# Financial Decision-Making Using the Implied Cost of Capital 

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## Declaration

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Signed: Saif Musabah Saif Al Mutairi

Date: 19 July 2019

To my family for their support and inspiration.


#### Abstract

In this thesis, I aim to shed light on the value of the market-implied cost of capital (ICC) in financial-decision making in three distinctive contexts. ICC is a forward-looking proxy for the expected return of a firm's stock which is implied from the current stock price and a choice of analyst forecasts or accounting forecasting models. As there has been a large variety of ICC models proposed in the literature, I first aim to identify the models with superior forecasting performance. To this end, I show through a comprehensive comparison that simple ICC models work better than more complicated widely used formulations in terms of forecasting future realised returns, and as a statistical quantity in terms of out-ofsample bias and measurement error variance. Specifically, a dividend discount model with a terminal value based on analysts' price target, or a price-over-earning ratio based estimate outperform more complicated ICC and risk factor models. These simple models coincide with market beliefs about expected returns more than more complex models. I find that ICC derived from models based on the residual income framework have better forecasting power than models that assume abnormal growth in earnings, in contrast to theory. Using mechanical earnings forecasts to replace analysts forecasts in ICC models does not consistently improve the forecasting ability of the models except for dividend discount models. Furthermore, adjusting the ICC estimates for firm characteristics and popular risk factors lead to better forecasts, and result in lower out-of-sample mean error and error variances, especially with models based on analysts earnings predictions and dividend discount models. I also develop a new estimator based on free cash flow to equity, and show that it predicts future returns and exhibit errors comparable to the best performing models, and I argue that it is a more economically sound construct than dividends.

Second, I capitalise on the ICC literature to derive forward-looking estimates of expected returns to improve the out-of-sample performance of portfolio selection strategies. I find that using ex-ante ICC estimates instead of the ex-post first moment as a proxy of expected returns in a tangency portfolio yields a higher out-of-sample risk adjusted returns and lower turnover. Moreover, I demonstrate that ICC-based market timing portfolios beat the conventional market-timing portfolio and naive $1 / \mathrm{N}$ strategy in terms of out-of-sample Sharpe


ratio and turnover. The evidence presented contributes to the research on how accounting information and models can be used to enhance investment decision making.

Third, I study the effect of risk similarity between acquirers and targets as captured by market implied cost of capital on mergers decisions and outcomes. I propose a new measure of risk similarity between two firms. This employs forward-looking market-implied cost of capital estimates to proxy for systematic risk. I use the new measure to study how risk similarity affects merger formation and outcomes. The empirical analysis provides evidence that firms with similar risk profiles are more likely to merge. The level of risk similarity is positively associated with the probability that an announced acquisition deal will be completed and negatively associated with the length of the period between deal announcement and completion. Mergers resulting from firms with high pre-merger risk similarity tend to lead to higher combined abnormal returns in the short-term and higher operating performance and lower risk in the long-term. The results indicate that risk similarity in mergers is in line with shareholder preferences, leads to less suboptimal investment in the target and facilitates improved management of the acquired assets. The evidence presented contributes to the research on determinants of M\&A success, provide a new perspective on the impact of how the risk-profile of a company as understood by the market affect investment decisions, and offers a new methodology for defining risk similarity between firms.

JEL classification: G11, G12, M41.

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## Contents

Declaration i
Abstract ..... iii
Acknowledgements ..... v
Contents ..... ix
List of Tables ..... xiv
1 Introduction ..... 1
2 A Comparison of Implied Cost of Capital Models ..... 16
2.1 Introduction ..... 16
2.2 Implied Cost of Capital Literature Review ..... 22
2.2.1 Gebhardt, Lee, and Swaminathan (2001) Model ..... 29
2.2.2 Claus and Thomas (2001) Model ..... 31
2.2.3 Easton, Taylor, Shroff, and Sougiannis (2002) Model ..... 33
2.2.4 Fitzgerald, Gray, Hall, and Jeyaraj (2013) Model ..... 35
2.2.5 O'Hanlon and Steele (2000) and Easton (2006) Model ..... 36
2.2.6 Gode and Mohanram (2003) Model ..... 37
2.2.7 PE, PEG, and Modified PEG Ratio Models ..... 37
2.2.8 Easton (2004) Model ..... 39
2.2.9 Ashton and Wang (2013) Model ..... 40
2.2.10 Wang (2018) Model ..... 43
2.2.11 Gordon and Gordon (1997) Model ..... 43
2.2.12 Botosan and Plumlee (2002) Model ..... 44
2.3 Data and Methodology ..... 44
2.3.1 Data ..... 44
2.3.2 Implied Cost of Capital Models ..... 46
2.3.3 Earnings and Other Forecasts ..... 51
2.3.4 Testing Methods ..... 53
2.3.4.1 Capturing Subsequent Future Returns ..... 53
2.3.4.2 Statistical Horse-Race using Models Confidence Set Method ..... 55
2.4 Descriptives ..... 58
2.5 Testing ICC Estimates as an Economic Quantity: Capturing the Variation in Subsequent Return ..... 65
2.5.1 Mechanical Earnings Forecasts for ICC Estimation ..... 71
2.5.2 Calibrating ICC Estimates Using Risk Factors ..... 77
2.5.3 Analysing the effect of using prior ICC estimates ..... 83
2.5.4 Introducing a new Model: FCF ..... 90
2.6 Testing ICC Estimates as a Statistical Quantity: Out-of-Sample Model Con- fidence Set ..... 101
2.6.1 Mechanical Earnings Forecasts for ICC Estimation ..... 108
2.6.2 Calibrating ICC Estimates Using Risk Factors ..... 118
2.6.3 The New Model:FCF ..... 122
2.7 Additional Analysis ..... 126
2.7.1 Size Effect ..... 126
2.7.2 Value Effect ..... 127
2.7.3 Momentum Effect ..... 127
2.7.4 Analysts Coverage Effect ..... 128
2.7.5 Long-term Growth in Earnings Effect ..... 128
2.7.6 Forecasts Dispersion Effect ..... 129
2.7.7 Leverage Effect ..... 130
2.7.8 Over/Under-pricing effect Effect ..... 130
2.7.9 Market Beta Effect ..... 131
2.7.10 Firm Specific Risk Effect ..... 131
2.7.11 Variation in Earnings Effect ..... 131
2.8 Conclusion ..... 132
3 Improving Portfolio Selection Using Implied Cost of Capital ..... 137
3.1 Introduction ..... 137
3.2 Data and Methodology ..... 142
3.2.1 Implied Cost of Capital Models ..... 142
3.2.2 Earnings Forecasts ..... 147
3.2.3 Portfolio Strategies ..... 148
3.2.4 Data, Estimation and Inference Procedure ..... 152
3.3 Descriptive Statistics ..... 155
3.4 Portfolio Selection Empirical Results ..... 160
3.4.1 Discussion of ICC Optimal Portfolios ..... 160
3.4.2 Discussion of ICC Market Timing Strategies ..... 162
3.5 Additional Analysis ..... 165
3.5.1 Portfolio Turnover ..... 165
3.5.2 Other Benchmark Portfolios ..... 172
3.5.3 Risk Factors Models ..... 174
3.6 Robustness Checks ..... 174
3.6.1 Timing Portfolios Tuning Parameter ..... 174
3.6.2 Moments Estimation Window ..... 175
3.7 A re-joinder: The ICC Models Horse Race and the Performance in Portfolio
Setting ..... 175
3.8 Conclusion ..... 176
4 The Effects of Risk Similarity on Mergers and Acquisitions: Evidence Using Market Implied Cost of Capital ..... 178
4.1 Introduction ..... 178
4.2 Data and Methodology ..... 184
4.2.1 ICC Similarity Measure ..... 184
4.2.2 ICC Models ..... 185
4.2.3 Data ..... 187
4.3 Descriptives ..... 190
4.4 Empirical Results ..... 194
4.4.1 Merger Pairs and ICC Similarity ..... 194
4.4.2 Likelihood of Deal Completion ..... 195
4.4.3 Duration of Deal Completion ..... 197
4.4.4 Combined Announcement Returns ..... 198
4.4.5 Abnormal Operating Performance ..... 202
4.5 Additional Analysis and Robustness Checks ..... 205
4.5.1 Risk Similarity Effect on Post-Acquisition Risk ..... 205
4.5.2 Cross Sectional Variations in Effects of Risk Similarity ..... 206
4.5.3 Beta as an Alternative Measure of Risk ..... 208
4.5.4 What is being Captured ..... 214
4.6 Conclusion ..... 214
5 Conclusion ..... 215
5.1 Summary ..... 215
5.2 Managerial Implications ..... 218
5.3 Limitations and Future Research ..... 219
Appendix A Horse Race Appendixes ..... 221
A. 1 Additional Regression Analysis ..... 221
A. 2 MCS Additional Analysis ..... 510
Appendix B Improving Portfolio Selection Appendixes ..... 547
Appendix C The Effects of Risk Similarities on Mergers and Acquisitions ..... 601
C. 1 Unbounded ICC Estimates ..... 601
C. 2 CAR Estimation Period ..... 608
References 626

## List of Tables

1 Implied Cost of Capital Models ..... 48
1 Implied Cost of Capital Models, Continued ..... 49
1 Implied Cost of Capital Models, Continued ..... 50
2 Summary Statistics of Firms' Characteristics ..... 59
3 Summary Statistics of Analysts Forecasts ..... 60
4 Summary Statistics of the Firm-Level ICC Estimates ..... 61
5 Spearman Correlation of the Firm-Level ICC Estimates ..... 62
6 Summary Statistics of the Variables used in the Mechanical Models ..... 63
7 Summary Statistics of the Earnings Forecasts from Mechanical Models ..... 63
8 Summary Statistics of the Control Variables used in Testing ICC Esti- mates ..... 64
9 Capturing Subsequent Return using Analysts forecasts based ICC ..... 69
9 Capturing Subsequent Return using Analysts forecasts based ICC ..... 70
10 Capturing Subsequent Return using HDZ forecasts based ICC ..... 73
11 Capturing Subsequent Return using RW forecasts based ICC ..... 74
12 Capturing Subsequent Return using EP forecasts based ICC ..... 75
13 Capturing Subsequent Return using RI forecasts based ICC ..... 76
14 Capturing Subsequent Return using Calibrated ICC ..... 79
14 Capturing Subsequent Return using Calibrated ICC ..... 80
14 Capturing Subsequent Return using Calibrated ICC ..... 81
14 Capturing Subsequent Return using Calibrated ICC ..... 82
15 Capturing Subsequent Return using Analysts forecasts based ICC - Ef- fect of Last Observation Carried Forward for up to 12 Months ..... 84
15 Capturing Subsequent Return using Analysts forecasts based ICC - Ef- fect of Last Observation Carried Forward for up to 12 Months ..... 85
16 Capturing Subsequent Return using HDZ forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months ..... 86
17 Capturing Subsequent Return using RW forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months ..... 87
18 Capturing Subsequent Return using EP forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months ..... 88
19 Capturing Subsequent Return using RI forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months ..... 89
20 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing ..... 94
20 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing ..... 95
21 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically ..... 96
21 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically ..... 97
21 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically ..... 98
21 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically ..... 99
21 Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically ..... 100
22 Out-of-Sample MEV Statistics and Pair-wise Comparison ..... 103
23 Out-of-Sample RMSE Statistics and Pair-wise Comparison ..... 104
24 Out-of-Sample MAE Statistics and Pair-wise Comparison ..... 105
25 Model Confidence Set Summary Results - Analysts Earnings Forecasts ..... 107
26 Out-of-Sample Pair-wise Comparison of MEV between ICC based on Analysts Forecasts and Mechanical Forecasts ..... 110
27 Out-of-Sample Pair-wise Comparison of RMSE between ICC based on Analysts Forecasts and Mechanical Forecasts ..... 111
28 Out-of-Sample Pair-wise Comparison of MAE between ICC based on Analysts Forecasts and Mechanical Forecasts ..... 112
29 Model Confidence Set Summary Results - Mechanical vs Analysts fore- casts ..... 113
29 Model Confidence Set Summary Results - Mechanical vs Analysts fore- casts ..... 115
30 Model Confidence Set Summary Results - HDZ Earnings Forecasts ..... 116
31 Model Confidence Set Summary Results - RW Earnings Forecasts ..... 116
32 Model Confidence Set Summary Results - EP Earnings Forecasts ..... 117
33 Model Confidence Set Summary Results - RI Earnings Forecasts ..... 117
34 Model Confidence Set Summary Results - Calibrated Estimates ..... 120
34 Model Confidence Set Summary Results - Calibrated Estimates ..... 121
34 Model Confidence Set Summary Results - Calibrated Estimates ..... 122
35 Model Confidence Set Summary Results - New Model Testing ..... 124
36 Out-of-Sample MEV, RMSE, and MAE Statistics and Pair-wise Com- parison ..... 125
37 Implied Cost of Capital Models ..... 144
37 Implied Cost of Capital Models, Continued ..... 145
37 Implied Cost of Capital Models, Continued ..... 146
38 Summary Statistics of Firms' Characteristics ..... 155
39 Summary Statistics of Analysts Forecasts ..... 156
40 Summary Statistics of the Firm-Level ICC Estimates ..... 157
41 Spearman Correlation of the Firm-Level ICC Estimates ..... 158
42 Summary Statistics of the Variables used in the Mechanical Models ..... 159
43 Summary Statistics of the Earnings Forecasts from Mechanical Models ..... 159
44 Summary: ICC Optimal Strategies Sharpe Ratio Comparison with Mean- Variance Strategy ..... 162
45 Summary: ICC Optimal Strategies Sharpe Ratio and Turnover Com- parison with Mean-Variance Strategy ..... 163
46 Summary: ICC Timing Strategies Sharpe Ratio Comparison with RRT Strategy ..... 165
47 Summary: ICC Timing Strategies Sharpe Ratio Comparison with $\mathbf{1 / N}$ Strategy ..... 166
48 Summary: ICC Timing Strategies Sharpe Ratio and Turnover Com- parison with RRT Strategy ..... 167
49 Summary: ICC Constrained Turnover Optimal Strategies Sharpe Ra- tio and Turnover Comparison with Constrained Turnover Mean-Variance Strategy ..... 170
50 Summary: ICC Turnover Constrained Timing Strategies Sharpe Ratio and Turnover Comparison with RRT Strategy ..... 171
51 Expected Return Models ..... 186
52 Sample Screens ..... 189
53 Summary Statistics for Actual and Pseudo-Control Deals ..... 191
54 ICC Estimates Summary Statistics ..... 192
55 Distribution of ICC Similarity (Percentiles) ..... 192
56 Summary Statistics for Sample Pairs Characteristics ..... 192
57 Deals by Merger Announcement Year ..... 193
58 Merger Pairs and ICC Similarity, ICC $\in[\mathbf{0 , 1 0 0}]$ ..... 196
59 Likelihood of Deal Completion, ICC $\in[\mathbf{0 , 1 0 0}]$ ..... 198
60 Duration of Deal Completion, ICC $\in[\mathbf{0 , 1 0 0}]$ ..... 199
61 Combined Announcement Returns, ICC $\in[0,100]$ ..... 201
62 Abnormal Operating Performance, ICC $\in[0,100]$ ..... 203
63 Post-Acquisition Goodwill Write-offs, ICC $\in[\mathbf{0 , 1 0 0}]$ ..... 204
64 Risk Similarity Effect on Post-Acquisition Risk ..... 205
65 Cross-Sectional Variation in Effects of ICC similarity on Merger Pair Formation ..... 209
66 Cross-Sectional Variation in Effects of ICC similarity on CAR ..... 210
67 Cross-Sectional Variation in Effects of ICC similarity on Post-Deal Ab- normal Operating Performance ..... 211
68 Combined Announcement Returns using Beta Similarity ..... 212
69 Abnormal Operating Performance using Beta Similarity ..... 213
94 Model Confidence Set Summary Results: Firm Size Effect ..... 511
94 Model Confidence Set Summary Results: Firm Size Effect, Continued ..... 512
94 Model Confidence Set Summary Results: Firm Size Effect, Continued ..... 513
95 Model Confidence Set Summary Results: Firm Value Effect ..... 514
95 Model Confidence Set Summary Results: Firm Value Effect, Continued ..... 515
95 Model Confidence Set Summary Results: Firm Value Effect, Continued ..... 516
96 Model Confidence Set Summary Results: Price Momentum Effect ..... 517
96 Model Confidence Set Summary Results: Price Momentum Effect, Con- tinued ..... 518
96 Model Confidence Set Summary Results: Price Momentum Effect, Con- tinued ..... 519
97 Model Confidence Set Summary Results: Long-term Growth in Earn- ings Forecast Effect ..... 520
97 Model Confidence Set Summary Results: Long-term Growth in Earn- ings Forecast Effect, Continued ..... 521
97 Model Confidence Set Summary Results: Long-term Growth in Earn- ings Forecast Effect, Continued ..... 522
98 Model Confidence Set Summary Results: Analysts Coverage Effect ..... 523
98 Model Confidence Set Summary Results: Analysts Coverage Effect, Continued ..... 524
98 Model Confidence Set Summary Results: Analysts Coverage Effect, Continued ..... 525
99 Model Confidence Set Summary Results: Earnings Forecasts Standard Deviation Effect ..... 526
99 Model Confidence Set Summary Results: Earnings Forecasts Standard Deviation Effect, Continued ..... 527
99 Model Confidence Set Summary Results: Earnings Forecasts Standard Deviation Effect, Continued ..... 528
100 Model Confidence Set Summary Results: Earnings Forecasts Coeffi- cient of Variation Effect ..... 529
100 Model Confidence Set Summary Results: Earnings Forecasts Coeffi- cient of Variation Effect, Continued ..... 530
100 Model Confidence Set Summary Results: Earnings Forecasts Coeffi- cient of Variation Effect, Continued ..... 531
101 Model Confidence Set Summary Results: Firm Leverage Effect ..... 532
101 Model Confidence Set Summary Results: Firm Leverage Effect, Con- tinued ..... 533
101 Model Confidence Set Summary Results: Firm Leverage Effect, Con- tinued ..... 534
102 Model Confidence Set Summary Results: Target Price Relative to Mar- ket Price Effect ..... 535
102 Model Confidence Set Summary Results: Target Price Relative to Mar- ket Price Effect, Continued ..... 536
102 Model Confidence Set Summary Results: Target Price Relative to Mar- ket Price Effect, Continued ..... 537
103 Model Confidence Set Summary Results: Market Beta Effect ..... 538
103 Model Confidence Set Summary Results: Market Beta Effect, Contin- ued ..... 539
103 Model Confidence Set Summary Results: Market Beta Effect, Contin- ued ..... 540
104 Model Confidence Set Summary Results: Beta Standard Error Effect ..... 541
104 Model Confidence Set Summary Results: Beta Standard Error Effect, Continued ..... 542
104 Model Confidence Set Summary Results: Beta Standard Error Effect, Continued ..... 543
105 Model Confidence Set Summary Results: Earnings Variation Effect ..... 544
105 Model Confidence Set Summary Results: Earnings Variation Effect, Continued ..... 545
105 Model Confidence Set Summary Results: Earnings Variation Effect, Continued ..... 546
115 Merger Pairs and ICC Similarity ..... 602
116 Likelihood of Deal Completion ..... 603
117 Duration of Deal Completion ..... 604
118 Combined Announcement Returns ..... 605
119 Abnormal Operating Performance ..... 606
120 Post-Acquisition Goodwill Write-offs ..... 607
121 Combined Announcement Returns, 3 Days Estimation Period ..... 609
122 Combined Announcement Returns, 11 Days Estimation Period ..... 610

## 1 Introduction

Implied cost of capital (ICC) estimates are forward-looking discount rates derived from accounting information, market data, and forecasts of future cash flows of the firms'. These discount rates of future cash flows, work as a proxy for the expected return from firms' stocks. ICCs are essentially derived by inverting accounting valuation models to solve for the discount rates. The literature used several accounting models to derive these ex-ante estimates such as dividend discount models, residual income models, and models of abnormal growth in earnings. This thesis examines ICC as a proxy for expected return and as a measure of risk in three distinctive contexts.

Firstly, I conduct horse-race between the various ICC models. It is different from any previous comparison of models performance in the ICC literature in that it is exhaustive in terms of models analysed, and two-dimensional in terms of the methodology used. The list of models includes versions based on analysts and mechanical earnings forecasts, calibrated versions using risk factors, portfolio-level estimates transformed to firm-level estimates, as well as simplified and naive estimates. Some of these versions are examined for the first time in the literature. I also develop a new ICC estimator derived from a Free Cash Flow model with desired properties. Moreover, the horse race is two dimensional in terms of methodology. The first methodology views the ICC estimates as an economic quantity, and is based on the tautology of Vuolteenaho (2002) and Campbell (1991) in decomposing returns. In implementing this methodology, I address literature criticisms of previous implementations in choosing proxies for firm cash flow news and economy wide news. The second methodology is the first application of Hansen, Lunde, and Nason (2011) Models Confidence Set in the ICC literature. Using out-of-sample loss functions to measure the mean error and the error variance, I investigate the validity and the relative performance of the ICC models in a statistical framework using the models' confidence set .

I then study the value of the ICC models by deploying the estimates into two novel empirical applications related to financial-decision making. The first is a portfolio selection application where the ICC estimates proxy for expected returns. The second is a corporate finance application where the ICC estimates work as proxies for how market participants
judge the riskiness of the underlying firm. The importance of the portfolio application stems from the fact that it is - to my knowledge - the first study to use the ex-ante ICC estimates to improve out-of-sample portfolio selection performance using two portfolio management styles: optimal strategies and market timing strategies. The second application also devises a new measure for comparing the riskiness of firms based on ICC estimates. I use this measure to test whether the similarity in the risk-profiles of firms impacts the probabilities and the outcomes of mergers and acquisitions.

The notions of cost of capital and expected returns are very central to finance and economics, which lead to a proliferation of estimating methods. Among these are proxies based on past realised returns, risk factor models, and models of ICC. Realised returns are known to be noisy proxies and therefore provide very poor estimates of expected returns (Elton (1999)). Botosan, Plumlee, and Wen (2011) find that some ICC models provide a valid construct of future expected returns, but not the factor models tested therein. Lee, So, and Wang (2017) evaluated several factor and ICC models, and concluded that "ICCs are particularly useful in tracking time-series variation in expected returns".

ICC estimates are derived by solving a valuation model for the discount rate. I analytically show the derivation and theoretical underpinnings of the most widely used models at the beginning of the first chapter, and Echterling, Eierle, and Ketterer (2015) provide an updated literature review of this research. The popularity of the ICC models stems from the fact that they are an ex-ante measure of expected return. These models have been used in a variety of finance applications. Due to the numerous models available to impute market implied cost of capital, it remains an open question which model or family of models performs best and in which setting. As shall be detailed in the first chapter, previous research attempted to address this question by comparing the ICC estimates against future realised returns or by contrasting them to risk factor models estimates. However, several problems should be noted regarding the previous research. Firstly, the conclusions are contradictory and inconclusive. For instance, studies like Easton and Monahan (2005) and Guay, Kothari, and Shu (2011) conclude that none of the ICC models is a valid proxy for subsequent returns, while Botosan, Plumlee, and Wen (2011) documented that some of these models are
in fact able to predict subsequent realised return. Second, the methods they utilise have been criticised in later research. For instance, setting the benchmark to factor models estimates have been criticised for setting the benchmark upon which the validity of ICC estimates is judged to unreliable estimates themselves (Easton and Monahan (2016)). Some other comparisons used Fama-Macbeth regression method to compare ICC estimates to future realised returns. These studies have been critiqued later for not controlling for cash flow news and shocks such as Guay et al. (2011), or using proxies that do not necessarily capture the intended control like in Botosan et al. (2011). Third, relevant studies use different sets of ICC models in the horse-race, which make it challenging to compare them.

To address these problems, the first chapter offers several contributions. Firstly, I unify the parameters of the horse-race between the ICC models. I apply the literature classical Fama-Macbeth regression methodology, based on the tautology of Vuolteenaho (2002) and Campbell (1991) in decomposing returns, to test which of these estimates reasonably capture subsequent future realised return after controlling for firm specific cash flow news and economy wide news. In applying this method, I address the concerns raised by Easton and Monahan (2016) and Wang (2018) about the choice of empirical variables in prior studies. This method test the ICC estimates as an economic quantity for its information content. Furthermore, I extend the investigation to test ICC estimates as a statistical quantity. I introduce the Model Confidence Set (MCS) non-parametric statistical methodology of Hansen, Lunde, and Nason (2011) to the ICC literature. Using MCS, I confirm the robustness of the results of the previous tests in a non-parametric statistic manner. To do so, I use a number of out-ofsample loss functions, including Root-Mean-Squared-Error (RMSE), Mean-Absolute-Error (MAE), and Measurement-Error-Variance (MEV). The use of the latter loss function in the MCS setting is to the best of my knowledge novel to this work. MEV importance in the context of expected returns validity testing stem from the fact that in most empirical applications the bias in expected returns (as captured by RMSE and MAE) is irrelevant as much as the measurement error variance (Lee, So, and Wang (2017)). In other words, minimising measurement error variance rationale is that for the majority of expected return applications, what matters is the deviation of the expected return rather than the absolute bias generated
by the proxy.
Using the regression method, I conclude that the simplest models such as the dividend discount model of Botosan and Plumlee (2002) (hereafter denoted by BP) and model based on the price-to-earnings ratio (PE) capture more variation in subsequent returns than any more sophisticated ICC or risk factor model. In fact, simplifying the BP model by limiting the forecasting horizon to one year only (hereafter denoted by TPDPS model), or to discounting the terminal value of the same model without dividend forecasts (hereafter denoted as Naive) works at least as good as the original BP model in terms of the variation they explain in subsequent returns. Moreover, contrary to the theoretical arguments that led to the development of ICC models based on abnormal growth in earnings framework (See Ohlson (2005) and Ohlson and Juettner-Nauroth (2005)), I find that ICC models based on residual income framework captures variation in subsequent returns better than the abnormal growth in earnings models.

The pair-wise comparison of the bias (i.e. out-of-sample RMSE and MAE) confirm that BP and PE models have relatively lower bias than more complex models. In the MCS testing, both of them were included in the models' confidence sets for more firms than any other model. Similarly, when the loss function in the MCS is set to be MEV, BP and PE win the race. Specifically, they get included in the confidence set of $55.19 \%$ and $54.98 \%$ of the firms in the sample respectively when compared to the other models simultaneously, while the nearest model to them record $50.87 \%$ only. The most widely used model in the literature GLS (Gebhardt, Lee, and Swaminathan (2001)), leads to low mean bias. However, in terms relative performance against other models using the error variance as a loss function, and in terms of capturing the variation in subsequent returns, its forecasting performance is inferior to the BP and PE .

Moreover, I extend the horse race to involve ICC models based on mechanical earnings forecasts instead of analysts earnings forecasts. Each ICC model has been implemented using four mechanical earnings forecasts to test whether these could improve the prediction of realised returns (See for instance, Hou, van Dijk, and Zhang (2012)). Generally, I find evidence to the contrary, most ICC models have a higher power of explaining the variation
in subsequent returns using analysts estimates, and no mechanical-based estimate could do better than the Naive model. However, among all types of ICC models, those based on dividend discount models benefit the most from mechanical forecasts. This is attributed to the fact that mechanical estimates of dividends tend to be more stable and in line with firms' fundamentals, while some firms in reality pay dividends that are not in-line with their capacity to pay due to reasons that include taxes or ownership structures. Among the four mechanical models used in the testing, I find that ICC models benefit the most from Hou, van Dijk, and Zhang (2012) (HDZ) forecasts and the least from a random walk (RW) forecasting process as presented by Gerakos and Gramacy (2013). In the pair-wise comparison of out-of-sample bias and measurement error variances, this conclusion is further demonstrated. For instance, except for the HDZ, the other three mechanical forecasting models resulted in almost no improvement to any of ICC models in terms of measurement error variance as compared to analysts forecasts. Among the models that benefited from HDZ forecasts, none are based on abnormal growth in earnings framework. Moreover, the MCS results demonstrate that dividend discount models work better with mechanical estimates, while most of the other models work best with analysts forecasts.

Third, I use Fitzgerald, Gray, Hall, and Jeyaraj (2013) methodology of calibrating their model estimates using common risk factors to reduce firm-level estimation errors. I calibrate the full range of ICC models. This is the first study to apply such calibration process to the full list of ICC models, and to involve such estimates in the horse-race. The estimation error targeted by calibration could be due to data noise, earnings forecast bias, or incompatibility of certain models with specific firms. The application of such calibration to a wide range of models, and testing the improvement it provides in capturing future returns in this setting is novel, and ensure that an exhaustive list of ICC models are tested. Analysts forecasts based ICC models benefited from the calibration more than the versions based on mechanical forecasts. Also, the dividend discount models, especially BP, benefited more than any other ICC model from the process of calibration, which further demonstrates the desirability of dividends estimates that are in line with the fundamentals of the firm. Again, using MCS methodology confirms that calibrated analysts estimates perform better than all
other versions of the respective ICC models except for dividend discount models. Dividend discount models work best using mechanical estimates.

Fourth, previous horse races excluded ICC models that yield portfolio-level estimates. I utilise Nekrasov and Ogneva (2011) methodology in which they extend the Easton, Taylor, Shroff, and Sougiannis (2002) portfolio-level model to generate firm-level estimates using common risk and growth factors. I use the same principle to obtain firm-level estimates from portfolio-level models of Easton (2004) and O'Hanlon and Steele (2000) as operationalised by Easton (2006). Previous research comparing the performance of ICC models restricted the horse-race to pure firm-level models. Thanks to this transformation, I extend the list of participating 'horses' to include transformed portfolio-level estimates. These models, however, consistently under-perform pure firm-level estimates in predicting subsequent returns and exhibit larger biases.

Fifth, I present a new approach to estimate the cost of equity capital. I use a discounted Free Cash-Flow to Common Equity holders (FCFE) model in conjunction with analysts estimates and market prices to estimate implied cost capital for the historical constituents of the S\&P 1500. This approach is distinct from prior models in that it is not based on a dividend discount model, residual income, or abnormal growth models. Therefore, it deals with many of the issues attributed to these models. For instance, it holds on a total basis, unlike the residual income model that require value neutrality for future shareholders in order to hold. Also, it is not subject to the dividend models issues such as the non-alignment of dividend paid with firm's capacity, or influence of major shareholders on dividend policy. Most importantly, free cash flow is a more robust concept in representing the economic reality of a firm than earnings since it is subject to less accounting assumptions and less prone to earnings management. I show that this model works as good as the best performing models in the horse race.

Sixth, I investigate models performance for several sub samples of the market based on firms characteristics such as size, value, price momentum, leverage, market beta, beta standard error, number of analysts covering the firm, earnings forecasts dispersion, earnings long-term forecasted growth, target price relative to market price, and past earnings vari-
ability. The purpose of this testing is to assess whether some models work better with a particular set of firms. I find little evidence that any of the models are affected as a statistical quantity by these characteristics. However, as an economic construct, some characteristics affected the ICC estimates ability to predict future realised returns. In most of the cases, the riskier is the firm, the less effective are the models in predicting subsequent returns. For instance, small firms, firms with low earnings growth, highly leveraged, over-priced (low target-to-market price ratio) render most of the ICC models insignificant. The exceptions are the Naive target-to-market price ratio model in the case of small or highly leveraged firms, and the simple price-over-earnings ratio model in the case of overpriced firms. Moreover, firms with large number of analysts, or low standard deviation (but not using coefficient of variation) between analysts forecasts of earnings also pose issues to models ability to predict future returns with the exception of the Naive target-to-market price ratio, the price-over-earnings ratio model, and dividend discount models with terminal values based on target prices. Finally, low market beta and beta standard error firms' are anomalies for the ICC models.

In summary, the first chapter bridge the gap in current research about ICC models performance and validity by testing an exhaustive list of models (including analysts based, mechanical-based, calibrated versions, and transformed portfolio level estimates) extensively using Fama-Macbeth regression and Models Confidence Set. Dividend discount model with a terminal value based on target price, especially if combined with mechanical forecasts, and price-over-earnings ratio based ICC estimates out-perform other ICC models. Finally, calibrating the ICC models improves the performance of the estimates, especially those based on analysts forecasts, which in most cases beat all other versions of models.

In the second chapter, I steer the analysis toward an empirical utilisation of ICC estimates in portfolio selection. The conventional approach in portfolio management is to estimate expected returns using historical data. This approach leads to portfolios with poor performance for two reasons. First, the risk-return profile of the assets and the risk attitude of the investors tend to change over time. Second, history-based estimates of expected returns are subject to significant errors that translate into unstable and inefficient portfolios. DeMiguel, Garlappi,
and Uppal (2009) concluded that "although there has been considerable progress in the design of optimal portfolios, more effort needs to be devoted to improving the estimation of the moments, and especially expected returns".

To deal with such issues in historical realised returns, the majority of the literature resorted to improved econometric specifications such as Merton (1980), Harvey (1991), Chan, Karolyi, and Stulz (1992), Fama and French (1998), Griffin (2002), and Karolyi and Stulz (2003) to name few. In fact, this vast literature tries to improve the performance of optimal portfolios by dealing with estimation errors using different approaches. The Bayesian approach, for instance, involve endeavours like using diffuse-priors (see for instance, Barry (1974), Bawa, Brown, and Klein (1979), Kandel and Stambaugh (1996), and Barberis (2000)), using shrinkage estimators (see for example, Jobson and Korkie (1980), Jorion (1985), and Jorion (1986)), or determining a prior based on asset pricing models (like Black and Litterman (1992), Pastor and Stambaugh (2000), and Pastor (2000)). Other strands of literature resorted to techniques like 'robust' diversifications, optimal diversification across estimation risk, and exploiting moment restrictions (see for instance, MacKinlay and Pastor (2000), Goldfarb and Iyengar (2003), Kan and Zhou (2007), and Garlappi, Uppal, and Wang (2007)). Moreover, other work focused on the covariance matrix estimation error (for instance, Best and Grauer (1992), Ledoit and Wolf (2004), and Kourtis, Dotsis, and Markellos (2012)), or imposing restricting constraints on the portfolio weights (for example, Frost and Savarino (1988), Chopra (1993), and Jagannathan and Ma (2003)). Unlike the previous work that improves portfolio selection by working on the estimation error of realised moments, this chapter reverts back to the basics that portfolio selection is a forward looking task, and hence, its inputs are supposed to be forward looking. Therefore, the main contribution of this chapter is to introduce market implied expected returns in a simple portfolio selection setting to demonstrate its potential benefits over ex-post returns in terms of risk-adjusted portfolio return.

To the best of my knowledge, attempting to demonstrate the improvement in the out-ofsample portfolio performance using the ex-ante cost of capital estimates as compared to the performance of strategies based on ex-post realised return is not established in the portfolio
literature. This work is different from the work of DeMiguel, Plyakha, Uppal, and Vilkov (2013), Kostakis, Panigirtzoglou, and Skiadopoulos (2011), and Câmara, Chung, and Wang (2009), as they attempt to infer implied expected return from options and other derivatives information. The focus here is the fundamentals of the individual firms instead of technical analysis of option implied information. In addition to the novelty of this ICC application, the same exhaustive list of ICC models is used in this testing including pure firm level estimates from analysts based forecasts and cross-sectional forecasts of earnings, as well as calibrated and transformed portfolio-level estimates.

I deploy these ex-ante measures in two portfolio management styles: (1) an optimal tangency portfolio setting, and (2) in market timing portfolio selection setting as recommended by Kirby and Ostdiek (2012). In both settings, I find good evidence that ICC expected return estimates have better out-of-sample performance against portfolios using realised returns.

More specifically, the results demonstrate that using ICC estimates rather than an ex-post first moment in an optimal portfolio result in more stable weights, higher out-of-sample Sharpe ratio, and lower turnover. For instance, Gebhardt, Lee, and Swaminathan (2001) ICC model which is one of the most widely used in the literature generate an out-of-sample Sharpe of 0.433 and turnover of 2.684 as compared to mean-variance portfolio Sharpe of -0.370 and turnover of 28.089. Similarly, I document at least 94 ICC versions with statistically better Sharpe ratios and lower turnover than the mean-variance portfolio.

Moreover, I find those market timing strategies that use ICC estimates generate a higher out-of-sample average risk-adjusted return, and on many occasions, lower turnovers than both conventional market timing portfolios and naive allocations like 1/N. Specifically, 21 ICC versions reported statistically better Sharpe ratios and lower turnover than the conventional market timing portfolio of Kirby and Ostdiek (2012), and many more with statistically better Sharpe ratios but practically similar turnover. Similarly, 91 of ICC market timing allocations reported statistically higher out-of-sample risk-adjusted return than $1 / \mathrm{N}$.

Due to the fact that the formulations used to operationalise the ICC strategies are known to be disadvantaged in terms of estimation risk and turnover, I introduce turnover-constrained versions of the portfolios as described by Kourtis (2015). Using these portfolios, I provide
evidence that ICC expected return estimates generate better out-of-sample risk-adjustedreturn than strategies that use historical moments, even after constraining the turnover to the turnover generated from an equally weighted portfolio. I find that the ICC strategies retain their edge in terms of risk-adjusted returns but with considerably lower turnover.

The evidence presented in this chapter contributes to the portfolio selection research by introducing a new perspective to the estimation of expected return. To the best of my knowledge, it is the first attempt to use the findings in the implied cost of capital literature to improve portfolio performance. This work demonstrates how accounting information can be used to enhance investment decision making.

Finally, the third chapter deploys ICC ex-ante estimates in a mergers and acquisitions study, where these discount rates are taken to represent how risky is the firm from the market point of view. In other words, ICC captures how market participants perceive the level of risk of the respective firms because it is the average discount rate applied by investors to future expected cash flows to determine the worth of the company. In fact, Pastor, Sinha, and Swaminathan (2008) and others show ICC to be perfectly correlated with the conditional expected stock return and helps detect the inter-temporal risk return relation. Taking this into consideration, I devise a new measure of similarity in terms of risk profile between firms' to address the following gap in the literature.

The literature offers ample evidence that post-merger integration between target and acquirer is the corner-stone to M\&A deals success. In fact, Larsson and Finkelstein (1999) claim that it is the most important factor of success. The ease of integration is induced by factors like the similarity of governance and CSR practises between the two firms (Bereskin, Byun, Officer, and Oh (2018)), national and firm cultural similarities (Weber, Shenkar, and Raveh (1996)), management style and organizational similarities (Datta (1991)), technology and knowledge similarities (Makri, Hitt, and Lane (2009)), marketing ideology (Homburg and Bucerius (2005)), strategic characteristics similarity (Ramaswamy (1997)), resources similarity and complementarity (Harrison, Hitt, Hoskisson, and Ireland (1991), and Chen and Wang (2014)), and ownership similarity (Bettinazzi, Miller, Amore, and Corbetta (2018)). However, there has been little empirical evidence about whether the risk-profile
fit between the target and the acquirer induce corporate integration, and hence, whether it is an important determinant of M\&A transactions success. I address this gap by investigating the effects of similarities in firms' implied cost of capital - to proxy for the degree of risk attached by market participants' to the entities - on merger likelihoods and outcomes. Specifically, I assess whether entities with similar risk - implied cost of capital - are more likely to form M\&A pairs, and if so, whether such transactions enjoy better outcomes.

The cost of capital represents the opportunity cost faced by the firm in spending its limited resources. Due to the differences in the cost of capital between firms, firms tend to attach different present values to mergers. Such differences in discount rates lead to varying incentives and objectives for merger formations and subsequently lead to different outcomes (See for instance, De Roos (2004) and Tombak (2002)). The differences in the discount rates applied by the market to various firms exist due to the different risk associated with different firms. For instance, Merton (1974), Andersson (2008), and Chava and Purnanandam (2010) show that this is due to different probabilities of bankruptcy. Others have shown that it is due to the risk of misusing agency and imperfect information received by the market (Harrington (1989)).

The theoretical motive underpinning this chapter boils down to the fact that firms have no incentive to change their risk profile dramatically by acquiring a business that is extremely different in terms of risk, especially if it is extremely riskier. Levi, Li, and Zhang (2012) argue that firms actively adjust behaviour to maintain the desired level of risk (i.e. the exhibit risk homeostasis behaviour). They show for instance, that firms witnessing risk level decline relative to peers will experience an increase in the level of risk to the original level post M\&A transactions. Similar patterns are also documented by Hackbarth and Morellec (2008) and Carlson, Fisher, and Giammarino (2010). Firms and managers have various reasons for maintaining the desired level of risk. Firstly, market participants do not appreciate firms changing their risk profiles dramatically, for instance, by acquiring significantly more or less riskier firm. By changing the risk profile significantly, firms face the threat of losing some of its investor base, which is costly in terms cost of funds (Grinblatt, Masulis, and Titman (1984), Lamoureux and Poon (1987), Kadlec and Mcconnell (1994), Miller (1999), Foerster
and Karolyi (1999), and Grullon, Kanatas, and Weston (2004)). Investors pick stocks taking into consideration the riskiness of the underlying firms. Dramatically changing the riskprofile not only create mis-balances in investors portfolios of assets, but also put off investors due to the uncertainty and required research effort and resources needed in predicting firms' cash flows. This phenomenon is portrayed in the literature on information acquisition in competitive markets (e.g. Grossman, Stiglitz, Grossman, and Stiglitz (1980) and Verrecchia (1982)). Secondly, it is safer for the management to undertake corporate strategies that are in line in terms of risk to those taken by firms that are held to be widely comparable by the market and the board, as compared to taking idiosyncratic strategies (Levi et al. (2012)). This is due to the significant cost attached to undertaking a failing strategy alone as compared to failing with others. Such risk aversion and pressure to revert to 'norms' is well documented in financial decisions literature (e.g. Wermers (1999), Hong, Kubik, and Solomon (2000), and Hong and Kubik (2003)).

The first hypothesis is that the higher the similarity in the systematic risk between two firms is, the higher the probability that the firms will merge together is. This hypothesis is motivated by two rationales. First, all else equal, the shareholders of the acquirer would prefer transactions that do not alter the systematic risk of the firm. An acquisition that involves targets which can impact the risk profile of the firm can lead to costly rebalancing in the shareholders portfolio. This is because shareholders may desire to maintain a desired level of risk or the merged firm may be incompatible with their investment style. Second, dissimilarities in the risk profile between the firms are likely to reflect dissimilarities in the risk propensity between their top management. Such differences in the management style can manifest in merger negotiations between the two parties and prevent the merger from forming (Datta (1991), Ramaswamy (1997), and Lin, Wei, and Xie (2018)).

If the acquiring firm's shareholders favour targets of similar risk, one should expect to observe a positive relation between pre-merger risk similarity and the return on the acquirer's stock around deal announcements. I further hypothesize a positive relation between pre-merger risk similarity and post-merger profitability and risk. Again, differences in the pre-merger risk of the two firms can represent differences in the risk-attitudes of the man-
agement which are known to negatively affect post-merger performance (Datta (1991), and Ramaswamy (1997)). For example, the aggressive management of a relatively high-risk firm is likely not to be suitable to manage the assets and resources of a conservative firm (Thomas, Litschert, and Ramaswamy (1991)). The hypotheses can be further supported by the finding of Kruger, Landier, and Thesmar (2015) that firms tend to suboptimally invest in targets with different risk. As managers tend to use a single discount rate corresponding to the cost of capital of their firm when making merger decisions, they tend to ignore target risk and end up with worse merger outcomes in both the short- and the long-term.

This work introduces a new measure of similarity in risk profiles between firms that is in line with measures used in Bereskin, Byun, Officer, and Oh (2018), Bena and Li (2014), Bloom, Schankerman, and Reenen (2013), and Jaffe (1986). The ICC similarity measure estimates the pairwise closeness of any two firms using 30 estimates of implied cost of capital. Using this ICC measure of similarity, I document that mergers are more likely between pairs of firms with higher ICC similarity. The testing shows that a one standard deviation increase in the ICC similarity increases the odds of a pair of firms merging by 24.45\% relative to a matched control sample of possible deals which did not happen. I then report evidence that a one standard deviation increase in ICC similarity index is associated with a $35 \%$ increase in the odds of completing an announced deal, and at a $34 \%$ shorter duration between announcement and effective date. Moreover, the acquirers in the top 25\% of the ICC similarity spectrum enjoy more than $4 \%$ greater increase in long-term abnormal operating performance than deals with lower risk similarity between the participating firms as well as significantly less post-acquisition goodwill write-offs. Moreover, I find that ICC similarity is positively associated with combined cumulative abnormal returns (CAR), which suggest that the markets appreciate deals with better risk-fit between the merger pair. In the additional analysis section, I show that the risk similarity between the target and the acquirer result in a lower average cost of capital of the combined firm in the two years subsequent to the completion of the deal.

For robustness, I address possible issues like the possibility that risk similarity index is capturing no more than the similarity in culture. I find no evidence of such a claim. The
correlation between cultural similarity and risk similarity is indistinguishable from zero. Moreover, I argue in the methodology section that the ex-ante implied cost of capital is a far better proxy of capturing the riskiness of a firm to make investment decisions than ex-post risk factors like the market beta. I find a very low correlation between a similarity score based on beta and a similarity score based on ICC. This is expected due to the nosiness of ex-post estimates, which make them less useful for inference (Lee, Ng, and Swaminathan (2009)). Rerunning the tests using the beta similarity result in no major change in the results, except them being weaker.

Furthermore, I limit the ICC estimates to those based on analysts forecasts only. I find that the results are robust to choice of earnings forecasts source. I investigate the crosssectional variation in the effects of the risk similarity on the deal likelihoods and outcomes. I find that the effect is stronger in labour intensive industries as compared to capital intensive industries. The effect is more prevalent in horizontal deals, followed by diversifying deals. The effect of the similarity in risk is less evident in vertical deals, perhaps due to the different motivation behind such deals (i.e. securing a customer or a supplier). Also, the effect is more observable in deals that involve larger targets and deals with acquirers that are considerably riskier than the target.

This chapter contributes to different strands in the literature. First, I identify risk relatedness between two firms as a driver of M\&A activity. In this manner, I add to the literature that examines the effects of various types of similarity between firms in merger formation and success (e.g., see Bereskin, Byun, Officer, and Oh (2018) and Bettinazzi, Miller, Amore, and Corbetta (2018) and the references therein). Second, I support previous research that examines the role of the systematic risk of the target in M\&A outcomes. For example, Hackbarth and Morellec (2008) model the dynamics of the beta of the bidding firm around a merger. Their model predicts that the beta of the acquirer should increase (decrease) before the acquisition, if it is higher (lower) than the target beta while a reversal of this change is predicted after the merger. Kruger, Landier, and Thesmar (2015) provide evidence that managers tend to ignore the risk of the target as reflected in the traditional weighted average cost of capital (WACC) measure. As a result, they tend to engage in value-destroying
transactions when the risk of the target is higher than that of the acquirer. A fundamental difference between these studies and this chapter is that I use the implied cost of capital instead of the beta as a proxy of systematic risk. Third, I contribute to the literature that examines how the cost of capital of the firm changes post-merger. For instance, Hann, Ogneva, and Ozbas (2013) use the ICC to show that a firm's systematic risk decreases when it engages in diversification mergers. By also using ICC to proxy the cost of equity capital, I show that the cost of capital of the merged entity is inversely related to pre-merger risk similarity. I attribute this finding to more effective management of the resources and the internal capital of the merged firm for firms with similar management in terms of risk attitudes, as discussed in Datta (1991).

## 2 A Comparison of Implied Cost of Capital Models

### 2.1 Introduction

The centrality of the notion of the cost of capital and expected returns cannot be overemphasised in the finance realm. Several proxies have been used by academics and practitioners to estimate expected returns. Most notable of those are proxies based on past realised returns, risk factor models, and models of Implied Cost of Capital (ICC). It is well documented that realised returns are noisy proxies and therefore provide very poor estimates of expected returns (see for instance, Campbell (1991), Elton (1999), Gebhardt, Lee, and Swaminathan (2001), Pastor, Sinha, and Swaminathan (2008), DeMiguel, Plyakha, Uppal, and Vilkov (2013), Ardia and Boudt (2015), and the references therein). Therefore, factor models and ICC models gained traction in the literature, and many models were proposed and tested for their goodness of predicting future expected returns. For instance, Botosan, Plumlee, and Wen (2011) find that some ICC models provide a valid construct of future expected returns, but not the factor models tested therein. Lee, So, and Wang (2017) evaluated several factor and ICC models, and concluded that "ICCs are particularly useful in tracking time-series variation in expected returns".

The ICC estimates, which are derived by inverting fundamental valuation models such as the Residual Income and the Abnormal Earnings Growth model to solve for the discount rate, has been subject to vast theoretical and empirical research. I analytically show the derivation and theoretical underpinnings of the most widely used models in the next section. Echterling, Eierle, and Ketterer (2015) provide an updated literature review of this research.

The popularity of the ICC models stems from the fact that they are an ex-ante measure of expected return. These models have been used in a variety of finance applications such as shareholders control rights and agency cost (Guedhami and Mishra (2009), and Chen, Chen, and Wei (2011b)), environmental sustainability Gupta (2018), audit quality (Hope, Kang, Thomas, and Yoo (2009)), labour unions, politics and religion (Chen, Kacperczyk, and Ortiz-Molina (2011a), Boubakri, Guedhami, Mishra, and Saffar (2012), El Ghoul, Guedhami, Ni, Pittman, and Saadi (2012)), corporate governance (Chen, Chen, and Wei
(2009)), family business control (Boubakri, Guedhami, and Mishra (2010)), social responsibility (El Ghoul, Guedhami, Kwok, and Mishra (2011)), and financial reporting (Daske (2006)) to name a few. Due to the numerous models available to impute market implied cost of capital, it is an open research question to find which of these models work better if at all, and in which applications does it perform better. Previous research attempted to address this question by comparing the ICC estimates against future realised returns. Easton and Monahan (2005) and subsequently Guay, Kothari, and Shu (2011), concluded that none of the ICC models they examined provide a valid proxy of future realised return. On the contrary, after controlling for firm-level and economy news, Botosan, Plumlee, and Wen (2011) documented a positive association between future realised returns and several ICC proxies. Moreover, Pastor, Sinha, and Swaminathan (2008) find that market return volatility is positively associated with market level ICC estimates. Other studies like Botosan and Plumlee (2005) attempted to evaluate the validity of ICC estimates by contrasting them to risk factor models estimates. This method has been criticised by later research for setting the benchmark to models that are known to yield unreliable estimates themselves (Easton and Monahan (2016)). Botosan and Plumlee (2005) results were that the dividend-based ICC model and the model based of PEG (Price to Earnings Growth) ratio are associated with firm specific risk characteristics and hence are valid, while models based on the residual income and abnormal growth are not. Overall, the literature document dissimilar conclusions about the validity of the ICC estimates, and relevant studies use different sets of ICC models, which make it challenging to compare them.

This chapter offers several contributions. Firstly, I unify the parameters of the horse-race between the ICC models. I apply the literature classical Fama-Macbeth regression methodology to test which of these estimates reasonably capture subsequent future realised return after controlling for firm specific cash flow news and economy wide news. Furthermore, I introduce the Model Confidence Set (MCS) statistical methodology of Hansen, Lunde, and Nason (2011) to the ICC literature. Using MCS, I confirm the robustness of the results of the previous tests statistically. To do so, I use a number of out-of-sample loss functions including Root-Mean-Squared-Error (RMSE), Mean-Absolute-Error (MAE), and

Measurement-Error-Variance (MEV). The use of the latter loss function in the MCS setting is to the best of my knowledge novel to this work. MEV importance in the context of expected returns validity testing stem from the fact that in most empirical applications, the bias in expected returns (as captured by RMSE and MAE), is not as important as the measurement error variance (Lee, So, and Wang (2017)). In other words, minimising measurement error variance method rationale is that for the majority of expected return applications, what matters is the deviation of the expected return rather than the absolute bias generated by the proxy. Nevertheless, I also set the loss function for the horse race to the root mean squared error (RMSE) and mean absolute error (MAE), which are the classical tools for analysing the validity of forecasts. It represents the bias magnitude, which is still important for some empirical applications (see for instance, applications in Claus and Thomas (2001), Fama and French (2002), Ashton and Wang (2013), and Fitzgerald, Gray, Hall, and Jeyaraj (2013)). Therefore, this horse-race tests the various ICC proxies as an economic construct as well as a statistical construct.

Using the regression method, I find that the simplest models such as the dividend discount model of Botosan and Plumlee (2002) (hereafter denoted by BP) and a model based on the price-to-earnings ratio (PE) capture more variation in subsequent returns than any more sophisticated ICC or risk factor models. In fact, simplifying the BP model by limiting the forecasting horizon to one year only (hereafter denoted by TPDPS model), or to discounting the terminal value of the same model without dividend forecasts (hereafter denoted as Naive) works at least as well as the original BP model in terms of the variation they explain in subsequent returns. Moreover, contrary to the theoretical arguments that led to the development of ICC models based on abnormal growth in earnings framework (see Ohlson (2005) and Ohlson and Juettner-Nauroth (2005)), I find that ICC models based on the residual income framework captures variation in subsequent returns better than the abnormal growth in earnings models.

The pair-wise comparison of the bias (i.e out-of-sample RMSE and MAE) confirm that BP and PE models have relatively lower bias than more complex models. In MCS testing, both of them were included in the model confidence sets for more firms than any other
model. Similarly, when the loss function in the MCS is set to be MEV, BP and PE win the race. Specifically, they get included in the confidence set of 55.19 and 54.98 percent of the firms in the sample respectively when compared to the other models simultaneously, while the nearest model to them record $50.87 \%$ only. The most widely used model in the literature GLS (Gebhardt, Lee, and Swaminathan (2001)), report low mean bias. However, in terms of relative performance against other models using the error variance as a loss function, and in terms of capturing the variation in subsequent returns, its forecasting performance is subordinate to the BP and PE .

Secondly, I extend the horse race to involve ICC models based on mechanical earnings forecasts instead of analysts earnings forecasts. Each ICC model has been implemented using four mechanical earnings forecasts to test whether doing away with analysts-'biased’ forecasts could improve the prediction of realised returns. Generally, I find evidence to the contrary, most ICC models have a higher power of explaining the variation in subsequent returns using analysts estimates, and no mechanical-based estimate could do better than the naive approach. However, among all types of ICC models, those based on dividend discount models benefit the most from mechanical forecasts. This is attributed to the fact that mechanical estimates of dividends tend to be more stable and in line with firms' fundamentals, while some firms in reality pay dividends that are not in-line with its capacity to pay due to reasons that include taxes or ownership structures. Among the four mechanical models used in the testing, I find that ICC models benefit the most from Hou, van Dijk, and Zhang (2012) (HDZ) forecasts and the least from a random walk forecasting process as presented by Gerakos and Gramacy (2013). In the pair-wise comparison of out-of-sample bias and measurement error variances, this conclusion is further demonstrated. For instance, except for the HDZ, the other three mechanical forecasting models resulted in almost no improvement to any of ICC models in terms of measurement error variance as compared to analysts forecasts. Among the models that benefited from HDZ forecasts, none are based on abnormal growth in earnings framework. Moreover, the MCS results demonstrate that dividend discount models work better with mechanical estimates, while most of the other models work best with analysts forecasts.

Thirdly, I use Fitzgerald, Gray, Hall, and Jeyaraj (2013) methodology of calibrating their model estimates using common risk factors to reduce firm-level estimation errors to calibrate the full range of ICC models. The estimation error could be due to data noise, earnings forecast bias, or incompatibility of certain models with specific firms. The application of such calibration to a wide range of models, and testing the improvement it provides in capturing future returns in this setting is novel also. Analysts forecasts based ICC models benefited from the calibration more than the versions based on mechanical forecasts. This is due to the fact that many of the calibration factors are already used in the mechanical earnings forecast process. Also, the dividend discount models, especially BP, benefited more than any other ICC model from the process of calibration, which further demonstrates the desirability of dividends estimates that are in line with the fundamentals of the firm. Again, using MCS methodology confirms that calibrated analysts estimates perform better than all other versions of the respective ICC models except for dividend discount models. Dividend Discount models work best using mechanical estimates.

Fourth, I utilise Nekrasov and Ogneva (2011) methodology in which they extend the Easton, Taylor, Shroff, and Sougiannis (2002) portfolio-level model to generate firm-level estimates using common risk and growth factors. I use the same principle to obtain firm-level estimates from portfolio-level models of Easton (2004) and O'Hanlon and Steele (2000) as operationalised by Easton (2006). Previous research comparing the performance of ICC models restricted the horse-race to pure firm-level models. Thanks to this transformation, I extend the list of participating 'horses' to include transformed portfolio-level estimates. These models, however, consistently under-perform pure firm-level estimates in predicting subsequent returns and exhibit larger biases.

Fifth, I present a new approach to estimate the cost of equity capital. I use a discounted Free Cash-Flow to Common Equity holders (FCFE) model in conjunction with analysts estimates and market prices to estimate implied cost capital for the historical constituents of the S\&P1500. This approach is distinct from prior models in that it is not based on the dividend discount model, residual income, or abnormal growth models. Therefore, it deals with many of the issues attributed to these models. For instance, it holds on a total
basis, unlike the residual income model that require value neutrality for future shareholders in order to hold. Also, it is not subject to the DDM issues such as the non-alignment of dividend paid with firm's capacity, or influence of major shareholders on dividend policy. Most importantly, free cash flow is a more robust concept in representing the economic reality of a firm than earnings since it is subject to less accounting assumptions and less prone to earnings management. I show that this model works as good as the best performing models in the horse race.

Sixth, I investigate models performance for several sub-samples of the market based on firms characteristics such as size, value, price momentum, leverage, market beta, beta standard error, number of analysts covering the firm, earnings forecasts dispersion, earnings long-term forecasted growth, target price relative to market price, and past earnings variability. The purpose of this testing is to assess whether some models work better with a particular set of firms. I find little evidence that any of the models are affected as a statistical construct by these characteristics. However, as an economic construct, some characteristics affected the ICC estimates ability to predict future realised returns.

In most of the cases, the riskier is the firm, the less effective are the models in predicting subsequent returns. For instance, small firms, firms with low earnings growth, highly leveraged, over-priced (low target-to-market price ratio) render most of the ICC models insignificant. The exceptions are the Naive target-to-market price ratio model in the case of small or highly leveraged firms, and the simple price-over-earnings ratio model in the case of overpriced firms. Moreover, firms with large number of analysts, or low standard deviation (but not using coefficient of variation) between analysts forecasts of earnings also pose issues to models ability to predict future returns with the exception of the Naive target-tomarket price ratio, the price-over-earnings ratio model, and dividend discount models with terminal values based on target prices. Finally, low market beta and beta standard error firms' are anomalies for the ICC models.

The remainder of this chapter is divided as follows. Firstly, I analytically show how the implied cost of capital models were developed in the literature and discuss the families of the models, the underlying assumptions and provide a background for the subsequent testing.

Subsequently, a description of the data and testing methodologies is presented, followed by two sections of testing. In the first section, I test the ICC models as an economic construct for their ability to capture subsequent returns. In the second section, the ICC models are tested as a statistical construct in terms of out-of-sample mean error and error variance using MCS. In the final section, I provide extensive testing for sub-samples to investigate the effect of certain characteristics on the forecasting performance of the models.

### 2.2 Implied Cost of Capital Literature Review

I begin the project by reviewing the various models from the Implied Cost of Capital (ICC) literature that will be used in deriving estimates of expected returns. In this section, I analytically show the foundations and the assumptions from which these models are derived.

ICC refers to the discount rates - sometimes called the internal rate of return - that equates the present value of forecasted future cash flows to the current market price of the firm. This idea is different from the work that attempts to infer implied expected return from options and other derivatives (see, for example, DeMiguel, Plyakha, Uppal, and Vilkov (2013), Kostakis, Panigirtzoglou, and Skiadopoulos (2011), and Câmara, Chung, and Wang (2009)). The implied expected return considered here is derived from theorygrounded fundamental valuation models, accounting data, market prices, and forecasts of earnings, dividends and cash-flows rather than from technical analysis of derivatives. The idea is to reverse engineer valuation models and to solve for the discount rate that equates forecasted cash flows to the current market price of the firm. Consequently, the estimates of expected returns from such approach are based on forward-looking forecasts instead of historical information extrapolation. It is worth noting the the derivatives method has the limitation that it can only be applied to firms having derivatives. Many firms do not have traded derivatives, and in many occasions, even if they do, it is not with the most appropriate maturity or liquidity. On the other hand, all public firms have a market price, and hence the ICC approach can be applied to a wider base of firms.

To set the context and the notations, consider the classical discounted cash flow valuation model which defines the intrinsic value of a security as the present value of its expected
future cash flows ${ }^{1}$ :

$$
\begin{equation*}
V_{0}=\sum_{t=1}^{\infty}\left(\frac{F C F_{t}}{\left(1+r_{0}\right)^{t}}\right) \tag{1}
\end{equation*}
$$

where $V_{0}$ is the intrinsic value of the firm, $F C F_{t}$ is the firm after-tax cash flow in period t , and $r_{0}$ is the expected rate of return. This is the most generic version of discounted cash flow valuation models and it is derived from the no arbitrage principle.

To impute market implied expected return form this model, the intrinsic value of the firm is set to be the current market price, and expected future cash flows are approximated, usually using analysts estimates. Since it is practically impossible to forecast cash flows infinitely, an estimate of the cash flows expected growth rate $g_{f c f}$ beyond forecast horizon T is used:

$$
\begin{equation*}
V_{0}=\sum_{t=1}^{T}\left(\frac{F C F_{t}}{\left(1+r_{0}\right)^{t}}\right)+\left(\frac{F C F_{T}\left(1+g_{f c f}\right)}{\left(r_{0}-g_{f c f}\right) *\left(1+r_{0}\right)^{T}}\right) \tag{2}
\end{equation*}
$$

Such formulation would require some judgement as to what would be the growth rate of the cash flows after the forecasting horizon. The literature used methods like identifying growth rates associated with macro-economic data like inflation, or industry averages (see, for instance, Claus and Thomas (2001)) . In some other cases, models were tweaked to impute simultaneously the growth rate implied by the data as well as the implied expected return (like, Easton, Taylor, Shroff, and Sougiannis (2002)). A third possible method is to avoid the use of any growth rate by identifying a forecasted terminal value at the end of the forecasting horizon by using fundamentals, or market multiples.

In operationalising this model, the literature explored with several definitions of cash flows including dividends such as Gordon and Gordon (1997), residual income like in Gebhardt, Lee, and Swaminathan (2001), and abnormal earnings like in Gode and Mohanram (2003). However, one should note that the debate of which of them is a better model is not about the theoretical foundations, since they are conceptually equivalent and are derived

[^0]from the same principles (see, for instance, Shrieves and Wachowicz (2001)). Instead, it is rather about the availability of forecasts and data, as well as the necessary adjustments to the accounting information used.

One of the most common methods to define cash flows is to use dividends. The Dividend Discount Model (DDM), attributed to Williams (1938) is used to infer the intrinsic value of Equity $V_{0}^{E}$ by suggesting that the investor will ultimately be paid for his investments in the form of dividends. Even in the case of selling the stock, the investor receives the present value of the remaining dividends. Early studies have used the DDM to generate estimates of implied expected returns (see, for instance, Malkiel (1979), Campbell and Shiller (1988), Botosan (1997), Gordon and Gordon (1997), and Botosan and Plumlee (2002)) due to the convenience of using dividends as a measure of cash flows and the low volatility of dividends when compared to earnings. However, unless all the firms in the sample have a history of paying dividends with dividend policies that are clear and are related to the firm's earnings, and they have no major shareholders who can influence the dividend policy suddenly making the fundamentals uncertain and volatile, the DDM would have clear issues. Moreover, the DDM by construction places a very high weight on the terminal value and the assumed growth rate beyond the forecasting horizon, which is problematic. Therefore, more recent literature shied away from using dividends as a proxy for cash flows. Instead, more recent work resorted to the Residual Income and Abnormal Growth definitions of cash flow in estimating implied cost of capital. Hence, I shall limit myself in this paper to two ICC models based on DDM - that is Gordon and Gordon (1997) and Botosan and Plumlee (2002) models as presented in the next subsections. This choice is stimulated by the aforementioned reasons, but also because of the declining dividend yields over time. In fact, there is evidence that the predicted equity premiums have been going negative due to such trend in yields (Welch (2000)).

But before skipping this point and eluding into the more accepted models in estimating implied expected returns, it is worth noting that recent valuation studies resorted to models of free cash flow that define cash flows as the available for distribution to capital providers rather than actually paid dividends. This is a more economically sound method for several
reasons, including that it avoids removing companies with no dividends from the sample, it is more suitable when companies pay dividends that are not in line with the company capacity to pay dividends, and the company ownership structure becomes irrelevant. Despite its popularity in valuation literature, there has been no attempt to estimate implied expected returns using Free Cash Flow models. Hence, one of the contributions of this paper would be to introduce a novel method of estimating implied expected returns by reverse-engineering the Free Cash Flow model, and to test it against the mostly-used methods.

As indicated earlier, the literature most evidently appreciates Residual Income and Abnormal Earnings Growth based methods in estimating implied expected return, mainly because analysts forecasts of earnings per share are more readily available than other variables, as well as the fact that these models place less weight on terminal values and more weight on current book values.

To start with, the Residual Income valuation model is derived from the same no arbitrage assumption used to derive the classic Discounted Cash Flow model as shown by Rubinstein (1976). Using the clean-surplus accounting identity ${ }^{2}$ which stipulates that the change in shareholders equity per share $\Delta b p s_{t}$ is the sum of the net income/loss during the period $e p s_{t}$ minus any dividends distributed $d p s_{t}$. The DDM could be written as follows after substituting for $d p s_{t}$ :

$$
\begin{equation*}
V_{0}^{E}=b p s_{t}+\sum_{t=1}^{\infty}\left(\frac{e p s_{t}-r_{E} \cdot b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right) \tag{3}
\end{equation*}
$$

This is formally called the Residual Income (or Economic Profits) Valuation Model, it is also referred to as Edwards-Bell-Ohlson (EBO) Model. Conceptually, residual income is defined as the net income of the firm less a deduction for common shareholders' opportunity cost in generating net income. It reflects the economic profit in the sense that it takes into account the costs of all forms of capital, not only debt capital as accounting profit does. In other words, a company earns a positive residual income/ economic profit only if it generates a net income higher than the cost of equity.

Note that Equation (3) is written in a per-share notation. It is worth noting that Ohlson

[^1](2000) and Ohlson (2005) pointed that the clean surplus assumption would not hold on a per share basis if future transactions are expected to alter the outstanding number of shares by the mean of repurchases or stock issuances for example ${ }^{3}$. The literature predominantly ignores this issue, and it is silent about the possible implications on the validity of the implied expected returns if the clean surplus assumption does not hold. However, the residual income model can be re-formulated to reflect the total value of the firm as follows:
\[

$$
\begin{equation*}
V_{0}^{E}=B V_{t}+\sum_{t=1}^{\infty}\left(\frac{N I_{t}-r_{E} \cdot B V_{t-1}}{\left(1+r_{E}\right)^{t}}\right) \tag{4}
\end{equation*}
$$

\]

Where $B V_{t}$ is the firm book value at time $\mathrm{t}, N I_{t}$ is the net income or loss for the period. Note that $N I_{t}-r_{E} . B V_{t-1}$ is the residual income. Another representation of residual income that stems directly from its definition is that $R I_{t}=\left(R O E_{t}-r_{E}\right) \cdot B V_{t-1}{ }^{4}$, hence the formula becomes:

$$
\begin{equation*}
V_{0}^{E}=B V_{t}+\sum_{t=1}^{\infty}\left(\frac{\left(R O E_{t}-r_{E}\right) \cdot B V_{t-1}}{\left(1+r_{E}\right)^{t}}\right) \tag{5}
\end{equation*}
$$

where $R O E_{t}$ is the return of equity after tax for the period. Even though both equations (4) and (5) are on the firm level, that does not negate fully the issue highlighted previously about the clean surplus accounting assumption (Ohlson (2005)). For the Residual Income Valuation Model to hold on a total basis, the equity transactions are ought to be value neutral for future shareholders. This is one of the reasons I argue that the Free Cash Flow models mentioned previously are more robust despite the data requirement and the cash flows volatility. The literature therefore developed a version of the residual income model that does not depend on the Clean-Surplus relation. It is called the Abnormal Earning Growth Valuation Models which shall be presented later.

To operationalise the model, the forecasting period need to be identified, and hence, equation (3) can be re-written in a finite horizon setting as follows:

$$
\begin{equation*}
V_{0}^{E}=b p s_{t}+\sum_{t=1}^{T}\left(\frac{e p s_{t}-r_{E} \cdot b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+\left(\frac{\left(e p s_{T}-r_{E} b p s_{T-1}\right)\left(1+g_{r i}\right)}{\left(r_{E}-g_{r i}\right) *\left(1+r_{E}\right)^{T}}\right) \tag{6}
\end{equation*}
$$

[^2]Re-writing (5) in a finite horizon setting will result in an equivalent formulation. Both these formulations are the basis for the models of Gebhardt, Lee, and Swaminathan (2001), Claus and Thomas (2001), Easton (2004), and Easton (2006) that will be discussed in details in the subsections to follow being the most prominent formulations to estimate implied expected returns based on the Residual Income Valuation Model.

The second representation the literature appreciates for estimating implied expected returns is the Abnormal Growth Model. The importance of this model steam from the discussion earlier about how critical is the Clean-Surplus Accounting assumption for the Residual Income model to hold. Ohlson and Juettner-Nauroth (2005) used the dividend discount model to derive the Abnormal Growth in Earnings Valuation model in the same way Residual Income Model was derived but by replacing the book value at time $t$ in the residual income model with capitalised forward earning per share eps $s_{t+1}$. Essentially, the model suggests that the valuation starting point is next period expected capitalized earnings. The derivation of this model could simply be done by adding the dividend discount model $V_{0}^{E}=\sum_{t=1}^{\infty}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{2}}\right)$ to the following zero sum equality, where $\frac{e p s_{t+1}}{r_{E}}$ is the capitalized next period earnings ${ }^{5}$ :

$$
\begin{equation*}
0=\frac{e p s_{1}}{r_{E}}+\frac{\frac{e p s_{2}}{r_{E}}-(1+r) \frac{e p s_{1}}{r_{E}}}{(1+r)}+\frac{\frac{e p s_{3}}{r_{E}}-(1+r) \frac{e p s_{2}}{r_{E}}}{(1+r)^{2}}+\ldots \ldots \ldots \tag{7}
\end{equation*}
$$

The outcome of this summation is ${ }^{6}$ :

$$
\begin{equation*}
V_{0}^{E}=\frac{e p s_{1}}{r_{E}}+\sum_{t=2}^{\infty}\left(\frac{e p s_{t}+r_{E} \cdot d p s_{t-1}-\left(1+r_{E}\right) * e p s_{t-1}}{r_{E} *\left(1+r_{E}\right)^{t-1}}\right) \tag{8}
\end{equation*}
$$

Equivalently, if $\operatorname{AGiE}_{t}$ is defined as the abnormal growth in earnings for year t , or the difference between expected year-t cum-dividend accounting earnings ( $e p s_{t}+r_{E} \cdot d p s_{t-1}$ ) and the normal accounting earnings that would be expected given earnings of last period $\left(\left(1+r_{E}\right) * e p s_{t-1}\right)$, then the model can be re-written as :

$$
\begin{equation*}
V_{0}^{E}=\frac{e p s_{1}}{r_{E}}+\sum_{t=2}^{\infty}\left(\frac{A G i E_{t}}{r_{E} *\left(1+r_{E}\right)^{t-1}}\right) \tag{9}
\end{equation*}
$$

${ }^{5}$ Equation (7) could be rearranged as follows: $0=\frac{e p s_{1}}{r_{E}}-\frac{e p s_{1}}{r_{E}}+\frac{\frac{e p s_{2}}{r_{E}}}{(1+r)}-\frac{\frac{e p s_{2}}{r_{E}}}{(1+r)}+\frac{\frac{e p s_{3}}{r_{E}}}{(1+r)^{2}}-\frac{\frac{e p s_{3}}{r_{E}}}{(1+r)^{2}}+\ldots$.
${ }^{6}$ To arrive to this representation, after summing up the DDM with the zero-sum equality of the capitalized earnings per share, multiply and divide the summation by $r_{E}$, and then subtract a period from all $t$ subscripts to make the summation start at $\mathrm{t}=2$ for a more intuitive representation.

Essentially this says that the present value of the abnormal growth earnings sequence accounts for the difference between the capitalized expected earnings and the current market price. Such formulation does not require the clean surplus accounting assumption, and sustain the dividend policy irrelevance property in Residual Income Model since it correct for earnings foregone due to the company dividend policy. Ohlson (2005) argue that the Ab normal Growth in Earning Model is theoretically more robust since it does not require the clean surplus accounting assumption to hold, and he shows that the residual income model implies the Abnormal Growth in Earnings model, but not the vice versa. Having highlighted the theoretical superiority of this model, it is worth noting that there is some evidence that the empirical estimates of the implied expected returns from the Residual Income Models are more robust than those inferred by reverse engineering the Abnormal Earnings Growth Model (see, for instance, Botosan and Plumlee (2005), Easton and Monahan (2005), Botosan, Plumlee, and Wen (2011), and Easton and Monahan (2016)), but I will investigate this further due to its inconclusivity.

The model in equation (8) has been shown by Ohlson and Juettner-Nauroth (2005) to be a generalization of the Gordon growth model which essentially assumes a fixed dividend payout ratio in the DDM formulation $V_{0}^{E}=\frac{d p s_{1}}{r_{E}-g_{\text {perp }}}$. By defining the perpetual growth rate to be $g_{\text {perp }}=\gamma-1$, adding and subtracting the leading capitalized earnings per share, the resulting equation is:

$$
\begin{equation*}
V_{0}^{E}=\frac{e p s_{1}}{r_{E}}+\frac{e p s_{2}-e p s_{1}}{r_{E}\left(r_{E}-g_{p e r p}\right)} \tag{10}
\end{equation*}
$$

Ohlson and Juettner-Nauroth (2005) (OJN) generalize this equation by correcting for the earnings forfeited due to the payment of dividends. Hence $e p s_{2}-e p s_{1}$ is replaced by $e p s_{2}-e p s_{1}-r_{E}\left(e p s_{1}-d p s_{1}\right)$ which effectively means that abnormal changes in earnings are the changes in excess of the return on net re-investment. This collapse back to $e p s_{2}-e p s_{1}$ in the case the payout ratio is $100 \%$. In addition, the model does not require the short-run growth rate $\frac{e p s_{2}-e p s_{1}-r_{E}\left(e p s_{1}-d p s_{1}\right)}{e p s_{1}}$ to equal the perpetual growth rate $g_{p e r p}=\gamma-1$. Instead, the model allows the growth in the short-run to be different and decaying asymptotically to the perpetual earnings growth rate. Therefore the model yield the following representation
which is equivalent to equation (8):

$$
\begin{equation*}
V_{0}^{E}=\frac{e p s_{1}}{r_{E}}+\frac{\left(e p s_{2}-e p s_{1}-r_{E}\left(e p s_{1}-d p s_{1}\right)\right)}{r_{E} *\left(r_{E}-g_{p r e p}\right)} \tag{11}
\end{equation*}
$$

Substituting $g_{p e r p}=\gamma-1$ into the above equation, and replacing the intrinsic value with current market price $P$, then solving for the expected return yields the following:

$$
\begin{equation*}
r_{E}=A+\sqrt{A^{2}+\frac{e p s_{1}}{P_{0}}\left(g_{2}-(\gamma-1)\right)} \tag{12}
\end{equation*}
$$

where $A=\frac{1}{2}\left((\gamma-1)+\frac{d p s_{1}}{P_{0}}\right)$ and $g_{2}=\frac{e p s_{2}-e p s_{1}}{e p s_{1}}$.
This yield back Gordon growth model if $g_{2}=\gamma-1$ (i.e equals the perpetual growth rate) and the payout ratio is constant $d p s_{t}=k^{*} e p s_{t}$. Subsequent studies used Ohlson and JuettnerNauroth (2005) with different sorts of assumptions ${ }^{7}$. These formulations are the basis for the models of Gode and Mohanram (2003); and Easton (2004); that will be discussed in details in the subsections to follow being the most prominent formulations to estimate implied expected returns based on the Abnormal Growth Valuation Model.

### 2.2.1 Gebhardt, Lee, and Swaminathan (2001) Model

Gebhardt et al. (2001) used a residual income model and market prices to estimate the implied expected return of a large sample of US stocks. They documented some crosssectional relations between these expected returns and some industry and firm characteristics. They did so by invoking a finite two stage formulation on equation (5). In the first stage, earnings are forecasted explicitly using analysts estimates for 3 years. Beyond this forecasting horizon, earnings are forecasted implicitly by mean reverting ROE in period $t+3$ to the industry median linearly by the period $t+T$. Gebhardt et al. (2001) argument for fading the ROE to the industry ${ }^{8}$ median is that residual income captures economic rent, hence, the mean reversion of ROE is designed to capture the idea that firms tend to become more like

[^3]peers in the long-term, but also to capture the erosion in abnormal ROE over the long-run. However, they do not examine the empirical validity of this assumption.

The terminal value beyond $T$ is computed by perpetual-discounting of the Residual Income at period $T$, which suggest that incremental economic profits after period beyond $T$ is zero ${ }^{9}$. They used $\mathrm{T}=12$ primarily, but $\mathrm{T}=6,9,15,18$ or 21 resulted in no major differences.

The formulation used boils down to the following:

$$
\begin{equation*}
V_{0}^{E}=b p s_{0}+\sum_{t=1}^{11}\left(\frac{\left(R O E_{t}-r_{E}\right) * b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+\left(\frac{\left(R O E_{12}-r_{E}\right) * b p s_{11}}{r_{E} *\left(1+r_{E}\right)^{11}}\right) \tag{13}
\end{equation*}
$$

The book value $b p s_{0}$ is the most recent book value of equity divided by the outstanding number of shares in the month. ROE for the first 3 years, is the forecasted average earnings per share divided by the book value per share at the beginning of the period. Linear interpolation is used beyond the third year to phase the forecast of ROE to industry median. The book value at any time period subsequent to the current time was determined by the clean surplus accounting formula $b p s_{t}=b p s_{t-1}+e p s_{t}-d p s_{t}$ where the dividend per share is forecasted using the current payout ratio and where $R O E_{t}=\frac{e p s_{t}}{b p s_{t-1}}$.

The Gebhardt et al. (2001) model is the most widely used formulation in the literature to impute implied expected returns (Wang (2015)). Easton (2001) however, showed that the abnormal ROE does not only capture the economic rent (i.e. economic value added) but also the difference between market expected return and the accounting measure of ROE (i.e. the accounting value added). Hence, due to the difference between economic earnings and accounting earnings, the residual income most probably will not capture economic rents per se, but rather it will depend on the accounting method used in determining the forecasted earnings and book value. To investigate the materiality and the consequence of such issue, Easton (2006) run the following regression between the implied expected return from Gebhardt et al. (2001) methodology applied on stocks on the Dow Jones Industrial Average at the end of December 2004 against the three variables that derive the cross sectional variation of such estimate by construction: (1)the current price to book ratio, (2) the forecasts of earnings, and (3) the industry median ROE which will determine the terminal growth rate

[^4]beyond forecasting horizon. When $j$ stocks are in the portfolio, the regression is:
\[

$$
\begin{equation*}
r_{E}=\alpha_{0}+\alpha_{1}\left(\frac{P_{t}^{j}}{b p s_{t}^{j}}\right)+\alpha_{2}\left[\sum_{t=1}^{3} \frac{e p s_{t}^{j}}{b p s_{t}^{j}}\right]+\alpha_{3} \operatorname{IndROE} E_{t}^{j}+\mu_{t}^{j} \tag{14}
\end{equation*}
$$

\]

The regression demonstrated that the industry median ROE has the highest incremental explanatory power for this estimate of expected returns. Hence, the differences in median industry ROE have so much effect on the differences of expected returns which is a concern because industry ROE is calculated differently under various accounting regimes. Furthermore, the current price to book ratio variable is also influenced by the accounting regime. Hence the differences in estimates of the expected returns might reflect no more than the consequences of accounting practises. It follows then that the growth of residual income will reflect not only the real growth but also the correction of accounting differences between forecasts of earnings and economic earnings. This at least could partially explain why the expected returns derived using growth rates implied by the data (as we shall see in some subsequent models) are consistently lower than those obtained using growth rates derived from median industry ROE. It seems that Gebhardt et al. (2001) growth rate assumption is too low.

Finally, the model of Gebhardt et al. (2001) does allow the estimation of firm-specific expected returns implied by the accounting data and market price. However, the issue about the industry-specific accounting practises described above does suggest that using the model for industry-level estimates of expected returns is more justified.

### 2.2.2 Claus and Thomas (2001) Model

Claus and Thomas (2001) used the residual income model to estimate the implied expected return. They assume that all firms residual income growth rate beyond the forecasting period of 5 years is the same; and this growth rate is an estimate of expected inflation, which is derived from the risk free rate based on an "educated guess" that real risk free rate equals $3 \%$. Claus and Thomas (2001) used the following formulation, where $g_{\text {infl }}$ is the residual income growth rate after year 5:

$$
\begin{equation*}
V_{0}^{E}=b p s_{0}+\sum_{t=1}^{5}\left(\frac{R I_{t}}{\left(1+r_{E}\right)^{t}}\right)+\left(\frac{R I_{5}\left(1+g_{\text {infl }}\right)}{\left(r_{E}-g_{\text {infl }}\right)\left(1+r_{E}\right)^{5}}\right) \tag{15}
\end{equation*}
$$

The rationale of the growth assumption -which represent the main difference to Gebhardt et al. (2001) model along with the forecasting horizon- is that if book value reflects market value, the expected residual income is supposed to be zero. Residual Income, unlike book values that measure the cost of inputs only, reflects also the unearned expected economic rent. However, the RI tends to be positive even in the absence of such rents due to the fact that accounting figures are based on the principle of conservatism, and rent dissipation over time. As Zhang (2000) puts it, the growth in residual income is determined by the difference between the market expected return on equity and the firm accounting ROE. This difference has two determinants: the principle of prudence and conservatism in accounting, and investments long-term growth. Under most GAAPs, the prudence principle leads to a relative understatement of assets and revenues on average and overstatement of liabilities and input costs on average, hence, ROE is supposed to converge to expected return over time but remains above it. The residual income decline as the spread between ROE and market expected return on the firm equity shrinks. Nevertheless, the growth of investments enlarges the residual income generation base. Claus and Thomas (2001) essentially assume that growth attributed to expanding investment base dominate the growth from accounting prudence and conservatism; hence they set the growth in investment to be the inflation rate calculated as nominal risk-free rate minus $3 \%$ as an estimate of real risk free rate. Such setting implies that the growth in earnings from prudence accounting practise beyond the forest horizon is zero. While this may be reasonable in the long-run, practically, reliable forecasts are generally only available for the short-horizon, and they are available for accounting earnings, not economic earnings. This will have implications on the inferred implied expected rate of return. The paper does not test for the empirical validity of such growth assumption.

The second complication with Claus and Thomas (2001) method is that after the fifth year, all firms would have the same growth rate which is arguably problematic in generating a firm-specific implied expected return. This method has been used by others, and Daske (2006) argue that such a procedure is "economically plausible" and "can be applied to a
single firm". The essence of the argument to advocate this method is as follows: since the expected growth rate is a function of both expected economic rents and the prudence principle of accounting, and since the short-term horizon forecast of earnings and book values (in this context it is three years) does take into consideration the firm-specific differences, in this way these differences are perpetuated beyond the forecasting horizon through the base upon which the earnings are assumed to grow using a unified growth rate. All in all, just like in Gebhardt et al. (2001), technically the methodology allows for the estimation of firm-specific implied expected returns, however, it is less challenging to justify the use of the same growth rate for portfolio-level estimates.

Equation (15) is solved using an iterative process for expected return, which appears in the discounting factor as well as in the calculation of RI. The iterative process could yield many possible roots, but only one is real and positive. The first iteration is set to be somewhere near the risk-free rate.

It is worth noting that the authors of the paper opted to call the model an abnormal Earnings model rather than a residual income model. I have shied away from calling it an abnormal earning model since it has been derived from a Residual Income Valuation Model. Following other authors, I reserve the name 'Abnormal Earnings Model' to those formulations derived from the Residual Income Models but without resorting to the CleanSurplus relation as discussed earlier.

### 2.2.3 Easton, Taylor, Shroff, and Sougiannis (2002) Model

Thus far, the models presented rely on some sort of assumption regarding the growth rate beyond the forecasting horizon. Hence, any estimate of implied expected return derived from inverting these models to solve for the required return would depend on the validity of the assumptions on growth rate. Easton et al. (2002) provide a formulation that estimates rather than assume a rate of growth. By inverting the residual income model in the form of linear regression, and using analysts forecasts, recorded book values, and observed market prices, their formulation simultaneously estimates implied residual income growth rate and implied expected rate of return as coefficients of the regression model. They argue that
using the data-implied growth rate adjust for the fact that the imputed implied-expected return is derived from the equity book value and short - term forecasts of earnings. Easton et al. (2002) inversion of the residual income model exploit the property of earnings being additive over time as demonstrated by Easton et al. (1992) to express the ratio of the sum of earnings forecasts over the forecasting horizon, which is four years, to current book value (the dependent variable) as a function of the current price to book multiple (the independent variable). This is achieved by recognizing that equation (3) can be split into the summation of two periods, before and after $\mathrm{T}=4$ :

$$
\begin{equation*}
V_{0}^{E}=b p s_{0}+\sum_{t=1}^{4}\left(\frac{e p s_{t}-r_{E} \cdot b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+\sum_{t=5}^{\infty}\left(\frac{e p s_{t}-r_{E} \cdot b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right) \tag{16}
\end{equation*}
$$

Using the accounting clean surplus relation, and substituting for $b p s_{3}, b p s_{2}$, and $b p s_{1}$ by the relevant earning $e p s_{t}$, dividend $d p s_{t}$, as well as the current book value $b p s_{0}$ in the first summation of equation (16), then collecting the terms would result in the following:

$$
\begin{equation*}
\sum_{t=1}^{4}\left(\frac{e p s_{t}-r_{E} \cdot b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)=\frac{e p s_{T c u m}-(R-1) b p s_{0}}{R} \tag{17}
\end{equation*}
$$

Where $R=\left(1+r_{E}\right)^{4}$ as $T=4$, and $e p s_{T c u m}$ is the aggregate cum dividend earnings for the 4 periods. Equation (18) essentially captures the present value of the expected residual income over the forecasting horizon. Since equation (16) is an infinite-horizon model, one could derive a finite version by using the residual earnings derived in formulation (17) as perpetuity where the expected average annual growth rate of residual income is $g$ and $G=$ $(1+g)^{4}$ :

$$
\begin{equation*}
V_{0}^{E}=b p s_{0}+\frac{e p s_{T c u m}-(R-1) b p s_{0}}{R-G} \tag{18}
\end{equation*}
$$

Rearranging this equation gives:

$$
\begin{equation*}
\frac{e p s_{T c u m}}{b p s_{0}}=(G-1)+(R-G) \cdot \frac{V_{0}^{E}}{b p s_{0}} \tag{19}
\end{equation*}
$$

In this formulation, if $(G-1)$ is considered to be an intercept coefficient, say $\gamma_{0}$, and ( $R-G$ ) a slope coefficient, say $\gamma_{1}$, then for a portfolio of $j$ stocks, if the current prices are considered to equal the intrinsic values, the following linear regression model can be used to
simultaneously infer the $R$ and the $G$, and hence, the implied growth rate of residual income as well as the implied expected return:

$$
\begin{equation*}
\frac{e p s_{T c u m}^{j}}{b p s_{0}^{j}}=\gamma_{0}+\gamma_{1} \frac{P_{0}^{j}}{b p s_{0}^{j}}+\mu_{0}^{j} \tag{20}
\end{equation*}
$$

The intercept and slope coefficients are the averages of the firm level coefficients, and the error term $\mu_{0}^{j}$ represent the cross-sectional variation in those firm-level coefficients. This error term is heteroskedastic by construction, and hence White standard errors need to be used. The estimation has a circularity issue since the estimation of eps $s_{\text {Tcum }}^{j}$ requires a rate of a required return, which is to be estimated itself. The authors used an iterative procedure, whereby initially the displacement of expected earnings due to dividend payment is set to be $12 \%$ of the paid amount since dividends could have been reinvested to boost future earnings of the firm. The underlying assumption is that if those dividends were not paid, they would have generated from the firm's operations the historical market return, which is $12 \%$. This estimate of the required rate of return gets revised while calculating eps $s_{T c u m}^{j}$ until no change in the estimate of $r$ and $g$ occurs by the iterative process. The obtained required rate of return from the regression is used to replace the rate of re-investment in every iteration. This process is iterated until it results in no further revision to the estimates of both implied income growth rate and implied expected return. Expected dividends are assumed to equal the current paid dividends for the forecasting horizon.

When $G$ and $R$ are estimated from the regression, $r$ and $g$ are calculated using the fourth positive root. The imaginary and negative roots are meaningless. It is worth noting that among the two variables used in the regression $\frac{e p s_{T c u m}^{j}}{b p s_{0}^{j}}$ and $\frac{P_{0}^{j}}{b p s_{0}^{j}}$, only the first is estimated with error generated from either the use of analysts forecasts as an estimate of future earnings or from the assumption of constant dividends. Therefore, the variable measured with error is set as the dependent variable to avoid biased coefficient estimates. Interestingly, this study resulted in a higher estimate of average expected returns than Gebhardt et al. (2001) and Claus and Thomas (2001).

### 2.2.4 Fitzgerald, Gray, Hall, and Jeyaraj (2013) Model

Fitzgerald et al. (2013) use the same starting point as Gebhardt et al. (2001). To operationalise equation (3), for 2 years, explicit forecasts of earnings are used. Beyond the second year, earning is implicitly determined by fading ROE through linear interpolation to the industry average. The terminal value is computed using a growing perpetuity formulation as follows:

$$
\begin{equation*}
V_{0}^{E}=b p s_{0}+\sum_{t=1}^{11}\left(\frac{\left(R O E_{t}-r_{E}\right) * b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+\left(\frac{\left(R O E_{11}-r_{E}\right) * b p s_{10} *(1+g)}{\left(r_{E}-g\right) *\left(1+r_{E}\right)^{11}}\right) \tag{21}
\end{equation*}
$$

Fitzgerald et al. (2013) used the price target instead of the price as a proxy for $V_{0}^{E}$.

### 2.2.5 O'Hanlon and Steele (2000) and Easton (2006) Model

One can realize that the previous formulations are dependent on analysts' forecasts. Among many possible issues, three are important in this context: contradictory analysts forecasts, stocks not followed by analysts would render these methods unusable, and most prominently analysts optimism/pessimism relative to the market. Rather than using market prices, reported book values, and analysts forecasts to derive the implied expected returns, Easton (2006) and Easton and Sommers (2007) adapted O'Hanlon and Steele (2000) idea to derive a method that use market prices, reported book values, and realised earnings (instead of analysts' forecasts) to simultaneously estimate implied expected return and implied residual income growth. The idea is that residual income model like in equation (5) can be reformulated like perpetuity growing at $g_{\text {perp }}$ :

$$
\begin{equation*}
P_{t}^{j}=b p s_{t}^{j}+\frac{\left[\left(R O E_{t}^{j}-r_{E}^{j}\right) b p s_{t-1}^{j}\right]\left(1+g_{p e r p}^{j}\right)}{r_{E}^{j}-g_{p e r p}^{j}} \tag{22}
\end{equation*}
$$

Then, by defining $\delta_{0}=r_{E}$, and $\delta_{1}=\frac{r_{E}-g_{\text {prep }}}{1+g_{\text {prep }}}$, the above model can be written in a linear regression format as follows:

$$
\begin{equation*}
\frac{e p s_{t}^{j}}{b p s_{t-1}^{j}}=\delta_{0}+\delta_{1} \frac{P_{t}^{j}-b p s_{t}^{j}}{b p s_{t-1}^{j}}+\mu_{t}^{j} \tag{23}
\end{equation*}
$$

This regression can yield an estimation of the expected rate of return $r_{E}$ and expected growth rate $g_{\text {perp }}$ of a portfolio of $j$ stocks. Note that this formulation differs when compared
to Easton et al. (2002) as in equation (20) in that only this period earnings is required in (23) as compared to the sum of this period as well as the next three periods in (20). One more difference between these two methods is that the implied expected return imputed in Easton et al. (2002) method, or in fact all the methods that use analysts forecasts, may not reflect the economic cost of capital due to analysts bias, while O'Hanlon and Steele (2000) method mitigate such issue.

### 2.2.6 Gode and Mohanram (2003) Model

Gode and Mohanram (2003) is one of the early studies that used Ohlson and JuettnerNauroth (2005) (see previous discussion and equation (12)) results to infer implied expected returns from the Abnormal Growth in Earnings model with two assumptions to operationalise it. Firstly, just like Claus and Thomas (2001), they assumed that all firms perpetual growth rate $(\gamma-1)$ is the same, and it is equal to risk free rate minus $3 \%$. Secondly, to reduce the impact of outliers, they used the average of short-run growth (2 years) and the long-run growth (5 years) rate as given by analysts as a proxy for $g_{2}$ in equation (12).

The model requires an explicit one-period dividend forecast which is the forthcoming dividend payment $d p s_{1}$. Also, the model requires two rates of growth as inputs: (1) a shortterm growth rate which decays asymptotically to (2) $\gamma$ which is the perpetual growth rate. The average of $g_{2}$ and the five-year estimate of growth by analysts is used as a proxy of short-term growth. Whereas $(1-\gamma)$ is set to be $\left(r_{f}-3 \%\right)$, where $3 \%$ is a proxy for long-term economic growth, and $r_{f}$ is the 10 -year treasury notes yield.

### 2.2.7 PE, PEG, and Modified PEG Ratio Models

An extensively used simplified case of the Abnormal Earnings Growth Model is the PEG Valuation Model (Bradshaw (2004)) which is defined as the price-earnings ratio divided by a rate of growth in earnings. PEG is designed on the basis that, all things being equal, a high PEG would imply a high $\mathrm{P} / \mathrm{E}$ relative to the expected growth in earnings, which indicate that expected rate of return is low due to bad outlook on future prospects of the firm. There are several versions of the PEG model depending on the definition of the $\mathrm{P} / \mathrm{E}$ ratio (trailing
or forward), and the definition of the growth rate of earnings. Advocates of the PEG ratio argue that it accounts for the differences in short-run growth of earnings and, hence, it gives a better ranking than the PE ratio.

To see how the PEG ratio is linked to the Abnormal Growth in Earnings model, start from equation (11), and define the variables in the following manner:

$$
\begin{equation*}
P_{0}=\frac{e p s_{1}}{r_{E}}+\frac{A G i E_{1}}{r_{E} *\left(r_{E}-\Delta A G i E\right)} \tag{24}
\end{equation*}
$$

$\Delta A G i E=\left(\frac{A G i E_{t+1}}{A G i E_{t}}\right)-1$ represents a unique growth rate in perpetuity, which if known, would allow estimating the implied expected returns given the market price and earnings forecasts for the next two periods. $A G i E_{t}=e p s_{2}+r_{E} \cdot d p s_{1}-\left(1+r_{E}\right) * e p s_{1}$ as previously defined. The argument is that if the expected accounting earnings $e p s_{1}$ and $e p s_{2}$ are equivalent to the economic profits (i.e. the price at the beginning of the period multiplied by the expected return), then $A G i E_{1}$ would be zero. Consequently, substituting in equation (24) the expected return would equal to the inverse of forward $\mathrm{P} / \mathrm{E}$ ratio (i.e. the $e p s_{1}$ would be sufficient for valuation). Hence the expected return $r$ would equal the earnings next period divided by the market price.

However, if either or both the earnings does not reflect the economic substance, then $A G i E_{1}$ would not be zero and $\triangle A G i E$ would reflect the long-term change in accounting earnings abnormal growth to adjust for the gap between economic and accounting figures. Where $A G i E_{1}$ is not zero, but the growth rate $\triangle A G i E$ is zero (i.e. $A G i E_{t}=A G i E_{t+1}=\ldots$ ), the equation reduces to the following

$$
\begin{equation*}
P_{0}=\frac{e p s_{2}+r_{E} \cdot d p s_{1}-e p s_{1}}{r_{E}^{2}} \tag{25}
\end{equation*}
$$

Hence,

$$
\begin{equation*}
r_{E}=\sqrt{\frac{e p s_{2}+r_{E} \cdot d p s_{1}-e p s_{1}}{P_{0}}} \tag{26}
\end{equation*}
$$

Or,

$$
\begin{equation*}
r_{E}^{2}-r_{E} * \frac{d p s_{1}}{P_{0}}-\frac{e p s_{2}-e p s_{1}}{P_{0}}=0 \tag{27}
\end{equation*}
$$

Observed more carefully, the expected return estimate from (26) is based on a modified PEG ratio. The modification being the inclusion of expected dividends in the estimate of short-term growth. To see that, if one could afford to assume further that $d p s_{1}=0$, the model would converge to the following representation:

$$
\begin{equation*}
r_{E}=\sqrt{\frac{e p s_{2}-e p s_{1}}{P_{0}}} \tag{28}
\end{equation*}
$$

Which imply the inverse of the PEG ratio itself, and hence let's call the required rate of return from such representation $r_{P E G}$ :

$$
\begin{equation*}
r_{P E G}=\sqrt{\frac{e p s_{2}-e p s_{1}}{P_{0}}}=\sqrt{\frac{\frac{e p s_{2}-e p s_{1}}{e p p s_{1}}}{\frac{\frac{P_{0}}{e p s_{1}}}{}}=\sqrt{\frac{1}{P E G * 100}} \text {. }} \tag{29}
\end{equation*}
$$

Therefore, it is clear that the PEG ratio implicitly assume $\triangle A G i E$ is zero. In spite of the pervasive usage of the PEG, it is not based on fundamental valuation theory. Moreover, the PEG ignores growth beyond the forecast horizon. Easton (2004) idea is to relax such assumption and avoid invoking any assumptions that would be inevitably erroneous about the growth of earnings, and hence equation (27) is a Modified PEG model. It can be rearranged by setting $A=\frac{d p s_{1}}{2 P_{0}}$ to:

$$
\begin{equation*}
r_{M P E G}=A+\sqrt[2]{A^{2}+\frac{e p s_{2}-e p s_{1}}{P_{0}}} \tag{30}
\end{equation*}
$$

### 2.2.8 Easton (2004) Model

Easton (2004) suggested a formulation that isolates the roles of the expected accounting earnings beyond the forecast horizon from the forecasts of earnings in the forecasting horizon and from next period accounting earnings. His method allows the estimation of long-term growth in earnings and the expected returns simultaneously as implied by prices and analysts forecasts. The model is derived using Equation (24) and its associated definitions. It can be re-arranged to yield:

$$
\begin{equation*}
\frac{e p s_{2}+r_{E} * d p s_{1}}{P_{0}}=r *\left(r-g_{A G i E}\right)+\left(1+g_{A G i E}\right) \frac{e p s_{1}}{P_{0}} \tag{31}
\end{equation*}
$$

Or:

$$
\begin{equation*}
\frac{c e p s_{2}}{P_{0}}=\gamma_{0}+\gamma_{1} \frac{e p s_{1}}{P_{0}} \tag{32}
\end{equation*}
$$

Where ceps $s_{2}$ is defined as $e p s_{2}+r_{E} * d p s_{1}$ which is a forecast of two-period cum-dividend earnings, $\gamma_{0}=r *\left(r-g_{A G i E}\right)$, and $\gamma_{1}=\left(1+g_{A G i E}\right)$. Equation (32) is a one firm representation that can be aggregated in a linear regression model for a portfolio of $j$ companies:

$$
\begin{equation*}
\frac{c e p s_{2}^{j}}{P_{0}^{j}}=\gamma_{0}+\gamma_{1} \frac{e p s_{1}^{j}}{P_{0}^{j}}+\mu_{0}^{j} \tag{33}
\end{equation*}
$$

The intercept and slope coefficients, in this case, would give an estimation of the average portfolio expected return $r$ and the average change in abnormal earnings growth $g_{A G i E}$ simultaneously. The source of the error term $\mu_{0}^{j}$ is the firm level estimates, which is probably heteroskedastic and need correction for standard errors.

The portfolios chosen for estimation using this regression need to be formed on the basis that ensures a high $R^{2}$ to mitigate the error-in-variable problem. Unlike Easton et al. (2002), both the dependent and the independent variables in this regression potentially are measured with errors. The author has chosen to form portfolios using PEG ratio since the regression model could be re-written as $\frac{c e p s_{2}}{P_{0}}=\frac{1}{P E G}+\frac{r_{E} d e p s_{1}}{P_{0}}+\frac{e p s_{1}}{P_{0}}$, hence the variance of the $\frac{1}{P E G}$ will be relatively small in any portfolio. Since the range that has bounds is a decreasing function of $R^{2}$, the $R^{2}$ has to be as high as possible to guarantee unbiased estimators.

Just like Easton et al. (2002), there is a circularity issue in the model, since the goal is to draw an estimate of implied expected return, but at the same time, the input ceps $s_{2}$ require an estimate of $r_{E}$. The author starts by assuming a displacement of earnings due to dividends of $12 \%$ that resemble the historical market return that could have been earned if the dividends were retained. Since the spirit of the model is to impute $r_{E}$ based on $g_{A G i E}$ rather than an assumed rate, an iterative process is used whereby the $\triangle A G i E$ is recalculated based on the rate of return estimated from the first iteration. This procedure is repeated until convergence is achieved where no change in estimated return and $\triangle A G i E$ is observed by the revision.

### 2.2.9 Ashton and Wang (2013) Model

Ashton and Wang (2013) model of estimating the implied cost of capital is primarily
based on the notion of price-led earnings and the persistence of earnings. Though the idea of estimating simultaneously the implied growth rate and the implied cost of capital as in Easton et al. (2002) and Easton (2004) seem appealing, it is restrictive and not without assumptions. Ashton and Wang (2013) propose a less restrictive model in which price is expressed as a function of some specified accounting fundamentals and an unspecified error term to capture the rest of the factors. Unlike Easton et al. (2002), Ashton and Wang (2013) formulation does not necessitate equality between the implied growth rate and growth rate of residual income. In fact, the definition of growth in Ashton and Wang (2013) is not linked to residual income like in Easton et al. (2002) or abnormal growth in earnings like in Easton (2004), but to firm's stock value. Moreover, they only require one period earnings forecast, hence, avoid perpetuating the residual income beyond the forecasting horizon. The relaxation of these restrictions allows the avoidance of making assumptions about the structure of the terminal value. The second difference between previous simultaneous models and Ashton and Wang (2013) model is the dividend policy irrelevance in this model.

Ashton and Wang (2013) start the model development by expressing the price $P_{t}$ in terms of book value $b_{t}$, earnings $e_{t}$, dividends $d_{t}$, and an error term to capture other market related factors.

$$
\begin{equation*}
P_{t}=\alpha_{1} b_{t}+\alpha_{2} e_{t}+\alpha_{3} d_{t}+\vartheta_{t} \tag{34}
\end{equation*}
$$

Since the book value, the earnings, and the dividends are historical accounting numbers, while the price is ought to incorporate the future prospect of the firm, the future growth component has to manifest in $\vartheta_{t}$. A Simple model to represent such manifestation where $g$ is the growth rate and $\epsilon_{v t+1}$ is an error term with a mean of zero:

$$
\begin{equation*}
\vartheta_{t+1}=(1+g) \vartheta_{t}+\epsilon_{v t+1} \tag{35}
\end{equation*}
$$

Assuming an arbitrage-free capital market where prices and dividends are related by $E_{t}\left[P_{t+1}+d_{t+1}\right]=R P_{t}$, where R is one plus the cost of equity; and that clean surplus accounting relation holds. Moreover, the set $\frac{\partial P_{t}}{\partial d_{t}}=-1$ to force equity price dollar-for-dollar to be displaced by net dividend flows. They also specify $\frac{\partial b_{t}}{\partial d_{t}}=-1$ and $\frac{\partial e_{t}}{\partial d_{t}}=0$ to model the no-
tion that although dividends reduce equity, they do not affect current income (i.e. dividend policy is irrelevance). Finally, the non-fundamental variables are not affected by dividends $\frac{\partial \vartheta_{t}}{\partial d_{t}}=0$. Given these relations, the authors link the pricing equation (34) in periods $t$ and $t+1$ :

$$
\begin{equation*}
E_{t}\left[e_{t+1}\right]=\frac{R}{\alpha_{1}+\alpha_{2}} P_{t}-\frac{\alpha_{1}}{\alpha_{1}+\alpha_{2}} b_{t}-\frac{1+g}{\alpha_{1}+\alpha_{2}} \vartheta_{t} \tag{36}
\end{equation*}
$$

Note that the assumptions necessitate that $\alpha_{3}=\alpha_{1}-1$ and that $1+g<R$. Also, the equation suggest that prices are a predictor of future earnings given the fundamental variables. The equation still contains an unspecified variable $\vartheta$. By substituting equation (34) in (36) given the clean surplus accounting relation, one could arrive at the following regression relation which Ashton and Wang (2013) call the Simple model. Note that although $\vartheta$ is not estimable, the growth in $\vartheta$ is. This growth is interpreted as the growth rate in investment or growth rate of the firm.

$$
\begin{equation*}
E_{t}\left[e_{t+1}\right]=\delta_{1} P_{t}+\delta_{2} e_{t}+\delta_{3} b_{t}+\delta_{4} b_{t-1} \tag{37}
\end{equation*}
$$

where

$$
\begin{gather*}
g=\frac{\left(1+\delta_{2}+\delta_{3}\right)+\sqrt{\left(1+\delta_{2}+\delta_{3}\right)^{2}-4\left(\delta_{2}-\delta_{4}\right)}}{2}-1  \tag{38}\\
r_{E}=(1+g)\left(1+\frac{\delta_{1}}{1+g-\delta_{2}}\right)-1 \tag{39}
\end{gather*}
$$

The authors go further to partition the growth rate from their model to the two components: growth from economic earnings which is the capital gain from the price and dividends, and the accounting gain discussed previously which steam from conservatism in reporting. Equation (35) becomes:

$$
\begin{equation*}
\vartheta_{t+1}=(1+g) \vartheta_{t}+\alpha_{4}\left(P_{t}-P_{t-1}+d_{t}-e_{t}\right)+\epsilon_{v t+1} \tag{40}
\end{equation*}
$$

Hence, the model gets extended to the following:

$$
\begin{equation*}
E_{t}\left[e_{t+1}\right]=\delta_{1} P_{t}+\delta_{2} e_{t}+\delta_{3} b_{t}+\delta_{4} b_{t-1}+\delta_{5} P_{t-1} \tag{41}
\end{equation*}
$$

where

$$
\begin{gather*}
g=\frac{\left(1+\delta_{2}+\delta_{3}-\delta_{5}\right)+\sqrt{\left(1+\delta_{2}+\delta_{3}-\delta_{5}\right)^{2}-4\left(\delta_{2}-\delta_{4}-\delta_{5}\right)}}{2}-1  \tag{42}\\
r_{E}=(1+g)\left(1+\frac{\delta_{1}+\delta_{5}}{1+g-\delta_{2}}\right)-1 \tag{43}
\end{gather*}
$$

In the empirical implementation of the models, Ashton and Wang (2013) divided all variables by the adjusted number of shares in issue. The purpose is to increase comparability over time and reduce heteroskedasticity. They have also deflated the variables by the price.

### 2.2.10 Wang (2018) Model

Wang (2018) extend Ashton and Wang (2013) extended version portfolio-level model in equation (41) to obtain firm-level estimates. After obtaining the results of the cross-sectional regression for all firms within the portfolio in each year, Wang (2018) use the sample average growth rate $g_{i t}$, cost of capital $R_{i t}$, and valuation multiples as common parameters for all firms in each industry year portfolio to obtain the firm-specific one-period ahead return from the following formulation:

$$
\begin{align*}
r_{E}= & \left(1+g_{i t}\right)\left[1-\frac{b p s_{t}}{P_{t}}-\left(\beta_{1, i t}-\left(R_{i t}-1\right) \beta_{2, i t}\right) \frac{b p s_{t-1}}{P_{t}}-\left(\beta_{1, i t}+\beta_{2, i t}\right) \frac{e p s_{t}}{P_{t}}\right]  \tag{44}\\
& +\left(1+\beta_{1, i t}+\beta_{2, i t}\right) \frac{e p s_{t+1}}{P_{t}}+\left(1-\beta_{1, i t}-\left(R_{i t}-1\right) \beta_{2, i t}\right) \frac{b p s_{t}}{P_{t}}+ \\
& \lambda_{i t}\left[\frac{P_{t}-b p s_{t}-\left(P_{t-1}-b p s_{t-1}\right)}{P_{t}}\right]-1
\end{align*}
$$

### 2.2.11 Gordon and Gordon (1997) Model

Gordon and Gordon (1997) derive their ICC model based on the well-known dividend model:

$$
\begin{equation*}
V_{0}^{E}=\sum_{t=1}^{\infty}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{t}}\right)=\sum_{t=1}^{\infty}\left(\frac{d p s_{1} *(1+g)^{t-1}}{\left(1+r_{E}\right)^{t}}\right)=\frac{d p s_{1}}{r_{E}-g} \tag{45}
\end{equation*}
$$

Assuming that retained earnings are the sole source of new equity injections to the firm and that dividends are the sole method of funds distribution from the firm to equity holders, Gordon (1962) showed that $r_{E}$ has to equal the summation of expected dividend yield and growth rate:

$$
\begin{equation*}
r_{E}=\frac{d p s_{1}}{V_{E}}+g=\frac{e p s_{1} *(1-b)}{V_{E}}+R O E * b \tag{46}
\end{equation*}
$$

where b is the retention rate. And since the expected return form a share is the rate of discounting that make expected dividends equivalent to the current price of the firm, Gordon and Gordon (1997) suggested the following formulation for empirical estimation of the implied cost of capital:

$$
\begin{equation*}
V_{0}^{E}=\sum_{t=1}^{T}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{t}}\right)+\frac{e p s_{T+1}}{r_{E}\left(1+r_{E}\right)^{T}} \tag{47}
\end{equation*}
$$

### 2.2.12 Botosan and Plumlee (2002) Model

Using the same line of argument above, Botosan and Plumlee (2002) estimate the implied cost of capital using the following equation, where the target price (TP) is used to determine the terminal value.

$$
\begin{equation*}
V_{0}^{E}=\sum_{t=1}^{T}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{t}}\right)+\frac{T P_{T}}{\left(1+r_{E}\right)^{T}} \tag{48}
\end{equation*}
$$

### 2.3 Data and Methodology

### 2.3.1 Data

The data for the analysis consists of the historical constituents of the S\&P1500 index which covers almost $91 \%$ of the market capitalisation of the US market according to S\&P Global (2017) fact sheet. The choice is driven by the fact that any broader indexes such as Wilshire 5000, Dow Jones US Total Stock Market, CRSP US Total Market, Russell 3000, or MSCI US broad market Index will have a substantial number of firms with no or little analysts coverage, which is necessary for this study. Due to this selection, the mean (median) analyst coverage is 10 (8) analyst per firm as presented in the Descriptives section. The analysts' forecasts data are obtained from I/B/E/S through Thomson Reuters DataStream database. The accounting data are gathered from WorldScope through DataStream, and the return data from DataStream.

The S\&P1500 is a combination of three indexes: S\&P500 large-cap U.S. equities, S\&P400
mid-cap U.S. equities, and the S\&P600 small-cap U.S. equities. The number of historical constituents at the time the data were collected were 1,630 securities in S\&P500, 1,505 securities in S\&P400, and 2,155 securities in S\&P600. Out of these 5,290 securities 4,958 were matched to Datastream database. Due to the fact that some firms historically were removed from and then brought back to the index later, the unique historical constituents were identified to be 3,762 firms. Due to the data required to estimate various ICC models based on analysts estimates and mechanical models, the sample was limited to 2,808 firms for which ICC models could be estimated. Therefore, the average number of firms in the sample for the purpose of estimating the cost of capital each month was 1,232 firms (minimum per month of 897 and maximum of 1,344 firms), yielding 339,995 firm-month observation. I then restrict the analysis each month to the firms that have estimates using all ICC models. Therefore, any firm that does not have an estimate using any of the models in the respective tests get dropped to make sure that models are compared using the same set of firms each month. If a particular ICC estimate is missing, I use the last available ICC estimate up to a maximum of 12 months. To make sure that such strategy does not impact the quality of the results, I run the analysis with strictly the firms that have estimates from all models in a particular month without forward filling in section (2.5.3). Finally, due to the availability of the data required to perform the regression testing that will be described shortly, the period of the testing has been limited to 224 months from the January 1999 to November 2017. Specifically, as shall be detailed shortly, some firm cash flow news control variables (as well as some of the ICC models) require analysts price-targets, which are only available post 1999 in the dataset used.

All data were collected on a monthly basis. Thomson Reuters guidance for using I/B/E/S through Datastream specifically mention that for the data to be identical with that shown by other $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ historical products, monthly data requests should specify the 20th of each month as the date of the download (Thomson Reuters (2010)). This also ensures that monthly data is always displayed in line with the $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ production cycle.

As shall be discussed in sections (2.5.4) and (2.6.3), the new model based on Free Cash Flow to Equity that I introduce in this work requires analysts estimates for variables beyond
the earnings per share. Analysts started tracking these variables in varying points in time, but certainly not as back in history as the earnings per share. Therefore, for that part of the analysis, the sample period is limited from January 2006 till November 2017 to ensure FCF estimation is possible. Prior data has been used for other estimations where required.

### 2.3.2 Implied Cost of Capital Models

Table 1 summarizes the models that will be used in the horse-race. The table set the short notation that would be used to refer to each model. These models are analytically expounded in the previous section. To level the playing field, the horse-race is carried on firm-level estimates. The models that yield portfolio level estimates are subjected to transformation as described in Nekrasov and Ogneva (2011). Nekrasov and Ogneva (2011) developed a methodology in which they extend the ETSS model to generate firm-level estimates from portfolio-level estimates by using common risk and growth factors. In other words, they generate firm-level expected return estimates from ETSS average portfolio level estimates conditional on observable firm characteristics. I use the same principle to obtain firm-level estimates from ETSS, OHE, and ES to test their validity in generating firm-level estimates. In fact, this application is novel to the literature.

The analysis also involves calibrated versions of the firm-level models following Fitzgerald, Gray, Hall, and Jeyaraj (2013) methodology. One of the most recurring criticisms of ICC expected return estimates in the literature is to do with the estimation error due to the noise in the data or due to the model being incompatible with some individual stocks. Fitzgerald et al. (2013) suggest that estimation error could be minimized by using the fitted values from regressing the expected return estimates from a particular ICC model on common risk factors. A similar methodology is applied by Lee, So, and Wang (2017). The idea is to capture the firm-specific characteristics that affect the expected return but not reflected in the variables of the ICC models. This calibration also helps to deal with the issue of estimation error due to analysts earnings forecast bias.

I perform such calibration in the cross-section every month to ensure that the fitted values are independent of the relationship between the expected return and the risk factors, and
between realised returns and the risk factors in every other period. I use the same risk factor used by Fitzgerald et al. (2013): leverage, size, book-to-market ratio, earning variability as predicted by the standard deviation in analysts EPS forecasts, market beta, the beta standard error, target-to-market price ratio, 12 months momentum factor, book value per share, and the firm long-term growth rate. I restrict the calibration to the models that yield firm-level estimates without transformations, since the transformations themselves use firm-level risk characteristics factors. Applying calibration to the estimates of this list of models is also novel to the literature.

The last five models in table (1) are average estimates of other models. These are used to test whether combining estimates from various models improve the prediction ability of the estimates.

Table 1: Implied Cost of Capital Models

| Model | Code | Basis | Growth beyond horizon | Horizon | Formulation | Type of estimate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gebhardt, Lee, and Swaminathan (2001) | GLS | Residual Income | Analysts | $(2+10)$ <br> years | $\begin{aligned} & \hline V_{0}^{E}=b p s_{0}+\sum_{t=1}^{11}\left(\frac{\left(R O E_{t}-r_{E}\right) * b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+ \\ & \left(\frac{\left(R O E_{12}-r_{E}\right) * b p s_{11}}{r_{E} *\left(1+r_{E}\right)^{11}}\right) \end{aligned}$ | firm level |
| Claus and Thomas (2001) | CT | Residual Income | Inflation | 5 years | $V_{0}^{E}=b p s_{0}+\sum_{t=1}^{5}\left(\frac{R I_{t}}{\left(1+r_{E}\right)^{i}}\right)+\left(\frac{R I_{5}\left(1+g_{\text {inf }}\right)}{\left(r_{E}-g_{\text {inff }}\right)\left(1+r_{E}\right)^{5}}\right)$ | firm level |
| Fitzgerald, Gray, Hall, and Jeyaraj (2013) | FGHJ | Residual Income | Analysts | $\begin{aligned} & (2+10) \\ & \text { years } \end{aligned}$ | $\begin{aligned} & \text { TargetPrice }{ }_{t}=\text { bps }_{0}+\sum_{t=1}^{11}\left(\frac{\left(\text { ROE }_{t}-r_{E}\right) * b p s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+ \\ & \left(\frac{\left(\text { ROE }_{11}-r_{E}\right) * b p s_{10} *(1+g)}{\left(r_{E}-g\right) *\left(1+r_{E}\right)^{11}}\right) \end{aligned}$ | firm level |
| Gode and Mohanram (2003) | GM | Abnormal <br> Earnings <br> Growth | Inflation | 2 years | $\begin{aligned} & r_{E}=A+\sqrt{A^{2}+\frac{e p s_{1}}{P_{0}}\left(g_{2}-(\gamma-1)\right)} \text { where } A= \\ & \frac{1}{2}\left((\gamma-1)+\frac{d p s_{1}}{P_{0}}\right) \text { and } g_{2}=\frac{e p s_{2}-e p s_{1}}{e p s_{1}} \end{aligned}$ | firm level |
| PE Ratio | PE | Abnormal <br> Earnings <br> Growth | Zero | 1 year | $r_{P E}=\left(\frac{P_{0}}{e p s_{1}}\right)^{-1}$ | firm level |
| PEG Ratio | PEG | Abnormal Earnings Growth | Zero | 2 years | $r_{P E G}=\sqrt{\frac{e p s_{2}-e p s_{1}}{P_{0}}}=\sqrt{\frac{\frac{e p s_{2}-e p s_{1}}{e p s_{1}}}{\frac{P_{0}}{e p s_{1}}}}=\sqrt{\frac{1}{P E G * 100}}$ | firm level |
| Modified PEG Ratio | MPEG | Abnormal <br> Earnings <br> Growth | Zero | 2 years | $r_{M P E G}=\sqrt{\frac{e p s_{2}+r_{E} . d p s_{1}-e p s_{1}}{P_{0}}}$ | firm level |
| Gordon and Gordon (1997) | GG | Dividends Discount | Analysts | 5 years | $V_{0}^{E}=\sum_{t=1}^{N}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{\prime}}\right)+\frac{e p s_{N+1}}{r_{E}\left(1+r_{E}\right)^{N}}$ | firm level |
| Botosan and Plumlee (2002) | BP | Dividends Discount | Analysts | 5 years | $V_{0}^{E}=\sum_{t=1}^{N}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{t}}\right)+\frac{\text { TargetPrice }^{\text {a }}}{\left(1+r_{E}\right)^{N}}$ | firm level |
| Easton, Taylor, Shroff, and Sougiannis (2002) | ETSS | Residual Income | data implied | 4 years | $\begin{aligned} & \frac{e p s_{\text {Tcum }}^{j}}{b p p j_{0}^{j}}=\gamma_{0}+\gamma_{1} \frac{P_{0}^{j}}{b p s_{0}^{j}}+\mu_{0}^{j} \text { where } \gamma_{0}=(G-1), \\ & \gamma_{1}=(R-G), R=\left(1+r_{E}\right)^{4}, \text { and } G=(1+g)^{4} \end{aligned}$ | portfolio level |
| Nekrasov and Ogneva (2011) | TrETSS | ETSS | Transformation to the ETSS to yield firm-level estimates | 4 years | $\begin{aligned} & \frac{e p s_{T c u m}^{j}}{b p s_{0}^{j}} \\ & \left(\lambda_{1} \text { Beta }^{j}+\lambda_{2} \text { LogS Size }^{j}+\lambda_{3} \frac{P_{0}^{j}}{b p s_{0}^{j}}+\lambda_{4} \text { MoM }^{j}\right) \frac{P_{0}^{j}}{b p s_{0}^{j}}+ \\ & \left(\lambda_{5} \text { Ltg }^{j}+\lambda_{6}\right. \text { dIndROEE } \\ & \left.\mu_{0}^{j}+\lambda_{7} R D S \text { ales }^{j}\right)\left(1-\frac{P_{0}^{j}}{b p s_{0}^{j}}\right)+ \\ & \mu_{0}^{j} \end{aligned}$ | firm level |

Table 1: Implied Cost of Capital Models, Continued

| Model | Code | Basis | $\begin{array}{ll} \hline \hline \text { Growth } & \text { beyond } \\ \text { horizon } \end{array}$ | Horizon | Formulation | Type of estimate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Easton (2004) | ES | Abnormal Earnings Growth | data implied | 2 years | $\begin{aligned} & \frac{\operatorname{cep} s_{2}^{j}}{P_{0}^{\prime}}=\gamma_{0}+\gamma_{1} \frac{e p p 1_{1}^{j}}{P_{0}^{j}}+\mu_{0}^{j} \text { where } \text { ceps } s_{2}=e p s_{2}+r_{E}{ }^{*} \\ & d p s_{1}, \gamma_{0}=r *\left(r-g_{A G i E}\right) \text {, and } \gamma_{1}=\left(1+g_{A G i E}\right) \end{aligned}$ | portfolio <br> level |
| Transformed ES | TrES | ES | Transformation to the ES to yield firm-level estimates | 2 years | $\begin{aligned} & \frac{\text { ceps } s_{2}^{j}}{P_{0}^{2}}=\gamma_{0}+\gamma_{1} \frac{e p p_{1}^{j}}{P_{0}^{1}}+ \\ & \left(\lambda_{1} \text { Beta }^{j}+\lambda_{2} \text { LogSize }^{j}+\lambda_{3} \frac{P_{0}^{j}}{b p s_{0}^{j}}+\lambda_{4} \text { MoM }^{j}\right) \frac{P_{0}^{j}}{b p p_{j}^{j}} \\ & \left(\lambda_{5} \text { Ltg }^{j}+\lambda_{6} \text { dIndROE }^{j}+\lambda_{7} R D S \text { ales }{ }^{j}\right)\left(1-\frac{P_{0}^{b p s_{0}^{j}}}{b p}\right) \\ & \mu_{0}^{j} \\ & \hline \end{aligned}$ | firm level |
| O'Hanlon and Steele (2000) and Easton (2006) | OHE | Residual Income | data implied | NA | $\begin{aligned} & \frac{e p s_{t}^{J}}{b p p_{t-1}^{s}}=\delta_{0}+\delta_{1} \frac{p_{t}^{J}-b p s_{t}^{s}}{b p p_{t-1}^{J}}+\mu_{t}^{j} \text { where } \delta_{0}=r_{E} \text {, and } \\ & \delta_{1}=\frac{r_{E}-g_{p r e c p}}{1+g_{p r e p}} \end{aligned}$ | portfolio level |
| Transformed OHE | TrOHE | OHE | Transformation to the OHE to yield firm-level estimates | NA |  | firm level |
| Simple Ashton and Wang (2013) | SAW | price-led earnings | data implied | 1 year | $E_{t}\left[e_{t+1}\right]=\delta_{1} P t+\delta_{2} e_{t}+\delta_{3} b_{t}+\delta_{4} b_{t-1}$ | portfolio level |
| Extended Ashton and Wang (2013) | EAW | price-led earnings | data implied | 1 year | $E_{t}\left[e_{t+1}\right]=\delta_{1} P t+\delta_{2} e_{t}+\delta_{3} b_{t}+\delta_{4} b_{t-1}+\delta_{5} P_{t-1}$ | portfolio level |
| Wang (2018) | WNG | EAW | data implied | 1 year | $\begin{array}{ll} r_{E}=\left(1+g_{i t}\right)\left[1-\frac{b p s_{t}}{}-\left(\beta_{1, i t}-\left(R_{i t}-1\right) \beta_{2, i t} \frac{b p s_{t-1}}{P_{t}}\right.\right. & + \\ \left(1+\beta_{1, i t}+\beta_{2, i t}\right) \frac{e p s_{t+1}}{P_{t}} & + \\ \left(1-\beta_{1, i t}-\left(R_{t i t}-1\right) \beta_{2, i t} \frac{b p p s_{t}}{P_{t}}\right. & + \\ \lambda_{i t}\left[\frac{P_{t}-b p s_{t}-\left(P_{t-1}-b p s_{t-1}\right)}{P_{t}}\right]-1 \end{array}$ | $-\left(\beta_{1, i t}+\beta_{2, i}\right.$ <br> firm level |

Table 1: Implied Cost of Capital Models, Continued

| Model | Code | Basis | Growth <br> horizon | Type of es- <br> timate |  |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Dhaliwal, Krull, and <br> $(2007)$ | Li | DKL | Mean of GLS, CT, and GM | Forizon | Formulation |

This table reports a summary of the ICC models to be used in the subsequent analysis. These are the most widely recognized models in the literature. Some authors used a variant of the models that are presented here in terms of forecasting horizon or source of data, these have been ignored. The models highlighted are introduced in this work. The models have been defined and analytically derived in the previous section.

In addition to the models presented in the table, I add two models that are simplified versions of the BP model. There are two reasons for adding the two versions to the analysis. The first is related to the fact that, as the analysis will show, BP will fare pretty well against other models, and hence, it would be interesting to see what parts of this model is driving the performance: the dividends or the terminal value based on target prices. The second reason is related to data available in $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ through DataStream. BP and subsequent research using this model used a database called Value Line to obtain price target data. The BP model has a forecasting horizon of 5 years, and hence, it requires a price target for the fifth year to calculate the terminal value. On the other hand, Thomson Reuters documentation (Thomson Reuters (2010)) is ambiguous to the horizon for which the target price is estimated, and so does the Datastream MS terminal. Therefore, I add the following two formulations to the models tested:

- One year forecasting horizon dividend discount model with a terminal value similar to BP: $V_{0}=\frac{D P S_{1}+\text { TargetPrice }}{(1+r)}$. The short hand notation that would be used for this model is TPDPS.
- Price target-only discounted model: $V_{0}=\frac{\text { TargetPrice }}{(1+r)}$. The short hand notation that would be used for this model is Naive.


### 2.3.3 Earnings and Other Forecasts

To implement the ICC models in Table (1), earning forecasts are obtained either from analysts using $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ database, or cross-sectional mechanical models of estimates. Four mechanical models has been used: (1) Hou, van Dijk, and Zhang (2012) model (HDZ), (2) the naive Random Walk (RW) model as expressed by Gerakos and Gramacy (2013), (3) Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI).

HDZ model is specified as:

$$
\begin{equation*}
E_{t+\tau}=\alpha_{0}+\alpha_{1} A_{t}+\alpha_{2} D_{t}+\alpha_{3} D D_{t}+\alpha_{4} E_{t}+\alpha_{5} N e g E_{t}+\alpha_{6} A C_{t}+\varepsilon \tag{49}
\end{equation*}
$$

where $E_{t+\tau}$ is the firm earnings in year $t+\tau$, where $\tau$ is 1 to 5 years. $A_{t}$ is the total assets of the firm, $D_{t}$ is the dividends paid by the firm, and $D D_{t}$ is a dummy to indicate whether a firm is paying dividends. $E_{t}$ is earnings, and $N e g E_{t}$ is a dummy for loss making firms. $A C_{t}$ is the firm working capital accruals. To be consistent with the original paper, the regression is estimated using dollar level unscaled data. The regression coefficients are multiplied by firm level observations at time $t$ to obtain firm-level earnings forecasts.

The RW is used as a naive benchmark to evaluate the performance of other earnings forecast models. It simply uses past earnings with no other parameters as follows:

$$
\begin{equation*}
E_{t+\tau}=E_{t}+\varepsilon \tag{50}
\end{equation*}
$$

The EP model uses earnings $E_{t}$, a dummy for loss making firms $\operatorname{Neg} E_{t}$, as well as an interaction term between them as regression parameters. It is expressed as follows:

$$
\begin{equation*}
E_{t+\tau}=\alpha_{0}+\alpha_{1} E_{t}+\alpha_{2} N e g E_{t}+\alpha_{3} N e g E_{t} * E_{t}+\varepsilon \tag{51}
\end{equation*}
$$

Unlike the HDZ model, Li and Mohanram (2014) used per-share level data in the regression for both EP and RI. Li and Mohanram (2014) motive for developing the cross sectional Residual Income model for earning forecast is the proposition that dividends, which are used as a parameter in HDZ, are irrelevant for asset pricing. The RI model is specified as follows:

$$
\begin{equation*}
E_{t+\tau}=\alpha_{0}+\alpha_{1} E_{t}+\alpha_{2} N e g E_{t}+\alpha_{3} N e g E_{t} * E_{t}+\alpha_{4} B_{t}+\alpha_{5} T A C C_{t}+\varepsilon \tag{52}
\end{equation*}
$$

where $B_{t}$ is the book value of the firm, and $T A C C_{t}$ is total accruals according to Richardson, Sloan, Soliman, and Tuna (2005) definition. TACC is calculated as a sum of the change in net working capital, the change in net non-current operating assets, and the change in net financial assets. Working capital is the difference between the current assets excluding cash and short-term investments, and current liabilities excluding the debt portion in current liabilities. Non-current operating assets is defined as the difference between total assets excluding current assets and investments and advances, and the total liabilities excluding
long-term debt and current liabilities. Net financial assets is the difference between investments and total debts including preference shares. Using the balance sheet identity, one could calculate TACC as the change in common equity minus the change in cash. In the sample, both calculation methods resulted in almost the same figures.

### 2.3.4 Testing Methods

### 2.3.4.1 Capturing Subsequent Future Returns

In conducting a horse race between the various ICC models described, I first test the proxies as an economic construct. Specifically, the test is to what extent are these models able to capture the variation in subsequent realised return. Based on the Vuolteenaho (2002) and Campbell (1991) decomposition of return, realised return at time $t$ can be modelled as the summation of the expected return at time $t$ conditional on the information available at $t-1$ and the abnormal/unexpected return due to unforeseen information. The latter could be further decomposed to unexpected return due to cash flow news and the unexpected return due to expected return news or future discount rates.

$$
\begin{equation*}
r_{\text {realised }, t}=E_{t-1}\left(r_{t}\right)+\left(N_{c f, t}-N_{r, t}\right) \tag{53}
\end{equation*}
$$

where $r_{\text {realised, } t}$ is the realised return from $t-1$ to $t ; E_{t-1}\left(r_{t}\right)$ is the expected return at $t$ based on the information available at $t-1 ; N_{c f, t}$ is the return due to cash flow news from $t-1$ to t ; and $N_{r, t}$ is the return due to unexpected return news from $t-1$ to t . The last term has a negative sign to reflect the expectation that an increase in discount rates would make realised returns lower than expected due to contemporaneous price decrease, all other things assumed unchanged. This formulation is derived from a tautology (i.e. a fully specified model), and hence, it allows for analysing the issue of realised returns as being a noisy measure of expected returns. That is because it model realised returns using the changes in expectations about future discount rates and future firm-specific cash flows. The variables are measured with error, which is unknown in terms of sign and magnitude. The error is originated by the fact that these variables are unobservable. However, the resulting bias in
the regression coefficients is well defined because if the variables were measured without error, by the construction of the decomposition, the coefficients should equal to 1 .

Prior research assumes that the mean of $\left(N_{c f, t}-N_{r, t}\right)$ is zero in order to justify the use of realised returns to proxy for expected returns. However, Vuolteenaho (2002) showed that the term $N_{c f, t}$ is firm-specific, and that $\left(N_{c f, t}-N_{r, t}\right)$ play a major part in driving firm level return estimates. Hence, firm-level realised returns are poor proxies for expected returns. At portfolio level, even though averaging might mitigate the firms cash flow news issue, it is still unlikely to help with the overall unexpected return due to systematic macroeconomic expected return news. Chan and Lakonishok (1993) showed that attempting to average over increasingly larger samples and longer periods to purge the unexpected return distortion would invoke unpalatable stationarity assumptions. Finally, ignoring the unexpected return from the study of the association between realised returns and expected returns would render the analysis vulnerable to omitted variables bias. Fama and French (2002) and Elton (1999) demonstrated that information surprises do not cancel across companies and over time. The analysis to follow will further show that these information surprises are correlated with expected returns. Hence, regressing realised returns on expected return would yield spurious results due to omitted correlated variables.

Therefore, in operationalising the model in equation (53), I will use the empirical variables used by Botosan, Plumlee, and Wen (2011) to proxy for $N_{c f, t}$ and $N_{r, t}$ with one exception. Namely, $N_{c f, t}$ will be captured using two proxies: (1) earnings surprise during realised return period to represent the cash flow news in the short term, and (2) the revision in analysts forecasts of target price during the same period to represent the cash flow related news in the long run. $N_{r, t}$ will also be proxied with two empirical variables: (1) the change in firm specific beta to measure the the amount of risk associated with the firm that affect expected return, and (2) change in implied expected return from $t-1$ to $t$ to capture the news affecting expected returns from macroeconomic factors, which is a departure from Botosan et al. (2011). Botosan et al. (2011) use the change in risk free rate between $t-1$ and $t$. This variable has been criticised by later work such as Easton and Monahan (2016) and Wang (2018) for being constant in the cross-section, for not capturing risk, and for not allowing differ-
ent effect on different firms. They argue further that using the change of implied expected return is more consistent with Vuolteenaho (2002) decomposition analysis. To incorporate this criticism, the empirical model applied here is specified as follows:

$$
\begin{equation*}
r_{\text {realised,it }}=\alpha_{0}+\beta_{1} E R_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t} \tag{54}
\end{equation*}
$$

where $r_{\text {realised,it }}$ is the future realised return (i.e. for the period after the estimation of ICC); $E R_{i t-1}$ is the expected return proxy from the ICC models at the realised return period conditional on the information available at the previous period ; $C F N S T_{i t}$ is the news about cash flows received during the period of realised return; $C F N L T_{i t}$ is the news captured by the target price (which is a present value of an infinite horizon cash flows beyond the forecasting point) during the realised return period; $E W E R N_{i t}$ is the economy wide expected return news represented by the change in expected return, and the $F S E R N_{i t}$ is the firm-level expected return news at the realised return period.

Note that the above validity test is designed to evaluate firm-level expected return proxies. As presented in table (1), there are 19 firm-level models, among which four are transformations of an underlying portfolio-level model. These are TrETSS, TrES, TrOHE and WNG. For the purpose of this analysis, these transformed models are estimated using two types of portfolios (except WNG): 10 Industries portfolios according to Fama and French 1997 classifications, and 25 size-Book to market portfolios. Therefore the total models tested against subsequent realised returns are 22 firm-level formulations as follows:

- 11 Firm-level models: GLS, CT, FGHJ, GM, PE, PEG, MPEG, GG, BP, TPDPS and Naive.
- 4 Amalgamated firm-level models: DKL, HL, KMY and FPM.
- 7 Portfolio-level models transformed to yield firm-level estimates: WNG, TrETSS_10Ind, TrETSS_25SBM, TrES_10Ind, TrES_25SBM, TrOHE_10Ind and TrOHE_25SBM.


### 2.3.4.2 Statistical Horse-Race using Models Confidence Set Method

The second approach through which I evaluate the performance of the various ICC modules is an out-of-sample analysis using the non-parametric approach as described by Hansen, Lunde, and Nason (2011), known as Model Confidence Set (MCS). In this testing, the ICC estimates are viewed as statistical constructs. MCS is used to identify a collection of models that outperform the rest of the models under a given loss function at a specific level of confidence. Firstly, I set the loss function to a classical accuracy measure of predictability and quality of an estimator, that is the Root Mean Squared Error (RMSE) and Mean Absolute Error (MAE). These are defined as follows:

$$
\begin{align*}
R M S E & =\sqrt{\frac{1}{T} \sum_{t=1}^{T}\left(r_{\text {realisedi } t}-E_{t-1}\left(r_{i, t}\right)\right)^{2}}  \tag{55}\\
M A E & =\frac{1}{T} \sum_{t=1}^{T}\left|r_{\text {realisedi }, t}-E_{t-1}\left(r_{i, t}\right)\right| \tag{56}
\end{align*}
$$

Next, I set the loss function in the MCS to the Measurement Error Variance (MEV). Lee, So, and Wang (2017) argue that biases in expected return proxies are irrelevant in many applications. Rather, the proxy with the relatively lowest measurement-error variance should be declared the winner in the horse race. They propose a two dimensional framework for the assessment of the relative quality of alternative expected return proxies based on the deviation of expected return estimates from a normative benchmark. The benchmark is the firm-level true -unobservable- expected return. These deviations, or measurement errors are obviously unobservable. However, one could derive the characteristics of the errors distribution such as the mean and the variance. The mean measurement error (the bias) and the measurement error variance (MEV) could be obtained for the cross-section or over time for all observations. Lee, So, and Wang (2017) argue and subsequently show using simulation analysis that the magnitude of the bias is unimportant or completely irrelevant in many expected return applications. They document that in $83 \%$ of the studies they surveyed in top Finance and Accounting journals since 1997, the precise measurement of the effect of interest is not affected by the absolute bias of the estimates, but depending on the relative magnitude of expected returns estimates and how closely they match the relative magnitude of true expected returns. Hence, whether the application is cross-sectional or time-series
oriented, the relevant MEV play a major role in estimating the effects of interest. For this reason, the authors conclude the MEV is a more desirable model selection test than Mean Squared Error (MSE) for instance. MSE is the sum of the error variance and its squared bias, and hence it penalises models for both the absolute bias and the MEV, while for most application, the latter only matters. As compared to the validity test of regressing future realised returns on expected returns, Lee, So, and Wang (2017) argued that even if the coefficient is 1, it is not necessary that the model is ideal. As a matter of fact, one could generate noisy expected return processes that have a slope of 1 .

To arrive at MEV, the realised return $r_{\text {realisedi,t }}$ is decomposed to $r_{T r u e i, t-1}$ which is the firm true but unobservable expected return conditional on available information at time $t-1$, and $\delta_{i, t}$ which is the firm unanticipated news of forecast error. The latter term is equivalent to the $\left(N_{c f, t}-N_{r, t}\right)$ in equation (53). However, such segregation is not necessary here since the benchmark is the normative true expected return. Such decomposition is in line with Decomposition Property of conditional expectations and the Prediction Property of conditional expectation as described in Angrist and Pischke (2008).

$$
\begin{equation*}
r_{\text {realisedi } i, t}=r_{T r u e i, t-1}+\delta_{i, t} \tag{57}
\end{equation*}
$$

Further, the expected return estimate from alternative models could be decomposed in the same way as follows:

$$
\begin{equation*}
E_{t-1}\left(r_{i, t}\right)=r_{\text {Truei }, t}+\omega_{i, t} \tag{58}
\end{equation*}
$$

where $E_{t-1}\left(r_{i, t}\right)$ is the expected return at t based on the information available at $t-1$ according to a certain model; $r_{\text {Truei,t-1 }}$ is the firm true but unobservable expected return conditional on available information at time $t-1$; and $\omega_{i, t}$ is measurement error. Obviously the true expected return is unobservable, but the objective is to evaluate whether a certain model of expected return forecasting captures the variation in $r_{\text {Truei,t }}$ in the cross-section and over-time. Hence, the task of comparing alternative expected return models boils down to comparing the distributional properties of the errors $\omega_{i, t}$ across firms and over time. Since for many expected return applications, the precision of the empirical test depends on the
variance of the model estimates from the true expected return being small, the appropriate loss function should be set to be MEV.

Appreciating that the errors are unobservable, Lee, So, and Wang (2017) derive the following firm-level empirically estimable formulation of time series MEV:

$$
\begin{equation*}
\operatorname{Var}_{i}\left(\omega_{i, t}\right)=\operatorname{Var}_{i}\left(E_{t-1}\left(r_{i, t}\right)\right)-2 \operatorname{Cov}_{i}\left(r_{\text {realisedi }, t+1}, E_{t-1}\left(r_{i, t}\right)\right)+\operatorname{Var}_{i}\left(r_{\text {Truei }, t}\right) \tag{59}
\end{equation*}
$$

The term $\operatorname{Var}_{i}\left(r_{\text {Truei, },}\right)$ is still unobservable, but it is constant across alternative expected return models. Hence, it does not have an effect on the relative performance of competing models, and therefore can be dropped for the task of determining which model have a minimum time-series variance in measurement error. This shall be called the Scaled Error Variance $\left(S \operatorname{Var}_{i}\left(\omega_{i, t}\right)\right.$ ). In the following testing of ICC models, I will compute $\left(S \operatorname{Var}_{i}\left(\omega_{i, t}\right)\right)$ for each model and each firm, and assess time series performance based on the average across firms AvgS $\operatorname{Var}^{T S}=\frac{1}{N} \sum_{i} S \operatorname{Var}_{i}\left(\omega_{i, t}\right)$.

The null hypothesis tested using MCS approach is that two models lead to the same loss at a specific time. To compute the MCS, I use a block bootstrap process with a block of 2 observation and 10,000 replications. The significance level is set to $5 \%$.

### 2.4 Descriptives

Table (2) provides descriptive statistics of the firms' characteristics in the sample. Table (3) reports analysts estimates statistics of the various variables for 5 forecasting periods ahead. The average (median) number of analysts following each firm is almost 10 (8) analysts. The long-term growth in earnings forecast has an inter-percentile [5,95] range between 4 and 30 percent. The average of earnings per share (EPS), dividend per share (DPS), and the cash flow from operations per share (CPS) increases as the further into the future the forecast goes. The EPS and DPS forecasts statistical attributes are comparable to the actual figures in table (2). Net debt (NDT) also exhibit a similar pattern when the forecasts are contrasted with the actual figure.

Table (4) reports the results of estimating the various firm-level models as described in table (1) using analysts estimates, as well as the subsequent realised return over the next 12

Table 2: Summary Statistics of Firms' Characteristics

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Earnings per share | 1.412 | 1.659 | 0.000 | 0.290 | 0.980 | 1.920 | 4.350 | 2.557 | 11.942 |
| Dividend per share | 0.383 | 0.588 | 0.000 | 0.000 | 0.080 | 0.560 | 1.680 | 2.024 | 7.103 |
| Market-to-Book | 2.986 | 3.377 | 0.560 | 1.410 | 2.180 | 3.440 | 8.390 | 3.044 | 16.963 |
| Book value per share | 12.376 | 15.157 | 0.539 | 4.050 | 8.494 | 15.394 | 36.101 | 3.553 | 19.932 |
| ROE | 10.038 | 25.635 | -28.150 | 5.200 | 11.920 | 18.730 | 39.020 | -1.549 | 12.664 |
| Dividend Payout | 16.949 | 23.266 | 0.000 | 0.000 | 0.920 | 29.270 | 68.380 | 1.384 | 4.096 |
| Price | 29.316 | 26.836 | 2.986 | 12.060 | 22.625 | 38.000 | 75.090 | 2.476 | 11.782 |
| Momentum (12 months) | 0.187 | 0.524 | -0.513 | -0.110 | 0.122 | 0.376 | 1.091 | 1.697 | 8.384 |
| Target Price/ Price | 1.290 | 0.492 | 0.918 | 1.054 | 1.159 | 1.334 | 2.104 | 3.761 | 20.666 |
| Beta | 0.145 | 0.150 | 0.000 | 0.000 | 0.109 | 0.228 | 0.448 | 1.119 | 3.838 |
| Beta Standard Error | 0.044 | 0.037 | 0.000 | 0.018 | 0.041 | 0.062 | 0.111 | 1.097 | 4.980 |
| Earnings Varaibility [std(forecasted EPS)/price] | 0.005 | 0.011 | 0.000 | 0.001 | 0.002 | 0.005 | 0.021 | 4.784 | 29.186 |
| Leverage | 2.468 | 4.784 | 0.071 | 0.335 | 0.826 | 2.165 | 10.879 | 3.990 | 21.261 |
| Total Assets (\$mill) | 7778.170 | 23086.611 | 62.181 | 353.002 | 1178.238 | 4420.000 | 34163.000 | 5.535 | 36.729 |
| Equity (\$mill) | 1835.771 | 4041.514 | 17.878 | 177.716 | 484.379 | 1433.300 | 8772.000 | 4.170 | 22.393 |
| Net Income (\$mill) | 264.806 | 783.203 | -91.029 | 9.144 | 48.145 | 181.675 | 1374.000 | 4.533 | 26.739 |
| EBITDA (\$mill) | 642.331 | 1571.567 | -17.059 | 41.769 | 140.147 | 462.000 | 3195.120 | 4.479 | 25.568 |
| Cash (\$mill) | 533.927 | 1527.257 | 2.511 | 23.691 | 88.894 | 317.624 | 2463.199 | 5.339 | 34.581 |
| Net Debt (\$mill) | 1920.436 | 4558.786 | -903.037 | -33.444 | 415.386 | 1920.900 | 10168.000 | 3.496 | 17.663 |
| Market Cap. (\$mill) | 5219.983 | 12314.553 | 74.330 | 446.405 | 1226.600 | 3839.485 | 23875.720 | 4.561 | 26.244 |
| Number of Outstanding Shares (mill) | 139.234 | 283.786 | 8.763 | 22.812 | 47.132 | 118.540 | 569.059 | 4.406 | 24.824 |

This table reports the summary statistics of firms' characteristics in the sample. The variables that are not per-share has been reported in millions of dollars.
months. The mean implied expected return range between 4.3 percent in the transformed OHE model using 25 size-B/M portfolios to as high as 38.8 percent using the transformed ES model. The dividend discount model GG also reported high estimates. The 5\% inter percentile range of the subsequent realised return ranged between -26 to 55 percent. This is in accordance with the previous literature observation of noisy historical return. Most of the ICC models give more stable estimates of expected return. For instance, GLS, one of the most widely ICC models have a range between 6 and $16.4 \%$. The $\mathrm{P} / \mathrm{E}$ ratio model range is between zero and $13 \%$. Table (5) present the Spearman correlation matrix between the estimates of the various ICC models. All models -except TrOHE_10Ind- have a positive and significant correlation with the subsequent realised return.

Tables (6) and (7) report the statistics of the variables used in forecasting earnings using mechanical models described in section (2.3.3), and the statistics of the resulting forecasts. Finally, the statistics of the control variables used in the regression testing are presented in table (8).

Table 3: Summary Statistics of Analysts Forecasts

|  | Mean | StD | Prert5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Analysts Per Firm | 9.778 | 7.354 | 1.000 | 4.000 | 8.000 | 14.000 | 25.000 | 1.058 | 3.581 |
| PT | 36.767 | 34.292 | 7.000 | 17.000 | 28.000 | 45.000 | 91.000 | 3.235 | 17.262 |
| Ltg (\%) | 14.646 | 9.171 | 4.000 | 10.000 | 13.000 | 18.000 | 30.000 | 1.196 | 7.205 |
| EPS 1 | 1.596 | 1.887 | -0.230 | 0.530 | 1.190 | 2.130 | 4.850 | 2.354 | 11.881 |
| EPS 2 | 1.924 | 2.023 | 0.110 | 0.730 | 1.430 | 2.450 | 5.470 | 2.727 | 13.419 |
| EPS 3 | 2.460 | 2.208 | 0.260 | 1.050 | 1.900 | 3.170 | 6.610 | 2.168 | 9.505 |
| EPS 4 | 3.149 | 2.654 | 0.360 | 1.400 | 2.470 | 4.120 | 8.170 | 1.903 | 7.958 |
| EPS 5 | 3.688 | 3.061 | 0.500 | 1.670 | 2.880 | 4.820 | 9.310 | 2.030 | 8.732 |
| DPS 1 | 0.609 | 0.782 | 0.000 | 0.000 | 0.350 | 0.900 | 2.150 | 2.026 | 8.006 |
| DPS 2 | 0.639 | 0.800 | 0.000 | 0.000 | 0.380 | 0.960 | 2.220 | 1.905 | 7.303 |
| DPS 3 | 0.708 | 0.850 | 0.000 | 0.000 | 0.420 | 1.090 | 2.440 | 1.606 | 5.696 |
| DPS 4 | 1.065 | 1.080 | 0.000 | 0.200 | 0.810 | 1.600 | 3.110 | 1.584 | 6.274 |
| DPS 5 | 1.146 | 1.179 | 0.000 | 0.220 | 0.870 | 1.700 | 3.410 | 1.644 | 6.418 |
| CPS 1 | 3.329 | 3.171 | 0.290 | 1.360 | 2.490 | 4.290 | 9.150 | 2.355 | 10.660 |
| CPS 2 | 3.780 | 3.450 | 0.520 | 1.630 | 2.820 | 4.770 | 10.070 | 2.458 | 11.129 |
| CPS 3 | 4.728 | 4.122 | 0.710 | 2.090 | 3.590 | 6.010 | 12.440 | 2.280 | 9.984 |
| CPS 4 | 5.818 | 5.367 | 0.980 | 2.410 | 4.300 | 7.300 | 15.865 | 2.517 | 11.352 |
| CPS 5 | 6.456 | 5.974 | 1.150 | 2.660 | 4.735 | 8.020 | 17.660 | 2.493 | 11.179 |
| CAP 1 | 398.447 | 935.447 | 4.230 | 23.500 | 75.000 | 271.410 | 2083.900 | 4.088 | 21.396 |
| CAP 2 | 404.733 | 950.431 | 4.800 | 24.500 | 78.000 | 275.000 | 2076.000 | 4.114 | 21.629 |
| CAP 3 | 561.161 | 1236.454 | 7.000 | 38.000 | 123.370 | 430.000 | 2790.000 | 4.048 | 21.497 |
| CAP 4 | 838.655 | 1984.491 | 9.737 | 55.000 | 189.000 | 671.000 | 3687.000 | 4.974 | 31.981 |
| CAP 5 | 923.526 | 2263.440 | 9.793 | 59.000 | 200.000 | 732.375 | 3892.298 | 5.101 | 32.714 |
| EBT 1 | 948.464 | 2162.369 | 4.097 | 82.550 | 246.000 | 775.000 | 4239.093 | 4.634 | 27.598 |
| EBT 2 | 1070.666 | 2384.894 | 19.965 | 104.900 | 293.130 | 892.370 | 4695.299 | 4.610 | 27.341 |
| EBT 3 | 1510.213 | 3160.066 | 40.500 | 165.000 | 452.525 | 1331.800 | 6488.238 | 4.373 | 24.795 |
| EBT 4 | 2177.182 | 4103.127 | 57.278 | 263.393 | 742.000 | 2115.615 | 9030.868 | 3.907 | 20.451 |
| EBT 5 | 2433.561 | 4461.306 | 66.000 | 290.000 | 821.150 | 2397.500 | 10405.100 | 3.704 | 18.670 |
| NDT 1 | 1605.962 | 4141.025 | -1245.861 | -78.870 | 325.500 | 1677.010 | 9179.168 | 3.193 | 16.012 |
| NDT 2 | 1445.472 | 4273.382 | -1779.380 | -155.720 | 250.400 | 1578.390 | 9142.141 | 2.930 | 15.130 |
| NDT 3 | 1432.469 | 4993.540 | -3023.250 | -299.460 | 236.700 | 1785.430 | 10209.000 | 2.343 | 13.079 |
| NDT 4 | 1932.309 | 7287.460 | -5563.445 | -371.370 | 456.545 | 2891.720 | 15747.125 | 1.146 | 9.861 |
| NDT 5 | 1388.745 | 7898.371 | -7589.913 | -627.298 | 258.600 | 2606.000 | 15236.254 | 0.353 | 10.310 |

This table reports the summary statistics of analysts forecasts that will be used for ICC estimations. The first row reports the statistics of the number of analysts following each firm in the sample. PT is the price target, and Ltg is the forecasted Long-term growth rate of earnings. EPS is the forecasted earnings per share. DPS is the forecasted dividend per share, and CPS is cash flow per share forecast. CAP is the forecasted capital expenditure, EBT is earnings before interest and taxes forecast, and NDT is the Net Debt forecast. The variables that are non per share are reported in millions of dollars. The number after the variables indicate the number of years ahead for which the forecast is attributed.

Table 4: Summary Statistics of the Firm-Level ICC Estimates

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| CT | 0.093 | 0.023 | 0.056 | 0.077 | 0.090 | 0.105 | 0.145 | 0.562 | 2.878 |
| GLS | 0.110 | 0.025 | 0.068 | 0.093 | 0.108 | 0.126 | 0.164 | 0.355 | 2.574 |
| GM | 0.114 | 0.029 | 0.074 | 0.094 | 0.107 | 0.126 | 0.187 | 1.025 | 3.575 |
| MPGE | 0.115 | 0.040 | 0.065 | 0.088 | 0.104 | 0.130 | 0.222 | 1.255 | 4.024 |
| GG | 0.319 | 0.078 | 0.170 | 0.269 | 0.318 | 0.368 | 0.473 | 0.034 | 2.540 |
| FGHJ | 0.117 | 0.022 | 0.080 | 0.102 | 0.115 | 0.130 | 0.165 | 0.433 | 2.645 |
| PEG | 0.100 | 0.049 | 0.000 | 0.076 | 0.095 | 0.121 | 0.216 | 0.365 | 3.613 |
| PE | 0.061 | 0.030 | 0.003 | 0.042 | 0.059 | 0.077 | 0.127 | 0.269 | 2.889 |
| HL | 0.107 | 0.025 | 0.071 | 0.089 | 0.102 | 0.119 | 0.170 | 0.907 | 3.325 |
| DKL | 0.105 | 0.023 | 0.071 | 0.089 | 0.101 | 0.117 | 0.160 | 0.762 | 3.085 |
| BP | 0.038 | 0.035 | -0.009 | 0.014 | 0.030 | 0.053 | 0.132 | 1.136 | 3.829 |
| KMY | 0.177 | 0.066 | 0.078 | 0.112 | 0.184 | 0.226 | 0.298 | 0.078 | 1.884 |
| FPM | 0.096 | 0.022 | 0.060 | 0.080 | 0.095 | 0.112 | 0.139 | 0.196 | 2.231 |
| TrETSS_25SBM | 0.101 | 0.151 | -0.094 | 0.000 | 0.045 | 0.174 | 0.484 | 1.123 | 3.439 |
| TrES_25SBM | 0.388 | 0.814 | -0.569 | 0.000 | 0.055 | 0.450 | 2.895 | 1.905 | 6.007 |
| TrOHE_25SBM | 0.043 | 0.139 | -0.243 | -0.011 | 0.024 | 0.102 | 0.365 | 0.330 | 3.490 |
| TrETSS_Ind10 | 0.045 | 0.114 | -0.184 | -0.015 | 0.049 | 0.098 | 0.314 | 0.212 | 3.440 |
| TrES_Ind10 | 0.231 | 0.335 | -0.118 | 0.034 | 0.089 | 0.300 | 1.249 | 1.832 | 5.684 |
| TrOHE_Ind10 | 0.054 | 0.048 | -0.048 | 0.027 | 0.054 | 0.083 | 0.152 | -0.050 | 2.963 |
| realised | 0.063 | 0.188 | -0.258 | 0.000 | 0.000 | 0.116 | 0.547 | 1.047 | 3.949 |

This table reports the summary statistics of the various firm-level ICC estimates based on analysts earnings forecasts, as well as the realised return.

Table 5: Spearman Correlation of the Firm-Level ICC Estimates

| CT | GLS | GM | MPEG | GG | FGHJ | PEG | PE | HL | DKL | BP | KMY | FPM | $\begin{aligned} & \text { TrOHE } \\ & \text { _10Ind } \end{aligned}$ | $\begin{aligned} & \hline \text { TrES } \\ & \text { 25SBM } \end{aligned}$ | $\begin{aligned} & \text { TrETSS } \\ & \text { _25SBM } \end{aligned}$ | $\begin{gathered} \text { TrOHE } \\ \text { 25SBM } \end{gathered}$ | $\begin{gathered} \hline \text { TrETSS } \\ \text { _Ind10 } \end{gathered}$ | $\begin{aligned} & \text { TrETSS } \\ & \text { _10Ind } \end{aligned}$ | realised |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT | 0.585*** | 0.607*** | 0.488*** | 0.678*** | 0.662*** | 0.357*** | 0.645*** | 0.776*** | 0.840*** | 0.493*** | 0.573*** | 0.607*** | 0.184*** | 0.061*** | 0.030*** | 0.056*** | 0.150*** | 0.070 | 0.073*** |
| GLS |  | 0.462*** | 0.456*** | 0.502*** | 0.977*** | 0.370*** | 0.598*** | 0.743*** | 0.814*** | 0.384*** | 0.345*** | 0.465*** | 0.156*** | 0.130*** | -0.103*** | 0.084*** | 0.081*** | 0.094*** | 0.126*** |
| GM |  |  | 0.927*** | 0.564*** | 0.502*** | 0.844*** | 0.186*** | 0.912*** | 0.831*** | 0.446*** | 0.600*** | 0.639*** | 0.099*** | 0.081*** | $-0.02 * * *$ | 0.049*** | 0.072*** | 0.016*** | 0.035*** |
| MPEG |  |  |  | 0.413*** | 0.47*** | 0.930** | 0.116*** | 0.889*** | 0.751*** | 0.380*** | 0.467*** | 0.57*** | 0.076*** | 0.086*** | -0.054*** | 0.045*** | 0.059*** | 0.018*** | 0.035*** |
| GG |  |  |  |  | 0.554*** | 0.483*** | 0.345*** | 0.598*** | 0.655*** | 0.436*** | 0.968*** | 0.428*** | 0.057*** | 0.043*** | 0.001 | 0.048*** | 0.053*** | 0.024*** | 0.051*** |
| FGHJ |  |  |  |  |  | 0.386*** | 0.610*** | 0.768*** | $0.844^{* * *}$ | 0.417*** | 0.374*** | 0.522*** | 0.174*** | 0.124*** | -0.072*** | 0.087*** | 0.099*** | 0.090*** | 0.119*** |
| PEG |  |  |  |  |  |  | -0.082*** | 0.653*** | 0.559*** | 0.304*** | 0.237*** | 0.405*** | -0.002 | 0.051*** | -0.055*** | 0.030*** | 0.025*** | $-0.008 * * *$ | 0.005** |
| PE |  |  |  |  |  |  |  | 0.445*** | 0.54*** | 0.342*** | 0.403*** | 0.319*** | 0.215*** | 0.070*** | 0.005** | 0.057*** | 0.149*** | 0.132*** | 0.104*** |
| HL |  |  |  |  |  |  |  |  | 0.973*** | 0.478*** | 0.570*** | 0.671*** | 0.147*** | 0.096*** | -0.050*** | 0.067*** | 0.106*** | 0.056*** | 0.084*** |
| DKL |  |  |  |  |  |  |  |  |  | 0.498*** | 0.583*** | 0.671*** | 0.166*** | 0.101*** | -0.046*** | 0.072*** | 0.114*** | 0.067*** | 0.095*** |
| BP |  |  |  |  |  |  |  |  |  |  | 0.473*** | 0.422*** | 0.125*** | 0.040*** | 0.043*** | 0.048*** | 0.110*** | 0.012*** | 0.064*** |
| KMY |  |  |  |  |  |  |  |  |  |  |  | 0.432*** | 0.109*** | 0.035*** | 0.032*** | 0.040*** | 0.117*** | 0.045*** | 0.067*** |
| FPM |  |  |  |  |  |  |  |  |  |  |  |  | 0.247*** | 0.051*** | 0.036*** | 0.064*** | 0.193*** | 0.036*** | 0.062*** |
| TrOHE_10Ind |  |  |  |  |  |  |  |  |  |  |  |  |  | -0.011*** | 0.004*** | 0.038*** | 0.170*** | 0.000 | -0.010*** |
| TrES_25SBM |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.097*** | 0.048*** | 0.065*** | 0.077*** | 0.084*** |
| TrETSS_25SBM |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.094*** | 0.078*** | 0.045*** | 0.048*** |
| TrOHE_25SBM |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.022*** | 0.002 | 0.023*** |
| TrETSS_Ind10 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.129*** | 0.097*** |
| TrETSS_10Ind realised |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.103*** |

This table reports the correlation matrix that corresponds to Spearman rank order correlations of the various firm-level ICC estimates based on analysts earnings forecasts and the realised return.

Table 6: Summary Statistics of the Variables used in the Mechanical Models

|  | Mean | StD | Prert5 | Prcrt25 | Median | Prert75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $A_{t}(\$$ mill $)$ | $7,778.170$ | $23,086.611$ | 62.181 | 353.002 | $1,178.238$ | $4,420.000$ | $34,163.000$ | 5.535 | 36.729 |
| $D_{t}(\$$ mill $)$ | 78.901 | 245.440 | 0.000 | 0.000 | 0.128 | 36.296 | 413.000 | 5.098 | 31.663 |
| $E_{t}(\$$ mill $)$ | 239.876 | 739.510 | -92.400 | 6.051 | 39.795 | 156.932 | $1,257.000$ | 4.639 | 27.711 |
| $A C_{t}(\$$ mill $)$ | -248.910 | 731.649 | $-1,302.100$ | -167.334 | -40.286 | -5.547 | 57.010 | -4.733 | 28.612 |
| $N e g E_{-} E_{t}(\$$ mill $)$ | -22.178 | 103.180 | -92.400 | 0.000 | 0.000 | 0.000 | 0.000 | -6.436 | 46.718 |
| $D D_{t}$ | 0.501 | 0.500 | 0.000 | 0.000 | 1.000 | 1.000 | 1.000 | -0.006 | 1.000 |
| $N e g E_{t}$ | 0.186 | 0.389 | 0.000 | 0.000 | 0.000 | 0.000 | 1.000 | 1.616 | 3.612 |
| $T A C C_{t}$ | 0.589 | 4.060 | -4.399 | -0.299 | 0.422 | 1.545 | 5.941 | -0.277 | 12.741 |
| $B_{t}$ | 12.376 | 15.157 | 0.539 | 4.050 | 8.494 | 15.394 | 36.101 | 3.553 | 19.932 |

This table reports the summary statistics of the regression variables used to generate mechanical forecasts of earnings. The units of the variables correspond to the units used in testing as described in section 2.3.3. $A_{t}$ is the total assets of the firm in millions of dollars, $D_{t}$ is the dividends paid by the firm, and $D D_{t}$ is a dummy to indicate whether a firm is paying dividends. $E_{t}$ is earnings in millions of dollars, and Neg $E_{t}$ is a dummy for loss making firms. $A C_{t}$ is the firm working capital accruals in millions of dollars, $T A C C_{t}$ is per-share total accruals according to Richardson, Sloan, Soliman, and Tuna (2005) definition, and $B_{t}$ is the per share book value of the firm.

Table 7: Summary Statistics of the Earnings Forecasts from Mechanical Models

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| HDZ1 | 1.954 | 2.488 | -1.351 | 0.584 | 1.435 | 2.645 | 6.053 | 2.689 | 13.911 |
| HDZ2 | 2.313 | 3.011 | -0.652 | 0.656 | 1.519 | 2.939 | 7.228 | 3.321 | 17.750 |
| HDZ3 | 2.745 | 3.754 | -0.583 | 0.722 | 1.709 | 3.381 | 8.880 | 3.481 | 18.586 |
| HDZ4 | 3.106 | 4.476 | -0.450 | 0.761 | 1.829 | 3.682 | 10.490 | 3.636 | 19.481 |
| HDZ5 | 3.348 | 4.783 | -0.290 | 0.831 | 1.988 | 3.955 | 11.123 | 3.724 | 20.324 |
| EP1 | 2.795 | 8.774 | -19.623 | 0.291 | 2.008 | 6.508 | 13.264 | 1.051 | 12.450 |
| EP2 | 5.066 | 7.866 | -12.639 | 1.224 | 4.595 | 9.740 | 18.169 | -0.223 | 3.037 |
| EP3 | 7.459 | 8.725 | -10.395 | 1.929 | 7.372 | 13.225 | 23.237 | 0.096 | 2.705 |
| EP4 | 5.746 | 7.423 | -11.067 | 0.309 | 6.533 | 11.343 | 16.517 | -0.344 | 3.038 |
| EP5 | 1.940 | 6.852 | -13.496 | -0.615 | 1.683 | 7.432 | 10.777 | -0.331 | 3.184 |
| RI1 | 2.582 | 5.467 | -7.327 | -0.733 | 1.048 | 6.597 | 12.781 | 0.490 | 2.833 |
| RI2 | 4.444 | 8.275 | -7.703 | -1.359 | 1.529 | 11.032 | 19.795 | 0.704 | 2.418 |
| RI3 | 3.968 | 9.005 | -9.798 | -1.841 | 0.554 | 10.620 | 22.663 | 0.841 | 2.759 |
| RI4 | 1.592 | 6.260 | -9.211 | -1.957 | 0.971 | 4.155 | 14.205 | 0.552 | 3.105 |
| RI5 | -0.958 | 6.240 | -12.952 | -4.217 | -0.890 | 1.899 | 9.317 | 0.933 | 6.758 |

This table reports the summary statistics of the earnings forecasts from the mechanical forecasting models for up to 5 years. The models are: Hou, van Dijk, and Zhang (2012) model (HDZ), (2) Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI).

Table 8: Summary Statistics of the Control Variables used in Testing ICC Estimates

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| CFNST | 0.000 | 0.061 | -0.078 | -0.017 | 0.000 | 0.010 | 0.075 | 2.429 | 16.988 |
| CFNLT | 0.105 | 0.537 | -0.734 | -0.147 | 0.089 | 0.326 | 0.987 | 0.587 | 6.064 |
| EWERN | 0.000 | 0.010 | -0.014 | -0.004 | 0.000 | 0.003 | 0.015 | -0.037 | 7.840 |
| FSERN | 0.005 | 0.070 | -0.104 | -0.012 | 0.000 | 0.024 | 0.118 | 0.177 | 7.983 |

This table reports the summary statistics of the control variables used in testing how much of the variation in subsequent realised return is captured by the ICC models as described in section (2.3.4.1).CFNS $T_{i t}$ is the news about cash flows received during the period of realised return; $C F N L T_{i t}$ is the news captured by the target price (which is a present value of an infinite horizon cash flows beyond the forecasting point) during the realised return period; $E W E R N_{i t}$ is the economy wide expected return news represented by the change in expected return, and the $F S E R N_{i t}$ is the firm-level expected return news at the realised return period.

### 2.5 Testing ICC Estimates as an Economic Quantity: Capturing the Variation in Subsequent Return

I start the analysis by investigating the ability of ICC models to capture the variation in the subsequent one year realised return. Table (9) report the results of regressing 27 expected returns proxies derived from ICC models using analysts forecasts as well as expected returns from some factor models on the subsequent 12 months realised returns. The regressions control for cash flow news and expected return news. The reported coefficients are the time-series averages from monthly cross-sectional regressions. The $t$-statistics -below each coefficient- are computed based on the temporal standard error of the coefficients as described by Fama and MacBeth (1973).

In theory, one should expect a positive coefficient for the ICC variable in various models. For the majority of expected return applications, the ability of the forecasting model to capture the cross-sectional variation in subsequent realised return is far more important than capturing the magnitude. Hence, testing whether the ICC coefficient is equal to one is unnecessarily stringent proof of validity, but the results are reported regardless. Column $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one.

More practically, an ICC proxy is valid for empirical applications if the coefficient is positive and statistically significant. In all but 10 models, I document a positive and statistically significant ICC coefficient with average magnitudes ranging from slightly above 0.121 (Naive) to 1.039 (PE_Anlst). All the factor models (CAPM, 3 Factors, 4 Factors, and 5 Factors models) reported statistically insignificant coefficients. The ICC models that yield statistically insignificant coefficient are all transformations of portfolio-level models using risk and firm characteristics. The original portfolio level models were developed in the literature to deal with issues like earnings growth estimation (See for instance, Easton et al. (2002)). Transforming ES, ETSS, and OHE models estimations by the method of Nekrasov and Ogneva (2011), or Wang (2018) (WNG) method for Ashton and Wang (2013) model to firm level estimates report no improved ability of these estimations in forecasting subsequent returns.

The cash flow news variables (CFNST and CFNLT) have positive coefficients in all the specifications as expected. The long-term cash flow news is especially consistently statistically significant. These observations are in line with previous research. The expected return news variables (EWERN and FSERN) are less consistently significant across the specifications.

In terms of relative performance, the table has been sorted using the adjusted $R^{2}$ improvement column. This column reports the difference between the adjusted $R^{2}$ of the model and the adjusted $R^{2}$ of the same model without the ICC variable. It proxies for the improvement achieved by the model in capturing the percentage of variation in realised returns when the ICC estimate is added. Although this sorting corresponds to the sorting by the $R^{2}$ of the model, the $R^{2}$ improvement is a better benchmark for the comparison since it indicates how much more variation in the subsequent returns can the formulation capture by adding the ICC estimate. A very interesting observation is the superiority of the simple models introduced in this work (TPDPS and Naive). The superiority is in terms of the percentage of variation in realised returns captured by the model $\left(R^{2}=60.2 \%\right.$ and $\left.R^{2}=60 \%\right)$, which are $6.5 \%$ and $6.3 \%$ higher than a benchmark specification without the ICC estimate respectively. Next comes the BP models which reports 5\% improvement, and the PE which reports 3.6\%. It is important to note that these models are much simpler in form than the rest in the list, which confirms to a general forecasting proposition that simpler models do a better job in forecasting.

A second observation is that models based on residual income (CT, GLS, FGHJ) reported better percentages than models based on abnormal growth in earnings (MPEG, GM, PEG). The average ICC models (HL, DKL, and KMY) reported figures reflecting their constituents. For instance, KMY contains GG estimates, which made it perform worse than the other two average models. The GG warrants a note in its own right. GG is a dividend discount model just like BP, but with a terminal value based on earnings perpetuity. This could indicate that BP performance (as well as TPDPS) are mainly driven by the terminal value based on the target price. This is especially evident when looking at the performance of Naive, which resembles the terminal values of BP and TPDPS. Lastly, including factor
models or transformed portfolio level estimates (WNG, OHE, ETSS, ES) achieved very low improvement in the percentage of variation in realised returns captured by the model.

Column $\% \mathbf{N}+$ sig report the percentage of months in which the ICC coefficient is positive and statistically significant in the cross section. Again, TPDPS, Naive, and BP estimates score the highest percentages of months with a positive and significant coefficient ( $71.7 \%$, $72.7 \%$, and $74.1 \%$ ). The PE_Anlst come second by this benchmark also, reporting $61 \%$. The residual income models (CT, GLS, FGHJ) also have higher percentages than abnormal growth in earnings models.

This observation is very interesting. It demonstrates that simple models like TPDPS, Naive, BP, and PE work better in forecasting subsequent returns than more complicated models. TPDPS and BP are dividend discount models with a terminal value based on the analysts target price. Again, as compared to GG, which is also a dividend discount model but with a terminal value based on earnings perpetuity, one could conclude that the terminal value is the driver of performance. This is further demonstrated by the performance of Naive which is formulated in a similar spirit as BP terminal value. Therefore, the primary driver of the good performance of these representations is that the analysts' target price of a firm concurs with market participants beliefs embedded in the firm stock price. A similar observation is noted by Barron, Harris, and Stanford (2005). The PE model is also a simple market multiple formulation that assumes zero growth in abnormal earnings beyond the forecasting horizon. Since this is a widely used ratio in the industry, it is reasonable to expect that such formulation will also coincide with market beliefs about expected returns.
$\beta_{I C C}^{T S}=1$ column report the p -value of testing whether the average ICC coefficient is statistically indistinguishable from one (the theoretical value). The null hypothesis for which the p value is reported in the column is that the beta does not equal one. Note that this is a more rigid form of testing as compared to testing whether the coefficient is positive and statistically significant as in column $\% \mathbf{N}+\mathbf{s i g}$. The results show that TPDPS and Naive have a coefficient that is indistinguishable from 1 statistically. However, neither the BP or PE report a p-value below a reasonable threshold. The CAPM report a coefficient which is not equivalent to one statistically also. In this respect, column $\beta_{I C C}^{C S}=1$ reports the percentage
of months in which the ICC cross-sectional coefficient is statistically indistinguishable from one. TPDPS and Naive are especially doing well by this rather stringent measure scoring $95.6 \%$. Some of the transformed portfolio-level models also reported very high percentages of months in which the ICC cross-sectional coefficient is statistically indistinguishable from one. However, the best performing models in capturing subsequent realised returns reported the following $\beta_{I C C}^{C S}=1$ percentages: BP (51.2\%), PE (43.9\%), CT (55.1\%), GLS (59.5\%), FGHJ (59.5\%).

The intercept is expected to be zero in models that are well specified. This is the case in BP, PE, CT, GLS, FGHJ, DKL, HL, FPM, KMY, and GG. Although low in magnitude, TPDPS and Naive have positive and significant intercepts.

Table 9: Capturing Subsequent Return using Analysts forecasts based ICC

| Model |  |  |  |  | EWERN |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | Intercept | ICC | CFNST 0.194 | CFNLT | EWERN | FSERN | Adj $R^{2}$ $60.2 \%$ | $R^{2}$ Imp. $6.5 \%$ | $\frac{\mathbf{N}}{205}$ | $\beta_{I C C}^{T S}=1$ 0.000 | \% $\quad$ + + sig | $\frac{\% \beta_{I I C}^{C J}}{C J}=1$ |
|  | (3.062) | (5.887) | (1.515) | (21.160) | (2.300) | (-1.265) |  |  |  |  |  |  |
| Naive | 0.026*** | 0.121*** | 0.275*** | $0.462 * * *$ | 0.086* | -0.165 | 60\% | 6.3\% | 205 | 0.000 | 72.7\% | 95.6\% |
|  | (3.760) | (7.186) | (3.355) | (22.011) | (2.440) | (-1.437) |  |  |  |  |  |  |
| BP_Anlst | 0.015 | 0.711*** | -0.015 | 0.456*** | 0.504* | -0.258 | 58\% | 5.0\% | 205 | 0.145 | 74.1\% | 51.2\% |
|  | (1.355) | (3.599) | (-0.047) | (19.551) | (2.207) | (-1.134) |  |  |  |  |  |  |
| PE_Anlst | -0.016 | 1.039*** | 0.467*** | 0.411*** | 0.760 | -0.299 | 56.2\% | 3.6\% | 205 | 0.723 | 61.0\% | 43.9\% |
|  | (-1.813) | (9.342) | (3.228) | (18.178) | (1.300) | (-1.932) |  |  |  |  |  |  |
| CT_Anlst | -0.015 | 0.558*** | 0.093 | $0.431 * * *$ | 1.217 | -0.053 | 54.8\% | 2.2\% | 205 | 0.000 | 43.9\% | 55.1\% |
|  | (-1.439) | (5.266) | (1.276) | (19.808) | (1.843) | (-0.993) |  |  |  |  |  |  |
| HL_Anlst | -0.024 | 0.626*** | 0.089 | 0.424*** | 0.601 | 0.000 | 54.6\% | 1.9\% | 205 | 0.000 | 36.1\% | 50.7\% |
|  | (-2.426) | (7.041) | (1.583) | (20.450) | (1.946) | (-0.004) |  |  |  |  |  |  |
| DKL_Anlst | -0.037 | 0.753*** | 0.103 | 0.426*** | 0.472 | -0.034 | 54.9\% | 1.9\% | 205 | 0.032 | 41.0\% | 45.4\% |
|  | (-3.228) | (6.586) | (1.699) | (20.292) | (1.033) | (-0.665) |  |  |  |  |  |  |
| GLS_Anlst | -0.046 | 0.843*** | 0.135 | 0.405*** | 0.994 | -0.237 | 55\% | 1.7\% | 205 | 0.308 | 37.1\% | 59.5\% |
|  | (-3.036) | (5.496) | (1.057) | (17.924) | (1.499) | (-1.618) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.048 | 0.768*** | 0.047 | 0.424*** | 1.602*** | -0.104 | 55\% | 1.7\% | 205 | 0.068 | 40.0\% | 59.5\% |
|  | (-3.317) | (6.091) | (0.592) | (19.521) | (3.402) | (-1.790) |  |  |  |  |  |  |
| MPEG_Anlst | 0.003 | 0.348*** | 0.002 | 0.42*** | 0.095 | 0.069 | 53.9\% | 1.7\% | 205 | 0.000 | 33.2\% | 57.1\% |
|  | (0.302) | (6.055) | (0.038) | (19.670) | (0.364) | (1.116) |  |  |  |  |  |  |
| FPM_Anlst | -0.023 | 0.574*** | -0.063 | $0.435 * * *$ | -0.348 | 0.043 | 53.7\% | 1.6\% | 205 | 0.010 | 34.1\% | 42.4\% |
|  | (-1.593) | (3.494) | (-0.829) | (18.742) | (-0.608) | (0.672) |  |  |  |  |  |  |
| GM_Anlst | -0.025 | 0.595*** | 0.038 | $0.425 * * *$ | 0.309 | 0.043 | 54\% | 1.6\% | 205 | 0.000 | 35.1\% | 54.1\% |
|  | (-2.741) | (8.197) | (0.705) | (20.558) | (1.136) | (0.771) |  |  |  |  |  |  |
| KMY_Anlst | -0.016 | 0.248*** | -0.049 | 0.433*** | 0.404 | -0.025 | 53.7\% | 1.2\% | 205 | 0.000 | 29.8\% | 69.8\% |
|  | (-1.350) | (4.912) | (-0.824) | (19.071) | (1.268) | (-0.455) |  |  |  |  |  |  |
| PEG_Anlst | 0.02* | 0.199*** | -0.027 | 0.412*** | 0.262 | 0.110 | 53.2\% | 1.1\% | 205 | 0.000 | 19.5\% | 71.2\% |
|  | (2.253) | (3.513) | (-0.396) | (19.737) | (1.307) | (1.528) |  |  |  |  |  |  |
| GG_Anlst | -0.015 | 0.161*** | -0.101 | 0.438*** | 0.371 | 0.005 | 53.2\% | 0.9\% | 205 | 0.000 | 28.8\% | 77.1\% |
|  | (-0.863) | (3.801) | (-1.473) | (17.315) | (1.169) | (0.094) |  |  |  |  |  |  |
| 3FF_Factor | 0.041*** | -0.228 | -0.077 | $0.435 * * *$ | 3.833 | -0.068 | 52.9\% | 0.7\% | 205 | 0.000 | 8.8\% | 44.9\% |
|  | (4.064) | (-1.258) | (-0.696) | (14.352) | (1.630) | (-0.304) |  |  |  |  |  |  |
| 5FF_Factor | 0.035*** | 0.141 | -0.021 | $0.427 * * *$ | 0.062 | 0.102 | 52.4\% | 0.6\% | 205 | 0.000 | 10.2\% | 51.2\% |
|  | (4.285) | (0.901) | (-0.246) | (18.407) | (0.049) | (1.224) |  |  |  |  |  |  |
| CAPM_Factor | 0.095 | -6.010 | -0.208 | 0.449*** | -7.723 | -0.383 | 52.8\% | 0.6\% | 205 | 0.425 | 20.5\% | 24.9\% |
|  | (0.870) | (-0.686) | (-1.964) | (15.327) | (-0.714) | (-0.679) |  |  |  |  |  |  |

Continued in next page...

Table 9: Capturing Subsequent Return using Analysts forecasts based ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_10Ind | $\begin{array}{r} \hline 0.039 * * * \\ (3.802) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.006) \end{array}$ | $\begin{array}{r} -0.016 \\ (-0.078) \end{array}$ | $\begin{array}{r} \hline 0.409^{* * *} \\ (9.905) \end{array}$ | $\begin{array}{r} 0.211 \\ (1.040) \end{array}$ | $\begin{array}{r} -0.485 \\ (-0.938) \end{array}$ | 52.1\% | 0.6\% | 205 | 0.000 | 20.0\% | 79.0\% |
| TrES_Anlst _10Ind | $\begin{array}{r} 0.042 * * * \\ (4.576) \end{array}$ | $\begin{aligned} & 0.025^{*} \\ & (2.024) \end{aligned}$ | $\begin{array}{r} -0.065 \\ (-0.458) \end{array}$ | $\begin{array}{r} 0.404 * * * \\ (13.276) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.030) \end{array}$ | $\begin{array}{r} -0.209 \\ (-1.609) \end{array}$ | 53\% | 0.5\% | 205 | 0.000 | 22.0\% | 98.0\% |
| TrETSS_Anlst _10Ind | $\begin{array}{r} 0.039 * * * \\ (5.078) \end{array}$ | $\begin{array}{r} 0.035 \\ (0.836) \end{array}$ | $\begin{array}{r} -0.096 \\ (-1.020) \end{array}$ | $\begin{array}{r} 0.416 * * * \\ (15.664) \end{array}$ | $\begin{array}{r} 0.109 \\ (1.742) \end{array}$ | $\begin{array}{r} -0.173 \\ (-1.057) \end{array}$ | 51.8\% | 0.1\% | 205 | 0.000 | 13.7\% | 83.4\% |
| Carhart_Factor | $\begin{array}{r} 0.041 * * * \\ (4.238) \end{array}$ | $\begin{array}{r} -0.159 \\ (-0.975) \end{array}$ | $\begin{array}{r} -0.104 \\ (-1.590) \end{array}$ | $\begin{array}{r} 0.432 * * * \\ (16.078) \end{array}$ | $\begin{array}{r} 1.736 \\ (1.396) \end{array}$ | $\begin{array}{r} -0.075 \\ (-0.416) \end{array}$ | 52.1\% | 0.0\% | 205 | 0.000 | 9.8\% | 61.0\% |
| TrES_Anlst _25SBM | $\begin{array}{r} 0.057 * * * \\ (5.017) \end{array}$ | $\begin{array}{r} -0.004 \\ (-0.578) \end{array}$ | $\begin{array}{r} -0.127 \\ (-1.605) \end{array}$ | $\begin{array}{r} 0.399 * * * \\ (18.408) \end{array}$ | $\begin{array}{r} 0.003 \\ (0.562) \end{array}$ | $\begin{array}{r} -0.142 \\ (-1.674) \end{array}$ | 52.5\% | 0.0\% | 205 | 0.000 | 7.8\% | 99.0\% |
| WNG_Anlst | $\begin{array}{r} 0.042 * * * \\ (5.683) \end{array}$ | $\begin{array}{r} 0.005 \\ (1.632) \end{array}$ | $\begin{array}{r} -0.069 \\ (-1.200) \end{array}$ | $\begin{array}{r} 0.423 * * * \\ (19.582) \end{array}$ | $\begin{array}{r} -0.269 \\ (-2.093) \end{array}$ | $\begin{array}{r} -0.088 \\ (-0.925) \end{array}$ | 52\% | -0.1\% | 205 | 0.000 | 9.3\% | 99.0\% |
| TrOHE_25SBM | $\begin{array}{r} 0.042 * * * \\ (5.590) \end{array}$ | $\begin{array}{r} 0.005 \\ (0.098) \end{array}$ | $\begin{array}{r} -0.100 \\ (-1.514) \end{array}$ | $\begin{array}{r} 0.423 * * * \\ (18.777) \end{array}$ | $\begin{array}{r} -0.011 \\ (-0.781) \end{array}$ | $\begin{array}{r} -0.169 \\ (-0.920) \end{array}$ | 51.5\% | -0.2\% | 205 | 0.000 | 14.1\% | 94.6\% |
| TrETSS_Anlst _25SBM | $\begin{array}{r} 0.049 * * * \\ (6.526) \\ \hline \end{array}$ | $\begin{array}{r} -0.047 \\ (-2.279) \\ \hline \end{array}$ | $\begin{array}{r} -0.120 \\ (-2.168) \\ \hline \end{array}$ | $\begin{aligned} & 0.42 * * * \\ & (20.005) \\ & \hline \end{aligned}$ | $\begin{array}{r} 0.047 \\ (1.531) \end{array}$ | $\begin{array}{r} -0.091 \\ (-1.103) \\ \hline \end{array}$ | 51.5\% | -0.4\% | 205 | 0.000 | 8.3\% | 94.1\% |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1 and four factor models: (1) CAPM (2) the Three Factor Model of Fama and French (1993), the Carhart (1997) Four Factor Model, and the Fama and French (2015) Five Factor Model.

### 2.5.1 Mechanical Earnings Forecasts for ICC Estimation

Considerable literature evolved around the idea of estimating ICC models using mechanical forecasts of earnings instead of analysts forecasts. These mechanical models arguably help to deal with analysts forecasts biases. Mechanical models impute earnings forecasts from historical fundamentals. As discussed in section (2.3.3), there are four notable mechanical earnings forecasts methods presented in the literature. In the following analysis, I replace the earnings forecasts in the various ICC models with those generated from the mechanical models. However, I should note that three ICC models use analysts Target Prices, which are not estimated by the mechanical models. These three ICC models are TPDPS, BP and FGHJ. Therefore, the results of these ICC models should be interpreted with caution, especially that I have demonstrated in the previous section that much of the performance in TPDPS and BP is driven by the terminal value that uses target price. Also, note that both of the implementations of OHE model would not be featured since the OHE does not use earnings forecasts as an input.

Table (10) report the results using Hou, van Dijk, and Zhang (2012) (HDZ) earnings forecasts. Table (11) report the results using random walk (RW) earnings forecasts as described by Gerakos and Gramacy (2013). Tables (12) and (13) present the results using Li and Mohanram (2014) two mechanical models: Earnings Persistence (EP) and Residual Income (RI) respectively. In all four tables, the TPDPS followed by BP model recorded the best improvement in capturing the percentage of variation in realised returns when the ICC estimate is added (see column $R^{2}$ Imp.). This observation is further evidenced in the percentage of months the models have positive and significant coefficients (see Column $\% \mathrm{~N}+\mathrm{sig}$ ). Using these two criteria, TPDPS and BP work better using HDZ forecasts than any other forecasts mechanical forecasts. In fact, for the BP where dividends have a higher weight, the HDZ forecast provides better results than analysts forecasts also. Naive still remained better than all of these versions except the TPDPS_Anlst, which show the influence of the target price in the formulation.

Most of the other models struggled to record a positive and statistically distinguishable coefficient from zero consistently using mechanical earnings forecasts especially forecasts
based on RW, EP and RI. In fact, using mechanical forecasts resulted in making the intercept statistically different from zero for many specifications, indicating that the models are not well specified. In general, turning away from analysts earnings forecast to forecasts based on historical fundamentals did undermine the ICC models ability to capture the variation in future realised returns. Although adding the ICC estimates in this context have resulted in some increases in the goodness of fit as compared to the benchmark, many of the ICC coefficients were having the wrong sign or not statistically significant. The BP and TPDPS performance has been maintained due to target price terminal value. The other dividend discount model GG maintained its positive coefficient and improvement in capturing returns above a benchmark model using HDZ and RW forecasts. Taking this observation with the fact that BP and TPDPS worked better with HDZ, there is some evidence that dividends mechanical forecasts are more suitable for ICC estimations. Dividend discount models are very sensitive to inputs especially the terminal values. The BP for instance, works extremely well due to its terminal value that is based on analysts target price forecast. The GG, on the other hand, report significant improvement in performance using some mechanical models as compared to analysts estimates. This goes back to the issue with DDM models in general. The fact that some companies pay dividends that are not in line with the company capacity to pay dividends, or that companies ownership structure affect the paid dividend makes the fundamentals less certain. Therefore, using mechanical forecasts for the dividend make it more stable and in line with the fundamentals.

The theoretical underpinnings suggest the superiority of models based on abnormal growth in earnings as compared to models based on residual income. Nevertheless, just like analysts based testing, using mechanical forecasts (HDZ, EP, and RI) show that models based on residual income (GLS, FGHJ, and CT) perform better than abnormal growth in earnings models (GM, MPEG, and PEG). Average ICC models such as HL, DKL, KMY do not improve the prediction ability of the estimates by combining estimates from various models. Lastly, the performance of models that start with portfolio level estimates of expected return, and then transform them to firm level estimates using risk factors to account for firm differences, are consistently subordinate to pure firm-level models.

Table 10: Capturing Subsequent Return using HDZ forecasts based ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\mathbf{A d j} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_HDZ | 0.023** | 0.109*** | 0.171 | 0.462*** | 0.061* | -0.165 | 59.8\% | 6.1\% | 205 | 0.000 | 73.2\% | 95.6\% |
|  | (2.889) | (4.820) | (1.036) | (21.185) | (2.168) | (-1.298) |  |  |  |  |  |  |
| BP_HDZ | 0.009 | 0.766*** | 0.006 | 0.452*** | 0.356 | -0.161 | 58.3\% | 5.2\% | 205 | 0.147 | 76.6\% | 49.3\% |
|  | (0.955) | (4.764) | (0.023) | (19.787) | (1.909) | (-1.231) |  |  |  |  |  |  |
| FGHJ_HDZ | -0.087 | 1.302 | 0.404 | 0.379*** | 2.891** | -1.206 | 54.4\% | 1.8\% | 205 | 0.768 | 30.2\% | 69.8\% |
|  | (-0.901) | (1.270) | (0.673) | (6.177) | (2.628) | (-0.912) |  |  |  |  |  |  |
| GG_HDZ | 0.011 | 0.384*** | -0.058 | 0.433*** | 2.066*** | -0.184 | 54.2\% | 1.6\% | 205 | 0.000 | 32.7\% | 64.9\% |
|  | (1.123) | (3.450) | (-0.480) | (18.071) | (3.835) | (-1.051) |  |  |  |  |  |  |
| PE_HDZ | 0.023** | 0.297*** | -0.196 | 0.431*** | 1.807*** | -0.137 | 54.2\% | 1.4\% | 205 | 0.000 | 44.4\% | 67.3\% |
|  | (3.026) | (4.237) | (-2.036) | (18.731) | (3.755) | (-1.655) |  |  |  |  |  |  |
| CT_HDZ | 0.015 | 0.265*** | -0.110 | 0.437*** | 0.941* | -0.141 | 53.6\% | 1.4\% | 205 | 0.000 | 37.6\% | 70.7\% |
|  | (1.761) | (3.352) | (-1.104) | (17.859) | (2.487) | (-1.290) |  |  |  |  |  |  |
| GLS_HDZ | -0.039 | 0.897 | 0.314 | 0.387*** | 2.81** | -0.942 | 54.2\% | 1.4\% | 205 | 0.876 | 31.7\% | 67.8\% |
|  | (-0.725) | (1.366) | (0.582) | (6.941) | (2.810) | (-0.901) |  |  |  |  |  |  |
| KMY_HDZ | 0.005 | 0.383** | -0.180 | 0.442*** | 1.018** | -0.160 | 53.7\% | 1.3\% | 205 | 0.000 | 31.7\% | 69.8\% |
|  | (0.380) | (2.654) | (-1.777) | (17.554) | (2.666) | (-1.134) |  |  |  |  |  |  |
| DKL_HDZ | 0.002 | 0.401*** | -0.106 | 0.434*** | 0.965*** | -0.174 | 53.6\% | 1.3\% | 205 | 0.000 | 32.7\% | 70.2\% |
|  | (0.134) | (3.163) | (-1.197) | (18.629) | (3.654) | (-1.286) |  |  |  |  |  |  |
| HL_HDZ | -0.002 | 0.409** | -0.102 | 0.441*** | 0.806** | -0.124 | 53.6\% | 1.0\% | 205 | 0.000 | 29.8\% | 72.7\% |
|  | (-0.135) | (2.600) | (-1.404) | (17.937) | (2.875) | (-1.472) |  |  |  |  |  |  |
| GM_HDZ | 0.043 | 0.081 | 0.073 | 0.391*** | 1.522 | -0.345 | 53.4\% | 0.7\% | 205 | 0.000 | 28.3\% | 72.7\% |
|  | (1.705) | (0.447) | (0.332) | (7.158) | (1.336) | $(-0.814)$ |  |  |  |  |  |  |
| MPEG_HDZ | 0.003 | 0.314* | -0.193 | 0.462*** | 0.289 | 0.160 | 53.3\% | 0.7\% | 205 | 0.000 | 29.8\% | 74.6\% |
|  | (0.108) | (2.141) | (-1.442) | (10.600) | (0.772) | (0.943) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.04*** | 0.003 | -0.033 | 0.416*** | -0.016 | -0.131 | 52.2\% | 0.6\% | 205 | 0.000 | 20.5\% | 98.0\% |
|  | (4.440) | (0.471) | (-0.345) | (17.136) | (-1.202) | (-0.935) |  |  |  |  |  |  |
| PEG_HDZ | 0.004 | 0.330 | -0.257 | 0.477*** | 0.352 | 0.131 | 53.2\% | 0.4\% | 205 | 0.000 | 23.4\% | 73.2\% |
|  | (0.134) | (1.828) | (-1.471) | (8.373) | (0.975) | (0.980) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.041*** | -0.041 | -0.087 | 0.419*** | 0.038 | -0.103 | 51.6\% | 0.3\% | 205 | 0.000 | 9.8\% | 92.2\% |
|  | (5.226) | (-1.135) | (-1.252) | (19.072) | (0.787) | (-1.333) |  |  |  |  |  |  |
| FPM_HDZ | 0.020 | 0.218* | -0.050 | 0.414*** | 0.666* | -0.172 | 53\% | 0.2\% | 205 | 0.000 | 28.3\% | 68.3\% |
|  | (1.561) | (2.094) | (-0.478) | (16.429) | (2.421) | (-0.960) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.044*** | -0.001 | -0.199 | $0.425 * * *$ | 0.002 | -0.146 | 52.5\% | 0.1\% | 205 | 0.000 | 6.3\% | 98.5\% |
|  | (5.407) | (-0.208) | (-0.947) | (16.859) | (0.555) | (-1.763) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.041*** | 0.019 | -0.094 | 0.416*** | 0.010 | -0.027 | 51.7\% | -0.2\% | 205 | 0.000 | 13.2\% | 95.6\% |
|  | (5.668) | (1.349) | (-1.638) | (19.371) | (0.466) | (-0.467) |  |  |  |  |  |  |
| WNG_HDZ | 0.043*** | 0.000 | -0.126 | 0.441*** | 0.179 | -0.073 | 52.1\% | -0.5\% | 205 | 0.000 | 0.5\% | 99.0\% |
|  | (5.051) | (-0.720) | (-1.454) | (17.670) | (1.148) | (-1.256) |  |  |  |  |  |  |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The ICC figures are estimated based on Hou et al. (2012) mechanical earnings forecasts. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \operatorname{Imp}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models described in Table 1.

Table 11: Capturing Subsequent Return using RW forecasts based ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N + sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RW | 0.03*** | 0.08*** | 0.106 | 0.448*** | 0.07* | -0.121 | 57.2\% | 3.9\% | 205 | 0.000 | 54.6\% | 95.6\% |
|  | (4.363) | (4.378) | (1.757) | (20.996) | (2.311) | (-1.146) |  |  |  |  |  |  |
| BP_RW | 0.022** | 0.531*** | 0.014 | 0.443*** | 0.377* | -0.168 | 56.4\% | 3.5\% | 205 | 0.000 | 59.0\% | 52.7\% |
|  | (2.788) | (6.149) | (0.153) | (19.906) | (2.475) | (-1.441) |  |  |  |  |  |  |
| GG_RW | 0.008 | 0.314** | -0.081 | 0.431*** | 2.345** | -0.174 | 53.6\% | 1.2\% | 205 | 0.000 | 33.7\% | 72.5\% |
|  | (0.786) | (2.854) | (-0.644) | (17.505) | (2.784) | (-0.962) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.041*** | 0.714 | -0.270 | $0.446 * * *$ | 10.738 | -0.041 | 53\% | 0.9\% | 205 | 0.948 | 21.5\% | 82.0\% |
|  | (5.123) | (0.162) | (-2.791) | (16.833) | (1.035) | (-0.649) |  |  |  |  |  |  |
| MPEG_RW | 0.066 | 0.038 | -0.094 | 0.403*** | 0.755* | 0.466 | 53.2\% | 0.8\% | 205 | 0.000 | 26.8\% | 96.1\% |
|  | (1.329) | (0.495) | (-1.138) | (11.331) | (2.001) | (0.740) |  |  |  |  |  |  |
| GM_RW | 0.045 | 0.003 | -0.193 | $0.418 * * *$ | 0.722* | 0.356 | 53.3\% | 0.8\% | 205 | 0.000 | 26.0\% | 98.0\% |
|  | (1.207) | (0.038) | (-2.155) | (13.678) | (1.975) | (0.772) |  |  |  |  |  |  |
| CT_RW | 0.014 | 0.103 | -0.169 | 0.438*** | 2.646* | -0.048 | 53.3\% | 0.6\% | 205 | 0.000 | 30.0\% | 74.5\% |
|  | (1.497) | (0.800) | (-1.990) | (16.838) | (1.984) | (-0.766) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.037*** | 0.008 | -0.090 | $0.418 * * *$ | 0.003 | -0.046 | 52.3\% | 0.6\% | 205 | 0.000 | 14.6\% | 99.0\% |
|  | (4.668) | (1.348) | (-1.764) | (19.448) | (0.571) | (-0.861) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.039*** | -1.280 | -0.099 | $0.421^{* * *}$ | 0.824 | -0.003 | 52.9\% | 0.6\% | 205 | 0.188 | 7.3\% | 82.9\% |
|  | (5.172) | (-0.741) | (-1.765) | (20.156) | (0.841) | (-0.048) |  |  |  |  |  |  |
| PE_RW | 0.05* | 0.165 | -0.063 | 0.416*** | -0.103 | 0.341 | 53.1\% | 0.6\% | 205 | 0.000 | 17.1\% | 91.7\% |
|  | (2.507) | (1.819) | (-0.662) | (15.400) | (-0.221) | (0.945) |  |  |  |  |  |  |
| FGHJ_RW | 0.029*** | 0.032 | -0.106 | 0.428*** | 0.389 | -0.057 | 51.9\% | 0.5\% | 205 | 0.000 | 21.4\% | 90.8\% |
|  | (3.206) | (0.324) | (-1.588) | (18.873) | (1.291) | (-1.028) |  |  |  |  |  |  |
| FPM_RW | 0.039*** | 0.051*** | -0.068 | 0.418*** | 0.006 | -0.078 | 53.2\% | 0.4\% | 205 | 0.000 | 20.0\% | 97.6\% |
|  | (4.494) | (4.223) | (-1.258) | (19.300) | (0.177) | (-1.079) |  |  |  |  |  |  |
| PEG_RW | -4.371 | 5.699 | -2.093 | 3.222 | -32.796 | -54.734 | 52.5\% | 0.2\% | 205 | 0.555 | 24.1\% | 100\% |
|  | (-0.716) | (0.717) | (-0.781) | (0.831) | (-0.714) | (-0.721) |  |  |  |  |  |  |
| DKL_RW | 0.018 | 0.011 | -0.210 | 0.433*** | -0.135 | 0.000 | 51.9\% | 0.0\% | 205 | 0.000 | 20.5\% | 86.3\% |
|  | (0.962) | (0.246) | (-1.928) | (15.971) | (-0.410) | (0.000) |  |  |  |  |  |  |
| KMY_RW | 0.007 | 0.071 | -0.363 | 0.454*** | -0.176 | 0.152 | 51.9\% | 0.0\% | 205 | 0.000 | 17.1\% | 89.3\% |
|  | (0.249) | (1.028) | (-1.718) | (13.114) | (-0.539) | (0.978) |  |  |  |  |  |  |
| HL_RW | 0.008 | 0.063 | -0.364 | 0.454*** | -0.215 | 0.151 | 51.9\% | 0.0\% | 205 | 0.000 | 18.0\% | 89.3\% |
|  | (0.313) | (0.905) | (-1.722) | (13.115) | (-0.663) | (0.977) |  |  |  |  |  |  |
| WNG_RW | 0.046*** | 0.000 | -0.170 | 0.42*** | -0.004 | -0.177 | 52\% | 0.0\% | 205 | 0.000 | 3.9\% | 100.0\% |
|  | (6.182) | (-1.422) | (-2.221) | (19.660) | (-0.837) | (-1.896) |  |  |  |  |  |  |
| GLS_RW | 0.049 | -0.014 | -0.149 | 0.435*** | -0.260 | -0.053 | 51.5\% | -0.2\% | 205 | 0.000 | 12.7\% | 91.7\% |
|  | (1.481) | (-0.320) | (-1.269) | (15.745) | (-0.689) | (-1.047) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.042*** | -0.016 | -0.092 | $0.417 * * *$ | 0.048 | -0.014 | 51.8\% | -0.4\% | 205 | 0.000 | 12.7\% | 99.0\% |
|  | (5.680) | (-1.450) | (-1.612) | (19.953) | (0.786) | (-0.312) |  |  |  |  |  |  |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The ICC figures are estimated based on Random Walk (RW) mechanical forecasts (Gerakos and Gramacy (2013)). The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted $R$ squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{\text {ICC }}^{T S}=1$ is the p-value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models described in Table 1.

Table 12: Capturing Subsequent Return using EP forecasts based ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{\text {ICC }}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_EP | 0.027*** | 0.067*** | 0.130 | 0.446*** | 0.078* | -0.180 | 58.1\% | 4.6\% | 205 | 0.000 | 64.9\% | 95.6\% |
|  | (3.658) | (4.197) | (1.300) | (21.153) | (2.251) | (-1.538) |  |  |  |  |  |  |
| BP_EP | 0.013 | 0.516*** | 0.011 | 0.442*** | 0.362* | -0.177 | 57\% | 4.0\% | 205 | 0.000 | 67.8\% | 59.5\% |
|  | (1.649) | (5.553) | (0.099) | (19.840) | (2.361) | (-1.487) |  |  |  |  |  |  |
| PE_EP | -0.003 | 3.855 | 0.927 | 0.129 | 8.874 | -2.444 | 53.7\% | 1.2\% | 205 | 0.508 | 40.5\% | 78.5\% |
|  | (-0.081) | (0.896) | (0.709) | (0.367) | (1.063) | (-0.829) |  |  |  |  |  |  |
| GG_EP | 0.013 | -1.230 | -0.240 | 0.459*** | -1.559 | 0.029 | 53.4\% | 1.0\% | 205 | 0.035 | 33.0\% | 77.3\% |
|  | (1.632) | (-1.173) | (-2.356) | (14.152) | (-0.316) | (0.305) |  |  |  |  |  |  |
| GLS_EP | 0.008 | 0.31* | -0.156 | $0.425^{* * *}$ | 1.691** | -0.127 | 53.4\% | 0.9\% | 205 | 0.000 | $33.2 \%$ | 72.7\% |
|  | (0.791) | (2.131) | (-0.976) | (15.142) | (2.951) | (-0.676) |  |  |  |  |  |  |
| PEG_EP | 0.02* | 0.037 | -0.224 | 0.432*** | 0.755*** | -0.082 | 53.1\% | 0.8\% | 205 | 0.000 | 32.2\% | 100\% |
|  | (2.367) | (1.276) | (-2.535) | (16.895) | (4.612) | (-1.176) |  |  |  |  |  |  |
| FGHJ_EP | 0.009 | 0.272 | -0.146 | $0.422 * * *$ | 2.318** | -0.104 | 53.1\% | 0.8\% | 205 | 0.000 | 34.1\% | 77.6\% |
|  | (0.714) | (1.587) | (-0.996) | (15.478) | (2.967) | (-0.624) |  |  |  |  |  |  |
| WNG_EP | 0.048*** | 0.000 | -0.058 | $0.415^{* * *}$ | -0.003 | -0.090 | 52.7\% | 0.8\% | 205 | 0.000 | 7.3\% | 99.0\% |
|  | (3.712) | (0.227) | (-1.130) | (19.889) | (-1.110) | (-1.659) |  |  |  |  |  |  |
| CT_EP | 0.122 | -0.071 | -0.646 | 0.515*** | 0.013 | 1.069 | 52.8\% | 0.7\% | 205 | 0.000 | $31.2 \%$ | 90.2\% |
|  | (1.322) | (-0.457) | (-1.009) | (3.622) | (0.041) | (0.867) |  |  |  |  |  |  |
| MPEG_EP | 0.011 | 0.086 | -0.031 | 0.422*** | 0.717** | -0.107 | 53\% | 0.7\% | 205 | 0.000 | 35.6\% | 89.3\% |
|  | (1.165) | (1.586) | (-0.298) | (18.008) | (3.006) | (-1.116) |  |  |  |  |  |  |
| KMY_EP | 0.006 | 0.040 | -0.132 | 0.475*** | 1.174 | 0.185 | 52.8\% | 0.6\% | 205 | 0.000 | 37.1\% | 77.6\% |
|  | (0.518) | (0.234) | (-1.724) | (6.491) | (1.030) | (0.435) |  |  |  |  |  |  |
| FPM_EP | 0.026** | 0.072*** | -0.079 | 0.417*** | 0.002 | -0.095 | 52.5\% | 0.6\% | 205 | 0.000 | 23.9\% | 97.1\% |
|  | (2.906) | (4.861) | (-1.113) | (18.398) | (0.112) | (-1.175) |  |  |  |  |  |  |
| DKL_EP | 0.008 | 0.107 | -0.189 | 0.471*** | 0.654 | 0.207 | 52.6\% | 0.5\% | 205 | 0.000 | 38.0\% | 83.4\% |
|  | (0.823) | (1.684) | (-2.239) | (8.627) | (1.434) | (0.766) |  |  |  |  |  |  |
| GM_EP | 0.015 | 0.070 | -0.028 | 0.414*** | 1.022** | -0.187 | 52.7\% | 0.4\% | 205 | 0.000 | 34.6\% | 86.3\% |
|  | (1.438) | (1.135) | (-0.280) | (16.546) | (2.678) | (-1.214) |  |  |  |  |  |  |
| HL_EP | 0.010 | 0.085 | -0.176 | 0.471*** | 0.656 | 0.196 | 52.5\% | 0.4\% | 205 | 0.000 | 34.6\% | 83.9\% |
|  | (1.004) | (1.359) | (-2.107) | (8.625) | (1.436) | (0.726) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.042*** | -0.002 | -0.002 | 0.413*** | 0.005 | -0.153 | 52\% | 0.4\% | 205 | 0.000 | 16.6\% | 97.1\% |
|  | (4.694) | (-0.071) | (-0.011) | (15.210) | (0.330) | (-0.912) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.032** | 0.028 | -0.105 | 0.433*** | -0.021 | 0.120 | 52.7\% | 0.2\% | 205 | 0.000 | 9.3\% | 99.0\% |
|  | (2.587) | (0.939) | (-1.827) | (13.852) | (-0.942) | (1.111) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.028* | 0.021 | -0.202 | 0.439*** | -0.133 | -0.095 | 51.6\% | 0.0\% | 205 | 0.000 | 13.2\% | 99.0\% |
|  | (2.337) | (1.813) | (-2.037) | (15.955) | (-1.073) | (-0.691) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.043*** | -0.001 | -0.066 | 0.419*** | 0.003 | -0.081 | 51.7\% | -0.4\% | 205 | 0.000 | 9.8\% | 99.0\% |
|  | (5.938) | (-0.181) | (-1.171) | (19.699) | (0.740) | (-1.361) |  |  |  |  |  |  |

Average monthly regression coefficients of 1 year ahead Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t} . T_{\text {I }}$ ICCs are estimated based on Li and Mohanram (2014) Earnings Persistence (EP) mechanical earnings forecasts. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models described in Table 1.

Table 13: Capturing Subsequent Return using RI forecasts based ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \%N+sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RI | 0.026*** | 0.075*** | 0.180 | 0.448*** | 0.081* | -0.193 | 58.6\% | 4.9\% | 205 | 0.000 | 64.9\% | 95.6\% |
|  | (3.617) | (4.325) | (1.666) | (22.000) | (2.254) | (-1.666) |  |  |  |  |  |  |
| BP_RI | 0.014 | 0.562*** | 0.079 | 0.439*** | 0.354* | -0.178 | 56.9\% | 3.9\% | 205 | 0.000 | 65.4\% | 53.7\% |
|  | (1.846) | (5.959) | (0.808) | (20.251) | (2.327) | (-1.504) |  |  |  |  |  |  |
| PE_RI | 0.03*** | -0.187 | -0.233 | 0.462*** | 0.637 | 0.173 | 53.5\% | 1.1\% | 205 | 0.001 | 38.5\% | 76.1\% |
|  | (3.960) | (-0.539) | (-1.939) | (11.217) | (0.614) | (0.804) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.034*** | -0.009 | -0.132 | 0.408*** | 0.050 | 0.004 | 52.7\% | 1.0\% | 205 | 0.000 | 20.0\% | 97.6\% |
|  | (3.991) | (-0.598) | (-2.315) | (19.719) | (1.441) | (0.058) |  |  |  |  |  |  |
| FGHJ_RI | 0.014 | 0.267 | -0.073 | 0.42*** | 1.205 | -0.130 | 52.7\% | 0.6\% | 205 | 0.000 | 28.8\% | 74.6\% |
|  | (1.117) | (1.523) | (-0.552) | (16.192) | (1.664) | $(-0.913)$ |  |  |  |  |  |  |
| MPEG_RI | -0.012 | 0.276 | -0.218 | 0.46*** | -3.120 | 0.169 | 52.9\% | 0.5\% | 205 | 0.000 | 37.3\% | 83.3\% |
|  | (-0.527) | (1.941) | (-1.642) | (10.550) | (-0.810) | (0.993) |  |  |  |  |  |  |
| GM_RI | 0.032 | 0.035 | 0.072 | 0.385*** | 0.622 | -0.354 | 52.9\% | 0.4\% | 205 | 0.000 | 38.2\% | 76.5\% |
|  | (1.287) | (0.200) | (0.329) | (7.052) | (0.468) | $(-0.833)$ |  |  |  |  |  |  |
| PEG_RI | 0.025** | -0.039 | -0.206 | 0.435*** | 0.316** | -0.053 | 52.5\% | 0.4\% | 205 | 0.000 | 28.9\% | 100\% |
|  | (2.720) | (-0.757) | (-2.254) | (16.129) | (2.624) | (-0.724) |  |  |  |  |  |  |
| GLS_RI | 0.017 | 0.255 | -0.038 | 0.417*** | 7.293 | -0.142 | 52.5\% | 0.4\% | 205 | 0.000 | 30.7\% | 75.6\% |
|  | (1.812) | (1.729) | (-0.251) | (15.658) | (0.647) | (-0.843) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.044*** | 0.001 | -0.057 | 0.414*** | 0.000 | -0.096 | 51.8\% | 0.4\% | 205 | 0.000 | 9.8\% | 99.0\% |
|  | (5.614) | (0.253) | (-0.524) | (19.627) | (-0.070) | (-0.910) |  |  |  |  |  |  |
| HL_RI | 0.017 | 0.068* | -0.159 | 0.426*** | 0.200 | -0.024 | 52.5\% | 0.3\% | 205 | 0.000 | 32.2\% | 85.4\% |
|  | (1.913) | (2.198) | (-1.747) | (17.403) | (1.115) | (-0.498) |  |  |  |  |  |  |
| DKL_RI | 0.019* | 0.061* | -0.159 | 0.427*** | 0.205 | -0.023 | 52.5\% | 0.3\% | 205 | 0.000 | 32.7\% | 85.4\% |
|  | (2.139) | (1.996) | (-1.742) | (17.424) | (1.144) | (-0.480) |  |  |  |  |  |  |
| KMY_RI | 0.016 | 0.114* | -0.141 | 0.424*** | 0.228 | -0.079 | 52.5\% | 0.2\% | 205 | 0.000 | 30.2\% | 80.0\% |
|  | (1.817) | (2.247) | (-1.847) | (19.485) | (0.939) | $(-0.941)$ |  |  |  |  |  |  |
| WNG_RI | 0.039*** | -0.043 | -0.210 | 0.44*** | 0.114 | -0.058 | 52.4\% | 0.0\% | 205 | 0.000 | 3.9\% | 99.5\% |
|  | (4.944) | (-0.472) | (-2.004) | (16.010) | (0.876) | (-0.778) |  |  |  |  |  |  |
| GG_RI | 0.023*** | 0.508 | -0.143 | 0.427*** | 2.963 | -0.154 | 52.3\% | 0.0\% | 205 | 0.145 | 27.8\% | 80.9\% |
|  | (3.168) | (1.508) | (-1.353) | (15.657) | (1.668) | (-1.432) |  |  |  |  |  |  |
| FPM_RI | 0.031*** | 0.025 | -0.076 | 0.426*** | -0.013 | -0.127 | 52.5\% | -0.1\% | 205 | 0.000 | 21.5\% | 91.2\% |
|  | (3.300) | (1.196) | (-1.393) | (19.576) | (-0.272) | (-1.738) |  |  |  |  |  |  |
| CT_RI | 0.033*** | 0.017 | -0.150 | 0.378*** | 0.507 | -0.176 | 52.1\% | -0.1\% | 205 | 0.000 | 13.7\% | 84.9\% |
|  | (3.705) | (0.555) | (-2.053) | (6.352) | (1.179) | $(-0.798)$ |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.049*** | 0.023 | -0.098 | 0.415*** | 0.115 | -0.292 | 51.8\% | -0.3\% | 205 | 0.000 | 17.6\% | 98.5\% |
|  | (4.043) | (0.804) | (-1.784) | (19.666) | (1.110) | (-1.318) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.048*** | -0.021 | -0.069 | 0.414*** | 0.004 | -0.150 | 51.6\% | -0.5\% | 205 | 0.000 | 12.7\% | 99.0\% |
|  | (6.180) | (-1.839) | (-0.719) | (18.947) | (0.296) | (-1.933) |  |  |  |  |  |  |

Average monthly regression coefficients of 1 year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$ . The ICCs are estimated based on Li and Mohanram (2014) Residual Income (RI) mechanical earnings forecasts. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}+\operatorname{sig}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models described in Table 1.

### 2.5.2 Calibrating ICC Estimates Using Risk Factors

In this sub-section, I address one of the most recurring criticisms of ICC expected return estimates in the literature, which has to do with the estimation error due to the noise in the data or due to the model being incompatible with some individual stocks, or due to analysts forecasts biasses. Fitzgerald et al. (2013) suggest that estimation error could be minimized by using the fitted values from regressing the expected return estimates from a particular ICC model on common risk factors. A similar methodology is applied by Lee et al. (2017). The idea is to capture the firm-specific characteristics that affect the expected return but not reflected in the variables of the ICC models.

I perform such calibration in the cross-section every month to ensure that the fitted values are independent of the relationship between the expected return and the risk factors, and between realised returns and the risk factors in every other period. I use the same risk factor used by Fitzgerald et al. (2013): Leverage, Size, book-to-market ratio, earning variability as predicted by the standard deviation in analysts EPS forecasts, market beta, the beta standard error, target-to-market price ratio, 12 months momentum factor, book value per share, and the firm long-term growth rate. I restrict the analysis here to the models that yield firm-level estimates without transformations, since the transformations themselves use firm-level risk characteristics factors. The application of calibration to this set of models, and testing the goodness of the estimates is novel to this work.

Table (14) report the results of regressing 1 year ahead returns of the calibrated ICC estimates and the control variables. All analysts and mechanical based versions have been calibrated to test the benefit of calibrating the estimates. The table shows that all the models except one result in an $R^{2}$ improvement when adding a fitted ICC variable to a baseline regression. In all but 11 models, the calibration increased the magnitude of the improvement in capturing the variation in realised return noticeably. All versions of the BP benefited from the calibration more than any other models. For instance, the improvement in capturing the variation in realised returns increased by $1.21 \%$ in the calibrated analysts based BP (BP_Anlst_Clbrtd) as compared to the same model without calibration (BP_Anlst). The (BP_EP_Clbrtd) gained additional $2.16 \%$ ability to capture the variation in subsequent re-
turns scoring $6.1 \%$ adjusted $R^{2}$ improvement as compared to $3.96 \%$ scored by (BP_EP).
Among the 11 models that recorded a deterioration in the goodness of fit improvement over a benchmark model with no ICC variable are the TPDPS five versions and the Naive which lost $1.64 \%$. However, not only did they managed to remain at the top of the list (though below the BP), but they also remained to be the only model with $100 \%$ crosssectional monthly ICC coefficients that are indistinguishable from the theoretical value of one in the top of the list (see column $\% \beta_{I C C}^{C S}=1$ ). In fact, all the BP versions reported a Fama-MacBeth coefficient that is distinguishable from one ( $\operatorname{see} \operatorname{column} \beta_{I C C}^{T S}=1$ ), while the TPDPS versions and the naive had statistically significant p-values.

PE_Anlst_Clbrtd reported a slight reduction in the improvement by calibration ( $0.19 \%$ ), but still managed to remain fairly in the top of the list. A more general observation is that analysts based ICC models benefited more than other models from calibration especially CT_Anlst_Clbrtd, DKL_Anlst_Clbrtd, HL_Anlst_Clbrtd, GLS_Anlst_Clbrtd, FGHJ_Anlst _Clbrtd, GM_Anlst_Clbrtd, and MPEG_Anlst_Clbrtd. Perhaps this is due to the fact that many of the calibration factors are already used in the mechanical earnings forecasts. The models based on random walk earnings forecasts went to the bottom of the list sorted by the improvement achieved by adding calibrated ICC estimates to a benchmark model without the ICC variable.

Table 14: Capturing Subsequent Return using Calibrated ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \beta_{I C C}^{C S}=1$ | $R^{2}$ Imp. not Clbrtd |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_HDZ_Clbrtd | 0.001 | 0.892* | 0.050 | 0.474*** | 0.505 | -0.258 | 60\% | 6.7\% | 205 | 0.775 | 74.2\% | 71.5\% | 5.18\% |
|  | (0.095) | (2.375) | (0.200) | (19.059) | (1.574) | (-1.490) |  |  |  |  |  |  |  |
| BP_Anlst _Clbrtd | 0.011 | 0.865* | -0.001 | 0.476*** | 0.581* | -0.166 | 59.9\% | 6.2\% | 205 | 0.752 | 70.2\% | 59.5\% | 5.03\% |
|  | (0.603) | (2.025) | (-0.004) | (19.275) | (2.464) | (-1.246) |  |  |  |  |  |  |  |
| BP_EP_Clbrtd | -0.011 | 0.923*** | 0.078 | 0.47*** | 0.668* | -0.267 | 59.6\% | 6.1\% | 205 | 0.766 | $72.0 \%$ | 66.1\% | 3.96\% |
|  | (-0.984) | (3.555) | (0.451) | (18.945) | (2.080) | (-1.493) |  |  |  |  |  |  |  |
| BP_RI_Clbrtd | -0.017 | 1.246*** | 0.312 | 0.465*** | 0.754* | -0.195 | 59.3\% | 6.0\% | 205 | 0.415 | 72.6\% | 64.0\% | 3.86\% |
|  | (-1.401) | (4.143) | (1.590) | (18.947) | (2.364) | (-1.196) |  |  |  |  |  |  |  |
| BP_RW_Clbrtd | -0.005 | 1.083*** | 0.24* | 0.466*** | 0.701* | -0.215 | 59.2\% | 5.9\% | 205 | 0.736 | 68.3\% | 71.0\% | 3.47\% |
|  | (-0.580) | (4.422) | (2.131) | (18.953) | (2.195) | (-1.062) |  |  |  |  |  |  |  |
| TPDPS_HDZ_Clbrtd | 0.025*** | 0.101*** | 0.243*** | 0.395*** | 0.036*** | -0.013 | 58.7\% | 4.8\% | 205 | 0.000 | 82.3\% | 100.0\% | 6.13\% |
|  | $(3.390)$ | (10.892) | (6.807) | (20.393) | (4.492) | (-0.708) |  |  |  |  |  |  |  |
| Naive_Clbrtd | 0.031*** | $0.113 * * *$ | 0.254*** | 0.424*** | 0.061*** | -0.011 | 59.3\% | 4.7\% | 205 | 0.000 | 83.3\% | 100.0\% | 6.30\% |
|  | (4.341) | (12.393) | (7.278) | (23.253) | (6.604) | (-0.602) |  |  |  |  |  |  |  |
| TPDPS_Anlst_Clbrtd | 0.03*** | 0.102*** | 0.241*** | 0.422*** | 0.045*** | -0.011 | 58.9\% | 4.4\% | 205 | 0.000 | 83.8\% | 100.0\% | 6.47\% |
|  | (4.253) | (12.306) | (6.927) | (23.187) | (5.229) | (-0.618) |  |  |  |  |  |  |  |
| HL_Anlst _Clbrtd | -0.238 | 2.669*** | 0.045 | 0.449*** | 0.498 | -0.073 | 57.4\% | 4.2\% | 205 | 0.000 | 62.0\% | 57.6\% | 1.93\% |
|  | (-7.000) | (8.406) | (0.485) | (18.239) | (1.042) | (-1.062) |  |  |  |  |  |  |  |
| DKL_Anlst _Clbrtd | -0.244 | 2.776*** | 0.068 | 0.449*** | 0.573 | -0.085 | 57.4\% | 4.2\% | 205 | 0.000 | 64.4\% | 59.0\% | 1.91\% |
|  | (-7.090) | (8.546) | (0.739) | (18.295) | (1.152) | (-1.222) |  |  |  |  |  |  |  |
| CT_Anlst _Clbrtd | -0.188 | 2.518*** | 0.106 | 0.451*** | 0.475 | -0.066 | 57.3\% | 3.9\% | 205 | 0.000 | 63.9\% | 59.5\% | 2.21\% |
|  | (-7.946) | (10.601) | (1.185) | (18.282) | (0.895) | (-1.011) |  |  |  |  |  |  |  |
| GM_Anlst _Clbrtd | -0.075 | 1.06* | 0.177 | 0.437*** | 0.758 | -0.378 | 56.8\% | 3.5\% | 205 | 0.890 | 61.5\% | 45.4\% | 1.59\% |
|  | (-1.476) | (2.428) | (1.160) | (16.647) | (1.725) | (-1.291) |  |  |  |  |  |  |  |
| FGHJ_Anlst _Clbrtd | -0.136 | 1.552* | -0.017 | $0.445 * * *$ | 1.39* | -0.031 | 56.7\% | 3.4\% | 205 | 0.425 | 58.5\% | 48.3\% | 1.72\% |
|  | (-1.715) | (2.246) | (-0.169) | (17.556) | (2.311) | (-0.309) |  |  |  |  |  |  |  |
| PE_Anlst _Clbrtd | 0.002 | 0.609 | 0.000 | 0.447*** | 0.647 | -0.038 | 55.9\% | 3.4\% | 205 | 0.232 | 51.7\% | 49.8\% | 3.56\% |
|  | (0.099) | (1.872) | (0.003) | (16.169) | (0.998) | (-0.577) |  |  |  |  |  |  |  |
| TPDPS_RI_Clbrtd | 0.032*** | $0.07 * * *$ | 0.221*** | 0.41*** | 0.029*** | -0.013 | 57.5\% | 3.2\% | 205 | 0.000 | 78.1\% | 100.0\% | 4.91\% |
|  | $(4.285)$ | (10.473) | (6.061) | (22.969) | (3.444) | (-0.729) |  |  |  |  |  |  |  |
| GLS_Anlst _Clbrtd | -0.300 | 3.149* | 0.056 | 0.458*** | 1.612*** | -0.451 | 56.3\% | 3.1\% | 205 | 0.148 | 56.1\% | 47.3\% | 1.73\% |
|  | (-1.890) | (2.126) | (0.317) | (16.908) | (3.354) | (-1.095) |  |  |  |  |  |  |  |
| TPDPS_EP_Clbrtd | 0.033*** | 0.061*** | 0.164*** | 0.406*** | 0.022** | -0.004 | 56.8\% | 2.6\% | 205 | 0.000 | 75.2\% | 100.0\% | 4.56\% |
|  | (4.337) | (9.953) | (4.823) | (22.617) | (2.940) | (-0.233) |  |  |  |  |  |  |  |
| GG_HDZ_Clbrtd | -0.003 | 0.536** | -0.119 | 0.445*** | 2.457** | -0.030 | 55.6\% | 2.6\% | 205 | 0.008 | 46.8\% | 66.3\% | 1.62\% |
|  | (-0.192) | (3.080) | (-1.219) | (18.243) | (2.763) | $(-0.387)$ |  |  |  |  |  |  |  |
| KMY_Anlst _Clbrtd | -0.138 | 1.016*** | -0.047 | 0.444*** | 0.910 | -0.126 | 55.8\% | 2.6\% | 205 | 0.902 | 56.1\% | 46.8\% | 1.24\% |
|  | (-5.761) | (7.960) | (-0.521) | (17.764) | (1.911) | (-1.681) |  |  |  |  |  |  |  |
| TPDPS_RW_Clbrtd | 0.044*** | 0.061*** | 0.138*** | 0.408*** | 0.023** | -0.017 | 56.6\% | 2.5\% | 205 | 0.000 | 73.3\% | 100.0\% | 3.88\% |
|  | (5.849) | (8.853) | (3.901) | (22.719) | (2.769) | (-0.875) |  |  |  |  |  |  |  |
| MPEG_Anlst _Clbrtd | -0.095 | 1.236*** | 0.169 | 0.419*** | 0.528 | -0.167 | 55.8\% | 2.4\% | 205 | 0.187 | 51.2\% | 45.4\% | 1.69\% |
|  | (-4.703) | (6.927) | (1.025) | (16.748) | $(1.285)$ | $(-0.795)$ |  |  |  |  |  |  |  |

Table 14: Capturing Subsequent Return using Calibrated ICC

| Table 14: Capturing Subsequent Return using Calibrated ICC |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \beta_{I C C}^{C S}=1$ | $R^{2}$ Imp. not Clbrtd |
| FPM_Anlst _Clbrtd | -0.254 | 2.995*** | -0.058 | $0.447^{* * *}$ | 1.045 | -0.024 | 55.3\% | 2.4\% | 205 | 0.014 | 57.3\% | 76.0\% | 1.64\% |
|  | (-3.344) | (3.737) | (-0.471) | (15.385) | (0.681) | (-0.371) |  |  |  |  |  |  |  |
| PE_HDZ_Clbrtd | 0.003 | -0.535 | -1.539 | 0.652** | 1.964 | 1.210 | 55.5\% | 2.1\% | 205 | 0.102 | 39.5\% | 67.3\% | 1.43\% |
|  | (0.176) | (-0.572) | (-0.903) | (2.657) | (1.152) | (0.923) |  |  |  |  |  |  |  |
| CT_HDZ_Clbrtd | -0.035 | 0.885*** | -0.073 | 0.423*** | 0.000 | -0.149 | 54.9\% | 2.1\% | 205 | 0.626 | 46.3\% | 66.8\% | 1.42\% |
|  | (-1.878) | (3.753) | (-0.770) | (16.497) | (0.000) | (-1.067) |  |  |  |  |  |  |  |
| GM_HDZ_Clbrtd | -0.005 | 0.459*** | -0.119 | 0.439*** | 0.862*** | -0.074 | 54.1\% | 2.0\% | 205 | 0.000 | 38.2\% | 73.9\% | 0.72\% |
|  | (-0.573) | (6.077) | (-1.454) | (17.509) | (3.404) | (-0.926) |  |  |  |  |  |  |  |
| PE_EP_Clbrtd | 0.001 | 0.561 | -0.094 | 0.43*** | 0.533 | -0.228 | 54.7\% | 1.9\% | 205 | 0.232 | 44.9\% | 72.7\% | 1.21\% |
|  | (0.073) | (1.533) | (-0.999) | (18.064) | (0.585) | (-1.126) |  |  |  |  |  |  |  |
| FGHJ_HDZ_Clbrtd | -0.025 | 0.571 | -0.215 | 0.446*** | 1.584* | 0.005 | 54.8\% | 1.8\% | 205 | 0.376 | 44.8\% | 68.9\% | 1.82\% |
|  | (-0.523) | (1.181) | (-1.872) | (15.645) | (2.373) | (0.030) |  |  |  |  |  |  |  |
| PEG_HDZ_Clbrtd | 0.000 | 0.6*** | -0.124 | 0.437*** | 0.628** | -0.068 | 54.1\% | 1.8\% | 205 | 0.007 | 44.8\% | 79.9\% | 0.36\% |
|  | (0.022) | (4.086) | (-1.546) | (17.032) | (2.961) | $(-0.847)$ |  |  |  |  |  |  |  |
| GLS_HDZ_Clbrtd | -0.012 | 0.517 | -0.201 | 0.443*** | 2.006*** | 0.062 | 54.7\% | 1.8\% | 205 | 0.258 | 41.5\% | 71.0\% | 1.38\% |
|  | (-0.293) | (1.216) | (-1.835) | (16.527) | (3.536) | (0.406) |  |  |  |  |  |  |  |
| DKL_HDZ_Clbrtd | 0.001 | 0.458 | 0.083 | 0.411*** | 1.586* | -0.313 | 54.5\% | 1.8\% | 205 | 0.140 | 45.6\% | 72.2\% | 1.33\% |
|  | (0.028) | (1.253) | (0.356) | (11.583) | (1.973) | $(-0.935)$ |  |  |  |  |  |  |  |
| KMY_HDZ_Clbrtd | -0.007 | $0.605^{* * *}$ | 0.013 | 0.421*** | 1.271* | -0.170 | 54.6\% | 1.7\% | 205 | 0.013 | 48.3\% | 70.6\% | 1.34\% |
|  | (-0.446) | (3.827) | (0.078) | (14.307) | (2.553) | (-0.937) |  |  |  |  |  |  |  |
| PEG_Anlst _Clbrtd | -0.029 | 0.741*** | -0.037 | $0.437 * * *$ | 0.801* | -0.068 | 55\% | 1.7\% | 205 | 0.161 | 36.1\% | 50.2\% | 1.13\% |
|  | (-1.460) | (4.027) | (-0.306) | (15.621) | (2.127) | (-0.554) |  |  |  |  |  |  |  |
| GM_RI_Clbrtd | 0.005 | 0.301 | 0.388 | 0.41*** | -0.417 | -0.546 | 54.5\% | 1.7\% | 205 | 0.000 | 38.0\% | 79.0\% | 0.43\% |
|  | (0.203) | (1.542) | (1.039) | (15.084) | (-0.532) | (-1.256) |  |  |  |  |  |  |  |
| CT_EP_Clbrtd | 0.075* | 0.037 | -0.245 | 0.459*** | 0.957 | -0.244 | 54\% | 1.7\% | 205 | 0.000 | 27.7\% | 67.8\% | 0.72\% |
|  | (2.304) | (0.498) | (-1.048) | (8.564) | (1.066) | (-0.754) |  |  |  |  |  |  |  |
| FPM_RI_Clbrtd | 0.041 | -0.281 | -0.052 | 0.41*** | 0.075 | -0.184 | 54.2\% | 1.7\% | 205 | 0.004 | 28.7\% | 80.1\% | -0.10\% |
|  | (0.663) | (-0.643) | (-0.543) | (16.236) | (0.333) | (-1.206) |  |  |  |  |  |  |  |
| FPM_RW_Clbrtd | -0.017 | -0.017 | -0.155 | $0.456^{* * *}$ | 0.229 | -0.126 | 54.5\% | 1.7\% | 205 | 0.000 | 24.6\% | 100\% | 0.41\% |
|  | (-0.439) | (-0.221) | (-1.056) | (10.577) | (1.221) | (-1.174) |  |  |  |  |  |  |  |
| HL_HDZ_Clbrtd | 0.010 | 0.359 | 0.119 | 0.406*** | 1.572 | -0.366 | 54.4\% | 1.6\% | 205 | 0.077 | 45.0\% | 72.8\% | 1.02\% |
|  | (0.255) | (0.994) | (0.415) | (9.873) | (1.863) | $(-0.908)$ |  |  |  |  |  |  |  |
| FPM_EP_Clbrtd | 0.135* | -0.028 | 0.069 | 0.407*** | 0.082 | 0.003 | 53.7\% | 1.6\% | 205 | 0.000 | 23.4\% | 100\% | 0.57\% |
|  | (2.555) | (-0.293) | (0.635) | (14.603) | (0.693) | (0.044) |  |  |  |  |  |  |  |
| GG_EP_Clbrtd | 0.007 | 0.519 | -0.152 | 0.432*** | 1.551 | -0.061 | 53.8\% | 1.6\% | 205 | 0.497 | 41.6\% | 70.2\% | 0.98\% |
|  | (0.854) | (0.736) | (-1.213) | (13.532) | (1.831) | (-0.907) |  |  |  |  |  |  |  |
| GG_RI_Clbrtd | 0.044 | -0.872 | -0.357 | 0.466*** | 0.274 | -0.292 | 54.1\% | 1.6\% | 205 | 0.191 | 37.4\% | 70.1\% | -0.02\% |
|  | (1.462) | (-0.611) | (-1.400) | (10.352) | (0.209) | (-0.999) |  |  |  |  |  |  |  |
| PEG_RI_Clbrtd | 0.041** | -0.627 | -0.129 | $0.426^{* * *}$ | -3.182 | -0.031 | 53.8\% | 1.6\% | 205 | 0.662 | 20.0\% | 70.7\% | 0.40\% |

Continued in next page...

Table 14: Capturing Subsequent Return using Calibrated ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \beta_{I C C}^{C S}=1$ | $R^{2}$ Imp. not Clbrtd |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_HDZ_Clbrtd | (3.013) | (-0.169) | (-1.519) | (17.281) | (-0.520) | (-0.455) |  |  |  |  |  |  |  |
|  | 0.002 | 0.343*** | -0.066 | 0.427*** | 0.731*** | -0.073 | 54.1\% | 1.5\% | 205 | 0.000 | 39.3\% | 75.6\% | 0.67\% |
|  | (0.229) | (5.715) | (-1.111) | (19.465) | (4.454) | (-1.032) |  |  |  |  |  |  |  |
| FGHJ_RI_Clbrtd | -0.007 | 0.466** | -0.099 | 0.428*** | 0.636 | -0.158 | 54.6\% | 1.5\% | 205 | 0.001 | 34.4\% | 80.4\% | 0.62\% |
|  | (-0.394) | (2.875) | (-1.392) | (18.397) | (1.416) | (-1.408) |  |  |  |  |  |  |  |
| GM_EP_Clbrtd | 0.002 | 0.158** | -0.087 | 0.431*** | 0.413*** | -0.059 | 54.3\% | 1.4\% | 205 | 0.000 | 37.6\% | 82.0\% | 0.44\% |
|  | (0.161) | (2.732) | (-1.171) | (18.005) | (3.249) | (-0.953) |  |  |  |  |  |  |  |
| GM_RW_Clbrtd | -0.013 | 0.042 | -0.046 | 0.426*** | 0.193 | -0.184 | 54.1\% | 1.4\% | 205 | 0.000 | 31.7\% | 89.3\% | 0.75\% |
|  | (-0.505) | (0.951) | (-0.586) | (16.559) | (1.052) | (-1.043) |  |  |  |  |  |  |  |
| CT_RI_Clbrtd | 0.04*** | 0.123 | -0.089 | 0.426*** | -0.026 | -0.087 | 53.9\% | 1.4\% | 205 | 0.000 | 29.3\% | 69.8\% | -0.13\% |
|  | (3.299) | (1.925) | (-1.724) | (19.463) | (-0.135) | (-1.132) |  |  |  |  |  |  |  |
| FGHJ_RW_Clbrtd | 0.091 | 0.111 | 0.201 | 0.343*** | 1.694 | -0.123 | 53.6\% | 1.3\% | 205 | 0.000 | 28.0\% | 91.8\% | 0.52\% |
|  | (1.122) | (0.970) | (0.583) | (3.192) | (1.047) | (-1.011) |  |  |  |  |  |  |  |
| KMY_RI_Clbrtd | -0.027 | 0.447* | -0.242 | 0.445*** | 0.023 | 0.117 | 54.7\% | 1.2\% | 205 | 0.002 | 39.7\% | 80.4\% | 0.22\% |
|  | (-0.930) | (2.484) | (-1.218) | (12.414) | (0.078) | (0.547) |  |  |  |  |  |  |  |
| KMY_EP_Clbrtd | -0.024 | 0.342** | -0.270 | 0.45*** | 0.463 | -0.122 | 54.1\% | 1.2\% | 205 | 0.000 | 33.3\% | 78.5\% | 0.65\% |
|  | (-1.394) | (2.661) | (-1.352) | (12.724) | (1.388) | (-0.580) |  |  |  |  |  |  |  |
| GG_Anlst _Clbrtd | -0.021 | 0.184*** | -0.121 | 0.43*** | 0.542** | -0.129 | 54\% | 1.1\% | 205 | 0.000 | 34.1\% | 75.6\% | 0.92\% |
|  | (-1.055) | (3.305) | (-1.148) | (17.414) | (2.774) | (-1.595) |  |  |  |  |  |  |  |
| MPEG_RI_Clbrtd | -0.020 | 0.185** | 0.213 | 0.417*** | 0.245* | -0.138 | 54.3\% | 1.1\% | 205 | 0.000 | 36.1\% | 81.0\% | 0.48\% |
|  | (-1.195) | (3.003) | (1.681) | (19.551) | (2.026) | (-1.102) |  |  |  |  |  |  |  |
| FPM_HDZ_Clbrtd | -0.029 | 0.682* | -0.143 | 0.434*** | 1.787** | -0.053 | 54\% | 1.1\% | 205 | 0.259 | 40.4\% | 74.3\% | 0.18\% |
|  | (-1.302) | (2.432) | (-0.905) | (12.658) | (2.651) | (-0.599) |  |  |  |  |  |  |  |
| HL_RI_Clbrtd | -0.020 | 0.360 | -0.215 | 0.444*** | -0.020 | 0.088 | 54.6\% | 1.0\% | 205 | 0.001 | 41.3\% | 75.4\% | 0.26\% |
|  | (-0.673) | (1.951) | (-1.183) | (13.020) | (-0.072) | (0.481) |  |  |  |  |  |  |  |
| DKL_EP_Clbrtd | 0.023 | 0.133* | -0.115 | 0.43*** | 0.602** | -0.095 | 53.6\% | 0.9\% | 205 | 0.000 | 27.5\% | 75.8\% | 0.54\% |
|  | (1.193) | (2.033) | (-1.184) | (17.209) | (2.719) | (-1.355) |  |  |  |  |  |  |  |
| PE_RW_Clbrtd | 0.046* | -0.086 | -0.010 | 0.406*** | -0.032 | 0.064 | 53.7\% | 0.9\% | 205 | 0.000 | 16.7\% | 93.6\% | 0.56\% |
|  | (2.469) | (-0.655) | (-0.144) | (15.456) | (-0.264) | (0.582) |  |  |  |  |  |  |  |
| GLS_EP_Clbrtd | -0.017 | 0.434 | -0.315 | 0.446*** | 1.683** | -0.227 | 53.9\% | 0.9\% | 205 | 0.025 | 30.3\% | 74.1\% | 0.91\% |
|  | (-0.906) | (1.735) | (-1.168) | (13.763) | (2.892) | (-1.331) |  |  |  |  |  |  |  |
| HL_EP_Clbrtd | 0.030 | 0.092 | -0.069 | $0.426 * * *$ | 0.485 | -0.136 | 53.7\% | 0.9\% | 205 | 0.000 | 25.8\% | 80.2\% | 0.42\% |
|  | (1.464) | (1.491) | (-0.529) | (16.655) | (1.827) | (-1.425) |  |  |  |  |  |  |  |
| PEG_EP_Clbrtd | 0.043*** | -0.089 | -0.098 | 0.419*** | 0.971 | -0.098 | 53.8\% | 0.9\% | 205 | 0.019 | 22.0\% | 100.0\% | 0.82\% |
|  | (3.200) | (-0.193) | (-1.240) | (16.508) | (1.438) | (-0.860) |  |  |  |  |  |  |  |
| FGHJ_EP_Clbrtd | -0.023 | 0.645 | -0.292 | 0.442*** | 1.292* | -0.266 | 54\% | 0.9\% | 205 | 0.357 | 28.6\% | 72.4\% | 0.81\% |
|  | (-0.713) | (1.677) | (-1.070) | (13.181) | (2.447) | (-1.521) |  |  |  |  |  |  |  |
| DKL_RI_Clbrtd | -0.018 | 0.375* | -0.209 | 0.442*** | -0.127 | 0.083 | 54.5\% | 0.9\% | 205 | 0.001 | 39.7\% | $77.7 \%$ | 0.26\% |
|  | (-0.618) | (1.967) | (-1.169) | (13.148) | (-0.407) | (0.460) |  |  |  |  |  |  |  |
| MPEG_RW_Clbrtd | -0.008 | -0.021 | -0.079 | 0.432*** | 0.185 | -0.066 | 53.3\% | 0.8\% | 205 | 0.000 | 24.9\% | 92.2\% | 0.76\% |
|  | (-0.604) | (-0.662) | (-1.190) | (18.778) | (1.815) | (-1.068) |  |  |  |  |  |  |  |

Continued in next page..

Table 14: Capturing Subsequent Return using Calibrated ICC

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ | $R^{2}$ Imp. not Clbrtd |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_EP_Clbrtd | 0.004 | 0.107** | -0.103 | 0.426*** | 0.428*** | -0.074 | 53.2\% | 0.8\% | 205 | 0.000 | 30.7\% | 90.7\% | 0.67\% |
|  | (0.448) | (2.741) | (-1.601) | (18.914) | (3.721) | $(-0.957)$ |  |  |  |  |  |  |  |
| GLS_RI_Clbrtd | 0.037 | 0.069 | -0.188 | 0.438*** | 0.369 | 0.016 | 53.6\% | 0.7\% | 205 | 0.000 | 26.8\% | 86.6\% | 0.39\% |
|  | (1.487) | (0.414) | (-1.101) | (13.414) | (1.288) | (0.087) |  |  |  |  |  |  |  |
| GLS_RW_Clbrtd | -0.028 | 0.178* | -0.265 | 0.496*** | -0.998 | 0.051 | 53.4\% | 0.7\% | 205 | 0.000 | 19.6\% | 74.4\% | -0.17\% |
|  | (-0.592) | (1.990) | (-1.170) | (5.891) | (-0.622) | (0.267) |  |  |  |  |  |  |  |
| PE_RI_Clbrtd | 0.024** | 0.086 | -0.016 | 0.414*** | -0.140 | 0.022 | 53.8\% | 0.6\% | 205 | 0.000 | 30.2\% | 79.5\% | 1.10\% |
|  | (2.655) | (1.043) | (-0.259) | (18.871) | (-0.505) | (0.457) |  |  |  |  |  |  |  |
| CT_RW_Clbrtd | 0.034*** | 0.894 | -0.210 | 0.457*** | -1.748 | -0.134 | 53.2\% | 0.6\% | 205 | 0.902 | 21.3\% | 95.3\% | 0.61\% |
|  | (3.447) | (1.037) | (-1.105) | (10.314) | (-1.090) | (-1.237) |  |  |  |  |  |  |  |
| HL_RW_Clbrtd | -0.082 | 0.376 | -0.011 | 0.399*** | 0.713 | -0.165 | 53.6\% | 0.4\% | 205 | 0.005 | 24.6\% | 68.8\% | -0.01\% |
|  | (-0.978) | (1.730) | (-0.079) | (9.850) | (0.732) | (-1.708) |  |  |  |  |  |  |  |
| KMY_RW_Clbrtd | -0.076 | 0.325 | -0.012 | 0.399*** | 0.801 | -0.164 | 53.5\% | 0.4\% | 205 | 0.002 | 25.1\% | 69.8\% | 0.01\% |
|  | (-0.910) | (1.520) | (-0.087) | (9.823) | (0.820) | (-1.699) |  |  |  |  |  |  |  |
| DKL_RW_Clbrtd | -0.034 | 0.269 | -0.075 | 0.417*** | 0.324 | -0.095 | 53.6\% | 0.3\% | 205 | 0.000 | 26.1\% | 67.3\% | 0.01\% |
|  | (-0.709) | (1.909) | (-0.915) | (17.111) | (0.805) | (-0.845) |  |  |  |  |  |  |  |
| GG_RW_Clbrtd | 0.037*** | -23.246 | -0.141 | 0.434*** | -37.742 | -0.092 | 52.7\% | 0.2\% | 205 | 0.497 | 26.6\% | 76.8\% | 1.19\% |
|  | (3.680) | (-0.680) | (-1.580) | (17.111) | (-0.319) | (-1.029) |  |  |  |  |  |  |  |
| PEG_RW_Clbrtd | 0.022 | -10.438 | -0.117 | 0.442*** | 40.465 | -0.009 | 53.1\% | -0.1\% | 205 | 0.448 | 21.7\% | 100\% | 0.18\% |
|  | (0.883) | (-0.695) | (-1.027) | (12.994) | (0.750) | (-0.175) |  |  |  |  |  |  |  |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. All ICC estimates has been calibrated, the fitting of the models has been done using Fitzgerald, Gray, Hall, and Jeyaraj (2013) specifications. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. When compared with the $R^{2} \mathbf{I m p}$. column, $R^{2} \mathbf{I m p}$. not Clbrtd column report the improvement in capturing subsequent return variation using non-calibrated estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\operatorname{sig}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Calibrated expected return estimates are generated using firm-level ICC models as described in Table 1.

### 2.5.3 Analysing the effect of using prior ICC estimates

In the previous analysis, for each month, if a particular ICC estimate is missing, I use the last available ICC estimate up to a maximum of 12 months. This is desirable due to the fact that if one of the ICC models had a missing value at a particular month, I drop that firm from the sample. I do so to ensure that the results are comparable between the models as they are driven from the same list of firms every month. This strategy allows to maintain a larger sample in terms of firms and time. To make sure that such a strategy does not impact the quality of the results, I run the analysis with strictly the firms that have estimates from all models in a particular month without forward filling.

Comparing table (15) to table (9) reveal not much difference in results attributed to the use of the last non missing observation up to 12 months. Note that the number of months in which all models have common firms fell from 205 to 158 . The BP, TPDPS, and the Naive remained at the top of the list in terms of the improvement provided by adding these estimates into the model in capturing the variation in subsequent realised returns, as well as the percentage of months in which the cross sectional coefficient is positive and statistically significant. Moreover, the factor models remained with insignificant coefficients. The PE model retained its relatively large coefficient in magnitude, though in terms of improvement in the goodness of fit it fell short relatively.

Furthermore, tables $(16,17,18$, and 19$)$ are comparable to the mechanical models results in tables ( $10,11,12$, and 13) respectively. Just like prior results, the TPDPS and BP model almost always recorded the best improvements in capturing the percentage of variation in realised returns when the ICC estimate is added. Similarly, these two models reported the highest percentages of positive and significant ICC coefficients. They also worked better in forecasting returns with HDZ forecasts as compared to other earnings forecasts. Other models, just like in the previous section, struggled to record consistently positive and statically significant coefficient using mechanical forecasts.

Table 15: Capturing Subsequent Return using Analysts forecasts based ICC - Effect of Last Observation Carried Forward for up to 12


Table 15: Capturing Subsequent Return using Analysts forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N + sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_10Ind | $\begin{array}{r} \hline 0.059 * * * \\ (4.439) \end{array}$ | $\begin{array}{r} -0.018 \\ (-0.283) \end{array}$ | $\begin{array}{r} \hline-0.188 \\ (-1.244) \end{array}$ | $\begin{gathered} \hline 0.347 * * * \\ (10.390) \end{gathered}$ | $\begin{array}{r} 0.129 \\ (0.485) \end{array}$ | $\begin{array}{r} \hline 0.101 \\ (0.922) \end{array}$ | 56.5\% | 0.6\% | 158 | 0.000 | 10.8\% | 60.8\% |
| TrETSS_Anlst _25SBM | $\begin{array}{r} 0.066 * * * \\ (4.673) \end{array}$ | $\begin{array}{r} -0.026 \\ (-0.913) \end{array}$ | $\begin{array}{r} -0.042 \\ (-0.348) \end{array}$ | $\begin{array}{r} 0.353 * * * \\ (10.967) \end{array}$ | $\begin{array}{r} 0.003 \\ (0.059) \end{array}$ | $\begin{array}{r} 0.141 \\ (1.772) \end{array}$ | 54.5\% | 0.6\% | 158 | 0.000 | 1.3\% | 84.2\% |
| TrOHE_25SBM | $\begin{array}{r} 0.062 * * * \\ (4.610) \end{array}$ | $\begin{array}{r} -0.006 \\ (-0.076) \end{array}$ | $\begin{array}{r} -0.242 \\ (-1.070) \end{array}$ | $\begin{gathered} 0.365 * * * \\ (13.611) \end{gathered}$ | $\begin{array}{r} 0.007 \\ (0.162) \end{array}$ | $\begin{array}{r} 0.080 \\ (0.678) \end{array}$ | 54.9\% | 0.2\% | 158 | 0.000 | 7.6\% | 85.4\% |
| Carhart_Factor | $\begin{array}{r} 0.078 * * * \\ (3.869) \end{array}$ | $\begin{array}{r} -0.382 \\ (-1.785) \end{array}$ | $\begin{array}{r} -0.108 \\ (-0.642) \end{array}$ | $\begin{gathered} 0.36 * * * \\ (9.333) \end{gathered}$ | $\begin{array}{r} -0.058 \\ (-0.023) \end{array}$ | $\begin{array}{r} -0.119 \\ (-0.352) \end{array}$ | 55.6\% | 0.0\% | 158 | 0.000 | 7.0\% | 49.4\% |
| TrES_Anlst _25SBM | $\begin{array}{r} 0.042 * * * \\ (3.301) \end{array}$ | $\begin{array}{r} 0.013 \\ (1.511) \end{array}$ | $\begin{array}{r} -0.132 \\ (-0.991) \end{array}$ | $\begin{array}{r} 0.362 * * * \\ (13.704) \end{array}$ | $\begin{array}{r} -0.016 \\ (-1.307) \end{array}$ | $\begin{array}{r} 0.116 \\ (1.529) \end{array}$ | 59\% | 0.0\% | 158 | 0.000 | 7.0\% | 92.4\% |
| TrES_Anlst _10Ind | $\begin{array}{r} 0.053 * * * \\ (3.427) \end{array}$ | $\begin{array}{r} 0.025 \\ (1.699) \end{array}$ | $\begin{array}{r} 0.103 \\ (0.763) \end{array}$ | $\begin{array}{r} 0.357 * * * \\ (13.500) \end{array}$ | $\begin{array}{r} -0.002 \\ (-0.110) \end{array}$ | $\begin{array}{r} 0.139 \\ (1.462) \end{array}$ | 58.8\% | -0.3\% | 158 | 0.000 | 16.5\% | 91.8\% |
| WNG_Anlst | $\begin{array}{r} 0.054 * * * \\ (4.110) \end{array}$ | $\begin{array}{r} -0.011 \\ (-0.672) \end{array}$ | $\begin{array}{r} -0.045 \\ (-0.205) \end{array}$ | $\begin{array}{r} 0.352 * * * \\ (11.182) \end{array}$ | $\begin{array}{r} 0.325 \\ (1.135) \end{array}$ | $\begin{array}{r} 0.038 \\ (0.499) \end{array}$ | 54.6\% | -0.4\% | 158 | 0.000 | 7.6\% | 96.8\% |
| 5FF_Factor | $\begin{array}{r} 0.08^{*} \\ (2.146) \end{array}$ | $\begin{array}{r} -0.925 \\ (-1.019) \end{array}$ | $\begin{array}{r} -0.130 \\ (-0.709) \end{array}$ | $\begin{array}{r} 0.349 * * * \\ (10.578) \end{array}$ | $\begin{array}{r} -4.387 \\ (-0.263) \end{array}$ | $\begin{array}{r} 0.160 \\ (0.724) \end{array}$ | 56.3\% | -0.5\% | 158 | 0.035 | 8.2\% | 38.0\% |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathrm{sig}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1 and four factor models: (1) CAPM (2) the Three Factor Model of Fama and French (1993), the Carhart (1997) Four Factor Model, and the Fama and French (2015) Five Factor Model.

Table 16: Capturing Subsequent Return using HDZ forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_HDZ | 0.038** | 0.102*** | 0.233 | 0.38*** | 0.062 | 0.069 | 61\% | 3.9\% | 158 | 0.000 | 50.6\% | 89.9\% |
|  | (2.878) | (5.861) | (0.719) | (12.604) | (1.089) | (0.787) |  |  |  |  |  |  |
| BP_HDZ | 0.023 | 0.753*** | 0.687 | 0.361*** | 0.094 | 0.122 | 60.9\% | 3.6\% | 158 | 0.090 | 60.1\% | 42.4\% |
|  | (1.359) | (5.195) | (1.798) | (12.131) | (0.334) | (1.463) |  |  |  |  |  |  |
| PE_HDZ | -0.067 | 1.404 | 0.698 | 0.413*** | 0.797 | 0.206 | 60.6\% | 3.5\% | 158 | 0.778 | 41.1\% | 50.6\% |
|  | (-0.496) | (0.980) | (0.793) | (4.596) | (0.391) | (0.834) |  |  |  |  |  |  |
| GG_HDZ | 0.020 | 0.408** | 0.002 | 0.361*** | 2.654* | 0.058 | 60.7\% | 3.0\% | 158 | 0.000 | 31.6\% | 58.2\% |
|  | (1.086) | (2.689) | (0.011) | (10.826) | (1.979) | (0.674) |  |  |  |  |  |  |
| CT_HDZ | 0.070 | 0.166 | 0.643 | 0.651 | 0.046 | 0.644 | 59.3\% | 2.6\% | 158 | 0.021 | 32.9\% | 74.1\% |
|  | (1.212) | (0.462) | (0.711) | (1.906) | (0.016) | (0.635) |  |  |  |  |  |  |
| FPM_HDZ | 0.002 | 0.687** | 0.067 | 0.363*** | 0.352 | 0.087 | 58.9\% | 2.3\% | 158 | 0.189 | 26.6\% | 51.9\% |
|  | (0.093) | (2.892) | (0.586) | (12.504) | (0.358) | (1.244) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.034* | 0.051 | -0.239 | 0.367*** | -0.040 | 0.090 | 60.2\% | 1.9\% | 158 | 0.000 | 7.6\% | 89.9\% |
|  | (2.217) | (1.371) | (-1.354) | (13.485) | (-1.047) | (1.123) |  |  |  |  |  |  |
| GLS_HDZ | 0.016 | 0.359* | 0.029 | 0.346*** | 1.728 | 0.120 | 59.6\% | 1.5\% | 158 | 0.000 | 24.7\% | 65.8\% |
|  | (0.766) | (2.289) | (0.156) | (11.522) | (1.183) | (1.175) |  |  |  |  |  |  |
| KMY_HDZ | 0.008 | 0.574*** |  |  | 2.046 | 0.076 | 58.9\% | 1.3\% | 158 | 0.022 | 31.0\% | 62.0\% |
|  | (0.422) | (3.118) | (0.508) | (10.782) | (1.393) | (0.697) |  |  |  |  |  |  |
| FGHJ_HDZ | -0.017 | 0.765* | 0.239 | 0.347*** |  | 0.014 | 59.1\% | 1.0\% | 158 | 0.539 | 25.3\% | 69.0\% |
|  | (-0.502) | (2.011) | (0.972) | (11.251) | (0.095) | (0.115) |  |  |  |  |  |  |
| DKL_HDZ | -0.002 | 0.731** | 0.109 | 0.356*** | 0.951 | -0.002 | 58\% | 0.6\% | 158 | 0.328 | 28.5\% | 68.4\% |
|  | (-0.097) | (2.667) | (0.691) | (11.400) | (0.510) | (-0.011) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.092*** | -0.010 | 0.045 | 0.363*** | -0.013 | 0.106 | 57.4\% | 0.4\% | 158 | 0.000 | 13.9\% | 88.6\% |
|  | (3.706) | (-0.343) | (0.394) | (12.023) | (-0.242) | (1.454) |  |  |  |  |  |  |
| HL_HDZ | 0.011 | 0.614* | 0.041 | 0.352*** | 0.597 | 0.000 | 57.4\% | 0.0\% | 158 | 0.151 | 28.5\% | 69.6\% |
|  | (0.534) | (2.298) | (0.261) | (11.121) | (0.309) | (-0.002) |  |  |  |  |  |  |
| PEG_HDZ | 0.021 | 0.718* | -0.136 | $0.369 * * *$ | 1.449 | -0.152 | 57.1\% | -0.3\% | 158 | 0.418 | 20.9\% | 65.2\% |
|  | (0.945) | (2.066) | (-0.438) | (10.085) | (0.365) | (-0.542) |  |  |  |  |  |  |
| MPEG_HDZ | 0.025 | 0.497* | 0.075 | 0.367*** | 0.523 | 0.046 | 57.1\% | -0.4\% | 158 | 0.028 | 22.8\% | 71.5\% |
|  | (1.361) | (2.188) | (0.353) | (9.924) | (0.235) | (0.219) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.062*** | -0.002 | -0.103 | 0.358*** | 0.040 | 0.068 | 57.2\% | -0.9\% | 158 | 0.000 | 10.8\% | 86.1\% |
|  | (4.735) | (-0.080) | (-0.859) | (12.417) | (0.645) | (0.992) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.065*** | 0.052 | 0.025 | $0.363 * * *$ | -0.050 | 0.139* | 55.3\% | -1.0\% | 158 | 0.000 | 4.4\% | 88.0\% |
|  | (4.924) | (0.839) | (0.201) | (11.985) | (-1.407) | (2.082) |  |  |  |  |  |  |
| GM_HDZ | 0.027 | 0.407* | -0.029 | 0.38*** | -0.078 | 0.093 | 56\% | -1.2\% | 158 | 0.001 | 23.4\% | 71.5\% |
|  | (1.362) | (2.371) | (-0.173) | (11.981) | (-0.103) | (0.923) |  |  |  |  |  |  |
| WNG_HDZ | $0.032 * * *$ | -0.005 | 0.027 | 0.376*** | -0.742 | 0.086 | 55.2\% | -1.7\% | 158 | 0.000 | 0.6\% | 97.5\% |
|  | (3.688) | (-2.442) | (0.195) | (13.557) | (-1.193) | (1.413) |  |  |  |  |  |  |

Average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$ . The ICC figures are estimated based on Hou et al. (2012) mechanical earnings forecasts. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p-value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1.

Table 17: Capturing Subsequent Return using RW forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\mathbf{A d j} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N + sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RW | 0.039* | 0.597*** | 0.490 | 0.352*** | 0.196 | 0.119 | 61.1\% | 4.0\% | 158 | 0.003 | 53.2\% | 49.4\% |
|  | (2.561) | (4.448) | (1.478) | (11.683) | (0.732) | (1.384) |  |  |  |  |  |  |
| TPDPS_RW | 0.037* | 0.054 | -0.138 | 0.357*** | -0.263 | 0.026 | 60.5\% | 3.8\% | 158 | 0.000 | 49.4\% | 93.0\% |
|  | (1.972) | (1.837) | (-0.304) | (10.932) | (-0.703) | (0.152) |  |  |  |  |  |  |
| GM_RW | 0.043 | 0.085* | -0.176 | 0.361*** | 0.311 | 0.020 | 59.3\% | 2.7\% | 158 | 0.000 | 19.6\% | 79.1\% |
|  | (1.778) | (2.395) | (-0.746) | (9.930) | (0.315) | (0.122) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.063*** | 0.015 | -0.019 | 0.387*** | 0.112 | -0.018 | 59.4\% | 2.6\% | 158 | 0.000 | 12.7\% | 93.7\% |
|  | (4.153) | (0.474) | (-0.140) | (11.418) | (0.712) | (-0.204) |  |  |  |  |  |  |
| GG_RW | 0.016 | 0.543** | 0.029 | 0.359*** | 2.797 | 0.064 | 60.5\% | 2.4\% | 158 | 0.023 | 30.4\% | 63.3\% |
|  | (0.892) | (2.733) | (0.206) | (10.938) | (1.893) | (0.738) |  |  |  |  |  |  |
| MPEG_RW | 0.026 | 0.086*** | 0.030 | 0.357*** | 0.287 | 0.143 | 59.8\% | 2.3\% | 158 | 0.000 | 22.8\% | 83.5\% |
|  | (1.444) | (3.144) | (0.135) | (11.590) | (0.404) | (1.284) |  |  |  |  |  |  |
| PEG_RW | 0.055* | 0.032 | -0.102 | 0.349*** | 0.191 | 0.062 | 58.6\% | 2.2\% | 158 | 0.000 | 33.0\% | 147.3\% |
|  | (2.045) | (0.945) | (-0.397) | (8.788) | (0.251) | (0.407) |  |  |  |  |  |  |
| PE_RW | 0.044* | 0.284 | 0.034 | 0.347*** | 0.508 | 0.168 | 58.6\% | 1.7\% | 158 | 0.001 | 20.9\% | 79.1\% |
|  | (2.339) | (1.387) | (0.154) | (9.334) | (0.510) | (1.185) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.034 | -5.013 | -0.233 | 0.356*** | -3.194 | 0.466 | 59.9\% | 1.3\% | 158 | 0.640 | 4.4\% | 82.9\% |
|  | (1.297) | (-0.390) | (-1.051) | (10.775) | (-0.591) | (1.736) |  |  |  |  |  |  |
| FPM_RW | -0.012 | -0.002 | 0.020 | 0.378*** | 0.510 | 0.066 | 57.9\% | 1.0\% | 158 | 0.000 | 17.1\% | 82.3\% |
|  | (-0.083) | (-0.026) | (0.169) | (11.340) | (0.962) | (0.727) |  |  |  |  |  |  |
| DKL_RW | 0.034 | 0.057 | -0.047 | 0.312*** | -1.793 | 0.248 | 57.5\% | 0.8\% | 158 | 0.000 | 15.2\% | 73.4\% |
|  | (1.058) | (0.496) | (-0.159) | (5.638) | (-0.290) | (1.199) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.037*** | 0.020 | -0.143 | $0.367 * * *$ | 0.097 | 0.054 | 56.2\% | 0.8\% | 158 | 0.000 | 5.1\% | 93.0\% |
|  | (3.413) | (1.866) | (-0.976) | (13.304) | (0.432) | (0.729) |  |  |  |  |  |  |
| KMY_RW | 0.064* | 0.005 | 0.298 | 0.418*** | 2.794 | -0.149 | 56.8\% | 0.8\% | 158 | 0.000 | 15.8\% | 77.8\% |
|  | (1.985) | (0.048) | (0.830) | (6.557) | (0.547) | (-0.709) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.061* | -33.482 | -0.199 | 0.343*** | -13.030 | -0.020 | 59.2\% | 0.7\% | 158 | 0.438 | 17.7\% | 84.8\% |
|  | (1.981) | (-0.754) | (-1.024) | (11.109) | (-0.699) | (-0.093) |  |  |  |  |  |  |
| CT_RW | 0.058 | 0.023 | -0.162 | 0.35*** | 27.743 | 0.981 | 57.9\% | 0.5\% | 158 | 0.000 | 27.8\% | 72.8\% |
|  | (1.619) | (0.088) | (-0.376) | (8.473) | (0.737) | (0.874) |  |  |  |  |  |  |
| HL_RW | 0.031 | 0.078 | -0.045 | 0.343*** | -2.478 | 0.069 | 56.5\% | 0.0\% | 158 | 0.000 | 17.1\% | 77.2\% |
|  | (1.256) | (1.818) | (-0.164) | (6.144) | (-1.018) | (0.420) |  |  |  |  |  |  |
| WNG_RW | 0.059*** | 0.000 | -0.054 | 0.353*** | 0.019 | 0.066 | 57.5\% | -0.1\% | 158 | 0.000 | 2.5\% | 98.1\% |
|  | (4.690) | (0.756) | (-0.466) | (12.870) | (1.640) | (1.024) |  |  |  |  |  |  |
| FGHJ_RW | 0.043* | 0.018 | 0.200 | $0.358^{* * *}$ | 5.089 | 0.480 | 54.1\% | -0.8\% | 158 | 0.000 | 20.9\% | 74.7\% |
|  | (2.261) | (0.226) | (0.854) | (11.580) | (0.926) | (1.363) |  |  |  |  |  |  |
| GLS_RW | 0.054** | 0.072 | 0.123 | 0.37*** | 9.665 | 0.334 | 54.1\% | -0.9\% | 158 | 0.000 | 14.6\% | 71.5\% |
|  | (2.611) | (1.468) | (0.545) | (10.151) | (0.814) | (1.277) |  |  |  |  |  |  |

Average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The ICC figures are estimated based on Random Walk (RW) mechanical forecasts by Gerakos and Gramacy (2013). The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted $R$ squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p-value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{\text {ICC }}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1.

Table 18: Capturing Subsequent Return using EP forecasts based ICC - Effect of Last Observation Carried Forward for up to $\mathbf{1 2}$ Months

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_EP | 0.039** | 0.084*** | 0.272 | 0.364*** | 0.044 | 0.052 | 61.1\% | 3.7\% | 158 | 0.000 | 46.8\% | 89.9\% |
|  | (3.000) | (4.931) | (0.881) | (11.944) | (0.836) | (0.597) |  |  |  |  |  |  |
| BP_EP | 0.027 | 0.565*** | 0.606 | 0.348*** | 0.118 | 0.087 | 60.6\% | 3.1\% | 158 | 0.001 | 47.5\% | 46.8\% |
|  | (1.726) | (4.425) | (1.741) | (11.499) | (0.441) | (0.997) |  |  |  |  |  |  |
| MPEG_EP | 0.008 | 0.415** | 0.016 | 0.343*** | 0.926 | 0.115 | 59\% | 2.6\% | 158 | 0.000 | 24.1\% | 73.4\% |
|  | (0.403) | (2.848) | (0.109) | (11.482) | (1.279) | (1.517) |  |  |  |  |  |  |
| GG_EP | 0.041* | 0.889 |  | 0.423*** | 6.774 | 0.306 | 58.9\% | 1.9\% | 158 | 0.887 | 23.4\% | 55.1\% |
|  | (2.188) | (1.145) | (0.512) | (4.271) | (1.584) | (1.093) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.057*** | 0.006 | 0.049 | 0.363*** | -0.002 | 0.092 | 56.9\% | 1.9\% | 158 | 0.000 | 6.3\% | 94.3\% |
|  | (4.463) | (1.039) | (0.392) | (12.013) | (-0.213) | (1.452) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.033*** | 0.010 | 0.071 | 0.356*** | -0.005 | 0.151 | 58.2\% | 1.7\% | 158 | 0.000 | 8.2\% | 94.3\% |
|  | (3.113) | (0.370) | (0.344) | (12.595) | (-0.344) | (1.412) |  |  |  |  |  |  |
| GM_EP | 0.002 | 0.585*** | -0.069 | 0.352*** | 1.294* | 0.003 | 60.2\% | 1.7\% | 158 | 0.017 | 23.4\% | 70.3\% |
|  | (0.085) | (3.386) | (-0.421) | (11.702) | (2.086) | (0.022) |  |  |  |  |  |  |
| FGHJ_EP | 0.031 | 0.215 | 0.049 | 0.35*** | 2.715* | 0.099 | 59.1\% | 1.6\% | 158 | 0.000 | 25.9\% | 73.4\% |
|  | (1.671) | (1.371) | (0.424) | (11.215) | (2.240) | (1.140) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.059 | -0.008 | 0.103 | 0.357*** | 0.086 | 0.138 | 59.9\% | 1.6\% | 158 | 0.000 | 9.5\% | 91.8\% |
|  | (1.917) | (-0.061) | (0.943) | (12.749) | (1.117) | (1.440) |  |  |  |  |  |  |
| PE_EP | 0.159 | -1.487 | 0.349 | -0.457 | 8.963 | -0.490 | 59.1\% | 1.3\% | 158 | 0.173 | 32.9\% | 74.7\% |
|  | (1.065) | (-0.819) | (0.748) | (-0.431) | (0.805) | (-0.686) |  |  |  |  |  |  |
| FPM_EP | -1.773 | 0.110 | -0.055 | 0.331*** | 0.537 | 0.157 | 58.7\% | 1.0\% | 158 | 0.000 | 20.9\% | 81.6\% |
|  | (-0.718) | (0.462) | (-0.497) | (7.285) | (1.447) | (1.191) |  |  |  |  |  |  |
| PEG_EP | 0.055** | 0.156 | 0.625 | 0.373*** | -2.981 | -0.074 | 59.4\% | 0.9\% | 158 | 0.036 | 25.2\% | 79.6\% |
|  | (3.055) | (0.393) | (0.600) | (6.800) | (-0.401) | (-0.271) |  |  |  |  |  |  |
| GLS_EP | 0.032* | 0.209* | 0.061 | 0.35*** | 1.752 | 0.096 | 58.9\% | 0.8\% | 158 | 0.000 | 27.2\% | 67.7\% |
|  | (1.999) | (2.082) | (0.511) | (11.260) | (1.662) | (1.057) |  |  |  |  |  |  |
| HL_EP | 0.014 | 0.315* | 0.115 | 0.308*** | 1.093 | 0.090 | 58.5\% | 0.7\% | 158 | 0.000 | 26.6\% | 71.5\% |
|  | (0.762) | (2.339) | (0.764) | (6.804) | (1.510) | (0.891) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.052*** | 0.035 | 0.013 | $0.359 * * *$ | -0.013 | 0.055 | 58.3\% | 0.7\% | 158 | 0.000 | 13.9\% | 94.3\% |
|  | (4.035) | (0.890) | (0.117) | (13.683) | (-0.168) | (0.833) |  |  |  |  |  |  |
| KMY_EP | 0.020 | 0.343** | 0.140 | 0.336*** | 1.210 | 0.145 | 58.3\% | 0.6\% | 158 | 0.000 | 28.5\% | 67.7\% |
|  | (1.354) | (3.059) | (0.913) | (10.819) | (1.446) | (1.811) |  |  |  |  |  |  |
| DKL_EP | 0.012 | 0.324*** | 0.116 | $0.339 * * *$ | 1.170 | 0.168 | 59.4\% | 0.6\% | 158 | 0.000 | 33.5\% | 68.4\% |
|  | (0.756) | (3.101) | (0.758) | (11.531) | (1.326) | (1.733) |  |  |  |  |  |  |
| CT_EP | 0.030 | 0.238 | 0.079 | 0.333*** | 0.787 | 0.143 | 57\% | -0.8\% | 158 | 0.000 | 25.9\% | 77.2\% |
|  | (1.840) | (1.819) | (0.551) | (11.858) | (0.809) | (1.388) |  |  |  |  |  |  |
| WNG_EP | 0.023* | 0.044 | -0.322 | 0.374*** | -0.007 | 0.051 | 55\% | -1.5\% | 158 | 0.000 | 5.1\% | 97.4\% |
|  | (2.375) | (1.405) | (-1.269) | (10.648) | (-0.173) | (0.988) |  |  |  |  |  |  |

Average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The ICC figures are estimated based on Li and Mohanram (2014) Earnings Persistence (EP) mechanical earnings forecasts. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions and it represent how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adj-R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1.

Table 19: Capturing Subsequent Return using RI forecasts based ICC - Effect of Last Observation Carried Forward for up to 12 Months

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\mathbf{A d j} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N + sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RI | 0.038** | 0.087*** | 0.312 | 0.363*** | 0.045 | 0.056 | 61.4\% | 4.0\% | 158 | 0.000 | 47.5\% | 89.9\% |
|  | (2.888) | (5.055) | (0.944) | (11.895) | (0.888) | (0.648) |  |  |  |  |  |  |
| GLS_RI | 0.015 | 0.551 | -0.110 | 0.307*** | 0.017 | -0.013 | 59\% | 3.5\% | 158 | 0.183 | 26.6\% | 70.9\% |
|  | (0.572) | (1.644) | (-0.403) | (4.887) | (0.009) | (-0.069) |  |  |  |  |  |  |
| PE_RI |  | 0.546* |  | 0.346*** |  |  | 61.1\% | 3.4\% | 158 | 0.074 | 36.1\% | 71.5\% |
|  | (1.702) | (2.163) | (1.168) | (11.241) | (0.975) | (1.535) |  |  |  |  |  |  |
| BP_RI | 0.029 | 0.586*** | 0.580 | 0.349*** | 0.169 | 0.072 | 60.8\% | 3.4\% | 158 | 0.002 | 48.1\% | 49.4\% |
|  | (1.831) | (4.375) | (1.669) | (11.532) | (0.627) | (0.831) |  |  |  |  |  |  |
| FGHJ_RI | -0.074 | 1.646 | -0.595 | 0.185 | -7.005 | -0.369 | 58.8\% | 2.3\% | 158 | 0.678 | 24.7\% | 75.9\% |
|  | (-0.606) | (1.059) | (-0.634) | (0.848) | (-0.645) | (-0.567) |  |  |  |  |  |  |
| GG_RI | 0.042** | 0.320 | -0.012 | 0.355*** | 2.372* | 0.028 | 60.2\% | 2.1\% | 158 | 0.011 | 22.2\% | 60.1\% |
|  | (2.843) | (1.209) | (-0.115) | (12.237) | (2.231) | (0.361) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.043* | 0.015 | -0.025 | 0.372*** | -0.012 | 0.416 | 56.9\% | 1.5\% | 158 | 0.000 | 7.0\% | 96.8\% |
|  | (2.359) | (1.201) | (-0.070) | (13.753) | (-0.889) | (1.170) |  |  |  |  |  |  |
| CT_RI | 0.099 | -0.686 | -0.401 | 0.368*** | -2.696 | -0.541 | 57.9\% | 1.2\% | 158 | 0.094 | 16.5\% | 83.5\% |
|  | (1.434) | (-0.686) | (-0.950) | (8.443) | (-0.905) | (-0.654) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.087 | -0.123 | 0.440 | $0.361 * * *$ | 0.040 | 0.364 | 59\% | 1.1\% | 158 | 0.000 | 15.2\% | 95.6\% |
|  | (1.162) | (-0.652) | (0.834) | (4.751) | (0.433) | (1.172) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.05*** | 0.006 | -0.117 | 0.371*** | -0.069 | 0.158 | 57.8\% | 0.3\% | 158 | 0.000 | 15.8\% | 91.8\% |
|  | (3.588) | (0.492) | (-0.448) | (11.911) | (-0.927) | (1.144) |  |  |  |  |  |  |
| KMY_RI | 0.048** | -0.114 | -0.284 | 0.358*** | -0.350 | 0.061 | 57.5\% | 0.2\% | 158 | 0.000 | 22.8\% | 72.8\% |
|  | (2.853) | (-0.423) | (-1.459) | (12.978) | (-0.507) | (0.610) |  |  |  |  |  |  |
| DKL_RI | 0.040 | 0.120 | -0.183 | $0.353 * * *$ | -0.057 | 0.075 | 56\% | 0.1\% | 158 | 0.000 | 22.2\% | 77.8\% |
|  | (1.945) | (0.578) | (-0.992) | (12.482) | (-0.115) | (0.597) |  |  |  |  |  |  |
| PEG_RI | 0.031 | 0.096 | -0.059 | $0.364 * * *$ | 1.073* | 0.038 | 57.3\% | -0.1\% | 158 | 0.000 | 29.3\% | 101.5\% |
|  | (1.628) | (1.567) | (-0.417) | (11.756) | (2.431) | (0.390) |  |  |  |  |  |  |
| GM_RI | 0.014 | 0.436** | -0.022 | 0.357*** | -0.023 | -0.024 | 56.6\% | -0.1\% | 158 | 0.000 | 29.1\% | 70.3\% |
|  | (0.725) | (2.814) | (-0.129) | (12.056) | (-0.031) | (-0.270) |  |  |  |  |  |  |
| WNG_RI | 0.062*** | -0.117 | 0.010 | $0.364 * * *$ | 0.328 | 0.048 | 56.6\% | -0.3\% | 158 | 0.000 | 1.9\% | 96.8\% |
|  | (4.705) | (-1.228) | (0.106) | (11.863) | (1.132) | (0.728) |  |  |  |  |  |  |
| HL_RI | 0.037 | 0.131 | -0.186 | 0.353*** | -0.055 | 0.076 | 55.9\% | -0.4\% | 158 | 0.000 | 21.5\% | 78.5\% |
|  | (1.819) | (0.629) | (-1.028) | (12.457) | (-0.111) | (0.608) |  |  |  |  |  |  |
| FPM_RI | 0.026 | 0.154 | -0.187 | 0.368*** | 0.535 | 0.125 | 54.8\% | -0.5\% | 158 | 0.020 | 20.3\% | 76.6\% |
|  | (1.397) | (0.428) | (-1.110) | (10.556) | (0.804) | (1.097) |  |  |  |  |  |  |
| MPEG_RI | 0.017 | 0.424* | 0.118 | 0.36*** | -0.400 | -0.078 | 56.5\% | -1.0\% | 158 | 0.005 | 31.0\% | 69.6\% |
|  | (0.917) | (2.077) | (0.634) | (12.270) | (-0.204) | (-0.389) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.045** | 0.005 | -0.287 | $0.367 * * *$ | -0.001 | 0.218 | 55.2\% | -1.5\% | 158 | 0.000 | 8.2\% | 91.8\% |
|  | (2.700) | (0.343) | (-1.140) | (12.769) | (-0.026) | (1.697) |  |  |  |  |  |  |

Average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realisedit }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$ . The ICC figures are estimated based on Li and Mohanram (2014) Residual Income (RI) mechanical earnings forecasts. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions and it represent how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adj-R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1.

### 2.5.4 Introducing a new Model: FCF

This section is mainly motivated by two observations from the prior discussion. Firstly, dividend discount models with a terminal value based on target price (such as BP or TPDPS) outperform other ICC models in predicting the variation in expected returns. However, much of this performance is driven by the terminal value, since the naive model could work as well as and sometimes better than these dividend discount models. Secondly, when using mechanical models to estimate the dividends rather than analysts forecasts, the dividend discount models - both those with terminal value based on target prices like TPDPS and BP, and models that have terminal value based on an earnings perpetuity like GG - enjoy a boost in performance. These two observations taken together suggest that when dividends forecasts based on fundamentals are used in the model, the model ability to forecast returns is better. Because some firms pay dividends that are not in line with the company fundamentals and capacity to pay dividends, or that large owners interfere in setting the dividend policy of the firm, the dividends estimates from analysts are not necessarily in line with the firm fundamentals. Therefore, using mechanical forecasts for the dividend make it more stable and in line with the fundamentals. Given this understanding, and using a widely known measure from the valuation literature, I purpose using Free Cash Flow to the Equity (FCFE) instead of dividends. The objective is to make the cash flows underpinning the expected returns estimations more in line with firm fundamentals.

Free cash flow is the cash available for distribution to the firms' suppliers of capital after covering operating expenses, working capital requirements, and capital expenditure. If the calculation was intended to yield the cash available for equity and debt holders, then it is formally called Free Cash Flow to the Firm (FCFF). While if the intention was to calculate the cash available to equity holders only, then the cost of servicing the debt is deducted as part of the operating expenses, and after accounting for the net debt, it is called Free Cash Flow to Equity (FCFE). This should not be confused with the reported Cash Flow from Operations (CFO) on the cash flow statement, neither with measures such as EBITDA (earnings before interest, tax, depreciation, and amortization). Measures such as net income, EBIT, EBITDA, and CFO are not compatible to be applied directly to the Discounted cash
flow framework ${ }^{10}$. By construction, these measures either double count or omit some cash flows to arrive at a disposable figure that could be attributed to capital suppliers.

The FCFE is more challenging to use when compared to dividends or earnings due to the fact that this figure is not readily available or reported. However, as compared to dividends, this is a more economically sound method for several reasons. First, it avoids removing companies with no dividends from the sample. Second, it is more suitable when companies pay dividends that are not in line with the company capacity to pay dividends, and the company ownership structure becomes irrelevant. Despite its popularity in valuation literature, there has been no attempt to estimate implied expected returns using Free Cash Flow models. Hence, one of the contributions of this chapter would be to introduce a simple method of estimating implied expected returns by reverse-engineering the Free Cash Flow model, and to test it against the other ICC models.

Moreover, in a reasonable forecasting period, FCFE has been shown to be better aligned with the profitability of the company. Hence, it is a more stable indicator than earnings or dividends ${ }^{11}$. FCFE is a more robust concept in representing the economic reality of a firm than earnings since it is subject to less accounting assumptions and less prone to earnings management.

To concretely define how the FCFE is calculated, one could start from several accounting measure such as NI (net income), CFO (cash flow from operations), EBIT (Earning before interest and tax), or EBITDA (earnings before interest, tax, and non cash expenses such as depreciation and amortization):

$$
\begin{align*}
F C F E & =N I+N C C-C E-W C+N B \\
& =C F O+N B-C E  \tag{60}\\
& =E B I T(1-\text { Tax })+N C E-C E-W C-\text { Interest }(1-\text { Tax })+N B \\
& =E B I T D A(1-\text { Tax })+N C E(\text { Tax })-C E-W C-\text { Interest }(1-\text { Tax })+N B
\end{align*}
$$

where (NB) is net borrowing calculated as debt issued minus debt repaid during the

[^5]period, NCE is non cash expenses such as depreciation and amortization, WC is working capital, and CE is capital expenditure.

A disadvantage of DDM - as discussed earlier - that is anticipated to also affect FCFE discount model is that the intrinsic value at time $t$ would heavily depend on the terminal value, or the growth rate after the forecasting horizon. Since the accuracy of the estimates would be less reliable the more it goes into the future, I will not resort to a perpetual growth rate neither to fading the specific firm's earnings or cash flows to industry norms like some of the conventional ICC models. Rather I propose using a terminal value based on a leading market multiple that is widely used in the market in order to make the implied expected returns from the model coincide with market participants believes about expected returns. The market multiple I are advocating is a leading $\mathrm{P} / \mathrm{E}$ ratio based on the analysts Target Price, and analysts forecasts of earnings. Liu, Nissim, and Thomas (2002) show that multiples based on forward earnings explain stock prices reasonably well across industries and time. I use the target price rather than the price in the numerator of the multiple like in Botosan and Plumlee (2002) to generate less noisy terminal values. In practice, multiples are used often as a substitute for comprehensive valuations since they communicate efficiently the essence of those valuations. In addition, in many applications, multiples are used to calibrate those valuations and to obtain terminal values (Liu et al. (2002)). Moreover, two more FCF versions are introduced to match the formulation of BP and TPDPS models but with FCFE as cash flows instead of dividends. This will facilitate comparisons further. Therefore the three formulations introduced would be:

$$
\begin{gather*}
V_{0, F C F_{-} e p s 5}=\sum_{t=1}^{5}\left(\frac{F C F E_{t}}{(1+r)^{t}}\right)+\frac{\left(e p s_{6} * \frac{\text { TargetPrice }}{\text { eps } s_{5}}\right)}{\left(1+r_{E}\right)^{5}}  \tag{61}\\
V_{0, F C F_{-} T P}=\sum_{t=1}^{5}\left(\frac{F C F E_{t}}{(1+r)^{t}}\right)+\frac{\text { TargetPrice }}{\left(1+r_{E}\right)^{5}}  \tag{62}\\
V_{0, F C F 1 y}=\frac{F C F E_{1}+\text { TargetPrice }}{(1+r)} \tag{63}
\end{gather*}
$$

Free Cash Flow to Equity is not a reported figure on the accounting statement of firms. Neither do analysts provide future estimates for FCFE. However, relatively recently, analysts
have started issuing forecasts for the components needed to calculate forecasted FCFE. For instance, for the US market, $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}^{12}$ started gathering per share cash flow from operations forecasts from February 1990, capital expenditure forecasts from October 2006, EBIT from May 1999, EBITDA from December 1998, and Net debt forecasts from July 2000 among other variables. Due to this data availability, the analysis forward will be for a shorter period than the previous analysis. This section results can be viewed as a robustness check for the other models results also for a shorter but newer period.

Table (20) report the results of testing the new models along with the other ICC models tested previously. The results show that the performance of the three FCF versions is close to the BP, TPDPS, and the Naive estimate empirically. I then estimate the FCF versions inputs using a random walk process similar to the method described in section (2.3.3) to forecast earnings. I use these estimates to compare them against the performance of mechanical forecasts based ICC models. Table (21) report the results based on mechanical forecasts. Although the FCF inputs are forecasted using a random walk process - which has been shown in the previous testing to not be as good as proper mechanical estimates- still its performance is comparable to the TPDPS and BP performance. Future research could work on developing a better mechanical process for forecasting free cash flows.

[^6]Table 20: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \beta_{\text {ICC }}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Naive | $\begin{aligned} & 0.016^{*} \\ & (2.273) \end{aligned}$ | $\begin{array}{r} \hline 0.078 * * * \\ (5.321) \end{array}$ | $\begin{gathered} \hline 0.18^{* * *} \\ (4.029) \end{gathered}$ | $\begin{array}{r} \hline 0.282 * * * \\ (9.316) \end{array}$ | $\begin{aligned} & \hline 0.037 * \\ & (2.350) \end{aligned}$ | $\begin{array}{r} -0.015 \\ (-0.861) \end{array}$ | 68.1\% | 5.5\% | 119 | 0.000 | 68.1\% | 100.0\% |
| TPDPS_Anlst | $\begin{aligned} & 0.014^{*} \\ & (2.006) \end{aligned}$ | $\begin{array}{r} 0.076 * * * \\ (5.288) \end{array}$ | $\begin{array}{r} 0.183 * * * \\ (4.070) \end{array}$ | $\begin{array}{r} 0.283 * * * \\ (9.308) \end{array}$ | $\begin{aligned} & 0.035^{*} \\ & (2.318) \end{aligned}$ | $\begin{array}{r} -0.013 \\ (-0.719) \end{array}$ | 68\% | 5.3\% | 119 | 0.000 | 67.2\% | 100.0\% |
| BP_Anlst | $\begin{gathered} 0.008 \\ (1.252) \end{gathered}$ | $\begin{array}{r} 0.559 * * * \\ (6.469) \end{array}$ | $\begin{array}{r} 0.162 * * * \\ (3.450) \end{array}$ | $\begin{array}{r} 0.276 * * * \\ (9.351) \end{array}$ | $\begin{array}{r} 0.130 \\ (1.519) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.048) \end{array}$ | 67.3\% | 4.9\% | 119 | 0.000 | 71.4\% | 60.5\% |
| FCF1y | $\begin{aligned} & 0.017^{*} \\ & (2.381) \end{aligned}$ | $\begin{array}{r} 0.047 * * * \\ (5.658) \end{array}$ | $\begin{array}{r} 0.122 * * \\ (2.602) \end{array}$ | $\begin{array}{r} 0.275 * * * \\ (9.307) \end{array}$ | $\begin{array}{r} 0.017 \\ (1.521) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.021) \end{array}$ | 65.8\% | 3.7\% | 119 | 0.000 | 63.9\% | 100.0\% |
| FCF_Anlst_TP | $\begin{array}{r} 0.012 \\ (1.828) \end{array}$ | $\begin{array}{r} 0.436 * * * \\ (6.317) \end{array}$ | $\begin{gathered} 0.12^{*} \\ (2.441) \end{gathered}$ | $\begin{array}{r} 0.269 * * * \\ (9.297) \end{array}$ | $\begin{array}{r} 0.144 \\ (1.743) \end{array}$ | $\begin{array}{r} 0.003 \\ (0.169) \end{array}$ | 65\% | 3.0\% | 119 | 0.000 | 73.1\% | 52.9\% |
| FCF_Anlst_eps5 | $\begin{gathered} 0.010 \\ (1.448) \end{gathered}$ | $\begin{array}{r} 0.318 * * * \\ (6.561) \end{array}$ | $\begin{array}{r} 0.065 \\ (1.276) \end{array}$ | $\begin{array}{r} 0.266^{* * *} \\ (9.298) \end{array}$ | $\begin{aligned} & 0.159^{*} \\ & (2.027) \end{aligned}$ | $\begin{array}{r} 0.001 \\ (0.053) \end{array}$ | 64.3\% | 2.3\% | 119 | 0.000 | 64.7\% | 50.4\% |
| PE_Anlst | $\begin{array}{r} 0.007 \\ (0.804) \end{array}$ | $\begin{array}{r} 0.422 * * * \\ (5.220) \end{array}$ | $\begin{array}{r} 0.191 * * * \\ (3.948) \end{array}$ | $\begin{gathered} 0.26 * * * \\ (9.234) \end{gathered}$ | $\begin{array}{r} 0.482 \\ (1.662) \end{array}$ | $\begin{array}{r} -0.022 \\ (-0.948) \end{array}$ | 64.1\% | 1.8\% | 119 | 0.000 | 51.3\% | 43.7\% |
| DKL_Anlst | $\begin{array}{r} -0.003 \\ (-0.356) \end{array}$ | $\begin{array}{r} 0.296 * * * \\ (4.519) \end{array}$ | $\begin{array}{r} 0.043 \\ (0.854) \end{array}$ | $\begin{array}{r} 0.265 * * * \\ (9.254) \end{array}$ | $\begin{array}{r} 0.097 \\ (0.600) \end{array}$ | $\begin{array}{r} 0.008 \\ (0.384) \end{array}$ | 63.8\% | 1.8\% | 119 | 0.000 | 47.9\% | 52.1\% |
| CT_Anlst | $\begin{array}{r} 0.003 \\ (0.336) \end{array}$ | $\begin{array}{r} 0.293 * * * \\ (5.315) \end{array}$ | $\begin{gathered} 0.081 \\ (1.662) \end{gathered}$ | $\begin{array}{r} 0.263 * * * \\ (9.266) \end{array}$ | $\begin{array}{r} 0.123 \\ (0.756) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.018) \end{array}$ | 63.6\% | 1.7\% | 119 | 0.000 | 45.4\% | 65.5\% |
| HL_Anlst | $\begin{array}{r} 0.000 \\ (0.049) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (4.231) \end{array}$ | $\begin{array}{r} 0.024 \\ (0.478) \end{array}$ | $\begin{array}{r} 0.264 * * * \\ (9.257) \end{array}$ | $\begin{array}{r} 0.105 \\ (0.677) \end{array}$ | $\begin{array}{r} 0.012 \\ (0.544) \end{array}$ | 63.6\% | 1.6\% | 119 | 0.000 | 44.5\% | 52.9\% |
| FPM_Anlst | $\begin{array}{r} -0.014 \\ (-1.642) \end{array}$ | $\begin{array}{r} 0.449 * * * \\ (4.471) \end{array}$ | $\begin{gathered} 0.010 \\ (0.221) \end{gathered}$ | $\begin{array}{r} 0.264 * * * \\ (9.263) \end{array}$ | $\begin{array}{r} 0.031 \\ (0.157) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.047) \end{array}$ | 63.3\% | 1.4\% | 119 | 0.000 | 46.2\% | 47.1\% |
| GM_Anlst | $\begin{array}{r} 0.001 \\ (0.161) \end{array}$ | $\begin{array}{r} 0.243 * * * \\ (4.484) \end{array}$ | $\begin{array}{r} -0.024 \\ (-0.479) \end{array}$ | $\begin{array}{r} 0.263 * * * \\ (9.255) \end{array}$ | $\begin{array}{r} 0.153 \\ (1.191) \end{array}$ | $\begin{array}{r} 0.016 \\ (0.777) \end{array}$ | 63\% | 1.3\% | 119 | 0.000 | 41.2\% | 58.0\% |
| KMY_Anlst | $\begin{array}{r} 0.008 \\ (1.113) \end{array}$ | $\begin{array}{r} 0.101 * * * \\ (3.339) \end{array}$ | $\begin{array}{r} -0.027 \\ (-0.546) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.242) \end{array}$ | $\begin{array}{r} 0.066 \\ (1.039) \end{array}$ | $\begin{array}{r} 0.006 \\ (0.275) \end{array}$ | 62.8\% | 1.1\% | 119 | 0.000 | 33.6\% | 82.4\% |
| MPEG_Anlst | $\begin{array}{r} 0.013 \\ (1.853) \end{array}$ | $\begin{array}{r} 0.127 * * * \\ (3.376) \end{array}$ | $\begin{array}{r} -0.042 \\ (-0.835) \end{array}$ | $\begin{array}{r} 0.262 * * * \\ (9.258) \end{array}$ | $\begin{gathered} 0.103 \\ (0.854) \end{gathered}$ | $\begin{gathered} 0.013 \\ (0.644) \end{gathered}$ | 62.7\% | 1.0\% | 119 | 0.000 | 30.3\% | 68.9\% |
| FGHJ_Anlst | $\begin{gathered} 0.010 \\ (1.321) \end{gathered}$ | $\begin{array}{r} 0.142 * * * \\ (3.619) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.004) \end{array}$ | $\begin{array}{r} 0.266^{* * *} \\ (9.238) \end{array}$ | $\begin{array}{r} 0.161 \\ (0.766) \end{array}$ | $\begin{array}{r} -0.008 \\ (-0.408) \end{array}$ | 63.3\% | 1.0\% | 119 | 0.000 | 31.1\% | 75.6\% |
| GG_Anlst | $\begin{aligned} & 0.015^{*} \\ & (2.237) \end{aligned}$ | $\begin{gathered} 0.04 * \\ (2.514) \end{gathered}$ | $\begin{array}{r} -0.056 \\ (-1.132) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.234) \end{array}$ | $\begin{array}{r} 0.030 \\ (0.767) \end{array}$ | $\begin{array}{r} 0.003 \\ (0.162) \end{array}$ | 62.5\% | 0.9\% | 119 | 0.000 | 28.6\% | 97.5\% |
| PEG_Anlst | $\begin{array}{r} 0.022 * * \\ (2.956) \end{array}$ | $\begin{array}{r} 0.056 \\ (1.602) \end{array}$ | $\begin{array}{r} -0.070 \\ (-1.361) \end{array}$ | $\begin{array}{r} 0.258^{* * *} \\ (9.255) \end{array}$ | $\begin{array}{r} 0.077 \\ (0.687) \end{array}$ | $\begin{array}{r} 0.002 \\ (0.076) \end{array}$ | 62.3\% | 0.8\% | 119 | 0.000 | 23.5\% | 79.8\% |

[^7]Table 20: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{\text {TS }}=1$ | \% $\mathrm{N}+$ sig | $\% \beta_{\text {ICC }}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_Anlst | 0.013 | 0.118*** | -0.018 | 0.265*** | 0.289 | -0.008 | 63\% | 0.7\% | 119 | 0.000 | 26.9\% | 73.9\% |
|  | (1.739) | (3.176) | (-0.401) | (9.229) | (1.660) | (-0.391) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | $\begin{gathered} 0.025 * * \\ (2.995) \end{gathered}$ | $\begin{array}{r} 0.032 \\ (1.083 \end{array}$ | $\begin{array}{r} -0.060 \\ (-1.124) \end{array}$ | $\begin{array}{r} 0.258^{* * *} \\ (9.246) \end{array}$ | $\begin{array}{r} 0.015 \\ (0.367) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.055) \end{array}$ | 62.1\% | 0.5\% | 119 | 0.000 | 12.6\% | 89.9\% |
| TrOHE_10Ind | $\begin{array}{r} 0.025 * * * \\ (3.309) \end{array}$ | $\begin{array}{r} 0.032 \\ (1.153) \end{array}$ | $\begin{array}{r} -0.073 \\ (-1.491) \end{array}$ | $\begin{array}{r} 0.257 * * * \\ (9.260) \end{array}$ | $\begin{array}{r} 0.053 \\ (0.858) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.022) \end{array}$ | 61.9\% | 0.2\% | 119 | 0.000 | 20.2\% | 83.2\% |
| TrES_Anlst_10Ind | $\begin{array}{r} 0.028^{* * *} \\ (3.457) \end{array}$ | $\begin{array}{r} -0.003 \\ (-0.719) \end{array}$ | $\begin{array}{r} -0.066 \\ (-1.361) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.247) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.014) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.024) \end{array}$ | 61.9\% | 0.2\% | 119 | 0.000 | 8.4\% | 100.0\% |
| TrES_Anlst_25SBM | $\begin{array}{r} 0.026 * * * \\ (3.279) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.572) \end{array}$ | $\begin{array}{r} -0.081 \\ (-1.678) \end{array}$ | $\begin{array}{r} 0.257 * * * \\ (9.257) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.606) \end{array}$ | $\begin{array}{r} -0.013 \\ (-0.682) \end{array}$ | 61.7\% | 0.1\% | 119 | 0.000 | 3.4\% | 100.0\% |
| TrETSS_Anlst_25SBM | $\begin{gathered} 0.026 * * * \\ (3.229) \end{gathered}$ | $\begin{array}{r} 0.004 \\ (0.403) \end{array}$ | $\begin{array}{r} -0.080 \\ (-1.592) \end{array}$ | $\begin{gathered} 0.258 * * * \\ (9.252) \end{gathered}$ | $\begin{gathered} 0.002 \\ (0.220) \end{gathered}$ | $\begin{array}{r} -0.001 \\ (-0.041) \end{array}$ | 61.5\% | 0.1\% | 119 | 0.000 | 5.0\% | 98.3\% |
| TrOHE_25SBM | $\begin{array}{r} 0.026^{* * *} \\ (3.275) \end{array}$ | $\begin{gathered} 0.024 * * \\ (2.605) \end{gathered}$ | $\begin{array}{r} -0.074 \\ (-1.508) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.253) \end{array}$ | $\begin{array}{r} -0.012 \\ (-1.661) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.031) \end{array}$ | 61.5\% | 0.1\% | 119 | 0.000 | 9.2\% | 98.3\% |
| WNG_Anlst | $\begin{array}{r} 0.026 * * * \\ (3.326) \end{array}$ | $\begin{gathered} 0.001 \\ (1.442) \end{gathered}$ | $\begin{array}{r} -0.082 \\ (-1.621) \end{array}$ | $\begin{array}{r} 0.261 * * * \\ (9.258) \end{array}$ | $\begin{array}{r} -0.037 \\ (-0.639) \end{array}$ | $\begin{gathered} -0.005 \\ (-0.223) \end{gathered}$ | 61.7\% | 0.0\% | 119 | 0.000 | 7.6\% | 100.0\% |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t -statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathrm{sig}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1.

Table 21: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically

|  | Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N + sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | FCF1y_Mech | $\begin{aligned} & 0.016^{*} \\ & (2.300) \end{aligned}$ | $\begin{array}{r} \hline 0.076^{* * *} \\ (5.298) \end{array}$ | $\begin{array}{r} \hline 0.175 * * * \\ (3.921) \end{array}$ | $\begin{array}{r} \hline 0.282 * * * \\ (9.324) \end{array}$ | $\begin{aligned} & \hline 0.035^{*} \\ & (2.252) \end{aligned}$ | $\begin{array}{r} -0.014 \\ (-0.752) \end{array}$ | 67.9\% | 5.3\% | 119 | 0.000 | 69.7\% | 100.0\% |
|  | TPDPS_HDZ | $\begin{aligned} & 0.016^{*} \\ & (2.161) \end{aligned}$ | $\begin{array}{r} 0.065 * * * \\ (5.352) \end{array}$ | $\begin{array}{r} 0.155 * * * \\ (3.296) \end{array}$ | $\begin{array}{r} 0.278 * * * \\ (9.331) \end{array}$ | $\begin{aligned} & 0.036^{*} \\ & (2.256) \end{aligned}$ | $\begin{array}{r} -0.002 \\ (-0.075) \end{array}$ | 67.5\% | 4.9\% | 119 | 0.000 | 68.9\% | 100.0\% |
|  | BP_HDZ | $\begin{array}{r} 0.008 \\ (1.280) \end{array}$ | $\begin{array}{r} 0.475 * * * \\ (6.657) \end{array}$ | $\begin{array}{r} 0.125 * * \\ (2.670) \end{array}$ | $\begin{array}{r} 0.274 * * * \\ (9.348) \end{array}$ | $\begin{aligned} & 0.186^{*} \\ & (2.238) \end{aligned}$ | $\begin{array}{r} 0.008 \\ (0.418) \end{array}$ | 66.7\% | 4.2\% | 119 | 0.000 | 73.9\% | 56.3\% |
|  | TPDPS_RI | $\begin{aligned} & 0.018^{*} \\ & (2.454) \end{aligned}$ | $\begin{array}{r} 0.029 * * * \\ (4.618) \end{array}$ | $\begin{array}{r} 0.045 \\ (0.812) \end{array}$ | $\begin{array}{r} 0.268 * * * \\ (9.325) \end{array}$ | $\begin{array}{r} 0.031 * * \\ (2.604) \end{array}$ | $\begin{array}{r} -0.007 \\ (-0.347) \end{array}$ | 65.2\% | 2.8\% | 119 | 0.000 | 52.9\% | 100.0\% |
|  | TPDPS_EP | $\begin{aligned} & 0.019 * \\ & (2.514) \end{aligned}$ | $\begin{array}{r} 0.023^{* * *} \\ (4.828) \end{array}$ | $\begin{array}{r} 0.036 \\ (0.663) \end{array}$ | $\begin{array}{r} 0.266 * * * \\ (9.323) \end{array}$ | $\begin{array}{r} 0.037 * * \\ (2.978) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.021) \end{array}$ | 64.7\% | 2.3\% | 119 | 0.000 | 50.4\% | 100.0\% |
|  | BP_RI | $\begin{aligned} & 0.015^{*} \\ & (2.141) \end{aligned}$ | $\begin{array}{r} 0.209 * * * \\ (5.869) \end{array}$ | $\begin{array}{r} 0.008 \\ (0.155) \end{array}$ | $\begin{array}{r} 0.264 * * * \\ (9.315) \end{array}$ | $\begin{aligned} & 0.139^{*} \\ & (2.018) \end{aligned}$ | $\begin{array}{r} -0.006 \\ (-0.288) \end{array}$ | 64.4\% | 2.2\% | 119 | 0.000 | 56.3\% | 67.2\% |
|  | TPDPS_RW | $\begin{array}{r} 0.023 * * \\ (2.963) \end{array}$ | $\begin{array}{r} 0.027 * * * \\ (4.244) \end{array}$ | $\begin{array}{r} 0.009 \\ (0.184) \end{array}$ | $\begin{array}{r} 0.269 * * * \\ (9.338) \end{array}$ | $\begin{array}{r} 0.025 \\ (1.690) \end{array}$ | $\begin{array}{r} -0.003 \\ (-0.159) \end{array}$ | 64.3\% | 2.1\% | 119 | 0.000 | 46.2\% | 100.0\% |
|  | BP_EP | $\begin{aligned} & 0.016^{*} \\ & (2.235) \end{aligned}$ | $\begin{array}{r} 0.191^{* * *} \\ (5.632) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.027) \end{array}$ | $\begin{array}{r} 0.264 * * * \\ (9.313) \end{array}$ | $\begin{aligned} & 0.159^{*} \\ & (2.195) \end{aligned}$ | $\begin{array}{r} -0.007 \\ (-0.336) \end{array}$ | 64.4\% | 2.1\% | 119 | 0.000 | 55.5\% | 69.7\% |
| $\bigcirc$ | BP_RW | $\begin{array}{r} 0.022 * * \\ (2.813) \end{array}$ | $\begin{array}{r} 0.195 * * * \\ (4.623) \end{array}$ | $\begin{array}{r} -0.006 \\ (-0.119) \end{array}$ | $\begin{array}{r} 0.266 * * * \\ (9.359) \end{array}$ | $\begin{array}{r} 0.127 \\ (1.741) \end{array}$ | $\begin{array}{r} -0.002 \\ (-0.105) \end{array}$ | 64.2\% | 2.1\% | 119 | 0.000 | 43.7\% | 73.9\% |
|  | FCF_Mech_TP | $\begin{array}{r} 0.021 * * \\ (2.725) \end{array}$ | $\begin{aligned} & 0.179^{*} \\ & (2.423) \end{aligned}$ | $\begin{array}{r} -0.030 \\ (-0.699) \end{array}$ | $\begin{array}{r} 0.264 * * * \\ (9.296) \end{array}$ | $\begin{array}{r} 0.098 \\ (0.454) \end{array}$ | $\begin{array}{r} -0.010 \\ (-0.437) \end{array}$ | 63.2\% | 1.1\% | 119 | 0.000 | 24.4\% | 40.3\% |
|  | FCF_Mech_eps5 | $\begin{array}{r} 0.023 * * \\ (2.920) \end{array}$ | $\begin{array}{r} 0.090 * * \\ (2.196) \end{array}$ | $\begin{array}{r} -0.030 \\ (-0.672) \end{array}$ | $\begin{array}{r} 0.264 * * * \\ (9.278) \end{array}$ | $\begin{array}{r} -0.119 \\ (-0.528) \end{array}$ | $\begin{array}{r} -0.011 \\ (-0.528) \end{array}$ | 62.9\% | 1.1\% | 119 | 0.000 | 19.3\% | 45.4\% |
|  | PE_HDZ | $\begin{aligned} & 0.019^{*} \\ & (2.487) \end{aligned}$ | $\begin{array}{r} 0.107 * * * \\ (3.923) \end{array}$ | $\begin{array}{r} -0.059 \\ (-1.166) \end{array}$ | $\begin{array}{r} 0.264 * * * \\ (9.242) \end{array}$ | $\begin{array}{r} 0.565^{* *} \\ (2.699) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.057) \end{array}$ | 63.2\% | 1.1\% | 119 | 0.000 | 37.0\% | 81.5\% |
|  | PE_EP | $\begin{aligned} & 0.015^{*} \\ & (2.338) \end{aligned}$ | $\begin{array}{r} 0.033^{* * *} \\ (3.793) \end{array}$ | $\begin{array}{r} -0.073 \\ (-1.530) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.247) \end{array}$ | $\begin{array}{r} 0.157 * * \\ (2.870) \end{array}$ | $\begin{array}{r} 0.002 \\ (0.072) \end{array}$ | 62.7\% | 0.7\% | 119 | 0.000 | 42.9\% | 99.2\% |
|  | CT_HDZ | $\begin{aligned} & 0.018^{*} \\ & (2.418) \end{aligned}$ | $\begin{aligned} & 0.074 * \\ & (2.542) \end{aligned}$ | $\begin{array}{r} -0.063 \\ (-1.333) \end{array}$ | $\begin{array}{r} 0.263^{*} * * \\ (9.243) \end{array}$ | $\begin{array}{r} 0.396 \\ (1.744) \end{array}$ | $\begin{array}{r} 0.009 \\ (0.423) \end{array}$ | 62.6\% | 0.7\% | 119 | 0.000 | 30.3\% | 89.9\% |
|  | PE_RW | $\begin{array}{r} 0.022 * * \\ (2.806) \end{array}$ | $\begin{array}{r} 0.016 \\ (0.788) \end{array}$ | $\begin{array}{r} -0.062 \\ (-1.281) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.226) \end{array}$ | $\begin{array}{r} 0.047 \\ (0.605) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.058) \end{array}$ | 62.7\% | 0.6\% | 119 | 0.000 | 11.8\% | 91.6\% |
|  | GG_HDZ | $\begin{aligned} & 0.018^{*} \\ & (2.404) \end{aligned}$ | $\begin{array}{r} 0.087 * * \\ (2.680) \end{array}$ | $\begin{array}{r} -0.056 \\ (-1.175) \end{array}$ | $\begin{array}{r} 0.263 * * * \\ (9.240) \end{array}$ | $\begin{array}{r} 1.044^{* * *} \\ (3.205) \end{array}$ | $\begin{array}{r} 0.010 \\ (0.482) \end{array}$ | 63.1\% | 0.6\% | 119 | 0.000 | 31.1\% | 85.7\% |
|  | TrETSS_RW_10Ind | $\begin{array}{r} 0.024 * * \\ (3.044) \\ \hline \end{array}$ | $\begin{array}{r} -0.010 \\ (-0.914) \\ \hline \end{array}$ | $\begin{array}{r} -0.072 \\ (-1.492) \\ \hline \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.225) \\ \hline \end{array}$ | $\begin{array}{r} 0.015 \\ (0.871) \\ \hline \end{array}$ | $\begin{array}{r} -0.010 \\ (-0.459) \\ \hline \end{array}$ | 62.1\% | 0.6\% | 119 | 0.000 | 15.1\% | 100.0\% |

Table 21: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N + sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.019** | 0.020 | -0.066 | 0.261*** | 0.152* | -0.008 | 62.7\% | 0.5\% | 119 | 0.000 | 29.4\% | 100.0\% |
|  | (2.609) | (1.677) | (-1.281) | (9.253) | (1.986) | (-0.393) |  |  |  |  |  |  |
| GM_RI | 0.008 | 0.043*** | -0.073 | 0.259*** | 0.158* | 0.005 | 62.5\% | 0.5\% | 119 | 0.000 | 42.0\% | 99.2\% |
|  | (1.255) | (5.913) | (-1.446) | (9.247) | (2.014) | (0.239) |  |  |  |  |  |  |
| GG_RW | 0.019* | 0.084*** | -0.060 | 0.262*** | 1.021 ** | 0.005 | 62.6\% | 0.5\% | 119 | 0.000 | 28.2\% | 92.7\% |
|  | (2.437) | (3.382) | (-1.179) | (8.888) | (2.713) | (0.224) |  |  |  |  |  |  |
| MPEG_RW | 0.02** | 0.001 | -0.073 | 0.26*** | 0.166* | 0.004 | 62.3\% | 0.5\% | 119 | 0.000 | 12.6\% | 100.0\% |
|  | (3.005) | (0.050) | (-1.502) | (9.245) | (2.358) | (0.202) |  |  |  |  |  |  |
| CT_RW | 0.019* | 0.055*** | -0.061 | 0.262*** | 0.535 | 0.006 | 62.2\% | 0.5\% | 119 | 0.000 | 20.7\% | 96.6\% |
|  | (2.447) | (3.422) | (-1.218) | (9.128) | (0.658) | (0.285) |  |  |  |  |  |  |
| MPEG_RI | 0.009 | $0.034^{* * *}$ | -0.077 | 0.259*** | 0.065 | 0.001 | 62.3\% | 0.5\% | 119 | 0.000 | $32.8 \%$ | 99.2\% |
|  | (1.317) | (5.599) | (-1.517) | (9.245) | (0.849) | (0.053) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.023 ** | 0.005* | -0.072 | 0.257*** | 0.003 | 0.010 | 62.2\% | 0.4\% | 119 | 0.000 | 20.2\% | 100.0\% |
|  | (2.780) | (2.031) | (-1.481) | (9.257) | (0.513) | (0.462) |  |  |  |  |  |  |
| FGHJ_EP | 0.016* | $0.051 * * *$ | -0.072 | 0.258*** | 1.181 | -0.002 | 62.1\% | 0.4\% | 119 | 0.000 | 26.9\% | 94.1\% |
|  | (2.115) | (3.098) | (-1.427) | (9.256) | (1.292) | (-0.067) |  |  |  |  |  |  |
| PEG_EP | 0.018* | 0.011 | -0.086 | 0.259*** | 0.474* | -0.003 | 62.5\% | 0.4\% | 119 | 0.000 | 22.9\% | 100.0\% |
|  | (2.154) | (0.823) | (-1.603) | (8.843) | (2.382) | (-0.134) |  |  |  |  |  |  |
| GG_EP | 0.019* | $0.071 * * *$ | -0.051 | $0.26 * * *$ | 0.214 | 0.002 | 62.2\% | 0.4\% | 119 | 0.000 | 25.0\% | 100.0\% |
|  | (2.563) | (3.507) | (-1.012) | (8.796) | (1.685) | (0.091) |  |  |  |  |  |  |
| KMY_EP | 0.014* | $0.054^{* * *}$ | -0.072 | 0.258*** | 0.049 | 0.000 | 62.1\% | 0.4\% | 119 | 0.000 | 22.7\% | 98.3\% |
|  | (2.127) | (4.522) | (-1.414) | (9.251) | (0.661) | (0.022) |  |  |  |  |  |  |
| FPM_HDZ | 0.018** | 0.055* | -0.065 | 0.261*** | 0.215 | 0.005 | 62.2\% | 0.4\% | 119 | 0.000 | 16.0\% | 78.2\% |
|  | (2.604) | (1.971) | (-1.361) | (9.222) | (1.525) | (0.251) |  |  |  |  |  |  |
| GM_HDZ | 0.023*** | 0.009 | -0.073 | 0.26*** | 0.298** | 0.011 | 62.2\% | 0.4\% | 119 | 0.000 | 13.4\% | 95.0\% |
|  | (3.304) | (0.602) | (-1.509) | (9.227) | (2.815) | (0.528) |  |  |  |  |  |  |
| GM_EP | 0.014* | 0.028*** | -0.080 | 0.26*** | 0.225* | 0.003 | $62.5 \%$ | 0.4\% | 119 | 0.000 | 27.7\% | 99.2\% |
|  | (2.147) | (3.981) | (-1.521) | (9.255) | (2.434) | (0.158) |  |  |  |  |  |  |
| MPEG_EP | 0.015* | $0.021 * * *$ | -0.068 | 0.259*** | 0.115 | 0.000 | 62.3\% | 0.4\% | 119 | 0.000 | 18.5\% | 99.2\% |
|  | (2.260) | (3.523) | $(-1.369)$ | (9.250) | (1.384) | $(0.016)$ |  |  |  |  |  |  |
| MPEG_HDZ | 0.024*** | 0.005 | -0.073 | 0.26 *** | 0.251 ** | 0.014 | 62.2\% | 0.4\% | 119 | 0.000 | 12.6\% | 97.5\% |
|  | (3.373) | (0.411) | (-1.555) | (9.229) | (2.701) | (0.638) |  |  |  |  |  |  |
| HL_RI | 0.014 | 0.025 | -0.080 | 0.258*** | 0.030 | 0.000 | 61.9\% | 0.3\% | 119 | 0.000 | 23.5\% | 100.0\% |
|  | (1.861) | (1.084) | (-1.576) | (9.253) | (1.423) | (0.001) |  |  |  |  |  |  |
| PEG_HDZ | $0.026 * * *$ | -0.021 | -0.082 | 0.259*** | 0.257* | 0.003 | 62.1\% | 0.3\% | 119 | 0.000 | 7.6\% | 94.1\% |
|  | (3.713) | (-1.271) | (-1.669) | (9.232) | (2.335) | (0.150) |  |  |  |  |  |  |

Table 21: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically

|  | Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | DKL_RI | 0.015 | 0.025 | -0.076 | 0.258*** | 0.039 | -0.002 | 61.9\% | 0.3\% | 119 | 0.000 | 26.1\% | 99.2\% |
|  |  | (1.949) | (1.068) | (-1.507) | (9.252) | (1.580) | $(-0.077)$ |  |  |  |  |  |  |
|  | TrETSS_RI_10Ind | 0.02** | 0.020 | -0.072 | 0.259*** | -0.015 | -0.001 | 61.9\% | 0.3\% | 119 | 0.000 | 19.3\% | 99.2\% |
|  |  | (2.793) | (1.299) | (-1.428) | (9.244) | (-1.293) | $(-0.068)$ |  |  |  |  |  |  |
|  | KMY_HDZ | 0.02** | 0.038 | -0.070 | 0.261*** | 0.366* | 0.009 | 62.4\% | 0.3\% | 119 | 0.000 | 19.3\% | 91.6\% |
|  |  | (2.862) | (1.402) | (-1.462) | (9.240) | (2.493) | (0.442) |  |  |  |  |  |  |
|  | KMY_RI | 0.014 | 0.042* | -0.070 | 0.259*** | 0.055 | 0.002 | 61.9\% | 0.3\% | 119 | 0.000 | 23.5\% | 100.0\% |
|  |  | (1.900) | (2.572) | (-1.418) | (9.246) | (1.803) | (0.093) |  |  |  |  |  |  |
|  | TrES_RW_10Ind | 0.028*** | 0.003 | -0.065 | $0.257 * * *$ | 0.000 | 0.001 | 62.1\% | 0.3\% | 119 | 0.000 | 16.8\% | 99.2\% |
|  |  | (3.307) | (0.689) | (-1.347) | (9.251) | (-0.056) | (0.039) |  |  |  |  |  |  |
|  | HL_HDZ | 0.021** | 0.029 | -0.072 | 0.261*** | 0.241* | 0.007 | 62.3\% | 0.3\% | 119 | 0.000 | 17.6\% | 93.3\% |
|  |  | (2.976) | (1.894) | (-1.471) | (9.234) | (2.192) | (0.311) |  |  |  |  |  |  |
|  | GG_RI | 0.018* | 0.061** | -0.061 | 0.26*** | 0.244 | 0.000 | 62.3\% | 0.3\% | 119 | 0.000 | 21.3\% | 100.0\% |
|  |  | (2.338) | (2.807) | (-1.178) | (8.804) | (1.611) | (-0.017) |  |  |  |  |  |  |
|  | TrES_HDZ_25SBM | 0.027*** | -0.002 | -0.076 | 0.259*** | 0.000 | -0.003 | 61.8\% | 0.3\% | 119 | 0.000 | 8.4\% | 100.0\% |
|  |  | (3.383) | (-0.415) | (-1.540) | (9.243) | (-0.516) | $(-0.133)$ |  |  |  |  |  |  |
|  | GLS_EP | 0.017* | 0.045** | -0.076 | 0.258*** | 0.180 | -0.001 | 62\% | 0.3\% | 119 | 0.000 | 27.7\% | 93.3\% |
| $\infty$ |  | (2.265) | (2.799) | (-1.495) | (9.255) | (1.373) | (-0.066) |  |  |  |  |  |  |
|  | GLS_RI | 0.017* | 0.051* | -0.084 | 0.258*** | -3.292 | 0.000 | 61.9\% | 0.3\% | 119 | 0.000 | 23.5\% | 93.3\% |
|  |  | (2.231) | (2.440) | (-1.682) | (9.249) | (-0.296) | (0.011) |  |  |  |  |  |  |
|  | DKL_HDZ | 0.02** | 0.042 | -0.073 | 0.261*** | 0.298 | 0.004 | 62.3\% | 0.3\% | 119 | 0.000 | 16.8\% | 90.8\% |
|  |  | (2.757) | (1.559) | (-1.499) | (9.238) | (1.552) | (0.198) |  |  |  |  |  |  |
|  | PEG_RW | 0.019* | -0.034 | -0.091 | 0.259*** | 0.180 | -0.001 | 62\% | 0.3\% | 119 | 0.000 | 29.5\% | 100.0\% |
|  |  | (2.042) | (-0.717) | (-1.283) | (6.621) | (1.605) | $(-0.043)$ |  |  |  |  |  |  |
|  | PEG_RI | 0.015* | 0.028*** | -0.080 | $0.259 * * *$ | 0.269 | 0.002 | 62.1\% | 0.2\% | 119 | 0.000 | 29.4\% | 96.6\% |
|  |  | (1.985) | (4.038) | (-1.558) | (9.243) | (1.208) | (0.082) |  |  |  |  |  |  |
|  | GM_RW | 0.023*** | -0.014 | -0.061 | 0.26*** | 0.159* | 0.007 | 62.3\% | 0.2\% | 119 | 0.000 | 8.4\% | 100.0\% |
|  |  | (3.378) | (-1.308) | (-1.227) | (9.246) | (2.111) | (0.308) |  |  |  |  |  |  |
|  | TrETSS_RI_25SBM | 0.027*** | -0.008 | -0.074 | 0.259*** | -0.001 | 0.002 | 61.8\% | 0.2\% | 119 | 0.000 | 11.8\% | 99.2\% |
|  |  | (3.379) | (-0.693) | $(-1.452)$ | (9.249) | (-0.215) | (0.098) |  |  |  |  |  |  |
|  | FPM_RW | 0.027*** | 0.006 | -0.074 | 0.259*** | 0.024 | 0.003 | 62\% | 0.2\% | 119 | 0.000 | 7.6\% | 97.5\% |
|  |  | (3.301) | (0.576) | (-1.456) | (9.252) | (0.575) | (0.131) |  |  |  |  |  |  |
|  | FGHJ_HDZ | 0.02* | 0.047 | -0.066 | 0.261*** | 0.364 | 0.001 | 62.2\% | 0.2\% | 119 | 0.000 | 13.4\% | 90.8\% |
|  |  | (2.561) | (1.483) | (-1.311) | (9.249) | (1.643) | (0.031) |  |  |  |  |  |  |
|  | TrETSS_EP_25SBM | 0.026*** | 0.003 | -0.079 | $0.258 * * *$ | 0.002 | 0.001 | 61.8\% | 0.2\% | 119 | 0.000 | 10.1\% | 100.0\% |
|  |  | (3.383) | (1.463) | (-1.590) | (9.255) | (0.955) | (0.055) |  |  |  |  |  |  |
|  | CT_RI | 0.024** | 0.009 | -0.079 | 0.258*** | 0.098 | 0.001 | 61.8\% | 0.2\% | 119 | 0.000 | 19.3\% | 99.2\% |
|  |  | (3.034) | (1.500) | (-1.592) | (9.256) | (1.435) | (0.052) |  |  |  |  |  |  |

Table 21: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically

|  | Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | DKL_RW | $\begin{array}{r} \hline 0.024^{* * *} \\ (3.223) \end{array}$ | $\begin{array}{r} 0.008 \\ (0.975) \end{array}$ | $\begin{array}{r} -0.073 \\ (-1.423) \end{array}$ | $\begin{array}{r} \hline 0.258^{* * *} \\ (9.252) \end{array}$ | $\begin{array}{r} 0.025 \\ (0.641) \end{array}$ | $\begin{array}{r} 0.003 \\ (0.135) \end{array}$ | 61.9\% | 0.2\% | 119 | 0.000 | 10.9\% | $99.2 \%$ |
|  | TrES_HDZ_10Ind | $\begin{array}{r} 0.027 * * * \\ (3.359) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.521) \end{array}$ | $\begin{array}{r} -0.069 \\ (-1.409) \end{array}$ | $\begin{array}{r} 0.257 * * * \\ (9.265) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.275) \end{array}$ | $\begin{array}{r} 0.007 \\ (0.319) \end{array}$ | 61.8\% | 0.2\% | 119 | 0.000 | 12.6\% | 100.0\% |
|  | FPM_RI | $\begin{array}{r} 0.018 \\ (1.953) \end{array}$ | $\begin{array}{r} 0.018 \\ (1.068) \end{array}$ | $\begin{array}{r} -0.064 \\ (-1.276) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.250) \end{array}$ | $\begin{array}{r} 0.011 \\ (0.691) \end{array}$ | $\begin{array}{r} -0.003 \\ (-0.136) \end{array}$ | 61.8\% | 0.2\% | 119 | 0.000 | 21.0\% | 99.2\% |
|  | DKL_EP | $\begin{aligned} & 0.019^{*} \\ & (2.448) \end{aligned}$ | $\begin{array}{r} 0.026 * * * \\ (4.134) \end{array}$ | $\begin{array}{r} -0.077 \\ (-1.484) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.255) \end{array}$ | $\begin{array}{r} 0.060 \\ (0.823) \end{array}$ | $\begin{array}{r} -0.003 \\ (-0.128) \end{array}$ | 61.9\% | 0.2\% | 119 | 0.000 | 18.5\% | 99.2\% |
|  | TrETSS_EP_10Ind | $\begin{array}{r} 0.023 * * \\ (3.017) \end{array}$ | $\begin{array}{r} 0.008 * * \\ (2.578) \end{array}$ | $\begin{array}{r} -0.079 \\ (-1.616) \end{array}$ | $\begin{array}{r} 0.257 * * * \\ (9.252) \end{array}$ | $\begin{array}{r} -0.014 \\ (-1.063) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.062) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 21.8\% | 100.0\% |
|  | FGHJ_RI | $\begin{aligned} & 0.018^{*} \\ & (2.402) \end{aligned}$ | $\begin{array}{r} 0.034 * * \\ (2.975) \end{array}$ | $\begin{array}{r} -0.079 \\ (-1.566) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.249) \end{array}$ | $\begin{aligned} & 10.511 \\ & (1.027) \end{aligned}$ | $\begin{array}{r} -0.001 \\ (-0.043) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 19.3\% | 95.8\% |
|  | TrES_RI_25SBM | $\begin{array}{r} 0.026 * * * \\ (3.214) \end{array}$ | $\begin{array}{r} 0.001 \\ (0.803) \end{array}$ | $\begin{array}{r} -0.072 \\ (-1.474) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.253) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.122) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.024) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 6.7\% | 100.0\% |
|  | CT_EP | $\begin{gathered} 0.024 * * \\ (3.039) \end{gathered}$ | $\begin{array}{r} 0.018 * * \\ (2.772) \end{array}$ | $\begin{array}{r} -0.072 \\ (-1.410) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.252) \end{array}$ | $\begin{array}{r} 0.118 \\ (1.202) \end{array}$ | $\begin{array}{r} -0.003 \\ (-0.156) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 13.4\% | 99.2\% |
|  | HL_RW | $\begin{array}{r} 0.024^{* * *} \\ (3.222) \end{array}$ | $\begin{array}{r} 0.007 \\ (0.901) \end{array}$ | $\begin{array}{r} -0.074 \\ (-1.449) \end{array}$ | $\begin{array}{r} 0.258^{* * *} \\ (9.255) \end{array}$ | $\begin{array}{r} 0.022 \\ (0.662) \end{array}$ | $\begin{array}{r} 0.003 \\ (0.118) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 11.8\% | 99.2\% |
| $\vartheta$ | FGHJ_RW | $\begin{aligned} & 0.021^{*} \\ & (2.540) \end{aligned}$ | $\begin{gathered} 0.036 * * \\ (2.666) \end{gathered}$ | $\begin{array}{r} -0.068 \\ (-1.294) \end{array}$ | $\begin{array}{r} 0.258^{* * *} \\ (8.899) \end{array}$ | $\begin{array}{r} 0.024 \\ (0.377) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.045) \end{array}$ | 61.7\% | 0.1\% | 119 | 0.000 | 12.7\% | 100.0\% |
|  | KMY_RW | $\begin{array}{r} 0.024 * * * \\ (3.307) \end{array}$ | $\begin{array}{r} 0.006 \\ (0.621) \end{array}$ | $\begin{array}{r} -0.075 \\ (-1.472) \end{array}$ | $\begin{array}{r} 0.258^{* * *} \\ (9.260) \end{array}$ | $\begin{array}{r} 0.064 \\ (1.388) \end{array}$ | $\begin{array}{r} 0.002 \\ (0.082) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 14.3\% | 98.3\% |
|  | WNG_RW | $\begin{array}{r} 0.026 * * * \\ (3.319) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.602) \end{array}$ | $\begin{array}{r} -0.084 \\ (-1.683) \end{array}$ | $\begin{gathered} 0.26 * * * \\ (9.263) \end{gathered}$ | $\begin{array}{r} 0.004 \\ (0.770) \end{array}$ | $\begin{array}{r} -0.004 \\ (-0.182) \end{array}$ | 61.7\% | 0.1\% | 119 | 0.000 | 5.9\% | 100.0\% |
|  | TrES_EP_10Ind | $\begin{array}{r} 0.026 * * * \\ (3.264) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.374) \end{array}$ | $\begin{array}{r} -0.072 \\ (-1.489) \end{array}$ | $\begin{array}{r} 0.257 * * * \\ (9.258) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.258) \end{array}$ | $\begin{array}{r} 0.002 \\ (0.106) \end{array}$ | 61.9\% | 0.1\% | 119 | 0.000 | 10.9\% | 100.0\% |
|  | GLS_RW | $\begin{array}{r} 0.027 * * * \\ (3.161) \end{array}$ | $\begin{array}{r} 0.011 \\ (1.143) \end{array}$ | $\begin{array}{r} -0.071 \\ (-1.398) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.259) \end{array}$ | $\begin{array}{r} 0.033 \\ (0.593) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.017) \end{array}$ | 61.7\% | 0.1\% | 119 | 0.000 | 7.6\% | 98.3\% |
|  | FPM_EP | $\begin{aligned} & 0.023^{*} \\ & (2.533) \end{aligned}$ | $\begin{array}{r} 0.013 \\ (1.742) \end{array}$ | $\begin{array}{r} -0.067 \\ (-1.362) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.249) \end{array}$ | $\begin{array}{r} 0.023 \\ (1.683) \end{array}$ | $\begin{array}{r} -0.006 \\ (-0.277) \end{array}$ | 61.6\% | 0.1\% | 119 | 0.000 | 12.6\% | 100.0\% |
|  | TrETSS_HDZ_10Ind | $\begin{array}{r} 0.025 * * * \\ (3.178) \end{array}$ | $\begin{aligned} & 0.017 * \\ & (2.014) \end{aligned}$ | $\begin{array}{r} -0.074 \\ (-1.510) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.253) \end{array}$ | $\begin{array}{r} -0.011 \\ (-0.458) \end{array}$ | $\begin{array}{r} 0.002 \\ (0.099) \end{array}$ | 61.7\% | 0.1\% | 119 | 0.000 | 13.4\% | 97.5\% |
|  | TrES_EP_25SBM | $\begin{array}{r} 0.027^{* * *} * \\ (3.407) \end{array}$ | $\begin{array}{r} -0.001 \\ (-1.060) \end{array}$ | $\begin{array}{r} -0.077 \\ (-1.527) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.251) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.012) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.060) \end{array}$ | 61.7\% | 0.1\% | 119 | 0.000 | 6.7\% | 100.0\% |
|  | GLS_HDZ | $\begin{array}{r} 0.019 * * \\ (2.617) \end{array}$ | $\begin{aligned} & 0.054 * \\ & (1.989) \end{aligned}$ | $\begin{array}{r} -0.072 \\ (-1.433) \end{array}$ | $\begin{gathered} 0.26 * * * \\ (9.251) \end{gathered}$ | $\begin{aligned} & 0.437 * \\ & (2.061) \end{aligned}$ | $\begin{array}{r} 0.001 \\ (0.033) \end{array}$ | 62\% | 0.1\% | 119 | 0.000 | 12.6\% | 90.8\% |
|  | TrETSS_HDZ_25SBM | $\begin{array}{r} 0.026 * * * \\ (3.355) \\ \hline \end{array}$ | $\begin{array}{r} 0.004 \\ (0.735) \\ \hline \end{array}$ | $\begin{array}{r} -0.077 \\ (-1.539) \\ \hline \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.251) \\ \hline \end{array}$ | $\begin{array}{r} 0.003 \\ (0.562) \\ \hline \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.021) \\ \hline \end{array}$ | 61.6\% | 0.1\% | 119 | 0.000 | 9.2\% | 99.2\% |

Table 21: Capturing Subsequent Return using Analysts forecasts based ICC - New Model Testing Mechanically

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% N +sig | $\% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_EP | $\begin{aligned} & \hline 0.019^{*} \\ & (2.467) \end{aligned}$ | $\begin{array}{r} 0.022 * * * \\ (3.981) \end{array}$ | $\begin{array}{r} \hline-0.078 \\ (-1.522) \end{array}$ | $\begin{gathered} \hline 0.259 * * * \\ (9.255) \end{gathered}$ | $\begin{array}{r} \hline 0.058 \\ (0.879) \end{array}$ | $\begin{array}{r} \hline-0.002 \\ (-0.086) \end{array}$ | 61.8\% | 0.1\% | 119 | 0.000 | 15.1\% | 99.2\% |
| TrETSS_RW_25SBM | $\begin{array}{r} 0.027 * * * \\ (3.490) \end{array}$ | $\begin{array}{r} -0.002 \\ (-0.617) \end{array}$ | $\begin{array}{r} -0.083 \\ (-1.693) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.254) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.099) \end{array}$ | $\begin{array}{r} 0.004 \\ (0.162) \end{array}$ | 61.6\% | 0.1\% | 119 | 0.000 | 9.2\% | 100.0\% |
| TrES_RW_25SBM | $\begin{array}{r} 0.026 * * * \\ (3.314) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.163) \end{array}$ | $\begin{array}{r} -0.078 \\ (-1.556) \end{array}$ | $\begin{array}{r} 0.258 * * * \\ (9.256) \end{array}$ | $\begin{array}{r} 0.000 \\ (0.160) \end{array}$ | $\begin{array}{r} -0.003 \\ (-0.146) \end{array}$ | 61.5\% | 0.0\% | 119 | 0.000 | 0.8\% | 100.0\% |
| WNG_RI | $\begin{array}{r} 0.027 * * * \\ (3.332) \end{array}$ | $\begin{array}{r} 0.000 \\ (0.969) \end{array}$ | $\begin{array}{r} -0.076 \\ (-1.554) \end{array}$ | $\begin{array}{r} 0.259 * * * \\ (9.251) \end{array}$ | $\begin{array}{r} 0.002 \\ (0.644) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.053) \end{array}$ | 61.5\% | -0.1\% | 119 | 0.000 | 3.4\% | 100.0\% |
| WNG_EP | $\begin{array}{r} 0.027 * * * \\ (3.319) \end{array}$ | $\begin{array}{r} 0.000 \\ (-0.883) \end{array}$ | $\begin{array}{r} -0.078 \\ (-1.498) \end{array}$ | $\begin{gathered} 0.26 * * * \\ (9.251) \end{gathered}$ | $\begin{array}{r} 0.000 \\ (-0.018) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.061) \end{array}$ | 61.5\% | -0.1\% | 119 | 0.000 | 0.0\% | 100.0\% |
| WNG_HDZ | $\begin{array}{r} 0.026 * * * \\ (3.260) \end{array}$ | $\begin{array}{r} 0.000 \\ (-1.137) \end{array}$ | $\begin{array}{r} -0.059 \\ (-1.198) \end{array}$ | $\begin{array}{r} 0.263 * * * \\ (9.233) \end{array}$ | $\begin{array}{r} 0.007 \\ (0.130) \end{array}$ | $\begin{array}{r} -0.001 \\ (-0.063) \end{array}$ | 61.9\% | -0.1\% | 119 | 0.000 | 0.0\% | 100.0\% |

The average monthly regression coefficients of one year ahead realised Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+$ $\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The ICC figures are estimated based on Hou et al. (2012) mechanical earnings forecasts. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one. Expected return estimates are generated using firm-level ICC models as described in Table 1.

### 2.6 Testing ICC Estimates as a Statistical Quantity: Out-of-Sample Model Confidence Set

I start this statistical analysis by comparing the three loss functions - MEV, RMSE and MAE - described in section (2.3.4.2) between the ICC models using Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment. The summary results of the MEV loss function is presented in table (22). The model with the lowest average time series MEV is the residual income formulation of Gebhardt et al. (2001) (GLS). Note that a negative mean MEV indicates that the ICC model has a lower measurement error variance than a trivial estimator (i.e. fixed constant). In the second place comes FGHJ which is also a residual income formulation. In fact, GLS, FGHJ, HL, BP, DKL, PE, MPEG, PEG, GM and FPM models all have a negative and significant mean MEV, which indicate that all of them outperform a trivial fixed constant estimate in the time series.

The Diebold-Mariano pair-wise p-values suggest that such superiority of the two residual income formulations (GLS and FGHJ) is statistically significant when compared to the rest of the models except the average ICC model DKL. It is also worth noting that three average ICC models (DKL, HL, and FPM) made it to the top of the list by virtue of small MEV. Therefore, the prediction ability of the estimates has improved in terms of measurement error variance by combining estimates from various models. In line with the previous section results, the BP also has a lower measurement error variance than a trivial estimator, and so does the PE model and its modified versions MPEG and PEG. These two latter models along with the GM estimate, work better than a fixed constant estimator. These three formulations are based on abnormal growth in earnings, which theoretically, should be better than residual income based models. The empirical results in terms of measurement error variance do not support this assertion since the GLS and FGHJ have less mean measurement error variance. The Naive reported a relatively high measurement error variance as compared to the BP which use the same formulation for the terminal value. It suggests that the dividends in BP reduce the time series measurement error variance. A similar observation is noted when comparing the BP to the TPDPS performance.

Secondly, I use the RMSE and MAE as a loss functions in comparing the ICC models.

As compared to MEV, both RMSE and MAE capture the bias as well as the measurement error variance. Table (23), and (24) present the RMSE and MEV results respectively. Interestingly, GLS and FGHJ did not remain at the top of the list by lowest mean RMSE and MAE which suggest that although they exhibit low measurement error variance, their mean total bias is relatively similar or higher than some models such as the PE and PEG. However, looking at the PEG Diebold and Mariano p-values in the RMSE table indicate that the PEG superiority is not significant. Average ICC models (DKL, FPM, and HL) remained as good performers. The BP, although fell down the list by the mean error, the p-values report that only the PE model (and to a lesser extent the GLS and FPM) are superior to it.

More formally, I use Hansen, Lunde, and Nason (2011) MCS methodology in order to compare all the models simultaneously rather than pair-wise comparisons. MCS can be understood as a confidence interval. In other words, using a 5\% significance level, an MCS would contain the best models with $95 \%$ confidence. The lower is the significance level the more are the models that are included in the confidence set just like the size of a confidence interval. Due to the fact that the analysis is carried out on firm-level, the tabulation of the results is huge, therefore, I report a summary in table (25) containing the percentages of firms for which a particular model is included in the confidence set for each of the loss functions.

The out-of-sample analysis using the non-parametric approach of Hansen, Lunde, and Nason (2011) identify a collection of models that outperform the rest of the models under a given loss function at a specific level of confidence. Firstly, using MEV as a loss function, the dividend discount model with a terminal value based on target price (BP) scored the highest percentage of inclusion among all other models, which is expected given the results in the section (2.5). Specifically, the BP is included for almost $55.9 \%$ of the firms in the sample in the model confidence set with a $95 \%$ confidence level. The low measurement error variance translates into better capturing of variation in future realised return as was documented in section (2.5). As compared to the BP, it is worth noting that the other dividend discount model with a terminal value based on an earnings perpetuity (GG) is included in the MCS for $50.87 \%$ of the firms. The Naive model that resembles the terminal value of BP

Table 22: Out-of-Sample MEV Statistics and Pair-wise Comparison


This table reports the ICC time-series MEV (Measurement Error Variance) statistics. The statistics are calculated on firm-level for several ICC models based on analyst forecast of earnings. The summary statistics for each model are estimated using the S\&P 1500 historical constituents. A full description of the ICC models used is presented in table

1. The table also reports the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of time series MEV based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.

Table 23: Out-of-Sample RMSE Statistics and Pair-wise Comparison


This table reports the ICC time-series RMSE (Root Mean Squared Error) statistics. The statistics are calculated on firm-level for several ICC models based on analyst forecast of earnings. The summary statistics for each model are estimated using the S\&P 1500 historical constituents. A full description of the ICC models used is presented in table 1 . The table also reports the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of RMSE based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.

Table 24: Out-of-Sample MAE Statistics and Pair-wise Comparison

|  | Diebold-Mariano P-values |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Mean | StD | Prec25 | Median | Prec75 | PE | GLS | PEG | FPM | DKL | FGHJ | HL | CT | GM | BP | MPEG | $\begin{aligned} & \text { OHE } \\ & \text { 10Ind } \end{aligned}$ | $\begin{aligned} & \hline \text { ETSS } \\ & \text { 10Ind } \end{aligned}$ | KMY | $\begin{aligned} & \hline \text { OHE } \\ & \text { 25SBM } \end{aligned}$ | $\begin{gathered} \hline \text { ETSS } \\ \text { I25SBM } \end{gathered}$ |  | Naive | $\overline{\text { TPDD }}$ | $\begin{aligned} & \hline \text { SES } \\ & \text { 10Ind } \end{aligned}$ | WNG |
| PE_Anlst | 0.255*** | 0.123 | 0.173 | 0.227 | 0.307 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| GLS_Anlst | 0.257*** | 0.129 | 0.171 | 0.227 | 0.310 | 0.000 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| PEG_Anlst | 0.257*** | 0.134 | 0.169 | 0.225 | 0.305 | 0.002 | 0.141 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| FPM_Anlst | 0.258*** | 0.127 | 0.171 | 0.229 | 0.310 | 0.001 | 0.280 | 0.036 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| DKL_Anlst | 0.258*** | 0.131 | 0.172 | 0.228 | 0.312 | 0.000 | 0.000 | 0.704 | 0.000 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| FGHJ_Anlst | 0.259*** | 0.130 | 0.171 | 0.229 | 0.311 | 0.000 | 0.000 | 0.611 | 0.001 | 0.602 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| HL_Anlst | 0.259*** | 0.132 | 0.171 | 0.229 | 0.311 | 0.000 | 0.000 | 0.782 | 0.000 | 0.000 | 0.052 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| CT_Anlst | 0.259*** | 0.129 | 0.173 | 0.228 | 0.314 | 0.000 | 0.061 | 0.753 | 0.007 | 0.966 | 0.812 | 0.304 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| GM_Anlst | 0.26*** | 0.134 | 0.171 | 0.229 | 0.314 | 0.000 | 0.000 | 0.040 | 0.000 | 0.000 | 0.000 | 0.000 | 0.009 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| BP_Anlst | 0.261*** | 0.122 | 0.178 | 0.231 | 0.310 | 0.000 | 0.847 | 0.249 | 0.749 | 0.177 | 0.235 | 0.065 | 0.148 | 0.003 |  |  |  |  |  |  |  |  |  |  |  |  |
| MPEG_Anlst | 0.261*** | 0.135 | 0.170 | 0.230 | 0.313 | 0.000 | 0.000 | 0.001 | 0.000 | 0.000 | 0.000 | 0.000 | 0.001 | 0.000 | 0.001 |  |  |  |  |  |  |  |  |  |  |  |
| TrOHE_10Ind | 0.264*** | 0.124 | 0.179 | 0.234 | 0.316 | 0.000 | 0.031 | 0.417 | 0.005 | 0.213 | 0.160 | 0.438 | 0.195 | 0.703 | 0.016 | 0.340 |  |  |  |  |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.269*** | 0.126 | 0.180 | 0.239 | 0.330 | 0.000 | 0.000 | 0.002 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.027 | 0.000 | 0.145 | 0.003 |  |  |  |  |  |  |  |  |  |
| KMY_Anlst | 0.281*** | 0.142 | 0.185 | 0.245 | 0.342 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |  |  |  |  |  |  |  |  |
| TrOHE_25SBM | 0.289*** | 0.131 | 0.202 | 0.259 | 0.335 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.393 |  |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.294*** | 0.136 | 0.207 | 0.262 | 0.343 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.001 | 0.005 |  |  |  |  |  |  |
| GG_Anlst | 0.331*** | 0.158 | 0.221 | 0.294 | 0.407 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |  |  |  |  |  |
| Naive_PT/P-1 | 0.34*** | 0.271 | 0.190 | 0.262 | 0.386 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |  |  |  |  |
| TPDPS_Anlst | 0.345*** | 0.276 | 0.187 | 0.264 | 0.394 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |  |  |  |
| TrES_Anlst_10Ind | 0.514*** | 0.430 | 0.290 | 0.376 | 0.536 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |  |  |
| WNG_Anlst | 0.878*** | 2.444 | 0.192 | 0.271 | 0.448 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |  |
| TrES_Anlst_25SBM | 1.059*** | 0.972 | 0.452 | 0.807 | 1.269 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |

This table reports the ICC time-series MAE (Mean Absolute Error) statistics. The statistics are calculated on firm-level for several ICC models based on analyst forecast of earnings. The summary statistics for each model are estimated using the $\mathrm{S} \& \mathrm{P} 1500$ historical constituents. A full description of the ICC models used is presented in table 1 . The table also reports the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of MAE based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.
is in the MCS of only $19.7 \%$ of the firms. This confirms the note that the dividends in these models provide better time series measurement error variances for the estimates. In section (2.5), the Naive model worked better in capturing the variation in subsequent realised return. The two observations could be reconciled by appreciating that the MCS results presented here are based on time series measurement error variance, but capturing subsequent realised return using Fama and MacBeth (1973) setting is a function of both the time series and the cross section. Moreover, as demonstrated by Lee et al. (2017), it is possible that a noisy expected return estimate would exhibit a regression statistical slope equivalent to one because the estimated coefficient does not, in fact, speak to the magnitude of the measurement error variance. Therefore, it is safe to conclude that the dividends stream reduces the measurement error variances of the estimates. In terms of ranking, the BP is followed by PE, GG, PEG, CT, KMY, FPM, GLS, GM, MPEG and FGHJ. Just like in the univariate analysis, models based on residual income (GLS) and average ICC models (FPM, KMY) have done well.

Secondly, using the RMSE and MAE as loss functions in the MCS, just like in the univariate Diebold-Mariano analysis, the PE, GLS, and BP scored the best percentages of inclusions in the confidence set. The PE modified version MPEG also reported relatively high percentages followed by the OHE portfolio-level model transformation, which does not require earnings forecasts.

Table 25: Model Confidence Set Summary Results - Analysts Earnings Forecasts

| MEV |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_Anlst | $55.19 \%$ | GLS_Anlst | $57.43 \%$ | PE_Anlst | $59.62 \%$ |
| PE_Anlst | $54.98 \%$ | PE_Anlst | $53.89 \%$ | GLS_Anlst | $58.77 \%$ |
| GG_Anlst | $50.87 \%$ | BP_Anlst | $50.92 \%$ | BP_Anlst | $55.59 \%$ |
| PEG_Anlst | $50.87 \%$ | MPEG_Anlst | $49.22 \%$ | MPEG_Anlst | $50.71 \%$ |
| CT_Anlst | $50.22 \%$ | TrOHE_10Ind | $46.96 \%$ | TrOHE_10Ind | $50.42 \%$ |
| KMY_Anlst | $48.38 \%$ | FGHJ_Anlst | $46.46 \%$ | FGHJ_Anlst | $47.67 \%$ |
| FPM_Anlst | $47.84 \%$ | HL_Anlst | $45.83 \%$ | TrETSS_Anlst_10Ind | $47.24 \%$ |
| GLS_Anlst | $47.19 \%$ | DKL_Anlst | $44.20 \%$ | HL_Anlst | $46.96 \%$ |
| GM_Anlst | $46.32 \%$ | GM_Anlst | $43.92 \%$ | PEG_Anlst | $46.53 \%$ |
| MPEG_Anlst | $46.32 \%$ | TrETSS_Anlst_10Ind | $43.07 \%$ | DKL_Anlst | $46.32 \%$ |
| FGHJ_Anlst | $45.24 \%$ | PEG_Anlst | $42.72 \%$ | CT_Anlst | $45.76 \%$ |
| TrOHE_10Ind | $43.72 \%$ | CT_Anlst | $42.64 \%$ | GM_Anlst | $45.69 \%$ |
| DKL_Anlst | $43.29 \%$ | KMY_Anlst | $41.51 \%$ | KMY_Anlst | $43.35 \%$ |
| HL_Anlst | $42.53 \%$ | FPM_Anlst | $38.83 \%$ | FPM_Anlst | $42.57 \%$ |
| TrETSS_Anlst_10Ind | $40.04 \%$ | WNG_Anlst | $35.86 \%$ | TrOHE_25SBM | $38.40 \%$ |
| WNG_Anlst | $36.90 \%$ | Naive_PT/P-1 | $33.59 \%$ | Naive_PT/P-1 | $38.33 \%$ |
| Naive_PT/P-1 | $19.70 \%$ | TPDPS_Anlst | $33.10 \%$ | TPDPS_Anlst | $37.55 \%$ |
| TrOHE_25SBM | $18.83 \%$ | TrOHE_25SBM | $32.67 \%$ | WNG_Anlst | $34.37 \%$ |
| TPDPS_Anlst | $17.42 \%$ | GG_Anlst | $25.39 \%$ | TrETSSS_Anlst_25SBM | $29.07 \%$ |
| TrETSS_Anlst_25SBM | $15.26 \%$ | TrETSS_Anlst_25SBM | $25.18 \%$ | GG_Anlst | $27.30 \%$ |
| TrES_Anlst_10Ind | $9.20 \%$ | TrES_Anlst_10Ind | $10.47 \%$ | TrES_Anlst_10Ind | $11.67 \%$ |
| TrES_Anlst_25SBM | $2.71 \%$ | TrES_Anlst_25SBM | $4.81 \%$ | TrES_Anlst_25SBM | $5.45 \%$ |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

### 2.6.1 Mechanical Earnings Forecasts for ICC Estimation

As noted earlier, considerable literature evolved around the idea of estimating ICC models using cross-sectional mechanical forecasts of earnings instead of analysts forecasts. These mechanical models arguably help to deal with analysts forecasts biases. Mechanical models impute earnings forecasts from historical fundamentals. Therefore, I test the performance of the various ICC models estimated using mechanical earnings forecasts as described in section (2.3.3) using the Model Confidence Set with MEV, RMSE, and MAE as the loss functions.

Table (26) report the MEV pair-wise comparison between each analysts-based ICC model and its versions using the various mechanical forecasts. The table reports the difference between the mean time-series MEV, and the Diebold and Mariano (1995) p-values. Almost no model reported an improvement (i.e. lower) MEV using RW, EP or RI earnings forecasts (two exceptions are TrES_25SBM using RW forecasts and KMY using EP forecasts, however, the MEV is still very large). Using HDZ forecasts, 8 models recoded better MEVs as compared to analysts versions: GLS, FGHJ, CT, BP, TPDPS, GG, DKL, and KMY). However, the TPDPS and BP differences are not statistically significant, which could be explained by the fact that the terminal value has not changed between the versions. The models that recorded lower MEV are either residual income models (GLS, FGHJ, CT), dividend discount models (BP, TPDPS, GG), and average models (DKL, KMY). No abnormal growth in earnings benefited from using mechanical forecasts of earnings in terms of MEV.

In terms the RMSE and MAE as depicted in tables (27 and 28), three models had lower bias using HDZ forecasts (two dividends models BP and GG, and an average model KMY that contain GG estimate). The BP difference is insignificant again. RW forecasts helped two models reduce the bias (GG and TrES_25SBM). The EP and RI earnings forecasts improved the bias of GG only to report significantly lower RMSE and MAE. The only common model witnessing lower bias using mechanical estimates is the dividend discount model GG. These results are in line with the discussion in section(2.5.1). Using mechanical forecasts for dividends make the fundamentals more certain since it deals with the observations where
firms pay dividends that are not in line with the firm capacity or that the ownership structure affects the dividends. The BP does not benefit as much because most of its performance is driven by the terminal value that does not change between versions.

To address the big question of whether analysts based ICC estimates are preferable to mechanical estimates more robustly, I perform the MCS out-of-sample test on each ICC model separately using analysts forecasts as well as the four mechanical models. Table (29) reports the percentage of firms for which the particular ICC model is included in the Model Confidence Set against versions of the same model using different earnings forecasts. To start, I note that in line with the previous discussion, the dividend discount models work better with mechanical estimates. The GG, for instance, scored the lowest inclusion percentages using analysts forecasts using RMSE and MAE loss functions, and lower than the HDZ version in terms of MEV loss function. The BP also reported similar results although to a lesser extent since its terminal value does not change between the versions as discussed earlier. As for the other models, the analysts' forecasts versions almost always scored better percentage of inclusions in the MCS. The exception is the PE, PEG and KMY models. For the PE, for instance, the HDZ version had better prediction ability using the full bias (RMSE, MAE) as loss functions (But not using the measurement error variance where the analysts' version remained better). PEG_HDZ scored the highest percentage of inclusion in MCS using MEV as a loss function. KMY, which is affected by the GG being one of its constituents, worked better with HDZ and EP earnings forecasts.

Table 26: Out-of-Sample Pair-wise Comparison of MEV between ICC based on Ana-
lysts Forecasts and Mechanical Forecasts

|  | HDZ | RW | EP | RI |
| :---: | :---: | :---: | :---: | :---: |
| GLS_Anlst | 0.001 | -0.061 | -0.011 | -0.013 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| FGHJ_Anlst | 0.001 | -0.024 | -0.013 | -0.015 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| CT_Anlst | 0.002 | -0.016 | -0.017 | -0.071 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| BP_Anlst | 0.000 | -0.018 | -0.007 | -0.007 |
|  | (0.656) | (0.000) | (0.000) | (0.000) |
| TPDPS_Anlst | 0.004 | -0.579 | -1.320 | -1.295 |
|  | (0.405) | (0.000) | (0.000) | (0.000) |
| GG_Anlst | 0.006 | -0.006 | -0.001 | -0.003 |
|  | (0.000) | (0.000) | (0.000) | (0.079) |
| PE_Anlst | -0.002 | -0.200 | -0.029 | -0.032 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| MPEG_Anlst | -0.007 | -0.062 | -0.023 | -0.031 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| PEG_Anlst | -0.005 | -0.028 | -0.005 | -0.013 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| GM_Anlst | -0.004 | -0.037 | -0.009 | -0.013 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| HL_Anlst | -0.001 | -0.029 | -0.009 | -0.018 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| DKL_Anlst | 0.000 | -0.026 | -0.006 | -0.016 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| KMY_Anlst | 0.002 | -0.022 | 0.004 | -0.005 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| FPM_Anlst | -0.004 | -6.778 | -2.662 | -5.083 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| WNG_Anlst | -1.286 | -3.479 | -9.886 | -6.118 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrETSS_Anlst _10Ind | -0.009 | -11.321 | -11.328 | -11.063 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrETSS_Anlst_25SBM | -0.048 | -21.260 | -31.212 | -26.571 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrES_Anlst_10Ind | -1.952 | -0.659 | -7.212 | -6.129 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrES_Anlst_25SBM | -94.140 | 2.095 | -25.282 | -21.304 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |

This table report for each ICC model the difference between the mean MEV based on analyst forecasts and mechanical forecasts (HDZ, RW, EP, RI). MEV is the measurement error variance. A full description of the ICC models used is presented in table 1. The mechanical forecasts models are detailed in section 2.3.3. The table also reports in parenthesis below each difference, the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of MEV based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.

Table 27: Out-of-Sample Pair-wise Comparison of RMSE between ICC based on Ana-
lysts Forecasts and Mechanical Forecasts

|  | HDZ | RW | EP | RI |
| :---: | :---: | :---: | :---: | :---: |
| GLS_Anlst | -0.005 | -0.108 | -0.073 | -0.063 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| FGHJ_Anlst | -0.007 | -0.055 | -0.076 | -0.066 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| CT_Anlst | -0.007 | -0.045 | -0.056 | -0.133 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| BP_Anlst | 0.001 | -0.028 | -0.008 | -0.008 |
|  | (0.332) | (0.000) | (0.000) | (0.000) |
| TPDPS_Anlst | -0.005 | -0.325 | -0.357 | -0.302 |
|  | (0.025) | (0.000) | (0.000) | (0.000) |
| GG_Anlst | 0.075 | 0.053 | 0.059 | 0.058 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| PE_Anlst | -0.003 | -0.310 | -0.091 | -0.077 |
|  | (0.002) | (0.000) | (0.000) | (0.000) |
| MPEG_Anlst | -0.029 | -0.176 | -0.168 | -0.171 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| PEG_Anlst | -0.039 | -0.238 | -0.184 | -0.180 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| GM_Anlst | -0.017 | -0.119 | -0.104 | -0.104 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| HL_Anlst | -0.013 | -0.085 | -0.079 | -0.091 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| DKL_Anlst | -0.009 | -0.075 | -0.060 | -0.076 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| KMY_Anlst | 0.015 | -0.048 | -0.002 | -0.015 |
|  | (0.000) | (0.000) | (0.874) | (0.000) |
| FPM_Anlst | -0.013 | -4.219 | -64.713 | -82.823 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| WNG_Anlst | -27.382 | -7.355 | -1.101 | -18.239 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrETSS_Anlst _10Ind | -0.022 | -2.553 | -2.572 | -2.470 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrETSS_Anlst_25SBM | -0.089 | -3.357 | -4.009 | -3.422 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrES_Anlst _10Ind | -0.744 | -0.284 | -1.237 | -1.256 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrES_Anlst_25SBM | -3.756 | 0.114 | -3.343 | -3.104 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |

This table report for each ICC model the difference between the mean RMSE based on analyst forecasts and mechanical forecasts (HDZ, RW, EP, RI). RMSE is the root mean squared error. A full description of the ICC models used is presented in table 1. The mechanical forecasts models are detailed in section 2.3.3. The table also reports in parenthesis below each difference, the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of MEV based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.

Table 28: Out-of-Sample Pair-wise Comparison of MAE between ICC based on Analysts Forecasts and Mechanical Forecasts

|  | HDZ | RW | EP | RI |
| :---: | :---: | :---: | :---: | :---: |
| GLS_Anlst | -0.005 | -0.079 | -0.065 | -0.055 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| FGHJ_Anlst | -0.007 | -0.046 | -0.067 | -0.057 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| CT_Anlst | -0.007 | -0.037 | -0.047 | -0.105 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| BP_Anlst | 0.001 | -0.022 | -0.005 | -0.006 |
|  | (0.38) | (0.000) | (0.000) | (0.000) |
| TPDPS_Anlst | -0.004 | -0.189 | -0.175 | -0.142 |
|  | (0.041) | (0.000) | (0.000) | (0.000) |
| GG_Anlst | 0.071 | 0.056 | 0.059 | 0.058 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| PE_Anlst | -0.002 | -0.247 | -0.082 | -0.069 |
|  | (0.034) | (0.000) | (0.000) | (0.000) |
| MPEG_Anlst | -0.025 | -0.149 | -0.150 | -0.153 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| PEG_Anlst | -0.037 | -0.222 | -0.177 | -0.172 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| GM_Anlst | -0.014 | -0.102 | -0.093 | -0.094 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| HL_Anlst | -0.012 | -0.074 | -0.071 | -0.080 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| DKL_Anlst | -0.008 | -0.065 | -0.055 | -0.066 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| KMY_Anlst | 0.015 | -0.038 | -0.002 | -0.013 |
|  | (0.000) | (0.000) | (0.703) | (0.000) |
| FPM_Anlst | -0.010 | -1.295 | -13.861 | -15.001 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| WNG_Anlst | -2.832 | -6.002 | -6.031 | -5.286 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrETSS_Anlst _10Ind | -0.018 | -1.256 | -1.260 | -1.192 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrETSS_Anlst_25SBM | -0.067 | -1.723 | -2.087 | -1.776 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |
| TrES_Anlst _10Ind | -0.493 | -0.092 | -0.800 | -0.871 |
|  | (0.000) | (0.002) | (0.000) | (0.000) |
| TrES_Anlst_25SBM | -1.727 | 0.070 | -2.177 | -1.969 |
|  | (0.000) | (0.000) | (0.000) | (0.000) |

This table report for each ICC model the difference between the mean MAE based on analyst forecasts and mechanical forecasts (HDZ, RW, EP, RI). MAE is the mean absolute error. A full description of the ICC models used is presented in table 1. The mechanical forecasts models are detailed in section 2.3.3. The table also reports in parenthesis below each difference, the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of MEV based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.

Table 29: Model Confidence Set Summary Results - Mechanical vs Analysts forecasts

| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| CT_Anlst | 87.61\% | CT_Anlst | 73.90\% | CT_Anlst | 75.95\% |
| CT_HDZ | 80.74\% | CT_HDZ | 71.78\% | CT_HDZ | 75.18\% |
| CT_RW | 58.90\% | CT_EP | 50.50\% | CT_EP | 52.26\% |
| CT_EP | 58.00\% | CT_RW | 50.35\% | CT_RW | 50.78\% |
| CT_RI | 38.96\% | CT_RI | 30.62\% | CT_RI | 33.73\% |
| MEV |  | RMSE |  | MAE |  |
| GLS_Anlst | 84.59\% | GLS_Anlst | 72.07\% | GLS_Anlst | 73.97\% |
| GLS_HDZ | 80.76\% | GLS_HDZ | 70.58\% | GLS_HDZ | 73.06\% |
| GLS_EP | 67.72\% | GLS_RI | 42.57\% | GLS_RI | 46.53\% |
| GLS_RI | 67.38\% | GLS_EP | 40.38\% | GLS_EP | 43.49\% |
| GLS_RW | 43.53\% | GLS_RW | 31.33\% | GLS_RW | 33.17\% |
| MEV |  | RMSE |  | MAE |  |
| GM_Anlst | 83.83\% | GM_Anlst | 80.69\% | GM_Anlst | 82.11\% |
| GM_HDZ | 82.73\% | GM_HDZ | 66.05\% | GM_HDZ | 68.32\% |
| GM_EP | 68.63\% | GM_EP | 36.00\% | GM_EP | 39.11\% |
| GM_RW | 56.72\% | GM_RI | 34.94\% | GM_RI | 37.69\% |
| GM_RI | 49.18\% | GM_RW | 29.14\% | GM_RW | 29.63\% |
| MEV |  | RMSE |  | MAE |  |
| MPEG_Anlst | 85.02\% | MPEG_Anlst | 84.51\% | MPEG_Anlst | 85.50\% |
| MPEG_HDZ | 84.24\% | MPEG_HDZ | 61.17\% | MPEG_HDZ | 64.50\% |
| MPEG_EP | 63.37\% | MPEG_EP | 27.79\% | MPEG_EP | 30.27\% |
| MPEG_RW | 50.61\% | MPEG_RI | 26.45\% | MPEG_RI | 29.42\% |
| MPEG_RI | 44.84\% | MPEG_RW | 25.11\% | MPEG_RW | 27.30\% |
| MEV |  | RMSE |  | MAE |  |
| GG_HDZ | 82.94\% | GG_HDZ | 79.49\% | GG_HDZ | 81.68\% |
| GG_Anlst | 76.45\% | GG_EP | 66.76\% | GG_EP | 68.10\% |
| GG_RW | 65.76\% | GG_RI | 63.79\% | GG_RI | 65.98\% |
| GG_RI | 60.30\% | GG_RW | 63.15\% | GG_RW | 64.78\% |
| GG_EP | 53.24\% | GG_Anlst | 37.13\% | GG_Anlst | 38.40\% |
| MEV |  | RMSE |  | MAE |  |
| FGHJ_Anlst | 84.75\% | FGHJ_Anlst | 72.14\% | FGHJ_Anlst | 74.19\% |
| FGHJ_HDZ | 78.90\% | FGHJ_HDZ | 70.37\% | FGHJ_HDZ | 72.77\% |
| FGHJ_EP | 66.86\% | FGHJ_RW | 42.01\% | FGHJ_RI | 46.04\% |
| FGHJ_RI | 65.71\% | FGHJ_RI | 41.44\% | FGHJ_RW | 44.06\% |
| FGHJ_RW | 46.56\% | FGHJ_EP | 40.66\% | FGHJ_EP | 43.21\% |
| MEV |  | RMSE |  | MAE |  |
| PEG_HDZ | 81.72\% | PEG_Anlst | 81.90\% | PEG_Anlst | 82.67\% |
| PEG_Anlst | 76.98\% | PEG_HDZ | 64.29\% | PEG_HDZ | 65.98\% |
| PEG_EP | 54.31\% | PEG_EP | 35.86\% | PEG_EP | 40.03\% |
| PEG_RI | 23.73\% | PEG_RI | 34.30\% | PEG_RI | 36.85\% |
| PEG_RW | 19.68\% | PEG_RW | 24.26\% | PEG_RW | 27.44\% |
| MEV |  | RMSE |  | MAE |  |
| TPDPS_Anlst | 84.70\% | TPDPS_Anlst | 65.84\% | TPDPS_Anlst | 66.48\% |
| TPDPS_HDZ | 83.90\% | TPDPS_HDZ | 59.41\% | TPDPS_HDZ | 59.55\% |
| TPDPS_RI | 74.30\% | TPDPS_RI | 44.06\% | TPDPS_RI | 44.91\% |
| TPDPS_EP | 67.40\% | TPDPS_RW | 40.74\% | TPDPS_EP | 40.17\% |
| TPDPS_RW | 63.80\% | TPDPS_EP | 40.24\% | TPDPS_RW | 39.25\% |
| MEV |  | RMSE |  | MAE |  |
| PE_Anlst | 88.27\% | PE_HDZ | 73.62\% | PE_HDZ | 75.46\% |
| PE_HDZ | 81.83\% | PE_Anlst | 70.30\% | PE_Anlst | 72.42\% |
| PE_RI | 71.03\% | PE_RI | 43.07\% | PE_RI | 46.96\% |
| PE_EP | 69.16\% | PE_EP | 36.78\% | PE_EP | 40.74\% |
| PE_RW | 50.57\% | PE_RW | 12.09\% | PE_RW | 14.00\% |

Continued in next page...

On a different question, how does the ICC models do against each other given a particular mechanical forecasts of earnings. Tables (30),(31),(32) and (33) report the out-of-sample MCS results using HDZ, RW, EP, and RI forecasts respectively. These tables should be viewed in conjunction with table (25) to compare the relative ranking of the ICC models. Several observations could be noted. First, dividend discount models BP and GG performed very well using mechanical forecasts (especially RI and RW) regardless of the loss function deployed. The relatively high MEV of the GG made its percentage of inclusion lower in some cases, especially using EP forecasts. Secondly, except when using RW forecasts, the PE and GLS also reported a relatively high percentage of inclusions.

As compared to the results based on analysts forecasts, the mechanical forecasts did not consistently improve the percentage of inclusions in the MCS in terms of bias or measurement error variance for any particular model except the BP. Specifically, RI forecasts increased the percentages of inclusions across all loss functions for BP, GG, and TPDPS. GLS, FGHJ, and PE only improved the percentages related to measurement error variance. The EP forecasts only benefited BP across all loss functions. GG and KMY reported higher percentages of inclusions only in terms of biases (RMSE and MAE). GLS, FGHJ and TPDPS measurement error variance percentages were better than reported using analysts forecasts but not using RMSE and MAE as loss functions. The RW forecasts are different since it deals mostly with the bias but not with the measurement error variance. Except for the BP, no model had better percentages of inclusion in MCS using RW as compared to analysts forecasts. In fact, the drop in the percentages is extremely noticeable. For instance, the GLS lost $26 \%$ of the firms for which it was included in the MCS using analysts forecasts, despite the fact that it benefited from other mechanical models using MEV as a loss function. Finally, HDZ forecasts benefited more models than any of the other mechanical forecasts. In terms of measurement error variance related percentages of inclusion in MCS, the BP, FGHJ, FPM, GG, GLS, GM, HL, MPEG, PEG, TPDPS, and the transformed ES using 25 Size-B/M portfolios reported higher percentages than those reported using analysts forecasts. The BP, CT, FGHJ, GG, KMY, PE, TPDPS, and TrES_HDZ_25SBM reported higher percentages using RMSE and MAE as loss functions.

Table 29: Model Confidence Set Summary Results - Mechanical vs Analysts forecasts

| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| HL_Anlst | 85.42\% | HL_Anlst | 79.70\% | HL_Anlst | 80.91\% |
| HL_HDZ | 82.51\% | HL_HDZ | 69.09\% | HL_HDZ | 71.43\% |
| HL_EP | 69.76\% | HL_EP | 42.29\% | HL_EP | 45.47\% |
| HL_RI | 48.06\% | HL_RI | 36.42\% | HL_RI | 39.32\% |
| HL_RW | 47.41\% | HL_RW | 29.63\% | HL_RW | 33.03\% |
| MEV |  | RMSE |  | MAE |  |
| DKL_Anlst | 87.18\% | DKL_Anlst | 76.38\% | DKL_Anlst | 78.78\% |
| DKL_HDZ | 82.44\% | DKL_HDZ | 71.57\% | DKL_HDZ | 73.83\% |
| DKL_EP | 69.61\% | DKL_EP | 45.19\% | DKL_EP | 49.29\% |
| DKL_RI | 52.26\% | DKL_RI | 38.40\% | DKL_RI | 42.79\% |
| DKL_RW | 48.92\% | DKL_RW | 31.97\% | DKL_RW | 35.22\% |
| MEV |  | RMSE |  | MAE |  |
| BP_Anlst | 79.45\% | BP_EP | 71.00\% | BP_EP | 71.85\% |
| BP_RW | 77.16\% | BP_HDZ | 56.72\% | BP_HDZ | 59.83\% |
| BP_HDZ | 76.61\% | BP_RI | 52.62\% | BP_RI | 57.21\% |
| BP_RI | 71.69\% | BP_Anlst | 51.13\% | BP_Anlst | 56.36\% |
| BP_EP | 69.95\% | BP_RW | 38.40\% | BP_RW | 40.66\% |
| MEV |  | RMSE |  | MAE |  |
| KMY_HDZ | 80.69\% | KMY_HDZ | 80.48\% | KMY_HDZ | 82.53\% |
| KMY_Anlst | 79.50\% | KMY_EP | 61.81\% | KMY_EP | 63.30\% |
| KMY_EP | 67.75\% | KMY_Anlst | 56.51\% | KMY_Anlst | 59.34\% |
| KMY_RI | 54.80\% | KMY_RI | 50.07\% | KMY_RI | 53.96\% |
| KMY_RW | 53.40\% | KMY_RW | 34.09\% | KMY_RW | 39.11\% |
| MEV |  | RMSE |  | MAE |  |
| FPM_Anlst | 92.09\% | FPM_Anlst | 88.12\% | FPM_Anlst | 88.40\% |
| FPM_HDZ | 85.86\% | FPM_HDZ | 77.44\% | FPM_HDZ | 77.65\% |
| FPM_RI | 62.91\% | FPM_RI | 54.03\% | FPM_RI | 41.02\% |
| FPM_EP | 61.52\% | FPM_EP | 52.90\% | FPM_RW | 39.32\% |
| FPM_RW | 60.04\% | FPM_RW | 52.12\% | FPM_EP | 37.13\% |
| MEV |  | RMSE |  | MAE |  |
| TrES_Anlst_25SBM | 75.45\% | TrES_Anlst_25SBM | 81.47\% | TrES_Anlst_25SBM | 79.84\% |
| TrES_RW_25SBM | 65.45\% | TrES_RW_25SBM | 71.57\% | TrES_RW_25SBM | 71.92\% |
| TrES_HDZ_25SBM | 57.27\% | TrES_HDZ_25SBM | 64.78\% | TrES_HDZ_25SBM | 63.86\% |
| TrES_RI_25SBM | 12.83\% | TrES_RI_25SBM | 24.33\% | TrES_RI_25SBM | 14.50\% |
| TrES_EP_25SBM | 10.30\% | TrES_EP_25SBM | 21.57\% | TrES_EP_25SBM | 14.29\% |
| MEV |  | RMSE |  | MAE |  |
| TrETSS_Anlst_25SBM | 94.40\% | TrETSS_Anlst_25SBM | 93.07\% | TrETSS_Anlst_25SBM | 92.79\% |
| TrETSS_HDZ_25SBM | 69.86\% | TrETSS_HDZ_25SBM | 73.20\% | TrETSS_HDZ_25SBM | 71.43\% |
| TrETSS_RI_25SBM | 47.15\% | TrETSS_RW_25SBM | 33.95\% | TrETSS_RI_25SBM | 21.57\% |
| TrETSS_RW_25SBM | 44.70\% | TrETSS_RI_25SBM | 32.67\% | TrETSS_RW_25SBM | 20.01\% |
| TrETSS_EP_25SBM | 43.99\% | TrETSS_EP_25SBM | 27.58\% | TrETSS_EP_25SBM | 14.14\% |
| MEV |  | RMSE |  | MAE |  |
| TrES_Anlst_10Ind | 93.46\% | TrES_Anlst_10Ind | 89.60\% | TrES_Anlst_10Ind | 87.20\% |
| TrES_RW_10Ind | 52.62\% | TrES_RW_10Ind | 63.44\% | TrES_RW_10Ind | 66.83\% |
| TrES_HDZ_10Ind | 28.07\% | TrES_HDZ_10Ind | 29.84\% | TrES_HDZ_10Ind | 29.21\% |
| TrES_EP_10Ind | 20.82\% | TrES_EP_10Ind | 26.38\% | TrES_EP_10Ind | 23.90\% |
| TrES_RI_10Ind | 19.32\% | TrES_RI_10Ind | 17.47\% | TrES_RI_10Ind | 11.03\% |
| MEV |  | RMSE |  | MAE |  |
| TrETSS_Anlst_10Ind | 94.12\% | TrETSS_Anlst_10Ind | 86.21\% | TrETSS_Anlst_10Ind | 86.56\% |
| TrETSS_HDZ_10Ind | 81.11\% | TrETSS_HDZ_10Ind | 70.16\% | TrETSS_HDZ_10Ind | 70.65\% |
| TrETSS_RW_10Ind | 61.61\% | TrETSS_EP_10Ind | 27.37\% | TrETSS_RI_10Ind | 20.08\% |
| TrETSS_EP_10Ind | 60.06\% | TrETSS_RI_10Ind | 26.94\% | TrETSS_EP_10Ind | 18.32\% |
| TrETSS_RI_10Ind | 56.55\% | TrETSS_RW_10Ind | 25.74\% | TrETSS_RW_10Ind | 17.61\% |
| MEV |  | RMSE |  | MAE |  |
| WNG_Anlst | 86.13\% | WNG_Anlst | 84.09\% | WNG_Anlst | 84.51\% |
| WNG_HDZ | 83.22\% | WNG_HDZ | 60.18\% | WNG_HDZ | 61.24\% |
| WNG_EP | 55.34\% | WNG_EP | 33.88\% | WNG_EP | 27.23\% |
| WNG_RI | 54.23\% | WNG_RI | 31.12\% | WNG_RW | 21.92\% |
| WNG_RW | 49.24\% | WNG_RW | 28.93\% | WNG_RI | 21.57\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

Table 30: Model Confidence Set Summary Results - HDZ Earnings Forecasts

| MEV |  | RMSE |  |  | MAE |
| :--- | ---: | :--- | ---: | :--- | ---: |
| PEG_HDZ | $57.14 \%$ | PE_HDZ | $57.92 \%$ | PE_HDZ | $62.94 \%$ |
| GM_HDZ | $56.66 \%$ | BP_HDZ | $54.88 \%$ | BP_HDZ | $59.76 \%$ |
| BP_HDZ | $56.66 \%$ | GLS_HDZ | $54.67 \%$ | GLS_HDZ | $55.87 \%$ |
| MPEG_HDZ | $54.50 \%$ | GG_HDZ | $51.41 \%$ | GG_HDZ | $54.81 \%$ |
| PE_HDZ | $54.38 \%$ | FGHJ_HDZ | $47.81 \%$ | FGHJ_HDZ | $49.29 \%$ |
| GG_HDZ | $51.14 \%$ | CT_HDZ | $45.97 \%$ | CT_HDZ | $48.09 \%$ |
| FPM_HDZ | $49.10 \%$ | DKL_HDZ | $42.50 \%$ | KMY_HDZ | $44.34 \%$ |
| GLS_HDZ | $48.02 \%$ | KMY_HDZ | $41.80 \%$ | DKL_HDZ | $43.85 \%$ |
| FGHJ_HDZ | $46.82 \%$ | HL_HDZ | $39.75 \%$ | TrETSS_HDZ_10Ind | $42.15 \%$ |
| HL_HDZ | $45.14 \%$ | TrETSS_HDZ_10Ind | $38.19 \%$ | HL_HDZ | $41.94 \%$ |
| KMY_HDZ | $45.14 \%$ | MPEG_HDZ | $38.12 \%$ | MPEG_HDZ | $41.02 \%$ |
| CT_HDZ | $43.70 \%$ | TPDPS_HDZ | $36.28 \%$ | TPDPS_HDZ | $40.66 \%$ |
| DKL_HDZ | $41.54 \%$ | GM_HDZ | $35.71 \%$ | GM_HDZ | $38.83 \%$ |
| WNG_HDZ | $32.53 \%$ | FPM_HDZ | $35.29 \%$ | FPM_HDZ | $37.69 \%$ |
| TrETSS_HDZ_10Ind | $31.33 \%$ | PEG_HDZ | $32.81 \%$ | PEG_HDZ | $35.86 \%$ |
| TPDPS_HDZ | $19.45 \%$ | WNG_HDZ | $23.13 \%$ | TrETSS_HDZ_25SBM | $25.32 \%$ |
| TrETSS_HDZ_25SBM | $14.41 \%$ | TrETSS_HDZ_25SBM | $21.29 \%$ | WNG_HDZ | $25.25 \%$ |
| TrES_HDZ_25SBM | $2.76 \%$ | TrES_HDZ_25SBM | $7.85 \%$ | TrES_HDZ_25SBM | $7.36 \%$ |
| TrES_HDZ_10Ind | $2.04 \%$ | TrES_HDZ_10Ind | $5.16 \%$ | TrES_HDZ_10Ind | $4.95 \%$ |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

Table 31: Model Confidence Set Summary Results - RW Earnings Forecasts

| MEV |  | RMSE |  |  | MAE |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_RW | $75.38 \%$ | BP_RW | $69.38 \%$ | GG_RW | $72.14 \%$ |
| GG_RW | $48.40 \%$ | GG_RW | $69.02 \%$ | BP_RW | $70.72 \%$ |
| KMY_RW | $48.06 \%$ | CT_RW | $54.88 \%$ | CT_RW | $55.80 \%$ |
| GM_RW | $32.88 \%$ | FGHJ_RW | $46.75 \%$ | FGHJ_RW | $49.08 \%$ |
| CT_RW | $29.01 \%$ | KMY_RW | $43.42 \%$ | KMY_RW | $44.55 \%$ |
| FGHJ_RW | $28.33 \%$ | DKL_RW | $37.91 \%$ | GLS_RW | $38.76 \%$ |
| HL_RW | $27.66 \%$ | GLS_RW | $36.56 \%$ | DKL_RW | $37.69 \%$ |
| DKL_RW | $26.14 \%$ | HL_RW | $31.05 \%$ | GM_RW | $32.25 \%$ |
| GLS_RW | $20.57 \%$ | GM_RW | $30.98 \%$ | HL_RW | $30.98 \%$ |
| MPEG_RW | $20.07 \%$ | TPDPS_RW | $24.26 \%$ | TPDPS_RW | $26.73 \%$ |
| PE_RW | $13.49 \%$ | MPEG_RW | $21.71 \%$ | PEG_RW | $23.06 \%$ |
| TPDPS_RW | $13.49 \%$ | PEG_RW | $21.07 \%$ | MPEG_RW | $22.98 \%$ |
| PEG_RW | $12.65 \%$ | TrES_RW_10Ind | $16.55 \%$ | TrES_RW_10Ind | $18.53 \%$ |
| WNG_RW | $3.88 \%$ | PE_RW | $14.29 \%$ | PE_RW | $14.29 \%$ |
| TrETSS_RW_10Ind | $3.71 \%$ | TrETSS_RW_10Ind | $12.52 \%$ | TrETSS_RW_10Ind | $12.52 \%$ |
| TrES_RW_10Ind | $3.20 \%$ | TrETSS_RW_25SBM | $8.70 \%$ | TrETSS_RW_25SBM | $7.64 \%$ |
| TrETSS_RW_25SBM | $2.87 \%$ | TrES_RW_25SBM | $6.58 \%$ | TrES_RW_25SBM | $7.00 \%$ |
| FPM_RW | $1.52 \%$ | WNG_RW | $5.73 \%$ | FPM_RW | $5.37 \%$ |
| TrES_RW_25SBM | $0.67 \%$ | FPM_RW | $5.45 \%$ | WNG_RW | $3.54 \%$ |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

Table 32: Model Confidence Set Summary Results - EP Earnings Forecasts

| MEV |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | :--- |
| BP_EP | $72.45 \%$ | BP_EP | $66.05 \%$ | BP_EP | $69.24 \%$ |
| PE_EP | $54.57 \%$ | GG_EP | $57.00 \%$ | GG_EP | $58.91 \%$ |
| FGHJ_EP | $49.14 \%$ | KMY_EP | $51.27 \%$ | KMY_EP | $53.47 \%$ |
| GLS_EP | $48.48 \%$ | CT_EP | $42.57 \%$ | CT_EP | $45.05 \%$ |
| GM_EP | $46.89 \%$ | PE_EP | $38.68 \%$ | PE_EP | $42.29 \%$ |
| DKL_EP | $42.12 \%$ | GLS_EP | $35.43 \%$ | GLS_EP | $37.62 \%$ |
| HL_EP | $41.32 \%$ | DKL_EP | $33.52 \%$ | DKL_EP | $36.49 \%$ |
| KMY_EP | $41.06 \%$ | FGHJ_EP | $29.77 \%$ | TPDPS_EP | $33.10 \%$ |
| MPEG_EP | $39.07 \%$ | TPDPS_EP | $29.00 \%$ | FGHJ_EP | $32.89 \%$ |
| PEG_EP | $33.51 \%$ | HL_EP | $23.41 \%$ | GM_EP | $28.15 \%$ |
| GG_EP | $31.13 \%$ | GM_EP | $23.27 \%$ | HL_EP | $26.80 \%$ |
| CT_EP | $28.21 \%$ | PEG_EP | $20.30 \%$ | PEG_EP | $24.89 \%$ |
| TPDPS_EP | $20.40 \%$ | MPEG_EP | $15.42 \%$ | MPEG_EP | $17.40 \%$ |
| TrETSS_EP_10Ind | $11.13 \%$ | TrETSS_EP_10Ind | $8.49 \%$ | TETSS_EP_10Ind | $9.12 \%$ |
| FPM_EP | $7.42 \%$ | TrES_EP_10Ind | $4.38 \%$ | TES_EP_10Ind | $5.23 \%$ |
| TrETS_EP_25SBM | $6.49 \%$ | FPM_EP | $3.96 \%$ | FPM_EP | $4.31 \%$ |
| WNG_EP | $1.99 \%$ | TrETSS_EP_25SBM | $3.54 \%$ | TrETSS_EP_25SBM | $3.96 \%$ |
| TrES_EP_10Ind | $1.85 \%$ | WNG_EP | $2.26 \%$ | WNGG_PP | $2.26 \%$ |
| TrES_EP_25SBM | $0.66 \%$ | TrES_EP_25SBM | $1.27 \%$ | TrES_EP_25SBM | $0.92 \%$ |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

Table 33: Model Confidence Set Summary Results - RI Earnings Forecasts

| MEV |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | :--- |
| BP_RI | $76.70 \%$ | BP_RI | $69.73 \%$ | BP_RI | $71.43 \%$ |
| PE_RI | $57.12 \%$ | GG_RI | $57.92 \%$ | GG_RI | $60.11 \%$ |
| GG_RI | $53.53 \%$ | PE_RI | $44.77 \%$ | KMY_RI | $47.10 \%$ |
| FGHJ_RI | $49.00 \%$ | KMY_RI | $44.70 \%$ | PE_RI | $45.69 \%$ |
| GLS_RI | $48.87 \%$ | GLS_RI | $40.31 \%$ | GLS_RI | $44.20 \%$ |
| KMY_RI | $38.88 \%$ | TPDPS_RI | $36.49 \%$ | TPDPS_RI | $39.18 \%$ |
| GM_RI | $29.16 \%$ | FGHJ_RI | $35.57 \%$ | FGHJ_RI | $38.83 \%$ |
| DKL_RI | $24.10 \%$ | DKL_RI | $28.71 \%$ | DKL_RI | $30.69 \%$ |
| TPDPS_RI | $21.97 \%$ | GM_RI | $24.96 \%$ | GM_RI | $27.51 \%$ |
| MPEG_RI | $19.84 \%$ | CT_RI | $24.33 \%$ | CT_RI | $26.80 \%$ |
| HL_RI | $19.84 \%$ | HL_RI | $22.98 \%$ | HL_RI | $25.67 \%$ |
| PEG_RI | $14.65 \%$ | PEG_RI | $22.07 \%$ | PEG_RI | $25.11 \%$ |
| CT_RI | $11.19 \%$ | MPEG_RI | $16.27 \%$ | MPEG_RI | $18.10 \%$ |
| TrETSS_RI_10Ind | $6.52 \%$ | TrETSS_RI_10Ind | $10.04 \%$ | TrETSS_RI_10Ind | $12.09 \%$ |
| FPM_RI | $3.60 \%$ | FPM_RI | $7.64 \%$ | FPM_RI | $8.42 \%$ |
| TrETSS_RI_25SBM | $2.66 \%$ | TrETSS_RI_25SBM | $6.36 \%$ | TrETSS_RI_25SBM | $7.28 \%$ |
| WNG_RI | $1.73 \%$ | WNG_RI | $2.90 \%$ | WNG_RI | $2.76 \%$ |
| TrES_RI_10Ind | $1.07 \%$ | TrES_RI_10Ind | $2.62 \%$ | TES_RI_10Ind | $2.33 \%$ |
| TrES_RI_25SBM | $0.40 \%$ | TrES_RI_25SBM | $1.49 \%$ | TrES_RI_25SBM | $0.64 \%$ |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

### 2.6.2 Calibrating ICC Estimates Using Risk Factors

I test ICC estimates using MCS after subjecting the ICC estimates to Fitzgerald et al. (2013) estimation error correction by using the fitted values from regressing the expected return estimates from a particular ICC model on common risk factors. I perform the calibration in the cross-section every month to ensure that the fitted values are independent of the relationship between the expected return and the risk factors, and between realised returns and the risk factors in every other period. I use the same risk factor used by Fitzgerald et al. (2013): Leverage, Size, book-to-market ratio, earning variability as predicted by the standard deviation in analysts EPS forecasts, market beta, the beta standard error, target-tomarket price ratio, 12 months momentum factor, book value per share, and the firm longterm growth rate. I restrict the analysis here to the models that yield firm-level estimates without transformations, since the transformations themselves use firm-level risk characteristics factors.

To address the question of whether ICC estimates should be calibrated, I perform the MCS out-of-sample test on each ICC model separately using analysts and mechanical forecasts as well as calibrated versions of these estimates. Table (34) reports the percentage of firms for which the particular ICC model is included in the Model Confidence Set against versions of the same model using different earnings forecasts and calibrated versions. A general observation is that in most of the models, versions using analysts forecasts (calibrated or not calibrated) have better percentages of inclusions in the respective model's confidence sets than versions using mechanical forecasts in all three loss functions settings. Among the exceptions is the better performance of dividend discount models using mechanical models, which is in line with previous testing results. The GG for instance (as well as the KMY which have the GG as one of its constituents) work best in both calibrated and no-calibrated settings using HDZ forecasts, and the BP exhibit better biases with the EP forecasts. The TPDPS does not benefit as much as the GG and BP from the mechanical estimates due to the fact that only 1 period dividend forecast is used. Some models like the CT and PEG benefit from the mechanical versions either in terms of bias or measurement error variance.

Specifically addressing the calibration benefit, the evidence suggests that most of the
model's versions work better with calibration. Considering the analysts' based models for instance, all calibrated versions ranked better than non-calibrated versions either based on measurement error variance or bias except the Naive and TPDPS. The latter two models share are almost entirely dependent on target price.

Table 34: Model Confidence Set Summary Results - Calibrated Estimates

| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| CT_Anlst_Clbrtd | 73.60\% | CT_HDZ | 63.79\% | CT_HDZ | 65.35\% |
| CT_HDZ_Clbrtd | 71.86\% | CT_HDZ_Clbrtd | 63.30\% | CT_Anlst_Clbrtd | 64.78\% |
| CT_Anlst | 71.40\% | CT_Anlst_Clbrtd | 62.94\% | CT_HDZ_Clbrtd | 64.29\% |
| CT_HDZ | 63.26\% | CT_Anlst | 62.59\% | CT_Anlst | 62.87\% |
| CT_EP_Clbrtd | 54.42\% | CT_EP | 43.78\% | CT_EP | 44.20\% |
| CT_RI_Clbrtd | 48.37\% | CT_RW | 42.43\% | CT_RW | 43.49\% |
| CT_RW | 41.98\% | CT_EP_Clbrtd | 41.02\% | CT_EP_Clbrtd | 40.66\% |
| CT_EP | 41.51\% | CT_RI_Clbrtd | 30.91\% | CT_RI_Clbrtd | 29.77\% |
| CT_RI | 28.72\% | CT_RI | 26.80\% | CT_RI | 28.08\% |
| CT_RW_Clbrtd | 24.77\% | CT_RW_Clbrtd | 24.05\% | CT_RW_Clbrtd | 21.71\% |
| MEV |  | RMSE |  | MAE |  |
| GLS_Anlst_Clbrtd | 73.58\% | GLS_HDZ | 65.06\% | GLS_Anlst | 68.39\% |
| GLS_Anlst | 69.48\% | GLS_Anlst | 64.07\% | GLS_HDZ | 68.18\% |
| GLS_HDZ | 66.40\% | GLS_Anlst_Clbrtd | 62.59\% | GLS_Anlst _Clbrtd | 64.64\% |
| GLS_HDZ_Clbrtd | 64.58\% | GLS_HDZ_Clbrtd | 53.47\% | GLS_HDZ_Clbrtd | 54.81\% |
| GLS_EP | 52.96\% | GLS_RI | 38.90\% | GLS_RI | 42.64\% |
| GLS_RI | 50.91\% | GLS_EP | 36.85\% | GLS_EP | 39.46\% |
| GLS_EP_Clbrtd | 49.54\% | GLS_RI_Clbrtd | 30.34\% | GLS_RI_Clbrtd | 32.04\% |
| GLS_RI_Clbrtd | 48.41\% | GLS_RW | 28.15\% | GLS_EP_Clbrtd | 31.54\% |
| GLS_RW_Clbrtd | 43.74\% | GLS_EP_Clbrtd | 28.08\% | GLS_RW | 29.77\% |
| GLS_RW | 26.88\% | GLS_RW_Clbrtd | 23.62\% | GLS_RW_Clbrtd | 23.06\% |
| MEV |  | RMSE |  | MAE |  |
| GM_Anlst_Clbrtd | 70.68\% | GM_Anlst_Clbrtd | 71.07\% | GM_Anlst_Clbrtd | 73.20\% |
| GM_Anlst | 70.57\% | GM_Anlst | 68.39\% | GM_Anlst | 70.30\% |
| GM_HDZ | 69.58\% | GM_HDZ_Clbrtd | 59.12\% | GM_HDZ_Clbrtd | 62.66\% |
| GM_HDZ_Clbrtd | 61.38\% | GM_HDZ | 56.58\% | GM_HDZ | 61.03\% |
| GM_EP_Clbrtd | 57.11\% | GM_EP | 30.34\% | GM_EP | 34.65\% |
| GM_EP | 50.11\% | GM_RI | 29.21\% | GM_RI | 32.81\% |
| GM_RW | 41.25\% | GM_RW | 23.41\% | GM_RW | 25.67\% |
| GM_RI_Clbrtd | 38.07\% | GM_EP_Clbrtd | 20.93\% | GM_RI_Clbrtd | 25.04\% |
| GM_RI | 34.35\% | GM_RI_Clbrtd | 17.82\% | GM_EP_Clbrtd | 23.69\% |
| GM_RW_Clbrtd | 22.32\% | GM_RW_Clbrtd | 12.52\% | GM_RW_Clbrtd | 13.51\% |
| MEV |  | RMSE |  | MAE |  |
| MPEG_Anlst_Clbrtd | 71.03\% | MPEG_Anlst_Clbrtd | 74.19\% | MPEG_Anlst_Clbrtd | 76.10\% |
| MPEG_HDZ | 69.37\% | MPEG_Anlst | 69.52\% | MPEG_Anlst | 71.92\% |
| MPEG_Anlst | 68.37\% | MPEG_HDZ_Clbrtd | 54.95\% | MPEG_HDZ_Clbrtd | 59.05\% |
| MPEG_HDZ_Clbrtd | 64.93\% | MPEG_HDZ | 52.40\% | MPEG_HDZ | 54.88\% |
| MPEG_EP_Clbrtd | 56.60\% | MPEG_RI | 22.35\% | MPEG_EP | 24.33\% |
| MPEG_EP | 47.17\% | MPEG_EP | 20.79\% | MPEG_RI | 24.05\% |
| MPEG_RW | 37.29\% | MPEG_RW | 18.81\% | MPEG_RW | 21.57\% |
| MPEG_RI_Clbrtd | 32.63\% | MPEG_RI_Clbrtd | 14.21\% | MPEG_RI_Clbrtd | 17.68\% |
| MPEG_RI | 30.08\% | MPEG_EP_Clbrtd | 13.51\% | MPEG_EP_Clbrtd | 15.56\% |
| MPEG_RW_Clbrtd | 14.43\% | MPEG_RW_Clbrtd | 9.62\% | MPEG_RW_Clbrtd | 11.32\% |
| MEV |  | RMSE |  | MAE |  |
| GG_HDZ_Clbrtd | 74.02\% | GG_HDZ | 69.52\% | GG_HDZ | 73.06\% |
| GG_HDZ | 69.49\% | GG_HDZ_Clbrtd | 67.11\% | GG_HDZ_Clbrtd | 70.51\% |
| GG_Anlst_Clbrtd | 68.77\% | GG_EP_Clbrtd | 60.11\% | GG_EP_Clbrtd | 64.29\% |
| GG_Anlst | 64.12\% | GG_EP | 59.83\% | GG_EP | 63.22\% |
| GG_RW | 51.01\% | GG_RI | 57.71\% | GG_RI | 59.90\% |
| GG_RI | 47.08\% | GG_RW | 56.93\% | GG_RW | 59.05\% |
| GG_RI_Clbrtd | 43.27\% | GG_RI_Clbrtd | 51.34\% | GG_RI_Clbrtd | 56.08\% |
| GG_EP | 37.78\% | GG_RW_Clbrtd | 41.23\% | GG_RW_Clbrtd | 45.19\% |
| GG_EP_Clbrtd | 34.33\% | GG_Anlst | 32.18\% | GG_Anlst | 32.53\% |
| GG_RW_Clbrtd | 22.41\% | GG_Anlst _Clbrtd | 29.99\% | GG_Anlst_Clbrtd | 30.76\% |

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Table 34: Model Confidence Set Summary Results - Calibrated Estimates

| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_Anlst_Clbrtd | 69.99\% | FGHJ_HDZ | 64.78\% | FGHJ_Anlst | 67.40\% |
| FGHJ_Anlst | 66.71\% | FGHJ_Anlst | 63.58\% | FGHJ_HDZ | 66.83\% |
| FGHJ_HDZ_Clbrtd | 65.61\% | FGHJ_Anlst_Clbrtd | 61.53\% | FGHJ_Anlst_Clbrtd | 63.72\% |
| FGHJ_HDZ | 63.55\% | FGHJ_HDZ_Clbrtd | 51.91\% | FGHJ_HDZ_Clbrtd | 54.10\% |
| FGHJ_EP_Clbrtd | 58.08\% | FGHJ_RW_Clbrtd | 43.78\% | FGHJ_RW_Clbrtd | 47.31\% |
| FGHJ_RI_Clbrtd | 54.07\% | FGHJ_RI | 36.85\% | FGHJ_RI | 41.65\% |
| FGHJ_EP | 50.43\% | FGHJ_EP | 36.42\% | FGHJ_RW | 39.60\% |
| FGHJ_RI | 48.60\% | FGHJ_RW | 35.79\% | FGHJ_EP | 39.18\% |
| FGHJ_RW_Clbrtd | 34.02\% | FGHJ_EP_Clbrtd | 28.15\% | FGHJ_EP_Clbrtd | 32.11\% |
| FGHJ_RW | 31.23\% | FGHJ_RI_Clbrtd | 25.81\% | FGHJ_RI_Clbrtd | 30.13\% |
| MEV |  | RMSE |  | MAE |  |
| PEG_HDZ_Clbrtd | 67.20\% | PEG_Anlst_Clbrtd | 73.27\% | PEG_Anlst_Clbrtd | 75.46\% |
| PEG_HDZ | 59.08\% | PEG_Anlst | 67.75\% | PEG_Anlst | 69.80\% |
| PEG_Anlst _Clbrtd | 54.32\% | PEG_HDZ_Clbrtd | 56.08\% | PEG_HDZ_Clbrtd | 59.34\% |
| PEG_Anlst | 51.85\% | PEG_HDZ | 53.68\% | PEG_HDZ | 56.86\% |
| PEG_EP_Clbrtd | 39.33\% | PEG_EP | 30.20\% | PEG_EP | 34.37\% |
| PEG_EP | 32.80\% | PEG_RI | 28.29\% | PEG_EP_Clbrtd | 32.11\% |
| PEG_RI | 13.05\% | PEG_EP_Clbrtd | 27.44\% | PEG_RI | 31.54\% |
| PEG_RI_Clbrtd | 12.52\% | PEG_RI_Clbrtd | 25.81\% | PEG_RI_Clbrtd | 30.76\% |
| PEG_RW_Clbrtd | 11.82\% | PEG_RW | 18.53\% | PEG_RW | 22.42\% |
| PEG_RW | 9.17\% | PEG_RW_Clbrtd | 17.04\% | PEG_RW_Clbrtd | 19.66\% |
| MEV |  | RMSE |  | MAE |  |
| PE_Anlst | 70.17\% | PE_HDZ | 63.08\% | PE_HDZ | 67.11\% |
| PE_Anlst_Clbrtd | 70.17\% | PE_Anlst_Clbrtd | 61.24\% | PE_Anlst _Clbrtd | 64.78\% |
| PE_HDZ_Clbrtd | 66.74\% | PE_HDZ_Clbrtd | 61.24\% | PE_Anlst | 63.30\% |
| PE_HDZ | 63.93\% | PE_Anlst | 58.63\% | PE_HDZ_Clbrtd | 61.53\% |
| PE_EP_Clbrtd | 63.51\% | PE_RI | 38.47\% | PE_RI | 42.36\% |
| PE_RI_Clbrtd | 63.20\% | PE_EP | 31.47\% | PE_EP | 34.65\% |
| PE_RI | 55.51\% | PE_RI_Clbrtd | 31.05\% | PE_RI_Clbrtd | 33.59\% |
| PE_EP | 53.85\% | PE_EP_Clbrtd | 28.43\% | PE_EP_Clbrtd | 31.19\% |
| PE_RW_Clbrtd | 33.37\% | PE_RW | 8.91\% | PE_RW | 10.96\% |
| PE_RW | 31.39\% | PE_RW_Clbrtd | 7.00\% | PE_RW_Clbrtd | 8.49\% |
| MEV |  | RMSE |  | MAE |  |
| Naive | 94.04\% | Naive | 95.12\% | Naive | 95.05\% |
| r_Clbrtd | 76.07\% | r_Clbrtd | 92.07\% | r_Clbrtd | 92.21\% |
| MEV |  | RMSE |  | MAE |  |
| TPDPS_Anlst | 79.66\% | TPDPS_Anlst | 62.09\% | TPDPS_Anlst | 63.04\% |
| TPDPS_HDZ | 79.16\% | TPDPS_HDZ | 59.31\% | TPDPS_HDZ | 60.41\% |
| TPDPS_RI | 66.93\% | TPDPS_Anlst_Clbrtd | 58.88\% | TPDPS_Anlst_Clbrtd | 59.24\% |
| TPDPS_Anlst_Clbrtd | 58.72\% | TPDPS_HDZ_Clbrtd | 53.25\% | TPDPS_HDZ_Clbrtd | 53.83\% |
| TPDPS_HDZ_Clbrtd | 58.62\% | TPDPS_RI | 42.07\% | TPDPS_RI | 42.29\% |
| TPDPS_EP | 58.42\% | TPDPS_EP | 39.15\% | TPDPS_EP | 38.57\% |
| TPDPS_RW | 53.01\% | TPDPS_RW | 37.03\% | TPDPS_RW | 34.26\% |
| TPDPS_RI_Clbrtd | 42.89\% | TPDPS_RW_Clbrtd | 31.12\% | TPDPS_RI_Clbrtd | 29.36\% |
| TPDPS_RW_Clbrtd | 35.77\% | TPDPS_RI_Clbrtd | 29.95\% | TPDPS_RW_Clbrtd | 27.39\% |
| TPDPS_EP_Clbrtd | 35.17\% | TPDPS_EP_Clbrtd | 25.35\% | TPDPS_EP_Clbrtd | 22.79\% |
| MEV |  | RMSE |  | MAE |  |
| HL_Anlst _Clbrtd | 72.19\% | HL_Anlst _Clbrtd | 70.16\% | HL_Anlst_Clbrtd | 73.55\% |
| HL_Anlst | 69.25\% | HL_Anlst | 67.04\% | HL_Anlst | 70.44\% |
| HL_HDZ | 66.41\% | HL_HDZ | 61.67\% | HL_HDZ | 64.07\% |
| HL_HDZ_Clbrtd | 62.92\% | HL_HDZ_Clbrtd | 56.15\% | HL_HDZ_Clbrtd | 59.34\% |
| HL_EP_Clbrtd | 59.43\% | HL_EP | 36.85\% | HL_EP | 39.25\% |
| HL_EP | 54.31\% | HL_RI | 30.91\% | HL_RI | 34.30\% |
| HL_RW_Clbrtd | 45.26\% | HL_RI_Clbrtd | 27.44\% | HL_RI_Clbrtd | 29.99\% |
| HL_RI_Clbrtd | 35.66\% | HL_EP_Clbrtd | 26.73\% | HL_EP_Clbrtd | 29.14\% |
| HL_RI | 33.91\% | HL_RW_Clbrtd | 25.32\% | HL_RW | 28.22\% |
| HL_RW | 32.72\% | HL_RW | 24.68\% | HL_RW_Clbrtd | 27.16\% |

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Table 34: Model Confidence Set Summary Results - Calibrated Estimates

| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_Anlst_Clbrtd | 74.16\% | DKL_Anlst_Clbrtd | 66.62\% | DKL_Anlst _Clbrtd | 70.30\% |
| DKL_Anlst | 71.55\% | DKL_Anlst | 65.35\% | DKL_Anlst | 68.74\% |
| DKL_HDZ | 66.78\% | DKL_HDZ | 64.29\% | DKL_HDZ | 67.40\% |
| DKL_HDZ_Clbrtd | 65.15\% | DKL_HDZ_Clbrtd | 56.79\% | DKL_HDZ_Clbrtd | 60.54\% |
| DKL_EP_Clbrtd | 60.15\% | DKL_EP | 40.03\% | DKL_EP | 43.71\% |
| DKL_EP | 53.85\% | DKL_RI | 34.02\% | DKL_RI | 37.69\% |
| DKL_RW_Clbrtd | 45.82\% | DKL_EP_Clbrtd | 32.11\% | DKL_EP_Clbrtd | 34.30\% |
| DKL_RI_Clbrtd | 44.30\% | DKL_RI_Clbrtd | 31.05\% | DKL_RI_Clbrtd | 33.52\% |
| DKL_RI | 37.46\% | DKL_RW | 28.01\% | DKL_RW | 29.49\% |
| DKL_RW | 33.12\% | DKL_RW_Clbrtd | 26.24\% | DKL_RW_Clbrtd | 27.51\% |
| MEV |  | RMSE |  | MAE |  |
| BP_Anlst_Clbrtd | 63.96\% | BP_EP | 65.35\% | BP_EP | 67.19\% |
| BP_RW_Clbrtd | 61.87\% | BP_EP_Clbrtd | 58.20\% | BP_EP_Clbrtd | 60.33\% |
| BP_RI_Clbrtd | 60.33\% | BP_HDZ | 52.83\% | BP_Anlst _Clbrtd | 55.94\% |
| BP_HDZ_Clbrtd | 59.89\% | BP_Anlst _Clbrtd | 51.34\% | BP_HDZ | 55.45\% |
| BP_EP_Clbrtd | 59.45\% | BP_RI_Clbrtd | 51.20\% | BP_RI | 54.95\% |
| BP_RW | 55.16\% | BP_RI | 50.99\% | BP_RI_Clbrtd | 52.40\% |
| BP_Anlst | 53.41\% | BP_Anlst | 48.30\% | BP_Anlst | 51.91\% |
| BP_RI | 51.87\% | BP_HDZ_Clbrtd | 46.68\% | BP_HDZ_Clbrtd | 51.20\% |
| BP_HDZ | 51.65\% | BP_RW_Clbrtd | 38.61\% | BP_RW_Clbrtd | 40.24\% |
| BP_EP | 51.32\% | BP_RW | 33.73\% | BP_RW | 35.43\% |
| MEV |  | RMSE |  | MAE |  |
| KMY_Anlst_Clbrtd | 67.51\% | KMY_HDZ | 70.08\% | KMY_HDZ | 72.77\% |
| KMY_HDZ | 66.41\% | KMY_HDZ_Clbrtd | 66.12\% | KMY_HDZ_Clbrtd | 70.37\% |
| KMY_Anlst | 66.08\% | KMY_EP | 54.46\% | KMY_EP | 57.00\% |
| KMY_HDZ_Clbrtd | 61.49\% | KMY_Anlst_Clbrtd | 52.62\% | KMY_Anlst_Clbrtd | 56.44\% |
| KMY_EP_Clbrtd | 57.99\% | KMY_Anlst | 46.04\% | KMY_Anlst | 48.87\% |
| KMY_EP | 49.12\% | KMY_RI | 43.71\% | KMY_RI | 46.96\% |
| KMY_RW_Clbrtd | 48.58\% | KMY_EP_Clbrtd | 41.87\% | KMY_EP_Clbrtd | 42.93\% |
| KMY_RI_Clbrtd | 40.48\% | KMY_RI_Clbrtd | 37.91\% | KMY_RI_Clbrtd | 40.45\% |
| KMY_RI | 40.37\% | KMY_RW | 29.21\% | KMY_RW | 32.53\% |
| KMY_RW | 37.75\% | KMY_RW_Clbrtd | 28.93\% | KMY_RW_Clbrtd | 31.26\% |
| MEV |  | RMSE |  | MAE |  |
| FPM_Anlst_Clbrtd | 81.80\% | FPM_Anlst | 79.00\% | FPM_Anlst | 78.57\% |
| FPM_Anlst | 79.10\% | FPM_Anlst _Clbrtd | 75.39\% | FPM_Anlst_Clbrtd | 75.11\% |
| FPM_HDZ_Clbrtd | 76.40\% | FPM_HDZ | 71.00\% | FPM_HDZ | 70.51\% |
| FPM_HDZ | 73.90\% | FPM_HDZ_Clbrtd | 64.92\% | FPM_HDZ_Clbrtd | 63.51\% |
| FPM_RI | 45.10\% | FPM_RI_Clbrtd | 48.51\% | FPM_RW | 34.16\% |
| FPM_RI_Clbrtd | 44.10\% | FPM_RI | 46.96\% | FPM_RI | 34.02\% |
| FPM_RW_Clbrtd | 43.80\% | FPM_EP | 46.25\% | FPM_RI_Clbrtd | 34.02\% |
| FPM_EP | 43.60\% | FPM_EP_Clbrtd | 45.90\% | FPM_EP | 31.26\% |
| FPM_RW | 43.40\% | FPM_RW_Clbrtd | 44.77\% | FPM_EP_Clbrtd | 30.69\% |
| FPM_EP_Clbrtd | 43.30\% | FPM_RW | 44.70\% | FPM_RW_Clbrtd | 29.77\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

### 2.6.3 The New Model:FCF

In this subsection, I test the new model that is based on free cash flow to the firm against the other models in terms of its percentage of firms for which it gets included in the model confidence set that is penalizing the models for bias (MAE and RMSE) and measurement error variance. As discussed in section (2.5.4) the rationale for formulating this model is to
replace the dividends which are prone to more uncertainties with a more stable and economically justifiable construct. Therefore, the focus here is the relative performance between the dividend based models and the FCF versions. Note that the period of the sample is shorter here as compared to previous MCS testing due to FCF data requirement as described in section (2.5.4).

First, when setting the loss function to MEV as in table (35), the BP and its most similar new formulation FCF_Anlst_TP have almost similar percentages of inclusions 35.08\% and $34.62 \%$ respectively against other models. However, FCF_Anlst_eps5 percentage of inclusion is superior equalling $37.59 \%$. Similarly, TPDPS and its most similar free cash flow version FCFF1y have similar percentages of inclusions $9.57 \%$ and $10.48 \%$ respectively. Similarly, the pair-wise Diebold Mariano comparison in table (36) panel A suggests that there is no statical difference between the MEV of BP and both FCF_Anlst_TP and FCF_Anlst_eps5.

Secondly, in terms of bias measured by out-of-sample RMSE and MAE in panels B and C of table (36), the BP bias is indistinguishable from FCF_Anlst_TP. In addition, FCF_Anlst_eps5 bias is indistinguishable from BP, but lower (i.e. better) than FCF_Anlst_TP. The MCS results with RMSE or MAE as loss functions in table (35) report a higher percentage of inclusions in the set for the BP.

Table 35: Model Confidence Set Summary Results - New Model Testing

| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_Anlst | 42.60\% | GLS_Anlst | 54.02\% | GLS_Anlst | 53.66\% |
| GG_Anlst | 40.32\% | PE_Anlst | 50.12\% | PE_Anlst | 50.12\% |
| PE_Anlst | 40.32\% | BP_Anlst | 47.20\% | BP_Anlst | 49.27\% |
| FCF_Anlst _eps5 | 37.59\% | FGHJ_Anlst | 46.71\% | FGHJ_Anlst | 47.20\% |
| FPM_Anlst | 35.54\% | MPEG_Anlst | 45.85\% | MPEG_Anlst | 46.71\% |
| BP_Anlst | 35.08\% | FCF_Anlst_TP | 44.88\% | FCF_Anlst_TP | 46.10\% |
| TrETSS_Anlst _10Ind | 35.08\% | HL_Anlst | 44.51\% | KMY_Anlst | 45.98\% |
| TrOHE_10Ind | 34.62\% | KMY_Anlst | 44.39\% | DKL_Anlst | 43.78\% |
| FCF_Anlst_TP | 34.62\% | DKL_Anlst | 43.17\% | HL_Anlst | 43.54\% |
| CT_Anlst | 34.40\% | CT_Anlst | 41.34\% | CT_Anlst | 43.29\% |
| MPEG_Anlst | 32.35\% | GM_Anlst | 41.10\% | FCF_Anlst _eps5 | 42.44\% |
| GM_Anlst | 32.12\% | FCF_Anlst _eps5 | 40.12\% | TrOHE_10Ind | 42.20\% |
| GLS_Anlst | 30.98\% | TrOHE_10Ind | 39.63\% | GM_Anlst | 41.71\% |
| KMY_Anlst | 30.98\% | PEG_Anlst | 39.27\% | PEG_Anlst | 41.34\% |
| FGHJ_Anlst | 29.38\% | FPM_Anlst | 38.90\% | TPDPS_Anlst | 40.00\% |
| WNG_Anlst | 29.38\% | TrETSS_Anlst _10Ind | 36.46\% | FPM_Anlst | 39.76\% |
| DKL_Anlst | 28.25\% | TPDPS_Anlst | 35.37\% | TrETSS_Anlst _10Ind | 38.41\% |
| HL_Anlst | 25.28\% | WNG_Anlst | 35.00\% | TrOHE_25SBM | 37.68\% |
| TrOHE_25SBM | 16.63\% | TrOHE_25SBM | 34.15\% | Naive | 36.95\% |
| TrETSS_Anlst _25SBM | 12.53\% | Naive | 33.66\% | WNG_Anlst | 33.41\% |
| Naive | 10.48\% | GG_Anlst | 33.29\% | GG_Anlst | 31.95\% |
| FCFF1y | 10.48\% | FCFF1y | 30.61\% | TrETSS_Anlst _25SBM | 31.22\% |
| TPDPS_Anlst | 9.57\% | TrETSS_Anlst_25SBM | 24.02\% | FCFF1y | 30.12\% |
| TrES_Anlst _10Ind | 7.52\% | TrES_Anlst _10Ind | 10.61\% | TrES_Anlst _10Ind | 11.83\% |
| TrES_Anlst_25SBM | 1.59\% | TrES_Anlst_25SBM | 8.66\% | TrES_Anlst_25SBM | 9.76\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE). The table reports the percentage of firms for which a specific model is included in the confidence set.

Table 36: Out-of-Sample MEV, RMSE, and MAE Statistics and Pair-wise Comparison

| Panel A: MEV | Mean | StD | Prec25 | Median | Prec75 | Diebold-Mariano P-values |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  | BP_Anlst | FCF_Anlst _TP | FCF_Anlst _eps5 | TPDPS_Anlst |
| BP_Anlst | -0.002 | 0.008 | -0.004 | -0.001 | 0.000 |  |  |  |  |
| FCF_Anlst_TP | -0.002 | 0.008 | -0.004 | -0.001 | 0.000 | 0.099 |  |  |  |
| FCF_Anlst _eps5 | -0.002 | 0.008 | -0.004 | -0.001 | 0.001 | 0.929 | 0.000 |  |  |
| TPDPS_Anlst | 0.025 | 0.103 | -0.007 | 0.001 | 0.020 | 0.000 | 0.000 | 0.000 |  |
| FCFF1y | 0.069 | 0.242 | -0.003 | 0.006 | 0.038 | 0.000 | 0.000 | 0.000 | 0.000 |
| Panel B: RMSE |  |  |  |  |  | Diebold-Mariano P-values |  |  |  |
|  | Mean | StD | Prec25 | Median | Prec75 | FCF_Anlst _eps5 | BP_Anlst | FCF_Anlst _TP | TPDPS_Anlst |
| FCF_Anlst _eps 5 | 0.101 | 0.167 | 0.000 | 0.000 | 0.200 |  |  |  |  |
| BP_Anlst | 0.101 | 0.167 | 0.000 | 0.000 | 0.200 | 0.462 |  |  |  |
| FCF_Anlst_TP | 0.102 | 0.168 | 0.000 | 0.000 | 0.203 | 0.000 | 0.178 |  |  |
| TPDPS_Anlst | 0.123 | 0.229 | 0.000 | 0.000 | 0.204 | 0.000 | 0.000 | 0.000 |  |
| FCFF1y | 0.143 | 0.273 | 0.000 | 0.000 | 0.220 | 0.000 | 0.000 | 0.000 | 0.000 |
| Panel C: MAE |  |  |  |  |  |  | Diebold-Mari | no P-values |  |
|  | Mean | StD | Prec25 | Median | Prec75 | FCF_Anlst _eps5 | BP_Anlst | FCF_Anlst _TP | TPDPS_Anlst |
| FCF_Anlst _eps 5 | 0.086 | 0.145 | 0.000 | 0.000 | 0.164 |  |  |  |  |
| BP_Anlst | 0.086 | 0.145 | 0.000 | 0.000 | 0.163 | 0.328 |  |  |  |
| FCF_Anlst_TP | 0.087 | 0.146 | 0.000 | 0.000 | 0.166 | 0.000 | 0.085 |  |  |
| TPDPS_Anlst | 0.104 | 0.198 | 0.000 | 0.000 | 0.166 | 0.000 | 0.000 | 0.000 |  |
| FCFF1y | 0.120 | 0.233 | 0.000 | 0.000 | 0.179 | 0.000 | 0.000 | 0.000 | 0.000 |

This table reports the ICC time-series MEV (Measurement Error Variance) statistics. The statistics are calculated on firm-level for several ICC models based on analyst forecast of earnings. The summary statistics for each model are estimated using the S\&P 1500 historical constituents. A full description of the ICC models used is presented in table 1. The table also reports the p-values based on Newey-West adjusted standard errors corresponding to the pair-wise comparisons of time series MEV based on Diebold and Mariano (1995) test statistic with Harvey, Leybourne, and Newbold (1997) adjustment.

### 2.7 Additional Analysis

In the previous sections, I subjected the ICC models to the realised Return Regression test, and the MCS test in general. In this section, I test the models' performance for subsamples by characteristics to investigate whether some models work better with particular firms. Specifically, I test for the effect of size, value, price momentum, leverage, market beta, beta standard error (as proxy for company specific risk), number of analysts covering the firm, earnings forecasts dispersion between analysts using earnings forecasts standard deviation and coefficient of variation, forecasted growth in earnings, analysts target price relative to current price, and past earnings variability. To do so, I split the sample each period based on these factors and test the highest and lowest quartiles separately for the ability to predict subsequent returns.

### 2.7.1 Size Effect

Firstly, tables (70) and (71) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the small (lowest quartile firms in terms of size each month) and large firms (highest quartile firms in terms of size each month) respectively.

Large firms results are comparable to the results presented in the main discussion, in that the Naive, TPDPS, BP and PE model are the best performers in terms of improvement provided to the forecasts of returns by adding the ICC estimate to the formulation. However, for small firms, the only model that had a statistically significant Fama-Macbeth coefficient from the list of all analysts and mechanical based models is the Naive model. In fact, it had the highest goodness of fit among all models (61.8\%) indicating how much of the variation in realised returns is captured by the model. It should be noted though that the tables (70) and (71) are sorted by the improvement in the goodness of fit over a benchmark model without the ICC variable, however, the models at the top of the small firms list have Fama-Macbeth coefficient indistinguishable from zero, and sometimes the wrong sign, except for the naive model.

Table (94) present the MCS results for the first and fourth quartiles of firms in terms of size. Panel A is comparable to table (25). The BP remained the best model in terms of the
percentage of firms for which the model is included in the confidence set when the MEV is used as a loss function for both small and large firms. Similarly, GLS and PE results were not affected by the size of the firms in the sample when the RMSE and MAE are used as loss functions in the MCS. More generally, the rankings by the percentages of inclusions were not affected by the size and remained similar to the main testing.

### 2.7.2 Value Effect

Tables (72) and (73) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the growth firms (lowest quartile firms in terms of the value calculated as book-to-market ratio each month) and value firms (highest quartile firms in terms of value each month) respectively. The results show that the value of the firm does not impact models performance to capture subsequent realised returns. TPDPS, Naive, BP , and PE remained the best models in mirroring the variation of subsequent returns.

Table (95) present the MCS results for the first and fourth quartiles of firms in terms of value. Again, the results are in line with testing the full sample, which indicates that the models' rankings are robust to the value effect. There is one very interesting change though, the only model that does not resort to earnings forecasts OHE showed relatively good percentages of inclusions in the model confidence set for growth firms especially when the loss function is set to capture the full bias (RMSE and MAE).

### 2.7.3 Momentum Effect

Tables (74) and (75) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the low momentum (lowest quartile firms in terms of momentum each month) and high momentum firms (highest quartile firms in terms of momentum each month), respectively. Table (96) present the MCS results for the first and fourth quartiles of firms in terms of momentum. Just like the value factor, the price momentum effect does not change the general rankings of the models in both tests.

### 2.7.4 Analysts Coverage Effect

Tables (78) and (79) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the firms with low number of analysts covering them (lowest quartile firms in terms of number of analysts each month) and firms with large number of analysts (highest quartile firms in terms of number of analysts each month), respectively. Contrary to expectations, more models lost their performance when firms have a larger number of analysts. For instance, BP, GG, FPM, GLS and PE had an ICC coefficient indistinguishable from zero when the sample is limited to the highest quartile firms in terms of the number of analysts. Other models like TPDPS and CT coefficients are only significant at $5 \%$. The Naive estimate still worked as in the main results. For firms with the lowest number of analysts, the ranking of the models is in line with the original results.

Table (98) present the MCS results for the first and fourth quartiles of firms in terms of the number of analysts covering the firm. The results are in line with testing the full sample. There is one very interesting change, in the case of low analysts coverage, ETSS_Anlst_Ind10 showed relatively good percentages of inclusions in the model confidence set for growth firms especially when the loss function is set to capture the full bias (RMSE and MAE).

### 2.7.5 Long-term Growth in Earnings Effect

Tables (76) and (77) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the firms with the lowest forecasted long term growth (lowest quartile each month) and highest forecasted long-term growth in earnings (highest quartile firms in terms of long-term growth in earnings each month), respectively. Generally, the performance of the models for firms with high forecasts of growth remained similar to the main results. The PE model performance deteriorated a bit when the sample was limited to high foretasted long-term growth firms relative to GG, CT and GLS, for instance. On the other hand, no ICC coefficient was distinguishable from zero statically when the sample is limited to the lowest quartile. Moreover, the percentage of months with statically significant ICC coefficients dropped noticeably for all models.

Table (97) present the MCS results for the first and fourth quartiles of firms in terms of
the forecasted rate of long-term growth in earnings. The results are in line with testing the full sample, but with lower percentages of inclusion.

### 2.7.6 Forecasts Dispersion Effect

Tables (80) and (81) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the firms with low dispersion between analysts forecasts (lowest quartile each month in terms of standard deviation) and firms with high dispersion between analysts forecasts (highest quartile firms in terms standard deviation in forecasts), respectively. The results for the firms with high earnings forecasts standard deviation are in line with the full sample results. The TPDPS, Naive, BP and PE are the best models in capturing subsequent returns. However, the sample with low standard deviation in forecasts rendered many of the models with an ICC coefficient that is indistinguishable from zero statistically. The BP has done well for this latter sub-sample but it is the exception. Many of the mechanical models also recorded insignificant coefficients.

Table (99) present the MCS results for the first and fourth quartiles of firms in terms of standard deviation in the earnings forecast. The results are in line with testing the full sample.

As a different measure of dispersion in forecasts to take into account relative variability, tables (82) and (83) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the firms with low dispersion between analysts forecasts (lowest quartile each month in terms of coefficient of variation) and firms with high dispersion between analysts forecasts (highest quartile firms in terms coefficient of variation in forecasts) respectively. The results using this measure of forecasts dispersion suggest that the dispersion does not affect the models' relative performance in capturing subsequent returns variation. Both high and low dispersion firms results are in line with the general conclusions of the full sample.

Table (100) present the MCS results for the first and fourth quartiles of firms in terms of the coefficient of variation in earnings forecasts. Except that OHE_Ind10 and WNG have recorded relatively high percentages of inclusions in MCS for both sub-samples using MEV
as a loss function, all other results are generally similar to the original results.

### 2.7.7 Leverage Effect

Tables (84) and (85) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the low leverage firms (lowest quartile firms in terms of leverage each month) and high leverage firms (highest quartile firms in terms of leverage each month), respectively. High leveraged firms render most of the models with insignificant ICC coefficients. The Naive estimate coefficient is only significant at $5 \%$. The percentage of months in which the coefficients of the models are positive and statistically significant almost halved as compared to the full-sample results. On the other hand, low leveraged firms results are in line with the full-sample results. The TPDPS, Naive, BP, and PE are the best performers.

Table (101)present the MCS results for the first and fourth quartiles of firms in terms of leverage. No major departure from the full-sample results or between the two extreme quartiles is recorded.

### 2.7.8 Over/Under-pricing effect Effect

Tables (86) and (87) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the over-priced firms (lowest quartile firms in terms of target price over market price ratio each month) and under-priced firms (highest quartile firms in terms of target price over market price ratio each month), respectively. Except for the PE_Anlst and BP_HDZ, no model generated a positive and significant ICC coefficient for the sub-sample constituting of the target to market price ratio. On the other hand, a high target to market ratio firms results are in line with the full-sample results. The TPDPS, Naive, BP, and the PE are the best performers as before. The FGHJ which use the target price instead of the price also performed exceptionally well in capturing the future returns.

Table (102) present the MCS results for the first and fourth quartiles of firms in terms of ratio of target price to market price. No major departure from the full-sample results or between the two extreme quartiles is recorded.

### 2.7.9 Market Beta Effect

Tables (88) and (89) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the low beta firms (lowest quartile firms in terms of market beta each month) and high beta firms (highest quartile firms in terms of market beta each month) respectively. Low beta firms render the ICC coefficients of all models insignificant. While high beta firms results are similar to the original results. The PEG model relative ranking is better for the high beta firms as compared to the full sample, even better than the PE.

Table (103) resent the MCS results for the first and fourth quartiles of firms in terms of market beta. No major departure from the full-sample results or between the two extreme quartiles is recorded.

### 2.7.10 Firm Specific Risk Effect

Tables (90) and (91) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the firms with low standard error in the beta estimate to indicate company specific risk or imprecision beta estimate (lowest quartile firms each month) and high beta standard error firms (highest quartile firms each month), respectively. Low beta standard error firms render the ICC coefficients of all models insignificant. While high standard error firms results are similar to the original results.

Table (104) present the MCS results for the first and fourth quartiles of firms in terms of the standard error in market beta. No major departure from the full-sample results or between the two extreme quartiles is recorded.

### 2.7.11 Variation in Earnings Effect

Tables (92) and (93) report the results of regressing one year ahead returns on the ICC estimates and other control variables for the firms with low variation in earnings (lowest quartile firms each month) and firms with high variation in earnings (highest quartile firms each month) respectively. No major departure from the full-sample results or between the two extreme quartiles is recorded.

Table (105) present the MCS results for the first and fourth quartiles of firms in terms of variation in a firm earnings.No major departure from the full-sample results or between the two extreme quartiles is recorded.

### 2.8 Conclusion

The expected return is a corner-stone concept in finance. Previous literature showed that expected return proxies based on ex-post data are noisy and unreliable (Elton (1999), and Fama and French (2002)). Much effort in the literature is devoted to developing exante measures by reverse engineering valuation models. The ICC models have been used extensively in prior research in variety on contexts, but with less evidence to show which of these models work better and in what context. The nearest prior literature came to that was the work of Easton and Monahan (2005), Botosan and Plumlee (2005), Guay et al. (2011), and Botosan et al. (2011). However, this research is limited in that it only takes into account limited number of models without recourse to all possible versions in terms of the source of earnings forecasts, or it depends on a methodology that is later criticised for inappropriateness, not to mention the dissimilar conclusions they arrive at.

This chapter address the question of the validity of the estimates extensively in terms of testing and exhaustively in terms of possible models. Firstly, it uses two methodologies to conduct the horse race. The first is the classical method used in prior research which treats the ICC estimates as an economic construct. However, in the application of this method I deal with the issues raised by the literature in picking the empirical variables (Easton and Monahan (2016), and Wang (2018)). I introduce a second method to the ICC literature from the forecasting research, namely Model Confidence Set, to test the ICC estimates validity and performance as statistical constructs. To do so, I use three loss functions to capture the estimate bias, and measurement error variance. The latter arguably is more important for the forecasting performance of the ICC construct (Lee et al. (2017)). Using the regression method, I find that the simplest models such as the dividend discount model of Botosan and Plumlee (2002) and model based on price-to-earnings ratio (PE) captures more variation in subsequent returns than any more sophisticated ICC or risk factor models. In fact,
simplifying the dividend model by limiting the forecasting horizon to one year only, or to discounting the terminal value of the same model without dividend forecasts, works at least as well as the original dividend model in terms of the variation they explain in subsequent returns. Moreover, contrary to the theoretical arguments that led to the development of ICC models based on abnormal growth in earnings framework (See Ohlson (2005) and Ohlson and Juettner-Nauroth (2005)), I find that ICC models based on residual income framework captures variation in subsequent returns better than the abnormal growth in earnings models. The pair-wise comparison of the bias (i.e. out-of-sample RMSE and MAE) confirm these results. In MCS testing, both of these models were included in the confidence sets for more firms than any other model. A similar result is obtained when the loss function in the MCS is set to be MEV.

Secondly, I extend the horse race to involve ICC models based on mechanical earnings forecasts instead of analysts earnings forecasts. Although some prior work attempted to test which of the mechanical models work better, no work has tested systemically each of the ICC models against itself using different sources of earnings forecasts. Each ICC model has been implemented using four mechanical earnings forecasts to test whether doing away with analysts 'biased' forecasts could improve the prediction of realised returns. Generally, I find evidence to the contrary, most ICC models have a higher power of explaining the variation in subsequent returns using analysts estimates. Moreover, no mechanical-based estimate could do better than Naive. However, among all types of ICC models, those based on dividend discount models benefit the most from mechanical forecasts. This is attributed to the fact that mechanical estimates of dividends tend to be more stable and in line with firms' fundamentals, while some firms in reality pay dividends that are not in-line with its capacity to pay due to reasons that include taxes or ownership structures. Among the four mechanical models used in the testing, I find that ICC models benefit the most from Hou, van Dijk, and Zhang (2012) (HDZ) forecasts and the least from a random walk forecasting process as presented by Gerakos and Gramacy (2013). In the pair-wise comparison of out-of-sample bias and measurement error variances, this conclusion is further demonstrated. For instance, except for the HDZ, the other three mechanical forecasting models resulted
in almost no improvement to any of ICC models in terms of measurement error variance as compared to analysts forecasts. Among the models that benefited from HDZ forecasts, none are based on abnormal growth in earnings framework. Moreover, the MCS results demonstrate that dividend discount models work better with mechanical estimates, while most of the other models work best with analysts forecasts.

I use Fitzgerald, Gray, Hall, and Jeyaraj (2013) methodology of calibrating their model estimates using common risk factors to reduce firm-level estimation errors to calibrate the full range of ICC models. The estimation error could be due to data noise, earnings forecast bias, or incompatibility of certain models with specific firms. The application of such calibration to a wide range of models, and testing the improvement it provides in capturing future returns in this setting is novel also. Analysts forecasts based ICC models benefited from the calibration more than the versions based on mechanical forecasts. This is due to the fact that many of the calibration factors are already used in the mechanical earnings forecast process. Also, the dividend discount models, especially BP, benefited more than any other ICC model from the process of calibration, which further demonstrates the desirability of dividends estimates that are in line with the fundamentals of the firm. Again, using MCS methodology confirms that calibrated analysts estimates perform better than all other versions of the respective ICC models except for dividend discount models. Dividend Discount models work best using mechanical estimates.

Moreover, I utilise Nekrasov and Ogneva (2011) methodology in which they extend the Easton, Taylor, Shroff, and Sougiannis (2002) portfolio-level model to generate firmlevel estimates using common risk and growth factors. I use the same principle to obtain firm-level estimates from portfolio-level models of Easton (2004) and O'Hanlon and Steele (2000) as operationalised by Easton (2006). Previous research comparing the performance of ICC models restricted the horse-race to pure firm-level models. Thanks to this transformation, I extend the list of ICC models to include transformed portfolio-level estimates. These models, however, consistently under-perform pure firm-level estimates in predicting subsequent returns and exhibit larger biases.

Furthermore, I present a new approach to estimate the cost of equity capital. I use a
discounted Free Cash-Flow to Common Equity holders (FCFE) model in conjunction with analysts estimates and market prices to estimate implied cost capital for the historical constituents of the S\&P1500. Our approach is distinct from prior models in that it is not based on the dividend discount model, residual income, or abnormal growth models. Therefore, it deals with many of the issues attributed to these models. For instance, it holds on a total basis, unlike the residual income model that require value neutrality for future shareholders in order to hold. Also, it is not subject to the DDM issues such as the non-alignment of dividend paid with firm's capacity, or influence of major shareholders on dividend policy. Most importantly, free cash flow is a more robust concept in representing the economic reality of a firm than earnings since it is subject to less accounting assumptions and less prone to earnings management. I show that this model works as well as the best performing models in the horse race.

I also investigate models performance for several sub samples of the market based on firms characteristics such as size, value, price momentum, leverage, market beta, beta standard error, number of analysts covering the firm, earnings forecasts dispersion, earnings long-term forecasted growth, target price relative to market price, and past earnings variability. The purpose of this testing is to assess whether some models work better with a particular set of firms. I find little evidence that any of the models are affected as statistical construct by these characteristics. However, as an economic construct, some characteristics affected the ICC estimates the ability to predict future realised returns. In most of the cases, the riskier is the firm, the less effective are the models in predicting subsequent returns. For instance, small firms, firms with low earnings growth, highly leveraged, over-priced (low target-to-market price ratio) render most of the ICC models insignificant. The exceptions are the Naive target-to-market price ratio model in the case of small or highly leveraged firms, and the simple price-over-earnings ratio model in the case of overpriced firms. Moreover, firms with large number of analysts, or low standard deviation (but not using coefficient of variation) between analysts forecasts of earnings also pose issues to models ability to predict future returns with the exception of the Naive target-to-market price ratio, the price-over-earnings ratio model, and dividend discount models with terminal values based
on target prices. Finally, low market beta and beta standard error firms' are anomalies for the ICC models.

## 3 Improving Portfolio Selection Using Implied Cost of Capital

### 3.1 Introduction

The mean-variance framework is the most popular portfolio selection model in academia and investment practice. The implementation of mean-variance efficient portfolios requires the knowledge of the expected asset returns. However, expected returns are unknown in practice and investors have to estimate them. The conventional approach is to estimate expected returns using historical data. This approach is problematic leading to portfolios with poor performance for two reasons. First, the risk-return profile of the assets and the risk attitude of the investors tend to change over time. Second, history-based estimates of expected returns are subject to significant errors that translate into unstable and inefficient portfolios. DeMiguel, Garlappi, and Uppal (2009) concluded that "although there has been considerable progress in the design of optimal portfolios, more effort needs to be devoted to improving the estimation of the moments, and especially expected returns".

Green, Hand, and Zhang (2013) listed over 300 papers on the estimation of the first moment. Despite such amount of work, researchers and practitioners overwhelmingly still resort to the extremely noisy historical realised returns to proxy for the most sensitive input in mean-variance portfolio analysis (see, e.g., Campbell (1991), Elton (1999), Gebhardt, Lee, and Swaminathan (2001), Pastor, Sinha, and Swaminathan (2008), DeMiguel, Plyakha, Uppal, and Vilkov (2013), and Ardia and Boudt (2015)). Using sample moments in the process of effectuating optimal portfolios have been shown to result in extreme weights that fluctuate considerably over time, making it impractical due to the turnover cost, not to mention the poor out-of-sample performance.

Realised return moments are used under the belief that information shocks would cancel out over time, and hence, such estimates would be unbiased. Such belief presupposes that enough historical data would be available to render unexpected return mean to zero. There are several issues with such assumptions as documented in the literature. Firstly, the data availability is limited especially for non-US markets, and hence the observation interval is
not large enough for unexpected return to converge to zero. Lakonishok (1993) for instance concluded that at least 70 years of data would be needed to establish a statistically significant risk factor in an asset pricing model when historical realised returns are used (See also Lundblad (2007) who suggest 100 years, and DeMiguel, Garlappi, and Uppal (2009) who show that 3000 months estimation window is needed for 25 assets optimal portfolio to outperform naive $1 / \mathrm{N}$ strategy). Secondly, evidence suggests that either information shocks are very large or they are correlated and cumulatively very large as to have a permanent consequence on realised returns.

Vuolteenaho (2002) argued that information surprises of this sort are in fact equivalent to the change in expectations about cash flows in the future. To deal with such noise in historical realised returns, the majority of the literature resorted to improved econometric specifications (such as, Merton (1980), Harvey (1991), Chan, Karolyi, and Stulz (1992), Fama and French (1998), Griffin (2002), and Karolyi and Stulz (2003) to name few). In fact, this vast literature try to improve the performance of optimal portfolios by dealing with estimation errors using different approaches. The Bayesian approach, for instance, involve endeavours like using diffuse-priors (see, for instance, Barry (1974), Bawa, Brown, and Klein (1979), Kandel and Stambaugh (1996), and Barberis (2000)), using shrinkage estimators (see for example Jobson and Korkie (1980), Jorion (1985), and Jorion (1986)), or determining a prior based on asset pricing models (like, Black and Litterman (1992), Pastor and Stambaugh (2000), and Pastor (2000)). Other strands of literature resorted to techniques like 'robust' diversifications, optimal diversification across estimation risk, and exploiting moment restrictions (see for instance, MacKinlay and Pastor (2000), Goldfarb and Iyengar (2003), Kan and Zhou (2007), and Garlappi, Uppal, and Wang (2007)). Moreover, other work focused on the covariance matrix estimation error (for instance, Best and Grauer (1992), Ledoit and Wolf (2004), and Kourtis, Dotsis, and Markellos (2012)), or imposing restricting constraints on the portfolio weights (for example, Frost and Savarino (1988), Chopra (1993), and Jagannathan and Ma (2003)). Still, in empirical research and practise, the usefulness of such econometrically-improved estimates is limited and "unavoidably imprecise" which "probably invalidate their use [i.e. historical return data] in applications" (Fama and French (1997),
and Fama and French (2002)).
Unlike the previous work that improves portfolio selection by working on the estimation error of realised moments, this project reverts back to the basics that portfolio selection is a forward looking task, and hence, its inputs are supposed to be forward looking. Therefore, the main contribution of this work is to introduce market implied expected returns calculated from reverse engineering fundamental valuation models to proxy for expected returns in a simple portfolio selection setting. To the best of my knowledge, attempting to demonstrate the improvement in the out-of-sample portfolio performance using the ex-ante cost of capital estimates as compared to the performance of strategies based on ex-post realised return is novel to portfolio literature.

The Implied Cost of Capital (ICC) as derived by inverting fundamental valuation models such as the Residual Income and the Abnormal Earnings Growth model has been subject to vast theoretical and empirical research ${ }^{13}$. I offer an extended discussion of these models in the previous chapter. I capitalize on the findings of the literature to obtain ex-ante measures of expected returns based on expected future cash flows and market information. The majority of the literature obtain future expected cash flows from sell-side analysts forecasts, but more recently some cross sectional mechanical forecasting models have been introduced such as Hou, van Dijk, and Zhang (2012); Li and Mohanram (2014) and Li, Ng, and Swaminathan (2013). I use ICC estimates based on analysts forecasts of earnings as well as estimates based on earnings forecasts from cross-sectional mechanical models. The latter type of estimates have been offered in the literature to deal with firms that are not followed by analysts but also to deal with the bias in analysts forecasts. Moreover, I also use Fitzgerald, Gray, Hall, and Jeyaraj (2013) methodology of calibrating model estimates using common risk factors to reduce firm-level estimation errors to calibrate the full range of ICC models. The estimation error could be due to data noise, earnings forecast bias, or incompatibility of certain models with specific firms. The application of such calibration to a wide range of models, and testing the improvement it provides in capturing future returns in this setting is novel also. I use these ex-ante measures in an optimal tangency portfolio setting, and in mar-

[^8]ket timing portfolio selection setting as recommended by Kirby and Ostdiek (2012). In both settings, I find good evidence that ICC expected return estimates have better out-of-sample performance against portfolios using realised returns.

More specifically, the results demonstrate that using ICC estimates rather than ex-post first moment in an optimal portfolio result in more stable weights, higher out-of-sample Sharpe ratio, and lower turnover. For instance, Gebhardt, Lee, and Swaminathan (2001) ICC model, which is one of the most widely used in the literature, generate an out-of-sample Sharpe of (0.433) and turnover of (2.684) as compared to mean-variance portfolio Sharpe of (-0.370) and turnover of (28.089). Similarly, I document at least 94 ICC versions with statistically better Sharpe ratios, and lower turnover than the mean-variance portfolio.

Moreover, I find that market timing strategies that use ICC estimates generate a higher out-of-sample average risk-adjusted return, and in many occasions, lower turnovers than both conventional market timing portfolios and naive allocations like 1/N. Specifically, 21 ICC versions reported statistically better Sharpe ratios and lower turnover than the conventional market timing portfolio of Kirby and Ostdiek (2012), and many more with statistically better Sharpe ratios but practically similar turnover. Similarly, 91 of ICC market timing allocations reported statistically higher out-of-sample risk-adjusted return than $1 / \mathrm{N}$.

Due to the fact that the formulations used to operationalise the ICC strategies are known to be disadvantaged in terms of estimation risk and turnover, I use turnover-constrained versions of the portfolios as described by Kourtis (2015). Using these portfolios, I provide evidence that ICC expected return estimates generate better out-of-sample risk-adjustedreturn than strategies that use historical moments, even after constraining the turnover to the turnover generated from an equally weighted portfolio. I find that the ICC strategies retain their edge in terms of risk-adjusted returns but with considerably lower turnover.

I further consider portfolio strategies that do not resort to expected return estimation as additional benchmarks of comparison. Given that it is well documented that these portfolios are difficult to beat, and that optimal portfolios are inherently disadvantaged due to estimation error, I still find that many of the ICC portfolios provide relatively better performance than $1 / \mathrm{N}$ and minimum variance portfolios. Furthermore, robustness checks in terms of his-
torical moments estimation window, timing strategies tuning factors result in no change in the overall conclusions of the previous testing.

The evidence presented in this work contributes to the portfolio selection research by introducing a new perspective to the estimation of expected return. To the best of my knowledge, it is the first attempt to use the findings in the implied cost of capital literature to improve portfolio performance. This work demonstrates how accounting information can be used to enhance investment decision making.

### 3.2 Data and Methodology

### 3.2.1 Implied Cost of Capital Models

Table (37) summarizes the models that will be used in the ICC based portfolios. These models were analytically expounded in section (2.2) in the previous chapter. Most of the models yield firm-level estimates. The models that yield portfolio level estimates are subjected to transformation as described in Nekrasov and Ogneva (2011). Nekrasov and Ogneva (2011) developed a methodology in which they extend the ETSS model to generate firm level estimates from portfolio level estimates by using common risk and growth factors. In other words, they generate firm level expected return estimates from ETSS average portfolio level estimates conditional on observable firm characteristics. I use the same principle to obtain firm level estimates from ETSS, OHE, and ES to test their validity in generating firm-level estimates. These estimates have been used in addition to the original portfolio level estimates separately in the analysis.

The analysis also involves calibrated versions of the firm-level models following Fitzgerald, Gray, Hall, and Jeyaraj (2013) methodology. One of the most recurring criticisms of ICC expected return estimates in the literature is to do with the estimation error due to the noise in the data or due to the model being incompatible with some individual stocks. Fitzgerald et al. (2013) suggest that estimation error could be minimized by using the fitted values from regressing the expected return estimates from a particular ICC model on common risk factors. A similar methodology is applied by Lee, So, and Wang (2017). The idea is to capture the firm-specific characteristics that affect the expected return but not reflected in the variables of the ICC models. This calibration also helps to deal with the issue of estimation error due to analysts earnings forecast bias.

I perform such calibration in the cross-section every month to ensure that the fitted values are independent of the relationship between the expected return and the risk factors, and between realised returns and the risk factors in every other period. I use the same risk factor used by Fitzgerald et al. (2013): Leverage, Size, book-to-market ratio, earning variability as predicted by the standard deviation in analysts EPS forecasts, market beta, the beta standard error, target-to-market price ratio, 12 months momentum factor, book value per share, and
the firm long-term growth rate. I restrict the calibration to the models that yield firm-level estimates without transformations, since the transformations themselves use firm-level risk characteristics factors. Applying calibration to the estimates of this list of models is also novel to the literature.

The last five models in table (37) are average estimates of other models. These are used to test whether combining estimates from various models improve the prediction ability of the estimates.

Table 37: Implied Cost of Capital Models

| Model | Code | Basis | Growth beyond horizon | Horizon | Formulation | Type of estimate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Gebhardt, Lee, and Swaminathan (2001) | GLS | Residual Income | Analysts | $\begin{aligned} & \hline \hline(2+10) \\ & \text { years } \end{aligned}$ |  | firm level |
| Claus and Thomas (2001) | CT | Residual Income | Inflation | 5 years | $V_{0}^{E}=b p s_{0}+\sum_{t=1}^{5}\left(\frac{R L_{t}}{\left(1+r_{E}\right)^{2}}\right)+\left(\frac{R L_{5}\left(1+g_{\text {inf }}\right)}{\left(r_{E}-g_{\text {inf } f}\right)\left(1+r_{E}\right)^{5}}\right)$ | firm level |
| Fitzgerald, Gray, Hall, and Jeyaraj (2013) | FGHJ | Residual Income | Analysts | $\begin{aligned} & (2+10) \\ & \text { years } \end{aligned}$ |  | firm level |
| Gode and Mohanram (2003) | GM | Abnormal Earnings Growth | Inflation | 2 years | $\begin{aligned} & r_{E}=A+\sqrt{A^{2}+\frac{e p s_{1}}{P_{0}}\left(g_{2}-(\gamma-1)\right)} \text { where } A= \\ & \frac{1}{2}\left((\gamma-1)+\frac{d p s_{1}}{P_{0}}\right) \text { and } g_{2}=\frac{e p s_{2}-e p s_{1}}{e p s_{1}} \end{aligned}$ | firm level |
| PE Ratio | PE | Abnormal Earnings Growth | Zero | 1 year | $r_{P E}=\left(\frac{P_{0}}{e P s_{1}}\right)^{-1}$ | firm level |
| PEG Ratio | PEG | Abnormal Earnings Growth | Zero | 2 years |  | firm level |
| Modified PEG Ratio | MPEG | Abnormal Earnings Growth | Zero | 2 years | $r_{M P E G}=\sqrt{\frac{e p s_{2}+r_{E} \cdot d p s_{1}-e p s_{1}}{P_{0}}}$ | firm level |
| Gordon and Gordon (1997) | GG | Dividends Discount | Analysts | 5 years | $V_{0}^{E}=\sum_{t=1}^{N}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{\prime}}\right)+\frac{e p S_{S+1}}{r_{E}\left(1+r_{E}\right)^{N}}$ | firm level |
| Botosan and Plumlee (2002) | BP | Dividends Discount | Analysts | 5 years | $V_{0}^{E}=\sum_{t=1}^{N}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{\prime}}\right)+\frac{\text { TargetPrice }}{\left(1+r_{E}\right)^{N}}$ | firm level |
| Easton, Taylor, Shroff, and Sougiannis (2002) | ETSS | Residual Income | data implied | 4 years | $\begin{aligned} & \frac{\text { epp } \gamma_{\text {cum }}^{j}}{\text { bps }}=\gamma_{0}+\gamma_{1} \frac{P_{0}^{j}}{b p s_{0}^{j}}+\mu_{0}^{j} \text { where } \gamma_{0}=(G-1), \\ & \gamma_{1}=(R-G), R=\left(1+r_{E}\right)^{4}, \text { and } G=(1+g)^{4} \end{aligned}$ | portfolio level |
| Nekrasov and Ogneva (2011) | TrETSS | ETSS | Transformation to the ETSS to yield firm-level estimates | 4 years |  | frm level |

Table 37: Implied Cost of Capital Models, Continued

| Model | Code | Basis | Growth beyond horizon | Horizon | Formulation | Type of estimate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Easton (2004) | ES | Abnormal Earnings Growth | data implied | 2 years | $\begin{aligned} & \frac{\text { ceppspj}}{P_{0}^{\prime}}=\gamma_{0}+\gamma_{1} \frac{e p s_{1}^{j}}{P_{0}^{\prime}}+\mu_{0}^{j} \text { where ceps } s_{2}=e p s_{2}+r_{E} * \\ & d p s_{1}, \gamma_{0}=r *\left(r-g_{A G i E}\right) \text {, and } \gamma_{1}=\left(1+g_{A G i E}\right) \end{aligned}$ | portfolio <br> level |
| Transformed ES | TrES | ES | Transformation to the ES to yield firm-level estimates | 2 years |  | rm level |
| O'Hanlon and Steele (2000) and Easton (2006) | OHE | Residual Income | data implied | NA | $\begin{aligned} & \frac{e p p_{t}^{J}}{b p s_{t-1}^{J}}=\delta_{0}+\delta_{1} \frac{p_{t}^{J}-b p s_{t}^{J}}{b p \delta_{t-1}^{J}}+\mu_{t}^{j} \text { where } \delta_{0}=r_{E}, \text { and } \\ & \delta_{1}=\frac{r_{E}-\text { gprer }^{1+g_{\text {prep }}}}{} \end{aligned}$ | portfolio level |
| Transformed OHE | TrOHE | OHE | Transformation to the OHE to yield firm-level estimates | NA |  | firm level |
| Simple Ashton and Wang (2013) | SAW | price-led earnings | data implied | 1 year | $E_{t}\left[e_{t+1}\right]=\delta_{1} P t+\delta_{2} e_{t}+\delta_{3} b_{t}+\delta_{4} b_{t-1}$ | portfolio level |
| Extended Ashton and Wang (2013) | EAW | price-led earnings | data implied | 1 year | $E_{t}\left[e_{t+1}\right]=\delta_{1} P t+\delta_{2} e_{t}+\delta_{3} b_{t}+\delta_{4} b_{t-1}+\delta_{5} P_{t-1}$ | portfolio level |
| Wang (2018) | WNG | EAW | data implied | 1 year | $\begin{array}{ll} r_{E}=\left(1+g_{i t}\right)\left[1-\frac{b p s_{t}}{}-\left(\beta_{1, i t}-\left(R_{i t}-1\right) \beta_{2, i t}\right) \frac{b p s_{1-1}}{P_{t}}\right. \\ \left(1+\beta_{1, i t}+\beta_{2, i t} \frac{e p s p_{t+1}}{P_{t}}\right. & + \\ \left(1-\beta_{1, i t}-\left(R_{i t}-1\right)\right. & + \\ \lambda_{i t}\left[\frac{P_{t}-b p s_{t}-\left(P_{t-1}-b p s_{s_{-1}}\right)}{P_{t}}\right]-1 & \\ \hline \end{array}$ | $1-\left(\beta_{1, i t}+\beta_{2,}\right.$ <br> firm level |

Table 37: Implied Cost of Capital Models, Continued

| Model | Code | Basis | Growth beyond horizon | Horizon | Formulation | Type of estimate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| One Year Horizon BP | TPDPS | Dividends Discount | NA | 1 year | $V_{0}=\frac{\text { DPS }{ }_{1}+\text { TargelPrice }}{(1+r)}$ | firm level |
| BP Terminal Value | Naive | Price Target | NA | 1 year | $V_{0}=\frac{\text { TargetPrice }}{(1+r)}$ | firm level |
| Dhaliwal, Krull, and Li (2007) | DKL | Mean of GLS, CT, and GM |  |  |  | firm level |
| Hail and Leuz (2006) | HL | Mean of GLS, CT, GM, and MPEG |  |  |  | firm level |
| Hou, van Dijk, and Zhang (2012) Composite | KMY | Mean of GLS, CT, GM, MPEG, and GG |  |  |  | firm level |
| Mean of $\begin{array}{l}\text { Portfolio-Level } \\ \text { Models }\end{array}$ | PLM | Mean of ETSS, ES, OHE, and EAW |  |  |  | portfolio level |
| Firm-level estimates adjusted toward Portfolio-level mean | FPM | Mean of HL and PLM |  |  |  | firm level |

This table reports a summary of the ICC models to be used in the subsequent analysis. These are the most widely recognized models in the literature. Some authors used a variant of the models that are presented here in terms of forecasting horizon or source of data, these have been ignored. The models highlighted are introduced in this work. The models have been defined and analytically derived in the previous chapter.

### 3.2.2 Earnings Forecasts

To implement the ICC models in Table (37), earning forecasts are obtained either from analysts using $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ database, or cross-sectional mechanical models of estimates. Four mechanical models have been used: (1) Hou, van Dijk, and Zhang (2012) model (HDZ), (2) Li and Mohanram (2014) Earnings Persistence model (EP), (3) Li and Mohanram (2014) Residual Income model (RI), and (4) the naive Random Walk (RW) model as expressed by Gerakos and Gramacy (2013).

HDZ model is specified as:

$$
\begin{equation*}
E_{t+\tau}=\alpha_{0}+\alpha_{1} A_{t}+\alpha_{2} D_{t}+\alpha_{3} D D_{t}+\alpha_{4} E_{t}+\alpha_{5} N e g E_{t}+\alpha_{6} A C_{t}+\varepsilon \tag{64}
\end{equation*}
$$

where $E_{t+\tau}$ is the firm earnings in year $t+\tau$, where $\tau$ is 1 to 5 years. $D_{t}$ is the dividends paid by the firm, and $D D_{t}$ is a dummy to indicate whether a firm is paying dividends. $E_{t}$ is earnings, and $N e g E_{t}$ is a dummy for loss making firms. $A C_{t}$ is the firm working capital accruals. To be consistent with the original paper, the regression is estimated using dollar level unscaled data. The regression coefficients are multiplied by firm level observations at time $t$ to obtain firm-level earnings forecasts.

The RW is used as a naive benchmark to evaluate the performance of other earnings forecast models. It simply uses past earnings with no other parameters as follows:

$$
\begin{equation*}
E_{t+\tau}=E_{t}+\varepsilon \tag{65}
\end{equation*}
$$

The EP model uses earnings $E_{t}$, a dummy for loss making firms $\operatorname{Neg} E_{t}$, as well as an interaction term between them as regression parameters. It is expressed as follows:

$$
\begin{equation*}
E_{t+\tau}=\alpha_{0}+\alpha_{1} E_{t}+\alpha_{2} N e g E_{t}+\alpha_{3} N e g E_{t} * E_{t}+\varepsilon \tag{66}
\end{equation*}
$$

Unlike the HDZ model, Li and Mohanram (2014) used per-share level data in the regression for both EP and RI. Li and Mohanram (2014) motive for developing the cross sectional Residual Income model for earning forecast is the proposition that dividends, which are used
as a parameter in HDZ, are irrelevant for asset pricing. The RI model is specified as follows:

$$
\begin{equation*}
E_{t+\tau}=\alpha_{0}+\alpha_{1} E_{t}+\alpha_{2} \mathrm{Neg}_{t}+\alpha_{3} N e g E_{t} * E_{t}+\alpha_{4} B_{t}+\alpha_{5} T A C C_{t}+\varepsilon \tag{67}
\end{equation*}
$$

where $B_{t}$ is the book value of the firm, and $T A C C_{t}$ is total accruals according to Richardson, Sloan, Soliman, and Tuna (2005) definition. TACC is calculated as a sum of the change in net working capital, the change in net non current operating assets, and the change in net financial assets. Working capital is the difference between the current assets excluding cash and short-term investments, and current liabilities excluding the debt portion in current liabilities. Non-current operating assets is defined as the difference between total assets excluding current assets and investments and advances, and the total liabilities excluding long-term debt and current liabilities. Net financial assets is the difference between investments and total debts including preference shares. Using the balance sheet identity, one could calculate TACC as the change in common equity minus the change cash. In our sample, both calculation methods resulted in almost the same figures.

### 3.2.3 Portfolio Strategies

I test ICC estimates in two types of portfolio management styles: (1) conditional optimal strategies under quadratic loss, and (2) non-optimization strategies that exploit sample moments information in order to mitigate estimation risk, namely market timing strategies. In the first type investment managers adopt an optimal asset allocation given the risk and return of the assets. In the second type, investment mangers make decisions depending on predictions about future price movements.

To set the notation, let $x_{t}$ be an $N$-dimensional vector the represents the weights of $N$ risky assets in a portfolio at date $t . f_{t}$ is an $N$-dimensional vector that represents the risky assets expected excess returns above the risk free rate, and $\Sigma_{t}$ is an $N x N$ variance-covariance matrix of returns between the risky assets.

Firstly, I start with an optimal decision for wealth allocation across assets carried out using a quadratic utility function in a static framework. The classical example of such strategies is mean-variance portfolio optimization using sample moments. The investors choose
the weights every period in order to maximize their expected utility given their risk aversion factor $\gamma$ :

$$
\begin{equation*}
\max x_{t} \cdot f_{t}-\frac{\gamma}{2} \cdot x_{t}^{\prime} \cdot \Sigma_{t} \cdot x_{t} \tag{68}
\end{equation*}
$$

The optimal portfolio is obtained by setting the first order differentiation with respect to $x_{t}$ to zero, to obtain a well known solution:

$$
\begin{equation*}
x_{t}=\frac{1}{\gamma} \cdot \Sigma_{t}^{-1} \cdot f_{t} \tag{69}
\end{equation*}
$$

If $\mathbf{1}_{N}$ is an $N$-dimensional vector of ones, the amount of wealth invested in risk-free assets would be $1-\mathbf{1}_{N}^{T} \cdot x_{t}$, and the vector of relative weights constituting the portfolio with only risky assets would be as follows ${ }^{14}$ :

$$
\begin{equation*}
w_{t}=\frac{x_{t}}{\left|\mathbf{1}_{N}^{T} \cdot x_{t}\right|}=\frac{\Sigma_{t}^{-1} \cdot f_{t}}{\left|\mathbf{1}_{N} \Sigma_{t}^{-1} \cdot f_{t}\right|} \tag{70}
\end{equation*}
$$

This formulation is the tangency portfolio (TP). Since the mean-variance portfolio allocates some weight to the risk-free asset, I will use the TP strategy as in equation (71) to test the performance of ICC estimates. This ensures that the performance differences across portfolios are not driven by different allocations to the risky assets and risk free assets. DeMiguel, Garlappi, and Uppal (2009) impose a similar constraint on the mean-variance portfolio by rescaling the weights of the optimal portfolio to obtain a portfolio that invest $100 \%$ in the TP given that the denominator in equation (71) is larger than zero (otherwise, if the TP is conditionally inefficient, the optimal strategy invests -100\% in TP and 200\% in risk-free asset). TP and optimal portfolio differ in 2 important issues: estimation risk and turnover.

$$
\begin{equation*}
x_{t}^{T P}=\frac{\Sigma_{t}^{-1} \cdot f_{t}}{\mathbf{1}^{\prime} \cdot \Sigma_{t}^{-1} \cdot f_{t}} \tag{71}
\end{equation*}
$$

Note that if $\Sigma_{t}=\Sigma$ and $f_{t}=f$ for all t , the two portfolios will have the same unconditional Sharpe ratios. However, in reality, this is not the case. The sampling variation increases the variance in returns and lowers the unconditional Sharpe ratio. The important thing is to

[^9]note is that TP is more likely to be severely impacted than the optimal portfolio (Kirby and Ostdiek (2012)). Moreover, turnover is also affected by estimation risk, but it is a greater concern for TP strategy than optimal strategy. Therefore, by focusing on TP strategy like DeMiguel et al. (2009) to test ICC models, I am disadvantaging the ICC models with respect to estimation risk and turnover when compared to benchmarks strategies that do not resort to estimates of expected return like $1 / \mathrm{N}$ and minimum variance portfolios. This note will be of importance when discussing the empirical results later, especially when comparing the ICC strategies based on TP to naive strategies like 1/N. Kirby and Ostdiek (2012) suggest that the weight of the risk-free asset in the classical optimal portfolio should be transferred to the minimum-variance portfolio because it only depends on the covariance matrix, which arguably generates less estimation error than rescaling using the tangent portfolio weights like in DeMiguel et al. (2009). Although this could be appealing in some other settings, the purpose of this work is to test for the benefit of using ICC models to estimate ex-ante expected returns. Rescaling the optimal portfolio using minimum-variance weights would make the optimal weights more dependent on the covariance matrix which is undesirable for the purpose of this work. Hence, I will use the highest Sharpe ratio portfolio to operationalise the ICC estimates of expected returns just like the majority of similar research. But to stress the point, the main benchmark to compare these ICC tangency portfolios is the tangency portfolio based on historical realised returns. The tangency portfolio - by construction - is not designed to be compared to benchmarks like $1 / \mathrm{N}$ and minimum-variance portfolios. Moreover, the task at hand is to assess the benefit of using expected returns from ICC models instead of realised returns in an optimal portfolio setting. The tangency portfolio is appropriate for this task since the results are not affected by the allocation to risk free assets, neither that such allocation is transferred to a portfolio that could undermine the importance of expected returns in determining the weights. However, TP is not appropriate if the task was to outperform naive strategies such as $1 / \mathrm{N}$. Nevertheless, I will present the results of comparing $1 / \mathrm{N}$ to the ICC tangency strategies in the additional analysis section for illustrating that despite the TP inherited disadvantage, some ICC models still outperform it. Having clarified that, the timing strategies that are described below can and would be
compared to $1 / \mathrm{N}$ in the main analysis.
In a nutshell, equation (71) shall be used to generate "ICC Strategies" by setting to $f_{t}=$ $I C C_{t}$ net of risk free rate, where $I C C_{t}$ are ex-ante estimates of expected returns generated from the models presented in table (37). These portfolios shall be compared primarily to a "mean-variance" version where the weights for the mean-variance portfolio are computed using the same equation but with $f_{t}=\hat{\mu_{t}}$.

Secondly, I test the improvement in market timing strategies out-of-sample performance from using ICC as proxies for expected returns. Following Kirby and Ostdiek (2012), if an aggressive form of shrinkage is applied to the covariance matrix whereby all off-diagonal elements of the matrix is set to zero in tangent portfolio, the resulting formulation is a Reward-to-Risk Timing (RRT) portfolio strategy of the form $\hat{w}_{i t}=\frac{\left(\hat{f}_{i t}^{+} / \hat{\sigma}_{i t}^{2}\right)}{\sum_{i=1}^{N}\left(\hat{f}_{i t}^{+} / \hat{\sigma}_{i t}^{2}\right)}$. Kirby and Ostdiek (2012) generalize this formulation to be as follows

$$
\begin{equation*}
\hat{w}_{i t}=\frac{\left(\hat{f}_{i t}^{+} / \hat{\sigma}_{i t}^{2}\right)^{\eta}}{\sum_{i=1}^{N}\left(\hat{f}_{i t}^{+} / \hat{\sigma}_{i t}^{2}\right)^{\eta}} \tag{72}
\end{equation*}
$$

where $\eta$ is a tuning parameter to adjust for the volatility changes effect on weights (timing aggressiveness), which allow control over transaction cost and portfolio turnover. $\sigma$ is the conditional volatility of excess return. The covariance matrix is assumed to be diagonal for all t. Kirby and Ostdiek (2012) argue that mean-variance portfolios with such diagonal matrix perform better than portfolios constructed using conventional covariance matrix. They consider such restriction on the matrix as a form of shrinkage, that reduces the number parameters to estimate and hence reduce the estimation risk in a way that outweighs the information loss. In the empirical implementation, I set $\eta=1$. Later in the robustness testing, $\eta$ equals to 2 is also checked.

This generalized form of the RRT adds the positive estimated conditional mean for each asset $\hat{f}_{i t}^{+}$. The mean is restricted to be positive (i.e $\max \left(\hat{f_{i t}}, 0\right)$ ) because it is estimated with less precision as compared to the restricted diagonal covariance matrix which reduces the tendency of the portfolio to yield extreme weights (Jagannathan and Ma (2003)). However, if the mean is allowed to be negative for some assets, this could result in the denominator in equation (72) to approach zero. Hence, the investor is assumed to eliminate any negative-
mean asset at period t . In the ICC setting, this assumption is trivial since almost all ICC estimates are positive by nature.

Equation (72) shall be used to generate "ICC Timing Strategies" by setting to $f_{t}=I C C_{t}$, where $I C C_{t}$ are ex-ante estimates of expected returns generated from the models presented in table (37). These portfolios shall be compared primarily to a "conventional RRT" version where the weights are computed using the same equation but with $f_{t}=\hat{\mu_{t}}$. Also, these portfolios lend themselves to be compared to $1 / \mathrm{N}$ due to how they deal with estimation risk. Therefore, in the main analysis, the ICC timing strategies shall be compared to both the conventional RRT and $1 / \mathrm{N}$.

As an additional benchmark, the same diagonal covariance is applied to the minimumvariance portfolio to yield a Volatility Timing (VT) portfolio that does not resort to expected returns estimates $\hat{w}_{i t}^{V T}=\frac{\left(1 / \hat{\sigma}_{\hat{i}}^{2}\right)}{\sum_{i=1}^{N}\left(1 / \hat{\sigma}_{\hat{i}}^{2}\right)}$. The VT strategy is designed to avoid short sales and to keep turnover as low as possible by capitalizing on the advantages of the naive equallyweighted diversification. The weights are determined without optimization and without the inversion of the covariance matrix. Kirby and Ostdiek (2012) generalize this strategy as follows:

$$
\begin{equation*}
\hat{w}_{i t}^{V T}=\frac{\left(1 / \hat{\sigma}_{i t}^{2}\right)^{\eta}}{\sum_{i=1}^{N}\left(1 / \hat{\sigma}_{i t}^{2}\right)^{\eta}} \tag{73}
\end{equation*}
$$

Note that if $\eta=0$, the portfolio becomes the naive $1 / \mathrm{N}$ diversification strategy.

### 3.2.4 Data, Estimation and Inference Procedure

The data used in the testing is the firm level data of S\&P 1500 historical constituents. All data were collected on monthly basis. Thomson Reuters guidance for using I/B/E/S through Datastream specifically mention that for the data to be identical with that shown by other I/B/E/S historical products, a monthly data requests should specify the 20th of each month as the date of the download (Thomson Reuters (2010)). This also ensures that monthly data is always displayed in line with the $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ production cycle.

The portfolio testing methodology goes as follows, portfolios are constructed using the strategies described in the previous subsection based on the S\&P 1500 historical con-
stituents. For each month, all ICC models are estimated using accounting data available lagged by 6 months to ensure availability to market participants. I use a rolling data window T as in DeMiguel, Garlappi, and Uppal (2009) to estimate the mean return and covariance matrix. In the base case, T is set to be 60 months, but windows of 90 months are tested for robustness. To implement this approach, I define the estimators to be $\hat{\mu}_{t}=\frac{1}{T} \sum_{n=0}^{T-1} r_{t-1}$ and $\hat{\Sigma_{t}}$ to be the covariance estimator of Ledoit and Wolf (2004). These sample estimates are used to operationalise the same strategies for each period by dropping the earliest period in each iteration and including one more month forward. This will result in L-T portfolio weight vectors for each strategy where L is the total number of observations. In the base case L is set to be 224 months (from the year 1999 till November 2017). Any firm that does not have an estimate using any of the ICC models in the receptive tests get dropped to make sure that models are compared using the same set of firms each month.

Using the implied expected returns calculated by the methods in table (37), I construct portfolios based on forward looking expected returns using Tangency Portfolio and Reward-to-Risk Strategies to test its performance against the same portfolios using realised return moments, and other benchmark portfolios.

Following DeMiguel, Garlappi, and Uppal (2009) and other relevant work, the performance of the portfolios would be compared using two methods. Firstly, out-of-sample Sharpe ratio which is defined as the average of excess return generated by the portfolio divided by the standard deviation over $L-T$ :

$$
\begin{equation*}
\hat{S R}=\frac{\hat{\mu}}{\hat{\sigma}} \tag{74}
\end{equation*}
$$

where $\hat{\mu}=\frac{1}{L-T} \sum_{t=T}^{L-1} w_{t}^{\prime} \cdot r_{t+1}$ and $\hat{\sigma^{2}}=\frac{1}{L-T-1} \sum_{t=T}^{L-1}\left(w_{t}^{\prime} \cdot r_{t+1}-\hat{\mu}\right)^{2}$.
The difference in out-of-sample Sharpe ratio between strategies would be tested for significance using the non-parametric bootstrapping methodology of Ledoit and Wolf (2008) which is formulated to deal with returns of time-series nature and fat tails. The hypothesis is set that the difference between the Sharpe ratios is zero, and a two sided p-value is calculated using a studentized circular block bootstrapping with a block size of 10 and 5,000 bootstrap re-samples.

Secondly, the Portfolio Turnover is compared, which can be defined as the amount of trading necessary to implement the allocation. Technically, it is the mean sum of the absolute value of the trades across the assets:

$$
\begin{equation*}
\hat{T O}=\frac{1}{L-T-1} \cdot \sum_{t=T}^{L-1} \sum_{j=1}^{N}\left(\left|w_{\hat{j, t+1}}-\hat{w_{k, t}}\right|\right) \tag{75}
\end{equation*}
$$

where $w_{j, t+1}$ is the desired weights under the asset allocation at time $t+1$ after rebalancing, and $\hat{w_{k, t}}$ is the weight of asset $j$ at time $t+1$ before rebalancing. Hence the difference is the trades on each asset $j$ in each period.

### 3.3 Descriptive Statistics

Table (38) provides descriptive statistics of the firms' characteristics in the sample. Table (39) reports analysts estimates statistics of the various variables for 5 forecasting periods ahead. The average (median) number of analysts following each firm is almost 10 (8) analysts. The long-term growth in earnings forecast has an inter-percentile [5,95] range between 4 and 30 percent. The average of earnings per share (EPS), dividend per share (DPS), and the cash flow from operations per share (CPS) increases as the further into the future the forecast goes. The EPS and DPS forecast statistical attributes are comparable to the actual figures in table (38). Net debt (NDT) also exhibit a similar pattern when the forecasts are contrasted with the actual figure.

Table 38: Summary Statistics of Firms' Characteristics

|  | Mean | StD | Prert5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Earnings per share | 1.412 | 1.659 | 0.000 | 0.290 | 0.980 | 1.920 | 4.350 | 2.557 | 11.942 |
| Dividend per share | 0.383 | 0.588 | 0.000 | 0.000 | 0.080 | 0.560 | 1.680 | 2.024 | 7.103 |
| Market-to-Book | 2.986 | 3.377 | 0.560 | 1.410 | 2.180 | 3.440 | 8.390 | 3.044 | 16.963 |
| Book value per share | 12.376 | 15.157 | 0.539 | 4.050 | 8.494 | 15.394 | 36.101 | 3.553 | 19.932 |
| ROE | 10.038 | 25.635 | -28.150 | 5.200 | 11.920 | 18.730 | 39.020 | -1.549 | 12.664 |
| Dividend Payout | 16.949 | 23.266 | 0.000 | 0.000 | 0.920 | 29.270 | 68.380 | 1.384 | 4.096 |
| Price | 29.316 | 26.836 | 2.986 | 12.060 | 22.625 | 38.000 | 75.090 | 2.476 | 11.782 |
| Momentum (12 months) | 0.187 | 0.524 | -0.513 | -0.110 | 0.122 | 0.376 | 1.091 | 1.697 | 8.384 |
| Target Price/ Price | 1.290 | 0.492 | 0.918 | 1.054 | 1.159 | 1.334 | 2.104 | 3.761 | 20.666 |
| Beta | 0.145 | 0.150 | 0.000 | 0.000 | 0.109 | 0.228 | 0.448 | 1.119 | 3.838 |
| Beta Standard Error | 0.044 | 0.037 | 0.000 | 0.018 | 0.041 | 0.062 | 0.111 | 1.097 | 4.980 |
| Earnings Varaibility [std(forecasted EPS)/price] | 0.005 | 0.011 | 0.000 | 0.001 | 0.002 | 0.005 | 0.021 | 4.784 | 29.186 |
| Leverage | 2.468 | 4.784 | 0.071 | 0.335 | 0.826 | 2.165 | 10.879 | 3.990 | 21.261 |
| Total Assets (\$mill) | 7778.170 | 23086.611 | 62.181 | 353.002 | 1178.238 | 4420.000 | 34163.000 | 5.535 | 36.729 |
| Equity (\$mill) | 1835.771 | 4041.514 | 17.878 | 177.716 | 484.379 | 1433.300 | 8772.000 | 4.170 | 22.393 |
| Net Income (\$mill) | 264.806 | 783.203 | -91.029 | 9.144 | 48.145 | 181.675 | 1374.000 | 4.533 | 26.739 |
| EBITDA (\$mill) | 642.331 | 1571.567 | -17.059 | 41.769 | 140.147 | 462.000 | 3195.120 | 4.479 | 25.568 |
| Cash (\$mill) | 533.927 | 1527.257 | 2.511 | 23.691 | 88.894 | 317.624 | 2463.199 | 5.339 | 34.581 |
| Net Debt (\$mill) | 1920.436 | 4558.786 | -903.037 | -33.444 | 415.386 | 1920.900 | 10168.000 | 3.496 | 17.663 |
| Market Cap. (\$mill) | 5219.983 | 12314.553 | 74.330 | 446.405 | 1226.600 | 3839.485 | 23875.720 | 4.561 | 26.244 |
| Number of Outstanding Shares (mill) | 139.234 | 283.786 | 8.763 | 22.812 | 47.132 | 118.540 | 569.059 | 4.406 | 24.824 |

This table reports the summary statistics of firms' characteristics in the sample. The variables that are not per-share has been reported in millions of dollars.

Table (40) reports the results of estimating the various firm-level models as described in table (37) using analysts estimates, as well as the subsequent realised return over the next 12 months. The mean implied expected return range between 4.3 percent in the transformed OHE model using 25 size- $\mathrm{B} / \mathrm{M}$ portfolios to as high as 38.8 percent using the transformed ES model. The dividend discount model GG also reported high estimates. The 5\% inter percentile range of the subsequent realised return ranged between -26 to 55 percent. This is in accordance with the previous literature observation of noisy historical return. Most of the ICC models give more stable estimates of expected return. For instance, GLS, one of

Table 39: Summary Statistics of Analysts Forecasts

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prert75 | Prert95 | Skewness | Kurtosis |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Analysts Per Firm | 9.778 | 7.354 | 1.000 | 4.000 | 8.000 | 14.000 | 25.000 | 1.058 | 3.581 |
| PT | 36.767 | 34.292 | 7.000 | 17.000 | 28.000 | 45.000 | 91.000 | 3.235 | 17.262 |
| Ltg (\%) | 14.646 | 9.171 | 4.000 | 10.000 | 13.000 | 18.000 | 30.000 | 1.196 | 7.205 |
| EPS 1 | 1.596 | 1.887 | -0.230 | 0.530 | 1.190 | 2.130 | 4.850 | 2.354 | 11.881 |
| EPS 2 | 1.924 | 2.023 | 0.110 | 0.730 | 1.430 | 2.450 | 5.470 | 2.727 | 13.419 |
| EPS 3 | 2.460 | 2.208 | 0.260 | 1.050 | 1.900 | 3.170 | 6.610 | 2.168 | 9.505 |
| EPS 4 | 3.149 | 2.654 | 0.360 | 1.400 | 2.470 | 4.120 | 8.170 | 1.903 | 7.958 |
| EPS 5 | 3.688 | 3.061 | 0.500 | 1.670 | 2.880 | 4.820 | 9.310 | 2.030 | 8.732 |
| DPS 1 | 0.609 | 0.782 | 0.000 | 0.000 | 0.350 | 0.900 | 2.150 | 2.026 | 8.006 |
| DPS 2 | 0.639 | 0.800 | 0.000 | 0.000 | 0.380 | 0.960 | 2.220 | 1.905 | 7.303 |
| DPS 3 | 0.708 | 0.850 | 0.000 | 0.000 | 0.420 | 1.090 | 2.440 | 1.606 | 5.696 |
| DPS 4 | 1.065 | 1.080 | 0.000 | 0.200 | 0.810 | 1.600 | 3.110 | 1.584 | 6.274 |
| DPS 5 | 1.146 | 1.179 | 0.000 | 0.220 | 0.870 | 1.700 | 3.410 | 1.644 | 6.418 |
| CPS 1 | 3.329 | 3.171 | 0.290 | 1.360 | 2.490 | 4.290 | 9.150 | 2.355 | 10.660 |
| CPS 2 | 3.780 | 3.450 | 0.520 | 1.630 | 2.820 | 4.770 | 10.070 | 2.458 | 11.129 |
| CPS 3 | 4.728 | 4.122 | 0.710 | 2.090 | 3.590 | 6.010 | 12.440 | 2.280 | 9.984 |
| CPS 4 | 5.818 | 5.367 | 0.980 | 2.410 | 4.300 | 7.300 | 15.865 | 2.517 | 11.352 |
| CPS 5 | 6.456 | 5.974 | 1.150 | 2.660 | 4.735 | 8.020 | 17.660 | 2.493 | 11.179 |
| CAP 1 | 398.447 | 935.447 | 4.230 | 23.500 | 75.000 | 271.410 | 2083.900 | 4.088 | 21.396 |
| CAP 2 | 404.733 | 950.431 | 4.800 | 24.500 | 78.000 | 275.000 | 2076.000 | 4.114 | 21.629 |
| CAP 3 | 561.161 | 1236.454 | 7.000 | 38.000 | 123.370 | 430.000 | 2790.000 | 4.048 | 21.497 |
| CAP 4 | 838.655 | 1984.491 | 9.737 | 55.000 | 189.000 | 671.000 | 3687.000 | 4.974 | 31.981 |
| CAP 5 | 923.526 | 2263.440 | 9.793 | 59.000 | 200.000 | 732.375 | 3892.298 | 5.101 | 32.714 |
| EBT 1 | 948.464 | 2162.369 | 4.097 | 82.550 | 246.000 | 775.000 | 4239.093 | 4.634 | 27.598 |
| EBT 2 | 1070.666 | 2384.894 | 19.965 | 104.900 | 293.130 | 892.370 | 4695.299 | 4.610 | 27.341 |
| EBT 3 | 1510.213 | 3160.066 | 40.500 | 165.000 | 452.525 | 1331.800 | 6488.238 | 4.373 | 24.795 |
| EBT 4 | 2177.182 | 4103.127 | 57.278 | 263.393 | 742.000 | 2115.615 | 9030.868 | 3.907 | 20.451 |
| EBT 5 | 2433.561 | 4461.306 | 66.000 | 290.000 | 821.150 | 2397.500 | 10405.100 | 3.704 | 18.670 |
| NDT 1 | 1605.962 | 4141.025 | -1245.861 | -78.870 | 325.500 | 1677.010 | 9179.168 | 3.193 | 16.012 |
| NDT 2 | 1445.472 | 4273.382 | -1779.380 | -155.720 | 250.400 | 1578.390 | 9142.141 | 2.930 | 15.130 |
| NDT 3 | 1432.469 | 4993.540 | -3023.250 | -299.460 | 236.700 | 1785.430 | 10209.000 | 2.343 | 13.079 |
| NDT 4 | 1932.309 | 7287.460 | -5563.445 | -371.370 | 456.545 | 2891.720 | 15747.125 | 1.146 | 9.861 |
| NDT 5 | 1388.745 | 7898.371 | -7589.913 | -627.298 | 258.600 | 2606.000 | 15236.254 | 0.353 | 10.310 |

This table reports the summary statistics of analysts forecasts that will be used for ICC estimations. The first row reports the statistics of the number of analysts following each firm in the sample. PT is the price target, and Ltg is the forecasted Long-term growth rate of earnings. EPS is the forecasted earnings per share. DPS is the forecasted dividend per share, and CPS is cash flow per share forecast. CAP is the forecasted capital expenditure, EBT is earnings before interest and taxes forecast, and NDT is the Net Debt forecast. The variables that are non per share are reported in millions of dollars. The number after the variables indicate the number of years ahead for which the forecast is attributed.
the most widely ICC models have a range between 6 and $16.4 \%$. The $\mathrm{P} / \mathrm{E}$ ratio model range is between zero and $13 \%$. Table (41) present the Spearman correlation matrix between the estimates of the various ICC models. All models -except TrOHE_10Ind- have a positive and significant correlation with the subsequent realised return.

Table 40: Summary Statistics of the Firm-Level ICC Estimates

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| CT | 0.093 | 0.023 | 0.056 | 0.077 | 0.090 | 0.105 | 0.145 | 0.562 | 2.878 |
| GLS | 0.110 | 0.025 | 0.068 | 0.093 | 0.108 | 0.126 | 0.164 | 0.355 | 2.574 |
| GM | 0.114 | 0.029 | 0.074 | 0.094 | 0.107 | 0.126 | 0.187 | 1.025 | 3.575 |
| MPGE | 0.115 | 0.040 | 0.065 | 0.088 | 0.104 | 0.130 | 0.222 | 1.255 | 4.024 |
| GG | 0.319 | 0.078 | 0.170 | 0.269 | 0.318 | 0.368 | 0.473 | 0.034 | 2.540 |
| FGHJ | 0.117 | 0.022 | 0.080 | 0.102 | 0.115 | 0.130 | 0.165 | 0.433 | 2.645 |
| PEG | 0.100 | 0.049 | 0.000 | 0.076 | 0.095 | 0.121 | 0.216 | 0.365 | 3.613 |
| PE | 0.061 | 0.030 | 0.003 | 0.042 | 0.059 | 0.077 | 0.127 | 0.269 | 2.889 |
| HL | 0.107 | 0.025 | 0.071 | 0.089 | 0.102 | 0.119 | 0.170 | 0.907 | 3.325 |
| DKL | 0.105 | 0.023 | 0.071 | 0.089 | 0.101 | 0.117 | 0.160 | 0.762 | 3.085 |
| BP | 0.038 | 0.035 | -0.009 | 0.014 | 0.030 | 0.053 | 0.132 | 1.136 | 3.829 |
| KMY | 0.177 | 0.066 | 0.078 | 0.112 | 0.184 | 0.226 | 0.298 | 0.078 | 1.884 |
| FPM | 0.096 | 0.022 | 0.060 | 0.080 | 0.095 | 0.112 | 0.139 | 0.196 | 2.231 |
| TrETSS_25SBM | 0.101 | 0.151 | -0.094 | 0.000 | 0.045 | 0.174 | 0.484 | 1.123 | 3.439 |
| TrES_25SBM | 0.388 | 0.814 | -0.569 | 0.000 | 0.055 | 0.450 | 2.895 | 1.905 | 6.007 |
| TrOHE_25SBM | 0.043 | 0.139 | -0.243 | -0.011 | 0.024 | 0.102 | 0.365 | 0.330 | 3.490 |
| TrETSS_Ind10 | 0.045 | 0.114 | -0.184 | -0.015 | 0.049 | 0.098 | 0.314 | 0.212 | 3.440 |
| TrES_Ind10 | 0.231 | 0.335 | -0.118 | 0.034 | 0.089 | 0.300 | 1.249 | 1.832 | 5.684 |
| TrOHE_Ind10 | 0.054 | 0.048 | -0.048 | 0.027 | 0.054 | 0.083 | 0.152 | -0.050 | 2.963 |
| realised | 0.063 | 0.188 | -0.258 | 0.000 | 0.000 | 0.116 | 0.547 | 1.047 | 3.949 |

This table reports the summary statistics of the various firm-level ICC estimates based on analysts earnings forecasts, as well as the realised return.

Tables (6) and (7) report the statistics of the variables used in forecasting earnings using mechanical models described in section (3.2.2), and the statistics of the resulting forecasts.

Table 41: Spearman Correlation of the Firm-Level ICC Estimates

| CT | GLS | GM | MPEG | GG | FGHJ | PEG | PE | HL | DKL | BP | KMY | FPM | $\begin{aligned} & \text { TrOHE } \\ & \text { _10Ind } \end{aligned}$ | $\begin{aligned} & \hline \text { TrES } \\ & \_25 S B M \end{aligned}$ | $\begin{gathered} \text { TrETSS } \\ \text { 25SBM } \end{gathered}$ | $\begin{aligned} & \hline \text { TrOHE } \\ & \text { _25SBM } \end{aligned}$ | $\begin{aligned} & \text { TrETSS } \\ & \text { _Ind10 } \end{aligned}$ | $\begin{aligned} & \text { TrETSS } \\ & \text { _10Ind } \end{aligned}$ | realised |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT | 0.585*** | 0.607*** | 0.488*** | 0.678*** | 0.662*** | 0.357*** | 0.645*** | 0.776*** | 0.840*** | 0.493*** | 0.573*** | 0.607*** | 0.184*** | 0.061*** | 0.030*** | 0.056*** | 0.150*** | 0.070 | 0.073*** |
| GLS |  | 0.462*** | 0.456*** | 0.502*** | 0.977*** | 0.370*** | 0.598*** | 0.743*** | 0.814*** | 0.384*** | 0.345*** | 0.465*** | 0.156*** | 0.130*** | -0.103*** | 0.084*** | 0.081*** | 0.094*** | 0.126*** |
| GM |  |  | 0.927*** | 0.564*** | 0.502*** | 0.844*** | 0.186*** | 0.912*** | 0.831*** | 0.446*** | 0.600*** | 0.639*** | 0.099*** | 0.081*** | -0.02*** | 0.049*** | 0.072*** | 0.016*** | 0.035*** |
| MPEG |  |  |  | 0.413*** | 0.47*** | 0.930** | 0.116*** | 0.889*** | 0.751*** | 0.380*** | 0.467*** | 0.57*** | 0.076*** | 0.086*** | -0.054*** | 0.045*** | 0.059*** | 0.018*** | 0.035*** |
| GG |  |  |  |  | 0.554*** | 0.483*** | 0.345*** | 0.598*** | 0.655*** | 0.436*** | 0.968*** | 0.428*** | 0.057*** | 0.043*** | 0.001 | 0.048*** | 0.053*** | 0.024*** | 0.051*** |
| FGHJ |  |  |  |  |  | 0.386*** | 0.610*** | 0.768*** | 0.844*** | 0.417*** | 0.374*** | 0.522*** | 0.174*** | 0.124*** | -0.072*** | 0.087*** | 0.099*** | 0.090*** | 0.119*** |
| PEG |  |  |  |  |  |  | -0.082*** | 0.653*** | 0.559*** | 0.304*** | 0.237*** | 0.405*** | -0.002 | 0.051*** | -0.055*** | 0.030*** | 0.025*** | -0.008*** | 0.005** |
| PE |  |  |  |  |  |  |  | 0.445*** | 0.54*** | 0.342*** | 0.403*** | 0.319*** | 0.215*** | 0.070*** | 0.005** | 0.057*** | 0.149*** | 0.132*** | 0.104*** |
| HL |  |  |  |  |  |  |  |  | 0.973*** | 0.478*** | 0.570*** | 0.671*** | 0.147*** | 0.096*** | -0.050*** | 0.067*** | 0.106*** | 0.056*** | 0.084*** |
| DKL |  |  |  |  |  |  |  |  |  | 0.498*** | 0.583*** | 0.671*** | 0.166*** | 0.101*** | -0.046*** | 0.072*** | 0.114*** | 0.067*** | 0.095*** |
| BP |  |  |  |  |  |  |  |  |  |  | 0.473*** | 0.422*** | 0.125*** | 0.040*** | 0.043*** | 0.048*** | 0.110*** | 0.012*** | 0.064*** |
| KMY |  |  |  |  |  |  |  |  |  |  |  | 0.432*** | 0.109*** | 0.035*** | 0.032*** | 0.040*** | 0.117*** | 0.045*** | 0.067*** |
| FPM |  |  |  |  |  |  |  |  |  |  |  |  | 0.247*** | 0.051*** | 0.036*** | 0.064*** | 0.193*** | 0.036*** | 0.062*** |
| TrOHE_10Ind |  |  |  |  |  |  |  |  |  |  |  |  |  | $-0.011^{* * *}$ | 0.004*** | 0.038*** | 0.170*** | 0.000 | $-0.010^{* * *}$ |
| TrES_25SBM |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.097*** | 0.048*** | 0.065*** | 0.077*** | 0.084*** |
| TrETSS_25SBM |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.094*** | 0.078*** | 0.045*** | 0.048*** |
| TrOHE_25SBM |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.022*** | 0.002 | 0.023*** |
| TrETSS_Ind10 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.129*** | 0.097*** |
| TrETSS_10Ind realised |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 0.103*** |

This table reports the correlation matrix that corresponds to Spearman rank order correlations of the various firm-level ICC estimates based on analysts earnings forecasts and the realised return.

Table 42: Summary Statistics of the Variables used in the Mechanical Models

|  | Mean | StD | Prert5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $A_{t}(\$$ mill $)$ | $7,778.170$ | $23,086.611$ | 62.181 | 353.002 | $1,178.238$ | $4,420.000$ | $34,163.000$ | 5.535 | 36.729 |
| $D_{t}(\$$ mill $)$ | 78.901 | 245.440 | 0.000 | 0.000 | 0.128 | 36.296 | 413.000 | 5.098 | 31.663 |
| $E_{t}(\$$ mill $)$ | 239.876 | 739.510 | -92.400 | 6.051 | 39.795 | 156.932 | $1,257.000$ | 4.639 | 27.711 |
| $A C_{t}(\$$ mill $)$ | -248.910 | 731.649 | $-1,302.100$ | -167.334 | -40.286 | -5.547 | 57.010 | -4.733 | 28.612 |
| Neg $E_{-} E_{t}(\$$ mill $)$ | -22.178 | 103.180 | -92.400 | 0.000 | 0.000 | 0.000 | 0.000 | -6.436 | 46.718 |
| $D D_{t}$ | 0.501 | 0.500 | 0.000 | 0.000 | 1.000 | 1.000 | 1.000 | -0.006 | 1.000 |
| Neg $E_{t}$ | 0.186 | 0.389 | 0.000 | 0.000 | 0.000 | 0.000 | 1.000 | 1.616 | 3.612 |
| $T A C C_{t}$ | 0.589 | 4.060 | -4.399 | -0.299 | 0.422 | 1.545 | 5.941 | -0.277 | 12.741 |
| $B_{t}$ | 12.376 | 15.157 | 0.539 | 4.050 | 8.494 | 15.394 | 36.101 | 3.553 | 19.932 |

This table reports the summary statistics of the regression variables used to generate mechanical forecasts of earnings. The units of the variables correspond to the units used in testing as described in section 2.3.3. $A_{t}$ is the total assets of the firm in millions of dollars, $D_{t}$ is the dividends paid by the firm, and $D D_{t}$ is a dummy to indicate whether a firm is paying dividends. $E_{t}$ is earnings in millions of dollars, and Neg $E_{t}$ is a dummy for loss making firms. $A C_{t}$ is the firm working capital accruals in millions of dollars, $T A C C_{t}$ is per-share total accruals according to Richardson, Sloan, Soliman, and Tuna (2005) definition, and $B_{t}$ is the per share book value of the firm.

Table 43: Summary Statistics of the Earnings Forecasts from Mechanical Models

|  | Mean | StD | Prcrt5 | Prcrt25 | Median | Prcrt75 | Prcrt95 | Skewness | Kurtosis |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| HDZ1 | 1.954 | 2.488 | -1.351 | 0.584 | 1.435 | 2.645 | 6.053 | 2.689 | 13.911 |
| HDZ2 | 2.313 | 3.011 | -0.652 | 0.656 | 1.519 | 2.939 | 7.228 | 3.321 | 17.750 |
| HDZ3 | 2.745 | 3.754 | -0.583 | 0.722 | 1.709 | 3.381 | 8.880 | 3.481 | 18.586 |
| HDZ4 | 3.106 | 4.476 | -0.450 | 0.761 | 1.829 | 3.682 | 10.490 | 3.636 | 19.481 |
| HDZ5 | 3.348 | 4.783 | -0.290 | 0.831 | 1.988 | 3.955 | 11.123 | 3.724 | 20.324 |
| EP1 | 2.795 | 8.774 | -19.623 | 0.291 | 2.008 | 6.508 | 13.264 | 1.051 | 12.450 |
| EP2 | 5.066 | 7.866 | -12.639 | 1.224 | 4.595 | 9.740 | 18.169 | -0.223 | 3.037 |
| EP3 | 7.459 | 8.725 | -10.395 | 1.929 | 7.372 | 13.225 | 23.237 | 0.096 | 2.705 |
| EP4 | 5.746 | 7.423 | -11.067 | 0.309 | 6.533 | 11.343 | 16.517 | -0.344 | 3.038 |
| EP5 | 1.940 | 6.852 | -13.496 | -0.615 | 1.683 | 7.432 | 10.777 | -0.331 | 3.184 |
| RI1 | 2.582 | 5.467 | -7.327 | -0.733 | 1.048 | 6.597 | 12.781 | 0.490 | 2.833 |
| RI2 | 4.444 | 8.275 | -7.703 | -1.359 | 1.529 | 11.032 | 19.795 | 0.704 | 2.418 |
| RI3 | 3.968 | 9.005 | -9.798 | -1.841 | 0.554 | 10.620 | 22.663 | 0.841 | 2.759 |
| RI4 | 1.592 | 6.260 | -9.211 | -1.957 | 0.971 | 4.155 | 14.205 | 0.552 | 3.105 |
| RI5 | -0.958 | 6.240 | -12.952 | -4.217 | -0.890 | 1.899 | 9.317 | 0.933 | 6.758 |

This table reports the summary statistics of the earnings forecasts from the mechanical forecasting models for up to 5 years. The models are: Hou, van Dijk, and Zhang (2012) model (HDZ), (2) Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI).

### 3.4 Portfolio Selection Empirical Results

### 3.4.1 Discussion of ICC Optimal Portfolios

In this section, I empirically compare the performance of the ICC strategies based on the tangency portfolio described in section 3.2, against the mean-variance portfolio. For each of the strategies, I compute the out-of-sample Sharpe ratios, the non-parametric bootstrapped p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding ICC portfolio and the mean variance portfolio is zero, and the turnover. Table (106) report the detailed results of this testing. In tables (45 and 44) I summarize the comparison between the ICC strategies and the optimal mean-variance portfolio. The latter table tabulates the ICC strategies Sharpe ratios by ICC models in the rows, and the source of earnings forecast used in the models in the columns. Five sources of earnings forecasts as well as 5 calibrated versions of these forecasts are used to estimate each of the ICC models (i.e. totalling to 10 versions of each of the ICC models). The portfolio-level models that have been transformed to yield firm-level estimates of expected returns (i.e. ETSS, ES, OHE, and WNG) have not been calibrated since the transformation involve the use of similar factors to the calibration. Models that do not use earnings forecasts (Naive, and the two transformations of OHE) have no versions based on mechanical earnings forecasts. The table reports the Sharpe ratios of each ICC strategy along with asterisks that denote the statistical significance of the difference between the respective Sharpe and the Sharpe of the mean variance portfolio if the ICC strategy has a larger ratio. Generally, most of the ICC tangent portfolios have higher out-of-sample risk-adjusted returns than a tangent portfolio based on average historical returns, and the difference is statistically significant in most cases.

To better understand the results, each model in table (45) have been assigned two symbols to indicate how the model fare against the mean-variance portfolio in terms of out-of-sample Sharpe ratio (the first symbol to the left), and turnover (the second symbol). If the Sharpe of the ICC strategy is higher than the mean-variance portfolio, and the nonparametric bootstrapped p-value is statistically significant, it would be assigned a $(\checkmark)$. If the Sharpe of the ICC is higher but the difference is not substantiated by the p -value, it would be assigned (?), or (x) if the mean-variance portfolio has a higher Sharpe. Similarly, the ICC
strategy would be assigned a $(\checkmark)$ if it has lower turnover, and (x) otherwise.
Using analysts estimates firstly, all ICC strategies based residual income framework (i.e. GLS, CT, FGHJ) as well as those based on the abnormal growth in earnings (i.e. PE, PEG, MPEG, and GM) have better Sharpe and turnover than the mean variance. Similarly, the strategies based on average ICC models (HL, DKL, KMY, and FPM) have better out-ofsample Sharpe and turnover than the benchmark. The dividend discount models report mixed results. The GG for instance, which has a terminal value based on earnings perpetuity, report significantly higher Sharpe and lower turnover than the benchmark. However, the dividend models that use price target in the terminal value (BP, and TPDPS) as well as the Naive model which resemble the terminal value of these dividend models, record higher turnovers than the mean-variance portfolio. Lastly, the transformed models (ES, ETSS, OHE, and WNG) had higher turnovers and an inconclusive difference in Sharpe ratios. With minor exceptions, the results did not qualitatively change much from replacing the analysts' earnings forecasts by forecasts based on mechanical models or calibrated versions of the forecasts. Among the exceptions, the PE and PEG models reported some inconclusive results, and the GG struggled with forecasts from RI mechanical model.

More specifically, the GLS (using analysts estimates), which is one of the most widely used ICC models, achieve a Sharpe ratio of 0.433 as compared to a mean-variance Sharpe ratio of negative 0.370 . The p -value of the difference between the GLS and the meanvariance Sharpe is 0.002 . The high recorded return variance 33.571 and turnover 28.089 of the mean-variance portfolio is the result of the known noisiness of realised returns which translates into extreme unstable weights in the mean-variance portfolio. Such return variance in the mean variance portfolio resulted in the fact that most ICC models have a higher riskadjusted return figures, which range from a maximum of 0.853 (GG_RW) to a minimum equivalent to the mean variance Sharpe (GG_RI_Clbrtd). Similarly, the lowest ICC turnover has been recorded to be 1.148 (FPM_Anlst_Clbrtd). Almost 129 ICC strategies recorded turnover below the turnover of the mean-variance portfolio.

In summary, in an optimal portfolio setting, expected returns derived from ICC models prove to have better out-of-sample performance than expected returns based on ex-post re-

Table 44: Summary: ICC Optimal Strategies Sharpe Ratio Comparison with MeanVariance Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| BP | $0.262^{*}$ | -0.079 | 0.084 | $0.433^{* * *}$ | 0.127 | $0.231^{*}$ | $0.512^{* * *}$ | $0.174^{*}$ | $0.211^{* *}$ | -0.171 |  |
| CT | $0.209^{*}$ | $0.612^{* * *}$ | $0.447^{* * *}$ | -0.104 | $0.481^{* *}$ | $0.54^{* * *}$ | $0.772^{* * *}$ | -0.23 | -0.296 | -0.075 |  |
| DKL | $0.366^{* *}$ | $0.531^{* * * *}$ | $0.307^{*}$ | $0.556^{* * *}$ | $0.369^{* * *}$ | $0.547^{* * *}$ | $0.712^{* * *}$ | $0.42^{* *}$ | $0.335^{* * *}$ | -0.014 |  |
| FGHJ | $0.38^{* *}$ | $0.525^{* * *}$ | $0.192^{* *}$ | $0.666^{* * *}$ | $0.291^{* *}$ | $0.547^{* * *}$ | $0.695^{* * *}$ | -0.051 | $0.672^{* * *}$ | $0.186^{*}$ |  |
| FPM | $0.397^{* *}$ | $0.379^{* *}$ | $0.696^{* * *}$ | $0.278^{*}$ | $0.263^{*}$ | $0.423^{* *}$ | $0.514^{* * *}$ | $0.426^{* * *}$ | $0.186^{*}$ | 0.002 |  |
| GG | $0.378^{* *}$ | $0.597^{* * *}$ | $0.853^{* * *}$ | $0.21^{* *}$ | -0.046 | $0.469^{* *}$ | 0.201 | $0.209^{*}$ | -0.207 | -0.37 |  |
| GLS | $0.433^{* *}$ | $0.6^{* * * *}$ | $0.337^{* * *}$ | $0.593^{* * *}$ | -0.206 | $0.548^{* * *}$ | $0.689^{* * *}$ | $0.2^{*}$ | $0.541^{* * *}$ | $0.123^{*}$ |  |
| GM | $0.342^{* *}$ | $0.161^{*}$ | $0.374^{* *}$ | $0.364^{* *}$ | $0.615^{* * *}$ | $0.557^{* * *}$ | -0.067 | -0.176 | $0.22^{* *}$ | $0.32^{* *}$ |  |
| HL | $0.346^{* *}$ | $0.477^{* * *}$ | $0.285^{*}$ | $0.626^{* *}$ | $0.431^{* * *}$ | $0.547^{* * *}$ | $0.7^{* * *}$ | $0.272^{*}$ | $0.177^{*}$ | -0.097 |  |
| KMY | $0.381^{* *}$ | $0.587^{* * *}$ | $0.384^{* *}$ | $0.641^{* * *}$ | 0.037 | $0.571^{* * *}$ | $0.511^{* *}$ | $0.289^{*}$ | -0.24 | -0.348 |  |
| MPEG | $0.282^{*}$ | $0.338^{* *}$ | $0.432^{* *}$ | $0.479^{* *}$ | $0.618^{* * *}$ | $0.491^{* *}$ | -0.133 | 0.058 | $0.396^{* * *}$ | $0.22^{* *}$ |  |
| PE | $0.148^{*}$ | -0.08 | $0.743^{* * *}$ | 0.017 | 0.026 | $0.466^{* *}$ | $0.81^{* * *}$ | -0.222 | $0.347^{* *}$ | 0.088 |  |
| PEG | $0.286^{*}$ | $0.244^{*}$ | -0.164 | $0.368^{* *}$ | -0.221 | -0.289 | -0.066 | $0.525^{* * *}$ | -0.13 | $0.637^{* * *}$ |  |
| TPDPS | $0.063^{*}$ | -0.082 | 0.014 | 0.165 | 0.178 | $0.092^{*}$ | 0.112 | 0.079 | $0.163^{*}$ | 0.121 |  |
| ES_10Ind | $0.336^{* * *}$ | $0.467^{* * *}$ | -0.311 | $0.277^{* * *}$ | 0.033 |  |  |  |  | -0.078 |  |
| ES_25SMB | 0.085 | -0.081 | $0.193^{* *}$ | -0.297 | -0.213 |  |  |  |  | -0.006 |  |
| ETSS_10Ind | -0.311 | -0.239 | -0.239 | 0.096 | $0.257^{* * *}$ |  |  |  | $0.284^{* *}$ |  |  |
| ETSS_25SBM | $0.252^{* * *}$ | -0.125 | -0.004 | $0.091^{*}$ | $0.244^{* * *}$ |  |  |  | $0.303^{* * *}$ |  |  |
| WNG | -0.1 | $0.128^{*}$ | $0.115^{*}$ | $0.21^{* * *}$ | 0.111 |  |  |  |  |  |  |
| OHE_10Ind | -0.31 |  |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | $0.242^{* * *}$ |  |  |  |  |  |  |  |  |  |  |
| Naive | -0.199 |  |  |  |  |  | -0.199 |  |  |  |  |

This table is a summary of table (106) where ICC strategies using various sources of earnings forecasts (the columns) are compared to mean-variance (MV) strategy in terms of Sharpe ratio. The Sharpe ratio of each strategy is reported. If the ICC Sharpe is higher than the MV, asterisk indicates if the difference is significant using non-parametric bootstrapped p-values. $5 \%, 1 \%$, and $0.1 \%$ level of significance are indicated by one, two, and three asterisks respectively.
turn data. This is especially evident when the estimates are produced by residual income models, models based on abnormal growth in earnings, and average ICC models. However, these conclusions are not as evident in models that are based on dividend discount models, and those estimates obtained by transforming portfolio-level estimates to firm-level estimates ${ }^{15}$.

### 3.4.2 Discussion of ICC Market Timing Strategies

I turn now to empirically compare the performance of the ICC market timing strategies described in the Data and Methodology section against conventional Reward-to-Risk Timing (RRT) portfolios and $1 / \mathrm{N}$. Similar to the previous testing, for each of the strategies, I compute the out-of-sample Sharpe ratios, the non-parametric bootstrapped p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding ICC portfolio and the RRT portfolio is zero, and the turnover. Table (107) report the detailed results of

[^10]Table 45: Summary: ICC Optimal Strategies Sharpe Ratio and Turnover Comparison with Mean-Variance Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP | $\checkmark \mathrm{x}$ | ? $\checkmark$ | ? x | $\checkmark \checkmark$ | ? $\checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | $\checkmark \checkmark$ | ? $\checkmark$ |
| CT | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | ? $\checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | ? $\checkmark$ |
| DKL | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | ? $\checkmark$ |
| FGHJ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| FPM | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |
| GG | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | x X |
| GLS | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| GM | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| HL | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |
| KMY | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ |
| MPEG | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| PE | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | ? x | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \mathrm{x}$ | ? x |
| PEG | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | ? x | ? x | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ |
| TPDPS | $\checkmark \mathrm{x}$ | $? \checkmark$ | ? x | $? \checkmark$ | $? \checkmark$ | $\checkmark \mathrm{x}$ | $? \checkmark$ | ? x | $\checkmark \checkmark$ | $? \checkmark$ |
| ES_10Ind | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | ? x |  |  |  |  |  |
| ES_25SMB | ? x | ? x | $\checkmark \mathrm{x}$ | ? x | ? x |  |  |  |  |  |
| ETSS_10Ind | ? x | ? x | ? x | $? \checkmark$ | $\checkmark \mathrm{x}$ |  |  |  |  |  |
| ETSS_25SBM | $\checkmark \mathrm{x}$ | ? x | ? x | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ |  |  |  |  |  |
| WNG | ? x | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | ? x |  |  |  |  |  |
| OHE_10Ind | ? x |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | $\checkmark \mathrm{x}$ |  |  |  |  |  |  |  |  |  |
| Naive | ? x |  |  |  |  | ? x |  |  |  |  |

This table is a summary of table (106) where ICC strategies using various sources of earnings forecasts (the columns) are compared to mean-variance (MV) strategy in terms of Sharpe ratio and turnover. Two symbols are assigned to each of the ICC strategies. The first symbol contrast the Sharpe against MV Sharpe ratio, and the second compare the turnover as follows:

- $\checkmark \checkmark$ Significantly higher Sharpe, and lower turnover.
- $\checkmark$ x Significantly higher Sharpe, and higher turnover.
- ? $\checkmark$ Higher Sharpe, and lower turnover.
- ? x Higher Sharpe, and higher turnover.
- $\mathrm{x} \checkmark$ Lower Sharpe, and lower turnover.
- x x Lower Sharpe, and higher turnover.
this testing. A summary of the out-of-sample risk-adjusted returns of the ICC timing portfolios and the statistical difference between it and the RRT and $1 / \mathrm{N}$ is presented in tables (46) and (47) respectively. Both tables report that the majority of the ICC strategies have Sharpe ratios that are higher than the RRT and $1 / \mathrm{N}$, and the difference is statistically attested.

In table (48) I summarize the comparison between the ICC strategies and the RRT portfolio in terms of Sharpe and turnover. This latter table tabulates the results by ICC models in the rows, and the source of earnings forecast used in the models in the columns.

Using analysts estimates firstly, all ICC based timing strategies -except for the transformed models- have higher Sharpe Ratios than RRT with a statistically significant difference. In fact, no ICC timing strategy - including those based on mechanical forecasts of earnings and calibrated versions - have Sharpe that is lower than RRT. In terms of the turnover of the strategies the results are mixed. Using analysts forecasts, all average ICC models (HL, KML, DKL, and FPM) have lower turnovers as compared to the benchmark. Similarly, the following models have reported turnovers lower than RRT: CT, GG, and GM. Among the mechanical models of earnings forecasts, the ICC portfolios worked best with HDZ and worst with the random walk (RW).

More specifically, the RRT portfolio reported a Sharpe ratio of 0.087 . Almost 160 ICC timing strategy reported a Sharpe higher than RRT. The maximum Sharpe is reported by PE_RI 0.627. In terms of turnover the RRT reported 0.477 . Although only about 30 ICC timing strategies have a lower turnover than RRT, at least 60 more ICC strategies have turnovers that are within $10 \%$ of the RRT turnover.

Comparing the ICC timing strategies to $1 / \mathrm{N}$, except for a few strategies, the ICC timing portfolios show higher out-of-sample Sharpe ratios, and in most of these cases, the difference is statistically significant. Similarly, many of the ICC portfolios reported smaller or practically similar trading volumes.

Overall, the evidence for the superiority of ICC timing strategies over conventional RRT and $1 / \mathrm{N}$ is overwhelming in terms of risk-adjusted returns. Some of the ICC strategies report lower turnover than RRT and $1 / \mathrm{N}$, many others reported practically similar turnovers, but some reported higher potential trading. One possible explanation to this observation is that

Table 46: Summary: ICC Timing Strategies Sharpe Ratio Comparison with RRT Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| BP | $0.399^{* *}$ | $0.398^{* *}$ | $0.424^{*}$ | $0.46^{* *}$ | $0.453^{* *}$ | $0.369^{*}$ | $0.365^{*}$ | 0.267 | $0.378^{*}$ | $0.335^{*}$ |  |
| CT | $0.3^{* *}$ | $0.365^{* *}$ | $0.38^{* *}$ | $0.385^{* *}$ | $0.451^{* *}$ | $0.341^{* *}$ | $0.404^{* * *}$ | 0.207 | $0.281^{*}$ | $0.34^{* *}$ |  |
| DKL | $0.314^{* *}$ | $0.355^{* *}$ | $0.375^{* * *}$ | $0.415^{* * *}$ | $0.436^{* *}$ | $0.342^{* * *}$ | $0.392^{* *}$ | $0.318^{* *}$ | $0.315^{* *}$ | $0.302^{* *}$ |  |
| FGHJ | $0.334^{* *}$ | $0.365^{* * *}$ | 0.258 | $0.368^{* *}$ | $0.405^{* * *}$ | $0.34^{* * *}$ | $0.366^{* *}$ | 0.198 | $0.395^{* * *}$ | $0.277^{* *}$ |  |
| FPM | $0.301^{* *}$ | $0.291^{* *}$ | 0.129 | $0.266^{*}$ | $0.411^{* * *}$ | $0.32^{* *}$ | $0.308^{*}$ | 0.311 | $0.238^{*}$ | 0.303 |  |
| GG | $0.307^{* *}$ | $0.379^{* *}$ | $0.414^{* * *}$ | 0.234 | 0.366 | $0.313^{* *}$ | $0.396^{* *}$ | 0.169 | $0.391^{*}$ | 0.312 |  |
| GLS | $0.353^{* *}$ | $0.383^{* * *}$ | 0.268 | $0.385^{* *}$ | $0.431^{* *}$ | $0.343^{* *}$ | $0.383^{* *}$ | $0.293^{* *}$ | $0.371^{* * *}$ | $0.367^{* *}$ |  |
| GM | $0.285^{* *}$ | $0.268^{*}$ | $0.347^{* *}$ | $0.257^{*}$ | $0.31^{* *}$ | $0.343^{* * *}$ | $0.445^{* * *}$ | 0.251 | $0.267^{*}$ | $0.343^{*}$ |  |
| HL | $0.304^{* *}$ | $0.346^{* *}$ | $0.366^{* *}$ | $0.41^{* * *}$ | $0.426^{* *}$ | $0.343^{* * *}$ | $0.397^{* *}$ | $0.318^{* *}$ | $0.32^{* *}$ | $0.272^{*}$ |  |
| KMY | $0.306^{* *}$ | $0.363^{* *}$ | $0.37^{* *}$ | $0.393^{* *}$ | $0.417^{* *}$ | $0.349^{* * *}$ | $0.395^{* *}$ | $0.321^{* *}$ | $0.303^{* *}$ | $0.306^{*}$ |  |
| MPEG | $0.274^{* *}$ | $0.32^{* *}$ | $0.349^{* *}$ | $0.313^{* *}$ | $0.337^{* *}$ | $0.351^{* * *}$ | $0.367^{* *}$ | $0.296^{*}$ | 0.174 | 0.258 |  |
| PE | $0.326^{*}$ | $0.474^{* * *}$ | $0.602^{*}$ | $0.459^{*}$ | $0.627^{* * *}$ | $0.385^{* *}$ | $0.469^{* *}$ | 0.016 | 0.312 | 0.019 |  |
| PEG | $0.274^{* *}$ | $0.313^{* *}$ | $0.339^{* *}$ | 0.259 | 0.225 | $0.319^{* *}$ | $0.427^{* *}$ | $0.289^{*}$ | 0.207 | 0.042 |  |
| TPDPS | $0.401^{* *}$ | $0.399^{* *}$ | $0.373^{*}$ | $0.461^{* *}$ | $0.464^{* *}$ | $0.403^{* *}$ | $0.396^{* *}$ | $0.397^{*}$ | $0.453^{* *}$ | $0.457^{* *}$ |  |
| ES_10Ind | 0.312 | 0.301 | 0.29 | $0.448^{*}$ | 0.088 |  |  |  |  |  |  |
| ES_25SMB | 0.224 | 0.127 | 0.213 | 0.2 | 0.39 |  |  |  |  |  |  |
| ETSS_10Ind | 0.22 | 0.158 | 0.101 | 0.201 | 0.116 |  |  |  |  |  |  |
| ETSS_25SBM | $0.316^{*}$ | 0.126 | -0.042 | 0.144 | 0.127 |  |  |  |  |  |  |
| WNG | 0.077 | 0.164 | 0.033 | 0.276 | 0.31 |  |  |  |  |  |  |
| OHE_10Ind | 0.26 |  |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | 0.312 |  |  |  |  |  |  |  |  |  |  |
| Naive | $0.402^{* *}$ |  |  |  |  |  | $0.402^{* *}$ |  |  |  |  |

This table is a summary of table (106) where ICC market timing strategies using various sources of earnings forecasts (the columns) are compared to conventional Reward-to-Risk (RRT) strategy in terms of Sharpe ratio. The Sharpe ratio of each strategy is reported. If the ICC Sharpe is higher than the RRT, asterisk indicates if the difference is significant using non-parametric bootstrapped p-values. $5 \%, 1 \%$, and $0.1 \%$ level of significance are indicated by one, two, and three asterisks respectively.
the research design of limiting the sample every month to firms that have ICC estimates using all the models used, result in high turnover. To minimize the possibility that firms go out of the sample suddenly in some months because they have a missing ICC estimate - and hence increasing the turnover- in the next section, I replace the missing ICC estimates by the last available estimate from the same model up to 12 months ahead.

### 3.5 Additional Analysis

### 3.5.1 Portfolio Turnover

In the previous sections, I have demonstrated that in optimal and timing strategies, investors are better off using ICC models to generate expected return estimates instead of the ex-post first moment. Many of the ICC models made the respective strategies generate lower turnover, but on some occasions - especially timing strategies - this was not the case. In this section, I analyse whether the research design implemented is the reason for the relatively higher turnover in some ICC strategies. Specifically, in the previous analysis,

Table 47: Summary: ICC Timing Strategies Sharpe Ratio Comparison with 1/N Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| BP | $0.399^{*}$ | $0.398^{*}$ | 0.424 | $0.46^{*}$ | $0.453^{*}$ | $0.369^{*}$ | 0.365 | 0.267 | 0.378 | 0.335 |
| CT | $0.3^{*}$ | $0.365^{*}$ | $0.38^{* *}$ | $0.385^{*}$ | $0.451^{*}$ | $0.341^{* *}$ | $0.404^{* *}$ | 0.207 | 0.281 | 0.34 |
| DKL | $0.314^{*}$ | $0.355^{*}$ | $0.375^{* *}$ | $0.415^{* *}$ | $0.436^{* *}$ | $0.342^{* *}$ | $0.392^{* *}$ | $0.318^{* *}$ | $0.315^{*}$ | 0.302 |
| FGHJ | $0.334^{* *}$ | $0.365^{* *}$ | 0.258 | $0.368^{* *}$ | $0.405^{* * *}$ | $0.34^{* *}$ | $0.366^{* *}$ | 0.198 | $0.395^{* *}$ | 0.277 |
| FPM | $0.301^{*}$ | 0.291 | 0.129 | 0.266 | $0.411^{*}$ | $0.32^{* *}$ | 0.308 | 0.311 | 0.238 | 0.303 |
| GG | $0.307^{* *}$ | $0.379^{* *}$ | $0.414^{* *}$ | 0.234 | 0.366 | $0.313^{* *}$ | $0.396^{* *}$ | 0.169 | 0.391 | 0.312 |
| GLS | $0.353^{* *}$ | $0.383^{* *}$ | 0.268 | $0.385^{* *}$ | $0.431^{* *}$ | $0.343^{* *}$ | $0.383^{* *}$ | $0.293^{*}$ | $0.371^{* *}$ | $0.367^{*}$ |
| GM | $0.285^{*}$ | 0.268 | $0.347^{* *}$ | 0.257 | 0.31 | $0.343^{* *}$ | $0.445^{* *}$ | 0.251 | 0.267 | 0.343 |
| HL | $0.304^{*}$ | $0.346^{*}$ | $0.366^{* *}$ | $0.41^{* *}$ | $0.426^{*}$ | $0.343^{* *}$ | $0.397^{* *}$ | $0.318^{* *}$ | $0.32^{*}$ | 0.272 |
| KMY | $0.306^{* *}$ | $0.363^{*}$ | $0.37^{* *}$ | $0.393^{*}$ | $0.417^{*}$ | $0.349^{* *}$ | $0.395^{* *}$ | $0.321^{* *}$ | $0.303^{*}$ | 0.306 |
| MPEG | 0.274 | $0.32^{*}$ | $0.349^{* *}$ | $0.313^{*}$ | $0.337^{*}$ | $0.351^{* *}$ | $0.367^{*}$ | 0.296 | 0.174 | 0.258 |
| PE | $0.326^{*}$ | $0.474^{* * *}$ | 0.602 | $0.459^{*}$ | $0.627^{* * *}$ | $0.385^{* *}$ | $0.469^{*}$ | 0.016 | 0.312 | 0.019 |
| PEG | 0.274 | $0.313^{*}$ | $0.339^{* *}$ | 0.259 | 0.225 | $0.319^{* *}$ | $0.427^{*}$ | 0.289 | 0.207 | 0.042 |
| TPDPS | $0.401^{*}$ | $0.399^{*}$ | 0.373 | $0.461^{*}$ | $0.464^{* *}$ | $0.403^{*}$ | $0.396^{*}$ | 0.397 | $0.453^{*}$ | $0.457^{*}$ |
| ES_10Ind | 0.312 | 0.301 | 0.29 | $0.448^{*}$ | 0.088 |  |  |  |  |  |
| ES_25SMB | 0.224 | 0.127 | 0.213 | 0.2 | 0.39 |  |  |  |  |  |
| ETSS_10Ind | 0.22 | 0.158 | 0.101 | 0.201 | 0.116 |  |  |  |  |  |
| ETSS_25SBM | 0.316 | 0.126 | -0.042 | 0.144 | 0.127 |  |  |  |  |  |
| WNG | 0.077 | 0.164 | 0.033 | 0.276 | 0.31 |  |  |  |  |  |
| OHE_10Ind | 0.26 |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | 0.312 |  |  |  |  |  |  |  |  |  |
| Naive | $0.402^{*}$ |  |  |  |  |  |  | $0.402^{*}$ |  |  |

This table is a summary of table (106) where ICC market timing strategies using various sources of earnings forecasts (the columns) are compared to $1 / \mathrm{N}$ strategy in terms of Sharpe ratio. The Sharpe ratio of each strategy is reported. If the ICC Sharpe is higher than the RRT, asterisk indicates if the difference is significant using non-parametric bootstrapped p-values. $5 \%, 1 \%$, and $0.1 \%$ level of significance are indicated by one, two, and three asterisks respectively.

I limit the sample every month to the list of firms that have ICC estimates from all of the models used. This means that if one of the models have a missing value in a certain month for a particular firm, that firm gets dropped from the sample to ensure that all strategies are using the same list of underlying firms each month. However, this could affect the turnover adversely if some firms get dropped suddenly from a particular strategy universe. In the following analysis, I address this potential issue by using the last available ICC estimate in case of a missing value for a particular model up to 12 months. This would potentially reduce the possibility of firms getting out of the sample suddenly because of missing values, which sometimes happens due to issues with the database of the underlying variables having occasionally missing values.

Table (108) report the optimal ICC portfolios results, and table (109) report the timing ICC portfolios results using this modified sample to minimize missing values. The results are intriguing. Firstly, no notable departure in the conclusions has been observed between this set of results and the previous analysis in terms of the out-of-sample Sharpe ratio

Table 48: Summary: ICC Timing Strategies Sharpe Ratio and Turnover Comparison with RRT Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ |
| CT | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| DKL | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| FGHJ | $\checkmark$ x | $\checkmark$ x | ? x | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| FPM | $\checkmark \checkmark$ | $\checkmark \checkmark$ | ? x | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | ? x |
| GG | $\checkmark \checkmark$ | $\checkmark$ x | $\checkmark \mathrm{x}$ | ? x | ? x | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | $? \checkmark$ | $\checkmark \mathrm{x}$ | ? x |
| GLS | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| GM | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | ? x | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| HL | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| KMY | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| MPEG | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\checkmark$ x | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | ? x | ? x |
| PE | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\sqrt{ } \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \checkmark$ | $\mathrm{x} \checkmark$ | $? \checkmark$ | $\mathrm{x} \checkmark$ |
| PEG | $\sqrt{ } \mathrm{x}$ | $\checkmark \checkmark$ | $\checkmark \mathrm{x}$ | ? x | ? x | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\sqrt{ } \mathrm{x}$ | ? $\checkmark$ | $\mathrm{x} \checkmark$ |
| TPDPS | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ | $\checkmark \mathrm{x}$ |
| ES_10Ind | ? x | ? x | ? x | $\checkmark \mathrm{x}$ | ? x |  |  |  |  |  |
| ES_25SMB | ? x | ? x | ? x | ? x | ? x |  |  |  |  |  |
| ETSS_10Ind | ? x | ? x | ? x | ? x | ? x |  |  |  |  |  |
| ETSS_25SBM | $\checkmark \mathrm{x}$ | ? x | x X | ? x | ? x |  |  |  |  |  |
| WNG | x X | ? x | x X | ? x | ? x |  |  |  |  |  |
| OHE_10Ind | ? x |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | ? x |  |  |  |  |  |  |  |  |  |
| Naive | $\checkmark \mathrm{x}$ |  |  |  |  | $\checkmark \mathrm{x}$ |  |  |  |  |

This table is a summary of table (106) where ICC market timing strategies using various sources of earnings forecasts (the columns) are compared to conventional Reward-to-Risk (RRT) strategy in terms of Sharpe ratio and turnover. Two symbols are assigned to each of the ICC timing strategies. The first symbol contrast the Sharpe against RRT Sharpe ratio, and the second compare the turnover as follows:

- $\checkmark \checkmark$ Significantly higher Sharpe, and lower turnover.
- $\checkmark$ x Significantly higher Sharpe, and higher turnover.
- ? $\checkmark$ Higher Sharpe, and lower turnover.
- ? x Higher Sharpe, and higher turnover.
- $\mathrm{x} \checkmark$ Lower Sharpe, and lower turnover.
- x x Lower Sharpe, and higher turnover.
performance of the ICC strategies when compared to the respective benchmarks. Specifically, most of the optimal ICC strategies based on analysts forecasts had statistically larger Sharpe ratios than the mean-variance portfolio. The exceptions as in the previous analysis are recorded mostly with the transformed models where the differences in risk adjusted return is not substantiated by the non-parametric p-values. In fact, no ICC strategy (including those based on mechanical forecasts and calibrated estimates) reported a Sharpe that is lower than the mean variance portfolio, and in the majority of them, the superiority is statistically attested. Similarly, except for WNG and versions of PEG and FPM that are based on a random walk (RW) estimates, all ICC timing strategics reported higher Sharpe ratios than RRT. In most of the cases, the difference is statistically significant. For instance, looking at the strategies based on analysts forecasts, BP, CT, DKL, FGHJ, FPM, GLS, GM, HL, KMY, MPEG, PEG, and four of the transformed models all reported bootstrapped $p$-values that are significant.

Having noted the consistency of the conclusion regarding the risk-adjusted return of ICC strategies between the previous and this sample, I turn now to the turnover. As expected, some of the strategies that reported higher turnover than the benchmark in the previous analysis now reported lower turnover. For instance, in the previous analysis, analysts-based ICC optimal strategies all reported lower turnover except transformed models and dividend models based on target price terminal value. Table (108) now shows that BP_Anlst has lower turnover than the mean-variance portfolio. However, some other strategies, especially those based on Random Walk(RW), had issues with turnover. A similar observation is noted from the timing strategies. Unlike in the previous section, analysts-based strategies such as FGHJ and GLS reported less turnover than the RRT. However, other strategies have not responded to a more continues sample as expected in terms of turnover.

To further investigate this issue of turnover more specifically, I introduce a turnover constraint to the portfolios using the method of Kourtis (2015). In particular, in the meanvariance context, the investor is assumed to be minimising both the portfolio variance and the deviation in portfolio weighs in consecutive periods:

$$
\begin{equation*}
\min x_{t}^{\prime} \cdot \Sigma_{t} \cdot x_{t}+c_{t}\left(x_{t}-\hat{x}_{t}\right)^{\prime} \cdot \Sigma_{t} \cdot\left(x_{t}-\hat{x}_{t}\right) \tag{76}
\end{equation*}
$$

where $c_{t}$ is a stability parameter and $\hat{x}_{t}$ is the weight before rebalancing. Since this formulation does not impose any limitation on how to estimate the efficient portfolio, this stabilization procedure may be applied to any sample based asset selection strategy. Kourtis (2015) show analytically that the composition of the stable portfolio may be expressed as a linear combination of a portfolio lying on the efficient frontier (say $x_{t}$ ) and the one that is already held by the investor before rebalancing:

$$
\begin{equation*}
x_{t}=\frac{1}{1+c_{t}} x_{t}^{e f f i c i e n t}+\frac{c_{t}}{1+c_{t}} \hat{x}_{t} \tag{77}
\end{equation*}
$$

Setting for instance $c_{t}$ in such a way to obtain a portfolio turnover equal to the one produced by the $1 / \mathrm{N}$ strategy, produce results as in table (110) for ICC optimal portfolios, and table (111) for ICC timing portfolios. To summarize the results in those two tables, table (49) show how the ICC optimal portfolios work as compared to the mean-variance portfolio, and table (50) summarize the performance of ICC timing strategies against RRT.

The results are as expected. The optimal ICC portfolios - with almost no exceptions - had higher Sharpe ratios and lower turnover than the mean-variance portfolio. Similarly, with few exceptions, the ICC timing strategies had higher Sharpe ratios and lower turnover than RRT. Nevertheless, in the timing portfolios, the higher Sharpe ratios were not accompanied with statistical significance in many cases. This empirical observation highlights the difference between market timing strategies and optimal strategies. By constraining the turnover, the optimal strategies still offer better risk-adjusted returns than the mean-variance, However, the market timing strategies although report higher Sharpe than conventional RRT, the difference is not attested by bootstrapped p -values. The difference between optimal strategies and market timing strategies is mainly in the structure of the covariance matrix. Therefore, it seems that the extremely shrunk covariance matrix in the timing strategies does not allow much room for better risk-adjusted returns after constraining the turnover of the strategy to the equally-weighted portfolio turnover.

Table 49: Summary: ICC Constrained Turnover Optimal Strategies Sharpe Ratio and Turnover Comparison with Constrained Turnover Mean-Variance Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| CT | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| DKL | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| FGHJ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| FPM | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | ? $\checkmark$ | $\checkmark \checkmark$ |
| GG | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| GLS | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| GM | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| HL | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| KMY | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| MPEG | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ |
| PE | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | ? $\checkmark$ |
| PEG | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |
| TPDPS | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| ES_10Ind | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| ES_25SMB | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |  |  |  |  |  |
| ETSS_10Ind | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| ETSS_25SBM | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ |  |  |  |  |  |
| WNG | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |  |  |  |  |  |
| OHE_10Ind | $\checkmark \checkmark$ |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | $\checkmark \checkmark$ |  |  |  |  |  |  |  |  |  |
| Naive | $\checkmark \checkmark$ |  |  |  |  | $\checkmark \checkmark$ |  |  |  |  |

This table is a summary of table (110) where ICC constrained turnover optimal strategies using various sources of earnings forecasts (the columns) are compared to turnover constrained mean-variance (MV) strategy in terms of Sharpe ratio and turnover. Two symbols are assigned to each of the ICC strategies. The first symbol contrast the Sharpe against MV Sharpe ratio, and the second compare the turnover as follows:

- $\checkmark \checkmark$ Significantly higher Sharpe, and lower turnover.
- $\checkmark x$ Significantly higher Sharpe, and higher turnover.
- ? $\checkmark$ Higher Sharpe, and lower turnover.
- ? x Higher Sharpe, and higher turnover.
- $\mathrm{x} \checkmark$ Lower Sharpe, and lower turnover.
- x x Lower Sharpe, and higher turnover.

Table 50: Summary: ICC Turnover Constrained Timing Strategies Sharpe Ratio and Turnover Comparison with RRT Strategy

|  | Analysts | HDZ | RW | EP | RI | CAnalysts | CHDZ | CRW | CEP | CRI |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP | $? \checkmark$ | ? $\checkmark$ | ? $\checkmark$ | ? $\checkmark$ | ? $\checkmark$ | $? \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $? \checkmark$ | ? $\checkmark$ |
| CT | $? \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ |
| DKL | $? \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |
| FGHJ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |
| FPM | $? \checkmark$ | ? $\checkmark$ | x | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ |
| GG | $? \checkmark$ | ? $\checkmark$ | ? $\checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $? \checkmark$ |
| GLS | $? \checkmark$ | ? $\checkmark$ | ? $\checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | ? $\checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |
| GM | $? \checkmark$ | ? $\checkmark$ | ? $\downarrow$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $? \checkmark$ |
| HL | $? \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| KMY | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ |
| MPEG | $? \checkmark$ | ? $\checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ |
| PE | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | x |
| PEG | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $\mathrm{x} \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ |
| TPDPS | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ |
| ES_10Ind | $? \checkmark$ | $? \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| ES_25SMB | $? \checkmark$ | ? $\checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| ETSS_10Ind | $? \checkmark$ | $? \checkmark$ | $\mathrm{x} \checkmark$ | $? \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| ETSS_25SBM | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| WNG | $? \checkmark$ | $\mathrm{x} \checkmark$ | $\mathrm{x} \checkmark$ | $\checkmark \checkmark$ | $? \checkmark$ |  |  |  |  |  |
| OHE_10Ind | $? \checkmark$ |  |  |  |  |  |  |  |  |  |
| OHE_25SBM | $? \checkmark$ |  |  |  |  |  |  |  |  |  |
| Naive | $? \checkmark$ |  |  |  |  | $? \checkmark$ |  |  |  |  |

This table is a summary of table (106) where ICC turnover constrained market timing strategies using various sources of earnings forecasts (the columns) are compared to turnover constrained Reward-to-Risk (RRT) strategy in terms of Sharpe ratio and turnover. Two symbols are assigned to each of the ICC timing strategies. The first symbol contrast the Sharpe against RRT Sharpe ratio, and the second compare the turnover as follows:

- $\checkmark \checkmark$ Significantly higher Sharpe, and lower turnover.
- $\checkmark$ x Significantly higher Sharpe, and higher turnover.
- ? $\checkmark$ Higher Sharpe, and lower turnover.
- ? x Higher Sharpe, and higher turnover.
- $\mathrm{x} \checkmark$ Lower Sharpe, and lower turnover.
- x x Lower Sharpe, and higher turnover.


### 3.5.2 Other Benchmark Portfolios

The general thesis of this chapter is that ICC estimates work better as expected return proxies in a portfolio selection context than ex-post realised returns first moment. Therefore, the benchmarks used so far to compare the performance of ICC strategies are the same strategies (i.e. TP and RRT) but using the first moment of realised returns. In this subsection, I steer the analysis toward benchmarks that do not resort to expected return measures.

Firstly I compare the ICC portfolios to naive $1 / \mathrm{N}$ strategy as portrayed by DeMiguel, Garlappi, and Uppal (2009). This strategy assigns equal weight to each asset in the portfolio and completely ignores the asset moments. The $1 / \mathrm{N}$ strategy is used as a benchmark strategy due to its simplicity, its property of not being affected by estimation error, and its usage by investors. $1 / \mathrm{N}$ does not yield short positions, and hence, it is a good indicator of whether active management can deliver better performance or whether the estimation errors eliminate the optimization benefits. Secondly, I use the minimum variance portfolio. Minimum variance strategy does not rely on expected return estimates, and hence, it gives an impression of how imprecise is the sample mean, and whether the estimation error in the mean is so large that not much is lost by ignoring it. The minimum variance portfolio still needs the estimation of the second moment in the covariance matrix. As discussed in section 3.2, the optimal ICC strategies are compared to the minimum variance portfolio where the weights are calculated by replacing the vector of expected returns by an all-ones vector in the TP formula. On the other hand, to make it comparable to the timing strategies the covariance matrix is limited to the diagonal of variances. This latter minimum variance strategy is referred to as volatility timing (VT). I have shown in section 3.2 how inherently the TP is at a disadvantage in terms of estimation risk as compared to such naive benchmarks that do not resort to expected return estimation. Keeping this caveat in mind, I proceed with the discussion of the results.

The last two columns from tables (106), (107), (110), and (111) report the p-values for the hypothesis test that the difference of the Sharpe ratio between the corresponding ICC portfolio and the benchmark (minimum variance/VT, and $1 / \mathrm{N}$ respectively) is zero.

Firstly, considering optimal ICC strategies in table (106), although at least 100 ICC
models reported Sharpe ratios higher than $1 / \mathrm{N}$, only a quarter of them are significant by the bootstrapped non-parametric p-value. The majority of these are strategies based on calibrated analysts estimates of ICC (CT, DKL, FGHJ, FPM, GG, GLS, HL, KMY, and MPEG), and calibrated HDZ forecasts (CT, DKL, FGHJ, GLS, HL, and PE). The FGHJ, GLS, HL, and KMY also reported significant differences with some other types of forecasts. Moreover, only 44 of the ICC optimal portfolios reported average Sharpe higher than the minimum variance strategy, but in most cases the difference is not significant.

Secondly, the ICC timing strategies as reported in table (107) depict stronger performance of market timing ICC strategies than seen in optimal portfolios setting against the VT and $1 / \mathrm{N}$. For instance, almost all models using analysts or calibrated analysts estimates generate higher Sharpe ratios than $1 / \mathrm{N}$. In fact, most of these differences are statistically significant. Using the mechanical estimates, the ICC timing strategies also recorded significantly higher Sharpe in more models than it did not, especially using HDZ and calibrated HDZ forecasts. The performance of the timing strategies is not as good when compared to VT, despite the fact that some models reported higher Sharpe than VT.

Table (110) present the results of the turnover-constrained optimal portfolio as described in section (3.5.1). Almost all ICC strategies in this setting had a lower turnover than $1 / \mathrm{N}$ and minimum-variance portfolio, accompanied with a higher Sharpe ratio, with statistically significant difference sometimes. The exceptions regarding the Sharpe ratio were clustered mainly in the strategies using random walk earnings forecasts and transformed portfoliolevel models.

Table (111) present the results of turnover-constrained timing portfolio as described in section (3.5.1). Almost all ICC strategies in this setting had a lower turnover than $1 / \mathrm{N}$ and minimum-variance portfolio, accompanied with a higher Sharpe ratio. The difference in the Sharpe between the strategies and the benchmark in most of the occasions is not statistically conclusive.

### 3.5.3 Risk Factors Models

It is worth presenting how the strategies tested so far work with expected returns generated from common risk factors models such CAPM, Fama and French (1993), Carhart (1997), and Fama and French (2015). This will shed some light on the difference between the ex-ante ICC estimates of expected returns and the risk factor estimates that are based on ex-post data. Among other results, table (106) report the results of using these factor models in a tangency portfolio. CAPM and Carhart (1997) report Sharpe ratios that are not statistically superior to the mean-variance portfolio, but Fama and French (1993) and Fama and French (2015) have better risk-adjusted returns than the mean variance strategy. All except CAPM report lower turnover than the mean-variance. In addition, none of the four modules beat the $1 / \mathrm{N}$ or the minimum variance portfolio in terms of risk-adjusted return or turnover.

On the other hand, table (107) which has these models operationalised in market timing strategy, disqualify all of these models in terms of risk-adjusted return and turnover to be contenders to the RRT, VT, or $1 / \mathrm{N}$.

In fact, even in table (110) and (111) which add a turnover constraint to the strategies, these models work well in terms of the turnover. However, the risk adjusted return of the three factor model in the optimal strategy, and all the four models in timing strategy are not higher than the respective main benchmark (mean-variance and RRT). Similarly, none of these models has Sharpe higher than $1 / \mathrm{N}$ or the minimum variance/VT portfolio.

### 3.6 Robustness Checks

### 3.6.1 Timing Portfolios Tuning Parameter

Following the discussion from the data and methodology section, Kirby and Ostdiek (2012) generalized the timing portfolios using a tuning parameter. In the previous analysis, I set the tuning parameter to 1 , as this follows directly from the tangency portfolio analysis by setting the covariance matrix to diagonal variances only matrix. Table (112) present the same set of results as in table (107) but after setting the tuning parameter of the timing strategies to 2 to check the robustness of the previous results. The two tables are qualitatively
the same.

### 3.6.2 Moments Estimation Window

In all the previous analysis, the estimation window is set to 60 months. To check that the results are robust to change in the estimation window, tables (113) and (114) are reestimations of tables (106) and (107) with an alternative window of 90 months. Except for some improvements in the performance of the timing strategies against $1 / \mathrm{N}$ and VT, the results are qualitatively identical.

### 3.7 A re-joinder: The ICC Models Horse Race and the Performance in Portfolio Setting

In the previous chapter, a detailed horse-race between the various ICC models has been conducted to assess their validity and relative performance in forecasting future expected returns. This chapter objective is not to assess the relative performance of the ICC estimates, but to investigate whether these models are able to provide better out-of-sample performance in portfolio selection than estimates based on ex-post data. Despite the fact that no systematic testing has been carried out to test the relative performance of these models in a portfolio setting, three general observations are worth noting in this context.

Firstly, in the previous chapter, analysts forecasts based models work better than estimates based on cross-sectional mechanical models. Similarly, analyst estimates have produced Sharpe ratios that are higher - with a statistically significant difference - than the benchmarks in more ICC models than any of the mechanical models (See tables 45 and 48).

Secondly, the results in the previous chapter illustrated that ICC estimates based on HDZ mechanical earnings forecasts are better than other mechanical estimates in predicting future realised returns. The out-of-sample risk-adjusted returns of HDZ timing and tangency portfolios, as in tables (45) and (48), also beat the respective benchmarks in more ICC models than any of the other mechanical models.

Thirdly, calibrating ICC estimates increases their prediction power, especially those based on analysts estimates. These results are attested by the out-of-sample performance
of the calibrated ICC strategies based on analysts forecasts. These observations are documented in the summary tables (45) and (48).

It is more challenging to issue a verdict about the specific ICC models performance against other ICC models in the portfolio context. This is due to the testing design in this chapter. This should be considered as a future research question, where the testing need to yield statistical measures (like the non-parametric bootstrapped p -values applied in this work) to test the difference between the models' risk-adjusted returns.

### 3.8 Conclusion

This chapter addresses the question of whether expected return estimates implied by accounting, analysts, and market data instead of average historical returns can improve portfolio selection out-of-sample performance. The literature previously dealt with the issue of estimation risk in portfolio context as a statistical issue. This chapter rather offers a new perspective by reverting back to the basics. Instead of dealing with the nosiness of exp-post estimates statistically, ex-ante expected return estimators are used, namely ICC models. Using two portfolio management styles, I demonstrate that such ex-ante estimates of expected returns yield better out-of-sample performance than portfolios based on realised returns.

Firstly, the results show that using ICC estimates instead of ex-post average retune in an optimal tangency portfolio result in more stable weights, higher out-of-sample Sharpe ratio, and lower turnover. The evidence presented shows that at least 94 ICC versions report statistically higher Sharpe ratios and lower turnover than the mean-variance portfolio.

Secondly, in market timing portfolios, the ICC estimates generate a higher out-of-sample average risk-adjusted return, and in many occasions lower turnovers than both conventional market timing portfolios and naive allocations like $1 / \mathrm{N}$. Specifically, 21 ICC versions reported statistically better Sharpe ratios and lower turnover than the conventional market timing portfolio of Kirby and Ostdiek (2012), and many more with statistically better Sharpe ratios but practically similar turnover. Similarly, 91 of ICC market timing allocations reported statistically higher out-of-sample risk-adjusted return than $1 / \mathrm{N}$.

In turnover-constrained versions of the strategies, I provide evidence that ICC expected
return estimates generate better out-of-sample risk-adjusted-return than strategies that use historical moments, even after constraining the turnover to the turnover generated from an equally weighted portfolio. I find that the ICC strategies retain their edge in terms of riskadjusted returns but with considerably lower turnover.

This work contributes to portfolio management research by introducing a new perspective on how market and accounting information can be used to drive expected return estimates that improve out-of-sample performance.

## 4 The Effects of Risk Similarity on Mergers and Acquisitions: Evidence Using Market Implied Cost of Capital

### 4.1 Introduction

The literature offers ample evidence that post-merger integration between target and acquirer is corner-stone to M\&A deals success. In fact, Larsson and Finkelstein (1999) claim that it is the most important factor of success. The ease of integration is induced by factors like the similarity of governance and CSR practises between the two firms (Bereskin, Byun, Officer, and Oh (2018)), national and firm cultural similarities (Weber, Shenkar, and Raveh (1996)), management style and organizational similarities (Datta (1991)), technology and knowledge similarities (Makri, Hitt, and Lane (2009)), marketing ideology (Homburg and Bucerius (2005)), strategic characteristics similarity (Ramaswamy (1997)), resources similarity and complementarity (Harrison, Hitt, Hoskisson, and Ireland (1991), and Chen and Wang (2014)), and ownership similarity (Bettinazzi, Miller, Amore, and Corbetta (2018)). However, there has been little empirical evidence about whether risk-profile fit between the target and the acquirer induce corporate integration, and hence, whether it is an important determinant of M\&A transactions success. I address this gap by investigating the effects of similarities in firms' implied cost of capital - to proxy for the degree of risk attached by market participants' to the entities - on merger likelihoods and outcomes. Specifically, I assess whether entities with similar risk - implied cost of capital - are more likely to form M\&A pairs, and if so, whether such transactions enjoy better outcomes. To the best of my knowledge, this is the first study that explicitly investigates the role of risk similarity in M\&A.

Market implied cost of capital (hereafter ICC) is an ideal proxy for company risk profile for several reasons. Firstly, it captures how market participants perceive the level of risk of the respective firms because it is the average discount rate applied by investors to future expected cash flows to determine the worth of the company. Secondly, ICC is arguably affected by all sorts of risk faced by a firm such as strategic, compliance, operational, market, and financing risks. Thirdly, it is established in the literature that ICC is perfectly correlated
with the conditional expected stock return and is helpful in detecting an inter-temporal risk return relation (Pastor, Sinha, and Swaminathan (2008)). Butler and Joaquin (1998) attest that cost of equity is the channel through which capital markets price the risk of the firm. It is a key input in the long-term investment decision of the firm, and hence, when implied from the market prices and fundamentals, it reflects the required return given the market perception of firm risk (Boubaker, Boubakri, Grira, and Guizani (2018)).

The cost of capital represents the opportunity cost faced by the firm in spending its limited resources. Due to the differences in cost of capital between firms, firms tend to attach different present values to mergers. Such differences in discount rates lead to varying incentives and objectives for merger formations and subsequently lead to different outcomes (See for instance, De Roos (2004) and Tombak (2002)). The differences in the discount rates applied by the market to various firms exist due to the different risk associated with different firms. For instance, Merton (1974), Andersson (2008), and Chava and Purnanandam (2010) show that this is due to different probabilities of bankruptcy. Others have shown that it is due to the risk of misusing agency and imperfect information received by the market (Harrington (1989)).

The hypothesis underlying this work is that similarity in the ICC reflects risk similarity between two companies. And that such similarity is positively related to the likeliness of companies forming M\&A pairs and to post-transaction performance. Consequently, the underlying story is that firms with similar ICC have similar risk profiles as judged by the market participants, and will experience smoother post-transaction integration. A deal that involves similar risk-profile entities is hypothesised to exhibit superior synergies, or will face lesser difficulties in realising the available opportunities of synergy. Differences in the riskprofiles of the firms' reflect differences in the plausible thresholds for operating, financing and investments activities, which if not congruent between merged firms, will levy higher costs of integration.

The first contention tested is that the higher the similarity in the systematic risk between two firms is, the higher the probability that the firms will merge together. This hypothesis is motivated by two rationales. First, all else equal, the shareholders of the acquirer would
prefer transactions that do not alter the systematic risk of the firm. An acquisition that involves targets which can impact the risk profile of the firm can lead to costly rebalancing in the shareholders portfolio. This is because shareholders may desire to maintain a desired level of risk or the merged firm may be incompatible with their investment style. ${ }^{16}$ Second, dissimilarities in the risk profile between the firms are likely to reflect dissimilarities in the risk propensity between their top management. Such differences in the management style can manifest in merger negotiations between the two parties and prevent the merger from forming (Datta (1991), Ramaswamy (1997), and Lin, Wei, and Xie (2018)).

The above hypothesis is plausible since an alternative will entail asserting that dissimilarity between the risk profiles of the firms' increase the likelihood of deal occurrence or merger success. This assertion could be based on the notion that differences between deal pairs is a source of value creation by complementarity or imposing a superior culture (Wang and Xie (2009)). Such an argument does not fit the risk-profile similarity as much as it could possibly fit the governance, culture, technology management style or marketing similarities. It does not fit since the risk of a business cannot be moulded without huge costs due to financial, operational, and regulatory constraints. The costs of moulding the business risk arguably erode any potential synergies. Moreover, the business risk is highly dependent on the nature of the business itself. Therefore, it is more sensible for an acquirer to target firms with similar risk-profiles from the outset instead of attempting to change the business model or the business risk.

Levi, Li, and Zhang (2012) argue that firms actively adjust behaviour to maintain the desired level of risk (i.e. risk homeostasis behaviour). They show for instance, that firms witnessing risk level decline relative to peers, will experience an increase in the level of risk to the original level post M\&A transactions. Similar patterns are also documented by Hackbarth and Morellec (2008) and Carlson, Fisher, and Giammarino (2010). Firms and managers have various reasons for maintaining the desired level of risk. Firstly, market participants do not appreciate firms changing their risk profiles dramatically, for instance

[^11]by acquiring significantly more or less riskier firm. By changing the risk profile significantly, firms face the threat of losing some of its investor base, which is costly in terms cost of funds (Grinblatt, Masulis, and Titman (1984), Lamoureux and Poon (1987), Kadlec and Mcconnell (1994), Miller (1999), Foerster and Karolyi (1999), and Grullon, Kanatas, and Weston (2004)). Investors pick stocks taking into consideration the riskiness of the underlying firms. Dramatically changing the risk-profile does not only create mis-balances in investors portfolios of assets, but also discourage investors due to the uncertainty and required research effort and resources needed in predicting firms' cash flows. This phenomenon is portrayed in the literature on information acquisition in competitive markets (e.g. Grossman, Stiglitz, Grossman, and Stiglitz (1980) and Verrecchia (1982)). Secondly, it is safer for the management to undertake corporate strategies that are in line in terms of risk to those taken by firms that are held to be widely comparable by the market and the board, as compared to taking idiosyncratic strategies (Levi et al. (2012)). This is due to the significant cost attached to undertaking a failing strategy alone as compared to failing with others. Such risk aversion and pressure to revert to 'norms' is well documented in financial decisions literature (e.g. Wermers (1999), Hong, Kubik, and Solomon (2000), and Hong and Kubik (2003)).

If the acquiring firm's shareholders favour targets of similar risk, one should expect to observe a positive relation between pre-merger risk similarity and the return on the acquirer's stock around deal announcements. I further hypothesize a positive relation between pre-merger risk similarity and post-merger profitability and risk. Again, differences in the pre-merger risk of the two firms can represent differences in the risk-attitudes of the management which are known to negatively affect post-merger performance (Datta (1991), and Ramaswamy (1997)). For example, the aggressive management of a relatively high-risk firm is likely not to be suitable to manage the assets and resources of a conservative firm (Thomas, Litschert, and Ramaswamy (1991)). The hypotheses can be further supported by the finding of Kruger, Landier, and Thesmar (2015) that firms tend to suboptimally invest in targets with different risk. As managers tend to use a single discount rate corresponding to the cost of capital of their firm when making merger decisions, they tend to ignore target
risk and end up with worse merger outcomes in both the short- and the long-term.
To test theses hypotheses, I devise a measure of similarity that is in line with measures used in Bereskin, Byun, Officer, and Oh (2018), Bena and Li (2014), Bloom, Schankerman, and Reenen (2013), and Jaffe (1986). The ICC similarity measure estimates the pairwise closeness of any two firms using 30 estimates of implied cost of capital. Using this ICC measure of similarity, I document that mergers are more likely between pairs of firms with higher ICC similarity. The testing shows that a one standard deviation increase in the ICC similarity increases the odds of a pair of firms merging by $24.45 \%{ }^{17}$ relative to a matched control sample of possible deals which did not happen. The magnitude reported is estimated after controlling for deal and firms' characteristics. I then report evidence that a one standard deviation increase in ICC similarity index is a associated with a $35 \%{ }^{18}$ increase in the odds of completing an announced deal, and at a $34 \%{ }^{19}$ shorter duration between announcement and effective date. Moreover, the acquirers in the top $25 \%$ of the ICC similarity spectrum enjoy more than $4 \%$ greater increase in long-term abnormal operating performance than deals with lower risk similarity between the participating firms as well as significantly less postacquisition goodwill write-offs. Moreover, I find that ICC similarity is positively associated with combined cumulative abnormal returns (CAR), which suggest that the markets appreciate deals with better risk-fit between the merger pair. In the additional analysis section, I show that the risk similarity between the target and the acquirer result in a lower average cost of capital of the combined firm in the three years subsequent to the completion of the deal.

For robustness, I investigate the results without truncating the implied cost of capital estimates at zero and 100. No change in the conclusions described above is recoded. I also address possible issues like the possibility that risk similarity index is capturing no more than the similarity in culture. I find no evidence of such claim. The correlation between cultural similarity and risk similarity is indistinguishable from zero. Moreover, I argue in the methodology section that the ex-ante implied cost of capital is far better proxy of capturing

[^12]the riskiness of a firm for the purpose of making investment decisions than ex-post risk factors like beta. I find very low correlation between a similarity score based on beta and a similarity score based on ICC as expected due to the nosiness of ex-post estimates, which make them less useful for inference (Lee, Ng, and Swaminathan (2009)). Empirically, Lee, So, and Wang (2017) show that two popular models of ICC outperform the CAPM and the Fama-French three-factor model (Fama and French (1993)) in terms of capturing the variation in realized returns. ${ }^{20}$. Running the tests using the beta similarity result in no major change in the results, except them being weaker.

Furthermore, I limit the ICC estimates to those based on analysts estimates only (as opposed to using mechanical estimates also), I find that the results are robust. I investigate the cross-sectional variation in the effects of the risk similarity on the deal likelihoods and outcomes. I find that the effect is stronger in labour intensive industries as compared to capital intensive industries. The effect is more prevalent in horizontal deals, followed by diversifying deals. The effect of the similarity in risk is less evident in vertical deal, perhaps due to the different motivation behind such deals (i.e. securing a customer or a supplier). Also, the effect is more observable in deals that involve larger targets and deals with acquirers that are considerably riskier than the target.

This chapter contributes to different strands in the literature. First, I identify risk relatedness between two firms as a driver of M\&A activity. In this manner, I add to the literature that examines the effects of various types of similarity between firms in merger formation and success (e.g., see Bereskin, Byun, Officer, and Oh (2018) and Bettinazzi, Miller, Amore, and Corbetta (2018) and the references therein). Second, I support previous research that examines the role of the systematic risk of the target in M\&A outcomes. For example, Hackbarth and Morellec (2008) model the dynamics of the beta of the bidding firm around a merger. Their model predicts that the beta of the acquirer should increase (decrease) before the acquisition, if it is higher (lower) than the target beta while a reversal of this change is predicted after the merger. Kruger, Landier, and Thesmar (2015) provide evidence that managers tend to ignore the risk of the target as reflected in the traditional weighted aver-

[^13]age cost of capital (WACC) measure. As a result, they tend to engage in value-destroying transactions when the risk of the target is higher than that of the acquirer. A fundamental difference between these studies and this chapter is that I use the implied cost of capital instead of the beta as a proxy of systematic risk. Third, I contribute to the literature that examines how the cost of capital of the firm changes post-merger. For instance, Hann, Ogneva, and Ozbas (2013) use the ICC to show that a firm's systematic risk decreases when it engages in diversification mergers. By also using ICC to proxy the cost of equity capital, I show that the cost of capital of the merged entity is inversely related to pre-merger risk similarity. I attribute this finding to more effective management of the resources and the internal capital of the merged firm for firms with similar management in terms of risk attitudes, as discussed in Datta (1991).

To the best of my knowledge this is the first study addressing the issue of how risk similarity between two firms affect the likelihood of M\&A deals and the outcomes. In fact, it is the first study to put forth a measure of risk similarity between two firms, that can be used generally in financial decision making not only in M\&A. My focus in this work is not the the level of riskiness of the target (or the acquirer), since these issues has been explored previously. Rather, I examine the role of similarities in the risk profile of the firms', and how such similarity induce deal outcomes and post-merger integration.

### 4.2 Data and Methodology

### 4.2.1 ICC Similarity Measure

To assess the similarity of market implied cost of capital between a pair of firms, I utilise the Jaffe (1986) distance measure. For two companies $i$ and $j$, the similarity index is calculated as follows:

$$
\begin{equation*}
\text { ICC_S imilarity }_{i j, t}=\frac{X_{i, t} X_{j, t}^{\prime}}{\left(X_{i, t} X_{i, t}^{\prime}\right)^{0.5}\left(X_{j, t} X_{j, t}^{\prime}\right)^{0.5}} \tag{78}
\end{equation*}
$$

where vector $X_{i, t}\left(X_{j, t}\right)$ correspond to firm $i$ 's $(j$ 's) implied cost of capital using 30 different models implementations. The models and the implementations are described in section
(4.2.2). This measure has been used extensively in economics and finance for its advantages (see, for instance, Bereskin et al. (2018), Bena and Li (2014), and Bloom, Schankerman, and Reenen (2013)). This propinquity measure has the advantage that it is unity for a pair of companies whose ICC vectors are identical, and it is zero for companies with orthogonal ICC vectors. The index is bounded between zero and one for all other pairs of vectors. The closer to unity is the index, the greater the degree of overlap of the two firms' ICC estimations. Furthermore, unlike Euclidean measure, this measure is not directly affected by the length of the pair of vectors.

Our risk similarity measure offers a number of advantages for our analysis. First, as it employs a large number of models, it is less sensitive to model and parameter uncertainty. Second, it is standardized allowing readily comparisons between firm-pairs. Third, it can be readily computed using publicly available data. Cosine similarity has also been used for other firm characteristics by Jaffe (1986), Bereskin et al. (2018), Bena and Li (2014), and Bloom, Schankerman, and Reenen (2013). We estimate risk similarity between two firms announcing a deal, 30 days before the announcement to make sure that the price is not affected by any news or rumours about the deal.

### 4.2.2 ICC Models

The Implied Cost of Capital (ICC) are derived by inverting fundamental valuation models such as the Residual Income and the Abnormal Earnings Growth model. These models have been subject to vast theoretical and empirical research ${ }^{21}$. The popularity of these models stem from the fact that they are ex-ante measures of cost of capital that overcome many of the issues of noise attributed to measures based on historical data such as factor models (see, for instance, Elton (1999), and Fama and French (1997)). ICC has been used in variety of finance applications such as shareholders control rights and agency cost (Guedhami and Mishra (2009), and Chen, Chen, and Wei (2011b)), environmental sustainability (Gupta (2018)), audit quality (Hope, Kang, Thomas, and Yoo (2009)), labour unions, politics and religion (Chen, Kacperczyk, and Ortiz-Molina (2011a), Boubakri, Guedhami, Mishra, and

[^14]Table 51: Expected Return Models

| Model | Code | Basis | Growth beyond horizon | Horizon | Formulation |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Gebhardt, Lee, and Swaminathan (2001) | GLS | Residual Income | Analysts | $\overline{(2+10)}$ <br> years | $\begin{aligned} & \hline P_{0}^{E}=b p s_{0}+\sum_{t=1}^{11}\left(\frac{\left(R O E_{t}-r_{E}\right) * b s_{t-1}}{\left(1+r_{E}\right)^{t}}\right)+ \\ & \left(\frac{\left(R O E_{12}-r_{E}\right) * p s_{11}}{r_{E} *\left(1+r_{E}\right)^{11}}\right) \end{aligned}$ |
| Claus and Thomas (2001) | CT | Residual Income | Inflation | 5 years | $P_{0}^{E}=b p s_{0}+\sum_{t=1}^{5}\left(\frac{R I_{t}}{\left(1+r_{E}\right)^{\prime}}\right)+\left(\frac{R I_{5}\left(1+g_{\text {iff }}\right)}{\left(r_{E}-g_{\text {inf } f}\right)\left(1+r_{E}\right)^{5}}\right)$ |
| Gode and Mohanram (2003) | GM | Abnormal Earnings Growth | Inflation | 2 years | $\begin{aligned} & r_{E}=A+\sqrt{A^{2}+\frac{e p s_{1}}{P_{0}}\left(g_{2}-(\gamma-1)\right)} \text { where } \\ & A=\frac{1}{2}\left((\gamma-1)+\frac{d p p s_{1}}{P_{0}}\right) \text { and } g_{2}=\frac{e p s_{2}-e p s_{1}}{e p p s_{1}} \end{aligned}$ |
| PE Ratio | PE | Abnormal Earnings Growth | Zero | 1 year | $r_{P E}=\left(\frac{P_{0}}{e p s_{1}}\right)^{-1}$ |
| PEG Ratio | PEG | Abnormal Earnings Growth | Zero | 2 years | $r_{P E G}=\sqrt{\frac{e p s_{2}-e p s_{1}}{P_{0}}}=\sqrt{\frac{\frac{e p s_{2}-e p s_{1}}{e p s_{1}}}{\frac{P}{0}} \frac{1}{e p s_{1}}}=\sqrt{\frac{1}{P E G * 100}}$ |
| Modified PEG Ratio of Easton (2004) | MPEG | Abnormal Earnings Growth | Zero | 2 years | $r_{M P E G}=\sqrt{\frac{e p s_{2}+r_{E} \cdot d p s_{1}-e p s_{1}}{P_{0}}}$ |

This table report a summary of the ICC models to be used in the subsequent analysis. These are the most widely recognized models in the literature. Some authors used a variant of the models that are presented here in terms of forecasting horizon or source of data, these have been ignored. $P$ is the price of the firm's stock. $r$ is the expected rate of return. $g$ is expected growth rate. $R O E$ is the return of equity after tax for the period.

Saffar (2012), El Ghoul, Guedhami, Ni, Pittman, and Saadi (2012)), corporate governance (Chen, Chen, and Wei (2009)), family business control (Boubakri, Guedhami, and Mishra (2010)), Social responsibility (El Ghoul, Guedhami, Kwok, and Mishra (2011)), and financial reporting (Daske (2006)) to name a few.

ICC models are suitable for this research setting due to its use of forward looking data rather than historical, and is conditional on the data available to the market at a particular time (Claus and Thomas (2001)). Also, ICC is positively related to risk under reasonable assumptions (Pastor et al. (2008)), which make it a suitable proxy to capture the risk of the firms undergoing a merger transaction. At the extreme, ICC is significantly related to default risk (Chava and Purnanandam (2010)). Furthermore, ICC estimates are less noisy than models that use historical information, making it more suitable for inference (Lee et al. (2009)). The usefulness of ICC models in estimating cost of capital and analysing firms' characteristics is discussed further in Hann, Ogneva, and Ozbas (2013), Frank and Shen (2016), and Ortiz-Molina and Phillips (2014).

There are several proposed ICC models in the literature. To ensure that the results are not driven by a particular approach and to minimize potential measurement error, I use six widely used ICC formulations to estimate the cost of capital. The first two formulations are
based on the residual income model as proposed by Claus and Thomas (2001) (CT) and Gebhardt, Lee, and Swaminathan (2001) (GLS). Two formulations are based on the abnormal growth model of Ohlson (2000) as deployed by Gode and Mohanram (2003) (GM) and Easton (2004) (MPEG). The last two formulations are rather naive estimates based on the Price-over-Earnings and Price-over-Earnings-to-Growth ratios as discussed in Easton (2004) (PE and PEG). The models details and formulas are presented in table 51. I ignore the models that yield portfolio level estimates such as O'Hanlon and Steele (2000), Easton, Taylor, Shroff, and Sougiannis (2002), Easton (2004), and Ashton and Wang (2013) due to the fact that the setting at hand require firm-level estimates of cost of capital. I also ignore models that are based on the dividend discount model such as Botosan (1997), Gordon and Gordon (1997), and Botosan and Plumlee (2002) for three reasons. First, these models necessitate removing deals with dividend non-paying acquirer or target from the sample. Second, unlike models based on Residual Income or Abnormal Earnings Growth, the estimation in dividend discount is highly dependent on the terminal value which is the most difficult element to forecast. Thirdly, in many firms dividend policies are not in line with the capacity to pay dividends or is unrelated to the firm's earnings, or they have a major shareholders who can influence the dividend policy suddenly making the fundamentals uncertain and volatile.

I implement each of these models using 5 different earnings forecasts to further ensure robustness of the estimates. Earning forecasts are obtained either from Analysts using I/B/E/S database, or cross-sectional mechanical models of estimates. Four mechanical models has been used: (1) Hou et al. (2012) model (HDZ), (2) Li and Mohanram (2014) Earnings Persistence model (EP), (3) Li and Mohanram (2014) Residual Income model (RI), and (4) the naive Random Walk (RW) model as expressed by Gerakos and Gramacy (2013).

### 4.2.3 Data

The M\&A sample is gathered using Thomson Reuters Eikon Deal screener. Screening for completed M\&A transactions with announcement dates between the beginning of 1980 till November 2018, where the acquirer is based in the United States, generated over 346 thousand transactions. After applying common literature screens on deal size and percent-
ages of acquisitions, matching the firms to Thomson Reuters Datastream, Worldscope, and $\mathrm{I} / \mathrm{B} / \mathrm{E} / \mathrm{S}$ for firm-level data, and removing firms with missing required data, 1,925 announced and completed deals and 509 announced but withdrawn deals were identified. Table 52 specify the various screens applied to generate this dataset.

More specifically, following Deng et al. (2013), Bena and Li (2014), and Bereskin et al. (2018), I restrict the main sample to mergers involving US targets and acquires with a minimum deal value of USD 1 million. Prior to the announcement, the sample is restricted to the acquirers who own less than $50 \%$ of the target, and is seeking to own more than $50 \%$. I depart from the literature in that I set the minimum percentage of ownership after the completion of the transaction for completed transaction to 75 percent rather than 90 percent for number of reasons ${ }^{22}$. Firstly, accounting standards trigger consolidation of accounts in most cases at $75 \%$ ownership for it is deemed to be a control threshold. Secondly, previous literature using higher parentages were dealing with CSR, cultural and technology issues which need near-full integration in order for the effect to transmit between the merger pairs. Nevertheless, for robustness I re-run the tests for the sub-sample of $90 \%$ and $100 \%$ post-acquisition ownership, and no noticeable change of results is recorded. In fact, only 17 transactions of the 1,925 are dropped with the $90 \%$ threshold, and an additional 17 with full post-acquisition ownership. The 509 announced but withdrawn deals (i.e failed mergers) are used in the analysis of the effect of risk similarity on the likelihood of completion in section 4.4.2.

I should note that the sample size I arrive at is almost double what is reported in similar M\&A studies (see, for instance, Bena and Li (2014), and Bereskin et al. (2018)). Most of prior research match the SDC deals to Compustat using CUSIPs. I match SDC in Eikon to Datastream through the Thomson Reuters permanent ID.

In addition to the actual-acquirer-actual-target pairs in the main sample described above, I also generate a control sample of pseudo-acquirer-actual-target pairs and actual-acquirer-pseudo-target pairs. The pseudo firms has been picked from a universe of almost 42 thousand possible firms contained in Thomson Reuters US Worldscope research list including

[^15]Table 52: Sample Screens

|  |  | M\&A Transactions |
| :--- | ---: | :---: |
| SDC M\&A Announcements 1980 $\mathbf{- 1 / 1 1 / 2 0 1 8}$ |  | $1,155,064$ |
| Aquirer based in US |  | $\mathbf{3 4 6 , 9 4 1}$ |
|  | Completed | 277,149 |
| Both Aquirer and Target matched to Datastream | Not Completed | 69,792 |
|  |  | $\mathbf{4 7 , 0 4 0}$ |
|  | Completed | 21,296 |
| After Removing Transactions where Acquirer and Target | Not Completed | 25,744 |
| identifier |  | $\mathbf{1 9 , 8 8 4}$ |
|  | Completed | 14,275 |
| Both Target and Acquirer were Public. Target is US based | Not Completed | 5,609 |
|  |  | $\mathbf{1 0 , 8 8 0}$ |
|  | Completed | 7,662 |
| Percent of Shares Acquiror is Seeking to own >=50\% | Not Completed | 3,218 |
| Acquiror own in Target before transaction <50\% |  |  |
| Acquired Share for completed transactions $>=\mathbf{7 5 \%}$ |  | $\mathbf{6 , 5 5 8}$ |
| Deal Value >= USD 1 million |  |  |
|  |  | Completed |
| No missing values in variables included in the main testing | Not Completed | 1,393 |
|  | Completed | 1,925 |

The table detail the sample screens applied to generate the dataset used in the subsequent testing. The M\&A deal-level data is downloaded from Thomson Reuters Eikon Deal screener (called SDC in other Thomson Reuters products), the firm-level market data is downloaded from Thomson Reuters Datastream, the firm-level accounting data is downloaded from Thomson Reuters Worldscope, and I/B/E/S was used for analysts forecasts). "Completed" refer to the deals that were announced and eventually happened, while "Not Completed" are the deals that were announced but withdrawn for any reason.
dead firms. Following Bena and Li (2014), and Bereskin et al. (2018), for each actual deal pair, pseudo-pairs are produced by pairing the actual acquirer with up to five matched pseudo-targets based on actual-target characteristics (i.e., industry, firm size, book-to-market ratio, in the same year). In addition, for each actual deal pair, pseudo-pairs are produced by pairing the actual target with up to five matched pseudo-acquirer based on actual-acquirer characteristics. This process generate for each actual M\&A deal, up to 11 firm pairs (The actual deal plus 10 control deals). Any deal with no pseudo matching is excluded from the relevant analysis due to the use of deal fixed effect. Out of 1,925 transactions in the main sample 1,750 transactions had pseudo matching. The control sample is used in the analysis of the effect of risk similarity on the merger pair formation in section (4.4.1). For this testing the sample size (actual and pseudo pairs) is 16,203 deals.

Due to the fact that some ICC models occasionally result in estimates that are negative or greater than $100 \%$, for robustness purpose, I drop such observations. Such a practise has been applied in some previous work using ICC (see, for instance, Chen, Chen, and Wei (2009), El Ghoul, Guedhami, Kwok, and Mishra (2011) and Gupta (2018)). Nevertheless, since this work is about the similarity of the estimates rather than the estimates themselves, I report both the results with and without the celling and the floor. I find no evidence that removing these observations affect the results. The number of observations in the main sample is 1,752 deals after truncating the ICC estimates.

Furthermore, in the robustness checks, I run the test using only analysts forecasts based ICC estimates only. For those tests the size of the full sample with the control group is 12,952 after dropping firms with no analysts forecasts to derive ICC estimates.

### 4.3 Descriptives

Table 53 presents summary statistics for both actual and control-pseudo merger pairs. The mean (median) ICC similarity index for actual deals is $78.9 \%$ ( $88.8 \%$ ) with fairly large standard deviation of $26 \%$. The control deals exhibit a lower mean and median of ICC similarity score of $68.7 \%(77.6 \%)$, which is in line with the hypothesis that the deals that have occurred exhibit higher similarity of risk profiles between the merger pair when compared to the set of possible deals at the time. Firm characteristics of the sample are consistent with M\&A literature (see, for instance, Harford et al. (2011), Bena and Li (2014), and Bereskin et al. (2018)). Specifically, acquirers are larger firms than targets, they have higher growth rates in sales, profitability ratios, and valuation multiples. On the other hand, acquirers are less R\&D intense.

Table 54 present summary statistics of the ICC estimates using the various earnings forecasts inputs for the Acquirers and Targets in both the main and control sample. Table 55 further present the distribution of the ICC similarity scores. Consistent with equation (78), the scores are bounded between zero and unity. The actual deals have an interquartile range ICC similarity scores between $68.6 \%$ to $97.8 \%$, while the range for the control deals has lower bounds spreading between $48.7 \%$ and $95.2 \%$. The 10th and 90th percentiles convey

Table 53: Summary Statistics for Actual and Pseudo-Control Deals

|  | Actual Deals |  |  | Pseudo Deals |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
|  | Mean | Std. Dev. | Median | Mean | Std. Dev. | Median |
| Same_State_Indicator | 0.240 | 0.427 | 0.000 | 0.105 | 0.306 | 0.000 |
| Horizontal_Indicator | 0.343 | 0.475 | 0.000 | 0.177 | 0.382 | 0.000 |
| Vertical_Indicator | 0.258 | 0.438 | 0.000 | 0.340 | 0.474 | 0.000 |
| Diversifying_Indicator | 0.399 | 0.490 | 0.000 | 0.483 | 0.500 | 0.000 |
| ICC_Similarity | 0.789 | 0.260 | 0.888 | 0.687 | 0.306 | 0.776 |
| Target_BM | 0.592 | 4.716 | 0.461 | 0.837 | 6.929 | 0.474 |
| Target_Cash | 0.209 | 0.230 | 0.107 | 0.205 | 0.228 | 0.109 |
| Target_HHI | 0.014 | 0.046 | 0.000 | 0.136 | 0.198 | 0.067 |
| Target_Leverage | 0.260 | 0.283 | 0.217 | 0.245 | 0.268 | 0.199 |
| Target_RD_to_Asset | 0.068 | 0.134 | 0.004 | 0.058 | 0.118 | 0.000 |
| Target_ROA | 0.037 | 0.431 | 0.100 | 0.053 | 0.305 | 0.102 |
| Tararget_Sales_Growth | 0.108 | 0.442 | 0.077 | 0.120 | 0.488 | 0.083 |
| Acquirer_BM | 0.640 | 4.535 | 0.412 | 1.139 | 13.098 | 0.425 |
| Acquirer_Cash | 0.131 | 0.152 | 0.074 | 0.138 | 0.159 | 0.079 |
| Acquirer_HHI | 0.015 | 0.046 | 0.000 | 0.119 | 0.193 | 0.035 |
| Acquirer_Leverage | 0.281 | 0.194 | 0.263 | 0.273 | 0.198 | 0.253 |
| Acquirer_RD_to_Asset | 0.036 | 0.058 | 0.005 | 0.034 | 0.056 | 0.005 |
| Acquirer_ROA | 0.093 | 0.223 | 0.110 | 0.103 | 0.202 | 0.115 |
| Acquirer_Sales_Growth | 0.213 | 0.389 | 0.137 | 0.174 | 0.362 | 0.113 |

a similar message, as they spread between $44.7 \%$ to $99.6 \%$ in the actual deals, and from $24.2 \%$ to $99.2 \%$ in the pseudo deals.

Table 56 present some additional deal-level characteristics about the sample mergers. $58 \%$ of the merger pairs are in the same industry, and $28.9 \%$ are high-tech firms. The median target in the sample is $22.3 \%$ the size of the acquirer. $38.9 \%$ of the deals in the dataset is allcash deals, and $20.02 \%$ are tender offers. Again, these statistics are comparable to Bereskin et al. (2018).

Finally table 57 show the distribution of the deals in the dataset by announcement year.

Table 54: ICC Estimates Summary Statistics

|  | ICC Estimates | Actual Deals |  |  | Pesudo Deals |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Mean | Std. Dev. | Median | Mean | Std. Dev. | Median |
| Acquirer | All | 0.241 | 0.225 | 0.147 | 0.197 | 0.217 | 0.107 |
|  | All except RW | 0.221 | 0.207 | 0.135 | 0.202 | 0.217 | 0.110 |
|  | Analysts | 0.103 | 0.054 | 0.095 | 0.120 | 0.109 | 0.095 |
|  | HDZ | 0.222 | 0.218 | 0.140 | 0.216 | 0.198 | 0.147 |
|  | RI | 0.317 | 0.224 | 0.258 | 0.530 | 0.222 | 0.535 |
|  | EP | 0.269 | 0.227 | 0.199 | 0.157 | 0.243 | 0.028 |
|  | RW | 0.335 | 0.276 | 0.261 | 0.100 | 0.199 | 0.027 |
| Target | All | 0.228 | 0.224 | 0.129 | 0.233 | 0.246 | 0.123 |
|  | All except RW | 0.198 | 0.196 | 0.119 | 0.240 | 0.246 | 0.130 |
|  | Analysts | 0.105 | 0.066 | 0.095 | 0.121 | 0.103 | 0.097 |
|  | HDZ | 0.274 | 0.244 | 0.186 | 0.335 | 0.254 | 0.263 |
|  | RI | 0.308 | 0.225 | 0.245 | 0.567 | 0.237 | 0.589 |
|  | EP | 0.250 | 0.220 | 0.176 | 0.134 | 0.232 | 0.025 |
|  | RW | 0.330 | 0.278 | 0.262 | 0.104 | 0.210 | 0.026 |

Table 55: Distribution of ICC Similarity (Percentiles)

|  | 10th | 25th | 50th | 75th | 90th |
| :--- | :---: | :---: | :---: | :---: | :---: |
| Actual_Deals | 0.447 | 0.686 | 0.888 | 0.978 | 0.996 |
| Pseudo_Deals | 0.242 | 0.487 | 0.776 | 0.952 | 0.992 |

Table 56: Summary Statistics for Sample Pairs Characteristics

|  | Mean | Std. Dev. | Median |
| :--- | ---: | ---: | ---: |
| Same_Industry_Indicator | 0.583 | 0.493 | 1.000 |
| High_Tech_Indicator | 0.289 | 0.453 | 0.000 |
| Relative_Size | 0.543 | 3.492 | 0.223 |
| All_Cash_Indicator | 0.389 | 0.488 | 0.000 |
| Tender_Offer_Indicator | 0.202 | 0.401 | 0.000 |

Table 57: Deals by Merger Announcement Year

| Year | No. of Deals | \% of Sample | Year | No. of Deals | \% of Sample |
| ---: | ---: | ---: | ---: | ---: | ---: |
| 1980 | 0 | $0.00 \%$ | 2000 | 138 | $7.17 \%$ |
| 1981 | 2 | $0.10 \%$ | 2001 | 111 | $5.77 \%$ |
| 1982 | 1 | $0.05 \%$ | 2002 | 61 | $3.17 \%$ |
| 1983 | 1 | $0.05 \%$ | 2003 | 73 | $3.79 \%$ |
| 1984 | 1 | $0.05 \%$ | 2004 | 75 | $3.90 \%$ |
| 1985 | 2 | $0.10 \%$ | 2005 | 87 | $4.52 \%$ |
| 1986 | 5 | $0.26 \%$ | 2006 | 91 | $4.73 \%$ |
| 1987 | 4 | $0.21 \%$ | 2007 | 91 | $4.73 \%$ |
| 1988 | 7 | $0.36 \%$ | 2008 | 63 | $3.27 \%$ |
| 1989 | 13 | $0.68 \%$ | 2009 | 61 | $3.17 \%$ |
| 1990 | 6 | $0.31 \%$ | 2010 | 69 | $3.58 \%$ |
| 1991 | 7 | $0.36 \%$ | 2011 | 46 | $2.39 \%$ |
| 1992 | 11 | $0.57 \%$ | 2012 | 59 | $3.06 \%$ |
| 1993 | 14 | $0.73 \%$ | 2013 | 53 | $2.75 \%$ |
| 1994 | 25 | $1.30 \%$ | 2014 | 74 | $3.84 \%$ |
| 1995 | 29 | $1.51 \%$ | 2015 | 87 | $4.52 \%$ |
| 1996 | 36 | $1.87 \%$ | 2016 | 83 | $4.31 \%$ |
| 1997 | 75 | $3.90 \%$ | 2017 | 52 | $2.70 \%$ |
| 1998 | 119 | $6.18 \%$ | 2018 | 37 | $1.92 \%$ |
| 1999 | 156 | $8.10 \%$ | Total | $\mathbf{1 9 2 5}$ | $\mathbf{1 0 0 \%}$ |

### 4.4 Empirical Results

### 4.4.1 Merger Pairs and ICC Similarity

I start the analysis by examining the effect of ICC similarity on the formation of merger pairs. Table 58 reports the results of running the following conditional logit model, using the setting deployed by Bena and Li (2014) and Bereskin et al. (2018), on the data of actual merger deals and the matched control sample of pseudo acquirers and targets:

$$
\begin{align*}
& \text { Actual_Deal }_{i j m, t}=\alpha+\beta_{1} \text { ICC_Similarity }_{i j m, t-1}+\beta_{2} \text { Same_State_Indicator }_{i j m, t-1} \\
& \quad+\beta_{3} \text { Acquirer_Controls }_{i m, t-1}+\beta_{4} \text { Target_Controls }_{j m, t-1}+\text { Deal_FE }_{m}+\epsilon_{i j m, t} \tag{79}
\end{align*}
$$

where the dependent variable Actual_Deal $_{i j m, t}$ is equal to 1 if the pair i and j constitute a pair of an actual deal m , and equal zero if the one of the pair is a pseudo target or acquirer. ICC_S imilarity $_{i_{j m, t-1}}$ is the independent variable of interest to proxy for the similarity of risk profile between a pair of companies as judged by market participants (i.e. the similarity between the discount rate applied by the market on future expected cash flow of the company). It is measured a month prior to the announcement of the deal. Same_State_Indicator $i_{i j m, t-1}$ equals 1 if the firms i and j are incorporated in the same state. The firm-level controls follow Bena and Li (2014) and Bereskin et al. (2018) to include Book-to-Market ratio (BM) which get omitted when this variable is used for the pseudo matching, Cash and short-term investments scaled by total assets (Cash), industry competitiveness measured by HerfindahlHirschman Index (HHI), the total debt of the firm scaled by total assets (Leverage), the intensity of research and development scaled by total assets (RD_to_Asset), Earnings before interest, taxes, depreciation and amortizations -EBITDA- scaled by total assets (ROA), and the natural log of the current year's sales divided by prior year's sales (Sales_Growth).

Models 1 and 2 in table (58) presents the results where the control sample is generated using the year, size, and the industry of the actual firm to match it with a pseudo firm. In models 3 and 4 the control sample is generated using year, size, industry, and the Book-to-Market ratio for the purpose of testing the results for sensitivity to the control sample selection. All models include deal fixed effects.

The bivariate settings in models 1 and 3 show a positive and statistically significant

ICC_Similarity coefficients. Therefore, the greater risk similarity as captured by ICC between a pair of firms, the greater is the likelihood of that pair actually merging, relative to a control sample of hypothetical deals in which at least the target or the acquirer is an actual from the main sample. Including control variables to capture firm-level characteristics in models 2 and 4 show that the ICC_Similarity coefficient is robust to these controls as well as to control sample selection. Overall, the results suggest that firms are more likely to merge when they share similar risk profiles. An economic interpretation of the result -using model 4 coefficient- would suggest that a one standard deviation increase in the similarity between a pair of firms is associated with $24.45 \%$ increase in the odds of being an actual acquirer-target pair as opposed to a pair with a pseudo firm. Rerunning the test after dropping the ICC estimates above 100 and below 0 percent does not affect the results as shown in the appendix in table (115). In this latter testing, the percentage increase in the odds of forming a merger pair is $64.4 \%$ for one standard deviation increase in the risk similarity. This finding supports the first hypothesis that the higher the risk similarity of two firms is, the higher the probability of the firms announcing a merger.

### 4.4.2 Likelihood of Deal Completion

Not all announced deals are seen through to completion. Announced deals to acquire a publicly traded firm could fail for many reasons including regulations, which is an exogenous reason that has nothing to do with the target fit to the acquirer criteria. Nevertheless, many other merger negotiations fail due to non congruence of characteristics, among which is the risk profile similarity. As discussed by Wong and O'Sullivan (2001), managerial resistance is a common reason for a deal not to materialize. The rationale in this section is that managerial resistance would be less prominent for firms with similar risk profile. In this fashion, I hypothesize that if two firms exhibit a high degree of risk similarity before a merger, they are more likely to finalize the merger than firms with a lower degree of risk similarity. To examine the effects of premerger risk similarity on the probability of that an announced deal will materialize, I extend the main sample to include abandoned deals mergers as discussed in the previous section and adopt a common logit model. The same

Table 58: Merger Pairs and ICC Similarity, ICC $\in[0,100]$


The table reports results of conditional logit model of the likelihood of an observation being an actual (as opposed to hypothetical) merger on acquirer-target Implied Cost of Capital (ICC) similarity and other control variables. This table is identical to table (115) except that ICC estimates above 100 or below zero are dropped. The dependent variable is a binary that takes the value of 1 if the observation is an actual merger deal, and the value of zero if the observation is a pseudo-firm pair from the control group. Following Bena and Li (2014) and Bereskin et al. (2018), for each actual deal, control group deals are formed by pairing the actual acquirer with up to 5 pseudo targets (identified by industry, year, and closest total assets to the actual target for the models 1 and 2; and matched by industry, year, and closest total assets and Book-to-Market ratio in models 3 and 4), and by pairing each actual target with up to 5 pseudo-acquirers using the same criteria. Constants are estimated but not reported. All specifications include deal fixed effects. All specification report $t$-statistics below coefficients based on standard errors clustered at the actual deal level.
data screens used to construct the main dataset as described in section 4.2.3 is also used to extend the dataset.

In table (59), using a logit model, I document a positive association between ICC similarity and the probability of an announced deal to get completed. Even after controlling extensively for deal-level and firm-level characteristics, model 3 in the table suggest that a one standard deviation increase in the ICC_Similarity is related to a $35 \%$ increase in the odds of successfully completing the deal. Moreover, in model 4, I replace the ICC similarity index with two dummies. The High_ICC_Similarity_Indicator takes the value of 1 if the deal is in the top $25 \%$ of the ICC similarity spectrum, and zero otherwise. The Low_ICC_Similarity_Indicator indicate that the deal is in the bottom quartile in terms of risk similarity. The coefficients of these two dummies suggest that for an announced deal, the probability of completion increases (decreases) if the deal is characterized with high (low) risk similarity. In summary, high ICC similarity deals are more likely to complete successfully. Furthermore, table (116) show that untruncated ICC estimates at zero and $100 \%$ does not change the results.

### 4.4.3 Duration of Deal Completion

I also examine whether ICC similarity affect the speed of deal completion using the main sample of completed deals. The importance of quick deal completion for post-merger integration is discussed by Feldman and Spratt (2001). Table (60) report the results of Cox Proportional Hazard model, where the dependent variable is the number of days between the announcement and the effective date of the deal. The results suggest that deals with higher ICC similarity (in the top quartile in terms of ICC similarity) between the merger pairs are associated with $34 \%$ more rapid rate of deal completion. On average, using the unconditional mean of time in the sample, this translates to almost seven valuable weeks that the merger pair could spend on post-merger integration rather than on deal completion uncertainties. On the other hand, the dummy indicating bottom quartile deals in terms of ICC similarity is negative (i.e slower speed of completion). In a nutshell, high ICC similarity deals are more likely to complete quickly, which ease post-merger integration, and is likely

Table 59: Likelihood of Deal Completion, ICC $\in[\mathbf{0 , 1 0 0}]$

|  | (1) |  | (2) |  | (3) |  | (4) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | $\begin{array}{r} \hline \hline 2.281 \\ (87.364) \end{array}$ | *** | $\begin{array}{r} 2.637 \\ (31.847) \end{array}$ | *** | $\begin{array}{r} 2.639 \\ (26.597) \end{array}$ | *** |  |  |
| High_ICC_Similarity_Indicator |  |  |  |  |  |  | $\begin{array}{r} 0.947 \\ (55.458) \end{array}$ | *** |
| Low_ICC_Similarity_Indicator |  |  |  |  |  |  | $\begin{array}{r} -0.370 \\ (-12.168) \end{array}$ | *** |
| Same_Industry_Indicator | $\begin{array}{r} 0.077 \\ (1.844) \end{array}$ |  | $\begin{array}{r} 0.182 \\ (6.693) \end{array}$ | *** | $\begin{array}{r} 0.207 \\ (7.562) \end{array}$ | ** | $\begin{array}{r} 0.205 \\ (7.689) \end{array}$ | *** |
| Relative_Size | $\begin{array}{r} -0.016 \\ (-4.993) \end{array}$ | *** | $\begin{array}{r} -0.099 \\ (-1.934) \end{array}$ | * | $\begin{array}{r} -0.093 \\ (-2.004) \end{array}$ | ** | $\begin{array}{r} -0.100 \\ (-2.135) \end{array}$ | ** |
| Tender_Offer_Indicator | $\begin{aligned} & 0.474 \\ & (10.8) \end{aligned}$ | *** | $\begin{array}{r} 0.394 \\ (15.021) \end{array}$ | *** | $\begin{array}{r} 0.503 \\ (23.758) \end{array}$ | ** | $\begin{array}{r} 0.495 \\ (24.168) \end{array}$ | *** |
| All_Cash_Indicator | $\begin{aligned} & 0.242 \\ & (6.97) \end{aligned}$ | *** | $\begin{aligned} & -0.166 \\ & (-6.472) \end{aligned}$ | *** | $\begin{array}{r} -0.219 \\ (-10.388) \end{array}$ | *** | $\begin{aligned} & -0.210 \\ & (-9.718) \end{aligned}$ | *** |
| Same_State_Indicator | $\begin{array}{r} -0.043 \\ (-1.2) \end{array}$ |  | $\begin{array}{r} -0.111 \\ (-4.153) \end{array}$ | *** | $\begin{gathered} -0.072 \\ (-3.071) \end{gathered}$ | *** | $\begin{array}{r} -0.062 \\ (-2.739) \end{array}$ | *** |
| High_Tech_Indicator | $\begin{array}{r} 0.116 \\ (2.289) \end{array}$ | ** | $\begin{array}{r} 0.176 \\ (5.041) \end{array}$ | *** | $\begin{array}{r} 0.183 \\ (6.484) \end{array}$ | *** | $\begin{array}{r} 0.171 \\ (6.375) \end{array}$ | *** |
| Acquirer and Target Controls | No |  | Yes |  | Yes |  | Yes |  |
| Year Fixed Effect | No |  | No |  | Yes |  | Yes |  |
| No. Of Obs. | 2,237 |  | 2,237 |  | 2,237 |  | 2,237 |  |
| Pesudo R-squared | 0.028 |  | 0.134 |  | 0.173 |  | 0.180 |  |

The table reports the likelihood of the deal completion using Logit model. This table is identical to table (116) except that ICC estimates above 100 or below zero are dropped. The main sample of completed deals have been expanded to include announced but uncompleted transactions using the same filter criteria used to generate the main sample in terms of ownership percentages, deal value, and other characteristics. The dependent variable equals 1 if the deal is completed, and 0 if the deal is withdrawn. The acquirer and target controls (suppressed coefficients) are RD/Assets, Size, Cash and Short-term investments/Assets, and Book-toMarket ratio. Constant terms are estimated but not reported. t-statistics based on standard errors clustered by industry group are reported below coefficients.
to make the deal more valuable. Table (117) show that the results are robust to the use of untruncated ICC estimates.

### 4.4.4 Combined Announcement Returns

In this section I turn to examine the effect of ICC similarity on the deal combined - the acquirer and target- announcement return to test for potential market synergy (Bradley, Desai, and Kim (1988)). Abnormal returns are obtained using standard estimation methodology for event studies with daily returns. A market model with MSCI USA Index return as the becnhmark return is deployed, using days - 300 through - 46 relative to the merger announcement day like in Bereskin et al. (2018) as the estimation period. Over this estimation period, the

Table 60: Duration of Deal Completion, ICC $\in[0,100]$

|  | (1) |  | (2) |  | (3) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| High_ICC_Similarity_Indicator | 0.346 | ** | 0.307 | *** | 0.292 | *** |
|  | (2.051) |  | (6.904) |  | (4.471) |  |
| Low_ICC_Similarity_Indicator | - 0.130 | *** | - 0.144 | * | - 0.130 |  |
|  | (-2.633) |  | (-1.78) |  | (-1.364) |  |
| Same_State_Indicator | -0.142 | *** | - 0.142 | * | - 0.148 | * |
|  | (-3.761) |  | (-1.8) |  | (-1.874) |  |
| Relative_Size | - |  | - 0.042 |  | - 0.034 | ** |
|  | (1.354) |  | (-1.153) |  | (-2.523) |  |
| Tender_Offer_Indicator | 0.689 | *** | 0.674 | *** | 0.754 | *** |
|  | (6.349) |  | (17.46) |  | (8.457) |  |
| All_Cash_Indicator | 0.475 | *** | 0.399 | *** | 0.358 | *** |
|  | (6.768) |  | (15.243) |  | (6.294) |  |
| Same_Industry_Indicator | - 0.228 | *** | - 0.188 | ** | - 0.194 | *** |
|  | (-3.186) |  | (-3.747) |  | (-2.627) |  |
| High_Tech_Indicator | 0.276 | *** | 0.132 |  | 0.132 |  |
|  | (3.987) |  | (1.424) |  | (0.938) |  |
| Acquirer and Target Controls | No |  | Yes |  | Yes |  |
| Year Fixed Effect | No |  | No |  | Yes |  |
| No. of Observations | 1752 |  | 1752 |  | 1752 |  |

The table reports the hazard ratio of deal completion time estimated using Cox proportional hazard model. This table is identical to table (117) except that ICC estimates above 100 or below zero are dropped. The dependent variable is the number of days between the announcement date and the effective date of a deal and is measured for completed deals only. The acquirer and target controls (suppressed coefficients) are RD/Assets, Size, Cash and Short-term investments/Assets, and Book-to-Market ratio. Constant terms are estimated but not reported. Statistics based on standard errors clustered by industry group are reported below coefficients.
firm daily returns are regressed on the benchmark returns. The difference between the actual daily return and the market model predicted daily return using the estimated factor loadings from the regression results is the daily abnormal return. I then cumulate the daily abnormal returns over the event window of 7 days $[-3$ to +3$]$ centred at the announcement day, and use the cumulative abnormal returns (CAR) as the measure of abnormal performance upon announcement of the acquisition.

Before delving into the results the multivariate results in table 61, I should note that mean CAR for the mergers in the dataset is $0.020(t-s t a t=7.188)$ and median CAR of 0.011 but falls outside the confidence interval. The highest $25 \%$ deals in terms of ICC similarity have a mean of 0.024 and median 0.009 , and both are statistically significant. The lowest $25 \%$ deals in terms of ICC similarity have a significant mean of 0.015 , but insignificant median
of 0.007 .
To formalize the testing, table (61) show the results of regressing CAR on ICC similarity scores and various other characteristics following Ishii and Xuan (2014), and Bereskin et al. (2018). Models 1 and 2 are the same except that I control for industry fixed effect in model 2. The result of these two models confirm the positive association between ICC similarity and the combined CAR. This observation suggest that the market appreciate deals with better risk-fit between the target and the acquirer.

In models 4 and 5, I address the potential sample selection biases due to the likelihood of the deal occurrence, and the bias due to likelihood of the deal completion using two stage Heckman model. In the first stage, a probit model is estimated using the same setting described in sections (4.4.1) and (4.4.2) respectively. In the second stage, an inverse Mill ratio from the first stage probit is included in the CAR regressions as an additional control. Accounting for those two biases yielded no change in the baseline results. This indicate that the market expects realization of better synergies when both the target and acquirer have more similar risk profiles.

Finally, in model 3, the ICC similarity index is replaced with two dummy variables to capture whether a particular pair fall in the top or bottom $25 \%$ of ICC similarity score distribution. Although the coefficient is positive for the high similarity group and negative for the low similarity group, both are statistically insignificant. This means that the ICC similarity effect on CAR is not stronger in the extreme quartiles, as the dummies represent the difference to the reference group between the 25th and 75th percentile.

For robustness purposes, the tests have been performed on alternative event windows. Table(121) present the results for the event window of 3 days $[-1$ to +1$]$, and table (122) is the results for event window of 11 days $[-5$ to +5$]$. No change in conclusions were observed. Neither has the conclusion changed when the ICC estimates are not truncated between zero and $100 \%$ as shown in table (118).

Table 61: Combined Announcement Returns, ICC $\in[\mathbf{0 , 1 0 0}]$

|  | (1) |  | (2) |  | (3) |  | (4) |  | (5) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | $\begin{gathered} \hline \hline 0.026 \\ (2.836) \end{gathered}$ | *** | $\begin{array}{r} \hline 0.022 \\ (2.278) \end{array}$ | ${ }^{* *}$ |  |  | $\begin{gathered} \hline \hline 0.026 \\ (2.850) \end{gathered}$ |  | $\begin{gathered} \hline \hline 0.029 \\ (2.411) \end{gathered}$ |  |
| High_ICC_Similarity_Indicator |  |  |  |  | $\begin{array}{r} 0.001 \\ (0.095) \end{array}$ |  |  |  |  |  |
| Low_ICC_Similarity_Indicator |  |  |  |  | $\begin{array}{r} -0.003 \\ (-0.651) \end{array}$ |  |  |  |  |  |
| Same_Industry_Indicator | $\begin{array}{r} 0.004 \\ (0.785) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.772) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.842) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.769) \end{array}$ |  | $\begin{array}{r} 0.003 \\ (0.743) \end{array}$ |  |
| Same_State_Indicator | $\begin{array}{r} 0.004 \\ (1.209) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.042) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.223) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.196) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.287) \end{array}$ |  |
| High_Tech_Indicator | $\begin{array}{r} -0.009 \\ (-2.234) \end{array}$ | ** | $\begin{array}{r} -0.012 \\ (-2.686) \end{array}$ | *** | $\begin{array}{r} -0.009 \\ (-2.107) \end{array}$ | ** | $\begin{array}{r} -0.009 \\ (-2.267) \end{array}$ | ** | $\begin{gathered} -0.009 \\ (-1.94) \end{gathered}$ | * |
| Relative_Size | $\begin{array}{r} 0.007 \\ (1.554) \end{array}$ |  | $\begin{array}{r} 0.006 \\ (1.462) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.531) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.562) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.479) \end{array}$ |  |
| All_Cash_Indicator | $\begin{array}{r} 0.015 \\ (2.988) \end{array}$ | *** | $\begin{array}{r} 0.016 \\ (3.141) \end{array}$ | *** | $\begin{array}{r} 0.015 \\ (2.957) \end{array}$ | *** | $\begin{array}{r} 0.015 \\ (2.989) \end{array}$ | *** | $\begin{array}{r} 0.016 \\ (3.030) \end{array}$ | *** |
| Tender_Offer_Indicator | $\begin{array}{r} 0.007 \\ (1.308) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.289) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.348) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.321) \end{array}$ |  | $\begin{array}{r} 0.008 \\ (1.272) \end{array}$ |  |
| Total_Size | $\begin{array}{r} -0.008 \\ (-6.649) \end{array}$ | *** | $\begin{gathered} -0.008 \\ (-6.735) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-6.695) \end{gathered}$ | *** | $\begin{array}{r} -0.008 \\ (-7.057) \end{array}$ | *** | $\begin{array}{r} -0.007 \\ (-6.764) \end{array}$ | *** |
| Book_To_Market | $\begin{array}{r} 0.000 \\ (2.499) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.618) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.525) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.531) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.449) \end{array}$ | ** |
| Leverage | $\begin{array}{r} 0.025 \\ (1.620) \end{array}$ |  | $\begin{array}{r} 0.027 \\ (1.576) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.561) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.636) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.628) \end{array}$ |  |
| Cash | $\begin{array}{r} 0.030 \\ (0.577) \end{array}$ |  | $\begin{array}{r} 0.014 \\ (0.338) \end{array}$ |  | $\begin{array}{r} 0.030 \\ (0.579) \end{array}$ |  | $\begin{array}{r} 0.030 \\ (0.587) \end{array}$ |  | $\begin{array}{r} 0.000 \\ (0.553) \end{array}$ |  |
| Merger_Pair_Liklihood_Inverse_Mills_ratio |  |  |  |  |  |  | $\begin{array}{r} 0.004 \\ (0.258) \end{array}$ |  |  |  |
| Completion_Liklihood_Inverse_Mills_ratio |  |  |  |  |  |  |  |  | $\begin{array}{r} 0.029 \\ (0.379) \end{array}$ |  |
| Year Fixed Effect | Yes |  | Yes |  | Yes |  | Yes |  | Yes |  |
| Industry Fixed Effect | No |  | Yes |  | Yes |  | Yes |  | Yes |  |
| No. of Observations | 1752 |  | 1752 |  | 1752 |  | 1752 |  | 1752 |  |
| R-Square | 0.320 |  | 0.317 |  | 0.319 |  | 0.319 |  | 0.319 |  |

The table reports $[-3,+3] 7$-day cumulative abnormal returns (CAR) around merger announcement of actual deals regression on ICC similarity between the merger pairs and other control variables. This table is identical to table (118) except that ICC estimates above 100 or below zero are dropped. The t-statistics reported below coefficients are based on industry clustered standard errors. Models 4 and 5 present the results using Heckman's two stage self-selection correction, where the inverse Mills ratio is based on merger-pair likelihood and merger-completion likelihood.

### 4.4.5 Abnormal Operating Performance

Next, I test whether deals with high ICC similarity exhibit better post-acquisition operating performance, as one might expect if such similarity induce the ease of integration, or reduces suboptimal investment in the target firm and facilitates more effective management of the merged entity. For this I follow the method presented in (Healy et al. (1992), Harford et al. (2012), and Bereskin et al. (2018)) in which they study the industry adjusted operating performance after a merger event. The test is run separately for highest and the lowest quartiles of merger pairs in terms of ICC similarity.

Operating profitability is defined as EBITDA scaled by the market value of the company assets. The abnormal operating performance is calculated as the company operating profitability minus the industry median performance. The post-merger abnormal operating performance over the 3 post-merger years is regressed against a synthetic pre-merger abnormal operating performance - that is computed as a value-weighted average of the target's and the acquirer's operating performance in the year before the merger- and a list of relevant pair-controls. The constant therefore represent the post-merger performance independent of pre-merger performance. Table (62) show that mergers with high ICC similarity are associated with significantly positive changes in operating performance over the 3 years period following the completion of the deal. The results are obtained by running the models separately for the top and bottom quartiles sub samples. In fact, the results show that high ICC similarity mergers are associated with $4.2 \%$ abnormal increase in post-merger industry adjusted ROA after controlling for various deal characteristics. On the other hand the low ICC similarity deals exhibit no such increase. The results are robust for truncating ICC estimates as shown in table (119).

Additionally, one can assess post-merger operating performance by tracing any postmerger goodwill write-offs. Goodwill represent the value paid by the acquirer in excess to the target fair value of identifiable assets. Such premium is paid in anticipation of some sort of synergy. Gu and Lev (2011) represent that a goodwill write-off is in fact a mis-valuation or a decline in expected synergies. Therefore, the hypothesis is that fewer goodwill writeoffs will happen in deals characterized with high similarity in ICC between the target and

Table 62: Abnormal Operating Performance, ICC $\in[\mathbf{0 , 1 0 0}]$

|  | (1) |  |  |  | (2) |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | High_Similarity |  | Low_Similarity |  | High_Similarity |  | Low_Similarity |  |
| Constant | 0.005 | ** | 0.011 |  | 0.042 | *** | -0.014 |  |
|  | (2.176) |  | (1.133) |  | (3.704) |  | (-0.798) |  |
| Abnormal_PreMerger_ROA | 0.516 | *** | 0.594 | *** | 0.360 | *** | 0.422 | *** |
|  | (7.717) |  | (11.279) |  | (7.172) |  | (3.144) |  |
| Same_Industry_Indicator |  |  |  |  | -0.022 | * | 0.023 |  |
|  |  |  |  |  | (-1.704) |  | (1.334) |  |
| Same_State_Indicator |  |  |  |  | -0.003 |  | -0.006 |  |
|  |  |  |  |  | (-0.256) |  | (-0.442) |  |
| Relative_Size |  |  |  |  | -0.024 | *** | -0.001 |  |
|  |  |  |  |  | (-3.556) |  | (-0.702) |  |
| High_Tech_Indicator |  |  |  |  | -0.011 |  | -0.021 |  |
|  |  |  |  |  | (-0.603) |  | (-0.908) |  |
| Adjusted_R2 | 0.352 |  | 0.468 |  | 0.504 |  | 0.318 |  |
| No. of Observations | 438 |  | 438 |  | 438 |  | 438 |  |

The table reports the OLS regression results explaining industry-adjusted (abnormal) post-merger operating performance as defined in Healy, Palepu, and Ruback (1992). This table is identical to table (119) except that ICC estimates above 100 or below zero are dropped. Operating profitability is defined as EBITDA scaled by the market value of the company assets. The abnormal operating performance is calculated as the company operating profitability minus the industry median performance. The post-merger abnormal operating performance over the 3 post-merger years is regressed against a synthetic pre-merger abnormal operating performance - that is computed as a value-weighted average of the target's and the acquirer's operating performance in the year before the merger- and a list of relevant pair-controls. The intercept is therefore is the post-merger operating performance independent of pre-merger performance. The regression is estimated separately for the top quartile of ICC similarity, and the bottom quartile of ICC similarity. $t$-statistics using robust standard errors are reported below coefficients in parentheses.
acquirer.
The testing I deploy follow Gu and Lev (2011) and Bereskin et al. (2018) setting. Specifically, the dataset is limited to the deals where the acquirer does not conduct any other deal in 7 years window centred at the announcement date. This is required to ensure that any post-acquisition write-off in the next 3 years of the deal is mainly attributed to the deal under consideration. Furthermore, all deals between 1994 to 2001 were dropped from the dataset since pooling accounting was allowed at the time. Pooling accounting use would not result in creation of goodwill that could be possibly written off subsequently. Write-offs are measured for 3 years after the deal date scaled by lagged total assets. These write-offs are used as a dependent variable in a Tobit regression since the dependent variable have a lower bound of zero.

The results in table (63) reveal that the ICC similarity coefficient is negative, however
statistically insignificant. The more interesting result is in model 2 , where I replace the ICC similarity score variable with 2 dummy variables for the top and bottom quartiles mergers on the ICC similarity distribution. In this setting I conclude that the deals with highest ICC similarity between the merger pairs have significantly lower goodwill write-offs as compared to other deals. Therefore post-merger integration is considerably easier and more successful when the merger pair exhibit more similar risk profiles (i.e it increases the probability of attaining expected synergies). Again, the results are robust for not truncating ICC estimates as shown in table (120).

| Table 63: Post-Acquisition Goodwill Write-offs, ICC $\in[\mathbf{0 , 1 0 0}]$ |  |  |  |
| :--- | ---: | ---: | ---: |
| ICC_Similarity | (1) | $\mathbf{( 2 )}$ |  |
|  | -0.548 |  |  |
| High_ICC_Similarity_Indicator | $(-0.998)$ | -0.347 | $* *$ |
|  |  | $(-2.29)$ |  |
| Low_ICC_Similarity_Indicator |  | -0.057 |  |
|  |  | $(-0.411)$ |  |
| Relative_PE_Ratio | 0.000 | 0.000 |  |
|  | $(-0.324)$ | $(0.204)$ |  |
| Goodwill_Prct | -0.07 | $* * *$ | -0.044 |
|  | $(-2.802)$ | $(-2.531)$ |  |
| Relative_Size | -0.089 | 0.01 |  |
|  | $(-0.663)$ | $(0.091)$ |  |
| Ln_Market_Value | -0.05 | -0.063 |  |
|  | $(-0.984)$ | $(-1.553)$ |  |
| Stock_Prct | -0.269 | -0.302 | $*$ |
|  | $(-1.448)$ | $(-1.925)$ |  |
| Year Fixed Effect | Yes | Yes |  |
| Industry Fixed Effect | Yes | Yes |  |
| Pesudo-R2 | 0.407 | 0.356 |  |
| No. of Observations | 541 | 541 |  |

The table reports a Tobit regression results of post-acquisitions goodwill write-offs by acquiring firms on ICC similarity index and control variables as in Gu and Lev (2011) and Bereskin, Byun, Officer, and Oh (2018). This table is identical to table (120) except that ICC estimates above 100 or below zero are dropped. The sample is restricted to acquirers with only one acquisition in 7 years window centred on the acquisition announcement date to ensure that any write-offs are attributable to the acquisitions under consideration. The dependent variable is measured as goodwill write-offs in the 3 years following the acquisition scaled by total assets from the year before the acquisition. Constant terms are estimated but not reported. The t -statistics under each coefficient is based on robust standard errors. Tobit models is used due to fact that the dependent variable have a lower bound of zero.

Table 64: Risk Similarity Effect on Post-Acquisition Risk

|  | Coefficient |  | t-stat |
| :--- | ---: | :--- | ---: |
| ICC_Similarity | -0.030 | $* *$ | -2.500 |
| Target_PreAcquestion_Average_ICC | -0.073 | $* *$ | -2.421 |
| Acquirer_PreAcquestion_Average_ICC | 0.207 | $* * *$ | 5.152 |
| Riskier_Target_Indicator | 0.002 |  | 0.289 |
| Same_Industry_Indicator | -0.010 | $*$ | -1.718 |
| Same_State_Indicator | 0.015 | $* *$ | 2.316 |
| High_Tech_Indicator | 0.010 |  | 1.480 |
| Relative_Size | 0.001 |  | 0.395 |
| All_Cash_Indicator | -0.003 |  | -0.419 |
| Tender_Offer_Indicator | -0.001 |  | -0.160 |
| Total_Size | -0.010 | $* * *$ | -5.849 |
| Book_To_Market | 0.001 |  | 0.307 |
| Leverage | 0.067 | $* * *$ | 3.940 |
| Cash | 0.033 |  | 1.334 |
| Adj-Rsquared | 0.074 |  |  |
| No. of Observations | 1752 |  |  |

The table reports the OLS regression results where the dependent variable is average ICC estimate of the acquirer over three years after the effective date of the M\&A deal on the ICC similarity index, the target and acquirer average ICC one month before the announcement of the deal, as well as other deal and firm level controls. The $t$-statistics reported are based on robust standard errors.

### 4.5 Additional Analysis and Robustness Checks

### 4.5.1 Risk Similarity Effect on Post-Acquisition Risk

In this section I continue the analysis by examining the post-merger riskiness as captured by ICC. The question is whether the risk similarity between the acquirer and the target affect the firm riskiness as implied by the market after the deal is completed. Specifically I run a regression where the dependent variable is the average ICC estimate of the acquirer in the two years after the deal effective date on the ICC similarity index and other controls. The controls include the ICC average estimates of both the target and the acquirer prior to the announcement of the deal by one month. The results are reported in table (64). The ICC similarity score coefficient is negative and statistically significant, which suggest that acquirers participating in deals with better risk fit would enjoy lower discount rate to their future cash flows by the market (i.e. the market would perceive them as less risky).

### 4.5.2 Cross Sectional Variations in Effects of Risk Similarity

In this section I implement various cross-sectional analysis and robustness checks to provide some further evidence on the effect of risk similarity on merger likelihood and outcomes. Firstly, I limit the ICC estimates to those based on analysts estimates only. The purpose is to check whether the results are driven by a particular type of earnings forecasts. I find that the conclusions are comparable to the ones presented in the main findings section. Specifically, table (65) show that a one standard deviation increase in the risk similarity will increase the odds of a merger pair formation by $15 \%$ using analysts estimates based ICC measure. Moreover, table (66) show that the there is positively significant relation between the the risk similarity based on analysts forecasts of earnings and the combined CAR enjoyed by shareholders. The high similarity deals also enjoy 3\% additional long-term abnormal operating return on average as shown in table (67).

Secondly, I test whether certain industries in the sample exhibit greater sensitivity to risk similarity in terms of the deal likelihood and outcomes. Following Meier and Servaes (2016) I split the deals to those executed in Labour Intensive and Capital Intensive industries. Capital intensive industries are defined as those with SIC code less than 5000, and labour intensive industries are those with SIC greater than or equal 5000. I find that the risk similarity effect is strongest in labour intensive deals. For instance, the likelihood of merger pair formation increases by $32 \%$ for one standard deviation increase in risk similarity in labour intensive industries, and by $15 \%$ in capital intensive industries. Although the risk similarity effect on post-deal abnormal operating performance and CAR are positive for both types of industries, only labour-intensive coefficients are significant. Such observation is not alien to the literature, in fact Bereskin et al. (2018) record a negative CAR coefficient when it comes to CSR similarity effect. This suggests that although firms which are capital intensive have better probability of forming a merger pair if their risk profile is relatively similar, the risk differences have a lesser effect on short and long-term performance.

Splitting the sample to within or cross industry deals to capture operational overlap between the target and the acquirer, yield similar results. For both groups, the risk similarity have a strong effect on merger pair formation likelihood. However, the CAR respond
stronger to the risk similarity when there is an operational overlap between the firms. To further investigate these relations, I also split the sample into horizontal, vertical, and diversifying deals. Following Fan and Goyal (2006), a merger is classified as vertical if the vertical relatedness between the the industries of the firms is greater than $1 \%$ as reported in input-output data from Bureau of Economic Analysis (BEA). A merger is classified as horizontal if the acquirer and target are from the same industry and have vertical relatedness of less than $1 \%$. The deal is diversifying transaction if it is not vertical or horizontal transaction. CAR coefficient is positively related in to risk similarity in all sub-sample but only significant for horizontal deals. This is again comparable to results reported in Bereskin et al. (2018) for the cultural fit. As for the long-term operating profitability, all sub samples highest quartiles have significant additions in abnormal operating profitability just like in the main findings.

Next, I examine the effect of risk similarity conditional on the relative size of the target (deal value) compared with acquirer market value just before the deal by splitting the deals into terciles. All three sub-samples reported strong ICC similarity effect on merger pair formation likelihood, with the strongest in terms of magnitude in the High relative size group as expected. The low relative size group reported a higher coefficient when compared to the mid sub-sample. A similar observation is noted in the ICC similarity effect on the combined CAR. The highest relative size group reported double the magnitude of the low group. The highest quartile of each of the 3 relative size groups reported positive post-deal abnormal ROA, but only significant in the highest.

To analyse if the trend has changed by a way of learning, I split the sample almost evenly in time before and after 2005. No change in the overall conclusions of the main findings has been recoded. The magnitude of the CAR response to risk similarity has improved a bit post 2005, but the opposite is observed regarding the merger pair formation likelihood and Abnormal ROA.

Finally, I split the sample to two sub-samples using average ICC estimate. The first group is where the target is riskier than the acquirer (i.e. the target average ICC estimate is larger than the acquirer), and the second is where the acquirer is riskier. Due to the fact that some of
these deals would have two firms with relatively similar average ICC, I also take the extreme quartile of each of the two sub samples, to test the deals where the target is considerably riskier than the acquirer, and where the acquirer is considerably riskier than the target. I find that when the acquirer is riskier (but especially when it is considerably riskier), the effect of the risk similarity is significantly strong in all tests, meaning that the similarity is more important. When the target is considerably riskier, the coefficients have signs comparable to the main findings, although some are indistinguishable from zero especially when it comes to post-deal abnormal ROA. This is could be explained by the evidence presented in the literature that buying very risky targets (perhaps distressed firms) is not a good idea.

### 4.5.3 Beta as an Alternative Measure of Risk

I have argued in the methodology section that an ex-ante measure of riskiness is preferred to an ex-post measure like beta. For robustness purpose, I re-run the test that involve only the main sample using a beta similarity index. I compute 10 beta estimates where possible to each firm using two test windows [-300 to -46] and [-200 to -20] days. For each of these windows I use daily return data against the following benchmarks to obtain beta estimates: Russell3000, WILSHIRE5000, MSCI US, SP500, and SP1500. Then I compute the similarity index using the same formulation used to compute the ICC similarity index. The Spearman correlation between the ICC similarity and Beta Similarity is 0.0480 ( p -value 0.0447 ), while Pearson correlation is 0.0203 ( p -value 0.3966 ), and Kendall correlations 0.0325 (p-value 0.0418 ). Such low correlation is most probably due to the nosiness of estimates based on historical data as detailed in the methodology section.

Table (68) report positive Beta similarity effect on CAR. Table (69) show that the deals with highest risk similarity enjoy $1.8 \%$ increase in post-deal abnormal ROA. Both results are in-line with the main-findings using ICC similarity score. The CAR testing is comparable to the main testing in terms of magnitude.

Table 65: Cross-Sectional Variation in Effects of ICC similarity on Merger Pair Formation

|  | Analysts ICC | Labour Intensive | Capital Intensive | Within Industry | Cross Industry | Horizontal | Vertical | Diversifying |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | 2.490 | $2.136{ }^{* * *}$ | 0.993 | $1.546{ }^{* * *}$ | $1.799^{* * *}$ | 1.584 | 1.362 | 1.880 |  |
|  | (3.602) | (13.76) | (2.505) | (3.528) | (3.343) | (3.370) | (1.197) | (3.434) |  |
| Acquirer and Target Controls | Yes | Yes | Yes | Yes | Yes | Yes | Yes | Yes |  |
| Deal Fixed Effects | Yes | Yes | Yes | Yes | Yes | Yes | Yes | Yes |  |
| Pseudo-Rsq | 0.816 | 0.928 | 0.772 | 0.854 | 0.847 | 0.837 | 0.916 | 0.843 |  |
| No. of Obs. | 12,952 | 4,423 | 8,871 | 9,462 | 6,319 | 7,400 | 2,171 | 6,152 |  |
|  | Low Relative Size | Mid Relative Size | $\begin{aligned} & \text { High Rela- } \\ & \text { tive Size } \end{aligned}$ | Riskier Target | Riskier Acquirer | Considerably Riskier Target | Considerably Riskier Acquirer | After 2005 | Before 2005 |
| ICC_Similarity | $2.677{ }^{* * *}$ | $1.065{ }^{* * *}$ | $3.763^{* * *}$ | 0.564 | $2.168{ }^{* * *}$ | $2.207^{* * *}$ | $1.533^{* *}$ | $1.146{ }^{* * *}$ | 2.216 |
|  | (3.048) | (4.333) | (4.043) | (1.237) | (4.428) | (3.216) | (2.321) | (2.794) | (4.267) |
| Acquirer and Target Controls | Yes | Yes | Yes | Yes | Yes | Yes | Yes | Yes | Yes |
| Deal Fixed Effects | Yes | Yes | Yes | Yes | Yes | Yes | Yes | Yes | Yes |
| Pseudo-Rsq | 0.933 | 0.834 | 0.896 | 0.789 | 0.881 | 0.829 | 0.888 | 0.859 | 0.842 |
| No. of Obs. | 3,794 | 4,318 | 4,955 | 4,905 | 10,876 | 2,565 | 3,026 | 9,442 | 6,339 |

The table examines the cross-sectional variations in the effects of ICC similarity on merger pair formation. The setting of the test is identical to table 58 column 4 . Column (Analysts ICC) perform the analysis using the ICC estimates based on analysts estimates only. Following Meier and Servaes (2016), I split the actual deals to those happening in (Labour Intensive) and (Capital Intensive) industries. Capital intensive industries are defined as those with SIC code less than 5000, and labour intensive industries are those with SIC greater than or equal 5000. Further, I split the deals to (cross Industry) and (within industry) deals. The results are also reported using the type of the merger: (Horizontal), (Vertical), or (Diversifying). Following Fan and Goyal (2006), a merger is classified as vertical if the vertical relatedness between the the industries of the firms is greater than $1 \%$ as reported in input-output data from BEA. A merger is classified as horizontal if the acquirer and target are from the same industry and have vertical relatedness of less than $1 \%$. Furthermore the deals are divided according to the relative size of the deal to the acquirer market value to Low, Mid and High relative size deals. The sample is also split into deals where the actual acquirer have an average ICC estimate that is higher than the actual target (Riskier Acquirer), and (Riskier Target). (Considerably Riskier Target) and (Considerably Riskier Acquirer) are top quartile sub-samples in terms of the risk spread between the target and the acquirer. Finally, the main deals are split almost evenly overtime to analyse the learning effect.

Table 66: Cross-Sectional Variation in Effects of ICC similarity on CAR


The table examines the cross-sectional variations in the effects of ICC similarity on Cumulative Abnormal Returns (CAR). The setting of the test is identical to table 61 . Column (Analysts ICC) perform the analysis using the ICC estimates based on analysts estimates only. Following Meier and Servaes (2016), I split the deals to those happening in (Labour Intensive) and (Capital Intensive) industries. Capital intensive industries are defined as those with SIC code less than 5000, and labour intensive industries are those with SIC greater than or equal 5000. Further, I split the deals to (cross Industry) and (within industry) deals. The results are also reported using the type of the merger: (Horizontal), (Vertical), or (Diversifying). Following Fan and Goyal (2006), a merger is classified as vertical if the vertical relatedness between the the industries of the firms is greater than $1 \%$ as reported in input-output data from BEA. A merger is classified as horizontal if the acquirer and target are from the same industry and have vertical relatedness of less than $1 \%$. Furthermore the deals are divided according to the relative size of the deal to the acquirer market value to Low, Mid and High relative size deals. The sample is also split into deals where the actual acquirer have an average ICC estimate that is higher than the actual target (Riskier Acquirer), and (Riskier Target). (Considerably Riskier Target) and (Considerably Riskier Acquirer) are top quartile sub-samples in terms of the risk spread between the target and the acquirer. Finally, the main deals are split almost evenly overtime to analyse the learning effect.

Table 67: Cross-Sectional Variation in Effects of ICC similarity on Post-Deal Abnormal Operating Performance


The table examines the cross-sectional variations in the effects of ICC similarity on post-deal abnormal operating performance. The setting of the test is identical to table 62 . Column (Analysts ICC) perform the analysis using the ICC estimates based on analysts estimates only. Following Meier and Servaes (2016) I split the deals to those happening in (Labour Intensive) and (Capital Intensive) industries. Capital intensive industries are defined as those with SIC code less than 5000, and labour intensive industries are those with SIC greater than or equal 5000. Further, I split the deals to (cross Industry) and (within industry) deals. The results are also reported using the type of the merger: (Horizontal), (Vertical), or (Diversifying). Following Fan and Goyal (2006), a merger is classified as vertical if the vertical relatedness between the the industries of the firms is greater than $1 \%$ as reported in input-output data from BEA. A merger is classified as horizontal if the acquirer and target are from the same industry and have vertical relatedness of less than $1 \%$. Furthermore the deals are divided according to the relative size of the deal to the acquirer market value to Low, Mid and High relative size deals. The sample is also split into deals where the actual acquirer have an average ICC estimate that is higher than the actual target (Riskier Acquirer), and (Riskier Target). (Considerably Riskier Target) and (Considerably Riskier Acquirer) are top quartile sub-samples in terms of the risk spread between the target and the acquirer. Finally, the main deals are split almost evenly overtime to analyse the learning effect.

Table 68: Combined Announcement Returns using Beta Similarity

|  | (1) |  | (2) |  |
| :---: | :---: | :---: | :---: | :---: |
| Beta_Similarity | 0.026 | *** | 0.029 | ** |
|  | (2.850) |  | (2.411) |  |
| High_ICC_Similarity_Indicator |  |  |  |  |
| Low_ICC_Similarity_Indicator |  |  |  |  |
| Same_Industry_Indicator | 0.004 |  | 0.003 |  |
|  | (0.769) |  | (0.743) |  |
| Same_State_Indicator | 0.004 |  | 0.004 |  |
|  | (1.196) |  | (1.287) |  |
| High_Tech_Indicator | - 0.009 | ** | - 0.009 | * |
|  | (-2.267) |  | (-1.94) |  |
| Relative_Size | 0.007 |  | 0.007 |  |
|  | (1.562) |  | (1.479) |  |
| All_Cash_Indicator | 0.015 | *** | 0.016 | *** |
|  | (2.989) |  | (3.030) |  |
| Tender_Offer_Indicator | 0.007 |  | 0.008 |  |
|  | (1.321) |  | (1.272) |  |
| Total_Size | - 0.008 | *** | -0.007 | *** |
|  | (-7.057) |  | (-6.764) |  |
| Book_To_Market | 0.000 | ** | 0.000 | ** |
|  | (2.531) |  | (2.449) |  |
| Leverage | 0.025 |  | 0.025 |  |
|  | (1.636) |  | (1.628) |  |
| Cash | 0.030 |  | 0.000 |  |
|  | (0.587) |  | (0.553) |  |
| Merger_Pair_Liklihood_Inverse_Mills_ratio | 0.004 |  |  |  |
|  | (0.258) |  |  |  |
| Completion_Liklihood_Inverse_Mills_ratio |  |  | 0.029 |  |
|  |  |  | (0.379) |  |
| Year Fixed Effect | Yes |  | Yes |  |
| Industry Fixed Effect | Yes |  | Yes |  |
| No. of Observations | 1752 |  | 1752 |  |
| R-Square | 0.319 |  | 0.319 |  |

The table reports $[-3,+3] 7$-day cumulative abnormal returns (CAR) around merger announcement of actual deals regression on Beta similarity between the merger pairs and other control variables. The t-statistics reported below coefficients are based on industry clustered standard errors. Models 4 and 5 present the results using Heckman's two stage self-selection correction, where the inverse Mills ratio is based on merger-pair likelihood and merger-completion likelihood.

Table 69: Abnormal Operating Performance using Beta Similarity

|  | (1) |  |  |  | (2) |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | High_Similarity |  | Low_Similarity |  | High_Similarity |  | Low_Similarity |  |
| Constant | 0.018 | *** | -0.015 |  | 0.026 | ** | -0.015 |  |
|  | (2.593) |  | (-1.359) |  | (2.2610) |  | (-0.533) |  |
| Abnormal_PreMerger_ROA | 0.534 | *** | 0.603 | *** | 0.259 | * | 0.000 | *** |
|  | (8.322) |  | (12.884) |  | (1.957) |  | (4.119) |  |
| Same_Industry_Indicator |  |  |  |  | -0.001 |  | 0.008 |  |
|  |  |  |  |  | (-0.1090) |  | (0.292) |  |
| Same_State_Indicator |  |  |  |  | -0.001 |  | 0.000 |  |
|  |  |  |  |  | (-0.12) |  | (0.000) |  |
| Relative_Size |  |  |  |  | -0.003 | ** | -0.001 |  |
|  |  |  |  |  | (-2.267) |  | (-0.253) |  |
| High_Tech_Indicator |  |  |  |  | -0.014 |  | -0.03 |  |
|  |  |  |  |  | (-1.310) |  | (-0.9360) |  |
| Adjusted_R2 | 0.177 |  | 0.000 |  | 0.189 |  | -0.005 |  |
| No. of Observations | 438 |  | 438 |  | 438 |  | 438 |  |

The table reports the OLS regression results explaining industry-adjusted (abnormal) post-merger operating performance as defined in Healy, Palepu, and Ruback (1992). Operating profitability is defined as EBITDA scaled by the market value of the company assets. The abnormal operating performance is calculated as the company operating profitability minus the industry median performance. The post-merger abnormal operating performance over the 3 post-merger years is regressed against a synthetic pre-merger abnormal operating performance - that is computed as a value-weighted average of the target's and the acquirer's operating performance in the year before the merger- and a list of relevant pair-controls. The intercept is therefore is the post-merger operating performance independent of pre-merger performance. The regression is estimated separately for the top quartile of Beta similarity, and the bottom quartile of Beta similarity. $t$-statistics using robust standard errors are reported below coefficients in parentheses.

### 4.5.4 What is being Captured

To check that the risk-similarity is not capturing the same effect captured by cultural similarity as presented in Bereskin et al. (2018) for instance, I compute CSR similarity for the sub-sample for which Thomson Reuters provide ESG data. I have used a similar index to the one used in Bereskin et al. (2018), but with a vector of 11 indicators for each firm. The indicator are: Resource Use Score, Emissions Score, Environmental Innovation Score, Management Score, Shareholders Score, CSR Strategy Score, Workforce Score, Human Rights Score, Community Score, Product Responsibility Score, and ESG Controversies Score. Only 102 deals in the main sample survived the data requirement given that Thomson Reuters only cover about 7000 firms worldwide from the year $2002{ }^{23}$. The CSR similarity correlation with the ICC similarity are indistinguishable from zero. Specifically, the Spearman correlation is -0.1197 ( p -value 0.2305 ), Pearson correlation is -12.28 ( p -value 0.2187 ), and Kendall correlation is -0.0794 ( p -value 0.2381 ). Therefore, I find no evidence that the risk similarity score is capturing the same effect of the cultural similarity.

### 4.6 Conclusion

In this chapter, I devise an ex-ante measure of risk similarity between two firms that calculate the pair-wise closeness based on implied cost of capital. Implied cost of capital captures how the market price the riskiness of a firm, and hence, it takes into consideration all information available at the time of estimation. Using this measure, I show that firms with better fit in term of risk profiles are more likely to decide to merge, complete deals they announce, and complete them more quickly. Such deals experience better market appreciation which translate into better combined cumulative returns for the shareholders, and better long-term abnormal operating performance. Moreover, the combined firm experience lower discount rate applied by the market subsequent to the deal completion. This is in-line with the hypothesis that better risk-fit makes integration easier and less costly.

[^16]
## 5 Conclusion

### 5.1 Summary

In conclusion, this thesis study market implied cost of capital (ICC) as a proxy for expected return and as a measure of risk in three contexts. The first empirical chapter is an extensive and exhaustive horse-race between the various ICC models. It is exhaustive in terms of models analysed, and extensive in the methodology used. The list of models include versions based on analysts and mechanical earnings forecasts, calibrated versions using risk factors, portfolio-level estimates transformed to firm-level estimates, as well as simplified and naive estimates. In terms of methodology, it utilise the classical regression method based upon the tautology of Vuolteenaho (2002) and Campbell (1991) in decomposing returns taking into account variable choice criticisms, as well as introduce Hansen et al. (2011) Models Confidence Set to the ICC literature with loss functions pertaining to mean error and error variance.

The second and third empirical chapters are applications in which ICC estimates are used in portfolio selection context and capital budgeting decision making. In the first application, ICC estimates are utilised to improve out-of-sample portfolio performance in terms of riskadjusted returns and turnover. In the second application, ICC estimates are taken to represent how market participants evaluate the riskiness of a firm, and to establish how similar in terms of risk-profiles two firms are. Understanding the risk similarity between firms is important to mergers and acquisitions decision making.

More specifically, the first chapter is designed to deal with issues in prior research about the comparison between ICC models. Prior research is limited in that it only takes into account a limited number of models without recourse to all possible versions in terms of the source of earnings forecasts, or it depends on a methodology that is later criticised for inappropriateness, not to mention the dissimilar conclusions they arrive at. I address the question of the validity of the estimates extensively in terms of testing and exhaustively in terms of possible models. Firstly, I use two methodologies to conduct the horse race. The first is the classical method used in prior similar research which treats the ICC estimates
as an economic construct. However, in the application of this method, I deal with the issues raised by the literature in picking the empirical variables (Easton and Monahan (2016), Wang (2018)). I introduce a second method to the ICC literature from the forecasting research, namely Model Confidence Set, to test the ICC estimates validity and performance as statical constructs. To do so, I use three loss functions to capture the estimate bias, and measurement error variance. The latter arguably is more important for the forecasting performance of the ICC construct (Lee et al. (2017)). Using the regression method, I find that the simplest models such as the dividend discount model of Botosan and Plumlee (2002) and model based on price-to-earnings ratio (PE) captures more variation in subsequent returns than any more sophisticated ICC or risk factor models. In fact, simplifying the dividend model by limiting the forecasting horizon to one year only, or to discounting the terminal value of the same model without dividend forecasts, works at least as good as the original dividend model in terms of the variation they explain in subsequent returns. Moreover, contrary to the theoretical arguments that led to the development of ICC models based on abnormal growth in earnings framework, I find that ICC models based on residual income framework capture variation in subsequent returns better than the abnormal growth in earnings models. The pair-wise comparison of the bias (i.e out-of-sample RMSE and MAE) confirm these results. In MCS testing, both of these models were included in the confidence sets for more firms than any other model. A similar result is obtained when the loss function in the MCS is set to be MEV.

Moreover, in terms of the source of earnings forecasts, I concluded that most ICC models have a higher power of explaining the variation in subsequent returns using analysts estimates. Furthermore, no mechanical-based estimate could do better than Naive. Also, among all types of ICC models, those based on dividend discount models benefit the most from mechanical forecasts. I also find that ICC models benefit the most from Hou, van Dijk, and Zhang (2012) (HDZ) forecasts and the least from a random walk forecasting process as presented by Gerakos and Gramacy (2013). I then examine the benefits of calibrating the ICC estimates. I find that analysts forecasts based ICC models benefited from the calibration more than the versions based on mechanical forecasts. Dividend discount models,
especially BP, benefited more than any other ICC model from the process of calibration. Also, I find that calibrated analysts estimates perform better than all other versions of the respective ICC models except for dividend discount models. Dividend Discount models work best using mechanical estimates. Furthermore, I present a new approach to estimate the cost of equity capital based on Free Cash-Flow to Common Equity holders (FCFE). I show that this model works as good as the best performing models in the horse race.

Finally, I investigate models performance for several sub-samples of the market based on firms characteristics to assess whether some models work better with a particular set of firms. I find little evidence that any of the models are affected as a statistical construct by these characteristics. However, as an economic construct, some characteristics affected the ICC estimates ability to predict future realised returns. In most of the cases, the riskier is the firm, the less effective are the models in predicting subsequent returns. For instance, small firms, firms with low earnings growth, highly leveraged, over-priced (low target-tomarket price ratio) render most of the ICC models insignificant. Moreover, firms with a large number of analysts, or low standard deviation (but not using the coefficient of variation) between analysts forecasts of earnings also pose issues to models ability to predict future returns.

In the second empirical chapter, I address the question of whether expected return estimates implied by accounting and market data instead of average historical returns can improve portfolio selection out-of-sample performance. The literature previously dealt with the issue of estimation risk in portfolio context as a statistical issue. This chapter rather offers a new perspective by reverting back to the basics. Instead of dealing with the nosiness of exp-post estimates statistically, ex-ante expected return estimators are used, namely ICC models. Using two portfolio management styles, I demonstrate that such ex-ante estimates of expected returns yield better out-of-sample performance than portfolios based on realised returns. In an optimal tangency portfolio, ICC estimates result in more stable weights, higher out-of-sample Sharpe ratio, and lower turnover. The evidence presented shows at least 94 ICC versions report statistically higher Sharpe ratios and lower turnover than the mean-variance portfolio.

In market timing portfolios, the ICC estimates generate a higher out-of-sample average risk-adjusted return, and in many occasions lower turnovers than both conventional market timing portfolios and naive allocations like 1/N. Specifically, 21 ICC versions reported statistically better Sharpe ratios and lower turnover than the conventional market timing portfolio, and many more with statistically better Sharpe ratios but practically similar turnover. Similarly, 91 of ICC market timing allocations reported statistically higher out-of-sample risk-adjusted return than $1 / \mathrm{N}$.

In turnover-constrained versions of the strategies, I provide evidence that ICC expected return estimates generate better out-of-sample risk-adjusted-return than strategies that use historical moments, even after constraining the turnover to the turnover generated from an equally weighted portfolio. I find that the ICC strategies retain their edge in terms of riskadjusted returns but with considerably lower turnover.

This chapter contributes to the portfolio management research by introducing a new perspective on how market and accounting information can be used to drive expected return estimates that improve out-of-sample performance.

In the last chapter, I devise an ex-ante measure of risk similarity between two firms that calculate the pair-wise closeness based on implied cost of capital. Implied cost of capital captures how the market price the riskiness of a firm, and hence, it takes into consideration all information available at the time of estimation. Using this measure, I show that firms with a better fit in term of risk profiles are more likely to decide to merge, complete deals they announce, and complete them more quickly. Such deals experience better market appreciation, which translates into better combined cumulative returns for the shareholders, and better long-term abnormal operating performance. Moreover, the combined firm experience lower discount rate applied by the market subsequent to the deal completion. This is in-line with the hypothesis that better risk-fit makes integration easier and less costly.

### 5.2 Managerial Implications

The thesis offers significant managerial implications for a broad range of financial applications. Firstly, market beliefs about expected returns are better reflected by the discount
rate applied by the market to the future cash flows (i.e. ICC) of the firms than by the firm characteristics as estimated from factor models, or by extrapolating historical return data. Practitioners still resort predominantly to historical returns or models like CAPM, which is problematic given the evidence presented in the first and second chapter.

Second, the work presented should allow investors, financial managers and policy-makers to use a forward-looking proxy of the implied cost of capital by identifying the best models and by showing that these models are simple to implement. Simple models do better than more complex models in forecasting returns, as demonstrated by the results in the first chapter. The estimation error in more complex models outweigh the benefit from additional parameters. Therefore, managers should at least benchmark the forecasting estimates of the complex models to naive benchmarks.

Third, from the conclusions of the first and second chapter, analysts forecasts of earnings are more dependable than forecasts based on cross-sectional mechanical forecasts based on some factors. However, calibrating analysts based ICC estimates using company risk factors make the forecasts even better in predicting future returns.

Fourth, practitioners can use the ICCs to more efficiently estimate expected returns for portfolio selection and market-timing to improve their investment decisions.

Fifth, financial managers have a new tool to use when deciding their investment in acquiring another firm. The risk similarity between firms is a crucial factor to consider in M\&A decisions. The last chapter has demonstrated that the outcome of the deal in term of operating performance, market performance, and accounting performance (lower goodwill write-offs) is affected by how similar are the firms in the first place. Moreover, the evidence shows that on many occasions, managers are aware of risk-similarity importance, since the probabilities of forming merger pairs are affected by the similarity.

### 5.3 Limitations and Future Research

The work presented in the three empirical chapters is limited geographically to the US market. Future research could investigate the validity of the results in other markets, or internationally. Furthermore, the first two chapters design is limited to the historical constituents
of the S\&P1500, which represent almost $91 \%$ of market capitalisation, however, further investigation could be done using the full market-base. Also, the first two chapters conducted all the analysis on firm-level data, future research could go further by investigating the ICC prediction power in portfolio-level context.

Moreover, future research can consider other portfolio strategies to determine the benefit from the ex-ante expected return estimates generated by the ICC models. Finally, the analysis in the third chapter did not consider acquisitions with private targets. In most of the cases, ICC models require the firm market price as an input, which is challenging in the case of private firms. Future research could use comparable public firms data, perhaps with proper discounts or premiums, to overcome this issue.

## Appendix A Horse Race Appendixes

A. 1 Additional Regression Analysis

## Table 70 : Capturing Subsequent Return: Small Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | 0.253 | -1.859 | -0.525 | 0.416*** | 5.361 | 0.480 | 60.7\% | 11.29\% | 205 | 0.366 | 9.6\% | 11.7\% |
|  | (0.883) | (-0.591) | (-0.582) | (3.792) | (0.766) | (0.902) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.062 | 0.065 | -0.170 | $0.251 * * *$ | -0.063 | 0.053 | 59.3\% | 9.15\% | 205 | 0.000 | 8.5\% | 62.8\% |
|  | (1.382) | (0.753) | (-0.824) | (4.040) | (-0.737) | (0.219) |  |  |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.074 | 0.438 | -0.309 | 0.251* | 0.237 | 0.364 | 59.3\% | 8.18\% | 205 | 0.289 | 8.5\% | 24.5\% |
|  | (1.466) | (0.831) | (-0.410) | (2.553) | (0.272) | (0.810) |  |  |  |  |  |  |
| GG_Anlst | -0.195 | 0.860 | 1.561 | 0.481 | 0.267 | -0.789 | 59.2\% | 7.39\% | 205 | 0.852 | 20.2\% | 24.5\% |
|  | (-0.920) | (1.152) | (0.587) | (1.709) | (0.204) | (-0.257) |  |  |  |  |  |  |
| 3FF_Factor | 0.030 | -0.786 | -0.227 | 0.346*** | -23.592 | -0.109 | 57.1\% | 7.17\% | 205 | 0.124 | 1.1\% | 22.3\% |
|  | (0.337) | (-0.683) | (-0.385) | (4.383) | (-0.547) | (-0.275) |  |  |  |  |  |  |
| WNG_HDZ | 0.074* | 0.062 | -0.091 | $0.227^{* * *}$ | 1.770 | 0.755 | 58.2\% | 6.98\% | 205 | 0.000 | 4.3\% | 81.9\% |
|  | (2.132) | (0.447) | (-0.292) | (4.185) | (1.193) | (1.152) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.104* | 0.143 | -0.180 | 0.307*** | 0.553 | 0.245 | 60.9\% | 6.83\% | 205 | 0.000 | 6.4\% | 46.8\% |
|  | (2.121) | (0.845) | (-0.847) | (4.207) | (0.469) | (0.796) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.077** | 0.003 | -0.289 | $0.268 * * *$ | 0.012 | -0.010 | 59.1\% | 6.66\% | 205 | 0.000 | 4.3\% | 76.6\% |
|  | (2.862) | (0.070) | (-0.897) | (5.547) | (0.162) | (-0.037) |  |  |  |  |  |  |
| DKL_Anlst | -0.024 | 1.078 | 0.201 | $0.337 * * *$ | -1.462 | 0.606 | 58.3\% | 6.36\% | 205 | 0.953 | 10.6\% | 5.3\% |
|  | (-0.184) | (0.822) | (0.424) | (4.652) | (-0.382) | (0.513) |  |  |  |  |  |  |

Continued in next page...

Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_Anlst | -0.058 | 0.786 | 1.120 | $0.405 * * *$ | 7.432 | 0.416 | $59.2 \%$ | $6.21 \%$ | 205 | 0.751 | 8.5\% | 10.6\% |
|  | (-0.418) | (1.167) | (0.748) | (3.844) | (0.814) | (0.384) |  |  |  |  |  |  |
| GLS_Anlst | -0.284 | 1.473 | 4.139 | 0.558 | 22.639 | 2.339 | $59.3 \%$ | 6.00\% | 205 | 0.791 | 8.5\% | 6.4\% |
|  | (-0.549) | (0.828) | (0.634) | (1.579) | (0.643) | (0.548) |  |  |  |  |  |  |
| CT_Anlst | 0.056 | 0.289 | 0.307 | $0.381 * * *$ | 0.393 | 0.280 | $56.1 \%$ | 5.81\% | 205 | 0.183 | 11.7\% | 12.8\% |
|  | (0.967) | (0.544) | (0.481) | (4.525) | (0.183) | (0.570) |  |  |  |  |  |  |
| HL_Anlst | -0.126 | 2.038 | 0.227 | $0.308^{* * *}$ | $-1.450$ | -1.330 | $56.4 \%$ | 5.52\% | 205 | 0.733 | 5.3\% | 10.6\% |
|  | (-0.397) | (0.673) | (0.552) | (3.301) | (-0.421) | $(-0.545)$ |  |  |  |  |  |  |
| DKL_HDZ | 0.098* | -0.094 | 0.189 | $0.341 * * *$ | 0.973 | -0.272 | 60\% | 5.37\% | 205 | 0.000 | 8.5\% | 21.3\% |
|  | (2.510) | (-0.637) | (0.615) | (5.536) | (0.996) | (-0.676) |  |  |  |  |  |  |
| HL_HDZ | 0.102** | -0.075 | 0.184 | $0.319 * * *$ | 0.986 | -0.124 | 59.7\% | 5.22\% | 205 | 0.000 | 7.4\% | 28.7\% |
|  | (2.657) | (-0.575) | (0.538) | (5.759) | (0.985) | (-0.508) |  |  |  |  |  |  |
| KMY_Anlst | 0.089 | -0.027 | 0.133 | $0.331 * * *$ | 0.322 | -0.411 | 56.6\% | 5.17\% | 205 | 0.000 | 10.6\% | 13.8\% |
|  | (1.758) | (-0.147) | (0.506) | (4.946) | (0.652) | (-0.573) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.062* | 0.013 | 0.008 | $0.241^{* * *}$ | 0.026 | 0.015 | $60.1 \%$ | 5.14\% | 205 | 0.000 | 6.4\% | 83.0\% |
|  | (2.331) | (0.190) | (0.026) | (4.181) | (0.406) | (0.074) |  |  |  |  |  |  |
| PEG_EP | 0.095* | 0.022 | 0.123 | $0.307 * * *$ | 0.335 | -0.088 | 55.5\% | 5.02\% | 205 | 0.000 | 3.8\% | 91.1\% |
|  | (2.303) | (0.211) | (0.401) | (5.178) | (0.673) | $(-0.234)$ |  |  |  |  |  |  |
| Carhart_Factor | 0.086* | -0.506 | 0.048 | $0.326^{* * *}$ | 3.183 | 0.038 | 60.6\% | 4.92\% | 205 | 0.027 | 2.1\% | 20.2\% |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | (2.345) | (-0.754) | (0.114) | (4.891) | (0.279) | (0.101) |  |  |  |  |  |  |
|  | 0.098*** | -0.139 | -0.508 | 0.268*** | 0.982 | 0.031 | 55.7\% | 4.89\% | 205 | 0.000 | 3.2\% | 41.5\% |
|  | (3.138) | (-1.426) | (-0.905) | (5.841) | (1.115) | (0.104) |  |  |  |  |  |  |
| FPM_HDZ | 0.105 | -0.240 | -0.023 | $0.331 * * *$ | 1.742 | 0.232 | 58.8\% | 4.86\% | 205 | 0.000 | 5.3\% | 22.3\% |
|  | (1.821) | (-0.893) | (-0.116) | (5.093) | (0.884) | (0.295) |  |  |  |  |  |  |
| HL_EP | 0.095* | -0.033 | -0.080 | $0.309 * * *$ | 0.603 | 0.139 | 52.9\% | 4.83\% | 205 | 0.000 | 1.1\% | 58.5\% |
|  | (2.573) | (-0.716) | (-0.146) | (4.408) | (0.733) | (0.368) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.082* | -0.005 | 0.051 | 0.25*** | 0.044 | 0.084 | 60.8\% | 4.68\% | 205 | 0.000 | 6.4\% | 74.5\% |
|  | (2.565) | (-0.131) | (0.231) | (3.873) | (0.342) | (0.423) |  |  |  |  |  |  |
| PEG_RI | 0.095** | 0.091 | 0.081 | 0.297*** | 0.528 | 0.192 | 55.5\% | 4.67\% | 205 | 0.000 | 2.4\% | 69.5\% |
|  | (2.838) | (0.472) | (0.355) | (5.869) | (1.152) | (0.976) |  |  |  |  |  |  |
| TrES_Anlst _10Ind | 0.085* | -0.029 | -0.120 | 0.332*** | 0.289 | 0.230 | 56.8\% | 4.26\% | 205 | 0.000 | 5.3\% | 69.1\% |
|  | (1.978) | (-0.217) | (-0.385) | (4.468) | (0.762) | (1.204) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.054 | 0.113 | -0.019 | 0.261*** | -0.034 | 0.029 | 58.7\% | 4.11\% | 205 | 0.000 | 7.4\% | 59.6\% |
|  | (1.167) | (1.121) | (-0.102) | (4.138) | (-0.299) | (0.113) |  |  |  |  |  |  |
| WNG_Anlst | 0.047 | 0.035 | -0.198 | 0.351** | 0.414 | -0.270 | 58.3\% | 4.11\% | 205 | 0.000 | 3.2\% | 78.7\% |
|  | (0.954) | (0.540) | (-0.407) | (2.875) | (0.320) | (-0.391) |  |  |  |  |  |  |
| BP_RW | 0.059 | 0.243 | 0.391 | 0.384*** | -0.186 | 0.253 | 60.2\% | 4.11\% | 205 | 0.000 | 10.0\% | 23.3\% |
|  | (1.674) | (1.620) | (0.592) | (4.408) | (-0.238) | (0.803) |  |  |  |  |  |  |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2} \mathrm{Imp}$. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_EP | 0.095* | -0.084 | -0.513 | 0.279* | -0.029 | -0.243 | $52.8 \%$ | 4.10\% | 205 | 0.000 | 2.1\% | $53.2 \%$ |
|  | (2.558) | (-0.549) | (-0.443) | (2.398) | (-0.019) | (-0.345) |  |  |  |  |  |  |
| TPDPS_RW | 0.189 | 0.053 | -1.820 | 0.079 | -0.545 | -0.846 | 60\% | 4.09\% | 205 | 0.000 | 6.4\% | 64.9\% |
|  | (0.857) | (0.533) | (-0.507) | (0.252) | (-0.704) | (-0.453) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.094* | -0.052 | -0.143 | 0.278*** | 0.126 | -0.496 | $53.9 \%$ | 4.03\% | 205 | 0.000 | 6.4\% | 28.7\% |
|  | (2.361) | (-0.294) | (-0.228) | (3.390) | (0.470) | (-0.760) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.156 | -0.129 | -0.510 | 0.212*** | -0.076 | 0.377 | $57.4 \%$ | 4.02\% | 205 | 0.000 | 5.3\% | 63.8\% |
|  | (0.959) | (-0.486) | (-0.679) | (3.603) | (-0.366) | (0.720) |  |  |  |  |  |  |
| MPEG_HDZ | 0.063 | -0.002 | 0.454 | 0.306*** | 0.546 | -0.513 | 56.7\% | 3.98\% | 205 | 0.000 | $2.1 \%$ | 40.4\% |
|  | (1.622) | (-0.017) | (0.841) | (6.006) | (0.666) | (-0.957) |  |  |  |  |  |  |
| GM_RI | 0.056 | -0.053 | 0.230 | 0.291*** | 0.153 | 0.048 | 55.2\% | 3.93\% | 205 | 0.000 | 4.3\% | 48.9\% |
|  | (1.499) | (-0.784) | (0.357) | (4.448) | (0.163) | (0.109) |  |  |  |  |  |  |
| BP_RI | 0.075 | 0.194 | -0.142 | 0.338*** | -0.008 | -0.168 | 57.5\% | 3.84\% | 205 | 0.000 | 13.0\% | 19.6\% |
|  | (1.673) | (1.555) | (-0.219) | (3.950) | (-0.010) | (-0.397) |  |  |  |  |  |  |
| GM_Anlst | 0.105 | -0.318 | -0.152 | 0.439** | 1.234 | 0.067 | 55.5\% | 3.84\% | 205 | 0.053 | 6.4\% | 9.6\% |
|  | (1.807) | (-0.472) | (-0.555) | (2.761) | (1.325) | (0.317) |  |  |  |  |  |  |
| PE_HDZ | 0.104** | -0.321 | -0.218 | 0.378*** | 0.182 | -0.130 | 58.5\% | 3.84\% | 205 | 0.000 | 10.6\% | 38.3\% |
|  | (2.632) | (-0.985) | (-0.492) | (4.976) | (0.212) | (-0.359) |  |  |  |  |  |  |
| TrETSS_Anlst _25SBM | 0.094 | -0.010 | -0.760 | 0.259 | -0.020 | -0.479 | 54\% | 3.69\% | 205 | 0.000 | 3.2\% | 33.0\% |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_EP | (1.691) | (-0.105) | (-0.908) | (1.642) | (-0.075) | (-0.747) |  |  |  |  |  |  |
|  | 0.039 | 0.108 | -0.456 | 0.206** | 0.064 | -0.176 | 59.5\% | 3.61\% | 205 | 0.000 | 9.6\% | 67.0\% |
|  | (0.982) | (1.739) | (-0.617) | (2.650) | (0.553) | (-0.522) |  |  |  |  |  |  |
| TPDPS_RI | 0.073* | 0.018 | -0.041 | $0.27 * * *$ | 0.018 | 0.143 | 60.1\% | 3.60\% | 205 | 0.000 | 11.7\% | 68.1\% |
|  | (2.356) | (0.332) | (-0.108) | (5.091) | (0.158) | (0.430) |  |  |  |  |  |  |
| BP_HDZ | 0.071 | 0.278 | 1.192 | $0.377 * * *$ | 0.442 | 0.358 | 59.2\% | 3.60\% | 205 | 0.141 | 16.0\% | 8.5\% |
|  | (1.407) | (0.571) | (1.011) | (4.779) | (0.543) | (0.239) |  |  |  |  |  |  |
| KMY_HDZ | 0.091* | -0.026 | 0.176 | 0.343*** |  | -0.480 | 59.8\% | 3.60\% | 205 | 0.000 | 7.4\% | 27.7\% |
|  | (2.371) | (-0.178) | (0.559) | (5.296) | (1.225) | (-0.754) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.064*** | 0.008 | -0.078 | 0.193*** | -0.009 | -0.294 | 58.3\% | 3.46\% | 205 | 0.000 | 6.4\% | 86.2\% |
|  | (3.154) | (0.507) | (-0.227) | (3.302) | (-0.702) | (-0.597) |  |  |  |  |  |  |
| GM_HDZ | 0.069* | -0.071 | 0.276 | $0.305^{* * *}$ | 0.408 | -0.387 | 56.6\% | 3.35\% | 205 | 0.000 | 1.1\% | 34.0\% |
|  | (1.980) | (-0.574) | (0.851) | (5.993) | (0.385) | (-1.031) |  |  |  |  |  |  |
| Naive | 0.040 | 0.112* | 0.249 | $0.327 * * *$ | 0.002 | 0.182 | 61.8\% | 3.33\% | 205 | 0.000 | 21.3\% | 62.8\% |
|  | (1.375) | (1.993) | (0.670) | (5.704) | (0.015) | (0.642) |  |  |  |  |  |  |
| CT_RW | 0.109* | -0.040 | 0.024 | 0.274*** | 1.119 | 0.267 | 59.2\% | 3.22\% | 205 | 0.000 | 6.0\% | 60.2\% |
|  | (2.215) | (-0.311) | (0.095) | (4.187) | (0.617) | (0.687) |  |  |  |  |  |  |
| BP_EP | 0.033 | 0.312 | 0.291 | $0.366 * * *$ | -0.097 | 0.199 | 56.9\% | 3.13\% | 205 | 0.005 | 7.6\% | 19.6\% |
|  | (0.660) | (1.299) | (0.486) | (4.730) | (-0.101) | (0.456) |  |  |  |  |  |  |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.052 | 0.070 | 0.216 | 0.323*** | 0.036 | 0.216 | 61.3\% | 3.01\% | 205 | 0.000 | 20.2\% | 66.0\% |
|  | (1.890) | (1.794) | (0.543) | (5.673) | (0.283) | (0.724) |  |  |  |  |  |  |
| CT_HDZ | 0.086 | -0.041 | 0.385 | 0.375*** | 0.600 | -0.361 | 59\% | 2.93\% | 205 | 0.000 | 4.3\% | 44.7\% |
|  | (1.903) | (-0.304) | (0.965) | (5.145) | (0.720) | (-0.738) |  |  |  |  |  |  |
| FPM_RI | 0.041 | 0.031 | -0.167 | 0.274*** | -0.027 | 0.067 | 57.8\% | 2.57\% | 205 | 0.000 | 2.1\% | 45.7\% |
|  | (0.457) | (0.329) | (-0.431) | (4.475) | (-0.073) | (0.340) |  |  |  |  |  |  |
| FPM_EP | 0.144 | -0.088 | -0.185 | 0.3*** | 2.354 | 0.204 | 53\% | 2.43\% | 205 | 0.000 | 3.2\% | 47.9\% |
|  | (0.973) | (-0.485) | (-0.376) | (4.638) | (0.692) | (0.772) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.057 | 0.051 | 0.213 | 0.303*** | 0.086 | 0.236 | 60.3\% | 2.42\% | 205 | 0.000 | 19.1\% | 63.8\% |
|  | (1.368) | (0.676) | (0.532) | (4.273) | (0.477) | (0.800) |  |  |  |  |  |  |
| WNG_EP | 0.083* | -0.057 | 0.256 | 0.2** | 0.146 | 0.337 | 56.6\% | 2.33\% | 205 | 0.000 | 2.1\% | 74.5\% |
|  | (2.134) | (-0.440) | (0.447) | (2.607) | (0.466) | (0.366) |  |  |  |  |  |  |
| GG_RI | 0.020 | 0.242 | 1.476 | 0.246 | 1.293 | 1.903 | 55.8\% | 2.30\% | 205 | 0.004 | 3.6\% | 41.7\% |
|  | (0.227) | (0.944) | (0.590) | (1.289) | (0.421) | (0.816) |  |  |  |  |  |  |
| GM_EP | 0.069 | 0.048 | -0.076 | 0.314*** | 0.587 | 0.325 | 56.2\% | 2.24\% | 205 | 0.000 | 4.4\% | 58.2\% |
|  | (1.216) | (0.517) | (-0.277) | (5.076) | (1.157) | (0.315) |  |  |  |  |  |  |
| 5FF_Factor | 0.077* | 0.550 | 0.167 | 0.295 | 26.643 | 1.490 | 55.7\% | 2.04\% | 205 | 0.868 | 3.2\% | 18.1\% |
|  | (1.990) | (0.203) | (0.325) | (1.540) | (0.719) | (0.724) |  |  |  |  |  |  |
| CAPM_Factor | -3.260 | 251.110 | 4.904 | 0.644 | 1300.385 | 1.716 | 58.7\% | 1.86\% | 205 | 0.309 | 5.3\% | 18.1\% |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_10Ind | (-0.970) | (1.028) | (0.556) | (1.345) | (0.483) | (0.547) |  |  |  |  |  |  |
|  | 0.083* | 0.096 | 0.035 | 0.286*** | -0.387 | 0.296 | 58.9\% | 1.77\% | 205 | 0.000 | 2.1\% | 29.8\% |
|  | (2.180) | (0.707) | (0.142) | (4.839) | (-1.116) | (0.902) |  |  |  |  |  |  |
| KMY_EP | 0.101* | -0.017 | -0.066 | $0.335 * * *$ | 1.005 | 0.058 | 52.1\% | 1.73\% | 205 | 0.000 | 9.6\% | 36.2\% |
|  | (2.240) | (-0.136) | (-0.171) | (5.477) | (0.833) | (0.129) |  |  |  |  |  |  |
| FGHJ_HDZ | 0.110 | -0.234 | -0.009 | 0.38*** | 0.114 | -0.704 | 58.2\% | 1.73\% | 205 | 0.000 | 6.4\% | 27.7\% |
|  | (1.724) | (-0.690) | (-0.014) | (5.289) | (0.033) | (-0.812) |  |  |  |  |  |  |
| MPEG_RI | 0.078* | -0.049 | -0.345 | $0.273 * * *$ | -0.024 | -0.081 | 52.8\% | 1.73\% | 205 | 0.000 | 1.1\% | 56.4\% |
|  | (2.379) | (-0.882) | (-1.373) | (5.537) | (-0.052) | (-0.507) |  |  |  |  |  |  |
| GG_HDZ | 0.418 | -2.387 | -4.160 | -0.184 | 2.779 | 13.912 | 61.1\% | 1.69\% | 205 | 0.372 | 5.3\% | 36.2\% |
|  | (0.815) | (-0.633) | (-0.563) | (-0.208) | (1.336) | (0.597) |  |  |  |  |  |  |
| PEG_Anlst | 0.137 | -0.349 | 0.307 | 0.362*** | 0.141 | 0.202 | 57.2\% | 1.37\% | 205 | 0.000 | $3.2 \%$ | 21.3\% |
|  | (1.894) | (-0.986) | (0.511) | (4.345) | (0.123) | (0.698) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.110 | -0.131 | -0.503 | -0.150 | 0.064 | -0.331 | 52.7\% | 1.34\% | 205 | 0.000 | 4.3\% | 77.7\% |
|  | (1.463) | (-0.629) | (-1.174) | (-0.213) | (0.472) | (-0.572) |  |  |  |  |  |  |
| BP_Anlst | 0.035 | 0.375 | 0.399 | 0.413*** | 0.062 | 0.292 | 57.2\% | 1.30\% | 205 | 0.004 | 21.3\% | 9.6\% |
|  | (0.918) | (1.763) | (0.754) | (4.962) | (0.071) | (0.713) |  |  |  |  |  |  |
| PE_RW | 0.1** | 0.030 | -0.168 | $0.259 * * *$ | 0.088 | -0.084 | 58.1\% | 1.19\% | 205 | 0.000 | 7.2\% | 74.7\% |
|  | (3.069) | (0.207) | (-0.363) | (4.525) | (0.153) | (-0.267) |  |  |  |  |  |  |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_EP_25SBM | $0.109 * * *$ | -0.019 | -0.238 | $0.204^{* * *}$ | 0.004 | 0.203 | $55.9 \%$ | 1.16\% | 205 | 0.000 | 4.3\% | $85.1 \%$ |
|  | (3.831) | (-0.959) | (-0.751) | (4.661) | (0.163) | (0.461) |  |  |  |  |  |  |
| KMY_RI | 0.126 | -0.080 | -0.087 | 0.293*** | -1.416 | $-0.341$ | $55.1 \%$ | 1.11\% | 205 | 0.000 | $2.1 \%$ | $39.4 \%$ |
|  | (1.552) | (-0.428) | (-0.198) | (4.029) | (-0.705) | (-0.742) |  |  |  |  |  |  |
| WNG_RI | 0.109** | $0.001$ | -0.357 | $0.233 * * *$ | $0.015$ | $0.069$ | 56.5\% | 1.11\% | 205 | 0.000 | 4.3\% | 87.2\% |
|  | (2.967) | (0.033) | (-1.308) | (4.192) | (0.263) | (0.287) |  |  |  |  |  |  |
| PEG_RW | 0.066 | 0.064 | -0.045 | $0.317 * * *$ | -0.378 | -0.036 | 55.9\% | 1.02\% | 205 | 0.000 | 2.0\% | 100.0\% |
|  | (1.292) | (0.655) | (-0.094) | (3.468) | (-0.780) | (-0.118) |  |  |  |  |  |  |
| TrES_Anlst _25SBM | 0.066** | 0.019 | -0.114 | 0.234*** | -0.004 | $-0.257$ | 55.9\% | 1.00\% | 205 | 0.000 | 3.2\% | 83.0\% |
|  | (3.070) | (1.259) | (-0.477) | (5.405) | (-0.349) | (-0.664) |  |  |  |  |  |  |
| GG_RW | 0.115** | -0.017 | -0.060 | 0.309*** | 1.169 | -0.039 | 57.8\% | 0.93\% | 205 | 0.000 | $3.1 \%$ | 64.6\% |
|  | (2.629) | (-0.126) | (-0.162) | (4.123) | (1.132) | (-0.138) |  |  |  |  |  |  |
| DKL_RW | 0.09* | 0.156 | 0.039 | $0.273 * * *$ | -0.788 | 0.007 | $56.1 \%$ | 0.93\% | 205 | 0.039 | 3.2\% | 48.4\% |
|  | (2.524) | (0.387) | (0.202) | (5.342) | (-1.169) | (0.039) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.074* | -0.057 | 0.873 | 0.373* | -0.071 | 0.505 | 53.5\% | 0.67\% | 205 | 0.000 | 5.3\% | 62.8\% |
|  | (2.311) | (-0.505) | (0.537) | (2.501) | (-0.983) | (0.650) |  |  |  |  |  |  |
| HL_RW | 0.075 | 0.198 | 0.016 | $0.279 * * *$ | -1.021 | -0.037 | 56.3\% | 0.57\% | 205 | 0.055 | 1.1\% | 47.3\% |
|  | (1.683) | (0.481) | (0.092) | (5.216) | (-1.275) | (-0.188) |  |  |  |  |  |  |
| KMY_RW | 0.081 | 0.066 | -0.079 | 0.242*** | -0.884 | 0.341 | 56.3\% | 0.52\% | 205 | 0.000 | 1.1\% | 44.7\% |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_HDZ | (1.822) | (0.377) | (-0.189) | (3.953) | (-1.265) | (0.614) |  |  |  |  |  |  |
|  | 0.067 | 0.029 | -0.080 | $0.372 * * *$ | 0.410 | -0.633 | 57.2\% | 0.38\% | 205 | 0.008 | 2.1\% | 23.4\% |
|  | (0.999) | (0.081) | (-0.197) | (5.310) | (0.158) | (-0.857) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.047 | 0.837 | -0.206 | $0.315 * * *$ | -0.434 | 0.283 | 54.4\% | 0.28\% | 205 | 0.824 | 4.3\% | 9.6\% |
|  | (1.020) | (1.139) | (-0.267) | (3.641) | (-0.358) | (0.771) |  |  |  |  |  |  |
| GG_EP | 0.112* | -0.030 | 0.666 | $0.375 * * *$ | -0.661 | -0.544 | $56.4 \%$ | 0.25\% | 205 | 0.000 | 0.0\% | 50.0\% |
|  | (1.971) | (-0.248) | (0.678) | (3.407) | (-0.489) | (-0.449) |  |  |  |  |  |  |
| GLS_RW | 0.074 | 0.347 | 0.525 | 0.299*** | -2.816 | 0.204 | 55.9\% | 0.23\% | 205 | 0.131 | 3.2\% | 47.3\% |
|  | (1.856) | (0.811) | (0.556) | (4.092) | (-1.200) | (0.805) |  |  |  |  |  |  |
| PE_EP | 0.060 | -0.020 | 0.323 | 0.288*** | -0.217 | 0.772 | 55.9\% | -0.36\% | 205 | 0.000 | 1.1\% | 57.4\% |
|  | (1.486) | (-0.284) | (0.546) | (5.410) | (-0.331) | (0.594) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.07* | -0.012 | 0.382 | 0.215 | 0.001 | 0.379 | 51.3\% | -0.42\% | 205 | 0.000 | 1.1\% | 85.1\% |
|  | (2.515) | (-0.644) | (0.500) | (1.935) | (0.053) | (0.509) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.089 | -0.034 | -0.121 | 0.18* | -0.002 | 0.369 | 56\% | -0.43\% | 205 | 0.000 | 1.1\% | 80.9\% |
|  | (1.812) | (-0.766) | (-0.345) | (2.111) | (-0.131) | (0.719) |  |  |  |  |  |  |
| FPM_RW | 0.149 | -0.198 | 0.042 | 0.298*** | -0.153 | -0.059 | 52.7\% | -0.63\% | 205 | 0.008 | 0.0\% | 58.5\% |
|  | (1.819) | (-0.446) | (0.168) | (4.638) | (-0.076) | (-0.256) |  |  |  |  |  |  |
| MPEG_Anlst | 0.126 | -0.188 | 0.113 | 0.374*** | 0.948 | -0.045 | 54.1\% | -0.68\% | 205 | 0.000 | 5.3\% | 21.3\% |
|  | (1.759) | (-0.636) | (0.230) | (4.487) | (1.599) | (-0.176) |  |  |  |  |  |  |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RW | 0.073 | 0.014 | -0.317 | $0.283 * * *$ | 0.666 | -0.172 | $56.5 \%$ | -0.89\% | 205 | 0.000 | $5.5 \%$ | 50.5\% |
|  | (1.752) | (0.148) | (-0.514) | (3.547) | (0.701) | (-0.726) |  |  |  |  |  |  |
| GLS_RI | 0.051 | 0.073 | 0.512 | 0.337*** | 2.859 | 0.306 | $53.7 \%$ | -1.06\% | 205 | 0.000 | 2.2\% | 53.3\% |
|  | (1.295) | (0.480) | (0.632) | (3.804) | (0.294) | (0.737) |  |  |  |  |  |  |
| MPEG_RW | 0.113* | -0.057 | -0.054 | 0.289*** | 0.613 | -0.277 | 55.3\% | -1.07\% | 205 | 0.000 | 5.6\% | 55.6\% |
|  | (2.351) | (-0.608) | (-0.125) | (4.694) | (0.719) | $(-0.706)$ |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.087*** | 0.001 | -0.319 | 0.167* | -0.008 | -0.206 | 54.8\% | -1.11\% | 205 | 0.000 | 4.3\% | 83.0\% |
|  | (3.756) | (0.048) | (-0.525) | (2.505) | (-0.625) | (-0.394) |  |  |  |  |  |  |
| CT_EP | 0.350 | 0.079 | -2.321 | -0.062 | -1.520 | 4.959 | 51.8\% | $-1.22 \%$ | 205 | 0.120 | $3.2 \%$ | 58.5\% |
|  | (0.706) | (0.135) | (-1.046) | (-0.173) | (-0.418) | (1.022) |  |  |  |  |  |  |
| PE_Anlst | 0.034 | 0.881 | 0.793 | 0.319*** | -0.255 | -0.328 | 55.3\% | $-1.34 \%$ | 205 | 0.860 | 14.9\% | 9.6\% |
|  | (0.738) | (1.309) | (0.875) | (4.791) | (-0.157) | (-0.880) |  |  |  |  |  |  |
| FGHJ_RI | 0.107 | -0.500 | -3.815 | -0.045 | 6.094 | -1.498 | $53.1 \%$ | -1.38\% | 205 | 0.076 | 2.2\% | 51.1\% |
|  | (1.090) | (-0.599) | (-0.572) | (-0.079) | (0.762) | $(-0.543)$ |  |  |  |  |  |  |
| FGHJ_RW | 0.075 | -0.104 | 0.641 | $0.313 * * *$ | -1.600 | 0.278 | 55.9\% | $-1.52 \%$ | 205 | 0.151 | 3.6\% | 52.4\% |
|  | (1.555) | (-0.136) | (0.541) | (3.632) | (-0.586) | (0.920) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.08** | -0.001 | -0.086 | $0.24 * * *$ | -0.004 | 0.141 | 53.9\% | -1.88\% | 205 | 0.000 | $3.2 \%$ | 83.0\% |
|  | (3.049) | (-0.020) | (-0.399) | (5.854) | (-0.192) | (0.511) |  |  |  |  |  |  |
| WNG_RW | 0.064* | -0.008 | -0.046 | 0.285*** | -0.048 | 0.055 | 55.5\% | -2.25\% | 205 | 0.000 | 2.3\% | 95.5\% |

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Table 70 : Capturing Subsequent Return: Small Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_EP | (2.079) | (-0.554) | (-0.324) | (5.013) | (-0.226) | (0.290) |  |  |  |  |  |  |
|  | 0.067* | -0.013 | -0.069 | 0.305*** | 1.343 | -0.111 | 51.4\% | $-2.27 \%$ | 205 | 0.000 | 1.1\% | 58.2\% |
|  | (2.141) | (-0.185) | (-0.206) | (4.887) | (0.195) | (-0.329) |  |  |  |  |  |  |
| DKL_RI | 0.096* | -0.020 | -0.584 | $0.261 * *$ | -0.235 | -0.153 | 53.6\% | $-2.37 \%$ | 205 | 0.000 | 0.0\% | 54.3\% |
|  | (2.111) | (-0.304) | (-0.687) | (2.910) | (-0.289) | (-0.568) |  |  |  |  |  |  |
| PE_RI | 0.028 | 0.055 | 0.869 | 0.326** | 0.685 | 0.538 | 54\% | -2.42\% | 205 | 0.000 | 4.3\% | 60.6\% |
|  | (0.376) | (0.828) | (0.529) | (2.882) | (0.650) | (0.694) |  |  |  |  |  |  |
| HL_RI | 0.106* | -0.048 | -0.423 | 0.284*** | 1.383 | -0.141 | 54.5\% | $-2.55 \%$ | 205 | 0.000 | 0.0\% | 52.1\% |
|  | (2.320) | (-0.854) | (-0.724) | (3.911) | (0.628) | (-0.565) |  |  |  |  |  |  |
| FGHJ_EP | 0.032 | 0.110 | 0.316 | $0.321 * * *$ | 8.536 | 0.027 | 51.2\% | $-2.71 \%$ | 205 | 0.000 | 2.2\% | 62.6\% |
|  | (0.574) | (0.802) | (0.487) | (4.325) | (0.823) | (0.066) |  |  |  |  |  |  |
| MPEG_EP | -0.093 | 0.627 | 0.895 | 0.653 | 143.231 | 0.164 | 53.1\% | $-3.11 \%$ | 205 | 0.728 | 1.1\% | 64.9\% |
|  | (-0.320) | (0.588) | (0.774) | (1.133) | (0.598) | (0.312) |  |  |  |  |  |  |
| CT_RI | 0.092* | -0.026 | -0.662 | 0.176 | -0.732 | 0.405 | 50.3\% | -5.48\% | 205 | 0.000 | 0.0\% | 63.8\% |
|  | (2.180) | (-0.264) | (-0.751) | (1.233) | (-0.230) | (0.635) |  |  |  |  |  |  |

For the lowest quartile of firms in terms of size, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various
ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+$ $\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the
testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 71 : Capturing Subsequent Return: Large Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | -0.007 | 0.195*** | 0.355 | $0.528 * * *$ | 0.074 | -0.119 | 59.5\% |  | 205 | 0.000 | 61.2\% | 94.9\% |
|  | (-0.834) | (3.485) | (1.241) | (5.939) | (1.836) | (-1.363) |  | 6.89\% |  |  |  |  |
| TPDPS_HDZ | -0.001 | 0.178** | -0.040 | $0.592 * * *$ | 0.116 | -0.115 | 59.2\% |  | 205 | 0.000 | 61.2\% | 94.9\% |
|  | (-0.071) | (2.710) | (-0.042) | (3.523) | (1.608) | (-1.098) |  | 6.55\% |  |  |  |  |
| Naive | -0.003 | 0.169*** | 0.494*** | $0.481^{* * *}$ | 0.067 | -0.061 | 59.3\% |  | 205 | 0.000 | 59.2\% | 94.9\% |
|  | (-0.367) | (5.134) | (3.759) | (12.195) | (1.774) | (-1.121) |  | 6.55\% |  |  |  |  |
| BP_Anlst | -0.007 | 0.978*** | $0.787^{* * *}$ | $0.464^{* * *}$ | 0.222 | -0.104 | 57.3\% |  | 205 | 0.916 | 63.8\% | 44.4\% |
|  | (-0.516) | (4.701) | (4.227) | (9.904) | (1.454) | (-1.477) |  | 5.25\% |  |  |  |  |
| BP_HDZ | -0.011 | 0.984*** | 0.674* | $0.47 * * *$ | 0.270 | -0.114 | 56.9\% |  | 205 | 0.953 | 63.3\% | 39.8\% |
|  | (-0.787) | (3.664) | (2.184) | (8.854) | (1.690) | (-1.373) |  | 4.79\% |  |  |  |  |
| TPDPS_RI | -0.011 | 0.131*** | 0.48* | 0.454*** | 0.108 | 0.149 | 57.8\% |  | 205 | 0.000 | 54.6\% | 95.4\% |
|  | (-1.092) | (3.742) | (2.125) | (18.091) | (1.534) | (0.679) |  | 4.79\% |  |  |  |  |
| TPDPS_EP | -0.010 | 0.056 | 2.483 | 0.164 | -0.037 | 0.283 | 57.3\% |  | 205 | 0.000 | 51.0\% | 95.4\% |
|  | (-0.995) | (0.798) | (1.002) | (0.496) | (-0.180) | (1.068) |  | 4.69\% |  |  |  |  |
| TPDPS_RW | 0.012 | 0.101* | 0.869 | $0.423 * * *$ | 0.016 | -0.020 | 56.1\% |  | 205 | 0.000 | 44.9\% | 95.4\% |
|  | (0.835) | (2.391) | (1.854) | (15.212) | (0.328) | (-0.421) |  | 3.66\% |  |  |  |  |
| PE_Anlst | -0.035 | 1.076*** | $1.071 * * *$ | $0.388 * * *$ | 0.494 | 0.008 | 56.4\% |  | 205 | 0.760 | 52.6\% | 44.4\% |
|  | (-2.733) | (4.326) | (3.305) | (15.696) | (0.751) | (0.077) |  | 3.18\% |  |  |  |  |

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Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_EP | -0.019 | $0.768 * * *$ | 0.382* | 0.439*** | 0.253 | 0.124 | 55.2\% |  | 205 | 0.182 | 53.6\% | 43.9\% |
|  | (-1.740) | (4.428) | (2.527) | (11.913) | (1.581) | (0.510) |  | 3.16\% |  |  |  |  |
| BP_RW | -0.003 | 0.796*** | 0.459** | $0.435 * * *$ | 0.196 | -0.058 | 55\% |  | 205 | 0.252 | 51.5\% | 37.8\% |
|  | (-0.292) | (4.497) | (2.620) | (15.720) | (1.049) | (-0.847) |  | 2.87\% |  |  |  |  |
| PEG_HDZ | 0.002 | 0.222* | 0.188 | 0.403*** | 0.450 | 0.017 | 53.6\% |  | 205 | 0.000 | 18.9\% | 67.3\% |
|  | (0.151) | (2.409) | (1.209) | (16.809) | (0.692) | (0.262) |  | 2.64\% |  |  |  |  |
| BP_RI | -0.017 | 0.756*** | -0.102 | $0.482 * * *$ | 0.539 | 0.115 | 55.1\% |  | 205 | 0.102 | 53.6\% | 41.8\% |
|  | (-1.550) | (5.091) | (-0.159) | (5.990) | (1.481) | (0.479) |  | 2.62\% |  |  |  |  |
| GM_RI | 0.001 | 0.813 | 0.495 | 0.514*** | -6.139 | -1.263 | 53.6\% |  | 205 | 0.793 | 29.9\% | 67.5\% |
|  | (0.024) | (1.147) | (1.741) | (3.703) | (-1.036) | (-1.107) |  | 2.37\% |  |  |  |  |
| GG_HDZ | -0.032 | 0.522* | -0.236 | $0.423 * * *$ | 3.379* | -0.078 | 54.6\% |  | 205 | 0.050 | 34.2\% | 63.8\% |
|  | (-1.400) | (2.157) | (-0.327) | (10.534) | (2.167) | (-0.204) |  | 2.27\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.007 | 0.017 | -0.152 | $0.408 * * *$ | -0.016 | 0.033 | 52.9\% |  | 205 | 0.000 | 8.2\% | 96.4\% |
|  | (0.864) | (1.707) | (-0.760) | (13.877) | (-1.175) | (0.299) |  | 2.11\% |  |  |  |  |
| TrES_EP_25SBM | 0.010 | -0.006 | 0.143 | 0.386*** | 0.015 | 0.105 | 53.1\% |  | 205 | 0.000 | 4.6\% | 97.4\% |
|  | (1.318) | (-0.455) | (0.671) | (16.923) | (0.728) | (0.813) |  | 2.09\% |  |  |  |  |
| DKL_HDZ | -0.036 | 0.633 | 0.152 | 0.41*** | 7.173 | 0.304 | 52.8\% |  | 205 | 0.396 | 20.4\% | 68.9\% |
|  | (-1.181) | (1.469) | (0.427) | (11.629) | (1.040) | (0.813) |  | 2.01\% |  |  |  |  |
| MPEG_HDZ | 0.001 | 0.176* | 0.223 | 0.398*** | 1.017 | 0.194 | 52.7\% |  | 205 | 0.000 | 19.4\% | 73.5\% |

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Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_HDZ | (0.099) | (2.008) | (1.270) | (15.895) | (1.139) | (1.383) |  | 1.99\% |  |  |  |  |
|  | 0.023 | 0.552 | 0.789 | $0.517^{* * *}$ | -9.878 | -0.810 | 52.5\% |  | 205 | 0.556 | 18.4\% | 69.9\% |
|  | (0.912) | (0.728) | (1.909) | (3.739) | (-1.258) | $(-0.876)$ |  | 1.63\% |  |  |  |  |
| TrES_Anlst_10Ind | 0.005 | 0.036* | 0.117 | 0.397*** | -0.010 | -0.004 | 53.1\% |  | 205 | 0.000 | 17.9\% | 95.4\% |
|  | (0.582) | (2.319) | (0.887) | (16.225) | (-0.488) | (-0.049) |  | 1.49\% |  |  |  |  |
| HL_HDZ | -0.093 | 1.333 | -0.669 | 0.429*** | 19.731 | 0.540 | 52.3\% |  | 205 | 0.783 | 20.9\% | 69.9\% |
|  | (-0.991) | (1.104) | (-0.560) | (10.760) | (0.897) | (1.137) |  | 1.48\% |  |  |  |  |
| PEG_Anlst | 0.039 | -0.141 | 0.066 | 0.46*** | 0.389 | -0.065 | 53.3\% |  | 205 | 0.000 | 15.3\% | 64.8\% |
|  | (1.322) | (-0.544) | (0.176) | (8.179) | (0.490) | (-0.471) |  | 1.48\% |  |  |  |  |
| FGHJ_HDZ | 0.062 | -0.672 | 2.620 | 0.238 | -2.308 | 1.626 | 53.6\% |  | 205 | 0.091 | 21.9\% | 66.8\% |
|  | (0.712) | (-0.684) | (1.140) | (1.723) | (-0.398) | (0.794) |  | 1.47\% |  |  |  |  |
| TrES_RW_25SBM | 0.072 | 4.348 | 0.358 | 0.183 | 1.438 | 0.125* | 53.1\% |  | 205 | 0.768 | 5.1\% | 81.6\% |
|  | (0.981) | (0.384) | (1.066) | (0.666) | (0.497) | (1.964) |  | 1.44\% |  |  |  |  |
| FGHJ_Anlst | -0.078 | 0.843*** | 0.143 | 0.426*** | 1.044 | -0.044 | 53.5\% |  | 205 | 0.301 | 26.5\% | 52.0\% |
|  | (-4.436) | (5.569) | (0.815) | (14.744) | (1.362) | (-0.520) |  | 1.41\% |  |  |  |  |
| DKL_RW | -0.028 | 0.063 | -0.129 | $0.439 * * *$ | -0.162 | 0.046 | 51.9\% |  | 205 | 0.000 | 8.7\% | 83.2\% |
|  | (-0.961) | (0.952) | (-0.993) | (14.840) | (-0.710) | (0.529) |  | 1.40\% |  |  |  |  |
| HL_RI | -0.010 | 0.040 | 0.031 | 0.405*** | 0.514 | 0.093 | 52.2\% |  | 205 | 0.000 | 30.1\% | 77.0\% |
|  | (-0.637) | (0.205) | (0.218) | (15.722) | (1.253) | (1.223) |  | 1.40\% |  |  |  |  |

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Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_RI | -0.021 | $0.172^{* *}$ | 0.114 | 0.414*** | -4.824 | -0.011 | 52.7\% |  | 205 | 0.000 | 29.7\% | 76.0\% |
|  | (-2.251) | (3.059) | (0.937) | (16.317) | (-1.109) | (-0.076) |  | 1.36\% |  |  |  |  |
| CT_Anlst | -0.054 | 0.771*** | 0.379** | 0.419*** | 0.683 | -0.105 | 53.4\% |  | 205 | 0.114 | 34.7\% | 40.3\% |
|  | (-3.878) | (5.332) | (2.703) | (17.043) | (1.504) | (-1.200) |  | 1.36\% |  |  |  |  |
| GLS_Anlst | -0.071 | 0.816*** | 0.043 | 0.43*** | 1.066 | -0.042 | 53.5\% |  | 205 | 0.246 | 28.6\% | 48.5\% |
|  | (-4.026) | (5.158) | (0.229) | (14.877) | (1.519) | (-0.762) |  | 1.36\% |  |  |  |  |
| PE_RI | -0.029 | 0.479* | -0.495 | $0.44 * * *$ | 0.697 | 0.558 | 54.2\% |  | 205 | 0.021 | 40.3\% | 69.4\% |
|  | (-1.497) | (2.138) | (-0.736) | (10.479) | (0.787) | (1.010) |  | 1.34\% |  |  |  |  |
| PEG_RI | -0.009 | 0.058 | 0.130 | 0.41 *** | 0.265 | 0.022 | 52.7\% |  | 205 | 0.000 | 35.3\% | 100.0\% |
|  | (-0.783) | (0.978) | (1.064) | (15.538) | (1.405) | (0.228) |  | 1.29\% |  |  |  |  |
| PE_EP | 0.034 | 0.206 | 0.343 | 0.241 | 1.573 | 0.677 | 52.9\% |  | 205 | 0.011 | 37.8\% | 71.9\% |
|  | (0.825) | (0.665) | (1.478) | (1.185) | (1.811) | (0.982) |  | 1.24\% |  |  |  |  |
| GLS_HDZ | -0.021 | 0.246 | 0.310 | $0.381 * * *$ | 2.847* | 0.717 | 53\% |  | 205 | 0.021 | $22.4 \%$ | 62.8\% |
|  | (-1.197) | (0.759) | (1.061) | (8.499) | (1.997) | (0.834) |  | 1.16\% |  |  |  |  |
| KMY_HDZ | -0.005 | 0.231* | 0.286 | 0.403*** | 0.578 | 0.057 | 52.1\% |  | 205 | 0.000 | 21.9\% | 68.4\% |
|  | (-0.473) | (2.140) | (1.828) | (16.109) | (0.837) | (0.409) |  | 1.15\% |  |  |  |  |
| DKL_RI | -0.005 | -0.007 | -0.177 | 0.425*** | 0.589 | -0.032 | 51.9\% |  | 205 | 0.000 | 28.1\% | 79.6\% |
|  | (-0.339) | (-0.036) | (-0.604) | (12.127) | (1.420) | (-0.199) |  | 1.12\% |  |  |  |  |
| WNG_RI | 0.012 | -0.003 | 0.100 | 0.4*** | -0.006 | 0.153 | 51.6\% |  | 205 | 0.000 | 5.1\% | 97.4\% |

[^17]Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_HDZ | (1.233) | (-0.892) | (0.938) | (16.055) | (-0.186) | (0.689) |  | 1.09\% |  |  |  |  |
|  | -0.006 | $0.491^{* * *}$ | 0.241* | 0.41 *** | 0.816 | -0.090 | 53.2\% |  | 205 | 0.000 | 36.7\% | 56.6\% |
|  | (-0.662) | (4.140) | (2.048) | (18.058) | (1.448) | (-0.722) |  | 1.09\% |  |  |  |  |
| CT_RI | -0.034 | 0.522 | -0.372 | 0.388*** | 5.452 | -0.129 | $51 \%$ |  | 205 | 0.277 | 15.3\% | 83.7\% |
|  | (-0.890) | (1.188) | (-0.569) | (12.934) | (0.884) | (-0.685) |  | 1.08\% |  |  |  |  |
| GG_RW | -0.027 | 0.384 | -0.312 | 0.424*** | 1.507 | -0.072 | 53.3\% |  | 205 | 0.013 | 25.0\% | 66.3\% |
|  | (-1.124) | (1.564) | (-0.419) | (10.235) | (0.535) | (-0.181) |  | 1.04\% |  |  |  |  |
| CT_HDZ | -0.045 | 0.592* | 0.552 | $0.453 * * *$ | 1.458 | -0.026 | 52.6\% |  | 205 | 0.081 | 25.5\% | 68.4\% |
|  | (-1.295) | (2.540) | (1.393) | (10.101) | (1.393) | (-0.079) |  | 0.94\% |  |  |  |  |
| TrES_RI_25SBM | 0.021* | -0.011 | -0.163 | 0.403*** | 0.008 | -0.028 | 52\% |  | 205 | 0.000 | 5.6\% | 98.0\% |
|  | (1.964) | (-1.035) | (-0.566) | (11.268) | (0.945) | (-0.228) |  | 0.91\% |  |  |  |  |
| DKL_Anlst | -0.048 | $0.741^{* * *}$ | 0.758** | $0.403 * * *$ | -0.080 | -0.177 | 53.4\% |  | 205 | 0.061 | 30.6\% | 34.2\% |
|  | (-2.730) | (5.385) | (2.994) | (17.320) | (-0.103) | (-1.151) |  | 0.85\% |  |  |  |  |
| GM_RW | -0.011 | -0.021 | -0.248 | 0.488*** | 0.328 | 0.769 | 51.7\% |  | 205 | 0.000 | 8.2\% | 89.2\% |
|  | (-0.559) | (-0.229) | (-0.465) | (5.469) | (1.831) | (0.588) |  | 0.76\% |  |  |  |  |
| WNG_Anlst | 0.047 | 0.013* | 0.801 | $0.425 * * *$ | 0.327 | -0.602 | 52.4\% |  | 205 | 0.000 | 8.7\% | 98.0\% |
|  | (1.706) | (2.438) | (1.388) | (9.617) | (0.795) | (-1.004) |  | 0.73\% |  |  |  |  |
| GG_RI | -0.002 | 0.513* | 0.206 | 0.434*** | -0.180 | -0.205 | 52\% |  | 205 | 0.050 | 15.7\% | 75.1\% |
|  | (-0.224) | (2.082) | (0.913) | (11.138) | (-0.186) | (-0.605) |  | 0.73\% |  |  |  |  |

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Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_25SBM | 0.008 | -0.002 | 0.020 | 0.41 *** | -0.023 | 0.178 | 50.6\% |  | 205 | 0.000 | 6.6\% | 91.8\% |
|  | (0.946) | (-0.072) | (0.172) | (13.820) | (-0.998) | (1.873) |  | 0.62\% |  |  |  |  |
| MPEG_RW | -0.002 | 0.015 | 0.115 | 0.424*** | 0.141 | 0.001 | 51.9\% |  | 205 | 0.000 | 12.2\% | 92.9\% |
|  | (-0.182) | (0.254) | (0.756) | (14.967) | (0.719) | (0.005) |  | 0.59\% |  |  |  |  |
| TrES_RW_10Ind | 0.017* | -0.605 | 0.159 | 0.41 *** | 16.605 | -0.101 | 52\% |  | 205 | 0.147 | 12.8\% | 81.6\% |
|  | (2.118) | (-0.548) | (1.501) | (18.101) | (1.499) | (-1.079) |  | 0.53\% |  |  |  |  |
| WNG_EP | 0.023* | 0.000 | 0.097 | $0.405^{* * *}$ | 0.008 | -0.043 | 51.3\% |  | 205 | 0.000 | 3.6\% | 98.5\% |
|  | (1.993) | (-1.306) | (0.896) | (15.081) | (1.074) | (-0.745) |  | 0.52\% |  |  |  |  |
| PEG_RW | 0.005 | 0.018 | 0.092 | 0.416*** | 0.297* | -0.071 | 51.7\% |  | 205 | 0.000 | 14.3\% | 100.0\% |
|  | (0.450) | (0.638) | (0.562) | (14.148) | (2.082) | (-0.717) |  | 0.51\% |  |  |  |  |
| Carhart_Factor | 0.012 | -0.238 | 0.163 | 0.434*** | -3.033 | 0.084 | 51.6\% |  | 205 | 0.000 | 13.3\% | 42.3\% |
|  | (0.969) | (-0.810) | (1.120) | (13.975) | (-1.753) | (0.306) |  | 0.51\% |  |  |  |  |
| FPM_Anlst | -0.064 | 0.906*** | 0.236 | $0.415^{* * *}$ | 0.402 | -0.026 | 52.2\% |  | 205 | 0.650 | $33.2 \%$ | 27.0\% |
|  | (-3.074) | (4.396) | (0.648) | (12.858) | (0.647) | (-0.211) |  | 0.50\% |  |  |  |  |
| KMY_EP | -0.013 | 0.129** | 0.127 | 0.399*** | 0.212 | -0.047 | 51\% |  | 205 | 0.000 | 18.4\% | 69.4\% |
|  | (-1.477) | (3.055) | (0.740) | (13.856) | (0.705) | (-0.919) |  | 0.46\% |  |  |  |  |
| TrES_Anlst_25SBM | 0.046 | -0.003 | -0.523 | 0.37*** | -0.017 | -0.364 | 52\% |  | 205 | 0.000 | 6.6\% | 96.9\% |
|  | (1.570) | (-0.292) | (-0.674) | (8.297) | (-1.081) | (-0.637) |  | 0.46\% |  |  |  |  |
| FPM_HDZ | -0.017 | $0.407 * * *$ | 0.217 | 0.393*** | -0.052 | -0.122 | 51.8\% |  | 205 | 0.000 | 18.4\% | 64.8\% |

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Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_Anlst | (-1.484) | (3.428) | (0.980) | (12.242) | (-0.125) | (-1.658) |  | 0.44\% |  |  |  |  |
|  | -0.029 | 0.557*** | 0.571** | 0.41 *** | 0.226 | -0.196 | 52.8\% |  | 205 | 0.000 | 29.1\% | 35.2\% |
|  | (-1.639) | (4.502) | (3.003) | (17.820) | (0.430) | (-1.290) |  | 0.44\% |  |  |  |  |
| GM_Anlst | -0.035 | $0.623 * * *$ | 0.602 | $0.418^{* * *}$ | -0.583 | -0.178 | 52.1\% |  | 205 | 0.002 | 26.0\% | 40.3\% |
|  | (-2.281) | (5.236) | (1.757) | (17.430) | (-0.536) | (-0.747) |  | 0.43\% |  |  |  |  |
| GG_EP | -0.010 | 0.501 | 0.123 | $0.446 * * *$ | -0.521 | -0.267 | 51.7\% |  | 205 | 0.656 | 24.3\% | 57.8\% |
|  | (-0.886) | (0.447) | (0.737) | (11.308) | (-0.158) | (-0.804) |  | 0.38\% |  |  |  |  |
| PEG_EP | 0.000 | 0.075* | 0.122 | 0.411*** | 0.992*** | 0.033 | 51.1\% |  | 205 | 0.000 | 24.4\% | 90.6\% |
|  | (0.025) | (2.001) | (1.069) | (17.245) | (4.475) | (0.364) |  | 0.33\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.013 | -0.001 | 0.171 | 0.354*** | 0.013 | 0.158 | 50.9\% |  | 205 | 0.000 | 6.1\% | 96.9\% |
|  | (0.996) | (-0.149) | (1.492) | (9.687) | (0.931) | (1.487) |  | 0.32\% |  |  |  |  |
| TrOHE_25SBM | 0.014 | 0.019 | 0.111 | 0.408*** | 0.013 | -0.027 | 51\% |  | 205 | 0.000 | 6.6\% | 91.3\% |
|  | (1.731) | (0.724) | (1.199) | (14.032) | (0.579) | (-0.206) |  | 0.30\% |  |  |  |  |
| PE_RW | 0.016 | 0.169 | -0.186 | $0.45 * * *$ | -0.308 | -0.032 | 51.5\% |  | 205 | 0.000 | 10.2\% | 86.7\% |
|  | (0.602) | (1.485) | (-0.617) | (11.652) | (-1.341) | (-0.497) |  | 0.28\% |  |  |  |  |
| KMY_Anlst | -0.020 | 0.173** | 0.4* | $0.402 * * *$ | -0.050 | -0.071 | 52.4\% |  | 205 | 0.000 | 20.9\% | 63.8\% |
|  | (-1.489) | (3.021) | (2.376) | (15.628) | (-0.172) | (-0.752) |  | 0.27\% |  |  |  |  |
| FPM_EP | -0.003 | $0.07 * * *$ | 0.140 | $0.403 * * *$ | 0.021 | -0.026 | 51.6\% |  | 205 | 0.000 | 19.9\% | 92.9\% |
|  | (-0.279) | (4.149) | (1.558) | (16.495) | (0.435) | (-0.298) |  | 0.24\% |  |  |  |  |

[^18]Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_EP | -0.013 | 0.189* | 0.702 | $0.347^{* * *}$ | 0.048 | 0.136 | 50.7\% |  | 205 | 0.000 | 21.9\% | 74.0\% |
|  | (-1.401) | (2.427) | (1.194) | (6.174) | (0.126) | (0.703) |  | 0.24\% |  |  |  |  |
| MPEG_Anlst | 0.003 | 0.209* | 0.383 | 0.429*** | 0.076 | -0.060 | 51.8\% |  | 205 | 0.000 | $22.4 \%$ | 51.5\% |
|  | (0.214) | (2.300) | (1.552) | (16.703) | (0.159) | (-0.438) |  | 0.24\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.006 | 0.027 | 0.074 | 0.398*** | -0.004 | 0.059 | 50.5\% |  | 205 | 0.000 | 12.2\% | 91.8\% |
|  | (0.890) | (0.447) | (0.568) | (16.880) | (-0.058) | (0.910) |  | 0.16\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.011 | 0.000 | 0.137 | $0.4 * * *$ | -0.032 | 0.044 | 50.1\% |  | 205 | 0.000 | 9.7\% | 98.5\% |
|  | (0.956) | (-0.040) | (0.849) | (15.766) | (-1.168) | (0.531) |  | 0.13\% |  |  |  |  |
| TrES_EP_10Ind | 0.000 | 0.024 | -0.077 | 0.406*** | 0.014 | -0.111 | 50.9\% |  | 205 | 0.000 | 10.7\% | 95.9\% |
|  | (-0.058) | (0.933) | (-0.541) | (15.609) | (0.179) | (-0.886) |  | 0.11\% |  |  |  |  |
| TrES_RI_10Ind | -0.005 | 0.010 | -0.033 | $0.411^{* * *}$ | 0.024 | -0.031 | 51.7\% |  | 205 | 0.000 | 14.8\% | 95.9\% |
|  | (-0.543) | (0.776) | (-0.421) | (15.694) | (1.197) | (-0.579) |  | 0.11\% |  |  |  |  |
| FPM_RW | -0.005 | 0.043* | 0.120 | $0.383 * * *$ | -0.020 | 0.034 | 51.6\% |  | 205 | 0.000 | 13.8\% | 88.8\% |
|  | (-0.319) | (2.413) | (1.548) | (10.058) | (-0.357) | (0.534) |  | 0.10\% |  |  |  |  |
| WNG_RW | 0.002 | 0.000 | 0.002 | $0.449^{* * *}$ | -0.007 | -0.329 | 49.5\% |  | 205 | 0.000 | 5.6\% | 98.5\% |
|  | (0.163) | (0.288) | (0.013) | (7.146) | (-0.988) | (-0.724) |  | 0.03\% |  |  |  |  |
| CT_EP | -0.010 | 0.105*** | 0.250 | 0.391*** | 0.067 | -0.148 | 51.5\% |  | 205 | 0.000 | 22.4\% | 77.6\% |
|  | (-0.941) | (3.543) | (1.791) | (16.633) | (0.389) | (-0.843) |  | -0.03\% |  |  |  |  |
| WNG_HDZ | 0.025* | 0.003 | 0.247 | 0.405*** | -0.012 | -0.122 | 51\% |  | 205 | 0.000 | 0.0\% | 98.0\% |

[^19]Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_Anlst_25SBM | (2.346) | (1.252) | (1.094) | (16.098) | (-0.044) | (-0.763) |  | -0.03\% |  |  |  |  |
|  | 0.025** | -0.051 | 0.118 | 0.388*** | 0.029 | -0.013 | 51.4\% |  | 205 | 0.000 | 7.7\% | 88.3\% |
|  | (2.678) | (-1.657) | (1.181) | (16.546) | (1.186) | (-0.143) |  | -0.06\% |  |  |  |  |
| HL_EP | -0.012 | 0.109*** | 0.175 | 0.391*** | 0.325 | -0.024 | 50.5\% |  | 205 | 0.000 | 19.4\% | 76.5\% |
|  | (-1.375) | (3.801) | (0.892) | (12.944) | (1.206) | (-0.407) |  | -0.09\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.000 | 0.001 | -0.137 | 0.43*** | -0.016 | 0.034 | 50.7\% |  | 205 | 0.000 | 4.6\% | 97.4\% |
|  | (-0.006) | (0.098) | (-0.811) | (15.281) | (-0.767) | (0.481) |  | -0.25\% |  |  |  |  |
| FGHJ_RI | 0.030 | -0.535 | 0.612 | $0.333 * * *$ | -1.194 | 1.740 | 51.3\% |  | 205 | 0.050 | 22.4\% | 74.5\% |
|  | (0.855) | (-0.688) | (1.140) | (3.648) | (-0.880) | (0.851) |  | -0.28\% |  |  |  |  |
| MPEG_EP | -0.012 | 0.399 | 0.027 | $0.427^{* * *}$ | -1.625 | -0.297 | 50.6\% |  | 205 | 0.161 | 13.8\% | 77.6\% |
|  | (-0.550) | (0.935) | (0.175) | (15.466) | (-0.531) | (-0.639) |  | -0.29\% |  |  |  |  |
| GG_Anlst | -0.015 | 0.087* | -0.779 | $0.496 * * *$ | 0.677 | -0.093 | 51.9\% |  | 205 | 0.000 | 14.8\% | 77.6\% |
|  | (-1.266) | (2.493) | (-0.802) | (4.587) | (0.904) | (-1.166) |  | -0.30\% |  |  |  |  |
| CT_RW | -0.009 | 0.461 | 0.276 | $0.432^{* * *}$ | 0.184 | -0.164 | 51.6\% |  | 205 | 0.270 | 11.4\% | 74.6\% |
|  | (-0.512) | (0.948) | (1.296) | (14.785) | (0.077) | (-0.684) |  | -0.33\% |  |  |  |  |
| GM_EP | -0.003 | 0.381 | 0.146 | $0.483 * * *$ | -2.514 | -0.557 | 50.7\% |  | 205 | 0.120 | 16.8\% | 78.6\% |
|  | (-0.284) | (0.960) | (0.755) | (6.005) | (-0.736) | (-1.044) |  | -0.49\% |  |  |  |  |
| KMY_RW | -0.028 | 0.048 | -0.114 | 0.439*** | -0.147 | -0.005 | 50.6\% |  | 205 | 0.000 | 8.7\% | 86.2\% |
|  | (-0.997) | (1.170) | (-0.906) | (15.183) | (-0.793) | (-0.078) |  | -0.52\% |  |  |  |  |

[^20]Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_HDZ_10Ind | 0.021 | -0.017 | 0.047 | 0.401*** | 0.020 | -0.005 | 50.7\% |  | 205 | 0.000 | 19.4\% | 95.4\% |
|  | (1.517) | (-0.988) | (0.445) | (15.753) | (1.329) | (-0.097) |  | -0.57\% |  |  |  |  |
| HL_RW | -0.027 | 0.046 | -0.114 | 0.439*** | -0.188 | -0.004 | 50.6\% |  | 205 | 0.000 | 8.7\% | 86.2\% |
|  | (-0.966) | (1.122) | (-0.903) | (15.177) | (-1.034) | (-0.055) |  | -0.58\% |  |  |  |  |
| GLS_RI | 0.014 | -0.181 | 0.336 | 0.379*** | -6.720 | 0.714 | 51.6\% |  | 205 | 0.000 | 19.9\% | 74.0\% |
|  | (0.896) | (-0.591) | (1.330) | (8.706) | (-1.383) | (0.829) |  | -0.62\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.001 | 0.002 | 0.135 | $0.418 * * *$ | -0.020 | 0.107 | 49.9\% |  | 205 | 0.000 | 4.6\% | 96.9\% |
|  | (0.050) | (0.611) | (0.542) | (13.103) | (-1.422) | (1.388) |  | -0.63\% |  |  |  |  |
| TrOHE_10Ind | 0.004 | 0.088 | 0.056 | $0.428 * * *$ | -0.170 | -0.036 | 49.9\% |  | 205 | 0.000 | 13.8\% | 71.4\% |
|  | (0.397) | (0.594) | (0.355) | (13.660) | (-0.373) | (-0.354) |  | -0.71\% |  |  |  |  |
| KMY_RI | -0.012 | 0.163 | 0.032 | 0.409*** | 0.568 | 0.076 | 50.4\% |  | 205 | 0.000 | 27.0\% | 71.9\% |
|  | (-1.274) | (1.875) | (0.231) | (16.265) | (1.412) | (1.049) |  | -0.75\% |  |  |  |  |
| FPM_RI | -0.002 | 0.062* | 0.016 | $0.427 * * *$ | -0.022 | -0.051 | 49.5\% |  | 205 | 0.000 | 19.9\% | 82.7\% |
|  | (-0.161) | (2.159) | (0.173) | (15.749) | (-0.522) | (-0.664) |  | -0.82\% |  |  |  |  |
| CAPM_Factor | -0.020 | 2.594 | 0.198 | 0.401*** | -0.321 | -0.004 | 50.7\% |  | 205 | 0.722 | 26.0\% | 21.4\% |
|  | (-0.301) | (0.581) | (1.520) | (17.181) | (-0.046) | (-0.020) |  | -0.83\% |  |  |  |  |
| TrETSS_RI_10Ind | -0.004 | 0.003 | 0.043 | 0.421*** | 0.005 | 0.007 | 49.9\% |  | 205 | 0.000 | 15.4\% | 98.5\% |
|  | (-0.410) | (0.211) | (0.327) | (16.538) | (0.219) | (0.123) |  | -0.83\% |  |  |  |  |
| FGHJ_EP | 0.017 | -0.327 | 0.395 | 0.347*** | -2.089 | 1.650 | 49.7\% |  | 205 | 0.097 | 23.5\% | 73.5\% |

[^21]Table 71 : Capturing Subsequent Return: Large Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_RW | (0.450) | (-0.410) | (0.692) | (3.771) | (-0.817) | (0.807) |  | -1.00\% |  |  |  |  |
|  | 0.037 | -0.651 | 0.611 | 0.345*** | 2.299 | 1.719 | 49.3\% |  | 205 | 0.040 | 13.4\% | 86.6\% |
|  | (1.021) | (-0.816) | (1.111) | (3.650) | (1.023) | (0.819) |  | -1.09\% |  |  |  |  |
| 5FF_Factor | 0.019 | 0.123 | 0.201 | 0.397*** | 4.787 | -0.191 | 50\% |  | 205 | 0.000 | 14.3\% | $30.1 \%$ |
|  | (0.890) | (0.561) | (1.258) | (10.836) | (1.208) | (-0.309) |  | -1.11\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.002 | -0.026 | -0.052 | $0.422^{* * *}$ | -0.034 | 0.029 | 49.5\% |  | 205 | 0.000 | 9.7\% | 97.4\% |
|  | (0.256) | (-1.503) | (-0.407) | (16.789) | (-0.635) | (0.450) |  | -1.14\% |  |  |  |  |
| 3FF_Factor | 0.019 | -0.128 | 0.235 | 0.399*** | 0.900 | 0.083 | 50.4\% |  | 205 | 0.000 | 13.8\% | 30.6\% |
|  | (1.749) | (-0.591) | (1.830) | (16.441) | (0.490) | (0.333) |  | -1.30\% |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.024* | -0.073 | 0.226 | 0.403*** | -0.063 | -0.092 | 49.5\% |  | 205 | 0.000 | 10.7\% | 82.7\% |
|  | (2.170) | (-0.519) | (1.019) | (16.918) | (-0.192) | (-0.855) |  | -1.50\% |  |  |  |  |
| GLS_EP | 0.008 | -0.028 | 0.271 | 0.384*** | -1.692 | 0.669 | 49.4\% |  | 205 | 0.001 | 21.9\% | 74.0\% |
|  | (0.520) | (-0.091) | (1.094) | (8.774) | (-0.714) | (0.778) |  | -1.55\% |  |  |  |  |
| GLS_RW | -0.001 | 0.017 | -0.012 | 0.431*** | 1.466 | 0.085 | 48.5\% |  | 205 | 0.000 | 8.7\% | 86.2\% |
|  | (-0.022) | (0.249) | (-0.103) | (16.515) | (0.838) | (1.226) |  | -1.80\% |  |  |  |  |

For the highest quartile of firms in terms of size, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+$ $\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t -statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in
subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 72 : Capturing Subsequent Return: Low Value Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | $0.024 * *$ | $0.135 * * *$ | $0.189$ | $0.484 * * *$ |  | -0.209 | 63.4\% | 6.91\% | 205 | 0.000 | 68.3\% | 89.8\% |
|  | (2.696) | (6.169) | (0.901) | (19.952) | (1.835) | (-1.476) |  |  |  |  |  |  |
| Naive | 0.027** | $0.135^{* * *}$ | 0.109 | 0.488*** | 0.097* |  | 63.2\% | 6.77\% | 205 | 0.000 | 67.8\% | 90.2\% |
|  | (3.054) | (6.476) | (0.391) | (18.389) | (1.980) | (-0.992) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.025** | $0.117^{* * *}$ |  | $0.484^{* * *}$ |  | -0.225 | 62.9\% | 6.46\% | 205 | 0.000 | 69.8\% | 91.2\% |
|  | (2.656) | (4.741) | (0.250) | (18.877) | (1.958) | (-1.409) |  |  |  |  |  |  |
| BP_HDZ | 0.013 | 0.827*** | 0.056 | 0.468*** | 0.448 | -0.273 | 61.3\% | 5.58\% | 205 | 0.307 | 72.7\% | 47.3\% |
|  | (1.150) | (4.901) | (0.206) | (19.503) | (1.601) | (-1.775) |  |  |  |  |  |  |
| BP_Anlst | 0.017 | 0.848*** | $0.080$ | 0.471*** | $0.495$ | -0.320 | 61\% | 5.48\% | 205 | 0.462 | 72.2\% | 51.2\% |
|  | (1.342) | (4.110) | (0.248) | (19.564) | (1.655) | (-1.365) |  |  |  |  |  |  |
| TPDPS_RI | 0.027** | 0.097*** | 0.230 | 0.463*** | 0.075 | -0.241 | 61.5\% | 5.07\% | 205 | 0.000 | 61.5\% | 90.2\% |
|  | (3.059) | (4.808) | (1.797) | (21.384) | (1.782) | (-1.905) |  |  |  |  |  |  |
| TPDPS_EP | 0.028*** | 0.078*** | 0.039 | 0.467*** | 0.088 | -0.160 | 61\% | 4.82\% | 205 | 0.000 | 59.5\% | 92.2\% |
|  | (3.091) | (3.991) | (0.157) | (18.322) | (1.866) | (-1.127) |  |  |  |  |  |  |
| BP_EP | 0.016 | $0.59 * * *$ | 0.062 | $0.457 * * *$ | 0.429 | -0.234 | 59.8\% | 4.27\% | 205 | 0.000 | 63.9\% | 55.6\% |
|  | (1.699) | (5.468) | (0.411) | (19.452) | (1.691) | (-1.770) |  |  |  |  |  |  |
| BP_RI | 0.019* | $0.621^{* * *}$ | 0.174 | 0.451 *** | 0.430 | -0.244 | 59.7\% | 4.10\% | 205 | 0.001 | 61.0\% | 51.2\% |
|  | (2.002) | (5.572) | (1.390) | (20.419) | (1.709) | (-1.863) |  |  |  |  |  |  |

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Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RW | $0.035^{* * *}$ | 0.093*** | 0.123 | 0.466*** | 0.099* | -0.248 | 59.9\% | 4.04\% | 205 | 0.000 | 50.7\% | 92.2\% |
|  | (4.033) | (4.926) | (1.023) | (19.794) | (2.344) | (-1.637) |  |  |  |  |  |  |
| BP_RW | 0.027** | 0.62*** | 0.116 | $0.458 * * *$ | 0.423 | -0.220 | 59.3\% | 3.80\% | 205 | 0.000 | 55.6\% | 51.2\% |
|  | (2.812) | (5.958) | (0.995) | (19.839) | (1.667) | (-1.672) |  |  |  |  |  |  |
| PE_Anlst | -0.013 | 0.958*** | 0.310 | 0.437*** | 1.129 | -0.189 | 57.7\% | 2.88\% | 205 | 0.746 | 56.6\% | 41.0\% |
|  | (-1.135) | (7.377) | (1.655) | (17.564) | (1.615) | (-1.444) |  |  |  |  |  |  |
| CT_RW | 0.003 | 0.422 | -0.361 | $0.47 * * *$ | 4.884 | -0.198 | 57\% | 1.72\% | 205 | 0.193 | 30.0\% | 76.0\% |
|  | (0.169) | (0.955) | (-1.680) | (15.900) | (1.207) | (-1.601) |  |  |  |  |  |  |
| CT_Anlst | -0.009 | $0.531 * * *$ | 0.115 | $0.445 * * *$ | 1.178 | -0.065 | 56.4\% | 1.57\% | 205 | 0.000 | 39.5\% | 54.6\% |
|  | (-0.826) | (4.614) | (0.972) | (19.902) | (1.578) | (-1.077) |  |  |  |  |  |  |
| FGHJ_HDZ | -0.095 | 1.369 | 0.325 | 0.41 *** | 3.041* | -1.177 | 56.1\% | 1.51\% | 205 | 0.720 | 27.3\% | 69.8\% |
|  | (-0.975) | (1.331) | (0.511) | (6.266) | (2.381) | (-0.889) |  |  |  |  |  |  |
| DKL_HDZ | 0.013 | 0.33* | -0.027 | $0.451 * * *$ | 0.932* | -0.256 | 55.6\% | 1.42\% | 205 | 0.000 | 31.7\% | 68.8\% |
|  | (0.885) | (2.199) | (-0.234) | (17.669) | (2.202) | (-1.534) |  |  |  |  |  |  |
| WNG_EP | $0.049^{* * *}$ | 0.000 | 0.043 | 0.43*** | -0.003 | -0.254 | 55.1\% | 1.35\% | 205 | 0.000 | 6.3\% | 98.5\% |
|  | (3.877) | (0.314) | (0.299) | (19.939) | (-0.998) | (-1.657) |  |  |  |  |  |  |
| GG_HDZ | 0.012 | 0.428** | 0.100 | 0.442*** | $2.37 * * *$ | -0.428 | 56.1\% | 1.34\% | 205 | 0.000 | $35.1 \%$ | 65.4\% |
|  | (1.101) | (2.687) | (0.606) | (17.415) | (3.144) | (-1.342) |  |  |  |  |  |  |
| MPEG_Anlst | -0.006 | 0.434*** | 0.344 | 0.403*** | -0.128 | 0.330 | 55.5\% | 1.34\% | 205 | 0.000 | 30.2\% | 53.7\% |

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Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_Anlst | (-0.364) | (3.509) | (1.024) | (10.643) | (-0.414) | (1.084) |  |  |  |  |  |  |
|  | -0.036 | $0.691^{* * *}$ | 0.131 | $0.425^{* * *}$ | 0.012 | 0.163 | 55.8\% | 1.29\% | 205 | 0.011 | $32.2 \%$ | 52.2\% |
|  | (-2.420) | (5.733) | (0.782) | (17.259) | (0.031) | (0.535) |  |  |  |  |  |  |
| GLS_HDZ | -0.038 | 0.892 | 0.338 | 0.414*** | $2.655^{* *}$ | -0.952 | 56.1\% | 1.23\% | 205 | 0.870 | 30.7\% | 63.9\% |
|  | (-0.699) | (1.345) | (0.614) | (6.943) | (2.617) | (-0.910) |  |  |  |  |  |  |
| CT_HDZ | 0.02* | 0.272** | -0.009 | 0.452*** | 0.957 | -0.310 | 55.5\% | 1.21\% | 205 | 0.000 | 35.1\% | 70.2\% |
|  | (2.002) | (2.842) | (-0.074) | (17.670) | (1.732) | (-1.836) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.041*** | -3.418 | -0.184 | $0.456 * * *$ | 14.974 | -0.082 | 55.1\% | 1.21\% | 205 | 0.304 | 18.0\% | 79.5\% |
|  | (4.959) | (-0.797) | (-1.270) | (15.289) |  |  |  |  |  |  |  |  |
| GM_RW | 0.052 | -0.004 | -0.226 | 0.444*** | 0.705 | 0.379 | 56.2\% | 1.20\% | 205 | 0.000 | 24.5\% | 92.3\% |
|  | (1.373) | (-0.046) | (-1.550) | (13.557) | (1.854) | (0.776) |  |  |  |  |  |  |
| GLS_Anlst | -0.028 | 0.691*** | 0.151 | 0.429*** | 1.124 | -0.262 | 56.9\% | 1.20\% | 205 | 0.048 | 35.6\% | 53.2\% |
|  | (-1.750) | (4.452) | (0.883) | (18.088) | (1.471) | (-1.690) |  |  |  |  |  |  |
| DKL_Anlst | -0.033 | 0.74*** | 0.091 | 0.442*** | 0.655 | -0.013 | 56.4\% | 1.19\% | 205 | 0.039 | 39.0\% | 43.9\% |
|  | (-2.602) | (5.904) | (0.832) | (20.438) | (1.145) | (-0.133) |  |  |  |  |  |  |
| PE_EP | -0.003 | 4.021 | 0.985 | 0.146 | 9.087 | -2.651 | 56.1\% | 1.16\% | 205 | 0.483 | 36.6\% | 72.2\% |
|  | (-0.103) | (0.935) | (0.752) | (0.414) | (1.086) | (-0.901) |  |  |  |  |  |  |
| TrES_Anlst_10Ind | 0.044*** | 0.016 | -0.058 | 0.42*** | 0.001 | -0.304 | 55.4\% | 1.16\% | 205 | 0.000 | 20.0\% | 95.1\% |
|  | (4.883) | (1.124) | (-0.357) | (14.015) | (0.066) | (-1.698) |  |  |  |  |  |  |

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Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_EP | 0.004 | 0.195 | 0.034 | 0.439*** | 0.097 | -0.162 | 55.5\% | 1.15\% | 205 | 0.000 | $34.1 \%$ | 87.8\% |
|  | (0.343) | (1.637) | (0.258) | (17.692) | (0.109) | (-1.413) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.034*** | -0.034 | -0.029 | $0.421 * * *$ | 0.039 | -0.125 | 54.8\% | 1.13\% | 205 | 0.000 | 16.6\% | 96.6\% |
|  | (3.849) | (-1.522) | (-0.232) | (19.326) | (1.234) | (-1.647) |  |  |  |  |  |  |
| HL_Anlst | -0.024 | 0.634*** | 0.144 | 0.435*** | 0.511 | 0.074 | 55.9\% | 1.09\% | 205 | 0.000 | 33.7\% | 46.8\% |
|  | (-1.995) | (6.324) | (1.405) | $(20.938)$ | (1.274) | (0.524) |  |  |  |  |  |  |
| MPEG_RW | 0.076 | 0.037 | -0.135 | 0.426*** | 0.726 | 0.420 | 56.1\% | 1.09\% | 205 | 0.000 | 24.9\% | 91.2\% |
|  | (1.502) | (0.471) | (-0.951) | (11.424) | (1.880) | (0.661) |  |  |  |  |  |  |
| GM_EP | 0.009 | 0.178* | -0.016 | $0.434 * * *$ | 1.462** | -0.209 | 55.1\% | 1.04\% | 205 | 0.000 | 34.6\% | 83.4\% |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| HL_HDZ | 0.013 | 0.285 | -0.102 | $0.462 * * *$ | 0.780 | -0.268 | 55.5\% | 1.02\% | 205 | 0.000 | 28.8\% | 68.3\% |
|  | (0.667) |  | (-0.740) |  |  | (-2.108) |  |  |  |  |  |  |
| KMY_HDZ | 0.009 | 0.382* | -0.074 | $0.455^{* * *}$ | 1.01* | -0.295 | 55.4\% | 1.01\% | 205 | 0.000 | 32.2\% | 65.9\% |
|  | (0.634) | (2.310) | (-0.615) | (17.395) | (2.204) | (-1.473) |  |  |  |  |  |  |
| PE_RW | 0.053** | 0.163 | -0.078 | 0.438*** | -0.037 | 0.252 | 56.3\% | 0.95\% | 205 | 0.000 | 16.6\% | 88.8\% |
|  | (2.593) | (1.799) | (-0.421) | (15.181) | (-0.078) | (0.687) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.032 | 0.648*** | 0.022 | 0.445*** | $1.869 * * *$ | -0.111 | 56.6\% | 0.95\% | 205 | 0.003 | 36.6\% | 55.6\% |
|  | (-2.272) | (5.529) | (0.183) | (19.689) | (3.254) | (-1.317) |  |  |  |  |  |  |
| FPM_Anlst | -0.009 | 0.423* | -0.069 | $0.449 * * *$ | -0.133 | 0.136 | 55\% | 0.92\% | 205 | 0.001 | 32.7\% | 33.2\% |

[^22]Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RW | (-0.557) | (2.430) | (-0.590) | (18.923) | (-0.181) | (1.289) |  |  |  |  |  |  |
|  | 0.010 | 0.359* | 0.069 | $0.441^{* * *}$ | 1.225 | -0.421 | 55.4\% | 0.87\% | 205 | 0.000 | 32.3\% | 74.1\% |
|  | (0.820) | (2.202) | (0.401) | (16.706) | (0.544) | (-1.268) |  |  |  |  |  |  |
| KMY_EP | 0.008 | 0.037 | -0.116 | 0.506*** | 1.075 | 0.337 | 55.1\% | 0.83\% | 205 | 0.000 | 36.6\% | 73.2\% |
|  | (0.666) | (0.215) | (-0.842) | (6.814) | (0.919) | (0.782) |  |  |  |  |  |  |
| PE_HDZ | 0.023** | $0.328 * * *$ | -0.175 | 0.451*** | 1.915*** | -0.230 | 55.5\% | 0.79\% | 205 | 0.000 | 41.5\% | 62.4\% |
|  | (2.709) | (3.405) | (-1.366) | (18.176) | (3.617) | (-2.242) |  |  |  |  |  |  |
| CT_EP | 0.084 | -0.040 | -2.257 | 0.634*** | 0.016 | 1.154 | 54.8\% | 0.76\% | 205 | 0.000 | 28.8\% | 84.9\% |
|  | (0.910) | (-0.261) | (-1.206) | (3.909) | (0.040) | (0.923) |  |  |  |  |  |  |
| DKL_RW | 0.020 | 0.014 | -0.247 | 0.459*** | -0.337 | -0.075 | 55\% | 0.75\% | 205 | 0.000 | 17.6\% | 81.0\% |
|  | (1.005) | (0.253) | (-1.333) | (15.526) | (-0.869) | (-0.775) |  |  |  |  |  |  |
| 3FF_Factor | 0.022 | 0.458 | 0.698 | 0.34** | -18.506 | 0.617 | 54.6\% | 0.75\% | 205 | 0.483 | 8.8\% | 41.5\% |
|  | (0.739) | (0.594) | (0.836) | (2.646) | (-0.717) | (0.687) |  |  |  |  |  |  |
| PEG_EP | 0.022* | 0.034 | -0.200 | 0.455*** | $0.769 * * *$ | -0.135 | 55\% | 0.74\% | 205 | 0.000 | 32.2\% | 100.0\% |
|  | (2.405) | (0.813) | (-1.306) | (14.189) | (3.978) | (-1.011) |  |  |  |  |  |  |
| PEG_Anlst | 0.017 | 0.241** | 0.080 | 0.413*** | 0.010 | 0.192 | 54.8\% | 0.73\% | 205 | 0.000 | 16.6\% | 68.8\% |
|  | (1.442) | (2.718) | (0.389) | (14.996) | (0.038) | (1.225) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.04*** | 0.584 | -0.075 | 0.446*** | 0.682 | 0.013 | 55.2\% | 0.70\% | 205 | 0.880 | 7.8\% | 83.4\% |
|  | (4.804) | (0.212) | (-0.578) | (15.873) | (0.614) | (0.122) |  |  |  |  |  |  |

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Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_EP | 0.014 | 0.229 | -0.287 | 0.452*** | 2.266* | -0.165 | 55.3\% | 0.66\% | 205 | 0.000 | 29.8\% | $72.2 \%$ |
|  | (1.249) | (1.489) | (-0.908) | (12.889) | (2.267) | (-0.781) |  |  |  |  |  |  |
| KMY_Anlst | -0.009 | $0.222^{* * *}$ | -0.064 | 0.448*** | 0.476 | -0.033 | 55.2\% | 0.66\% | 205 | 0.000 | 27.8\% | 64.9\% |
|  | (-0.690) | (4.254) | (-0.539) | (19.120) | (1.369) | (-0.330) |  |  |  |  |  |  |
| PE_RI | 0.045*** | -0.519 | -0.252 | 0.477*** | 1.426 | 0.135 | 54.7\% | 0.65\% | 205 | 0.000 | 36.6\% | 76.6\% |
|  | (4.715) | (-1.379) | (-1.147) | (11.529) | (1.208) | (0.603) |  |  |  |  |  |  |
| GG_EP | 0.014 | -0.630 | -0.247 | 0.48*** | -0.981 | -0.080 | 55.9\% | 0.64\% | 205 | 0.096 | 29.4\% | 75.3\% |
|  | (1.535) | (-0.646) | (-1.545) | (13.520) | (-0.194) | (-0.607) |  |  |  |  |  |  |
| TrES_RI_25SBM | $0.041^{* * *}$ | 0.001 | 0.004 | 0.428*** | 0.000 | -0.089 | 54.3\% | 0.60\% | 205 | 0.000 | 9.3\% | 98.5\% |
|  | (5.412) | (0.267) | (0.024) | (19.634) | (0.151) | (-0.697) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.033*** | 0.010 | -0.227 | 0.463*** | 0.007 | -0.093 | 54.8\% | 0.58\% | 205 | 0.000 | 13.2\% | 98.5\% |
|  | (4.205) | (1.566) | (-0.902) | (12.243) | (0.984) | $(-0.985)$ |  |  |  |  |  |  |
| CT_RI | 0.039*** | -0.075 | 0.019 | $0.389 * * *$ | 0.637 | -0.210 | 54.8\% | 0.55\% | 205 | 0.000 | 12.7\% | 83.4\% |
|  | (4.006) | (-1.234) | (0.092) | (6.468) | (1.359) | (-0.934) |  |  |  |  |  |  |
| FGHJ_RI | 0.031* | 0.079 | -0.039 | $0.428 * * *$ | 1.422 | -0.180 | 54.5\% | 0.52\% | 205 | 0.000 | 26.8\% | 69.8\% |
|  | (2.101) | (0.401) | (-0.239) | (17.098) | (1.905) | (-1.194) |  |  |  |  |  |  |
| PEG_RW | -4.366 | 5.715 | -2.126 | 3.242 | -32.860 | -54.853 | 55.1\% | 0.49\% | 205 | 0.555 | 25.0\% | 100.0\% |
|  | (-0.712) | (0.717) | (-0.789) | (0.834) | (-0.713) | (-0.720) |  |  |  |  |  |  |
| DKL_EP | 0.013 | 0.101 | -0.164 | 0.488*** | 0.446 | 0.176 | 54.5\% | 0.48\% | 205 | 0.000 | 34.6\% | 74.6\% |

[^23]Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_Anlst | (1.136) | (1.537) | (-1.225) | (8.876) | (0.953) | (0.601) |  |  |  |  |  |  |
|  | -0.007 | 0.146** | 0.005 | 0.445*** | 0.246 | -0.126 | 55.2\% | 0.48\% | 205 | 0.000 | 24.9\% | 75.6\% |
|  | (-0.352) | (2.993) | (0.042) | (18.066) | (0.715) | (-1.264) |  |  |  |  |  |  |
| FGHJ_EP | -0.158 | 2.920 | 4.672 | 0.206 | -17.351 | -1.944 | 54.8\% | 0.47\% | 205 | 0.533 | $31.7 \%$ | 75.6\% |
|  | (-0.802) | (0.950) | (0.876) | (0.777) | (-0.792) | (-0.970) |  |  |  |  |  |  |
| KMY_RW | 0.015 | 0.057 | -0.396 | 0.476*** | -0.214 | 0.177 | 54.4\% | 0.43\% | 205 | 0.000 | 15.1\% | 85.4\% |
|  | (0.554) | (0.768) | (-1.651) | (13.274) | (-0.642) |  |  |  |  |  |  |  |
| TrES_EP_10Ind | $0.037 * * *$ | 0.007 | 0.047 | 0.43*** | 0.011 | -0.263 | 54.3\% | 0.42\% | 205 | 0.000 | 14.1\% | 93.7\% |
|  | (4.261) | (0.263) | (0.287) | (15.545) | (0.373) | (-1.350) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.034** | 0.104 | 0.006 | 0.423*** | 0.176 | -0.450 | 54.1\% | 0.40\% | 205 | 0.000 | 16.6\% | 72.7\% |
|  | (2.714) | (0.479) | (0.025) | (10.110) | (0.680) | (-0.851) |  |  |  |  |  |  |
| GM_HDZ | 0.043 | 0.136 | 0.186 | 0.393*** | 1.720 | -0.466 | 55.4\% | 0.40\% | 205 | 0.000 | 28.3\% | 67.8\% |
|  | (1.641) | (0.696) | (0.812) | (7.334) | (1.386) | (-1.095) |  |  |  |  |  |  |
| HL_RW | 0.017 | 0.049 | -0.397 | 0.476*** | -0.257 | 0.177 | 54.4\% | 0.40\% | 205 | 0.000 | 16.1\% | 84.9\% |
|  | (0.614) | (0.653) | (-1.652) | (13.275) | (-0.772) | (0.749) |  |  |  |  |  |  |
| PEG_RI | 0.03** | -0.041 | -0.187 | $0.455 * * *$ | 0.182 | -0.099 | 54.3\% | 0.32\% | 205 | 0.000 | 26.1\% | 100.0\% |
|  | (3.023) | (-0.636) | (-1.150) | (13.855) | (1.156) | (-0.748) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.033** | 0.052 | -0.312 | 0.434*** | -0.261 | -0.185 | 53.9\% | 0.31\% | 205 | 0.000 | 12.7\% | 80.0\% |
|  | (3.039) | (1.024) | (-1.045) | (15.492) | (-0.672) | (-0.979) |  |  |  |  |  |  |

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Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_HDZ | -0.005 | 0.426* | -0.090 | 0.467*** | -0.259 | 0.083 | 55.2\% | 0.29\% | 205 | 0.001 | 28.8\% | 71.7\% |
|  | (-0.198) | (2.434) | (-0.608) | (10.953) | (-0.353) | (0.468) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.055*** | -0.028 | 0.084 | 0.437*** | -0.073 | -0.184 | 53.8\% | 0.26\% | 205 | 0.000 | 20.0\% | 93.7\% |
|  | (4.963) | (-1.595) | (0.494) | (17.742) | (-1.550) | (-1.077) |  |  |  |  |  |  |
| 5FF_Factor | 0.038*** | 0.262 | 0.016 | 0.445*** | 0.701 | -0.044 | 54.1\% | 0.26\% | 205 | 0.000 | 11.7\% | 43.9\% |
|  | (4.405) | (1.471) | (0.110) | (19.049) | (0.490) | (-0.381) |  |  |  |  |  |  |
| HL_EP | 0.014 | 0.078 | -0.141 | 0.488*** |  |  | 54.2\% | 0.25\% | 205 | 0.000 | 32.2\% | 76.1\% |
|  | (1.285) | (1.226) | (-1.077) | (8.878) |  |  |  |  |  |  |  |  |
| GLS_RI | 0.033** | 0.051 | 0.012 | 0.42*** | 7.152 | -0.179 | 54.3\% | 0.23\% | 205 | 0.000 | 29.8\% | 73.2\% |
|  | (2.805) | (0.285) | (0.067) | (16.629) |  | (-1.008) |  |  |  |  |  |  |
| MPEG_RI | -0.018 | 0.381* | -0.103 | 0.463*** | -3.447 | 0.095 | 54.8\% | 0.22\% | 205 | 0.000 | 30.4\% | 79.9\% |
|  | (-0.722) | (2.224) | (-0.704) | (10.907) | (-0.980) | (0.527) |  |  |  |  |  |  |
| FPM_EP | 0.021 | 0.074*** | 0.026 | 0.427*** | 0.002 | -0.100 | 54.1\% | 0.21\% | 205 | 0.000 | 22.4\% | 96.6\% |
|  | (1.954) | (4.728) | (0.268) | (19.329) | (0.096) | (-0.935) |  |  |  |  |  |  |
| FPM_RW | 0.049*** | 0.048*** | 0.033 | 0.425*** | 0.023 | -0.164 | 55\% | 0.18\% | 205 | 0.000 | 17.6\% | 97.1\% |
|  | (4.836) | (4.039) | (0.370) | (19.484) | (0.628) | (-1.628) |  |  |  |  |  |  |
| PEG_HDZ | 0.005 | 0.334 | -0.224 | $0.5 * * *$ | 0.431 | 0.156 | 55.6\% | 0.17\% | 205 | 0.000 | 20.5\% | 68.8\% |
|  | (0.176) | (1.809) | (-1.078) | (8.509) | (0.822) | (0.952) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | $0.037 * * *$ | -0.038 | -0.158 | 0.442*** | -0.764 | -0.165 | 54\% | 0.06\% | 205 | 0.000 | 13.7\% | 94.6\% |

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Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_RW | (4.363) | (-1.870) | (-1.297) | (19.672) | (-1.712) | (-1.782) |  |  |  |  |  |  |
|  | 0.031*** | 0.062 | -0.047 | 0.443*** | 0.341 | -0.155 | 53.2\% | 0.01\% | 205 | 0.000 | 21.4\% | 82.7\% |
|  | (3.231) | (0.618) | (-0.417) | (18.971) | (0.904) | (-1.848) |  |  |  |  |  |  |
| WNG_Anlst | 0.041*** | 0.004 | -0.315 | 0.449*** | -0.209 | -0.208 | 54.2\% | -0.05\% | 205 | 0.000 | 7.3\% | 98.0\% |
|  | (4.518) | (1.007) | (-1.001) | (15.900) | (-1.309) | (-1.980) |  |  |  |  |  |  |
| GG_RI | 0.031** | -0.426 | -0.960 | $0.455^{* * *}$ | 4.518* |  | 54.8\% | -0.08\% | 205 | 0.198 | 27.3\% | 78.4\% |
|  | (2.793) | (-0.386) | (-0.925) | (14.039) |  | (0.227) |  |  |  |  |  |  |
| GM_RI | 0.035 | 0.091 | 0.164 | 0.388*** | 1.232 | -0.492 | 54.6\% | -0.08\% | 205 | 0.000 | 34.8\% | 74.0\% |
|  | (1.332) | (0.487) | (0.702) | (7.243) | (0.991) | (-1.157) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.044*** | 0.002 | -0.070 | 0.434*** | 0.002 | -0.213 | 54.6\% | -0.10\% | 205 | 0.000 | 3.4\% | 98.5\% |
|  | (5.284) | (0.675) | (-0.459) | (17.791) | (0.611) | (-1.533) |  |  |  |  |  |  |
| CAPM_Factor | 0.094 | -5.648 | -0.193 | 0.476*** | -15.606 | -0.491 | 54\% | -0.11\% | 205 | 0.456 | 22.0\% | 23.9\% |
|  | (0.833) | (-0.634) | (-1.143) | (13.732) | (-0.950) | (-0.875) |  |  |  |  |  |  |
| TrES_Anlst_25SBM | 0.056*** | -0.003 | -0.165 | 0.426*** | 0.002 | -0.131 | 54.4\% | -0.13\% | 205 | 0.000 | 8.8\% | 97.6\% |
|  | (4.791) | (-0.449) | (-0.979) | (17.994) | (0.255) | (-1.142) |  |  |  |  |  |  |
| HL_RI | 0.028** | -0.076 | -0.048 | 0.439*** | 0.371 | -0.043 | 54\% | -0.18\% | 205 | 0.000 | 28.8\% | 81.5\% |
|  | (2.745) | (-0.912) | (-0.348) | (17.797) | (1.618) | (-0.554) |  |  |  |  |  |  |
| DKL_RI | 0.029** | -0.074 | -0.045 | 0.439*** | 0.373 | -0.039 | 54\% | -0.19\% | 205 | 0.000 | 27.3\% | 82.0\% |
|  | (2.871) | (-0.897) | (-0.328) | (17.819) | (1.624) | (-0.511) |  |  |  |  |  |  |

[^24]Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

|  | Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% N+\operatorname{sig}$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$\% \% \beta_{I C C}^{C S}=1$

[^25]Table 72 : Capturing Subsequent Return: Low Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_EP_10Ind | (3.942) | (0.010) | (-0.647) | (19.279) | (1.225) | (-1.159) |  |  |  |  |  |  |
|  | 0.027* | 0.025 | -0.202 | 0.454*** | -0.177 | -0.199 | 52.9\% | -0.66\% | 205 | 0.000 | 11.7\% | 97.1\% |
|  | (2.059) | (1.874) | (-1.316) | (16.991) | (-1.326) | (-1.306) |  |  |  |  |  |  |
| GLS_RW | 0.055 | 0.006 | -0.063 | 0.449*** | 0.509 | -0.152 | 53.1\% | -0.72\% | 205 | 0.000 | 11.7\% | 83.9\% |
|  | (1.577) | (0.126) | (-0.402) | (16.015) | (0.729) | (-2.077) |  |  |  |  |  |  |
| WNG_RI | 0.046*** | -0.039 | -0.079 | $0.45 * * *$ | 0.035 | -0.160 | 54\% | -0.78\% | 205 | 0.000 | 3.4\% | 98.5\% |
|  | (5.226) | (-0.428) | (-0.522) | (15.366) | (0.896) | (-1.114) |  |  |  |  |  |  |
| WNG_HDZ | 0.042*** | -0.001 | -0.096 | 0.464*** | 0.051 | -0.126 | 53.8\% | -0.81\% | 205 | 0.000 | 1.5\% | 98.5\% |
|  | (4.916) | (-0.716) | (-0.616) | (17.511) | (0.158) | (-1.179) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.046*** | 0.010 | -0.007 | 0.424*** | 0.016 | -0.094 | 53.1\% | -0.95\% | 205 | 0.000 | 11.7\% | 91.7\% |
|  | (5.831) | (0.615) | (-0.049) | (18.655) | (0.672) | (-1.037) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.04*** | -0.001 | -0.153 | 0.445*** | 0.017 | -0.552 | 53\% | -0.97\% | 205 | 0.000 | 8.8\% | 98.5\% |
|  | (3.752) | (-0.429) | (-0.811) | (16.200) | (1.900) | (-1.154) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.053*** | -0.012 | -0.016 | 0.434*** | -0.003 | -0.176 | 53\% | -1.00\% | 205 | 0.000 | 9.8\% | 96.1\% |
|  | (6.350) | (-1.068) | (-0.124) | (18.599) | (-0.164) | (-1.764) |  |  |  |  |  |  |

For the lowest quartile of firms in terms of value, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+$ $\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in
subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 73 : Capturing Subsequent Return: High Value Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.021* | $0.165^{* * *}$ | 0.382* | $0.461 * * *$ | 0.060 | -0.106 | 63.2\% |  | 205 | 0.000 | 65.5\% | 90.6\% |
|  | (2.571) | (7.886) | (1.984) | (15.531) | (1.584) | (-1.354) |  | 6.13\% |  |  |  |  |
| Naive | 0.024** | $0.164 * * *$ | 0.280 | $0.462 * * *$ | 0.073 | -0.059 | 63.1\% |  | 205 | 0.000 | 66.5\% | 89.7\% |
|  | (2.965) | (7.225) | (0.998) | (14.256) | (1.726) | (-0.605) |  | 6.01\% |  |  |  |  |
| TPDPS_HDZ | 0.019* | $0.156 * * *$ | 0.306 | 0.46*** | 0.071 | -0.077 | 62.9\% |  | 205 | 0.000 | 67.0\% | 90.1\% |
|  | (2.395) | (7.838) | (1.297) | (15.472) | (1.800) | (-0.791) |  | 5.76\% |  |  |  |  |
| BP_HDZ | 0.004 | $1.095 * * *$ | 0.375** | $0.446 * * *$ | 0.333 | -0.109 | 61.6\% |  | 205 | 0.386 | 71.4\% | 47.3\% |
|  | (0.447) | (9.991) | (2.758) | (17.131) | (1.658) | (-1.371) |  | 5.17\% |  |  |  |  |
| BP_Anlst | 0.007 | $1.122^{* * *}$ | 0.383*** | $0.457 * * *$ | 0.435* | -0.115 | 61.1\% |  | 205 | 0.221 | 68.5\% | 52.2\% |
|  | (0.784) | (11.302) | (3.282) | (18.643) | (2.246) | (-1.581) |  | 4.86\% |  |  |  |  |
| TPDPS_RI | 0.023** | 0.127*** | 0.402*** | 0.44*** | 0.050 | -0.148 | 61.5\% |  | 205 | 0.000 | 55.2\% | 89.7\% |
|  | (2.806) | (5.912) | (3.165) | (15.274) | (1.464) | (-2.285) |  | 4.41\% |  |  |  |  |
| TPDPS_EP | 0.025** | 0.107*** | 0.232 | 0.442*** | 0.061 | -0.074 | 61\% |  | 205 | 0.000 | 59.6\% | 90.1\% |
|  | (3.057) | (5.105) | (0.943) | (14.054) | (1.553) | (-0.814) |  | 4.15\% |  |  |  |  |
| BP_EP | 0.012 | $0.769 * * *$ | 0.255 | 0.435*** | 0.274 | -0.150 | 60\% |  | 205 | 0.043 | 63.1\% | 58.6\% |
|  | (1.354) | (6.765) | (1.919) | (16.090) | (1.390) | (-2.040) |  | 3.81\% |  |  |  |  |
| TPDPS_RW | 0.035*** | $0.088 * * *$ | 0.272** | $0.463 * * *$ | 0.081* | -0.155 | 60.3\% |  | 205 | 0.000 | 48.8\% | 93.6\% |
|  | (4.411) | (5.210) | (2.677) | (20.825) | (2.411) | (-1.215) |  | 3.70\% |  |  |  |  |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | 0.014 | 0.806*** | 0.349*** | 0.432*** | 0.283 | -0.135 | 59.9\% |  | 205 | 0.101 | 58.1\% | 54.7\% |
|  | (1.628) | (6.859) | (3.134) | (16.430) | (1.435) | (-1.696) |  | 3.63\% |  |  |  |  |
| BP_RW | 0.024** | 0.792*** | 0.291* | 0.436*** | 0.283 | -0.148 | 59.6\% |  | 205 | 0.074 | 55.7\% | 54.7\% |
|  | (2.740) | (6.831) | (2.521) | $(16.005)$ | (1.471) | (-2.001) |  | 3.45\% |  |  |  |  |
| PE_Anlst | -0.009 | 0.913*** | 0.406* | 0.442*** | 1.140 | -0.132 | 58.6\% |  | 205 | 0.495 | 53.2\% | 38.9\% |
|  | (-0.783) | (7.171) | (2.235) | (17.811) | (1.535) | (-1.395) |  | 2.45\% |  |  |  |  |
| DKL_HDZ | 0.010 | 0.409** | 0.117 | 0.452*** | 1.184* | -0.278 | 57.5\% |  | 205 | 0.000 | 32.5\% | 70.9\% |
|  | (0.644) | (2.584) | (0.945) | (17.618) | (2.444) | (-1.669) |  | 1.73\% |  |  |  |  |
| MPEG_Anlst | -0.006 | $0.454 * * *$ | 0.449 | $0.407^{* * *}$ | 0.067 | 0.351 | 57\% |  | 205 | 0.000 | 31.0\% | 57.1\% |
|  |  |  |  |  |  |  |  | 1.69\% |  |  |  |  |
| CT_RW | -0.003 | 0.623 | -0.192 | 0.475*** | 4.835 | -0.332 | 57.6\% |  | 205 | 0.423 | 29.8\% | 73.7\% |
|  | (-0.163) | (1.324) | (-0.896) | (16.140) | (1.225) | (-1.592) |  | 1.65\% |  |  |  |  |
| CT_Anlst | -0.009 | $0.543 * * *$ | 0.27* | $0.445 * * *$ | 1.504* | -0.073 | 57.6\% |  | 205 | 0.000 | 39.9\% | 58.1\% |
|  | (-0.853) | (4.698) | (2.474) | (20.332) | (2.101) | (-1.432) |  | 1.55\% |  |  |  |  |
| WNG_EP | 0.055*** | 0.000 | 0.209 | $0.439 * * *$ | -0.003 | -0.213 | 56.2\% |  | 205 | 0.000 | 5.9\% | 99.5\% |
|  | (3.670) | (-0.120) | (1.502) | (19.282) | (-1.009) | (-1.390) |  | 1.49\% |  |  |  |  |
| FGHJ_HDZ | -0.002 | 0.443*** | -0.168 | 0.463*** | 2.936*** | -0.085 | 57.3\% |  | 205 | 0.000 | 26.6\% | 69.5\% |
|  | (-0.111) | (3.970) | (-0.747) | (14.585) | (3.360) | (-1.160) |  | 1.49\% |  |  |  |  |
| TrES_Anlst_10Ind | $0.042 * * *$ | 0.012 | 0.170 | 0.446*** | 0.013 | -0.116 | 56.7\% |  | 205 | 0.000 | 20.7\% | 97.0\% |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_HDZ | (4.479) | (1.017) | (1.522) | (16.264) | (0.643) | (-0.909) |  | 1.48\% |  |  |  |  |
|  | 0.025* | 0.262* | 0.164 | 0.453*** | 1.938*** | -0.306 | 57.6\% |  | 205 | 0.000 | 34.0\% | 72.9\% |
|  | (2.394) | (2.570) | (1.295) | (17.820) | (3.385) | (-1.800) |  | 1.44\% |  |  |  |  |
| KMY_HDZ | 0.014 | 0.348** | 0.069 | $0.457 * * *$ | 1.474** | -0.289 | 57.6\% |  | 205 | 0.000 | 32.5\% | 68.5\% |
|  | (1.261) | (2.675) | (0.516) | (17.254) | (2.991) | (-1.568) |  | 1.41\% |  |  |  |  |
| GM_EP | 0.009 | $0.231^{* * *}$ | 0.102 | 0.436*** | 0.760 | -0.189 | 56\% |  | 205 | 0.000 | 34.5\% | 83.7\% |
|  | (0.918) | (3.578) | (0.862) | (18.400) | (1.496) | (-1.459) |  | 1.38\% |  |  |  |  |
| DKL_Anlst | -0.027 | $0.691^{* * *}$ | 0.212* | $0.443 * * *$ | 0.664 | -0.014 | 57.5\% |  | 205 | 0.019 | 37.9\% | 45.3\% |
|  | (-2.181) | (5.302) | (2.178) | (20.753) | (1.128) | (-0.155) |  | 1.30\% |  |  |  |  |
| FGHJ_Anlst | -0.033 | 0.659*** | 0.106 | 0.444*** | 1.882*** | -0.068 | 57.6\% |  | 205 | 0.003 | 34.5\% | 56.7\% |
|  | (-2.331) | (5.710) | (0.987) | (19.787) | (3.422) | (-0.950) |  | 1.29\% |  |  |  |  |
| PE_HDZ | 0.020 | 0.425** | 0.010 | 0.452*** | 1.895*** | -0.224 | 57.2\% |  | 205 | 0.000 | 39.4\% | 62.1\% |
|  | (1.901) | (2.898) | (0.078) | (18.531) | (3.282) | (-2.613) |  | 1.28\% |  |  |  |  |
| GLS_Anlst | -0.032 | 0.71*** | 0.122 | 0.436*** | 1.080 | -0.124 | 57.6\% |  | 205 | 0.027 | 32.5\% | 53.7\% |
|  | (-2.276) | (5.440) | (1.133) | (19.488) | (1.519) | (-1.969) |  | 1.28\% |  |  |  |  |
| TrES_RI_10Ind | 0.039*** | -0.035 | 0.124 | 0.416*** | 0.015 | -0.145 | 56\% |  | 205 | 0.000 | 16.7\% | 98.5\% |
|  | (4.400) | (-1.663) | (1.245) | (19.822) | (0.770) | (-1.927) |  | 1.26\% |  |  |  |  |
| GG_HDZ | 0.014 | 0.464** | 0.280 | 0.442*** | 3.024*** | -0.435 | 57.6\% |  | 205 | 0.000 | 32.0\% | 65.0\% |
|  | (1.328) | (3.084) | (1.643) | (17.421) | (3.848) | (-1.429) |  | 1.24\% |  |  |  |  |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_HDZ | 0.012 | 0.339* | 0.102 | $0.456 * * *$ | 1.25* | -0.224 | 57.4\% |  | 205 | 0.000 | 27.6\% | 71.4\% |
|  | (0.863) | (2.563) | (0.873) | (18.239) | (2.276) | (-2.001) |  | 1.22\% |  |  |  |  |
| MPEG_EP | 0.007 | 0.187 | 0.166 | $0.437 * * *$ | 0.028 | -0.154 | 56.2\% |  | 205 | 0.000 | 34.0\% | 89.2\% |
|  | (0.530) | (1.499) | (1.266) | (17.995) | (0.034) | (-1.478) |  | 1.12\% |  |  |  |  |
| KMY_EP | 0.003 | 0.192*** | 0.087 | $0.425^{* * *}$ | 0.036 | -0.170 | 55.9\% |  | 205 | 0.000 | 35.0\% | 73.4\% |
|  | (0.297) | (3.409) | (0.687) | (11.595) | (0.095) | (-0.660) |  | 1.11\% |  |  |  |  |
| GM_Anlst | -0.031 | 0.674*** |  | $0.426 * * *$ |  |  | 56.7\% |  | 205 | 0.006 | 33.0\% | 52.7\% |
|  | (-2.181) | (5.721) | (1.952) | (17.587) |  |  |  | 1.10\% |  |  |  |  |
| PE_RI | $0.045 * * *$ | $-0.269$ | $0.106$ | $0.458^{* * *}$ | 2.349* | $-0.105$ | 56.2\% |  | 205 | 0.000 | 36.5\% | 75.9\% |
|  | (4.839) | (-1.528) | (0.521) | (19.472) | (2.509) | (-1.407) |  | 1.02\% |  |  |  |  |
| CT_EP | 0.013 | 0.069 | -1.546 | 0.51*** | 0.409 | 0.085 | 55.8\% |  | 205 | 0.000 | 27.6\% | 86.2\% |
|  | (0.530) | (1.867) | (-0.873) | (5.970) | (1.024) | (0.403) |  | 1.01\% |  |  |  |  |
| PE_RW | $0.045 * * *$ | 0.009 | 0.079 | $0.447 * * *$ | 0.176 | -0.080 | 56.9\% |  | 205 | 0.000 | 14.3\% | 90.1\% |
|  | (4.512) | (0.091) | (0.460) | (18.092) | (0.474) | (-1.021) |  | 0.98\% |  |  |  |  |
| MPEG_RW | 0.038*** | 0.093*** | 0.112 | 0.445*** | 0.561*** | -0.133 | 56.9\% |  | 205 | 0.000 | 26.1\% | 93.6\% |
|  | (3.230) | (3.189) | (0.824) | (17.304) | (3.780) | (-1.118) |  | 0.95\% |  |  |  |  |
| HL_Anlst | -0.022 | 0.623*** | 0.264** | $0.436 * * *$ | 0.653 | 0.103 | 57\% |  | 205 | 0.000 | 35.0\% | 48.8\% |
|  | (-1.824) | (6.242) | (3.056) | (21.393) | (1.745) | (0.770) |  | 0.92\% |  |  |  |  |
| GLS_HDZ | 0.007 | $0.375 * * *$ | 0.009 | 0.46*** | 2.431 *** | -0.098 | 57.2\% |  | 205 | 0.000 | 26.6\% | 65.0\% |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_RW_10Ind | (0.552) | (3.816) | (0.059) | (14.730) | (4.276) | (-1.640) |  | 0.89\% |  |  |  |  |
|  | 0.033*** | -0.058 | 0.023 | 0.443*** | -1.124 | -0.157 | 55.4\% |  | 205 | 0.000 | 13.8\% | 96.1\% |
|  | (3.181) | (-1.983) | (0.219) | (19.847) | (-1.567) | (-1.926) |  | 0.86\% |  |  |  |  |
| FPM_RW | $0.052 * * *$ | $0.051 * * *$ | 0.177 | $0.428 * * *$ | 0.037 | -0.064 | 56.4\% |  | 205 | 0.000 | 18.7\% | 96.6\% |
|  | (4.888) | (4.322) | (1.802) | (19.707) | (0.926) | (-0.686) |  | 0.85\% |  |  |  |  |
| PEG_EP | 0.025** | 0.032 | -0.031 | 0.457*** | $0.906 * * *$ | -0.117 | 55.2\% |  | 205 | 0.000 | 34.6\% | 100.0\% |
|  | (2.635) | (0.808) | (-0.201) | (14.559) | (4.483) | (-0.900) |  | 0.84\% |  |  |  |  |
| DKL_EP | 0.013 | 0.117*** | 0.013 | $0.452 * * *$ | 0.265 | -0.050 | 55.5\% |  | 205 | 0.000 | 35.0\% | 77.3\% |
|  | (1.350) | (3.954) | (0.105) | (17.423) | (0.866) | (-0.415) |  | 0.84\% |  |  |  |  |
| FPM_Anlst | -0.009 | 0.464** | 0.137 | 0.443*** | -0.020 | 0.054 | 56.1\% |  | 205 | 0.002 | 31.5\% | 35.5\% |
|  | (-0.576) | (2.765) | (1.410) | (19.886) | (-0.032) | (0.610) |  | 0.84\% |  |  |  |  |
| GG_EP | 0.018 | -2.257 | -0.156 | 0.476*** | 3.688* | -0.120 | 56.5\% |  | 205 | 0.216 | 29.7\% | 72.4\% |
|  | (1.953) | (-0.860) | (-0.942) | (14.113) | (2.172) | (-0.957) |  | 0.83\% |  |  |  |  |
| PEG_Anlst | 0.018 | 0.264** | 0.238 | 0.417*** | 0.252 | 0.194 | 56.1\% |  | 205 | 0.000 | 15.8\% | 68.0\% |
|  | (1.526) | (2.932) | (1.196) | (15.060) | (0.928) | (1.248) |  | 0.78\% |  |  |  |  |
| KMY_Anlst | -0.010 | 0.224*** | 0.124 | 0.447*** | 0.370 | -0.023 | 56.5\% |  | 205 | 0.000 | 28.6\% | 64.0\% |
|  | (-0.786) | (3.978) | (1.086) | (19.283) | (0.818) | (-0.250) |  | 0.76\% |  |  |  |  |
| GM_RW | 0.026* | 0.055* | 0.031 | $0.452 * * *$ | $0.525 * * *$ | -0.021 | 56.7\% |  | 205 | 0.000 | 26.8\% | 93.8\% |
|  | (1.995) | (2.107) | (0.225) | (16.756) | (3.268) | (-0.115) |  | 0.75\% |  |  |  |  |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RW | 0.011 | 0.407** | 0.248 | 0.441*** | 12.774 | -0.427 | 56.9\% |  | 205 | 0.000 | $32.3 \%$ | 72.6\% |
|  | (0.964) | (2.655) | (1.378) | (16.641) | (1.424) | (-1.342) |  | 0.74\% |  |  |  |  |
| HL_RW | 0.040 | -0.014 | -0.031 | $0.462 * * *$ | -0.156 | 0.065 | 55.5\% |  | 205 | 0.000 | 16.3\% | 87.7\% |
|  | (1.939) | (-0.352) | (-0.196) | (16.557) | (-0.470) | (0.344) |  | 0.72\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.036*** | 0.012 | -0.067 | 0.468*** | 0.007 | -0.087 | 56.2\% |  | 205 | 0.000 | 12.3\% | 99.5\% |
|  | (4.436) | (1.578) | (-0.271) | $(12.201)$ | (0.748) | (-1.065) |  | 0.67\% |  |  |  |  |
| KMY_RW | 0.038 | -0.006 | -0.032 | $0.462 * * *$ | -0.118 | 0.065 | 55.4\% |  | 205 | 0.000 | 14.8\% | 88.2\% |
|  | (1.855) | (-0.144) | (-0.201) | (16.558) | (-0.352) | (0.345) |  | 0.65\% |  |  |  |  |
| TrES_Anlst_25SBM | 0.053*** | 0.001 | -0.032 | 0.433*** | 0.001 | -0.081 | 55.7\% |  | 205 | 0.000 | 8.9\% | 98.0\% |
|  |  |  | (-0.209) |  |  |  |  | 0.60\% |  |  |  |  |
| TrES_EP_10Ind | $0.04 * * *$ | 0.057 | 0.101 | $0.441^{* * *}$ | 0.034 | -0.160 | 55.3\% |  | 205 | 0.000 | 13.3\% | 95.6\% |
|  | (4.563) | (1.471) | (0.743) | (17.403) | (0.998) | (-0.888) |  | 0.59\% |  |  |  |  |
| HL_EP | 0.014 | 0.097*** | 0.026 | 0.452*** | 0.245 | -0.050 | 55.2\% |  | 205 | 0.000 | 31.5\% | 79.8\% |
|  | (1.508) | (3.691) | (0.219) | (17.446) | (0.811) | (-0.356) |  | 0.58\% |  |  |  |  |
| GG_Anlst | 0.001 | 0.129*** | 0.217* | $0.437 * * *$ | 0.301 | -0.143 | 56.2\% |  | 205 | 0.000 | 26.6\% | 74.9\% |
|  | (0.089) | (3.099) | (2.071) | (20.290) | (0.890) | (-1.620) |  | 0.58\% |  |  |  |  |
| GM_HDZ | 0.022 | 0.316** | 0.125 | 0.444*** | 0.814 | -0.115 | 56.4\% |  | 205 | 0.000 | 23.6\% | 69.5\% |
|  | (1.669) | (2.741) | (1.131) | (17.728) | (1.370) | (-1.692) |  | 0.57\% |  |  |  |  |
| TrES_RI_25SBM | 0.04*** | -0.009 | 0.029 | $0.433 * * *$ | 0.006 | -0.038 | 54.8\% |  | 205 | 0.000 | 6.9\% | 99.5\% |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_EP | (4.660) | (-1.297) | (0.288) | (18.440) | (1.468) | (-0.472) |  | 0.56\% |  |  |  |  |
|  | 0.027* | 0.027 | -0.277 | 0.47*** | 2.246* | 0.036 | 56.6\% |  | 205 | 0.000 | 28.6\% | 73.4\% |
|  | (2.257) | (0.201) | (-0.944) | (14.373) | (2.268) | (0.295) |  | 0.54\% |  |  |  |  |
| FGHJ_RI | 0.047*** | -0.128 | -0.012 | 0.444*** | 1.457 | -0.120 | 55.8\% |  | 205 | 0.000 | 24.1\% | 71.4\% |
|  | (3.828) | (-0.963) | (-0.086) | (19.996) | (1.937) | (-1.592) |  | 0.53\% |  |  |  |  |
| DKL_RW | 0.019 | 0.034 | -0.054 | 0.462*** | 0.012 | -0.036 | 55.6\% |  | 205 | 0.000 | 17.7\% | 80.8\% |
|  | (0.957) | (0.717) | (-0.301) | (15.858) | (0.034) | (-0.391) |  | 0.49\% |  |  |  |  |
| PE_EP | $0.032 * * *$ | -0.159 | -0.104 | 0.473*** | $2.109 * *$ | 0.134 | 56.8\% |  | 205 | 0.011 | 35.0\% | 70.9\% |
|  | (3.177) | (-0.354) | (-0.673) | (12.619) | (2.661) | (0.560) |  | 0.49\% |  |  |  |  |
| FPM_HDZ | 0.019 | $0.268 * * *$ | 0.084 | 0.44*** | 1.034*** | 0.075 | 56.1\% |  | 205 | 0.000 | 24.6\% | 69.0\% |
|  | (1.934) | (3.380) | (0.798) | (19.090) | (3.380) | (0.535) |  | 0.47\% |  |  |  |  |
| TrES_RW_10Ind | 0.041*** | -1.792 | 0.065 | 0.447*** | 15.126 | -0.164 | 55.8\% |  | 205 | 0.274 | 21.7\% | 77.3\% |
|  | (4.881) | (-0.703) | (0.412) | (14.621) | (1.022) | (-0.718) |  | 0.45\% |  |  |  |  |
| TrES_RW_25SBM | 0.041*** | -0.089 | 0.001 | 0.446*** | 0.738 | 0.034 | 55.9\% |  | 205 | 0.718 | 9.4\% | 82.3\% |
|  | (4.937) | (-0.030) | (0.010) | (15.737) | (0.661) | (0.332) |  | 0.44\% |  |  |  |  |
| 3FF_Factor | 0.021 | 0.470 | 0.830 | 0.349** | -18.195 | 0.641 | 55.6\% |  | 205 | 0.492 | 8.9\% | 40.4\% |
|  | (0.708) | (0.610) | (0.992) | (2.703) | (-0.702) | (0.717) |  | 0.44\% |  |  |  |  |
| MPEG_HDZ | 0.013 | 0.338** | 0.130 | 0.445*** | 0.175 | -0.071 | 56.2\% |  | 205 | 0.000 | 27.1\% | 71.9\% |
|  | (0.888) | (2.768) | (1.398) | (17.981) | (0.241) | (-1.152) |  | 0.43\% |  |  |  |  |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RW | 0.044** | -0.017 | 0.034 | 0.444*** | 0.349 | -0.200 | 55.9\% |  | 205 | 0.000 | 23.7\% | 100.0\% |
|  | (3.043) | (-0.477) | (0.192) | (13.922) | (1.880) | (-1.792) |  | 0.42\% |  |  |  |  |
| PEG_HDZ | 0.023 | 0.231* | -0.041 | 0.47*** |  | 0.026 | 56.5\% |  | 205 | 0.000 | 19.2\% | 67.0\% |
|  | (1.483) | (2.152) | (-0.272) | (12.673) | (1.510) | (0.240) |  | 0.35\% |  |  |  |  |
| GG_RI | 0.033** | -0.700 | -0.907 | 0.468*** | 2.949* | 0.101 | 55.3\% |  | 205 | 0.111 | 28.6\% | 80.2\% |
|  | (2.950) | (-0.659) | (-0.872) | $(15.803)$ | (2.139) | (0.275) |  | 0.35\% |  |  |  |  |
| DKL_RI | 0.027** | 0.005 | 0.098 | 0.446*** |  | -0.049 | 55\% |  | 205 | 0.000 | 30.0\% | 82.3\% |
|  | (2.697) | (0.075) | (0.677) | (18.400) | (1.180) | (-0.723) |  | 0.33\% |  |  |  |  |
| HL_RI | 0.026** | 0.003 | 0.097 | 0.446*** | 0.287 | -0.051 | 55\% |  | 205 | 0.000 | 29.6\% | 82.3\% |
|  |  | (0.037) | (0.672) | (18.378) |  | (-0.769) |  | 0.32\% |  |  |  |  |
| GLS_RI | 0.042*** | -0.079 | 0.005 | $0.443 * * *$ | 3.008 | -0.110 | 55.6\% |  | 205 | 0.000 | 27.1\% | 74.4\% |
|  | (3.944) | (-0.727) | (0.037) | (20.410) | (0.411) | (-1.658) |  | 0.31\% |  |  |  |  |
| PEG_RI | 0.034*** | 0.050 | -0.034 | 0.458*** | 0.313 | -0.111 | 54.7\% |  | 205 | 0.000 | 27.4\% | 100.0\% |
|  | (3.336) | (0.607) | (-0.225) | (14.035) | (1.674) | (-0.840) |  | 0.27\% |  |  |  |  |
| FGHJ_EP | -0.142 | 2.714 | 4.697 | 0.220 | -17.257 | -1.785 | 56\% |  | 205 | 0.580 | 30.0\% | 77.8\% |
|  | (-0.716) | (0.879) | (0.877) | (0.828) | (-0.784) | (-0.889) |  | 0.26\% |  |  |  |  |
| GM_RI | 0.013 | 0.267* | 0.068 | 0.441*** | 0.385 | -0.139 | 55.6\% |  | 205 | 0.000 | 34.2\% | 74.3\% |
|  | (0.949) | (2.545) | (0.621) | (17.854) | (0.697) | (-1.970) |  | 0.26\% |  |  |  |  |
| KMY_RI | 0.025* | 0.015 | 0.053 | 0.449*** | 0.327 | -0.041 | 54.8\% |  | 205 | 0.000 | 28.1\% | 76.4\% |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_RI | (2.494) | (0.125) | (0.330) | (18.318) | (1.100) | (-0.555) |  | 0.21\% |  |  |  |  |
|  | 0.046*** | -0.026 | 0.171 | 0.454*** | 0.093 | -0.212 | 55.7\% |  | 205 | 0.000 | 21.7\% | 89.2\% |
|  | (3.986) | (-0.581) | (1.794) | (18.754) | (1.432) | (-2.166) |  | 0.20\% |  |  |  |  |
| WNG_Anlst | 0.045*** | 0.006 | -0.214 | 0.454*** | -0.043 | -0.178 | 54.5\% |  | 205 | 0.000 | 6.4\% | 99.0\% |
|  | (4.883) | (1.328) | (-0.690) | (15.809) | (-0.187) | (-1.892) |  | 0.15\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.046*** | 0.004 | -0.065 | 0.438*** | 0.001 | -0.176 | 55.7\% |  | 205 | 0.000 | 3.4\% | 99.5\% |
|  | (5.579) | (1.054) | (-0.436) | (17.815) | (0.164) | (-1.390) |  | 0.12\% |  |  |  |  |
| CT_RI | 0.034*** | 0.029 | 0.127 | 0.435*** | -0.014 | -0.101 | 54.8\% |  | 205 | 0.000 | 11.8\% | 82.3\% |
|  | (3.691) | (0.765) | (0.752) | (17.596) | (-0.052) | (-0.923) |  | 0.12\% |  |  |  |  |
| FPM_EP | 0.025* | 0.079*** | 0.153 | 0.43*** | 0.009 | -0.134 | 55\% |  | 205 | 0.000 | 23.6\% | 97.0\% |
|  | (2.207) | (4.742) | (1.668) | (20.120) | (0.433) | (-1.689) |  | 0.11\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.063*** | -0.051 | 0.179 | 0.446*** | -0.089 | 0.016 | 55.2\% |  | 205 | 0.000 | 21.2\% | 95.1\% |
|  | (4.394) | (-1.434) | (1.170) | (17.898) | (-1.518) | (0.132) |  | 0.10\% |  |  |  |  |
| TrOHE_10Ind | 0.034*** | 0.296** | 0.074 | 0.449*** | 0.491 | 0.048 | 54.7\% |  | 205 | 0.000 | 19.2\% | 70.0\% |
|  | (3.689) | (3.078) | (0.623) | (16.852) | (1.002) | (0.434) |  | 0.08\% |  |  |  |  |
| MPEG_RI | 0.001 | 0.285* | 0.096 | 0.446*** | -4.211 | -0.052 | 55.6\% |  | 205 | 0.000 | 31.7\% | 80.7\% |
|  | (0.067) | (2.443) | (1.055) | (18.133) | (-0.859) | (-0.803) |  | 0.06\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.057*** | -0.075 | 0.081 | 0.435*** | 0.079 | -0.101 | 54.7\% |  | 205 | 0.000 | 7.4\% | 89.7\% |
|  | (6.155) | (-1.685) | (0.757) | (18.258) | (1.889) | (-0.998) |  | 0.05\% |  |  |  |  |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_RW | 0.034*** | 0.030 | 0.102 | $0.443 * * *$ | 0.559 | -0.127 | 54.3\% |  | 205 | 0.000 | $22.2 \%$ | 81.4\% |
|  | (3.331) | (0.288) | (0.849) | (18.997) | (1.481) | (-1.528) |  | 0.05\% |  |  |  |  |
| 5FF_Factor | $0.039 * * *$ | 0.251 | 0.186 | $0.442 * * *$ | 0.373 | -0.090 | 55.3\% |  | 205 | 0.000 | 11.3\% | 44.8\% |
|  | (4.531) | (1.478) | (1.675) | (20.072) | (0.270) | (-0.989) |  | -0.04\% |  |  |  |  |
| TrES_EP_25SBM | 0.033** | 0.028 | 0.079 | $0.451 * * *$ | -0.025 | 0.029 | 55.9\% |  | 205 | 0.000 | 5.9\% | 98.5\% |
|  | (2.756) | (1.027) | (0.765) | (15.366) | (-0.982) | (0.403) |  | -0.06\% |  |  |  |  |
| TrETSS_Anlst _10Ind | $0.035 * * *$ | 0.055 | -0.098 | 0.438*** | -0.318 | -0.197 | 54.3\% |  | 205 | 0.000 | 11.3\% | 81.8\% |
|  | (3.369) | (1.230) | (-0.334) | (16.007) | (-0.818) | (-1.056) |  | -0.17\% |  |  |  |  |
| CAPM_Factor | 0.102 | -4.565 | 0.153 | 0.448*** | -10.730 | 0.141 | 55.3\% |  | 205 | 0.529 | 19.7\% | 24.1\% |
|  | (0.909) | (-0.518) | (0.905) | (13.740) | (-0.994) | (0.792) |  | -0.21\% |  |  |  |  |
| WNG_RW | 0.05*** | 0.000 | 0.029 | 0.436*** | -0.006 | -0.294 | 54.5\% |  | 205 | 0.000 | 3.9\% | 99.5\% |
|  | (5.854) | (-1.528) | (0.298) | (19.372) | (-1.030) | (-2.203) |  | -0.21\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.04*** | -0.034 | 0.074 | 0.442*** | 0.082 | -0.022 | 54.8\% |  | 205 | 0.000 | 14.3\% | 97.0\% |
|  | (5.021) | (-2.803) | (0.633) | (19.553) | (1.405) | (-0.241) |  | -0.30\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.04*** | 0.000 | -0.027 | 0.451*** | 0.014 | -0.514 | 54.2\% |  | 205 | 0.000 | 7.9\% | 99.5\% |
|  | (3.626) | (-0.079) | (-0.140) | (15.946) | (1.438) | (-1.070) |  | -0.31\% |  |  |  |  |
| TrOHE_25SBM | 0.045*** | 0.093 | 0.090 | $0.436 * * *$ | -0.078 | 0.015 | 54.1\% |  | 205 | 0.000 | 12.3\% | 87.7\% |
|  | (5.691) | (1.893) | (0.822) | (18.901) | (-1.837) | (0.214) |  | -0.37\% |  |  |  |  |
| WNG_RI | 0.049*** | 0.000 | 0.070 | 0.454*** | 0.150 | -0.158 | 55.1\% |  | 205 | 0.000 | 4.0\% | 99.0\% |

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Table 73 : Capturing Subsequent Return: High Value Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_10Ind | (5.545) | (0.062) | (0.451) | (15.476) | (1.757) | (-1.140) |  | -0.56\% |  |  |  |  |
|  | 0.048*** | -0.062 | 0.386 | 0.421*** | -0.034 | -0.063 | 54.4\% |  | 205 | 0.000 | 10.8\% | 86.7\% |
|  | (5.314) | (-1.280) | (1.662) | (19.367) | (-0.326) | (-0.495) |  | -0.56\% |  |  |  |  |
| GLS_RW | 0.052 | 0.002 | 0.074 | $0.453 * * *$ | 0.289 | -0.091 | 53.9\% |  | 205 | 0.000 | 13.8\% | 85.2\% |
|  | (1.651) | (0.037) | (0.515) | (16.304) | (0.584) | (-1.296) |  | -0.56\% |  |  |  |  |
| Carhart_Factor | 0.043*** | -0.010 | 0.067 | $0.453 * * *$ | 2.275 | -0.133 | 54.2\% |  | 205 | 0.000 | 7.4\% | 60.1\% |
|  | (4.787) | (-0.134) | (0.468) | (15.493) | (1.716) | (-0.880) |  | -0.63\% |  |  |  |  |
| WNG_HDZ | 0.043*** | -0.001 | 0.039 | $0.472 * * *$ | 0.331 | -0.098 | 54.5\% |  | 205 | 0.000 | 1.0\% | 99.5\% |
|  | (4.140) | (-0.742) | (0.251) | (15.725) | (1.485) | (-1.139) |  | -0.64\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.049*** | $0.008$ | $0.105$ | 0.421*** | $0.004$ | -0.080 | 54.1\% |  | 205 | 0.000 | 11.3\% | 93.6\% |
|  | (6.087) | (0.458) | (1.075) | (19.135) | (0.120) | (-0.863) |  | -0.65\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.047*** | 0.003 | 0.083 | 0.435*** | -0.014 | -0.179 | 53.7\% |  | 205 | 0.000 | 7.9\% | 96.1\% |
|  | (6.066) | (0.298) | (0.731) | (20.148) | (-0.989) | (-2.023) |  | -0.67\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.028 | 0.034 | 0.013 | $0.462 * * *$ | -0.035 | -0.191 | 54\% |  | 205 | 0.000 | 13.3\% | 97.5\% |
|  | (1.916) | (1.840) | (0.103) | (15.302) | (-0.867) | (-1.254) |  | -0.70\% |  |  |  |  |

For the highest quartile of firms in terms of value, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+$ $\beta_{2}$ CFNS $_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t -statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in
subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 74 : Capturing Subsequent Return: Low Price Momentum Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | $0.033^{* *}$ | $0.154 * * *$ | $0.299^{*}$ | $0.413 * * *$ | $0.061 *$ | $-0.047$ | 64.5\% | 8.76\% | 205 | 0.000 | 54.7\% | 93.4\% |
|  | (3.037) | (6.254) | (1.971) | (12.350) | (2.225) | (-0.457) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.031** | $0.149^{* * *}$ | 0.306* | $0.408 * * *$ | 0.058* | -0.029 | 64.3\% | 8.67\% | 205 | 0.000 | 56.9\% | 93.4\% |
|  | (2.929) | (6.235) | (2.025) | (12.279) | (2.191) | (-0.282) |  |  |  |  |  |  |
| Naive | 0.038*** | $0.147^{* * *}$ | 0.307 | $0.413 * * *$ | 0.062* | -0.048 | 64.2\% | 8.51\% | 205 | 0.000 | 53.6\% | 93.4\% |
|  | (3.504) | (5.976) |  | (12.197) |  |  |  |  |  |  |  |  |
| TPDPS_RI | $0.037 * * *$ | 0.091*** | 0.263 | 0.392*** | 0.071** | -0.058 | 62.6\% | 7.10\% | 205 | 0.000 | 49.7\% | 95.6\% |
|  | (3.435) | (4.603) | (1.691) | (12.011) | (2.902) | (-0.575) |  |  |  |  |  |  |
| BP_Anlst | 0.001 | 1.07*** | 0.35* | 0.415*** | 0.243 | 0.071 | 61.5\% | 6.83\% | 205 | 0.525 | 55.8\% | 38.7\% |
|  | (0.140) | (9.665) | (2.028) | (11.871) | (1.614) | (0.740) |  |  |  |  |  |  |
| BP_HDZ | 0.021 | 0.982*** | 0.231 | 0.342*** | 0.46* | -0.131 | 61.3\% | 6.53\% | 205 | 0.894 | 55.2\% | 37.6\% |
|  | (0.978) | (7.365) | (1.064) | (4.535) | (2.095) | $(-0.535)$ |  |  |  |  |  |  |
| TPDPS_EP | 0.038*** | 0.085*** | 0.247 | 0.381*** | 0.06* | -0.056 | 61.4\% | 6.06\% | 205 | 0.000 | 50.8\% | 97.2\% |
|  | (3.434) | (4.319) | (1.874) | (11.657) | (2.492) | (-0.556) |  |  |  |  |  |  |
| BP_RI | 0.032 | 0.646*** | 0.172 | 0.33*** | 0.551* | -0.140 | 60\% | 5.35\% | 205 | 0.004 | 45.9\% | 39.8\% |
|  | (1.461) | (5.387) | (0.763) | (4.380) | (2.547) | (-0.583) |  |  |  |  |  |  |
| BP_EP | 0.032 | $0.574 * * *$ | 0.063 | $0.329 * * *$ | 0.546* | -0.158 | 59.5\% | 4.95\% | 205 | 0.000 | 45.9\% | 43.6\% |
|  | (1.450) | (4.935) | (0.316) | (4.382) | (2.503) | (-0.651) |  |  |  |  |  |  |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RW | 0.049*** | 0.073*** | 0.016 | 0.392*** | 0.026 | -0.024 | 60\% | 4.92\% | 205 | 0.000 | 39.8\% | 96.7\% |
|  | (4.409) | (4.285) | (0.140) | (11.971) | (0.555) | (-0.272) |  |  |  |  |  |  |
| BP_RW | 0.040 | $0.582 * * *$ | 0.133 | 0.326*** | 0.5* | -0.180 | 59.1\% | 4.89\% | 205 | 0.001 | 38.1\% | 48.1\% |
|  | (1.789) | (4.625) | (0.561) | (4.314) | (2.254) | (-0.746) |  |  |  |  |  |  |
| PE_Anlst | 0.011 | 0.663** | 0.033 | 0.334*** | 0.401 | -0.233 | 58.3\% | 4.23\% | 205 | 0.161 | 44.2\% | 29.3\% |
|  | (0.564) | (2.771) | (0.120) | (6.703) | (0.747) | (-1.531) |  |  |  |  |  |  |
| DKL_HDZ | 0.016 | 0.279* | 0.045 | 0.38*** | 0.88* | 0.007 | 57.3\% | 3.27\% | 205 | 0.000 | 22.7\% | 62.4\% |
|  | (1.275) | (2.093) | (0.359) | (10.380) | (2.208) | (0.058) |  |  |  |  |  |  |
| GLS_HDZ | 0.050 | 0.505** | -0.096 | 0.231 | 4.012 | -0.425 | 57\% | 3.12\% | 205 | 0.006 | 27.6\% | 55.2\% |
|  |  |  | (-0.265) |  |  | (-0.875) |  |  |  |  |  |  |
| GM_Anlst | -0.007 | 0.338 | 0.130 | $0.429 * * *$ | -0.724 | 0.180 | 55.9\% | 3.09\% | 205 | 0.008 | 26.0\% | 40.9\% |
|  | (-0.440) | (1.362) | (0.508) | (6.249) | (-0.553) | (1.036) |  |  |  |  |  |  |
| MPEG_Anlst | 0.008 | $0.296 * * *$ | -0.122 | 0.399*** | 0.049 | 0.080 | 55.9\% | 3.00\% | 205 | 0.000 | 24.9\% | 47.5\% |
|  | (0.613) | (3.577) | (-1.126) | (11.724) | (0.118) | (0.971) |  |  |  |  |  |  |
| HL_HDZ | 0.027 | -0.123 | -0.006 | $0.462 * * *$ | -0.381 | 0.157 | 56.8\% | 2.99\% | 205 | 0.001 | 22.7\% | 68.0\% |
|  | (0.760) | (-0.380) | (-0.017) | (4.182) | (-0.314) | (0.413) |  |  |  |  |  |  |
| FGHJ_HDZ | -4.975 | -27.434 | 45.173 | 20.774 | -454.913 | 77.891 | 56.7\% | 2.94\% | 205 | 0.398 | 25.4\% | 60.8\% |
|  | (-0.827) | (-0.817) | (0.828) | (0.844) | (-0.826) | (0.827) |  |  |  |  |  |  |
| PE_HDZ | 0.025* | 0.226* | -0.021 | 0.398*** | 0.862* | -0.053 | 57.2\% | 2.85\% | 205 | 0.000 | 34.3\% | 56.9\% |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RI | (2.205) | (2.440) | (-0.211) | (10.639) | (2.485) | (-0.490) |  |  |  |  |  |  |
|  | 0.024* | 0.127 | -0.068 | 0.384*** | -3.109 | 0.010 | 55.7\% | 2.74\% | 205 | 0.000 | 27.5\% | 69.7\% |
|  | (2.136) | (1.749) | (-0.538) | (13.965) | (-0.985) | (0.149) |  |  |  |  |  |  |
| KMY_HDZ | 0.036 | -0.098 | -0.203 | 0.436*** | 0.449 | -0.061 | 56.6\% | 2.70\% | 205 | 0.003 | 24.3\% | 60.2\% |
|  | (1.292) | (-0.269) | (-0.624) | (6.981) | (0.709) | (-0.267) |  |  |  |  |  |  |
| GLS_Anlst | -0.037 | 0.826*** | -0.080 | $0.361 * * *$ | 1.223* | -0.204 | 56.7\% | 2.65\% | 205 | 0.296 | $30.4 \%$ | 39.2\% |
|  | (-1.960) | (4.988) | (-0.528) | (8.618) |  |  |  |  |  |  |  |  |
| FPM_Anlst | -0.012 | 0.655 | 0.312 | $0.351 * * *$ | -3.464 | 0.246 | 55.1\% | 2.64\% | 205 | 0.377 | 26.0\% | 29.3\% |
|  | (-0.442) | (1.681) | (1.049) | (5.013) | (-1.104) | (1.053) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.053*** | 1.280 | 0.052 | $0.369 * * *$ | -3.970 | 0.046 | 55.3\% | 2.58\% | 205 | 0.875 | 11.0\% | 85.1\% |
|  | (4.347) | (0.721) | (0.215) | (12.090) | (-0.989) | (0.317) |  |  |  |  |  |  |
| DKL_Anlst | -0.008 | 0.747* | 0.116 | 0.321*** | 0.927* | -0.017 | 56.5\% | 2.51\% | 205 | 0.457 | 29.8\% | 37.6\% |
|  | (-0.234) | (2.202) | (0.454) | (5.101) | (2.027) | $(-0.112)$ |  |  |  |  |  |  |
| FGHJ_Anlst | -0.066 | 0.966*** | -0.024 | 0.368*** | 1.186* | -0.215 | 56.5\% | 2.50\% | 205 | 0.887 | 29.3\% | 40.3\% |
|  | (-1.940) | (4.023) | (-0.151) | (8.685) | (2.303) | (-1.681) |  |  |  |  |  |  |
| CT_HDZ | 0.026* | 0.114 | -0.064 | $0.403 * * *$ | 1.547** | -0.058 | 57.2\% | 2.50\% | 205 | 0.000 | 25.4\% | 65.2\% |
|  | (2.390) | (1.151) | (-0.474) | (10.479) | (3.058) | (-0.511) |  |  |  |  |  |  |
| HL_Anlst | 0.010 | $0.501 * * *$ | 0.155 | $0.328 * * *$ | 0.457 | -0.010 | 56.3\% | 2.45\% | 205 | 0.000 | 29.3\% | 38.7\% |
|  | (0.447) | (3.780) | (0.651) | (5.543) | (0.857) | (-0.063) |  |  |  |  |  |  |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.023 | 0.169 | -0.039 | 0.393*** | 0.482 | -0.001 | 56\% | 2.36\% | 205 | 0.000 | 32.6\% | 76.2\% |
|  | (1.780) | (1.638) | (-0.286) | (9.033) | (0.633) | (-0.018) |  |  |  |  |  |  |
| PE_EP | 0.023* | 0.502*** | -0.127 | 0.373*** | 1.899 | -0.119 | 56\% | 2.31\% | 205 | 0.002 | $33.1 \%$ | 80.7\% |
|  | (2.142) | (3.250) | (-1.208) | (11.275) | (1.889) | (-1.316) |  |  |  |  |  |  |
| HL_RI | -0.015 | 0.119 | 0.125 | 0.541* | -0.393 | 0.456 | 54.2\% | 2.18\% | 205 | 0.000 | 22.1\% | 78.5\% |
|  | (-0.340) | (1.797) | (0.298) | (2.523) | (-0.871) | (0.808) |  |  |  |  |  |  |
| DKL_RI | -0.013 | 0.113 | 0.103 | 0.548* | -0.431 | 0.483 | 54.2\% | 2.16\% | 205 | 0.000 | 17.7\% | 79.6\% |
|  | (-0.300) | (1.729) | (0.241) | (2.524) | (-0.963) | (0.858) |  |  |  |  |  |  |
| MPEG_RI | -0.007 | 0.080 | 0.176 | 0.53** | 7.270 | 0.263 | 55.6\% | 2.05\% | 205 | 0.000 | 28.4\% | 75.6\% |
|  | (-0.212) | (1.578) | (0.530) | (3.054) | (0.503) | (0.881) |  |  |  |  |  |  |
| CT_Anlst | -0.002 | 0.7*** | 0.218 | 0.329*** | 0.571 | -0.036 | 56.2\% | 2.04\% | 205 | 0.126 | 29.3\% | 39.8\% |
|  | (-0.069) | (3.592) | (0.917) | (5.745) | (1.109) | (-0.258) |  |  |  |  |  |  |
| GG_HDZ | 0.032 | -0.018 | -0.199 | $0.432 * * *$ | $1.911^{* * *}$ | -0.108 | 56.4\% | 1.98\% | 205 | 0.001 | 22.1\% | 55.2\% |
|  | (1.729) | (-0.061) | (-0.747) | (7.656) | (3.208) | (-0.531) |  |  |  |  |  |  |
| WNG_RW | 0.045*** | -0.002 | -0.164 | 0.344*** | -0.005 | -0.007 | 53.9\% | 1.92\% | 205 | 0.000 | 3.4\% | 100.0\% |
|  | (4.119) | (-0.847) | (-1.531) | (13.469) | (-0.457) | (-0.092) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.048*** | 0.005 | -0.244 | 0.376*** | -0.004 | -0.062 | 53.8\% | 1.79\% | 205 | 0.000 | 10.5\% | 98.9\% |
|  | (3.641) | (0.889) | (-2.147) | (11.391) | (-0.926) | (-0.783) |  |  |  |  |  |  |
| FPM_HDZ | 0.044 | 0.114 | -0.137 | 0.35*** | 0.756 | -0.048 | 54.9\% | 1.71\% | 205 | 0.000 | 19.9\% | 51.9\% |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_EP | (1.883) | (0.632) | (-1.143) | (9.131) | (1.091) | (-0.480) |  |  |  |  |  |  |
|  | -0.002 | 0.212*** | -0.165 | 0.483*** | -0.554 | 0.284 | 54.5\% | 1.69\% | 205 | 0.000 | 26.5\% | 70.7\% |
|  | (-0.064) | (3.292) | (-0.544) | (3.460) | (-0.710) | (0.635) |  |  |  |  |  |  |
| GM_HDZ | 0.041*** | -0.023 | -0.023 | 0.403*** | 1.145*** | 0.026 | 54.4\% | 1.68\% | 205 | 0.000 | 17.1\% | 64.6\% |
|  | (3.462) | (-0.241) | (-0.176) | (8.929) | (3.186) | (0.191) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.058*** | 0.000 | -0.015 | 0.426*** | -0.019 | 0.053 | 53.8\% | 1.68\% | 205 | 0.000 | 12.2\% | 97.2\% |
|  | (3.634) | (-0.008) | (-0.050) | (5.581) | (-0.948) | (0.325) |  |  |  |  |  |  |
| HL_EP | 0.010 | 0.048 | 0.168 | 0.497*** | 0.207 | 0.387 | 54.4\% | 1.66\% | 205 | 0.000 | 23.2\% | 76.8\% |
|  | (0.336) | (0.415) | (0.457) | (3.629) | (0.293) | (0.869) |  |  |  |  |  |  |
| WNG_RI | 0.036*** | -0.008 | -0.163 | 0.393*** | 0.003 | 0.020 | 54\% | 1.65\% | 205 | 0.000 | 3.4\% | 100.0\% |
|  | (3.138) | (-0.875) | (-1.481) | (10.995) | (0.056) | (0.242) |  |  |  |  |  |  |
| GG_RW | 0.029 | -0.070 | -0.229 | $0.431^{* * *}$ | 2.513* | -0.099 | 55.9\% | 1.65\% | 205 | 0.001 | 22.2\% | 65.3\% |
|  | (1.477) | (-0.231) | (-0.826) | (7.352) | (2.367) | (-0.466) |  |  |  |  |  |  |
| KMY_Anlst | -0.081 | 0.481 | -0.209 | 0.494*** | 0.469 | -0.225 | 54.5\% | 1.56\% | 205 | 0.061 | 22.7\% | 53.6\% |
|  | (-0.832) | (1.743) | (-0.969) | (3.733) | (1.723) | (-1.433) |  |  |  |  |  |  |
| PEG_HDZ | 0.049*** | -0.023 | -0.028 | 0.387*** | 0.326 | 0.052 | 55\% | 1.47\% | 205 | 0.000 | 11.6\% | 68.5\% |
|  | (4.427) | (-0.374) | (-0.231) | (9.193) | (0.444) | (0.395) |  |  |  |  |  |  |
| MPEG_HDZ | 0.04*** | 0.043 | -0.042 | 0.394*** | 0.501 | 0.019 | 54.7\% | 1.46\% | 205 | 0.000 | 16.0\% | 70.7\% |
|  | (3.722) | (0.742) | (-0.360) | (9.914) | (1.126) | (0.161) |  |  |  |  |  |  |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_Anlst | -0.081 | 0.273 | -0.192 | 0.469** | 0.287 | -0.226 | 53.7\% | 1.41\% | 205 | 0.000 | 19.3\% | 69.6\% |
|  | (-0.723) | (1.735) | (-1.151) | (2.852) | (1.524) | (-1.313) |  |  |  |  |  |  |
| GG_EP | 0.021 | 0.284 | -0.020 | 0.379*** | 0.378 | 0.130 | 55\% | 1.40\% | 205 | 0.170 | 20.0\% | 70.0\% |
|  | (1.835) | (0.547) | (-0.142) | (9.304) | (0.343) | (1.029) |  |  |  |  |  |  |
| WNG_EP | 0.051*** | -0.014 | -0.687 | 0.442*** | 0.002 | 0.120 | 54.1\% | 1.34\% | 205 | 0.000 | 3.9\% | 98.3\% |
|  | (3.799) | (-2.027) | (-1.080) | (7.300) | (0.148) | (0.937) |  |  |  |  |  |  |
| TrES_Anlst _25SBM | 0.057*** | -0.001 | -0.342 | 0.352*** | 0.003 | -0.120 | 53.4\% | 1.21\% | 205 | 0.000 | 7.7\% | 97.8\% |
|  | (5.355) | (-0.108) | (-1.421) | (12.321) | (0.289) | (-1.130) |  |  |  |  |  |  |
| PEG_EP | 0.037 | 0.032 | -0.026 | $0.326 * * *$ | 0.424 | 0.030 | 55.1\% | 1.21\% | 205 | 0.000 | 24.1\% | 97.6\% |
|  | (1.818) |  | (-0.076) | (5.302) |  | (0.210) |  |  |  |  |  |  |
| CT_EP | 0.051 | -0.681 | 0.471 | 0.524** | 2.962 | 0.387 | 54.1\% | 1.12\% | 205 | 0.063 | 16.6\% | 81.8\% |
|  | (0.813) | (-0.758) | (0.836) | (2.940) | (0.851) | (0.814) |  |  |  |  |  |  |
| DKL_EP | 0.004 | 0.097 | 0.090 | 0.501*** | 0.061 | 0.355 | 53.7\% | 1.07\% | 205 | 0.000 | 22.1\% | 72.9\% |
|  | (0.129) | (1.182) | (0.250) | (3.394) | (0.112) | (0.790) |  |  |  |  |  |  |
| MPEG_RW | 0.054* | 0.113 | -0.355 | 0.333*** | 0.379 | -0.328 | 54.2\% | 1.04\% | 205 | 0.000 | 9.1\% | 95.4\% |
|  | (2.575) | (1.312) | (-1.703) | (4.595) | (1.857) | (-1.277) |  |  |  |  |  |  |
| GM_EP | 0.019 | -0.023 | -0.116 | 0.383*** | 0.953*** | -0.006 | 54.4\% | 1.00\% | 205 | 0.000 | 25.0\% | 83.9\% |
|  | (1.460) | (-0.300) | (-0.580) | (12.080) | (3.724) | (-0.074) |  |  |  |  |  |  |
| KMY_RW | 0.015 | 0.077 | -0.316 | 0.342*** | 1.694 | -0.175 | 53.4\% | 0.99\% | 205 | 0.000 | 6.6\% | 86.2\% |

[^26]Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_RW | (0.397) | (0.870) | (-1.278) | (6.474) | (0.933) | (-1.279) |  |  |  |  |  |  |
|  | 0.016 | 0.092 | -0.275 | $0.339 * * *$ | 1.616 | -0.183 | 53.4\% | 0.98\% | 205 | 0.000 | 7.7\% | 88.4\% |
|  | (0.408) | (1.059) | (-1.129) | (6.456) | (0.890) | (-1.337) |  |  |  |  |  |  |
| PEG_RI | 0.049* | -0.027 | 0.015 | $0.32 * * *$ | 0.486* | 0.077 | 54\% | 0.84\% | 205 | 0.000 | 16.0\% | 98.7\% |
|  | (2.491) | (-0.282) | (0.060) | (5.222) | (2.456) | (0.604) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.058*** | 0.151** | -0.091 | 0.338*** | -0.024 | -0.168 | 52.5\% | 0.84\% | 205 | 0.000 | 14.4\% | 77.3\% |
|  | (3.293) |  | $(-0.411)$ | (5.194) | (-0.574) | (-1.060) |  |  |  |  |  |  |
| PEG_Anlst | 0.011 | 0.179 | -0.248 | $0.421 * * *$ | -0.179 | 0.056 | 54.3\% | 0.81\% | 205 | 0.000 | 12.7\% | 59.7\% |
|  | (0.408) | (1.497) | (-1.803) | (8.522) | (-0.297) | (0.705) |  |  |  |  |  |  |
| GG_RI | 0.028* | 0.168 | 0.088 | 0.399*** | 0.081 | -0.013 | 54.2\% | 0.78\% | 205 | 0.000 | 20.6\% | 73.5\% |
|  | (2.206) | (1.506) | (0.577) | (8.961) | (0.082) | (-0.126) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.045*** | -0.004 | -0.136 | 0.386*** | -0.014 | 0.013 | 54.1\% | 0.77\% | 205 | 0.000 | 8.8\% | 98.9\% |
|  | (4.418) | (-0.621) | (-1.409) | (13.916) | (-0.879) | (0.171) |  |  |  |  |  |  |
| FGHJ_EP | -4.953 | -27.603 | 44.994 | 20.747 | -453.327 | 77.881 | 54.3\% | 0.74\% | 205 | 0.395 | 27.6\% | 80.1\% |
|  | (-0.824) | (-0.822) | (0.825) | (0.843) | (-0.823) | (0.827) |  |  |  |  |  |  |
| KMY_RI | 0.019 | 0.092 | 0.224 | 0.484* | 0.646 | 0.413 | 53.6\% | 0.63\% | 205 | 0.000 | 18.2\% | 70.2\% |
|  | (0.350) | (0.989) | (0.538) | (2.126) | (0.686) | (0.725) |  |  |  |  |  |  |
| GM_RW | 0.024* | 0.018 | -0.105 | $0.385 * * *$ | 0.556** | -0.077 | 54.7\% | 0.62\% | 205 | 0.000 | 15.8\% | 91.2\% |
|  | (2.012) | (0.739) | (-0.557) | (9.648) | (2.595) | (-0.802) |  |  |  |  |  |  |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RW_25SBM | -0.011 | -1.712 | -0.265 | 0.495** | 1.002 | 0.032 | 54\% | 0.55\% | 205 | 0.110 | 2.2\% | 84.0\% |
|  | (-0.158) | (-1.013) | (-1.568) | (3.028) | (0.883) | (0.224) |  |  |  |  |  |  |
| MPEG_EP | -0.001 | 0.022 | -0.068 | 0.429*** | 0.799*** | 0.155 | 54.2\% | 0.55\% | 205 | 0.000 | 27.1\% | 83.4\% |
|  | (-0.046) | (0.473) | (-0.317) | (6.459) | (3.152) | (0.866) |  |  |  |  |  |  |
| FGHJ_RI | -4.948 | -27.604 | 45.113 | 20.743 | -464.033 | 77.964 | 52.6\% | 0.50\% | 205 | 0.395 | 24.3\% | 71.8\% |
|  | (-0.823) | (-0.822) | (0.827) | (0.842) | (-0.842) | (0.828) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.031 | -0.004 | 0.057 | 0.438*** | -0.006 | 0.136 | 53.1\% | 0.48\% | 205 | 0.000 | 7.7\% | 97.8\% |
|  | (1.727) | (-0.838) | (0.278) | (6.265) | (-0.516) | (0.721) |  |  |  |  |  |  |
| DKL_RW | 0.002 | 0.136 | -0.264 | 0.341 *** | 1.702 | -0.149 | 53.5\% | 0.46\% | 205 | 0.000 | 12.7\% | 85.1\% |
|  | (0.059) | (1.493) | (-0.991) | (6.371) | (0.937) | (-1.107) |  |  |  |  |  |  |
| PE_RW | 0.036 | 0.063 | -0.066 | $0.39 * * *$ | -2.028 | 0.020 | 54.6\% | 0.44\% | 205 | 0.000 | 13.3\% | 86.7\% |
|  | (1.916) | (1.245) | (-0.314) | (12.080) | (-0.922) | (0.234) |  |  |  |  |  |  |
| CT_RW | 0.017 | 0.107 | -0.108 | 0.386*** | 0.544 | -0.027 | 54.5\% | 0.42\% | 205 | 0.000 | 18.1\% | 71.3\% |
|  | (1.171) | (1.253) | (-0.485) | (9.495) | (0.646) | (-0.275) |  |  |  |  |  |  |
| GLS_EP | 0.051 | 0.333* | -0.499 | 0.276* | 6.436 | -0.447 | 53.9\% | 0.42\% | 205 | 0.000 | 24.3\% | 75.1\% |
|  | (1.506) | (2.116) | (-1.610) | (2.268) | (1.801) | (-0.945) |  |  |  |  |  |  |
| FPM_EP | 0.080 | 0.052* | -0.146 | 0.507** | -0.033 | 0.064 | 52.4\% | 0.36\% | 205 | 0.000 | 17.1\% | 89.5\% |
|  | (1.180) | (2.297) | (-1.419) | (3.067) | (-0.880) | (0.422) |  |  |  |  |  |  |
| GLS_RW | 0.286 | -0.310 | 0.467 | 0.382*** | -0.617 | 0.087 | 52.9\% | 0.35\% | 205 | 0.000 | 6.6\% | 84.5\% |

[^27]Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 3FF_Factor | (1.158) | (-1.079) | (0.701) | (6.774) | (-1.094) | (0.934) |  |  |  |  |  |  |
|  | 0.065*** | -0.414 | -0.092 | 0.332*** | 6.847* | -0.083 | 53.4\% | 0.31\% | 205 | 0.000 | 7.7\% | 28.2\% |
|  | (4.838) | (-2.206) | (-0.852) | (7.778) | (2.462) | (-0.607) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.05*** | 0.151 | -0.300 | $0.346 * * *$ | 0.346 | -0.157 | 52.5\% | 0.30\% | 205 | 0.000 | 13.8\% | 50.8\% |
|  | (3.097) | (1.778) | (-2.182) | (7.104) | (1.108) | (-1.170) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.056*** | -0.002 | -0.154 | $0.371^{* * *}$ | -0.005 | -0.025 | 52.9\% | 0.21\% | 205 | 0.000 | 11.6\% | 95.0\% |
|  | (5.208) | $(-0.179)$ | $(-1.993)$ | (12.547) | $(-0.259)$ | (-0.406) |  |  |  |  |  |  |
| GLS_RI | 0.060 | 0.287 | -0.322 | 0.27* | 20.721 | -0.432 | 52.9\% | 0.20\% | 205 | 0.000 | 23.2\% | 75.7\% |
|  | (1.778) | (1.862) | (-1.091) | (2.219) | (0.870) | $(-0.913)$ |  |  |  |  |  |  |
| FPM_RI | 0.025* | 0.100 | -0.128 | 0.366*** | -0.662 | -0.064 | 52.3\% | 0.19\% | 205 | 0.000 | 16.0\% | 76.8\% |
|  | (2.104) | (1.185) | (-1.225) | (11.820) | (-0.637) | (-0.887) |  |  |  |  |  |  |
| TrES_Anlst_10Ind | 0.054*** | 0.033* | -0.197 | 0.345*** | -0.033 | -0.164 | 54.2\% | 0.19\% | 205 | 0.000 | 14.4\% | 92.3\% |
|  | (3.888) | (2.084) | (-1.323) | (10.978) | (-0.811) | (-1.460) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.071*** | -0.018 | -0.256 | 0.39*** | 0.020 | -0.041 | 52.8\% | 0.18\% | 205 | 0.000 | 5.0\% | 91.2\% |
|  | (4.820) | (-0.415) | (-1.340) | (12.790) | (0.739) | (-0.555) |  |  |  |  |  |  |
| TrETSS_Anlst _10Ind | $0.034 * * *$ | 0.16** | -0.186 | $0.405^{* * *}$ | -0.006 | -0.007 | 54.2\% | 0.16\% | 205 | 0.000 | 9.9\% | 69.6\% |
|  | (3.403) | (2.587) | (-1.367) | (12.728) | (-0.049) | (-0.096) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.05*** | 0.001 | -0.152 | $0.404 * * *$ | 0.003 | 0.031 | 53.5\% | 0.14\% | 205 | 0.000 | 9.4\% | 90.6\% |
|  | (5.018) | (0.029) | (-1.643) | (12.199) | (0.081) | (0.334) |  |  |  |  |  |  |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_HDZ_10Ind | 0.078*** | -0.002 | -0.266 | 0.333*** | 0.004 | -0.095 | 52.5\% | 0.10\% | 205 | 0.000 | 14.4\% | 96.7\% |
|  | (3.990) | (-0.179) | (-2.045) | (6.549) | (0.264) | (-0.776) |  |  |  |  |  |  |
| Carhart_Factor | -0.054 | -0.453 | 0.860 | 0.732 | -6.113 | 1.441 | 53\% | 0.07\% | 205 | 0.000 | 6.1\% | 35.9\% |
|  | (-0.367) | (-1.744) | (0.908) | (1.453) | (-0.658) | (0.859) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.04* | -0.011 | -0.240 | 0.449*** | -0.011 | 0.114 | 53.5\% | 0.07\% | 205 | 0.000 | 6.1\% | 96.7\% |
|  | (2.198) | (-1.226) | (-1.102) | (6.181) | (-0.609) | (0.578) |  |  |  |  |  |  |
| CT_RI | -0.022 | -0.056 | 0.100 | 0.607** | 2.531 | 0.388 | 52.2\% | 0.05\% | 205 | 0.000 | 6.6\% | 86.7\% |
|  | (-0.391) | (-0.760) | (0.192) | (2.621) | (0.847) | (0.676) |  |  |  |  |  |  |
| PEG_RW | 0.002 | 0.035 | -0.319 | $0.383 * * *$ | 2.074 | -0.070 | 53.8\% | 0.04\% | 205 | 0.000 | 11.6\% | 100.0\% |
|  | (0.057) |  | (-0.937) | (8.754) | (0.700) | (-0.546) |  |  |  |  |  |  |
| 5FF_Factor | $0.059 * * *$ | -0.150 | -0.097 | $0.346 * * *$ | -0.268 | -0.048 | 53.1\% | 0.02\% | 205 | 0.000 | 8.8\% | 27.1\% |
|  | (4.662) | (-0.841) | (-0.937) | (9.550) | (-0.138) | (-0.415) |  |  |  |  |  |  |
| CAPM_Factor | -0.027 | 5.806 | 0.102 | 0.329*** | -5.275 | 0.163 | 53.2\% | -0.04\% | 205 | 0.818 | 12.2\% | 19.3\% |
|  | (-0.086) | (0.278) | (0.444) | (5.645) | (-0.224) | (1.110) |  |  |  |  |  |  |
| WNG_Anlst | 0.058** | 0.041 | -0.043 | 0.342*** | 0.002 | -0.027 | 52.3\% | -0.07\% | 205 | 0.000 | 9.9\% | 91.7\% |
|  | (2.833) | (1.062) | (-0.216) | (6.532) | (0.016) | (-0.315) |  |  |  |  |  |  |
| FGHJ_RW | -4.934 | -27.792 | 44.813 | 20.797 | -456.163 | 77.931 | 52.7\% | -0.16\% | 205 | 0.406 | 11.1\% | 83.6\% |
|  | (-0.798) | (-0.805) | (0.798) | (0.821) | (-0.805) | (0.805) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.055*** | 0.005 | 0.180 | 0.37*** | -0.010 | 0.071 | 51.9\% | -0.31\% | 205 | 0.000 | 5.5\% | 97.8\% |

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Table 74 : Capturing Subsequent Return: Low Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_RW | (4.839) | (0.343) | (0.441) | (11.003) | (-0.736) | (0.456) |  |  |  |  |  |  |
|  | 0.053** | 0.037 | -0.286 | $0.316^{* * *}$ | 0.068 | -0.119 | 52.7\% | -0.45\% | 205 | 0.000 | 8.3\% | 83.4\% |
|  | (2.770) | (1.582) | (-1.806) | (5.403) | (0.918) | (-0.803) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | -0.028 | -0.036 | 0.031 | 0.609* | 0.008 | 0.574 | 52.7\% | -0.58\% | 205 | 0.000 | 6.6\% | 92.8\% |
|  | (-0.319) | (-1.631) | (0.056) | (2.176) | (0.038) | (0.739) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.052*** | 0.003 | -0.185 | $0.346 * * *$ | -0.002 | -0.089 | 51.4\% | -0.74\% | 205 | 0.000 | 6.6\% | 97.8\% |
|  | (4.864) | (0.610) | (-2.185) | (9.597) | (-0.329) | (-0.815) |  |  |  |  |  |  |
| WNG_HDZ | 0.046*** | 0.000 | -0.474 | $0.371 * * *$ | 0.198 | -0.153 | 52.1\% | -0.82\% | 205 | 0.000 | 0.6\% | 99.4\% |
|  | (3.919) | (-1.557) | (-1.006) | (11.705) | (0.609) | (-0.934) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | -0.019 | -0.007 | 0.240 | 0.61* | -0.072 | 0.532 | 51.3\% | -1.12\% | 205 | 0.000 | 7.2\% | 98.3\% |
|  | (-0.230) | (-0.702) | (0.509) | (2.327) | (-0.888) | (0.768) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.056*** | 0.000 | 0.028 | 0.373*** | 0.022 | -0.037 | 51\% | -1.18\% | 205 | 0.000 | 8.8\% | 89.5\% |
|  | (5.193) | (0.016) | (0.137) | (14.141) | (0.333) | (-0.415) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.067** | 0.003 | -0.280 | 0.307*** | 0.029 | -0.175 | 51\% | -1.31\% | 205 | 0.000 | 13.8\% | 95.0\% |
|  | (2.905) | (0.221) | (-1.729) | (4.182) | (0.858) | (-0.835) |  |  |  |  |  |  |

For the lowest quartile of firms in terms of price momentum, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, \text { it }}=$ $\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much
of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 75 : Capturing Subsequent Return: High Price Momentum Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | -0.026 | 0.185*** | 0.346* | 0.419*** | 0.084 | 0.029 | 67.1\% |  | 205 | 0.000 | 45.6\% | 94.6\% |
|  | (-2.086) | (3.872) | (2.365) | (10.656) | (1.525) | (0.553) |  | 6.25\% |  |  |  |  |
| Naive | -0.016 | 0.154** | 0.311* | $0.415^{* * *}$ | 0.079 | 0.036 | 66.8\% |  | 205 | 0.000 | 45.6\% | 94.6\% |
|  | (-1.356) | (3.054) | (2.133) | (10.729) | (1.666) | (0.709) |  | 6.07\% |  |  |  |  |
| TPDPS_HDZ | -0.025 | 0.152* | 0.314* | 0.379*** | 0.134* | 0.094 | 66.8\% |  | 205 | 0.000 | 44.2\% | 94.6\% |
|  | (-1.663) | (2.272) | (2.204) | (8.756) | (2.161) | (1.383) |  | 6.03\% |  |  |  |  |
| BP_HDZ | -0.015 | 0.655*** | 0.278 | 0.48 *** | 0.529** | 0.120 | 66.3\% |  | 205 | 0.008 | 46.3\% | 49.7\% |
|  | (-1.370) | (5.090) | (1.638) | (9.845) | (2.944) | (1.821) |  | 5.83\% |  |  |  |  |
| BP_Anlst | -0.013 | 0.719*** | 0.269 | 0.495*** | 0.493** | 0.116 | 65.9\% |  | 205 | 0.038 | 46.3\% | 51.0\% |
|  | (-1.176) | (5.372) | (1.649) | (8.513) | (2.897) | (1.764) |  | 5.42\% |  |  |  |  |
| TPDPS_EP | -0.014 | 0.070 | 0.295 | 0.43*** | 0.152* | 0.120 | 65.6\% |  | 205 | 0.000 | 42.9\% | 97.3\% |
|  | (-1.268) | (1.879) | (1.929) | (11.785) | (2.532) | (1.457) |  | 5.29\% |  |  |  |  |
| TPDPS_RI | -0.019 | 0.096 | 0.286* | 0.407*** | 0.127* | 0.128 | 64.8\% |  | 205 | 0.000 | 34.0\% | 96.6\% |
|  | (-1.405) | (1.742) | (2.184) | (10.165) | (2.174) | (1.535) |  | 4.17\% |  |  |  |  |
| TPDPS_RW | -0.020 | 0.041 | 0.391*** | 0.403*** | 0.117** | 0.079 | 64.7\% |  | 205 | 0.000 | $33.3 \%$ | 98.0\% |
|  | (-1.744) | (1.639) | (3.320) | (11.918) | (2.942) | (1.454) |  | 4.07\% |  |  |  |  |
| BP_EP | -0.012 | 0.441*** | 0.309* | $0.519 * * *$ | 0.502** | 0.126 | 64\% |  | 205 | 0.000 | 41.5\% | 55.1\% |
|  | (-1.083) | (4.544) | (1.974) | (8.024) | (2.909) | (1.867) |  | 4.03\% |  |  |  |  |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RW | -0.009 | 0.543*** | 0.217 | 0.514*** | 0.377* | 0.111 | 63.6\% |  | 205 | 0.000 | 38.8\% | 54.4\% |
|  | (-0.781) | (5.456) | (1.290) | (8.799) | (2.051) | (1.768) |  | 3.89\% |  |  |  |  |
| BP_RI | -0.010 | 0.42*** | 0.284 | 0.518*** | 0.498** | 0.127 | 63.4\% |  | 205 | 0.000 | 37.4\% | 53.7\% |
|  | (-0.914) | (4.404) | (1.736) | (8.004) | (2.819) | (1.799) |  | $3.23 \%$ |  |  |  |  |
| 3FF_Factor | -0.011 | 1.337 | 0.412 | 0.468*** | 7.601 | 0.161 | 61.1\% |  | 205 | 0.800 | 8.2\% | 22.4\% |
|  | (-0.609) | (1.009) | (0.340) | (5.664) | (0.684) | (1.224) |  | 2.59\% |  |  |  |  |
| PE_Anlst | -0.024 | 0.621** | 0.225 | 0.48*** | 1.364** | 0.049 | 62.7\% |  | 205 | 0.066 | 30.6\% | 29.3\% |
|  | (-1.434) | (3.040) | (0.913) | (8.369) | (2.796) | (0.683) |  | 1.98\% |  |  |  |  |
| PE_HDZ | -0.002 | 0.164 | 0.205 | $0.457^{* * *}$ | $1.365 * * *$ | 0.062 | 61\% |  | 205 | 0.000 | 15.6\% | 42.9\% |
|  | (-0.108) | (1.478) | (1.698) | (9.511) | (3.690) | (0.923) |  | 1.85\% |  |  |  |  |
| CT_Anlst | -0.053 | 0.666*** | 0.424*** | 0.48*** | 0.629 | 0.081 | 62\% |  | 205 | 0.059 | 20.4\% | 32.7\% |
|  | (-3.008) |  | (3.225) | (8.861) | (0.870) | (1.159) |  | 1.72\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.000 | -0.067 | 0.231 | $0.388 * * *$ | -0.156 | 0.029 | 60.3\% |  | 205 | 0.000 | 6.1\% | 93.2\% |
|  | (-0.001) | (-0.836) | (1.441) | (9.598) | (-0.989) | (0.381) |  | 1.72\% |  |  |  |  |
| GM_Anlst | -0.017 | 0.137 | 0.182 | 0.437*** | 0.844 | 0.061 | 61.5\% |  | 205 | 0.000 | 12.9\% | 38.8\% |
|  | (-1.037) | (0.995) | (1.008) | (9.584) | (1.326) | (0.978) |  | 1.60\% |  |  |  |  |
| PEG_RW | 0.023 | -0.039 | 0.423 | 0.392*** | 1.168 | 0.315 | 60.6\% |  | 205 | 0.000 | 12.9\% | 100.0\% |
|  | (0.252) | (-0.259) | (0.989) | (6.488) | (0.856) | (0.852) |  | 1.53\% |  |  |  |  |
| FPM_Anlst | -0.025 | 0.294 | 0.244 | 0.466*** | 0.659 | 0.064 | 61.2\% |  | 205 | 0.002 | 7.5\% | 23.8\% |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_HDZ | (-1.173) | (1.341) | (1.087) | (8.575) | (1.101) | (0.829) |  | 1.45\% |  |  |  |  |
|  | -0.012 | 0.131 | 0.358* | 0.437*** | 1.692** | 0.072 | 60.7\% |  | 205 | 0.000 | 14.3\% | 50.3\% |
|  | (-0.751) | (1.040) | (2.136) | (9.213) | (2.798) | (1.116) |  | 1.38\% |  |  |  |  |
| CT_HDZ | -0.008 | 0.089 | 0.347 | $0.428^{* * *}$ | $1.57 * * *$ | 0.073 | 60.7\% |  | 205 | 0.000 | 15.6\% | 53.7\% |
|  | (-0.384) | (0.542) | (1.906) | (9.027) | (3.454) | (1.132) |  | 1.34\% |  |  |  |  |
| CAPM_Factor | 0.005 | 0.052 | 0.063 | $0.461 * * *$ | 5.153 | 0.047 | 60.7\% |  | 205 | 0.896 | 15.0\% | 18.4\% |
|  | (0.043) | (0.007) | (0.308) | (8.208) | (0.476) | (0.612) |  | 1.31\% |  |  |  |  |
| TrES_HDZ_25SBM | -0.005 | 0.018 | 0.107 | $0.343 * * *$ | -0.008 | -0.018 | 60\% |  | 205 | 0.000 | 6.8\% | 98.6\% |
|  | (-0.419) | (1.386) | (0.843) | (7.895) | (-0.758) | (-0.295) |  | 1.31\% |  |  |  |  |
| TrES_RW_25SBM | 0.003 | 0.234 | 0.182 | 0.413*** | -0.010 | 0.017 | 59.2\% |  | 205 | 0.029 | 4.8\% | 93.2\% |
|  | (0.247) | (0.674) | (1.100) | (9.844) | (-0.350) | (0.270) |  | 1.28\% |  |  |  |  |
| GG_EP | -0.010 | 0.006 | 0.297 | 0.486*** | 1.301 | 0.115 | 60.2\% |  | 205 | 0.000 | 17.6\% | 64.7\% |
|  | (-0.654) | (0.028) | (1.916) | (7.413) | (1.647) | (1.513) |  | 1.25\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.010 | -0.010 | 0.221 | $0.367 * * *$ | 0.086 | 0.046 | 59.6\% |  | 205 | 0.000 | 4.8\% | 91.8\% |
|  | (0.664) | (-0.267) | (1.144) | (10.731) | (1.222) | (0.641) |  | 1.22\% |  |  |  |  |
| GG_HDZ | 0.007 | 0.055 | 0.395* | 0.446*** | $2.227 * * *$ | 0.068 | 61.1\% |  | 205 | 0.000 | 18.4\% | 49.7\% |
|  | (0.371) | (0.328) | (2.427) | (9.185) | (3.660) | (0.964) |  | 1.21\% |  |  |  |  |
| PE_EP | 0.012 | 0.175 | 0.046 | $0.44 * * *$ | 0.420 | 0.098 | 59.9\% |  | 205 | 0.004 | 15.0\% | 78.9\% |
|  | (0.563) | (0.626) | (0.337) | (6.566) | (0.777) | (1.179) |  | 1.18\% |  |  |  |  |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_HDZ | -0.015 | 0.083 | 0.361 | 0.444*** | 1.069 | 0.076 | 60.3\% |  | 205 | 0.000 | 12.9\% | 55.1\% |
|  | (-0.910) | (0.639) | (1.677) | (9.121) | (1.643) | (1.134) |  | 1.17\% |  |  |  |  |
| TrETSS_HDZ_25SBM | -0.003 | 0.020 | 0.113 | 0.42*** | -0.022 | 0.055 | 59.6\% |  | 205 | 0.000 | 8.8\% | 91.8\% |
|  | (-0.287) | (0.709) | (0.804) | (8.553) | (-0.594) | (0.788) |  | 1.14\% |  |  |  |  |
| TrES_Anlst_25SBM | -0.003 | 0.012 | 0.158 | 0.334*** | 0.028 | 0.088 | 58.8\% |  | 205 | 0.000 | 6.8\% | 97.3\% |
|  | (-0.309) | (0.440) | (1.094) | (11.808) | (1.185) | (1.368) |  | 1.13\% |  |  |  |  |
| HL_EP | 0.007 | -0.252 | 0.459 | 0.388*** | 1.585 | 0.061 | 60\% |  | 205 | 0.018 | 15.8\% | 74.7\% |
|  | (0.179) | (-0.484) | (0.998) | (11.186) | (1.040) | (0.873) |  | 1.11\% |  |  |  |  |
| 5FF_Factor | 0.008 | -0.063 | 0.259 | $0.512 * * *$ | -0.752 | 0.045 | 59.7\% |  | 205 | 0.000 | 9.5\% | 27.2\% |
|  | (0.606) | (-0.314) | (1.668) | (7.346) | (-0.761) | (0.643) |  | 1.10\% |  |  |  |  |
| DKL_EP | -0.020 | 0.107 | 0.139 | $0.392 * * *$ | 0.671 | 0.026 | 59.9\% |  | 205 | 0.000 | 16.4\% | 69.2\% |
|  | (-1.204) | (0.855) | (1.260) | (11.848) | (1.750) | (0.476) |  | 1.02\% |  |  |  |  |
| FGHJ_RW | 0.010 | 0.198* | 0.183 | 0.392*** | 0.011 | -0.095 | 58.4\% |  | 205 | 0.000 | 14.1\% | 87.4\% |
|  | (0.499) | (2.268) | (0.854) | (4.533) | (0.056) | (-0.650) |  | 0.99\% |  |  |  |  |
| TrOHE_10Ind | 0.229 | -2.280 | -5.757 | 0.498*** | -4.291 | -2.564 | 59.8\% |  | 205 | 0.302 | 8.8\% | 53.7\% |
|  | (0.746) | (-0.720) | (-0.752) | (4.053) | (-0.753) | (-0.740) |  | 0.97\% |  |  |  |  |
| DKL_HDZ | -0.016 | 0.166 | 0.338* | $0.435 * * *$ | $1.428^{* *}$ | 0.067 | 60\% |  | 205 | 0.000 | 15.0\% | 55.8\% |
|  | (-0.926) | (1.272) | (2.193) | (9.171) | (2.949) | (1.068) |  | 0.95\% |  |  |  |  |
| TrES_EP_10Ind | -0.010 | 0.027 | 0.313 | $0.348 * * *$ | -0.005 | 0.067 | 59.1\% |  | 205 | 0.000 | 6.8\% | 95.2\% |

[^28]Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_EP_25SBM | (-0.776) | (1.288) | (1.582) | (10.978) | (-0.438) | (0.865) |  | 0.92\% |  |  |  |  |
|  | -0.005 | 0.013 | 0.103 | $0.349^{* * *}$ | -0.025 | 0.022 | 59.6\% |  | 205 | 0.000 | 7.5\% | 98.6\% |
|  | (-0.405) | (0.357) | (0.677) | (10.188) | (-0.686) | (0.396) |  | 0.88\% |  |  |  |  |
| HL_RW | -0.006 | 0.053 | 0.294 | $0.478 * * *$ | 0.074 | 0.055 | 59.1\% |  | 205 | 0.000 | 8.2\% | 85.7\% |
|  | (-0.150) | (0.569) | (1.137) | (9.103) | (0.210) | (0.499) |  | 0.86\% |  |  |  |  |
| GG_RI | 0.001 | 0.096 | 0.348* | 0.486*** | 0.643 | 0.111 | 59.4\% |  | 205 | 0.000 | 7.4\% | 61.5\% |
|  | (0.036) | (0.650) | (2.361) | (7.592) | (1.471) | (1.600) |  | 0.78\% |  |  |  |  |
| CT_EP | 0.055 | -1.944 | 0.718 | $0.39 * * *$ | 10.071 | 0.281 | 60.3\% |  | 205 | 0.304 | 13.8\% | 75.2\% |
|  | (0.564) | $(-0.682)$ | (0.955) | (7.772) |  | (1.008) |  | 0.75\% |  |  |  |  |
| TrES_RW_10Ind | 0.005 | -0.123 | 0.174 | 0.491*** | 0.787 | -0.034 | 59.1\% |  | 205 | 0.000 | 7.5\% | 87.8\% |
|  | (0.392) | (-0.555) | (0.959) | (8.000) | (0.683) | (-0.383) |  | 0.75\% |  |  |  |  |
| CT_RW | -0.018 | 0.112 | 0.304 | 0.482*** | 1.533** | 0.092 | 60\% |  | 205 | 0.000 | 20.8\% | 73.8\% |
|  | (-0.851) | (0.549) | (1.614) | (7.384) | (2.613) | (1.229) |  | 0.74\% |  |  |  |  |
| GG_RW | 0.001 | -0.018 | 0.342* | $0.447 * * *$ | 1.802 | 0.072 | 59.8\% |  | 205 | 0.000 | 12.8\% | 68.4\% |
|  | (0.060) | (-0.151) | (2.091) | (8.220) | (1.076) | (0.959) |  | 0.74\% |  |  |  |  |
| KMY_RW | -0.006 | 0.044 | 0.298 | 0.477*** | 0.186 | 0.056 | 59\% |  | 205 | 0.000 | 6.8\% | 84.4\% |
|  | (-0.162) | (0.489) | (1.154) | (9.095) | (0.511) | (0.511) |  | 0.73\% |  |  |  |  |
| GLS_RW | -0.005 | 0.111 | 0.528 | 0.404*** | 0.314 | 0.052 | 57.9\% |  | 205 | 0.000 | 7.5\% | 76.2\% |
|  | (-0.250) | (1.435) | (1.652) | (4.856) | (0.624) | (0.846) |  | 0.70\% |  |  |  |  |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_Anlst | -0.012 | 0.031 | 0.140 | 0.424*** | 0.388 | 0.071 | 60.2\% |  | 205 | 0.000 | 9.5\% | 44.2\% |
|  | (-0.687) | (0.215) | (0.992) | (10.428) | (1.357) | (1.152) |  | 0.64\% |  |  |  |  |
| PEG_Anlst | -0.022 | 0.144 | 0.110 | 0.456*** | 0.668 | 0.072 | 60\% |  | 205 | 0.005 | 8.2\% | 46.3\% |
|  | (-0.699) | (0.483) | (0.702) | (7.932) | (1.876) | (1.078) |  | 0.52\% |  |  |  |  |
| Carhart_Factor | -0.001 | -0.083 | 0.123 | 0.435*** | -1.637 | 0.027 | 59.4\% |  | 205 | 0.000 | 4.8\% | 38.1\% |
|  | (-0.084) | (-0.752) | (0.681) | (8.049) | (-2.073) | (0.304) |  | 0.50\% |  |  |  |  |
| DKL_Anlst | -0.031 | 0.278 | 0.335 | 0.444*** | -0.030 | 0.055 | 61.1\% |  | 205 | 0.008 | 14.3\% | 29.3\% |
|  | (-1.142) | (1.040) | (1.493) | (9.658) | (-0.032) | (0.777) |  | 0.42\% |  |  |  |  |
| FGHJ_HDZ | -0.007 | 0.151 | 0.215 | 0.484*** | $2.068^{* * *}$ | 0.063 | 59.8\% |  | 205 | 0.000 | 15.0\% | 59.9\% |
|  | (-0.397) | (1.386) | (1.812) | (8.399) | (4.053) | (0.922) |  | 0.38\% |  |  |  |  |
| HL_Anlst | -0.010 | 0.106 | 0.028 | 0.446*** | 0.698 | 0.015 | 60.9\% |  | 205 | 0.003 | 12.2\% | 28.6\% |
|  | (-0.328) | (0.358) | (0.083) | (9.536) | (1.590) | (0.230) |  | 0.33\% |  |  |  |  |
| DKL_RW | 0.048 | -0.121 | -0.403 | $0.511^{* * *}$ | 0.645 | -0.121 | 58.1\% |  | 205 | 0.000 | 7.5\% | 77.6\% |
|  | (0.657) | (-0.487) | (-0.436) | (6.194) | (0.719) | (-0.487) |  | 0.29\% |  |  |  |  |
| PEG_EP | -0.004 | 0.211 | 0.135 | $0.471^{* * *}$ | 1.530 | 0.091 | 60.3\% |  | 205 | 0.000 | 16.1\% | 80.4\% |
|  | (-0.239) | (1.713) | (0.778) | (8.138) | (1.582) | (1.256) |  | 0.25\% |  |  |  |  |
| KMY_EP | -0.008 | -0.066 | 0.255 | 0.406*** | 1.147 | 0.059 | 59.9\% |  | 205 | 0.000 | 14.4\% | 70.5\% |
|  | (-0.401) | (-0.229) | (1.458) | (11.459) | (1.292) | (1.015) |  | 0.24\% |  |  |  |  |
| GM_RW | -0.015 | 0.067 | 0.201 | 0.454*** | 0.831** | 0.089 | 60.1\% |  | 205 | 0.000 | 10.9\% | 81.6\% |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_EP | (-0.728) | (1.130) | (1.053) | (9.428) | (3.013) | (1.047) |  | 0.23\% |  |  |  |  |
|  | -0.013 | 0.091* | 0.130 | 0.416*** | 0.586* | 0.041 | 59.6\% |  | 205 | 0.000 | 12.9\% | 81.6\% |
|  | (-0.766) | (1.975) | (0.794) | (8.434) | (2.458) | (0.616) |  | 0.16\% |  |  |  |  |
| GLS_EP | -0.001 | 0.053 | 0.205 | 0.461 *** | 0.198 | 0.059 | 58.6\% |  | 205 | 0.000 | 12.9\% | 78.6\% |
|  | (-0.081) | (0.456) | (1.352) | (8.317) | (0.297) | (0.877) |  | 0.16\% |  |  |  |  |
| FPM_EP | 0.005 | 0.031 | -0.106 | 0.359*** | 0.044 | -0.055 | 60.2\% |  | 205 | 0.000 | 11.6\% | 79.6\% |
|  | (0.232) | (0.918) | (-0.388) | (11.214) | (0.204) | (-0.564) |  | 0.14\% |  |  |  |  |
| PE_RW | -0.004 | -0.087 | 0.219 | $0.411^{* * *}$ | 0.295 | 0.091 | 59.9\% |  | 205 | 0.000 | 8.8\% | 78.9\% |
|  | (-0.254) | (-0.685) | (1.775) | (8.808) | (1.505) | (1.538) |  | 0.13\% |  |  |  |  |
| TrES_RI_10Ind | $-0.007$ | $0.013$ | $0.049$ | $0.376 * * *$ | $0.002$ | -0.104 | 58.7\% |  | 205 | 0.000 | 8.2\% | 97.3\% |
|  | (-0.475) | (1.073) | (0.239) | (7.654) | (0.140) | (-0.866) |  | 0.12\% |  |  |  |  |
| FGHJ_Anlst | 0.030 | -0.174 | -0.003 | 0.437*** | 0.615 | -0.019 | 60.9\% |  | 205 | 0.017 | 17.0\% | 34.7\% |
|  | (0.458) | (-0.359) | (-0.010) | (9.627) | (1.200) | (-0.129) |  | 0.12\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.104 | -0.115 | -0.772 | 0.45*** | 0.182 | -1.237 | 58.4\% |  | 205 | 0.000 | 8.2\% | 98.6\% |
|  | (0.678) | (-0.705) | (-0.615) | (3.347) | (0.748) | (-0.714) |  | 0.12\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.000 | 0.089 | 0.085 | 0.434*** | -0.030 | -0.013 | 59\% |  | 205 | 0.000 | 6.8\% | 90.5\% |
|  | (-0.032) | (1.429) | (0.620) | (9.543) | (-0.615) | (-0.189) |  | 0.11\% |  |  |  |  |
| MPEG_RI | 0.000 | -0.021 | 0.197 | 0.426*** | 0.359 | 0.059 | 59.6\% |  | 205 | 0.000 | 9.5\% | 88.4\% |
|  | (-0.021) | (-0.283) | (1.910) | (9.788) | (1.810) | (0.880) |  | 0.10\% |  |  |  |  |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_Anlst | -0.027 | 0.144 | 0.133 | 0.475*** | 0.463 | 0.101 | 60.1\% |  | 205 | 0.000 | 15.0\% | 51.7\% |
|  | (-0.910) | (1.146) | (0.830) | (8.539) | (0.712) | (1.381) |  | 0.05\% |  |  |  |  |
| MPEG_RW |  | 0.055 |  | $0.484^{* * *}$ | 2.377 | 0.067 | 59.6\% |  | 205 | 0.000 | 8.8\% | 83.7\% |
|  | (-0.560) | (1.032) | (1.444) | (8.363) | (1.176) | (0.914) |  | 0.05\% |  |  |  |  |
| FGHJ_EP | -0.006 | 0.065 | 0.141 | 0.454*** | 0.129 | 0.086 | 58.6\% |  | 205 | 0.000 | 15.9\% | 81.9\% |
|  | (-0.353) | (0.656) | (1.038) | (8.064) | (0.235) | (1.220) |  | 0.05\% |  |  |  |  |
| PE_RI | 0.007 | 0.014 | 0.215 | $0.486 * * *$ |  |  | 60.1\% |  | 205 | 0.000 | 12.2\% | 78.2\% |
|  | (0.546) | (0.190) | (1.740) | (7.377) | (1.598) | (0.993) |  | 0.04\% |  |  |  |  |
| GLS_Anlst | 0.010 | -0.011 | 0.044 | $0.437 * * *$ | 0.895 | 0.014 | 60.8\% |  | 205 | 0.000 | 15.6\% | 35.4\% |
|  | (0.277) | (-0.042) |  |  |  | (0.133) |  | 0.02\% |  |  |  |  |
| GM_EP | -0.007 | 0.005 | 0.250 | $0.428 * * *$ | 0.882* | 0.042 | 59.5\% |  | 205 | 0.000 | 13.6\% | 77.6\% |
|  | (-0.376) | (0.045) | (1.871) | (8.147) | (2.516) | (0.689) |  | -0.11\% |  |  |  |  |
| GG_Anlst | -0.022 | 0.075 | -0.141 | 0.439*** | 0.138 | -0.019 | 59.8\% |  | 205 | 0.000 | 15.6\% | 76.2\% |
|  | (-0.909) | (1.128) | (-0.358) | (11.164) | (0.487) | (-0.260) |  | -0.18\% |  |  |  |  |
| FPM_HDZ | -0.014 | 0.081 | 0.387 | 0.435*** | 1.917 | 0.116 | 58.3\% |  | 205 | 0.000 | 7.5\% | 40.1\% |
|  | (-0.698) | (0.359) | (1.472) | (8.954) | (1.519) | (1.090) |  | -0.20\% |  |  |  |  |
| GLS_HDZ | 0.000 | 0.101 | 0.237* | 0.485*** | 1.905*** | 0.069 | 59.1\% |  | 205 | 0.000 | 11.6\% | 60.5\% |
|  | (0.000) | (1.082) | (2.063) | (8.491) | (3.799) | (1.020) |  | -0.23\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.005 | 0.001 | 0.170 | 0.356*** | 0.003 | -0.016 | 58.6\% |  | 205 | 0.000 | 6.1\% | 98.0\% |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RI | (0.477) | (0.188) | (1.585) | (11.631) | (0.172) | (-0.297) |  | -0.24\% |  |  |  |  |
|  | 0.007 | -0.011 | 0.153 | 0.483*** | 0.057 | 0.120 | 59.4\% |  | 205 | 0.000 | 9.0\% | 93.3\% |
|  | (0.373) | (-0.169) | (0.987) | (7.952) | (0.100) | (1.464) |  | -0.24\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.434 | -3.912 | -5.985 | 0.958 | 3.255 | -5.975 | 58.3\% |  | 205 | 0.346 | 4.1\% | 88.4\% |
|  | (0.767) | (-0.754) | (-0.724) | (1.326) | (0.767) | (-0.742) |  | -0.26\% |  |  |  |  |
| GM_RI | 0.001 | -0.024 | 0.110 | 0.429*** | 1.034 | 0.051 | 58.8\% |  | 205 | 0.000 | 8.8\% | 78.2\% |
|  | (0.038) | (-0.234) | (0.703) | (9.225) | (0.935) | (0.726) |  | -0.30\% |  |  |  |  |
| WNG_EP | -0.025 | 0.076 | 0.243 | 0.386*** | -0.159 | -0.001 | 59.3\% |  | 205 | 0.000 | 3.4\% | 95.9\% |
|  | (-1.092) | (0.832) | (1.577) | (7.824) | (-0.763) | (-0.020) |  | -0.32\% |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.005 | -0.006 | 0.104 | $0.414^{* * *}$ | 0.097 | 0.091 | 58.7\% |  | 205 | 0.000 | 4.8\% | 74.1\% |
|  | (0.453) | (-0.051) | (0.244) | (8.477) | (0.695) | (0.907) |  | -0.37\% |  |  |  |  |
| TrES_Anlst _10Ind | -0.003 | 0.019 | 0.187 | 0.36*** | -0.044 | -0.008 | 57.8\% |  | 205 | 0.000 | 6.8\% | 92.5\% |
|  | (-0.293) | (0.790) | (1.351) | (10.802) | (-1.425) | (-0.135) |  | -0.39\% |  |  |  |  |
| FGHJ_RI | -0.001 | 0.043 | 0.176 | $0.443 * * *$ | -0.166 | 0.074 | 58.9\% |  | 205 | 0.000 | 7.2\% | 84.1\% |
|  | (-0.073) | (0.526) | (1.360) | (8.582) | (-0.194) | (1.054) |  | -0.41\% |  |  |  |  |
| GLS_RI | -0.001 | 0.077 | 0.194 | $0.441^{* * *}$ | -0.296 | 0.069 | 58.9\% |  | 205 | 0.000 | 7.9\% | 83.6\% |
|  | (-0.109) | (1.095) | (1.554) | (8.640) | (-0.303) | (1.005) |  | -0.42\% |  |  |  |  |
| FPM_RI | 0.006 | -0.025 | 0.211 | 0.412*** | 0.144 | 0.046 | 58.1\% |  | 205 | 0.000 | 11.6\% | 83.0\% |
|  | (0.248) | (-0.365) | (1.550) | (9.838) | (0.702) | (0.673) |  | -0.46\% |  |  |  |  |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_RW | 0.004 | 0.000 | 0.133 | 0.358*** | -0.002 | -0.011 | 58.1\% |  | 205 | 0.000 | 2.1\% | 100.0\% |
|  | (0.315) | (0.017) | (1.061) | (11.978) | (-0.056) | (-0.222) |  | -0.47\% |  |  |  |  |
| TrES_RI_25SBM | -0.005 | -0.004 | 0.106 | 0.334*** | 0.004 | 0.087 | 57.9\% |  | 205 | 0.000 | 6.8\% | 98.6\% |
|  | (-0.438) | (-0.718) | (0.845) | (9.715) | (0.323) | (1.201) |  | -0.49\% |  |  |  |  |
| FPM_RW | 0.028 | 0.078 | 0.128 | 0.374*** | 0.026 | 0.043 | 58.1\% |  | 205 | 0.000 | 7.5\% | 80.3\% |
|  | (0.353) | (0.620) | (0.564) | (11.378) | (0.254) | (0.359) |  | -0.53\% |  |  |  |  |
| TrETSS_RW_25SBM | -0.006 | 0.022 | 0.173 | 0.387*** | 0.011 | 0.048 | 57.8\% |  | 205 | 0.000 | 5.4\% | 95.9\% |
|  | (-0.561) | (1.485) | (1.101) | (9.849) | (0.433) | (0.983) |  | -0.53\% |  |  |  |  |
| WNG_Anlst | 0.028 | -0.191 | -0.223 | 0.455*** | 0.617 | -0.136 | 57.1\% |  | 205 | 0.000 | 4.1\% | 94.6\% |
|  | (1.151) | (-1.131) | (-0.569) | (5.691) | (1.302) | (-0.741) |  | -0.56\% |  |  |  |  |
| PEG_HDZ | -0.006 | 0.067 | 0.168 | 0.443*** | 1.364** | 0.052 | 58.7\% |  | 205 | 0.000 | 10.2\% | 61.2\% |
|  | (-0.475) | (1.076) | (1.442) | (9.285) | (3.003) | (0.822) |  | -0.59\% |  |  |  |  |
| MPEG_HDZ | -0.011 | 0.037 | 0.161 | 0.44*** | $0.823^{* *}$ | 0.026 | 58.4\% |  | 205 | 0.000 | 8.2\% | 68.7\% |
|  | (-0.660) | (0.398) | (0.988) | (9.032) | (2.844) | (0.412) |  | -0.64\% |  |  |  |  |
| KMY_RI | 0.013 | -0.268 | 0.098 | 0.439*** | 0.410 | 0.010 | 57.9\% |  | 205 | 0.000 | 3.4\% | 76.9\% |
|  | (0.745) | (-0.800) | (0.487) | (8.056) | (1.519) | (0.099) |  | -0.66\% |  |  |  |  |
| HL_RI | -0.007 | 0.022 | 0.113 | 0.431*** | 0.129 | -0.044 | 57.8\% |  | 205 | 0.000 | 6.8\% | 89.8\% |
|  | (-0.355) | (0.182) | (0.577) | (7.443) | (1.081) | (-0.343) |  | -0.83\% |  |  |  |  |
| TrOHE_25SBM | 0.005 | 0.019 | 0.101 | 0.396*** | 0.016 | 0.029 | 57.1\% |  | 205 | 0.000 | 2.7\% | 83.0\% |

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Table 75 : Capturing Subsequent Return: High Price Momentum Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_HDZ | (0.487) | (0.539) | (0.748) | (10.568) | (0.459) | (0.509) |  | -0.97\% |  |  |  |  |
|  | -0.011 | 0.020 | 0.121 | 0.432*** | 1.953 | 0.048 | 58.1\% |  | 205 | 0.000 | 10.9\% | 57.1\% |
|  | (-0.721) | (0.204) | (0.722) | (9.053) | (1.706) | (0.711) |  | -1.01\% |  |  |  |  |
| DKL_RI | 0.003 | -0.064 | 0.087 | 0.401*** | 0.237 | -0.132 | 57.5\% |  | 205 | 0.000 | 7.5\% | 89.1\% |
|  | (0.195) | (-0.939) | (0.387) | (4.796) | (1.217) | (-0.573) |  | -1.04\% |  |  |  |  |
| WNG_RI | 0.000 | 0.005 | 0.142 | 0.363*** | 0.058 | 0.000 | 57.6\% |  | 205 | 0.000 | 2.7\% | 98.0\% |
|  | (-0.016) | (0.118) | (1.090) | (9.931) | (0.932) | (-0.003) |  | -1.05\% |  |  |  |  |
| WNG_HDZ | 0.015 | -0.112 | 0.331 | $0.358 * * *$ | -0.064 | -0.080 | 56.9\% |  | 205 | 0.000 | 2.7\% | 95.9\% |
|  | (0.490) | (-0.505) | (1.792) | (5.749) | (-0.509) | (-0.611) |  | -1.07\% |  |  |  |  |
| CT_RI | 0.007 | -0.126 | 0.200 | 0.47*** | -0.037 | 0.067 | 57.3\% |  | 205 | 0.000 | 2.8\% | 97.2\% |
|  | (0.527) | (-1.042) | (1.535) | (7.776) | (-0.131) | (1.110) |  | -1.21\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.024 | -0.053 | -0.158 | $0.412 * * *$ | -0.070 | -0.052 | 56.9\% |  | 205 | 0.000 | 2.7\% | 96.6\% |
|  | (1.453) | (-1.606) | (-0.383) | (10.736) | (-1.042) | (-0.449) |  | -1.21\% |  |  |  |  |
| TrETSS_RI_25SBM | -0.007 | 0.005 | 0.864 | 0.344*** | 0.038 | 0.195 | 56.7\% |  | 205 | 0.000 | 6.8\% | 96.6\% |
|  | (-0.404) | (0.129) | (0.874) | (7.864) | (1.238) | (0.973) |  | -1.31\% |  |  |  |  |

For the highest quartile of firms in terms of price momentum, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, \text { it }}=$ $\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much
of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_HDZ | 0.055 | -0.096 | 1.177 | 0.131 | 0.638 | -0.672 | 71.8\% | 11.47\% | 205 | 0.372 | $31.3 \%$ | 16.3\% |
|  | (0.388) | (-0.079) | (0.602) | (0.648) | (0.574) | (-0.493) |  |  |  |  |  |  |
| Naive | -0.002 | 0.085 | 0.304 | 0.251 *** | 0.056 | -0.101 | 73.4\% | 10.95\% | 205 | 0.000 | 35.0\% | 73.8\% |
|  | (-0.057) | (1.549) | (0.842) | (4.469) | (0.608) | (-0.386) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.050 | -0.028 | 0.877 | 0.157 | 0.124 | -0.566 | 72.7\% | 10.73\% | 205 | 0.000 | 31.3\% | 73.8\% |
|  | (0.414) | (-0.141) | (0.518) | (0.925) | (0.578) | (-0.442) |  |  |  |  |  |  |
| BP_Anlst | 0.082 | -0.194 | 1.442 | 0.111 | 1.670 | -1.163 | 73.7\% | 10.04\% | 205 | 0.473 | 35.0\% | 22.5\% |
|  | (0.475) | (-0.117) | (0.546) | (0.478) | (0.632) | (-0.556) |  |  |  |  |  |  |
| TPDPS_Anlst | -0.072 | 0.200 | -0.731 | 0.343* | -0.124 | 0.811 | 74.3\% | 10.01\% | 205 | 0.000 | 32.5\% | 75.0\% |
|  | (-0.697) | (1.083) | (-0.445) | (2.480) | (-0.382) | (0.573) |  |  |  |  |  |  |
| PE_EP | 0.077 | -0.018 | -0.192 | 0.271*** | -0.127 | -0.005 | 66\% | 8.91\% | 205 | 0.000 | 7.5\% | 71.3\% |
|  | (1.108) | (-0.214) | (-0.715) | (3.266) | (-0.217) | (-0.022) |  |  |  |  |  |  |
| TPDPS_RI | -0.010 | 0.049 | -0.183 | 0.296*** | 0.063 | 0.274 | 70.1\% | 8.15\% | 205 | 0.000 | 10.0\% | 78.8\% |
|  | (-0.246) | (0.781) | (-0.540) | (4.599) | (0.688) | (0.559) |  |  |  |  |  |  |
| TPDPS_RW | 0.218 | -0.573 | 3.927 | -0.191 | -0.257 | 0.612 | 70.3\% | 7.41\% | 205 | 0.147 | 20.0\% | 80.0\% |
|  | (0.640) | (-0.534) | (0.561) | (-0.238) | (-0.479) | (0.561) |  |  |  |  |  |  |
| WNG_Anlst | 0.028 | -0.197 | -0.345 | 0.281 *** | 0.475 | 0.280 | 64\% | 7.39\% | 205 | 0.032 | 3.8\% | 86.3\% |
|  | (0.803) | (-0.359) | (-0.766) | (4.273) | (0.449) | (0.443) |  |  |  |  |  |  |

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Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RW | 0.025 | 0.175 | 0.257 | 0.228*** | -0.014 | -0.020 | 69.1\% | 6.99\% | 205 | 0.000 | 17.5\% | 23.8\% |
|  | (0.940) | (0.790) | (0.962) | (4.575) | (-0.036) | (-0.100) |  |  |  |  |  |  |
| BP_RI | 0.006 | 0.294 | -0.337 | 0.202* | 0.116 | 0.132 | 68\% | 6.33\% | 205 | 0.001 | 17.5\% | 27.5\% |
|  | (0.165) | (1.413) | (-0.673) | (2.147) | (0.307) |  |  |  |  |  |  |  |
| TPDPS_EP | -0.009 | 0.111 | -0.605 | 0.262** | -0.233 | 0.123 | 68\% | 6.18\% | 205 | 0.000 | 13.8\% | 76.3\% |
|  | (-0.222) | (1.237) | (-0.549) | (2.582) | (-0.482) | (0.610) |  |  |  |  |  |  |
| PEG_EP | 0.167 | 0.044 | -1.001 | 0.346 | -1.360 | 0.213 | 65.3\% | 6.13\% | 205 | 0.000 | 5.6\% | 84.7\% |
|  | (0.662) | (0.553) | (-0.739) | (1.248) | (-0.468) |  |  |  |  |  |  |  |
| MPEG_HDZ | 0.028 | 0.006 | -0.073 | $0.28 * * *$ | 0.263 | 0.082 | 65.8\% | 6.07\% | 205 | 0.000 | 6.3\% | 53.8\% |
|  |  |  | (-0.240) |  |  |  |  |  |  |  |  |  |
| HL_HDZ | 0.026 | 0.133 | -0.316 | 0.232* | -0.709 | 0.012 | 65.8\% | 5.71\% | 205 | 0.000 | 7.5\% | 45.0\% |
|  | (0.631) | (0.768) | (-0.640) | (2.272) | (-0.473) | (0.039) |  |  |  |  |  |  |
| DKL_Anlst | -0.004 | 0.276 | 0.202 | $0.253 * * *$ | 0.581 | -0.045 | 63.8\% | 5.66\% | 205 | 0.184 | 16.3\% | 17.5\% |
|  | (-0.074) | (0.510) | (0.981) | (5.896) | (0.591) | (-0.372) |  |  |  |  |  |  |
| PE_RW | 0.030 | 0.088 | -0.215 | 0.24*** | 0.088 | -0.091 | 67.3\% | 5.17\% | 205 | 0.000 | 3.8\% | 75.0\% |
|  | (0.961) | (0.921) | (-1.255) | (5.010) | (0.503) | (-0.527) |  |  |  |  |  |  |
| KMY_RW | 0.038 | -0.203 | -0.875 | $0.314 * * *$ | 0.951 | 0.776 | 61.4\% | 5.12\% | 205 | 0.000 | 5.0\% | 51.3\% |
|  | (0.994) | (-0.862) | (-0.660) | (3.125) | (0.493) | (0.569) |  |  |  |  |  |  |
| HL_Anlst | -0.039 | 0.623 | 0.068 | 0.247*** | -0.288 | -0.042 | 63.3\% | 5.00\% | 205 | 0.323 | 12.5\% | 18.8\% |

[^29]Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_Anlst | (-0.909) | (1.642) | (0.424) | (5.999) | (-0.362) | (-0.323) |  |  |  |  |  |  |
|  | 0.023 | 0.042 | -0.055 | 0.259*** | -0.392 | 0.047 | 65.1\% | 4.87\% | 205 | 0.000 | 7.5\% | 35.0\% |
|  | (1.124) | (0.310) | (-0.278) | (5.984) | (-0.745) | (0.475) |  |  |  |  |  |  |
| KMY_Anlst | 0.025 | -0.011 | -0.182 | 0.271*** | 0.296 | -0.115 | 63.6\% | 4.66\% | 205 | 0.000 | 10.0\% | 38.8\% |
|  | (0.857) | (-0.083) | (-0.864) | (6.040) | (0.803) | (-0.901) |  |  |  |  |  |  |
| CT_Anlst | 0.002 | 0.170 | -0.022 | 0.277*** | 0.705 | -0.054 | 61.7\% | 4.56\% | 205 | 0.011 | 16.3\% | 26.3\% |
|  | (0.087) | (0.532) | (-0.091) | (6.065) | (1.308) | (-0.395) |  |  |  |  |  |  |
| MPEG_RI | 0.029 | 0.026 | -0.083 | $0.253 * * *$ | -0.951 | -0.094 | 61.8\% | 4.45\% | 205 | 0.000 | 8.8\% | 75.0\% |
|  | (0.702) | (0.387) | $(-0.262)$ | (4.806) | (-0.592) | (-0.420) |  |  |  |  |  |  |
| KMY_HDZ | 0.022 | -0.100 | 0.010 | 0.284*** | -0.293 | -0.068 | 66.2\% | 4.36\% | 205 | 0.001 | 10.0\% | 46.3\% |
|  | (0.728) | (-0.304) | (0.046) | (4.246) | (-0.272) | (-0.407) |  |  |  |  |  |  |
| GM_RW | 0.033 | -0.046 | -0.054 | $0.253 * * *$ | 0.930 | -0.039 | 66.7\% | 4.30\% | 205 | 0.000 | 4.0\% | 68.0\% |
|  | (1.347) | (-0.663) | (-0.295) | (5.169) | (0.747) | (-0.251) |  |  |  |  |  |  |
| WNG_RW | 0.027 | 0.000 | 0.121 | 0.206*** | 0.001 | 0.255 | 62\% | 4.07\% | 205 | 0.000 | 3.8\% | 93.8\% |
|  | (1.476) | (-1.377) | (0.484) | (5.010) | (0.023) | (0.702) |  |  |  |  |  |  |
| FGHJ_EP | 0.030 | 0.044 | -0.122 | $0.237 * * *$ | -18.846 | -0.064 | 66.5\% | 4.06\% | 205 | 0.000 | 4.2\% | 84.7\% |
|  | (1.184) | (0.402) | (-0.724) | (5.150) | (-0.542) | (-0.350) |  |  |  |  |  |  |
| GLS_EP | 0.033 | 0.038 | -0.135 | 0.239*** | 3.179 | -0.067 | 66.4\% | 4.05\% | 205 | 0.000 | 4.2\% | 86.1\% |
|  | (1.299) | (0.329) | (-0.791) | (5.178) | (0.290) | (-0.358) |  |  |  |  |  |  |

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Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_25SBM | 0.049* | -0.009 | -0.086 | 0.237*** | 0.010 | 0.020 | 62.7\% | 4.00\% | 205 | 0.000 | 3.8\% | 82.5\% |
|  | (2.316) | (-0.641) | (-0.498) | (5.529) | (0.947) | (0.226) |  |  |  |  |  |  |
| GM_Anlst | 0.008 | 0.115 | -0.659 | 0.237*** | -0.523 | -0.088 | 65.2\% | 3.97\% | 205 | 0.000 | 8.8\% | 25.0\% |
|  | (0.285) | (0.541) | (-0.655) | (3.621) | (-0.520) | (-0.545) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.004 | 0.059 | 0.017 | $0.239 * * *$ | -0.034 | 0.092 | 62.8\% | 3.91\% | 205 | 0.000 | 1.3\% | 87.5\% |
|  | (0.135) | (0.644) | (0.074) | (4.320) | (-0.295) | (0.558) |  |  |  |  |  |  |
| GM_EP | -0.002 | 0.019 | -0.070 | 0.235*** | 0.770 | -0.012 | 64.9\% | 3.82\% | 205 | 0.000 | 6.3\% | 68.8\% |
|  | (-0.069) | (0.329) | (-0.399) | (5.282) | (1.016) | (-0.063) |  |  |  |  |  |  |
| CT_RI | 0.054 | -0.026 | -0.172 | 0.25* | -0.361 | 0.416 | 65.2\% | 3.79\% | 205 | 0.000 | 3.8\% | 75.0\% |
|  | (0.828) | (-0.305) | (-0.645) | (2.561) | (-0.649) | (0.521) |  |  |  |  |  |  |
| CT_RW | 0.047 | -0.449 | -0.343 | 0.263*** | -0.198 | $0.000$ | 61.4\% | 3.69\% | 205 | 0.301 | 7.7\% | 66.2\% |
|  | (0.646) | (-0.323) | (-0.671) | (4.794) | (-0.103) | (0.000) |  |  |  |  |  |  |
| PEG_RI | 0.050 | -0.003 | -0.176 | 0.213* | -0.295 | -0.208 | 64.9\% | 3.64\% | 205 | 0.000 | 6.5\% | 80.5\% |
|  | (1.234) | (-0.075) | (-0.441) | (2.238) | (-0.518) | (-0.644) |  |  |  |  |  |  |
| HL_RW | 0.045 | -0.207 | -1.029 | 0.318*** | 0.918 | 0.826 | 61\% | 3.63\% | 205 | 0.000 | 5.1\% | 53.8\% |
|  | (0.914) | (-0.796) | (-0.745) | (3.109) | (0.469) | (0.598) |  |  |  |  |  |  |
| GM_HDZ | 0.026 | -0.062 | -0.006 | 0.263*** | 0.700 | 0.012 | 63.6\% | 3.57\% | 205 | 0.000 | 5.0\% | 48.8\% |
|  | (0.917) | (-0.466) | (-0.023) | (4.892) | (0.855) | (0.095) |  |  |  |  |  |  |
| FPM_RW | 0.042* | 0.059 | 0.016 | $0.241^{* * *}$ | -0.051 | -0.133 | 59.7\% | 3.54\% | 205 | 0.000 | 11.3\% | 52.5\% |

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Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | (2.079) | (0.800) | (0.114) | (5.499) | (-0.395) | (-0.628) |  |  |  |  |  |  |
|  | 0.022 | 0.011 | -0.200 | $0.271^{* * *}$ | 0.511 | 0.032 | 61.9\% | $3.52 \%$ | 205 | 0.000 | 6.3\% | 53.8\% |
|  | (0.920) | (0.117) | (-0.749) | (4.764) | (0.689) | (0.166) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.051 | 0.519 | -0.099 | $0.233 * * *$ | 0.042 | -0.035 | 63.9\% | 3.48\% | 205 | 0.158 | 11.3\% | 11.3\% |
|  | (-1.068) | (1.538) | (-0.284) | (5.246) | (0.059) | (-0.236) |  |  |  |  |  |  |
| MPEG_Anlst | 0.019 | 0.094 | -0.164 | $0.268 * * *$ | -0.197 | -0.032 | 61.4\% | $3.28 \%$ | 205 | 0.000 | 8.8\% | 27.5\% |
|  | (0.638) | (0.520) | (-0.663) | (5.511) | (-0.450) | (-0.278) |  |  |  |  |  |  |
| MPEG_EP | 0.015 | -0.014 | 0.017 | $0.231 * * *$ | 0.129 | -0.196 | 63.4\% | $3.14 \%$ | 205 | 0.000 | 6.3\% | 77.5\% |
|  | (0.470) | $(-0.346)$ | (0.099) | (5.181) | (0.643) | (-0.912) |  |  |  |  |  |  |
| KMY_RI | 0.027 | -0.022 | -0.071 | 0.222*** | 0.915 | -0.028 | 66.3\% | 3.08\% | 205 | 0.000 | 7.5\% | 60.0\% |
|  | (0.753) | (-0.308) | (-0.276) | (5.056) | (0.883) | (-0.193) |  |  |  |  |  |  |
| GG_EP | 0.029 | -0.010 | -0.065 | $0.259 * * *$ | 0.289 | -0.029 | 66.6\% | 2.93\% | 205 | 0.000 | 5.8\% | 63.8\% |
|  | (1.085) | (-0.058) | (-0.261) | (5.062) | (0.262) | (-0.235) |  |  |  |  |  |  |
| WNG_HDZ | $0.045^{* *}$ | 0.010 | 0.037 | $0.243 * * *$ | 0.017 | 0.067 | 62\% | 2.93\% | 205 | 0.000 | 6.3\% | 93.8\% |
|  | (2.859) | (0.711) | (0.272) | (5.603) | (0.067) | (0.804) |  |  |  |  |  |  |
| GLS_Anlst | -0.038 | 0.445 | -0.078 | $0.229 * * *$ | -0.173 | -0.058 | 63.7\% | 2.92\% | 205 | 0.102 | 10.0\% | 12.5\% |
|  | (-0.795) | (1.326) | (-0.230) | (5.141) | (-0.204) | (-0.402) |  |  |  |  |  |  |
| FGHJ_HDZ | 0.024 | -0.063 | 0.037 | 0.259*** | 11.649 | -0.265 | 63\% | 2.88\% | 205 | 0.001 | 0.0\% | 38.8\% |
|  | (0.700) | (-0.203) | (0.150) | (4.915) | (0.579) | (-0.837) |  |  |  |  |  |  |

Continued in next page...

Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RI_25SBM | 0.038 | -0.008 | -0.072 | 0.232*** | 0.003 | 0.036 | 63.4\% | 2.85\% | 205 | 0.000 | 3.8\% | 91.3\% |
|  | (1.944) | (-0.874) | (-0.342) | (5.641) | (0.415) | (0.357) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.019 | 0.060 | -0.341 | 0.192*** | -0.049 | -0.029 | 62.3\% | 2.84\% | 205 | 0.000 | 6.3\% | 86.3\% |
|  | (0.616) | (0.693) | (-0.423) | (3.979) | (-0.532) | (-0.195) |  |  |  |  |  |  |
| BP_EP | -0.001 | 0.347 | -0.216 | 0.189* | -0.142 | 0.016 | 64.5\% | 2.82\% | 205 | 0.001 | 12.5\% | 27.5\% |
|  | (-0.039) | (1.747) | (-0.468) | (2.044) | (-0.266) | (0.102) |  |  |  |  |  |  |
| FPM_EP | 0.092 | -0.129 | 0.211 | 0.274** | 0.234 | 0.154 | 64.8\% | 2.82\% | 205 | 0.000 | 1.3\% | 63.8\% |
|  | (0.784) | (-0.516) | (0.432) | (2.915) | (0.820) |  |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.025 | 0.029 | -0.033 | $0.242 * * *$ | -0.002 | 0.009 | 66.4\% | 2.81\% | 205 | 0.000 | 3.8\% | 78.8\% |
|  |  |  | (-0.220) |  | (-0.048) | (0.087) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.028 | -0.017 | -0.001 | 0.22*** | 0.010 | -0.010 | 59\% | 2.75\% | 205 | 0.000 | 5.0\% | 88.8\% |
|  | (0.841) | (-0.871) | (-0.005) | (5.338) | (0.216) | (-0.101) |  |  |  |  |  |  |
| CAPM_Factor | 0.663 | -42.536 | -0.115 | 0.226* | 55.005 | -0.110 | 64.9\% | 2.72\% | 205 | 0.606 | 11.3\% | 15.0\% |
|  | (0.535) | (-0.506) | (-0.292) | (2.411) | (0.389) | (-0.775) |  |  |  |  |  |  |
| CT_HDZ | -0.009 | 0.202 | 0.060 | 0.254*** | -0.509 | -0.001 | 62.6\% | 2.62\% | 205 | 0.000 | 11.3\% | 47.5\% |
|  | (-0.268) | (1.020) | (0.264) | (4.776) | (-0.372) | (-0.009) |  |  |  |  |  |  |
| GG_RI | 0.026 | 0.042 | -0.019 | $0.27 * * *$ | -0.253 | -0.097 | 66\% | 2.61\% | 205 | 0.000 | 10.1\% | 63.8\% |
|  | (1.122) | (0.386) | (-0.088) | (5.083) | (-0.450) | (-0.676) |  |  |  |  |  |  |
| DKL_RI | 0.012 | 0.023 | 0.055 | $0.245 * * *$ | -0.110 | 0.127 | 65.8\% | 2.42\% | 205 | 0.000 | 5.0\% | 62.5\% |

[^30]Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_RW | (0.361) | (0.413) | (0.283) | (5.540) | (-0.340) | (0.504) |  |  |  |  |  |  |
|  | 0.093 | -0.426 | -1.442 | $0.331 * *$ | 1.091 | 0.888 | 59.9\% | 2.40\% | 205 | 0.011 | 3.8\% | 52.6\% |
|  | (0.770) | (-0.781) | (-0.839) | (3.065) | (0.553) | (0.640) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.024 | -0.006 | 0.230 | 0.187*** | 0.036 | -0.022 | 62.3\% | 2.11\% | 205 | 0.000 | 6.3\% | 86.3\% |
|  | (1.100) | (-0.392) | (0.573) | (4.036) | (0.381) | (-0.198) |  |  |  |  |  |  |
| 5FF_Factor | 0.031 | 0.565 | -0.210 | 0.224* | 1.047 | -0.081 | 61.3\% | 2.07\% | 205 | 0.506 | 3.8\% | $11.3 \%$ |
|  | (0.970) | (0.869) | (-0.508) | (2.408) | (0.464) | (-0.283) |  |  |  |  |  |  |
| GLS_HDZ | 0.031 | 0.070 | -0.109 | 0.252*** | -4.673 | -0.054 | 62.6\% | 2.06\% | 205 | 0.000 | 1.3\% | $36.3 \%$ |
|  | (0.847) | (0.287) | (-0.538) | (4.232) | (-0.495) | (-0.317) |  |  |  |  |  |  |
| GG_RW | 0.024 | 0.003 | -0.054 | $0.248 * * *$ | 0.673 | -0.110 | 60\% | 2.05\% | 205 | 0.000 | 1.6\% | 57.1\% |
|  | (0.889) | (0.019) | (-0.319) | (4.496) | (0.704) | (-0.745) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.012 | 0.104 | 0.072 | 0.276*** | -0.201 | 0.184 | 59.1\% | 2.03\% | 205 | 0.000 | 2.5\% | 57.5\% |
|  | (0.463) | (1.095) | (0.379) | (5.246) | (-1.027) | (0.768) |  |  |  |  |  |  |
| PE_Anlst | -0.002 | 0.537 | -0.156 | $0.273 * * *$ | 1.148 | -0.130 | 64.1\% | 1.94\% | 205 | 0.290 | 8.8\% | 18.8\% |
|  | (-0.055) | (1.236) | (-0.544) | (5.077) | (1.043) | (-1.131) |  |  |  |  |  |  |
| PE_HDZ | -0.010 | 0.325 | 0.172 | $0.258 * * *$ | 0.897 | -0.081 | 63.8\% | 1.84\% | 205 | 0.047 | 1.3\% | 42.5\% |
|  | (-0.305) | (0.973) | (0.582) | (4.266) | (0.842) | (-0.462) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.047* | 0.021 | 0.052 | 0.259*** | 0.012 | 0.133 | 64.3\% | 1.78\% | 205 | 0.000 | 6.3\% | 85.0\% |
|  | (2.081) | (0.637) | (0.161) | (5.447) | (0.435) | (0.699) |  |  |  |  |  |  |

[^31]Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_RW | 0.038 | -0.105 | -0.810 | 0.31** | 0.792 | 0.832 | 60.3\% | 1.76\% | 205 | 0.000 | 2.6\% | 53.8\% |
|  | (0.840) | (-0.437) | (-0.606) | (3.052) | (0.402) | (0.604) |  |  |  |  |  |  |
| GLS_RI | 0.046 | 0.015 | -0.075 | 0.251 *** | 5.237 | -0.066 | 65.5\% | 1.72\% | 205 | 0.000 | 1.4\% | 88.7\% |
|  | (1.558) | (0.124) | (-0.438) | (4.940) | (0.328) | (-0.340) |  |  |  |  |  |  |
| 3FF_Factor | 0.018 | 0.198 | -0.101 | 0.214* | 0.418 | -0.081 | 60.5\% | 1.69\% | 205 | 0.379 | 6.3\% | 10.0\% |
|  | (0.412) | (0.219) | (-0.240) | (2.273) | (0.032) | (-0.618) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.025 | -0.015 | -0.197 | $0.267 * * *$ | 0.002 | 0.055 | 63.9\% | 1.64\% | 205 | 0.000 | 2.5\% | 52.5\% |
|  | (1.326) | (-0.167) | (-0.683) | (5.673) | (0.014) | (0.530) |  |  |  |  |  |  |
| FGHJ_RW | -0.005 | 0.175 | -0.214 | $0.25 * * *$ | 0.401 | 0.328 | 60.7\% | 1.60\% | 205 | 0.000 | 2.9\% | 68.1\% |
|  | (-0.094) | (0.848) | (-0.515) | (4.565) | (0.605) | (0.474) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.038 | 0.056 | -0.008 | 0.28*** | -0.126 | 0.079 | 63.3\% | 1.57\% | 205 | 0.000 | 7.5\% | 50.0\% |
|  | (1.517) | (0.582) | (-0.039) | (4.379) | (-1.022) | (0.759) |  |  |  |  |  |  |
| GG_Anlst | 0.032 | 0.023 | 0.494 | 0.235*** | -6.451 | -0.013 | 61.3\% | 1.55\% | 205 | 0.000 | 10.0\% | 72.5\% |
|  | (1.371) | (0.386) | (0.481) | (5.558) | (-0.549) | (-0.073) |  |  |  |  |  |  |
| HL_RI | 0.166 | -0.026 | 2.798 | 0.552 | -8.419 | -0.872 | 66.9\% | 1.51\% | 205 | 0.000 | 7.5\% | 67.5\% |
|  | (0.553) | (-0.261) | (0.567) | (0.921) | (-0.549) | (-0.551) |  |  |  |  |  |  |
| MPEG_RW | -0.213 | 0.105 | 1.091 | 0.107 | 1.635 | -0.437 | 65\% | 1.48\% | 205 | 0.002 | 4.1\% | 74.0\% |
|  | (-0.448) | (0.374) | (0.526) | (0.342) | (0.645) | (-0.513) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.041* | 0.012 | 0.306 | $0.257 * * *$ | -0.024 | 0.001 | 63.5\% | 1.34\% | 205 | 0.000 | 2.5\% | 87.5\% |

[^32]Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_EP | (2.148) | (0.351) | (0.561) | (5.514) | (-0.368) | (0.008) |  |  |  |  |  |  |
|  | 0.032 | -0.048 | -0.212 | $0.242 * * *$ | -0.040 | -0.079 | 62.8\% | 1.29\% | 205 | 0.000 | 1.3\% | 55.0\% |
|  | (1.134) | (-0.663) | (-1.003) | (6.155) | (-0.107) | (-0.541) |  |  |  |  |  |  |
| GG_HDZ | 0.008 | 0.077 | 0.117 | 0.244*** | 1.149 | -0.041 | 61.8\% | 1.26\% | 205 | 0.000 | 7.5\% | 31.3\% |
|  | (0.309) | (0.593) | (0.567) | (4.851) | (1.143) | (-0.343) |  |  |  |  |  |  |
| DKL_HDZ | 0.011 | 0.136 | -0.088 | 0.267*** | -0.030 | 0.044 | 62.8\% | 1.13\% | 205 | 0.000 | 6.3\% | 40.0\% |
|  | (0.368) | (0.652) | (-0.391) | (4.688) | (-0.044) | (0.171) |  |  |  |  |  |  |
| GM_RI | 0.014 | 0.057 | -0.022 | 0.286*** | -0.013 | 0.019 | 65.2\% | 1.07\% | 205 | 0.000 | 10.0\% | 71.3\% |
|  | (0.289) | (0.396) | (-0.072) | (5.109) | (-0.033) | (0.085) |  |  |  |  |  |  |
| FPM_RI | -0.008 | 0.025 | 0.047 | 0.226*** | 0.166 | -0.042 | 60.8\% | 1.04\% | 205 | 0.000 | 3.8\% | 55.0\% |
|  | (-0.276) | (0.656) | (0.447) | (4.501) | (1.450) | (-0.385) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.009 | 0.079 | 0.314 | 0.25*** | 0.001 | -0.079 | 59\% | 1.02\% | 205 | 0.000 | 5.0\% | 71.3\% |
|  | (0.335) | (1.117) | (0.596) | (4.706) | (0.006) | (-0.371) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.014 | 0.098 | -0.124 | 0.244*** | 0.033 | 0.027 | 61.2\% | 0.93\% | 205 | 0.000 | 2.5\% | 86.3\% |
|  | (0.626) | (0.690) | (-0.729) | (6.162) | (0.239) | (0.334) |  |  |  |  |  |  |
| FPM_Anlst | -0.039 | 0.741 | -0.001 | 0.253*** | -0.365 | -0.090 | 61.9\% | 0.61\% | 205 | 0.611 | 12.5\% | 11.3\% |
|  | (-0.713) | (1.463) | (-0.004) | (5.691) | (-0.510) | (-0.477) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | -0.066 | 0.097 | 0.669 | 0.133 | 0.893 | -0.826 | 57\% | 0.55\% | 205 | 0.000 | 0.0\% | 75.0\% |
|  | (-0.465) | (0.639) | (0.424) | (0.609) | (0.629) | (-0.618) |  |  |  |  |  |  |

[^33]Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_EP | 0.012 | 0.057 | -0.050 | 0.248*** | 0.367 | -0.101 | 61.7\% | 0.33\% | 205 | 0.000 | 2.5\% | 67.5\% |
|  | (0.394) | (0.954) | (-0.218) | (5.749) | (0.745) | (-0.333) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.028 | -0.003 | 0.017 | $0.221^{* * *}$ | -0.006 | -0.007 | 62.4\% | 0.32\% | 205 | 0.000 | 1.3\% | 93.8\% |
|  | (1.239) | (-0.280) | (0.120) | (5.679) | (-0.975) | (-0.093) |  |  |  |  |  |  |
| PEG_RW | 0.030 | -0.014 | -0.250 | 0.220 | 0.178 | 0.091 | 59.1\% | 0.22\% | 205 | 0.000 | 5.3\% | 100.0\% |
|  | (0.640) | (-0.237) | (-0.441) | (1.657) | (1.386) | (0.278) |  |  |  |  |  |  |
| DKL_EP | 0.028 | -0.016 | -0.143 | 0.245*** | -0.019 | -0.140 | 61\% | 0.16\% | 205 | 0.000 | 1.3\% | 67.5\% |
|  | (0.927) | (-0.266) | (-0.523) | (6.074) | (-0.048) | (-0.811) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.035 | -0.004 | -0.088 | 0.216*** | 0.005 | 0.020 | 60.8\% | 0.13\% | 205 | 0.000 | 3.8\% | 88.8\% |
|  | (1.622) | (-0.239) | (-0.495) | (4.930) | (0.437) | (0.193) |  |  |  |  |  |  |
| HL_EP | 0.035 | -0.033 | -0.041 | $0.243 * * *$ | 0.214 | -0.173 | 61.9\% | 0.01\% | 205 | 0.000 | 0.0\% | 73.8\% |
|  | (1.147) | (-0.579) | (-0.237) | (6.051) | (0.490) | (-0.890) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.016 | 0.171 | -0.158 | 0.306*** | -3.195 | 0.165 | 60.8\% | 0.01\% | 205 | 0.053 | 6.3\% | 55.7\% |
|  | (0.311) | (0.405) | (-0.618) | (3.901) | (-0.693) | (1.110) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.019 | -0.153 | -0.053 | 0.215** | 0.218 | -0.063 | 59.9\% | -0.08\% | 205 | 0.000 | 0.0\% | 76.3\% |
|  | (0.396) | (-0.623) | (-0.068) | (2.584) | (0.568) | (-0.304) |  |  |  |  |  |  |
| TrES_Anlst _10Ind | 0.045 | -0.031 | -0.476 | 0.282*** | 0.012 | -0.297 | 58.2\% | -0.46\% | 205 | 0.000 | 1.3\% | 75.0\% |
|  | (1.366) | (-0.276) | (-0.554) | (3.533) | (0.190) | (-0.568) |  |  |  |  |  |  |
| FPM_HDZ | -0.020 | 0.259 | 0.038 | 0.28*** | 0.323 | -0.023 | 62.8\% | -0.62\% | 205 | 0.000 | 5.0\% | 31.3\% |

[^34]Table 76 : Capturing Subsequent Return: Low Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | (-0.636) | (1.380) | (0.192) | (4.663) | (0.451) | (-0.152) |  |  |  |  |  |  |
|  | 0.031 | 0.029 | -0.069 | $0.242^{* * *}$ | 0.343 | -0.037 | 61.7\% | -0.96\% | 205 | 0.000 | 3.8\% | 78.8\% |
|  | (1.251) | (0.396) | (-0.453) | (4.981) | (1.536) | $(-0.299)$ |  |  |  |  |  |  |
| WNG_RI | 0.032 | 0.001 | 0.162 | 0.218*** | 0.100 | 0.028 | 57.8\% | -1.30\% | 205 | 0.000 | 2.5\% | 93.8\% |
|  | (1.627) | (0.759) | (0.930) | (4.244) | (0.504) | (0.301) |  |  |  |  |  |  |
| FGHJ_RI | 0.043 | 0.031 | -0.079 | 0.254*** | -8.645 | 0.010 | 61.8\% | -1.34\% | 205 | 0.000 | 2.8\% | 84.5\% |
|  | (1.350) | (0.277) | (-0.428) | (4.734) | (-0.600) | (0.072) |  |  |  |  |  |  |
| Carhart_Factor | 0.049 | -0.206 | -0.192 | 0.233* | 4.441 | -0.230 | 59.4\% | -1.86\% | 205 | 0.010 | 3.8\% | 8.8\% |
|  | (1.250) | (-0.454) | (-0.472) | (2.263) | (0.283) | (-0.985) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.052 | -0.244 | -0.162 | 0.24*** | 0.028 | -0.233 | 60.3\% | -2.40\% | 205 | 0.133 | 6.3\% | 35.0\% |
|  | (0.742) | (-0.298) | (-0.680) | (4.507) | (0.022) | (-0.626) |  |  |  |  |  |  |
| WNG_EP | 0.044* | 0.005 | -0.137 | $0.216^{* * *}$ | -0.051 | 0.301 | 60.7\% | -3.29\% | 205 | 0.000 | 0.0\% | 86.3\% |
|  | (2.221) | (0.092) | (-0.602) | (5.483) | (-0.574) | (0.673) |  |  |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.003 | 0.112 | -0.035 | 0.28*** | -2.383 | -0.148 | 55.7\% | -4.57\% | 205 | 0.000 | 0.0\% | 31.3\% |
|  | (0.134) | (0.615) | (-0.102) | (5.848) | (-0.538) | (-0.884) |  |  |  |  |  |  |

For the lowest quartile of firms in terms of Long-term forecasted growth in earnings, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it
represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.038 | 0.103* | -0.721 | 0.534*** | 0.362 | -1.650 | 66\% |  | 205 | 0.000 | 44.2\% | 95.3\% |
|  | (0.514) | (2.023) | (-0.817) | (7.687) | (0.850) | (-0.800) |  | 7.58\% |  |  |  |  |
| Naive | 0.011 | 0.113*** | -0.868 | 0.532*** | 0.164 | -0.772 | 65.9\% |  | 205 | 0.000 | 43.0\% | 95.3\% |
|  | (0.266) | (3.272) | (-0.819) | (8.051) | (0.818) | (-0.787) |  | 7.27\% |  |  |  |  |
| BP_HDZ | 0.113 | 3.539 | 17.164 | 0.130 | 8.975 | -1.477 | 65.2\% |  | 205 | 0.424 | 51.7\% | 39.0\% |
|  | (0.752) | (1.116) | (0.821) | (0.309) | (0.883) | (-0.984) |  | 6.40\% |  |  |  |  |
| TPDPS_HDZ | 0.006 | 0.116*** | -0.932 | 0.508*** | 0.097 | -0.581 | 65.6\% |  | 205 | 0.000 | 43.6\% | 93.6\% |
|  | (0.179) | (3.227) | (-0.711) | (9.526) | (0.540) | (-0.751) |  | 6.39\% |  |  |  |  |
| TPDPS_RI | 0.036 | 0.098*** | 0.029 | 0.42*** | 0.169 | -0.829 | 64.8\% |  | 205 | 0.000 | 39.5\% | 95.9\% |
|  | (0.911) | (3.664) | (0.031) | (4.719) | (0.921) | (-0.885) |  | 6.21\% |  |  |  |  |
| TPDPS_EP | 0.036 | 0.069* | -0.455 | 0.428*** | 0.132 | -0.836 | 65\% |  | 205 | 0.000 | 34.9\% | 95.3\% |
|  | (0.861) | (1.965) | (-0.317) | (4.622) | (0.618) | (-0.841) |  | 6.09\% |  |  |  |  |
| BP_RW | 0.005 | 0.408 | -0.930 | $0.487 * * *$ | 0.268 | -0.286 | 64.2\% |  | 205 | 0.009 | 40.7\% | 48.8\% |
|  | (0.260) | (1.815) | (-0.645) | (10.701) | (0.286) | (-0.633) |  | 5.77\% |  |  |  |  |
| PE_EP | -0.004 | 0.646* | 0.046 | 0.456*** | -1.186 | 0.048 | 63.8\% |  | 205 | 0.231 | 23.3\% | 78.5\% |
|  | (-0.228) | (2.194) | (0.158) | (7.406) | (-0.692) | (0.349) |  | 5.50\% |  |  |  |  |
| BP_Anlst | -0.110 | -1.291 | -14.571 | 0.79* | -6.363 | 0.702 | 65.4\% |  | 205 | 0.419 | 52.9\% | 40.1\% |
|  | (-0.868) | (-0.456) | (-0.791) | (2.080) | (-0.719) | (0.549) |  | 5.33\% |  |  |  |  |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_HDZ | 0.011 | 0.336* | 0.228 | 0.468*** | $3.355 * * *$ | -0.155 | 63.4\% |  | 205 | 0.000 | 25.0\% | 58.7\% |
|  | (0.673) | (2.194) | (0.754) | (9.992) | (3.203) | (-0.806) |  | 5.22\% |  |  |  |  |
| GG_Anlst | 0.147 | -0.007 | 1.257 | 0.446* | 5.788 | -3.664 | 61.6\% |  | 205 | 0.000 | 19.2\% | 79.1\% |
|  | (0.962) | (-0.071) | (0.704) | (2.510) | (1.107) | (-0.901) |  | 5.05\% |  |  |  |  |
| BP_EP | -0.088 | -1.250 | -12.706 | 0.724* | -5.494 | 0.523 | 64.2\% |  | 205 | 0.351 | 43.0\% | 43.0\% |
|  | (-0.763) | (-0.520) | (-0.789) | (2.165) | (-0.700) | (0.473) |  | 4.97\% |  |  |  |  |
| FPM_Anlst | -0.175 | -0.117 | -3.803 | 0.975 | 13.516 | 1.829 | 62.7\% |  | 205 | 0.361 | 21.5\% | 29.1\% |
|  | (-1.036) | (-0.096) | (-0.725) | (1.512) | (0.884) | (0.743) |  | 4.97\% |  |  |  |  |
| CT_Anlst | -0.044 | 0.519* | -0.853 | $0.575 * * *$ | -1.381 | 0.030 | 63\% |  | 205 | 0.030 | 25.0\% | 38.4\% |
|  | (-1.136) | (2.360) | (-0.739) | (4.076) | (-0.727) | (0.174) |  | 4.96\% |  |  |  |  |
| DKL_HDZ | -0.028 | 0.569 | 0.299 | 0.453*** | 1.653 | -0.051 | 63\% |  | 205 | 0.242 | 19.8\% | 68.0\% |
|  | (-0.703) | (1.547) | (0.450) | (7.667) | (1.085) | (-0.249) |  | 4.80\% |  |  |  |  |
| BP_RI | -0.002 | $0.608^{* * *}$ | -0.581 | $0.475 * * *$ | 0.400 | -0.257 | 63.8\% |  | 205 | 0.024 | 41.9\% | 43.0\% |
|  | (-0.101) | (3.530) | (-0.527) | (11.927) | (0.512) | (-0.607) |  | 4.78\% |  |  |  |  |
| TPDPS_RW | -0.028 | 0.071*** | -0.904 | 0.572*** | 0.001 | 0.472 | 63.9\% |  | 205 | 0.000 | 30.8\% | 95.3\% |
|  | (-0.798) | (3.229) | (-0.788) | (3.353) | (0.015) | (1.085) |  | 4.78\% |  |  |  |  |
| GG_RW | 0.012 | 0.291 | 0.213 | $0.461^{* * *}$ | 1.473 | -0.159 | 61.7\% |  | 205 | 0.000 | 23.1\% | 65.6\% |
|  | (0.732) | (1.883) | (0.713) | (9.622) | (0.840) | (-0.746) |  | 4.74\% |  |  |  |  |
| FGHJ_HDZ | -0.008 | $0.421 * *$ | -0.004 | $0.445^{* * *}$ | $2.507 * * *$ | -0.277 | 62.7\% |  | 205 | 0.000 | 15.7\% | 69.2\% |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | (-0.440) | (2.680) | (-0.013) | (12.558) | (4.191) | (-2.060) |  | 4.64\% |  |  |  |  |
|  | 0.016 | 0.295 | 0.372 | 0.435*** | -2.003 | 0.056 | 63.1\% |  | 205 | 0.001 | 19.2\% | 79.1\% |
|  | (1.168) | (1.416) | (0.877) | (10.187) | (-0.564) | (0.232) |  | 4.54\% |  |  |  |  |
| GM_HDZ | -0.013 | 0.371 | -1.957 | $0.539^{* * *}$ | 0.149 | -0.076 | 62.4\% |  | 205 | 0.019 | 15.1\% | 70.3\% |
|  | (-0.355) | (1.395) | (-0.748) | (5.695) | (0.088) | (-0.718) |  | 4.47\% |  |  |  |  |
| GLS_Anlst | -0.006 | 0.363 | 0.526 | 0.481*** | 1.937 | -0.136 | 62.1\% |  | 205 | 0.068 | 23.3\% | 43.6\% |
|  | (-0.162) | (1.047) | (0.580) | (7.056) | (1.569) | (-0.757) |  | 4.35\% |  |  |  |  |
| CT_RI | 0.019 | 0.406 | 0.521 | 0.348*** | -0.628 | 0.265 | 60.7\% |  | 205 | 0.040 | 5.3\% | 92.3\% |
|  | (0.628) | (1.418) | (1.000) | (4.009) | (-0.885) | (1.192) |  | 4.25\% |  |  |  |  |
| CT_HDZ | 0.020 | 0.088 | 0.219 | 0.471*** | 1.233 | -0.114 | 62.5\% |  | 205 | 0.000 | 22.1\% | 71.5\% |
|  | (1.457) | (0.638) | (0.529) | (11.228) | (1.216) | (-0.681) |  | 4.23\% |  |  |  |  |
| PE_Anlst | -0.001 | 0.441 | 0.633 | 0.436*** | 1.112 | 0.097 | 63.8\% |  | 205 | 0.237 | 36.6\% | 34.9\% |
|  | (-0.027) | (0.939) | (0.878) | (8.984) | (0.719) | (0.369) |  | 4.17\% |  |  |  |  |
| TrES_RW_10Ind | 0.224 | -0.335 | -0.115 | 0.552*** | 59.500 | -3.033 | 61.1\% |  | 205 | 0.585 | 16.3\% | 89.0\% |
|  | (0.959) | (-0.137) | (-0.417) | (4.340) | (0.900) | (-0.817) |  | 4.13\% |  |  |  |  |
| GM_Anlst | -0.052 | 0.746*** | 0.314 | 0.476*** | 0.295 | 0.069 | 63.3\% |  | 205 | 0.266 | 25.6\% | 46.5\% |
|  | (-1.577) | (3.274) | (1.418) | (8.174) | (0.552) | (0.441) |  | 4.10\% |  |  |  |  |
| GG_EP | -0.016 | 0.623 | -0.373 | 0.473*** | -3.476 | 0.141 | 62.4\% |  | 205 | 0.739 | 19.9\% | 70.8\% |
|  | (-0.955) | (0.551) | (-1.157) | (9.266) | (-1.030) | (0.309) |  | 4.05\% |  |  |  |  |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_HDZ | 0.016 | 0.207 | 0.616 | $0.459 * * *$ | 2.468* | -0.227 | 62.8\% |  | 205 | 0.000 | 21.5\% | 70.3\% |
|  | (0.912) | (1.604) | (0.768) | (10.147) | (2.125) | (-1.744) |  | 3.79\% |  |  |  |  |
| KMY_HDZ | 0.016 | 0.175 | 0.250 | $0.483 * * *$ | 2.416** | -0.230 | 62.7\% |  | 205 | 0.000 | 20.3\% | 64.5\% |
|  | (1.051) | (1.147) | (0.574) | (10.442) | (2.845) | (-1.733) |  | 3.69\% |  |  |  |  |
| GLS_HDZ | -0.014 | 0.466* | -0.009 | $0.445^{* * *}$ | $2.215 * * *$ | -0.242 | 62.7\% |  | 205 | 0.007 | 17.4\% | 63.4\% |
|  | (-0.669) | (2.382) | (-0.026) | (11.657) | (4.203) | (-1.731) |  | 3.67\% |  |  |  |  |
| HL_Anlst | -0.048 | 0.791*** |  | 0.481 *** | 0.457 | -0.009 | 63.2\% |  | 205 | 0.362 | 24.4\% | 42.4\% |
|  | (-1.708) | (3.459) | (1.534) | (8.121) | (0.865) | (-0.069) |  | 3.62\% |  |  |  |  |
| TrOHE_10Ind | 0.007 | 0.361 | 0.037 | $0.452 * * *$ | -2.694 | 0.293 | 60.3\% |  | 205 | 0.261 | 9.3\% | 57.6\% |
|  |  | (0.639) |  |  | (-1.057) |  |  | 3.50\% |  |  |  |  |
| CAPM_Factor | -0.084 | $5.906$ | 0.474 | 0.369*** | 9.892 | 0.459 | 60.8\% |  | 205 | 0.644 | 11.6\% | 16.9\% |
|  | (-0.542) | (0.558) | (1.375) | (8.009) | (0.787) | (0.908) |  | 3.49\% |  |  |  |  |
| DKL_Anlst | -0.049 | 0.782 *** | 0.315 | $0.462 * * *$ | 0.559 | -0.019 | 63.2\% |  | 205 | 0.331 | 26.2\% | 39.5\% |
|  | (-1.741) | (3.494) | (1.272) | (7.722) | (0.893) | (-0.125) |  | 3.48\% |  |  |  |  |
| WNG_RI | 0.036*** | -0.066 | 0.072 | 0.382*** | -0.070 | 0.073 | 61.9\% |  | 205 | 0.000 | 4.7\% | 94.8\% |
|  | (3.449) | (-1.059) | (0.447) | (11.625) | (-0.377) | (0.637) |  | 3.47\% |  |  |  |  |
| MPEG_Anlst | -0.061 | 0.846*** | 0.184 | $0.475 * * *$ | 0.748 | -0.180 | 63.2\% |  | 205 | 0.563 | 21.5\% | 55.2\% |
|  | (-1.933) | (3.185) | (1.516) | (9.756) | (1.061) | (-0.904) |  | 3.46\% |  |  |  |  |
| FPM_RW | 0.029 | 0.021 | 0.180 | 0.376*** | 0.115 | 0.035 | 60.1\% |  | 205 | 0.000 | 6.4\% | 82.6\% |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RI_10Ind | (1.184) | (0.680) | (0.741) | (6.531) | (0.711) | (0.351) |  | 3.38\% |  |  |  |  |
|  | 0.035 | -0.011 | 0.068 | 0.401*** | 0.048 | 0.074 | 60.8\% |  | 205 | 0.000 | 13.4\% | 96.5\% |
|  | (1.803) | (-0.330) | (0.649) | (14.678) | (0.571) | (0.622) |  | 3.36\% |  |  |  |  |
| PE_HDZ | 0.038 | 0.206 | 0.829 | 0.497*** | 1.741* | 0.535 | 62.6\% |  | 205 | 0.084 | 22.1\% | 61.0\% |
|  | (0.854) | (0.452) | (0.814) | (8.354) | (2.439) | (0.714) |  | 3.33\% |  |  |  |  |
| FGHJ_Anlst | 0.004 | 0.302 | 1.023 | 0.467*** | 2.537 | -0.135 | 61.9\% |  | 205 | 0.047 | 21.5\% | 42.4\% |
|  | (0.108) | (0.865) |  | (7.083) | (1.281) | (-1.061) |  | 3.24\% |  |  |  |  |
| KMY_Anlst | -0.068 | 0.325 | -0.042 | 0.531*** | -0.102 | 0.159 | 62.6\% |  | 205 | 0.037 | 20.9\% | 70.9\% |
|  | (-0.840) | (1.013) | (-0.120) | (8.562) | (-0.180) | (0.907) |  | 3.24\% |  |  |  |  |
| TrES_Anlst_10Ind | -21.516 | 50.028 | -4.201 | -3.475 | -12.079 | 131.374 | 60.7\% |  | 205 | 0.430 | 11.0\% | 93.6\% |
|  | (-0.807) | (0.807) | (-0.799) | (-0.721) | (-0.813) | (0.808) |  | $3.21 \%$ |  |  |  |  |
| TrES_EP_10Ind | 0.037 | -0.001 | 0.700 | 0.353*** | 0.053 | 0.100 | 61.5\% |  | 205 | 0.000 | 11.6\% | 96.5\% |
|  | (1.068) | (-0.041) | (1.012) | (3.472) | (0.669) | (0.664) |  | 3.01\% |  |  |  |  |
| FPM_RI | 0.040 | -0.230 | 0.774 | 0.343*** | 0.237 | -0.034 | 60\% |  | 205 | 0.000 | 11.0\% | 84.3\% |
|  | (1.863) | (-0.992) | (1.082) | (3.689) | (0.736) | (-0.327) |  | 2.85\% |  |  |  |  |
| PE_RW | 0.031 | 0.116 | 0.087 | 0.443*** | -0.383 | -0.011 | 61.2\% |  | 205 | 0.002 | 5.8\% | 86.6\% |
|  | (1.008) | (0.422) | (0.275) | (7.375) | (-0.989) | (-0.071) |  | 2.83\% |  |  |  |  |
| KMY_EP | -0.008 | 0.239*** | 0.263 | $0.419 * * *$ | 0.416* | 0.038 | 61.7\% |  | 205 | 0.000 | 21.5\% | 72.1\% |
|  | (-0.562) | (3.616) | (1.133) | (8.689) | (2.140) | (0.278) |  | 2.80\% |  |  |  |  |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_HDZ_25SBM | -0.006 | -0.003 | -0.551 | 0.544** | -0.010 | 0.714 | 59.7\% |  | 205 | 0.000 | 8.7\% | 93.0\% |
|  | (-0.121) | (-0.100) | (-0.385) | (3.054) | (-0.570) | (0.819) |  | 2.71\% |  |  |  |  |
| TrETSS_Anlst_10Ind | -0.001 | -0.499 | 0.023 | 0.446*** | 0.012 | 0.482 | 60.8\% |  | 205 | 0.024 | 11.0\% | 76.2\% |
|  | (-0.036) | (-0.760) | (0.198) | (10.207) | (0.066) | (1.035) |  | 2.71\% |  |  |  |  |
| Carhart_Factor | 0.087 | -2.121 | -1.634 | 0.439*** | -3.699 | -0.464 | 60.3\% |  | 205 | 0.223 | 8.1\% | 48.3\% |
|  | (1.442) | (-0.831) | (-0.890) | (9.090) | (-0.826) | (-1.641) |  | 2.54\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.051** | -0.010 | -0.017 | 0.407*** | -0.006 | 0.054 | 61.1\% |  | 205 | 0.000 | 5.8\% | 96.5\% |
|  | (2.944) | (-0.804) | (-0.077) | (12.136) | (-0.289) | (0.255) |  | 2.51\% |  |  |  |  |
| GLS_RI | 0.011 | 0.146 | 0.254 | 0.43*** | -7.008 | -0.059 | 62.4\% |  | 205 | 0.000 | 18.6\% | 78.5\% |
|  | (0.667) | (0.622) | (0.891) | (10.078) | (-1.019) | (-0.372) |  | 2.51\% |  |  |  |  |
| PEG_Anlst | 0.002 | 0.426* | 0.228 | 0.466*** | 0.996 | -0.262 | 62.6\% |  | 205 | 0.001 | 15.7\% | 61.0\% |
|  | (0.071) | (2.408) | (0.888) | (10.646) | (0.947) | (-0.923) |  | 2.45\% |  |  |  |  |
| GG_RI | 0.010 | 0.241 | 0.213 | 0.448*** | 1.654 | -0.028 | 61.6\% |  | 205 | 0.008 | 15.6\% | 66.9\% |
|  | (0.829) | (0.850) | (0.789) | (11.813) | (1.718) | (-0.127) |  | 2.45\% |  |  |  |  |
| PEG_HDZ | 0.035* | -0.138 | 0.418 | 0.471*** | 1.57* | -0.157 | 62.5\% |  | 205 | 0.000 | 14.0\% | 73.3\% |
|  | (2.380) | (-0.705) | (0.612) | (8.621) | (2.215) | (-1.279) |  | 2.44\% |  |  |  |  |
| HL_EP | 0.007 | 0.054 | 0.337 | 0.428*** | 0.423* | 0.017 | 61.6\% |  | 205 | 0.000 | 20.9\% | 76.2\% |
|  | (0.282) | (0.322) | (1.254) | (10.210) | (2.127) | (0.110) |  | 2.40\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.040 | -0.013 | 0.436 | 0.417*** | 0.033 | 0.167 | 60.2\% |  | 205 | 0.000 | 9.3\% | 93.0\% |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_EP | (1.219) | (-0.555) | (1.384) | (8.796) | (0.764) | (0.395) |  | 2.37\% |  |  |  |  |
|  | -0.039 | 0.501 | -0.080 | 0.439*** | 0.101 | 0.111 | 61.6\% |  | 205 | 0.131 | 19.8\% | 74.4\% |
|  | (-1.068) | (1.522) | (-0.240) | (10.209) | (0.301) | (0.629) |  | 2.32\% |  |  |  |  |
| PEG_RI | 0.021 | -0.008 | 0.318 | 0.449*** | $0.696 * * *$ | 0.015 | 61.4\% |  | 205 | 0.000 | 11.8\% | 92.1\% |
|  | (1.287) | (-0.080) | (0.775) | (7.772) | (4.095) | (0.141) |  | 2.27\% |  |  |  |  |
| GLS_EP | 0.022 | -0.188 | -0.035 | $0.449 * * *$ | -2.334 | 0.161 | 61.5\% |  | 205 | 0.025 | 15.1\% | 74.4\% |
|  | (0.834) | (-0.358) | (-0.266) | (14.552) | (-0.622) | (0.358) |  | 2.25\% |  |  |  |  |
| MPEG_HDZ | 0.031 | 0.020 | 0.717 | 0.44*** | 1.431* | -0.138 | 63\% |  | 205 | 0.000 | 17.4\% | 75.0\% |
|  | (1.853) | (0.201) | (0.879) | (10.211) | (2.217) | (-1.289) |  | 2.22\% |  |  |  |  |
| CT_RW | -0.006 | 0.321 | 0.037 | 0.473*** | -0.701 | -0.066 | 62.2\% |  | 205 | 0.000 | 17.1\% | 79.3\% |
|  | (-0.403) | (1.694) | (0.139) | (10.567) | (-0.353) | (-0.197) |  | 2.15\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.109 | -0.211 | -0.170 | 0.484*** | 0.280 | -0.541 | 59.7\% |  | 205 | 0.000 | 3.5\% | 92.4\% |
|  | (1.399) | (-1.255) | (-0.646) | (9.314) | (1.183) | (-0.815) |  | 2.14\% |  |  |  |  |
| MPEG_EP | 0.001 | -0.073 | -0.434 | 0.513*** | $1.427 * * *$ | -0.161 | 62.4\% |  | 205 | 0.000 | 18.6\% | 82.6\% |
|  | (0.018) | (-0.930) | (-0.566) | (8.858) | (3.107) | (-0.533) |  | 2.12\% |  |  |  |  |
| FGHJ_EP | 0.030 | -0.231 | -0.024 | 0.446*** | 70.367 | 0.130 | 61.6\% |  | 205 | 0.018 | 13.5\% | 79.5\% |
|  | (1.021) | (-0.448) | (-0.195) | (14.761) | (0.701) | (0.341) |  | 2.09\% |  |  |  |  |
| WNG_Anlst | 0.048* | 0.067 | 0.574 | 0.411*** | 0.623 | -0.235 | 59.4\% |  | 205 | 0.000 | 4.7\% | 96.5\% |
|  | (2.191) | (0.898) | (1.053) | (5.136) | (1.591) | (-1.498) |  | 2.05\% |  |  |  |  |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_25SBM | 0.041*** | 0.014 | 0.563 | 0.404*** | -0.007 | 0.004 | 60.1\% |  | 205 | 0.000 | 5.8\% | 95.9\% |
|  | (4.006) | (1.083) | (0.778) | (10.903) | (-0.897) | (0.039) |  | 2.02\% |  |  |  |  |
| FPM_HDZ | 14.128 | -19.948 | $-18.641$ | 16.547 | 3959.718 | -520.305 | 61.3\% |  | 205 | 0.405 | 18.0\% | 47.7\% |
|  | (0.807) | (-0.796) | (-0.810) | (0.829) | (0.807) | (-0.807) |  | 2.02\% |  |  |  |  |
| CT_EP | -0.004 | 0.300 | 0.358 | $0.422^{* * *}$ | 1.656* | 0.003 | 61.2\% |  | 205 | 0.000 | 18.0\% | 79.1\% |
|  | (-0.165) | (1.777) | (1.260) | (9.861) | (1.965) | (0.011) |  | 1.96\% |  |  |  |  |
| GM_EP | 0.005 | 0.091 | 0.020 | 0.442*** | 1.76** | 0.058 | 62.2\% |  | 205 | 0.000 | 20.9\% | 78.5\% |
|  | (0.302) | (0.745) | (0.096) | (14.974) | (2.614) | (0.283) |  | 1.94\% |  |  |  |  |
| 3FF_Factor | 0.042*** | 0.059 | 0.325 | $0.438 * * *$ | 0.585 | 0.095 | 60.1\% |  | 205 | 0.009 | 4.7\% | 34.3\% |
|  | (3.610) | (0.168) | (1.528) | (13.898) | (0.293) | (0.622) |  | 1.89\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.023 | -0.014 | -0.160 | $0.474 * * *$ | -0.046 | 0.078 | 60\% |  | 205 | 0.000 | 5.2\% | 90.7\% |
|  | (1.047) | (-0.333) | (-0.320) | (6.654) | (-0.808) | (0.423) |  | 1.78\% |  |  |  |  |
| TrES_HDZ_10Ind | -0.027 | -0.128 | -6.277 | 0.842 | -0.013 | -2.616 | 59.7\% |  | 205 | 0.000 | 18.0\% | 93.6\% |
|  | (-0.208) | (-0.932) | (-0.790) | (1.716) | (-0.751) | (-0.793) |  | 1.77\% |  |  |  |  |
| TrETSS_HDZ_10Ind | -0.022 | 0.337 | -1.925 | 0.606*** | 0.045 | 0.440 | 60.7\% |  | 205 | 0.012 | 13.4\% | 87.2\% |
|  | (-0.207) | (1.285) | (-0.824) | (3.540) | (0.261) | (0.488) |  | 1.72\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.048 | -0.013 | -0.026 | 0.461*** | -0.079 | 0.262 | 60.3\% |  | 205 | 0.000 | 7.0\% | 94.8\% |
|  | (1.701) | (-0.536) | (-0.037) | (8.643) | (-0.611) | (1.119) |  | 1.71\% |  |  |  |  |
| FGHJ_RW | 0.015 | -0.119 | -0.768 | $0.544 * * *$ | 2.439 | 0.011 | 61\% |  | 205 | 0.000 | 12.9\% | 85.9\% |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_EP_25SBM | (0.410) | (-0.416) | (-0.866) | (3.461) | (0.900) | (0.025) |  | 1.69\% |  |  |  |  |
|  | 0.035** | 0.003 | 0.221 | $0.412 * * *$ | -0.011 | 0.025 | 60.7\% |  | 205 | 0.000 | 8.1\% | 95.3\% |
|  | (2.819) | (0.371) | (0.994) | (12.666) | (-1.320) | (0.309) |  | 1.55\% |  |  |  |  |
| GM_RI | -0.007 | 0.263 | -2.144 | $0.537 * * *$ | -1.720 | -0.097 | 62.5\% |  | 205 | 0.005 | 19.9\% | 73.5\% |
|  | (-0.171) | (1.016) | (-0.803) | (5.423) | (-0.885) | (-0.568) |  | 1.47\% |  |  |  |  |
| PEG_EP | 0.015 | -0.012 | 0.176 | $0.445^{* * *}$ | 2.011* | 0.060 | 59.9\% |  | 205 | 0.000 | 18.1\% | 89.2\% |
|  | (1.204) | $(-0.099)$ | (0.519) | (10.832) | (2.508) | (0.362) |  | 1.34\% |  |  |  |  |
| WNG_EP | 0.037* | -0.001 | 0.259 | $0.378 * * *$ | -0.005 | -0.288 | 59.8\% |  | 205 | 0.000 | 2.3\% | 96.5\% |
|  | (2.192) | (-0.580) | (0.523) | (8.863) | (-0.588) | (-1.213) |  | 1.30\% |  |  |  |  |
| WNG_RW | 0.036* | 0.000 | 0.177 | 0.357*** | 0.009 | 0.025 | 60.8\% |  | 205 | 0.000 | 3.5\% | 96.5\% |
|  | (2.214) | (-0.582) | (1.055) | (10.076) | (1.815) | (0.263) |  | 1.30\% |  |  |  |  |
| FGHJ_RI | -0.033 | 1.015 | 0.118 | 0.444*** | 20.384 | -0.307 | 60.8\% |  | 205 | 0.984 | 14.6\% | 76.0\% |
|  | (-0.756) | (1.361) | (0.482) | (10.618) | (0.857) | (-1.586) |  | 1.18\% |  |  |  |  |
| 5FF_Factor | 0.070 | 0.052 | 0.398 | 0.436*** | 1.615 | -0.169 | 60.4\% |  | 205 | 0.528 | 4.7\% | 29.7\% |
|  | (1.871) | (0.035) | (0.592) | (5.174) | (0.340) | (-0.475) |  | 1.10\% |  |  |  |  |
| HL_RI | 0.036 | 0.014 | 0.638 | 0.371*** | 0.479 | 0.019 | 60.2\% |  | 205 | 0.000 | 12.2\% | 89.5\% |
|  | (1.339) | (0.153) | (1.089) | (4.584) | (0.939) | (0.138) |  | 1.02\% |  |  |  |  |
| KMY_RI | 0.030 | 0.027 | 0.510 | $0.367 * * *$ | 0.322 | 0.167 | 60.5\% |  | 205 | 0.000 | 9.9\% | 82.0\% |
|  | (1.096) | (0.226) | (0.903) | (4.430) | (1.703) | (0.814) |  | 1.00\% |  |  |  |  |

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Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_RW_25SBM | 0.032* | 0.005 | -0.327 | 0.467*** | -0.008 | -0.074 | 61.1\% |  | 205 | 0.000 | 12.8\% | 94.2\% |
|  | (2.035) | (0.394) | (-1.062) | (7.406) | (-0.448) | (-0.333) |  | 0.98\% |  |  |  |  |
| DKL_RW | -0.196 | 0.765 | 1.125 | 0.292 | -5.489 | 2.670 | 61.4\% |  | 205 | 0.795 | 11.0\% | 83.1\% |
|  | (-0.689) | (0.848) | (1.458) | (1.548) | (-0.976) | (1.284) |  | 0.88\% |  |  |  |  |
| MPEG_RI | 2.493 | -11.395 | -0.966 | -0.077 | 0.969 | -32.817 | 61.3\% |  | 205 | 0.387 | 15.1\% | 75.3\% |
|  | (0.815) | (-0.797) | (-0.293) | (-0.120) | (1.545) | (-0.785) |  | 0.83\% |  |  |  |  |
| DKL_RI | 0.037 | 0.010 | 0.514 | $0.374 * * *$ |  |  | 60.2\% |  | 205 | 0.000 | 11.0\% | 91.3\% |
|  | (1.737) | (0.105) | (1.169) | (5.883) | (1.026) | (-0.190) |  | 0.82\% |  |  |  |  |
| FPM_EP | -0.069 | 0.095*** | -0.104 | 0.435*** | 0.072 | 0.009 | 60.8\% |  | 205 | 0.000 | 19.2\% | 91.9\% |
|  | (-1.490) | (4.568) | (-0.402) | (10.195) | (1.331) | (0.105) |  | 0.70\% |  |  |  |  |
| TrES_RW_25SBM | 0.057* | -5.878 | 0.069 | 0.462*** | -1.522 | -0.016 | 59.9\% |  | 205 | 0.483 | 5.8\% | 87.8\% |
|  | (2.439) | (-0.601) | (0.167) | (8.862) | (-1.358) | (-0.070) |  | 0.57\% |  |  |  |  |
| GM_RW | -0.010 | 0.109*** | 0.040 | $0.449 * * *$ | -2.153 | 0.020 | 59.9\% |  | 205 | 0.000 | 14.6\% | 87.1\% |
|  | (-0.737) | (3.726) | (0.287) | (13.760) | (-0.719) | (0.080) |  | 0.56\% |  |  |  |  |
| GLS_RW | 0.029* | 0.075 | 0.323 | 0.444*** | 0.003 | -0.020 | 59.7\% |  | 205 | 0.000 | 7.0\% | 85.5\% |
|  | (1.961) | (0.574) | (1.263) | (12.537) | (0.001) | (-0.098) |  | 0.20\% |  |  |  |  |
| HL_RW | 0.136 | -0.145 | 0.806 | 0.44*** | 0.173 | -0.235 | 60.8\% |  | 205 | 0.000 | 9.9\% | 87.2\% |
|  | (1.940) | (-1.048) | (1.781) | (7.150) | (0.571) | (-0.956) |  | 0.17\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.044** | 0.005 | 0.171 | 0.418*** | -0.048 | 0.162 | 59.7\% |  | 205 | 0.000 | 4.7\% | 94.2\% |

[^35]Table 77 : Capturing Subsequent Return: High Forecasted Long-term Growth Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_RW | (2.865) | (0.272) | (0.654) | (13.242) | (-1.587) | (0.946) |  | 0.12\% |  |  |  |  |
|  | 0.135 | -0.142 | 0.815 | 0.44*** | 0.293 | -0.234 | 60.8\% |  | 205 | 0.000 | 10.5\% | 84.9\% |
|  | (1.925) | (-1.025) | (1.800) | (7.155) | (0.950) | (-0.953) |  | 0.12\% |  |  |  |  |
| PEG_RW | 0.014 | 0.062 | 0.362 | 0.433*** | 0.403 | 0.075 | 59.5\% |  | 205 | 0.000 | 21.7\% | 100.0\% |
|  | (0.712) | (1.233) | (0.998) | (12.013) | (1.388) | (0.492) |  | 0.07\% |  |  |  |  |
| WNG_HDZ | 0.052*** | -0.017 | -0.058 | 0.46*** | 0.212 | -0.184 | 60.3\% |  | 205 | 0.000 | 5.2\% | 96.5\% |
|  | (3.862) | (-1.270) | (-0.303) | (11.103) | (1.314) | (-0.931) |  | 0.06\% |  |  |  |  |
| TrES_RI_25SBM | 0.034* | -0.040 | -1.668 | $0.518^{* * *}$ | 0.067 | -1.007 | 59.5\% |  | 205 | 0.000 | 9.3\% | 96.5\% |
|  | (2.086) | (-0.804) | (-0.749) | (3.265) | (0.730) | (-0.840) |  | -0.20\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.014 | -0.041 | 0.042 | 0.432*** | -0.017 | -0.038 | 60.5\% |  | 205 | 0.000 | 12.2\% | 92.4\% |
|  | (0.996) | (-0.717) | (0.437) | (14.217) | (-0.154) | (-0.243) |  | -0.26\% |  |  |  |  |
| MPEG_RW | -0.007 | $0.168^{* * *}$ | 0.058 | $0.444 * * *$ | 0.523** | -0.080 | 59.8\% |  | 205 | 0.000 | 14.3\% | 94.6\% |
|  | (-0.350) | (3.234) | (0.489) | (15.594) | (2.931) | (-0.672) |  | -0.51\% |  |  |  |  |
| TrOHE_25SBM | 0.030 | -0.128 | -1.288 | $0.437 * * *$ | 0.112 | 0.108 | 59.8\% |  | 205 | 0.000 | 9.3\% | 80.2\% |
|  | (1.467) | (-0.809) | (-0.728) | (6.767) | (0.992) | (0.696) |  | -1.14\% |  |  |  |  |

For the highest quartile of firms in terms of Long-term forecasted growth in earnings, this table reports average monthly regression coefficients of one year ahead Return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it
represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 78 : Capturing Subsequent Return: Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.015* | 0.162*** | 0.393*** | 0.474*** | 0.052 | -0.061 | 62.8\% | 6.85\% | 205 | 0.000 | 69.5\% | 91.1\% |
|  | (2.335) | (8.322) | (3.269) | (16.158) | (1.790) | (-1.204) |  |  |  |  |  |  |
| Naive | 0.02*** | 0.163*** | 0.434*** | 0.469*** | 0.070 | -0.066 | 62.6\% | 6.71\% | 205 | 0.000 | 68.0\% | 91.6\% |
|  | (3.159) | (8.077) | (3.693) | (15.748) | (1.956) | (-1.370) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.013* | 0.159*** | 0.412*** | 0.468*** | 0.057* | -0.101 | 62.4\% | 6.47\% | 205 | 0.000 | 69.5\% | 92.6\% |
|  | (2.034) | (8.768) | (3.822) | (16.775) | (2.107) | (-1.411) |  |  |  |  |  |  |
| BP_HDZ | -0.002 | 1.066*** | 0.312** | 0.46*** | 0.399* | -0.091 | 60.8\% | 5.63\% | 205 | 0.521 | 70.9\% | 49.8\% |
|  | (-0.368) | (10.323) | (2.670) | (17.271) | (2.537) | (-1.242) |  |  |  |  |  |  |
| BP_Anlst | -0.001 | 1.119*** | 0.293** | $0.472 * * *$ | 0.413* | -0.011 | 60.6\% | 5.50\% | 205 | 0.212 | 70.4\% | 54.7\% |
|  | (-0.137) | (11.792) | (2.661) | (18.486) | (2.498) | (-0.226) |  |  |  |  |  |  |
| TPDPS_RI | 0.019** | $0.115^{* * *}$ | 0.368** | $0.452 * * *$ | 0.07* | -0.107 | 61\% | 5.06\% | 205 | 0.000 | 59.1\% | 91.6\% |
|  | (2.913) | (5.848) | (2.864) | (15.562) | (1.985) | (-2.151) |  |  |  |  |  |  |
| TPDPS_EP | 0.021** | 0.106*** | 0.332** | 0.451*** | 0.071* | -0.083 | 60.5\% | 4.67\% | 205 | 0.000 | 58.1\% | 92.6\% |
|  | (3.083) | (5.738) | (2.775) | (15.204) | (2.014) | (-1.656) |  |  |  |  |  |  |
| TPDPS_RW | 0.029*** | 0.078*** | 0.159* | 0.477*** | 0.095** | -0.196 | 59.8\% | 4.36\% | 205 | 0.000 | 50.7\% | 96.1\% |
|  | (4.392) | (5.393) | (2.556) | (21.209) | (2.759) | (-1.450) |  |  |  |  |  |  |
| BP_EP | 0.006 | 0.747*** | 0.182 | 0.449*** | 0.364* | -0.058 | 59.3\% | 4.26\% | 205 | 0.020 | 60.1\% | 60.1\% |
|  | (0.805) | (6.929) | (1.628) | (16.193) | (2.438) | (-1.264) |  |  |  |  |  |  |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | 0.008 | 0.781*** | 0.254* | $0.446 * * *$ | 0.348* | -0.071 | 59.2\% | 4.17\% | 205 | 0.048 | 57.1\% | 56.7\% |
|  | (1.108) | (7.099) | (2.401) | (16.399) | (2.385) | (-1.523) |  |  |  |  |  |  |
| BP_RW | 0.019* | 0.744*** | 0.155 | 0.451*** | 0.379* | -0.042 | 58.8\% | 3.87\% | 205 | 0.020 | 56.2\% | 55.7\% |
|  | (2.507) | (6.816) | (1.330) | (15.908) | (2.521) | (-0.840) |  |  |  |  |  |  |
| PE_Anlst | -0.010 | 1.034*** | 0.604*** | 0.433*** | 0.934 | -0.355 | 58.1\% | 2.92\% | 205 | 0.758 | 59.6\% | 41.4\% |
|  | (-1.036) | (9.382) | (3.945) | (20.027) | (1.346) | (-2.457) |  |  |  |  |  |  |
| GLS_Anlst | -0.035 | $0.721^{* * *}$ | 0.044 | 0.438*** | 0.718 | -0.152 | 57.2\% | 2.17\% | 205 | 0.075 | 35.5\% | 55.2\% |
|  | (-2.355) | (4.622) | (0.490) | (18.936) | (0.875) | (-2.210) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.034 | 0.634*** | 0.025 | 0.454*** | 1.745** | -0.119 | 57.2\% | 2.11\% | 205 | 0.006 | 38.9\% | 60.1\% |
|  | (-2.363) | (4.781) | (0.282) | (19.535) | (2.965) | (-1.914) |  |  |  |  |  |  |
| CT_Anlst | -0.011 | $0.521^{* * *}$ | 0.128 | 0.455*** | 1.157 | -0.084 | 56.9\% | 1.93\% | 205 | 0.000 | 42.4\% | 57.1\% |
|  | (-1.037) | (4.548) | (1.470) | (20.372) | (1.649) | (-1.650) |  |  |  |  |  |  |
| CT_EP | 0.046 | 0.107* | -0.031 | 0.414*** | 0.426 | -0.008 | 55.7\% | 1.81\% | 205 | 0.000 | 27.1\% | 88.2\% |
|  | (1.879) | (2.039) | (-0.455) | (12.863) | (1.092) | (-0.190) |  |  |  |  |  |  |
| FGHJ_HDZ | -0.001 | 0.415*** | -0.052 | 0.454*** | $2.801^{* * *}$ | -0.051 | 57\% | 1.79\% | 205 | 0.000 | 26.1\% | 69.5\% |
|  | (-0.058) | (4.911) | (-0.664) | (19.580) | (4.225) | (-0.971) |  |  |  |  |  |  |
| DKL_Anlst | -0.027 | $0.658 * * *$ | 0.107 | $0.452 * * *$ | 0.321 | -0.078 | 56.8\% | 1.67\% | 205 | 0.008 | 42.9\% | 45.8\% |
|  | (-2.336) | (5.171) | (1.459) | (20.686) | (0.609) | (-1.508) |  |  |  |  |  |  |
| MPEG_Anlst | 0.007 | $0.324 * * *$ | 0.044 | $0.446 * * *$ | 0.109 | 0.064 | 55.8\% | 1.58\% | 205 | 0.000 | 31.0\% | 58.1\% |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_RW | (0.849) | (5.149) | (0.572) | (19.975) | (0.359) | (0.817) |  |  |  |  |  |  |
|  | 0.005 | 0.322 | -0.058 | $0.463 * * *$ | 1.823 | -0.213 | 56.4\% | 1.58\% | 205 | 0.004 | 28.3\% | 74.7\% |
|  | (0.369) | (1.383) | (-0.695) | (17.832) | (1.511) | (-1.188) |  |  |  |  |  |  |
| GLS_HDZ | 0.006 | 0.366*** | -0.094 | 0.456*** | 2.758*** | -0.058 | 56.9\% | 1.57\% | 205 | 0.000 | 27.6\% | 64.5\% |
|  | (0.722) | (4.621) | (-0.851) | (19.304) | (4.528) | (-1.146) |  |  |  |  |  |  |
| GG_HDZ | 0.009 | 0.473*** | 0.119 | 0.446*** | $2.821^{* * *}$ | -0.253 | 56.9\% | 1.53\% | 205 | 0.000 | 32.0\% | 65.5\% |
|  | (1.100) | (4.580) | (1.031) | (19.127) | (4.130) | (-1.670) |  |  |  |  |  |  |
| TrES_Anlst_10Ind | $0.042 * * *$ | 0.008 | 0.008 | 0.456*** | 0.013 | -0.107 | $56.4 \%$ | 1.44\% | 205 | 0.000 | 21.2\% | 97.5\% |
|  | (4.354) | (0.602) | (0.104) | (16.199) | (0.827) | (-1.029) |  |  |  |  |  |  |
| DKL_EP | 0.005 | 0.155*** | -0.120 | $0.459 * * *$ | 0.471 | -0.090 | 55.5\% | 1.42\% | 205 | 0.000 | 36.0\% | 80.3\% |
|  | (0.614) | (4.952) | (-1.428) | (17.743) | (1.435) | (-1.776) |  |  |  |  |  |  |
| CT_HDZ | 0.016 | 0.303*** | 0.069 | $0.452 * * *$ | 1.626** | -0.219 | 56.5\% | 1.40\% | 205 | 0.000 | 30.0\% | 70.4\% |
|  | (1.837) | (3.577) | (0.832) | (19.496) | (2.913) | (-1.815) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.036*** | -0.008 | -0.063 | 0.428*** | 0.037 | -0.033 | 55.2\% | 1.39\% | 205 | 0.000 | 17.7\% | 98.0\% |
|  | (4.292) | (-0.556) | (-1.123) | (20.028) | (1.304) | (-0.406) |  |  |  |  |  |  |
| KMY_EP | -0.003 | 0.232*** | -0.022 | 0.416*** | 0.133 | -0.403 | 55.3\% | 1.32\% | 205 | 0.000 | 36.0\% | 73.9\% |
|  | (-0.331) | (3.750) | (-0.292) | (12.089) | (0.356) | (-1.608) |  |  |  |  |  |  |
| DKL_HDZ | 0.000 | $0.444 * * *$ | 0.041 | 0.453*** | 1.359** | -0.253 | 56.4\% | 1.28\% | 205 | 0.000 | 29.6\% | 70.4\% |
|  | (0.029) | (3.145) | (0.513) | (19.947) | (2.941) | (-1.761) |  |  |  |  |  |  |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_Anlst | -0.018 | 0.573*** | 0.110 | 0.448*** | 0.489 | -0.031 | 56.3\% | 1.26\% | 205 | 0.000 | $35.5 \%$ | 47.3\% |
|  | (-1.834) | (6.113) | (1.626) | (20.985) | (1.435) | (-0.582) |  |  |  |  |  |  |
| GM_Anlst | -0.021 | 0.577*** | 0.070 | 0.447*** | 0.226 | -0.093 | 55.8\% | 1.26\% | 205 | 0.000 | 33.0\% | 52.2\% |
|  | (-2.267) | (6.941) | (0.998) | (21.150) | (0.751) | (-0.592) |  |  |  |  |  |  |
| GG_Anlst | 0.003 | 0.119*** | -0.032 | 0.457*** | 0.456 | -0.110 | 55.8\% | 1.24\% | 205 | 0.000 | 24.6\% | 74.4\% |
|  | (0.236) | (3.253) | (-0.418) | (19.424) | (1.372) | (-1.794) |  |  |  |  |  |  |
| KMY_HDZ | 0.009 | $0.379 * * *$ | 0.024 | 0.451*** | $1.472 * * *$ | -0.210 | 56.3\% | 1.23\% | 205 | 0.000 | 29.6\% | 65.5\% |
|  | (0.921) | (3.858) | (0.300) | (19.333) | (3.251) | (-1.653) |  |  |  |  |  |  |
| PE_HDZ | 0.016 | 0.428*** | -0.032 | 0.452*** | $2.089 * * *$ | -0.199 | 56.5\% | 1.21\% | 205 | 0.000 | 38.9\% | 62.6\% |
|  | (1.825) |  | (-0.354) | (20.068) | (3.547) | (-2.558) |  |  |  |  |  |  |
| HL_EP | 0.007 | 0.128*** | -0.111 | 0.459*** | 0.450 | -0.111 | 55.2\% | 1.20\% | 205 | 0.000 | 30.0\% | 82.8\% |
|  | (0.842) | (4.493) | (-1.336) | (17.767) | (1.389) | (-2.089) |  |  |  |  |  |  |
| FPM_Anlst | -0.014 | 0.471** | -0.028 | $0.457 * * *$ | 0.041 | 0.023 | 55.6\% | 1.18\% | 205 | 0.003 | $33.0 \%$ | 35.0\% |
|  | (-0.949) | (2.688) | (-0.356) | (19.803) | (0.063) | (0.394) |  |  |  |  |  |  |
| GG_EP | 0.017* | -3.072 | -0.193 | $0.476 * * *$ | 3.069 | -0.034 | 55.8\% | 1.18\% | 205 | 0.128 | 30.7\% | 75.0\% |
|  | (2.207) | (-1.155) | (-1.719) | (15.837) | (1.887) | (-0.433) |  |  |  |  |  |  |
| MPEG_RW | 0.033*** | 0.099*** | 0.027 | 0.446*** | 0.582*** | -0.098 | 56\% | 1.18\% | 205 | 0.000 | 25.1\% | 94.6\% |
|  | (3.320) | (3.385) | (0.274) | (17.991) | (4.078) | (-1.626) |  |  |  |  |  |  |
| WNG_EP | 0.049*** | 0.000 | -0.020 | 0.44*** | -0.003 | -0.095 | 55.1\% | 1.14\% | 205 | 0.000 | 6.9\% | 100.0\% |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_Anlst | (3.690) | (-0.457) | (-0.335) | (19.342) | (-1.047) | (-1.337) |  |  |  |  |  |  |
|  | -0.002 | 0.185*** | -0.008 | 0.459*** | 0.374 | -0.068 | 55.9\% | 1.06\% | 205 | 0.000 | 30.5\% | 63.5\% |
|  | (-0.151) | (3.404) | (-0.107) | (19.454) | (0.856) | (-1.191) |  |  |  |  |  |  |
| GLS_EP | 0.016 | 0.139 | -0.220 | 0.464*** | 2.161*** | -0.039 | 56.1\% | 1.06\% | 205 | 0.000 | 29.1\% | 71.9\% |
|  | (1.452) | (1.037) | (-1.824) | (18.061) | (3.326) | (-0.360) |  |  |  |  |  |  |
| FGHJ_RI | 0.028** | 0.074 | -0.094 | 0.453*** | 0.763 | -0.018 | 55.6\% | 1.02\% | 205 | 0.000 | 24.6\% | 70.9\% |
|  | (2.812) | (0.724) | (-1.038) | (19.087) | (0.871) | (-0.289) |  |  |  |  |  |  |
| GG_RW | 0.007 | 0.396*** | 0.083 | 0.446*** | 5.128* | -0.246 | 56.3\% | 1.02\% | 205 | 0.000 | 29.7\% | 75.1\% |
|  | (0.772) | (3.911) | (0.677) | (18.239) | (2.145) | (-1.547) |  |  |  |  |  |  |
| PE_EP | 0.032*** | -0.282 | -0.191 | $0.482 * * *$ | $2.481 * * *$ | 0.272 | 56\% | 1.00\% | 205 | 0.011 | 36.0\% | 73.4\% |
|  | (3.454) | (-0.567) | (-1.406) | (12.826) | (3.261) | (0.875) |  |  |  |  |  |  |
| GM_RW | 0.019 | $0.068 * * *$ | -0.041 | $0.451 * * *$ | $0.569 * * *$ | -0.057 | 56\% | 0.99\% | 205 | 0.000 | 25.8\% | 96.4\% |
|  | (1.856) | (3.359) | (-0.458) | (17.841) | (3.508) | (-1.042) |  |  |  |  |  |  |
| PEG_Anlst | 0.023** | 0.193*** | -0.002 | 0.439*** | 0.268 | 0.085 | 55.1\% | 0.97\% | 205 | 0.000 | 18.2\% | 68.0\% |
|  | (2.589) | (3.169) | (-0.027) | (20.085) | (1.203) | (1.114) |  |  |  |  |  |  |
| PE_RW | 0.04*** | 0.125 | 0.031 | 0.45*** | 0.109 | -0.017 | 55.9\% | 0.94\% | 205 | 0.000 | 14.3\% | 91.1\% |
|  | (4.420) | (1.758) | (0.298) | (18.953) | (0.297) | (-0.295) |  |  |  |  |  |  |
| MPEG_EP | 0.014 | 0.086 | -0.002 | 0.453*** | 0.871** | -0.123 | 55.5\% | 0.92\% | 205 | 0.000 | 30.5\% | 88.7\% |
|  | (1.387) | (1.321) | (-0.015) | (18.142) | (2.852) | (-1.278) |  |  |  |  |  |  |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_HDZ | 0.006 | 0.358*** | 0.025 | 0.456*** | 1.123** | -0.153 | 56.2\% | 0.92\% | 205 | 0.000 | 27.6\% | 70.4\% |
|  | (0.474) | (3.166) | (0.336) | (19.433) | (3.010) | (-1.713) |  |  |  |  |  |  |
| PE_RI | 0.031*** | 0.026 | -0.070 | 0.461*** | 2.217** | -0.017 | 55.4\% | 0.89\% | 205 | 0.000 | 36.5\% | 73.4\% |
|  | (4.246) | (0.269) | (-0.853) | (19.349) | (2.652) | (-0.333) |  |  |  |  |  |  |
| FGHJ_EP | 0.024 | 0.049 | -0.187 | $0.457 * * *$ | $2.44 * *$ | -0.039 | 55.5\% | 0.88\% | 205 | 0.000 | 31.5\% | 75.4\% |
|  | (1.772) | (0.287) | (-1.563) | (17.787) | (3.037) | (-0.363) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.034*** | 0.010 | -0.010 | 0.446*** | 0.004 | 0.023 | 55.9\% | 0.87\% | 205 | 0.000 | 13.8\% | 100.0\% |
|  | (4.212) | (1.402) | (-0.138) | (18.543) | (0.495) | (0.330) |  |  |  |  |  |  |
| GM_EP | 0.009 | $0.151^{* * *}$ | -0.059 | 0.45*** | $1.298 * *$ | -0.189 | 55.1\% | 0.86\% | 205 | 0.000 | 33.0\% | 83.7\% |
|  | (1.136) | (3.204) | (-0.794) | (18.823) | (2.613) | (-1.487) |  |  |  |  |  |  |
| PEG_EP | 0.022** | 0.081 | -0.089 | $0.455^{* * *}$ | $1.011^{* * *}$ | -0.094 | 54.9\% | 0.84\% | 205 | 0.000 | $33.7 \%$ | 100.0\% |
|  | (2.718) | (1.792) | (-1.039) | (17.352) | (4.619) | (-1.336) |  |  |  |  |  |  |
| GLS_RI | 0.024** | 0.117 | -0.088 | 0.455*** | 2.677 | -0.036 | 55.5\% | 0.81\% | 205 | 0.000 | 26.1\% | 72.4\% |
|  | (2.750) | (1.391) | (-0.927) | (19.049) | (0.371) | (-0.585) |  |  |  |  |  |  |
| FPM_RW | 0.049*** | 0.05*** | -0.030 | 0.433*** | 0.036 | 0.001 | 55.8\% | 0.76\% | 205 | 0.000 | 19.7\% | 97.5\% |
|  | (4.983) | (4.090) | (-0.489) | (20.114) | (0.939) | (0.007) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.04*** | -1.015 | -0.031 | $0.441^{* * *}$ | 0.647 | 0.008 | 55.6\% | 0.74\% | 205 | 0.245 | 8.4\% | 83.3\% |
|  | (5.534) | (-0.587) | (-0.472) | (20.594) | (0.636) | (0.135) |  |  |  |  |  |  |
| MPEG_HDZ | 0.017 | $0.238 * *$ | -0.036 | 0.461 *** | 0.612 | -0.049 | 55.6\% | 0.69\% | 205 | 0.000 | 28.1\% | 71.4\% |

[^36]Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_RI | (1.451) | (2.984) | (-0.413) | (16.830) | (1.576) | (-0.670) |  |  |  |  |  |  |
|  | 0.016 | 0.127* | -0.075 | $0.451 * * *$ | 0.328 | -0.008 | 54.6\% | 0.68\% | 205 | 0.000 | 28.1\% | 81.8\% |
|  | (1.790) | (2.271) | (-0.723) | (18.063) | (1.360) | (-0.152) |  |  |  |  |  |  |
| WNG_Anlst | 0.045*** | 0.002 | -0.025 | $0.455 * * *$ | -0.315 | 0.004 | 54.5\% | 0.67\% | 205 | 0.000 | 7.4\% | 100.0\% |
|  | (6.171) | (1.430) | (-0.363) | (18.992) | (-0.712) | (0.066) |  |  |  |  |  |  |
| GM_HDZ | 0.020 | 0.266** | -0.081 | $0.467 * * *$ | 0.722 | -0.057 | 55.6\% | 0.67\% | 205 | 0.000 | 24.6\% | 69.0\% |
|  | (1.714) | (2.620) | (-0.866) | (16.482) | (1.315) | (-0.694) |  |  |  |  |  |  |
| 3FF_Factor | 0.041 *** | -0.071 | -0.015 | 0.464*** | 5.006* | -0.047 | 55\% | 0.65\% | 205 | 0.000 | 7.9\% | 42.4\% |
|  | (4.183) | (-0.320) | (-0.125) | (15.028) | (1.987) | (-0.251) |  |  |  |  |  |  |
| KMY_RI | 0.013 | 0.211** | -0.076 | $0.447 * * *$ | 0.325 | -0.087 | 54.5\% | 0.65\% | 205 | 0.000 | 29.6\% | 74.9\% |
|  | (1.492) | (2.938) | (-0.860) | (19.982) | (1.174) | (-0.990) |  |  |  |  |  |  |
| FPM_HDZ | 0.011 | 0.298*** | -0.072 | 0.456*** | 1.107** | -0.069 | 55.3\% | 0.63\% | 205 | 0.000 | 24.1\% | 68.0\% |
|  | (1.334) | (3.915) | (-1.050) | (19.714) | (2.957) | (-0.670) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.034*** | -0.049 | -0.080 | $0.443 * * *$ | -0.705 | -0.067 | 54.4\% | 0.60\% | 205 | 0.000 | 14.3\% | 98.0\% |
|  | (3.518) | (-1.771) | (-1.085) | (19.882) | (-1.099) | (-1.028) |  |  |  |  |  |  |
| PEG_RW | 0.043*** | -0.010 | -0.035 | $0.448 * * *$ | 0.383* | -0.097 | 55.3\% | 0.59\% | 205 | 0.000 | 22.4\% | 100.0\% |
|  | (3.259) | (-0.297) | (-0.276) | (14.576) | (2.130) | (-1.311) |  |  |  |  |  |  |
| HL_RI | 0.015 | 0.13* | -0.076 | 0.45*** | 0.326 | -0.010 | 54.5\% | 0.56\% | 205 | 0.000 | 30.0\% | 81.8\% |
|  | (1.613) | (2.324) | (-0.737) | (18.033) | (1.350) | (-0.200) |  |  |  |  |  |  |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_RW | 0.025 | 0.022 | -0.034 | $0.454 * * *$ | -0.200 | -0.022 | 54.6\% | 0.56\% | 205 | 0.000 | 15.8\% | 86.2\% |
|  | (1.329) | (0.805) | (-0.352) | (17.468) | (-0.617) | (-0.372) |  |  |  |  |  |  |
| FGHJ_RW | 0.03*** | 0.035 | 0.000 | 0.451*** | 0.558 | -0.012 | 54.1\% | 0.56\% | 205 | 0.000 | 21.1\% | 84.0\% |
|  | (3.375) | (0.344) | (-0.004) | (19.327) | (1.704) | (-0.218) |  |  |  |  |  |  |
| DKL_RW | 0.009 | 0.067 | -0.068 | $0.455^{* * *}$ | -0.099 | -0.025 | 54.6\% | 0.55\% | 205 | 0.000 | 17.7\% | 82.8\% |
|  | (0.503) | (1.936) | (-0.682) | (16.777) | (-0.296) | (-0.454) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.041*** | 2.936 | -0.085 | 0.449*** | 17.794 | -0.175 | 55.2\% | 0.55\% | 205 | 0.512 | 18.2\% | 76.8\% |
|  | (5.303) | (0.996) | (-0.833) | (16.693) | (1.065) | (-1.043) |  |  |  |  |  |  |
| TrES_Anlst _25SBM | $0.05 * * *$ | 0.003 | -0.050 | 0.436*** | -0.001 | -0.083 | 55.1\% | 0.53\% | 205 | 0.000 | 7.4\% | 99.5\% |
|  | (5.786) | (0.611) | (-0.629) | (19.189) | (-0.405) | (-1.095) |  |  |  |  |  |  |
| 5FF_Factor | 0.037*** | 0.102 | 0.017 | $0.452^{* * *}$ | -0.066 | 0.058 | 55.1\% | 0.52\% | 205 | 0.000 | 10.8\% | 45.3\% |
|  | (4.563) | (0.630) | (0.174) | (18.818) | (-0.047) | (0.944) |  |  |  |  |  |  |
| PEG_HDZ | 0.017 | 0.269** | -0.151 | $0.479 * * *$ | 0.580 | -0.011 | 55.7\% | 0.51\% | 205 | 0.000 | 20.2\% | 68.5\% |
|  | (1.132) | (2.607) | (-1.397) | (13.605) | (1.297) | (-0.153) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.04*** | 0.056 | -0.002 | $0.441^{* * *}$ | 0.018 | -0.061 | 54.5\% | 0.50\% | 205 | 0.000 | 12.3\% | 95.6\% |
|  | (4.483) | (1.461) | (-0.010) | (17.369) | (0.736) | (-0.390) |  |  |  |  |  |  |
| KMY_RW | 0.024 | 0.031 | -0.033 | 0.454*** | -0.153 | -0.022 | 54.5\% | 0.48\% | 205 | 0.000 | 14.3\% | 86.7\% |
|  | (1.233) | (1.102) | (-0.345) | (17.469) | (-0.469) | (-0.367) |  |  |  |  |  |  |
| FPM_RI | $0.038^{* * *}$ | 0.007 | 0.012 | $0.459 * * *$ | 0.079 | -0.121 | 55\% | 0.47\% | 205 | 0.000 | 21.2\% | 89.2\% |

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Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RI | (3.533) | (0.162) | (0.176) | (18.854) | (1.102) | (-1.709) |  |  |  |  |  |  |
|  | 0.012 | 0.197* | -0.139 | 0.466*** | 0.225 | -0.040 | 55\% | 0.43\% | 205 | 0.000 | $32.7 \%$ | 76.2\% |
|  | (1.044) | (2.507) | (-1.511) | (16.604) | (0.402) | (-0.520) |  |  |  |  |  |  |
| FPM_EP | 0.020 | 0.077*** | -0.068 | 0.44*** | 0.013 | -0.121 | 54.6\% | 0.41\% | 205 | 0.000 | 22.2\% | 97.5\% |
|  | (1.904) | (4.614) | (-0.906) | (18.351) | (0.638) | (-1.670) |  |  |  |  |  |  |
| CT_RI | 0.03*** | 0.017 | -0.048 | 0.443*** | 0.069 | -0.072 | 54.4\% | 0.40\% | 205 | 0.000 | 12.3\% | 84.7\% |
|  | (3.730) | (0.402) | (-0.589) | (18.219) | (0.232) | (-0.704) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.035*** | 0.212* | -0.065 | $0.461 * * *$ | 0.662 | 0.003 | 54.4\% | 0.38\% | 205 | 0.000 | 17.2\% | 71.9\% |
|  | (4.220) | (2.547) | (-0.639) | (16.757) | (1.379) | (0.036) |  |  |  |  |  |  |
| PEG_RI | 0.029*** | 0.085 | -0.111 | $0.452 * * *$ | 0.250 | -0.068 | 54.1\% | 0.37\% | 205 | 0.000 | 30.1\% | 100.0\% |
|  | (3.271) | (0.991) | (-1.332) | (17.190) | (1.526) | (-1.045) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.051 *** | -0.075 | -0.083 | $0.452 * * *$ | 0.082* | -0.097 | 54.1\% | 0.37\% | 205 | 0.000 | 6.9\% | 89.7\% |
|  | (6.650) | (-1.737) | (-1.030) | (18.475) | (1.986) | (-1.299) |  |  |  |  |  |  |
| GG_RI | 0.025*** | 0.166 | -0.094 | 0.456*** | $2.029 * * *$ | -0.122 | 54.6\% | 0.34\% | 205 | 0.000 | 29.2\% | 78.1\% |
|  | (3.528) | (1.132) | (-1.272) | (19.209) | (3.170) | (-1.647) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.039*** | -0.011 | -0.071 | 0.43*** | 0.007 | -0.032 | 54.1\% | 0.33\% | 205 | 0.000 | 6.9\% | 100.0\% |
|  | (4.464) | (-1.483) | (-0.978) | (18.138) | (1.539) | (-0.712) |  |  |  |  |  |  |
| MPEG_RI | 0.004 | 0.177** | -0.114 | 0.461*** | -2.047 | -0.037 | 55\% | 0.28\% | 205 | 0.000 | 32.7\% | 82.2\% |
|  | (0.329) | (2.651) | (-1.382) | (17.017) | (-0.672) | (-0.488) |  |  |  |  |  |  |

Continued in next page...

Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_EP_25SBM | 0.049*** | 0.001 | 0.046 | 0.432*** | 0.002 | -0.082 | 54.1\% | 0.23\% | 205 | 0.000 | 9.4\% | 100.0\% |
|  | (6.185) | (0.253) | (0.641) | (19.721) | (0.312) | (-1.460) |  |  |  |  |  |  |
| CAPM_Factor | 0.165 | -9.622 | 0.025 | 0.442*** | -2.448 | 0.237 | 54.8\% | 0.22\% | 205 | 0.287 | 18.7\% | 23.6\% |
|  | (1.318) | (-0.968) | (0.229) | (16.117) | (-0.137) | (1.270) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.046*** | 0.002 | -0.233 | 0.444*** | -0.002 | -0.093 | 55.4\% | 0.17\% | 205 | 0.000 | 4.4\% | 99.0\% |
|  | (5.620) | (0.414) | (-1.089) | (17.210) | (-0.436) | (-1.317) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.056*** | -0.034 | -0.063 | 0.451 *** | -0.048 | 0.033 | 54.7\% | 0.16\% | 205 | 0.000 | 18.7\% | 96.6\% |
|  | (4.002) | (-1.040) | (-0.649) | (17.327) | (-1.128) | (0.363) |  |  |  |  |  |  |
| WNG_RW | 0.046*** | 0.000 | -0.073 | 0.444*** | -0.005 | -0.137 | 54\% | 0.13\% | 205 | 0.000 | 3.4\% | 100.0\% |
|  | (6.401) | (-1.314) | (-1.189) | (20.039) | (-0.874) | (-1.642) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.042*** | 0.011 | -0.087 | 0.452*** | -0.002 | -0.156 | 53.8\% | 0.10\% | 205 | 0.000 | 8.4\% | 98.5\% |
|  | (5.927) | (1.484) | (-0.938) | (17.934) | (-0.171) | (-2.068) |  |  |  |  |  |  |
| WNG_RI | $0.041^{* * *}$ | -0.002 | -0.110 | 0.46*** | 0.192 | -0.056 | 54.7\% | 0.08\% | 205 | 0.000 | 4.0\% | 100.0\% |
|  | (5.373) | (-0.347) | (-1.037) |  | (1.332) | (-0.880) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.04*** | -0.011 | -0.051 | $0.448 * * *$ | 0.055 | -0.090 | 54.2\% | 0.06\% | 205 | 0.000 | 15.8\% | 99.0\% |
|  | (5.192) | (-0.749) | (-0.644) | (19.615) | (1.010) | (-0.798) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.032** | 0.031 | -0.047 | $0.45 * * *$ | -0.022 | 0.138 | 55.1\% | 0.00\% | 205 | 0.000 | 6.4\% | 99.5\% |
|  | (2.651) | (1.017) | (-0.649) | (14.178) | (-0.976) | (1.218) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.039*** | 0.046 | -0.048 | $0.44 * * *$ | 0.075 | -0.155 | 54.1\% | -0.05\% | 205 | 0.000 | 12.3\% | 82.3\% |

[^37]Table 78 : Capturing Subsequent Return: Small Firms, Low Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_25SBM | (5.296) | (1.041) | (-0.490) | (16.405) | (0.904) | (-0.880) |  |  |  |  |  |  |
|  | 0.043*** | 0.004 | -0.081 | 0.444*** | -0.021 | -0.044 | 54\% | -0.05\% | 205 | 0.000 | 10.8\% | 93.1\% |
|  | (6.263) | (0.293) | (-1.128) | (19.441) | (-0.678) | (-0.635) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.043*** | 0.040 | -0.025 | 0.448*** | -0.039 | -0.007 | 53.8\% | -0.06\% | 205 | 0.000 | 12.3\% | 86.2\% |
|  | (6.069) | (1.733) | (-0.313) | (19.516) | (-1.630) | (-0.116) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.042*** | -0.051 | -0.026 | $0.441^{* * *}$ | -0.025 | -0.098 | 53.8\% | -0.09\% | 205 | 0.000 | 11.3\% | 88.2\% |
|  | (5.507) | (-1.334) | (-0.362) | (19.340) | (-0.458) | (-1.200) |  |  |  |  |  |  |
| GLS_RW | 0.059 | 0.004 | -0.067 | 0.462*** | 0.175 | -0.023 | 53.5\% | -0.27\% | 205 | 0.000 | 12.8\% | 86.7\% |
|  | (1.543) | (0.084) | (-0.542) | (16.200) | (0.375) | (-0.416) |  |  |  |  |  |  |
| Carhart_Factor | $0.039 * * *$ | -0.075 | -0.066 | $0.461 * * *$ | 2.251 | -0.042 | 53.6\% | -0.28\% | 205 | 0.000 | 7.4\% | 58.6\% |
|  | (4.473) | (-0.700) | (-0.839) | (16.973) | (1.827) | (-0.357) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.024 | 0.031 | -0.178 | $0.474 * * *$ | -0.020 | -0.113 | 53.5\% | -0.35\% | 205 | 0.000 | 15.8\% | 99.0\% |
|  | (1.739) | (1.745) | (-1.514) | (14.509) | (-0.559) | (-0.782) |  |  |  |  |  |  |
| WNG_HDZ | 0.045*** | 0.000 | -0.014 | $0.467 * * *$ | 0.034 | -0.104 | 54.1\% | -0.48\% | 205 | 0.000 | 1.0\% | 100.0\% |
|  | (4.367) | (-0.705) | (-0.147) | (15.956) | (0.121) | (-1.340) |  |  |  |  |  |  |

For the lowest quartile of firms in terms of analysts coverage, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, \text { it }}=$ $\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much
of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 79 : Capturing Subsequent Return: High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.038 | 0.103* | -0.721 | 0.534*** | 0.362 | -1.650 | 66\% |  | 205 | 0.000 | 44.2\% | 95.3\% |
|  | (0.514) | (2.023) | (-0.817) | (7.687) | (0.850) | (-0.800) |  | 7.58\% |  |  |  |  |
| Naive | 0.011 | 0.113*** | -0.868 | $0.532 * * *$ | 0.164 | -0.772 | 65.9\% |  | 205 | 0.000 | 43.0\% | 95.3\% |
|  | (0.266) | (3.272) | (-0.819) | (8.051) | (0.818) | (-0.787) |  | 7.27\% |  |  |  |  |
| BP_HDZ | 0.113 | 3.539 | 17.164 | 0.130 | 8.975 | -1.477 | 65.2\% |  | 205 | 0.424 | 51.7\% | 39.0\% |
|  | (0.752) | (1.116) |  | $(0.309)$ | (0.883) | (-0.984) |  | 6.40\% |  |  |  |  |
| TPDPS_HDZ | 0.006 | $0.116^{* * *}$ | -0.932 | $0.508 * * *$ | 0.097 | -0.581 | 65.6\% |  | 205 | 0.000 | 43.6\% | 93.6\% |
|  | (0.179) | (3.227) | (-0.711) |  | (0.540) |  |  | 6.39\% |  |  |  |  |
| TPDPS_RI | 0.036 | 0.098*** | 0.029 | 0.42*** | 0.169 | -0.829 | 64.8\% |  | 205 | 0.000 | 39.5\% | 95.9\% |
|  | (0.911) | (3.664) | (0.031) | (4.719) | (0.921) | (-0.885) |  | 6.21\% |  |  |  |  |
| TPDPS_EP | 0.036 | 0.069* | -0.455 | $0.428 * * *$ | 0.132 | -0.836 | 65\% |  | 205 | 0.000 | 34.9\% | 95.3\% |
|  | (0.861) | (1.965) | (-0.317) | (4.622) | (0.618) | (-0.841) |  | 6.09\% |  |  |  |  |
| BP_RW | 0.005 | 0.408 | -0.930 | 0.487*** | 0.268 | -0.286 | 64.2\% |  | 205 | 0.009 | 40.7\% | 48.8\% |
|  | (0.260) | (1.815) | (-0.645) | (10.701) | (0.286) | (-0.633) |  | 5.77\% |  |  |  |  |
| PE_EP | -0.004 | 0.646* | 0.046 | $0.456 * * *$ | -1.186 | 0.048 | 63.8\% |  | 205 | 0.231 | 23.3\% | 78.5\% |
|  | (-0.228) | (2.194) | (0.158) | (7.406) | (-0.692) | (0.349) |  | 5.50\% |  |  |  |  |
| BP_Anlst | -0.110 | -1.291 | $-14.571$ | 0.79* | -6.363 | 0.702 | 65.4\% |  | 205 | 0.419 | 52.9\% | 40.1\% |
|  | (-0.868) | (-0.456) | (-0.791) | (2.080) | (-0.719) | (0.549) |  | 5.33\% |  |  |  |  |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_HDZ | 0.011 | 0.336* | 0.228 | 0.468*** | $3.355 * * *$ | -0.155 | 63.4\% |  | 205 | 0.000 | 25.0\% | 58.7\% |
|  | (0.673) | (2.194) | (0.754) | (9.992) | (3.203) | (-0.806) |  | 5.22\% |  |  |  |  |
| GG_Anlst | 0.147 | -0.007 | 1.257 | 0.446* | 5.788 | -3.664 | 61.6\% |  | 205 | 0.000 | 19.2\% | 79.1\% |
|  | (0.962) | (-0.071) | (0.704) | (2.510) | (1.107) | (-0.901) |  | 5.05\% |  |  |  |  |
| BP_EP | -0.088 | -1.250 | -12.706 | 0.724* | -5.494 | 0.523 | 64.2\% |  | 205 | 0.351 | 43.0\% | 43.0\% |
|  | (-0.763) | (-0.520) | (-0.789) | (2.165) | (-0.700) | (0.473) |  | 4.97\% |  |  |  |  |
| FPM_Anlst | -0.175 | -0.117 | -3.803 | 0.975 | 13.516 | 1.829 | 62.7\% |  | 205 | 0.361 | 21.5\% | 29.1\% |
|  | (-1.036) | (-0.096) | (-0.725) | (1.512) | (0.884) | (0.743) |  | 4.97\% |  |  |  |  |
| CT_Anlst | -0.044 | 0.519* | -0.853 | $0.575 * * *$ | -1.381 | 0.030 | 63\% |  | 205 | 0.030 | 25.0\% | 38.4\% |
|  | (-1.136) | (2.360) | (-0.739) | (4.076) | (-0.727) | (0.174) |  | 4.96\% |  |  |  |  |
| DKL_HDZ | -0.028 | 0.569 | 0.299 | $0.453 * * *$ | 1.653 | -0.051 | 63\% |  | 205 | 0.242 | 19.8\% | 68.0\% |
|  | (-0.703) | (1.547) | (0.450) | (7.667) | (1.085) | (-0.249) |  | 4.80\% |  |  |  |  |
| BP_RI | -0.002 | $0.608^{* * *}$ | -0.581 | $0.475 * * *$ | 0.400 | -0.257 | 63.8\% |  | 205 | 0.024 | 41.9\% | 43.0\% |
|  | (-0.101) | (3.530) | (-0.527) | (11.927) | (0.512) | (-0.607) |  | 4.78\% |  |  |  |  |
| TPDPS_RW | -0.028 | 0.071*** | -0.904 | 0.572*** | 0.001 | 0.472 | 63.9\% |  | 205 | 0.000 | 30.8\% | 95.3\% |
|  | (-0.798) | (3.229) | (-0.788) | (3.353) | (0.015) | (1.085) |  | 4.78\% |  |  |  |  |
| GG_RW | 0.012 | 0.291 | 0.213 | $0.461 * * *$ | 1.473 | -0.159 | 61.7\% |  | 205 | 0.000 | 23.1\% | 65.6\% |
|  | (0.732) | (1.883) | (0.713) | (9.622) | (0.840) | (-0.746) |  | 4.74\% |  |  |  |  |
| FGHJ_HDZ | -0.008 | 0.421** | -0.004 | 0.445*** | $2.507 * * *$ | -0.277 | 62.7\% |  | 205 | 0.000 | 15.7\% | 69.2\% |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | (-0.440) | (2.680) | (-0.013) | (12.558) | (4.191) | (-2.060) |  | 4.64\% |  |  |  |  |
|  | 0.016 | 0.295 | 0.372 | 0.435*** | -2.003 | 0.056 | 63.1\% |  | 205 | 0.001 | 19.2\% | 79.1\% |
|  | (1.168) | (1.416) | (0.877) | (10.187) | (-0.564) | (0.232) |  | 4.54\% |  |  |  |  |
| GM_HDZ | -0.013 | 0.371 | -1.957 | 0.539*** | 0.149 | -0.076 | 62.4\% |  | 205 | 0.019 | 15.1\% | 70.3\% |
|  | (-0.355) | (1.395) | (-0.748) | (5.695) | (0.088) | (-0.718) |  | 4.47\% |  |  |  |  |
| GLS_Anlst | -0.006 | 0.363 | 0.526 | 0.481*** | 1.937 | -0.136 | 62.1\% |  | 205 | 0.068 | 23.3\% | 43.6\% |
|  | (-0.162) | (1.047) | (0.580) | (7.056) | (1.569) | (-0.757) |  | 4.35\% |  |  |  |  |
| CT_RI | 0.019 | 0.406 | 0.521 | 0.348*** | -0.628 | 0.265 | 60.7\% |  | 205 | 0.040 | 5.3\% | 92.3\% |
|  | (0.628) | (1.418) | (1.000) | (4.009) | (-0.885) | (1.192) |  | 4.25\% |  |  |  |  |
| CT_HDZ | 0.020 | 0.088 | 0.219 | $0.471 * * *$ | 1.233 | -0.114 | 62.5\% |  | 205 | 0.000 | 22.1\% | 71.5\% |
|  | (1.457) | (0.638) | (0.529) | (11.228) | (1.216) | (-0.681) |  | 4.23\% |  |  |  |  |
| PE_Anlst | -0.001 | 0.441 | 0.633 | 0.436*** | 1.112 | 0.097 | 63.8\% |  | 205 | 0.237 | 36.6\% | 34.9\% |
|  | (-0.027) | (0.939) | (0.878) | (8.984) | (0.719) | (0.369) |  | 4.17\% |  |  |  |  |
| TrES_RW_10Ind | 0.224 | -0.335 | -0.115 | 0.552*** | 59.500 | -3.033 | 61.1\% |  | 205 | 0.585 | 16.3\% | 89.0\% |
|  | (0.959) | (-0.137) | (-0.417) | (4.340) | (0.900) | (-0.817) |  | 4.13\% |  |  |  |  |
| GM_Anlst | -0.052 | 0.746*** | 0.314 | 0.476*** | 0.295 | 0.069 | 63.3\% |  | 205 | 0.266 | 25.6\% | 46.5\% |
|  | (-1.577) | (3.274) | (1.418) | (8.174) | (0.552) | (0.441) |  | 4.10\% |  |  |  |  |
| GG_EP | -0.016 | 0.623 | -0.373 | 0.473*** | -3.476 | 0.141 | 62.4\% |  | 205 | 0.739 | 19.9\% | 70.8\% |
|  | (-0.955) | (0.551) | (-1.157) | (9.266) | (-1.030) | (0.309) |  | 4.05\% |  |  |  |  |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_HDZ | 0.016 | 0.207 | 0.616 | 0.459*** | 2.468* | -0.227 | 62.8\% |  | 205 | 0.000 | 21.5\% | 70.3\% |
|  | (0.912) | (1.604) | (0.768) | (10.147) | (2.125) | (-1.744) |  | 3.79\% |  |  |  |  |
| KMY_HDZ | 0.016 | 0.175 | 0.250 | $0.483 * * *$ | 2.416** | -0.230 | 62.7\% |  | 205 | 0.000 | 20.3\% | 64.5\% |
|  | (1.051) | (1.147) | (0.574) | (10.442) | (2.845) | (-1.733) |  | 3.69\% |  |  |  |  |
| GLS_HDZ | -0.014 | 0.466* | -0.009 | $0.445 * * *$ | 2.215*** | -0.242 | 62.7\% |  | 205 | 0.007 | 17.4\% | 63.4\% |
|  | (-0.669) | (2.382) | (-0.026) | (11.657) | (4.203) | (-1.731) |  | 3.67\% |  |  |  |  |
| HL_Anlst | -0.048 | 0.791*** | 0.297 | $0.481 * * *$ | 0.457 | -0.009 | 63.2\% |  | 205 | 0.362 | 24.4\% | 42.4\% |
|  | (-1.708) | (3.459) | (1.534) | (8.121) | (0.865) | (-0.069) |  | 3.62\% |  |  |  |  |
| TrOHE_10Ind | 0.007 | 0.361 | 0.037 | 0.452*** | -2.694 | 0.293 | 60.3\% |  | 205 | 0.261 | 9.3\% | 57.6\% |
|  | (0.100) | (0.639) | (0.213) | (7.351) | (-1.057) | (0.286) |  | 3.50\% |  |  |  |  |
| CAPM_Factor | -0.084 | 5.906 | 0.474 | 0.369*** | 9.892 | 0.459 | 60.8\% |  | 205 | 0.644 | 11.6\% | 16.9\% |
|  | (-0.542) | (0.558) | (1.375) | (8.009) | (0.787) | (0.908) |  | 3.49\% |  |  |  |  |
| DKL_Anlst | -0.049 | 0.782*** | 0.315 | 0.462*** | 0.559 | -0.019 | 63.2\% |  | 205 | 0.331 | 26.2\% | 39.5\% |
|  | (-1.741) | (3.494) | (1.272) | (7.722) | (0.893) | (-0.125) |  | 3.48\% |  |  |  |  |
| WNG_RI | 0.036*** | -0.066 | 0.072 | 0.382*** | -0.070 | 0.073 | 61.9\% |  | 205 | 0.000 | 4.7\% | 94.8\% |
|  | (3.449) | (-1.059) | (0.447) | (11.625) | (-0.377) | (0.637) |  | $3.47 \%$ |  |  |  |  |
| MPEG_Anlst | -0.061 | 0.846*** | 0.184 | 0.475*** | 0.748 | -0.180 | 63.2\% |  | 205 | 0.563 | 21.5\% | 55.2\% |
|  | (-1.933) | (3.185) | (1.516) | (9.756) | (1.061) | (-0.904) |  | 3.46\% |  |  |  |  |
| FPM_RW | 0.029 | 0.021 | 0.180 | 0.376*** | 0.115 | 0.035 | 60.1\% |  | 205 | 0.000 | 6.4\% | 82.6\% |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RI_10Ind | (1.184) | (0.680) | (0.741) | (6.531) | (0.711) | (0.351) |  | 3.38\% |  |  |  |  |
|  | 0.035 | -0.011 | 0.068 | 0.401*** | 0.048 | 0.074 | 60.8\% |  | 205 | 0.000 | 13.4\% | 96.5\% |
|  | (1.803) | (-0.330) | (0.649) | (14.678) | (0.571) | (0.622) |  | 3.36\% |  |  |  |  |
| PE_HDZ | 0.038 | 0.206 | 0.829 | $0.497 * * *$ | 1.741* | 0.535 | 62.6\% |  | 205 | 0.084 | 22.1\% | 61.0\% |
|  | (0.854) | (0.452) | (0.814) | (8.354) | (2.439) | (0.714) |  | 3.33\% |  |  |  |  |
| FGHJ_Anlst | 0.004 | 0.302 | 1.023 | $0.467 * * *$ | 2.537 | -0.135 | 61.9\% |  | 205 | 0.047 | 21.5\% | 42.4\% |
|  | (0.108) | (0.865) | (0.748) | (7.083) | (1.281) | (-1.061) |  | 3.24\% |  |  |  |  |
| KMY_Anlst | -0.068 | 0.325 | -0.042 | 0.531*** | -0.102 | 0.159 | 62.6\% |  | 205 | 0.037 | 20.9\% | 70.9\% |
|  | (-0.840) | (1.013) | (-0.120) | (8.562) | (-0.180) | (0.907) |  | 3.24\% |  |  |  |  |
| TrES_Anlst_10Ind | -21.516 | 50.028 | -4.201 | -3.475 | -12.079 | 131.374 | 60.7\% |  | 205 | 0.430 | 11.0\% | 93.6\% |
|  | (-0.807) | (0.807) | (-0.799) | (-0.721) | (-0.813) | (0.808) |  | 3.21\% |  |  |  |  |
| TrES_EP_10Ind | 0.037 | -0.001 | 0.700 | 0.353*** | 0.053 | 0.100 | 61.5\% |  | 205 | 0.000 | 11.6\% | 96.5\% |
|  | (1.068) | (-0.041) | (1.012) | (3.472) | (0.669) | (0.664) |  | 3.01\% |  |  |  |  |
| FPM_RI | 0.040 | -0.230 | 0.774 | $0.343 * * *$ | 0.237 | -0.034 | 60\% |  | 205 | 0.000 | 11.0\% | 84.3\% |
|  | (1.863) | (-0.992) | (1.082) | (3.689) | (0.736) | (-0.327) |  | 2.85\% |  |  |  |  |
| PE_RW | 0.031 | 0.116 | 0.087 | 0.443*** | -0.383 | -0.011 | 61.2\% |  | 205 | 0.002 | 5.8\% | 86.6\% |
|  | (1.008) | (0.422) | (0.275) | (7.375) | (-0.989) | (-0.071) |  | 2.83\% |  |  |  |  |
| KMY_EP | -0.008 | $0.239 * * *$ | 0.263 | 0.419*** | 0.416* | 0.038 | 61.7\% |  | 205 | 0.000 | 21.5\% | 72.1\% |
|  | (-0.562) | (3.616) | (1.133) | (8.689) | (2.140) | (0.278) |  | 2.80\% |  |  |  |  |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_HDZ_25SBM | -0.006 | -0.003 | -0.551 | 0.544** | -0.010 | 0.714 | 59.7\% |  | 205 | 0.000 | 8.7\% | 93.0\% |
|  | (-0.121) | (-0.100) | $(-0.385)$ | (3.054) | (-0.570) | (0.819) |  | 2.71\% |  |  |  |  |
| TrETSS_Anlst_10Ind | -0.001 | -0.499 | 0.023 | 0.446*** | 0.012 | 0.482 | 60.8\% |  | 205 | 0.024 | 11.0\% | 76.2\% |
|  | $(-0.036)$ | (-0.760) | (0.198) | (10.207) | (0.066) | (1.035) |  | 2.71\% |  |  |  |  |
| Carhart_Factor | 0.087 | -2.121 | -1.634 | 0.439*** | -3.699 | -0.464 | 60.3\% |  | 205 | 0.223 | 8.1\% | 48.3\% |
|  | (1.442) | (-0.831) | $(-0.890)$ | (9.090) | (-0.826) | (-1.641) |  | 2.54\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.051** | -0.010 | -0.017 | 0.407*** | -0.006 | 0.054 | 61.1\% |  | 205 | 0.000 | 5.8\% | 96.5\% |
|  | (2.944) | (-0.804) | $(-0.077)$ | (12.136) | (-0.289) | (0.255) |  | 2.51\% |  |  |  |  |
| GLS_RI | 0.011 | 0.146 | 0.254 | 0.43*** | -7.008 | -0.059 | 62.4\% |  | 205 | 0.000 | 18.6\% | 78.5\% |
|  | (0.667) | (0.622) | (0.891) | (10.078) | (-1.019) | (-0.372) |  | 2.51\% |  |  |  |  |
| PEG_Anlst | 0.002 | 0.426* | 0.228 | 0.466*** | 0.996 | -0.262 | 62.6\% |  | 205 | 0.001 | 15.7\% | 61.0\% |
|  | (0.071) | (2.408) | (0.888) | (10.646) | (0.947) | (-0.923) |  | 2.45\% |  |  |  |  |
| GG_RI | 0.010 | 0.241 | 0.213 | $0.448^{* * *}$ | 1.654 | -0.028 | 61.6\% |  | 205 | 0.008 | 15.6\% | 66.9\% |
|  | (0.829) | (0.850) | (0.789) | (11.813) | (1.718) | (-0.127) |  | 2.45\% |  |  |  |  |
| PEG_HDZ | 0.035* | -0.138 | 0.418 | 0.471*** | 1.57* | -0.157 | 62.5\% |  | 205 | 0.000 | 14.0\% | 73.3\% |
|  | (2.380) | (-0.705) | (0.612) | (8.621) | (2.215) | (-1.279) |  | 2.44\% |  |  |  |  |
| HL_EP | 0.007 | 0.054 | 0.337 | 0.428*** | 0.423* | 0.017 | 61.6\% |  | 205 | 0.000 | 20.9\% | 76.2\% |
|  | (0.282) | (0.322) | (1.254) | (10.210) | (2.127) | (0.110) |  | 2.40\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.040 | -0.013 | 0.436 | 0.417*** | 0.033 | 0.167 | 60.2\% |  | 205 | 0.000 | 9.3\% | 93.0\% |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_EP | (1.219) | (-0.555) | (1.384) | (8.796) | (0.764) | (0.395) |  | 2.37\% |  |  |  |  |
|  | -0.039 | 0.501 | -0.080 | 0.439*** | 0.101 | 0.111 | 61.6\% |  | 205 | 0.131 | 19.8\% | 74.4\% |
|  | (-1.068) | (1.522) | (-0.240) | (10.209) | (0.301) | (0.629) |  | 2.32\% |  |  |  |  |
| PEG_RI | 0.021 | -0.008 | 0.318 | 0.449*** | 0.696*** | 0.015 | 61.4\% |  | 205 | 0.000 | 11.8\% | 92.1\% |
|  | (1.287) | (-0.080) | (0.775) | (7.772) | (4.095) | (0.141) |  | 2.27\% |  |  |  |  |
| GLS_EP | 0.022 | -0.188 | -0.035 | 0.449*** | -2.334 | 0.161 | 61.5\% |  | 205 | 0.025 | 15.1\% | 74.4\% |
|  | (0.834) | (-0.358) | (-0.266) | (14.552) | (-0.622) | (0.358) |  | 2.25\% |  |  |  |  |
| MPEG_HDZ | 0.031 | 0.020 | 0.717 | 0.44*** | 1.431* | -0.138 | 63\% |  | 205 | 0.000 | 17.4\% | 75.0\% |
|  | (1.853) | (0.201) | (0.879) | (10.211) | (2.217) | (-1.289) |  | 2.22\% |  |  |  |  |
| CT_RW | -0.006 | 0.321 | 0.037 | $0.473 * * *$ | -0.701 | -0.066 | 62.2\% |  | 205 | 0.000 | 17.1\% | 79.3\% |
|  | (-0.403) | (1.694) | (0.139) | (10.567) | (-0.353) | (-0.197) |  | 2.15\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.109 | -0.211 | -0.170 | $0.484 * * *$ | 0.280 | -0.541 | 59.7\% |  | 205 | 0.000 | 3.5\% | 92.4\% |
|  | (1.399) | (-1.255) | (-0.646) | (9.314) | (1.183) | (-0.815) |  | 2.14\% |  |  |  |  |
| MPEG_EP | 0.001 | -0.073 | -0.434 | 0.513*** | 1.427*** | -0.161 | 62.4\% |  | 205 | 0.000 | 18.6\% | 82.6\% |
|  | (0.018) | (-0.930) | (-0.566) | (8.858) | (3.107) | (-0.533) |  | 2.12\% |  |  |  |  |
| FGHJ_EP | 0.030 | -0.231 | -0.024 | 0.446*** | 70.367 | 0.130 | 61.6\% |  | 205 | 0.018 | 13.5\% | 79.5\% |
|  | (1.021) | (-0.448) | (-0.195) | (14.761) | (0.701) | (0.341) |  | 2.09\% |  |  |  |  |
| WNG_Anlst | 0.048* | 0.067 | 0.574 | 0.411*** | 0.623 | -0.235 | 59.4\% |  | 205 | 0.000 | 4.7\% | 96.5\% |
|  | (2.191) | (0.898) | (1.053) | (5.136) | (1.591) | (-1.498) |  | 2.05\% |  |  |  |  |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{\text {ICC }}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_25SBM | 0.041*** | 0.014 | 0.563 | 0.404*** | -0.007 | 0.004 | 60.1\% |  | 205 | 0.000 | 5.8\% | 95.9\% |
|  | (4.006) | (1.083) | (0.778) | (10.903) | (-0.897) | (0.039) |  | 2.02\% |  |  |  |  |
| FPM_HDZ | 14.128 | -19.948 | -18.641 | 16.547 | 3959.718 | $-520.305$ | 61.3\% |  | 205 | 0.405 | 18.0\% | 47.7\% |
|  | (0.807) | (-0.796) | (-0.810) | (0.829) | (0.807) | (-0.807) |  | 2.02\% |  |  |  |  |
| CT_EP | -0.004 | 0.300 | 0.358 | 0.422*** | 1.656* | 0.003 | 61.2\% |  | 205 | 0.000 | 18.0\% | 79.1\% |
|  | (-0.165) | (1.777) | (1.260) | (9.861) | (1.965) | (0.011) |  | 1.96\% |  |  |  |  |
| GM_EP | 0.005 | 0.091 | 0.020 | 0.442*** | 1.76** | 0.058 | 62.2\% |  | 205 | 0.000 | 20.9\% | 78.5\% |
|  | (0.302) | (0.745) | (0.096) | (14.974) | (2.614) | (0.283) |  | 1.94\% |  |  |  |  |
| 3FF_Factor | 0.042*** | 0.059 | 0.325 | 0.438*** | 0.585 | 0.095 | 60.1\% |  | 205 | 0.009 | 4.7\% | 34.3\% |
|  | (3.610) | (0.168) | (1.528) | (13.898) | (0.293) | (0.622) |  | 1.89\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.023 | -0.014 | -0.160 | 0.474*** | -0.046 | 0.078 | 60\% |  | 205 | 0.000 | 5.2\% | 90.7\% |
|  | (1.047) | (-0.333) | (-0.320) | (6.654) | (-0.808) | (0.423) |  | 1.78\% |  |  |  |  |
| TrES_HDZ_10Ind | -0.027 | -0.128 | -6.277 | 0.842 | -0.013 | -2.616 | 59.7\% |  | 205 | 0.000 | 18.0\% | 93.6\% |
|  | (-0.208) | (-0.932) | (-0.790) | (1.716) | (-0.751) | (-0.793) |  | 1.77\% |  |  |  |  |
| TrETSS_HDZ_10Ind | -0.022 | 0.337 | -1.925 | 0.606*** | 0.045 | 0.440 | 60.7\% |  | 205 | 0.012 | 13.4\% | 87.2\% |
|  | (-0.207) | (1.285) | (-0.824) | (3.540) | (0.261) | (0.488) |  | 1.72\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.048 | -0.013 | -0.026 | 0.461*** | -0.079 | 0.262 | 60.3\% |  | 205 | 0.000 | 7.0\% | 94.8\% |
|  | (1.701) | (-0.536) | $(-0.037)$ | (8.643) | (-0.611) | (1.119) |  | 1.71\% |  |  |  |  |
| FGHJ_RW | 0.015 | -0.119 | -0.768 | 0.544*** | 2.439 | 0.011 | 61\% |  | 205 | 0.000 | 12.9\% | 85.9\% |

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Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_EP_25SBM | (0.410) | (-0.416) | (-0.866) | (3.461) | (0.900) | (0.025) |  | 1.69\% |  |  |  |  |
|  | 0.035** | 0.003 | 0.221 | 0.412*** | -0.011 | 0.025 | 60.7\% |  | 205 | 0.000 | 8.1\% | 95.3\% |
|  | (2.819) | (0.371) | (0.994) | (12.666) | (-1.320) | (0.309) |  | 1.55\% |  |  |  |  |
| GM_RI | -0.007 | 0.263 | -2.144 | 0.537*** | -1.720 | -0.097 | 62.5\% |  | 205 | 0.005 | 19.9\% | 73.5\% |
|  | (-0.171) | (1.016) | (-0.803) | (5.423) | (-0.885) | (-0.568) |  | 1.47\% |  |  |  |  |
| PEG_EP | 0.015 | -0.012 | 0.176 | $0.445^{* * *}$ | 2.011* | 0.060 | 59.9\% |  | 205 | 0.000 | 18.1\% | 89.2\% |
|  | (1.204) | $(-0.099)$ |  | (10.832) | (2.508) | (0.362) |  | 1.34\% |  |  |  |  |
| WNG_EP | 0.037* | -0.001 | 0.259 | 0.378*** | -0.005 | -0.288 | 59.8\% |  | 205 | 0.000 | 2.3\% | 96.5\% |
|  | (2.192) | (-0.580) | (0.523) | (8.863) | (-0.588) | (-1.213) |  | 1.30\% |  |  |  |  |
| WNG_RW | 0.036* | 0.000 | 0.177 | 0.357*** | 0.009 | 0.025 | 60.8\% |  | 205 | 0.000 | 3.5\% | 96.5\% |
|  | (2.214) | (-0.582) | (1.055) | (10.076) | (1.815) | (0.263) |  | 1.30\% |  |  |  |  |
| FGHJ_RI | -0.033 | 1.015 | 0.118 | 0.444*** | 20.384 | -0.307 | 60.8\% |  | 205 | 0.984 | 14.6\% | 76.0\% |
|  | (-0.756) | (1.361) | (0.482) | (10.618) | (0.857) | (-1.586) |  | 1.18\% |  |  |  |  |
| 5FF_Factor | 0.070 | 0.052 | 0.398 | 0.436*** | 1.615 | -0.169 | 60.4\% |  | 205 | 0.528 | 4.7\% | 29.7\% |
|  | (1.871) | (0.035) | (0.592) | (5.174) | (0.340) | (-0.475) |  | 1.10\% |  |  |  |  |
| HL_RI | 0.036 | 0.014 | 0.638 | 0.371*** | 0.479 | 0.019 | 60.2\% |  | 205 | 0.000 | 12.2\% | 89.5\% |
|  | (1.339) | (0.153) | (1.089) | (4.584) | (0.939) | (0.138) |  | 1.02\% |  |  |  |  |
| KMY_RI | 0.030 | 0.027 | 0.510 | $0.367 * * *$ | 0.322 | 0.167 | 60.5\% |  | 205 | 0.000 | 9.9\% | 82.0\% |
|  | (1.096) | (0.226) | (0.903) | (4.430) | (1.703) | (0.814) |  | 1.00\% |  |  |  |  |

[^38]Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_RW_25SBM | 0.032* | 0.005 | -0.327 | 0.467*** | -0.008 | -0.074 | 61.1\% |  | 205 | 0.000 | 12.8\% | 94.2\% |
|  | (2.035) | (0.394) | (-1.062) | (7.406) | $(-0.448)$ | (-0.333) |  | 0.98\% |  |  |  |  |
| DKL_RW | -0.196 | 0.765 | 1.125 | 0.292 | -5.489 | 2.670 | 61.4\% |  | 205 | 0.795 | 11.0\% | 83.1\% |
|  | (-0.689) | (0.848) | (1.458) | (1.548) | (-0.976) | (1.284) |  | 0.88\% |  |  |  |  |
| MPEG_RI | 2.493 | -11.395 | -0.966 | -0.077 | 0.969 | -32.817 | 61.3\% |  | 205 | 0.387 | 15.1\% | 75.3\% |
|  | (0.815) | (-0.797) | (-0.293) | (-0.120) | (1.545) | (-0.785) |  | 0.83\% |  |  |  |  |
| DKL_RI | 0.037 | 0.010 | 0.514 | 0.374*** | 0.535 | -0.021 | 60.2\% |  | 205 | 0.000 | 11.0\% | 91.3\% |
|  | (1.737) | (0.105) | (1.169) | (5.883) | (1.026) | (-0.190) |  | 0.82\% |  |  |  |  |
| FPM_EP | -0.069 | 0.095*** | -0.104 | 0.435*** | 0.072 | 0.009 | 60.8\% |  | 205 | 0.000 | 19.2\% | 91.9\% |
|  | (-1.490) | (4.568) | (-0.402) | (10.195) | (1.331) | (0.105) |  | 0.70\% |  |  |  |  |
| TrES_RW_25SBM | 0.057* | -5.878 | 0.069 | 0.462*** | -1.522 | -0.016 | 59.9\% |  | 205 | 0.483 | 5.8\% | 87.8\% |
|  | (2.439) | (-0.601) | (0.167) | (8.862) | (-1.358) | (-0.070) |  | 0.57\% |  |  |  |  |
| GM_RW | -0.010 | 0.109*** | 0.040 | 0.449*** | -2.153 | 0.020 | 59.9\% |  | 205 | 0.000 | 14.6\% | 87.1\% |
|  | (-0.737) | (3.726) | (0.287) | (13.760) | (-0.719) | (0.080) |  | 0.56\% |  |  |  |  |
| GLS_RW | 0.029* | 0.075 | 0.323 | 0.444*** | 0.003 | -0.020 | 59.7\% |  | 205 | 0.000 | 7.0\% | 85.5\% |
|  | (1.961) | (0.574) | (1.263) | (12.537) | (0.001) | (-0.098) |  | 0.20\% |  |  |  |  |
| HL_RW | 0.136 | -0.145 | 0.806 | 0.44*** | 0.173 | -0.235 | 60.8\% |  | 205 | 0.000 | 9.9\% | 87.2\% |
|  | (1.940) | (-1.048) | (1.781) | (7.150) | (0.571) | (-0.956) |  | 0.17\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.044** | 0.005 | 0.171 | 0.418*** | -0.048 | 0.162 | 59.7\% |  | 205 | 0.000 | 4.7\% | 94.2\% |

[^39]Table 79 : Capturing Subsequent Return: Small Firms, High Analysts Coverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_RW | (2.865) | (0.272) | (0.654) | (13.242) | (-1.587) | (0.946) |  | 0.12\% |  |  |  |  |
|  | 0.135 | -0.142 | 0.815 | 0.44*** | 0.293 | -0.234 | 60.8\% |  | 205 | 0.000 | 10.5\% | 84.9\% |
|  | (1.925) | (-1.025) | (1.800) | (7.155) | (0.950) | (-0.953) |  | 0.12\% |  |  |  |  |
| PEG_RW | 0.014 | 0.062 | 0.362 | 0.433*** | 0.403 | 0.075 | 59.5\% |  | 205 | 0.000 | 21.7\% | 100.0\% |
|  | (0.712) | (1.233) | (0.998) | (12.013) | (1.388) | (0.492) |  | 0.07\% |  |  |  |  |
| WNG_HDZ | 0.052*** | -0.017 | -0.058 | 0.46*** | 0.212 | -0.184 | 60.3\% |  | 205 | 0.000 | 5.2\% | 96.5\% |
|  | (3.862) | (-1.270) | (-0.303) | (11.103) | (1.314) | (-0.931) |  | 0.06\% |  |  |  |  |
| TrES_RI_25SBM | 0.034* | -0.040 | -1.668 | $0.518^{* * *}$ | 0.067 | -1.007 | 59.5\% |  | 205 | 0.000 | 9.3\% | 96.5\% |
|  | (2.086) | (-0.804) | (-0.749) | (3.265) | (0.730) | (-0.840) |  | -0.20\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.014 | -0.041 | 0.042 | $0.432^{* * *}$ | -0.017 | -0.038 | 60.5\% |  | 205 | 0.000 | 12.2\% | 92.4\% |
|  | (0.996) | (-0.717) | (0.437) | (14.217) | (-0.154) | (-0.243) |  | -0.26\% |  |  |  |  |
| MPEG_RW | -0.007 | 0.168*** | 0.058 | 0.444*** | 0.523** | -0.080 | 59.8\% |  | 205 | 0.000 | 14.3\% | 94.6\% |
|  | (-0.350) | (3.234) | (0.489) | (15.594) | (2.931) | (-0.672) |  | -0.51\% |  |  |  |  |
| TrOHE_25SBM | 0.030 | -0.128 | -1.288 | 0.437*** | 0.112 | 0.108 | 59.8\% |  | 205 | 0.000 | 9.3\% | 80.2\% |
|  | (1.467) | (-0.809) | (-0.728) | (6.767) | (0.992) | (0.696) |  | -1.14\% |  |  |  |  |

For the highest quartile of firms in terms of analysts coverage, this table reports average monthly regression coefficients of one year subsequent return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents
how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_HDZ | -0.023 | 0.444 | 0.159 | 0.427*** | 0.092 | 0.239 | 65.3\% | 3.59\% | 205 | 0.016 | 34.4\% | $33.1 \%$ |
|  | (-0.624) | (1.952) | (0.430) | (12.441) | (0.139) | (0.582) |  |  |  |  |  |  |
| BP_Anlst | 0.017 | 0.616*** | 0.448*** | 0.427*** | 0.716*** |  | 64.9\% | 3.57\% | 205 | 0.000 | $32.5 \%$ | 28.6\% |
|  | (1.428) | (6.140) | (3.864) | (12.514) | (3.647) | (-1.680) |  |  |  |  |  |  |
| MPEG_EP | 0.038 | -0.085 | 0.471 | $0.436 * * *$ | 0.564 |  | 64\% | 3.06\% | 205 | 0.000 | 13.6\% | 85.7\% |
|  | (1.259) | (-0.934) | (1.315) | (12.468) | (1.308) | (-1.219) |  |  |  |  |  |  |
| TPDPS_HDZ | -0.024 | 0.051 | 0.053 | 0.414*** | 0.038 | 0.357 | 65.5\% | 3.02\% | 205 | 0.000 | 29.2\% | 93.5\% |
|  | (-0.494) | (1.124) | (0.112) |  | (0.248) |  |  |  |  |  |  |  |
| TrOHE_10Ind | 0.039** | 0.113 | 0.43** | 0.395*** | -0.235 | -0.181 | 63.3\% | 3.00\% | 205 | 0.000 | 11.0\% | 40.3\% |
|  | (2.867) | (0.647) | (2.996) | (7.945) | (-0.675) | (-1.507) |  |  |  |  |  |  |
| TPDPS_Anlst | 0.017 | 0.066 | 0.433*** | 0.425*** | $0.15 * * *$ | -0.097 | 65.1\% | 2.87\% | 205 | 0.000 | 29.2\% | 92.2\% |
|  | (1.683) | (1.855) | (3.923) | (13.089) | (4.514) | (-1.409) |  |  |  |  |  |  |
| KMY_EP | 0.067 | -0.174 | 0.487 | $0.422 * * *$ | 0.231 | -0.110 | 63.4\% | 2.73\% | 205 | 0.000 | 11.0\% | 70.8\% |
|  | (1.587) | (-0.874) | (1.056) | (11.266) | (0.211) | (-0.627) |  |  |  |  |  |  |
| PEG_HDZ | 0.005 | 0.192 | 0.548 | $0.401 * * *$ | -0.072 | -0.086 | 63.7\% | 2.65\% | 205 | 0.000 | 13.0\% | 66.9\% |
|  | (0.157) | (1.343) | (1.940) | (9.585) | (-0.061) | (-0.741) |  |  |  |  |  |  |
| TrES_Anlst _10Ind | 0.005 | 0.008 | 0.362 | 0.354*** | -0.006 | 0.202 | 62.8\% | 2.60\% | 205 | 0.000 | 9.1\% | 90.9\% |
|  | (0.140) | (0.257) | (1.524) | (9.371) | (-0.106) | (0.573) |  |  |  |  |  |  |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Naive | 0.02* | 0.063* | $0.411 * * *$ | $0.427 * * *$ | 0.162*** | -0.102 | 64.9\% | 2.60\% | 205 | 0.000 | 26.6\% | 92.2\% |
|  | (2.008) | (2.189) | (3.808) | (13.248) | (4.602) | (-1.486) |  |  |  |  |  |  |
| MPEG_HDZ | -0.009 | 0.193* | 1.056 | 0.404*** | -1.764 | -0.233 | 63.5\% | 2.52\% | 205 | 0.000 | 14.3\% | 73.4\% |
|  | (-0.271) | (1.969) | (1.429) | (8.771) | (-0.730) | (-1.032) |  |  |  |  |  |  |
| BP_RW | -0.025 | 0.173 | -0.044 | $0.411^{* * *}$ | -0.077 | 0.314 | 63.9\% | 2.44\% | 205 | 0.022 | 25.5\% | 40.5\% |
|  | (-0.504) | (0.482) | (-0.085) | (12.739) | (-0.088) | (0.560) |  |  |  |  |  |  |
| GM_EP | 0.050 | -0.072 | 0.629 | $0.444^{* * *}$ | 0.614 | -0.234 | 63.8\% | 2.41\% | 205 | 0.000 | 14.3\% | 80.5\% |
|  | (1.525) | (-0.693) | (1.659) | (9.839) | (1.183) | (-1.119) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.048* | 0.063 | 0.447* | $0.436 * * *$ | 0.001 | -0.254 | 62.8\% | 2.37\% | 205 | 0.000 | 10.4\% | 52.6\% |
|  | (2.369) | (0.631) | (2.295) | (6.953) | (0.007) | (-1.246) |  |  |  |  |  |  |
| WNG_EP | $0.043^{* *}$ | $0.019$ | 0.46* | $0.357 * * *$ | 0.011 | 0.072 | 61.8\% | 2.37\% | 205 | 0.000 | 5.8\% | 95.5\% |
|  | (2.987) | (1.011) | (2.049) | (10.794) | (0.113) | (0.581) |  |  |  |  |  |  |
| WNG_RI | 0.034* | 0.039 | 0.203 | 0.412*** | -0.440 | -0.086 | 62.1\% | 2.36\% | 205 | 0.000 | 5.8\% | 98.1\% |
|  | (2.164) | (0.796) | (0.956) | (11.268) | (-0.459) | (-1.766) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.03* | -0.016 | 0.101 | 0.399*** | 0.020 | -0.217 | 62.5\% | 2.33\% | 205 | 0.000 | 9.1\% | 93.5\% |
|  | (2.210) | (-0.260) | (0.593) | (11.303) | (0.252) | (-1.813) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.034 | 0.027 | 0.332 | $0.299 * * *$ | 0.015 | -0.242 | 63.7\% | 2.18\% | 205 | 0.000 | 13.0\% | 97.4\% |
|  | (1.108) | (1.821) | (1.312) | (4.194) | (0.688) | (-0.903) |  |  |  |  |  |  |
| PEG_EP | 0.046 | 0.022 | 0.776* | $0.406 * * *$ | 0.614 | 0.003 | 63.2\% | 2.17\% | 205 | 0.000 | 10.1\% | 97.1\% |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_EP | (1.728) | (0.288) | (2.029) | (7.042) | (1.195) | (0.026) |  |  |  |  |  |  |
|  | 0.081 | -0.111 | 0.324 | 0.419*** | 1.986 | -0.395 | 63.4\% | 2.16\% | 205 | 0.000 | 12.6\% | 69.9\% |
|  | (1.946) | (-0.503) | (0.671) | (7.588) | (1.864) | (-1.478) |  |  |  |  |  |  |
| CAPM_Factor | 0.039 | -0.107 | 0.603** | 0.382*** | -1.034 | -0.195 | 62.6\% | 2.15\% | 205 | 0.828 | 10.4\% | 13.0\% |
|  | (0.503) | (-0.021) | (2.627) | (6.915) | (-0.068) | (-1.289) |  |  |  |  |  |  |
| FPM_RW | 0.878 | -1.528 | 8.346 | -0.678 | 0.148 | 8.028 | 63.1\% | 2.06\% | 205 | 0.189 | 13.0\% | 74.7\% |
|  | (0.822) | (-0.797) | (0.820) | (-0.500) | (0.127) | (0.805) |  |  |  |  |  |  |
| HL_EP | -0.001 | 0.298 | 1.225 | 0.39*** | -1.558 | 0.330 | 63\% | 2.06\% | 205 | 0.174 | 11.0\% | 81.8\% |
|  | (-0.007) | (0.579) | (1.495) | (7.258) | (-0.655) | (0.759) |  |  |  |  |  |  |
| TPDPS_EP | 0.017 | 0.037 | 0.403*** | 0.41*** | 0.106*** | -0.019 | 63.9\% | 2.03\% | 205 | 0.000 | 21.4\% | 96.8\% |
|  | (1.873) | (1.439) | (4.196) | (13.175) | (3.814) | (-0.378) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.015 | -0.156 | 0.415 | 0.396*** | 0.058 | -0.071 | 62.3\% | 2.03\% | 205 | 0.000 | 7.1\% | 91.6\% |
|  | (1.108) | (-2.086) | (1.767) | (11.175) | (1.108) | (-1.451) |  |  |  |  |  |  |
| MPEG_RW | 0.044 | 0.030 | 0.644 | 0.424*** | 0.376 | -0.063 | 63\% | 1.96\% | 205 | 0.000 | 13.8\% | 85.5\% |
|  | (1.132) | (0.509) | (1.502) | (11.762) | (1.445) | (-0.621) |  |  |  |  |  |  |
| GLS_RW | 0.057* | 0.025 | 0.399 | 0.412*** | -0.131 | -0.213 | 62\% | 1.92\% | 205 | 0.000 | 9.7\% | 77.3\% |
|  | (2.457) | (0.340) | (1.241) | (11.711) | (-0.379) | (-1.649) |  |  |  |  |  |  |
| CT_RW | 0.010 | 0.110 | -0.007 | $0.402 * * *$ | 1.047 | -0.249 | 63.1\% | 1.92\% | 205 | 0.000 | 12.5\% | 89.0\% |
|  | (0.208) | (0.516) | (-0.015) | (10.155) | (1.548) | (-2.125) |  |  |  |  |  |  |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RW | 0.040 | 0.102 | 0.507 | 0.451*** | 1.489* | -0.099 | 62.9\% | 1.91\% | 205 | 0.000 | 16.8\% | 71.2\% |
|  | (1.213) | (0.651) | (1.408) | (9.841) | (2.111) | (-0.882) |  |  |  |  |  |  |
| KMY_RI | 0.020 | 0.010 | 0.023 | 0.419*** | -0.508 | -0.186 | 62.2\% | 1.91\% | 205 | 0.000 | 8.4\% | 76.0\% |
|  | (0.799) | (0.048) | (0.069) | (9.113) | (-0.458) | (-1.880) |  |  |  |  |  |  |
| TPDPS_RI | -0.003 | 0.023 | 0.192 | $0.417^{* * *}$ | 0.048 | 0.155 | 64.2\% | 1.84\% | 205 | 0.000 | 23.4\% | 96.8\% |
|  | (-0.120) | (0.638) | (0.759) | (13.182) | (0.589) | (0.535) |  |  |  |  |  |  |
| MPEG_Anlst | 0.023 | 0.146 | 0.352** | 0.402*** | -0.020 | -0.185 | 62.6\% | 1.78\% | 205 | 0.000 | 13.0\% | 47.4\% |
|  | (1.409) | (1.183) | (2.647) | (9.841) | (-0.049) | (-1.915) |  |  |  |  |  |  |
| PEG_Anlst | 0.030 | -0.031 | 0.469* | $0.386^{* * *}$ | -0.797 | -0.041 | 62.6\% | 1.70\% | 205 | 0.000 | 12.3\% | 55.2\% |
|  | (1.037) | (-0.147) | (2.486) | (9.684) | (-0.626) | (-0.278) |  |  |  |  |  |  |
| KMY_RW | -0.106 | 0.310 | 0.581 | $0.432 * * *$ | 0.212 | 0.309 | 62.4\% | 1.68\% | 205 | 0.120 | 7.1\% | 76.0\% |
|  | (-0.527) | (0.705) | (1.142) | (12.568) | (0.535) | (0.603) |  |  |  |  |  |  |
| GM_HDZ | 0.004 | -0.031 | 0.514* | 0.402*** | -1.654 | -0.064 | 62.9\% | 1.66\% | 205 | 0.000 | 13.6\% | 65.6\% |
|  | (0.096) | (-0.161) | (2.470) | (9.894) | (-0.537) | (-0.330) |  |  |  |  |  |  |
| Carhart_Factor | 0.068* | 1.272 | 0.929 | 0.373*** | 62.789 | 0.443 | 62.3\% | 1.62\% | 205 | 0.881 | 7.8\% | 28.6\% |
|  | (2.035) | (0.702) | (1.132) | (9.673) | (0.846) | (0.414) |  |  |  |  |  |  |
| GG_RI | 0.034* | 0.049 | 0.371 | $0.41^{* * *}$ | 1.513 | -0.072 | 62.4\% | 1.62\% | 205 | 0.000 | 9.1\% | 69.2\% |
|  | (2.518) | (0.335) | (1.591) | (8.364) | (1.755) | (-0.611) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.032 | 0.015 | 0.388 | 0.367*** | 0.069 | -0.068 | 62.7\% | 1.59\% | 205 | 0.000 | 8.4\% | 97.4\% |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_HDZ | (1.744) | (0.897) | (1.518) | (7.552) | (0.726) | (-1.119) |  |  |  |  |  |  |
|  | 0.010 | 0.293** | 0.466** | $0.393 * * *$ | 0.349 | -0.086 | 63.2\% | 1.57\% | 205 | 0.000 | 18.2\% | 55.2\% |
|  | (0.694) | (2.810) | (2.827) | (8.083) | (0.583) | (-0.831) |  |  |  |  |  |  |
| DKL_RW | 0.171 | -0.318 | 0.756 | $0.439^{* * *}$ | 2.394 | -0.413 | 62.2\% | 1.53\% | 205 | 0.000 | 7.1\% | 81.2\% |
|  | (1.291) | (-0.898) | (0.911) | (10.977) | (0.944) | (-1.071) |  |  |  |  |  |  |
| FGHJ_RI | 0.049 | -0.086 | 0.316 | $0.465 * * *$ | 13.295 | -0.175 | 62.3\% | 1.53\% | 205 | 0.002 | 8.8\% | 83.8\% |
|  | (1.547) | (-0.249) | (1.371) | (5.770) | (0.969) | (-2.098) |  |  |  |  |  |  |
| DKL_EP | 0.055 | -0.021 | 0.765 | 0.42*** | -0.062 | 0.058 | 62.4\% | 1.53\% | 205 | 0.000 | 11.0\% | 77.9\% |
|  | (1.098) | (-0.105) | (1.458) | (11.457) | (-0.095) | (0.479) |  |  |  |  |  |  |
| HL_RW | -0.100 | 0.320 | 0.671 | $0.433 * * *$ | 0.135 | 0.320 | 62.2\% | 1.51\% | 205 | 0.124 | 6.5\% | 81.2\% |
|  | (-0.493) | (0.729) | (1.088) | (12.330) | (0.341) | (0.622) |  |  |  |  |  |  |
| BP_RI | -0.007 | 0.298 | 0.163 | 0.42*** | $0.032$ | 0.130 | 62.8\% | 1.49\% | 205 | 0.000 | 25.7\% | 48.0\% |
|  | (-0.247) | (1.723) | (0.589) | (12.339) | (0.059) | (0.421) |  |  |  |  |  |  |
| GM_RW | 0.052 | -0.016 | 0.825 | 0.435*** | 0.686 | -0.123 | 62.8\% | 1.46\% | 205 | 0.000 | 8.7\% | 84.7\% |
|  | (0.924) | (-0.154) | (1.477) | (10.518) | (1.470) | (-1.057) |  |  |  |  |  |  |
| FGHJ_RW | 0.044* | 0.041 | 0.400 | 0.402*** | 0.279 | -0.236 | 61.9\% | 1.45\% | 205 | 0.000 | 12.6\% | 86.0\% |
|  | (2.045) | (0.505) | (1.356) | (10.623) | (1.150) | (-1.436) |  |  |  |  |  |  |
| FPM_EP | 0.042 | 0.015 | 0.664 | 0.352 *** | 0.138 | 0.158 | 62.4\% | 1.45\% | 205 | 0.000 | 10.4\% | 84.4\% |
|  | (1.199) | (0.575) | (1.311) | (6.665) | (1.385) | (0.433) |  |  |  |  |  |  |

Continued in next page...

Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_HDZ | 0.034* | 0.166 | 0.496*** | $0.391 * * *$ | 0.589 | -0.257 | 63.2\% | 1.42\% | 205 | 0.000 | 16.2\% | 56.5\% |
|  | (2.207) | (1.217) | (3.124) | (7.340) | (1.266) | (-1.127) |  |  |  |  |  |  |
| GG_HDZ | 0.008 | 0.341 ** | 0.352** | 0.446*** | 1.601** | -0.134 | 63.6\% | 1.41\% | 205 | 0.000 | 26.0\% | 48.7\% |
|  | (0.562) | (2.744) | (2.942) | (10.977) | (2.846) | (-1.509) |  |  |  |  |  |  |
| HL_Anlst | 0.005 | 0.321 | 0.509** | $0.421^{* * *}$ | 0.599 | -0.109 | 62.2\% | 1.38\% | 205 | 0.000 | 15.6\% | 39.0\% |
|  | (0.213) | (1.721) | (2.579) | (9.780) | (1.391) | (-1.048) |  |  |  |  |  |  |
| GLS_RI | 0.056* | -0.008 | 0.237 | $0.375 * * *$ | 2.463 | -0.418 | 62.2\% | 1.38\% | 205 | 0.000 | 10.8\% | 80.4\% |
|  | (2.548) | (-0.041) | (1.346) | (5.127) | (1.245) | (-1.216) |  |  |  |  |  |  |
| HL_HDZ | -0.002 | 0.304** | 0.569* | 0.407*** | -0.638 | -0.078 | 62.9\% | 1.38\% | 205 | 0.000 | 18.2\% | 64.3\% |
|  | (-0.129) | (2.775) | (2.341) | (8.245) | (-0.540) | (-0.770) |  |  |  |  |  |  |
| PEG_RW | -0.147 | 0.370 | 0.688 | 0.433*** | -4.316 | -2.236 | 62.2\% | 1.37\% | 205 | 0.342 | 14.6\% | 100.0\% |
|  | (-0.454) | (0.561) | (1.061) | (7.994) | (-0.501) | (-0.585) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | -0.028 | 0.234 | 0.342 | $0.361^{* * *}$ | -0.832 | 1.145 | 62.1\% | 1.35\% | 205 | 0.014 | 9.1\% | 81.8\% |
|  | (-0.297) | (0.758) | (1.687) | (7.113) | (-0.751) | (0.656) |  |  |  |  |  |  |
| CT_HDZ | 0.005 | 0.3* | 0.424*** | 0.455*** | 0.726 | -0.063 | 63.1\% | 1.35\% | 205 | 0.000 | 16.9\% | 62.3\% |
|  | (0.320) | (2.176) | (3.118) | (10.062) | (1.312) | (-0.799) |  |  |  |  |  |  |
| BP_EP | 0.015 | 0.412*** | $0.427^{* * *}$ | $0.416 * * *$ | 0.470 | -0.116 | 62.9\% | 1.29\% | 205 | 0.000 | 25.0\% | 52.0\% |
|  | (1.446) | (4.710) | (3.297) | (12.253) | (1.473) | (-1.611) |  |  |  |  |  |  |
| FPM_HDZ | 0.027 | 0.164 | 0.403** | $0.521^{* * *}$ | 1.015 | -0.227 | 62.2\% | 1.28\% | 205 | 0.000 | 12.3\% | 44.2\% |

[^40]Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | (1.493) | (0.707) | (2.578) | (4.549) | (1.562) | (-1.894) |  |  |  |  |  |  |
|  | -0.001 | 0.544*** | $0.475 * * *$ | 0.419*** | 0.984 | -0.076 | 62.2\% | 1.27\% | 205 | 0.002 | 20.8\% | 23.4\% |
|  | (-0.052) | (3.724) | (4.305) | (12.562) | (1.224) | (-0.519) |  |  |  |  |  |  |
| DKL_HDZ | -0.004 | 0.392* | 0.51** | 0.403*** | 0.440 | 0.008 | 62.6\% | 1.23\% | 205 | 0.000 | 16.9\% | 59.1\% |
|  | (-0.210) | (2.365) | (2.597) | (7.811) | (0.293) | (0.061) |  |  |  |  |  |  |
| DKL_RI | 0.034 | -0.115 | 0.027 | 0.404*** | -0.155 | -0.127 | 61.4\% | 1.22\% | 205 | 0.000 | 9.7\% | 89.6\% |
|  | (1.232) | (-0.452) | (0.109) | (11.177) | (-0.184) | (-1.497) |  |  |  |  |  |  |
| DKL_Anlst | 0.026 | 0.154 | 0.459* | 0.42*** | 0.765 | -0.177 | 62.2\% | 1.22\% | 205 | 0.000 | 15.6\% | 31.2\% |
|  | (1.125) | (0.813) | (2.262) | (9.675) | (1.614) | (-1.509) |  |  |  |  |  |  |
| CT_EP | -0.749 | 5.156 | 5.354 | 0.056 | -20.808 | 4.535 | 62.1\% | 1.22\% | 205 | 0.486 | 8.4\% | 84.4\% |
|  | (-0.825) | (0.867) | (0.692) | (0.126) | (-0.636) | (0.744) |  |  |  |  |  |  |
| FPM_RI | 0.025 | 0.029 | 0.316** | 0.456*** | -0.144 | -0.056 | 62.5\% | 1.18\% | 205 | 0.000 | 11.0\% | 83.1\% |
|  | (1.623) | (0.489) | (2.689) | (8.645) | (-1.116) | (-1.258) |  |  |  |  |  |  |
| 5FF_Factor | 0.037*** | -0.050 | 0.337** | 0.424*** | -0.447 | -0.095 | 62\% | 1.17\% | 205 | 0.000 | 8.4\% | 25.3\% |
|  | (3.509) | (-0.275) | (2.706) | (9.454) | (-0.154) | (-0.933) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.057** | -1.056 | 0.609* | 0.375*** | -0.386 | -0.238 | 62\% | 1.15\% | 205 | 0.092 | 9.7\% | 93.5\% |
|  | (2.735) | (-0.870) | (2.245) | (6.195) | (-0.360) | (-1.602) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.030 | -0.007 | 0.296 | 0.383*** | 0.005 | -0.058 | 61.5\% | 1.14\% | 205 | 0.000 | 11.7\% | 97.4\% |
|  | (1.933) | (-0.339) | (1.905) | (10.011) | (0.120) | (-0.527) |  |  |  |  |  |  |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_Anlst | 0.605 | -1.721 | $0.421$ | $0.433 * * *$ | 2.426 | 1.357 | 62\% | 1.12\% | 205 | 0.196 | 11.0\% | 79.2\% |
|  | (0.877) | (-0.821) | (1.732) | (4.896) | (0.855) | (0.716) |  |  |  |  |  |  |
| TrES_RW_25SBM | $0.034 * * *$ | -0.148 | 0.488* | $0.406 * * *$ | -7.180 | -0.043 | 61.3\% | 1.08\% | 205 | 0.000 | 5.2\% | 93.5\% |
|  | (3.196) | (-1.220) | (2.123) | (6.646) | (-0.754) | (-0.354) |  |  |  |  |  |  |
| 3FF_Factor | -0.124 | -0.057 | -0.115 | 0.37*** | -31.467 | 1.043 | 61.9\% | 1.07\% | 205 | 0.000 | 9.1\% | 25.3\% |
|  | (-0.584) | (-0.193) | (-0.221) | (6.108) | (-0.660) | (0.659) |  |  |  |  |  |  |
| CT_Anlst | 0.021 |  | 0.385** | $0.419 * * *$ |  | -0.162 | 62\% | 1.06\% | 205 | 0.001 | 16.2\% | 42.2\% |
|  | (0.827) | (1.288) | (2.643) | (8.470) |  | (-1.612) |  |  |  |  |  |  |
| KMY_Anlst | -0.010 | 0.204 | $0.379 * * *$ | $0.424 * * *$ | 0.113 | -0.143 | 62.3\% | 1.04\% | 205 | 0.003 | 14.3\% | 62.3\% |
|  | (-0.171) | (0.769) | (3.212) |  |  | (-1.230) |  |  |  |  |  |  |
| GM_Anlst | 0.018 | 0.194 | 0.351*** | 0.412*** | 0.468 | -0.234 | 62\% | 1.02\% | 205 | 0.000 | 13.0\% | 35.1\% |
|  | (1.269) | (1.498) | (3.304) | (12.496) | (1.672) | (-2.454) |  |  |  |  |  |  |
| GM_RI | 0.010 | 0.039 | 0.296** | 0.42*** | 0.313 | -0.052 | 62.9\% | 0.92\% | 205 | 0.000 | 11.0\% | 76.0\% |
|  | (0.919) | (0.577) | (3.078) | (11.541) | (0.938) | (-0.884) |  |  |  |  |  |  |
| PE_RI | 0.026 | -0.080 | 0.339* | 0.431*** | -0.411 | -0.052 | 63.2\% | 0.91\% | 205 | 0.000 | 9.7\% | 83.1\% |
|  | (0.978) | (-0.321) | (2.002) | (9.291) | (-0.156) | (-0.316) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.041*** | 0.015 | 0.184 | $0.378 * * *$ | -0.024 | -0.131 | 62.2\% | 0.91\% | 205 | 0.000 | 9.7\% | 96.8\% |
|  | (3.474) | (0.826) | (1.165) | (12.405) | (-0.932) | (-1.654) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.035 | 0.372 | 0.192 | $0.442 * * *$ | -0.606 | 0.077 | 61.7\% | 0.90\% | 205 | 0.129 | 13.6\% | 33.8\% |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_10Ind | (-0.417) | (0.904) | (1.115) | (9.258) | (-0.240) | (0.196) |  |  |  |  |  |  |
|  | 0.035** | 0.095 | 0.443* | $0.421^{* * *}$ | -0.538 | -0.044 | 62.8\% | 0.86\% | 205 | 0.000 | 10.4\% | 81.2\% |
|  | (3.047) | (1.306) | (2.064) | (12.466) | (-1.048) | (-0.699) |  |  |  |  |  |  |
| GLS_Anlst | 0.075 | $-0.124$ | 0.269 | $0.475 * * *$ | 2.887 | -0.459 | 61.7\% | 0.83\% | 205 | 0.007 | 14.9\% | 38.3\% |
|  | (1.020) | $(-0.300)$ | (1.511) | (9.959) | (1.330) | (-1.370) |  |  |  |  |  |  |
| TPDPS_RW | 0.026** | 0.062* | $0.306 * * *$ | $0.419^{* * *}$ | 0.107* | -0.059 | 62.5\% | 0.82\% | 205 | 0.000 | 14.9\% | 96.1\% |
|  | (2.871) | (2.080) | (3.216) | (13.462) | (2.212) | (-1.317) |  |  |  |  |  |  |
| MPEG_RI | -0.006 | 0.093 | 0.252* | $0.413^{* * *}$ | 0.253 | -0.090 | 62.6\% | 0.82\% | 205 | 0.000 | 10.4\% | 75.3\% |
|  | (-0.500) | (1.876) | (2.452) | (11.464) | (1.048) | (-1.256) |  |  |  |  |  |  |
| TrES_Anlst _25SBM | $0.031^{* *}$ | 0.001 | 0.165 | $0.386 * * *$ | -0.005 | -0.135 | 61.7\% | 0.77\% | 205 | 0.000 | 5.8\% | 97.4\% |
|  | (2.617) | (0.071) | (1.049) | (11.751) | (-0.631) | (-2.311) |  |  |  |  |  |  |
| WNG_RW | 0.05*** | $0.001$ | $0.329 * *$ | $0.372 * * *$ | 0.018 | -0.118 | 60.9\% | 0.77\% | 205 | 0.000 | 4.0\% | 100.0\% |
|  | (4.533) | (0.795) | (2.654) | (11.616) | (0.620) | (-2.515) |  |  |  |  |  |  |
| WNG_HDZ | 0.025 | -0.002 | -0.768 | 0.412*** | -0.044 | -1.003 | 62\% | 0.73\% | 205 | 0.000 | 9.1\% | 95.5\% |
|  | (1.283) | (-0.046) | (-0.571) | (12.432) | (-0.188) | (-0.735) |  |  |  |  |  |  |
| HL_RI | 0.003 | 0.166 | 0.136 | 0.398*** | -0.289 | -0.133 | 61.7\% | 0.73\% | 205 | 0.000 | 11.7\% | 89.6\% |
|  | (0.094) | (0.806) | (1.039) | (11.104) | (-0.763) | (-1.684) |  |  |  |  |  |  |
| PE_RW | 0.004 | -0.053 | 0.211 | 0.42*** | 0.191 | 0.001 | 62.2\% | 0.67\% | 205 | 0.000 | 5.9\% | 81.0\% |
|  | (0.148) | (-0.902) | (1.373) | (10.559) | (0.849) | (0.006) |  |  |  |  |  |  |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | 0.028 | 0.088 | 0.301*** | 0.429*** | 0.898 | -0.141 | 62.3\% | 0.51\% | 205 | 0.000 | 13.0\% | 24.7\% |
|  | (1.541) | (0.502) | (3.215) | (9.900) | (1.203) | (-0.979) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.038* | 0.025 | 0.158 | 0.361 *** | -0.062 | -0.131 | 61.3\% | 0.50\% | 205 | 0.000 | 9.1\% | 90.3\% |
|  | (2.222) | (0.814) | (1.058) | (9.920) | (-1.293) | (-1.714) |  |  |  |  |  |  |
| PE_EP | 0.018 | 0.397 | 0.209 | 0.397*** | -0.290 | -0.155 | 62.1\% | 0.49\% | 205 | 0.023 | 11.7\% | 81.8\% |
|  | (1.274) | (1.507) | (0.907) | (8.525) | (-0.175) | (-1.203) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.052* | -0.077 | 0.473 | 0.405*** | -0.146 | 0.155 | 59.7\% | 0.46\% | 205 | 0.000 | 1.3\% | 86.4\% |
|  | (2.183) | (-0.753) | (1.489) | (11.581) | (-0.715) |  |  |  |  |  |  |  |
| FGHJ_EP | 0.051** | 0.023 | 0.653** | 0.386*** | 1.079 | -0.241 | 60.9\% | 0.08\% | 205 | 0.000 | 8.0\% | 88.7\% |
|  |  | (0.305) | (2.664) | (6.942) | (1.020) | (-1.133) |  |  |  |  |  |  |
| PEG_RI | 0.034* | 0.039 | 0.484* | $0.388^{* * *}$ | 0.566 | -0.167 | 60\% | 0.04\% | 205 | 0.000 | 6.9\% | 88.3\% |
|  | (2.374) | (0.462) | (2.085) | (6.835) | (1.936) | (-1.226) |  |  |  |  |  |  |
| CT_RI | 0.032* | 0.118 | 0.534 | 0.42 *** | -0.111 | -0.060 | 61.3\% | 0.02\% | 205 | 0.013 | 5.9\% | 93.5\% |
|  | (2.016) | (0.336) | (1.891) | (12.295) | (-0.103) | (-0.784) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.059** | -0.016 | 0.304* | $0.356 * * *$ | 0.036 | -0.022 | 59.8\% | 0.02\% | 205 | 0.000 | 6.5\% | 97.4\% |
|  | (2.697) | (-0.823) | (2.368) | (12.162) | (0.952) | (-0.240) |  |  |  |  |  |  |
| FGHJ_HDZ | -0.009 | $0.437 * * *$ | $0.476 * * *$ | $0.438 * * *$ | 0.639 | -0.180 | 62.1\% | -0.04\% | 205 | 0.000 | 14.3\% | 63.6\% |
|  | (-0.407) | (3.126) | (4.199) | (9.889) | (1.079) | (-0.822) |  |  |  |  |  |  |
| GLS_HDZ | 0.001 | 0.384** | 0.444*** | 0.432*** | 0.773 | -0.223 | 62\% | -0.05\% | 205 | 0.000 | 16.9\% | 58.4\% |

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Table 80 : Capturing Subsequent Return: Low Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_25SBM | (0.064) | (3.051) | (4.028) | (9.669) | (1.399) | $(-0.948)$ |  |  |  |  |  |  |
|  | 0.020 | 0.080 | 0.231 | 0.406*** | -0.011 | -0.029 | 61.4\% | -0.11\% | 205 | 0.000 | 5.8\% | 80.5\% |
|  | (1.381) | (0.793) | (1.110) | (12.138) | (-0.155) | (-0.224) |  |  |  |  |  |  |
| GLS_EP | 0.029* | 0.095 | 0.443* | 0.419*** | -0.562 | -0.090 | 61.2\% | -0.23\% | 205 | 0.000 | 7.3\% | 84.0\% |
|  | (2.005) | (0.873) | (2.058) | (7.393) | (-0.334) | (-0.932) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.032** | 0.020 | 0.166 | 0.38*** | 0.003 | -0.112 | 59.7\% | -0.50\% | 205 | 0.000 | 3.2\% | 96.1\% |
|  | (2.972) | (1.205) | (1.502) | $(11.135)$ | (0.143) | (-1.891) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.05* | -0.055 | -0.120 | 0.391*** | 0.170 | -0.757 | 60.1\% | -0.53\% | 205 | 0.000 | 3.9\% | 96.8\% |
|  | (2.162) | (-0.606) | (-0.217) | (10.020) | (0.721) | (-0.867) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.038*** | -0.003 | 0.215 | $0.336 * * *$ | -0.003 | -0.076 | 59.1\% | -0.91\% | 205 | 0.000 | 4.5\% | 97.4\% |
|  | (3.848) | (-0.492) | (1.683) | (8.299) | (-0.705) | (-2.008) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.034*** | 0.016 | 0.171 | $0.384 * * *$ | 0.007 | -0.124 | 58.8\% | -0.94\% | 205 | 0.000 | 4.5\% | 96.8\% |
|  | (3.218) | (0.700) | (1.280) | (10.801) | (0.332) | (-1.917) |  |  |  |  |  |  |
| WNG_Anlst | 0.045** | 0.040 | 0.455* | 0.393*** | 0.272 | -0.198 | 58.5\% | -1.64\% | 205 | 0.000 | 5.2\% | 94.2\% |
|  | (2.892) | (0.562) | (2.004) | (9.125) | (0.624) | (-1.735) |  |  |  |  |  |  |

For the lowest quartile of firms in terms of the standard deviation in earnings forecasts, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it
represents how much of the variation in subsequent return is captured by the model．$R^{2} \mathbf{I m p}$ ．is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable．$R^{2}$ Imp．measures how much improvement in capturing subsequent return variation is provided by the ICC estimate． $\mathbf{N}$ is the number of months over which the cross－sectional regressions are carried out．$\beta_{I C C}^{T S}=1$ is the p －value for testing whether the reported average ICC coefficient is different from the theoretical value of one．$\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant．$\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one．

Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.028* | 0.159*** | -0.199 | 0.462*** | 0.003 | -0.219 | 59.5\% |  | 205 | 0.000 | 64.0\% | 94.3\% |
|  | (2.337) | (5.447) | (-0.422) | (11.766) | (0.055) | (-1.556) |  | -2.73\% |  |  |  |  |
| TPDPS_HDZ | 0.026* | 0.15*** | -0.241 | 0.459*** | 0.015 | -0.184 | 59.5\% |  | 205 | 0.000 | 66.3\% | 94.3\% |
|  | (2.364) | (5.839) | (-0.549) | (12.015) | (0.285) | (-1.638) |  | -2.98\% |  |  |  |  |
| Naive | 0.046* | 0.174*** | -0.063 | 0.471*** | -0.057 | -0.387 | 59.2\% |  | 205 | 0.000 | 62.3\% | 93.7\% |
|  | (2.100) | (4.640) | (-0.168) | (10.734) | (-0.447) | (-1.297) |  | -3.10\% |  |  |  |  |
| BP_Anlst | 0.009 | 1.061*** | 0.232 | 0.415*** | 0.128 | -0.046 | 57.1\% |  | 205 | 0.650 | 67.4\% | 49.1\% |
|  | (0.820) | (7.928) | (0.973) | (12.052) | (0.712) | (-0.453) |  | -4.23\% |  |  |  |  |
| BP_HDZ | 0.005 | 1.022*** | 0.232 | 0.398*** | 0.147 | -0.097 | 56.6\% |  | 205 | 0.856 | 68.0\% | 44.0\% |
|  | (0.439) | (8.436) | (1.006) | (11.757) | (0.839) | (-1.146) |  | -5.11\% |  |  |  |  |
| TPDPS_RI | 0.035*** | 0.09*** | -0.266 | 0.436*** | 0.034 | -0.190 | 56.8\% |  | 205 | 0.000 | 53.1\% | 94.3\% |
|  | (3.130) | (4.007) | (-0.729) | (11.948) | (0.675) | (-1.943) |  | -5.56\% |  |  |  |  |
| TPDPS_EP | -0.022 | 0.925 | 22.681 | -0.449 | 0.739 | -1.899 | 55.9\% |  | 205 | 0.941 | 53.1\% | 95.4\% |
|  | (-0.322) | (0.906) | (0.814) | (-0.419) | (0.871) | $(-0.880)$ |  | -5.97\% |  |  |  |  |
| TPDPS_RW | 0.026 | $0.082 * * *$ | -0.051 | 0.399*** | 0.064 | 0.067 | 55.2\% |  | 205 | 0.000 | 44.0\% | 96.0\% |
|  | (1.696) | (3.531) | (-0.252) | (11.786) | (1.177) | (0.600) |  | -6.48\% |  |  |  |  |
| BP_RI | 0.019 | 0.655*** | 0.175 | 0.387*** | 0.238 | -0.136 | 54.3\% |  | 205 | 0.003 | 50.3\% | 48.6\% |
|  | (1.568) | (5.623) | (0.725) | (11.363) | (1.409) | (-1.560) |  | -7.01\% |  |  |  |  |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | 0.005 | 0.859*** | 0.242 | 0.391*** | 2.369 | -0.367 | 53.7\% |  | 205 | 0.449 | 46.3\% | 38.9\% |
|  | (0.279) | (4.609) | (0.870) | (11.949) | (1.027) | (-1.793) |  | -7.23\% |  |  |  |  |
| BP_EP | 0.016 | 0.613*** | 0.120 | 0.388*** | 0.235 | -0.128 | 53.9\% |  | 205 | 0.001 | 49.7\% | 52.0\% |
|  | (1.384) | (5.342) | (0.519) | (11.479) | (1.408) | (-1.547) |  | $-7.71 \%$ |  |  |  |  |
| BP_RW | 0.026* | $0.642 * * *$ | 0.160 | 0.383*** | 0.179 | -0.143 | 53.4\% |  | 205 | 0.004 | 48.6\% | 49.7\% |
|  | (2.029) | (5.266) | (0.673) | (11.201) | (1.128) | (-1.392) |  | -8.06\% |  |  |  |  |
| GLS_Anlst | 0.254 | -2.187 | 0.963 | 0.255 | 10.797 | -1.156 | 51.9\% |  | 205 | 0.309 | 25.7\% | 39.4\% |
|  | (0.868) | (-0.701) | (0.804) | (1.843) | (0.934) | (-0.940) |  | -8.97\% |  |  |  |  |
| TrES_Anlst_10Ind | $0.051^{* * *}$ | -0.008 | -0.087 | 0.36 *** | 0.037 | -0.075 | 51.2\% |  | 205 | 0.000 | 13.7\% | 95.4\% |
|  | (4.192) | (-0.462) | (-0.673) | (14.736) | (1.447) | (-1.061) |  | -9.00\% |  |  |  |  |
| FGHJ_Anlst | -0.008 | 0.515 | -0.009 | 0.385*** | 0.030 | -0.277 | 51.7\% |  | 205 | 0.094 | 26.9\% | 36.6\% |
|  | (-0.253) | (1.792) | (-0.045) | (11.717) | (0.033) | (-1.129) |  | -9.10\% |  |  |  |  |
| CT_Anlst | 0.003 | 0.473 | -0.256 | 0.405*** | 0.128 | -0.060 | 51.6\% |  | 205 | 0.207 | 32.6\% | 48.6\% |
|  | (0.056) | (1.137) | (-0.518) | (8.897) | (0.139) | $(-0.339)$ |  | -9.34\% |  |  |  |  |
| PE_HDZ | 0.027* | 0.339* | -0.194 | 0.383*** | 0.722 | -0.183 | 52.3\% |  | 205 | 0.000 | 33.7\% | 62.9\% |
|  | (2.195) | (2.523) | (-1.192) | (9.947) | (0.712) | (-1.353) |  | -9.48\% |  |  |  |  |
| DKL_Anlst | -0.089 | 2.709 | 2.360 | 0.274 | -6.255 | -2.394 | 51.4\% |  | 205 | 0.490 | 32.0\% | 34.3\% |
|  | (-1.163) | (1.098) | (0.783) | (1.587) | (-0.822) | (-0.866) |  | -9.58\% |  |  |  |  |
| HL_Anlst | -0.006 | 0.473*** | -0.031 | $0.388^{* * *}$ | 0.043 | -0.009 | 51.1\% |  | 205 | 0.000 | 29.7\% | 34.9\% |

[^41]Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_EP | (-0.406) | (4.166) | (-0.163) | (13.489) | (0.071) | (-0.098) |  | -9.72\% |  |  |  |  |
|  | 0.042*** | -0.003 | -0.093 | $0.347 * * *$ | -0.001 | -0.127 | 49.7\% |  | 205 | 0.000 | 2.9\% | 96.0\% |
|  | (3.574) | (-0.828) | (-0.528) | (7.502) | (-0.163) | (-1.436) |  | -9.73\% |  |  |  |  |
| MPEG_EP | 0.003 | 0.066 | 0.306 | 0.322*** | 2.542 | 0.543 | 51.2\% |  | 205 | 0.024 | 20.6\% | 81.7\% |
|  | (0.056) | (0.159) | (0.898) | (8.631) | (1.285) | (1.158) |  | -9.74\% |  |  |  |  |
| PE_EP | 0.100 | -1.006 | 0.363 | 0.189 | 5.628 | 0.415 | 51.8\% |  | 205 | 0.204 | 28.6\% | 78.9\% |
|  | (1.189) | (-0.639) | (0.636) | (0.841) | (1.007) | (0.664) |  | -9.81\% |  |  |  |  |
| TrES_EP_25SBM | 0.039*** | 0.019 | -0.292 | 0.358*** | -0.012 | -0.050 | 49.9\% |  | 205 | 0.000 | 4.0\% | 96.0\% |
|  | (3.429) | (0.995) | (-1.491) | (12.117) | (-0.785) | (-0.479) |  | -9.84\% |  |  |  |  |
| PEG_EP | 0.026 | 0.047 | -0.466 | 0.41*** | 1.269*** | -0.075 | 51.1\% |  | 205 | 0.000 | 24.3\% | 82.2\% |
|  | (1.808) | (0.649) | (-1.328) | (6.591) | (3.719) | (-0.517) |  | -9.93\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.057** | -0.027 | -0.393 | 0.405*** | -0.001 | -0.220 | 49.3\% |  | 205 | 0.000 | 0.0\% | 91.4\% |
|  | (2.856) | (-0.864) | (-1.120) | (10.466) | (-0.019) | (-0.654) |  | -9.94\% |  |  |  |  |
| KMY_EP | -0.007 | 0.443* | -0.202 | 0.394*** | 0.656 | -0.307 | 50.7\% |  | 205 | 0.005 | 26.3\% | 68.6\% |
|  | (-0.277) | (2.288) | (-0.616) | (6.930) | (1.107) | (-1.766) |  | -9.97\% |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.083* | 0.013 | -0.566 | 0.297* | 0.216 | -0.145 | 50.4\% |  | 205 | 0.000 | 14.3\% | 76.6\% |
|  | (2.178) | (0.099) | (-1.594) | (2.436) | (1.425) | (-1.386) |  | -10.03\% |  |  |  |  |
| CAPM_Factor | -0.079 | 8.461 | -0.040 | $0.358 * * *$ | 4.520 | 0.071 | 50.4\% |  | 205 | 0.240 | 16.6\% | 19.4\% |
|  | (-0.834) | (1.338) | (-0.196) | (9.852) | (0.368) | (0.186) |  | -10.05\% |  |  |  |  |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_Anlst | -0.002 | 0.375 | 0.063 | 0.39*** | -0.134 | -0.049 | 50.9\% |  | 205 | 0.004 | 25.7\% | 39.4\% |
|  | (-0.063) | (1.751) | (0.296) | (13.014) | (-0.286) | (-0.541) |  | -10.08\% |  |  |  |  |
| GLS_RW | 0.047 | -0.061 | -0.179 | $0.341 * * *$ | 2.887 | 0.116 | 50\% |  | 205 | 0.000 | 6.3\% | 87.4\% |
|  | (0.824) | (-0.601) | (-1.151) | (7.278) | (0.697) | (0.501) |  | -10.08\% |  |  |  |  |
| TrES_RW_10Ind | 0.051* | 3.021 | -0.274 | 0.393*** | -3.558 | 0.167 | 50.7\% |  | 205 | 0.542 | 13.7\% | 85.1\% |
|  | (2.514) | (0.914) | (-0.400) | (5.694) | (-0.947) | (0.905) |  | -10.15\% |  |  |  |  |
| KMY_Anlst | 0.020 | 0.104 | -0.244 | $0.361 * * *$ | 0.418 | -0.056 | 51.1\% |  | 205 | 0.000 | 29.1\% | 64.0\% |
|  | (0.627) | (0.798) | (-1.343) | (10.890) | (1.185) | (-0.628) |  | -10.16\% |  |  |  |  |
| GG_Anlst | 0.024 | 0.059 | -0.259 | $0.353 * * *$ | 0.389 | -0.045 | 50.7\% |  | 205 | 0.000 | 24.0\% | 77.1\% |
|  | (0.862) | (0.777) | (-1.380) | (11.650) | (1.492) | (-0.555) |  | -10.18\% |  |  |  |  |
| MPEG_Anlst | -0.007 | 0.515* | 0.101 | 0.378*** | 0.360 | -0.018 | 50.6\% |  | 205 | 0.053 | 20.6\% | 50.3\% |
|  | (-0.261) | (2.069) | (0.455) | (12.416) | (0.796) | (-0.198) |  | -10.22\% |  |  |  |  |
| KMY_HDZ | 0.056 | 0.033 | -0.523 | 0.376*** | -2.315 | -0.106 | 51.4\% |  | 205 | 0.000 | 20.6\% | 68.0\% |
|  | (1.753) | (0.127) | (-0.788) | (6.731) | (-0.567) | (-0.801) |  | -10.23\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.085*** | -0.025 | -0.321 | 0.357*** | -0.008 | -0.048 | 50.1\% |  | 205 | 0.000 | 9.7\% | 94.9\% |
|  | (3.230) | (-0.750) | (-1.713) | (12.268) | (-0.210) | (-0.218) |  | -10.26\% |  |  |  |  |
| FGHJ_RI | 0.029 | 0.089 | -0.110 | $0.338^{* * *}$ | 83.602 | -0.019 | 50.5\% |  | 205 | 0.000 | 22.0\% | 75.1\% |
|  | (1.778) | (0.593) | (-0.383) | (9.012) | (0.796) | (-0.138) |  | -10.27\% |  |  |  |  |
| GG_RW | 0.051* | 0.143 | -0.095 | 0.34*** | 8.201 | -0.151 | 50.7\% |  | 205 | 0.000 | 18.5\% | 64.8\% |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | (2.000) | (0.955) | (-0.243) | (7.084) | (0.936) | (-0.488) |  | -10.29\% |  |  |  |  |
|  | -0.036 | 0.959 | -0.156 | 0.394*** | 0.489 | 0.101 | 51.5\% |  | 205 | 0.956 | 30.9\% | 31.4\% |
|  | (-0.405) | (1.291) | $(-0.251)$ | (10.305) | (0.224) | (0.359) |  | -10.29\% |  |  |  |  |
| DKL_HDZ | -0.012 | 0.621 | -0.540 | $0.391 * * *$ | -1.140 | -0.060 | 51\% |  | 205 | 0.334 | 18.9\% | 67.4\% |
|  | (-0.284) | (1.584) | (-1.736) | (10.944) | (-0.723) | (-0.610) |  | -10.37\% |  |  |  |  |
| HL_HDZ | -0.068 | 0.938 | -0.358 | 0.412*** | 0.187 | 0.359 | 51.1\% |  | 205 | 0.934 | 20.6\% | 68.6\% |
|  | (-0.768) | (1.248) | (-1.114) | (8.614) | (0.089) | (0.653) |  | -10.42\% |  |  |  |  |
| WNG_RI | $0.039 * * *$ | 0.015 | 0.177 | $0.33 * * *$ | 0.000 | 0.011 | 49.3\% |  | 205 | 0.000 | 2.9\% | 95.4\% |
|  | (3.388) | (0.427) | (0.460) | (7.825) | (0.004) | (0.088) |  | -10.44\% |  |  |  |  |
| FGHJ_HDZ | 0.001 | 0.446* | -0.098 | 0.363*** | 1.223* | -0.047 | 51.7\% |  | 205 | 0.007 | 24.0\% | 69.1\% |
|  | (0.037) | (2.185) | (-0.530) | (10.470) | (2.048) | (-0.339) |  | -10.44\% |  |  |  |  |
| GLS_HDZ | 0.026 | 0.295 | 0.094 | 0.331*** | 2.100 | 0.105 | 51.6\% |  | 205 | 0.000 | 21.7\% | 65.7\% |
|  | (1.050) | (1.615) | (0.280) | (5.750) | (1.768) | (0.307) |  | -10.45\% |  |  |  |  |
| MPEG_HDZ | 0.031 | 0.187 | 0.043 | 0.352*** | 1.365 | 0.020 | 50.5\% |  | 205 | 0.000 | 12.6\% | 73.7\% |
|  | (1.508) | (1.229) | (0.143) | (11.272) | (0.762) | (0.071) |  | -10.48\% |  |  |  |  |
| KMY_RI | 0.061 | 0.113 | -0.723 | 0.381*** | -0.450 | -0.601 | 49.8\% |  | 205 | 0.011 | 20.6\% | 73.7\% |
|  | (1.172) | (0.328) | (-1.086) | (7.245) | (-0.942) | (-0.955) |  | -10.49\% |  |  |  |  |
| FPM_HDZ | 0.047 | -0.079 | -0.435 | $0.362 * * *$ | 2.025 | -0.062 | 50.4\% |  | 205 | 0.001 | 12.6\% | 60.0\% |
|  | (1.629) | (-0.252) | (-0.689) | (9.457) | (1.564) | (-0.407) |  | -10.52\% |  |  |  |  |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_25SBM | 0.04*** | -0.075 | -3.000 | 0.388*** | 0.015 | -1.338 | 50.4\% |  | 205 | 0.000 | 5.7\% | 96.0\% |
|  | (3.839) | (-0.544) | (-0.895) | (6.360) | (0.272) | (-0.845) |  | -10.53\% |  |  |  |  |
| GG_EP | 0.032 | 0.681 | 0.220 | $0.345^{* * *}$ | 2.934 | -0.316 | 50.7\% |  | 205 | 0.780 | 22.0\% | 70.1\% |
|  | (1.740) | (0.597) | (0.531) | (7.777) | (0.778) | (-1.071) |  | -10.54\% |  |  |  |  |
| WNG_Anlst | 0.056*** | 0.011 | -0.361 | $0.353 * * *$ | -0.123 | -0.064 | 49.6\% |  | 205 | 0.000 | 7.4\% | 92.6\% |
|  | (4.968) | (0.205) | (-1.423) | (11.322) | (-0.568) | (-0.730) |  | -10.54\% |  |  |  |  |
| PEG_HDZ | 0.030 | 0.224 | 0.087 | $0.367 * * *$ | 2.800 | -0.056 | 50.5\% |  | 205 | 0.000 | 10.9\% | 71.4\% |
|  | (1.055) | (1.247) | (0.270) | (11.081) | (0.846) | (-0.137) |  | -10.55\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.052*** | -0.002 | -0.145 | 0.343*** | -0.028 | -0.118 | 49.7\% |  | 205 | 0.000 | 13.1\% | 94.9\% |
|  | (3.897) | (-0.067) | (-0.846) | (10.249) | (-0.237) | (-1.407) |  | -10.57\% |  |  |  |  |
| GM_EP | 0.280 | -1.895 | -2.300 | 0.220 | -25.464 | -2.532 | 50.8\% |  | 205 | 0.241 | 21.7\% | 78.3\% |
|  | (0.905) | (-0.771) | (-0.920) | (1.175) | (-0.799) | (-0.904) |  | -10.59\% |  |  |  |  |
| FGHJ_EP | 0.044* | -0.134 | -0.526 | 0.389*** | -9.009 | -0.014 | 50.2\% |  | 205 | 0.000 | 19.1\% | 79.2\% |
|  | (2.301) | (-0.621) | (-2.071) | (8.340) | (-0.666) | (-0.056) |  | -10.62\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.154 | -0.252 | 0.088 | 0.458*** | -0.796 | -0.929 | 50.1\% |  | 205 | 0.000 | 10.9\% | 93.1\% |
|  | (1.182) | (-1.203) | (0.058) | (4.927) | (-1.272) | (-0.945) |  | -10.65\% |  |  |  |  |
| CT_HDZ | 0.046* | 0.109 | -0.031 | 0.337*** | 1.312 | -0.057 | 51.1\% |  | 205 | 0.000 | 20.6\% | 68.6\% |
|  | (2.323) | (0.791) | (-0.153) | (8.602) | (1.777) | (-0.469) |  | -10.65\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.06*** | -0.011 | -0.183 | 0.368*** | 0.036 | -0.223 | 49.1\% |  | 205 | 0.000 | 5.7\% | 96.0\% |

[^42]Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_HDZ | (3.588) | (-1.375) | (-1.040) | (7.139) | (0.824) | (-1.448) |  | -10.68\% |  |  |  |  |
|  | 0.042* | 0.214 | 0.198 | 0.323*** | 2.248* | 0.016 | 51.5\% |  | 205 | 0.000 | 21.1\% | 62.3\% |
|  | (2.103) | (1.452) | (0.827) | (7.415) | (2.064) | (0.094) |  | -10.69\% |  |  |  |  |
| TrOHE_10Ind | 0.044** | 0.110 | -0.474 | $0.405^{* * *}$ | 0.082 | -0.150 | 49.6\% |  | 205 | 0.000 | 13.1\% | 61.1\% |
|  | (3.079) | (1.488) | (-1.882) | (8.806) | (0.383) | (-1.099) |  | -10.70\% |  |  |  |  |
| DKL_RI | 0.043 | 0.376 | -0.588 | $0.338^{* * *}$ | -0.628 | -0.478 | 49.4\% |  | 205 | 0.222 | 22.3\% | 85.1\% |
|  | (0.968) | (0.738) | (-1.079) | (5.330) | (-0.867) | (-1.005) |  | -10.78\% |  |  |  |  |
| TrES_EP_10Ind | 0.056** | 0.273 | -0.122 | $0.327 * * *$ | -0.023 | 0.008 | 50.3\% |  | 205 | 0.025 | 12.6\% | 93.7\% |
|  | (2.598) | (0.853) | (-0.760) | (11.022) | (-0.964) | (0.044) |  | -10.81\% |  |  |  |  |
| GM_HDZ | 0.284 | -1.832 | -2.209 | 0.233 | -25.629 | -2.439 | 50.4\% |  | 205 | 0.249 | 10.3\% | 72.0\% |
|  | (0.920) | (-0.749) | (-0.886) | (1.254) | (-0.805) | (-0.876) |  | -10.84\% |  |  |  |  |
| PEG_RI | 0.028 | 0.065 | -0.481 | 0.406*** | 0.330 | -0.131 | 49.1\% |  | 205 | 0.000 | 24.3\% | 97.4\% |
|  | (1.381) | (0.825) | (-1.315) | (6.103) | (1.394) | (-0.396) |  | -10.86\% |  |  |  |  |
| PEG_Anlst | 0.043* | 0.041 | -0.319 | 0.376*** | 0.472 | -0.206 | 50\% |  | 205 | 0.000 | 14.9\% | 62.3\% |
|  | (2.491) | (0.314) | (-0.779) | (11.906) | (0.642) | (-1.023) |  | -10.90\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.015 | 0.062 | -1.068 | $0.413 * * *$ | -0.009 | -0.297 | 49.3\% |  | 205 | 0.000 | 5.1\% | 96.0\% |
|  | (0.250) | (0.981) | (-1.173) | (5.248) | (-0.070) | (-0.389) |  | -10.90\% |  |  |  |  |
| GLS_RI | 0.036** | 0.288 | -1.377 | $0.459 * * *$ | -4.729 | -0.347 | 49.9\% |  | 205 | 0.009 | 21.4\% | 73.4\% |
|  | (2.686) | (1.075) | (-1.056) | (3.632) | (-1.043) | (-1.382) |  | -10.92\% |  |  |  |  |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_EP | 0.051 | -0.474 | -0.297 | 0.318*** | 9.000 | 0.432 | 50.5\% |  | 205 | 0.003 | 20.8\% | $72.8 \%$ |
|  | (1.582) | (-0.952) | (-1.136) | (3.214) | (1.008) | (0.825) |  | -10.93\% |  |  |  |  |
| HL_EP | 0.012 | 0.224* | -0.198 | $0.35 * * *$ | 0.870 | -0.311 | 50\% |  | 205 | 0.000 | 23.4\% | 74.3\% |
|  | (0.480) | (2.254) | (-0.699) | (6.300) | (1.681) | (-1.762) |  | -10.94\% |  |  |  |  |
| DKL_EP | 0.011 | 0.335* | -0.136 | 0.348*** | 1.335 | -0.355 | 49.9\% |  | 205 | 0.000 | 26.9\% | 69.7\% |
|  | (0.431) | (2.163) | (-0.402) | (6.019) | (1.254) | (-1.712) |  | -10.97\% |  |  |  |  |
| GG_RI | -5.583 | 3.791 | 72.156 | -4.315 | 116.889 | 94.792 | 49.8\% |  | 205 | 0.516 | 11.0\% | 75.6\% |
|  | (-0.781) | (0.885) | (0.787) | (-0.727) | (0.795) |  |  | -10.98\% |  |  |  |  |
| TrES_RW_25SBM | 0.046* | 1.873 | 0.172 | 0.362*** | -1.011 | -0.082 | 49.2\% |  | 205 | 0.848 | 2.9\% | 86.9\% |
|  | (2.543) |  | (0.210) |  | (-0.199) | (-0.547) |  | -11.02\% |  |  |  |  |
| PEG_RW | 0.064 | -0.008 | -0.424 | 0.391*** | 0.338 | -0.133 | 49.8\% |  | 205 | 0.000 | 14.9\% | 100.0\% |
|  | (1.519) | (-0.122) | (-1.574) | (9.236) | (1.327) | (-0.778) |  | -11.03\% |  |  |  |  |
| 3FF_Factor | 0.044* | -0.461 | -0.287 | 0.394*** | 0.398 | 0.192 | 49.8\% |  | 205 | 0.002 | 5.7\% | 27.4\% |
|  | (2.367) | (-1.009) | (-1.185) | (11.753) | (0.169) | (0.617) |  | -11.03\% |  |  |  |  |
| WNG_RW | 0.015 | 0.000 | 10.108 | -0.665 | 0.000 | 2.525 | 49.1\% |  | 205 | 0.000 | 0.6\% | 97.1\% |
|  | (0.123) | (0.288) | (0.869) | (-0.638) | (-0.011) | (0.974) |  | -11.03\% |  |  |  |  |
| FPM_EP | -0.046 | $0.121^{* * *}$ | -0.156 | 0.349*** | 0.014 | -0.095 | 49.9\% |  | 205 | 0.000 | 21.1\% | 86.9\% |
|  | (-0.916) | (5.298) | (-1.063) | (9.453) | (0.411) | (-1.131) |  | -11.05\% |  |  |  |  |
| Carhart_Factor | 0.073* | -0.484 | -0.160 | 0.361*** | 15.686 | -0.154 | 49.6\% |  | 205 | 0.042 | 4.6\% | 41.1\% |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_RW | (1.986) | (-0.668) | (-1.071) | (9.937) | (0.849) | (-0.716) |  | -11.08\% |  |  |  |  |
|  | 0.069 | 0.013 | -0.200 | 0.328*** | -0.139 | -0.062 | 49.9\% |  | 205 | 0.000 | 11.4\% | 85.7\% |
|  | (1.325) | (0.477) | (-1.308) | (8.466) | (-1.397) | (-0.719) |  | -11.14\% |  |  |  |  |
| MPEG_RW | 0.024 | 0.025 | -0.441 | 0.442*** | 0.532 | -0.255 | 49.9\% |  | 205 | 0.000 | 10.3\% | 93.7\% |
|  | (1.740) | (0.502) | (-1.261) | (7.740) | (1.361) | (-1.525) |  | -11.14\% |  |  |  |  |
| CT_RW | 0.004 | 0.791 | -0.333 | $0.401 * * *$ | 19.039 | -0.489 | 50\% |  | 205 | 0.887 | 12.2\% | 79.3\% |
|  | (0.063) | (0.541) | (-1.146) | (4.226) | (0.807) | (-0.829) |  | -11.18\% |  |  |  |  |
| TrES_RI_25SBM | 0.032* | 0.002 | -0.189 | 0.357*** | 0.005 | 0.096 | 48.8\% |  | 205 | 0.000 | 8.0\% | 96.0\% |
|  | (2.337) | (0.500) | (-0.505) | (11.192) | (0.768) | (0.561) |  | -11.21\% |  |  |  |  |
| TrES_RI_10Ind | 0.068*** | -0.021 | -0.063 | 0.338*** | 0.001 | -0.190 | 50.3\% |  | 205 | 0.000 | 13.1\% | 94.9\% |
|  | (3.346) | (-1.048) | (-0.290) | (12.300) | (0.035) | (-1.350) |  | -11.22\% |  |  |  |  |
| DKL_RW | 0.053** | 0.013 | -0.531 | 0.393*** | 0.012 | -0.337 | 49.4\% |  | 205 | 0.000 | 8.0\% | 84.6\% |
|  | (2.817) | (0.216) | (-2.060) | (11.031) | (0.016) | (-1.568) |  | -11.27\% |  |  |  |  |
| CT_EP | 0.070 | 0.347 | 0.039 | 0.291* | 0.400 | -1.563 | 49.6\% |  | 205 | 0.239 | 10.9\% | 79.4\% |
|  | (1.071) | (0.627) | (0.028) | (2.287) | (0.667) | (-1.345) |  | -11.28\% |  |  |  |  |
| PE_RI | 0.052* | -0.349 | 0.206 | 0.36*** | 0.489 | 0.198 | 51\% |  | 205 | 0.026 | 34.3\% | 74.3\% |
|  | (2.218) | (-0.579) | (0.393) | (10.102) | (0.664) | (0.716) |  | -11.29\% |  |  |  |  |
| 5FF_Factor | 0.039 | -0.344 | -0.256 | 0.418*** | -2.027 | 0.412 | 49.5\% |  | 205 | 0.002 | 9.7\% | 32.0\% |
|  | (1.725) | (-0.813) | (-0.982) | (10.249) | (-0.881) | (0.712) |  | -11.33\% |  |  |  |  |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RW | 0.028* | 0.037 | -0.329 | 0.373*** | 0.199 | -0.285 | 50\% |  | 205 | 0.000 | 12.6\% | 93.7\% |
|  | (2.100) | (1.749) | (-1.757) | (10.565) | (0.535) | (-1.843) |  | -11.34\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.051*** | -0.036 | -0.530 | $0.365 * * *$ | 0.007 | -0.173 | 48.8\% |  | 205 | 0.000 | 5.7\% | 93.1\% |
|  | (3.319) | (-0.575) | (-1.351) | (11.167) | (0.059) | (-0.903) |  | -11.37\% |  |  |  |  |
| MPEG_RI | 0.033 | 0.058 | 0.228 | 0.338*** | 1.508 | -0.034 | 50.4\% |  | 205 | 0.000 | 28.8\% | 78.2\% |
|  | (1.271) | (0.420) | (0.731) | (8.938) | (0.851) | (-0.117) |  | -11.38\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.056*** | 0.019 | -0.203 | $0.351 * * *$ | 0.006 | -0.166 | 49.2\% |  | 205 | 0.000 | 4.0\% | 96.0\% |
|  | (4.028) | (0.595) | (-0.867) | (10.188) | (0.116) | (-1.668) |  | -11.43\% |  |  |  |  |
| FGHJ_RW | 0.05*** | 0.120 | -0.459 | $0.371 * * *$ | -0.730 | -0.413 | 49\% |  | 205 | 0.000 | 11.5\% | 90.9\% |
|  | (3.223) | (1.865) | (-1.686) | (8.544) | (-0.649) | (-1.429) |  | -11.45\% |  |  |  |  |
| PE_RW | 0.031 | -0.024 | -0.582 | $0.383 * * *$ | -0.270 | -0.160 | 50\% |  | 205 | 0.000 | 10.9\% | 86.9\% |
|  | (1.264) | (-0.479) | (-1.945) | (8.933) | (-1.062) | (-1.740) |  | -11.53\% |  |  |  |  |
| HL_RI | 0.002 | 0.544 | -0.049 | $0.307 * * *$ | -0.711 | -0.043 | 49.4\% |  | 205 | 0.342 | 22.9\% | 83.4\% |
|  | (0.070) | (1.135) | (-0.324) | (5.396) | (-0.987) | (-0.262) |  | -11.57\% |  |  |  |  |
| HL_RW | 0.012 | 0.090 | -0.861 | 0.452*** | 0.437 | -0.603 | 49.1\% |  | 205 | 0.000 | 4.6\% | 88.0\% |
|  | (0.217) | (0.815) | (-1.395) | (5.166) | (0.526) | (-1.312) |  | -11.59\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.06** | 0.019 | -0.390 | 0.396*** | 0.024 | -0.333 | 49.2\% |  | 205 | 0.000 | 8.0\% | 96.0\% |
|  | (2.846) | (1.468) | (-1.185) | (6.767) | (0.309) | (-1.117) |  | -11.60\% |  |  |  |  |
| FPM_RI | 0.068** | -0.056 | -0.195 | 0.358*** | -0.109 | -0.257 | 49.7\% |  | 205 | 0.000 | 19.4\% | 82.3\% |

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Table 81 : Capturing Subsequent Return: High Earnings Forecast Standard Deviation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RI | (2.622) | (-0.640) | (-0.736) | (7.846) | (-0.433) | (-1.202) |  | -11.62\% |  |  |  |  |
|  | 0.060 | -0.448 | -2.739 | 0.145 | -25.489 | -1.598 | 50.3\% |  | 205 | 0.628 | 29.4\% | 73.5\% |
|  | (0.148) | (-0.150) | (-1.061) | (0.703) | (-0.789) | (-0.534) |  | -11.68\% |  |  |  |  |
| KMY_RW | 0.011 | 0.093 | -0.865 | 0.452*** | 0.459 | -0.602 | 49\% |  | 205 | 0.000 | 4.0\% | 88.0\% |
|  | (0.202) | (0.838) | (-1.403) | (5.170) | (0.551) | (-1.312) |  | -11.72\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.032* | 0.027 | -0.202 | 0.366*** | 0.002 | -0.010 | 49.4\% |  | 205 | 0.000 | 1.1\% | 94.9\% |
|  | (2.326) | (1.232) | (-1.498) | (14.020) | (0.150) | (-0.137) |  | -11.89\% |  |  |  |  |
| TrOHE_25SBM | $0.048 * * *$ | 0.082 | -0.192 | $0.352 * * *$ | 0.083 | -0.119 | 49.3\% |  | 205 | 0.000 | 8.0\% | 86.3\% |
|  | (3.884) | (1.516) | (-1.696) | (10.904) | (1.094) | (-1.725) |  | -12.21\% |  |  |  |  |
| WNG_HDZ | 0.054*** | 0.005 | -0.357 | $0.379 * * *$ | 0.351 | -0.078 | 49\% |  | 205 | 0.000 | 2.3\% | 96.0\% |
|  | (4.417) | (0.929) | (-1.803) | (11.007) | (1.039) | (-0.821) |  | -12.27\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.052*** | 0.012 | -0.122 | $0.348 * * *$ | -0.136 | -0.167 | 49.5\% |  | 205 | 0.000 | 5.1\% | 85.7\% |
|  | (4.520) | (0.279) | (-0.867) | (11.079) | (-1.205) | (-1.908) |  | -12.44\% |  |  |  |  |
| CT_RI | 0.054** | -0.326 | -0.102 | $0.37 * * *$ | 0.431 | 0.018 | 48.8\% |  | 205 | 0.000 | 10.3\% | 89.7\% |
|  | (2.856) | (-1.181) | (-0.331) | (8.556) | (1.044) | (0.104) |  | -12.48\% |  |  |  |  |

For the highest quartile of firms in terms of the standard deviation in earnings forecasts, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it
represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% + +sig | $\% \% \beta_{\text {ICC }}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.019** | 0.148*** | 0.309 | 0.466*** | 0.046 | -0.071 | 62.1\% |  | 205 | 0.000 | 69.1\% | 93.6\% |
|  | (2.698) | (6.754) | (1.877) | (16.123) | (1.735) | (-1.356) |  | 6.48\% |  |  |  |  |
| Naive | 0.023*** | 0.152*** | 0.383** | 0.461 *** | 0.069* | -0.089 | 62\% |  | 205 | 0.000 | 67.6\% | 94.1\% |
|  | (3.545) | (7.450) | (2.838) | (15.731) | (2.041) | (-1.730) |  | 6.48\% |  |  |  |  |
| TPDPS_HDZ | 0.018* | 0.142*** | 0.279 | $0.462^{* * *}$ | 0.042 | -0.083 | 61.7\% |  | 205 | 0.000 | 68.6\% | 94.1\% |
|  | (2.422) | (5.814) | (1.470) | (16.675) | (1.621) | (-1.476) |  | 6.17\% |  |  |  |  |
| BP_HDZ | 0.004 | 0.938*** | 0.105 | $0.453 * * *$ | 0.272 | -0.079 | 60\% |  | 205 | 0.713 | 73.0\% | 52.5\% |
|  | (0.476) | (5.608) | (0.396) | (17.030) | (1.560) | (-1.255) |  | 5.26\% |  |  |  |  |
| BP_Anlst | 0.009 | 0.916*** | 0.037 | 0.463*** | 0.364 | -0.050 | 59.7\% |  | 205 | 0.657 | 71.1\% | 55.9\% |
|  | (0.878) | (4.817) | (0.115) | (18.189) | (1.945) | (-0.767) |  | 5.05\% |  |  |  |  |
| TPDPS_RI | 0.023*** | 0.104*** | 0.295 | $0.445^{* * *}$ | 0.067 | -0.122 | 60.3\% |  | 205 | 0.000 | 59.3\% | 94.1\% |
|  | (3.313) | (5.029) | (1.941) | (15.499) | (1.952) | (-2.342) |  | 4.78\% |  |  |  |  |
| TPDPS_EP | 0.024*** | 0.094*** | 0.245 | $0.444^{* * *}$ | 0.066* | -0.103 | 59.9\% |  | 205 | 0.000 | 59.3\% | 94.6\% |
|  | (3.413) | (4.781) | (1.670) | (15.222) | (1.970) | (-1.917) |  | 4.42\% |  |  |  |  |
| BP_EP | 0.009 | 0.695*** | 0.109 | $0.441^{* * *}$ | 0.336* | -0.078 | 58.7\% |  | 205 | 0.008 | 62.3\% | 58.8\% |
|  | (1.181) | (6.130) | (0.768) | (16.123) | (2.388) | (-1.553) |  | 4.04\% |  |  |  |  |
| TPDPS_RW | 0.03*** | 0.082*** | 0.122 | 0.465*** | 0.07* | -0.150 | 59.1\% |  | 205 | 0.000 | 50.5\% | 95.6\% |
|  | (4.442) | (6.122) | (1.628) | (21.121) | (2.374) | (-1.340) |  | 3.98\% |  |  |  |  |

Continued in next page...

Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | 0.011 | 0.731*** | 0.180 | 0.438*** | 0.335* | -0.085 | 58.5\% |  | 205 | 0.020 | 57.8\% | 55.9\% |
|  | (1.496) | (6.348) | (1.351) | (16.301) | (2.442) | (-1.711) |  | 3.90\% |  |  |  |  |
| BP_RW | 0.021** | $0.693 * * *$ | 0.102 | $0.442 * * *$ | 0.386** | -0.074 | 58\% |  | 205 | 0.005 | $55.4 \%$ | 53.9\% |
|  | (2.767) | (6.381) | (0.776) | (15.796) | (2.717) | (-1.502) |  | 3.46\% |  |  |  |  |
| PE_Anlst | -0.015 | 1.032*** | $0.521^{* * *}$ | $0.421^{* * *}$ | 0.566 | -0.305 | 57.6\% |  | 205 | 0.785 | 60.8\% | 40.2\% |
|  | (-1.620) | (8.890) | (4.214) | (20.047) | (0.943) | (-2.262) |  | 3.02\% |  |  |  |  |
| GLS_Anlst | -0.036 | $0.739 * * *$ | 0.034 | 0.43*** | 0.842 | -0.129 | 56.4\% |  | 205 | 0.054 | 35.3\% | 54.4\% |
|  | (-2.686) | (5.496) | (0.409) | (19.430) | (1.290) | (-2.302) |  | 1.86\% |  |  |  |  |
| FGHJ_Anlst | -0.038 | $0.685 * * *$ | 0.019 | $0.442 * * *$ | 1.618*** | -0.106 | 56.4\% |  | 205 | 0.010 | 36.3\% | 57.8\% |
|  | (-2.771) | (5.631) |  | (19.799) |  | (-1.983) |  | 1.84\% |  |  |  |  |
| CT_Anlst | -0.009 | 0.51*** | 0.094 | $0.444^{* * *}$ | 1.232 | -0.096 | 56.1\% |  | 205 | 0.000 | 39.7\% | 54.4\% |
|  | (-0.905) | (4.803) | (1.186) | (20.310) | (1.813) | (-1.729) |  | 1.62\% |  |  |  |  |
| FGHJ_HDZ | 0.001 | $0.396 * * *$ | -0.050 | $0.439 * * *$ | $2.541^{* * *}$ | -0.060 | 56\% |  | 205 | 0.000 | 27.5\% | 68.6\% |
|  | (0.055) | (4.687) | (-0.673) | (19.513) | (4.363) | (-1.198) |  | 1.61\% |  |  |  |  |
| DKL_Anlst | -0.029 | $0.681 * * *$ | 0.099 | $0.44 * * *$ | 0.513 | -0.072 | 55.9\% |  | 205 | 0.005 | 40.2\% | 42.2\% |
|  | (-2.615) | (6.011) | (1.434) | (20.718) | (1.101) | (-1.352) |  | 1.38\% |  |  |  |  |
| MPEG_Anlst | 0.007 | $0.324 * * *$ | 0.039 | $0.435 * * *$ | 0.162 | 0.047 | 55.1\% |  | 205 | 0.000 | 31.9\% | 56.4\% |
|  | (0.820) | (5.553) | (0.495) | (19.911) | (0.583) | (0.679) |  | 1.38\% |  |  |  |  |
| TrES_RI_10Ind | 0.036*** | -0.005 | -0.105 | 0.419*** | 0.031 | -0.040 | 54.5\% |  | 205 | 0.000 | 17.2\% | 97.5\% |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_EP | (4.439) | (-0.376) | (-1.503) | (19.891) | (1.124) | (-0.522) |  | 1.23\% |  |  |  |  |
|  | 0.031*** | -0.286 | -0.219 | 0.472*** | 2.014*** | 0.316 | 55.6\% |  | 205 | 0.010 | 39.2\% | 74.5\% |
|  | (3.274) | (-0.576) | (-1.616) | (12.647) | (3.115) | (1.028) |  | 1.19\% |  |  |  |  |
| DKL_HDZ | -0.001 | $0.462 * * *$ | 0.022 | 0.44*** | 0.997** | -0.233 | 55.4\% |  | 205 | 0.000 | 29.4\% | 70.6\% |
|  | (-0.107) | (3.310) | (0.278) | (19.907) | (2.800) | (-1.667) |  | 1.18\% |  |  |  |  |
| GM_Anlst | -0.019 | 0.56*** | 0.061 | 0.438*** | 0.411 | -0.007 | 55.1\% |  | 205 | 0.000 | 33.8\% | 47.5\% |
|  | (-2.179) | (7.591) | (0.873) | (21.113) | (1.426) | (-0.114) |  | 1.16\% |  |  |  |  |
| GG_HDZ | 0.010 | $0.432 * * *$ | 0.101 | 0.436*** | $2.464 * * *$ | -0.231 | 55.9\% |  | 205 | 0.000 | 34.3\% | 63.2\% |
|  | (1.242) | (4.789) | (0.867) | (19.087) | (4.502) | (-1.519) |  | 1.16\% |  |  |  |  |
| GLS_EP | 0.016 | 0.126 | -0.231 | 0.453*** | 1.742** | 0.011 | 55.3\% |  | 205 | 0.000 | 30.4\% | 70.6\% |
|  | (1.528) | (0.944) | (-1.953) | (18.016) | (3.003) | (0.116) |  | 1.06\% |  |  |  |  |
| GLS_HDZ | 0.011 | 0.309*** | -0.096 | 0.442*** | 2.411*** | -0.056 | 55.7\% |  | 205 | 0.000 | 29.4\% | 64.2\% |
|  | (1.207) | (3.908) | (-0.897) | (19.149) | (4.436) | (-1.057) |  | 1.04\% |  |  |  |  |
| HL_Anlst | -0.017 | $0.559 * * *$ | 0.093 | 0.438*** | 0.620 | -0.038 | 55.5\% |  | 205 | 0.000 | 34.8\% | 45.1\% |
|  | (-1.702) | (6.308) | (1.360) | (20.860) | (1.903) | (-0.702) |  | 1.04\% |  |  |  |  |
| PE_HDZ | 0.016 | 0.43*** | -0.060 | 0.44*** | $1.962 * * *$ | -0.178 | 55.7\% |  | 205 | 0.000 | 42.2\% | 65.2\% |
|  | (1.775) | (3.425) | (-0.687) | (20.061) | (3.597) | (-2.414) |  | 1.01\% |  |  |  |  |
| CT_HDZ | 0.015 | $0.324 * * *$ | 0.047 | 0.439*** | 1.367 *** | -0.217 | 55.3\% |  | 205 | 0.000 | 33.8\% | 70.6\% |
|  | (1.735) | (4.339) | (0.558) | (19.373) | (3.277) | (-1.856) |  | 0.96\% |  |  |  |  |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_HDZ | 0.009 | $0.371 * * *$ | -0.008 | 0.44*** | 1.288*** | -0.192 | 55.3\% |  | 205 | 0.000 | 30.9\% | 67.6\% |
|  | (1.004) | (3.891) | (-0.106) | (19.226) | (3.353) | (-1.557) |  | 0.91\% |  |  |  |  |
| FPM_Anlst | -0.013 | 0.486** | -0.025 | 0.446*** | -0.258 | -0.046 | 54.8\% |  | 205 | 0.002 | 32.8\% | 35.8\% |
|  | (-0.957) | (2.962) | (-0.318) | (19.600) | (-0.472) | (-0.902) |  | 0.86\% |  |  |  |  |
| HL_HDZ | 0.005 | 0.369*** | 0.000 | 0.445*** | 0.955** | -0.129 | 55.3\% |  | 205 | 0.000 | 28.9\% | 70.6\% |
|  | (0.403) | (3.299) | (0.006) | (19.270) | (2.972) | (-1.534) |  | 0.84\% |  |  |  |  |
| GG_Anlst | -0.003 | 0.136*** | -0.056 | 0.446*** | 0.425 | -0.076 | 54.9\% |  | 205 | 0.000 | 24.0\% | 74.5\% |
|  | (-0.245) | (4.108) | (-0.726) | (19.254) | (1.338) | (-1.368) |  | 0.82\% |  |  |  |  |
| CT_RW | 0.006 | 0.310 | -0.106 | 0.454*** | 2.056 | -0.190 | 55.2\% |  | 205 | 0.002 | 30.7\% | 75.9\% |
|  | (0.456) |  | (-1.223) | (17.435) |  | (-1.061) |  | 0.81\% |  |  |  |  |
| FGHJ_EP | 0.025 | 0.030 | -0.195 | $0.445 * * *$ | 2.061 ** | 0.023 | 54.8\% |  | 205 | 0.000 | 32.8\% | 75.5\% |
|  | (1.835) | (0.174) | (-1.606) | (17.662) | (2.828) | (0.244) |  | 0.81\% |  |  |  |  |
| FGHJ_RI | 0.029** | 0.060 | -0.147 | 0.442*** | 0.581 | -0.049 | 54.7\% |  | 205 | 0.000 | 26.5\% | 73.5\% |
|  | (2.915) | (0.587) | (-1.660) | (18.937) | (0.737) | (-0.826) |  | 0.80\% |  |  |  |  |
| PEG_EP | 0.022** | 0.021 | -0.127 | $0.441^{* * *}$ | 0.904*** | -0.086 | 54.3\% |  | 205 | 0.000 | 33.0\% | 100.0\% |
|  | (2.664) | (0.688) | (-1.462) | (17.133) | (4.058) | (-1.376) |  | 0.77\% |  |  |  |  |
| PEG_Anlst | 0.024** | 0.183*** | -0.010 | 0.427*** | 0.292 | 0.081 | 54.3\% |  | 205 | 0.000 | 20.1\% | 68.1\% |
|  | (2.747) | (3.173) | (-0.128) | (19.896) | (1.274) | (1.030) |  | 0.76\% |  |  |  |  |
| CT_EP | 0.047 | 0.070 | -0.090 | 0.404*** | 0.548 | -0.037 | 54.1\% |  | 205 | 0.000 | 28.4\% | 87.7\% |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_Anlst | (1.929) | (1.616) | (-1.248) | (12.768) | (1.636) | (-0.781) |  | 0.76\% |  |  |  |  |
|  | -0.006 | 0.209*** | -0.024 | 0.445*** | 0.473 | -0.067 | 55.1\% |  | 205 | 0.000 | $30.4 \%$ | 67.6\% |
|  | (-0.555) | (4.382) | (-0.341) | (19.808) | (1.458) | (-1.204) |  | 0.76\% |  |  |  |  |
| GG_RW | 0.007 | $0.371 * * *$ | 0.083 | $0.434 * * *$ | 5.584* | -0.223 | 55.3\% |  | 205 | 0.000 | 31.9\% | 72.3\% |
|  | (0.746) | (4.247) | (0.692) | (18.426) | (2.236) | (-1.423) |  | 0.71\% |  |  |  |  |
| GG_EP | 0.018* | -2.914 | -0.201 | $0.463 * * *$ | 3.782* | -0.037 | 54.8\% |  | 205 | 0.136 | 31.1\% | 75.1\% |
|  | (2.340) | (-1.114) | (-1.813) | (15.588) | (2.273) | (-0.479) |  | 0.69\% |  |  |  |  |
| MPEG_RW | 0.034*** | 0.096*** | -0.028 | $0.436 * * *$ | $0.515^{* * *}$ | -0.092 | 55\% |  | 205 | 0.000 | 23.5\% | 95.6\% |
|  | (3.447) | (3.355) | (-0.295) | (17.887) | (3.923) | (-1.484) |  | 0.66\% |  |  |  |  |
| FPM_RW | 0.05*** | 0.05*** | -0.056 | 0.422*** | 0.016 | -0.057 | 54.9\% |  | 205 | 0.000 | 20.6\% | 97.5\% |
|  | (5.173) | (3.963) | (-0.838) | (19.852) | (0.468) | (-0.910) |  | 0.66\% |  |  |  |  |
| GLS_RI | $0.025^{* *}$ | 0.103 | -0.132 | 0.444*** | 4.493 | -0.044 | 54.6\% |  | 205 | 0.000 | 28.4\% | 73.0\% |
|  | (2.935) | (1.236) | (-1.492) | (18.965) | (0.490) | (-0.735) |  | 0.66\% |  |  |  |  |
| TrES_Anlst _10Ind | 0.038*** | 0.025 | -0.085 | $0.448 * * *$ | 0.005 | -0.185 | 54.9\% |  | 205 | 0.000 | 22.1\% | 97.5\% |
|  | (3.878) | (1.911) | (-0.635) | (15.608) | (0.285) | (-1.853) |  | 0.65\% |  |  |  |  |
| WNG_EP | 0.048*** | 0.000 | -0.061 | $0.426 * * *$ | -0.003 | -0.080 | 54.3\% |  | 205 | 0.000 | 5.9\% | 99.5\% |
|  | (3.637) | (-0.437) | (-0.854) | (20.111) | (-0.960) | (-1.546) |  | 0.64\% |  |  |  |  |
| KMY_EP | -0.002 | $0.241^{* * *}$ | -0.035 | 0.405*** | 0.272* | $-0.376$ | 54.1\% |  | 205 | 0.000 | 38.7\% | 74.5\% |
|  | (-0.259) | (4.067) | (-0.437) | (11.901) | (2.027) | (-1.507) |  | 0.64\% |  |  |  |  |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_EP | 0.005 | $0.166^{* * *}$ | -0.145 | 0.449*** |  | -0.067 | 54.1\% |  | 205 | 0.000 | $36.8 \%$ | 80.4\% |
|  | (0.561) | (5.284) | (-1.647) | (17.581) | (2.087) | (-1.453) |  | 0.63\% |  |  |  |  |
| PE_RI | 0.032*** | 0.011 | -0.110 | $0.45 * * *$ |  | -0.042 | 54.7\% |  | 205 | 0.000 | 36.8\% | 74.0\% |
|  | (4.332) | (0.116) | (-1.475) | (19.345) | (2.557) | (-0.839) |  | 0.62\% |  |  |  |  |
| GM_RW | 0.019 | $0.067 * * *$ | -0.097 | $0.442 * * *$ | $0.495 * * *$ | -0.043 | 55.1\% |  | 205 | 0.000 | 26.2\% | 97.4\% |
|  | (1.940) | (3.399) | (-1.047) | (17.638) | (3.364) | (-0.734) |  | 0.61\% |  |  |  |  |
| PE_RW | 0.038*** | 0.118 | -0.029 | $0.439 * * *$ |  | -0.018 | 54.8\% |  | 205 | 0.000 | 14.7\% | 91.7\% |
|  | (4.237) | (1.672) | (-0.296) | (18.843) | (0.298) | (-0.303) |  | 0.57\% |  |  |  |  |
| MPEG_EP | $0.014$ | $0.070$ | -0.006 | $0.439^{* * *}$ | $0.763^{*}$ | -0.127 | 54.4\% |  | 205 | 0.000 | 33.3\% | 87.7\% |
|  | (1.483) | (1.109) | (-0.051) | (17.984) | (2.553) | (-1.326) |  | 0.54\% |  |  |  |  |
| 3FF_Factor | 0.042*** | -0.157 | -0.029 | $0.452 * * *$ | 4.666* | -0.045 | 54.5\% |  | 205 | 0.000 | 8.8\% | 41.2\% |
|  | (4.236) | (-0.955) | (-0.243) | (14.856) | (1.963) | (-0.243) |  | 0.52\% |  |  |  |  |
| KMY_RI | 0.015 | 0.151* | -0.120 | $0.437 * * *$ | 0.273 | -0.098 | 54.1\% |  | 205 | 0.000 | 28.9\% | 77.9\% |
|  | (1.716) | (2.076) | (-1.400) | (19.963) | (1.029) | (-1.123) |  | 0.48\% |  |  |  |  |
| DKL_RI | 0.018* | 0.088 | -0.124 | $0.441^{* * *}$ | 0.259 | -0.018 | 54.2\% |  | 205 | 0.000 | 29.9\% | 83.8\% |
|  | (2.014) | (1.531) | (-1.254) | (18.070) | (1.161) | (-0.369) |  | 0.45\% |  |  |  |  |
| HL_RI | 0.017 | 0.091 | -0.123 | $0.441^{* * *}$ | 0.253 | -0.020 | 54.2\% |  | 205 | 0.000 | 28.9\% | 83.8\% |
|  | (1.812) | (1.594) | (-1.253) | (18.040) | (1.135) | (-0.419) |  | 0.42\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.035*** | 0.009 | -0.055 | 0.432*** | 0.009 | -0.010 | 54.4\% |  | 205 | 0.000 | 11.3\% | 99.5\% |

[^43]Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_EP | (4.327) | (1.213) | (-0.726) | (18.787) | (1.282) | (-0.218) |  | 0.42\% |  |  |  |  |
|  | 0.012 | 0.119*** | -0.051 | $0.435 * * *$ | 1.097* | -0.214 | 54.3\% |  | 205 | 0.000 | 32.8\% | 86.3\% |
|  | (1.547) | (3.927) | (-0.700) | (18.615) | (2.536) | (-1.678) |  | 0.39\% |  |  |  |  |
| HL_EP | 0.008 | $0.135 * * *$ | -0.132 | $0.448 * * *$ | 0.507* | -0.081 | 53.8\% |  | 205 | 0.000 | 33.3\% | 82.4\% |
|  | (0.884) | (4.997) | (-1.519) | (17.605) | (2.061) | (-1.731) |  | 0.37\% |  |  |  |  |
| GM_HDZ | 0.021 | 0.248** | -0.126 | $0.457 * * *$ | 0.597 | -0.017 | 54.5\% |  | 205 | 0.000 | 27.9\% | 69.6\% |
|  | (1.813) | (2.714) | (-1.357) | (16.475) |  | (-0.224) |  | 0.37\% |  |  |  |  |
| TrES_RW_10Ind | $0.041^{* * *}$ | 4.833 | -0.085 | 0.441*** | 14.612 | -0.189 | 54.4\% |  | 205 | 0.232 | 19.6\% | 78.9\% |
|  | (5.309) | (1.510) | (-0.794) | (16.541) | (0.965) | (-1.348) |  | 0.35\% |  |  |  |  |
| FPM_EP | 0.019* | 0.075*** | -0.083 | 0.427*** | 0.010 | -0.058 | 54\% |  | 205 | 0.000 | 22.5\% | 97.5\% |
|  | (2.045) | (4.649) | (-1.087) | (18.380) | (0.474) | (-1.136) |  | 0.32\% |  |  |  |  |
| PEG_RI | 0.028*** | -0.022 | -0.125 | 0.44*** | 0.212 | -0.064 | 53.6\% |  | 205 | 0.000 | 27.4\% | 100.0\% |
|  | (3.119) | (-0.172) | (-1.457) | (17.035) | (1.471) | (-0.970) |  | 0.32\% |  |  |  |  |
| MPEG_HDZ | 0.018 | 0.226** | -0.095 | $0.452 * * *$ | 0.535 | -0.017 | 54.4\% |  | 205 | 0.000 | 27.5\% | 72.5\% |
|  | (1.515) | (3.046) | (-1.132) | (16.850) | (1.742) | (-0.258) |  | 0.31\% |  |  |  |  |
| TrES_Anlst _25SBM | 0.049*** | 0.003 | -0.121 | $0.427 * * *$ | -0.001 | -0.128 | 54.2\% |  | 205 | 0.000 | 8.3\% | 99.5\% |
|  | (5.692) | (0.809) | (-1.326) | (19.099) | (-0.304) | (-1.871) |  | 0.27\% |  |  |  |  |
| TrES_RW_25SBM | 0.041*** | -0.882 | -0.078 | 0.433*** | 0.383 | -0.005 | 54.4\% |  | 205 | 0.279 | 6.4\% | 82.8\% |
|  | (5.586) | (-0.509) | (-1.246) | (20.555) | (0.370) | (-0.081) |  | 0.24\% |  |  |  |  |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RI | 0.012 | 0.191* | -0.155 | 0.453*** | -0.068 | -0.020 | 54.3\% |  | 205 | 0.000 | 33.5\% | 76.4\% |
|  | (1.056) | (2.550) | (-1.634) | (16.413) | (-0.128) | (-0.255) |  | 0.24\% |  |  |  |  |
| CT_RI | $0.03 * * *$ | 0.008 | -0.057 | 0.43*** | 0.254 | -0.075 | 54\% |  | 205 | 0.000 | 12.3\% | 85.3\% |
|  | (3.706) | (0.203) | (-0.673) | (18.105) | (1.085) | (-0.728) |  | 0.23\% |  |  |  |  |
| DKL_RW | 0.010 | 0.060 | -0.102 | $0.445 * * *$ | -0.154 | -0.054 | 53.6\% |  | 205 | 0.000 | 18.1\% | 84.3\% |
|  | (0.541) | (1.757) | (-0.996) | $(16.584)$ | (-0.466) | (-0.959) |  | 0.20\% |  |  |  |  |
| MPEG_RI | 0.003 | 0.181** | -0.138 | 0.451*** | -3.870 |  | 54.2\% |  | 205 | 0.000 | 32.5\% | 82.3\% |
|  | (0.274) | (2.763) | (-1.628) | (16.866) | (-0.780) | (0.062) |  | 0.20\% |  |  |  |  |
| FPM_HDZ | 0.015* | $0.256 * * *$ | -0.078 | 0.44*** | 0.826** | -0.038 | 54.3\% |  | 205 | 0.000 | 26.0\% | 65.2\% |
|  | (1.976) | (3.814) | (-1.094) | (19.782) |  | (-0.878) |  | 0.20\% |  |  |  |  |
| 5FF_Factor | $0.037 * * *$ | 0.139 | -0.013 | $0.442 * * *$ | 0.046 | 0.018 | 54.2\% |  | 205 | 0.000 | 11.3\% | 47.1\% |
|  | (4.519) | (0.955) | (-0.139) | (18.623) | (0.033) | (0.333) |  | 0.19\% |  |  |  |  |
| HL_RW | 0.005 | 0.084 | -0.235 | 0.462*** | -0.213 | 0.095 | 53.6\% |  | 205 | 0.000 | 16.2\% | 86.8\% |
|  | (0.182) | (1.218) | (-1.149) | (13.625) | (-0.652) | (0.619) |  | 0.17\% |  |  |  |  |
| PEG_RW | 0.041*** | -0.011 | -0.083 | 0.438*** | 0.398** | -0.082 | 54.1\% |  | 205 | 0.000 | 21.5\% | 100.0\% |
|  | (3.226) | (-0.311) | (-0.675) | (14.449) | (2.634) | (-1.267) |  | 0.17\% |  |  |  |  |
| FPM_RI | 0.038*** | -0.003 | -0.019 | 0.446*** | 0.034 | -0.101 | 54.2\% |  | 205 | 0.000 | 21.1\% | 90.2\% |
|  | (3.582) | (-0.072) | (-0.276) | (18.717) | (1.094) | (-1.731) |  | 0.15\% |  |  |  |  |
| FGHJ_RW | 0.031*** | 0.030 | -0.059 | $0.439^{* * *}$ | 0.456 | -0.057 | 53.3\% |  | 205 | 0.000 | 22.1\% | 83.6\% |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_Anlst | (3.488) | (0.313) | (-0.768) | (19.363) | (1.448) | (-1.102) |  | 0.15\% |  |  |  |  |
|  | 0.044*** | 0.002 | -0.068 | 0.438*** | -0.194 | -0.003 | 53.5\% |  | 205 | 0.000 | 8.8\% | 99.5\% |
|  | (6.138) | (1.299) | (-0.964) | (19.784) | (-1.385) | (-0.041) |  | 0.14\% |  |  |  |  |
| GG_RI | 0.026*** | 0.126 | -0.101 | 0.443*** | $1.871 * * *$ | -0.127 | 53.9\% |  | 205 | 0.000 | 29.0\% | 78.2\% |
|  | (3.669) | (0.908) | (-1.365) | (19.011) | (3.347) | (-1.737) |  | 0.12\% |  |  |  |  |
| KMY_RW | 0.003 | 0.092 | -0.235 | 0.462*** | -0.172 | 0.095 | 53.5\% |  | 205 | 0.000 | 15.7\% | 87.3\% |
|  | (0.115) | (1.342) | (-1.145) | (13.622) | (-0.525) | (0.620) |  | 0.10\% |  |  |  |  |
| TrES_HDZ_25SBM | $0.047 * * *$ | -0.001 | -0.214 | 0.432*** | -0.001 | -0.130 | 54.3\% |  | 205 | 0.000 | 4.4\% | 99.0\% |
|  | (5.708) | (-0.216) | (-1.017) | (17.010) | (-0.274) | (-1.821) |  | 0.10\% |  |  |  |  |
| CAPM_Factor | 0.096 | -4.058 | -0.001 | 0.431*** | -14.158 | 0.231 | 54.1\% |  | 205 | 0.565 | 19.6\% | 26.0\% |
|  | (0.869) | (-0.463) | (-0.009) | (15.963) | (-0.892) | (1.236) |  | 0.09\% |  |  |  |  |
| PEG_HDZ | 0.017 | 0.252* | -0.175 | 0.469*** | 0.516 | 0.005 | 54.5\% |  | 205 | 0.000 | 19.6\% | 69.1\% |
|  | (1.171) | (2.535) | (-1.597) | (13.474) | (1.380) | (0.063) |  | 0.08\% |  |  |  |  |
| TrES_RI_25SBM | 0.042*** | -0.005 | -0.123 | 0.426*** | 0.004 | -0.051 | 53.4\% |  | 205 | 0.000 | 6.9\% | 99.5\% |
|  | (5.072) | (-1.657) | (-1.669) | (18.370) | (1.276) | (-1.087) |  | 0.04\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.053*** | -0.030 | -0.095 | $0.442 * * *$ | -0.045 | -0.043 | 53.6\% |  | 205 | 0.000 | 19.6\% | 96.6\% |
|  | (3.915) | (-0.923) | (-0.935) | (17.073) | (-1.084) | (-0.755) |  | 0.02\% |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.04*** | 0.040 | -0.074 | 0.428*** | 0.071 | -0.199 | 53.8\% |  | 205 | 0.000 | 12.3\% | 83.3\% |
|  | (5.342) | (1.030) | (-0.728) | (16.251) | (0.951) | (-1.151) |  | 0.02\% |  |  |  |  |

Continued in next page...

Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_10Ind | 0.037*** | 0.163* | -0.131 | 0.452*** | 0.674 | -0.068 | 53.7\% |  | 205 | 0.000 | 18.6\% | 72.1\% |
|  | (4.520) | (2.449) | (-1.223) | (16.685) | (1.397) | (-1.232) |  | 0.01\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.047*** | 0.003 | -0.026 | 0.426*** | 0.002 | -0.068 | 53.2\% |  | 205 | 0.000 | 9.8\% | 99.5\% |
|  | (6.038) | (0.619) | (-0.368) | (19.723) | (0.310) | (-1.257) |  | -0.02\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.047*** | -0.003 | -0.108 | 0.44*** | -0.004 | -0.210 | 53.3\% |  | 205 | 0.000 | 9.3\% | 98.5\% |
|  | (6.419) | (-0.307) | (-1.208) | (17.803) | (-0.343) | (-2.237) |  | -0.06\% |  |  |  |  |
| TrOHE_25SBM | 0.043*** | 0.031 | -0.097 | 0.438*** | -0.026 | -0.049 | 53.2\% |  | 205 | 0.000 | 12.7\% | 88.2\% |
|  | (6.041) | (1.450) | (-1.159) | (19.585) | (-1.424) | (-0.991) |  | -0.11\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.052*** | -0.078 | -0.148 | $0.443 * * *$ | 0.077* | -0.110 | 53\% |  | 205 | 0.000 | 7.4\% | 91.7\% |
|  | (6.852) | $(-1.941)$ | (-1.995) | (18.599) |  | (-1.680) |  | -0.12\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.042*** | -0.054 | -0.076 | 0.432*** | 0.001 | -0.142 | 53.4\% |  | 205 | 0.000 | 10.8\% | 89.2\% |
|  | (5.504) | (-1.456) | (-0.924) | (19.197) | (0.032) | (-1.785) |  | -0.12\% |  |  |  |  |
| TrES_EP_10Ind | $0.041^{* * *}$ | 0.048 | -0.017 | 0.43*** | 0.023 | -0.161 | 53.6\% |  | 205 | 0.000 | 14.7\% | 96.1\% |
|  | (4.566) | (1.264) | (-0.114) | (17.315) | (0.971) | (-1.209) |  | -0.16\% |  |  |  |  |
| WNG_RI | 0.041*** | -0.003 | -0.154 | $0.449 * * *$ | 0.152 | -0.030 | 53.7\% |  | 205 | 0.000 | $3.4 \%$ | 100.0\% |
|  | (5.302) | (-0.547) | (-1.418) | (16.517) | (1.124) | (-0.553) |  | -0.20\% |  |  |  |  |
| WNG_RW | 0.047*** | 0.000 | -0.107 | 0.431*** | -0.004 | -0.131 | 53.2\% |  | 205 | 0.000 | 3.9\% | 99.5\% |
|  | (6.454) | (-1.246) | (-1.476) | (20.171) | (-0.828) | (-1.695) |  | -0.25\% |  |  |  |  |
| Carhart_Factor | 0.039*** | -0.034 | -0.037 | 0.448*** | 2.503* | -0.026 | 53.4\% |  | 205 | 0.000 | 8.3\% | 58.3\% |

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Table 82 : Capturing Subsequent Return: Low Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_RI_10Ind | (4.478) | (-0.350) | (-0.439) | (16.754) | (2.011) | (-0.221) |  | -0.25\% |  |  |  |  |
|  | 0.042*** | -0.012 | -0.084 | $0.439 * * *$ | 0.056 | -0.156 | 53.3\% |  | 205 | 0.000 | 15.7\% | 98.5\% |
|  | (5.385) | (-0.890) | (-1.071) | (19.801) | (1.070) | (-1.487) |  | -0.28\% |  |  |  |  |
| GLS_RW | 0.048 | 0.010 | -0.108 | 0.45 *** | 0.093 | -0.057 | 53.1\% |  | 205 | 0.000 | 13.2\% | 86.8\% |
|  | (1.472) | (0.249) | (-0.847) | (15.984) | (0.222) | (-1.073) |  | -0.29\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.043*** | 0.004 | -0.087 | $0.434^{* * *}$ | -0.012 | -0.073 | 53\% |  | 205 | 0.000 | 11.8\% | 95.1\% |
|  | (6.287) | (0.277) | (-1.266) | (19.831) | (-0.669) | (-1.183) |  | -0.41\% |  |  |  |  |
| TrES_EP_25SBM | 0.033** | 0.032 | -0.094 | 0.438*** | -0.023 | 0.077 | 54\% |  | 205 | 0.000 | 5.9\% | 99.5\% |
|  | (2.742) | (1.045) | (-1.324) | (13.953) | (-0.991) | (0.700) |  | -0.46\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.043*** | -0.022 | -0.090 | $0.428 * * *$ | -0.005 | -0.067 | 52.9\% |  | 205 | 0.000 | 13.7\% | 98.0\% |
|  | (5.878) | (-1.771) | (-1.248) | (20.178) | (-0.080) | (-1.410) |  | -0.48\% |  |  |  |  |
| WNG_HDZ | 0.045*** | 0.000 | -0.038 | $0.453 * * *$ | 0.196 | -0.081 | 53.3\% |  | 205 | 0.000 | 0.5\% | 99.5\% |
|  | (4.442) | (-0.692) | (-0.391) | (15.753) | (1.196) | (-1.362) |  | -0.56\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.026 | 0.028 | -0.231 | $0.465 * * *$ | -0.043 | -0.129 | 52.9\% |  | 205 | 0.000 | 12.3\% | 99.0\% |
|  | (1.909) | (1.587) | (-1.919) | (14.375) | (-1.190) | (-0.909) |  | -0.60\% |  |  |  |  |

For the lowest quartile of firms in terms of coefficient of variation in earnings forecasts, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it
represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.016* | 0.16*** | 0.401*** | 0.464*** | 0.051 | -0.057 | 61.7\% | 6.44\% | 205 | 0.000 | 70.0\% | 92.1\% |
|  | (2.420) | (7.981) | (3.306) | (15.968) | (1.732) | (-1.178) |  |  |  |  |  |  |
| Naive | 0.021*** | 0.161*** | 0.442*** | 0.459*** | 0.068 | -0.062 | 61.5\% | 6.31\% | 205 | 0.000 | 70.0\% | 92.1\% |
|  | (3.233) | (7.799) | (3.758) | (15.568) | (1.875) | (-1.346) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.015* | 0.156*** | 0.409*** | 0.459*** | 0.058* | -0.096 | 61.3\% | 6.05\% | 205 | 0.000 | 70.0\% | 93.6\% |
|  | (2.197) | (8.433) | (3.800) | (16.563) | (2.128) | (-1.377) |  |  |  |  |  |  |
| BP_HDZ | -0.001 | 1.051*** | 0.313** | 0.451*** | 0.375* | -0.087 | 59.7\% | 5.26\% | 205 | 0.624 | 70.4\% | 48.8\% |
|  | (-0.085) | (10.040) | (2.684) | (17.063) | (2.384) | (-1.221) |  |  |  |  |  |  |
| BP_Anlst | 0.001 | 1.092*** | 0.304** | 0.463*** | 0.402* | -0.041 | 59.4\% | 5.00\% | 205 | 0.331 | 69.0\% | 53.7\% |
|  | (0.119) | (11.523) | (2.727) | (18.303) | (2.436) | (-0.802) |  |  |  |  |  |  |
| TPDPS_RI | 0.021** | 0.114*** | 0.369** | $0.442 * * *$ | 0.068 | -0.104 | 59.9\% | 4.70\% | 205 | 0.000 | 58.6\% | 92.1\% |
|  | (3.047) | (5.627) | (2.875) | (15.376) | (1.908) | (-2.186) |  |  |  |  |  |  |
| TPDPS_EP | 0.022*** | 0.105*** | 0.337** | 0.442*** | 0.066 | -0.079 | 59.5\% | 4.38\% | 205 | 0.000 | 60.6\% | 93.6\% |
|  | (3.177) | (5.504) | (2.815) | (15.053) | (1.868) | (-1.653) |  |  |  |  |  |  |
| BP_EP | 0.008 | 0.726*** | 0.187 | 0.441*** | 0.294 | -0.078 | 58.3\% | 3.99\% | 205 | 0.012 | 61.6\% | 57.6\% |
|  | (1.021) | (6.698) | (1.681) | (16.003) | (1.922) | (-1.591) |  |  |  |  |  |  |
| TPDPS_RW | 0.03*** | 0.076*** | 0.189** | 0.467*** | 0.094* | -0.186 | 58.8\% | 3.93\% | 205 | 0.000 | 51.7\% | 95.6\% |
|  | (4.354) | (3.921) | (3.055) | (21.044) | (2.576) | (-1.385) |  |  |  |  |  |  |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | 0.010 | 0.754*** | 0.259* | 0.437*** | 0.276 | -0.090 | 58\% | 3.76\% | 205 | 0.027 | 56.7\% | 55.7\% |
|  | (1.402) | (6.847) | (2.468) | (16.184) | (1.854) | (-1.826) |  |  |  |  |  |  |
| BP_RW | 0.02** | 0.713*** | 0.171 | 0.442*** | 0.293 | -0.062 | 57.6\% | 3.39\% | 205 | 0.010 | 55.2\% | 52.2\% |
|  | (2.647) | (6.485) | (1.468) | (15.711) | (1.918) | (-1.168) |  |  |  |  |  |  |
| PE_Anlst | -0.009 | 1.029*** | 0.544*** | 0.434*** | 0.856 | -0.347 | 57.4\% | 3.01\% | 205 | 0.798 | 59.6\% | 42.9\% |
|  | (-0.969) | (9.117) | (3.268) | (18.689) | (1.253) | (-2.401) |  |  |  |  |  |  |
| GLS_Anlst | -0.039 | 0.764*** | 0.050 | 0.431*** | 0.625 | -0.176 | 56.3\% | 1.98\% | 205 | 0.148 | $36.5 \%$ | 54.7\% |
|  | (-2.439) | (4.710) | (0.571) | (18.789) | (0.767) | (-2.126) |  |  |  |  |  |  |
| CT_Anlst | -0.012 | 0.544*** | 0.149 | $0.448 * * *$ | 1.076 | -0.080 | 56.1\% | 1.95\% | 205 | 0.000 | 40.4\% | 59.1\% |
|  | (-1.151) | (4.706) | (1.733) | (20.069) | (1.540) | (-1.498) |  |  |  |  |  |  |
| FGHJ_HDZ | 0.004 | 0.37*** | -0.065 | 0.449*** | $2.366^{* * *}$ | -0.035 | 55.9\% | 1.88\% | 205 | 0.000 | 26.6\% | 69.0\% |
|  | (0.324) | (3.482) | (-0.807) | (19.214) | (4.192) | (-0.577) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.038 | 0.677*** | 0.042 | 0.445*** | 1.631** | -0.133 | 56.2\% | 1.81\% | 205 | 0.019 | 39.9\% | 57.6\% |
|  | (-2.525) | (4.967) | (0.476) | (19.388) | (2.839) | (-1.927) |  |  |  |  |  |  |
| CT_RW | 0.007 | 0.296 | -0.070 | 0.459*** | 1.714 | -0.245 | 55.8\% | 1.65\% | 205 | 0.003 | 28.3\% | 76.3\% |
|  | (0.460) | (1.261) | (-0.747) | (17.173) | (1.446) | (-1.338) |  |  |  |  |  |  |
| DKL_Anlst | -0.029 | 0.683*** | 0.128 | 0.444*** | 0.216 | $-0.077$ | 56\% | 1.62\% | 205 | 0.014 | 42.9\% | 46.8\% |
|  | (-2.435) | (5.310) | (1.779) | (20.420) | (0.408) | (-1.414) |  |  |  |  |  |  |
| MPEG_RW | 0.033** | 0.096*** | 0.026 | 0.439*** | 0.523*** | -0.104 | 55.4\% | 1.60\% | 205 | 0.000 | 25.1\% | 95.6\% |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_Anlst | (3.003) | (3.267) | (0.271) | (17.705) | (3.704) | (-1.112) |  |  |  |  |  |  |
|  | 0.006 | 0.334*** | 0.053 | 0.436*** | -0.034 | 0.073 | $55.2 \%$ | 1.55\% | 205 | 0.000 | 32.5\% | 56.2\% |
|  | (0.699) | (5.398) | (0.696) | (19.792) | (-0.116) | (0.913) |  |  |  |  |  |  |
| GM_RW | 0.020 | 0.064** | -0.080 | 0.448*** | $0.511^{* * *}$ | -0.077 | 55.4\% | 1.54\% | 205 | 0.000 | 26.8\% | 97.4\% |
|  | (1.742) | (2.795) | (-0.836) | (17.211) | (3.446) | (-0.812) |  |  |  |  |  |  |
| GLS_HDZ | 0.009 | 0.332*** | -0.102 | 0.45*** | $2.387 * * *$ | -0.040 | 55.7\% | 1.54\% | 205 | 0.000 | 28.6\% | 65.0\% |
|  | (0.969) | (3.531) | (-0.910) | (18.948) | (4.537) | (-0.679) |  |  |  |  |  |  |
| CT_EP | 0.052* | 0.083 | -0.040 | 0.409*** | 0.413 | -0.030 | 55\% | 1.53\% | 205 | 0.000 | 26.1\% | 88.7\% |
|  | (2.138) | (1.798) | (-0.571) | (12.692) | (1.051) | (-0.725) |  |  |  |  |  |  |
| GM_Anlst | -0.021 | $0.581 * * *$ | 0.078 | $0.441^{* * *}$ | 0.037 | -0.080 | 55.4\% | 1.48\% | 205 | 0.000 | 33.0\% | 51.2\% |
|  | (-2.215) | (6.966) | (1.089) | (20.853) | (0.113) | (-0.506) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.036*** | -0.011 | -0.034 | $0.421^{* * *}$ | 0.035 | -0.009 | 54.7\% | 1.48\% | 205 | 0.000 | 18.2\% | 98.5\% |
|  | (4.261) | (-0.792) | (-0.582) | (19.896) | (1.266) | (-0.108) |  |  |  |  |  |  |
| TrES_Anlst _10Ind | 0.043*** | 0.009 | 0.024 | $0.453 * * *$ | 0.010 | -0.093 | 55.4\% | 1.46\% | 205 | 0.000 | 19.7\% | 98.0\% |
|  | (4.347) | (0.783) | (0.294) | (15.919) | (0.672) | (-0.875) |  |  |  |  |  |  |
| GG_HDZ | 0.015 | 0.345** | 0.070 | $0.447^{* * *}$ | $2.399 * * *$ | -0.174 | 55.7\% | 1.44\% | 205 | 0.000 | 31.0\% | 67.0\% |
|  | (1.695) | (3.082) | (0.540) | (18.056) | (4.742) | (-1.061) |  |  |  |  |  |  |
| DKL_HDZ | 0.007 | 0.361* | -0.021 | $0.451^{* * *}$ | 1.12*** | -0.222 | 55.5\% | 1.34\% | 205 | 0.000 | 29.6\% | 71.9\% |
|  | (0.496) | (2.312) | (-0.216) | (18.801) | (3.103) | (-1.495) |  |  |  |  |  |  |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | -0.013 | $0.477^{* *}$ | 0.014 | 0.446*** | 0.040 | 0.034 | 55\% | 1.34\% | 205 | 0.004 | $33.5 \%$ | 36.9\% |
|  | (-0.888) | (2.679) | (0.180) | (19.732) | (0.062) | (0.559) |  |  |  |  |  |  |
| KMY_HDZ | 0.017 | 0.248* | -0.079 | 0.455*** | 1.26 *** | -0.167 | 55.4\% | 1.33\% | 205 | 0.000 | 29.1\% | 68.0\% |
|  | (1.623) | (2.077) | (-0.707) | (17.610) | (3.757) | (-1.245) |  |  |  |  |  |  |
| HL_Anlst | -0.020 | 0.597*** | 0.129 | $0.441^{* * *}$ | 0.405 | -0.028 | 55.6\% | 1.31\% | 205 | 0.000 | 35.0\% | 48.8\% |
|  | (-1.916) | (6.188) | (1.940) | (20.675) | (1.188) | (-0.510) |  |  |  |  |  |  |
| KMY_EP | -0.001 | 0.222*** | 0.002 | 0.41*** | 0.208 | -0.407 | 54.8\% | 1.30\% | 205 | 0.000 | 35.0\% | 74.4\% |
|  | (-0.093) | (3.687) | (0.021) | (11.897) | (0.702) | (-1.623) |  |  |  |  |  |  |
| CT_HDZ | 0.021* | 0.219* | -0.007 | 0.453*** | 1.197*** | -0.188 | 55.2\% | 1.23\% | 205 | 0.000 | 33.5\% | 70.0\% |
|  | (2.315) | (2.502) | (-0.069) | (17.925) | (3.267) | (-1.492) |  |  |  |  |  |  |
| DKL_EP | 0.008 | $0.146 * * *$ | -0.102 | $0.452^{* * *}$ | 0.527 | -0.096 | 54.8\% | 1.22\% | 205 | 0.000 | $34.5 \%$ | 79.3\% |
|  | (0.874) | (5.027) | (-1.191) | (17.464) | (1.762) | (-1.967) |  |  |  |  |  |  |
| GG_EP | 0.017* | -3.035 | -0.238 | 0.474*** | 2.697 | -0.059 | 55.1\% | 1.19\% | 205 | 0.132 | 30.7\% | 74.5\% |
|  | (2.160) | (-1.138) | (-1.924) | (15.270) | (1.692) | (-0.650) |  |  |  |  |  |  |
| PE_RW | 0.04*** | 0.152 | 0.041 | 0.444*** | 0.099 | 0.018 | 55.2\% | 1.17\% | 205 | 0.000 | 15.3\% | 91.1\% |
|  | (4.438) | (1.757) | (0.395) | (18.656) | (0.266) | (0.297) |  |  |  |  |  |  |
| GG_Anlst | 0.004 | $0.119^{* * *}$ | -0.006 | 0.449*** | 0.426 | -0.102 | 54.9\% | 1.17\% | 205 | 0.000 | 27.6\% | 73.9\% |
|  | (0.301) | (3.175) | (-0.076) | (19.263) | (1.282) | (-1.630) |  |  |  |  |  |  |
| PE_HDZ | 0.019* | 0.376** | -0.101 | $0.45 * * *$ | $1.856^{* * *}$ | -0.172 | 55.2\% | 1.14\% | 205 | 0.000 | 38.9\% | 64.0\% |

[^44]Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_EP | (2.114) | (3.003) | (-0.965) | (18.923) | (3.651) | (-2.112) |  |  |  |  |  |  |
|  | 0.017 | 0.126 | -0.260 | 0.459*** | 1.723*** | -0.027 | 54.9\% | 1.14\% | 205 | 0.000 | 29.1\% | 71.9\% |
|  | (1.574) | (0.906) | (-2.172) | (17.853) | (3.149) | (-0.256) |  |  |  |  |  |  |
| PE_EP | 0.033*** | -0.327 | -0.190 | 0.476*** | 2.114*** | 0.280 | 55.1\% | 1.10\% | 205 | 0.009 | 36.5\% | 74.4\% |
|  | (3.541) | (-0.651) | (-1.410) | (12.658) | (3.272) | (0.900) |  |  |  |  |  |  |
| MPEG_EP | 0.013 | 0.098 | 0.025 | 0.443*** | 0.767** | -0.119 | 54.8\% | 1.08\% | 205 | 0.000 | 31.5\% | 88.2\% |
|  | (1.271) | (1.457) | (0.212) | (18.131) | (2.996) | (-1.227) |  |  |  |  |  |  |
| PE_RI | 0.031*** | 0.046 | -0.064 | 0.451*** | 1.477* | -0.014 | 54.7\% | 1.07\% | 205 | 0.000 | 36.5\% | 73.4\% |
|  | (4.210) | (0.456) | (-0.842) | (19.283) | (2.101) | (-0.277) |  |  |  |  |  |  |
| HL_EP | 0.010 | $0.121^{* * *}$ | -0.091 | 0.452*** | 0.512 | -0.116 | 54.6\% | 1.05\% | 205 | 0.000 | 30.5\% | 83.3\% |
|  | (1.079) | (4.576) | (-1.080) | (17.488) | (1.739) | (-2.239) |  |  |  |  |  |  |
| FGHJ_EP | 0.027* | 0.013 | -0.213 | $0.454 * * *$ | $2.022 * *$ | -0.027 | 54.5\% | 1.03\% | 205 | 0.000 | 31.0\% | 75.9\% |
|  | (1.971) | (0.071) | (-1.782) | (17.593) | (3.053) | (-0.251) |  |  |  |  |  |  |
| KMY_Anlst | -0.001 | 0.189*** | 0.016 | 0.451*** | 0.335 | -0.079 | 55\% | 1.00\% | 205 | 0.000 | 30.5\% | 62.6\% |
|  | (-0.132) | (3.421) | (0.229) | (19.219) | (0.768) | (-1.357) |  |  |  |  |  |  |
| GG_RW | 0.013 | 0.265* | 0.033 | 0.446*** | 3.714* | -0.166 | 55.1\% | 0.93\% | 205 | 0.000 | 29.8\% | 75.0\% |
|  | (1.353) | (2.413) | (0.240) | (17.352) | (2.328) | (-0.973) |  |  |  |  |  |  |
| WNG_EP | 0.055*** | 0.000 | 0.020 | 0.438*** | -0.003 | -0.093 | 54.4\% | 0.91\% | 205 | 0.000 | 6.9\% | 100.0\% |
|  | (3.597) | (-0.170) | (0.308) | (18.984) | (-1.081) | (-1.442) |  |  |  |  |  |  |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% + +sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_HDZ | 0.009 | 0.313** | 0.000 | 0.452*** | 1.006*** | -0.178 | 55.2\% | 0.87\% | 205 | 0.000 | 27.1\% | 70.9\% |
|  | (0.697) | (2.625) | (0.003) | (18.518) | (3.707) | (-1.796) |  |  |  |  |  |  |
| GM_EP | 0.010 | 0.159*** | -0.022 | 0.441*** | 1.308** | -0.184 | 54.6\% | 0.85\% | 205 | 0.000 | 33.5\% | 84.2\% |
|  | (1.138) | (3.418) | (-0.290) | (18.642) | (2.618) | (-1.440) |  |  |  |  |  |  |
| PEG_EP | 0.023** | 0.087* | -0.103 | 0.451*** | 0.969*** | -0.120 | 54.2\% | 0.83\% | 205 | 0.000 | 33.1\% | 100.0\% |
|  | (2.639) | (2.055) | (-0.957) | (17.000) | (4.846) | (-1.398) |  |  |  |  |  |  |
| 5FF_Factor | 0.038*** | 0.044 | 0.069 | 0.442*** | -0.167 | 0.083 | 54.5\% | 0.80\% | 205 | 0.000 | 10.8\% | 47.8\% |
|  | (4.568) | (0.235) | (0.571) | (18.638) | (-0.122) | (1.021) |  |  |  |  |  |  |
| GM_HDZ | 0.019 | 0.29** | -0.047 | 0.459*** | 0.542 | -0.046 | 54.9\% | 0.79\% | 205 | 0.000 | 24.6\% | 70.9\% |
|  | (1.603) | (2.874) | (-0.489) | (16.358) | (1.187) | (-0.566) |  |  |  |  |  |  |
| PEG_RW | 0.042** | -0.010 | -0.022 | $0.442^{* * *}$ | 0.347* | -0.098 | 54.5\% | 0.79\% | 205 | 0.000 | 25.4\% | 100.0\% |
|  | (2.993) | (-0.302) | (-0.170) | (14.320) | (2.027) | (-0.923) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.042*** | 2.579 | -0.125 | 0.45*** | 15.030 | -0.195 | 54.5\% | 0.78\% | 205 | 0.587 | 19.2\% | 77.8\% |
|  | (5.209) | (0.888) | (-1.084) | (16.070) | (1.067) | (-1.130) |  |  |  |  |  |  |
| MPEG_HDZ | 0.016 | 0.25*** | -0.018 | 0.456*** | 0.428 | -0.036 | 54.8\% | 0.78\% | 205 | 0.000 | 27.6\% | 73.9\% |
|  | (1.365) | (3.118) | (-0.203) | (16.686) | (1.405) | (-0.484) |  |  |  |  |  |  |
| 3FF_Factor | 0.042*** | -0.104 | 0.008 | 0.456*** | 5.168* | -0.041 | 54.3\% | 0.78\% | 205 | 0.000 | 7.9\% | 43.3\% |
|  | (4.201) | (-0.451) | (0.062) | (14.831) | (2.099) | (-0.220) |  |  |  |  |  |  |
| PEG_Anlst | 0.024** | 0.189*** | 0.006 | 0.43*** | 0.182 | 0.092 | 54.4\% | 0.76\% | 205 | 0.000 | 17.7\% | 70.0\% |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RW_25SBM | (2.648) | (3.205) | (0.083) | (19.907) | (0.845) | (1.182) |  |  |  |  |  |  |
|  | 0.041*** | -1.346 | -0.031 | $0.437 * * *$ | 0.971 | -0.019 | 54.9\% | 0.75\% | 205 | 0.167 | 9.9\% | 82.8\% |
|  | (5.482) | (-0.796) | (-0.495) | (20.269) | (1.015) | (-0.307) |  |  |  |  |  |  |
| FGHJ_RI | 0.029** | 0.057 | -0.113 | $0.449^{* * *}$ | 0.220 | -0.032 | 54.1\% | 0.73\% | 205 | 0.000 | 25.6\% | 70.9\% |
|  | (2.813) | (0.522) | (-1.253) | (18.633) | (0.301) | (-0.515) |  |  |  |  |  |  |
| FPM_RW | 0.044*** | 0.052 *** | 0.016 | 0.435*** | 0.036 | -0.072 | 55.2\% | 0.73\% | 205 | 0.000 | 21.2\% | 98.0\% |
|  | (4.702) | (4.349) | (0.249) | (19.706) | (0.936) | (-0.967) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | $0.038^{* * *}$ | 0.010 | 0.022 | $0.441^{* * *}$ | 0.001 | -0.003 | 54.9\% | 0.70\% | 205 | 0.000 | 12.3\% | 100.0\% |
|  | (4.744) | (1.481) | (0.333) | (18.490) | (0.182) | (-0.043) |  |  |  |  |  |  |
| KMY_RW | 0.029 | 0.010 | -0.106 | 0.451*** | -0.170 | 0.004 | 54\% | 0.61\% | 205 | 0.000 | 14.8\% | 87.2\% |
|  | (1.505) | (0.315) | (-0.877) | (16.631) | (-0.522) | (0.054) |  |  |  |  |  |  |
| HL_RW | 0.031 | 0.001 | -0.106 | 0.452*** | -0.214 | 0.003 | 54\% | 0.59\% | 205 | 0.000 | 16.3\% | 86.7\% |
|  | (1.596) | (0.040) | (-0.879) | (16.629) | (-0.662) | (0.050) |  |  |  |  |  |  |
| DKL_RW | 0.018 | 0.019 | -0.108 | 0.448*** | -0.073 | 0.010 | 54\% | 0.59\% | 205 | 0.000 | 19.2\% | 83.7\% |
|  | (0.952) | (0.403) | (-0.934) | (16.259) | (-0.219) | (0.142) |  |  |  |  |  |  |
| FPM_HDZ | 0.013 | 0.276*** | -0.055 | 0.445*** | 1.034** | -0.091 | 54.7\% | 0.56\% | 205 | 0.000 | 26.1\% | 67.5\% |
|  | (1.644) | (3.862) | (-0.767) | (19.505) | (2.699) | (-0.905) |  |  |  |  |  |  |
| FPM_EP | 0.018 | 0.076*** | -0.030 | 0.44*** | 0.012 | -0.081 | 54.1\% | 0.55\% | 205 | 0.000 | 23.6\% | 97.5\% |
|  | (1.892) | (4.580) | (-0.375) | (18.729) | (0.619) | (-1.184) |  |  |  |  |  |  |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_Anlst | 0.046*** | 0.005 | -0.008 | $0.447 * * *$ | -0.328 | -0.073 | 53.8\% | 0.53\% | 205 | 0.000 | 7.4\% | 100.0\% |
|  | (6.164) | (1.549) | (-0.123) | (18.750) | (-0.750) | (-0.800) |  |  |  |  |  |  |
| PEG_HDZ | 0.015 | 0.28** | -0.092 | 0.47*** | 0.488 | 0.012 | 54.7\% | 0.51\% | 205 | 0.000 | 20.7\% | 70.0\% |
|  | (1.009) | (2.681) | (-0.831) | (13.492) | (1.397) | (0.155) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.055*** | -0.031 | -0.032 | $0.443 * * *$ | -0.046 | 0.036 | 54.4\% | 0.51\% | 205 | 0.000 | 20.2\% | 98.5\% |
|  | (4.004) | (-0.950) | (-0.323) | (17.136) | (-1.102) | (0.400) |  |  |  |  |  |  |
| FGHJ_RW | 0.031*** | 0.037 | 0.029 | 0.444*** | 0.500 | -0.032 | 53.6\% | 0.50\% | 205 | 0.000 | 20.6\% | 85.1\% |
|  | (3.335) | (0.361) | (0.325) | (18.805) | (1.604) | (-0.478) |  |  |  |  |  |  |
| KMY_RI | 0.016 | 0.176** | -0.044 | 0.44*** | 0.262 | -0.090 | 54\% | 0.46\% | 205 | 0.000 | 29.6\% | 75.9\% |
|  | (1.773) | (2.934) | (-0.503) | (19.695) | (0.983) | (-1.021) |  |  |  |  |  |  |
| DKL_RI | 0.019* | 0.093* | -0.056 | $0.445^{* * *}$ | 0.258 | -0.019 | 54\% | 0.43\% | 205 | 0.000 | 30.0\% | 82.8\% |
|  | (2.160) | (2.165) | (-0.542) | (17.790) | (1.154) | (-0.370) |  |  |  |  |  |  |
| TrES_Anlst_25SBM | 0.058*** | -0.002 | -0.031 | $0.423 * * *$ | 0.003 | -0.084 | 54.2\% | 0.42\% | 205 | 0.000 | 6.4\% | 99.5\% |
|  | (5.081) | (-0.324) | (-0.384) | (18.318) | (0.525) | (-1.125) |  |  |  |  |  |  |
| GLS_RI | 0.027** | 0.081 | -0.104 | $0.449 * * *$ | 2.794 | -0.033 | 53.8\% | 0.42\% | 205 | 0.000 | 27.6\% | 73.9\% |
|  | (2.984) | (0.900) | (-1.116) | (18.870) | (0.397) | (-0.561) |  |  |  |  |  |  |
| HL_RI | 0.018* | 0.095* | -0.055 | $0.445^{* * *}$ | 0.260 | -0.021 | 54\% | 0.41\% | 205 | 0.000 | 30.0\% | 82.8\% |
|  | (1.996) | (2.226) | (-0.535) | (17.767) | (1.161) | (-0.420) |  |  |  |  |  |  |
| GM_RI | 0.011 | 0.218** | -0.104 | 0.459*** | -0.287 | -0.032 | 54.1\% | 0.40\% | 205 | 0.000 | 34.2\% | 73.8\% |

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Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_HDZ_25SBM | (0.906) | (2.782) | (-1.117) | (16.457) | (-0.346) | (-0.411) |  |  |  |  |  |  |
|  | 0.044*** | 0.003 | -0.219 | $0.447 * * *$ | 0.000 | -0.097 | 54.5\% | 0.28\% | 205 | 0.000 | 5.9\% | 99.0\% |
|  | (5.442) | (0.855) | (-1.022) | (17.070) | (-0.118) | (-1.326) |  |  |  |  |  |  |
| CT_RI | 0.031 *** | 0.029 | -0.025 | $0.437 * * *$ | 0.087 | -0.077 | 53.7\% | 0.27\% | 205 | 0.000 | 12.3\% | 84.7\% |
|  | (3.722) | (0.737) | (-0.299) | (17.529) | (0.298) | (-0.761) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.051*** | -0.067 | -0.047 | $0.445^{* * *}$ | 0.066 | -0.058 | 53.4\% | 0.24\% | 205 | 0.000 | 7.4\% | 89.7\% |
|  | (6.502) | (-1.547) | (-0.588) | (18.238) | (1.545) | (-0.736) |  |  |  |  |  |  |
| PEG_RI | 0.03*** | 0.011 | -0.138 | 0.452*** | 0.253 | -0.095 | 53.5\% | 0.22\% | 205 | 0.000 | 28.2\% | 100.0\% |
|  |  | (0.281) | (-1.339) | (16.302) | (1.579) | (-1.169) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.042*** | 0.055 | 0.039 | 0.432*** | 0.001 | -0.104 | 53.6\% | 0.21\% | 205 | 0.000 | 14.8\% | 96.6\% |
|  | (4.620) | (1.440) | (0.264) | (16.868) | (0.030) | (-0.761) |  |  |  |  |  |  |
| FPM_RI | 0.038*** | 0.005 | 0.037 | 0.451*** | 0.080 | -0.145 | 54.1\% | 0.19\% | 205 | 0.000 | 21.2\% | 89.2\% |
|  | (3.523) | (0.123) | (0.529) | (18.660) | (1.114) | (-1.885) |  |  |  |  |  |  |
| CAPM_Factor | 0.165 | -9.768 | -0.019 | 0.441*** | 2.391 | 0.212 | 53.9\% | 0.19\% | 205 | 0.280 | 20.2\% | 24.6\% |
|  | (1.319) | (-0.982) | (-0.164) | (15.614) | (0.185) | (1.112) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.043*** | 0.031 | 0.017 | 0.443*** | -0.033 | 0.008 | 53.4\% | 0.18\% | 205 | 0.000 | 12.8\% | 88.2\% |
|  | (5.899) | (1.274) | (0.228) | (19.162) | (-1.389) | (0.152) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.037*** | 0.214** | -0.071 | 0.452*** | 0.589 | -0.013 | 53.6\% | 0.17\% | 205 | 0.000 | 18.2\% | 72.4\% |
|  | (4.534) | (2.794) | (-0.703) | (16.672) | (1.234) | (-0.200) |  |  |  |  |  |  |

Continued in next page...

Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% + +sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RI | 0.025*** | 0.144 | -0.138 | 0.454*** | 2.003*** | -0.141 | 53.7\% | 0.16\% | 205 | 0.000 | 27.6\% | 77.6\% |
|  | (3.504) | (1.030) | (-1.546) | (18.110) | (3.201) | (-1.666) |  |  |  |  |  |  |
| MPEG_RI | 0.003 | 0.189** | -0.087 | 0.456*** | -3.936 | -0.024 | 53.9\% | 0.16\% | 205 | 0.000 | $33.2 \%$ | 83.2\% |
|  | (0.252) | (2.819) | (-1.014) | (16.858) | (-0.777) | (-0.324) |  |  |  |  |  |  |
| WNG_RI | 0.042*** | -0.003 | -0.076 | 0.452*** | 0.214 | -0.101 | 54.2\% | 0.14\% | 205 | 0.000 | 4.5\% | 100.0\% |
|  | (5.355) | (-0.262) | (-0.712) | (16.449) | (1.425) | (-1.217) |  |  |  |  |  |  |
| WNG_RW | 0.048*** | 0.000 | -0.080 | $0.436^{* * *}$ | -0.005 | -0.246 | 53.5\% | 0.11\% | 205 | 0.000 | 2.5\% | 100.0\% |
|  | (6.329) | (-1.530) | (-0.989) | (19.534) | (-0.829) | (-2.317) |  |  |  |  |  |  |
| Carhart_Factor | 0.041*** | -0.094 | -0.013 | 0.453*** | 2.098 | -0.024 | 53.4\% | 0.11\% | 205 | 0.000 | 7.9\% | 60.6\% |
|  | (4.543) | (-0.852) | (-0.157) | (16.731) | (1.732) | (-0.204) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.034** | 0.028 | -0.015 | 0.449*** | -0.021 | 0.140 | 54.5\% | 0.07\% | 205 | 0.000 | 6.9\% | 99.5\% |
|  | (2.770) | (0.935) | (-0.189) |  |  | (1.213) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.042*** | -0.008 | -0.054 | 0.431 *** | 0.005 | -0.025 | 53.1\% | 0.06\% | 205 | 0.000 | 8.9\% | 100.0\% |
|  | (4.803) | (-1.119) | (-0.752) | (18.217) | (1.204) | (-0.592) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.04*** | 0.051 | 0.005 | 0.433*** | 0.092 | -0.151 | 53.5\% | 0.03\% | 205 | 0.000 | 11.8\% | 82.3\% |
|  | (5.201) | (1.168) | (0.054) | (16.240) | (1.220) | (-0.865) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.041*** | -0.008 | -0.018 | 0.441*** | 0.049 | -0.097 | 53.6\% | -0.03\% | 205 | 0.000 | 16.7\% | 99.0\% |
|  | (5.126) | (-0.517) | (-0.221) | (19.532) | (0.897) | $(-0.853)$ |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.044*** | 0.001 | 0.068 | 0.438*** | 0.002 | -0.065 | 53.4\% | -0.04\% | 205 | 0.000 | 10.3\% | 100.0\% |

[^45]Table 83 : Capturing Subsequent Return: High Earnings Forecasts Coefficient of Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_10Ind | (6.053) | (0.256) | (0.963) | (19.519) | (0.366) | (-1.275) |  |  |  |  |  |  |
|  | 0.043*** | -0.038 | 0.010 | $0.432 * * *$ | -0.003 | -0.102 | 53.3\% | -0.04\% | 205 | 0.000 | 11.3\% | 89.2\% |
|  | (5.524) | (-0.951) | (0.141) | (19.197) | (-0.054) | (-1.212) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.027* | 0.027 | -0.137 | $0.466^{* * *}$ | -0.015 | -0.101 | 53.2\% | -0.06\% | 205 | 0.000 | 15.8\% | 99.0\% |
|  | (2.003) | (1.502) | (-1.136) | (14.319) | (-0.527) | (-0.700) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.045*** | 0.000 | 0.004 | 0.432*** | -0.012 | -0.159 | 53.1\% | -0.07\% | 205 | 0.000 | 8.9\% | 99.0\% |
|  | (6.382) | (-0.014) | (0.054) | (20.038) | (-0.902) | (-2.093) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.042*** | -0.026 | -0.033 | 0.434*** | -0.232 | -0.044 | 53.1\% | -0.10\% | 205 | 0.000 | 12.8\% | 98.0\% |
|  | (5.380) | (-1.649) | (-0.451) | (19.836) | (-0.754) | (-0.756) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.044*** | 0.009 | -0.031 | 0.432*** | 0.012 | -0.030 | 53.3\% | -0.15\% | 205 | 0.000 | 11.3\% | 94.1\% |
|  | (6.334) | (0.636) | (-0.452) | (19.198) | (0.494) | (-0.467) |  |  |  |  |  |  |
| GLS_RW | 0.058 | -0.010 | -0.014 | 0.452*** | -0.145 | -0.023 | 52.9\% | -0.19\% | 205 | 0.000 | 11.8\% | 86.7\% |
|  | (1.578) | (-0.212) | (-0.110) | (16.024) | (-0.377) | (-0.388) |  |  |  |  |  |  |
| WNG_HDZ | 0.043*** | 0.000 | -0.016 | 0.469*** | 0.062 | -0.109 | 53.5\% | -0.36\% | 205 | 0.000 | 1.5\% | 100.0\% |
|  | (4.142) | (-0.719) | (-0.157) | (15.841) | (0.220) | (-1.397) |  |  |  |  |  |  |

For the highest quartile of firms in terms of coefficient of variation in earnings forecasts, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it
represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 84 : Capturing Subsequent Return: Low Leverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | -0.008 | 0.203*** | 0.559*** | 0.515*** | 0.043 | -0.052 | 61.2\% |  | 205 | 0.000 | 63.3\% | 96.8\% |
|  | (-1.209) | (5.719) | (5.682) | (11.385) | (1.669) | (-0.667) |  | 8.69\% |  |  |  |  |
| Naive | -0.005 | 0.186*** | 0.494*** | 0.502*** | 0.05* | 0.000 | 60.7\% |  | 205 | 0.000 | 62.8\% | 96.8\% |
|  | (-0.675) | (7.080) | (4.879) | (14.116) | (2.084) | (0.000) |  | 8.34\% |  |  |  |  |
| TPDPS_HDZ | -0.010 | 0.183*** | 0.502*** | 0.5*** | 0.059* | -0.033 | 60.6\% |  | 205 | 0.000 | 63.3\% | 97.9\% |
|  | (-1.480) | (7.580) | (5.498) | (15.036) | (2.523) | (-0.542) |  | 8.30\% |  |  |  |  |
| BP_Anlst | -0.019 | $1.232^{* * *}$ | 0.51*** | 0.493*** | 0.138 | -0.009 | 58.5\% |  | 205 | 0.220 | 69.1\% | 48.9\% |
|  | (-2.546) | (6.520) | (3.900) | (11.459) | (1.101) | (-0.124) |  | 7.12\% |  |  |  |  |
| BP_HDZ | -0.022 | $1.152^{* * *}$ | 0.498*** | $0.483 * * *$ | 0.185 | -0.018 | 58\% |  | 205 | 0.374 | 71.3\% | 44.7\% |
|  | (-2.736) | (6.741) | (4.175) | (12.115) | (1.386) | (-0.218) |  | 6.79\% |  |  |  |  |
| TPDPS_EP | -0.011 | $0.124^{* * *}$ | $0.371^{* * *}$ | $0.482 * * *$ | 0.064** | -0.022 | 58.6\% |  | 205 | 0.000 | 59.0\% | 96.8\% |
|  | (-1.533) | (6.322) | (3.776) | (16.077) | (2.816) | (-0.352) |  | 6.49\% |  |  |  |  |
| TPDPS_RI | -0.006 | $0.121^{* * *}$ | 0.252** | $0.489 * * *$ | 0.069** | -0.051 | 58.3\% |  | 205 | 0.000 | 53.2\% | 97.3\% |
|  | (-0.883) | (5.118) | (2.579) | (14.081) | (2.763) | (-0.803) |  | 5.88\% |  |  |  |  |
| TPDPS_RW | 0.012 | 0.264 | 0.275** | 0.676** | 0.060 | -0.156 | 57.2\% |  | 205 | 0.000 | 47.9\% | 98.4\% |
|  | (0.904) | (1.388) | (2.619) | (2.663) | (1.514) | (-0.930) |  | 5.09\% |  |  |  |  |
| BP_EP | -0.014 | 0.708*** | 0.348** | $0.462 * * *$ | 0.354** | -0.009 | 56\% |  | 205 | 0.029 | 61.7\% | 38.8\% |
|  | (-1.711) | (5.319) | (2.725) | (13.703) | (2.944) | (-0.126) |  | 4.86\% |  |  |  |  |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RW | 0.001 | 0.717*** | 0.323* | $0.467 * * *$ | 0.341** | -0.012 | 55.4\% |  | 205 | 0.083 | 55.9\% | 45.2\% |
|  | (0.122) | (4.416) | (2.407) | (12.019) | (2.583) | (-0.169) |  | 4.29\% |  |  |  |  |
| BP_RI | -0.009 | $0.675 * * *$ |  | $0.461 * * *$ | $0.371 * * *$ | -0.020 | 55.2\% |  | 205 | 0.013 | 56.9\% | 40.4\% |
|  | (-1.128) | (5.227) | (2.298) | (13.667) | (3.175) | (-0.291) |  | 4.06\% |  |  |  |  |
| PE_Anlst | -0.022 | 0.954*** | 0.43*** | 0.442*** | 0.702 | -0.080 | 54.9\% |  | 205 | 0.798 | 53.7\% | 43.1\% |
|  | (-1.446) | (5.342) | (3.720) | $(16.210)$ | (1.318) | (-1.046) |  | 3.49\% |  |  |  |  |
| GG_HDZ | 0.001 | 0.254** |  | $0.442 * * *$ | $2.067 * *$ |  | 54.5\% |  | 205 | 0.000 | 33.5\% | 53.2\% |
|  | (0.063) | (2.634) | (-1.132) | (16.749) | (2.601) | (0.340) |  | 2.61\% |  |  |  |  |
| CT_Anlst | -0.044 | 0.682 *** | $0.173$ | 0.456*** | $1.305$ | -0.167 | 53.8\% |  | 205 | 0.055 | 43.6\% | 41.0\% |
|  | (-2.646) | (4.148) | (1.057) | (16.072) | (1.403) | (-1.217) |  | 2.40\% |  |  |  |  |
| HL_Anlst | -0.020 | 0.468 | 0.036 | $0.434 * * *$ | 0.724* | -0.102 | 53.3\% |  | 205 | 0.088 | 29.3\% | 37.2\% |
|  | (-0.566) | (1.511) | (0.166) | (17.275) | (2.405) | (-1.091) |  | 1.87\% |  |  |  |  |
| MPEG_Anlst | -0.008 | 0.284*** | 0.080 | 0.435*** | 0.370 | 0.011 | 52.8\% |  | 205 | 0.000 | 24.5\% | 47.9\% |
|  | (-0.693) | (3.132) | (0.812) | (17.277) | (0.898) | (0.178) |  | 1.77\% |  |  |  |  |
| FGHJ_HDZ | -0.037 | 0.516** | 0.071 | $0.422 * * *$ | $2.38 * * *$ | -0.032 | 52.6\% |  | 205 | 0.012 | 23.4\% | 66.0\% |
|  | (-1.624) | (2.714) | (0.366) | (13.272) | (4.793) | (-0.320) |  | 1.74\% |  |  |  |  |
| CT_HDZ | 0.001 | 0.137 | -0.106 | 0.44*** | 1.012 | -0.049 | 52.9\% |  | 205 | 0.000 | 29.3\% | 66.0\% |
|  | (0.088) | (1.737) | (-1.071) | (16.610) | (1.792) | (-0.861) |  | 1.69\% |  |  |  |  |
| GM_Anlst | -0.024 | 0.479* | 0.059 | 0.431*** | 0.552 | -0.047 | 52.8\% |  | 205 | 0.026 | 31.9\% | 39.4\% |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_Anlst | (-0.821) | (2.063) | (0.337) | (17.520) | (1.752) | (-0.507) |  | 1.69\% |  |  |  |  |
|  | -0.051 | 0.746*** | 0.190 | 0.434*** | 0.968* | -0.065 | 53.3\% |  | 205 | 0.101 | 31.9\% | 33.5\% |
|  | (-3.097) | (4.840) | (1.611) | (16.670) | (2.513) | (-0.975) |  | 1.66\% |  |  |  |  |
| PE_HDZ | 0.004 | 0.268** | -0.129 | $0.431 * * *$ | $1.724^{* * *}$ | -0.029 | 53.4\% |  | 205 | 0.000 | $36.7 \%$ | 55.3\% |
|  | (0.408) | (3.043) | (-1.336) | (16.937) | (4.494) | (-0.414) |  | 1.66\% |  |  |  |  |
| GG_RW | -0.003 | 0.156 | -0.129 | $0.443 * * *$ | 1.692 | -0.043 | 53.2\% |  | 205 | 0.000 | 29.0\% | 62.5\% |
|  | (-0.254) | (1.743) | (-1.158) | (16.228) | (0.789) | (-0.611) |  | 1.64\% |  |  |  |  |
| PEG_HDZ | 0.014 | 0.163* | -0.008 | $0.412 * * *$ | 0.092 | -0.057 | 52.8\% |  | 205 | 0.000 | 22.9\% | 70.2\% |
|  | (1.531) |  | (-0.050) | (16.700) | (0.220) | (-0.779) |  | 1.63\% |  |  |  |  |
| HL_HDZ | -0.017 | 0.357* | -0.018 | 0.423*** | $0.938 * * *$ | -0.094 | 52\% |  | 205 | 0.000 | 22.3\% | 67.6\% |
|  | (-1.214) | (2.472) | (-0.201) | (16.317) | (3.239) | (-1.035) |  | 1.55\% |  |  |  |  |
| KMY_Anlst | -0.007 | 0.132 | -0.022 | 0.437*** | 0.318 | -0.065 | 52.6\% |  | 205 | 0.000 | 22.3\% | 61.2\% |
|  | (-0.346) | (1.456) | (-0.178) | (15.830) | (1.569) | (-0.958) |  | 1.54\% |  |  |  |  |
| GLS_HDZ | -0.043 | 0.581** | 0.128 | 0.404*** | 2.333*** | -0.007 | 52.5\% |  | 205 | 0.053 | 23.9\% | 62.2\% |
|  | (-1.619) | (2.696) | (0.667) | (13.139) | (4.860) | (-0.067) |  | 1.39\% |  |  |  |  |
| GG_Anlst | -0.001 | 0.068 | -0.150 | $0.428 * * *$ | 0.171 | -0.027 | 51.9\% |  | 205 | 0.000 | 17.0\% | 78.7\% |
|  | (-0.072) | (1.480) | (-1.473) | (16.575) | (1.115) | (-0.353) |  | 1.38\% |  |  |  |  |
| PE_RI | -0.004 | 0.425** | -0.020 | $0.418 * * *$ | 1.67** | 0.027 | 52.4\% |  | 205 | 0.001 | 31.4\% | 75.5\% |
|  | (-0.392) | (2.591) | (-0.196) | (16.385) | (2.645) | (0.407) |  | 1.35\% |  |  |  |  |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_Anlst | -0.045 | 0.658*** | -0.006 | 0.422*** | 1.446** | -0.066 | 52.4\% |  | 205 | 0.010 | 27.7\% | 45.7\% |
|  | (-3.060) | (5.013) | (-0.058) | (16.857) | (2.616) | (-0.990) |  | 1.32\% |  |  |  |  |
| DKL_HDZ | -0.015 | $0.324 * * *$ |  | $0.428 * * *$ | $1.125^{* * *}$ | -0.033 | 51.8\% |  | 205 | 0.000 | 21.8\% | 65.4\% |
|  | (-1.583) | (3.874) | (-0.322) | (16.883) | (3.848) | (-0.478) |  | 1.24\% |  |  |  |  |
| FGHJ_Anlst | -0.072 | 0.836*** | 0.096 | 0.414*** | 1.522* | -0.046 | 52.3\% |  | 205 | 0.364 | 28.2\% | 49.5\% |
|  | (-3.525) | (4.651) | (0.799) | (15.708) |  | (-0.699) |  | 1.24\% |  |  |  |  |
| GM_HDZ | 0.005 | 0.188* |  | $0.412 * * *$ | 0.614 | -0.079 | 52.3\% |  | 205 | 0.000 | 20.2\% | 69.1\% |
|  | (0.545) | (2.226) | (0.536) | (14.010) | (1.011) | (-1.211) |  | 1.20\% |  |  |  |  |
| PEG_Anlst | 0.007 | 0.147 | 0.144 | 0.41*** | 0.703 | -0.040 | 51.5\% |  | 205 | 0.000 | 15.4\% | 55.9\% |
|  | (0.557) | (1.341) |  | (14.316) | (1.425) | (-0.657) |  | 1.18\% |  |  |  |  |
| CT_EP | -0.001 | $0.134 * * *$ | -0.049 | $0.417 * * *$ | 0.354 | -0.044 | 51.7\% |  | 205 | 0.000 | 23.9\% | 79.8\% |
|  | (-0.064) | (4.342) | (-0.594) | (16.099) | (1.529) | (-0.587) |  | 1.16\% |  |  |  |  |
| PE_EP | 0.008 | 0.079 | -0.165 | $0.433 * * *$ | 2.154** | -0.079 | 52.8\% |  | 205 | 0.000 | 37.8\% | 73.4\% |
|  | (0.615) | (0.406) | (-1.446) | (16.158) | (2.883) | (-1.248) |  | 1.10\% |  |  |  |  |
| KMY_HDZ | -0.004 | 0.251** | -0.085 | $0.438 * * *$ | $1.398 * * *$ | -0.012 | 51.6\% |  | 205 | 0.000 | 25.5\% | 60.6\% |
|  | (-0.405) | (2.706) | (-0.908) | (16.548) | (4.552) | (-0.238) |  | 1.09\% |  |  |  |  |
| PEG_RI | 0.007 | 0.048 | -0.108 | $0.429 * * *$ | 0.421** | 0.056 | 51.6\% |  | 205 | 0.000 | 32.5\% | 100.0\% |
|  | (0.350) | (0.932) | (-0.923) | (14.582) | (2.625) | (0.399) |  | 1.05\% |  |  |  |  |
| MPEG_HDZ | 0.003 | 0.204* | 0.131 | 0.407*** | 0.445 | -0.116 | 52.2\% |  | 205 | 0.000 | 20.2\% | 76.6\% |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_EP | (0.326) | (2.279) | (0.659) | (13.431) | (1.436) | (-1.442) |  | 1.05\% |  |  |  |  |
|  | 0.022* | 0.000 | -0.211 | 0.412*** | -0.003 | -0.064 | 51.4\% |  | 205 | 0.000 | $3.2 \%$ | 99.5\% |
|  | (2.310) | (0.841) | (-2.875) | (15.118) | (-0.601) | (-1.222) |  | 1.02\% |  |  |  |  |
| GM_RW | 0.010 | 0.053* | -0.060 | 0.408*** | 0.144 | 0.026 | 51.9\% |  | 205 | 0.000 | 15.7\% | 95.7\% |
|  | (0.998) | (2.205) | (-0.684) | (16.045) | (0.649) | (0.266) |  | 0.98\% |  |  |  |  |
| TrES_RW_25SBM | 0.019* | 2.736 | 0.118 | 0.399*** | -3.010 | -0.002 | 51.5\% |  | 205 | 0.478 | 5.3\% | 83.5\% |
|  | (2.404) | (1.121) | (0.437) | (11.743) | (-0.723) | (-0.036) |  | 0.87\% |  |  |  |  |
| HL_RI | -0.002 | 0.145 | -0.053 | 0.418*** | -0.155 | -0.014 | 50.8\% |  | 205 | 0.000 | 25.0\% | 86.7\% |
|  | (-0.219) | (1.590) | (-0.460) | (16.424) | (-0.796) | (-0.197) |  | 0.87\% |  |  |  |  |
| MPEG_RI | -0.012 | 0.191* | 0.046 | 0.4*** | -1.478 | -0.107 | 51.9\% |  | 205 | 0.000 | 25.1\% | 75.4\% |
|  | (-1.252) | (2.224) | (0.230) | (12.939) | (-0.666) | (-1.352) |  | 0.86\% |  |  |  |  |
| FPM_Anlst | -0.027 | 0.488* | 0.037 | 0.438*** | 0.372 | -0.065 | 51.7\% |  | 205 | 0.021 | 26.6\% | 31.4\% |
|  | (-1.367) | (2.222) | (0.436) | (17.149) | (1.142) | (-1.227) |  | 0.83\% |  |  |  |  |
| CT_RW | 0.006 | -0.161 | -0.046 | 0.427*** | 0.594 | -0.016 | 51.3\% |  | 205 | 0.000 | 27.8\% | 71.6\% |
|  | (0.535) | (-0.792) | (-0.511) | (16.241) | (0.529) | (-0.231) |  | 0.82\% |  |  |  |  |
| HL_EP | -0.010 | $0.161 * * *$ | 0.044 | 0.402*** | 0.265 | -0.019 | 51.6\% |  | 205 | 0.000 | 29.3\% | 75.0\% |
|  | (-1.002) | (4.374) | (0.303) | (14.698) | (1.941) | (-0.255) |  | 0.82\% |  |  |  |  |
| FPM_EP | 0.008 | 0.093*** | -0.170 | 0.421*** | 0.042 | -0.048 | 51.2\% |  | 205 | 0.000 | 20.7\% | 93.1\% |
|  | (0.380) | (4.507) | (-2.456) | (13.783) | (0.797) | (-0.873) |  | 0.81\% |  |  |  |  |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_RW_10Ind | 0.016 | -0.002 | 0.019 | 0.414*** | 0.069 | 0.044 | 51.8\% |  | 205 | 0.000 | 11.2\% | 97.3\% |
|  | (1.839) | (-0.168) | (0.105) | (15.938) | (1.349) | (0.716) |  | 0.80\% |  |  |  |  |
| KMY_RI | 0.005 | 0.085 | -0.052 | $0.419 * * *$ | -0.040 | -0.037 | 50.8\% |  | 205 | 0.000 | 18.6\% | 76.6\% |
|  | (0.454) | (0.603) | (-0.422) | (15.634) | (-0.288) | (-0.474) |  | 0.79\% |  |  |  |  |
| DKL_EP | -0.016 | 0.178*** | -0.005 | 0.407*** | 0.231 | -0.050 | 51.4\% |  | 205 | 0.000 | $31.4 \%$ | 75.0\% |
|  | (-1.534) | (6.034) | (-0.054) | (16.320) | (1.630) | (-0.691) |  | 0.73\% |  |  |  |  |
| CT_RI | -0.005 | 0.423 | 0.317 | $0.371^{* * *}$ | 0.366 | 0.052 | 50.7\% |  | 205 | 0.069 | 5.3\% | 88.8\% |
|  | (-0.331) | (1.341) | (0.832) | (7.796) | (1.099) | (0.651) |  | 0.70\% |  |  |  |  |
| Carhart_Factor | 0.021* | -0.032 | -0.177 | $0.432 * * *$ | -1.804 | -0.081 | 50.7\% |  | 205 | 0.000 | 9.6\% | 43.1\% |
|  | (2.324) | (-0.285) | (-1.663) | (16.851) | (-2.559) | (-1.311) |  | 0.68\% |  |  |  |  |
| WNG_RI | 0.02* | 0.005 | -0.184 | $0.432 * * *$ | -0.009 | -0.061 | 51.3\% |  | 205 | 0.000 | 5.3\% | 98.4\% |
|  | (2.111) | (0.705) | (-2.478) | (14.435) | (-0.225) | (-1.031) |  | 0.66\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.022** | -0.020 | -0.164 | 0.415*** | -0.007 | -0.028 | 50.7\% |  | 205 | 0.000 | 8.0\% | 96.3\% |
|  | (2.807) | (-0.860) | (-2.273) | (16.792) | (-0.385) | (-0.302) |  | 0.66\% |  |  |  |  |
| GLS_RI | 0.009 | 0.114 | -0.094 | 0.426*** | -7.654 | 0.013 | 51.4\% |  | 205 | 0.000 | 19.1\% | 75.5\% |
|  | (0.811) | (1.463) | (-1.011) | (16.093) | (-1.236) | (0.127) |  | 0.65\% |  |  |  |  |
| DKL_RI | -0.001 | 0.129 | -0.082 | 0.42*** | -0.157 | -0.025 | 50.5\% |  | 205 | 0.000 | 22.9\% | 87.8\% |
|  | (-0.102) | (1.438) | (-0.790) | (16.898) | (-0.807) | (-0.357) |  | 0.64\% |  |  |  |  |
| GG_EP | -0.008 | 0.250 | -0.119 | $0.437 * * *$ | 2.838 | -0.091 | 51.7\% |  | 205 | 0.356 | 25.4\% | 63.3\% |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_EP | (-0.802) | (0.309) | (-1.154) | (16.299) | (1.842) | (-1.348) |  | 0.58\% |  |  |  |  |
|  | -0.013 | 0.199*** | 0.041 | 0.41 *** | 0.192 | -0.056 | 51.4\% |  | 205 | 0.000 | 26.1\% | 70.2\% |
|  | (-1.364) | (4.579) | (0.290) | (14.757) | (1.044) | (-0.874) |  | 0.57\% |  |  |  |  |
| FPM_RW | -0.021 | 0.087*** | -0.150 | 0.406*** | 0.008 | -0.076 | 51.5\% |  | 205 | 0.000 | 16.0\% | 92.6\% |
|  | (-0.613) | (3.912) | (-2.164) | (15.487) | (0.147) | (-1.139) |  | 0.56\% |  |  |  |  |
| GM_RI | -0.007 | 0.152 | 0.127 | 0.396*** | 0.087 | 0.003 | 51.9\% |  | 205 | 0.000 | 30.5\% | 72.7\% |
|  | (-0.737) | (1.872) | (0.744) | (13.510) | (0.102) | (0.038) |  | 0.54\% |  |  |  |  |
| PEG_EP | 0.005 | 0.040 | -0.020 | $0.411^{* * *}$ | 0.704* | -0.029 | 51.4\% |  | 205 | 0.000 | 26.1\% | 86.7\% |
|  | (0.465) | (0.985) | (-0.112) | (13.245) | (2.304) | (-0.438) |  | 0.51\% |  |  |  |  |
| TrES_EP_25SBM | 0.011 | 0.000 | -0.147 | 0.397*** | -0.003 | -0.023 | 51.6\% |  | 205 | 0.000 | 10.1\% | 98.4\% |
|  | (1.414) | (0.010) | (-1.958) | (16.850) | (-0.774) | (-0.423) |  | 0.45\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.026 | -0.002 | -0.165 | 0.401*** | 0.014 | -0.099 | 51.3\% |  | 205 | 0.000 | 7.4\% | 99.5\% |
|  | (1.705) | (-0.195) | (-2.455) | (16.753) | (1.100) | (-1.691) |  | 0.45\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.018* | 0.010 | -0.150 | 0.398*** | -0.007 | -0.050 | 51.1\% |  | 205 | 0.000 | 9.6\% | 98.9\% |
|  | (2.325) | (1.763) | (-2.233) | (16.588) | (-1.236) | (-0.981) |  | 0.40\% |  |  |  |  |
| FPM_HDZ | -0.008 | 0.252** | 0.121 | 0.414*** | 0.588 | -0.131 | 50.9\% |  | 205 | 0.000 | 18.6\% | 56.4\% |
|  | (-0.767) | (2.726) | (0.606) | (12.850) | (1.863) | (-1.410) |  | 0.40\% |  |  |  |  |
| MPEG_RW | 0.013 | 0.043* | -0.091 | $0.412 * * *$ | 0.263 | 0.033 | 51\% |  | 205 | 0.000 | 16.1\% | 96.2\% |
|  | (1.294) | (2.226) | (-1.037) | (16.112) | (1.680) | (0.326) |  | 0.36\% |  |  |  |  |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_25SBM | 0.021* | 0.007 | -0.141 | 0.388*** | 0.006 | -0.057 | 50.9\% |  | 205 | 0.000 | 9.0\% | 99.5\% |
|  | (2.233) | (1.190) | (-1.988) | (15.504) | (0.480) | (-0.677) |  | 0.36\% |  |  |  |  |
| PEG_RW | 0.013 | -0.010 | -0.188 | $0.417 * * *$ | 0.293* | 0.014 | 50.7\% |  | 205 | 0.000 | 22.4\% | 100.0\% |
|  | (1.135) | (-0.176) | (-1.774) | (14.090) | (2.119) | (0.139) |  | 0.31\% |  |  |  |  |
| HL_RW | 0.021 | 0.020 | -0.095 | $0.427 * * *$ | -0.175 | -0.021 | 50.8\% |  | 205 | 0.000 | 12.8\% | 89.9\% |
|  | (1.064) | (0.582) | (-1.120) | (16.713) | (-0.990) | (-0.250) |  | 0.31\% |  |  |  |  |
| PE_RW | 0.013 | 0.219 | -0.105 | 0.411*** | -0.048 | 0.011 | 50.9\% |  | 205 | 0.019 | 9.6\% | 87.8\% |
|  | (1.314) | (0.664) | (-1.411) | (17.240) | (-0.148) | (0.149) |  | 0.27\% |  |  |  |  |
| WNG_RW | 0.027** | 0.000 | -0.148 | 0.394*** | -0.002 | -0.045 | 50.9\% |  | 205 | 0.000 | 5.3\% | 99.5\% |
|  | (2.965) | (-0.387) | (-2.182) | (15.823) | (-0.457) | (-0.770) |  | 0.26\% |  |  |  |  |
| MPEG_EP | -0.002 | 0.085 | 0.217 | 0.509*** | 9.720 | 0.192 | 51.1\% |  | 205 | 0.000 | 22.9\% | 79.8\% |
|  | (-0.097) | (0.700) | (0.923) | (3.534) | (0.887) | (0.485) |  | 0.24\% |  |  |  |  |
| KMY_RW | 0.019 | 0.024 | -0.096 | 0.426*** | -0.134 | -0.023 | 50.6\% |  | 205 | 0.000 | 11.7\% | 87.8\% |
|  | (0.966) | (0.700) | (-1.134) | (16.720) | (-0.734) | (-0.270) |  | 0.20\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.02* | -0.009 | -0.113 | 0.422*** | 0.037 | 0.031 | 50.4\% |  | 205 | 0.000 | 10.1\% | 98.4\% |
|  | (2.220) | (-0.754) | (-1.435) | (16.386) | (0.721) | (0.349) |  | 0.20\% |  |  |  |  |
| TrOHE_10Ind | 0.02* | 0.013 | -0.226 | $0.431^{* * *}$ | -0.166 | 0.055 | 51\% |  | 205 | 0.000 | 6.4\% | 73.9\% |
|  | (2.445) | (0.272) | (-2.304) | (16.652) | (-0.594) | (0.489) |  | 0.18\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.013 | 0.000 | -0.110 | 0.386*** | 0.015 | 0.062 | 50.5\% |  | 205 | 0.000 | 6.9\% | 99.5\% |

[^46]Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_10Ind | (0.785) | (-0.076) | (-1.609) | (12.288) | (1.229) | (0.770) |  | 0.16\% |  |  |  |  |
|  | 0.017 | 0.015 | -0.100 | 0.405*** | 0.029 | -0.028 | 50.8\% |  | 205 | 0.000 | 17.0\% | 97.9\% |
|  | (1.657) | (0.932) | (-1.416) | (15.391) | (1.289) | (-0.456) |  | 0.12\% |  |  |  |  |
| FGHJ_RI | 0.018 | -0.009 | -0.018 | 0.417*** | -2.949 | 0.102 | 50.5\% |  | 205 | 0.000 | 22.9\% | 77.1\% |
|  | (1.230) | (-0.089) | (-0.117) | (14.491) | (-0.966) | (0.615) |  | 0.09\% |  |  |  |  |
| GG_RI | -0.003 | 0.44** | 0.000 | 0.434*** | 0.667 | -0.114 | 50.7\% |  | 205 | 0.001 | 15.9\% | 72.7\% |
|  | (-0.366) | (2.609) | (0.002) | (15.496) | (1.218) | (-1.400) |  | 0.08\% |  |  |  |  |
| GM_EP | -0.003 | 0.111 | 0.145 | 0.406*** | 1.076* | -0.086 | 51\% |  | 205 | 0.000 | 20.7\% | 80.9\% |
|  | (-0.368) | (1.850) | (0.807) | (13.727) | (1.991) | (-1.330) |  | 0.02\% |  |  |  |  |
| TrES_RI_25SBM | 0.016* | 0.006 | -0.150 | 0.38*** | 0.000 | -0.001 | 50.2\% |  | 205 | 0.000 | 6.4\% | 98.9\% |
|  | (2.157) | (1.899) | (-1.958) | (16.780) | (0.090) | (-0.016) |  | 0.01\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.019* | -0.006 | -0.082 | 0.408*** | -0.029 | 0.000 | 50.4\% |  | 205 | 0.000 | 8.5\% | 95.2\% |
|  | (2.293) | (-0.258) | (-0.618) | (15.655) | (-0.496) | (-0.002) |  | 0.00\% |  |  |  |  |
| WNG_HDZ | 0.025** | 0.003 | -0.003 | 0.383*** | -0.021 | -0.096 | 50.5\% |  | 205 | 0.000 | 1.6\% | 99.5\% |
|  | (2.887) | (0.641) | (-0.020) | (12.839) | (-0.146) | (-1.540) |  | -0.01\% |  |  |  |  |
| CAPM_Factor | -0.058 | 5.227 | -0.136 | 0.424*** | -2.059 | -0.050 | 50.3\% |  | 205 | 0.452 | 15.4\% | 17.6\% |
|  | (-0.709) | (0.932) | (-1.390) | (17.057) | (-0.309) | (-0.722) |  | -0.09\% |  |  |  |  |
| 5FF_Factor | 0.017 | 0.005 | -0.190 | $0.436 * * *$ | -0.369 | -0.034 | 49.8\% |  | 205 | 0.000 | 12.8\% | 37.8\% |
|  | (1.915) | (0.036) | (-1.381) | (16.977) | (-0.480) | (-0.528) |  | -0.10\% |  |  |  |  |

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Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_EP | -0.002 | 0.104 | -0.167 | 0.424*** | 13.796 | -0.093 | 50.8\% |  | 205 | 0.000 | 21.8\% | 79.8\% |
|  | (-0.143) | (1.526) | (-1.879) | (16.294) | (1.044) | (-1.712) |  | -0.17\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.015 | 0.003 | -0.123 | 0.404*** | -0.005 | 0.129 | 50.4\% |  | 205 | 0.000 | 8.0\% | 99.5\% |
|  | (1.090) | (1.022) | (-1.695) | (16.385) | (-0.859) | (0.796) |  | -0.20\% |  |  |  |  |
| DKL_RW | 0.015 | 0.018 | -0.064 | 0.418*** | -0.013 | 0.007 | 49.8\% |  | 205 | 0.000 | 12.8\% | 84.6\% |
|  | (0.693) | (0.299) | (-0.785) | (16.038) | (-0.064) | (0.089) |  | -0.22\% |  |  |  |  |
| TrES_RI_10Ind | -0.070 | 0.074 | 0.335 | $0.441^{* * *}$ | 0.056 | -0.273 | 50.6\% |  | 205 | 0.000 | 14.9\% | 97.9\% |
|  | (-0.772) | (0.922) | (0.538) | (9.351) | (1.190) | (-1.125) |  | -0.27\% |  |  |  |  |
| WNG_Anlst | 0.026*** | 0.010 | -0.182 | 0.419*** | 0.073 | -0.011 | 50.5\% |  | 205 | 0.000 | 8.5\% | 99.5\% |
|  | (3.168) | (1.131) | (-1.531) | (15.893) | (0.323) | (-0.140) |  | -0.28\% |  |  |  |  |
| FGHJ_RW | 0.011 | 0.063 | -0.059 | 0.43*** | 0.497 | 0.006 | 49.9\% |  | 205 | 0.000 | 14.0\% | 95.5\% |
|  | (1.182) | (1.660) | (-0.448) | (14.911) | (1.078) | (0.089) |  | -0.30\% |  |  |  |  |
| GLS_EP | -0.005 | 0.146** | -0.180 | 0.434*** | -2.787 | -0.097 | 50.7\% |  | 205 | 0.000 | 25.0\% | 71.3\% |
|  | (-0.427) | (2.608) | (-2.172) | (16.675) | (-0.833) | (-1.691) |  | -0.31\% |  |  |  |  |
| GLS_RW | 0.008 | 0.035 | -0.114 | 0.443*** | 0.316 | -0.015 | 49.7\% |  | 205 | 0.000 | 8.5\% | 92.0\% |
|  | (0.235) | (0.774) | (-0.911) | (15.544) | (0.714) | (-0.225) |  | -0.33\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.029*** | -0.026 | -0.134 | 0.417*** | 0.035 | -0.025 | 50.1\% |  | 205 | 0.000 | 7.4\% | 96.3\% |
|  | (3.600) | (-1.228) | (-1.788) | (16.645) | (1.954) | (-0.460) |  | -0.35\% |  |  |  |  |
| 3FF_Factor | $0.027^{* *}$ | -0.176 | -0.259 | $0.443 * * *$ | -0.539 | -0.103 | 49.6\% |  | 205 | 0.000 | 14.9\% | 31.4\% |

[^47]Table 84 : Capturing Subsequent Return: Low Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_EP_10Ind | (2.683) | (-0.858) | (-1.471) | (12.910) | (-0.463) | (-1.367) |  | -0.37\% |  |  |  |  |
|  | 0.024* | -0.013 | -0.167 | 0.405*** | 0.020 | 0.002 | 50.2\% |  | 205 | 0.000 | 6.4\% | 97.9\% |
|  | (2.159) | (-0.767) | (-2.320) | (13.848) | (1.018) | (0.026) |  | -0.38\% |  |  |  |  |
| TrOHE_25SBM | 0.022** | 0.006 | -0.026 | 0.423*** | -0.035 | -0.026 | 49.4\% |  | 205 | 0.000 | 4.8\% | 94.1\% |
|  | (2.643) | (0.170) | (-0.192) | (15.107) | (-1.659) | (-0.513) |  | -0.41\% |  |  |  |  |
| TrES_RW_10Ind | 0.022** | -0.034 | -0.182 | 0.428*** | 10.621 | -0.079 | 50.1\% |  | 205 | 0.311 | 11.7\% | 83.0\% |
|  | (2.651) | (-0.033) | (-2.233) | (17.530) | (1.330) | (-1.434) |  | -0.44\% |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.016 | 0.030 | -0.180 | 0.417*** | 0.054 | 0.026 | 50.3\% |  | 205 | 0.000 | 7.4\% | 81.4\% |
|  | (1.872) | (1.120) | (-2.169) | (16.673) | (0.872) | (0.320) |  | -0.45\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.031 | -0.014 | -0.137 | 0.389*** | -0.007 | -0.053 | 49.7\% |  | 205 | 0.000 | 12.2\% | 98.4\% |
|  | (1.953) | (-0.710) | (-1.994) | (16.235) | (-0.516) | (-0.886) |  | -0.49\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.02* | -0.005 | 0.212 | 0.408*** | -0.051 | -0.006 | 49.8\% |  | 205 | 0.000 | 8.5\% | 98.9\% |
|  | (2.149) | (-0.603) | (0.484) | (14.966) | (-1.024) | (-0.122) |  | -0.55\% |  |  |  |  |
| FPM_RI | 0.003 | 0.034 | -0.155 | 0.44*** | 0.020 | -0.033 | 50.4\% |  | 205 | 0.000 | 13.3\% | 87.8\% |
|  | (0.197) | (1.618) | (-1.919) | (16.237) | (0.656) | (-0.661) |  | -0.55\% |  |  |  |  |

For the lowest quartile of firms in terms of leverage, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+$ $\beta_{2}$ CFNS $_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t -statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in
subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 85 : Capturing Subsequent Return: High Leverage Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_Anlst | 0.520 | -8.176 | -8.207 | $0.031$ | 24.272 | -4.053 | 65.9\% | 4.55\% | 205 | 0.461 | $33.8 \%$ | 15.5\% |
|  | (0.801) | (-0.658) | (-0.690) | (0.054) | (0.786) | (-0.776) |  |  |  |  |  |  |
| Naive |  | 0.132* | 0.250 | $0.447 * * *$ | 0.196 |  | 67.1\% | 4.01\% | 205 | 0.000 | 38.0\% | 75.4\% |
|  | (1.630) | (2.081) | (0.688) | (7.818) | (0.843) | (-0.580) |  |  |  |  |  |  |
| TPDPS_Anlst | 0.064* | 0.090 | 0.098 | $0.417 * * *$ | 0.133 | -0.094 | 66.7\% | 3.90\% | 205 | 0.000 | 30.3\% | 76.1\% |
|  |  | (1.546) | (0.336) | (9.729) | (1.258) | (-0.443) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.029 | $0.141 * * *$ | 0.140 | 0.399*** | -0.002 | 0.050 | 66.3\% | 3.14\% | 205 | 0.000 | 38.0\% | 74.6\% |
|  | (1.630) | (3.531) | (1.345) | (11.536) | (-0.026) | (0.389) |  |  |  |  |  |  |
| BP_HDZ | 0.029 | 0.63*** | 0.094 | 0.401*** | 0.264 | 0.160 | 65\% | 2.96\% | 205 | 0.062 | 35.9\% | 21.1\% |
|  | (1.502) | (3.204) | (0.866) | (11.361) | (0.767) | (0.880) |  |  |  |  |  |  |
| BP_RW | 0.029 | 0.433* | 0.078 | 0.393*** | 0.181 | 0.078 | 65\% | 2.81\% | 205 | 0.003 | 26.8\% | 31.7\% |
|  | (1.484) | (2.300) | (0.728) | (11.145) | (0.503) | (0.418) |  |  |  |  |  |  |
| Carhart_Factor | 0.084*** | -0.314 | 0.101 | 0.411*** | -24.303 | 0.082 | 62\% | 2.37\% | 205 | 0.001 | 6.3\% | 23.2\% |
|  | (4.277) | (-0.785) | (0.798) | (9.269) | (-0.839) | (0.238) |  |  |  |  |  |  |
| TPDPS_RW | 0.046* | 0.07* | 0.084 | $0.371 * * *$ | 0.072 | 0.008 | 63.8\% | 2.29\% | 205 | 0.000 | 19.7\% | 86.6\% |
|  | (2.177) | (2.119) | (0.669) | (11.308) | (0.978) | (0.055) |  |  |  |  |  |  |
| CAPM_Factor | -0.086 | 6.835 | -0.038 | 0.409*** | -54.575 | 0.412 | 61.9\% | 2.23\% | 205 | 0.787 | 6.3\% | 13.4\% |
|  | (-0.265) | (0.316) | (-0.297) | (10.908) | (-0.990) | (1.898) |  |  |  |  |  |  |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | 0.035 | 0.42** | 0.229 | 0.412*** | 1.002 | 0.122 | 63.7\% | 2.17\% | 205 | 0.000 | 25.4\% | $31.7 \%$ |
|  | (1.825) | (2.598) | (1.504) | (10.550) | (1.200) | (0.646) |  |  |  |  |  |  |
| TrES_Anlst_10Ind | 0.040 | 0.191 | -0.148 | $0.367 * * *$ | -0.283 | 0.048 | 61.7\% | 2.06\% | 205 | 0.000 | 2.8\% | 85.2\% |
|  | (1.349) | (1.326) | (-0.829) | (6.602) | (-1.136) | (0.284) |  |  |  |  |  |  |
| TPDPS_EP | 0.034 | 0.104** | -0.069 | 0.363*** | -0.243 | 0.046 | 63.4\% | 2.06\% | 205 | 0.000 | 19.0\% | 83.8\% |
|  | (1.826) | (2.945) | (-0.192) | (6.504) | (-0.714) | (0.368) |  |  |  |  |  |  |
| KMY_RI | 0.023 | 0.187 | 0.091 | 0.381*** |  |  | 61.1\% | 2.01\% | 205 | 0.002 | 9.9\% | 53.5\% |
|  | (0.562) | (0.729) | (0.737) | (9.725) | (-0.804) |  |  |  |  |  |  |  |
| FGHJ_EP | 0.139 | -0.440 | 0.170 | $0.392 * * *$ | 3.349 | 0.392 | 61.3\% | 1.91\% | 205 | 0.028 | 8.5\% | 71.1\% |
|  | (1.270) | (-0.677) |  | (9.439) | (1.899) | (1.272) |  |  |  |  |  |  |
| GG_Anlst | 0.027 | 0.137 | 0.212 | 0.373*** | 0.208 | 0.075 | 61.2\% | 1.70\% | 205 | 0.000 | 12.0\% | 54.9\% |
|  | (0.772) | (1.284) | (1.285) | (10.739) | (1.124) | (0.520) |  |  |  |  |  |  |
| 5FF_Factor | 0.082*** | -0.194 | 0.023 | 0.384*** | 5.039 | 0.468 | 62.4\% | 1.69\% | 205 | 0.060 | 4.2\% | 21.1\% |
|  | (4.573) | (-0.307) | (0.094) | (10.047) | (0.908) | (1.417) |  |  |  |  |  |  |
| TPDPS_RI | 0.052* | 0.085* | -0.207 | $0.344^{* * *}$ | -0.531 | -0.024 | 64.2\% | 1.69\% | 205 | 0.000 | 24.6\% | 81.7\% |
|  | (2.371) | (2.246) | (-0.330) | (4.123) | (-0.682) | (-0.158) |  |  |  |  |  |  |
| GM_HDZ | 0.056*** | 0.123 | 0.217 | 0.389*** | 0.844 | 0.124 | 62\% | 1.63\% | 205 | 0.000 | 6.3\% | 57.7\% |
|  | (3.120) | (1.041) | (1.162) | (10.984) | (1.484) | (1.184) |  |  |  |  |  |  |
| PE_Anlst | 0.044* | 0.173 | 0.066 | 0.39*** | 0.741 | 0.253 | 62.4\% | 1.61\% | 205 | 0.100 | 19.0\% | 16.2\% |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_HDZ | (2.123) | (0.345) | (0.136) | (10.805) | (1.032) | (0.998) |  |  |  |  |  |  |
|  | 0.11* | -0.489 | -0.039 | 0.401*** | 3.471* | 0.080 | 61.8\% | 1.59\% | 205 | 0.000 | 7.7\% | 49.3\% |
|  | (2.455) | (-1.337) | (-0.278) | (10.481) | (2.333) | (0.323) |  |  |  |  |  |  |
| FGHJ_HDZ | 0.008 | 0.325 | -0.189 | 0.351*** | -1.854 | -0.029 | 61.6\% | 1.56\% | 205 | 0.310 | 6.3\% | 47.2\% |
|  | (0.081) | (0.490) | (-0.732) | (6.550) | (-0.733) | (-0.091) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.079*** | -0.004 | 0.183 | 0.39*** | -0.087 | 0.208 | 61.2\% | 1.55\% | 205 | 0.000 | 2.1\% | 67.6\% |
|  | (3.188) | (-0.037) | (1.054) | (10.898) | (-0.202) | (0.902) |  |  |  |  |  |  |
| GM_RW | 0.056 | 0.009 | -0.016 | $0.39 * * *$ | 1.117* | 0.147 | 60.8\% | 1.54\% | 205 | 0.000 | 7.9\% | 78.6\% |
|  | (1.715) | (0.175) | (-0.114) | (10.690) | (1.972) | (0.725) |  |  |  |  |  |  |
| PE_EP | 0.020 | 0.367 | 0.084 | 0.346*** | -11.626 | 0.062 | 62\% | 1.49\% | 205 | 0.017 | 9.9\% | 77.5\% |
|  | (0.539) | (1.401) | (0.515) | (9.503) | (-0.717) | (0.446) |  |  |  |  |  |  |
| MPEG_HDZ | 0.068*** | 0.017 | 0.119 | 0.385*** | 0.429 | 0.101 | 62\% | 1.47\% | 205 | 0.000 | 6.3\% | 68.3\% |
|  | (3.422) | (0.202) | (0.980) | (11.092) | (0.819) | (0.783) |  |  |  |  |  |  |
| PEG_EP | 0.024 | 0.158 | 0.063 | 0.361*** | -0.989 | 0.142 | 61.3\% | 1.46\% | 205 | 0.000 | 7.9\% | 86.5\% |
|  | (0.392) | (0.845) | (0.366) | (8.891) | (-0.257) | (0.373) |  |  |  |  |  |  |
| CT_Anlst | 0.021 | 0.417 | 0.374 | 0.4*** | 1.085 | 0.196 | 61.9\% | 1.46\% | 205 | 0.025 | 16.9\% | 28.9\% |
|  | (0.810) | (1.626) | (1.952) | (9.989) | (1.846) | (1.392) |  |  |  |  |  |  |
| BP_EP | 0.033 | 0.406** | 0.080 | 0.39*** | 0.225 | 0.012 | 62.4\% | 1.42\% | 205 | 0.000 | 19.7\% | 33.8\% |
|  | (1.849) | (2.980) | (0.819) | (11.230) | (0.737) | (0.111) |  |  |  |  |  |  |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RI | 0.038 | 0.350 | 0.099 | 0.368*** | -0.695 | -0.119 | 61\% | 1.41\% | 205 | 0.138 | 9.9\% | 53.4\% |
|  | (0.896) | (0.806) | (0.858) | (8.970) | (-0.469) | (-0.289) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.084*** | -0.191 | -0.144 | 0.277 | 0.242 | -0.169 | 61.2\% | 1.39\% | 205 | 0.000 | 11.3\% | 87.3\% |
|  | (4.603) | (-0.840) | (-0.438) | (1.821) | (0.696) | (-0.363) |  |  |  |  |  |  |
| HL_RI | 0.023 | 0.137 | 0.042 | $0.381 * * *$ | -0.559 | 0.030 | 60.5\% | 1.31\% | 205 | 0.000 | 10.6\% | 66.2\% |
|  | (0.605) | (0.808) | (0.238) | (9.952) | (-1.001) | (0.158) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.048*** | 0.003 | 0.143 | $0.359 * * *$ | 0.009 | 0.039 | 60.5\% | 1.31\% | 205 | 0.000 | 4.2\% | 93.7\% |
|  | (3.527) | (0.182) | (1.271) | (11.040) | (0.457) | (0.501) |  |  |  |  |  |  |
| GLS_EP | 0.147 | -0.528 | 0.064 | 0.399*** | 4.561 | 0.503 | 61\% | 1.29\% | 205 | 0.065 | 6.3\% | 69.7\% |
|  | (1.080) | (-0.644) | (0.504) | (7.869) | (1.194) | (1.191) |  |  |  |  |  |  |
| 3FF_Factor | 0.053* | -0.480 | 0.222 | $0.361^{* * *}$ | 1.230 | 0.009 | 62.3\% | 1.29\% | 205 | 0.006 | 7.7\% | 16.2\% |
|  | (2.176) | (-0.906) |  | (8.462) | (0.120) | (0.024) |  |  |  |  |  |  |
| PE_RI | 0.066*** | -0.031 | 0.169 | 0.373*** | 0.077 | 0.098 | 62.2\% | 1.25\% | 205 | 0.000 | 9.9\% | 77.5\% |
|  | (3.254) | (-0.235) | (1.256) | (10.213) | (0.121) | (0.618) |  |  |  |  |  |  |
| FGHJ_RI | 0.046* | 0.116 | 0.054 | 0.366*** | -19.600 | 0.130 | 61.3\% | 1.25\% | 205 | 0.000 | 11.4\% | 71.4\% |
|  | (2.017) | (0.868) | (0.574) | (10.250) | (-0.964) | (0.885) |  |  |  |  |  |  |
| GG_EP | -0.860 | 12.352 | 13.321 | 0.237 | -706.595 | -2.872 | 61.9\% | 1.24\% | 205 | 0.510 | 10.7\% | 57.3\% |
|  | (-0.697) | (0.718) | (0.708) | (1.301) | (-0.704) | (-0.726) |  |  |  |  |  |  |
| CT_RW | 0.096 | -0.248 | 0.038 | 0.405*** | 7.818 | 0.421 | 61.8\% | 1.23\% | 205 | 0.000 | 8.9\% | 60.7\% |

[^48]Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_Anlst | (1.309) | (-0.749) | (0.163) | (9.283) | (0.731) | (1.166) |  |  |  |  |  |  |
|  | 0.056*** | -0.005 | 0.195 | 0.364*** | -0.465 | 0.288 | 60.6\% | 1.20\% | 205 | 0.000 | 6.3\% | 85.9\% |
|  | (3.554) | (-0.111) | (0.979) | (10.178) | (-0.965) | (0.912) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.050 | -0.028 | 0.239 | 0.339*** | -0.008 | -0.106 | 60.4\% | 1.19\% | 205 | 0.000 | 4.9\% | 93.0\% |
|  | (1.610) | (-1.038) | (1.530) | (9.817) | (-0.301) | (-0.818) |  |  |  |  |  |  |
| PE_HDZ | 0.073** | -0.130 | 0.154 | 0.393*** | 1.591 | 0.345 | 62\% | 1.15\% | 205 | 0.000 | 12.7\% | 47.9\% |
|  | (3.047) | (-0.735) | (1.200) | (11.027) | (1.855) | (1.593) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.07*** | -0.003 | 0.084 | 0.386*** | 0.036 | 0.062 | 61.8\% | 1.11\% | 205 | 0.000 | 7.7\% | 53.5\% |
|  | (4.187) | (-0.026) | (0.712) | (11.146) | (0.117) | (0.445) |  |  |  |  |  |  |
| GLS_Anlst | 0.069 | -0.057 | 0.064 | 0.387*** | 1.847* | 0.228 | 62\% | 1.11\% | 205 | 0.000 | 11.3\% | 16.9\% |
|  | (1.869) | (-0.194) | (0.447) | (10.888) | (2.061) | (1.198) |  |  |  |  |  |  |
| DKL_RI | 0.015 | 0.183 | -0.102 | 0.383*** | -0.701 | 0.025 | 60.6\% | 1.07\% | 205 | 0.000 | 13.4\% | 66.9\% |
|  | (0.382) | (0.887) | (-0.597) | (9.750) | (-1.004) | (0.123) |  |  |  |  |  |  |
| GLS_HDZ | 0.009 | 0.376 | -0.182 | 0.342*** | -1.507 | -0.152 | 61.4\% | 1.06\% | 205 | 0.244 | 6.3\% | 48.6\% |
|  | (0.113) | (0.706) | (-0.682) | (6.341) | (-0.670) | (-0.436) |  |  |  |  |  |  |
| DKL_HDZ | 0.044 | 0.172 | 0.266 | 0.395*** | -1.185 | 0.113 | 61.5\% | 1.06\% | 205 | 0.000 | 8.5\% | 49.3\% |
|  | (1.755) | (0.957) | (0.959) | (9.444) | (-0.406) | (0.619) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.072** | -0.048 | 0.016 | 0.36*** | -0.014 | 0.091 | $61 \%$ | 1.05\% | 205 | 0.000 | 3.5\% | 93.7\% |
|  | (2.754) | (-0.532) | (0.101) | (9.543) | (-0.346) | (1.048) |  |  |  |  |  |  |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_HDZ | 0.054*** | 0.016 | 0.156 | 0.352*** | -0.300 | 0.095 | 60.7\% | 0.99\% | 205 | 0.000 | 4.2\% | 94.4\% |
|  | (3.565) | (0.533) | (0.991) | (10.961) | (-0.520) | (1.045) |  |  |  |  |  |  |
| DKL_Anlst | 0.049 | 0.120 | 0.123 | 0.394*** | 1.529* | 0.223 | 61.7\% | 0.98\% | 205 | 0.000 | 14.8\% | 15.5\% |
|  | (1.592) | (0.498) | (0.991) | (10.960) | (2.012) | (1.260) |  |  |  |  |  |  |
| CT_HDZ | 0.069** | -0.102 | 0.038 | 0.39*** | 1.86* | 0.071 | 61.4\% | 0.98\% | 205 | 0.000 | 5.6\% | 56.3\% |
|  | (2.913) | (-0.616) | (0.348) | (10.771) | (2.282) | (0.329) |  |  |  |  |  |  |
| KMY_HDZ | 0.036 | 0.124 | 0.080 | 0.37*** | -0.355 | 0.044 | 61.6\% | 0.98\% | 205 | 0.034 | 9.2\% | 52.8\% |
|  | (0.734) | (0.304) | (0.361) | (9.333) | (-0.180) | (0.187) |  |  |  |  |  |  |
| PE_RW | 0.294 | 0.142 | -0.013 | 0.331*** | -0.294 | -1.029 | 62\% | 0.95\% | 205 | 0.014 | 7.2\% | 74.1\% |
|  |  |  |  | (4.590) |  |  |  |  |  |  |  |  |
| WNG_EP | 0.042* | 0.021 | 0.063 | $0.321^{* * *}$ | 0.060 | 0.117 | 61\% | 0.95\% | 205 | 0.000 | 11.3\% | 93.0\% |
|  | (2.525) | (0.707) | (0.351) | (9.507) | (0.458) | (1.071) |  |  |  |  |  |  |
| HL_HDZ | 0.051* | 0.067 | 0.143 | 0.393*** | 0.353 | 0.158 | 61.7\% | 0.95\% | 205 | 0.000 | 9.2\% | 52.1\% |
|  | (2.277) | (0.557) | (1.143) | (10.274) | (0.431) | (1.048) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.288 | -0.877 | 1.791 | $0.333 * * *$ | 0.758 | -0.239 | 60.1\% | 0.95\% | 205 | 0.118 | 6.3\% | 64.1\% |
|  | (0.939) | (-0.734) | (0.872) | (5.930) | (0.699) | (-0.573) |  |  |  |  |  |  |
| PEG_HDZ | 0.074*** | 0.008 | 0.128 | 0.383*** | 0.490 | -0.024 | 62\% | 0.95\% | 205 | 0.000 | 4.2\% | 67.6\% |
|  | (3.547) | (0.078) | (0.934) | (10.952) | (0.695) | (-0.160) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | $0.065 * * *$ | -0.003 | 0.147 | 0.371*** | 0.403 | 0.111 | 62.1\% | 0.95\% | 205 | 0.000 | 5.6\% | 71.8\% |

[^49]Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_Anlst | (3.643) | (-0.052) | (1.401) | (11.036) | (1.114) | (1.169) |  |  |  |  |  |  |
|  | 0.353 | -1.977 | -0.308 | $0.449^{* * *}$ | 10.755 | -0.637 | 62\% | 0.94\% | 205 | 0.308 | 11.3\% | 16.2\% |
|  | (0.844) | (-0.679) | (-0.511) | (4.608) | (0.853) | (-0.539) |  |  |  |  |  |  |
| MPEG_RW | 0.1* | 0.022 | 0.098 | $0.376 * * *$ | 0.483 | -0.127 | 61\% | 0.92\% | 205 | 0.000 | 6.5\% | 81.3\% |
|  | (2.396) | (0.219) | (0.705) | (10.514) | (1.771) | (-0.270) |  |  |  |  |  |  |
| FGHJ_RW | 0.045* | 0.112 | -0.029 | 0.393*** | -0.342 | -0.057 | 59.6\% | 0.91\% | 205 | 0.000 | 6.8\% | 70.5\% |
|  | (2.220) | (1.781) | (-0.282) | (10.701) | (-0.505) | (-0.367) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.061*** | -0.029 | -0.281 | 0.346*** | 0.010 | 0.099 | 60.2\% | 0.90\% | 205 | 0.000 | 2.8\% | 95.1\% |
|  | (3.365) | (-0.660) | (-0.511) | (11.305) | (0.278) | (1.022) |  |  |  |  |  |  |
| TrES_Anlst _25SBM | 0.075*** | -0.019 | 0.225 | $0.352 * * *$ | 0.010 | 0.166 | 61.1\% | 0.86\% | 205 | 0.000 | 5.6\% | 95.1\% |
|  | (3.309) | (-0.400) | (1.216) | (10.972) | (0.244) | (1.052) |  |  |  |  |  |  |
| FPM_HDZ | 0.068*** | 0.022 | 0.153 | 0.391*** | 1.301* | 0.104 | 61.5\% | 0.84\% | 205 | 0.000 | 8.5\% | 33.1\% |
|  | (3.356) | (0.122) | (1.116) | (10.680) | (2.509) | (0.875) |  |  |  |  |  |  |
| GG_RW | 0.062 | -0.009 | 0.127 | 0.398*** | 4.121 | 0.276 | 60.4\% | 0.82\% | 205 | 0.001 | 4.3\% | 51.7\% |
|  | (1.688) | (-0.031) | (0.718) | (9.357) | (1.237) | (1.377) |  |  |  |  |  |  |
| FPM_RW | 0.042 | 0.071 | -0.676 | 0.226 | 0.216 | 0.375 | 61.5\% | 0.80\% | 205 | 0.000 | 4.9\% | 66.2\% |
|  | (1.147) | (0.799) | (-0.578) | (1.265) | (0.822) | (0.929) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.042** | -0.009 | 0.229 | $0.328 * * *$ | 0.004 | 0.130 | 60.6\% | 0.79\% | 205 | 0.000 | 4.9\% | 97.2\% |
|  | (2.948) | (-0.704) | (0.666) | (10.352) | (0.292) | (0.828) |  |  |  |  |  |  |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_RI | 0.08*** | -0.447 | -0.809 | 0.396*** | 0.288 | 0.651 | 60.1\% | 0.79\% | 205 | 0.023 | 3.5\% | 96.5\% |
|  | (4.177) | (-0.711) | (-0.944) | (7.772) | (0.918) | (1.186) |  |  |  |  |  |  |
| PEG_RI | 0.05* | 0.115 | 0.165 | 0.39*** | 0.381 | 0.129 | 61.2\% | 0.73\% | 205 | 0.000 | 9.7\% | 70.1\% |
|  | (2.405) | (1.165) | (1.047) | (10.593) | (0.989) | (1.158) |  |  |  |  |  |  |
| MPEG_Anlst | 0.084** | -0.110 | 0.269 | 0.388*** | 0.424 | 0.275 | 61.7\% | 0.63\% | 205 | 0.000 | 9.9\% | 34.5\% |
|  | (2.729) | (-0.647) | (1.415) | (10.525) | (1.017) | (1.361) |  |  |  |  |  |  |
| PEG_Anlst | 0.092*** | -0.163 | 0.185 | $0.383 * * *$ |  |  | 61.6\% | 0.60\% | 205 | 0.000 | 4.2\% | 35.9\% |
|  | (3.683) | (-1.149) | (1.339) | (9.172) |  | $(0.802)$ |  |  |  |  |  |  |
| GM_Anlst | 0.114 | -0.318 | 0.198 | $0.422 * * *$ | 1.072 | 0.461 | 61.7\% | 0.59\% | 205 | 0.002 | 9.9\% | 26.8\% |
|  |  | $(-0.770)$ |  |  |  | (1.196) |  |  |  |  |  |  |
| MPEG_RI | $0.096 * * *$ | -0.105 | 0.210 | 0.377*** | 0.647 | 0.184 | 60.5\% | 0.58\% | 205 | 0.000 | 6.3\% | 73.2\% |
|  | (3.322) | (-1.205) | (1.627) | (11.169) | (1.792) | (1.522) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.043 | 0.030 | 0.129 | $0.347 * * *$ | 0.016 | 0.172 | 60.5\% | 0.57\% | 205 | 0.000 | 3.5\% | 93.0\% |
|  | (1.748) | (0.920) | (0.829) | (9.500) | (0.398) | (1.518) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.047 | 0.134 | 0.308 | 0.448*** | 0.921 | 0.329 | 60\% | 0.56\% | 205 | 0.013 | 4.9\% | 28.2\% |
|  | (1.236) | (0.390) | (0.885) | (5.175) | (1.467) | (1.593) |  |  |  |  |  |  |
| FPM_Anlst | 0.043 | 0.170 | 0.412 | $0.375 * * *$ | 0.946 | 0.120 | 61.3\% | 0.51\% | 205 | 0.006 | 11.3\% | 9.9\% |
|  | (1.232) | (0.578) | (1.187) | (9.866) | (0.618) | (0.645) |  |  |  |  |  |  |
| FPM_RI | 0.052* | 0.071 | 0.030 | $0.354 * * *$ | -0.222 | 0.131 | 61\% | 0.45\% | 205 | 0.000 | 6.3\% | 71.8\% |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_Anlst | (2.327) | (0.691) | (0.229) | (10.104) | (-0.663) | (1.012) |  |  |  |  |  |  |
|  | 0.056** | 0.075 | 0.140 | 0.397*** | 1.157* | 0.277 | 61.6\% | 0.45\% | 205 | 0.000 | 12.7\% | 19.7\% |
|  | (2.642) | (0.501) | (1.246) | (11.174) | (2.013) | (1.683) |  |  |  |  |  |  |
| GM_EP | 0.040 | 0.100 | 0.144 | $0.363 * * *$ | 0.453 | 0.047 | 60.8\% | 0.38\% | 205 | 0.000 | 10.6\% | 71.8\% |
|  | (0.897) | (0.662) | (1.165) | (10.296) | (0.529) | (0.203) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.09*** | -0.052 | -0.055 | 0.359*** | 0.111 | 0.139 | 60.5\% | 0.38\% | 205 | 0.000 | 2.1\% | 81.0\% |
|  | (3.862) | (-0.680) | (-0.404) | (9.148) | (0.636) | (1.030) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.008 | 0.109 | -0.044 | 0.673 | -0.386 | 0.422 | 61.2\% | 0.37\% | 205 | 0.000 | 7.0\% | 86.6\% |
|  | (0.092) | (0.656) | (-0.297) | (1.598) | (-0.741) | (1.258) |  |  |  |  |  |  |
| DKL_EP | 0.056 | 0.190 | 0.160 | 0.345*** | -0.490 | -0.056 | 59.7\% | 0.37\% | 205 | 0.000 | 3.5\% | 63.4\% |
|  | (0.846) | (0.873) | (0.608) | (7.097) | (-0.901) | (-0.198) |  |  |  |  |  |  |
| HL_EP | 0.054 | 0.153 | 0.130 | $0.348 * * *$ | -0.543 | -0.074 | 60.2\% | 0.35\% | 205 | 0.000 | 4.2\% | 62.7\% |
|  | (0.893) | (0.846) | (0.541) | (7.523) | (-1.137) | (-0.254) |  |  |  |  |  |  |
| MPEG_EP | 0.033 | 0.066 | 0.157 | 0.366*** | -0.171 | 0.070 | 60\% | 0.30\% | 205 | 0.000 | 7.7\% | 77.5\% |
|  | (0.733) | (0.552) | (1.238) | (10.036) | (-0.476) | (0.288) |  |  |  |  |  |  |
| CT_RI | 0.181 | -1.106 | 0.050 | 0.426*** | 6.324 | 0.686 | 59.9\% | 0.27\% | 205 | 0.056 | 9.9\% | 86.6\% |
|  | (1.408) | (-1.014) | (0.186) | (6.827) | (0.982) | (0.560) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.06*** | 0.037 | 0.194 | 0.374*** | -0.076 | 0.222 | 60.2\% | 0.18\% | 205 | 0.000 | 2.8\% | 83.8\% |
|  | (3.110) | (1.659) | (1.410) | (10.793) | (-0.564) | (1.915) |  |  |  |  |  |  |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RW | 0.048 | 0.011 | 0.025 | 0.371*** | 0.127 | 0.094 | 60\% | 0.07\% | 205 | 0.000 | 7.8\% | 100.0\% |
|  | (1.072) | (0.136) | (0.162) | (8.332) | (0.178) | (0.607) |  |  |  |  |  |  |
| GLS_RI | 0.043 | 0.152 | 0.067 | 0.369*** | 8.166 | 0.123 | 60.9\% | 0.02\% | 205 | 0.000 | 7.9\% | 68.6\% |
|  | (1.910) | (1.261) | (0.660) | (10.165) | (1.220) | (0.828) |  |  |  |  |  |  |
| GM_RI | 0.11** | -0.205 | 0.188 | 0.382*** | 0.811 | 0.176 | 60.4\% | -0.03\% | 205 | 0.000 | 8.5\% | 67.6\% |
|  | (2.608) | (-1.030) | (1.479) | (10.976) |  |  |  |  |  |  |  |  |
| KMY_EP | -0.105 | 0.560 | -0.803 | 0.295* | -1.928 | -0.175 | 61\% | -0.04\% | 205 | 0.420 | 9.2\% | 54.9\% |
|  | (-0.757) | (1.029) | (-0.582) | (2.016) | (-0.693) | (-0.368) |  |  |  |  |  |  |
| FPM_EP | -0.009 | 0.073 | 0.316 | $0.325^{* * *}$ | 0.109 | -0.029 | 61.9\% | -0.06\% | 205 | 0.000 | 6.3\% | 66.9\% |
|  | (-0.174) |  | (1.273) | (8.497) |  |  |  |  |  |  |  |  |
| KMY_RW | -0.023 | 0.243 | -0.007 | 0.379*** | -0.225 | -0.070 | 59.1\% | -0.14\% | 205 | 0.000 | 4.9\% | 59.2\% |
|  | (-0.375) | (1.705) | (-0.039) | (10.732) | (-0.549) | (-0.315) |  |  |  |  |  |  |
| DKL_RW | 0.118 | -0.146 | -0.109 | 0.393*** | -0.205 | 0.206 | 59.3\% | -0.17\% | 205 | 0.000 | 3.5\% | 62.0\% |
|  | (1.370) | (-0.554) | (-0.399) | (10.600) | (-0.478) | (1.141) |  |  |  |  |  |  |
| GLS_RW | 0.051** | 0.149 | 0.131 | 0.396*** | 0.352 | 0.215 | 59\% | -0.18\% | 205 | 0.000 | 2.1\% | 60.6\% |
|  | (2.677) | (1.465) | (1.071) | (11.018) | (0.676) | (1.303) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.072*** | -0.018 | 0.087 | 0.352*** | -0.051 | 0.028 | 60.7\% | -0.21\% | 205 | 0.000 | 4.2\% | 91.5\% |
|  | (3.558) | (-0.801) | (0.698) | (10.100) | (-0.818) | (0.171) |  |  |  |  |  |  |
| HL_RW | -0.020 | 0.227 | 0.013 | 0.381*** | -0.213 | -0.049 | 59.2\% | -0.25\% | 205 | 0.000 | 3.5\% | 63.4\% |

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Table 85 : Capturing Subsequent Return: High Leverage Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_RW | (-0.319) | (1.602) | (0.073) | (10.744) | (-0.509) | (-0.220) |  |  |  |  |  |  |
|  | 0.036* | 0.000 | 0.170 | 0.339*** | -0.045 | 0.214 | 59.9\% | -0.32\% | 205 | 0.000 | 4.3\% | 100.0\% |
|  | (2.277) | (1.484) | (1.363) | (10.519) | (-0.271) | (1.446) |  |  |  |  |  |  |
| KMY_Anlst | -0.077 | 0.809 | 0.771 | 0.37*** | -0.498 | 0.297 | 60.6\% | -0.43\% | 205 | 0.844 | 7.7\% | 32.4\% |
|  | (-0.457) | (0.833) | (0.851) | (10.139) | (-0.433) | (1.062) |  |  |  |  |  |  |
| CT_EP | 0.037 | 0.163 | -0.676 | 0.387*** | -0.721 | 0.135 | 60.6\% | -0.44\% | 205 | 0.000 | 3.5\% | 73.9\% |
|  | (0.790) | (0.959) | (-0.691) | (6.776) | (-1.103) | (0.477) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.054*** | 0.025 | 0.079 | $0.361 * * *$ | 0.024 | 0.038 | 60.5\% | -0.49\% | 205 | 0.000 | 8.5\% | 59.9\% |
|  | (3.418) | (0.327) | (0.578) | (11.090) | (0.190) | (0.377) |  |  |  |  |  |  |
| TrES_RI_25SBM | -0.029 | 0.013 | -1.661 | 0.351*** | 0.001 | 0.824 | 59.2\% | -0.50\% | 205 | 0.000 | 2.1\% | 96.5\% |
|  | (-0.292) | (0.518) | (-0.943) | (9.059) | (0.085) | (0.821) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.055* | 0.045 | -0.324 | 0.473** | -0.060 | 0.489 | 59.7\% | -0.77\% | 205 | 0.000 | 2.1\% | 92.3\% |
|  | (2.534) | (0.520) | (-0.750) | (2.841) | (-0.472) | (1.109) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.093 | -0.017 | -0.464 | 0.240 | -0.020 | -0.251 | 59.1\% | -1.19\% | 205 | 0.000 | 2.8\% | 93.7\% |
|  | (1.616) | (-1.154) | (-0.583) | (1.595) | (-1.053) | (-0.602) |  |  |  |  |  |  |

For the highest quartile of firms in terms of leverage, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+$ $\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the variation in
subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}$ $+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_RI | -0.033 | 0.146 | 0.085 | 0.526*** | 2.969 | 0.088 | 66.9\% |  | 205 | 0.000 | 13.4\% | 83.4\% |
|  | (-1.223) | (1.454) | (0.618) | (9.209) | (0.973) | (0.825) |  | 2.66\% |  |  |  |  |
| TPDPS_Anlst | -0.029 | 0.215 | 0.392* | 0.536*** | -0.061 | -0.011 | 69\% |  | 205 | 0.000 | 32.5\% | 84.7\% |
|  | (-1.444) | (1.008) | (2.156) | (10.216) | (-0.467) | (-0.194) |  | 2.43\% |  |  |  |  |
| Naive | -0.029 | 0.202 | 0.4* | $0.547 * * *$ | -0.053 | -0.024 | 69\% |  | 205 | 0.000 | 33.8\% | 87.9\% |
|  | (-1.493) | (0.914) | (2.088) | (11.688) | (-0.414) | (-0.431) |  | 2.38\% |  |  |  |  |
| KMY_Anlst | -0.010 | -0.033 | 0.256 | 0.54*** | 0.146 | 0.140 | 67.5\% |  | 205 | 0.000 | 8.3\% | 68.2\% |
|  | (-0.289) | (-0.230) | (1.507) | (10.937) |  | (1.737) |  | 2.34\% |  |  |  |  |
| TPDPS_HDZ | -0.035 | 0.238 | 0.345* | 0.539*** | -0.061 | -0.005 | 68.9\% |  | 205 | 0.000 | 34.4\% | 87.9\% |
|  | (-1.819) | (1.179) | (2.468) | (12.991) | (-0.474) | (-0.110) |  | 2.29\% |  |  |  |  |
| GG_Anlst | -0.047 | 0.120 | 0.208 | 0.552*** | 0.138 | 0.067 | 67.8\% |  | 205 | 0.000 | 5.7\% | 83.4\% |
|  | (-1.054) | (0.891) | (1.431) | (9.528) | (0.941) | (0.440) |  | 2.21\% |  |  |  |  |
| GM_RI | -0.059 | 0.268 | 0.148 | $0.564 * * *$ | -1.541 | -0.116 | 67.2\% |  | 205 | 0.004 | 17.2\% | 77.1\% |
|  | (-1.999) | (1.065) | (0.893) | (10.597) | (-0.915) | (-0.868) |  | 2.17\% |  |  |  |  |
| PE_RW | -0.009 | 0.092 | 0.288 | 0.491*** | -0.028 | 0.085 | 67.2\% |  | 205 | 0.000 | 6.4\% | 81.4\% |
|  | (-0.143) | (0.949) | (1.870) | (9.642) | (-0.172) | (0.579) |  | 2.17\% |  |  |  |  |
| BP_HDZ | -0.041 | 0.542*** | 0.537* | 0.626*** | 0.139 | 0.252 | 68.7\% |  | 205 | 0.007 | 36.3\% | 30.6\% |
|  | (-1.821) | (3.253) | (2.445) | (5.702) | (0.642) | (0.927) |  | 2.12\% |  |  |  |  |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RW_10Ind | -0.010 | -0.215 | 0.244 | 0.59*** | -10.192 | 0.238 | 67.3\% |  | 205 | 0.017 | 9.6\% | 91.7\% |
|  | (-0.357) | (-0.429) | (1.232) | (6.596) | (-0.681) | (0.968) |  | 2.03\% |  |  |  |  |
| MPEG_Anlst | -0.041 | 0.266 | 0.497* | 0.625*** | -0.172 | 0.137 | 66.5\% |  | 205 | 0.101 | 5.7\% | 63.7\% |
|  | (-0.903) | (0.600) | (2.018) | (6.993) | (-0.326) | (0.933) |  | 1.99\% |  |  |  |  |
| TrES_Anlst _10Ind | -0.026 | 0.009 | 0.149 | 0.502*** | 0.001 | 0.196 | 67.8\% |  | 205 | 0.000 | 10.8\% | 93.6\% |
|  | (-1.912) | (0.245) | (0.847) | (11.816) | (0.016) | (1.707) |  | 1.92\% |  |  |  |  |
| BP_Anlst | -0.027 | 0.339 | 0.485 | 0.636*** | 0.134 | 0.023 | 68.7\% |  | 205 | 0.115 | 36.9\% | 36.9\% |
|  | (-0.726) | (0.812) | (1.470) | (4.498) | (0.508) | (0.049) |  | 1.89\% |  |  |  |  |
| TPDPS_EP | -0.034 | 0.188 | 0.284 | 0.522*** | -0.045 | -0.094 | 68.8\% |  | 205 | 0.000 | 28.0\% | 91.1\% |
|  | (-1.646) | (0.892) | (1.325) | (9.959) | (-0.351) | (-0.685) |  | 1.87\% |  |  |  |  |
| BP_EP | -0.048 | -0.450 | 0.850 | 0.698*** | -0.212 | 0.159 | 68.5\% |  | 205 | 0.238 | 31.2\% | 51.0\% |
|  | (-2.038) | (-0.367) | (1.495) | (4.867) | (-0.396) | (0.529) |  | 1.87\% |  |  |  |  |
| GG_RW | -0.040 | -0.023 | 0.673 | $0.644^{* * *}$ | -3.267 | 0.006 | 67.9\% |  | 205 | 0.001 | 7.9\% | 81.3\% |
|  | (-1.869) | (-0.072) | (1.136) | (4.419) | (-0.565) | (0.053) |  | 1.85\% |  |  |  |  |
| TrES_EP_25SBM | -0.014 | -0.014 | 0.114 | 0.481*** | -0.004 | -0.041 | 66.3\% |  | 205 | 0.000 | 5.1\% | 98.1\% |
|  | (-1.353) | (-0.563) | (0.973) | (12.828) | (-0.242) | (-0.342) |  | 1.70\% |  |  |  |  |
| TrETSS_RW_25SBM | -0.016 | -0.001 | 0.231* | 0.526*** | 0.016 | -0.036 | 66\% |  | 205 | 0.000 | 3.8\% | 93.6\% |
|  | (-1.428) | (-0.059) | (2.137) | (10.987) | (0.582) | (-0.500) |  | 1.70\% |  |  |  |  |
| BP_RW | -0.037 | 0.159 | 0.455* | 0.626*** | 0.271 | 0.215 | 68\% |  | 205 | 0.009 | 24.2\% | 52.9\% |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RI | (-1.632) | (0.501) | (2.073) | (5.675) | (1.489) | (0.782) |  | 1.69\% |  |  |  |  |
|  | -0.055 | 0.230 | 0.155 | 0.559*** | -0.066 | -0.029 | 68.3\% |  | 205 | 0.000 | 26.8\% | 91.7\% |
|  | (-1.468) | (1.112) | (0.782) | (6.984) | (-0.489) | (-0.210) |  | 1.68\% |  |  |  |  |
| MPEG_RW | 0.036 | -0.058 | 0.166 | 0.505*** | 0.416* | 0.109 | 67.3\% |  | 205 | 0.000 | 7.1\% | 84.0\% |
|  | (0.600) | (-0.777) | (1.301) | (10.819) | (2.345) | (1.268) |  | 1.68\% |  |  |  |  |
| TrETSS_Anlst_25SBM | -0.013 | 0.004 | 0.130 | 0.501*** | 0.014 | 0.034 | 67.4\% |  | 205 | 0.000 | 4.5\% | 86.0\% |
|  | $(-0.930)$ | (0.094) | (0.971) | (13.000) | (0.214) | (0.258) |  | 1.60\% |  |  |  |  |
| KMY_RW | -0.008 | -0.063 | -0.261 | 0.478*** | 0.197 | 0.336 | 66.6\% |  | 205 | 0.000 | 4.5\% | 84.7\% |
|  | (-0.186) | (-0.687) | (-0.592) | (6.671) | (0.998) | (1.314) |  | 1.59\% |  |  |  |  |
| TrOHE_10Ind | -0.039 | 0.359 | 0.689 | 0.549*** | -0.016 | 0.254 | 68.1\% |  | 205 | 0.005 | 10.8\% | 61.8\% |
|  | (-2.443) | (1.576) | (1.596) | (10.355) | (-0.053) | (1.330) |  | 1.58\% |  |  |  |  |
| BP_RI | -0.055 | 0.357 | 0.476* | 0.66*** | -0.013 | 0.272 | 68.2\% |  | 205 | 0.026 | 28.7\% | 45.2\% |
|  | (-1.895) | (1.248) | (2.037) | (5.525) | (-0.046) | (0.957) |  | 1.58\% |  |  |  |  |
| HL_RW | -0.007 | -0.060 | -0.264 | 0.478*** | 0.119 | 0.335 | 66.6\% |  | 205 | 0.000 | 3.8\% | 86.0\% |
|  | (-0.179) | (-0.653) | (-0.597) | (6.675) | (0.623) | (1.312) |  | 1.58\% |  |  |  |  |
| PE_EP | -0.018 | -0.060 | 0.459* | 0.532*** | 0.355 | 0.106 | 67.3\% |  | 205 | 0.000 | 15.3\% | 82.2\% |
|  | (-1.172) | (-0.202) | (2.431) | (9.831) | (0.286) | (1.088) |  | 1.55\% |  |  |  |  |
| PE_HDZ | -0.034 | 0.184 | 0.411* | $0.569^{* * *}$ | 0.351 | 0.085 | 68.5\% |  | 205 | 0.000 | 16.6\% | 65.6\% |
|  | (-2.233) | (0.853) | (2.085) | (10.363) | (0.312) | (0.927) |  | 1.54\% |  |  |  |  |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RI | -0.060 | 0.010 | 0.551 | 0.772** | -0.178 | 0.399 | 65.8\% |  | 205 | 0.000 | 16.2\% | 93.0\% |
|  | (-1.117) | (0.127) | (1.217) | (3.003) | (-0.377) | (0.526) |  | 1.54\% |  |  |  |  |
| HL_HDZ | -0.016 |  | 0.42* | $0.544 * * *$ | -0.402 | -0.025 | 68.3\% |  | 205 | 0.000 | 10.2\% | 73.2\% |
|  | (-1.221) | (0.232) | (2.048) | (8.397) | (-0.266) | (-0.200) |  | 1.53\% |  |  |  |  |
| DKL_HDZ | -0.010 | 0.024 | 0.382 | 0.515*** | -0.460 | -0.088 | 68.1\% |  | 205 | 0.000 | 10.2\% | 70.1\% |
|  | (-0.591) | (0.183) | (1.772) | (6.650) | (-0.282) | (-0.529) |  | 1.52\% |  |  |  |  |
| GG_HDZ | -0.039 | -0.041 | 0.661 | 0.638*** | -2.089 | 0.037 | 67.9\% |  | 205 | 0.001 | 7.6\% | 68.8\% |
|  | (-1.953) | (-0.137) | (1.186) | (4.647) | (-0.430) | (0.322) |  | 1.50\% |  |  |  |  |
| PE_RI | -0.023 | 0.263 | 0.134 | 0.493*** | 1.155 | 0.176 | 67.8\% |  | 205 | 0.001 | 13.4\% | 84.7\% |
|  | (-1.434) | (1.190) | (0.933) | (8.629) | (1.000) | (1.234) |  | 1.46\% |  |  |  |  |
| KMY_HDZ | -0.022 | -0.062 | 0.477 | 0.584*** | -0.699 | 0.033 | 68.1\% |  | 205 | 0.000 | 9.6\% | 71.3\% |
|  | (-1.674) | (-0.378) | (1.830) | (8.028) | (-0.303) | (0.361) |  | 1.43\% |  |  |  |  |
| PE_Anlst | -0.044 | 0.65** | 0.495** | 0.542*** | -0.111 | 0.002 | 68.2\% |  | 205 | 0.118 | 27.4\% | 27.4\% |
|  | (-2.430) | (2.917) | (2.684) | (10.083) | (-0.130) | (0.012) |  | 1.39\% |  |  |  |  |
| DKL_Anlst | -0.039 | 0.468 | 0.336 | 0.467*** | 0.084 | -0.310 | 66.8\% |  | 205 | 0.120 | 8.9\% | 42.0\% |
|  | (-0.913) | (1.374) | (1.144) | (3.686) | (0.110) | (-0.884) |  | 1.35\% |  |  |  |  |
| KMY_RI | -0.031 | 0.157 | 0.195 | 0.533*** | -0.278 | 0.040 | 67.2\% |  | 205 | 0.000 | 7.0\% | 81.5\% |
|  | (-2.147) | (1.362) | (1.154) | (10.685) | (-0.464) | (0.390) |  | 1.34\% |  |  |  |  |
| CT_Anlst | 0.040 | -0.453 | 0.110 | 0.561*** | 1.238 | -0.034 | 66.8\% |  | 205 | 0.012 | 11.5\% | 47.1\% |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_RI | (0.670) | (-0.795) | (0.323) | (8.134) | (1.274) | (-0.159) |  | 1.32\% |  |  |  |  |
|  | -0.173 | -1.209 | 2.955 | 1.388 | -30.505 | -0.746 | $66.9 \%$ |  | 205 | 0.273 | 7.3\% | 87.3\% |
|  | (-0.967) | (-0.602) | (0.857) | (1.194) | (-0.773) | (-0.619) |  | 1.30\% |  |  |  |  |
| TrES_RI_25SBM | -0.024 | -0.005 | 0.285 | 0.429*** | 0.005 | 0.204 | 66.8\% |  | 205 | 0.000 | 7.0\% | 98.1\% |
|  | (-1.549) | (-0.816) | (1.945) | (3.868) | (0.806) | (0.902) |  | 1.29\% |  |  |  |  |
| FPM_HDZ | -0.018 | 0.051 | 0.149 | 0.501*** | 1.68* | 0.190 | 67.3\% |  | 205 | 0.000 | 3.8\% | 61.1\% |
|  | (-1.094) | (0.442) | (0.922) | (10.988) | (2.552) | (1.749) |  | 1.22\% |  |  |  |  |
| GLS_HDZ | -0.076 | 0.561 | 0.112 | 0.612*** | 1.239 | 0.240 | 67.5\% |  | 205 | 0.544 | 7.6\% | 68.8\% |
|  | (-1.202) | (0.778) | (0.315) | (7.667) | (0.427) | (1.370) |  | 1.19\% |  |  |  |  |
| FGHJ_RI | -0.035 | -3.184 | 3.474 | 1.585 | -47.185 | -1.036 | 67\% |  | 205 | 0.379 | 9.3\% | 88.0\% |
|  | (-0.716) | (-0.671) | (0.849) | (1.121) | (-0.762) | (-0.634) |  | 1.19\% |  |  |  |  |
| TrES_EP_10Ind | -0.023 | -0.080 | -0.009 | $0.565 * * *$ | -0.038 | 0.155 | 67.5\% |  | 205 | 0.000 | 10.2\% | 96.8\% |
|  | (-1.257) | (-0.740) | (-0.047) | (11.306) | (-0.810) | (0.914) |  | 1.18\% |  |  |  |  |
| TrES_HDZ_10Ind | -0.029 | 0.012 | 0.136 | $0.481 * * *$ | -0.005 | 0.077 | 66.7\% |  | 205 | 0.000 | 12.1\% | 97.5\% |
|  | (-2.101) | (0.860) | (0.965) | (12.821) | (-0.112) | (0.912) |  | 1.09\% |  |  |  |  |
| CT_HDZ | -0.019 | -0.027 | 0.354 | 0.571*** | -0.582 | 0.090 | 67.7\% |  | 205 | 0.000 | 8.9\% | 72.6\% |
|  | (-1.441) | (-0.164) | (1.812) | (9.454) | (-0.342) | (1.120) |  | 1.09\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.043 | 0.673 | -2.009 | -0.476 | -0.265 | 4.615 | 67\% |  | 205 | 0.701 | 7.6\% | 97.5\% |
|  | (0.850) | (0.794) | (-0.608) | (-0.397) | (-0.683) | (0.744) |  | 1.03\% |  |  |  |  |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RI_10Ind | -0.051 | -0.004 | 0.145 | 0.561*** | 0.010 | 0.089 | 66.1\% |  | 205 | 0.000 | 10.8\% | 98.1\% |
|  | (-1.904) | (-0.217) | (1.134) | (5.169) | (0.360) | (0.879) |  | 1.03\% |  |  |  |  |
| CT_EP | -0.020 | 0.006 | 0.124 | 0.527*** | 0.181 | 0.188 | 67.1\% |  | 205 | 0.000 | 10.2\% | 80.3\% |
|  | (-0.758) | (0.060) | (0.752) | (10.562) | (0.271) | (1.087) |  | 1.00\% |  |  |  |  |
| TrETSS_RW_10Ind | -0.017 | -0.054 | 0.31** | 0.535*** | 0.024 | 0.055 | 67.1\% |  | 205 | 0.000 | 2.6\% | 94.2\% |
|  | (-1.262) | (-0.803) | (2.615) | (10.641) | (0.132) | (1.205) |  | 0.99\% |  |  |  |  |
| TrETSS_HDZ_25SBM | -0.007 | 0.002 | 0.526 | 0.538*** | -0.056 | -0.054 | 66\% |  | 205 | 0.000 | 2.5\% | 87.9\% |
|  | (-0.686) | (0.030) | (1.348) | (10.720) | (-0.492) | (-0.264) |  | 0.97\% |  |  |  |  |
| HL_RI | -0.042 | 0.177 | 0.199 | $0.524^{* * *}$ | 0.030 | 0.145 | 66.7\% |  | 205 | 0.000 | 11.5\% | 89.2\% |
|  | (-2.218) | (1.563) | (1.078) | (10.107) | (0.210) | (1.297) |  | 0.96\% |  |  |  |  |
| TPDPS_RW | -0.025 | 0.223 | 0.236* | $0.499 * * *$ | -0.037 | 0.043 | 67.1\% |  | 205 | 0.000 | 18.5\% | 93.0\% |
|  | (-1.273) | (1.135) | (2.234) | (13.318) | (-0.283) | (0.578) |  | 0.95\% |  |  |  |  |
| FGHJ_HDZ | -0.046 | 0.207 | 0.406 | 0.598*** | -0.747 | 0.097 | 67.6\% |  | 205 | 0.003 | 8.3\% | 70.7\% |
|  | (-1.795) | (0.794) | (1.638) | (8.022) | (-0.303) | (0.939) |  | 0.92\% |  |  |  |  |
| PEG_Anlst | -0.016 | 0.002 | 0.221 | 0.518*** | -0.126 | 0.206 | 65.3\% |  | 205 | 0.014 | 1.9\% | 68.2\% |
|  | (-0.382) | (0.005) | (1.107) | (7.762) | (-0.204) | (1.215) |  | 0.91\% |  |  |  |  |
| FPM_RW | 0.011 | -0.020 | 0.256 | 0.465*** | 0.016 | 0.014 | 67.3\% |  | 205 | 0.000 | 5.1\% | 87.9\% |
|  | (0.270) | (-0.622) | (1.854) | (9.339) | (0.270) | (0.262) |  | 0.89\% |  |  |  |  |
| PEG_HDZ | -0.024 | -0.035 | 0.496 | 0.608*** | -1.798 | 0.050 | 68.1\% |  | 205 | 0.000 | 5.7\% | 75.8\% |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_RI | (-1.691) | (-0.210) | (1.329) | (6.874) | (-0.508) | (0.439) |  | 0.83\% |  |  |  |  |
|  | -0.081 | 0.459 | -0.151 | 0.471*** | -0.059 | 0.394 | 66.8\% |  | 205 | 0.190 | 8.3\% | 89.2\% |
|  | (-1.222) | (1.116) | (-0.271) | (5.973) | (-0.130) | (0.868) |  | 0.81\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.211 | -0.010 | -3.323 | 0.627*** | -0.388 | 2.593 | 65.9\% |  | 205 | 0.000 | 6.4\% | 94.9\% |
|  | (0.730) | (-0.334) | (-0.743) | (3.514) | (-0.746) | (0.766) |  | 0.80\% |  |  |  |  |
| WNG_RW | -0.018 | 0.000 | 0.222 | $0.464 * * *$ | -0.029 | 0.006 | 65.8\% |  | 205 | 0.000 | 3.2\% | 100.0\% |
|  | (-0.876) | (0.390) | (1.868) | (7.006) | (-0.783) | (0.118) |  | 0.77\% |  |  |  |  |
| HL_Anlst | -0.030 | 0.190 | 0.401* | $0.523 * * *$ | 0.047 | 0.033 | 65.9\% |  | 205 | 0.040 | 8.9\% | 47.8\% |
|  | (-0.747) | (0.485) | (2.225) | (8.669) | (0.090) | (0.320) |  | 0.70\% |  |  |  |  |
| MPEG_HDZ | -0.028 | 0.140 | 0.230 | 0.575*** | 0.010 | 0.060 | 67.7\% |  | 205 | 0.000 | 7.6\% | 77.7\% |
|  | (-1.841) | (0.916) | (1.146) | (10.502) | (0.008) | (0.704) |  | 0.67\% |  |  |  |  |
| GM_HDZ | -0.026 | 0.102 | 0.157 | 0.568*** | -0.600 | 0.041 | 67.6\% |  | 205 | 0.000 | 8.3\% | 72.6\% |
|  | (-1.769) | (0.527) | (0.603) | (10.503) | (-0.321) | (0.520) |  | 0.63\% |  |  |  |  |
| PEG_RW | 0.005 | -0.021 | 0.205 | 0.536*** | 0.343 | 0.190 | 66.1\% |  | 205 | 0.000 | 18.3\% | 100.0\% |
|  | (0.110) | (-0.333) | (1.295) | (7.775) | (1.166) | (1.334) |  | 0.62\% |  |  |  |  |
| CT_RI | -0.007 | -0.023 | 0.205 | $0.535 * * *$ | -0.252 | -0.024 | 66.9\% |  | 205 | 0.000 | 8.9\% | 91.7\% |
|  | (-0.487) | (-0.132) | (1.307) | (10.262) | (-0.464) | (-0.220) |  | 0.57\% |  |  |  |  |
| TrES_Anlst_25SBM | -0.006 | 0.018 | 0.155 | $0.479 * * *$ | -0.014 | 0.087 | 66.6\% |  | 205 | 0.000 | 5.7\% | 95.5\% |
|  | (-0.578) | (1.576) | (1.189) | (13.773) | (-1.244) | (1.649) |  | 0.50\% |  |  |  |  |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_RI_10Ind | -0.015 | 0.049 | 0.067 | 0.526*** | -0.016 | 0.080 | 65.7\% |  | 205 | 0.000 | 3.2\% | 94.9\% |
|  | (-1.403) | (1.374) | (0.408) | (13.386) | (-0.299) | (0.975) |  | 0.38\% |  |  |  |  |
| WNG_HDZ | 0.000 | -0.067 | -0.026 | 0.496*** | 0.700 | 0.150 | 66.5\% |  | 205 | 0.000 | 3.2\% | 97.5\% |
|  | (0.019) | (-0.811) | (-0.093) | (10.592) | (0.746) | (1.526) |  | 0.36\% |  |  |  |  |
| Carhart_Factor | -0.018 | -1.148 | -0.195 | 0.537*** | 0.790 | 0.359 | 66\% |  | 205 | 0.168 | 8.9\% | 50.3\% |
|  | (-1.172) | (-0.741) | (-0.578) | (10.393) | (0.443) | (0.994) |  | 0.34\% |  |  |  |  |
| 5FF_Factor | -0.020 | 0.457 | -0.125 | 0.454*** | 1.474 | 0.100 | 65.8\% |  | 205 | 0.489 | 10.2\% | 32.5\% |
|  | (-1.324) | (0.583) | (-0.182) | (4.172) | (0.689) | (0.935) |  | 0.32\% |  |  |  |  |
| DKL_RW | -0.034 | 0.099 | 0.026 | $0.567 * * *$ | 0.152 | 0.003 | 65.7\% |  | 205 | 0.000 | 2.5\% | 83.4\% |
|  | (-1.409) | (1.105) | (0.102) | (9.656) | (0.980) | (0.020) |  | 0.30\% |  |  |  |  |
| TrOHE_25SBM | 0.022 | -0.514 | 0.594 | 0.552*** | 0.117 | -0.255 | 65.6\% |  | 205 | 0.002 | 5.1\% | 86.6\% |
|  | (0.530) | (-1.095) | (1.690) | (5.487) | (0.312) | (-0.666) |  | 0.27\% |  |  |  |  |
| TrETSS_Anlst_10Ind | -0.007 | 0.192 | 0.153 | 0.546*** | 0.253 | -0.258 | 66.2\% |  | 205 | 0.076 | 6.4\% | 75.2\% |
|  | (-0.215) | (0.425) | (0.511) | (8.775) | (0.577) | (-0.592) |  | 0.20\% |  |  |  |  |
| TrETSS_EP_10Ind | -0.025 | 0.011 | 0.095 | 0.526*** | -0.399 | 0.063 | 65.9\% |  | 205 | 0.000 | 5.1\% | 96.2\% |
|  | (-1.778) | (0.364) | (0.555) | (10.669) | (-0.890) | (1.088) |  | 0.17\% |  |  |  |  |
| GM_RW | -0.005 | -0.015 | 0.070 | 0.454*** | 0.53* | 0.029 | 67.2\% |  | 205 | 0.000 | 5.8\% | 84.0\% |
|  | (-0.193) | (-0.322) | (0.427) | (7.980) | (2.126) | (0.194) |  | 0.12\% |  |  |  |  |
| GM_EP | 0.011 | -0.276 | 0.185 | 0.485*** | -3.751 | -0.153 | 65.9\% |  | 205 | 0.000 | 12.1\% | 80.9\% |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CAPM_Factor | (0.275) | (-1.020) | (0.544) | (3.424) | (-0.869) | (-0.400) |  | 0.07\% |  |  |  |  |
|  | -0.166 | 10.076 | 0.046 | 0.611*** | -3.928 | 0.298 | 66.5\% |  | 205 | 0.345 | 15.9\% | 21.0\% |
|  | (-1.163) | (1.052) | (0.104) | (4.136) | (-0.349) | (0.761) |  | 0.02\% |  |  |  |  |
| GLS_EP | -0.010 | -0.053 | -0.105 | 0.596*** | -0.398 | -0.030 | 65.9\% |  | 205 | 0.033 | 9.9\% | 82.2\% |
|  | (-0.205) | (-0.108) | (-0.244) | (8.088) | (-0.492) | (-0.135) |  | 0.00\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.051 | -0.434 | 0.851 | $0.571 * * *$ | 2.171 | 0.302 | 66\% |  | 205 | 0.012 | 2.5\% | 85.4\% |
|  | (0.602) | (-0.767) | (0.843) | (4.177) | (1.027) | (0.846) |  | -0.15\% |  |  |  |  |
| FGHJ_EP | 0.004 | -0.225 | -0.123 | 0.583*** | -0.704 | 0.036 | 65.8\% |  | 205 | 0.016 | 11.3\% | 86.1\% |
|  | (0.076) | (-0.448) | (-0.283) | (8.715) | (-0.747) | (0.160) |  | -0.19\% |  |  |  |  |
| WNG_Anlst | -0.019 | 0.091 | 0.087 | 0.513*** | 0.334 | 0.220 | 65.5\% |  | 205 | 0.000 | 5.1\% | 93.0\% |
|  | (-1.098) | (0.406) | (0.304) | (10.731) | (0.747) | (1.605) |  | -0.20\% |  |  |  |  |
| GM_Anlst | 0.096 | -1.031 | -0.640 | $0.538 * * *$ | -0.554 | -0.103 | 64.2\% |  | 205 | 0.129 | $5.1 \%$ | 52.9\% |
|  | (0.678) | (-0.775) | (-0.562) | (6.846) | (-0.490) | (-0.387) |  | -0.28\% |  |  |  |  |
| FGHJ_RW | -0.010 | -0.070 | -0.156 | 0.558*** | 0.447 | -0.135 | 66.2\% |  | 205 | 0.000 | 2.7\% | 91.1\% |
|  | (-0.524) | (-0.283) | (-0.251) | (8.541) | (1.052) | (-0.492) |  | -0.28\% |  |  |  |  |
| FPM_RI | -0.011 | -0.027 | 0.215 | $0.525 * * *$ | 0.010 | 0.155* | 66\% |  | 205 | 0.000 | 10.8\% | 91.1\% |
|  | (-0.607) | (-0.455) | (1.861) | (12.015) | (0.087) | (2.049) |  | -0.31\% |  |  |  |  |
| DKL_EP | -0.033 | -0.092 | 0.179 | $0.533 * * *$ | -0.364 | 0.166 | 65.5\% |  | 205 | 0.000 | 15.3\% | 78.3\% |
|  | (-1.276) | (-0.509) | (1.423) | (9.471) | (-0.393) | (0.955) |  | -0.35\% |  |  |  |  |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | -0.025 | -0.421 | 0.194 | $0.563 * * *$ | -1.804 | 0.454 | 65.2\% |  | 205 | 0.033 | 6.4\% | $35.0 \%$ |
|  | (-0.885) | (-0.636) | (0.865) | (8.826) | (-0.448) | (0.681) |  | -0.36\% |  |  |  |  |
| GLS_RW | -0.151 | 0.220 | 0.157 | 0.506*** | 0.864 | -0.074 | 64.9\% |  | 205 | 0.001 | 1.9\% | 83.4\% |
|  | (-0.793) | (0.990) | (0.320) | (9.821) | (1.276) | (-0.416) |  | -0.48\% |  |  |  |  |
| GG_RI | -0.009 | 0.196 | 0.353 | 0.552*** | -0.137 | -0.171 | 66.2\% |  | 205 | 0.003 | 6.2\% | $71.9 \%$ |
|  | (-0.319) | (0.743) | (1.168) | (8.910) | (-0.186) | (-0.586) |  | -0.57\% |  |  |  |  |
| FPM_EP | -0.002 | 0.003 | 0.067 | $0.511^{* * *}$ | 0.451 | -0.039 | 65.2\% |  | 205 | 0.000 | 10.2\% | 85.4\% |
|  | (-0.084) | (0.093) | (0.443) | (11.155) | (0.938) | (-0.364) |  | -0.65\% |  |  |  |  |
| WNG_EP | -0.004 | -0.009 | 0.222* | 0.48*** | -0.023 | 0.113 | 65.1\% |  | 205 | 0.000 | $3.2 \%$ | 95.5\% |
|  | (-0.449) | (-0.901) | (2.296) | (13.547) | (-0.951) | (1.504) |  | -0.66\% |  |  |  |  |
| GLS_Anlst | -0.075 | 0.547 | 0.546* | 0.541*** | -0.537 | 0.097 | 65.5\% |  | 205 | 0.217 | 8.3\% | 45.2\% |
|  | (-1.668) | (1.494) | (2.069) | (8.518) | (-0.359) | (0.837) |  | -0.67\% |  |  |  |  |
| TrES_RW_25SBM | -0.030 | 0.045 | 0.215 | 0.533*** | 0.002 | 0.143 | 64.4\% |  | 205 | 0.000 | 5.7\% | 92.4\% |
|  | (-1.868) | (0.852) | (1.046) | (10.728) | (0.044) | (0.833) |  | -0.68\% |  |  |  |  |
| 3FF_Factor | -0.019 | -0.283 | 0.321 | 0.589*** | 3.932 | 0.248 | 65.7\% |  | 205 | 0.004 | 10.2\% | 24.8\% |
|  | (-0.966) | (-0.645) | (1.230) | (6.319) | (1.473) | (1.093) |  | -0.71\% |  |  |  |  |
| KMY_EP | -0.044 | 0.036 | 0.210 | 0.534*** | 0.035 | 0.164 | 65.1\% |  | 205 | 0.000 | $13.4 \%$ | 73.2\% |
|  | (-2.252) | (0.485) | (1.671) | (10.609) | (0.055) | (0.956) |  | -0.73\% |  |  |  |  |
| HL_EP | -0.025 | -0.113 | 0.199 | 0.539*** | -0.308 | 0.159 | 65\% |  | 205 | 0.000 | 14.0\% | 81.5\% |

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Table 86 : Capturing Subsequent Return: Low Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_RI | (-0.902) | (-0.641) | (1.395) | (9.166) | (-0.354) | (0.948) |  | -0.77\% |  |  |  |  |
|  | -0.004 | 0.024 | 0.040 | 0.453*** | -0.422 | 0.063 | 65.2\% |  | 205 | 0.000 | 3.8\% | 98.1\% |
|  | (-0.277) | (0.713) | (0.216) | (10.433) | (-0.737) | (0.699) |  | -0.83\% |  |  |  |  |
| CT_RW | -0.047 | -0.046 | 0.553 | $0.587 * * *$ | -1.098 | 0.145 | 65.8\% |  | 205 | 0.001 | 6.3\% | 85.4\% |
|  | (-1.402) | (-0.146) | (1.519) | (6.072) | (-0.509) | (0.797) |  | -0.93\% |  |  |  |  |
| FGHJ_Anlst | 0.081 | -0.467 | -0.335 | 0.336 | 3.794 | -0.225 | 65.2\% |  | 205 | 0.112 | 7.6\% | 47.1\% |
|  | (0.646) | (-0.508) | (-0.438) | (1.691) | (0.936) | (-0.443) |  | -0.97\% |  |  |  |  |
| TrETSS_EP_25SBM | -0.006 | -0.004 | 0.21* | $0.479 * * *$ | -0.010 | 0.066 | 65\% |  | 205 | 0.000 | 5.1\% | 96.8\% |
|  | (-0.406) | (-0.436) | (2.096) | (14.193) | (-0.771) | (1.261) |  | -1.01\% |  |  |  |  |
| GG_EP | -0.035 | $0.064$ | $-0.309$ | 0.58*** | -1.279 | -0.030 | 65.1\% |  | 205 | 0.000 | 10.3\% | 77.4\% |
|  | (-1.914) | (0.255) | (-0.362) | (9.492) | (-0.586) | (-0.153) |  | -1.10\% |  |  |  |  |
| MPEG_EP | 0.252 | -3.568 | 4.451 | 0.135 | -5.194 | 1.737 | 64.8\% |  | 205 | 0.336 | 8.9\% | 83.4\% |
|  | (0.681) | (-0.753) | (0.834) | (0.244) | (-0.773) | (0.749) |  | -1.36\% |  |  |  |  |
| PEG_EP | -0.034 | -0.013 | 0.370 | $0.575 * * *$ | 0.069 | 0.164 | 65\% |  | 205 | 0.000 | 13.8\% | 88.2\% |
|  | (-2.281) | (-0.232) | (1.865) | (9.230) | (0.082) | (1.182) |  | -1.58\% |  |  |  |  |

For the lowest quartile of firms in terms of ratio of target price over market price, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t -statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents
how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_Anlst | 0.027* | $0.995 * * *$ | 0.387* | $0.412 * * *$ | 0.182 | -0.051 | 63.5\% | 9.53\% | 205 | 0.974 | 61.8\% | 38.2\% |
|  | (2.464) | (7.080) | (2.222) | (12.505) | (0.920) | (-0.477) |  |  |  |  |  |  |
| BP_HDZ | 0.023 | 0.952*** | 0.288 | 0.41 *** | 0.321 | -0.066 | 63.2\% | 8.95\% | 205 | 0.724 | 61.3\% | 32.4\% |
|  | (1.901) | (6.951) | (1.765) | (12.954) | (1.633) | (-0.690) |  |  |  |  |  |  |
| Naive | 0.035** | $0.145^{* * *}$ | 0.328** | 0.406*** | 0.038 | -0.080 | 63.7\% | 8.86\% | 205 | 0.000 | 59.5\% | 90.8\% |
|  | (2.829) | (4.683) | (2.760) | (14.159) | (0.888) | (-0.862) |  |  |  |  |  |  |
| TPDPS_Anlst | 0.034** | $0.138^{* * *}$ | 0.375** | 0.407*** | 0.024 | -0.087 | 63.5\% | 8.79\% | 205 | 0.000 | 59.0\% | 90.2\% |
|  | (2.731) | (4.380) |  | (13.942) | (0.501) | (-0.902) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.033* | $0.136 * * *$ | 0.231* | 0.41 *** | 0.040 | -0.031 | 63.4\% | 8.37\% | 205 | 0.000 | 61.8\% | 92.5\% |
|  | (2.226) | (3.808) | (2.183) | (13.817) | (0.815) | (-0.336) |  |  |  |  |  |  |
| BP_RW | $0.048 * * *$ | $0.559 * * *$ | 0.104 | $0.398 * * *$ | 0.775 | -0.071 | 60.6\% | 7.37\% | 205 | 0.000 | 45.7\% | 41.6\% |
|  | (4.175) | (5.514) | (0.603) | (11.948) | (1.084) | (-0.685) |  |  |  |  |  |  |
| BP_EP | 0.041*** | 0.5*** | 0.182 | 0.403*** | 0.324 | -0.048 | 61\% | 6.91\% | 205 | 0.000 | 48.6\% | 38.7\% |
|  | (3.653) | (5.000) | (1.167) | (12.711) | (1.596) | (-0.516) |  |  |  |  |  |  |
| BP_RI | 0.041*** | 0.53*** | 0.231 | 0.398*** | 0.375* | 0.003 | 60.8\% | 6.74\% | 205 | 0.000 | 48.6\% | 38.2\% |
|  | (3.857) | (5.775) | (1.405) | (12.728) | (2.099) | (0.037) |  |  |  |  |  |  |
| TPDPS_RI | 0.047*** | 0.075*** | 0.140 | 0.381*** | 0.051 | 0.004 | 61.8\% | 6.41\% | 205 | 0.000 | 50.3\% | 96.0\% |
|  | (4.396) | (3.632) | (1.220) | (13.429) | (1.276) | (0.052) |  |  |  |  |  |  |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_EP | 0.048*** | 0.072*** | 0.213* | 0.38*** | 0.046 | -0.058 | 61.4\% | 5.99\% | 205 | 0.000 | 49.7\% | 94.2\% |
|  | (4.489) | (3.587) | (2.133) | (13.106) | (1.186) | (-0.620) |  |  |  |  |  |  |
| TPDPS_RW | 0.055*** | 0.09*** | 0.192 | 0.364*** | 0.025 | 0.064 | 59.2\% | 5.68\% | 205 | 0.000 | 43.9\% | 95.4\% |
|  | (3.374) | (3.353) | (1.687) | (10.366) | (0.445) | (0.903) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.021 | 0.885*** | 0.354** | 0.37*** | 1.114* | 0.007 | 59\% | 5.44\% | 205 | 0.480 | 34.7\% | 37.0\% |
|  | (-1.108) | (5.444) | (2.775) | (12.614) | (2.038) | (0.072) |  |  |  |  |  |  |
| PE_Anlst | 0.024* | 0.883*** | 0.65*** | 0.368*** | 0.353 | -0.148 | 59.9\% | 4.99\% | 205 | 0.400 | 45.7\% | 27.2\% |
|  | (2.046) | (6.338) | (3.796) | (11.762) | (0.652) | (-1.242) |  |  |  |  |  |  |
| GM_Anlst | 0.007 | 0.692*** | 0.422* | 0.402*** | 0.212 | -0.030 | 58\% | 4.93\% | 205 | 0.011 | 30.6\% | 35.8\% |
|  | (0.443) | (5.781) | (2.131) | (12.426) | (0.422) | (-0.297) |  |  |  |  |  |  |
| GLS_Anlst | -0.004 | 0.793*** | 0.394** | $0.366^{* * *}$ | 0.968 | 0.008 | 58.8\% | 4.91\% | 205 | 0.142 | 33.5\% | 37.6\% |
|  | (-0.249) | (5.656) |  | (12.611) | (1.934) | (0.077) |  |  |  |  |  |  |
| WNG_EP | 0.068*** | 0.004 | -0.066 | 0.35*** | 0.002 | -0.079 | 55.7\% | 4.82\% | 205 | 0.000 | 6.4\% | 97.1\% |
|  | (7.443) | (0.355) | (-0.510) | (12.014) | (0.197) | (-0.776) |  |  |  |  |  |  |
| MPEG_Anlst | 0.031* | 0.371 | 0.110 | 0.396*** | 1.331 | -0.034 | 57.9\% | 4.73\% | 205 | 0.001 | 31.8\% | 36.4\% |
|  | (2.024) | (1.920) | (0.498) | (12.698) | (0.964) | $(-0.367)$ |  |  |  |  |  |  |
| DKL_Anlst | -0.017 | 0.949*** | 0.571*** | 0.374*** | 0.172 | -0.075 | 58.7\% | 4.51\% | 205 | 0.726 | 34.7\% | 32.9\% |
|  | (-1.049) | (6.474) | (3.258) | (12.130) | (0.302) | $(-0.741)$ |  |  |  |  |  |  |
| FGHJ_HDZ | 0.012 | 0.621*** | 0.058 | 0.386*** | 1.431* | -0.105 | 57.1\% | 4.17\% | 205 | 0.004 | 28.3\% | 55.5\% |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_Anlst | (0.775) | (4.749) | (0.556) | (12.626) | (2.171) | (-1.224) |  |  |  |  |  |  |
|  | -0.003 | $0.782 * * *$ | 0.501* | $0.384 * * *$ | 0.179 | -0.026 | 58.1\% | 4.10\% | 205 | 0.082 | 35.3\% | 30.6\% |
|  | (-0.189) | (6.290) | (2.570) | (12.762) | (0.370) | (-0.267) |  |  |  |  |  |  |
| FPM_Anlst | -0.025 | 1.002*** | 0.185 | $0.373 * * *$ | -0.197 | -0.012 | 57.3\% | 4.08\% | 205 | 0.996 | 31.2\% | 23.7\% |
|  | (-1.020) | (3.633) | (0.949) | (11.728) | (-0.502) | (-0.120) |  |  |  |  |  |  |
| GM_EP | 0.044** | -0.192 | 0.088 | 0.381 *** | -7.286 | 0.043 | 56.5\% | 3.98\% | 205 | 0.000 | 30.2\% | 74.4\% |
|  | (3.000) | (-0.878) | (0.590) | (13.304) | (-0.747) | (0.363) |  |  |  |  |  |  |
| PEG_Anlst | 0.047*** | 0.323** | -0.012 | 0.401*** | 0.384 | 0.012 | 56.5\% | 3.96\% | 205 | 0.000 | 13.3\% | 51.4\% |
|  | (3.317) | (2.967) | (-0.048) | (12.497) | (0.823) | (0.133) |  |  |  |  |  |  |
| GLS_HDZ | 0.018 | 0.584*** | 0.053 | 0.382*** | 1.963*** | -0.068 | 57\% | 3.69\% | 205 | 0.001 | 28.3\% | 53.2\% |
|  | (1.268) | (4.936) | (0.508) | (12.570) | (3.528) | (-0.759) |  |  |  |  |  |  |
| CT_Anlst | -0.005 | 0.866*** | $0.602^{* *}$ | $0.372 * * *$ | 0.348 | $-0.088$ | 58.1\% | 3.52\% | 205 | 0.356 | 33.5\% | 37.0\% |
|  | (-0.313) | (5.976) | (3.085) | (12.192) | (0.598) | (-0.698) |  |  |  |  |  |  |
| MPEG_EP | 0.027 | 0.021 | 0.212 | 0.396*** | -14.189 | 0.159 | 56.4\% | 3.48\% | 205 | 0.000 | 31.0\% | 77.2\% |
|  | (1.510) | (0.089) | (1.075) | (10.937) | (-0.794) | (0.751) |  |  |  |  |  |  |
| KMY_EP | 0.021 | 0.265** | 0.107 | 0.363*** | 0.156 | 0.026 | $56.4 \%$ | 3.29\% | 205 | 0.000 | $34.1 \%$ | 59.5\% |
|  | (1.574) | (2.600) | (0.701) | (12.917) | (0.737) | (0.243) |  |  |  |  |  |  |
| HL_EP | 0.023 | 0.246*** | 0.081 | $0.366 * * *$ | 0.155 | -0.008 | 56.1\% | 3.14\% | 205 | 0.000 | 30.6\% | 67.6\% |
|  | (1.751) | (3.199) | (0.536) | (13.498) | (0.779) | (-0.098) |  |  |  |  |  |  |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_HDZ | 0.018 | 0.577*** | 0.121 | $0.396 * * *$ | 1.239** | -0.099 | 55.7\% | 3.01\% | 205 | 0.000 | 32.9\% | 55.5\% |
|  | (1.418) | (4.906) | (0.873) | (12.605) | (2.688) | (-0.981) |  |  |  |  |  |  |
| WNG_RI | 0.071*** | 0.030 | 0.022 | 0.347*** | -0.027 | -0.076 | 54\% | 2.97\% | 205 | 0.000 | 5.8\% | 97.7\% |
|  | (6.731) | (0.719) | (0.163) | (12.468) | (-0.389) | (-0.789) |  |  |  |  |  |  |
| GG_Anlst | 0.033 | 0.089 | 1.550 | $0.362 * * *$ | -1.245 | -0.323 | 55.8\% | 2.93\% | 205 | 0.000 | 23.7\% | 65.9\% |
|  | (1.068) | (0.638) | (0.982) | (10.088) | (-0.780) | $(-0.831)$ |  |  |  |  |  |  |
| GG_RW | 0.021 | 0.6** | 0.114 | 0.366*** | $2.828 * * *$ | -0.162 | 55.7\% | 2.89\% | 205 | 0.056 | 37.3\% | 57.1\% |
|  | (1.267) | (2.889) | (0.517) | (10.272) | (3.229) | (-1.499) |  |  |  |  |  |  |
| GG_EP | 0.024 | 1.389 | 0.093 | $0.381 * * *$ | -1.402 | -0.251 | 56.2\% | 2.82\% | 205 | 0.884 | 29.6\% | 63.0\% |
|  | (0.663) | (0.522) | (0.512) | (11.287) | (-0.707) | (-1.324) |  |  |  |  |  |  |
| 3FF_Factor | 0.09*** | -0.795 | -0.108 | $0.372 * * *$ | -1.989 | -0.063 | 53.9\% | 2.81\% | 205 | 0.000 | 5.2\% | 30.6\% |
|  | (6.839) | (-2.309) | (-0.577) | (11.782) | (-0.509) | (-0.478) |  |  |  |  |  |  |
| KMY_HDZ | 0.025* | $0.534 * * *$ | 0.119 | $0.387 * * *$ | 1.303*** | -0.070 | 55.8\% | 2.77\% | 205 | 0.000 | 31.8\% | 56.1\% |
|  | (2.144) | (5.377) | (0.739) | (12.613) | (3.380) | (-0.796) |  |  |  |  |  |  |
| DKL_EP | 0.028 | 0.253*** | 0.794 | 0.35*** | 0.143 | -0.084 | 56\% | 2.75\% | 205 | 0.000 | 28.9\% | 64.7\% |
|  | (1.739) | (3.349) | (0.858) | (8.194) | (0.610) | (-0.905) |  |  |  |  |  |  |
| PE_HDZ | 0.054*** | $0.411^{* * *}$ | 0.267 | 0.389*** | 1.216* | -0.158 | 57.1\% | 2.72\% | 205 | 0.000 | $34.1 \%$ | 48.6\% |
|  | (4.790) | (4.381) | (1.402) | (12.921) | (2.405) | (-1.761) |  |  |  |  |  |  |
| HL_HDZ | 0.022 | $0.537 * * *$ | 0.072 | 0.395*** | 0.804** | -0.123 | 55.4\% | 2.71\% | 205 | 0.000 | 30.6\% | 61.3\% |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_HDZ | (1.726) | (4.448) | (0.536) | (12.620) | (2.601) | (-1.010) |  |  |  |  |  |  |
|  | 0.025 | 0.682*** | 0.042 | 0.37*** | 2.576*** | -0.150 | 55.9\% | 2.65\% | 205 | 0.114 | 30.1\% | 49.7\% |
|  | (1.592) | (3.403) | (0.221) | (10.817) | (4.417) | (-1.405) |  |  |  |  |  |  |
| DKL_RW | 0.068*** | 0.028 | -0.058 | $0.385 * * *$ | 0.123 |  | 54.9\% | 2.62\% | 205 | 0.000 | 18.5\% | 79.8\% |
|  | (4.970) | (0.651) | (-0.477) | (11.771) | (0.824) | (0.732) |  |  |  |  |  |  |
| CT_EP | 0.06*** | 0.067 | 0.108 | $0.383 * * *$ |  |  | 55\% | 2.59\% | 205 | 0.000 | 19.7\% | 79.8\% |
|  |  |  | (0.747) | $(13.892)$ | (1.593) | $(-0.853)$ |  |  |  |  |  |  |
| GM_RW | 0.031 | 0.135* | -0.135 | 0.368*** | 0.263 | -0.105 | 55.4\% | 2.54\% | 205 | 0.000 | 23.4\% | 88.0\% |
|  | (1.467) | (2.176) | (-0.834) | (7.830) | (0.589) | (-0.748) |  |  |  |  |  |  |
| HL_RW | 0.081*** | -0.026 | -0.013 | 0.379*** | 0.112 | 0.147 | 54.4\% | 2.54\% | 205 | 0.000 | 16.8\% | 85.0\% |
|  | (5.688) | (-0.616) | (-0.097) | (10.371) | (0.865) | (0.902) |  |  |  |  |  |  |
| KMY_RW | 0.077*** | 0.015 | 0.009 | 0.378*** | 0.161 | 0.131 | 54.5\% | 2.54\% | 205 | 0.000 | 19.1\% | 78.6\% |
|  | (5.366) | (0.317) | (0.067) | (10.407) | (1.149) | (0.796) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.082*** | -0.011 | 0.094 | 0.391*** | -0.058 | -0.172 | 53.6\% | 2.41\% | 205 | 0.000 | 11.0\% | 82.1\% |
|  | (7.808) | (-0.152) | (0.374) | (13.503) | (-0.684) | (-1.539) |  |  |  |  |  |  |
| PE_RW | -0.001 | 0.438 | 0.361 | $0.425 * * *$ | -0.489 | -0.316 | 55.3\% | 2.38\% | 205 | 0.256 | 18.5\% | 85.0\% |
|  | (-0.008) | (0.890) | (1.248) | (9.036) | (-0.990) | (-1.073) |  |  |  |  |  |  |
| PEG_HDZ | 0.06*** | 0.174 | 0.274 | 0.382*** | 0.682 | -0.007 | 55.9\% | 2.37\% | 205 | 0.000 | 23.1\% | 61.3\% |
|  | (3.987) | (1.489) | (0.846) | (11.806) | (1.641) | (-0.077) |  |  |  |  |  |  |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_RW | 0.126* | 0.004 | -0.149 | 0.366*** | 0.107 | 0.119 | 54.7\% | 2.34\% | 205 | 0.000 | 12.1\% | 81.5\% |
|  | (2.293) | (0.048) | (-1.337) | (10.043) | (0.394) | (0.645) |  |  |  |  |  |  |
| PEG_EP | 0.054*** | 0.041 | 0.207 | 0.381*** | 0.543* | -0.055 | $56.1 \%$ | 2.31\% | 205 | 0.000 | 28.0\% | 92.4\% |
|  | (3.610) | (0.552) | (0.800) | (11.429) | (2.153) | (-0.573) |  |  |  |  |  |  |
| WNG_RW | 0.07*** | 0.000 | 0.013 | 0.374*** | -0.015 | -0.023 | 54.8\% | 2.29\% | 205 | 0.000 | 4.6\% | 98.8\% |
|  | (5.240) | (-1.166) | (0.104) | (13.403) | (-0.815) | $(-0.264)$ |  |  |  |  |  |  |
| GLS_EP | 0.041*** | $0.327^{* * *}$ | 0.064 | 0.374*** | -0.043 | -0.003 | 56.9\% | 2.25\% | 205 | 0.000 | 34.1\% | 68.2\% |
|  | (3.105) | (3.491) | (0.474) | (11.957) | (-0.009) | (-0.027) |  |  |  |  |  |  |
| KMY_Anlst | 0.001 | $0.348^{* * *}$ | 0.588* | 0.379*** | -0.087 | -0.036 | 55.6\% | 2.20\% | 205 | 0.000 | 24.9\% | 49.7\% |
|  | (0.061) | (4.558) | (2.161) | (11.377) | (-0.247) | (-0.357) |  |  |  |  |  |  |
| 5FF_Factor | 0.089*** | 1.528 | 1.016 | 0.586* | -10.316 | -1.959 | 54.6\% | 2.11\% | 205 | 0.830 | 3.5\% | 26.6\% |
|  | (6.468) | (0.623) | (0.730) |  | (-0.973) | (-0.825) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.077*** | -0.077 | 0.060 | 0.417*** | 0.048 | 0.037 | 52.8\% | 2.05\% | 205 | 0.000 | 4.0\% | 86.1\% |
|  | (3.113) | (-1.022) | (0.334) | (8.923) | (0.689) | (0.265) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.065*** | -0.043 | -0.064 | 0.39*** | 0.016 | -0.033 | 54.6\% | 2.04\% | 205 | 0.000 | 12.1\% | 95.4\% |
|  | (3.907) | $(-0.526)$ | (-0.578) | (11.383) | (0.129) | $(-0.464)$ |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.058* | 51.129 | 0.121 | 0.369*** | -3.946 | -0.069 | 53.5\% | 2.04\% | 205 | 0.432 | 11.0\% | 84.4\% |
|  | (2.088) | (0.803) | (0.623) | (12.685) | (-0.930) | (-0.446) |  |  |  |  |  |  |
| CT_RW | 0.021 | 0.735 | -0.142 | 0.316*** | 4.675 | -0.135 | 54.8\% | 2.00\% | 205 | 0.777 | 26.5\% | 73.5\% |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_RI | (0.486) | (0.785) | (-0.563) | (3.951) | (0.439) | (-0.426) |  |  |  |  |  |  |
|  | 0.074*** | -0.070 | 0.117 | 0.36*** | 1.015 | -0.030 | 52.9\% | 1.98\% | 205 | 0.000 | 2.9\% | 88.4\% |
|  | (6.432) | (-0.911) | (0.904) | (12.712) | (1.188) | (-0.366) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.094** | -0.016 | 0.549 | 0.352*** | 0.446 | 0.423 | 53.4\% | 1.92\% | 205 | 0.000 | 12.1\% | 96.5\% |
|  | (2.939) | (-0.415) | (0.925) | (10.443) | (0.813) | (0.803) |  |  |  |  |  |  |
| FGHJ_EP | 0.044*** | 0.31** | 0.045 | 0.376*** | -4.296 | 0.036 | 56.8\% | 1.84\% | 205 | 0.000 | 31.0\% | 76.6\% |
|  | (3.319) | (2.953) | (0.335) | (12.258) | $(-0.831)$ |  |  |  |  |  |  |  |
| TrES_Anlst_25SBM | 0.066*** | 0.059 | 0.060 | 0.386*** | -0.047 | -0.028 | 53.6\% | 1.83\% | 205 | 0.000 | 5.8\% | 96.5\% |
|  | (6.605) | (1.177) | (0.454) | (9.703) | (-1.388) | (-0.480) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.058*** | 0.009 | -0.158 | 0.374*** | 0.054 | -0.010 | 53.9\% | 1.81\% | 205 | 0.000 | 12.7\% | 97.7\% |
|  | (6.728) | (1.102) | (-1.474) | (13.480) | (0.992) | (-0.110) |  |  |  |  |  |  |
| MPEG_RW | 0.08* | 0.046 | -0.044 | 0.406*** | 0.535* | 0.068 | 54.5\% | 1.77\% | 205 | 0.000 | 22.8\% | 90.4\% |
|  | (2.126) | (0.850) | (-0.277) | (11.111) | (2.318) | (0.721) |  |  |  |  |  |  |
| FPM_EP | 0.054 | 0.084* | 0.192 | 0.296*** | 0.031 | 0.163 | 53.7\% | 1.75\% | 205 | 0.000 | 17.3\% | 85.5\% |
|  | (0.718) | (2.218) | (1.099) | (5.525) | (0.294) | (1.302) |  |  |  |  |  |  |
| GM_RI | 0.039*** | 0.323* | 0.121 | 0.353*** | -4.124 | 0.088 | 55.8\% | 1.65\% | 205 | 0.000 | $33.1 \%$ | 65.7\% |
|  | (3.138) | (2.344) | (0.877) | (7.168) | (-0.759) | (1.100) |  |  |  |  |  |  |
| PE_EP | 0.051*** | 0.493** | -0.067 | 0.391*** | 2.300 | -0.129 | 57\% | 1.63\% | 205 | 0.004 | 29.5\% | 76.3\% |
|  | (4.497) | (2.820) | (-0.289) | (12.209) | (1.517) | (-1.419) |  |  |  |  |  |  |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_HDZ | $0.04 * *$ | 0.295*** | 0.107 | 0.379*** | 1.672* | 0.076 | 55.1\% | 1.62\% | 205 | 0.000 | $32.4 \%$ | 56.1\% |
|  | (2.913) | (3.245) | (0.436) | (10.170) | (2.014) | $(0.509)$ |  |  |  |  |  |  |
| FPM_RI | 0.059 | -0.004 | 0.195 | $0.327^{* * *}$ | -0.754 | -0.050 | 53.4\% | 1.61\% | 205 | 0.000 | 15.0\% | 82.1\% |
|  | (1.726) | (-0.018) | (1.044) | (12.056) | (-0.688) | (-0.393) |  |  |  |  |  |  |
| FGHJ_RW | 0.06*** | 0.191* | 0.081 | 0.401*** | -0.415 | -0.120 | 53.8\% | 1.56\% | 205 | 0.000 | 19.0\% | 80.4\% |
|  | (5.191) | (2.469) | (0.633) | $(10.496)$ | (-1.257) | (-0.793) |  |  |  |  |  |  |
| WNG_HDZ | $0.078 * * *$ | $0.012$ | $-0.025$ | $0.364 * * *$ |  |  | 55.3\% | 1.53\% | 205 | 0.000 | 6.4\% | 98.3\% |
|  | (7.468) | (0.481) | (-0.231) | (11.809) | $(0.091)$ | (0.594) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.058*** | -0.011 | -0.110 | $0.389^{* * *}$ | -0.104 | 0.006 | 53.7\% | 1.51\% | 205 | 0.000 | 12.7\% | 95.4\% |
|  |  |  |  |  | (-1.383) |  |  |  |  |  |  |  |
| FPM_HDZ | 0.029 | 0.478* | 0.099 | $0.382 * * *$ | 0.902* | -0.184 | 54.9\% | 1.44\% | 205 | 0.006 | 28.3\% | 41.6\% |
|  | (1.569) | (2.534) | (0.715) | (12.155) | (2.130) | (-1.045) |  |  |  |  |  |  |
| GLS_RI | $0.053 * * *$ | 0.26** | 0.154 | $0.387^{* * *}$ | 12.522 | -0.037 | 55.2\% | 1.28\% | 205 | 0.000 | 32.4\% | 71.8\% |
|  | (4.333) | (2.817) | (1.167) | (11.858) | (0.560) | (-0.515) |  |  |  |  |  |  |
| KMY_RI | 0.036* | 0.36** | 0.126 | $0.385 * * *$ | -0.343 | -0.072 | 54\% | 1.12\% | 205 | 0.000 | 24.9\% | 69.4\% |
|  | (2.432) | (3.023) | (0.863) | (9.953) | (-0.485) | (-0.579) |  |  |  |  |  |  |
| MPEG_RI | 0.045*** | $0.163^{* * *}$ | 0.097 | 0.368*** | -0.404 | 0.042 | 54.8\% | 1.11\% | 205 | 0.000 | 29.3\% | 72.5\% |
|  | (3.567) | (3.494) | (0.627) | (12.904) | (-0.623) | (0.540) |  |  |  |  |  |  |
| FGHJ_RI | 0.052*** | 0.269* | 0.136 | 0.397*** | -2.601 | -0.023 | 54.8\% | 1.06\% | 205 | 0.000 | 30.0\% | 72.4\% |

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Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RW | (3.840) | (2.352) | (1.020) | (11.434) | (-0.760) | (-0.298) |  |  |  |  |  |  |
|  | -0.070 | 0.170 | 0.409 | 0.434*** | 0.173 | -0.168 | 53\% | 1.06\% | 205 | 0.009 | 20.2\% | 100.0\% |
|  | (-0.251) | (0.541) | (1.049) | (6.340) | (0.591) | (-0.416) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.05* | 0.022* | -0.135 | 0.39*** | -0.001 | 0.033 | 53\% | 1.00\% | 205 | 0.000 | 7.5\% | 97.7\% |
|  | (2.180) | (2.276) | (-0.339) | (7.647) | (-0.019) | (0.306) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.067*** | -0.013 | -0.290 | $0.335 * * *$ | -0.010 | -0.319 | 53.5\% | 0.96\% | 205 | 0.000 | 8.7\% | 96.5\% |
|  | (3.875) | (-0.444) | (-0.809) | (9.369) | (-0.414) | (-0.878) |  |  |  |  |  |  |
| HL_RI | 0.05*** | 0.24* | 0.064 | 0.346*** | -0.150 | 0.064 | 53.6\% | 0.94\% | 205 | 0.000 | 19.7\% | 80.9\% |
|  | (3.155) | (2.299) | (0.485) | (11.539) | (-0.242) | (0.853) |  |  |  |  |  |  |
| CAPM_Factor | 0.471 | -24.995 | 0.237 | $0.466 * * *$ | -43.054 | -0.627 | 54.4\% | 0.94\% | 205 | 0.255 | 7.5\% | 22.0\% |
|  | (1.396) | (-1.097) | (0.273) | (4.704) | (-0.574) | (-1.126) |  |  |  |  |  |  |
| GM_HDZ | 0.057*** | 0.289* | 0.131 | $0.361 * * *$ | -3.126 | 0.083 | 54.4\% | 0.91\% | 205 | 0.000 | 26.6\% | 56.6\% |
|  | (4.892) | (1.976) | (0.726) | (7.205) | (-0.576) | (0.848) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.094* | -0.069 | 1.213 | 0.499*** | 1.751 | -0.262 | 53.2\% | 0.87\% | 205 | 0.000 | 13.3\% | 93.1\% |
|  | (2.126) | (-0.841) | (0.769) | (3.737) | (0.810) | (-0.615) |  |  |  |  |  |  |
| DKL_RI | 0.043** | 0.253* | 0.297 | $0.369 * * *$ | -0.216 | -0.101 | 53.4\% | 0.87\% | 205 | 0.000 | 17.3\% | 80.3\% |
|  | (2.656) | (2.383) | (1.128) | (10.934) | (-0.348) | (-0.716) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.07*** | -0.002 | 0.058 | 0.398*** | 0.061 | -0.014 | 53.4\% | 0.77\% | 205 | 0.000 | 11.0\% | 85.0\% |
|  | (4.397) | (-0.032) | (0.440) | (9.299) | (0.595) | (-0.086) |  |  |  |  |  |  |

Continued in next page...

Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_25SBM | 0.08*** | -0.028 | -0.163 | 0.401*** | -0.013 | -0.005 | 53.8\% | 0.75\% | 205 | 0.000 | 15.6\% | 90.8\% |
|  | (6.420) | (-0.618) | (-0.908) | (13.117) | (-0.232) | (-0.065) |  |  |  |  |  |  |
| PE_RI | 0.057*** | 0.338* | 0.199 | $0.384^{* * *}$ | 0.052 | 0.033 | 55.6\% | 0.73\% | 205 | 0.000 | 30.6\% | 74.0\% |
|  | (4.948) | (1.965) | (1.070) | (12.527) | (0.041) | (0.425) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.081*** | -0.011 | 0.011 | 0.35*** | -0.001 | 0.009 | 54\% | 0.71\% | 205 | 0.000 | 9.2\% | 98.8\% |
|  | (6.330) | (-1.675) | (0.098) | (11.399) | (-0.111) | (0.147) |  |  |  |  |  |  |
| PEG_RI | 0.059*** | 0.020 | 0.133 | 0.381 *** | 0.587* | -0.086 | 54.7\% | 0.67\% | 205 | 0.000 | 16.2\% | 98.6\% |
|  | (3.245) | (0.326) | (0.650) | (11.506) | (2.267) | (-0.779) |  |  |  |  |  |  |
| FPM_RW | 0.414 | 0.033 | -0.048 | $0.334 * * *$ | 0.123 | 0.031 | 53.6\% | 0.65\% | 205 | 0.000 | 15.0\% | 78.6\% |
|  |  | (0.544) | (-0.351) | (12.029) |  |  |  |  |  |  |  |  |
| TrETSS_RW_10Ind | $0.065 * * *$ | 0.006 | -0.008 | 0.38*** | 0.757 | -0.096 | 53.9\% | 0.64\% | 205 | 0.000 | 11.0\% | 89.0\% |
|  | (4.372) | (0.174) | (-0.038) | (9.416) | (1.046) | (-0.938) |  |  |  |  |  |  |
| GG_RI | $0.053 * * *$ | $0.343 * *$ | -0.002 | $0.398 * * *$ | 0.514 | -0.157 | 54.1\% | 0.62\% | 205 | 0.000 | 25.3\% | 66.7\% |
|  | (4.664) | (2.934) | (-0.009) |  | (0.534) | (-1.430) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.062* | 0.009 | -0.089 | 0.394*** | -0.034 | -0.074 | 52\% | 0.61\% | 205 | 0.000 | 11.6\% | 95.4\% |
|  | (1.973) | (0.239) | (-0.549) | (10.035) | (-0.576) | (-0.538) |  |  |  |  |  |  |
| MPEG_HDZ | $0.069 * * *$ | 0.083 | -0.040 | $0.387 * * *$ | -0.071 | 0.040 | 54.9\% | 0.58\% | 205 | 0.000 | 27.7\% | 64.2\% |
|  | (4.379) | (0.720) | (-0.203) | (12.146) | (-0.102) | (0.435) |  |  |  |  |  |  |
| TrOHE_10Ind | 0.069** | 0.038 | 0.110 | 0.374*** | 1.308 | -0.175 | 52.7\% | 0.56\% | 205 | 0.000 | 9.2\% | 46.8\% |

[^50]Table 87 : Capturing Subsequent Return: High Target Price over Market Price Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_10Ind | (2.985) | (0.297) | (0.422) | (10.695) | (1.071) | (-0.816) |  |  |  |  |  |  |
|  | $0.065 * * *$ | 0.019 | -0.099 | $0.384^{* * *}$ | -0.077 | -0.025 | 53.8\% | 0.49\% | 205 | 0.000 | 8.7\% | 94.2\% |
|  | (3.930) | (0.554) | (-0.605) | (9.549) | (-1.457) | (-0.277) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.05* | 0.034 | -0.144 | $0.34 * * *$ | -0.012 | -0.322 | 52.9\% | 0.47\% | 205 | 0.000 | 8.1\% | 96.5\% |
|  | (2.301) | (1.192) | (-0.462) | (6.620) | (-1.341) | (-0.759) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | $0.069^{* * *}$ | 0.036 | 0.144 | $0.377 * * *$ | -0.059 | 0.012 | 53.9\% | 0.33\% | 205 | 0.000 | 9.2\% | 94.2\% |
|  | (6.416) | (1.594) | (0.746) | (12.313) | (-1.078) | (0.094) |  |  |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.084*** | 0.135 | 0.258 | 0.383*** | -0.107 | 0.019 | 52.5\% | 0.20\% | 205 | 0.000 | 5.2\% | 76.9\% |
|  | (5.429) | (1.290) | (0.918) | (11.576) | (-0.563) | (0.113) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.073*** | 1.367 | 0.068 | 0.366*** | -0.758 | -0.020 | 53\% | 0.07\% | 205 | 0.834 | 2.9\% | 85.5\% |
|  | (7.093) | (0.782) | (0.380) | (13.430) | (-0.462) | (-0.234) |  |  |  |  |  |  |
| Carhart_Factor | 0.086*** | -0.140 | 0.199 | 0.386*** | -0.907 | -0.054 | 53.3\% | 0.01\% | 205 | 0.000 | 4.0\% | 45.7\% |
|  | (7.476) | (-0.822) | (1.091) | (11.927) | (-0.574) | (-0.436) |  |  |  |  |  |  |
| WNG_Anlst | 0.081*** | 0.027 | 0.160 | $0.384^{* * *}$ | -0.082 | -0.073 | 52\% | -0.52\% | 205 | 0.000 | 8.1\% | 96.0\% |
|  | (7.422) | (1.344) | (0.932) | (12.354) | (-0.419) | (-0.758) |  |  |  |  |  |  |

For the highest quartile of firms in terms of ratio of target price over market price, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t -statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents
how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 88 : Capturing Subsequent Return: Low Beta Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_HDZ | 0.020 | -0.152 | -0.099 | 0.144 | -0.167 | 0.128 | 63\% |  | 205 | 0.189 | 40.9\% | 13.6\% |
|  | (0.818) | (-0.176) | (-0.243) | (1.868) | (-0.321) | (0.991) |  | 10.47\% |  |  |  |  |
| BP_Anlst | 0.022 | -0.090 | -0.056 | 0.151* | -0.069 | 0.141 | 62.5\% |  | 205 | 0.176 | 38.6\% | 11.4\% |
|  | (0.840) | (-0.114) | (-0.182) | (2.125) | (-0.193) | (1.060) |  | 9.93\% |  |  |  |  |
| TPDPS_HDZ | 0.016 | 0.007 | -0.037 | 0.162** | 0.015 | 0.089 | 62.4\% |  | 205 | 0.000 | $36.4 \%$ | 70.5\% |
|  | (0.696) | (0.075) | (-0.157) | (2.739) | (0.197) | (1.163) |  | 9.63\% |  |  |  |  |
| TPDPS_Anlst | 0.017 | 0.008 | -0.032 | 0.16** | 0.022 | 0.094 | 62.3\% |  | 205 | 0.000 | $36.4 \%$ | 70.5\% |
|  | (0.737) | (0.078) | (-0.137) | (2.699) | (0.292) | (1.224) |  | 9.60\% |  |  |  |  |
| BP_EP | 0.017 | 0.264 | 0.195 | 0.173** | 0.436 | 0.155 | 61.7\% |  | 205 | 0.014 | 36.4\% | 13.6\% |
|  | (0.656) | (0.919) | (0.450) | (2.752) | (0.444) | (0.986) |  | 9.24\% |  |  |  |  |
| BP_RI | 0.020 | 0.278 | 0.224 | 0.172** | 0.428 | 0.148 | 60.7\% |  | 205 | 0.024 | 38.6\% | 9.1\% |
|  | (0.788) | (0.905) | (0.502) | (2.774) | (0.444) | (0.963) |  | 8.69\% |  |  |  |  |
| Naive | 0.018 | 0.010 | -0.012 | 0.163** | 0.023 | 0.095 | 61.4\% |  | 205 | 0.000 | $34.1 \%$ | 68.2\% |
|  | (0.821) | (0.108) | (-0.068) | (2.844) | (0.338) | (1.218) |  | 8.67\% |  |  |  |  |
| TPDPS_RI | -0.015 | -0.042 | -0.887 | 0.112 | -0.323 | -0.098 | 61.2\% |  | 205 | 0.000 | 38.6\% | 72.7\% |
|  | (-0.205) | (-0.196) | (-0.383) | (0.762) | (-0.368) | (-0.218) |  | 8.17\% |  |  |  |  |
| BP_RW | 0.019 | 0.751 | 0.407 | 0.210 | 0.886 | 0.178 | 60.4\% |  | 205 | 0.861 | 34.1\% | 11.4\% |
|  | (0.757) | (0.532) | (0.437) | (1.708) | (0.404) | (0.948) |  | 7.83\% |  |  |  |  |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_EP | -0.021 | -0.071 | -1.115 | 0.083 | -0.418 | -0.144 | 58.8\% |  | 205 | 0.000 | $29.5 \%$ | $77.3 \%$ |
|  | (-0.221) | (-0.254) | (-0.398) | (0.414) | (-0.370) | (-0.239) |  | 7.55\% |  |  |  |  |
| GLS_EP | 0.002 | 0.110 | -0.178 | 0.159* | 0.559 | 0.123 | $57.1 \%$ |  | 205 | 0.002 | $22.7 \%$ | 47.7\% |
|  | (0.029) | (0.402) | (-0.454) | (2.367) | (0.487) | (0.679) |  | 6.37\% |  |  |  |  |
| PE_EP | 0.039 | 0.174 | 0.054 | 0.16** | 1.991 | 0.181 | $56.2 \%$ |  | 205 | 0.001 | $22.7 \%$ | $36.4 \%$ |
|  | (0.788) | (0.785) | (0.148) | (2.768) | (0.527) | (0.623) |  | $5.81 \%$ |  |  |  |  |
| KMY_EP | 0.008 | 0.206 | -0.177 | 0.122* | -0.142 | 0.430 | 56.9\% |  | 205 | 0.027 | 29.5\% | 18.2\% |
|  | (0.170) | (0.597) | (-0.396) | (2.048) | (-0.153) | (0.775) |  | 5.47\% |  |  |  |  |
| TrES_Anlst _10Ind | 0.055 | -0.024 | -0.004 | 0.136* | 0.119 | 0.054 | 52\% |  | 205 | 0.000 | 9.1\% | 70.5\% |
|  | (1.052) | (-0.225) | (-0.021) | (2.526) | (0.601) | (0.421) |  | 5.35\% |  |  |  |  |
| CT_Anlst | -0.043 | 0.710 | 0.138 | 0.159** | 0.120 | 0.069 | 54.5\% |  | 205 | 0.761 | 18.2\% | 11.4\% |
|  | (-0.545) | (0.746) | (0.295) | (2.783) | (0.171) | (0.470) |  | 4.79\% |  |  |  |  |
| TPDPS_RW | 0.012 | -0.016 | -0.167 | 0.151* | -0.033 | 0.062 | 57.1\% |  | 205 | 0.000 | 13.6\% | 70.5\% |
|  | (0.513) | (-0.145) | (-0.506) | (2.309) | (-0.258) | (0.724) |  | 4.63\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.020 | 0.032 | -0.115 | 0.163** | -0.066 | 0.109 | $52.1 \%$ |  | 205 | 0.000 | 6.8\% | 31.8\% |
|  | (0.752) | (0.243) | (-0.622) | (3.035) | (-0.296) | (0.592) |  | $4.31 \%$ |  |  |  |  |
| TrETSS_RW_10Ind | 0.012 | -0.040 | -0.131 | 0.138** | 0.051 | 0.110 | 55.3\% |  | 205 | 0.000 | 2.3\% | 68.2\% |
|  | (0.425) | (-0.318) | (-0.702) | (2.629) | (0.348) | (1.301) |  | 4.23\% |  |  |  |  |
| GLS_RI | 0.035 | 0.000 | -0.075 | 0.140 | -0.068 | 0.105 | 52.7\% |  | 205 | 0.001 | 20.5\% | 43.2\% |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_EP | (0.509) | (0.000) | (-0.352) | (1.914) | (-0.134) | (0.609) |  | 3.49\% |  |  |  |  |
|  | 0.033 | 0.258 | -0.065 | 0.17** | -2.146 | 0.209 | 50.8\% |  | 205 | 0.272 | 20.5\% | 13.6\% |
|  | (0.799) | (0.386) | (-0.162) | (2.834) | (-0.355) | (1.208) |  | 3.29\% |  |  |  |  |
| GG_HDZ | 0.016 | 0.068 | -0.039 | 0.155** | 0.432 | 0.165 | 54.8\% |  | 205 | 0.006 | 27.3\% | 11.4\% |
|  | (0.465) | (0.212) | (-0.182) | (2.708) | (0.347) | (0.934) |  | 3.07\% |  |  |  |  |
| TrOHE_25SBM | 0.021 | 0.103 | -0.148 | 0.144* | 0.017 | 0.125 | 51.4\% |  | 205 | 0.000 | 11.4\% | 25.0\% |
|  | (0.870) | (0.738) | (-0.435) | (2.533) | (0.113) | (1.212) |  | 3.05\% |  |  |  |  |
| CT_RW | 0.027 | -0.115 | -0.069 | 0.147* | -0.114 | 0.118 | 50.6\% |  | 205 | 0.024 | 10.5\% | 34.2\% |
|  | (0.478) | (-0.244) | (-0.160) | (2.367) | (-0.099) | (0.915) |  | 3.02\% |  |  |  |  |
| DKL_Anlst | 0.007 | 0.222 | -0.091 | 0.164** | 0.538 | 0.158 | 53.6\% |  | 205 | 0.258 | 20.5\% | 6.8\% |
|  | (0.088) | (0.328) | (-0.166) | (2.874) | (0.632) | (0.872) |  | 2.96\% |  |  |  |  |
| PE_Anlst | 0.009 | 0.098 | -0.106 | 0.162** | -0.509 | -0.196 | 55.1\% |  | 205 | 0.016 | 29.5\% | 13.6\% |
|  | (0.332) | (0.272) | (-0.291) | (2.759) | (-0.376) | (-0.264) |  | 2.95\% |  |  |  |  |
| GG_RW | 0.032 | -0.148 | -0.103 | 0.151* | -0.297 | 0.171 | 50.1\% |  | 205 | 0.006 | 11.5\% | 76.9\% |
|  | (0.659) | (-0.390) | (-0.407) | (2.275) | (-0.197) | (0.773) |  | 2.91\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.003 | 0.033 | 0.249 | 0.119* | 0.021 | -0.091 | 49.6\% |  | 205 | 0.000 | 11.4\% | 79.5\% |
|  | (0.067) | (0.706) | (0.300) | (2.356) | (0.774) | (-0.265) |  | 2.82\% |  |  |  |  |
| KMY_Anlst | -0.033 | 0.264 | 0.094 | 0.143* | 0.266 | 0.050 | 54.4\% |  | 205 | 0.015 | 15.9\% | 13.6\% |
|  | (-0.494) | (0.914) | (0.313) | (2.536) | (0.601) | (0.401) |  | 2.82\% |  |  |  |  |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_HDZ | 0.015 | 0.110 | -0.026 | 0.151** | 0.453 | 0.162 | 54.3\% |  | 205 | 0.007 | 25.0\% | 18.2\% |
|  | (0.385) | (0.348) | (-0.127) | (2.806) | (0.351) | (0.877) |  | 2.81\% |  |  |  |  |
| DKL_EP | 0.027 | 0.029 | -0.100 | 0.139* | 0.492 | 0.175 | 51.9\% |  | 205 | 0.000 | 18.2\% | 29.5\% |
|  | (0.633) | (0.173) | (-0.426) | (2.529) | (0.701) | (1.063) |  | 2.75\% |  |  |  |  |
| HL_Anlst | -0.004 | 0.301 | 0.046 | 0.16** | 0.652 | 0.133 | 52.5\% |  | 205 | 0.082 | 15.9\% | 4.5\% |
|  | (-0.089) | $(0.766)$ | (0.127) | (2.853) | (0.712) | (0.998) |  | 2.75\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.013 | 0.015 | -0.071 | 0.136** | -0.080 | 0.031 | 48\% |  | 205 | 0.000 | 4.5\% | 75.0\% |
|  | (0.446) | (0.209) | (-0.377) |  | (-0.775) | (0.224) |  | 2.68\% |  |  |  |  |
| TrES_RW_10Ind | 0.043 | 0.042 | -0.012 | 0.131* | 0.039 | 0.184 | 48.8\% |  | 205 | 0.000 | 4.5\% | 63.6\% |
|  | (0.799) | (0.280) | (-0.051) | (2.429) | (0.288) | (1.180) |  | 2.64\% |  |  |  |  |
| PEG_EP | 0.010 | 0.066 | -0.248 | 0.154* | 0.048 | 0.084 | 53.2\% |  | 205 | 0.000 | 16.3\% | 53.5\% |
|  | (0.293) | (0.764) | (-1.105) | (2.531) | (0.094) | (0.562) |  | 2.50\% |  |  |  |  |
| HL_EP | 0.025 | 0.014 | -0.229 | 0.145* | 0.292 | 0.139 | 51.5\% |  | 205 | 0.000 | 11.4\% | $34.1 \%$ |
|  | (0.549) | (0.090) | (-0.700) | (2.519) | (0.487) | (0.911) |  | 2.37\% |  |  |  |  |
| GM_RW | 0.009 | 0.020 | -0.216 | 0.152** | 0.016 | 0.069 | 51.2\% |  | 205 | 0.000 | 11.4\% | 36.4\% |
|  | (0.179) | (0.119) | (-0.774) | (2.695) | (0.040) | (0.603) |  | 2.37\% |  |  |  |  |
| GLS_HDZ | 0.019 | 0.055 | -0.066 | 0.156** | 0.408 | 0.156 | 53.9\% |  | 205 | 0.002 | 20.5\% | 18.2\% |
|  | (0.559) | (0.196) | (-0.327) | (2.848) | (0.387) | (1.009) |  | 2.36\% |  |  |  |  |
| GM_Anlst | 0.030 | -0.031 | 0.346 | 0.107 | 8.616 | -0.349 | 52.2\% |  | 205 | 0.179 | 11.4\% | 4.5\% |

[^51]Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_25SBM | (0.328) | (-0.041) | (0.529) | (0.633) | (0.562) | (-0.306) |  | 2.25\% |  |  |  |  |
|  | 0.018 | 0.021 | 0.010 | 0.146** | -0.002 | 0.150 | 49.4\% |  | 205 | 0.000 | 2.3\% | 50.0\% |
|  | (0.721) | (0.176) | (0.047) | (2.942) | (-0.015) | (1.096) |  | 2.09\% |  |  |  |  |
| PE_HDZ | 0.006 | 0.159 | -0.139 | 0.153** | 0.019 | -0.170 | 53.7\% |  | 205 | 0.000 | 22.7\% | 11.4\% |
|  | (0.215) | (0.928) | (-0.611) | (2.787) | (0.022) | (-0.220) |  | 2.05\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.010 | 0.007 | -0.121 | 0.128** | -0.011 | -0.057 | 50.4\% |  | 205 | 0.000 | 4.5\% | 84.1\% |
|  | (0.362) | (0.149) | (-0.700) | (2.709) | (-0.160) | (-0.213) |  | 1.87\% |  |  |  |  |
| GG_Anlst | -0.014 | 0.127 | -0.011 | $0.15 * *$ | 0.122 | 0.100 | 53.4\% |  | 205 | 0.000 | 9.1\% | 25.0\% |
|  | (-0.219) | (0.679) | (-0.044) | (2.813) | (0.349) | (0.971) |  | 1.87\% |  |  |  |  |
| FPM_Anlst | -0.016 | 0.419 | -0.054 | 0.168** | 2.413 | 0.179 | 50.7\% |  | 205 | 0.488 | 13.6\% | 9.1\% |
|  | (-0.211) | (0.505) | (-0.215) | (2.624) | (0.762) | (1.135) |  | 1.80\% |  |  |  |  |
| CT_HDZ | 0.020 | -0.011 | -0.003 | 0.159** | 0.377 | 0.163 | 54.4\% |  | 205 | 0.061 | 20.5\% | 11.4\% |
|  | (0.394) | (-0.021) | (-0.008) | (2.751) | (0.333) | (1.019) |  | 1.80\% |  |  |  |  |
| FGHJ_EP | 0.031 | -0.046 | -0.094 | 0.162* | 0.726 | 0.125 | 52.2\% |  | 205 | 0.000 | 13.6\% | 43.2\% |
|  | (0.648) | (-0.215) | (-0.436) | (2.515) | (0.626) | (0.745) |  | 1.78\% |  |  |  |  |
| GLS_RW | 0.029 | -0.017 | -0.016 | 0.141* | -0.105 | 0.157 | 48\% |  | 205 | 0.001 | 4.5\% | 40.9\% |
|  | (0.530) | (-0.059) | (-0.051) | (2.367) | (-0.144) | (1.132) |  | 1.74\% |  |  |  |  |
| FGHJ_Anlst | -0.057 | 0.811 | 0.700 | 0.167** | 1.907 | -0.236 | 53.2\% |  | 205 | 0.891 | 15.9\% | 6.8\% |
|  | (-0.468) | (0.591) | (0.430) | (2.683) | (0.524) | (-0.314) |  | 1.67\% |  |  |  |  |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_EP | 0.038 | -0.097 | -0.179 | 0.157* | 0.816 | -0.022 | 50.9\% |  | 205 | 0.002 | 6.8\% | 27.3\% |
|  | (0.778) | (-0.287) | (-0.426) | (2.350) | (0.544) | (-0.053) |  | 1.55\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.021 | -0.021 | -0.016 | 0.138** | 0.018 | 0.041 | 49.3\% |  | 205 | 0.000 | 2.3\% | 90.9\% |
|  | (0.934) | (-0.437) | (-0.068) | (2.990) | (0.334) | (0.442) |  | 1.54\% |  |  |  |  |
| FPM_EP | -0.023 | 0.119 | -0.278 | 0.15** | 0.038 | 0.053 | 51.2\% |  | 205 | 0.000 | 13.6\% | 38.6\% |
|  | (-0.435) | (0.990) | (-0.847) | (2.632) | (0.082) | (0.398) |  | 1.43\% |  |  |  |  |
| GLS_Anlst | -0.099 | 1.441 | 1.751 | 0.181* | 4.321 | -0.345 | 52.4\% |  | 205 | 0.885 | 20.5\% | 6.8\% |
|  | (-0.404) | (0.476) | (0.429) | (2.171) | (0.480) | (-0.417) |  | 1.38\% |  |  |  |  |
| FGHJ_RI | 0.034 | -0.031 | -0.078 | 0.138* | -0.145 | 0.106 | 50\% |  | 205 | 0.000 | 13.6\% | 40.9\% |
|  | (0.537) | (-0.125) | (-0.343) | (1.984) | (-0.262) | (0.686) |  | 1.33\% |  |  |  |  |
| PEG_RW | 0.048 | 0.012 | -0.217 | 0.14* | 0.074 | 0.189 | 48.8\% |  | 205 | 0.000 | 0.0\% | 44.2\% |
|  | (0.575) | (0.095) | (-0.797) | (2.510) | (0.218) | (1.070) |  | 1.32\% |  |  |  |  |
| GM_EP | 0.013 | 0.051 | -0.238 | 0.155** | 0.048 | 0.084 | 51.8\% |  | 205 | 0.000 | 13.6\% | 27.3\% |
|  | (0.360) | (0.392) | (-0.875) | (2.700) | (0.073) | (0.515) |  | 1.27\% |  |  |  |  |
| 3FF_Factor | -0.001 | 0.870 | -0.757 | 0.153** | -6.973 | 0.210 | 53\% |  | 205 | 0.952 | 0.0\% | 13.6\% |
|  | (-0.012) | (0.405) | (-0.438) | (2.738) | (-0.750) | (0.850) |  | 1.22\% |  |  |  |  |
| DKL_HDZ | 0.011 | 0.084 | -0.123 | 0.154** | 0.255 | 0.124 | 53.1\% |  | 205 | 0.000 | 22.7\% | 11.4\% |
|  | (0.430) | (0.433) | (-0.600) | (2.863) | (0.298) | (0.776) |  | 1.18\% |  |  |  |  |
| PE_RW | 0.010 | -0.101 | -0.036 | 0.151* | -0.162 | 0.085 | 50.8\% |  | 205 | 0.004 | 2.3\% | 50.0\% |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_RI | (0.154) | (-0.278) | (-0.122) | (2.171) | (-0.267) | (0.680) |  | 1.17\% |  |  |  |  |
|  | 0.018 | 0.022 | -0.106 | 0.161** | -0.017 | 0.083 | 46.5\% |  | 205 | 0.000 | 13.6\% | 43.2\% |
|  | (0.514) | (0.233) | (-0.515) | (2.695) | (-0.109) | (0.788) |  | 1.15\% |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.029 | 0.081 | 0.087 | 0.132* | -0.018 | 0.180 | 48.3\% |  | 205 | 0.000 | 2.3\% | 38.6\% |
|  | (1.039) | (0.392) | (0.140) | (1.973) | (-0.040) | (0.918) |  | 1.13\% |  |  |  |  |
| TrOHE_10Ind | 0.041 | -0.091 | -0.189 | 0.129 | -0.688 | 0.569 | 50.9\% |  | 205 | 0.022 | 4.5\% | 13.6\% |
|  | (0.977) | (-0.199) | (-0.699) | (1.553) | (-0.533) | (0.567) |  | 1.11\% |  |  |  |  |
| DKL_RI | 0.016 | 0.029 | -0.116 | 0.164** | -0.013 | 0.080 | 46.3\% |  | 205 | 0.000 | 13.6\% | 45.5\% |
|  | (0.425) | (0.238) | (-0.557) | (2.667) | (-0.075) | (0.746) |  | 1.04\% |  |  |  |  |
| WNG_RW | 0.014 | -0.006 | -0.131 | 0.138* | -0.148 | 0.111 | 46.1\% |  | 205 | 0.000 | 2.6\% | 100.0\% |
|  | (0.457) | (-0.438) | (-0.552) | (2.375) | (-0.509) | (1.135) |  | 0.92\% |  |  |  |  |
| Carhart_Factor | 0.031 | -0.087 | 0.115 | 0.141* | -0.130 | 0.117 | 50.6\% |  | 205 | 0.000 | 2.3\% | 13.6\% |
|  | (1.295) | (-0.400) | (0.327) | (2.508) | (-0.047) | (0.668) |  | 0.91\% |  |  |  |  |
| PE_RI | 0.403 | -1.271 | 0.101 | -0.188 | -2.181 | 1.211 | 54.5\% |  | 205 | 0.497 | 22.7\% | 29.5\% |
|  | (0.430) | (-0.384) | (0.184) | (-0.228) | (-0.395) | (0.444) |  | 0.85\% |  |  |  |  |
| WNG_EP | 0.016 | 0.002 | -0.107 | 0.142** | -0.018 | 0.095 | 51.8\% |  | 205 | 0.000 | 2.3\% | 86.4\% |
|  | (0.914) | (0.072) | (-0.583) | (2.855) | (-0.297) | (1.064) |  | 0.84\% |  |  |  |  |
| MPEG_RI | 0.012 | 0.019 | -0.075 | 0.156* | 3.428 | 0.059 | 49.3\% |  | 205 | 0.000 | 6.8\% | 36.4\% |
|  | (0.206) | (0.092) | (-0.263) | (2.426) | (0.438) | (0.467) |  | 0.72\% |  |  |  |  |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_RW | 0.028 | 0.006 | -0.174 | 0.145* | 0.121 | 0.085 | 47.6\% |  | 205 | 0.000 | 0.0\% | 36.4\% |
|  | (0.551) | (0.041) | (-0.503) | (2.545) | (0.303) | (0.597) |  | 0.59\% |  |  |  |  |
| CT_RI | 0.060 | -0.140 | 0.053 | 0.157* | 0.004 | 0.155 | 46.9\% |  | 205 | 0.000 | 2.3\% | 75.0\% |
|  | (1.096) | (-0.581) | (0.191) | (2.383) | (0.008) | (1.168) |  | 0.59\% |  |  |  |  |
| FGHJ_RW | 0.030 | -0.009 | -0.026 | 0.15** | -0.142 | 0.150 | 46.5\% |  | 205 | 0.001 | 0.0\% | 45.5\% |
|  | (0.549) | (-0.030) | (-0.087) | (2.582) | (-0.200) | (1.018) |  | 0.43\% |  |  |  |  |
| MPEG_Anlst | 0.002 | 0.192 | 0.131 | 0.153** | 0.068 | 0.090 | 49.3\% |  | 205 | 0.010 | $9.1 \%$ | 2.3\% |
|  | (0.044) | (0.639) | (0.303) | (2.674) | (0.050) | (0.587) |  | 0.40\% |  |  |  |  |
| PEG_Anlst | 0.024 | 0.034 | -0.099 | $0.16 * *$ | -0.518 | 0.208 | 47.9\% |  | 205 | 0.019 | 2.3\% | 15.9\% |
|  | (0.502) | (0.086) | (-0.252) | (2.648) | (-0.186) | (0.968) |  | 0.39\% |  |  |  |  |
| MPEG_EP | -0.003 | 0.078 | -0.241 | $0.158^{* *}$ | 0.057 | 0.044 | 50.3\% |  | 205 | 0.000 | 11.4\% | 43.2\% |
|  | (-0.087) | (0.910) | (-1.093) | (2.744) | (0.109) | (0.391) |  | 0.34\% |  |  |  |  |
| TrETSS_RW_25SBM | -0.020 | 0.069 | -1.387 | 0.159 | -0.154 | 0.262 | 49.8\% |  | 205 | 0.000 | 0.0\% | 68.2\% |
|  | (-0.267) | (0.441) | (-0.463) | (1.853) | (-0.385) | (0.444) |  | 0.34\% |  |  |  |  |
| FPM_HDZ | 0.016 | 0.139 | -0.150 | $0.158 * *$ | 0.753 | 0.068 | 52.7\% |  | 205 | 0.007 | 13.6\% | 11.4\% |
|  | (0.371) | (0.461) | (-0.722) | (2.598) | (0.673) | (0.225) |  | 0.31\% |  |  |  |  |
| CAPM_Factor | 0.047 | -0.862 | -0.176 | 0.145* | 5.352 | 0.198 | $52.1 \%$ |  | 205 | 0.359 | 2.3\% | 15.9\% |
|  | (1.115) | (-0.429) | (-0.482) | (2.436) | (0.302) | (0.855) |  | 0.20\% |  |  |  |  |
| DKL_RW | 0.038 | -0.029 | -0.093 | 0.159** | 0.098 | 0.134 | 49.6\% |  | 205 | 0.000 | 4.5\% | 20.5\% |

[^52]Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_RI | (0.826) | (-0.149) | (-0.396) | (3.001) | (0.190) | (1.054) |  | 0.15\% |  |  |  |  |
|  | 0.009 | 0.003 | -0.168 | 0.162* | 0.129 | 0.069 | 48\% |  | 205 | 0.000 | 4.5\% | 36.4\% |
|  | (0.221) | (0.023) | (-0.734) | (2.494) | (0.487) | (0.631) |  | 0.10\% |  |  |  |  |
| GM_RI | 0.025 | -0.010 | -0.086 | 0.162** | 9.314 | 0.083 | 49.9\% |  | 205 | 0.000 | 6.8\% | 25.0\% |
|  | (0.700) | (-0.074) | (-0.335) | (2.749) | (0.432) | (0.407) |  | 0.09\% |  |  |  |  |
| PEG_RI | 0.026 | -0.058 | -0.327 | 0.174* | 0.269 | 0.108 | 50.2\% |  | 205 | 0.000 | 2.6\% | 65.8\% |
|  | (0.818) | (-0.406) | (-0.706) | (2.106) | (0.494) | (0.492) |  | 0.04\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.065 | 1.163 | -0.127 | 0.141* | -1.048 | 0.132 | 47.1\% |  | 205 | 0.936 | 4.5\% | 65.9\% |
|  | (0.832) | (0.577) | (-0.773) | (2.431) | (-0.681) | (0.946) |  | 0.00\% |  |  |  |  |
| TrES_RI_25SBM | 0.018 | 0.003 | -0.055 | 0.112** | -0.001 | -0.023 | 47.2\% |  | 205 | 0.000 | 6.8\% | 95.5\% |
|  | (0.869) | (0.234) | (-0.241) | (2.739) | (-0.052) | (-0.180) |  | -0.01\% |  |  |  |  |
| HL_HDZ | 0.012 | 0.073 | -0.137 | 0.152** | 0.243 | 0.129 | 51.9\% |  | 205 | 0.000 | 20.5\% | 4.5\% |
|  | (0.483) | (0.451) | (-0.571) | (2.849) | (0.305) | (0.751) |  | -0.10\% |  |  |  |  |
| KMY_HDZ | 0.010 | 0.094 | -0.125 | 0.154** | 0.319 | 0.086 | 51.9\% |  | 205 | 0.000 | 20.5\% | 6.8\% |
|  | (0.397) | (0.537) | (-0.625) | (2.860) | (0.354) | (0.574) |  | -0.18\% |  |  |  |  |
| GG_RI | 0.037 | -0.245 | -0.199 | 0.143* | -0.252 | 0.190 | 49.1\% |  | 205 | 0.002 | 6.8\% | 13.6\% |
|  | (0.958) | (-0.667) | (-0.723) | (2.550) | (-0.227) | (1.121) |  | -0.21\% |  |  |  |  |
| MPEG_RW | 0.008 | 0.032 | -0.129 | 0.154** | 0.029 | 0.089 | 48.3\% |  | 205 | 0.000 | 2.3\% | 45.5\% |
|  | (0.175) | (0.269) | (-0.644) | (2.881) | (0.100) | (1.184) |  | -0.38\% |  |  |  |  |

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Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_EP_10Ind | 0.031 | 0.024 | -0.118 | 0.159* | -0.033 | -0.096 | 45.9\% |  | 205 | 0.000 | $2.3 \%$ | 81.8\% |
|  | (0.758) | (0.422) | (-0.529) | (2.256) | (-0.600) | (-0.177) |  | -0.44\% |  |  |  |  |
| 5FF_Factor | 0.014 | 0.142 | -0.286 | 0.147** | -0.300 | 0.051 | $52 \%$ |  | 205 | 0.021 | 0.0\% | 11.4\% |
|  | (0.451) | (0.396) | (-0.630) | (2.706) | (-0.115) | (0.256) |  | -0.62\% |  |  |  |  |
| TrES_Anlst _25SBM | 0.012 | 0.025 | -0.011 | $0.125^{* *}$ | 0.021 | 0.064 | 45.2\% |  | 205 | 0.000 | 2.3\% | 84.1\% |
|  | (0.594) | (0.867) | (-0.044) | (3.070) | (0.351) | (0.526) |  | -0.83\% |  |  |  |  |
| FPM_RW | 0.027 | 0.025 | -0.166 | 0.146* | -0.120 | -0.008 | 48.4\% |  | 205 | 0.000 | 6.8\% | 50.0\% |
|  | (0.335) | (0.125) | (-0.416) | (2.512) | (-0.250) | (-0.025) |  | -1.07\% |  |  |  |  |
| TrETSS_RI_25SBM | 0.016 | -0.012 | -0.071 | 0.132** | 0.026 | 0.049 | 46.9\% |  | 205 | 0.000 | 4.5\% | 86.4\% |
|  | (0.712) | (-0.289) | (-0.437) | (2.722) | (0.385) | (0.664) |  | -1.11\% |  |  |  |  |
| KMY_RI | 0.007 | 0.072 | -0.030 | $0.161 * *$ | -0.018 | 0.070 | 45.8\% |  | 205 | 0.000 | $9.1 \%$ | 13.6\% |
|  | (0.154) | (0.353) | (-0.131) | (2.579) | (-0.069) | (0.615) |  | -1.37\% |  |  |  |  |
| KMY_RW | 0.033 | -0.025 | -0.133 | 0.143* | 0.092 | 0.095 | 46.3\% |  | 205 | 0.000 | 0.0\% | $34.1 \%$ |
|  | (0.707) | (-0.135) | (-0.464) | (2.534) | (0.184) | (0.695) |  | $-1.37 \%$ |  |  |  |  |
| MPEG_HDZ | 0.030 | -0.054 | -0.247 | 0.145* | 0.074 | 0.116 | $50.1 \%$ |  | 205 | 0.000 | 6.8\% | 9.1\% |
|  | (1.047) | (-0.253) | (-0.675) | (2.474) | (0.098) | (0.390) |  | $-1.44 \%$ |  |  |  |  |
| WNG_RI | 0.023 | -0.014 | -0.112 | 0.122** | -0.139 | 0.069 | 47.7\% |  | 205 | 0.000 | 4.5\% | 95.5\% |
|  | (0.777) | (-0.119) | (-0.469) | (2.766) | (-0.678) | (0.914) |  | $-1.46 \%$ |  |  |  |  |
| TrES_RI_10Ind | 0.038 | 0.000 | -0.176 | 0.136** | -0.085 | 0.052 | 46.8\% |  | 205 | 0.000 | 6.8\% | 88.6\% |

[^53]Table 88 : Capturing Subsequent Return: Low Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RW_25SBM | (1.027) | (-0.025) | (-0.945) | (2.761) | (-0.508) | (0.301) |  | -1.52\% |  |  |  |  |
|  | 0.013 | -0.029 | -0.106 | 0.13* | -0.025 | 0.033 | 45.8\% |  | 205 | 0.000 | $2.3 \%$ | 81.8\% |
|  | (0.561) | (-0.357) | (-0.613) | (2.174) | (-0.470) | (0.278) |  | -1.70\% |  |  |  |  |
| WNG_HDZ | 0.020 | -0.019 | 0.037 | 0.129** | 0.266 | 0.128 | 47.2\% |  | 205 | 0.000 | 0.0\% | 93.2\% |
|  | (0.898) | (-0.300) | (0.190) | (2.833) | (0.571) | (1.125) |  | $-2.41 \%$ |  |  |  |  |
| WNG_Anlst | 0.036 | -0.031 | -0.117 | $0.155^{* * *}$ | 0.121 | 0.127 | 45.3\% |  | 205 | 0.000 | 6.8\% | 50.0\% |
|  | (1.605) | (-0.310) | (-0.432) | (3.128) | (0.389) | (0.996) |  | $-2.81 \%$ |  |  |  |  |
| GM_HDZ | 0.023 | 0.016 | -0.302 | 0.157** | 0.225 | 0.287 | 47.2\% |  | 205 | 0.013 | 6.8\% | 4.5\% |
|  | (0.816) | (0.043) | (-0.791) | (2.773) | (0.336) | (0.460) |  | -2.81\% |  |  |  |  |
| TrETSS_Anlst _25SBM | 0.034 | 0.007 | -0.209 | 0.139** | 0.000 | 0.114 | 45\% |  | 205 | 0.000 | 0.0\% | 56.8\% |
|  | (1.413) | (0.089) | (-0.669) | (2.813) | (0.004) | (1.057) |  | -2.93\% |  |  |  |  |
| PEG_HDZ | 0.036 | -0.065 | -0.250 | 0.14* | -0.010 | 0.164 | 45.9\% |  | 205 | 0.000 | 4.5\% | 13.6\% |
|  | (1.388) | (-0.422) | (-1.078) | (2.500) | (-0.015) | (0.611) |  | -3.63\% |  |  |  |  |
| TrES_EP_25SBM | 0.023 | -0.009 | -0.080 | 0.102* | -0.003 | 0.107 | 45.1\% |  | 205 | 0.000 | 2.3\% | 93.2\% |
|  | (1.361) | (-0.523) | (-0.505) | (2.273) | (-0.189) | (0.842) |  | -3.68\% |  |  |  |  |

For the lowest quartile of firms in terms of market beta, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+$ $\beta_{1} I C C_{i t-1}+\beta_{2}$ CFNS $_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the
variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

Table 89 : Capturing Subsequent Return: High Beta Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.001 | $0.202 * * *$ | 0.353 | 0.482*** | 0.039 | -0.107 | 63\% | 8.86\% | 205 | 0.000 | 61.7\% | 87.8\% |
|  | (0.093) | (7.434) | (1.457) | (17.264) | (0.561) | (-0.564) |  |  |  |  |  |  |
| Naive | -0.022 | $0.223 * * *$ | 0.372 | 0.44*** |  | 0.558 | 63.2\% | 8.48\% | 205 | 0.000 | 61.2\% | 88.3\% |
|  | (-0.699) | (5.557) | (1.294) | (8.701) | (0.349) | (0.825) |  |  |  |  |  |  |
| TPDPS_HDZ | -0.008 | 0.17*** | 0.516 | $0.444 * * *$ | 0.019 | 0.345 | 62.3\% | 7.40\% | 205 | 0.000 | 60.2\% | 87.2\% |
|  | (-0.294) | (4.414) | (1.583) | (10.514) |  |  |  |  |  |  |  |  |
| TPDPS_EP | -0.018 | $0.145^{* * *}$ | 0.245 | $0.415 * * *$ | 0.030 | 0.487 | 61.2\% | 6.64\% | 205 | 0.000 | 54.6\% | 88.3\% |
|  | (-0.606) | (3.829) | (0.819) | (9.024) | (0.321) | (0.812) |  |  |  |  |  |  |
| BP_Anlst | -0.018 | 1.543*** | 0.691 | 0.45*** | 1.236 | -0.346 | 59.6\% | 6.58\% | 205 | 0.217 | 63.3\% | 45.9\% |
|  | (-0.960) | (3.521) | (1.353) | (13.103) | (1.020) | (-1.182) |  |  |  |  |  |  |
| TPDPS_RI | -0.018 | 0.153*** | 0.084 | 0.426*** | 0.023 | 0.434 | 61.1\% | 6.33\% | 205 | 0.000 | 49.5\% | 88.8\% |
|  | (-0.632) | (3.931) | (0.255) | (9.192) | (0.239) | (0.734) |  |  |  |  |  |  |
| BP_HDZ | -0.012 | 1.112*** | 0.416 | 0.449*** | 0.233 | 0.077 | 59.8\% | 6.16\% | 205 | 0.572 | 65.3\% | 40.8\% |
|  | (-0.601) | (5.614) | (1.449) | (14.262) | (0.716) | (0.242) |  |  |  |  |  |  |
| TPDPS_RW | -0.107 | 0.111 | 1.395 | 0.332*** | 0.099 | 2.978 | 59.6\% | 5.98\% | 205 | 0.000 | 49.5\% | 87.8\% |
|  | (-0.970) | (1.527) | (1.532) | (3.473) | (0.501) | (1.243) |  |  |  |  |  |  |
| BP_RW | -0.004 | 0.894*** | 0.164 | $0.427 * * *$ | 0.196 | 0.211 | 58.3\% | 5.32\% | 205 | 0.506 | 44.9\% | 42.9\% |
|  | (-0.179) | (5.614) | (0.630) | (11.713) | (0.473) | (0.468) |  |  |  |  |  |  |

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Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | -0.025 | 1.055*** | 0.006 | 0.421*** | 0.292 | 0.324 | 58.1\% | 4.86\% | 205 | 0.790 | 51.5\% | 48.0\% |
|  | (-1.010) | (5.065) | (0.020) | (11.412) | (0.767) | (0.737) |  |  |  |  |  |  |
| BP_EP | -0.024 | $0.989 * * *$ | 0.026 | 0.42 *** | 0.300 |  | 58.1\% | 4.82\% | 205 | 0.956 | 54.1\% | 50.0\% |
|  | (-0.971) | (4.911) | (0.096) | (11.537) | (0.852) | (0.746) |  |  |  |  |  |  |
| PEG_Anlst | -0.015 | 0.267 | 0.268 | $0.418 * * *$ | -0.607 | 0.590 | 55.4\% | 3.89\% | 205 | 0.000 | 12.8\% | 56.6\% |
|  | (-0.312) | (1.671) | (1.100) | $(11.289)$ | (-1.307) | (0.862) |  |  |  |  |  |  |
| GM_Anlst | 0.015 | 1.890 | -0.738 | $0.491^{* * *}$ | -7.618 | -3.783 | 56.7\% | 3.81\% | 205 | 0.477 | 28.6\% | 39.8\% |
|  | (0.109) | (1.512) | (-0.932) | (5.754) | (-1.023) | (-0.891) |  |  |  |  |  |  |
| CAPM_Factor | 0.853 | -66.375 | -0.107 | $0.501 * * *$ | $-28.712$ | 0.360 | 56.2\% | 3.51\% | 205 | 0.367 | 19.4\% | 21.9\% |
|  | (0.906) | (-0.892) | (-0.295) | (8.349) | (-0.784) |  |  |  |  |  |  |  |
| GG_HDZ | 0.009 | 0.219 | -0.290 | $0.468 * * *$ | 1.751 | 0.075 | 55.6\% | 3.49\% | 205 | 0.000 | 27.0\% | 56.1\% |
|  | (0.545) | (1.123) | (-1.271) | (14.163) | (0.497) | (0.379) |  |  |  |  |  |  |
| PE_Anlst | -0.015 | 0.688 | 0.481 | 0.414*** | -0.486 | 0.037 | 58.3\% | 3.47\% | 205 | 0.616 | 55.6\% | 38.8\% |
|  | (-0.802) | (1.106) | (0.992) | (11.255) | (-0.189) | (0.116) |  |  |  |  |  |  |
| FGHJ_HDZ | -0.006 | -0.084 | -0.098 | $0.462 * * *$ | -6.027 | 0.776 | 55\% | 3.41\% | 205 | 0.103 | 18.9\% | 62.2\% |
|  | (-0.172) | (-0.127) | (-0.635) | (10.592) | (-0.629) | (1.059) |  |  |  |  |  |  |
| WNG_EP | 0.058*** | 0.000 | 0.021 | 0.448*** | -0.002 | -0.205 | 55.5\% | 3.24\% | 205 | 0.000 | 3.6\% | 96.9\% |
|  | (3.723) | (-0.737) | (0.115) | (16.602) | (-0.716) | (-0.965) |  |  |  |  |  |  |
| GM_RW | -0.058 | 0.169 | 0.802 | 0.508*** | -0.750 | 1.198 | 55.4\% | 3.13\% | 205 | 0.000 | 14.4\% | 81.4\% |

[^54]Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$\%_{0} \% \beta_{I C C}^{C S}=1$

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## Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.04** | 0.322 | 0.101 | $0.465 * * *$ | 3.701*** | -0.422 | 54\% | 2.45\% | 205 | 0.013 | 26.5\% | 66.3\% |
|  | (2.966) | (1.191) | (0.709) | (17.609) | (3.103) | (-1.730) |  |  |  |  |  |  |
| DKL_Anlst | 0.038 | -0.057 | -0.112 | 0.48*** | 0.235 | -0.092 | 57.2\% | 2.38\% | 205 | 0.251 | $31.1 \%$ | 34.2\% |
|  | (0.527) | (-0.062) | (-0.254) | (13.259) | (0.221) | (-0.245) |  |  |  |  |  |  |
| FPM_HDZ | 0.041 | 0.246 | -0.294 | 0.478*** | 1.416 | -0.594 | 55.8\% | 2.30\% | 205 | 0.008 | 20.9\% | 61.7\% |
|  | (1.159) | (0.874) | (-1.327) | (16.361) | (0.895) | (-1.526) |  |  |  |  |  |  |
| PE_EP | -0.004 | 0.520 | -0.182 | $0.454 * * *$ | 1.176 | 0.104 | 54.6\% | 2.30\% | 205 | 0.255 | 34.2\% | 71.9\% |
|  | (-0.204) | (1.234) | (-0.921) | (15.607) | (0.432) | (0.337) |  |  |  |  |  |  |
| PE_HDZ | -0.007 | 0.324 | -0.223 | 0.44*** | 2.358 | 0.602 | 54.6\% | 2.28\% | 205 | 0.026 | 32.7\% | 60.7\% |
|  | (-0.266) |  | (-1.234) | (12.161) | (1.267) |  |  |  |  |  |  |  |
| FGHJ_Anlst | -0.025 | 0.684 | -0.212 | 0.488*** | 0.039 | -0.098 | 56.8\% | 2.24\% | 205 | 0.492 | 26.5\% | 42.9\% |
|  | (-0.528) | (1.493) | (-0.879) | (11.232) | (0.025) | (-0.161) |  |  |  |  |  |  |
| GLS_HDZ | -0.011 | -0.463 | -0.247 | $0.491 * * *$ | -11.470 | 1.305 | 54.1\% | 2.13\% | 205 | 0.115 | 18.4\% | 60.7\% |
|  | (-0.452) | (-0.500) | (-0.739) | (6.432) | (-0.729) | (0.968) |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.06** | 0.030 | -0.068 | 0.477*** | -0.055 | -0.314 | 55.1\% | 2.09\% | 205 | 0.000 | 13.3\% | 91.3\% |
|  | (2.945) | (0.445) | (-0.227) | (14.402) | (-0.775) | (-0.835) |  |  |  |  |  |  |
| TrES_RI_10Ind | 0.083* | -0.016 | -0.327 | 0.467*** | 0.000 | -0.530 | 55.4\% | 2.09\% | 205 | 0.000 | 11.2\% | 93.4\% |
|  | (2.413) | (-0.809) | (-1.227) | (11.276) | (0.005) | (-1.324) |  |  |  |  |  |  |
| KMY_HDZ | 0.021 | 0.143 | -0.003 | 0.462*** | -0.718 | 0.059 | 56.2\% | 2.06\% | 205 | 0.000 | 25.0\% | 61.7\% |

[^55]
## Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | (1.621) | (0.874) | (-0.014) | (15.171) | (-0.278) | (0.294) |  |  |  |  |  |  |
|  | -0.071 | 0.484 | 0.262 | 0.43*** | 0.910 | 0.833 | 55.6\% | 2.03\% | 205 | 0.291 | 27.6\% | 29.6\% |
|  | (-1.149) | (0.993) | (1.560) | (13.448) | (0.859) | (1.111) |  |  |  |  |  |  |
| WNG_HDZ | 0.043** | 0.006 | 0.102 | $0.463 * * *$ | 0.374 | 0.248 | 55.7\% | 1.99\% | 205 | 0.000 | 1.0\% | 96.9\% |
|  | (2.820) | (0.889) | (0.716) | (16.311) | (0.877) | (1.008) |  |  |  |  |  |  |
| KMY_EP | -0.010 | 0.337 | 0.127 | $0.453 * * *$ | -0.027 | 0.058 | 54\% | 1.97\% | 205 | 0.000 | 26.5\% | 67.3\% |
|  | (-0.428) | (1.933) | (0.542) | (11.181) | (-0.055) | (0.120) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.048 | -0.007 | -0.033 | 0.458*** | 0.005 | -0.353 | 53.5\% | 1.94\% | 205 | 0.000 | 6.6\% | 95.4\% |
|  | (1.385) | (-1.552) | (-0.253) | (12.838) | (1.101) | (-1.022) |  |  |  |  |  |  |
| MPEG_Anlst | $0.011$ | 0.293* | 0.146 | 0.446*** | -0.647 | -0.123 | 56.2\% | 1.90\% | 205 | 0.000 | 26.0\% | 45.4\% |
|  | (0.642) | (2.396) | (1.015) | (17.891) | (-1.238) | (-0.678) |  |  |  |  |  |  |
| HL_RW | 0.047 | -0.003 | 0.471 | 0.416*** | -0.280 | 0.481 | 53.8\% | 1.82\% | 205 | 0.000 | 12.2\% | 73.0\% |
|  | (0.411) | (-0.022) | (0.862) | (7.906) | (-0.132) | (0.718) |  |  |  |  |  |  |
| KMY_RW | 0.045 | 0.005 | 0.474 | 0.415*** | -0.221 | 0.482 | 53.7\% | 1.80\% | 205 | 0.000 | 10.7\% | 73.0\% |
|  | (0.398) | (0.045) | (0.868) | (7.902) | (-0.104) | (0.720) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.067** | 0.494 | 0.071 | 0.481*** | 9.901 | -0.280 | 55.3\% | 1.72\% | 205 | 0.909 | 13.8\% | 74.5\% |
|  | (2.650) | (0.111) | (0.165) | (16.155) | (1.016) | (-0.983) |  |  |  |  |  |  |
| WNG_RW | 0.032 | 0.000 | 0.153 | $0.373 * * *$ | -0.032 | -0.155 | 53.1\% | 1.68\% | 205 | 0.000 | 4.1\% | 96.9\% |
|  | (1.305) | (-0.917) | (0.597) | (4.971) | (-0.925) | (-0.183) |  |  |  |  |  |  |

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Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RW | 0.003 | 0.372** | -0.036 | 0.448*** | 9.790 | 0.143 | 54.3\% | 1.60\% | 205 | 0.000 | 21.8\% | 74.1\% |
|  | (0.164) | (2.952) | (-0.202) | (15.480) | (1.308) | (0.672) |  |  |  |  |  |  |
| FPM_EP | -0.037 | 0.05*** | -0.164 | 0.45*** | 0.014 | -0.441 | 55.1\% | 1.53\% | 205 | 0.000 | 12.2\% | 88.8\% |
|  | (-0.397) | (3.601) | (-0.858) | (15.322) | (0.282) | (-1.208) |  |  |  |  |  |  |
| MPEG_RW | 0.010 | 0.231 | 0.255 | $0.447 * * *$ | 0.108 | 0.152 | 54.9\% | 1.53\% | 205 | 0.000 | 20.9\% | 85.7\% |
|  | (0.368) | (1.513) | (1.134) | (17.443) | (0.118) | (0.489) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.09* | -0.028 | -0.133 | 0.476*** | -0.024 | -0.465 | 54.7\% | 1.50\% | 205 | 0.000 | 14.8\% | 84.2\% |
|  | (2.449) | (-1.007) | (-0.739) | (14.973) | (-0.605) | (-1.732) |  |  |  |  |  |  |
| GLS_EP | -0.023 | 0.205 | -0.128 | $0.441^{* * *}$ | -0.373 | 0.481 | 54.1\% | 1.50\% | 205 | 0.028 | 25.5\% | 63.8\% |
|  | (-1.001) |  |  |  |  |  |  |  |  |  |  |  |
| MPEG_EP | -0.328 | 0.155 | 1.800 | 0.258 | -6.006 | 6.403 | 54.7\% | 1.47\% | 205 | 0.003 | 19.4\% | 78.1\% |
|  | (-0.937) | (0.544) | (1.136) | (0.913) | (-0.701) | (1.013) |  |  |  |  |  |  |
| GG_Anlst | 0.043 | -0.074 | 0.448 | $0.418 * * *$ | 1.444 | 0.426 | 55.6\% | 1.41\% | 205 | 0.000 | 22.2\% | 69.1\% |
|  | (1.526) | (-0.499) | (0.866) | (5.861) | (1.772) | (0.784) |  |  |  |  |  |  |
| DKL_RW | 0.089 | -0.067 | -0.086 | $0.432 * * *$ | -0.363 | -0.170 | 54.2\% | 1.39\% | 205 | 0.000 | 11.2\% | 69.9\% |
|  | (0.834) | (-0.517) | (-0.415) | (11.342) | (-0.199) | (-0.750) |  |  |  |  |  |  |
| TrOHE_10Ind | -0.214 | 4.961 | 0.541 | 0.377*** | -2.665 | 0.916 | 52.4\% | 1.37\% | 205 | 0.473 | 17.3\% | 58.2\% |
|  | (-0.799) | (0.900) | (0.863) | (3.455) | (-0.674) | (1.077) |  |  |  |  |  |  |
| DKL_EP | -0.006 | 0.219* | 0.096 | 0.441*** | -0.076 | 0.079 | 53\% | 1.28\% | 205 | 0.000 | 23.5\% | 68.4\% |

[^56]Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

|  | Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% N+\operatorname{sig}$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$\%_{0} \% \beta_{I C C}^{C S}=1$

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## Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 3FF_Factor | 0.119 | 0.027 | -0.571 | $0.55 * * *$ | 5.190 | -1.195 | 55.4\% | 0.88\% | 205 | 0.128 | 9.7\% | 28.6\% |
|  | (1.680) | (0.043) | (-1.246) | (5.863) | (0.722) | (-0.869) |  |  |  |  |  |  |
| GG_RI | -0.702 | -0.867 | 4.984 | 0.497*** | -58.439 | 17.250 | 52.9\% | 0.87\% | 205 | 0.263 | 16.8\% | 64.9\% |
|  | (-0.801) | (-0.521) | (0.823) | (13.610) | (-0.828) | (0.821) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.096* | -6.116 | -0.337 | 0.495*** | 3.024 | -0.983 | 55.3\% | 0.87\% | 205 | 0.124 | 6.1\% | 80.1\% |
|  | (2.151) | (-1.328) | (-1.222) | $(10.858)$ | (0.816) | (-1.154) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.037* | -0.035 | 0.076 | 0.432*** |  | -0.015 | 54.1\% | 0.86\% | 205 | 0.000 | 6.1\% | 79.6\% |
|  | (2.058) | (-0.406) | (0.533) | (15.134) |  | (-0.072) |  |  |  |  |  |  |
| DKL_HDZ | 0.020 | 0.183 | -0.043 | 0.465*** | -1.015 | 0.107 | 56\% | 0.81\% | 205 | 0.000 | 22.4\% | 61.2\% |
|  | (1.353) | (1.740) | (-0.252) | (16.069) | (-0.462) | (0.516) |  |  |  |  |  |  |
| HL_HDZ | 0.028* | 0.082 | 0.001 | 0.468*** | -0.716 | 0.057 | 56.2\% | 0.80\% | 205 | 0.000 | 20.4\% | 63.8\% |
|  | (2.025) | (0.655) | (0.004) | (17.493) | (-0.380) | (0.557) |  |  |  |  |  |  |
| CT_HDZ | 0.027 | 0.162 | -0.100 | 0.476*** | -0.064 | -0.038 | 55.8\% | 0.80\% | 205 | 0.000 | 31.6\% | 62.2\% |
|  | (1.620) | (0.946) | (-0.705) | (16.660) | (-0.022) | (-0.319) |  |  |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.021 | 0.039 | 0.023 | -0.005 | 5.393 | -1.213 | 53.6\% | 0.79\% | 205 | 0.000 | 6.1\% | 73.5\% |
|  | (0.512) | (0.252) | (0.170) | (-0.010) | (0.843) | (-1.115) |  |  |  |  |  |  |
| FPM_RI | 0.007 | 0.339 | -0.074 | 0.429*** | -0.043 | -0.570 | 54.3\% | 0.76\% | 205 | 0.006 | 16.8\% | 78.1\% |
|  | (0.337) | (1.430) | (-0.530) | (17.122) | (-0.324) | (-0.930) |  |  |  |  |  |  |
| PEG_HDZ | 0.020 | 0.281 | -0.148 | 0.472*** | -1.144 | -0.170 | 54.1\% | 0.75\% | 205 | 0.000 | 14.3\% | 65.3\% |

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## Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_25SBM | (1.257) | (1.755) | (-0.935) | (16.593) | (-0.630) | (-1.299) |  |  |  |  |  |  |
|  | 0.026 | 0.051 | 0.642 | 0.383*** | 0.080 |  | 54.3\% | 0.71\% | 205 | 0.000 | 8.7\% | 74.5\% |
|  | (0.756) | (0.669) | (0.947) | (6.723) | (0.695) | (0.742) |  |  |  |  |  |  |
| GG_EP | 0.014 | 0.356 | -0.026 | $0.481 * * *$ | 10.529 | 0.032 | 54.3\% | 0.69\% | 205 | 0.531 | 21.1\% | 70.3\% |
|  | (0.338) | (0.347) | (-0.072) | (8.873) | (1.882) | (0.040) |  |  |  |  |  |  |
| CT_RW | -0.016 | 0.020 | 0.712 | 0.47 *** | -0.078 | 0.843 | 54.4\% | 0.69\% | 205 | 0.005 | 17.5\% | 69.8\% |
|  | (-0.258) | (0.059) | (1.091) | (13.831) | (-0.015) |  |  |  |  |  |  |  |
| KMY_RI | 0.002 | 0.208 | 0.218 | 0.444*** | -1.570 | -0.108 | 53.4\% | 0.53\% | 205 | 0.011 | 19.4\% | 68.9\% |
|  | (0.087) | (0.678) | (0.672) | (15.393) | (-0.799) | (-0.456) |  |  |  |  |  |  |
| TrES_Anlst_25SBM | 0.052** | 0.007 | 0.176 | 0.445*** | -0.014 | -0.139 | 54.9\% | 0.52\% | 205 | 0.000 | 3.6\% | 92.9\% |
|  | (2.729) | (0.287) | (0.582) | (12.372) | (-1.091) | (-1.036) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.085** | -0.197 | 0.167 | 0.348*** | -0.058 | -0.741 | 52\% | 0.52\% | 205 | 0.000 | 9.2\% | 79.6\% |
|  | (2.857) | (-1.771) | (0.765) | (3.111) | (-0.778) | (-1.304) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.056 | 0.005 | 0.005 | 0.472*** | 0.000 | -0.269 | 51.4\% | 0.35\% | 205 | 0.000 | 7.1\% | 95.4\% |
|  | (1.247) | (0.477) | (0.013) | (10.654) | (-0.031) | (-1.029) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.033* | -0.049 | 0.178 | $0.437 * * *$ | 0.080 | 0.067 | 52.7\% | 0.31\% | 205 | 0.000 | 10.2\% | 86.2\% |
|  | (2.218) | (-1.934) | (1.065) | (17.244) | (0.501) | (0.368) |  |  |  |  |  |  |
| CT_RI | 0.029 | -0.054 | 0.139 | 0.443*** | 0.742 | 0.118 | 53\% | 0.27\% | 205 | 0.000 | 10.7\% | 81.1\% |
|  | (1.470) | (-0.398) | (0.944) | (16.516) | (1.022) | (0.564) |  |  |  |  |  |  |

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## Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 5FF_Factor | -0.002 | 0.649 | 0.272 | $0.371 * * *$ | 1.073 | 1.200 | 53.5\% | 0.19\% | 205 | 0.722 | 9.7\% | $33.2 \%$ |
|  | (-0.049) | (0.660) | (0.764) | (5.967) | (0.500) | (0.982) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.057 | 0.108 | 0.572 | 0.478*** | -0.147 | -0.216 | 52\% | 0.19\% | 205 | 0.000 | 12.3\% | 88.7\% |
|  | (1.696) | (1.371) | (0.528) | (12.562) | (-0.768) | (-0.387) |  |  |  |  |  |  |
| PEG_RI | -0.061 | 0.701 | 1.159 | 0.288 | 8.444 | -0.744 | 52.9\% | 0.09\% | 205 | 0.769 | 28.0\% | 100.0\% |
|  | (-0.431) | (0.692) | (0.679) | (1.220) | (0.773) | (-0.926) |  |  |  |  |  |  |
| GLS_RW | 0.143 | -0.014 | -0.004 | 0.436*** | -2.579 | 0.104 | 53.3\% | 0.03\% | 205 | 0.000 | 8.2\% | 71.9\% |
|  | (1.254) | (-0.098) | (-0.023) | (14.013) | (-1.413) | (0.500) |  |  |  |  |  |  |
| MPEG_RI | 0.011 | 0.145** | -0.182 | $0.459 * * *$ | 0.550 | -0.052 | 54\% | -0.19\% | 205 | 0.000 | 28.3\% | 71.1\% |
|  |  |  |  | (18.048) |  |  |  |  |  |  |  |  |
| HL_RI | -0.007 | 0.386 | -0.053 | 0.434*** | -0.064 | -0.302 | 52.6\% | -0.47\% | 205 | 0.005 | 25.0\% | 77.0\% |
|  | (-0.297) | (1.784) | (-0.249) | (13.661) | (-0.159) | (-0.845) |  |  |  |  |  |  |
| DKL_RI | -0.033 | 1.326 | 0.349 | $0.363 * * *$ | -0.350 | -2.112 | 52.3\% | -0.47\% | 205 | 0.784 | 21.9\% | 77.0\% |
|  | (-0.830) | (1.116) | (0.617) | (3.837) | (-0.845) | (-0.824) |  |  |  |  |  |  |
| FGHJ_RI | -0.014 | 0.921** | 0.040 | 0.417*** | -11.506 | -0.577 | 53.1\% | -0.63\% | 205 | 0.820 | 17.9\% | 65.8\% |
|  | (-0.629) | (2.657) | (0.305) | (12.383) | (-0.914) | (-1.946) |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.022 | 0.018 | -0.197 | 0.457*** | -0.130 | 0.140 | 51.7\% | -0.64\% | 205 | 0.000 | 8.2\% | 92.8\% |
|  | (1.263) | (0.994) | (-0.685) | (16.762) | (-0.931) | (0.632) |  |  |  |  |  |  |
| PEG_EP | 0.017 | 0.017 | -0.076 | 0.443*** | 1.586* | 0.239 | 53.9\% | -0.66\% | 205 | 0.000 | 24.3\% | 97.0\% |

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## Table 89 : Capturing Subsequent Return: High Beta Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_EP | (1.019) | (0.250) | (-0.369) | (16.602) | (2.369) | (0.925) |  |  |  |  |  |  |
|  | -0.041 | 0.090 | 0.400 | 0.472*** | -4.216 | 0.894 | 53.1\% | -0.70\% | 205 | 0.000 | 21.9\% | 72.4\% |
|  | (-0.749) | (1.177) | (0.728) | (13.997) | (-0.583) | (0.798) |  |  |  |  |  |  |
| GLS_RI | -0.001 | 0.886** | 0.061 | $0.407 * * *$ | -46.103 | -0.604 | 53\% | -0.73\% | 205 | 0.708 | 17.3\% | 66.3\% |
|  | (-0.068) | (2.920) | (0.406) | (10.555) | (-0.956) | (-1.594) |  |  |  |  |  |  |
| GM_RI | 0.011 | 0.193* | -0.062 | $0.443 * * *$ | 0.219 | -0.007 | 52.8\% | -0.79\% | 205 | 0.000 | 26.9\% | 66.8\% |
|  | (0.835) | (2.447) | (-0.534) | (18.162) | (0.239) | (-0.060) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.048*** | 0.014 | 0.087 | 0.454*** | -0.059 | -0.007 | 53.3\% | -0.86\% | 205 | 0.000 | 7.7\% | 94.9\% |
|  | (4.184) | (1.011) | (0.770) | (17.191) | (-0.437) | (-0.062) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.088** | -0.056 | 0.198 | 0.423*** | 0.085 | -0.588 | 50.6\% | -1.22\% | 205 | 0.000 | 8.7\% | 94.4\% |
|  | (3.001) | (-1.376) | (0.762) | (13.529) | (1.543) | (-2.112) |  |  |  |  |  |  |
| Carhart_Factor | 0.043*** | -0.247 | -0.147 | 0.437*** | 3.834 | -0.012 | 53.1\% | -1.24\% | 205 | 0.000 | 8.7\% | 38.8\% |
|  | (3.322) | (-1.406) | (-0.851) | (15.379) | (1.399) | (-0.072) |  |  |  |  |  |  |
| FGHJ_RW | 0.015 | 0.328 | 0.233 | 0.438*** | -0.711 | 0.043 | 52.1\% | -1.60\% | 205 | 0.000 | 16.1\% | 73.7\% |
|  | (0.992) | (1.938) | (0.735) | (14.736) | (-0.833) | (0.258) |  |  |  |  |  |  |

For the highest quartile of firms in terms of market beta, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, i t}=\alpha_{0}+$ $\beta_{1} I C C_{i t-1}+\beta_{2}$ CFNS $_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much of the
variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_Anlst _10Ind | 0.047 | 0.325 | -0.129 | 0.099 | 2.455 | -0.589 | 54.8\% |  | 205 | 0.232 | 9.7\% | $38.9 \%$ |
|  | (1.135) | (0.580) | (-0.442) | (0.561) | (0.497) | (-0.814) |  | 7.21\% |  |  |  |  |
| MPEG_Anlst | -0.001 | 0.441 | -0.054 | $0.223 * * *$ | 0.545 | -0.085 | 57.1\% |  | 205 | 0.079 | 9.7\% | 30.6\% |
|  | (-0.037) | (1.407) | (-0.104) | (3.776) | (0.986) | (-0.325) |  | 6.88\% |  |  |  |  |
| HL_Anlst | -0.029 | 0.750 | 0.001 | 0.189* | 0.784 | -0.308 | 56.6\% |  | 205 | 0.635 | 12.5\% | 15.3\% |
|  | (-0.491) | (1.426) | (0.002) | (2.150) | (1.150) | (-0.936) |  | 6.60\% |  |  |  |  |
| GLS_Anlst | -0.010 | 0.460 | -0.096 | 0.214*** | 1.271 | 0.003 | 58.6\% |  | 205 | 0.149 | 11.1\% | 12.5\% |
|  | (-0.201) | (1.241) | (-0.254) | (3.446) | (1.067) | (0.014) |  | 6.58\% |  |  |  |  |
| GM_Anlst | -0.004 | 0.413 | 0.178 | 0.162 | 0.924 | -0.156 | 57.7\% |  | 205 | 0.070 | 6.9\% | 22.2\% |
|  | (-0.081) | (1.292) | (0.351) | (1.411) | (1.456) | (-0.305) |  | 6.51\% |  |  |  |  |
| FGHJ_Anlst | -0.028 | 0.574 | -0.064 | 0.215*** | 1.321 | -0.009 | 58.4\% |  | 205 | 0.353 | 8.3\% | 12.5\% |
|  | (-0.465) | (1.258) | (-0.171) | (3.459) | (1.074) | (-0.045) |  | 6.33\% |  |  |  |  |
| DKL_Anlst | -0.057 | 1.040 | 0.224 | 0.19* | 1.990 | -0.245 | 57.7\% |  | 205 | 0.954 | 12.5\% | 15.3\% |
|  | (-0.853) | (1.494) | (0.331) | (2.569) | (0.828) | (-0.752) |  | 6.00\% |  |  |  |  |
| TPDPS_HDZ | 0.038 | 0.040 | -0.238 | $0.247 * * *$ | 0.011 | 0.030 | 59.4\% |  | 205 | 0.000 | 23.6\% | 72.2\% |
|  | (1.618) | (0.511) | (-0.752) | (4.996) | (0.120) | (0.215) |  | 5.35\% |  |  |  |  |
| KMY_Anlst | -0.020 | 0.319 | 0.182 | 0.206* | 0.340 | -0.089 | 57\% |  | 205 | 0.005 | 5.6\% | 25.0\% |
|  | (-0.326) | (1.356) | (0.746) | (2.572) | (1.014) | (-0.425) |  | 5.19\% |  |  |  |  |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_RI | 0.036 | 0.044 | -0.329 | $0.22 * * *$ | 0.424 | -0.017 | 54.3\% |  | 205 | 0.000 | 6.9\% | 69.4\% |
|  | (1.358) | (0.354) | (-0.714) | (4.105) | (0.770) | (-0.073) |  | 5.15\% |  |  |  |  |
| BP_EP | 0.026 | 0.426 | 0.188 | 0.192 | 0.169 | 0.175 | 57.5\% |  | 205 | 0.038 | $21.1 \%$ | 15.5\% |
|  | (0.697) | (1.572) | (0.361) | (1.033) | (0.659) | (0.420) |  | 5.09\% |  |  |  |  |
| HL_RI | 0.030 | 0.110 | -0.327 | $0.218 * * *$ | 0.134 | -0.030 | 54.1\% |  | 205 | 0.000 | 8.3\% | 63.9\% |
|  | (0.932) | (0.667) | (-0.686) | (3.863) | (0.436) | (-0.146) |  | 5.01\% |  |  |  |  |
| TPDPS_Anlst | 0.026 | 0.060 | -0.170 | $0.248^{* * *}$ | 0.003 | 0.008 | 59.2\% |  | 205 | 0.000 | 20.8\% | 70.8\% |
|  | (1.072) | (0.962) | (-0.567) | (4.946) | (0.032) | (0.055) |  | 4.83\% |  |  |  |  |
| TrES_RI_10Ind | 0.000 | 0.056 | -0.064 | 0.229*** | 0.014 | 0.058 | 53.5\% |  | 205 | 0.000 | 8.3\% | 80.6\% |
|  | (0.004) | (1.201) | (-0.246) | (3.139) | (0.241) | (0.383) |  | 4.70\% |  |  |  |  |
| GLS_HDZ | 0.020 | 0.248 | -0.135 | $0.211^{* * *}$ | 1.350 | 0.103 | 58.6\% |  | 205 | 0.082 | 9.7\% | 18.1\% |
|  | (0.416) | (0.582) | (-0.301) | (3.528) | (1.347) | (0.509) |  | 4.69\% |  |  |  |  |
| CT_Anlst | -0.046 | 0.790 | -0.291 | $0.222 * * *$ | 0.066 | -0.147 | $57.1 \%$ |  | 205 | 0.796 | 11.1\% | 19.4\% |
|  | (-0.489) | (0.978) | (-0.712) | (3.848) | (0.057) | (-0.543) |  | 4.54\% |  |  |  |  |
| 3FF_Factor | 0.000 | -0.449 | -0.574 | 0.159 | -0.719 | -0.669 | $56.1 \%$ |  | 205 | 0.005 | 1.4\% | 6.9\% |
|  | (0.000) | (-0.906) | (-0.626) | (1.577) | (-0.173) | (-0.492) |  | 4.48\% |  |  |  |  |
| Naive | 0.034 | 0.059 | -0.159 | $0.25 * * *$ | 0.012 | 0.008 | 58.7\% |  | 205 | 0.000 | 19.4\% | 70.8\% |
|  | (1.748) | (0.904) | (-0.546) | (4.950) | (0.115) | (0.062) |  | 4.35\% |  |  |  |  |
| FGHJ_HDZ | 0.015 | 0.238 | -0.178 | $0.22 * * *$ | 1.633 | 0.102 | 58\% |  | 205 | 0.219 | 11.1\% | 16.7\% |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_Anlst | (0.219) | (0.387) | (-0.402) | (3.626) | (1.281) | (0.473) |  | 4.30\% |  |  |  |  |
|  | -0.017 | 0.195 | 0.050 | 0.192* | 0.168 | -0.119 | 55.7\% |  | 205 | 0.000 | 4.2\% | 47.2\% |
|  | (-0.244) | (1.134) | (0.231) | (2.473) | (0.624) | (-0.501) |  | 4.13\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.030 | -0.070 | -0.311 | 0.179*** | -0.128 | 0.138 | 51.9\% |  | 205 | 0.000 | 4.2\% | 45.8\% |
|  | (0.736) | (-0.472) | (-0.792) | (3.289) | (-0.644) | (0.793) |  | 4.01\% |  |  |  |  |
| TrES_RI_25SBM | 0.052 | 0.008 | -0.055 | 0.193*** | 0.011 | -0.087 | 50.9\% |  | 205 | 0.000 | 4.2\% | 95.8\% |
|  | (1.392) | (0.273) | (-0.199) | (3.459) | (0.721) | (-0.404) |  | 3.94\% |  |  |  |  |
| BP_HDZ | 0.002 | 1.044 | 0.216 | 0.282*** | 0.162 | -0.047 | 56.8\% |  | 205 | 0.962 | 26.4\% | 19.4\% |
|  | (0.045) | (1.136) | (0.262) | (3.623) | (0.487) | (-0.217) |  | 3.81\% |  |  |  |  |
| TPDPS_EP | 0.029 | 0.074 | -0.016 | $0.227 * * *$ | 0.037 | -0.121 | 55.6\% |  | 205 | 0.000 | 20.8\% | 79.2\% |
|  | (1.259) | (1.828) | (-0.047) | (4.252) | (0.472) | (-0.589) |  | 3.81\% |  |  |  |  |
| CAPM_Factor | 1.922 | -129.402 | -0.016 | 0.185** | 144.443 | 0.328 | 55.6\% |  | 205 | 0.565 | 2.8\% | 9.7\% |
|  | (0.578) | (-0.574) | (-0.025) | (2.858) | (0.766) | (0.928) |  | 3.66\% |  |  |  |  |
| PEG_Anlst | 0.022 | 0.225 | -0.137 | 0.264*** | 0.618 | 0.069 | 54\% |  | 205 | 0.019 | 2.8\% | 31.9\% |
|  | (0.702) | (0.697) | (-0.289) | (3.818) | (1.038) | (0.266) |  | 3.62\% |  |  |  |  |
| BP_Anlst | 0.019 | 0.52* | -0.243 | 0.26*** | 0.224 | -0.033 | 56.5\% |  | 205 | 0.061 | 25.0\% | 22.2\% |
|  | (0.954) | (2.058) | (-0.721) | (4.728) | (0.691) | (-0.183) |  | 3.40\% |  |  |  |  |
| WNG_RW | 0.042 | -0.010 | -0.133 | 0.206*** | 0.036 | 0.574 | 52.5\% |  | 205 | 0.000 | 4.2\% | 94.4\% |
|  | (1.447) | (-0.629) | (-0.454) | (3.771) | (0.479) | (0.767) |  | 3.34\% |  |  |  |  |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_RW | -0.026 | 0.039 | -0.365 | $0.215^{* * *}$ | 0.941 | 0.013 | 52.8\% |  | 205 | 0.000 | 1.4\% | $43.1 \%$ |
|  | (-0.166) | (0.157) | (-0.897) | (3.751) | (1.131) | (0.063) |  | $3.32 \%$ |  |  |  |  |
| MPEG_EP | 0.021 | 0.098 | -0.263 | $0.233 * *$ | 0.486 | -0.157 | 54.6\% |  | 205 | 0.000 | 3.0\% | $77.3 \%$ |
|  | (0.597) | (1.038) | (-0.508) | (2.632) | (0.975) | (-0.386) |  | $3.32 \%$ |  |  |  |  |
| DKL_HDZ | 0.017 | 0.224 | -0.222 | 0.227* | 1.338 | 0.235 | 55.9\% |  | 205 | 0.118 | 8.3\% | 23.6\% |
|  | (0.324) | (0.458) | (-0.629) | (2.540) | (1.276) | (0.665) |  | $3.24 \%$ |  |  |  |  |
| GM_RI | 0.019 | 0.156 | -0.391 | $0.265^{* * *}$ | -0.431 | -0.134 | 56.9\% |  | 205 | 0.014 | 9.7\% | 62.5\% |
|  | (0.533) | (0.463) | (-0.608) | (3.277) | (-0.397) | (-0.323) |  | 3.10\% |  |  |  |  |
| TrES_RW_10Ind | 0.024 | 0.082 | 0.139 | 0.229*** | -0.057 | 0.037 | 53.8\% |  | 205 | 0.000 | 8.3\% | 66.7\% |
|  | (0.978) | (0.838) | (0.423) | (3.365) | (-0.491) | (0.268) |  | $3.06 \%$ |  |  |  |  |
| MPEG_RI | -0.014 | 0.187 | -0.394 | 0.321* | -1.173 | -0.030 | 57.2\% |  | 205 | 0.000 | 11.1\% | 62.5\% |
|  | (-0.272) | (1.002) | (-0.578) | (2.405) | (-0.497) | (-0.051) |  | $2.79 \%$ |  |  |  |  |
| PE_HDZ | 0.027 | 0.262 | -0.378 | $0.216^{* * *}$ | 0.913 | 0.047 | 54.6\% |  | 205 | 0.070 | 16.7\% | 29.2\% |
|  | (0.782) | (0.652) | (-1.061) | (3.999) | (0.872) | (0.283) |  | 2.78\% |  |  |  |  |
| TPDPS_RW | 0.030 | 0.065 | -0.034 | $0.21 * * *$ | 0.017 | 0.117 | 57.2\% |  | 205 | 0.000 | 16.7\% | 77.8\% |
|  | (1.461) | (1.656) | (-0.110) | (3.616) | (0.165) | (0.592) |  | 2.45\% |  |  |  |  |
| KMY_HDZ | 0.035 | 0.106 | -0.151 | $0.215^{* * *}$ | 1.493 | 0.189 | 55.8\% |  | 205 | 0.139 | 6.9\% | 23.6\% |
|  | (0.652) | (0.178) | (-0.488) | (3.548) | (1.198) | (0.520) |  | 2.19\% |  |  |  |  |
| HL_HDZ | 0.034 | 0.180 | -0.062 | 0.184* | 1.002 | 0.047 | 55.2\% |  | 205 | 0.031 | 5.6\% | 29.2\% |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$\%_{0} \% \beta_{I C C}^{C S}=1$

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2} \mathrm{Imp}$ | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.046* | -0.084 | -0.361 | $0.256^{* *}$ | 0.843 | -0.010 | $56.1 \%$ |  | 205 | 0.000 | 4.2\% | 69.4\% |
|  | (1.993) | (-0.431) | (-0.680) | (3.061) | (1.555) | (-0.061) |  | 1.29\% |  |  |  |  |
| Carhart_Factor | 0.047* | -0.056 | -0.292 | 0.2 *** | -2.727 | -0.044 | 51.4\% |  | 205 | 0.005 | 4.2\% | 15.3\% |
|  | (2.352) | (-0.155) | (-0.743) | (3.762) | (-0.357) | (-0.238) |  | 1.14\% |  |  |  |  |
| GM_RW | 0.062 | -0.039 | 0.115 | $0.24 * * *$ | 2.408 | 0.318 | $53.8 \%$ |  | 205 | 0.000 | 4.3\% | 57.1\% |
|  | (1.704) | (-0.145) | (0.281) | (3.638) | (0.634) | (0.992) |  | 1.13\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.056 | -0.037 | -0.250 | 0.273* | 0.042 | 0.193 | 50.9\% |  | 205 | 0.000 | 6.9\% | 84.7\% |
|  | (1.661) | (-0.611) | (-0.798) | (2.500) | (0.485) | (0.809) |  | 1.07\% |  |  |  |  |
| PE_Anlst | 0.017 | 0.448 | 0.532 | 0.159 | 1.138 | 0.766 | 54\% |  | 205 | 0.328 | 15.3\% | 12.5\% |
|  | (0.300) | (0.797) | (0.571) | (0.915) | (0.878) | (0.628) |  | 1.04\% |  |  |  |  |
| GG_RW | 0.074 | -0.194 | -1.012 | 0.262 | 1.263 | -0.364 | 53.6\% |  | 205 | 0.000 | 5.3\% | 47.4\% |
|  | (1.470) | (-0.808) | (-0.723) | (1.109) | (1.240) | (-0.513) |  | 0.87\% |  |  |  |  |
| BP_RW | 0.021 | 0.202 | -0.197 | 0.341* | 0.253 | -0.077 | 53\% |  | 205 | 0.002 | 20.6\% | 27.9\% |
|  | (0.853) | (0.799) | (-0.367) | (2.445) | (0.977) | (-0.274) |  | 0.81\% |  |  |  |  |
| CT_RW | -0.001 | -0.021 | -2.674 | 0.592 | 0.258 | -1.473 | $53.1 \%$ |  | 205 | 0.002 | 4.8\% | 54.0\% |
|  | (-0.013) | (-0.065) | (-0.516) | (0.873) | (0.319) | (-0.449) |  | 0.67\% |  |  |  |  |
| GLS_EP | 0.100 | -0.245 | -0.381 | 0.188 | 0.611 | -0.126 | 54.3\% |  | 205 | 0.000 | 4.4\% | 72.1\% |
|  | (1.830) | (-0.900) | (-0.651) | (1.179) | (0.568) | $(-0.386)$ |  | 0.54\% |  |  |  |  |
| WNG_Anlst | 0.018 | 0.209 | -0.015 | 0.258*** | -0.294 | 0.042 | 52.8\% |  | 205 | 0.006 | 1.4\% | 62.5\% |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 5FF_Factor | (0.564) | (0.743) | (-0.051) | (3.275) | (-0.319) | (0.299) |  | 0.52\% |  |  |  |  |
|  | -0.058 | -0.317 | -1.145 | 0.159 | 3.558 | -1.491 | 50.3\% |  | 205 | 0.094 | 2.8\% | 12.5\% |
|  | (-0.274) | (-0.409) | (-0.610) | (0.928) | (0.497) | (-0.480) |  | 0.40\% |  |  |  |  |
| FPM_HDZ | 0.041 | 0.064 | 0.014 | 0.120 | -1.493 | -0.567 | 52.6\% |  | 205 | 0.009 | 8.3\% | 12.5\% |
|  | (0.878) | (0.182) | (0.032) | (0.631) | (-0.377) | (-0.596) |  | 0.29\% |  |  |  |  |
| BP_RI | 0.033 | 0.288 | -0.043 | 0.178 | 0.196 | 0.034 | 52.3\% |  | 205 | 0.001 | 23.9\% | 15.5\% |
|  | (1.095) | (1.381) | (-0.141) | (1.322) | (0.837) | (0.135) |  | 0.25\% |  |  |  |  |
| GLS_RI | 0.030 | 0.120 | 0.089 | 0.232 | 0.520 | 0.011 | 53\% |  | 205 | 0.001 | 2.9\% | 67.6\% |
|  | (0.625) | (0.455) | (0.138) | (1.851) | (0.600) | (0.027) |  | 0.25\% |  |  |  |  |
| GG_HDZ | 0.068 | -0.432 | -0.259 | 0.242*** | 2.771 | 0.253 | 54.2\% |  | 205 | 0.346 | 8.3\% | 26.4\% |
|  | (0.660) | (-0.286) | (-0.681) | (3.391) | (0.836) | (0.364) |  | 0.24\% |  |  |  |  |
| TrES_EP_10Ind | 0.025 | -0.015 | -0.557 | 0.239*** | -0.152 | 0.192 | 52\% |  | 205 | 0.000 | 2.8\% | 81.9\% |
|  | (1.142) | (-0.315) | (-0.430) | (3.191) | (-1.146) | (0.592) |  | 0.22\% |  |  |  |  |
| GG_EP | 0.052 | -0.102 | -1.151 | 0.271 | 0.269 | -0.656 | 52.7\% |  | 205 | 0.000 | 0.0\% | 54.4\% |
|  | (1.225) | (-0.362) | (-0.577) | (0.971) | (0.357) | (-0.635) |  | 0.21\% |  |  |  |  |
| GG_RI | 0.061 | -0.418 | -0.351 | 0.199 | 2.921 | 0.010 | 52.8\% |  | 205 | 0.009 | 0.0\% | 39.7\% |
|  | (1.490) | (-0.789) | (-0.610) | (1.314) | (0.759) | (0.024) |  | 0.17\% |  |  |  |  |
| PEG_RI | 0.037 | 0.021 | -0.533 | 0.244*** | 0.201 | -0.228 | 53.8\% |  | 205 | 0.000 | 9.4\% | 85.9\% |
|  | (1.175) | (0.212) | (-1.025) | (3.903) | (0.261) | (-0.644) |  | 0.04\% |  |  |  |  |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst _10Ind | 0.010 | 0.054 | -0.315 | 0.199*** | -0.278 | -0.021 | 50\% |  | 205 | 0.000 | 11.1\% | 66.7\% |
|  | (0.231) | (0.502) | (-0.408) | (3.149) | (-0.762) | (-0.109) |  | -0.18\% |  |  |  |  |
| HL_RW | -0.119 | 0.520 | -0.777 | 0.254** | 1.317 | -0.170 | 51.2\% |  | 205 | 0.520 | 4.2\% | 51.4\% |
|  | (-0.492) | (0.699) | (-0.959) | (2.713) | (0.496) | (-0.404) |  | -0.24\% |  |  |  |  |
| FGHJ_RI | 0.055 | -0.042 | -0.443 | 0.236* | 0.726 | 0.221 | 51.5\% |  | 205 | 0.000 | 4.4\% | 66.2\% |
|  | (1.371) | (-0.157) | (-0.591) | (2.153) | (0.589) | (0.469) |  | -0.32\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.038 | -0.033 | -0.261 | 0.224*** | 0.006 | 0.011 | 50.7\% |  | 205 | 0.000 | 1.4\% | 58.3\% |
|  | (1.768) | (-0.379) | (-0.928) | (4.032) | (0.066) | (0.084) |  | -0.32\% |  |  |  |  |
| DKL_RW | -2.397 | 5.439 | -1.097 | -0.047 | 63.739 | -0.007 | 51.3\% |  | 205 | 0.647 | 2.8\% | 44.4\% |
|  | (-0.566) | (0.563) | (-0.720) | (-0.092) | (0.489) | (-0.006) |  | -0.41\% |  |  |  |  |
| PEG_RW | 0.081 | -0.073 | -0.387 | 0.208** | -0.094 | 0.412 | 53.7\% |  | 205 | 0.000 | 4.3\% | 100.0\% |
|  | (1.423) | (-0.674) | (-0.415) | (3.038) | (-0.082) | (0.614) |  | -0.50\% |  |  |  |  |
| FGHJ_RW | 0.036 | 0.102 | -1.159 | 0.345 | 0.496 | -0.359 | 49.2\% |  | 205 | 0.000 | 1.5\% | 39.7\% |
|  | (1.421) | (0.674) | (-0.750) | (1.704) | (1.326) | (-0.407) |  | -0.54\% |  |  |  |  |
| KMY_RW | -0.117 | 0.493 | -0.733 | 0.254** | 1.432 | -0.185 | 51.4\% |  | 205 | 0.498 | 4.2\% | 45.8\% |
|  | (-0.486) | (0.664) | (-0.933) | (2.706) | (0.539) | (-0.438) |  | -0.62\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.038 | 0.107 | -0.296 | 0.239*** | -0.095 | 0.050 | 49.3\% |  | 205 | 0.000 | 2.8\% | 55.6\% |
|  | (1.780) | (0.970) | (-0.977) | (4.564) | (-0.308) | (0.361) |  | -0.67\% |  |  |  |  |
| PEG_HDZ | 0.020 | 0.156 | 0.037 | 0.204*** | 1.399 | -0.080 | 51.4\% |  | 205 | 0.000 | 2.8\% | 48.6\% |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_EP_25SBM | (0.673) | (0.776) | (0.131) | (3.280) | (1.267) | (-0.286) |  | -1.15\% |  |  |  |  |
|  | 0.052* | -0.026 | -0.050 | 0.169*** | 0.020 | -0.009 | 44.6\% |  | 205 | 0.000 | 0.0\% | 94.4\% |
|  | (2.179) | (-1.016) | (-0.221) | (4.020) | (0.951) | (-0.094) |  | -1.17\% |  |  |  |  |
| FPM_RI | 0.059 | -0.010 | -0.304 | 0.187*** | 0.324 | 0.187 | 51.1\% |  | 205 | 0.000 | 5.6\% | 55.6\% |
|  | (1.690) | (-0.051) | (-0.436) | (3.858) | (0.709) | (0.754) |  | -1.34\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.043 | 0.016 | -0.243 | 0.221* | -0.060 | 0.161 | 47.6\% |  | 205 | 0.000 | 9.7\% | 79.2\% |
|  | (1.487) | (0.389) | (-1.017) | (2.487) | (-0.772) | (0.649) |  | -1.73\% |  |  |  |  |
| FPM_RW | -0.373 | 0.116 | 0.001 | 0.236*** | 0.717 | 0.061 | 51.7\% |  | 205 | 0.002 | 4.2\% | 51.4\% |
|  | (-0.329) | (0.427) | (0.002) | (3.272) | (1.782) | (0.219) |  | -1.76\% |  |  |  |  |
| TrOHE_25SBM | 0.025 | 0.113 | -0.090 | 0.196** | -0.038 | -0.226 | 47.5\% |  | 205 | 0.000 | 2.8\% | 56.9\% |
|  | (0.563) | (0.659) | (-0.337) | (2.886) | (-0.414) | (-0.373) |  | -1.86\% |  |  |  |  |
| MPEG_HDZ | 0.017 | 0.357 | -0.112 | 0.193** | 0.747 | 0.239 | 49.8\% |  | 205 | 0.072 | 0.0\% | 44.4\% |
|  | (0.641) | (1.016) | (-0.343) | (2.886) | (1.086) | (0.759) |  | -2.19\% |  |  |  |  |
| CT_HDZ | -0.349 | 4.297 | -1.647 | -0.320 | 1.811 | 0.114 | 51.2\% |  | 205 | 0.657 | 6.9\% | 29.2\% |
|  | (-0.521) | (0.582) | (-0.609) | (-0.307) | (1.040) | (0.319) |  | -2.50\% |  |  |  |  |
| MPEG_RW | 0.035 | 0.261 | -0.211 | 0.18* | 1.011 | 0.105 | 48.5\% |  | 205 | 0.023 | 1.4\% | 66.2\% |
|  | (0.347) | (0.820) | (-0.451) | (2.520) | (0.778) | (0.312) |  | -2.54\% |  |  |  |  |
| WNG_EP | 0.036 | 0.033 | -0.143 | 0.23*** | -0.057 | 0.007 | 49.6\% |  | 205 | 0.000 | 5.6\% | 87.5\% |
|  | (1.663) | (0.594) | (-0.280) | (3.533) | (-0.559) | (0.046) |  | -2.64\% |  |  |  |  |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_EP_10Ind | 0.043 | 0.058 | -0.055 | 0.256* | -0.139 | 0.012 | 49.7\% |  | 205 | 0.000 | 4.2\% | 66.7\% |
|  | (1.189) | (0.636) | (-0.238) | (2.403) | (-0.722) | (0.069) |  | -2.69\% |  |  |  |  |
| WNG_HDZ | 0.028 | -0.032 | -0.492 | $0.227^{* * *}$ | -0.132 | 0.150 | 47\% |  | 205 | 0.000 | 1.4\% | 93.1\% |
|  | (1.635) | (-0.922) | (-0.852) | (3.657) | (-0.150) | (0.356) |  | -2.70\% |  |  |  |  |
| TrOHE_10Ind | 0.066 | -0.128 | 0.208 | 0.238*** | 0.769 | 0.078 | 48.2\% |  | 205 | 0.047 | 6.9\% | 18.1\% |
|  | (1.455) | (-0.231) | (0.603) | (4.057) | (0.494) | (0.433) |  | -3.03\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.044* | 0.037 | -0.027 | $0.201 * * *$ | -0.028 | -0.085 | 47.3\% |  | 205 | 0.000 | 2.8\% | 72.2\% |
|  | (2.289) | (0.371) | (-0.112) | (4.648) | (-0.231) | (-0.864) |  | -3.09\% |  |  |  |  |
| KMY_RI | 0.053 | -0.003 | -0.221 | $0.218 * * *$ | 0.350 | 0.121 | 46.2\% |  | 205 | 0.000 | 1.4\% | 50.0\% |
|  | (1.736) | (-0.017) | (-0.488) | (4.016) | (1.010) | (0.480) |  | -3.12\% |  |  |  |  |
| CT_RI | 0.063 | -0.064 | -0.371 | 0.185 | 0.104 | -0.094 | 48.8\% |  | 205 | 0.000 | 7.0\% | 71.8\% |
|  | (1.709) | (-0.680) | (-0.462) | (1.031) | (0.201) | (-0.243) |  | -3.20\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.063** | 0.039 | -0.493 | 0.214** | -0.234 | -0.152 | 43\% |  | 205 | 0.000 | 6.9\% | 86.1\% |
|  | (2.846) | (0.754) | (-0.829) | (2.939) | (-0.490) | (-0.432) |  | -3.57\% |  |  |  |  |
| GM_HDZ | 0.030 | 0.102 | -0.330 | 0.22* | 0.462 | -0.034 | 48.8\% |  | 205 | 0.003 | 2.8\% | 33.3\% |
|  | (1.041) | (0.357) | (-0.756) | (2.529) | (0.403) | (-0.101) |  | -3.72\% |  |  |  |  |
| KMY_EP | 0.081 | -0.048 | -1.032 | 0.276 | 0.738 | -0.268 | 49.3\% |  | 205 | 0.000 | 4.2\% | 46.5\% |
|  | (1.166) | (-0.244) | (-0.623) | (1.075) | (1.036) | (-0.237) |  | -3.84\% |  |  |  |  |
| CT_EP | 0.089 | 0.626 | 9.549 | -1.017 | 0.127 | 6.185 | 48.5\% |  | 205 | 0.748 | 9.9\% | 59.2\% |

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Table 90 : Capturing Subsequent Return: Low Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_EP | (0.782) | (0.538) | (0.510) | (-0.423) | (0.179) | (0.522) |  | -3.85\% |  |  |  |  |
|  | 0.000 | 0.187 | -0.179 | $0.233 * * *$ | 0.041 | -0.078 | 49.2\% |  | 205 | 0.011 | 6.9\% | 48.6\% |
|  | (0.001) | (0.604) | (-0.606) | (3.865) | (0.097) | (-0.421) |  | -3.89\% |  |  |  |  |
| DKL_EP | 0.053 | -0.010 | -1.118 | 0.230 | 0.881 | -0.622 | 47.5\% |  | 205 | 0.000 | 5.6\% | 59.2\% |
|  | (1.197) | (-0.065) | (-0.774) | (0.908) | (0.906) | (-0.751) |  | -4.12\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.022 | 0.000 | -0.213 | $0.222 * * *$ | 0.060 | 0.203 | 47.7\% |  | 205 | 0.000 | 1.4\% | 63.9\% |
|  | (0.711) | (0.003) | (-0.814) | (4.194) | (0.324) | (0.688) |  | -4.35\% |  |  |  |  |
| HL_EP | 0.045 | 0.014 | -1.046 | 0.246 | 0.393 | -0.544 | 47.8\% |  | 205 | 0.000 | 5.6\% | 59.2\% |
|  | (1.075) | (0.095) | (-0.728) | (0.979) | (0.821) | (-0.667) |  | -4.46\% |  |  |  |  |
| WNG_RI | 0.044 | -0.002 | -0.293 | 0.175*** | -0.013 | 0.438 | 47.2\% |  | 205 | 0.000 | 1.4\% | 88.7\% |
|  | (1.651) | (-0.047) | (-0.765) | (3.824) | (-0.079) | (0.535) |  | -5.76\% |  |  |  |  |
| TrES_HDZ_25SBM | 0.041* | 0.003 | 0.133 | $0.176 * * *$ | -0.004 | -0.037 | 42.6\% |  | 205 | 0.000 | 1.4\% | 84.7\% |
|  | (2.194) | (0.085) | (0.384) | (3.583) | (-0.089) | (-0.418) |  | -6.65\% |  |  |  |  |
| TrES_RW_25SBM | 0.042* | -0.001 | -0.020 | 0.216* | 0.017 | 0.065 | 39.9\% |  | 205 | 0.000 | 1.4\% | 84.7\% |
|  | (1.969) | (-0.031) | (-0.062) | (2.219) | (0.335) | (0.429) |  | -6.72\% |  |  |  |  |

For the lowest quartile of firms in terms of market beta standard error (as proxy for company specific risk), this table reports average monthly regression coefficients of one year subsequent return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly
regressions, and it represents how much of the variation in subsequent return is captured by the model. $R^{2}$ Imp. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+\mathbf{s i g}$ is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Naive | 0.012 | 0.179*** | 0.336* | 0.489*** | 0.038 | -0.028 | 66.3\% |  | 205 | 0.000 | 52.5\% | 95.0\% |
|  | (1.306) | (6.738) | (1.993) | (16.024) | (1.044) | (-0.391) |  | 6.27\% |  |  |  |  |
| TPDPS_Anlst | 0.009 | 0.173*** | 0.321 | $0.491^{* * *}$ | 0.041 | -0.032 | 66.2\% |  | 205 | 0.000 | 52.5\% | 94.5\% |
|  | (0.953) | (6.814) | (1.951) | (16.666) | (1.143) | (-0.453) |  | 6.13\% |  |  |  |  |
| TPDPS_HDZ | 0.008 | 0.166*** | 0.286 | 0.489*** | 0.039 | -0.028 | 66\% |  | 205 | 0.000 | 54.0\% | 94.5\% |
|  | (0.905) | (6.820) | (1.777) | (17.129) | (1.092) | (-0.397) |  | 5.86\% |  |  |  |  |
| BP_Anlst | 0.013 | 1.044*** | $0.631^{* * *}$ | $0.474 * * *$ | 0.441 | -0.258 | 65\% |  | 205 | 0.740 | 56.0\% | 43.5\% |
|  | (1.088) | (7.870) | (3.607) | (18.507) | (1.509) | (-2.087) |  | 5.46\% |  |  |  |  |
| BP_HDZ | -0.003 | 1.091*** | 0.232 | 0.48*** | 0.275 | -0.019 | 64.8\% |  | 205 | 0.529 | 56.5\% | 39.0\% |
|  | (-0.278) | (7.545) | (1.427) | (17.708) | (1.332) | (-0.231) |  | 5.14\% |  |  |  |  |
| TPDPS_RW | 0.021* | 0.094*** | 0.110 | 0.496*** | 0.054 | -0.071 | 64.4\% |  | 205 | 0.000 | 43.5\% | 96.0\% |
|  | (2.231) | (4.264) | (0.770) | (21.452) | (1.394) | (-0.576) |  | 4.69\% |  |  |  |  |
| TPDPS_EP | 0.015 | 0.115*** | 0.259 | $0.481^{* * *}$ | 0.014 | -0.078 | 64.5\% |  | 205 | 0.000 | 49.0\% | 95.5\% |
|  | (1.461) | (4.776) | (1.371) | (15.460) | (0.392) | (-0.992) |  | 4.39\% |  |  |  |  |
| TPDPS_RI | 0.016 | 0.114*** | 0.248 | $0.474 * * *$ | 0.032 | -0.079 | 63.8\% |  | 205 | 0.000 | 47.0\% | 95.0\% |
|  | (1.622) | (4.566) | (1.354) | (15.563) | (0.849) | (-1.051) |  | 3.74\% |  |  |  |  |
| BP_RW | 0.02* | 0.85*** | 0.272 | $0.469 * * *$ | 0.268 | -0.035 | 62.8\% |  | 205 | 0.337 | 43.5\% | 47.5\% |
|  | (1.983) | (5.439) | (1.537) | (16.332) | (1.199) | (-0.428) |  | 3.43\% |  |  |  |  |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | -0.015 | 1.197*** | 0.89*** | 0.461 *** | -1.840 | -0.223 | 62.8\% |  | 205 | 0.205 | 50.0\% | $38.5 \%$ |
|  | (-1.293) | (7.730) | (3.308) | (16.883) | (-0.742) | (-1.366) |  | 3.18\% |  |  |  |  |
| BP_RI | 0.003 | $0.846 * * *$ | 0.123 | $0.466 * * *$ | 0.331 | -0.019 | 62.6\% |  | 205 | 0.322 | 49.5\% | 51.5\% |
|  | (0.282) | (5.473) | (0.751) | (16.659) | (1.624) | (-0.233) |  | 3.16\% |  |  |  |  |
| BP_EP | 0.002 | 0.8*** | 0.054 | 0.463*** | 0.276 | -0.039 | 62.7\% |  | 205 | 0.176 | 47.5\% | 51.5\% |
|  | (0.197) | (5.430) | (0.313) | $(16.396)$ | (1.349) | (-0.468) |  | 3.11\% |  |  |  |  |
| CT_Anlst | 0.015 | -0.172 | -0.064 | $0.441^{* * *}$ |  | -0.276 | 61.7\% |  | 205 | 0.168 | 33.5\% | 39.0\% |
|  | (0.416) | (-0.203) | (-0.200) | (8.820) | (2.209) | (-0.882) |  | 2.25\% |  |  |  |  |
| FPM_Anlst | -0.054 | 1.275 | 0.510 | 0.45*** | 0.370 | -0.109 | 60.8\% |  | 205 | 0.673 | 24.5\% | 28.0\% |
|  | (-1.423) | (1.959) | (1.216) | (11.713) |  | (-0.535) |  | 1.81\% |  |  |  |  |
| PE_RI | 0.044*** | -0.151 | -0.016 | 0.47*** | 1.73* | -0.138 | 60.5\% |  | 205 | 0.000 | 24.0\% | 72.0\% |
|  | (3.746) | (-0.732) | (-0.044) | (13.083) | (2.109) | (-1.493) |  | 1.59\% |  |  |  |  |
| TrES_RW_25SBM | 0.046*** | -0.586 | -0.049 | 0.464*** | 0.989 | -0.068 | 59.9\% |  | 205 | 0.514 | 8.0\% | 81.0\% |
|  | (4.495) | (-0.242) | (-0.337) | (15.740) | (0.695) | (-0.603) |  | 1.52\% |  |  |  |  |
| FGHJ_Anlst | 0.002 | 0.245 | -0.080 | 0.478*** | $2.177 * * *$ | 0.059 | 61.5\% |  | 205 | 0.004 | 19.0\% | 36.5\% |
|  | (0.080) | (0.952) | (-0.477) | (18.964) | (3.198) | (0.687) |  | 1.46\% |  |  |  |  |
| TrES_RI_10Ind | 0.047** | -0.019 | -0.014 | 0.442*** | -0.015 | -0.190 | 60\% |  | 205 | 0.000 | 16.5\% | 97.5\% |
|  | (2.841) | (-0.915) | (-0.148) | (17.378) | (-0.445) | (-1.748) |  | 1.42\% |  |  |  |  |
| GLS_Anlst | 0.007 | 0.261 | -0.026 | 0.475*** | 1.886*** | 0.024 | 61.5\% |  | 205 | 0.002 | 19.0\% | 40.5\% |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_Anlst | (0.322) | (1.099) | (-0.166) | (18.774) | (3.306) | (0.272) |  | 1.38\% |  |  |  |  |
|  | -0.004 | 0.413* | 0.198 | 0.48*** | 0.853 | -0.021 | 61.2\% |  | 205 | 0.001 | 27.5\% | 29.0\% |
|  | (-0.203) | (2.468) | (1.661) | (20.058) | (1.704) | (-0.218) |  | 1.35\% |  |  |  |  |
| MPEG_Anlst | 0.017 | 0.233* | 0.071 | $0.465^{* * *}$ | 0.246 | -0.111 | 60.3\% |  | 205 | 0.000 | 22.0\% | 52.0\% |
|  | (1.174) | (2.187) | (0.635) | (19.790) | (0.978) | (-1.009) |  | 1.29\% |  |  |  |  |
| HL_Anlst | -0.006 | 0.499 | 0.269 | $0.461 * * *$ | 0.777* | -0.163 | 61\% |  | 205 | 0.057 | 25.0\% | 38.5\% |
|  | (-0.220) | (1.910) | (1.808) | (18.878) | (2.294) | (-1.207) |  | 1.28\% |  |  |  |  |
| PE_HDZ | 0.018 | 0.415** | 0.026 | $0.484 * * *$ | 1.244* | -0.134 | 61\% |  | 205 | 0.000 | 25.0\% | 62.5\% |
|  | (1.670) | (2.999) | (0.212) | (19.853) | (2.061) | (-1.768) |  | 1.27\% |  |  |  |  |
| GM_HDZ | 0.026 | 0.245 | 0.046 | $0.466 * * *$ | 0.722 | -0.171 | 60.7\% |  | 205 | 0.000 | 20.0\% | 68.0\% |
|  | (1.376) | (1.743) | (0.233) | (15.767) | (1.217) | (-1.636) |  | 1.24\% |  |  |  |  |
| GM_Anlst | -0.033 | 0.739 | 0.356 | $0.404 * * *$ | 0.600 | -0.550 | 60.5\% |  | 205 | 0.595 | 25.5\% | 43.5\% |
|  | (-0.682) | (1.513) | (1.489) | (5.148) | (1.628) | (-1.070) |  | 1.23\% |  |  |  |  |
| GM_RW | 0.020 | 0.062** | -0.027 | 0.47*** | 0.777*** | -0.048 | 60\% |  | 205 | 0.000 | 8.3\% | 90.2\% |
|  | (1.841) | (2.686) | (-0.193) | (17.509) | (3.762) | (-0.702) |  | 1.01\% |  |  |  |  |
| KMY_Anlst | -0.017 | 0.360 | 0.159 | 0.451*** | 0.592* | -0.253 | 59.9\% |  | 205 | 0.017 | 20.0\% | 55.0\% |
|  | (-0.615) | (1.351) | (1.082) | (18.263) | (2.172) | (-1.941) |  | 1.00\% |  |  |  |  |
| MPEG_HDZ | 0.020 | 0.248* | 0.046 | $0.472 * * *$ | 0.614 | -0.143 | 60.3\% |  | 205 | 0.000 | 15.0\% | 68.0\% |
|  | (1.134) | (2.348) | (0.262) | (16.466) | (1.342) | (-1.542) |  | 0.99\% |  |  |  |  |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst _10Ind | 0.042*** | -0.004 | 0.096 | $0.475^{* * *}$ | 0.046 | -0.124 | 59.6\% |  | 205 | 0.000 | 13.5\% | 95.0\% |
|  | (4.145) | (-0.278) | (0.922) | (17.109) | (1.766) | (-1.686) |  | 0.91\% |  |  |  |  |
| GG_Anlst | 0.022 | -0.030 | -0.473 | 0.504*** | 1.830 | 0.074 | 59.4\% |  | 205 | 0.000 | 14.1\% | 70.7\% |
|  | (1.121) | (-0.201) | (-0.838) | (13.985) | (1.150) | (0.353) |  | 0.89\% |  |  |  |  |
| GM_RI | 0.013 | 0.223* | -0.227 | $0.5 * * *$ | -0.622 | 0.189 | 60.1\% |  | 205 | 0.000 | 16.8\% | 70.6\% |
|  | (0.695) | (2.134) | (-1.057) | (15.170) | (-0.351) | (0.873) |  | 0.87\% |  |  |  |  |
| PEG_Anlst | 0.028* | 0.120 | 0.041 | 0.456*** | 0.237 | -0.056 | 59.7\% |  | 205 | 0.000 | 9.0\% | 58.0\% |
|  | (2.264) | (1.255) | (0.370) | (20.100) | (0.779) | (-0.510) |  | 0.85\% |  |  |  |  |
| MPEG_EP | 0.029* | 0.061 | 0.082 | 0.473*** | 0.116 | -0.417 | 59.7\% |  | 205 | 0.000 | 13.5\% | 85.5\% |
|  | (2.474) | (0.734) | (0.591) | (18.691) | (0.258) | (-1.843) |  | 0.83\% |  |  |  |  |
| FPM_HDZ | 0.004 | 0.391** | -0.188 | 0.472*** | 0.236 | -0.110 | 59.9\% |  | 205 | 0.000 | 12.0\% | 55.5\% |
|  | (0.234) | (2.745) | (-1.457) | (19.999) | (0.754) | (-2.019) |  | 0.81\% |  |  |  |  |
| HL_HDZ | 0.014 | 0.308* | 0.055 | 0.473*** | 1.354* | -0.189 | 60.3\% |  | 205 | 0.000 | 19.0\% | 65.0\% |
|  | (0.847) | (2.295) | (0.380) | (18.883) | (2.338) | (-1.855) |  | 0.79\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.056*** | 0.007 | 0.067 | 0.463*** | 0.000 | -0.093 | 58.7\% |  | 205 | 0.000 | 7.5\% | 98.5\% |
|  | (4.683) | (1.193) | (0.464) | (18.229) | (0.059) | (-1.483) |  | 0.76\% |  |  |  |  |
| TrES_HDZ_25SBM | $0.055 * * *$ | 0.031 | -0.089 | $0.442 * * *$ | 0.012 | -0.175 | 59.9\% |  | 205 | 0.000 | 6.5\% | 98.0\% |
|  | (4.916) | (1.422) | (-0.329) | (14.959) | (0.449) | (-1.695) |  | 0.75\% |  |  |  |  |
| KMY_HDZ | 0.014 | $0.348 * * *$ | 0.042 | 0.477*** | $1.952 * * *$ | -0.205 | 60.4\% |  | 205 | 0.000 | 19.5\% | 62.5\% |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_HDZ | (1.210) | (3.503) | (0.329) | (18.764) | (3.570) | (-1.590) |  | 0.68\% |  |  |  |  |
|  | 0.011 | 0.269** | -0.091 | 0.491*** | $2.254 * * *$ | -0.061 | 60.8\% |  | 205 | 0.000 | 19.5\% | 63.5\% |
|  | (0.748) | (2.644) | (-0.645) | (16.254) | (3.238) | (-1.016) |  | 0.66\% |  |  |  |  |
| DKL_HDZ | 0.011 | 0.356* | 0.051 | 0.48*** | 1.777** | -0.216 | 59.9\% |  | 205 | 0.000 | 18.0\% | 62.0\% |
|  | (0.714) | (2.539) | (0.370) | (18.895) | (2.897) | (-1.626) |  | 0.65\% |  |  |  |  |
| MPEG_RW | 0.024* | 0.097** | -0.075 | 0.474*** | 0.765*** | -0.066 | 59.5\% |  | 205 | 0.000 | 10.6\% | 91.0\% |
|  | (2.173) | (2.944) | (-0.542) | (17.795) | (4.409) | (-0.915) |  | 0.64\% |  |  |  |  |
| TrES_RW_10Ind | 0.042** | 3.919 | 0.010 | $0.487^{* * *}$ | 13.653 | -0.135 | 58.9\% |  | 205 | 0.305 | 12.5\% | 75.0\% |
|  | (2.825) | (1.381) | (0.031) | (15.468) | (1.340) | (-0.709) |  | 0.64\% |  |  |  |  |
| GLS_HDZ | 0.014 | 0.261 ** | -0.130 | 0.492*** | $2.181 * * *$ | -0.068 | 60.7\% |  | 205 | 0.000 | 17.5\% | 63.5\% |
|  | (1.053) | (2.710) | (-0.789) | (15.316) | (3.313) | (-1.105) |  | 0.63\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.058*** | -0.061 | -0.032 | $0.479 * * *$ | 0.046 | -0.095 | 58.7\% |  | 205 | 0.000 | 4.5\% | 89.5\% |
|  | (5.850) | (-1.164) | (-0.239) | (16.986) | (0.999) | (-0.883) |  | 0.59\% |  |  |  |  |
| HL_RW | 0.076* | -0.020 | 0.113 | 0.48*** | 0.213 | 0.073 | 58.4\% |  | 205 | 0.000 | 7.5\% | 84.5\% |
|  | (2.264) | (-0.464) | (0.650) | (16.407) | (0.874) | (0.535) |  | 0.57\% |  |  |  |  |
| CT_HDZ | 0.022 | 0.282*** | 0.076 | 0.477*** | 2.114 | -0.230 | 59.8\% |  | 205 | 0.000 | 20.5\% | 67.5\% |
|  | (1.934) | (3.532) | (0.557) | (19.042) | (1.577) | (-1.696) |  | 0.57\% |  |  |  |  |
| KMY_RW | 0.073* | -0.007 | 0.114 | 0.479*** | 0.259 | 0.073 | 58.4\% |  | 205 | 0.000 | 8.5\% | 81.0\% |
|  | (2.193) | (-0.155) | (0.656) | (16.390) | (1.053) | (0.538) |  | 0.55\% |  |  |  |  |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_EP | 0.013 | 0.082 | -0.307 | 0.493*** | 1.055 | -0.158 | 59.2\% |  | 205 | 0.000 | 12.0\% | 80.5\% |
|  | (0.676) | (1.943) | (-0.932) | (13.865) | (1.333) | (-1.042) |  | 0.54\% |  |  |  |  |
| DKL_EP | 0.014 | 0.122*** | -0.116 | 0.487*** | 0.522 | 0.010 | 58.2\% |  | 205 | 0.000 | 20.5\% | 73.5\% |
|  | (1.325) | (3.603) | (-0.925) | (17.421) | (1.845) | (0.152) |  | 0.52\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.047*** | 0.012 | 0.057 | $0.473 * * *$ | -0.003 | -0.118 | 59.5\% |  | 205 | 0.000 | 8.5\% | 97.5\% |
|  | (3.752) | (1.461) | (0.232) | (13.554) | (-0.327) | (-1.577) |  | 0.50\% |  |  |  |  |
| DKL_RW | 0.062 | 0.019 | 0.080 | 0.481*** | 0.422 | 0.069 | 58.1\% |  | 205 | 0.000 | 6.5\% | 81.5\% |
|  | (1.853) | (0.393) | (0.451) | (15.925) | (1.533) | (0.514) |  | 0.49\% |  |  |  |  |
| GLS_EP | 0.017 | 0.135 | -0.265 | 0.501*** | 5.149 | 0.043 | 59.8\% |  | 205 | 0.000 | 13.5\% | 65.0\% |
|  | (1.412) | (1.066) | (-1.480) | (16.099) | (1.429) | (0.435) |  | 0.46\% |  |  |  |  |
| MPEG_RI | 0.011 | 0.182* | -0.198 | 0.505*** | -1.950 | 0.064 | 59.7\% |  | 205 | 0.000 | 20.6\% | 74.4\% |
|  | (0.659) | (2.115) | (-0.969) | (16.408) | (-0.547) | (0.568) |  | 0.45\% |  |  |  |  |
| TrOHE_10Ind | 0.05* | 0.044 | 0.294 | 0.442*** | 1.041 | -0.238 | 58.5\% |  | 205 | 0.000 | 10.5\% | 60.0\% |
|  | (1.975) | (0.173) | (0.518) | (9.167) | (1.338) | (-1.327) |  | 0.43\% |  |  |  |  |
| PEG_EP | 0.031*** | 0.071 | -0.017 | 0.487*** | 0.490 | 0.003 | 59.1\% |  | 205 | 0.000 | 12.1\% | 100.0\% |
|  | (3.095) | (1.798) | (-0.103) | (15.234) | (1.105) | (0.021) |  | 0.42\% |  |  |  |  |
| CAPM_Factor | 0.154 | -9.125 | 0.013 | 0.468*** | 5.464 | 0.254 | 59.9\% |  | 205 | 0.217 | 15.0\% | 23.5\% |
|  | (1.345) | (-1.117) | (0.070) | (13.624) | (0.334) | (1.364) |  | 0.42\% |  |  |  |  |
| PEG_RI | $0.042 * * *$ | -0.056 | 0.265 | $0.455^{* * *}$ | 0.150 | -0.318 | 58.9\% |  | 205 | 0.000 | 16.4\% | 100.0\% |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | (3.379) | (-0.481) | (0.754) | (10.418) | (0.632) | (-1.168) |  | 0.36\% |  |  |  |  |
|  | 0.030 | 0.155 | -0.063 | 0.492*** | 0.901 | -0.057 | 59.7\% |  | 205 | 0.000 | 10.5\% | 67.5\% |
|  | (1.559) | (1.333) | (-0.301) | (12.356) | (1.650) | (-0.473) |  | 0.36\% |  |  |  |  |
| FGHJ_RW | 0.031*** | 0.027 | 0.007 | 0.476*** | 0.097 | -0.096 | 58.3\% |  | 205 | 0.000 | 9.4\% | 84.8\% |
|  | (3.230) | (0.271) | (0.061) | (19.841) | (0.198) | (-1.601) |  | 0.34\% |  |  |  |  |
| CT_EP | 0.018 | 0.048 | -0.269 | 0.476*** | 0.581 | 0.023 | 58.3\% |  | 205 | 0.000 | 14.0\% | 85.0\% |
|  | (0.838) | (0.480) | (-1.041) | (14.457) | (1.488) | (0.267) |  | 0.34\% |  |  |  |  |
| TrES_Anlst_25SBM | 0.045*** | 0.001 | 0.089 | $0.471^{* * *}$ | -0.005 | -0.069 | 59.1\% |  | 205 | 0.000 | 5.5\% | 98.0\% |
|  | (4.709) | (0.083) | (0.396) | (16.983) | (-0.453) | (-0.845) |  | 0.32\% |  |  |  |  |
| FGHJ_EP | 0.029* | 0.046 | -0.221 | $0.496 * * *$ | $3.179 * *$ | 0.041 | 59.5\% |  | 205 | 0.000 | 15.5\% | 71.5\% |
|  | (2.060) | (0.288) | (-1.312) | (16.165) | (2.912) | (0.414) |  | 0.30\% |  |  |  |  |
| TrETSS_Anlst_10Ind | 0.057*** | 0.098 | 0.363 | 0.442*** | 0.032 | -0.355 | 58.7\% |  | 205 | 0.000 | 5.5\% | 76.5\% |
|  | (3.942) | (0.656) | (0.834) | (11.936) | (0.214) | (-1.363) |  | 0.30\% |  |  |  |  |
| GG_EP | 0.013 | -2.145 | -0.194 | 0.499*** | 1.133 | -0.011 | 58.9\% |  | 205 | 0.234 | 19.6\% | 64.0\% |
|  | (1.196) | (-0.815) | (-1.020) | (14.663) | (0.516) | (-0.091) |  | 0.26\% |  |  |  |  |
| PEG_RW | 0.054*** | -0.001 | 0.045 | 0.472*** | 0.526* | -0.029 | 58.8\% |  | 205 | 0.000 | 13.7\% | 100.0\% |
|  | (3.319) | (-0.024) | (0.222) | (13.938) | (2.318) | (-0.236) |  | 0.25\% |  |  |  |  |
| FGHJ_RI | 0.046*** | -0.118 | -0.134 | 0.479*** | -7.008 | -0.106 | 59.5\% |  | 205 | 0.000 | 13.0\% | 71.0\% |
|  | (4.069) | (-0.975) | (-1.144) | (20.561) | (-0.599) | (-1.753) |  | 0.23\% |  |  |  |  |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_EP | 0.009 | 0.171** | -0.086 | 0.462*** | 0.322 | -0.142 | 58.2\% |  | 205 | 0.000 | 21.0\% | 72.0\% |
|  | (0.927) | (3.025) | (-0.628) | (11.973) | (1.369) | (-0.654) |  | 0.22\% |  |  |  |  |
| PE_EP | 0.038*** | -0.243 | -0.136 | 0.51 *** | 2.166** | -0.016 | 59.4\% |  | 205 | 0.006 | 18.5\% | 70.5\% |
|  | (3.380) | (-0.541) | (-0.756) | (13.376) | (2.949) | (-0.058) |  | 0.21\% |  |  |  |  |
| FPM_EP | 0.034*** | 0.020 | 0.052 | 0.441*** | 0.023 | -0.157 | 58.6\% |  | 205 | 0.000 | 9.0\% | 95.5\% |
|  | (3.147) | (1.513) | (0.527) | (20.046) | (0.616) | (-1.971) |  | 0.19\% |  |  |  |  |
| CT_RW | 0.014 | 0.356 | -0.081 | 0.491*** | 2.131 | -0.211 | 58.9\% |  | 205 | 0.007 | 10.9\% | 72.4\% |
|  | (0.935) | (1.507) | (-0.545) | (17.549) | (1.122) | (-1.059) |  | 0.16\% |  |  |  |  |
| 3FF_Factor | 0.039** | 0.600 | 0.009 | 0.51 *** | -11.987 | -0.204 | 59.1\% |  | 205 | 0.407 | 7.5\% | 25.5\% |
|  |  |  |  | (12.567) | (-0.720) |  |  | 0.16\% |  |  |  |  |
| HL_EP | 0.019 | 0.084** | -0.129 | $0.491^{* * *}$ | 0.502 | 0.026 | 57.9\% |  | 205 | 0.000 | 15.5\% | 77.5\% |
|  | (1.904) |  | (-0.975) | (17.246) | (1.757) | (0.296) |  | 0.15\% |  |  |  |  |
| TrES_EP_10Ind | 0.037*** | 0.039 | -0.909 | $0.429 * * *$ | -0.458 | -0.213 | 58.8\% |  | 205 | 0.000 | 12.5\% | 94.0\% |
|  | (3.149) | (1.000) | (-0.841) | (11.196) | (-0.836) | (-1.483) |  | 0.13\% |  |  |  |  |
| GG_HDZ | 0.023* | 0.243** | 0.107 | $0.464 * * *$ | 0.405 | -0.148 | 59.7\% |  | 205 | 0.000 | 22.0\% | 61.0\% |
|  | (2.185) | (2.676) | (0.696) | (18.303) | (0.246) | (-0.920) |  | 0.12\% |  |  |  |  |
| WNG_Anlst | 0.05*** | -0.005 | 0.285 | $0.445^{* * *}$ | -0.829 | -0.073 | 58.6\% |  | 205 | 0.000 | 3.0\% | 98.0\% |
|  | (5.007) | (-0.639) | (0.691) | (9.284) | (-1.305) | (-0.657) |  | 0.12\% |  |  |  |  |
| TrETSS_EP_10Ind | 0.033* | 0.018 | -0.110 | 0.494*** | -0.030 | -0.109 | 58.1\% |  | 205 | 0.000 | 4.0\% | 97.0\% |

[^57]Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_RW | (2.100) | (0.911) | (-0.798) | (14.148) | (-0.754) | (-0.642) |  | 0.07\% |  |  |  |  |
|  | 0.042* | 0.059*** | -0.787 | 0.332* | 0.038 | -0.991 | 59.9\% |  | 205 | 0.000 | 9.5\% | 85.5\% |
|  | (2.203) | (3.090) | (-0.856) | (2.509) | (0.806) | (-0.937) |  | 0.06\% |  |  |  |  |
| WNG_RW | 0.046*** | 0.000 | -0.074 | 0.467*** | -0.015 | 0.001 | 58.2\% |  | 205 | 0.000 | 5.5\% | 99.0\% |
|  | (4.767) | (-1.567) | (-0.551) | (17.809) | (-0.638) | (0.002) |  | 0.05\% |  |  |  |  |
| TrETSS_RI_25SBM | $0.049 * * *$ | 0.009 | -0.029 | $0.471^{* * *}$ | -0.006 | -0.171 | 58.3\% |  | 205 | 0.000 | 7.0\% | 97.5\% |
|  | (4.362) | (1.183) | (-0.213) | (18.714) | (-0.543) | (-1.924) |  | 0.04\% |  |  |  |  |
| WNG_RI | 0.047*** | -0.004 | -0.073 | 0.474*** | 0.121 | -0.009 | 59.1\% |  | 205 | 0.000 | 5.5\% | 99.5\% |
|  | (5.008) | (-0.674) | (-0.527) | (15.800) | (1.410) | (-0.076) |  | 0.04\% |  |  |  |  |
| TrES_EP_25SBM | 0.036** | 0.020 | 0.004 | 0.453*** | -0.017 | -0.065 | 58.7\% |  | 205 | 0.000 | 4.5\% | 98.0\% |
|  | (2.852) | (0.726) | (0.042) | (15.127) | (-0.649) | (-0.832) |  | 0.02\% |  |  |  |  |
| WNG_EP | 0.062*** | 0.000 | -0.052 | 0.475*** | -0.002 | -0.149 | 58.5\% |  | 205 | 0.000 | 5.5\% | 99.0\% |
|  | (3.225) | (-0.867) | (-0.518) | (17.035) | (-0.145) | (-0.927) |  | -0.01\% |  |  |  |  |
| PE_RW | 0.034*** | 0.098 | -0.020 | 0.473*** | -0.311 | -0.050 | 59.3\% |  | 205 | 0.000 | 8.0\% | 89.9\% |
|  | (3.331) | (1.786) | (-0.116) | (18.625) | (-1.396) | (-0.686) |  | -0.02\% |  |  |  |  |
| FPM_RI | 0.048*** | -0.010 | 0.077 | 0.466*** | 0.032 | -0.169 | 59.3\% |  | 205 | 0.000 | 8.0\% | 84.5\% |
|  | (4.368) | (-0.238) | (0.679) | (18.540) | (0.603) | (-2.278) |  | -0.06\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.049*** | -0.037 | 0.053 | 0.472*** | 0.076 | -0.002 | 58\% |  | 205 | 0.000 | 5.0\% | 95.5\% |
|  | (5.128) | (-2.879) | (0.441) | (15.937) | (1.544) | (-0.021) |  | -0.06\% |  |  |  |  |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_25SBM | 0.044*** | 0.006 | -0.018 | $0.461 * * *$ | -0.017 | -0.080 | 58.3\% |  | 205 | 0.000 | 7.0\% | 89.5\% |
|  | (5.128) | (0.249) | (-0.209) | (20.374) | (-0.658) | (-1.258) |  | -0.06\% |  |  |  |  |
| TrES_RI_25SBM | 0.053*** | -0.011 | 0.009 | $0.484 * * *$ | 0.015 | -0.114 | 58.2\% |  | 205 | 0.000 | 4.5\% | 98.0\% |
|  | (4.129) | (-1.724) | (0.088) | (12.570) | (1.213) | (-1.525) |  | -0.07\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.059*** | -0.015 | 0.124 | 0.464*** | 0.023 | -0.102 | 58\% |  | 205 | 0.000 | 5.5\% | 97.5\% |
|  | (4.503) | (-1.276) | (0.690) | (19.765) | (0.357) | (-1.657) |  | -0.08\% |  |  |  |  |
| TrOHE_25SBM | 0.05*** | -0.017 | -0.007 | 0.475*** | -0.014 | -0.051 | 57.6\% |  | 205 | 0.000 | 6.5\% | 84.5\% |
|  | (5.433) | (-0.253) | (-0.066) | (11.192) | (-0.303) | (-0.461) |  | -0.12\% |  |  |  |  |
| KMY_RI | 0.015 | 0.085 | -0.040 | $0.475 * * *$ | 0.322 | -0.006 | 58.4\% |  | 205 | 0.000 | 13.5\% | 70.5\% |
|  | (0.721) |  | (-0.281) | (17.266) |  |  |  | -0.16\% |  |  |  |  |
| GLS_RI | 0.038*** | -0.022 | -0.101 | $0.475 * * *$ | -52.075 | -0.075 | 59.4\% |  | 205 | 0.000 | 14.5\% | 70.0\% |
|  | (3.873) | (-0.225) | (-0.873) | (20.186) | (-0.858) | (-1.244) |  | -0.18\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.058*** | -0.068 | 0.205 | 0.504*** | -0.067 | 0.142 | 58.3\% |  | 205 | 0.000 | 13.0\% | 95.5\% |
|  | (3.203) | (-1.872) | (0.914) | (9.621) | (-1.154) | (0.414) |  | -0.21\% |  |  |  |  |
| Carhart_Factor | 0.043*** | -0.312 | -0.113 | $0.471 * * *$ | 1.139 | -0.012 | 58.2\% |  | 205 | 0.000 | 7.0\% | 45.5\% |
|  | (4.624) | (-2.163) | (-0.780) | (15.588) | (1.045) | (-0.094) |  | -0.24\% |  |  |  |  |
| 5FF_Factor | 0.047** | -0.738 | 0.072 | 0.429*** | 1.853 | 0.329 | 58.1\% |  | 205 | 0.055 | 10.5\% | 27.0\% |
|  | (2.728) | (-0.820) | (0.502) | (10.292) | (0.873) | (1.070) |  | -0.27\% |  |  |  |  |
| WNG_HDZ | 0.043*** | -0.001 | 0.196 | 0.49*** | 0.214 | -0.087 | 58.3\% |  | 205 | 0.000 | 3.5\% | 99.0\% |

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Table 91 : Capturing Subsequent Return: High Beta Standard Error Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_RI | (3.693) | (-0.662) | (0.975) | (14.510) | (0.747) | (-1.024) |  | -0.29\% |  |  |  |  |
|  | 0.024 | 0.056 | 0.008 | 0.46*** | 0.322 | -0.055 | 58\% |  | 205 | 0.000 | 4.5\% | 84.5\% |
|  | (1.646) | (0.896) | (0.062) | (17.239) | (0.771) | (-0.455) |  | -0.29\% |  |  |  |  |
| GLS_RW | -0.067 | 0.176 | 0.249 | 0.471*** | -0.074 | -0.030 | 57.1\% |  | 205 | 0.003 | 2.5\% | 85.5\% |
|  | (-0.283) | (0.637) | (0.788) | (12.730) | (-0.151) | (-0.191) |  | -0.35\% |  |  |  |  |
| HL_RI | 0.012 | 0.129 | -0.007 | $0.466^{* * *}$ | 0.287 | 0.019 | 58\% |  | 205 | 0.000 | 10.0\% | 79.0\% |
|  | (0.598) | (1.257) | (-0.049) | (17.093) | (0.752) | (0.168) |  | -0.37\% |  |  |  |  |
| GG_RI | 0.028** | 0.041 | -0.153 | 0.476*** | -1.264 | -0.126 | 57.8\% |  | 205 | 0.000 | 14.3\% | 67.7\% |
|  | (2.970) | (0.223) | (-0.854) | (18.473) | (-0.750) | (-1.285) |  | -0.42\% |  |  |  |  |
| GG_RW | 0.022* | 0.251** | 0.078 | 0.463*** | 0.797 | -0.140 | 58.9\% |  | 205 | 0.000 | 15.1\% | 69.4\% |
|  | (2.002) | (2.624) | (0.492) | (17.674) | (0.429) | (-0.840) |  | -0.45\% |  |  |  |  |
| DKL_RI | -0.001 | 0.143 | -0.047 | 0.46*** | 0.211 | 0.109 | 57.8\% |  | 205 | 0.000 | 10.0\% | 80.0\% |
|  | (-0.020) | (1.299) | (-0.319) | (16.233) | (0.499) | (0.573) |  | -0.49\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.051*** | -0.085 | 0.116 | 0.47*** | -0.048 | -0.072 | 57.3\% |  | 205 | 0.000 | 5.0\% | 84.0\% |
|  | (5.401) | (-1.443) | (0.932) | (17.562) | (-0.506) | (-0.608) |  | -1.03\% |  |  |  |  |

For the highest quartile of firms in terms of market beta standard error (as proxy for company specific risk), this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised,it }}=\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The $t$-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions,
and it represents how much of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_Anlst | -0.003 | 0.951*** | 0.746*** | 0.47 *** | 0.114 | -0.162 | 65.5\% |  | 205 | 0.782 | 45.8\% | 40.0\% |
|  | (-0.402) | (5.366) | (3.359) | (14.430) | (0.264) | (-1.947) |  | 7.16\% |  |  |  |  |
| BP_HDZ | -0.003 | 0.876*** | 0.797*** | 0.467*** | 0.693* | -0.171 | 65.3\% |  | 205 | 0.505 | 46.8\% | 40.5\% |
|  | (-0.360) | (4.726) | (3.844) | (14.083) | (2.100) | (-2.074) |  | 7.00\% |  |  |  |  |
| TPDPS_Anlst | 0.014 | 0.156** | 0.899** | 0.438*** | 0.098 | -0.181 | 65.5\% |  | 205 | 0.000 | 42.6\% | 91.1\% |
|  | (1.268) | (2.973) | (3.019) | (7.891) | (1.389) | (-1.698) |  | 6.31\% |  |  |  |  |
| TPDPS_HDZ | 0.012 | 0.121** | 0.84** | 0.463*** | 0.101 | -0.137 | 65.4\% |  | 205 | 0.000 | 42.6\% | 91.1\% |
|  | (1.383) | (2.910) | (3.039) | (11.084) | (1.520) | (-1.777) |  | 6.30\% |  |  |  |  |
| Naive | 0.013 | 0.158*** | 0.752* | $0.457 * * *$ | 0.131 | -0.189 | 65.3\% |  | 205 | 0.000 | 39.5\% | 90.5\% |
|  | (1.382) | (3.124) | (2.368) | (10.438) | (1.839) | (-2.207) |  | 6.14\% |  |  |  |  |
| TPDPS_RI | 0.014 | 0.106* | 0.76* | $0.448 * * *$ | 0.131 | -0.196 | 64.8\% |  | 205 | 0.000 | 35.8\% | 93.2\% |
|  | (1.490) | (2.241) | (2.555) | (10.378) | (1.794) | (-2.312) |  | 5.82\% |  |  |  |  |
| BP_RW | 0.009 | 0.724*** | 0.733** | $0.443 * * *$ | 0.483 | -0.184 | 63.6\% |  | 205 | 0.166 | 38.9\% | 44.7\% |
|  | (1.024) | (3.645) | (2.637) | (11.822) | (1.190) | (-1.691) |  | 5.52\% |  |  |  |  |
| BP_EP | 0.001 | 0.692*** | 0.665** | $0.453 * * *$ | 0.616 | -0.196 | 63.6\% |  | 205 | 0.109 | 38.9\% | 47.9\% |
|  | (0.104) | (3.619) | (2.889) | (13.167) | (1.796) | (-2.249) |  | 5.45\% |  |  |  |  |
| BP_RI | 0.003 | 0.676*** | 0.681** | $0.455 * * *$ | 0.617 | -0.172 | 63.4\% |  | 205 | 0.084 | 38.4\% | 47.4\% |
|  | (0.382) | (3.612) | (2.875) | (13.245) | (1.800) | (-1.975) |  | 5.28\% |  |  |  |  |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{\text {ICC }}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_EP | 0.015 | 0.086* | 0.801** | 0.44*** | 0.107 | -0.160 | 64.1\% |  | 205 | 0.000 | 35.3\% | 93.2\% |
|  | (1.663) | (1.999) | (2.712) | (10.097) | (1.476) | (-1.950) |  | 5.18\% |  |  |  |  |
| PE_Anlst | -0.029 | 1.188*** | 0.95*** | 0.452*** | 2.966*** | -0.383 | 62.8\% |  | 205 | 0.387 | 34.2\% | 28.9\% |
|  | (-2.622) | (5.491) | (3.188) | (16.646) | (4.785) | (-2.324) |  | 4.85\% |  |  |  |  |
| KMY_HDZ | -0.043 | 0.795** | 0.110 | 0.512*** | 2.265*** | -0.120 | 62.4\% |  | 205 | 0.452 | 26.3\% | 57.9\% |
|  | (-2.366) | (2.917) | (0.269) | (15.190) | (3.861) | (-0.657) |  | 3.46\% |  |  |  |  |
| GG_HDZ | -0.011 | 0.335 | -0.338 | 0.498*** | 3.392*** | -0.377 | 63.2\% |  | 205 | 0.037 | 27.4\% | 51.1\% |
|  | (-0.589) | (1.057) | (-0.744) | (13.877) | (4.515) | (-1.628) |  | $3.44 \%$ |  |  |  |  |
| GLS_HDZ | -0.036 | 0.482* | 0.192 | 0.483*** | 2.393* | -0.103 | 62.5\% |  | 205 | 0.023 | 23.7\% | 59.5\% |
|  | (-1.395) | (2.130) | (0.910) | (17.875) | (2.388) | (-0.792) |  | 3.41\% |  |  |  |  |
| CT_HDZ | -0.022 | 0.362** | -0.480 | 0.525*** | 2.194** | -0.194 | 62.9\% |  | 205 | 0.000 | 26.3\% | 62.1\% |
|  | (-1.741) | (2.852) | (-0.578) | (10.241) | (3.029) | (-1.223) |  | $3.41 \%$ |  |  |  |  |
| DKL_HDZ | -0.079 | 1.254 | 0.160 | $0.521^{* * *}$ | 1.863*** | 0.131 | 61.9\% |  | 205 | 0.724 | 25.3\% | 61.6\% |
|  | (-1.727) | (1.742) | (0.488) | (13.786) | (3.254) | (0.328) |  | 3.41\% |  |  |  |  |
| PEG_Anlst | -0.014 | 0.308 | 0.468* | 0.449*** | -1.419 | 0.125 | 60.7\% |  | 205 | 0.008 | 10.0\% | 61.1\% |
|  | (-0.480) | (1.200) | (2.276) | (15.701) | (-0.789) | (0.851) |  | 3.39\% |  |  |  |  |
| FGHJ_HDZ | -0.024 | 0.389* | 0.182 | 0.476*** | $3.302^{* * *}$ | -0.090 | 62.7\% |  | 205 | 0.000 | 22.6\% | 64.7\% |
|  | (-1.466) | (2.383) | (1.180) | (19.557) | (3.466) | (-0.849) |  | 3.39\% |  |  |  |  |
| HL_HDZ | -0.045 | 0.694*** | 0.070 | 0.509*** | 1.657*** | -0.112 | 61.6\% |  | 205 | 0.081 | 25.8\% | 64.7\% |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_EP | (-2.720) | (3.984) | (0.276) | (17.583) | (3.422) | (-1.039) |  | 3.25\% |  |  |  |  |
|  | 0.001 | 0.221** | 1.049 | $0.38 * * *$ | 1.026** | -0.436 | 60.3\% |  | 205 | 0.000 | 22.6\% | 65.8\% |
|  | (0.041) | (2.964) | (1.860) | (7.809) | (2.720) | (-1.558) |  | 3.19\% |  |  |  |  |
| TPDPS_RW | 0.019* | 0.019 | 0.240 | 0.504*** | 0.092 | -0.072 | 62.3\% |  | 205 | 0.000 | 26.8\% | 94.7\% |
|  | (2.363) | (0.553) | (1.523) | (14.569) | (1.169) | (-0.482) |  | 3.19\% |  |  |  |  |
| FPM_Anlst | -0.069 | 0.822* | 0.191 | 0.486*** | 1.005 | -0.027 | 62.1\% |  | 205 | 0.655 | 17.4\% | 24.7\% |
|  | (-1.721) | (2.065) | (0.873) | (19.051) | (0.870) | (-0.262) |  | 2.97\% |  |  |  |  |
| CT_EP | 0.027 | $0.149^{* *}$ | 0.995 | $0.376 * * *$ | 0.570 | 0.006 | 60.2\% |  | 205 | 0.000 | 21.1\% | 77.9\% |
|  | (0.988) | (2.618) | (1.553) | (7.232) | (1.323) | (0.050) |  | 2.84\% |  |  |  |  |
| DKL_EP | 0.007 | 0.158*** | 1.030 | $0.42 * * *$ | 0.876** | -0.012 | 59.6\% |  | 205 | 0.000 | 19.5\% | 71.1\% |
|  | (0.511) | (3.893) | (1.509) | (8.447) | (3.038) | (-0.101) |  | 2.78\% |  |  |  |  |
| WNG_RW | 0.023*** | 0.000 | 0.023 | 0.471*** | 0.005 | -0.107 | 59.9\% |  | 205 | 0.000 | 3.2\% | 98.4\% |
|  | (3.288) | (-0.355) | (0.101) | (15.786) | (0.688) | (-1.399) |  | 2.77\% |  |  |  |  |
| PE_HDZ | -0.149 | 1.813 | -2.152 | 0.724** | $2.928 * * *$ | -0.660 | 62.8\% |  | 205 | 0.616 | 31.1\% | 52.1\% |
|  | (-1.060) | (1.121) | (-0.935) | (2.827) | (4.080) | (-0.869) |  | 2.65\% |  |  |  |  |
| HL_EP | 0.007 | $0.13 * * *$ | 1.055 | 0.416*** | 1.245** | -0.117 | 59.5\% |  | 205 | 0.000 | 20.0\% | 74.7\% |
|  | (0.491) | (3.548) | (1.619) | (8.711) | (3.013) | (-0.954) |  | 2.63\% |  |  |  |  |
| GG_RW | -0.004 | 0.215 | -0.373 | 0.498*** | 5.201** | -0.376 | 61.8\% |  | 205 | 0.016 | 19.1\% | 66.3\% |
|  | (-0.231) | (0.662) | (-0.796) | (13.442) | (2.684) | (-1.575) |  | 2.50\% |  |  |  |  |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_EP | -0.047 | 0.968 | 0.149 | 0.514*** | 20.266 | -0.178 | 60.6\% |  | 205 | 0.971 | 17.4\% | 75.3\% |
|  | (-1.285) | (1.113) | (0.943) | (9.996) | (0.942) | (-1.097) |  | 2.23\% |  |  |  |  |
| GM_HDZ | -0.015 | 0.474*** | 0.069 | 0.514*** | 1.819* | -0.040 | 59.7\% |  | 205 | 0.000 | 18.4\% | 63.7\% |
|  | (-1.195) | (3.813) | (0.394) | (16.341) | (2.406) | (-0.458) |  | 2.22\% |  |  |  |  |
| Carhart_Factor | 0.016 | 0.549 | 1.163 | $0.506^{* * *}$ | -2.609 | -0.053 | 59.2\% |  | 205 | 0.317 | 11.1\% | 41.6\% |
|  | (1.072) | (1.223) | (1.915) | (9.741) | (-1.583) | (-0.157) |  | 2.18\% |  |  |  |  |
| PE_EP | 0.015 | 0.021 | 0.432 | $0.464^{* * *}$ | 3.246* | 0.258 | 61.7\% |  | 205 | 0.073 | 18.4\% | 75.3\% |
|  | (1.423) | (0.039) | (1.572) | (10.107) | (2.167) | (0.782) |  | 2.17\% |  |  |  |  |
| WNG_Anlst | 0.026** | 0.035 | 0.154 | $0.477^{* * *}$ | 0.080 | -0.008 | 60.1\% |  | 205 | 0.000 | 3.2\% | 96.3\% |
|  | (3.073) | (1.380) | (0.221) | (10.474) | (0.311) | (-0.043) |  | 2.10\% |  |  |  |  |
| DKL_Anlst | -0.038 | 0.722* | 0.844** | 0.444*** | 2.372** | 0.047 | 61.9\% |  | 205 | 0.392 | 24.2\% | 38.9\% |
|  | (-1.229) | (2.227) | (3.047) | (14.099) | (2.795) | (0.394) |  | 2.10\% |  |  |  |  |
| GM_Anlst | 0.010 | 0.224 | 0.579 | $0.454 * * *$ | 0.958 | -0.156 | 61.4\% |  | 205 | 0.019 | 18.4\% | 40.5\% |
|  | (0.267) | (0.683) | (1.870) | (12.843) | (0.770) | (-1.248) |  | 2.00\% |  |  |  |  |
| GLS_Anlst | -0.383 | 3.846 | -0.476 | 0.613*** | 8.148 | $-1.486$ | 63\% |  | 205 | 0.300 | 20.5\% | 44.7\% |
|  | (-1.207) | (1.405) | (-0.223) | (4.044) | (1.466) | (-1.009) |  | 1.93\% |  |  |  |  |
| FPM_EP | 0.117 | 0.052*** | 0.221 | 0.473*** | 0.043 | -0.044 | 60.8\% |  | 205 | 0.000 | 15.8\% | 91.6\% |
|  | (0.965) | (3.196) | (1.211) | (18.012) | (0.862) | $(-0.849)$ |  | 1.88\% |  |  |  |  |
| DKL_RW | -0.021 | 0.058 | 0.193 | 0.48*** | 0.331 | 0.038 | 60\% |  | 205 | 0.000 | 14.7\% | 79.5\% |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_Anlst | (-0.701) | (0.988) | (1.136) | (15.830) | (1.583) | (0.538) |  | 1.83\% |  |  |  |  |
|  | -0.113 | 1.667 | 1.377* | 0.4*** | 1.837** | -0.304 | 61.2\% |  | 205 | 0.489 | 21.1\% | 37.4\% |
|  | (-1.485) | (1.731) | (2.165) | (7.197) | (2.809) | (-0.793) |  | 1.80\% |  |  |  |  |
| WNG_EP | 0.028* | 0.000 | 0.372 | $0.45 * * *$ | -0.009 | -0.006 | 60.3\% |  | 205 | 0.000 | 4.7\% | 97.4\% |
|  | (2.074) | (0.080) | (1.622) | (18.214) | (-0.906) | (-0.102) |  | 1.78\% |  |  |  |  |
| FGHJ_Anlst | -0.087 | 1.118* | 0.735* | 0.482*** | $3.602 * * *$ | -0.193 | 62.8\% |  | 205 | 0.790 | 20.5\% | 48.4\% |
|  | (-2.468) | (2.522) | (2.002) | (16.797) | (3.476) | (-2.051) |  | 1.77\% |  |  |  |  |
| HL_RI | 0.013 | -0.020 | 0.153 | 0.493*** | 0.494 | -0.011 | 59\% |  | 205 | 0.000 | 17.4\% | 83.7\% |
|  | (1.177) | (-0.151) | (1.108) | (17.218) | (0.852) | (-0.120) |  | 1.71\% |  |  |  |  |
| DKL_RI | 0.015 | -0.031 | 0.159 | 0.493*** | 0.505 | -0.013 | 58.9\% |  | 205 | 0.000 | 16.3\% | 83.2\% |
|  | (1.427) | (-0.227) | (1.134) | (17.228) | (0.871) | (-0.139) |  | 1.63\% |  |  |  |  |
| MPEG_EP | -0.004 | 0.107 | 0.170 | 0.471*** | 0.587 | -0.073 | 60.5\% |  | 205 | 0.000 | 15.8\% | 82.1\% |
|  | (-0.385) | (1.260) | (0.813) | (16.218) | (0.927) | (-0.660) |  | 1.61\% |  |  |  |  |
| TrES_Anlst_25SBM | 0.031*** | -0.003 | 0.308* | 0.443*** | 0.006 | -0.032 | 59.6\% |  | 205 | 0.000 | 4.7\% | 97.4\% |
|  | (3.274) | (-0.262) | (2.204) | (18.733) | (0.806) | (-0.557) |  | 1.60\% |  |  |  |  |
| TrETSS_RI_10Ind | 0.024* | 0.015 | 0.151 | $0.477 * * *$ | 0.081 | -0.032 | 59.9\% |  | 205 | 0.000 | 8.9\% | 93.7\% |
|  | (2.427) | (0.523) | (0.782) | (15.988) | (0.915) | (-0.261) |  | 1.54\% |  |  |  |  |
| GM_RI | 0.006 | 0.047 | -0.241 | 0.559*** | 1.366 | 0.298 | 59.7\% |  | 205 | 0.017 | 21.4\% | 67.9\% |
|  | (0.174) | (0.119) | (-0.884) | (7.803) | (1.151) | (0.823) |  | 1.52\% |  |  |  |  |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RI_10Ind | 0.015 | 0.005 | 0.004 | $0.467 * * *$ | 0.097 | 0.023 | 60.5\% |  | 205 | 0.000 | 11.1\% | 94.7\% |
|  | (1.291) | (0.269) | (0.014) | (16.569) | (1.530) | (0.255) |  | 1.51\% |  |  |  |  |
| MPEG_HDZ | -0.008 | $0.336 * * *$ | 0.048 | 0.503*** | 1.699* | -0.054 | 59.5\% |  | 205 | 0.000 | 17.4\% | 68.9\% |
|  | (-0.595) | (3.372) | (0.282) | (16.645) | (2.291) | (-0.630) |  | 1.50\% |  |  |  |  |
| TrETSS_RW_10Ind | 0.039* | 0.029 | 0.089 | 0.482*** | 0.331 | 0.129 | 59\% |  | 205 | 0.000 | 8.9\% | 92.1\% |
|  | (2.565) | (0.773) | (0.323) | (17.196) | (0.664) | (1.225) |  | 1.44\% |  |  |  |  |
| CT_Anlst | -0.051 | 0.878*** | 0.748** | $0.461 * * *$ |  | -0.099 | 61.5\% |  | 205 | 0.566 | 22.6\% | 40.5\% |
|  | (-2.866) | (4.120) | (2.706) | (15.655) | (2.975) | (-1.146) |  | 1.43\% |  |  |  |  |
| TrES_Anlst_10Ind | 0.013 | $0.002$ | $0.006$ | 0.492*** | 0.128 | -0.060 | 61.1\% |  | 205 | 0.000 | 11.6\% | 92.1\% |
|  | (1.247) | (0.054) | (0.018) | (13.269) | (1.039) | (-0.696) |  | 1.42\% |  |  |  |  |
| KMY_RW | -0.016 | 0.057 | 0.281 | 0.474*** | 0.248 | 0.044 | 59.7\% |  | 205 | 0.000 | 11.1\% | 82.1\% |
|  | (-0.528) | (1.300) | (1.621) | (16.647) | (0.897) | (0.492) |  | 1.42\% |  |  |  |  |
| HL_RW | -0.015 | 0.050 | 0.282 | 0.474*** | 0.141 | 0.044 | 59.6\% |  | 205 | 0.000 | 12.1\% | 83.7\% |
|  | (-0.501) | (1.140) | (1.628) | (16.645) | (0.527) | (0.496) |  | 1.41\% |  |  |  |  |
| MPEG_Anlst | -0.014 | 0.383* | 0.366 | 0.476*** | 0.916 | -0.145 | 60.5\% |  | 205 | 0.000 | 14.7\% | 48.4\% |
|  | (-0.728) | (2.507) | (1.145) | (13.242) | (0.329) | (-0.737) |  | 1.33\% |  |  |  |  |
| CAPM_Factor | 0.203 | -11.824 | 0.881 | 0.444*** | 7.808 | 0.243 | 60.7\% |  | 205 | 0.129 | 17.9\% | 19.5\% |
|  | (1.646) | (-1.407) | (1.600) | (11.480) | (0.693) | (1.090) |  | 1.31\% |  |  |  |  |
| PEG_HDZ | -0.001 | 0.306* | 0.149 | 0.504*** | 1.504* | -0.014 | 59.6\% |  | 205 | 0.000 | 16.8\% | 64.2\% |

[^58]Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RW | (-0.068) | (2.553) | (0.893) | (13.409) | (2.248) | (-0.169) |  | 1.30\% |  |  |  |  |
|  | -0.009 | 0.068 | -0.609 | 0.466*** | 0.734*** | 0.179 | 60.1\% |  | 205 | 0.000 | 21.3\% | 100.0\% |
|  | (-0.183) | (1.584) | (-0.489) | (14.320) | (3.717) | (0.407) |  | 1.21\% |  |  |  |  |
| TrES_EP_10Ind | 0.012 | -0.003 | -0.138 | 0.499*** | 0.051 | -0.097 | 61.4\% |  | 205 | 0.000 | 7.4\% | 95.3\% |
|  | (1.349) | (-0.069) | (-0.352) | (14.250) | (0.945) | (-0.681) |  | 1.21\% |  |  |  |  |
| GLS_RW | -0.025 | 0.078 | 0.081 | 0.492*** | -1.176 | -0.015 | 57.6\% |  | 205 | 0.000 | 12.6\% | 84.2\% |
|  | (-0.589) | (0.961) | (0.424) | (16.185) | (-1.031) | (-0.122) |  | 1.16\% |  |  |  |  |
| TrETSS_HDZ_10Ind | 0.016* | -0.030 | 0.042 | 0.487*** | 0.006 | -0.016 | 59.3\% |  | 205 | 0.000 | 7.9\% | 90.0\% |
|  | (2.143) | (-0.498) | (0.171) | (15.888) | (0.076) | (-0.190) |  | 1.16\% |  |  |  |  |
| TrOHE_25SBM | 0.028*** | -0.089 | 0.292 | $0.456 * * *$ | -0.017 | 0.006 | 57.5\% |  | 205 | 0.000 | 4.7\% | 90.5\% |
|  | (3.645) | (-0.921) | (1.369) | (17.852) | (-0.285) | (0.096) |  | 1.14\% |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.007 | 0.112 | -0.064 | 0.449*** | -0.021 | 0.002 | 59.2\% |  | 205 | 0.000 | 12.1\% | 94.2\% |
|  | (0.387) | (1.029) | (-0.252) | (10.703) | (-0.548) | (0.021) |  | 1.08\% |  |  |  |  |
| KMY_Anlst | -0.007 | 0.311 | 0.574* | $0.463 * * *$ | 1.421* | -0.103 | 60.9\% |  | 205 | 0.001 | 15.3\% | 64.2\% |
|  | (-0.235) | (1.528) | (2.179) | (15.602) | (2.273) | (-0.829) |  | 1.06\% |  |  |  |  |
| TrOHE_10Ind | 0.034* | -0.096 | 0.488 | 0.429*** | 0.322 | 0.081 | 59.2\% |  | 205 | 0.000 | 6.8\% | 58.9\% |
|  | (2.258) | (-0.579) | (1.275) | (10.219) | (0.409) | (0.876) |  | 1.06\% |  |  |  |  |
| TrETSS_Anlst_25SBM | 0.031*** | -0.066 | 0.019 | 0.475*** | 0.076 | -0.073 | 58.4\% |  | 205 | 0.000 | 3.2\% | 89.5\% |
|  | (3.515) | (-1.365) | (0.126) | (18.268) | (1.825) | (-1.076) |  | 1.06\% |  |  |  |  |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_RI | -0.014 | 0.268** | 0.063 | 0.486*** | -1.178 | -0.086 | 59.4\% |  | 205 | 0.000 | 19.6\% | 70.9\% |
|  | (-1.051) | (2.951) | (0.383) | (16.241) | (-0.386) | (-1.008) |  | 1.03\% |  |  |  |  |
| KMY_RI | 0.006 | 0.029 | 0.333* | 0.487*** | 0.039 | -0.035 | 58\% |  | 205 | 0.000 | 15.3\% | 73.7\% |
|  | (0.656) | (0.167) | (2.225) | (18.380) | (0.068) | (-0.299) |  | 1.01\% |  |  |  |  |
| GG_Anlst | -0.007 | 0.056 | 0.090 | 0.512*** | 1.001 | -0.348 | 61.2\% |  | 205 | 0.009 | 11.1\% | 72.6\% |
|  | (-0.077) | (0.155) | (0.217) | (6.159) | (0.926) | (-1.236) |  | 0.98\% |  |  |  |  |
| 3FF_Factor | 0.044* | -0.690 | 0.422 | 0.462*** | 1.645 | 0.052 | 59.7\% |  | 205 | 0.004 | 11.1\% | 32.1\% |
|  | (2.289) | (-1.193) | (0.871) | (12.619) | (0.412) | (0.219) |  | 0.89\% |  |  |  |  |
| TrES_HDZ_10Ind | 0.003 | -0.014 | -0.303 | 0.528*** | -0.287 | 0.363 | 60.3\% |  | 205 | 0.000 | 13.7\% | 93.7\% |
|  | (0.122) | (-0.294) | (-0.650) | (10.506) | (-0.981) | (1.108) |  | 0.89\% |  |  |  |  |
| PE_RI | 0.017* | 0.092 | 0.384* | 0.465*** | 1.907 | -0.011 | 61.7\% |  | 205 | 0.000 | 22.6\% | 71.6\% |
|  | (2.070) | (0.591) | (2.390) | (18.080) | (1.637) | (-0.113) |  | 0.80\% |  |  |  |  |
| 5FF_Factor | 0.035* | -0.196 | 0.465* | 0.463*** | 1.226 | -0.148 | 59.3\% |  | 205 | 0.011 | 11.6\% | 33.7\% |
|  | (2.088) | (-0.420) | (2.311) | (15.703) | (0.723) | (-0.815) |  | 0.78\% |  |  |  |  |
| MPEG_RW | 0.017 | 0.079* | 0.238 | 0.465*** | 0.965*** | -0.092 | 59.8\% |  | 205 | 0.000 | 14.8\% | 91.5\% |
|  | (1.573) | (2.042) | (1.333) | (17.457) | (3.436) | (-0.884) |  | 0.77\% |  |  |  |  |
| FGHJ_RI | 0.030 | -0.161 | 0.190 | 0.465*** | 8.500 | 0.018 | 60.4\% |  | 205 | 0.000 | 12.7\% | 78.5\% |
|  | (1.696) | (-0.712) | (0.800) | (15.603) | (0.874) | (0.137) |  | 0.76\% |  |  |  |  |
| TrES_HDZ_25SBM | -0.061 | 0.165 | 2.408 | 0.626*** | -0.078 | 0.658 | 59.3\% |  | 205 | 0.000 | 7.4\% | 96.3\% |

[^59]Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FGHJ_EP | (-0.643) | (0.910) | (0.931) | (3.169) | (-1.011) | (0.795) |  | 0.72\% |  |  |  |  |
|  | 0.028 | -0.193 | 0.069 | 0.474*** | 45.585 | 0.139 | 60.6\% |  | 205 | 0.000 | 13.7\% | 79.2\% |
|  | (1.489) | (-0.800) | (0.353) | (16.061) | (0.875) | (0.957) |  | 0.66\% |  |  |  |  |
| FGHJ_RW | 0.037* | -0.304 | 0.299 | 0.471*** | -0.587 | 0.019 | 57.6\% |  | 205 | 0.000 | 16.9\% | 88.2\% |
|  | (2.317) | (-1.575) | (1.218) | (17.980) | (-0.618) | (0.129) |  | 0.53\% |  |  |  |  |
| CT_RI | 0.012 | 0.074 | 0.056 | $0.496 * * *$ | 0.252 | -0.161 | 58.7\% |  | 205 | 0.000 | 8.4\% | 85.8\% |
|  | (1.345) | (0.879) | (0.151) | (14.797) | (0.446) | (-0.908) |  | 0.47\% |  |  |  |  |
| GG_EP | 0.008 | -0.950 | 0.176 | $0.486 * * *$ | 4.717* | 0.006 | 60.9\% |  | 205 | 0.499 | 19.6\% | 66.5\% |
|  | (0.442) | (-0.330) | (0.543) | (14.569) | (2.219) | (0.028) |  | 0.47\% |  |  |  |  |
| TrES_RI_25SBM | 0.032* | -0.019 | 0.190 | 0.428*** | 0.007 | -0.098 | 59.2\% |  | 205 | 0.000 | 3.7\% | 97.9\% |
|  | (2.132) | (-0.943) | (0.615) | (8.845) | (0.607) | (-0.986) |  | 0.46\% |  |  |  |  |
| PEG_EP | -0.027 | 0.104* | -0.392 | $0.476 * * *$ | 0.916*** | 0.328 | 59.2\% |  | 205 | 0.000 | 15.5\% | 96.0\% |
|  | (-0.638) |  | (-0.370) | (18.664) | (3.259) | (0.882) |  | 0.37\% |  |  |  |  |
| TrETSS_EP_10Ind | -0.001 | 0.006 | -0.021 | 0.508*** | -0.537 | 0.177 | 58.3\% |  | 205 | 0.000 | 6.3\% | 95.8\% |
|  | (-0.077) | (0.183) | (-0.101) | (13.647) | (-0.954) | (0.693) |  | 0.37\% |  |  |  |  |
| PE_RW | 0.02* | 0.109 | 0.312* | $0.468 * * *$ | -0.361 | -0.128 | 60\% |  | 205 | 0.000 | 8.4\% | 87.4\% |
|  | (2.486) | (0.904) | (2.100) | (18.619) | (-1.670) | (-1.626) |  | 0.36\% |  |  |  |  |
| GLS_EP | 0.029 | -0.229 | 0.090 | $0.476 * * *$ | -0.100 | 0.117 | 60.3\% |  | 205 | 0.000 | 13.5\% | 70.8\% |
|  | (1.716) | (-1.027) | (0.456) | (15.982) | (-0.034) | (0.825) |  | 0.36\% |  |  |  |  |

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Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_RW | -0.002 | 0.159 | 0.158 | $0.483 * * *$ | 3.417 | -0.214 | 60.1\% |  | 205 | 0.002 | 18.5\% | 75.1\% |
|  | (-0.147) | (0.585) | (0.695) | (15.705) | (1.593) | (-0.996) |  | 0.33\% |  |  |  |  |
| GLS_RI | 0.031* | -0.150 | 0.197 | 0.462*** | -2.045 | 0.011 | 60.7\% |  | 205 | 0.000 | 12.6\% | 73.8\% |
|  | (2.026) | (-0.795) | (0.837) | (15.604) | (-0.587) | (0.083) |  | 0.29\% |  |  |  |  |
| PEG_RI | -0.406 | -0.966 | -6.127 | 0.897 | 0.517* | 4.615 | 58.5\% |  | 205 | 0.083 | 10.5\% | 100.0\% |
|  | (-0.744) | (-0.858) | (-0.710) | (1.612) | (2.078) | (0.761) |  | 0.28\% |  |  |  |  |
| TrETSS_RW_25SBM | 0.017* | 0.010 | 0.472* | 0.47*** | 0.027* | 0.014 | 59.4\% |  | 205 | 0.000 | 6.8\% | 97.4\% |
|  | (2.065) | (1.215) | (2.245) | (17.154) | (2.079) | (0.289) |  | 0.28\% |  |  |  |  |
| TrES_EP_25SBM | 0.014 | 0.039 | 0.217 | 0.461*** | -0.031 | 0.067 | 59.6\% |  | 205 | 0.000 | 7.9\% | 95.8\% |
|  | (1.107) | (1.195) | (1.365) | (13.826) | (-1.242) | (0.573) |  | 0.28\% |  |  |  |  |
| TrETSS_EP_25SBM | 0.042 | 0.003 | 0.079 | $0.424 * * *$ | 0.053 | 0.010 | 59.4\% |  | 205 | 0.000 | 6.3\% | 96.8\% |
|  | (1.651) | (0.602) | (0.452) | (6.426) | (0.979) | (0.109) |  | 0.26\% |  |  |  |  |
| GM_RW | 0.011 | 0.018 | 0.53* | $0.466 * * *$ | 0.524 | 0.130 | 60.2\% |  | 205 | 0.000 | 13.8\% | 88.3\% |
|  | (1.107) | (0.482) | (2.256) | (17.451) | (0.893) | (0.834) |  | 0.21\% |  |  |  |  |
| GG_RI | 0.019 | -0.470 | 0.296 | $0.469 * * *$ | 1.673** | -0.171 | 58.9\% |  | 205 | 0.001 | 16.8\% | 65.4\% |
|  | (1.037) | (-1.079) | (1.057) | (15.908) | (2.671) | (-0.800) |  | 0.16\% |  |  |  |  |
| WNG_RI | 0.022* | -0.003 | 0.077 | $0.483 * * *$ | 0.129 | -0.145 | 59.1\% |  | 205 | 0.000 | 2.1\% | 96.3\% |
|  | (2.314) | (-0.338) | (0.363) | (15.236) | (0.794) | (-1.391) |  | 0.14\% |  |  |  |  |
| FPM_RI | 0.024 | -0.055 | 0.297* | $0.454 * * *$ | 0.019 | -0.064 | 60.3\% |  | 205 | 0.000 | 12.6\% | 83.7\% |

[^60]Table 92 : Capturing Subsequent Return: Low Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |$\%_{0} \% \beta_{I C C}^{C S}=1$

For the lowest quartile of firms in terms of earnings variation, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised, } i t}=$ $\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much
of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2} \mathbf{I m p}$. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## Table 93 : Capturing Subsequent Return: High Earnings Variation Firms

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.010 | 0.151*** | 0.224*** | 0.372*** | 0.048* | 0.060 | 61.3\% | 4.23\% | 205 | 0.000 | 52.9\% | 94.8\% |
|  | (0.811) | (6.944) | (3.786) | (13.089) | (2.128) | (1.458) |  |  |  |  |  |  |
| Naive | 0.014 | 0.157*** | 0.226*** | $0.372 * * *$ | 0.046* | 0.054 | 61.2\% | 4.11\% | 205 | 0.000 | 55.6\% | 95.4\% |
|  | (1.149) | (7.269) | (3.704) | (13.144) | (2.014) | (1.356) |  |  |  |  |  |  |
| TPDPS_HDZ | 0.008 | 0.155*** | 0.245*** | 0.371*** | 0.035 | 0.060 | 61.2\% | 4.06\% | 205 | 0.000 | 55.6\% | 96.7\% |
|  | (0.689) | (7.599) | (4.223) | (13.100) | (1.865) | (1.568) |  |  |  |  |  |  |
| BP_Anlst | 0.016 | 0.886*** | 0.162* | 0.357*** | 0.258* | 0.062 | 58.7\% | 2.46\% | 205 | 0.258 | 54.2\% | 37.3\% |
|  | (1.297) | (8.781) | (2.222) | (11.604) | (2.086) | (1.491) |  |  |  |  |  |  |
| TPDPS_RI | 0.016 | 0.103*** | 0.155* | 0.359*** | 0.052* | 0.056 | 59.2\% | 2.11\% | 205 | 0.000 | 45.8\% | 97.4\% |
|  | (1.294) | (5.638) | (2.508) | (12.821) | (2.561) | (1.392) |  |  |  |  |  |  |
| BP_HDZ | 0.011 | 0.844*** | 0.145* | 0.354*** | 0.242* | 0.061 | 58.5\% | 2.07\% | 205 | 0.091 | 63.4\% | 32.7\% |
|  | (0.910) | (9.203) | (2.053) | (11.698) | (2.320) | (1.550) |  |  |  |  |  |  |
| TPDPS_EP | 0.013 | 0.098*** | 0.161** | 0.354*** | 0.055** | 0.075 | 58.9\% | 2.05\% | 205 | 0.000 | 41.2\% | 98.0\% |
|  | (1.069) | (5.677) | (2.620) | (12.567) | (2.857) | (1.456) |  |  |  |  |  |  |
| TPDPS_RW | 0.022 | 0.1*** | 0.157** | 0.356*** | 0.046* | 0.064 | 58.5\% | 1.90\% | 205 | 0.000 | 37.3\% | 97.4\% |
|  | (1.722) | (5.487) | (2.783) | (12.699) | (2.013) | (1.453) |  |  |  |  |  |  |
| BP_EP | 0.017 | 0.495*** | 0.031 | 0.337*** | 0.44*** | 0.082 | 56.7\% | 0.51\% | 205 | 0.000 | 47.7\% | 47.1\% |
|  | (1.120) | (7.150) | (0.411) | (11.255) | (3.377) | (1.003) |  |  |  |  |  |  |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_RI | 0.023 | 0.538*** | 0.039 | 0.341 *** | 0.408*** | 0.031 | 56.6\% | 0.33\% | 205 | 0.000 | 50.3\% | 41.8\% |
|  | (1.795) | (6.917) | (0.534) | (11.550) | (3.479) | (0.740) |  |  |  |  |  |  |
| BP_RW | 0.028* | $0.547 * * *$ | 0.033 | $0.341^{* * *}$ | 0.285 |  | 56.4\% | 0.25\% | 205 | 0.000 | 41.2\% | 47.7\% |
|  | (2.192) | (7.051) | (0.452) | (11.533) | (1.942) | (0.859) |  |  |  |  |  |  |
| GM_EP | 0.028 | 0.047 | -0.023 | 0.332*** | 0.681* | 0.085 | 53.8\% | -0.82\% | 205 | 0.000 | 15.0\% | 79.7\% |
|  | (1.659) | (0.801) | (-0.348) | (11.413) |  | (1.867) |  |  |  |  |  |  |
| PEG_EP | 0.042* |  | -0.098 | $0.283 * * *$ | $0.579 * * *$ |  | 53.5\% | -0.86\% | 205 | 0.000 | 19.7\% | 90.1\% |
|  |  | (1.088) | (-0.906) | (6.038) |  |  |  |  |  |  |  |  |
| MPEG_EP | 0.035 | 0.009 | -0.037 | 0.292*** | 0.37* | 0.055 | 54\% | -1.08\% | 205 | 0.000 | 17.0\% | 85.6\% |
|  | (1.938) |  | (-0.527) |  |  |  |  |  |  |  |  |  |
| PE_RI | 0.031* | 0.073 | 0.055 | $0.334 * * *$ | 0.054 | 0.076 | 53.7\% | -1.48\% | 205 | 0.000 | 20.9\% | 83.0\% |
|  | (2.452) | (1.779) | (0.564) | (11.197) | (0.139) | (1.354) |  |  |  |  |  |  |
| TrETSS_EP_25SBM | 0.048*** | -0.003 | -0.003 | 0.309*** | 0.012 | 0.074 | 53\% | -1.51\% | 205 | 0.000 | 5.2\% | 98.7\% |
|  | (4.011) | (-0.583) | (-0.041) | (10.609) | (1.401) | (1.656) |  |  |  |  |  |  |
| FGHJ_HDZ | 0.022 | 0.236** | -0.016 | $0.32 * * *$ | 0.93* | 0.090 | 54.3\% | -1.51\% | 205 | 0.000 | 17.6\% | 61.4\% |
|  | (1.579) | (3.024) | (-0.204) | (10.413) | (2.558) | (1.828) |  |  |  |  |  |  |
| KMY_EP | -0.005 | $0.197 * * *$ | -0.002 | $0.342 * * *$ | 0.265 | 0.049 | 53\% | -1.79\% | 205 | 0.000 | 18.3\% | 69.9\% |
|  | (-0.245) | (3.557) | (-0.024) | (10.473) | (1.278) | (1.029) |  |  |  |  |  |  |
| FGHJ_Anlst | -0.001 | $0.482^{* * *}$ | 0.056 | 0.291*** | $1.106^{* * *}$ | 0.098* | 54.5\% | -1.81\% | 205 | 0.000 | 25.5\% | 30.7\% |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | \% $\mathrm{N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_Anlst | (-0.041) | (3.395) | (0.468) | (6.455) | (3.300) | (1.961) |  |  |  |  |  |  |
|  | 0.013 | 0.383*** | 0.042 | $0.289 * * *$ | 1.187*** | 0.104* | 54.5\% | -1.82\% | 205 | 0.000 | 22.2\% | 33.3\% |
|  | (0.733) | (3.252) | (0.347) | (6.433) | (3.598) | (2.103) |  |  |  |  |  |  |
| DKL_HDZ | 0.03* | 0.171* | -0.001 | $0.331 * * *$ | 0.759* | 0.095* | 53.9\% | -1.87\% | 205 | 0.000 | 16.3\% | 71.9\% |
|  | (2.081) | (1.968) | (-0.014) | (10.511) | (2.564) | (2.088) |  |  |  |  |  |  |
| TrETSS_Anlst _10Ind | 0.043*** | 0.060 | 0.044 | 0.312*** | 0.074 | 0.070 | 52.6\% | -1.87\% | 205 | 0.000 | 7.8\% | 68.6\% |
|  | (3.111) | (0.735) | (0.595) | (9.505) | (0.771) | (1.132) |  |  |  |  |  |  |
| CT_EP | 0.015 | 0.140 | -0.071 | 0.349*** | 0.561 | 0.039 | 52.9\% | -1.89\% | 205 | 0.000 | 5.2\% | 86.9\% |
|  | (0.674) | (1.151) | (-0.790) | (10.591) | (1.698) | (0.852) |  |  |  |  |  |  |
| PE_Anlst | 0.028 | $0.577 * * *$ | 0.199 | $0.289 * * *$ | 0.434 | 0.050 | 54.2\% | -1.95\% | 205 | 0.000 | 32.0\% | 24.8\% |
|  | (1.819) | (5.333) | (1.665) | (6.427) | (1.769) | (1.015) |  |  |  |  |  |  |
| FGHJ_RW | 0.046** | 0.065 | 0.071 | $0.315^{* * *}$ | 0.195 | -0.001 | 52.3\% | -1.95\% | 205 | 0.000 | 9.2\% | 85.9\% |
|  | (2.599) | (1.220) | (0.394) | (10.024) | (1.881) | (-0.008) |  |  |  |  |  |  |
| DKL_EP | 0.014 | 0.094 | -0.038 | $0.342 * * *$ | 0.429 | 0.046 | 52.7\% | -1.96\% | 205 | 0.000 | 12.4\% | 78.4\% |
|  | (0.662) | (1.454) | (-0.452) | (10.493) | (1.643) | (1.013) |  |  |  |  |  |  |
| KMY_RI | 0.011 | 0.083 | -0.072 | $0.347 * * *$ | 0.344 | 0.105 | 52.6\% | -1.99\% | 205 | 0.000 | 15.7\% | 73.2\% |
|  | (0.521) | (1.158) | (-0.722) | (10.540) | (1.950) | (1.560) |  |  |  |  |  |  |
| HL_EP | 0.006 | 0.124* | -0.036 | 0.344*** | 0.175 | 0.041 | 52.6\% | -2.02\% | 205 | 0.000 | 13.7\% | 80.4\% |
|  | (0.296) | (2.254) | (-0.428) | (10.486) | (0.782) | (0.860) |  |  |  |  |  |  |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_HDZ | 0.035* | 0.125 | 0.006 | 0.326*** | 0.751* | 0.116* | 54.1\% | -2.09\% | 205 | 0.000 | 12.4\% | 66.7\% |
|  | (2.539) | (1.693) | (0.075) | (10.327) | (2.121) | (2.193) |  |  |  |  |  |  |
| TrETSS_RI_10Ind | 0.027 | 0.010 | -0.030 | $0.336 * * *$ | -0.035 | 0.054 | 53\% | -2.10\% | 205 | 0.000 | 7.2\% | 85.6\% |
|  | (1.630) | (0.451) | (-0.370) | (11.257) | (-0.573) | (1.190) |  |  |  |  |  |  |
| GLS_HDZ | 0.03* | 0.165* | -0.019 | 0.323*** | $1.141^{* * *}$ | 0.089 | 54.2\% | -2.11\% | 205 | 0.000 | 17.0\% | 63.4\% |
|  | (2.166) | (2.328) | (-0.237) | (10.480) | (3.397) | (1.833) |  |  |  |  |  |  |
| CT_HDZ | 0.03* | 0.097 | -0.017 | $0.352 * * *$ | 1.092** | 0.115* | 54\% | -2.16\% | 205 | 0.000 | 14.4\% | 68.6\% |
|  | (2.105) |  | (-0.241) | (11.082) |  |  |  |  |  |  |  |  |
| HL_HDZ | 0.03* | 0.150 | -0.018 | $0.321^{* * *}$ | 0.941* | 0.154 | 54\% | -2.18\% | 205 | 0.000 | 13.1\% | 71.9\% |
|  | (2.005) |  | (-0.204) |  |  |  |  |  |  |  |  |  |
| TrETSS_EP_10Ind | 0.021 | 0.009 | 0.000 | $0.341 * * *$ | -0.015 | 0.123 | 52.5\% | -2.20\% | 205 | 0.000 | 6.5\% | 96.7\% |
|  | (1.294) | (0.763) | (-0.006) | (10.926) | (-0.476) | (1.920) |  |  |  |  |  |  |
| PE_HDZ | 0.031* | 0.183*** | 0.026 | $0.333 * * *$ | 0.811* | 0.072 | 53.7\% | -2.22\% | 205 | 0.000 | 19.0\% | 60.1\% |
|  | (2.367) | (3.282) | (0.315) | (11.160) | (2.399) | (1.398) |  |  |  |  |  |  |
| TrETSS_RI_25SBM | 0.04*** | -0.005 | 0.021 | $0.315^{* * *}$ | -0.005 | 0.055 | 52.1\% | -2.27\% | 205 | 0.000 | 5.2\% | 99.3\% |
|  | (3.220) | (-0.548) | (0.284) | (10.576) | (-0.346) | (1.050) |  |  |  |  |  |  |
| WNG_HDZ | $0.047 * * *$ | 0.024 | 0.017 | $0.329 * * *$ | -0.035 | 0.084 | 52.8\% | -2.34\% | 205 | 0.000 | 2.6\% | 98.7\% |
|  | (3.805) | (0.912) | (0.180) | (11.634) | (-0.230) | (1.737) |  |  |  |  |  |  |
| GG_HDZ | 0.033* | 0.125* | -0.006 | 0.337*** | $1.661 * * *$ | 0.104* | 54\% | -2.36\% | 205 | 0.000 | 10.5\% | 68.0\% |

[^61]Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+$ sig | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_Anlst | (2.344) | (2.057) | (-0.079) | (10.564) | (3.716) | (2.233) |  |  |  |  |  |  |
|  | -0.007 | 0.601*** | -0.002 | 0.287*** | 0.835 | 0.131* | 52.9\% | -2.36\% | 205 | 0.025 | 17.6\% | 22.9\% |
|  | (-0.262) | (3.402) | (-0.023) | (6.344) | (1.427) | (2.063) |  |  |  |  |  |  |
| DKL_RI | 0.018 | 0.040 | -0.033 | 0.345*** | -0.193 | 0.015 | 52.3\% | -2.37\% | 205 | 0.000 | 16.3\% | 83.7\% |
|  | (0.796) | (0.517) | (-0.369) | (10.342) | (-0.348) | (0.139) |  |  |  |  |  |  |
| HL_RI | 0.012 | 0.095** | 0.020 | $0.341^{* * *}$ | -0.191 | 0.056 | 52.3\% | -2.38\% | 205 | 0.000 | 17.0\% | 83.7\% |
|  | (0.566) | (2.668) | (0.225) | (10.167) | (-0.386) | (1.190) |  |  |  |  |  |  |
| GLS_RI | 0.024 | 0.113* | -0.038 | 0.32*** | 18.188 | 0.135 | 52.9\% | -2.39\% | 205 | 0.000 | 16.4\% | 78.3\% |
|  | (1.467) | (2.196) | (-0.469) | (10.297) | (0.605) | (1.785) |  |  |  |  |  |  |
| TrES_HDZ_10Ind | 0.044*** | 0.005 | -0.012 | 0.31 *** | -0.008 | 0.046 | 52.7\% | -2.40\% | 205 | 0.000 | 5.2\% | 98.7\% |
|  | (3.608) | (0.375) | (-0.173) | (12.233) | (-0.615) | (1.061) |  |  |  |  |  |  |
| CT_RW | 0.019 | 0.103 | -0.025 | $0.345 * * *$ | 1.217* | 0.113* | 53.5\% | -2.45\% | 205 | 0.000 | 14.6\% | 79.9\% |
|  | (1.019) | (0.945) | (-0.359) | (10.699) | (1.970) | (2.324) |  |  |  |  |  |  |
| FGHJ_RI | 0.028 | 0.102* | -0.069 | $0.322 * * *$ | 11.440 | 0.107 | 52.8\% | -2.47\% | 205 | 0.000 | 17.1\% | 80.3\% |
|  | (1.903) | (2.249) | (-0.942) | (10.477) | (1.141) | (1.801) |  |  |  |  |  |  |
| WNG_EP | 0.037** | 0.000 | 0.010 | $0.317 * * *$ | -0.013 | 0.057 | 52.2\% | -2.51\% | 205 | 0.000 | 3.3\% | 98.7\% |
|  | (2.656) | (-0.201) | (0.117) | (10.914) | (-1.265) | (1.223) |  |  |  |  |  |  |
| MPEG_Anlst | 0.044** | 0.129* | -0.072 | $0.294 * * *$ | 0.085 | 0.092 | 52.8\% | -2.51\% | 205 | 0.000 | 9.8\% | 52.9\% |
|  | (3.055) | (2.446) | (-0.679) | (6.537) | (0.517) | (1.931) |  |  |  |  |  |  |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FPM_EP | 0.011 | 0.093*** | 0.047 | 0.307*** | -0.003 | 0.055 | 52.3\% | -2.59\% | 205 | 0.000 | 19.0\% | 84.3\% |
|  | $(0.910)$ | (3.801) | (0.599) | (11.849) | (-0.080) | (1.250) |  |  |  |  |  |  |
| TrES_Anlst_10Ind | 0.045** |  |  | $0.284 * * *$ | 0.016 |  | 52.6\% | -2.62\% | 205 | 0.000 | 8.5\% | 96.1\% |
|  | (2.984) | (0.809) | (0.638) | (7.943) | (0.707) | (1.466) |  |  |  |  |  |  |
| PEG_RI | 0.049** | -0.007 | -0.076 | 0.278*** | -0.184 | 0.106* | 51.8\% | -2.63\% | 205 | 0.000 | 13.8\% | 88.3\% |
|  | (2.919) | (-0.077) | (-0.673) | (5.876) | (-0.142) | (2.106) |  |  |  |  |  |  |
| TrETSS_RW_10Ind | 0.020 | -0.009 | 0.061 | $0.314^{* * *}$ |  |  | 51.9\% | -2.64\% | 205 | 0.000 | 9.2\% | 90.2\% |
|  | (0.673) | (-0.121) | (0.526) | (10.588) | (0.273) | (0.617) |  |  |  |  |  |  |
| GG_RI | 0.034* | 0.080 | -0.013 | 0.333*** | 0.638 | 0.12* | 52.3\% | -2.65\% | 205 | 0.000 | 14.9\% | 70.9\% |
|  |  |  | (-0.161) | (10.120) |  |  |  |  |  |  |  |  |
| GLS_RW | 0.048** | 0.061 | -0.019 | $0.316^{* * *}$ | 0.028 | 0.055 | 51.8\% | -2.66\% | 205 | 0.000 | 6.5\% | 78.4\% |
|  | (2.908) | (1.485) | (-0.245) | (10.857) | (0.117) | (1.042) |  |  |  |  |  |  |
| GM_HDZ | 0.032* | 0.149 | 0.102 | $0.322^{* * *}$ | 0.664 | 0.070 | 53.1\% | -2.73\% | 205 | 0.000 | 7.8\% | 69.3\% |
|  | (2.333) | (1.840) | (0.799) | (10.891) | (1.685) | (1.143) |  |  |  |  |  |  |
| KMY_RW | 0.056** | 0.026 | -0.007 | $0.315^{* * *}$ | 0.262* | -0.045 | 52\% | -2.75\% | 205 | 0.000 | 9.8\% | 75.8\% |
|  | (3.055) | (0.694) | (-0.090) | (10.810) | (2.442) | (-0.287) |  |  |  |  |  |  |
| CT_Anlst | 0.016 | 0.418*** | 0.037 | 0.292*** | 0.763* | 0.107 | 53.3\% | -2.75\% | 205 | 0.000 | 24.8\% | 42.5\% |
|  | (0.913) | (3.808) | (0.345) | (6.496) | (2.271) | (1.796) |  |  |  |  |  |  |
| GG_RW | 0.023 | 0.328** | 0.113 | 0.332*** | 2.051 | 0.032 | 53.4\% | -2.76\% | 205 | 0.000 | 15.3\% | 70.2\% |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_HDZ | (1.356) | (2.750) | (0.530) | (9.494) | (1.441) | (0.291) |  |  |  |  |  |  |
|  | 0.037** | 0.113 | -0.002 | 0.321 *** | 0.69** | 0.097 | 53\% | -2.77\% | 205 | 0.000 | 9.2\% | 75.2\% |
|  | (2.692) | (1.948) | (-0.017) | (10.914) | (2.908) | (1.903) |  |  |  |  |  |  |
| HL_RW | 0.059*** | 0.005 | -0.005 | 0.316*** | 0.19* | -0.050 | 52\% | -2.78\% | 205 | 0.000 | 7.8\% | 80.4\% |
|  | (3.216) | (0.157) | (-0.058) | (10.821) | (2.118) | (-0.319) |  |  |  |  |  |  |
| GM_RI | 0.047** | -0.042 | -0.003 | 0.315*** | 0.549* | 0.079 | 52.5\% | -2.84\% | 205 | 0.000 | 15.7\% | 80.4\% |
|  | (2.860) | (-0.792) | (-0.050) | (10.447) | (2.051) | (1.724) |  |  |  |  |  |  |
| CAPM_Factor | -0.134 | 12.449 | -0.089 | 0.28*** | -4.574 | 0.081 | 52.6\% | -2.91\% | 205 | 0.460 | 9.2\% | 17.0\% |
|  | (-0.580) | (0.806) | (-0.803) | (6.185) | (-0.233) | (1.616) |  |  |  |  |  |  |
| PEG_Anlst | 0.049*** | 0.093* | -0.102 | 0.291*** | 0.112 | 0.094 | 52.4\% | -2.92\% | 205 | 0.000 | 7.2\% | 58.2\% |
|  | (3.456) | (2.052) | (-0.956) | (6.481) | (0.765) | (1.915) |  |  |  |  |  |  |
| WNG_Anlst | $0.061 * * *$ | -0.048 | -0.051 | $0.327 * * *$ | 0.119 | 0.077 | 51.4\% | -2.95\% | 205 | 0.000 | 6.5\% | 97.4\% |
|  | (4.938) |  | (-0.526) | (10.280) | (0.624) | (1.702) |  |  |  |  |  |  |
| TrES_RW_25SBM | 0.041*** | -0.165 | -0.022 | $0.318^{* * *}$ | 0.076 | 0.121 | 52.5\% | -2.96\% | 205 | 0.000 | 3.3\% | 95.4\% |
|  | (3.418) | (-0.788) | (-0.272) | (10.398) | (0.708) | (1.771) |  |  |  |  |  |  |
| GM_Anlst | 0.036* | 0.218* | 0.020 | $0.29 * * *$ | 0.062 | 0.114 | 52.6\% | -3.00\% | 205 | 0.000 | 12.4\% | 41.2\% |
|  | (2.113) | (2.418) | (0.143) | (6.171) | (0.283) | (1.775) |  |  |  |  |  |  |
| FPM_HDZ | 0.027 | 0.286*** | -0.055 | $0.286 * * *$ | 0.561 | 0.099* | 52.6\% | -3.03\% | 205 | 0.000 | 13.7\% | 45.1\% |
|  | (1.798) | (3.370) | (-0.491) | (6.365) | (1.805) | (2.098) |  |  |  |  |  |  |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_RI_10Ind | 0.059*** | 0.001 | -0.022 | 0.305*** | -0.005 | 0.094* | 51.7\% | -3.04\% | 205 | 0.000 | 5.2\% | 98.7\% |
|  | (4.103) | (0.163) | (-0.293) | (11.702) | (-0.378) | (2.117) |  |  |  |  |  |  |
| TrETSS_Anlst_25SBM | $0.055 * * *$ | 0.031 | 0.013 | $0.299 * * *$ |  |  | 51.6\% | -3.05\% | 205 | 0.000 | 3.3\% | 83.7\% |
|  | (3.878) | (1.174) | (0.154) | (8.299) | (0.487) | (1.125) |  |  |  |  |  |  |
| WNG_RW | 0.044*** | 0.001 | -0.002 | $0.335 * * *$ | -0.006 | 0.057 | 51.6\% | -3.11\% | 205 | 0.000 | 1.3\% | 100.0\% |
|  | (4.208) | (0.832) | (-0.032) | (10.218) | (-0.190) | (1.327) |  |  |  |  |  |  |
| KMY_Anlst | 0.019 | $0.168 * * *$ | -0.132 | 0.293*** | $0.33 *$ | $0.113$ | 52.6\% | -3.14\% | 205 | 0.000 | 20.3\% | 50.3\% |
|  | (1.095) | (3.111) | (-1.183) | (6.537) |  |  |  |  |  |  |  |  |
| PE_EP | 0.027* | 0.128 | -0.012 | $0.328 * * *$ | 0.267 | 0.076 | 53.1\% | -3.21\% | 205 | 0.000 | 17.6\% | 86.9\% |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| GG_Anlst | 0.011 | 0.091* | 0.044 | $0.335 * * *$ | 0.279* | 0.092 | 52.4\% | -3.22\% | 205 | 0.000 | 17.6\% | 71.9\% |
|  | (0.712) | (2.128) | (0.633) | (11.620) | (2.005) | (1.784) |  |  |  |  |  |  |
| TrETSS_RW_25SBM | 0.035* | -0.012 | 0.052 | 0.32*** | 0.004 | 0.075 | 52.3\% | -3.23\% | 205 | 0.000 | 4.6\% | 96.1\% |
|  | (2.136) | (-1.508) | (0.616) | (10.887) | (0.404) | (1.366) |  |  |  |  |  |  |
| TrES_RI_25SBM | 0.037*** | 0.011 | 0.100 | 0.3*** | -0.002 | 0.050 | 51\% | -3.24\% | 205 | 0.000 | 11.1\% | 99.3\% |
|  | (3.291) | (1.903) | (0.674) | (11.552) | (-0.241) | (0.881) |  |  |  |  |  |  |
| MPEG_RI | 0.037* | 0.019 | -0.019 | $0.342 * * *$ | 0.261 | 0.066 | 52.3\% | -3.24\% | 205 | 0.000 | 18.3\% | 83.7\% |
|  | (2.524) | (0.360) | (-0.294) | (11.862) | (1.099) | (1.368) |  |  |  |  |  |  |
| PEG_HDZ | -0.039 | 0.095 | -0.288 | 0.464* | 0.602** | -1.826 | 52.9\% | -3.25\% | 205 | 0.000 | 7.2\% | 71.9\% |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_HDZ_10Ind | (-0.371) | (1.284) | (-0.719) | (2.327) | (2.620) | (-0.722) |  |  |  |  |  |  |
|  | 0.044*** | 0.111 | 0.060 | 0.312*** | -0.009 | 0.066 | 51.7\% | -3.26\% | 205 | 0.000 | 8.5\% | 84.3\% |
|  | (3.419) | (1.893) | (0.536) | (11.008) | (-0.141) | (1.375) |  |  |  |  |  |  |
| GG_EP | 0.025 | 0.140 | -0.075 | 0.326*** | 0.332 | 0.096* | 52.4\% | -3.27\% | 205 | 0.000 | 13.4\% | 73.2\% |
|  | (1.620) | (1.708) | (-0.993) | (9.927) | (1.334) |  |  |  |  |  |  |  |
| CT_RI | 0.024 | 0.035 | 0.003 | 0.344*** | 0.086 | 0.079 | 51.4\% | -3.28\% | 205 | 0.000 | 8.6\% | 90.8\% |
|  | (1.128) | (0.974) | (0.035) | (10.161) | (0.187) | (1.382) |  |  |  |  |  |  |
| DKL_Anlst | 0.025 | 0.337** | -0.041 | 0.294*** | 0.370 | 0.102 | 52.9\% | -3.30\% | 205 | 0.000 | 19.0\% | 32.0\% |
|  | (1.325) | (2.825) | (-0.344) | (6.509) | (0.900) |  |  |  |  |  |  |  |
| FPM_RI | 0.027 | 0.042 | 0.003 | 0.313*** | 0.007 | 0.071 | 52.2\% | -3.30\% | 205 | 0.000 | 13.1\% | 80.4\% |
|  | (1.687) | (1.338) | (0.046) | (11.724) | (0.104) | (1.631) |  |  |  |  |  |  |
| Carhart_Factor | $0.061 * * *$ | -0.104 | -0.095 | 0.285*** | 0.604 | -0.023 | 51.5\% | -3.33\% | 205 | 0.000 | 3.9\% | 35.3\% |
|  | (4.109) | (-1.188) | (-0.895) | (6.324) | (0.747) | (-0.147) |  |  |  |  |  |  |
| WNG_RI | 0.041*** | 0.000 | 0.045 | $0.316^{* * *}$ | 0.080 | 0.055 | 52.3\% | -3.36\% | 205 | 0.000 | 2.0\% | 99.3\% |
|  | (3.376) | (0.931) | (0.526) | (11.897) | (0.922) | (1.061) |  |  |  |  |  |  |
| 3FF_Factor | 0.05*** | -0.087 | -0.064 | $0.291^{* * *}$ | -1.702 | 0.134* | 51.8\% | -3.36\% | 205 | 0.000 | 5.2\% | 18.3\% |
|  | (3.113) | (-0.474) | (-0.578) | (6.365) | (-1.379) | (2.054) |  |  |  |  |  |  |
| GLS_EP | 0.043* | 0.070 | -0.074 | 0.317*** | -3.625 | -0.010 | 52.7\% | -3.36\% | 205 | 0.000 | 15.8\% | 78.3\% |
|  | (2.065) | (0.892) | (-0.982) | (10.181) | (-0.597) | (-0.063) |  |  |  |  |  |  |

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Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | $\operatorname{Adj} R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_10Ind | 0.053*** | 0.002 | 0.036 | 0.32*** | 0.096 | 0.088 | 51.2\% | -3.42\% | 205 | 0.000 | 5.9\% | 47.1\% |
|  | (3.625) | (0.016) | (0.344) | (10.952) | (0.629) | (1.554) |  |  |  |  |  |  |
| FGHJ_EP | 0.042* | 0.029 | -0.028 | $0.317 * * *$ | -5.046 | 0.088 | 52.2\% | -3.54\% | 205 | 0.000 | 17.8\% | 82.2\% |
|  | (2.325) | (0.472) | (-0.310) | (10.228) | (-0.446) | (1.815) |  |  |  |  |  |  |
| TrOHE_25SBM | 0.048*** | 0.102* | 0.035 | 0.343*** | -0.029 |  | 50.9\% | -3.57\% | 205 | 0.000 | 8.5\% | 82.4\% |
|  | (3.802) | (2.138) | (0.457) | (10.720) | (-1.096) | (1.649) |  |  |  |  |  |  |
| HL_Anlst | 0.033* | 0.251** | -0.031 | 0.293*** | 0.113 | 0.093 | 52.5\% | -3.58\% | 205 | 0.000 | 16.3\% | 35.9\% |
|  |  |  | (-0.270) | (6.469) |  |  |  |  |  |  |  |  |
| DKL_RW | 0.051** | 0.031 | -0.012 | $0.317 * * *$ | 0.158 | -0.056 | 51.5\% | -3.61\% | 205 | 0.000 | 9.2\% | 77.8\% |
|  |  |  | (-0.163) |  |  |  |  |  |  |  |  |  |
| TrES_EP_10Ind | 0.036 | 0.002 | 0.042 | 0.297*** | -0.018 | 0.107 | 51\% | -3.71\% | 205 | 0.000 | 7.2\% | 98.0\% |
|  | (1.553) | (0.153) | (0.555) | (11.386) | (-0.146) | (1.914) |  |  |  |  |  |  |
| TrETSS_HDZ_25SBM | 0.059** | -0.034 | 0.284 | $0.324 * * *$ | 0.038 | -0.011 | 51\% | -3.75\% | 205 | 0.000 | 10.5\% | 88.2\% |
|  | (2.622) | (-0.762) | (0.700) | (9.325) | (0.746) | (-0.072) |  |  |  |  |  |  |
| PE_RW | 0.031 | -0.218 | 0.031 | 0.321*** | 0.147 | 0.064 | 52.1\% | -3.82\% | 205 | 0.000 | 7.3\% | 84.1\% |
|  | (0.917) | (-1.039) | (0.384) | (10.478) | (0.617) | (1.396) |  |  |  |  |  |  |
| FPM_RW | 0.033 | 0.041 | -0.010 | $0.299 * * *$ | 0.174 | -0.043 | 51.6\% | -3.95\% | 205 | 0.000 | 7.8\% | 78.4\% |
|  | (1.952) | (1.287) | (-0.129) | (11.628) | (1.624) | (-0.273) |  |  |  |  |  |  |
| PEG_RW | -0.018 | 0.053 | -0.084 | 0.279*** | 0.260 | 0.060 | 51.5\% | -3.98\% | 205 | 0.000 | 7.5\% | 100.0\% |

[^62]Table 93 : Capturing Subsequent Return: High Earnings Variation Firms, Continued

| Model | Intercept | ICC | CFNST | CFNLT | EWERN | FSERN | Adj $R^{2}$ | $R^{2}$ Imp. | N | $\beta_{I C C}^{T S}=1$ | $\% \mathrm{~N}+\mathrm{sig}$ | $\% \% \beta_{I C C}^{C S}=1$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst _25SBM | (-0.194) | (0.532) | (-0.543) | (4.466) | (1.221) | (0.921) |  |  |  |  |  |  |
|  | 0.047*** | 0.007 | 0.037 | $0.302 * * *$ | -0.009 | 0.066 | 51.1\% | -4.00\% | 205 | 0.000 | 4.6\% | 98.0\% |
|  | (4.545) | (1.164) | (0.481) | (11.513) | (-1.409) | (1.270) |  |  |  |  |  |  |
| MPEG_RW | 0.011 | 0.104* | 0.043 | $0.31^{* * *}$ | 0.309 | 0.047 | 51.9\% | -4.05\% | 205 | 0.000 | 9.2\% | 88.2\% |
|  | (0.235) | (2.038) | (0.541) | (11.210) | (1.536) | (0.958) |  |  |  |  |  |  |
| GM_RW | 0.019 | 0.063 | 0.026 | $0.327 * * *$ | 0.408** | 0.103* | 51.9\% | -4.05\% | 205 | 0.000 | 14.5\% | 84.2\% |
|  | (1.205) | (1.877) | (0.351) | (11.668) | (2.711) | (2.034) |  |  |  |  |  |  |
| TrES_RW_10Ind | 0.055*** | 0.032 | 0.044 | 0.307*** | -1.000 | -0.036 | 51.2\% | -4.15\% | 205 | 0.000 | 4.6\% | 90.2\% |
|  | (3.915) | (0.540) | (0.555) | (11.354) | (-0.936) | (-0.228) |  |  |  |  |  |  |
| 5FF_Factor | 0.057*** | 0.003 | -0.079 | 0.288*** | -1.728 | 0.084 | 51\% | -4.34\% | 205 | 0.000 | 9.2\% | 22.2\% |
|  | (3.848) | (0.030) | (-0.733) | (6.413) | (-1.119) | (1.831) |  |  |  |  |  |  |
| TrES_EP_25SBM | 0.044*** | -0.008 | 0.025 | 0.304*** | -0.008 | 0.071 | 51\% | -4.96\% | 205 | 0.000 | 5.2\% | 98.0\% |
|  | (3.478) | (-0.723) | (0.327) | (11.744) | (-0.861) | (1.444) |  |  |  |  |  |  |
| TrES_HDZ_25SBM | 0.036* | -0.020 | -0.165 | 0.295*** | 0.012 | 0.244 | 50.5\% | -5.08\% | 205 | 0.000 | 3.9\% | 97.4\% |
|  | (2.208) | (-1.054) | (-0.660) | (10.393) | (0.901) | (1.360) |  |  |  |  |  |  |

For the highest quartile of firms in terms of earnings variation, this table reports average monthly regression coefficients of one year ahead return on expected return proxies using various ICC models, cash flow news proxies (CFNST and CFNLT), and expected return news proxies (EWERN and FSERN) are presented in this table $r_{\text {realised }, \text { it }}=$ $\alpha_{0}+\beta_{1} I C C_{i t-1}+\beta_{2} C F N S T_{i t}+\beta_{3} C F N L T_{i t}+\beta_{4} E W E R N_{i t}+\beta_{5} F S E R N_{i t}+\epsilon_{i t}$. The t-statistics of the mean is calculated using the temporal standard error of the coefficients estimates across the testing period as described in Fama and MacBeth (1973). The adjusted R squared is the mean from the monthly regressions, and it represents how much
of the variation in subsequent return is captured by the model. $R^{2} \mathbf{I m p}$. is the difference between the adjusted R squared of the model and the adjusted R squared of the same model without the ICC variable. $R^{2}$ Imp. measures how much improvement in capturing subsequent return variation is provided by the ICC estimate. $\mathbf{N}$ is the number of months over which the cross-sectional regressions are carried out. $\beta_{I C C}^{T S}=1$ is the p -value for testing whether the reported average ICC coefficient is different from the theoretical value of one. $\% \mathbf{N}+$ sig is the percentage of months in which the ICC coefficient was positive and statistically significant. $\% \beta_{I C C}^{C S}=1$ is the percentage of months in which the ICC coefficient was indistinguishable from one.

## A. 2 MCS Additional Analysis

Table 94: Model Confidence Set Summary Results: Firm Size Effect

|  |  |  |  |  |  |  |
| :--- | ---: | :--- | :--- | :--- | :--- | :---: |
| Panel A: Analysts |  |  | RMSE |  | MAE |  |
| MEV |  |  |  |  |  |  |
| BP_Anlst | $42.58 \%$ | GLS_Anlst | $53.48 \%$ | PE_Anlst | $54.87 \%$ |  |
| PE_Anlst | $41.86 \%$ | PE_Anlst | $50.56 \%$ | GLS_Anlst | $53.96 \%$ |  |
| GG_Anlst | $39.71 \%$ | BP_Anlst | $49.03 \%$ | BP_Anlst | $52.99 \%$ |  |
| PEG_Anlst | $39.20 \%$ | MPEG_Anlst | $46.11 \%$ | MPEG_Anlst | $47.36 \%$ |  |
| CT_Anlst | $37.67 \%$ | FGHJ_Anlst | $44.71 \%$ | OHE_Ind10 | $47.08 \%$ |  |
| KMY_Anlst | $36.44 \%$ | OHE_Ind10 | $43.60 \%$ | ETSS_Anlst_Ind10 | $45.13 \%$ |  |
| FPM_Anlst | $36.44 \%$ | HL_Anlst | $42.14 \%$ | FGHJ_Anlst | $44.30 \%$ |  |
| OHE_Ind10 | $35.82 \%$ | ETSS_Anlst_Ind10 | $41.93 \%$ | PEG_Anlst | $43.74 \%$ |  |
| GLS_Anlst | $34.90 \%$ | DKL_Anlst | $41.72 \%$ | HL_Anlst | $43.39 \%$ |  |
| MPEG_Anlst | $34.70 \%$ | GM_Anlst | $41.52 \%$ | CT_Anlst | $42.56 \%$ |  |
| GM_Anlst | $34.19 \%$ | PEG_Anlst | $40.89 \%$ | DKL_Anlst | $42.42 \%$ |  |
| FGHJ_Anlst | $33.37 \%$ | CT_Anlst | $40.75 \%$ | KMY_Anlst | $42.14 \%$ |  |
| ETSS_Anlst_Ind10 | $32.45 \%$ | KMY_Anlst | $40.61 \%$ | GM_Anlst | $42.00 \%$ |  |
| DKL_Anlst | $32.24 \%$ | FPM_Anlst | $38.18 \%$ | TPDPS_Anlst | $38.73 \%$ |  |
| HL_Anlst | $31.22 \%$ | WNG_Anlst | $35.12 \%$ | FPM_Anlst | $38.60 \%$ |  |
| WNG_Anlst | $29.48 \%$ | Naive | $34.49 \%$ | Naive | $37.76 \%$ |  |
| Naive | $15.76 \%$ | TPDPS_Anlst | $34.08 \%$ | OHE_25SBM | $36.16 \%$ |  |
| TPDPS_Anlst | $15.15 \%$ | OHE_25SBM | $31.15 \%$ | WNG_Anlst | $33.10 \%$ |  |
| OHE_25SBM | $13.00 \%$ | GG_Anlst | $28.93 \%$ | GG_Anlst | $29.00 \%$ |  |
| ETSS_Anlst_25SBM | $12.08 \%$ | ETSS_Anlst_25SBM | $26.43 \%$ | ETSS_Anlst_25SBM | $28.79 \%$ |  |
| ES_Anlst_Ind10 | $8.70 \%$ | ES_Anlst_Ind10 | $13.35 \%$ | ES_Anlst_Ind10 | $15.02 \%$ |  |
| ES_Anlst_25SBM | $2.25 \%$ | ES_Anlst_25SBM | $7.58 \%$ | ES_Anlst_25SBM | $7.44 \%$ |  |


| MEV |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_Anlst | $42.68 \%$ | GLS_Anlst | $55.04 \%$ | PE_Anlst | $56.70 \%$ |
| PE_Anlst | $42.27 \%$ | PE_Anlst | $53.04 \%$ | GLS_Anlst | $56.17 \%$ |
| GG_Anlst | $39.61 \%$ | BP_Anlst | $50.43 \%$ | BP_Anlst | $54.64 \%$ |
| PEG_Anlst | $39.10 \%$ | MPEG_Anlst | $49.17 \%$ | MPEG_Anlst | $49.83 \%$ |
| CT_Anlst | $37.67 \%$ | FGHJ_Anlst | $47.30 \%$ | OHE_Ind10 | $49.70 \%$ |
| KMY_Anlst | $36.64 \%$ | OHE_Ind10 | $46.63 \%$ | FGHJ_Anlst | $46.83 \%$ |
| FPM_Anlst | $36.54 \%$ | HL_Anlst | $45.10 \%$ | ETSS_Anlst_Ind10 | $46.76 \%$ |
| OHE_Ind10 | $35.82 \%$ | ETSS_Anlst_Ind10 | $44.83 \%$ | PEG_Anlst | $46.16 \%$ |
| GLS_Anlst | $34.90 \%$ | PEG_Anlst | $44.63 \%$ | HL_Anlst | $46.10 \%$ |
| MPEG_Anlst | $34.90 \%$ | DKL_Anlst | $44.50 \%$ | DKL_Anlst | $45.90 \%$ |
| GM_Anlst | $34.49 \%$ | GM_Anlst | $44.30 \%$ | GM_Anlst | $45.03 \%$ |
| FGHJ_Anlst | $33.47 \%$ | KMY_Anlst | $43.10 \%$ | CT_Anlst | $44.76 \%$ |
| DKL_Anlst | $32.34 \%$ | CT_Anlst | $43.03 \%$ | KMY_Anlst | $44.30 \%$ |
| ETSS_Anlst_Ind10 | $32.34 \%$ | FPM_Anlst | $41.16 \%$ | FPM_Anlst | $41.83 \%$ |
| HL_Anlst | $31.32 \%$ | Naive | $36.69 \%$ | TPDPS_Anlst | $39.96 \%$ |
| WNG_Anlst | $29.27 \%$ | WNG_Anlst | $36.62 \%$ | Naive | $39.63 \%$ |
| Naive | $15.35 \%$ | TPDPS_Anlst | $36.62 \%$ | OHE_25SBM | $38.56 \%$ |
| TPDPS_Anlst | $14.64 \%$ | OHE_25SBM | $34.29 \%$ | WNG_Anlst | $34.76 \%$ |
| OHE_25SBM | $13.00 \%$ | GG_Anlst | $30.55 \%$ | ETSS_Anlst_25SBM | $31.22 \%$ |
| ETSS_Anlst_25SBM | $11.98 \%$ | ETSS_Anlst_25SBM | $28.49 \%$ | GGG_Anlst | $30.42 \%$ |
| ESS_Anlst_Ind10 | $8.80 \%$ | ES_Anlst_Ind10 | $14.74 \%$ | ES_Anlst_Ind10 | $14.94 \%$ |
| ES_Anlst_25SBM | $2.15 \%$ | ES_Anlst_25SBM | $8.54 \%$ | ES_Anlst_25SBM | $8.67 \%$ |


| Panel B: HDZ |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| PEG_HDZ | 44.41\% | PE_HDZ | 54.94\% | PE_HDZ | 58.90\% | PEG_HDZ | 44.30\% | PE_HDZ | 56.64\% | PE_HDZ | 60.11\% |
| BP_HDZ | 44.08\% | BP_HDZ | 51.67\% | BP_HDZ | 57.09\% | BP_HDZ | 44.19\% | BP_HDZ | 53.17\% | BP_HDZ | 58.31\% |
| GM_HDZ | 42.76\% | GLS_HDZ | 50.70\% | GLS_HDZ | 51.18\% | GM_HDZ | 43.09\% | GLS_HDZ | 52.50\% | GLS_HDZ | 53.84\% |
| PE_HDZ | 42.65\% | GG_HDZ | 48.40\% | GG_HDZ | 51.18\% | PE_HDZ | 42.54\% | GG_HDZ | 50.83\% | GG_HDZ | 53.17\% |
| MPEG_HDZ | 41.89\% | FGHJ_HDZ | 45.20\% | FGHJ_HDZ | 45.34\% | MPEG_HDZ | 41.89\% | FGHJ_HDZ | 47.90\% | FGHJ_HDZ | 49.23\% |
| FPM_HDZ | 38.60\% | CT_HDZ | 43.25\% | CT_HDZ | 44.78\% | FPM_HDZ | 39.04\% | CT_HDZ | 45.16\% | CT_HDZ | 47.30\% |
| GG_HDZ | 38.27\% | KMY_HDZ | 38.73\% | ETSS_HDZ_Ind10 | 41.45\% | GG_HDZ | 38.60\% | KMY_HDZ | 41.76\% | KMY_HDZ | 43.70\% |
| GLS_HDZ | 36.62\% | DKL_HDZ | 38.39\% | TPDPS_HDZ | 41.17\% | GLS_HDZ | 36.84\% | DKL_HDZ | 41.36\% | TPDPS_HDZ | 42.90\% |
| FGHJ_HDZ | 35.31\% | ETSS_HDZ_Ind10 | 37.83\% | KMY_HDZ | 40.54\% | FGHJ_HDZ | 35.64\% | ETSS_HDZ_Ind10 | 40.16\% | ETSS_HDZ_Ind10 | 42.76\% |
| KMY_HDZ | 33.88\% | TPDPS_HDZ | 36.93\% | DKL_HDZ | 39.92\% | KMY_HDZ | 34.21\% | TPDPS_HDZ | 39.43\% | DKL_HDZ | 42.63\% |
| HL_HDZ | 33.55\% | HL_HDZ | 35.95\% | HL_HDZ | 37.48\% | HL_HDZ | 33.55\% | HL_HDZ | 38.89\% | HL_HDZ | 40.56\% |
| CT_HDZ | 32.35\% | MPEG_HDZ | 35.26\% | MPEG_HDZ | 37.00\% | CT_HDZ | 32.35\% | MPEG_HDZ | 37.56\% | MPEG_HDZ | 39.83\% |
| DKL_HDZ | 31.25\% | GM_HDZ | 33.80\% | GM_HDZ | 36.23\% | DKL_HDZ | 31.25\% | GM_HDZ | 36.89\% | GM_HDZ | 39.16\% |
| WNG_HDZ | 27.96\% | FPM_HDZ | 33.52\% | FPM_HDZ | 35.95\% | WNG_HDZ | 28.29\% | FPM_HDZ | 36.02\% | FPM_HDZ | 39.03\% |
| ETSS_HDZ_Ind10 | 24.89\% | PEG_HDZ | 31.64\% | PEG_HDZ | 34.56\% | ETSS_HDZ_Ind10 | 25.11\% | PEG_HDZ | 34.36\% | PEG_HDZ | 37.29\% |
| TPDPS_HDZ | 17.00\% | WNG_HDZ | 23.44\% | ETSS_HDZ_25SBM | 25.03\% | TPDPS_HDZ | 16.78\% | ETSS_HDZ_25SBM | 25.48\% | ETSS_HDZ_25SBM | 27.28\% |
| ETSS_HDZ_25SBM | 9.65\% | ETSS_HDZ_25SBM | 22.67\% | WNG_HDZ | 24.41\% | ETSS_HDZ_25SBM | 10.09\% | WNG_HDZ | 25.08\% | WNG_HDZ | 26.15\% |
| ES_HDZ_25SBM | 1.97\% | ES_HDZ_25SBM | 8.62\% | ES_HDZ_25SBM | 8.83\% | ES_HDZ_25SBM | 2.19\% | ES_HDZ_25SBM | 10.01\% | ES_HDZ_25SBM | 9.67\% |
| ES_HDZ_Ind10 | 1.32\% | ES_HDZ_Ind10 | 7.02\% | ES_HDZ_Ind10 | 6.61\% | ES_HDZ_Ind10 | 1.43\% | ES_HDZ_Ind10 | 7.94\% | ES_HDZ_Ind10 | 6.80\% |

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Table 94: Model Confidence Set Summary Results: Firm Size Effect, Continued
First Quartile Fourth Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 57.23\% | BP_RW | 64.88\% | GG_RW | 68.15\% | BP_RW | 57.38\% | GG_RW | 66.31\% | GG_RW | 68.98\% |
| GG_RW | 35.62\% | GG_RW | 64.81\% | BP_RW | 66.76\% | GG_RW | 35.92\% | BP_RW | 65.51\% | BP_RW | 66.98\% |
| KMY_RW | 33.38\% | CT_RW | 50.90\% | CT_RW | 52.29\% | KMY_RW | 33.38\% | CT_RW | 53.04\% | CT_RW | 54.17\% |
| GM_RW | 23.99\% | FGHJ_RW | 44.02\% | FGHJ_RW | 46.18\% | GM_RW | 24.14\% | FGHJ_RW | 46.23\% | FGHJ_RW | 48.63\% |
| CT_RW | 19.08\% | KMY_RW | 43.18\% | KMY_RW | 43.67\% | CT_RW | 19.23\% | KMY_RW | 45.96\% | KMY_RW | 46.70\% |
| FGHJ_RW | 18.93\% | DKL_RW | 36.37\% | GLS_RW | 38.04\% | FGHJ_RW | 18.63\% | DKL_RW | 39.16\% | GLS_RW | 40.29\% |
| HL_RW | 15.80\% | GLS_RW | 35.61\% | DKL_RW | 36.30\% | HL_RW | 15.80\% | GLS_RW | 37.96\% | DKL_RW | 39.23\% |
| MPEG_RW | 15.35\% | GM_RW | 32.75\% | GM_RW | 34.08\% | MPEG_RW | 15.50\% | GM_RW | 36.29\% | GM_RW | 37.16\% |
| DKL_RW | 15.20\% | HL_RW | 31.64\% | HL_RW | 30.95\% | DKL_RW | 15.20\% | HL_RW | 34.56\% | HL_RW | 33.22\% |
| GLS_RW | 13.71\% | TPDPS_RW | 26.01\% | TPDPS_RW | 28.30\% | GLS_RW | 13.86\% | TPDPS_RW | 28.55\% | TPDPS_RW | 29.82\% |
| PE_RW | 10.43\% | MPEG_RW | 24.76\% | MPEG_RW | 26.56\% | PE_RW | 10.73\% | MPEG_RW | 26.88\% | MPEG_RW | 28.62\% |
| TPDPS_RW | 10.13\% | PEG_RW | 23.78\% | PEG_RW | 25.10\% | TPDPS_RW | 10.13\% | PEG_RW | 26.28\% | PEG_RW | 26.55\% |
| PEG_RW | 9.99\% | ES_RW_Ind10 | 16.62\% | ES_RW_Ind10 | 18.01\% | PEG_RW | 9.99\% | ES_RW_Ind10 | 20.41\% | ES_RW_Ind10 | 21.41\% |
| ETSS_RW_Ind10 | 3.28\% | PE_RW | 16.20\% | PE_RW | 16.76\% | ETSS_RW_Ind10 | 3.28\% | PE_RW | 18.15\% | PE_RW | 18.08\% |
| ES_RW_Ind10 | 2.68\% | ETSS_RW_Ind10 | 14.26\% | ETSS_RW_Ind10 | 13.84\% | ES_RW_Ind10 | 2.68\% | ETSS_RW_Ind10 | 16.28\% | ETSS_RW_Ind10 | 15.68\% |
| WNG_RW | 2.68\% | ETSS_RW_25SBM | 10.85\% | ETSS_RW_25SBM | 9.67\% | WNG_RW | 2.68\% | ETSS_RW_25SBM | 12.27\% | ETSS_RW_25SBM | 11.54\% |
| ETSS_RW_25SBM | 1.94\% | ES_RW_25SBM | 7.72\% | ES_RW_25SBM | 7.65\% | ETSS_RW_25SBM | 1.94\% | ES_RW_25SBM | 10.74\% | ES_RW_25SBM | 9.41\% |
| FPM_RW | 1.79\% | FPM_RW | 7.58\% | FPM_RW | 7.58\% | FPM_RW | 1.79\% | FPM_RW | 10.01\% | FPM_RW | 9.14\% |
| ES_RW_25SBM | 0.45\% | WNG_RW | 7.30\% | WNG_RW | 4.73\% | ES_RW_25SBM | 0.30\% | WNG_RW | 8.74\% | WNG_RW | 5.14\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 57.05\% | BP_EP | 62.80\% | BP_EP | 64.95\% | BP_EP | 56.68\% | BP_EP | 64.18\% | BP_EP | 66.58\% |
| PE_EP | 42.57\% | GG_EP | 54.45\% | GG_EP | 56.40\% | PE_EP | 42.20\% | GG_EP | 56.44\% | GG_EP | 58.37\% |
| GLS_EP | 34.28\% | KMY_EP | 47.98\% | KMY_EP | 49.44\% | GM_EP | 34.28\% | KMY_EP | 51.57\% | KMY_EP | 52.10\% |
| GM_EP | 34.28\% | CT_EP | 39.78\% | CT_EP | 41.45\% | FGHJ_EP | 34.28\% | CT_EP | 43.43\% | CT_EP | 45.63\% |
| FGHJ_EP | 34.28\% | PE_EP | 38.53\% | PE_EP | 41.17\% | GLS_EP | 34.03\% | PE_EP | 39.96\% | PE_EP | 42.03\% |
| DKL_EP | 31.31\% | GLS_EP | 34.77\% | GLS_EP | 36.86\% | DKL_EP | 30.94\% | GLS_EP | 37.69\% | GLS_EP | 39.09\% |
| HL_EP | 30.69\% | DKL_EP | 33.03\% | DKL_EP | 34.63\% | KMY_EP | 30.45\% | DKL_EP | 36.69\% | DKL_EP | 37.76\% |
| KMY_EP | 30.57\% | TPDPS_EP | 30.53\% | TPDPS_EP | 33.38\% | HL_EP | 29.95\% | FGHJ_EP | 33.22\% | TPDPS_EP | 36.16\% |
| MPEG_EP | 29.46\% | FGHJ_EP | 29.42\% | FGHJ_EP | 31.99\% | MPEG_EP | 29.21\% | TPDPS_EP | 32.82\% | FGHJ_EP | 34.82\% |
| GG_EP | 24.75\% | GM_EP | 24.90\% | GM_EP | 28.23\% | PEG_EP | 24.88\% | GM_EP | 28.49\% | GM_EP | 31.09\% |
| PEG_EP | 24.75\% | HL_EP | 24.27\% | HL_EP | 26.56\% | GG_EP | 24.50\% | HL_EP | 27.08\% | HL_EP | 29.22\% |
| CT_EP | 21.66\% | PEG_EP | 21.28\% | PEG_EP | 24.83\% | CT_EP | 21.41\% | PEG_EP | 23.75\% | PEG_EP | 27.55\% |
| TPDPS_EP | 16.46\% | MPEG_EP | 16.13\% | MPEG_EP | 17.80\% | TPDPS_EP | 16.34\% | MPEG_EP | 19.01\% | MPEG_EP | 20.35\% |
| ETSS_EP_Ind10 | 7.55\% | ETSS_EP_Ind10 | 11.06\% | ETSS_EP_Ind10 | 11.61\% | ETSS_EP_Ind10 | 7.30\% | ETSS_EP_Ind10 | 13.01\% | ETSS_EP_Ind10 | 12.94\% |
| FPM_EP | 6.81\% | FPM_EP | 6.82\% | FPM_EP | 7.37\% | FPM_EP | 6.81\% | FPM_EP | 8.27\% | FPM_EP | 7.61\% |
| ETSS_EP_25SBM | 4.21\% | ES_EP_Ind10 | 5.84\% | ES_EP_Ind10 | 6.82\% | ETSS_EP_25SBM | 3.96\% | ETSS_EP_25SBM | 7.47\% | ES_EP_Ind10 | 6.87\% |
| ES_EP_Ind10 | 1.73\% | ETSS_EP_25SBM | 5.42\% | ETSS_EP_25SBM | 5.56\% | ES_EP_Ind10 | 1.61\% | ES_EP_Ind10 | 7.34\% | ETSS_EP_25SBM | 5.87\% |
| WNG_EP | 1.36\% | WNG_EP | 3.89\% | WNG_EP | 3.62\% | WNG_EP | 1.36\% | WNG_EP | 5.40\% | WNG_EP | 3.80\% |
| ES_EP_25SBM | 0.25\% | ES_EP_25SBM | 2.29\% | ES_EP_25SBM | 1.88\% | ES_EP_25SBM | 0.25\% | ES_EP_25SBM | 3.87\% | ES_EP_25SBM | 1.87\% |

Table 94: Model Confidence Set Summary Results: Firm Size Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 61.82\% | BP_RI | 65.23\% | BP_RI | 67.45\% | BP_RI | 61.69\% | BP_RI | 66.64\% | BP_RI | 67.44\% |
| PE_RI | 46.02\% | GG_RI | 54.31\% | GG_RI | 55.98\% | PE_RI | 46.02\% | GG_RI | 55.97\% | GG_RI | 57.37\% |
| GG_RI | 41.42\% | KMY_RI | 43.46\% | KMY_RI | 44.44\% | GG_RI | 41.54\% | PE_RI | 45.36\% | KMY_RI | 45.36\% |
| FGHJ_RI | 36.94\% | PE_RI | 43.05\% | PE_RI | 43.05\% | FGHJ_RI | 37.06\% | KMY_RI | 44.63\% | PE_RI | 44.36\% |
| GLS_RI | 35.95\% | GLS_RI | 38.60\% | GLS_RI | 41.66\% | GLS_RI | 36.19\% | GLS_RI | 41.23\% | GLS_RI | 44.10\% |
| KMY_RI | 30.35\% | TPDPS_RI | 35.81\% | TPDPS_RI | 38.46\% | KMY_RI | 30.60\% | TPDPS_RI | 38.49\% | TPDPS_RI | 40.03\% |
| GM_RI | 22.89\% | FGHJ_RI | 33.03\% | FGHJ_RI | 36.02\% | GM_RI | 22.89\% | FGHJ_RI | 36.82\% | FGHJ_RI | 38.83\% |
| DKL_RI | 19.40\% | DKL_RI | 29.21\% | DKL_RI | 30.74\% | DKL_RI | 19.53\% | DKL_RI | 30.89\% | DKL_RI | 32.15\% |
| TPDPS_RI | 18.66\% | CT_RI | 25.59\% | CT_RI | 27.61\% | TPDPS_RI | 18.41\% | GM_RI | 28.42\% | GM_RI | 29.42\% |
| MPEG_RI | 17.04\% | GM_RI | 24.83\% | GM_RI | 26.77\% | MPEG_RI | 17.04\% | CT_RI | 26.95\% | CT_RI | 27.82\% |
| HL_RI | 15.67\% | HL_RI | 23.23\% | HL_RI | 25.17\% | HL_RI | 15.67\% | HL_RI | 26.02\% | HL_RI | 27.22\% |
| PEG_RI | 12.06\% | PEG_RI | 22.18\% | PEG_RI | 24.90\% | PEG_RI | 11.94\% | PEG_RI | 24.42\% | PEG_RI | 26.42\% |
| CT_RI | 10.45\% | MPEG_RI | 16.06\% | MPEG_RI | 17.87\% | CT_RI | 10.70\% | MPEG_RI | 18.48\% | MPEG_RI | 19.28\% |
| ETSS_RI_Ind10 | 4.85\% | ETSS_RI_Ind10 | 12.17\% | ETSS_RI_Ind10 | 13.14\% | ETSS_RI_Ind10 | 4.85\% | ETSS_RI_Ind10 | 13.61\% | ETSS_RI_Ind10 | 14.48\% |
| FPM_RI | 3.11\% | FPM_RI | 9.04\% | FPM_RI | 9.67\% | FPM_RI | 2.99\% | FPM_RI | 10.74\% | FPM_RI | 10.27\% |
| ETSS_RI_25SBM | 2.11\% | ETSS_RI_25SBM | 7.37\% | ETSS_RI_25SBM | 8.00\% | ETSS_RI_25SBM | 2.11\% | ETSS_RI_25SBM | 9.14\% | ETSS_RI_25SBM | 9.14\% |
| WNG_RI | 1.00\% | ES_RI_Ind10 | 3.55\% | ES_RI_Ind10 | 2.99\% | WNG_RI | 1.00\% | WNG_RI | 5.00\% | WNG_RI | 3.87\% |
| ES_RI_Ind10 | 0.75\% | WNG_RI | 3.20\% | WNG_RI | 2.92\% | ES_RI_Ind10 | 0.75\% | ES_RI_Ind10 | 4.80\% | ES_RI_Ind10 | 3.34\% |
| ES_RI_25SBM | 0.25\% | ES_RI_25SBM | 1.74\% | ES_RI_25SBM | 1.18\% | ES_RI_25SBM | 0.25\% | ES_RI_25SBM | 3.14\% | ES_RI_25SBM | 1.20\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of size. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 95: Model Confidence Set Summary Results: Firm Value Effect

| First Quartile |  |  |  |  |  |
| :--- | ---: | :--- | :--- | :--- | :--- |
|  | MEV |  |  |  |  |
| Panel A: Analysts |  |  |  | RMSE |  |
| MAE |  |  |  |  |  |
| GG_Anlst | $31.35 \%$ | BP_Anlst | $45.53 \%$ | BP_Anlst | $46.39 \%$ |
| PEG_Anlst | $30.72 \%$ | PE_Anlst | $42.44 \%$ | PE_Anlst | $45.36 \%$ |
| BP_Anlst | $29.15 \%$ | OHE_25SBM | $41.24 \%$ | OHE_25SBM | $45.02 \%$ |
| PE_Anlst | $28.21 \%$ | OHE_Ind10 | $40.55 \%$ | OHE_Ind10 | $40.55 \%$ |
| FPM_Anlst | $27.59 \%$ | GLS_Anlst | $33.33 \%$ | MPEG_Anlst | $35.57 \%$ |
| KMY_Anlst | $26.33 \%$ | MPEG_Anlst | $32.99 \%$ | GLS_Anlst | $35.22 \%$ |
| WNG_Anlst | $26.02 \%$ | ETSS_Anlst_Ind10 | $32.65 \%$ | ETSS_Anlst_Ind10 | $34.54 \%$ |
| GM_Anlst | $25.71 \%$ | CT_Anlst | $31.96 \%$ | CT_Anlst | $33.85 \%$ |
| OHE_Ind10 | $25.71 \%$ | FGHJ_Anlst | $30.24 \%$ | PEG_Anlst | $33.16 \%$ |
| OHE_25SBM | $25.08 \%$ | WNG_Anlst | $29.90 \%$ | KMY_Anlst | $32.65 \%$ |
| MPEG_Anlst | $24.76 \%$ | Naive | $29.73 \%$ | FGHJ_Anlst | $31.62 \%$ |
| ETSS_Anlst_Ind10 | $24.76 \%$ | KMY_Anlst | $29.55 \%$ | Naive | $31.27 \%$ |
| GLS_Anlst | $21.63 \%$ | HL_Anlst | $29.38 \%$ | TPDPS_Anlst | $31.27 \%$ |
| CT_Anlst | $21.00 \%$ | TPDPS_Anlst | $29.04 \%$ | GM_Anlst | $31.10 \%$ |
| FGHJ_Anlst | $19.44 \%$ | PEG_Anlst | $28.87 \%$ | HL_Anlst | $30.93 \%$ |
| HL_Anlst | $18.18 \%$ | GM_Anlst | $28.69 \%$ | DKL_Anlst | $30.24 \%$ |
| DKL_Anlst | $18.18 \%$ | DKL_Anlst | $28.69 \%$ | FPM_Anlst | $29.21 \%$ |
| ETSS_Anlst_25SBM | $13.48 \%$ | FPM_Anlst | $27.66 \%$ | WNG_Anlst | $29.21 \%$ |
| Naive | $11.29 \%$ | GG_Anlst | $21.65 \%$ | ETSS_Anlst_25SBM | $24.91 \%$ |
| TPDPS_Anlst | $11.29 \%$ | ETSS_Anlst_25SBM | $20.62 \%$ | GG_Anlst | $21.48 \%$ |
| ES_Anlst_Ind10 | $6.90 \%$ | ES_Anlst_Ind10 | $13.40 \%$ | ES_Anlst_Ind10 | $15.46 \%$ |
| ES_Anlst_25SBM | $2.19 \%$ | ES_Anlst_25SBM | $10.14 \%$ | ES_Anlst_25SBM | $11.34 \%$ |
|  |  |  |  |  |  |


| MEV |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
|  | RMSE |  |  |  |  |
| GG_Anlst | $31.66 \%$ | GLS_Anlst | $45.95 \%$ | PE_Anlst | $46.95 \%$ |
| PEG_Anlst | $30.72 \%$ | BP_Anlst | $43.71 \%$ | BP_Anlst | $45.33 \%$ |
| BP_Anlst | $29.15 \%$ | PE_Anlst | $42.96 \%$ | GLS_Anlst | $44.46 \%$ |
| PE_Anlst | $28.21 \%$ | MPEG_Anlst | $42.59 \%$ | MPEG_Anlst | $41.72 \%$ |
| FPM_Anlst | $27.90 \%$ | ETSS_Anlst_Ind10 | $40.97 \%$ | OHE_Ind10 | $41.47 \%$ |
| KMY_Anlst | $26.33 \%$ | PEG_Anlst | $39.85 \%$ | ETSS_Anlst_Ind10 | $40.60 \%$ |
| WNG_Anlst | $26.02 \%$ | OHE_Ind10 | $39.60 \%$ | PEG_Anlst | $39.10 \%$ |
| GM_Anlst | $25.71 \%$ | HL_Anlst | $38.36 \%$ | KMY_Anlst | $38.85 \%$ |
| OHE_Ind10 | $25.39 \%$ | KMY_Anlst | $37.61 \%$ | HL_Anlst | $37.73 \%$ |
| OHE_25SBM | $25.08 \%$ | GM_Anlst | $36.99 \%$ | GM_Anlst | $37.24 \%$ |
| MPEG_Anlst | $24.76 \%$ | FGHJ_Anlst | $36.99 \%$ | ETSS_Anlst_25SBM | $36.74 \%$ |
| ETSS_Anlst_Ind10 | $24.76 \%$ | DKL_Anlst | $36.86 \%$ | FGHJ_Anlst | $36.61 \%$ |
| GLS_Anlst | $21.63 \%$ | GG_Anlst | $35.62 \%$ | DKL_Anlst | $36.61 \%$ |
| CT_Anlst | $21.32 \%$ | ETSS_Anlst_25SBM | $35.37 \%$ | GG_Anlst | $36.11 \%$ |
| FGHJ_Anlst | $19.44 \%$ | FPM_Anlst | $34.37 \%$ | FPM_Anlst | $36.11 \%$ |
| HL_Anlst | $18.18 \%$ | CT_Anlst | $33.50 \%$ | TPDPS_Anlst | $35.62 \%$ |
| DKL_Anlst | $17.87 \%$ | TPDPS_Anlst | $32.88 \%$ | Naive | $34.25 \%$ |
| ETSS_Anlst_25SBM | $13.48 \%$ | WNG_Anlst | $32.50 \%$ | CT_Anlst | $33.87 \%$ |
| Naive | $11.29 \%$ | Naive | $32.13 \%$ | OHE_25SBM | $33.25 \%$ |
| TPDPS_Anlst | $11.29 \%$ | OHE_25SBM | $29.27 \%$ | WNG_Anlst | $28.77 \%$ |
| ES_Anlst_Ind10 | $6.90 \%$ | ES_Anlst_Ind10 | $14.57 \%$ | ES_Anlst_Ind10 | $14.20 \%$ |
| ES_Anlst_25SBM | $2.19 \%$ | ES_Anlst_25SBM | $7.72 \%$ | ES_Anlst_25SBM | $5.23 \%$ |


| Panel B: HDZ |  |  | RMSE |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| MEV |  |  |  | MAE |  |
| PEG_HDZ | $34.34 \%$ | BP_HDZ | $50.52 \%$ | BP_HDZ | $51.89 \%$ |
| GM_HDZ | $26.94 \%$ | PE_HDZ | $45.19 \%$ | PE_HDZ | $48.11 \%$ |
| BP_HDZ | $26.94 \%$ | GG_HDZ | $37.97 \%$ | GG_HDZ | $40.89 \%$ |
| PE_HDZ | $24.58 \%$ | FGHJ_HDZ | $32.13 \%$ | GLS_HDZ | $35.91 \%$ |
| FPM_HDZ | $24.58 \%$ | GLS_HDZ | $31.96 \%$ | CT_HDZ | $34.36 \%$ |
| MPEG_HDZ | $22.22 \%$ | CT_HDZ | $31.79 \%$ | TPDPS_HDZ | $34.36 \%$ |
| GG_HDZ | $21.89 \%$ | TPDPS_HDZ | $31.79 \%$ | FGHJ_HDZ | $34.19 \%$ |
| WNG_HDZ | $20.54 \%$ | ETSS_HDZ_Ind10 | $30.93 \%$ | FPM_HDZ | $33.33 \%$ |
| GLS_HDZ | $18.18 \%$ | FPM_HDZ | $30.76 \%$ | MPEG_HDZ | $33.16 \%$ |
| FGHJ_HDZ | $17.17 \%$ | MPEG_HDZ | $30.58 \%$ | ETSS_HDZ_Ind10 | $32.99 \%$ |
| HL_HDZ | $17.17 \%$ | PEG_HDZ | $30.24 \%$ | KMY_HDZ | $32.47 \%$ |
| CT_HDZ | $16.16 \%$ | KMY_HDZ | $28.69 \%$ | PEG_HDZ | $31.96 \%$ |
| ETSS_HDZ_Ind10 | $15.49 \%$ | DKL_HDZ | $27.66 \%$ | DKL_HDZ | $31.62 \%$ |
| DKL_HDZ | $13.47 \%$ | HL_HDZ | $26.98 \%$ | GM_HDZ | $29.73 \%$ |
| KMY_HDZ | $13.47 \%$ | GM_HDZ | $26.46 \%$ | HL_HDZ | $29.73 \%$ |
| TPDPS_HDZ | $13.47 \%$ | ETSS_HDZ_25SBM | $23.37 \%$ | ETSS_HDZ_25SBM | $29.04 \%$ |
| ETSS_HDZ_25SBM | $10.77 \%$ | WNG_HDZ | $21.65 \%$ | WNG_HDZ | $21.31 \%$ |
| ES_HDZ_25SBM | $3.03 \%$ | ES_HDZ_25SBM | $15.98 \%$ | ES_HDZ_25SBM | $17.35 \%$ |
| ES_HDZ_Ind10 | $0.34 \%$ | ES_HDZ_Ind10 | $8.25 \%$ | ES_HDZ_Ind10 | $7.73 \%$ |


| MEV |  |  | RMSE |  |  |  |  | MAE |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | $34.34 \%$ | PE_HDZ | $46.82 \%$ | PE_HDZ | $51.18 \%$ |  |  |  |  |  |
| GM_HDZ | $26.94 \%$ | BP_HDZ | $46.45 \%$ | BP_HDZ | $48.44 \%$ |  |  |  |  |  |
| BP_HDZ | $26.60 \%$ | GLS_HDZ | $44.33 \%$ | GLS_HDZ | $43.96 \%$ |  |  |  |  |  |
| FPM_HDZ | $24.58 \%$ | GG_HDZ | $39.10 \%$ | GG_HDZ | $40.10 \%$ |  |  |  |  |  |
| PE_HDZ | $24.24 \%$ | FGHJ_HDZ | $38.73 \%$ | FGHJ_HDZ | $39.98 \%$ |  |  |  |  |  |
| MPEG_HDZ | $22.22 \%$ | TPDPS_HDZ | $34.87 \%$ | TPDPS_HDZ | $39.60 \%$ |  |  |  |  |  |
| GG_HDZ | $21.21 \%$ | ETSS_HDZ_Ind10 | $34.50 \%$ | CT_HDZ | $36.74 \%$ |  |  |  |  |  |
| WNG_HDZ | $20.88 \%$ | CT_HDZ | $34.12 \%$ | ETSS_HDZ_Ind10 | $36.49 \%$ |  |  |  |  |  |
| GLS_HDZ | $18.18 \%$ | KMY_HDZ | $32.88 \%$ | DKL_HDZ | $33.75 \%$ |  |  |  |  |  |
| FGHJ_HDZ | $16.84 \%$ | DKL_HDZ | $32.75 \%$ | KMY_HDZ | $33.75 \%$ |  |  |  |  |  |
| HL_HDZ | $16.50 \%$ | MPEG_HDZ | $32.38 \%$ | MPEG_HDZ | $32.00 \%$ |  |  |  |  |  |
| CT_HDZ | $15.82 \%$ | HL_HDZ | $30.76 \%$ | HL_HDZ | $31.26 \%$ |  |  |  |  |  |
| ETSS_HDZ_Ind10 | $15.82 \%$ | FPM_HDZ | $30.01 \%$ | FPM_HDZ | $30.01 \%$ |  |  |  |  |  |
| TPDPS_HDZ | $13.80 \%$ | GM_HDZ | $28.77 \%$ | GM_HDZ | $29.76 \%$ |  |  |  |  |  |
| DKL_HDZ | $13.13 \%$ | PEG_HDZ | $28.39 \%$ | PEG_HDZ | $28.77 \%$ |  |  |  |  |  |
| KMY_HDZ | $13.13 \%$ | ETSS_HDZ_25SBM | $24.16 \%$ | ETSS_HDZ_25SBM | $25.28 \%$ |  |  |  |  |  |
| ETSS_HDZ_25SBM | $10.77 \%$ | WNG_HDZ | $23.79 \%$ | WNG_HDZ | $22.67 \%$ |  |  |  |  |  |
| ES_HDZ_25SBM | $3.37 \%$ | ES_HDZ_Ind10 | $9.71 \%$ | ES_HDZ_Ind10 | $10.09 \%$ |  |  |  |  |  |
| ES_HDZ_Ind10 | $0.67 \%$ | ES_HDZ_25SBM | $4.86 \%$ | ES_HDZ_25SBM | $3.86 \%$ |  |  |  |  |  |

Continued in next page..

Table 95: Model Confidence Set Summary Results: Firm Value Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 51.38\% | BP_RW | 60.31\% | BP_RW | 59.11\% | BP_RW | 51.38\% | GG_RW | 55.92\% | GG_RW | 57.66\% |
| GG_RW | 32.04\% | GG_RW | 48.63\% | GG_RW | 50.00\% | GG_RW | 32.04\% | BP_RW | 55.92\% | BP_RW | 56.04\% |
| KMY_RW | 27.07\% | CT_RW | 38.14\% | CT_RW | 42.61\% | KMY_RW | 27.07\% | CT_RW | 42.59\% | CT_RW | 44.96\% |
| CT_RW | 20.44\% | FGHJ_RW | 37.29\% | FGHJ_RW | 40.55\% | CT_RW | 20.44\% | KMY_RW | 41.72\% | KMY_RW | 42.71\% |
| GM_RW | 16.57\% | KMY_RW | 29.73\% | KMY_RW | 30.58\% | GM_RW | 16.57\% | FGHJ_RW | 40.10\% | FGHJ_RW | 41.47\% |
| HL_RW | 16.02\% | GLS_RW | 27.84\% | TPDPS_RW | 29.55\% | HL_RW | 16.02\% | DKL_RW | 37.61\% | GLS_RW | 38.11\% |
| DKL_RW | 15.47\% | GM_RW | 27.32\% | GLS_RW | 28.52\% | DKL_RW | 15.47\% | GLS_RW | 34.37\% | DKL_RW | 37.61\% |
| PE_RW | 12.71\% | TPDPS_RW | 26.98\% | GM_RW | 28.01\% | PE_RW | 12.71\% | GM_RW | 32.25\% | GM_RW | $33.37 \%$ |
| FGHJ_RW | $11.05 \%$ | MPEG_RW | $24.57 \%$ | PE_RW | 25.43\% | FGHJ_RW | 11.05\% | HL_RW | $32.25 \%$ | HL_RW | 32.63\% |
| GLS_RW | $8.84 \%$ | HL_RW | $24.05 \%$ | DKL_RW | $24.74 \%$ | GLS_RW | 8.84\% | MPEG_RW | $24.53 \%$ | MPEG_RW | 26.28\% |
| PEG_RW | 8.84\% | PE_RW | 23.02\% | MPEG_RW | 24.40\% | PEG_RW | 8.84\% | PEG_RW | 22.17\% | PEG_RW | 23.79\% |
| TPDPS_RW | 8.29\% | DKL_RW | 23.02\% | HL_RW | 23.88\% | TPDPS_RW | 8.29\% | TPDPS_RW | 20.80\% | TPDPS_RW | 23.16\% |
| MPEG_RW | 4.97\% | PEG_RW | 20.79\% | ES_RW_Ind10 | 20.79\% | ES_RW_Ind10 | 4.97\% | PE_RW | 17.43\% | ES_RW_Ind10 | 21.79\% |
| ES_RW_Ind10 | 4.97\% | ES_RW_Ind10 | 19.24\% | PEG_RW | 20.45\% | MPEG_RW | 4.42\% | ES_RW_Ind10 | 17.31\% | PE_RW | 17.43\% |
| ETSS_RW_Ind10 | 3.31\% | ETSS_RW_25SBM | 17.18\% | ES_RW_25SBM | 18.38\% | ETSS_RW_Ind10 | 3.31\% | ETSS_RW_Ind10 | 15.32\% | ETSS_RW_Ind10 | 17.19\% |
| ETSS_RW_25SBM | 1.66\% | ETSS_RW_Ind10 | 16.15\% | ETSS_RW_Ind10 | 15.64\% | ETSS_RW_25SBM | 1.66\% | FPM_RW | 10.09\% | FPM_RW | 10.59\% |
| WNG_RW | 1.10\% | ES_RW_25SBM | 14.95\% | ETSS_RW_25SBM | 15.29\% | WNG_RW | 1.10\% | ETSS_RW_25SBM | 9.96\% | ETSS_RW_25SBM | 10.21\% |
| FPM_RW | 0.55\% | WNG_RW | 8.93\% | FPM_RW | 6.87\% | FPM_RW | 0.55\% | WNG_RW | 6.23\% | WNG_RW | 4.36\% |
| ES_RW_25SBM | 0.00\% | FPM_RW | 7.04\% | WNG_RW | 6.36\% | ES_RW_25SBM | 0.00\% | ES_RW_25SBM | 4.73\% | ES_RW_25SBM | 3.74\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 48.37\% | BP_EP | 54.30\% | BP_EP | 56.53\% | BP_EP | 49.19\% | BP_EP | 55.04\% | BP_EP | 55.92\% |
| PE_EP | 37.40\% | GG_EP | 45.36\% | GG_EP | 46.22\% | PE_EP | 37.80\% | GG_EP | 48.44\% | GG_EP | 47.82\% |
| FGHJ_EP | 28.05\% | PE_EP | 39.35\% | PE_EP | $42.44 \%$ | FGHJ_EP | 28.46\% | KMY_EP | $40.85 \%$ | KMY_EP | 41.59\% |
| GM_EP | $25.20 \%$ | KMY_EP | $37.63 \%$ | KMY_EP | 41.75\% | GM_EP | 26.42\% | CT_EP | 39.60\% | CT_EP | $39.23 \%$ |
| PEG_EP | 25.20\% | CT_EP | 35.91\% | CT_EP | 35.57\% | PEG_EP | 25.61\% | PE_EP | 31.01\% | PE_EP | $32.25 \%$ |
| GLS_EP | 24.80\% | DKL_EP | 28.69\% | DKL_EP | 32.47\% | GLS_EP | 25.20\% | DKL_EP | 28.77\% | GLS_EP | 29.89\% |
| MPEG_EP | 24.80\% | TPDPS_EP | 27.66\% | TPDPS_EP | 29.38\% | MPEG_EP | 25.20\% | GLS_EP | 28.64\% | DKL_EP | 29.14\% |
| DKL_EP | 22.76\% | GLS_EP | 24.91\% | GLS_EP | 27.49\% | DKL_EP | 23.17\% | FGHJ_EP | 26.90\% | FGHJ_EP | 27.52\% |
| HL_EP | 20.33\% | PEG_EP | 22.68\% | FGHJ_EP | 25.95\% | HL_EP | 21.54\% | GM_EP | 25.65\% | PEG_EP | 27.15\% |
| KMY_EP | 18.70\% | FGHJ_EP | 21.31\% | PEG_EP | 25.95\% | KMY_EP | 19.92\% | PEG_EP | 24.28\% | GM_EP | 26.53\% |
| CT_EP | 12.20\% | HL_EP | 21.31\% | HL_EP | 24.74\% | CT_EP | 13.41\% | TPDPS_EP | 24.16\% | TPDPS_EP | 25.28\% |
| GG_EP | 11.38\% | GM_EP | 18.38\% | GM_EP | 23.02\% | GG_EP | 11.79\% | HL_EP | 23.41\% | HL_EP | 23.79\% |
| TPDPS_EP | 10.98\% | MPEG_EP | 15.81\% | MPEG_EP | 16.84\% | TPDPS_EP | 10.98\% | MPEG_EP | 19.43\% | MPEG_EP | 20.80\% |
| ETSS_EP_Ind10 | 4.88\% | ETSS_EP_Ind10 | 8.25\% | ETSS_EP_Ind10 | 9.11\% | ETSS_EP_Ind10 | 4.88\% | ETSS_EP_Ind10 | 14.82\% | ETSS_EP_Ind10 | 16.69\% |
| FPM_EP | 4.47\% | ETSS_EP_25SBM | 6.19\% | ETSS_EP_25SBM | 6.19\% | FPM_EP | 4.47\% | FPM_EP | 10.71\% | FPM_EP | 11.46\% |
| ETSS_EP_25SBM | 3.66\% | FPM_EP | 5.33\% | ES_EP_Ind10 | 6.01\% | ETSS_EP_25SBM | 3.66\% | ES_EP_Ind10 | 7.72\% | ES_EP_Ind10 | 6.97\% |
| WNG_EP | 2.03\% | ES_EP_Ind10 | 5.33\% | FPM_EP | 5.67\% | WNG_EP | 2.03\% | ETSS_EP_25SBM | 5.60\% | ETSS_EP_25SBM | 6.23\% |
| ES_EP_25SBM | 0.81\% | WNG_EP | 4.81\% | WNG_EP | 4.64\% | ES_EP_25SBM | 0.81\% | WNG_EP | 5.60\% | WNG_EP | 4.86\% |
| ES_EP_Ind10 | 0.41\% | ES_EP_25SBM | 3.95\% | ES_EP_25SBM | 4.12\% | ES_EP_Ind10 | 0.41\% | ES_EP_25SBM | 1.62\% | ES_EP_25SBM | 0.87\% |

Table 95: Model Confidence Set Summary Results: Firm Value Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  | MEV |  | RMSE |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | MAE |
| BP_RI | 49.02\% | BP_RI | 56.19\% | BP_RI | 56.53\% | BP_RI | 48.63\% |  |  | BP_RI | 58.41\% | BP_RI | 57.78\% |
| PE_RI | 41.96\% | GG_RI | 44.67\% | GG_RI | 47.08\% | PE_RI | 41.96\% | GG_RI | 47.70\% | GG_RI | 47.32\% |
| FGHJ_RI | 30.20\% | PE_RI | 43.13\% | PE_RI | 44.16\% | FGHJ_RI | 30.20\% | KMY_RI | 38.61\% | KMY_RI | 37.86\% |
| GLS_RI | 27.45\% | KMY_RI | 35.05\% | KMY_RI | 36.08\% | GLS_RI | 27.84\% | GLS_RI | 32.75\% | GLS_RI | 32.25\% |
| GG_RI | 24.71\% | TPDPS_RI | 33.68\% | TPDPS_RI | 35.40\% | GG_RI | 24.31\% | TPDPS_RI | 31.88\% | TPDPS_RI | 32.00\% |
| GM_RI | 18.43\% | GLS_RI | 33.16\% | GLS_RI | 34.71\% | GM_RI | 18.04\% | PE_RI | 31.13\% | PE_RI | 30.76\% |
| TPDPS_RI | 16.86\% | FGHJ_RI | 28.35\% | FGHJ_RI | 31.62\% | TPDPS_RI | 16.47\% | FGHJ_RI | 30.14\% | FGHJ_RI | 30.39\% |
| KMY_RI | 14.51\% | CT_RI | 26.63\% | DKL_RI | 28.69\% | MPEG_RI | 14.51\% | PEG_RI | 26.65\% | PEG_RI | 27.40\% |
| MPEG_RI | 14.12\% | DKL_RI | 25.95\% | CT_RI | 27.15\% | KMY_RI | 14.51\% | GM_RI | 26.03\% | GM_RI | 25.40\% |
| PEG_RI | 12.55\% | GM_RI | 25.26\% | PEG_RI | 26.80\% | PEG_RI | 12.55\% | CT_RI | 25.40\% | CT_RI | 25.28\% |
| HL_RI | 10.98\% | PEG_RI | 24.40\% | GM_RI | 25.60\% | HL_RI | 10.59\% | DKL_RI | 24.91\% | DKL_RI | 25.16\% |
| DKL_RI | 9.41\% | HL_RI | 23.37\% | HL_RI | 25.26\% | DKL_RI | 9.02\% | HL_RI | 22.54\% | HL_RI | 21.79\% |
| CT_RI | 8.63\% | MPEG_RI | 17.18\% | MPEG_RI | 18.21\% | CT_RI | 8.24\% | MPEG_RI | 21.17\% | MPEG_RI | 21.17\% |
| ETSS_RI_Ind10 | 7.45\% | ETSS_RI_Ind10 | 13.57\% | ETSS_RI_Ind10 | 14.60\% | ETSS_RI_Ind10 | 7.06\% | ETSS_RI_Ind10 | 15.19\% | ETSS_RI_Ind10 | 14.82\% |
| ETSS_RI_25SBM | 4.71\% | ETSS_RI_25SBM | 12.20\% | ETSS_RI_25SBM | 12.89\% | ETSS_RI_25SBM | 4.31\% | FPM_RI | 14.20\% | FPM_RI | 14.20\% |
| FPM_RI | 3.92\% | FPM_RI | 8.42\% | FPM_RI | 8.76\% | FPM_RI | 3.53\% | ETSS_RI_25SBM | 8.22\% | ETSS_RI_25SBM | 7.72\% |
| WNG_RI | 0.78\% | WNG_RI | 5.67\% | WNG_RI | 4.81\% | WNG_RI | 0.78\% | ES_RI_Ind10 | 6.10\% | ES_RI_Ind10 | 5.48\% |
| ES_RI_25SBM | 0.39\% | ES_RI_Ind10 | 3.78\% | ES_RI_Ind10 | 2.92\% | ES_RI_25SBM | 0.39\% | WNG_RI | 5.11\% | WNG_RI | 3.24\% |
| ES_RI_Ind10 | 0.00\% | ES_RI_25SBM | 2.23\% | ES_RI_25SBM | 1.55\% | ES_RI_Ind10 | 0.00\% | ES_RI_25SBM | 2.12\% | ES_RI_25SBM | 1.00\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of value. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 96: Model Confidence Set Summary Results: Price Momentum Effect

| First Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Panel A: Analysts |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |
| BP_Anlst | 41.88\% | GLS_Anlst | 54.86\% | PE_Anlst | 56.44\% |
| PE_Anlst | 41.56\% | PE_Anlst | 52.96\% | GLS_Anlst | 56.11\% |
| GG_Anlst | 39.56\% | BP_Anlst | 51.91\% | BP_Anlst | 54.93\% |
| PEG_Anlst | 38.61\% | MPEG_Anlst | 47.63\% | OHE_Ind10 | 49.54\% |
| CT_Anlst | 37.34\% | OHE_Ind10 | 46.32\% | MPEG_Anlst | 49.01\% |
| KMY_Anlst | 36.18\% | FGHJ_Anlst | 46.06\% | ETSS_Anlst_Ind10 | 47.63\% |
| FPM_Anlst | 35.44\% | HL_Anlst | 43.89\% | FGHJ_Anlst | 46.39\% |
| OHE_Ind10 | 34.70\% | ETSS_Anlst_Ind10 | 43.69\% | HL_Anlst | 45.27\% |
| GLS_Anlst | 34.49\% | DKL_Anlst | 43.43\% | PEG_Anlst | 45.14\% |
| MPEG_Anlst | 33.97\% | GM_Anlst | 42.77\% | DKL_Anlst | 45.01\% |
| GM_Anlst | 33.23\% | PEG_Anlst | 42.51\% | CT_Anlst | 44.68\% |
| FGHJ_Anlst | 33.12\% | KMY_Anlst | 42.31\% | GM_Anlst | 43.63\% |
| ETSS_Anlst_Ind10 | 31.96\% | CT_Anlst | 41.72\% | KMY_Anlst | 43.23\% |
| DKL_Anlst | 31.65\% | FPM_Anlst | 39.62\% | FPM_Anlst | 41.59\% |
| HL_Anlst | 30.70\% | WNG_Anlst | 35.55\% | OHE_25SBM | 39.03\% |
| WNG_Anlst | 27.85\% | Naive | 34.76\% | TPDPS_Anlst | 38.76\% |
| Naive | 15.30\% | TPDPS_Anlst | 34.69\% | Naive | 38.37\% |
| TPDPS_Anlst | 14.87\% | OHE_25SBM | 34.17\% | WNG_Anlst | 34.56\% |
| OHE_25SBM | 12.97\% | GG_Anlst | 29.43\% | ETSS_Anlst_25SBM | 31.21\% |
| ETSS_Anlst_25SBM | 11.71\% | ETSS_Anlst_25SBM | 27.92\% | GG_Anlst | 29.76\% |
| ES_Anlst_Ind10 | 8.76\% | ES_Anlst_Ind10 | 13.99\% | ES_Anlst_Ind10 | 14.85\% |
| ES_Anlst_25SBM | 1.79\% | ES_Anlst_25SBM | 8.54\% | ES_Anlst_25SBM | 8.41\% |


| MEV |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_Anlst | $42.09 \%$ | GLS_Anlst | $55.10 \%$ | PE_Anlst | $57.97 \%$ |
| PE_Anlst | $41.67 \%$ | PE_Anlst | $53.24 \%$ | GLS_Anlst | $56.70 \%$ |
| GG_Anlst | $39.98 \%$ | BP_Anlst | $51.50 \%$ | BP_Anlst | $55.70 \%$ |
| PEG_Anlst | $38.40 \%$ | MPEG_Anlst | $48.03 \%$ | OHE_Ind10 | $49.97 \%$ |
| CT_Anlst | $37.45 \%$ | OHE_Ind10 | $47.16 \%$ | MPEG_Anlst | $49.37 \%$ |
| KMY_Anlst | $36.39 \%$ | FGHJ_Anlst | $46.23 \%$ | ETSS_Anlst_Ind10 | $47.97 \%$ |
| FPM_Anlst | $35.65 \%$ | ETSS_Anlst_Ind10 | $45.30 \%$ | FGHJ_Anlst | $47.30 \%$ |
| GLS_Anlst | $34.92 \%$ | HL_Anlst | $44.76 \%$ | PEG_Anlst | $46.63 \%$ |
| OHE_Ind10 | $34.70 \%$ | DKL_Anlst | $44.36 \%$ | HL_Anlst | $45.50 \%$ |
| MPEG_Anlst | $34.18 \%$ | GM_Anlst | $43.50 \%$ | CT_Anlst | $45.30 \%$ |
| GM_Anlst | $33.33 \%$ | PEG_Anlst | $43.43 \%$ | DKL_Anlst | $45.23 \%$ |
| FGHJ_Anlst | $33.33 \%$ | KMY_Anlst | $43.16 \%$ | GM_Anlst | $44.23 \%$ |
| ETSS_Anlst_Ind10 | $32.07 \%$ | CT_Anlst | $42.03 \%$ | KMY_Anlst | $44.10 \%$ |
| DKL_Anlst | $31.65 \%$ | FPM_Anlst | $40.43 \%$ | FPM_Anlst | $41.89 \%$ |
| HL_Anlst | $30.91 \%$ | WNG_Anlst | $36.76 \%$ | TPDPS_Anlst | $39.89 \%$ |
| WNG_Anlst | $28.27 \%$ | Naive | $35.69 \%$ | Naive | $39.56 \%$ |
| Naive | $15.82 \%$ | TPDPS_Anlst | $34.96 \%$ | OHE_25SBM | $38.63 \%$ |
| TPDPS_Anlst | $15.51 \%$ | OHE_25SBM | $34.22 \%$ | WNG_Anlst | $34.96 \%$ |
| OHE_25SBM | $13.19 \%$ | GG_Anlst | $30.22 \%$ | ETSS_Anlst_25SBM | $31.62 \%$ |
| ETSS_Anlst_25SBM | $11.60 \%$ | ETSS_Anlst_25SBM | $27.82 \%$ | GG_Anlst | $30.35 \%$ |
| ES_Anlst_Ind10 | $8.76 \%$ | ES_Anlst_Ind10 | $13.41 \%$ | ES_Anlst_Ind10 | $14.68 \%$ |
| ES_Anlst_25SBM | $2.00 \%$ | ES_Anlst_25SBM | $8.27 \%$ | ES_Anlst_25SBM | $7.81 \%$ |


| Panel B: HDZ |  |  |  |  |  | MEV |  | RMSE |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MEV |  | RMSE |  | MAE |  |  |  | MAE |
| PEG_HDZ | 44.36\% | PE_HDZ | 57.23\% | PE_HDZ | 61.50\% | PEG_HDZ | 44.24\% |  |  | PE_HDZ | 57.64\% | PE_HDZ | 61.24\% |
| BP_HDZ | 43.90\% | BP_HDZ | 54.66\% | BP_HDZ | 59.40\% | BP_HDZ | 43.90\% | BP_HDZ | 54.50\% | BP_HDZ | 59.11\% |
| GM_HDZ | 42.87\% | GLS_HDZ | 53.29\% | GLS_HDZ | 54.53\% | GM_HDZ | 42.65\% | GLS_HDZ | 53.10\% | GLS_HDZ | 54.77\% |
| PE_HDZ | 42.76\% | GG_HDZ | 50.85\% | GG_HDZ | 53.42\% | PE_HDZ | 42.65\% | GG_HDZ | 51.23\% | GG_HDZ | 53.90\% |
| MPEG_HDZ | 41.73\% | FGHJ_HDZ | 48.23\% | FGHJ_HDZ | 48.95\% | MPEG_HDZ | 41.85\% | FGHJ_HDZ | 48.77\% | FGHJ_HDZ | 49.50\% |
| FPM_HDZ | 38.54\% | CT_HDZ | 45.34\% | CT_HDZ | 46.98\% | FPM_HDZ | 38.43\% | CT_HDZ | 45.90\% | CT_HDZ | 46.96\% |
| GG_HDZ | 37.74\% | KMY_HDZ | 41.72\% | KMY_HDZ | 44.61\% | GG_HDZ | 37.86\% | KMY_HDZ | 42.49\% | KMY_HDZ | 44.70\% |
| GLS_HDZ | 36.15\% | DKL_HDZ | 41.46\% | ETSS_HDZ_Ind10 | 43.82\% | GLS_HDZ | 36.15\% | DKL_HDZ | 42.36\% | DKL_HDZ | 43.90\% |
| FGHJ_HDZ | 34.89\% | ETSS_HDZ_Ind10 | 39.75\% | DKL_HDZ | 43.30\% | FGHJ_HDZ | 34.89\% | HL_HDZ | 39.36\% | ETSS_HDZ_Ind10 | 43.03\% |
| KMY_HDZ | 33.64\% | HL_HDZ | 38.57\% | TPDPS_HDZ | 42.38\% | KMY_HDZ | 33.52\% | ETSS_HDZ_Ind10 | 39.23\% | TPDPS_HDZ | 42.70\% |
| HL_HDZ | 33.41\% | TPDPS_HDZ | 38.50\% | HL_HDZ | 41.52\% | HL_HDZ | 33.30\% | TPDPS_HDZ | 39.09\% | HL_HDZ | 41.49\% |
| CT_HDZ | 32.04\% | MPEG_HDZ | 37.71\% | MPEG_HDZ | 40.54\% | CT_HDZ | 32.38\% | MPEG_HDZ | 38.29\% | MPEG_HDZ | 40.63\% |
| DKL_HDZ | 30.56\% | FPM_HDZ | 36.73\% | FPM_HDZ | 39.55\% | DKL_HDZ | 30.44\% | GM_HDZ | 37.49\% | GM_HDZ | 39.63\% |
| WNG_HDZ | 28.51\% | GM_HDZ | 36.40\% | GM_HDZ | 39.49\% | WNG_HDZ | 28.39\% | FPM_HDZ | 36.29\% | FPM_HDZ | 38.76\% |
| ETSS_HDZ_Ind10 | 24.40\% | PEG_HDZ | 34.36\% | PEG_HDZ | 37.65\% | ETSS_HDZ_Ind10 | 24.40\% | PEG_HDZ | 34.42\% | PEG_HDZ | 37.49\% |
| TPDPS_HDZ | 16.31\% | ETSS_HDZ_25SBM | 26.22\% | ETSS_HDZ_25SBM | 28.06\% | TPDPS_HDZ | 16.19\% | ETSS_HDZ_25SBM | 25.22\% | ETSS_HDZ_25SBM | 27.42\% |
| ETSS_HDZ_25SBM | 9.92\% | WNG_HDZ | 25.43\% | WNG_HDZ | 26.15\% | ETSS_HDZ_25SBM | 9.81\% | WNG_HDZ | 24.68\% | WNG_HDZ | 26.02\% |
| ES_HDZ_25SBM | 1.37\% | ES_HDZ_25SBM | 9.92\% | ES_HDZ_25SBM | 9.26\% | ES_HDZ_25SBM | 1.25\% | ES_HDZ_25SBM | 9.87\% | ES_HDZ_25SBM | 8.41\% |
| ES_HDZ_Ind10 | 1.14\% | ES_HDZ_Ind10 | 8.08\% | ES_HDZ_Ind10 | 6.31\% | ES_HDZ_Ind10 | 1.25\% | ES_HDZ_Ind10 | 7.00\% | ES_HDZ_Ind10 | 6.80\% |

Continued in next page...

Table 96: Model Confidence Set Summary Results: Price Momentum Effect, Continued
First Quartile Fourth Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  | MEV |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | RMSE |  | MAE |  |
| BP_RW | 58.14\% | BP_RW | 67.81\% | GG_RW | 69.12\% | BP_RW | 58.29\% | BP_RW | 67.65\% | GG_RW | 69.38\% |
| GG_RW | 35.50\% | GG_RW | 66.49\% | BP_RW | 68.59\% | GG_RW | 35.66\% | GG_RW | 66.64\% | BP_RW | 68.71\% |
| KMY_RW | 34.26\% | CT_RW | 54.20\% | CT_RW | 54.73\% | KMY_RW | 34.57\% | CT_RW | 54.30\% | CT_RW | 55.24\% |
| GM_RW | 24.50\% | FGHJ_RW | 47.63\% | FGHJ_RW | 49.61\% | GM_RW | 24.50\% | FGHJ_RW | 46.76\% | FGHJ_RW | 49.43\% |
| CT_RW | 19.07\% | KMY_RW | 45.86\% | KMY_RW | 46.06\% | CT_RW | 18.91\% | KMY_RW | 46.43\% | KMY_RW | 46.70\% |
| FGHJ_RW | 17.98\% | DKL_RW | 39.75\% | GLS_RW | 41.46\% | FGHJ_RW | 17.98\% | DKL_RW | 40.56\% | GLS_RW | 40.83\% |
| HL_RW | 16.90\% | GLS_RW | 39.42\% | DKL_RW | 39.49\% | HL_RW | 16.59\% | GLS_RW | 38.89\% | DKL_RW | 39.89\% |
| MPEG_RW | 16.43\% | HL_RW | 34.95\% | GM_RW | 35.22\% | MPEG_RW | 16.28\% | GM_RW | 35.36\% | GM_RW | 35.49\% |
| DKL_RW | 15.81\% | GM_RW | 34.56\% | HL_RW | 33.51\% | DKL_RW | 15.81\% | HL_RW | 35.09\% | HL_RW | 34.29\% |
| GLS_RW | 13.18\% | TPDPS_RW | 28.65\% | TPDPS_RW | 30.35\% | GLS_RW | 13.02\% | TPDPS_RW | 28.69\% | TPDPS_RW | 30.55\% |
| PE_RW | 10.54\% | MPEG_RW | 26.81\% | MPEG_RW | 27.73\% | PE_RW | 10.54\% | MPEG_RW | 26.75\% | MPEG_RW | 27.69\% |
| PEG_RW | 10.39\% | PEG_RW | 25.82\% | PEG_RW | 26.22\% | PEG_RW | 10.39\% | PEG_RW | 25.82\% | PEG_RW | 26.02\% |
| TPDPS_RW | 10.39\% | ES_RW_Ind10 | 19.97\% | ES_RW_Ind10 | 21.02\% | TPDPS_RW | 10.23\% | ES_RW_Ind10 | 20.08\% | ES_RW_Ind10 | 21.41\% |
| ETSS_RW_Ind10 | 2.95\% | PE_RW | 18.40\% | PE_RW | 18.13\% | ETSS_RW_Ind10 | 2.95\% | PE_RW | 17.48\% | PE_RW | 17.34\% |
| ES_RW_Ind10 | 2.64\% | ETSS_RW_Ind10 | 16.49\% | ETSS_RW_Ind10 | 15.44\% | ES_RW_Ind10 | 2.64\% | ETSS_RW_Ind10 | 15.41\% | ETSS_RW_Ind10 | 14.34\% |
| WNG_RW | 2.64\% | ETSS_RW_25SBM | 12.75\% | ETSS_RW_25SBM | 11.63\% | WNG_RW | 2.64\% | ETSS_RW_25SBM | 11.67\% | ETSS_RW_25SBM | 11.34\% |
| ETSS_RW_25SBM | 2.02\% | ES_RW_25SBM | 11.04\% | ES_RW_25SBM | 9.66\% | FPM_RW | 1.86\% | ES_RW_25SBM | 10.34\% | ES_RW_25SBM | 10.07\% |
| FPM_RW | 1.86\% | FPM_RW | 10.05\% | FPM_RW | 9.00\% | ETSS_RW_25SBM | 1.86\% | FPM_RW | 9.47\% | FPM_RW | 8.61\% |
| ES_RW_25SBM | 0.47\% | WNG_RW | 8.87\% | WNG_RW | 4.86\% | ES_RW_25SBM | 0.31\% | WNG_RW | 7.87\% | WNG_RW | 4.47\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 56.31\% | BP_EP | 64.78\% | BP_EP | 66.43\% | BP_EP | 56.31\% | BP_EP | 64.91\% | BP_EP | 67.44\% |
| PE_EP | 41.02\% | GG_EP | 56.37\% | GG_EP | 57.95\% | PE_EP | 41.15\% | GG_EP | 56.84\% | GG_EP | 57.64\% |
| GM_EP | 33.89\% | KMY_EP | 50.53\% | KMY_EP | 51.18\% | GM_EP | 33.63\% | KMY_EP | 51.03\% | KMY_EP | 52.43\% |
| FGHJ_EP | 33.63\% | CT_EP | 44.68\% | CT_EP | 44.94\% | GLS_EP | 33.50\% | CT_EP | 43.43\% | CT_EP | 44.36\% |
| GLS_EP | 33.38\% | PE_EP | 40.74\% | PE_EP | 42.84\% | FGHJ_EP | 33.38\% | PE_EP | 40.56\% | PE_EP | 42.76\% |
| KMY_EP | 29.94\% | GLS_EP | 37.06\% | GLS_EP | 38.76\% | DKL_EP | 29.94\% | GLS_EP | 37.29\% | GLS_EP | 38.49\% |
| DKL_EP | 29.68\% | DKL_EP | 36.40\% | DKL_EP | 37.45\% | KMY_EP | 29.94\% | DKL_EP | 35.76\% | DKL_EP | 37.42\% |
| MPEG_EP | 28.92\% | FGHJ_EP | 32.06\% | FGHJ_EP | 34.10\% | HL_EP | 28.92\% | FGHJ_EP | 31.55\% | FGHJ_EP | 34.42\% |
| HL_EP | 28.54\% | TPDPS_EP | 31.34\% | TPDPS_EP | 33.97\% | MPEG_EP | 28.66\% | TPDPS_EP | 31.15\% | TPDPS_EP | 34.36\% |
| GG_EP | 25.10\% | HL_EP | 26.87\% | GM_EP | 29.50\% | GG_EP | 24.97\% | GM_EP | 26.82\% | GM_EP | 29.75\% |
| PEG_EP | 23.69\% | GM_EP | 26.74\% | HL_EP | 28.65\% | PEG_EP | 23.57\% | HL_EP | 26.22\% | HL_EP | 28.62\% |
| CT_EP | 21.53\% | PEG_EP | 22.54\% | PEG_EP | 25.69\% | CT_EP | 21.66\% | PEG_EP | 22.41\% | PEG_EP | 26.02\% |
| TPDPS_EP | 15.92\% | MPEG_EP | 18.00\% | MPEG_EP | 18.79\% | TPDPS_EP | 15.80\% | MPEG_EP | 17.68\% | MPEG_EP | 19.08\% |
| ETSS_EP_Ind10 | 7.26\% | ETSS_EP_Ind10 | 11.50\% | ETSS_EP_Ind10 | 11.56\% | ETSS_EP_Ind10 | 7.01\% | ETSS_EP_Ind10 | 11.41\% | ETSS_EP_Ind10 | 11.81\% |
| FPM_EP | 6.75\% | FPM_EP | 7.62\% | FPM_EP | 7.95\% | FPM_EP | 6.62\% | FPM_EP | 6.87\% | FPM_EP | 6.94\% |
| ETSS_EP_25SBM | 3.69\% | ES_EP_Ind10 | 6.50\% | ES_EP_Ind10 | 6.37\% | ETSS_EP_25SBM | 3.82\% | ETSS_EP_25SBM | 6.14\% | ES_EP_Ind10 | 6.40\% |
| ES_EP_Ind10 | 1.66\% | ETSS_EP_25SBM | 6.18\% | ETSS_EP_25SBM | 5.58\% | ES_EP_Ind10 | 1.40\% | ES_EP_Ind10 | 6.07\% | ETSS_EP_25SBM | 5.27\% |
| WNG_EP | 1.40\% | WNG_EP | 4.20\% | WNG_EP | 3.48\% | WNG_EP | 1.27\% | WNG_EP | 3.87\% | WNG_EP | 3.47\% |
| ES_EP_25SBM | 0.25\% | ES_EP_25SBM | 2.89\% | ES_EP_25SBM | 1.64\% | ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.60\% | ES_EP_25SBM | 1.33\% |

Continued in next page..

Table 96: Model Confidence Set Summary Results: Price Momentum Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 60.90\% | BP_RI | 67.28\% | BP_RI | 68.73\% | BP_RI | 61.03\% | BP_RI | 67.18\% | BP_RI | 69.45\% |
| PE_RI | 45.00\% | GG_RI | 56.96\% | GG_RI | 58.08\% | PE_RI | 44.49\% | GG_RI | 56.44\% | GG_RI | 58.57\% |
| GG_RI | 40.38\% | PE_RI | 45.80\% | KMY_RI | 46.25\% | GG_RI | 40.38\% | KMY_RI | 45.30\% | KMY_RI | 47.10\% |
| FGHJ_RI | 37.31\% | KMY_RI | 45.53\% | PE_RI | 45.40\% | FGHJ_RI | 37.05\% | PE_RI | 45.23\% | PE_RI | 44.90\% |
| GLS_RI | 36.54\% | GLS_RI | 41.06\% | GLS_RI | 44.02\% | GLS_RI | 36.28\% | GLS_RI | 40.83\% | GLS_RI | 44.23\% |
| KMY_RI | 29.74\% | TPDPS_RI | 38.17\% | TPDPS_RI | 39.42\% | KMY_RI | 29.74\% | TPDPS_RI | 37.63\% | TPDPS_RI | 39.56\% |
| GM_RI | 22.44\% | FGHJ_RI | 36.79\% | FGHJ_RI | 38.83\% | GM_RI | 22.56\% | FGHJ_RI | 36.09\% | FGHJ_RI | 38.83\% |
| DKL_RI | 18.85\% | DKL_RI | 31.27\% | DKL_RI | 32.33\% | DKL_RI | 18.46\% | DKL_RI | 31.55\% | DKL_RI | 33.02\% |
| TPDPS_RI | 17.95\% | CT_RI | 27.79\% | CT_RI | 29.24\% | TPDPS_RI | 17.82\% | CT_RI | 27.55\% | GM_RI | 30.09\% |
| MPEG_RI | 16.92\% | GM_RI | 27.79\% | GM_RI | 29.11\% | MPEG_RI | 16.92\% | GM_RI | 27.28\% | CT_RI | 29.22\% |
| HL_RI | 14.74\% | HL_RI | 25.69\% | HL_RI | 26.81\% | HL_RI | 14.74\% | HL_RI | 25.68\% | HL_RI | 27.82\% |
| PEG_RI | 11.54\% | PEG_RI | 24.44\% | PEG_RI | 26.41\% | PEG_RI | 11.54\% | PEG_RI | 24.35\% | PEG_RI | 26.82\% |
| CT_RI | 10.64\% | MPEG_RI | 18.27\% | MPEG_RI | 19.65\% | CT_RI | 10.38\% | MPEG_RI | 18.68\% | MPEG_RI | 19.95\% |
| ETSS_RI_Ind10 | 4.49\% | ETSS_RI_Ind10 | 12.42\% | ETSS_RI_Ind10 | 14.19\% | ETSS_RI_Ind10 | 4.36\% | ETSS_RI_Ind10 | 12.74\% | ETSS_RI_Ind10 | 14.21\% |
| FPM_RI | 2.69\% | FPM_RI | 10.18\% | FPM_RI | 10.97\% | FPM_RI | 2.56\% | FPM_RI | 10.54\% | FPM_RI | 10.47\% |
| ETSS_RI_25SBM | 1.67\% | ETSS_RI_25SBM | 8.87\% | ETSS_RI_25SBM | 9.00\% | ETSS_RI_25SBM | 1.54\% | ETSS_RI_25SBM | 8.87\% | ETSS_RI_25SBM | 8.81\% |
| WNG_RI | 0.77\% | WNG_RI | 4.20\% | WNG_RI | $3.29 \%$ | WNG_RI | 0.77\% | WNG_RI | 4.40\% | WNG_RI | 3.47\% |
| ES_RI_Ind10 | 0.51\% | ES_RI_Ind10 | 4.01\% | ES_RI_Ind10 | 3.09\% | ES_RI_Ind10 | 0.51\% | ES_RI_Ind10 | 4.14\% | ES_RI_Ind10 | 3.00\% |
| ES_RI_25SBM | 0.13\% | ES_RI_25SBM | 2.50\% | ES_RI_25SBM | 1.12\% | ES_RI_25SBM | 0.00\% | ES_RI_25SBM | 2.67\% | ES_RI_25SBM | 1.13\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of price momentum. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 97: Model Confidence Set Summary Results: Long-term Growth in Earnings Forecast Effect

| First Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Panel A: Analysts |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |
| PE_Anlst | 41.87\% | GLS_Anlst | 54.95\% | PE_Anlst | 56.48\% |
| BP_Anlst | 41.52\% | PE_Anlst | 52.67\% | BP_Anlst | 55.08\% |
| GG_Anlst | 39.45\% | BP_Anlst | 51.60\% | GLS_Anlst | 55.01\% |
| PEG_Anlst | 38.06\% | OHE_Ind10 | 46.99\% | OHE_Ind10 | 50.07\% |
| CT_Anlst | 37.37\% | MPEG_Anlst | 46.93\% | MPEG_Anlst | 47.93\% |
| KMY_Anlst | 35.87\% | FGHJ_Anlst | 46.72\% | ETSS_Anlst_Ind10 | 47.39\% |
| FPM_Anlst | 34.95\% | ETSS_Anlst_Ind10 | 44.99\% | FGHJ_Anlst | 46.06\% |
| GLS_Anlst | 34.83\% | HL_Anlst | 44.32\% | HL_Anlst | 44.85\% |
| MPEG_Anlst | 33.91\% | DKL_Anlst | 44.05\% | PEG_Anlst | 44.52\% |
| OHE_Ind10 | 33.68\% | KMY_Anlst | 43.32\% | DKL_Anlst | 44.45\% |
| GM_Anlst | 32.99\% | PEG_Anlst | 43.25\% | CT_Anlst | 44.25\% |
| FGHJ_Anlst | 32.76\% | CT_Anlst | 42.85\% | KMY_Anlst | 43.58\% |
| DKL_Anlst | 31.37\% | GM_Anlst | 42.65\% | GM_Anlst | 42.98\% |
| ETSS_Anlst_Ind10 | 31.26\% | FPM_Anlst | 40.51\% | FPM_Anlst | 41.31\% |
| HL_Anlst | 30.57\% | WNG_Anlst | 37.90\% | Naive | 40.31\% |
| WNG_Anlst | 27.80\% | Naive | 37.17\% | TPDPS_Anlst | 40.11\% |
| Naive | 15.80\% | TPDPS_Anlst | 36.23\% | OHE_25SBM | 38.77\% |
| TPDPS_Anlst | 15.34\% | OHE_25SBM | 34.83\% | WNG_Anlst | 34.63\% |
| ETSS_Anlst_25SBM | 11.07\% | GG_Anlst | 30.88\% | ETSS_Anlst_25SBM | 31.15\% |
| OHE_25SBM | 10.96\% | ETSS_Anlst_25SBM | 29.01\% | GG_Anlst | 30.88\% |
| ES_Anlst_Ind10 | 8.65\% | ES_Anlst_Ind10 | 14.91\% | ES_Anlst_Ind10 | 15.84\% |
| ES_Anlst_25SBM | 1.73\% | ES_Anlst_25SBM | 9.29\% | ES_Anlst_25SBM | 8.56\% |
| Panel B: HDZ |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |
| PEG_HDZ | 44.16\% | PE_HDZ | 56.48\% | PE_HDZ | 60.63\% |
| BP_HDZ | 43.91\% | BP_HDZ | 54.61\% | BP_HDZ | 59.63\% |
| GM_HDZ | 43.05\% | GLS_HDZ | 52.07\% | GG_HDZ | 53.68\% |
| PE_HDZ | 43.05\% | GG_HDZ | 50.13\% | GLS_HDZ | 53.41\% |
| MPEG_HDZ | 42.31\% | FGHJ_HDZ | 47.79\% | FGHJ_HDZ | 48.93\% |
| FPM_HDZ | 38.50\% | CT_HDZ | 44.79\% | CT_HDZ | 47.33\% |
| GG_HDZ | 37.88\% | KMY_HDZ | 41.98\% | KMY_HDZ | 44.65\% |
| GLS_HDZ | 37.15\% | DKL_HDZ | 41.24\% | TPDPS_HDZ | 44.25\% |
| FGHJ_HDZ | 35.67\% | TPDPS_HDZ | 40.31\% | DKL_HDZ | 43.25\% |
| KMY_HDZ | 33.95\% | ETSS_HDZ_Ind10 | 39.91\% | ETSS_HDZ_Ind10 | 43.18\% |
| HL_HDZ | 33.58\% | HL_HDZ | 38.57\% | HL_HDZ | 40.71\% |
| CT_HDZ | 32.10\% | MPEG_HDZ | 36.97\% | MPEG_HDZ | 39.71\% |
| DKL_HDZ | 31.24\% | GM_HDZ | 36.23\% | GM_HDZ | 38.84\% |
| WNG_HDZ | 29.15\% | FPM_HDZ | 35.76\% | FPM_HDZ | 38.57\% |
| ETSS_HDZ_Ind10 | 23.62\% | PEG_HDZ | 34.56\% | PEG_HDZ | 37.50\% |
| TPDPS_HDZ | 16.85\% | ETSS_HDZ_25SBM | 25.33\% | ETSS_HDZ_25SBM | 26.47\% |
| ETSS_HDZ_25SBM | 9.35\% | WNG_HDZ | 24.80\% | WNG_HDZ | 26.14\% |
| ES_HDZ_25SBM | 1.35\% | ES_HDZ_25SBM | 10.36\% | ES_HDZ_25SBM | 9.76\% |
| ES_HDZ_Ind10 | 1.23\% | ES_HDZ_Ind10 | 8.22\% | ES_HDZ_Ind10 | 7.15\% |


| MEV |  |  |  |  |  |  | RMSE |  |  |  |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | $41.64 \%$ | GLS_Anlst | $54.87 \%$ | PE_Anlst | $56.95 \%$ |  |  |  |  |  |  |  |  |
| BP_Anlst | $41.52 \%$ | PE_Anlst | $53.13 \%$ | BP_Anlst | $56.40 \%$ |  |  |  |  |  |  |  |  |
| GG_Anlst | $39.45 \%$ | BP_Anlst | $52.50 \%$ | GLS_Anlst | $55.29 \%$ |  |  |  |  |  |  |  |  |
| PEG_Anlst | $37.95 \%$ | MPEG_Anlst | $48.26 \%$ | OHE_Ind10 | $49.86 \%$ |  |  |  |  |  |  |  |  |
| CT_Anlst | $37.25 \%$ | OHE_Ind10 | $47.15 \%$ | MPEG_Anlst | $49.30 \%$ |  |  |  |  |  |  |  |  |
| KMY_Anlst | $35.76 \%$ | FGHJ_Anlst | $46.24 \%$ | ETSS_Anlst_Ind10 | $48.33 \%$ |  |  |  |  |  |  |  |  |
| FPM_Anlst | $34.95 \%$ | ETSS_Anlst_Ind10 | $45.90 \%$ | PEG_Anlst | $47.08 \%$ |  |  |  |  |  |  |  |  |
| GLS_Anlst | $34.72 \%$ | HL_Anlst | $45.48 \%$ | HL_Anlst | $45.76 \%$ |  |  |  |  |  |  |  |  |
| MPEG_Anlst | $33.91 \%$ | DKL_Anlst | $44.51 \%$ | FGHJ_Anlst | $45.41 \%$ |  |  |  |  |  |  |  |  |
| OHE_Ind10 | $33.56 \%$ | GM_Anlst | $43.88 \%$ | CT_Anlst | $44.99 \%$ |  |  |  |  |  |  |  |  |
| GM_Anlst | $32.64 \%$ | PEG_Anlst | $43.81 \%$ | DKL_Anlst | $44.85 \%$ |  |  |  |  |  |  |  |  |
| FGHJ_Anlst | $32.53 \%$ | KMY_Anlst | $42.84 \%$ | GM_Anlst | $43.95 \%$ |  |  |  |  |  |  |  |  |
| ETSS_Anlst_Ind10 | $31.26 \%$ | CT_Anlst | $42.77 \%$ | KMY_Anlst | $43.46 \%$ |  |  |  |  |  |  |  |  |
| DKL_Anlst | $31.03 \%$ | FPM_Anlst | $40.68 \%$ | FPM_Anlst | $41.52 \%$ |  |  |  |  |  |  |  |  |
| HL_Anlst | $30.45 \%$ | WNG_Anlst | $36.72 \%$ | TPDPS_Anlst | $39.22 \%$ |  |  |  |  |  |  |  |  |
| WNG_Anlst | $27.80 \%$ | Naive | $36.37 \%$ | Naive | $39.15 \%$ |  |  |  |  |  |  |  |  |
| Naive | $15.92 \%$ | TPDPS_Anlst | $36.02 \%$ | OHE_25SBM | $38.73 \%$ |  |  |  |  |  |  |  |  |
| TPDPS_Anlst | $15.57 \%$ | OHE_25SBM | $34.14 \%$ | WNG_Anlst | $34.28 \%$ |  |  |  |  |  |  |  |  |
| ETSS_Anlst_25SBM | $11.30 \%$ | GG_Anlst | $31.02 \%$ | GG_Anlst | $30.11 \%$ |  |  |  |  |  |  |  |  |
| OHE_25SBM | $11.07 \%$ | ETSS_Anlst_25SBM | $28.09 \%$ | ETSS_Anlst_25SBM | $30.04 \%$ |  |  |  |  |  |  |  |  |
| ES_Anlst_Ind10 | $8.88 \%$ | ES_Anlst_Ind10 | $14.46 \%$ | ES_Anlst_Ind10 | $14.74 \%$ |  |  |  |  |  |  |  |  |
| ES_Anlst_25SBM | $1.73 \%$ | ES_Anlst_25SBM | $8.48 \%$ | ES_Anlst_25SBM | $7.79 \%$ |  |  |  |  |  |  |  |  |


| MEV |  |  |  |  |  |  | RMSE |  |  |  |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | $44.40 \%$ | PE_HDZ | $57.72 \%$ | PE_HDZ | $61.89 \%$ |  |  |  |  |  |  |  |  |
| BP_HDZ | $44.03 \%$ | BP_HDZ | $55.84 \%$ | BP_HDZ | $60.92 \%$ |  |  |  |  |  |  |  |  |
| PE_HDZ | $43.30 \%$ | GLS_HDZ | $52.57 \%$ | GG_HDZ | $54.03 \%$ |  |  |  |  |  |  |  |  |
| GM_HDZ | $42.93 \%$ | GG_HDZ | $50.83 \%$ | GLS_HDZ | $53.48 \%$ |  |  |  |  |  |  |  |  |
| MPEG_HDZ | $42.31 \%$ | FGHJ_HDZ | $47.01 \%$ | FGHJ_HDZ | $48.05 \%$ |  |  |  |  |  |  |  |  |
| FPM_HDZ | $38.62 \%$ | CT_HDZ | $44.71 \%$ | CT_HDZ | $47.71 \%$ |  |  |  |  |  |  |  |  |
| GG_HDZ | $38.25 \%$ | DKL_HDZ | $41.38 \%$ | KMY_HDZ | $44.09 \%$ |  |  |  |  |  |  |  |  |
| GLS_HDZ | $36.90 \%$ | KMY_HDZ | $41.31 \%$ | ETSS_HDZ_Ind10 | $43.67 \%$ |  |  |  |  |  |  |  |  |
| FGHJ_HDZ | $35.79 \%$ | ETSS_HDZ_Ind10 | $40.40 \%$ | DKL_HDZ | $42.91 \%$ |  |  |  |  |  |  |  |  |
| KMY_HDZ | $33.95 \%$ | TPDPS_HDZ | $38.87 \%$ | TPDPS_HDZ | $42.56 \%$ |  |  |  |  |  |  |  |  |
| HL_HDZ | $33.83 \%$ | HL_HDZ | $37.62 \%$ | HL_HDZ | $40.75 \%$ |  |  |  |  |  |  |  |  |
| CT_HDZ | $32.60 \%$ | MPEG_HDZ | $36.58 \%$ | MPEG_HDZ | $38.94 \%$ |  |  |  |  |  |  |  |  |
| DKL_HDZ | $31.24 \%$ | FPM_HDZ | $36.51 \%$ | GM_HDZ | $38.25 \%$ |  |  |  |  |  |  |  |  |
| WNG_HDZ | $29.03 \%$ | GM_HDZ | $35.88 \%$ | FPM_HDZ | $37.90 \%$ |  |  |  |  |  |  |  |  |
| ETSS_HDZ_Ind10 | $23.49 \%$ | PEG_HDZ | $33.94 \%$ | PEG_HDZ | $37.13 \%$ |  |  |  |  |  |  |  |  |
| TPDPS_HDZ | $16.97 \%$ | WNG_HDZ | $25.31 \%$ | WNG_HDZ | $26.63 \%$ |  |  |  |  |  |  |  |  |
| ETSS_HDZ_25SBM | $9.10 \%$ | ETSS_HDZ_25SBM | $25.17 \%$ | ETSS_HDZ_25SBM | $26.36 \%$ |  |  |  |  |  |  |  |  |
| ES_HDZ_25SBM | $1.35 \%$ | ES_HDZ_25SBM | $9.94 \%$ | ES_HDZ_25SBM | $8.55 \%$ |  |  |  |  |  |  |  |  |
| ES_HDZ_Ind10 | $1.23 \%$ | ES_HDZ_Ind10 | $8.00 \%$ | ES_HDZ_Ind10 | $6.68 \%$ |  |  |  |  |  |  |  |  |

Continued in next page...

Table 97: Model Confidence Set Summary Results: Long-term Growth in Earnings Forecast Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  | MEV |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | RMSE |  | MAE |  |
| BP_RW | 58.00\% | BP_RW | 66.84\% | GG_RW | 69.45\% | BP_RW | 58.00\% | BP_RW | 68.01\% | BP_RW | 68.85\% |
| GG_RW | 35.28\% | GG_RW | 66.44\% | BP_RW | 67.71\% | GG_RW | 35.28\% | GG_RW | 65.92\% | GG_RW | 67.80\% |
| KMY_RW | 34.25\% | CT_RW | 54.14\% | CT_RW | 55.01\% | KMY_RW | 34.42\% | CT_RW | 53.69\% | CT_RW | 53.76\% |
| GM_RW | 25.30\% | FGHJ_RW | 47.53\% | FGHJ_RW | 49.60\% | GM_RW | 25.13\% | FGHJ_RW | 47.36\% | FGHJ_RW | 48.33\% |
| CT_RW | 17.21\% | KMY_RW | 46.26\% | KMY_RW | 46.19\% | FGHJ_RW | 17.21\% | KMY_RW | 46.73\% | KMY_RW | 45.97\% |
| FGHJ_RW | 17.21\% | DKL_RW | 40.17\% | GLS_RW | 40.91\% | CT_RW | 16.87\% | DKL_RW | 40.54\% | GLS_RW | 40.40\% |
| MPEG_RW | 16.35\% | GLS_RW | 39.91\% | DKL_RW | 39.44\% | HL_RW | 16.18\% | GLS_RW | 38.87\% | DKL_RW | 39.29\% |
| HL_RW | 16.01\% | GM_RW | 35.70\% | GM_RW | 35.03\% | MPEG_RW | 16.01\% | GM_RW | 35.74\% | GM_RW | 35.67\% |
| DKL_RW | 15.15\% | HL_RW | 34.89\% | HL_RW | 33.62\% | DKL_RW | 14.97\% | HL_RW | 35.05\% | HL_RW | 33.59\% |
| GLS_RW | 13.08\% | TPDPS_RW | 29.08\% | TPDPS_RW | 30.68\% | GLS_RW | 12.74\% | TPDPS_RW | 28.93\% | TPDPS_RW | 29.00\% |
| PE_RW | 11.53\% | MPEG_RW | 26.80\% | MPEG_RW | 27.54\% | PE_RW | 11.36\% | MPEG_RW | 27.33\% | MPEG_RW | 27.82\% |
| PEG_RW | 11.02\% | PEG_RW | 25.67\% | PEG_RW | 25.87\% | PEG_RW | 11.02\% | PEG_RW | 25.94\% | PEG_RW | 26.29\% |
| TPDPS_RW | 10.50\% | ES_RW_Ind10 | 20.66\% | ES_RW_Ind10 | 20.19\% | TPDPS_RW | 10.50\% | ES_RW_Ind10 | 20.03\% | ES_RW_Ind10 | 21.70\% |
| ETSS_RW_Ind10 | 3.10\% | PE_RW | 18.78\% | PE_RW | 17.18\% | ETSS_RW_Ind10 | 2.75\% | PE_RW | 18.36\% | PE_RW | 17.94\% |
| ES_RW_Ind10 | 2.58\% | ETSS_RW_Ind10 | 16.11\% | ETSS_RW_Ind10 | 15.98\% | ES_RW_Ind10 | 2.58\% | ETSS_RW_Ind10 | 15.72\% | ETSS_RW_Ind10 | 14.67\% |
| WNG_RW | 2.58\% | ETSS_RW_25SBM | 13.10\% | ETSS_RW_25SBM | 11.90\% | WNG_RW | 2.58\% | ETSS_RW_25SBM | 11.20\% | ETSS_RW_25SBM | 11.40\% |
| FPM_RW | 2.07\% | ES_RW_25SBM | 11.30\% | ES_RW_25SBM | 9.89\% | FPM_RW | 2.07\% | ES_RW_25SBM | 10.99\% | ES_RW_25SBM | 9.94\% |
| ETSS_RW_25SBM | 1.72\% | FPM_RW | 9.69\% | FPM_RW | 8.89\% | ETSS_RW_25SBM | 1.72\% | FPM_RW | 9.11\% | FPM_RW | 8.69\% |
| ES_RW_25SBM | 0.52\% | WNG_RW | 8.62\% | WNG_RW | 4.61\% | ES_RW_25SBM | 0.34\% | WNG_RW | 8.28\% | WNG_RW | 4.73\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 55.45\% | BP_EP | 65.04\% | BP_EP | 66.58\% | BP_EP | 55.45\% | BP_EP | 64.60\% | BP_EP | 66.41\% |
| PE_EP | 39.39\% | GG_EP | 56.89\% | GG_EP | 58.02\% | PE_EP | 39.11\% | GG_EP | 56.05\% | GG_EP | 57.72\% |
| GM_EP | 32.82\% | KMY_EP | 50.67\% | KMY_EP | 50.94\% | GM_EP | 32.40\% | KMY_EP | 50.21\% | KMY_EP | 50.49\% |
| GLS_EP | 31.28\% | CT_EP | 44.79\% | CT_EP | 45.39\% | GLS_EP | 31.56\% | CT_EP | 44.16\% | CT_EP | 44.85\% |
| FGHJ_EP | 30.87\% | PE_EP | 40.44\% | PE_EP | 42.31\% | FGHJ_EP | 31.01\% | PE_EP | 39.36\% | PE_EP | 42.35\% |
| KMY_EP | 30.17\% | GLS_EP | 37.70\% | GLS_EP | 38.03\% | KMY_EP | 30.17\% | GLS_EP | 36.02\% | GLS_EP | 37.48\% |
| DKL_EP | 29.75\% | DKL_EP | 36.83\% | DKL_EP | 37.50\% | DKL_EP | 29.61\% | DKL_EP | 35.61\% | DKL_EP | 36.65\% |
| MPEG_EP | 28.77\% | TPDPS_EP | 33.62\% | TPDPS_EP | 35.63\% | MPEG_EP | 28.49\% | FGHJ_EP | 31.64\% | TPDPS_EP | 33.73\% |
| HL_EP | 28.21\% | FGHJ_EP | 32.89\% | FGHJ_EP | 34.02\% | HL_EP | 28.21\% | TPDPS_EP | 30.32\% | FGHJ_EP | 33.66\% |
| GG_EP | 25.28\% | GM_EP | 27.67\% | GM_EP | 29.75\% | GG_EP | 25.14\% | GM_EP | 26.77\% | GM_EP | 29.21\% |
| PEG_EP | 23.18\% | HL_EP | 27.67\% | HL_EP | 28.48\% | PEG_EP | 22.77\% | HL_EP | 26.22\% | HL_EP | 28.09\% |
| CT_EP | 21.23\% | PEG_EP | 23.66\% | PEG_EP | 26.67\% | CT_EP | 20.95\% | PEG_EP | 22.88\% | PEG_EP | 26.50\% |
| TPDPS_EP | 15.92\% | MPEG_EP | 18.58\% | MPEG_EP | 19.18\% | TPDPS_EP | 15.78\% | MPEG_EP | 18.29\% | MPEG_EP | 19.61\% |
| ETSS_EP_Ind10 | 6.70\% | ETSS_EP_Ind10 | 12.77\% | ETSS_EP_Ind10 | 12.17\% | ETSS_EP_Ind10 | 6.56\% | ETSS_EP_Ind10 | 11.20\% | ETSS_EP_Ind10 | 12.03\% |
| FPM_EP | 6.15\% | FPM_EP | 9.02\% | FPM_EP | 7.95\% | FPM_EP | 6.15\% | FPM_EP | 6.54\% | FPM_EP | 7.02\% |
| ETSS_EP_25SBM | 3.63\% | ES_EP_Ind10 | 7.22\% | ES_EP_Ind10 | 6.48\% | ETSS_EP_25SBM | 3.63\% | ES_EP_Ind10 | 6.05\% | ES_EP_Ind10 | 6.61\% |
| ES_EP_Ind10 | 1.54\% | ETSS_EP_25SBM | 6.55\% | ETSS_EP_25SBM | 5.55\% | ES_EP_Ind10 | 1.40\% | ETSS_EP_25SBM | 5.70\% | ETSS_EP_25SBM | 5.70\% |
| WNG_EP | 1.26\% | WNG_EP | 4.95\% | WNG_EP | 3.81\% | WNG_EP | 1.26\% | WNG_EP | 3.62\% | WNG_EP | 3.34\% |
| ES_EP_25SBM | 0.00\% | ES_EP_25SBM | 3.41\% | ES_EP_25SBM | 1.47\% | ES_EP_25SBM | 0.00\% | ES_EP_25SBM | 2.50\% | ES_EP_25SBM | 1.53\% |

Continued in next page..

Table 97: Model Confidence Set Summary Results: Long-term Growth in Earnings Forecast Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  | MEV |  | RMSE |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | MAE |  |
| BP_RI | 60.31\% | BP_RI | 66.98\% | BP_RI | 68.65\% | BP_RI | 60.45\% |  |  | BP_RI | 68.22\% | BP_RI | 69.96\% |
| PE_RI | 43.90\% | GG_RI | 56.89\% | GG_RI | 58.36\% | PE_RI | 44.04\% | GG_RI | 57.51\% | GG_RI | 58.97\% |
| GG_RI | 40.53\% | PE_RI | 45.19\% | KMY_RI | 46.79\% | GG_RI | 40.67\% | KMY_RI | 46.31\% | KMY_RI | 47.36\% |
| GLS_RI | 35.06\% | KMY_RI | 45.19\% | PE_RI | 44.65\% | FGHJ_RI | 35.34\% | PE_RI | 45.69\% | PE_RI | 45.27\% |
| FGHJ_RI | 35.06\% | GLS_RI | 41.78\% | GLS_RI | 44.25\% | GLS_RI | 35.06\% | GLS_RI | 41.38\% | GLS_RI | 44.51\% |
| KMY_RI | 30.58\% | TPDPS_RI | 38.37\% | TPDPS_RI | 40.04\% | KMY_RI | 30.58\% | TPDPS_RI | 38.11\% | FGHJ_RI | 39.50\% |
| GM_RI | 20.90\% | FGHJ_RI | 37.10\% | FGHJ_RI | 39.17\% | GM_RI | 21.18\% | FGHJ_RI | 36.93\% | TPDPS_RI | 39.08\% |
| DKL_RI | $19.35 \%$ | DKL_RI | 32.29\% | DKL_RI | 32.69\% | DKL_RI | 19.35\% | DKL_RI | 32.41\% | DKL_RI | 33.59\% |
| TPDPS_RI | 17.67\% | GM_RI | 28.07\% | CT_RI | 29.48\% | TPDPS_RI | 17.95\% | CT_RI | 28.93\% | CT_RI | 29.76\% |
| MPEG_RI | 16.55\% | CT_RI | 27.94\% | GM_RI | 29.41\% | MPEG_RI | 16.69\% | GM_RI | 28.51\% | GM_RI | 29.55\% |
| HL_RI | 14.87\% | HL_RI | 26.20\% | HL_RI | 27.34\% | HL_RI | 14.87\% | HL_RI | 26.98\% | HL_RI | 28.09\% |
| PEG_RI | 11.64\% | PEG_RI | 25.27\% | PEG_RI | 26.94\% | PEG_RI | 11.78\% | PEG_RI | 25.10\% | PEG_RI | 27.19\% |
| CT_RI | 10.80\% | MPEG_RI | 19.05\% | MPEG_RI | 20.52\% | CT_RI | 10.80\% | MPEG_RI | 19.89\% | MPEG_RI | 20.45\% |
| ETSS_RI_Ind10 | 4.21\% | ETSS_RI_Ind10 | 13.03\% | ETSS_RI_Ind10 | 13.64\% | ETSS_RI_Ind10 | 4.21\% | ETSS_RI_Ind10 | 13.56\% | ETSS_RI_Ind10 | 14.39\% |
| FPM_RI | 2.52\% | FPM_RI | 10.96\% | FPM_RI | 10.96\% | FPM_RI | 2.66\% | FPM_RI | 10.64\% | FPM_RI | 11.13\% |
| ETSS_RI_25SBM | 1.82\% | ETSS_RI_25SBM | 10.16\% | ETSS_RI_25SBM | 9.49\% | ETSS_RI_25SBM | 1.82\% | ETSS_RI_25SBM | 9.25\% | ETSS_RI_25SBM | 9.39\% |
| WNG_RI | 0.84\% | ES_RI_Ind10 | 4.68\% | WNG_RI | 3.88\% | WNG_RI | 0.84\% | WNG_RI | 4.87\% | WNG_RI | 3.48\% |
| ES_RI_Ind10 | 0.42\% | WNG_RI | 4.68\% | ES_RI_Ind10 | 3.14\% | ES_RI_Ind10 | 0.42\% | ES_RI_Ind10 | 4.52\% | ES_RI_Ind10 | 3.06\% |
| ES_RI_25SBM | 0.14\% | ES_RI_25SBM | 3.14\% | ES_RI_25SBM | 1.27\% | ES_RI_25SBM | 0.14\% | ES_RI_25SBM | 3.20\% | ES_RI_25SBM | 1.18\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of long-term growth in earnings forecast. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 98: Model Confidence Set Summary Results: Analysts Coverage Effect

|  |
| ---: |
| Panel A: Analysts |
| MEV |


| Panel A: Analysts |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| MEV |  | RMSE |  | MAE |  |
| PE_Anlst | 33.43\% | BP_Anlst | 45.24\% | BP_Anlst | 47.76\% |
| GG_Anlst | 32.84\% | PE_Anlst | 43.63\% | PE_Anlst | 45.42\% |
| BP_Anlst | 31.07\% | GLS_Anlst | 42.55\% | ETSS_Anlst_Ind10 | 44.52\% |
| KMY_Anlst | 28.11\% | ETSS_Anlst_Ind10 | 42.19\% | GLS_Anlst | 43.45\% |
| PEG_Anlst | 27.81\% | OHE_Ind10 | 41.83\% | OHE_Ind10 | 42.91\% |
| OHE_Ind10 | 27.51\% | KMY_Anlst | 39.32\% | MPEG_Anlst | 40.93\% |
| FPM_Anlst | 26.33\% | MPEG_Anlst | 38.78\% | KMY_Anlst | 39.50\% |
| GLS_Anlst | 23.96\% | FGHJ_Anlst | 38.60\% | FGHJ_Anlst | 38.60\% |
| MPEG_Anlst | 23.96\% | GM_Anlst | 38.42\% | GM_Anlst | 38.24\% |
| ETSS_Anlst_Ind10 | 23.96\% | TPDPS_Anlst | 37.52\% | TPDPS_Anlst | 38.24\% |
| CT_Anlst | 22.78\% | PEG_Anlst | 37.16\% | HL_Anlst | 38.06\% |
| GM_Anlst | 22.49\% | DKL_Anlst | 35.73\% | PEG_Anlst | 37.34\% |
| WNG_Anlst | 22.49\% | HL_Anlst | 35.01\% | DKL_Anlst | 36.62\% |
| DKL_Anlst | 18.34\% | WNG_Anlst | 34.83\% | FPM_Anlst | 35.19\% |
| FGHJ_Anlst | 18.05\% | FPM_Anlst | 34.65\% | Naive | 34.65\% |
| HL_Anlst | 16.86\% | Naive | 34.47\% | CT_Anlst | 33.57\% |
| TPDPS_Anlst | 11.54\% | GG_Anlst | 33.93\% | GG_Anlst | 33.57\% |
| Naive | 10.06\% | CT_Anlst | 32.14\% | OHE_25SBM | 33.03\% |
| ETSS_Anlst_25SBM | 7.99\% | OHE_25SBM | 29.62\% | WNG_Anlst | 30.52\% |
| ES_Anlst_Ind10 | 7.40\% | ETSS_Anlst_25SBM | 26.39\% | ETSS_Anlst_25SBM | 28.01\% |
| OHE_25SBM | 6.21\% | ES_Anlst_Ind10 | 17.06\% | ES_Anlst_Ind10 | 17.06\% |
| ES_Anlst_25SBM | 0.00\% | ES_Anlst_25SBM | 4.67\% | ES_Anlst_25SBM | 3.05\% |


| MEV |  |  | RMSE |  | MAE |
| :--- | ---: | :--- | :--- | :--- | :--- |
| PE_Anlst | $33.43 \%$ | BP_Anlst | $48.86 \%$ | BP_Anlst | $49.29 \%$ |
| GG_Anlst | $32.54 \%$ | PE_Anlst | $47.58 \%$ | PE_Anlst | $48.43 \%$ |
| BP_Anlst | $31.07 \%$ | GLS_Anlst | $45.58 \%$ | GLS_Anlst | $46.44 \%$ |
| KMY_Anlst | $27.81 \%$ | OHE_Ind10 | $43.02 \%$ | OHE_Ind10 | $45.44 \%$ |
| OHE_Ind10 | $27.81 \%$ | MPEG_Anlst | $41.31 \%$ | OHE_25SBM | $44.02 \%$ |
| PEG_Anlst | $27.51 \%$ | FGHJ_Anlst | $40.74 \%$ | FGHJ_Anlst | $42.02 \%$ |
| FPM_Anlst | $26.04 \%$ | OHE_25SBM | $40.60 \%$ | MPEG_Anlst | $41.60 \%$ |
| ETSS_Anlst_Ind10 | $24.26 \%$ | DKL_Anlst | $38.46 \%$ | PEG_Anlst | $39.89 \%$ |
| GLS_Anlst | $23.67 \%$ | CT_Anlst | $37.89 \%$ | KMY_Anlst | $39.03 \%$ |
| MPEG_Anlst | $23.37 \%$ | PEG_Anlst | $37.46 \%$ | GM_Anlst | $38.03 \%$ |
| CT_Anlst | $22.78 \%$ | HL_Anlst | $37.32 \%$ | ETSS_Anlst_Ind10 | $37.89 \%$ |
| WNG_Anlst | $22.78 \%$ | GM_Anlst | $37.18 \%$ | Naive | $37.61 \%$ |
| GM_Anlst | $21.89 \%$ | KMY_Anlst | $37.04 \%$ | CT_Anlst | $37.46 \%$ |
| DKL_Anlst | $18.05 \%$ | ETSS_Anlst_Ind10 | $36.47 \%$ | HL_Anlst | $37.18 \%$ |
| FGHJ_Anlst | $17.75 \%$ | FPM_Anlst | $34.90 \%$ | DKL_Anlst | $37.18 \%$ |
| HL_Anlst | $16.57 \%$ | Naive | $34.90 \%$ | TPDPS_Anlst | $35.47 \%$ |
| TPDPS_Anlst | $10.95 \%$ | WNG_Anlst | $33.33 \%$ | FPM_Anlst | $35.19 \%$ |
| Naive | $9.76 \%$ | TPDPS_Anlst | $32.05 \%$ | ETSS_Anlst_25SBM | $32.62 \%$ |
| ETSS_Anlst_25SBM | $7.69 \%$ | ETSS_Anlst_25SBM | $30.06 \%$ | WNG_Anlst | $30.20 \%$ |
| ES_Anlst_Ind10 | $7.69 \%$ | GG_Anlst | $29.49 \%$ | GG_Anlst | $29.77 \%$ |
| OHE_25SBM | $6.21 \%$ | ES_Anlst_Ind10 | $11.82 \%$ | ES_Anlst_25SBM | $11.54 \%$ |
| ES_Anlst_25SBM | $0.00 \%$ | ES_Anlst_25SBM | $10.83 \%$ | ES_Anlst_Ind10 | $11.40 \%$ |


| Panel B: HDZ |  |  | RMSE |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| MEV |  |  |  | MAE |  |
| PEG_HDZ | $42.37 \%$ | BP_HDZ | $53.14 \%$ | BP_HDZ | $56.55 \%$ |
| GM_HDZ | $36.45 \%$ | PE_HDZ | $50.63 \%$ | PE_HDZ | $50.99 \%$ |
| BP_HDZ | $35.20 \%$ | GG_HDZ | $40.39 \%$ | GLS_HDZ | $41.83 \%$ |
| MPEG_HDZ | $34.58 \%$ | GLS_HDZ | $38.96 \%$ | GG_HDZ | $41.83 \%$ |
| FPM_HDZ | $33.64 \%$ | TPDPS_HDZ | $36.45 \%$ | TPDPS_HDZ | $40.93 \%$ |
| PE_HDZ | $33.02 \%$ | ETSS_HDZ_Ind10 | $36.27 \%$ | ETSS_HDZ_Ind10 | $38.42 \%$ |
| GG_HDZ | $31.46 \%$ | CT_HDZ | $36.09 \%$ | FGHJ_HDZ | $38.06 \%$ |
| GLS_HDZ | $29.28 \%$ | FGHJ_HDZ | $35.91 \%$ | CT_HDZ | $36.62 \%$ |
| WNG_HDZ | $28.97 \%$ | KMY_HDZ | $31.60 \%$ | DKL_HDZ | $34.11 \%$ |
| FGHJ_HDZ | $28.35 \%$ | DKL_HDZ | $30.88 \%$ | GM_HDZ | $33.03 \%$ |
| HL_HDZ | $27.10 \%$ | GM_HDZ | $30.34 \%$ | KMY_HDZ | $32.32 \%$ |
| KMY_HDZ | $26.17 \%$ | FPM_HDZ | $29.80 \%$ | HL_HDZ | $31.24 \%$ |
| CT_HDZ | $24.30 \%$ | HL_HDZ | $28.73 \%$ | FPM_HDZ | $30.52 \%$ |
| DKL_HDZ | $22.74 \%$ | MPEG_HDZ | $27.83 \%$ | MPEG_HDZ | $29.80 \%$ |
| ETSS_HDZ_Ind10 | $18.69 \%$ | PEG_HDZ | $27.65 \%$ | PEG_HDZ | $29.44 \%$ |
| TPDPS_HDZ | $14.33 \%$ | WNG_HDZ | $22.26 \%$ | WNG_HDZ | $23.16 \%$ |
| ETSS_HDZ_25SBM | $4.67 \%$ | ETSS_HDZ_25SBM | $18.67 \%$ | ETSS_HDZ_25SBM | $18.67 \%$ |
| ES_HDZ_Ind10 | $1.25 \%$ | ES_HDZ_Ind10 | $8.98 \%$ | ES_HDZ_Ind10 | $7.72 \%$ |
| ES_HDZ_25SBM | $0.31 \%$ | ES_HDZ_25SBM | $6.64 \%$ | ES_HDZ_25SBM | $4.49 \%$ |


| MEV |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
|  | RMSE |  |  |  |  |
| PEG_HDZ | $42.37 \%$ | PE_HDZ | $51.99 \%$ | PE_HDZ | $56.13 \%$ |
| GM_HDZ | $36.45 \%$ | BP_HDZ | $49.57 \%$ | BP_HDZ | $50.14 \%$ |
| BP_HDZ | $35.20 \%$ | GLS_HDZ | $45.16 \%$ | GLS_HDZ | $46.87 \%$ |
| MPEG_HDZ | $34.27 \%$ | FGHJ_HDZ | $43.45 \%$ | GG_HDZ | $44.73 \%$ |
| FPM_HDZ | $33.64 \%$ | GG_HDZ | $41.60 \%$ | ETSS_HDZ_Ind10 | $43.73 \%$ |
| PE_HDZ | $33.33 \%$ | ETSS_HDZ_Ind10 | $40.60 \%$ | FGHJ_HDZ | $43.45 \%$ |
| GG_HDZ | $31.15 \%$ | MPEG_HDZ | $39.60 \%$ | TPDPS_HDZ | $40.74 \%$ |
| GLS_HDZ | $29.28 \%$ | TPDPS_HDZ | $38.89 \%$ | CT_HDZ | $38.46 \%$ |
| WNG_HDZ | $29.28 \%$ | FPM_HDZ | $37.75 \%$ | MPEG_HDZ | $38.32 \%$ |
| FGHJ_HDZ | $28.35 \%$ | DKL_HDZ | $36.61 \%$ | DKL_HDZ | $37.32 \%$ |
| HL_HDZ | $27.10 \%$ | CT_HDZ | $36.47 \%$ | FPM_HDZ | $37.04 \%$ |
| KMY_HDZ | $25.86 \%$ | HL_HDZ | $35.90 \%$ | KMY_HDZ | $36.32 \%$ |
| CT_HDZ | $23.99 \%$ | KMY_HDZ | $35.90 \%$ | HL_HDZ | $35.19 \%$ |
| DKL_HDZ | $22.74 \%$ | PEG_HDZ | $33.48 \%$ | ETSS_HDZ_25SBM | $34.62 \%$ |
| ETSS_HDZ_Ind10 | $19.00 \%$ | GM_HDZ | $32.91 \%$ | PEG_HDZ | $34.33 \%$ |
| TPDPS_HDZ | $14.64 \%$ | ETSS_HDZ_25SBM | $30.77 \%$ | GM_HDZ | $33.76 \%$ |
| ETSS_HDZ_25SBM | $4.98 \%$ | WNG_HDZ | $24.64 \%$ | WNG_HDZ | $25.36 \%$ |
| ES_HDZ_Ind10 | $1.25 \%$ | ES_HDZ_25SBM | $15.10 \%$ | ES_HDZ_25SBM | $14.96 \%$ |
| ES_HDZ_25SBM | $0.31 \%$ | ES_HDZ_Ind10 | $9.54 \%$ | ES_HDZ_Ind10 | $6.84 \%$ |

Continued in next page..

Table 98: Model Confidence Set Summary Results: Analysts Coverage Effect, Continued
First Quartile Fourth Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 46.53\% | BP_RW | 59.25\% | BP_RW | 60.14\% | BP_RW | 46.53\% | BP_RW | 64.10\% | BP_RW | 63.39\% |
| GG_RW | 26.73\% | GG_RW | 54.22\% | GG_RW | 56.19\% | GG_RW | 26.73\% | GG_RW | 55.70\% | GG_RW | 57.55\% |
| KMY_RW | 23.76\% | CT_RW | 44.88\% | CT_RW | 46.68\% | KMY_RW | 23.76\% | CT_RW | 48.58\% | CT_RW | 47.58\% |
| GM_RW | 19.31\% | FGHJ_RW | 42.19\% | KMY_RW | 42.73\% | GM_RW | 19.31\% | FGHJ_RW | 46.30\% | FGHJ_RW | 47.15\% |
| MPEG_RW | 14.36\% | KMY_RW | 41.29\% | FGHJ_RW | 41.11\% | MPEG_RW | 14.36\% | KMY_RW | 40.31\% | KMY_RW | 40.46\% |
| FGHJ_RW | 10.40\% | GLS_RW | 37.34\% | GLS_RW | 39.32\% | FGHJ_RW | 10.40\% | GLS_RW | 38.89\% | GLS_RW | 39.60\% |
| PEG_RW | 9.90\% | DKL_RW | 35.73\% | DKL_RW | 36.62\% | PEG_RW | 9.90\% | DKL_RW | 38.03\% | DKL_RW | 36.61\% |
| PE_RW | 9.41\% | HL_RW | 31.78\% | HL_RW | 33.03\% | PE_RW | 9.41\% | HL_RW | 32.62\% | HL_RW | 33.19\% |
| CT_RW | 7.92\% | GM_RW | 30.88\% | GM_RW | 30.52\% | CT_RW | 7.92\% | GM_RW | 28.92\% | TPDPS_RW | 29.06\% |
| GLS_RW | 6.93\% | TPDPS_RW | 24.96\% | PEG_RW | 25.31\% | GLS_RW | 6.93\% | TPDPS_RW | 28.92\% | GM_RW | 28.63\% |
| TPDPS_RW | 6.44\% | MPEG_RW | 23.52\% | TPDPS_RW | 24.60\% | TPDPS_RW | 6.44\% | MPEG_RW | 22.36\% | PEG_RW | 24.36\% |
| HL_RW | 4.95\% | PEG_RW | 22.44\% | MPEG_RW | 24.24\% | HL_RW | 4.95\% | PEG_RW | 22.36\% | MPEG_RW | 22.22\% |
| DKL_RW | 4.46\% | ES_RW_Ind10 | 19.57\% | ES_RW_Ind10 | 21.01\% | DKL_RW | 4.46\% | ES_RW_Ind10 | 19.23\% | ES_RW_Ind10 | 20.09\% |
| WNG_RW | 2.48\% | ETSS_RW_Ind10 | 18.13\% | PE_RW | 19.21\% | WNG_RW | 2.48\% | PE_RW | 16.24\% | PE_RW | 16.52\% |
| FPM_RW | 0.99\% | PE_RW | 16.88\% | ETSS_RW_Ind10 | 15.80\% | FPM_RW | 0.99\% | ETSS_RW_Ind10 | 14.96\% | ES_RW_25SBM | 14.39\% |
| ETSS_RW_Ind10 | 0.99\% | FPM_RW | 10.95\% | FPM_RW | 9.69\% | ETSS_RW_Ind10 | 0.99\% | ETSS_RW_25SBM | 14.81\% | ETSS_RW_Ind10 | 14.25\% |
| ES_RW_25SBM | 0.50\% | ETSS_RW_25SBM | 9.87\% | ETSS_RW_25SBM | 8.80\% | ES_RW_25SBM | 0.50\% | ES_RW_25SBM | 13.82\% | ETSS_RW_25SBM | 13.39\% |
| ES_RW_Ind10 | 0.50\% | WNG_RW | 7.90\% | ES_RW_25SBM | 7.36\% | ES_RW_Ind10 | 0.50\% | FPM_RW | 7.41\% | FPM_RW | 9.12\% |
| ETSS_RW_25SBM | 0.00\% | ES_RW_25SBM | 6.64\% | WNG_RW | 5.75\% | ETSS_RW_25SBM | 0.00\% | WNG_RW | 6.70\% | WNG_RW | 4.70\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 48.21\% | BP_EP | 57.27\% | BP_EP | 60.14\% | BP_EP | 48.21\% | BP_EP | 58.55\% | BP_EP | 58.69\% |
| PE_EP | 39.29\% | GG_EP | 49.55\% | GG_EP | 49.91\% | PE_EP | 39.29\% | GG_EP | 47.01\% | GG_EP | 49.15\% |
| GM_EP | 27.50\% | KMY_EP | 40.57\% | KMY_EP | 40.75\% | GM_EP | 27.50\% | PE_EP | 44.16\% | PE_EP | 44.44\% |
| MPEG_EP | 22.50\% | CT_EP | 35.37\% | CT_EP | 35.19\% | MPEG_EP | 22.14\% | KMY_EP | 43.45\% | KMY_EP | 43.87\% |
| GLS_EP | 21.79\% | PE_EP | 29.80\% | PE_EP | 30.70\% | DKL_EP | 21.79\% | CT_EP | 39.60\% | CT_EP | 40.60\% |
| DKL_EP | 21.79\% | TPDPS_EP | 28.01\% | GLS_EP | 29.98\% | GLS_EP | 21.07\% | GLS_EP | 36.04\% | GLS_EP | 37.75\% |
| KMY_EP | 20.71\% | GLS_EP | 27.83\% | DKL_EP | 28.37\% | KMY_EP | 20.36\% | DKL_EP | 34.90\% | DKL_EP | 34.90\% |
| FGHJ_EP | 20.36\% | DKL_EP | 27.65\% | PEG_EP | 27.83\% | HL_EP | 20.00\% | FGHJ_EP | 31.20\% | TPDPS_EP | 33.76\% |
| HL_EP | 20.36\% | PEG_EP | 26.75\% | TPDPS_EP | 27.47\% | FGHJ_EP | 19.64\% | TPDPS_EP | 29.91\% | FGHJ_EP | 30.91\% |
| GG_EP | 17.50\% | FGHJ_EP | 24.96\% | FGHJ_EP | 25.13\% | GG_EP | 17.50\% | GM_EP | 25.93\% | GM_EP | 29.06\% |
| PEG_EP | 16.79\% | GM_EP | 23.16\% | GM_EP | 24.60\% | PEG_EP | 16.43\% | HL_EP | 25.93\% | PEG_EP | 26.78\% |
| CT_EP | 13.57\% | HL_EP | 22.62\% | HL_EP | 22.62\% | CT_EP | 13.21\% | PEG_EP | 24.93\% | HL_EP | 26.64\% |
| TPDPS_EP | 12.86\% | MPEG_EP | 17.95\% | MPEG_EP | 19.03\% | TPDPS_EP | 12.50\% | MPEG_EP | 20.23\% | MPEG_EP | 20.80\% |
| ETSS_EP_Ind10 | 5.36\% | ETSS_EP_Ind10 | 14.36\% | ETSS_EP_Ind10 | 14.72\% | ETSS_EP_Ind10 | 5.36\% | ETSS_EP_Ind10 | 14.96\% | ETSS_EP_Ind10 | 16.52\% |
| FPM_EP | 5.00\% | ES_EP_Ind10 | 9.69\% | ES_EP_Ind10 | 10.23\% | FPM_EP | 5.00\% | FPM_EP | 7.83\% | ETSS_EP_25SBM | 6.98\% |
| ETSS_EP_25SBM | 1.43\% | FPM_EP | 8.08\% | FPM_EP | 7.54\% | ETSS_EP_25SBM | 1.43\% | ETSS_EP_25SBM | 6.98\% | FPM_EP | 6.70\% |
| ES_EP_Ind10 | 1.43\% | WNG_EP | 6.46\% | WNG_EP | 6.10\% | ES_EP_Ind10 | 1.43\% | ES_EP_Ind10 | 5.84\% | ES_EP_Ind10 | 4.84\% |
| WNG_EP | 1.07\% | ETSS_EP_25SBM | 5.75\% | ETSS_EP_25SBM | 4.49\% | WNG_EP | 1.07\% | WNG_EP | 5.56\% | WNG_EP | 4.70\% |
| ES_EP_25SBM | 0.00\% | ES_EP_25SBM | 3.41\% | ES_EP_25SBM | 1.97\% | ES_EP_25SBM | 0.00\% | ES_EP_25SBM | 3.42\% | ES_EP_25SBM | 2.71\% |

Table 98: Model Confidence Set Summary Results: Analysts Coverage Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  | RMSE |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  |  |  | MAE |  |
| BP_RI | 55.20\% | BP_RI | 61.22\% | BP_RI | 61.76\% | BP_RI | 55.20\% | BP_RI | 58.97\% | BP_RI | 59.12\% |
| PE_RI | 38.71\% | GG_RI | 51.17\% | GG_RI | 53.14\% | PE_RI | 38.71\% | GG_RI | 48.43\% | GG_RI | 50.57\% |
| GG_RI | 35.48\% | KMY_RI | 37.88\% | KMY_RI | 38.24\% | GG_RI | 35.48\% | PE_RI | 46.72\% | PE_RI | 47.44\% |
| GLS_RI | 27.24\% | PE_RI | 33.03\% | GLS_RI | 33.75\% | GLS_RI | 27.24\% | GLS_RI | 45.01\% | GLS_RI | 44.44\% |
| FGHJ_RI | 27.24\% | GLS_RI | 31.96\% | PE_RI | 33.03\% | KMY_RI | 27.24\% | KMY_RI | 39.32\% | KMY_RI | 40.74\% |
| KMY_RI | 27.24\% | TPDPS_RI | 31.06\% | TPDPS_RI | 32.85\% | FGHJ_RI | 26.88\% | FGHJ_RI | 37.46\% | TPDPS_RI | 38.32\% |
| GM_RI | 18.64\% | FGHJ_RI | 26.21\% | PEG_RI | 28.73\% | GM_RI | 18.64\% | TPDPS_RI | 37.46\% | FGHJ_RI | 38.18\% |
| DKL_RI | 14.70\% | PEG_RI | 24.24\% | FGHJ_RI | 26.93\% | DKL_RI | 14.70\% | DKL_RI | 31.62\% | DKL_RI | 32.62\% |
| MPEG_RI | 14.34\% | DKL_RI | 24.06\% | DKL_RI | 26.21\% | MPEG_RI | 14.34\% | GM_RI | 29.34\% | GM_RI | 29.77\% |
| TPDPS_RI | 13.98\% | GM_RI | 22.80\% | CT_RI | 25.13\% | TPDPS_RI | 13.98\% | CT_RI | 28.21\% | CT_RI | 29.34\% |
| HL_RI | 10.04\% | CT_RI | 22.26\% | GM_RI | 22.62\% | HL_RI | 10.04\% | HL_RI | 26.07\% | HL_RI | 27.64\% |
| CT_RI | 9.32\% | HL_RI | 19.21\% | HL_RI | 20.29\% | CT_RI | 9.32\% | PEG_RI | 24.79\% | PEG_RI | 27.07\% |
| PEG_RI | 8.24\% | MPEG_RI | 15.44\% | MPEG_RI | 17.77\% | PEG_RI | 8.24\% | MPEG_RI | 19.37\% | MPEG_RI | 20.09\% |
| ETSS_RI_Ind10 | 5.38\% | ETSS_RI_Ind10 | 11.13\% | ETSS_RI_Ind10 | 12.39\% | ETSS_RI_Ind10 | 5.38\% | ETSS_RI_Ind10 | 17.09\% | ETSS_RI_Ind10 | 19.23\% |
| FPM_RI | 2.15\% | FPM_RI | 7.54\% | ETSS_RI_25SBM | 7.00\% | FPM_RI | 1.79\% | ETSS_RI_25SBM | 11.25\% | ETSS_RI_25SBM | 13.53\% |
| WNG_RI | 1.43\% | ETSS_RI_25SBM | 6.46\% | FPM_RI | 6.82\% | WNG_RI | 1.43\% | FPM_RI | 10.54\% | FPM_RI | 11.11\% |
| ETSS_RI_25SBM | 0.72\% | WNG_RI | 5.39\% | WNG_RI | 4.67\% | ETSS_RI_25SBM | 0.36\% | WNG_RI | 6.98\% | WNG_RI | 5.98\% |
| ES_RI_25SBM | 0.00\% | ES_RI_Ind10 | 4.85\% | ES_RI_Ind10 | 4.49\% | ES_RI_25SBM | 0.00\% | ES_RI_Ind10 | 3.28\% | ES_RI_Ind10 | 3.56\% |
| ES_RI_Ind10 | 0.00\% | ES_RI_25SBM | 2.51\% | ES_RI_25SBM | 1.97\% | ES_RI_Ind10 | 0.00\% | ES_RI_25SBM | 2.85\% | ES_RI_25SBM | 1.71\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of number of analysts covering the firms. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 99: Model Confidence Set Summary Results: Earnings Forecasts Standard Deviation Effect

## Panel A: Analysts

| MEV |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| RMSE |  | MAE |  |  |  |
| BP_Anlst | $43.24 \%$ | GLS_Anlst | $55.69 \%$ | PE_Anlst | $57.41 \%$ |
| PE_Anlst | $42.49 \%$ | PE_Anlst | $53.90 \%$ | GLS_Anlst | $57.01 \%$ |
| GG_Anlst | $40.67 \%$ | BP_Anlst | $51.26 \%$ | BP_Anlst | $55.56 \%$ |
| PEG_Anlst | $40.24 \%$ | MPEG_Anlst | $47.95 \%$ | OHE_Ind10 | $50.60 \%$ |
| CT_Anlst | $38.52 \%$ | OHE_Ind10 | $47.62 \%$ | MPEG_Anlst | $48.81 \%$ |
| KMY_Anlst | $37.23 \%$ | FGHJ_Anlst | $47.16 \%$ | ETSS_Anlst_Ind10 | $48.15 \%$ |
| FPM_Anlst | $37.02 \%$ | ETSS_Anlst_Ind10 | $45.11 \%$ | FGHJ_Anlst | $47.02 \%$ |
| OHE_Ind10 | $36.48 \%$ | DKL_Anlst | $44.71 \%$ | HL_Anlst | $45.70 \%$ |
| GLS_Anlst | $36.16 \%$ | HL_Anlst | $44.64 \%$ | PEG_Anlst | $45.44 \%$ |
| MPEG_Anlst | $35.52 \%$ | KMY_Anlst | $43.78 \%$ | DKL_Anlst | $45.30 \%$ |
| GM_Anlst | $34.98 \%$ | GM_Anlst | $43.45 \%$ | CT_Anlst | $45.17 \%$ |
| FGHJ_Anlst | $34.33 \%$ | PEG_Anlst | $43.25 \%$ | KMY_Anlst | $44.64 \%$ |
| DKL_Anlst | $33.37 \%$ | CT_Anlst | $42.79 \%$ | GM_Anlst | $44.44 \%$ |
| ETSS_Anlst_Ind10 | $33.26 \%$ | FPM_Anlst | $39.81 \%$ | FPM_Anlst | $41.87 \%$ |
| HL_Anlst | $32.08 \%$ | WNG_Anlst | $37.24 \%$ | OHE_25SBM | $40.28 \%$ |
| WNG_Anlst | $29.51 \%$ | Naive | $35.85 \%$ | TPDPS_Anlst | $39.55 \%$ |
| Naive | $15.99 \%$ | TPDPS_Anlst | $35.38 \%$ | Naive | $39.09 \%$ |
| TPDPS_Anlst | $15.56 \%$ | OHE_25SBM | $35.19 \%$ | WNG_Anlst | $35.71 \%$ |
| OHE_25SBM | $13.20 \%$ | GG_Anlst | $30.16 \%$ | ETSS_Anlst_25SBM | $30.75 \%$ |
| ETSS_Anlst_25SBM | $12.12 \%$ | ETSS_Anlst_25SBM | $28.77 \%$ | GG_Anlst | $30.42 \%$ |
| ES_Anlst_Ind10 | $9.01 \%$ | ES_Anlst_Ind10 | $14.81 \%$ | ES_Anlst_Ind10 | $15.61 \%$ |
| ES_Anlst_25SBM | $2.15 \%$ | ES_Anlst_25SBM | $8.27 \%$ | ES_Anlst_25SBM | $7.61 \%$ |


| MEV |  | RMSE |  |  |  |  | MAE |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: | :---: |
| BP_Anlst | $43.03 \%$ | GLS_Anlst | $55.64 \%$ | PE_Anlst | $56.76 \%$ |  |  |
| PE_Anlst | $42.92 \%$ | PE_Anlst | $53.08 \%$ | GLS_Anlst | $56.36 \%$ |  |  |
| GG_Anlst | $40.56 \%$ | BP_Anlst | $50.98 \%$ | BP_Anlst | $54.79 \%$ |  |  |
| PEG_Anlst | $40.24 \%$ | MPEG_Anlst | $47.70 \%$ | OHE_Ind10 | $49.87 \%$ |  |  |
| CT_Anlst | $38.52 \%$ | FGHJ_Anlst | $47.11 \%$ | MPEG_Anlst | $48.88 \%$ |  |  |
| FPM_Anlst | $37.02 \%$ | OHE_Ind10 | $46.52 \%$ | ETSS_Anlst_Ind10 | $47.90 \%$ |  |  |
| KMY_Anlst | $36.91 \%$ | HL_Anlst | $44.55 \%$ | FGHJ_Anlst | $46.26 \%$ |  |  |
| OHE_Ind10 | $36.37 \%$ | ETSS_Anlst_Ind10 | $44.42 \%$ | HL_Anlst | $45.28 \%$ |  |  |
| GLS_Anlst | $35.84 \%$ | DKL_Anlst | $44.29 \%$ | PEG_Anlst | $45.21 \%$ |  |  |
| MPEG_Anlst | $35.52 \%$ | GM_Anlst | $43.50 \%$ | DKL_Anlst | $45.08 \%$ |  |  |
| GM_Anlst | $34.44 \%$ | KMY_Anlst | $43.04 \%$ | CT_Anlst | $44.69 \%$ |  |  |
| FGHJ_Anlst | $34.44 \%$ | PEG_Anlst | $42.91 \%$ | KMY_Anlst | $44.23 \%$ |  |  |
| DKL_Anlst | $32.94 \%$ | CT_Anlst | $42.65 \%$ | GM_Anlst | $43.70 \%$ |  |  |
| ETSS_Anlst_Ind10 | $32.83 \%$ | FPM_Anlst | $40.22 \%$ | FPM_Anlst | $41.86 \%$ |  |  |
| HL_Anlst | $31.76 \%$ | WNG_Anlst | $36.68 \%$ | TPDPS_Anlst | $39.11 \%$ |  |  |
| WNG_Anlst | $29.08 \%$ | Naive | $36.15 \%$ | OHE_25SBM | $39.04 \%$ |  |  |
| Naive | $15.99 \%$ | TPDPS_Anlst | $35.24 \%$ | Naive | $38.78 \%$ |  |  |
| TPDPS_Anlst | $15.45 \%$ | OHE_25SBM | $34.78 \%$ | WNG_Anlst | $33.99 \%$ |  |  |
| OHE_25SBM | $13.09 \%$ | GG_Anlst | $29.53 \%$ | ETSS_Anlst_25SBM | $30.77 \%$ |  |  |
| ETSS_Anlst_25SBM | $11.91 \%$ | ETSS_Anlst_25SBM | $28.35 \%$ | GG_Anlst | $29.99 \%$ |  |  |
| ES_Anlst_Ind10 | $8.80 \%$ | ES_Anlst_Ind10 | $13.98 \%$ | ES_Anlst_Ind10 | $15.03 \%$ |  |  |
| ES_Anlst_25SBM | $2.15 \%$ | ES_Anlst_25SBM | $8.01 \%$ | ES_Anlst_25SBM | $8.14 \%$ |  |  |


| Panel B: HDZ |  |  | RMSE |  | MAE |
| :--- | ---: | :--- | ---: | :--- | ---: |
| MEV |  |  | $57.80 \%$ | PE_HDZ | $61.71 \%$ |
| PEG_HDZ | $44.97 \%$ | PE_HDZ | $54.63 \%$ | BP_HDZ | $59.59 \%$ |
| BP_HDZ | $44.28 \%$ | BP_HDZ | $53.57 \%$ | GLS_HDZ | $54.70 \%$ |
| GM_HDZ | $43.59 \%$ | GLS_HDZ | $51.12 \%$ | GG_HDZ | $54.17 \%$ |
| PE_HDZ | $43.48 \%$ | GG_HDZ | $48.41 \%$ | FGHJ_HDZ | $49.01 \%$ |
| MPEG_HDZ | $42.79 \%$ | FGHJ_HDZ | $45.97 \%$ | CT_HDZ | $47.69 \%$ |
| FPM_HDZ | $39.47 \%$ | CT_HDZ | $42.72 \%$ | KMY_HDZ | $44.31 \%$ |
| GG_HDZ | $38.79 \%$ | DKL_HDZ | $42.00 \%$ | DKL_HDZ | $43.19 \%$ |
| GLS_HDZ | $37.41 \%$ | KMY_HDZ | $40.08 \%$ | ETSS_HDZ_Ind10 | $43.06 \%$ |
| FGHJ_HDZ | $35.81 \%$ | HL_HDZ | $39.68 \%$ | TPDPS_HDZ | $42.92 \%$ |
| KMY_HDZ | $34.78 \%$ | TPDPS_HDZ | $39.62 \%$ | HL_HDZ | $41.40 \%$ |
| HL_HDZ | $34.21 \%$ | ETSS_HDZ_Ind10 | $38.36 \%$ | MPEG_HDZ | $40.01 \%$ |
| CT_HDZ | $33.18 \%$ | MPEG_HDZ | $37.17 \%$ | FPM_HDZ | $39.15 \%$ |
| DKL_HDZ | $31.81 \%$ | GM_HDZ | $37.17 \%$ | GM_HDZ | $39.09 \%$ |
| WNG_HDZ | $28.60 \%$ | FPM_HDZ | $34.99 \%$ | PEG_HDZ | $37.30 \%$ |
| ETSS_HDZ_Ind10 | $25.51 \%$ | PEG_HDZ | ETS_HDZ_25SBM | $25.86 \%$ | ETSS_HDZ_25SBM |
| TPDPS_HDZ | $17.05 \%$ | ETSS_HDZ_27.98\% |  |  |  |
| ETSS_HDZ_25SBM | $9.73 \%$ | WNG_HDZ | $25.40 \%$ | WNG_HDZ | $25.99 \%$ |
| ES_HDZ_25SBM | $1.60 \%$ | ES_HDZ_25SBM | $10.32 \%$ | ES_HDZ_25SBM | $9.33 \%$ |
| ES_HDZ_Ind10 | $1.26 \%$ | ES_HDZ_Ind10 | $8.40 \%$ | ES_HDZ_Ind10 | $7.08 \%$ |


| MEV |  |  |  |  | RMSE |  | MAE |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: | :---: |
| PEG_HDZ | $44.97 \%$ | PE_HDZ | $57.02 \%$ | PE_HDZ | $61.42 \%$ |  |  |
| BP_HDZ | $44.51 \%$ | BP_HDZ | $53.87 \%$ | BP_HDZ | $59.38 \%$ |  |  |
| GM_HDZ | $43.82 \%$ | GLS_HDZ | $53.02 \%$ | GLS_HDZ | $54.33 \%$ |  |  |
| PE_HDZ | $43.36 \%$ | GG_HDZ | $50.20 \%$ | GG_HDZ | $53.15 \%$ |  |  |
| MPEG_HDZ | $42.79 \%$ | FGHJ_HDZ | $47.83 \%$ | FGHJ_HDZ | $48.75 \%$ |  |  |
| FPM_HDZ | $39.59 \%$ | CT_HDZ | $44.95 \%$ | CT_HDZ | $47.18 \%$ |  |  |
| GG_HDZ | $39.13 \%$ | DKL_HDZ | $41.67 \%$ | KMY_HDZ | $43.50 \%$ |  |  |
| GLS_HDZ | $37.41 \%$ | KMY_HDZ | $41.67 \%$ | DKL_HDZ | $43.11 \%$ |  |  |
| FGHJ_HDZ | $36.04 \%$ | ETSS_HDZ_Ind10 | $39.57 \%$ | ETSS_HDZ_Ind10 | $42.59 \%$ |  |  |
| KMY_HDZ | $34.44 \%$ | HL_HDZ | $38.98 \%$ | TPDPS_HDZ | $41.93 \%$ |  |  |
| HL_HDZ | $34.21 \%$ | TPDPS_HDZ | $38.39 \%$ | HL_HDZ | $40.75 \%$ |  |  |
| CT_HDZ | $33.30 \%$ | MPEG_HDZ | $37.60 \%$ | MPEG_HDZ | $39.83 \%$ |  |  |
| DKL_HDZ | $31.81 \%$ | GM_HDZ | $36.42 \%$ | GM_HDZ | $38.78 \%$ |  |  |
| WNG_HDZ | $28.72 \%$ | FPM_HDZ | $36.15 \%$ | FPM_HDZ | $38.12 \%$ |  |  |
| ETSS_HDZ_Ind10 | $25.29 \%$ | PEG_HDZ | $34.12 \%$ | PEG_HDZ | $37.14 \%$ |  |  |
| TPDPS_HDZ | $16.82 \%$ | WNG_HDZ | $24.87 \%$ | ETSS_HDZ_25SBM | $27.17 \%$ |  |  |
| ETSS_HDZ_25SBM | $9.84 \%$ | ETSS_HDZ_25SBM | $24.08 \%$ | WNG_HDZ | $25.85 \%$ |  |  |
| ES_HDZ_25SBM | $1.60 \%$ | ES_HDZ_25SBM | $9.97 \%$ | ES_HDZ_25SBM | $9.38 \%$ |  |  |
| ES_HDZ_Ind10 | $1.14 \%$ | ES_HDZ_Ind10 | $8.01 \%$ | ES_HDZ_Ind10 | $7.09 \%$ |  |  |

Continued in next page..

Table 99: Model Confidence Set Summary Results: Earnings Forecasts Standard Deviation Effect, Continued
First Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 58.45\% | BP_RW | 67.26\% | GG_RW | 69.64\% | BP_RW | 58.45\% | BP_RW | 67.13\% | GG_RW | 69.16\% |
| GG_RW | 36.33\% | GG_RW | 67.20\% | BP_RW | 68.12\% | GG_RW | 36.33\% | GG_RW | 66.80\% | BP_RW | 68.37\% |
| KMY_RW | 34.60\% | CT_RW | 54.43\% | CT_RW | 54.89\% | KMY_RW | 34.60\% | CT_RW | 53.67\% | CT_RW | 54.40\% |
| GM_RW | 24.80\% | FGHJ_RW | 46.96\% | FGHJ_RW | 49.34\% | GM_RW | 24.96\% | FGHJ_RW | 46.98\% | FGHJ_RW | 49.08\% |
| CT_RW | 19.12\% | KMY_RW | 46.03\% | KMY_RW | 46.23\% | CT_RW | 19.27\% | KMY_RW | 45.21\% | KMY_RW | 46.39\% |
| FGHJ_RW | 18.48\% | DKL_RW | 40.61\% | GLS_RW | 41.53\% | FGHJ_RW | 18.80\% | GLS_RW | 39.57\% | GLS_RW | 41.08\% |
| HL_RW | 16.75\% | GLS_RW | 39.81\% | DKL_RW | 40.08\% | HL_RW | 16.75\% | DKL_RW | 39.44\% | DKL_RW | 39.70\% |
| MPEG_RW | 16.27\% | GM_RW | 35.52\% | GM_RW | 34.72\% | MPEG_RW | 16.27\% | GM_RW | 34.32\% | GM_RW | 34.78\% |
| DKL_RW | 15.96\% | HL_RW | 35.12\% | HL_RW | 33.66\% | DKL_RW | 15.96\% | HL_RW | 34.06\% | HL_RW | 33.66\% |
| GLS_RW | 13.74\% | TPDPS_RW | 29.30\% | TPDPS_RW | 30.09\% | GLS_RW | 13.74\% | TPDPS_RW | 28.28\% | TPDPS_RW | 29.86\% |
| PE_RW | 10.58\% | MPEG_RW | 26.65\% | MPEG_RW | 26.92\% | PE_RW | 10.58\% | MPEG_RW | 25.46\% | MPEG_RW | 26.64\% |
| PEG_RW | 10.43\% | PEG_RW | 26.06\% | PEG_RW | 25.66\% | PEG_RW | 10.43\% | PEG_RW | 24.80\% | PEG_RW | 25.52\% |
| TPDPS_RW | 10.43\% | ES_RW_Ind10 | 20.63\% | ES_RW_Ind10 | 21.16\% | TPDPS_RW | 10.43\% | ES_RW_Ind10 | 19.49\% | ES_RW_Ind10 | 20.73\% |
| ETSS_RW_Ind10 | 3.16\% | PE_RW | 18.72\% | PE_RW | 17.20\% | ETSS_RW_Ind10 | 3.32\% | PE_RW | 17.72\% | PE_RW | 17.32\% |
| ES_RW_Ind10 | 2.69\% | ETSS_RW_Ind10 | 16.34\% | ETSS_RW_Ind10 | 15.34\% | ES_RW_Ind10 | 2.69\% | ETSS_RW_Ind10 | 15.16\% | ETSS_RW_Ind10 | 14.83\% |
| WNG_RW | 2.69\% | ETSS_RW_25SBM | 13.62\% | ETSS_RW_25SBM | 11.77\% | WNG_RW | 2.69\% | ETSS_RW_25SBM | 12.53\% | ETSS_RW_25SBM | 11.22\% |
| FPM_RW | 1.90\% | ES_RW_25SBM | 10.85\% | ES_RW_25SBM | 9.72\% | FPM_RW | 1.90\% | ES_RW_25SBM | 10.63\% | ES_RW_25SBM | 9.38\% |
| ETSS_RW_25SBM | 1.90\% | FPM_RW | 10.05\% | FPM_RW | 8.73\% | ETSS_RW_25SBM | 1.90\% | FPM_RW | 8.60\% | FPM_RW | 8.01\% |
| ES_RW_25SBM | 0.32\% | WNG_RW | 8.66\% | WNG_RW | 4.56\% | ES_RW_25SBM | 0.32\% | WNG_RW | 8.01\% | WNG_RW | 4.53\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 57.11\% | BP_EP | 64.81\% | BP_EP | 66.73\% | BP_EP | 57.11\% | BP_EP | 65.16\% | BP_EP | 67.19\% |
| PE_EP | 42.64\% | GG_EP | 56.75\% | GG_EP | 57.41\% | PE_EP | 42.25\% | GG_EP | 57.28\% | GG_EP | 58.27\% |
| GLS_EP | 35.01\% | KMY_EP | 50.26\% | KMY_EP | 51.92\% | GLS_EP | 34.88\% | KMY_EP | 51.31\% | KMY_EP | 51.97\% |
| GM_EP | 35.01\% | CT_EP | 43.52\% | CT_EP | 44.97\% | GM_EP | 34.88\% | CT_EP | 44.42\% | CT_EP | 44.95\% |
| FGHJ_EP | 34.88\% | PE_EP | 41.01\% | PE_EP | 43.52\% | FGHJ_EP | 34.50\% | PE_EP | 41.08\% | PE_EP | 42.59\% |
| DKL_EP | 31.40\% | GLS_EP | 37.63\% | GLS_EP | 38.16\% | DKL_EP | 31.40\% | GLS_EP | 37.53\% | GLS_EP | 37.86\% |
| KMY_EP | 31.01\% | DKL_EP | 35.91\% | DKL_EP | 36.90\% | KMY_EP | 30.88\% | DKL_EP | 36.75\% | DKL_EP | 37.20\% |
| HL_EP | 30.36\% | FGHJ_EP | 32.61\% | TPDPS_EP | 34.19\% | HL_EP | 30.10\% | FGHJ_EP | 32.94\% | TPDPS_EP | 34.91\% |
| MPEG_EP | 29.97\% | TPDPS_EP | 31.42\% | FGHJ_EP | 33.66\% | MPEG_EP | 29.72\% | TPDPS_EP | 32.02\% | FGHJ_EP | 34.25\% |
| GG_EP | 25.45\% | HL_EP | 26.98\% | GM_EP | 29.50\% | GG_EP | 25.19\% | HL_EP | 27.82\% | GM_EP | 30.12\% |
| PEG_EP | 24.94\% | GM_EP | 26.79\% | HL_EP | 28.31\% | PEG_EP | 25.06\% | GM_EP | 26.97\% | HL_EP | 28.35\% |
| CT_EP | 22.09\% | PEG_EP | 22.42\% | PEG_EP | 25.93\% | CT_EP | 21.96\% | PEG_EP | 23.29\% | PEG_EP | 26.05\% |
| TPDPS_EP | 16.41\% | MPEG_EP | 17.79\% | MPEG_EP | 18.92\% | TPDPS_EP | 16.28\% | MPEG_EP | 18.44\% | MPEG_EP | 19.09\% |
| ETSS_EP_Ind10 | 7.49\% | ETSS_EP_Ind10 | 12.24\% | ETSS_EP_Ind10 | 12.10\% | ETSS_EP_Ind10 | 7.36\% | ETSS_EP_Ind10 | 11.88\% | ETSS_EP_Ind10 | 11.94\% |
| FPM_EP | 6.85\% | FPM_EP | 7.28\% | FPM_EP | 7.54\% | FPM_EP | 6.85\% | FPM_EP | 8.20\% | FPM_EP | 7.55\% |
| ETSS_EP_25SBM | 3.75\% | ETSS_EP_25SBM | 6.48\% | ES_EP_Ind10 | 6.35\% | ETSS_EP_25SBM | 4.13\% | ES_EP_Ind10 | 6.89\% | ES_EP_Ind10 | 5.84\% |
| ES_EP_Ind10 | 1.55\% | ES_EP_Ind10 | 6.22\% | ETSS_EP_25SBM | 6.02\% | ES_EP_Ind10 | 1.55\% | ETSS_EP_25SBM | 6.56\% | ETSS_EP_25SBM | 5.18\% |
| WNG_EP | 1.29\% | WNG_EP | 3.77\% | WNG_EP | 3.04\% | WNG_EP | 1.29\% | WNG_EP | 4.66\% | WNG_EP | 3.61\% |
| ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.78\% | ES_EP_25SBM | 1.46\% | ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.89\% | ES_EP_25SBM | 1.31\% |

Table 99: Model Confidence Set Summary Results: Earnings Forecasts Standard Deviation Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  | MEV |  | RMSE |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | MAE |
| BP_RI | 61.74\% | BP_RI | 67.53\% | BP_RI | 68.65\% | BP_RI | 61.74\% |  |  | BP_RI | 67.26\% | BP_RI | 68.77\% |
| PE_RI | 45.78\% | GG_RI | 57.74\% | GG_RI | 58.86\% | PE_RI | 45.78\% | GG_RI | 56.82\% | GG_RI | 58.40\% |
| GG_RI | 41.25\% | PE_RI | 46.76\% | KMY_RI | 47.09\% | GG_RI | 41.12\% | KMY_RI | 45.28\% | KMY_RI | 46.39\% |
| FGHJ_RI | 37.09\% | KMY_RI | 46.69\% | PE_RI | 46.10\% | FGHJ_RI | 36.84\% | PE_RI | 45.01\% | PE_RI | 45.08\% |
| GLS_RI | 36.58\% | GLS_RI | 41.73\% | GLS_RI | 44.44\% | GLS_RI | 36.45\% | GLS_RI | 40.62\% | GLS_RI | 43.37\% |
| KMY_RI | 30.22\% | TPDPS_RI | 38.29\% | TPDPS_RI | 39.81\% | KMY_RI | 29.96\% | TPDPS_RI | 37.99\% | TPDPS_RI | 39.57\% |
| GM_RI | 23.48\% | FGHJ_RI | 37.17\% | FGHJ_RI | 38.96\% | GM_RI | 23.22\% | FGHJ_RI | 36.22\% | FGHJ_RI | 38.19\% |
| DKL_RI | 19.46\% | DKL_RI | 32.21\% | DKL_RI | 33.00\% | DKL_RI | 19.33\% | DKL_RI | 30.64\% | DKL_RI | 32.28\% |
| TPDPS_RI | 18.29\% | GM_RI | 28.57\% | GM_RI | 29.76\% | TPDPS_RI | 17.90\% | CT_RI | 27.49\% | GM_RI | 29.13\% |
| MPEG_RI | 17.25\% | CT_RI | 28.11\% | CT_RI | 28.64\% | MPEG_RI | 17.12\% | GM_RI | 27.10\% | CT_RI | 28.94\% |
| HL_RI | 15.30\% | HL_RI | 26.72\% | HL_RI | 27.65\% | HL_RI | 15.18\% | HL_RI | 25.33\% | HL_RI | 26.97\% |
| PEG_RI | 11.93\% | PEG_RI | 25.00\% | PEG_RI | 26.92\% | PEG_RI | 11.93\% | PEG_RI | 24.15\% | PEG_RI | 26.57\% |
| CT_RI | 10.64\% | MPEG_RI | 19.84\% | MPEG_RI | 20.63\% | CT_RI | 10.38\% | MPEG_RI | 18.90\% | MPEG_RI | 20.08\% |
| ETSS_RI_Ind10 | 4.54\% | ETSS_RI_Ind10 | 14.02\% | ETSS_RI_Ind10 | 14.42\% | ETSS_RI_Ind 10 | 4.67\% | ETSS_RI_Ind10 | 13.06\% | ETSS_RI_Ind10 | 14.04\% |
| FPM_RI | 2.72\% | FPM_RI | 10.98\% | FPM_RI | 11.11\% | FPM_RI | 2.85\% | FPM_RI | 10.76\% | FPM_RI | 10.76\% |
| ETSS_RI_25SBM | 1.82\% | ETSS_RI_25SBM | 9.72\% | ETSS_RI_25SBM | 10.05\% | ETSS_RI_25SBM | 1.95\% | ETSS_RI_25SBM | 8.92\% | ETSS_RI_25SBM | 9.06\% |
| WNG_RI | 1.04\% | ES_RI_Ind10 | 4.96\% | WNG_RI | 3.37\% | WNG_RI | 1.04\% | WNG_RI | 4.86\% | WNG_RI | 3.41\% |
| ES_RI_Ind10 | 0.65\% | WNG_RI | 4.83\% | ES_RI_Ind10 | 3.11\% | ES_RI_Ind10 | 0.65\% | ES_RI_Ind10 | 4.79\% | ES_RI_Ind10 | 2.95\% |
| ES_RI_25SBM | 0.13\% | ES_RI_25SBM | 3.44\% | ES_RI_25SBM | 1.46\% | ES_RI_25SBM | 0.26\% | ES_RI_25SBM | 3.41\% | ES_RI_25SBM | 1.31\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of the standard deviation of earnings forecasts. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 100: Model Confidence Set Summary Results: Earnings Forecasts Coefficient of Variation Effect

| First Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Panel A: Analysts |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |
| GG_Anlst | 24.53\% | PE_Anlst | 48.92\% | PE_Anlst | 50.65\% |
| OHE_Ind10 | 22.67\% | BP_Anlst | 47.97\% | BP_Anlst | 48.23\% |
| PE_Anlst | 21.33\% | GLS_Anlst | 47.63\% | GLS_Anlst | 47.63\% |
| BP_Anlst | 21.33\% | OHE_Ind10 | 46.07\% | OHE_Ind10 | 46.68\% |
| WNG_Anlst | 21.33\% | FGHJ_Anlst | 44.09\% | ETSS_Anlst_Ind10 | 44.52\% |
| PEG_Anlst | 21.07\% | MPEG_Anlst | 43.57\% | MPEG_Anlst | 43.31\% |
| ETSS_Anlst_Ind10 | 20.27\% | ETSS_Anlst_Ind10 | 42.28\% | FGHJ_Anlst | 42.97\% |
| FPM_Anlst | 19.73\% | DKL_Anlst | 41.07\% | OHE_25SBM | 42.97\% |
| CT_Anlst | 16.80\% | OHE_25SBM | 40.72\% | DKL_Anlst | 40.90\% |
| KMY_Anlst | 16.00\% | HL_Anlst | 40.55\% | KMY_Anlst | 40.90\% |
| MPEG_Anlst | 14.67\% | GM_Anlst | 40.12\% | PEG_Anlst | 40.81\% |
| GLS_Anlst | 14.40\% | PEG_Anlst | 40.12\% | HL_Anlst | 39.95\% |
| GM_Anlst | 13.60\% | KMY_Anlst | 39.69\% | CT_Anlst | 39.69\% |
| FGHJ_Anlst | 13.60\% | CT_Anlst | 38.83\% | GM_Anlst | 39.69\% |
| DKL_Anlst | 11.20\% | FPM_Anlst | 38.74\% | FPM_Anlst | 38.05\% |
| OHE_25SBM | 10.93\% | WNG_Anlst | 36.24\% | Naive | 34.77\% |
| HL_Anlst | 9.87\% | Naive | 34.34\% | TPDPS_Anlst | 34.51\% |
| ETSS_Anlst_25SBM | 9.60\% | TPDPS_Anlst | 33.82\% | WNG_Anlst | 34.08\% |
| Naive | 8.80\% | GG_Anlst | 30.37\% | ETSS_Anlst_25SBM | 31.23\% |
| TPDPS_Anlst | 6.93\% | ETSS_Anlst_25SBM | 29.68\% | GG_Anlst | 31.15\% |
| ES_Anlst_Ind10 | 5.33\% | ES_Anlst_Ind10 | 17.00\% | ES_Anlst_Ind10 | 16.31\% |
| ES_Anlst_25SBM | 1.87\% | ES_Anlst_25SBM | 9.84\% | ES_Anlst_25SBM | 8.71\% |


| MEV |  | RMSE |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| GG_Anlst | $24.53 \%$ | BP_Anlst | $47.29 \%$ | BP_Anlst | MAE |
| OHE_Ind10 | $22.13 \%$ | PE_Anlst | $44.22 \%$ | OHE_Ind10 | $49.85 \%$ |
| BP_Anlst | $21.33 \%$ | OHE_Ind10 | $43.50 \%$ | PE_Anlst | $44.93 \%$ |
| WNG_Anlst | $21.33 \%$ | GLS_Anlst | $41.35 \%$ | OHE_25SBM | $42.37 \%$ |
| PE_Anlst | $21.07 \%$ | ETSS_Anlst_Ind10 | $41.04 \%$ | ETSS_Anlst_Ind10 | $41.97 \%$ |
| PEG_Anlst | $20.80 \%$ | MPEG_Anlst | $40.84 \%$ | PEG_Anlst | $40.63 \%$ |
| FPM_Anlst | $20.00 \%$ | PEG_Anlst | $40.63 \%$ | MPEG_Anlst | $40.43 \%$ |
| ETSS_Anlst_Ind10 | $20.00 \%$ | HL_Anlst | $37.67 \%$ | GLS_Anlst | $38.59 \%$ |
| CT_Anlst | $17.07 \%$ | GM_Anlst | $37.15 \%$ | KMY_Anlst | $37.67 \%$ |
| KMY_Anlst | $16.00 \%$ | OHE_25SBM | $37.15 \%$ | GM_Anlst | $36.34 \%$ |
| MPEG_Anlst | $14.40 \%$ | KMY_Anlst | $36.75 \%$ | Naive | $36.23 \%$ |
| GLS_Anlst | $14.13 \%$ | FGHJ_Anlst | $36.23 \%$ | HL_Anlst | $35.52 \%$ |
| GM_Anlst | $13.87 \%$ | DKL_Anlst | $36.23 \%$ | DKL_Anlst | $35.21 \%$ |
| FGHJ_Anlst | $13.33 \%$ | Naive | $36.13 \%$ | ETSS_Anlst_25SBM | $35.01 \%$ |
| DKL_Anlst | $11.47 \%$ | CT_Anlst | $35.21 \%$ | FGHJ_Anlst | $34.19 \%$ |
| OHE_25SBM | $10.93 \%$ | GG_Anlst | $34.49 \%$ | CT_Anlst | $33.57 \%$ |
| HL_Anlst | $9.60 \%$ | FPM_Anlst | $34.29 \%$ | TPDPS_Anlst | $33.57 \%$ |
| ETSS_Anlst_25SBM | $9.60 \%$ | TPDPS_Anlst | $32.86 \%$ | GG_Anlst | $33.37 \%$ |
| Naive | $8.80 \%$ | WNG_Anlst | $32.65 \%$ | FPM_Anlst | $33.27 \%$ |
| TPDPS_Anlst | $6.93 \%$ | ETSS_Anlst_25SBM | $32.24 \%$ | WNG_Anlst | $29.27 \%$ |
| ES_Anlst_Ind10 | $5.33 \%$ | ES_Anlst_Ind10 | $17.50 \%$ | ES_Anlst_Ind10 | $17.30 \%$ |
| ES_Anlst_25SBM | $1.87 \%$ | ES_Anlst_25SBM | $9.11 \%$ | ES_Anlst_25SBM | $7.68 \%$ |


| Panel B: HDZ | MEV |  |  |  |  |
| :--- | ---: | :--- | :--- | :--- | ---: |
| RMSE |  | MAE |  |  |  |
| PEG_HDZ | $30.70 \%$ | BP_HDZ | $53.32 \%$ | BP_HDZ | $53.75 \%$ |
| PE_HDZ | $24.32 \%$ | PE_HDZ | $51.34 \%$ | PE_HDZ | $52.72 \%$ |
| GM_HDZ | $24.01 \%$ | GG_HDZ | $47.37 \%$ | GG_HDZ | $48.66 \%$ |
| MPEG_HDZ | $23.10 \%$ | GLS_HDZ | $46.07 \%$ | GLS_HDZ | $47.02 \%$ |
| GLS_HDZ | $20.97 \%$ | FGHJ_HDZ | $44.26 \%$ | FGHJ_HDZ | $45.13 \%$ |
| BP_HDZ | $20.06 \%$ | CT_HDZ | $40.90 \%$ | CT_HDZ | $42.36 \%$ |
| FPM_HDZ | $19.76 \%$ | ETSS_HDZ_Ind10 | $40.03 \%$ | ETSS_HDZ_Ind10 | $41.93 \%$ |
| WNG_HDZ | $19.76 \%$ | TPDPS_HDZ | $39.52 \%$ | TPDPS_HDZ | $41.93 \%$ |
| GG_HDZ | $18.54 \%$ | KMY_HDZ | $38.91 \%$ | DKL_HDZ | $40.21 \%$ |
| FGHJ_HDZ | $17.93 \%$ | DKL_HDZ | $38.65 \%$ | KMY_HDZ | $39.43 \%$ |
| CT_HDZ | $15.81 \%$ | HL_HDZ | $37.27 \%$ | HL_HDZ | $38.14 \%$ |
| ETSS_HDZ_Ind10 | $14.29 \%$ | MPEG_HDZ | $37.01 \%$ | MPEG_HDZ | $37.79 \%$ |
| HL_HDZ | $13.68 \%$ | FPM_HDZ | $36.32 \%$ | PEG_HDZ | $37.79 \%$ |
| DKL_HDZ | $13.37 \%$ | PEG_HDZ | $36.24 \%$ | FPM_HDZ | $37.45 \%$ |
| KMY_HDZ | $13.37 \%$ | GM_HDZ | $36.15 \%$ | GM_HDZ | $36.50 \%$ |
| TPDPS_HDZ | $9.42 \%$ | ETSS_HDZ_25SBM | $28.21 \%$ | ETSS_HDZ_25SBM | $30.46 \%$ |
| ETSS_HDZ_25SBM | $8.21 \%$ | WNG_HDZ | $26.06 \%$ | WNG_HDZ | $26.49 \%$ |
| ES_HDZ_25SBM | $2.13 \%$ | ES_HDZ_25SBM | $13.81 \%$ | ES_HDZ_25SBM | $12.17 \%$ |
| ES_HDZ_Ind10 | $0.61 \%$ | ES_HDZ_Ind10 | $10.61 \%$ | ES_HDZ_Ind10 | $8.54 \%$ |


| MEV |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
|  |  |  | RMSE |  |  |
| PEG_HDZ | $30.70 \%$ | BP_HDZ | $52.92 \%$ | BP_HDZ | $55.58 \%$ |
| PE_HDZ | $24.62 \%$ | PE_HDZ | $51.38 \%$ | PE_HDZ | $53.53 \%$ |
| GM_HDZ | $24.32 \%$ | GLS_HDZ | $41.76 \%$ | GLS_HDZ | $43.71 \%$ |
| MPEG_HDZ | $23.10 \%$ | ETSS_HDZ_Ind10 | $40.43 \%$ | ETSS_HDZ_Ind10 | $42.37 \%$ |
| GLS_HDZ | $21.28 \%$ | GG_HDZ | $40.12 \%$ | GG_HDZ | $41.86 \%$ |
| BP_HDZ | $20.06 \%$ | FGHJ_HDZ | $39.41 \%$ | FGHJ_HDZ | $39.71 \%$ |
| FPM_HDZ | $19.76 \%$ | TPDPS_HDZ | $37.26 \%$ | TPDPS_HDZ | $39.20 \%$ |
| WNG_HDZ | $19.76 \%$ | CT_HDZ | $35.11 \%$ | CT_HDZ | $35.93 \%$ |
| GG_HDZ | $18.54 \%$ | PEG_HDZ | $33.98 \%$ | MPEG_HDZ | $34.60 \%$ |
| FGHJ_HDZ | $17.93 \%$ | FPM_HDZ | $33.16 \%$ | PEG_HDZ | $34.60 \%$ |
| CT_HDZ | $15.81 \%$ | MPEG_HDZ | $33.06 \%$ | DKL_HDZ | $34.08 \%$ |
| ETSS_HDZ_Ind10 | $14.59 \%$ | GM_HDZ | $32.96 \%$ | KMY_HDZ | $33.67 \%$ |
| HL_HDZ | $13.98 \%$ | DKL_HDZ | $32.96 \%$ | GM_HDZ | $33.37 \%$ |
| KMY_HDZ | $13.68 \%$ | KMY_HDZ | $32.96 \%$ | HL_HDZ | $33.37 \%$ |
| DKL_HDZ | $13.37 \%$ | HL_HDZ | $32.86 \%$ | FPM_HDZ | $32.55 \%$ |
| TPDPS_HDZ | $9.73 \%$ | ETSS_HDZ_25SBM | $29.48 \%$ | ETSS_HDZ_25SBM | $29.17 \%$ |
| ETSS_HDZ_25SBM | $8.51 \%$ | WNG_HDZ | $24.67 \%$ | WNG_HDZ | $25.59 \%$ |
| ES_HDZ_25SBM | $2.43 \%$ | ES_HDZ_Ind10 | $11.16 \%$ | ES_HDZ_Ind10 | $9.42 \%$ |
| ES_HDZ_Ind10 | $0.61 \%$ | ES_HDZ_25SBM | $10.54 \%$ | ES_HDZ_25SBM | $8.09 \%$ |

Continued in next page..

Table 100: Model Confidence Set Summary Results: Earnings Forecasts Coefficient of Variation Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  | MEV |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | RMSE |  | MAE |  |
| BP_RW | 42.86\% | BP_RW | 62.30\% | GG_RW | 60.83\% | BP_RW | 42.86\% | BP_RW | 59.98\% | BP_RW | 59.47\% |
| GG_RW | 24.42\% | GG_RW | 61.00\% | BP_RW | 60.57\% | GG_RW | 24.42\% | GG_RW | 51.18\% | GG_RW | 51.18\% |
| KMY_RW | 18.89\% | CT_RW | 51.86\% | CT_RW | 51.08\% | KMY_RW | 18.43\% | FGHJ_RW | 42.68\% | CT_RW | 43.50\% |
| CT_RW | 16.59\% | FGHJ_RW | 44.69\% | FGHJ_RW | 45.99\% | CT_RW | 16.59\% | CT_RW | 42.17\% | FGHJ_RW | 42.68\% |
| DKL_RW | 14.75\% | KMY_RW | 41.76\% | KMY_RW | 39.52\% | DKL_RW | 14.75\% | KMY_RW | 41.56\% | GLS_RW | 41.04\% |
| GM_RW | 12.44\% | GLS_RW | 37.96\% | GLS_RW | 37.88\% | GM_RW | 12.44\% | GLS_RW | 40.23\% | KMY_RW | 40.23\% |
| FGHJ_RW | 11.98\% | DKL_RW | 35.63\% | DKL_RW | 34.69\% | FGHJ_RW | 11.98\% | DKL_RW | 38.08\% | DKL_RW | 37.97\% |
| HL_RW | 11.06\% | HL_RW | 32.87\% | GM_RW | $33.22 \%$ | HL_RW | 11.06\% | HL_RW | 33.47\% | HL_RW | 33.67\% |
| GLS_RW | 9.22\% | GM_RW | 32.79\% | HL_RW | 32.36\% | GLS_RW | 9.22\% | GM_RW | 31.53\% | GM_RW | 32.34\% |
| MPEG_RW | 8.76\% | TPDPS_RW | 28.99\% | TPDPS_RW | 26.23\% | MPEG_RW | 8.76\% | PEG_RW | 28.66\% | PEG_RW | 28.66\% |
| PEG_RW | 7.83\% | MPEG_RW | 24.25\% | MPEG_RW | 24.85\% | TPDPS_RW | 7.83\% | MPEG_RW | 25.90\% | ES_RW_Ind10 | 26.82\% |
| TPDPS_RW | 7.83\% | PEG_RW | 23.81\% | ES_RW_Ind10 | 22.86\% | PEG_RW | 7.37\% | TPDPS_RW | 25.08\% | MPEG_RW | 26.51\% |
| PE_RW | 6.45\% | ES_RW_Ind10 | 23.55\% | PEG_RW | 22.00\% | PE_RW | 6.45\% | ES_RW_Ind10 | 24.26\% | TPDPS_RW | 25.69\% |
| ES_RW_Ind10 | 2.76\% | PE_RW | 20.79\% | PE_RW | 21.05\% | ES_RW_Ind10 | 2.76\% | PE_RW | 23.03\% | PE_RW | 22.31\% |
| ETSS_RW_Ind10 | 2.76\% | ETSS_RW_Ind10 | 18.81\% | ETSS_RW_Ind10 | 15.88\% | ETSS_RW_Ind10 | 2.76\% | ETSS_RW_Ind10 | 19.96\% | ETSS_RW_Ind10 | 20.98\% |
| WNG_RW | 2.76\% | ES_RW_25SBM | 15.10\% | ES_RW_25SBM | 12.08\% | WNG_RW | 2.76\% | FPM_RW | 14.43\% | FPM_RW | 14.12\% |
| ETSS_RW_25SBM | 2.30\% | ETSS_RW_25SBM | 14.75\% | ETSS_RW_25SBM | 11.30\% | ETSS_RW_25SBM | 2.30\% | ETSS_RW_25SBM | 13.41\% | ETSS_RW_25SBM | 13.61\% |
| FPM_RW | 0.92\% | FPM_RW | 12.17\% | FPM_RW | 10.18\% | FPM_RW | 0.92\% | WNG_RW | 10.24\% | ES_RW_25SBM | 8.09\% |
| ES_RW_25SBM | 0.00\% | WNG_RW | 11.30\% | WNG_RW | 6.30\% | ES_RW_25SBM | 0.00\% | ES_RW_25SBM | 9.62\% | WNG_RW | 7.98\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 39.58\% | BP_EP | 60.05\% | BP_EP | 61.43\% | BP_EP | 39.58\% | BP_EP | 56.81\% | BP_EP | 56.91\% |
| PE_EP | 35.07\% | GG_EP | 58.67\% | GG_EP | 60.22\% | PE_EP | 35.07\% | GG_EP | 45.96\% | GG_EP | 46.88\% |
| FGHJ_EP | 24.31\% | KMY_EP | 50.22\% | KMY_EP | 49.96\% | FGHJ_EP | 24.31\% | KMY_EP | 37.36\% | CT_EP | 38.38\% |
| GLS_EP | 19.79\% | PE_EP | 43.74\% | PE_EP | 43.74\% | GLS_EP | 19.79\% | CT_EP | 37.05\% | KMY_EP | 37.46\% |
| MPEG_EP | 17.01\% | CT_EP | 42.28\% | CT_EP | 43.40\% | MPEG_EP | 17.01\% | PE_EP | 35.21\% | PE_EP | 36.13\% |
| GM_EP | 15.28\% | GLS_EP | 36.50\% | TPDPS_EP | 35.89\% | GM_EP | 15.63\% | GLS_EP | 30.91\% | GLS_EP | 30.60\% |
| DKL_EP | 13.89\% | TPDPS_EP | 35.63\% | GLS_EP | 35.72\% | DKL_EP | 13.89\% | DKL_EP | 30.60\% | DKL_EP | 29.89\% |
| GG_EP | 13.19\% | DKL_EP | 35.03\% | DKL_EP | 34.08\% | GG_EP | 13.19\% | FGHJ_EP | 28.15\% | FGHJ_EP | 28.56\% |
| KMY_EP | 13.19\% | FGHJ_EP | 33.48\% | FGHJ_EP | 31.49\% | KMY_EP | 13.19\% | PEG_EP | 26.31\% | PEG_EP | 28.25\% |
| HL_EP | 12.50\% | HL_EP | 29.16\% | GM_EP | 29.59\% | HL_EP | 12.50\% | TPDPS_EP | 26.20\% | TPDPS_EP | 26.41\% |
| PEG_EP | 12.15\% | GM_EP | 27.78\% | HL_EP | 28.39\% | PEG_EP | 12.15\% | HL_EP | 24.67\% | HL_EP | 24.77\% |
| CT_EP | 11.11\% | PEG_EP | 25.28\% | PEG_EP | 28.04\% | CT_EP | 11.46\% | GM_EP | 24.36\% | GM_EP | 24.16\% |
| TPDPS_EP | 5.90\% | MPEG_EP | 19.24\% | MPEG_EP | 20.10\% | TPDPS_EP | 5.90\% | MPEG_EP | 18.22\% | MPEG_EP | 18.42\% |
| ETSS_EP_Ind10 | 5.21\% | ETSS_EP_Ind10 | 16.39\% | ETSS_EP_Ind10 | 15.79\% | ETSS_EP_Ind10 | 5.21\% | ETSS_EP_Ind10 | 17.30\% | ETSS_EP_Ind10 | 18.01\% |
| FPM_EP | 3.47\% | WNG_EP | 10.01\% | FPM_EP | 9.40\% | FPM_EP | 3.47\% | FPM_EP | 12.08\% | FPM_EP | 11.77\% |
| ETSS_EP_25SBM | 2.43\% | FPM_EP | 9.75\% | ES_EP_Ind10 | 8.54\% | ETSS_EP_25SBM | 2.43\% | ES_EP_Ind10 | 8.70\% | ES_EP_Ind10 | 8.39\% |
| WNG_EP | 1.04\% | ES_EP_Ind10 | 9.49\% | WNG_EP | 7.16\% | WNG_EP | 1.04\% | WNG_EP | 7.16\% | WNG_EP | 7.06\% |
| ES_EP_25SBM | 0.00\% | ETSS_EP_25SBM | 8.89\% | ETSS_EP_25SBM | 7.08\% | ES_EP_25SBM | 0.00\% | ETSS_EP_25SBM | 7.06\% | ETSS_EP_25SBM | 6.14\% |
| ES_EP_Ind10 | 0.00\% | ES_EP_25SBM | 6.21\% | ES_EP_25SBM | 2.93\% | ES_EP_Ind10 | 0.00\% | ES_EP_25SBM | 2.87\% | ES_EP_25SBM | 1.74\% |

Continued in next page..

Table 100: Model Confidence Set Summary Results: Earnings Forecasts Coefficient of Variation Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 42.72\% | BP_RI | 62.04\% | BP_RI | 62.38\% | BP_RI | 42.72\% | BP_RI | 60.29\% | BP_RI | 61.11\% |
| PE_RI | 31.13\% | GG_RI | 58.67\% | GG_RI | 59.19\% | PE_RI | 31.13\% | GG_RI | 48.21\% | GG_RI | 47.49\% |
| GG_RI | 27.15\% | KMY_RI | 46.16\% | KMY_RI | 46.25\% | GG_RI | 27.15\% | KMY_RI | 37.15\% | KMY_RI | 38.69\% |
| FGHJ_RI | 20.53\% | PE_RI | 44.43\% | PE_RI | 43.83\% | FGHJ_RI | 20.20\% | GLS_RI | 35.21\% | GLS_RI | 35.11\% |
| GLS_RI | 19.54\% | GLS_RI | 42.36\% | GLS_RI | 41.93\% | GLS_RI | 19.54\% | PE_RI | 35.01\% | PE_RI | 33.16\% |
| GM_RI | 15.89\% | TPDPS_RI | 40.55\% | TPDPS_RI | 41.93\% | GM_RI | 15.89\% | TPDPS_RI | 30.19\% | PEG_RI | 31.83\% |
| KMY_RI | 15.56\% | FGHJ_RI | 36.32\% | FGHJ_RI | 37.79\% | KMY_RI | 15.56\% | FGHJ_RI | 29.99\% | TPDPS_RI | 31.42\% |
| MPEG_RI | 12.91\% | DKL_RI | 31.32\% | DKL_RI | 31.58\% | MPEG_RI | 12.91\% | PEG_RI | 29.68\% | FGHJ_RI | 31.22\% |
| TPDPS_RI | 10.60\% | CT_RI | 29.94\% | CT_RI | 29.68\% | TPDPS_RI | 10.60\% | CT_RI | 28.45\% | CT_RI | 28.97\% |
| HL_RI | 8.94\% | GM_RI | 27.35\% | GM_RI | 28.90\% | HL_RI | 8.94\% | GM_RI | 26.71\% | DKL_RI | 27.23\% |
| DKL_RI | 8.61\% | HL_RI | 26.57\% | HL_RI | 27.18\% | DKL_RI | 8.61\% | DKL_RI | 26.71\% | GM_RI | 26.92\% |
| CT_RI | 7.95\% | PEG_RI | 25.28\% | PEG_RI | 26.14\% | CT_RI | 7.62\% | HL_RI | 24.26\% | HL_RI | 24.26\% |
| PEG_RI | 6.95\% | MPEG_RI | 19.41\% | MPEG_RI | 18.38\% | PEG_RI | 6.95\% | MPEG_RI | 19.96\% | MPEG_RI | 21.29\% |
| ETSS_RI_Ind10 | 4.64\% | ETSS_RI_Ind10 | 17.00\% | ETSS_RI_Ind10 | 16.91\% | ETSS_RI_Ind10 | 4.64\% | ETSS_RI_Ind10 | 16.89\% | ETSS_RI_Ind10 | 17.50\% |
| ETSS_RI_25SBM | 1.99\% | FPM_RI | 11.73\% | FPM_RI | 10.01\% | ETSS_RI_25SBM | 1.99\% | FPM_RI | 15.25\% | FPM_RI | 16.07\% |
| FPM_RI | 1.66\% | ETSS_RI_25SBM | 11.56\% | ETSS_RI_25SBM | 9.40\% | FPM_RI | 1.66\% | ETSS_RI_25SBM | 10.44\% | ETSS_RI_25SBM | 10.13\% |
| WNG_RI | 0.66\% | WNG_RI | 8.63\% | WNG_RI | 6.04\% | WNG_RI | 0.66\% | ES_RI_Ind10 | 6.55\% | ES_RI_Ind10 | 4.91\% |
| ES_RI_Ind10 | 0.33\% | ES_RI_Ind10 | 6.21\% | ES_RI_Ind10 | 3.28\% | ES_RI_Ind10 | 0.33\% | WNG_RI | 6.45\% | WNG_RI | 4.71\% |
| ES_RI_25SBM | 0.00\% | ES_RI_25SBM | 4.57\% | ES_RI_25SBM | 1.98\% | ES_RI_25SBM | 0.00\% | ES_RI_25SBM | 3.17\% | ES_RI_25SBM | 0.92\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of the coefficient of variation in earnings forecasts. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 101: Model Confidence Set Summary Results: Firm Leverage Effect

|  |  |  | RMSE |  |  |
| :--- | ---: | :--- | :--- | :--- | :--- |
| Panel A: Analysts |  |  |  | MAE |  |
| MEV |  |  |  | $56.97 \%$ |  |
| BP_Anlst | $43.41 \%$ | GLS_Anlst | $55.65 \%$ | PE_Anlst | $56.44 \%$ |
| PE_Anlst | $43.31 \%$ | PE_Anlst | $54.00 \%$ | GLS_Anlst | $54.06 \%$ |
| GG_Anlst | $40.67 \%$ | BP_Anlst | $50.96 \%$ | BP_Anlst | $50.03 \%$ |
| PEG_Anlst | $39.83 \%$ | MPEG_Anlst | $48.45 \%$ | OHE_Ind10 | $48.51 \%$ |
| CT_Anlst | $38.99 \%$ | OHE_Ind10 | $47.26 \%$ | MPEG_Anlst | $46.86 \%$ |
| KMY_Anlst | $37.30 \%$ | FGHJ_Anlst | $46.60 \%$ | ETSS_Anlst_Ind10 | $46.20 \%$ |
| FPM_Anlst | $36.99 \%$ | HL_Anlst | $44.68 \%$ | FGHJ_Anlst | 4.35 |
| OHE_Ind10 | $36.04 \%$ | ETSS_Anlst_Ind10 | $44.35 \%$ | PEG_Anlst | $45.54 \%$ |
| GLS_Anlst | $35.83 \%$ | DKL_Anlst | $44.02 \%$ | HL_Anlst | $45.01 \%$ |
| MPEG_Anlst | $35.62 \%$ | PEG_Anlst | $43.36 \%$ | CT_Anlst | $44.81 \%$ |
| GM_Anlst | $34.88 \%$ | CT_Anlst | $43.03 \%$ | DKL_Anlst | $44.48 \%$ |
| FGHJ_Anlst | $34.14 \%$ | GM_Anlst | $43.03 \%$ | KMY_Anlst | $43.23 \%$ |
| DKL_Anlst | $33.09 \%$ | KMY_Anlst | $42.43 \%$ | GM_Anlst | $43.16 \%$ |
| ETSS_Anlst_Ind10 | $32.67 \%$ | FPM_Anlst | $40.38 \%$ | FPM_Anlst | $41.37 \%$ |
| HL_Anlst | $32.03 \%$ | WNG_Anlst | $36.81 \%$ | TPDPS_Anlst | $39.26 \%$ |
| WNG_Anlst | $29.29 \%$ | Naive | $35.82 \%$ | OHE_25SBM | $39.06 \%$ |
| Naive | $15.70 \%$ | TPDPS_Anlst | $35.03 \%$ | Naive | $39.06 \%$ |
| TPDPS_Anlst | $15.17 \%$ | OHE_25SBM | $34.17 \%$ | WNG_Anlst | $33.77 \%$ |
| OHE_25SBM | $13.07 \%$ | GG_Anlst | $29.68 \%$ | GG_Anlst | $29.94 \%$ |
| ETSS_Anlst_25SBM | $12.12 \%$ | ETSS_Anlst_25SBM | $27.96 \%$ | ETSS_Anlst_25SBM | $29.87 \%$ |
| ES_Anlst_Ind10 | $8.75 \%$ | ES_Anlst_Ind10 | $13.62 \%$ | ES_Anlst_Ind10 | $14.21 \%$ |
| ES_Anlst_25SBM | $2.00 \%$ | ES_Anlst_25SBM | $7.14 \%$ | ES_Anlst_25SBM | $7.60 \%$ |


| MEV |  |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: |
|  | RMSE |  |  |  |  |  |
| BP_Anlst | $43.41 \%$ | GLS_Anlst | $55.32 \%$ | PE_Anlst | MAE |  |
| PE_Anlst | $43.31 \%$ | PE_Anlst | $53.02 \%$ | GLS_Anlst | $58.02 \%$ |  |
| GG_Anlst | $40.57 \%$ | BP_Anlst | $50.99 \%$ | BP_Anlst | $55.58 \%$ |  |
| PEG_Anlst | $40.15 \%$ | MPEG_Anlst | $47.63 \%$ | OHE_Ind10 | $49.80 \%$ |  |
| CT_Anlst | $38.78 \%$ | OHE_Ind10 | $46.78 \%$ | MPEG_Anlst | $49.21 \%$ |  |
| KMY_Anlst | $37.30 \%$ | FGHJ_Anlst | $46.12 \%$ | ETSS_Anlst_Ind10 | $48.09 \%$ |  |
| FPM_Anlst | $36.99 \%$ | DKL_Anlst | $44.28 \%$ | FGHJ_Anlst | $46.58 \%$ |  |
| GLS_Anlst | $36.04 \%$ | HL_Anlst | $44.15 \%$ | PEG_Anlst | $45.66 \%$ |  |
| OHE_Ind10 | $35.93 \%$ | ETSS_Anlst_Ind10 | $44.15 \%$ | CT_Anlst | $45.27 \%$ |  |
| MPEG_Anlst | $35.62 \%$ | PEG_Anlst | $42.71 \%$ | DKL_Anlst | $45.20 \%$ |  |
| GM_Anlst | $34.77 \%$ | KMY_Anlst | $42.71 \%$ | HL_Anlst | $45.14 \%$ |  |
| FGHJ_Anlst | $34.25 \%$ | GM_Anlst | $42.64 \%$ | KMY_Anlst | $44.42 \%$ |  |
| DKL_Anlst | $33.40 \%$ | CT_Anlst | $42.44 \%$ | GM_Anlst | $44.15 \%$ |  |
| ETSS_Anlst_Ind10 | $32.67 \%$ | FPM_Anlst | $39.68 \%$ | FPM_Anlst | $41.13 \%$ |  |
| HL_Anlst | $32.03 \%$ | WNG_Anlst | $36.99 \%$ | TPDPS_Anlst | $39.49 \%$ |  |
| WNG_Anlst | $29.29 \%$ | Naive | $35.48 \%$ | Naive | $39.29 \%$ |  |
| Naive | $15.70 \%$ | TPDPS_Anlst | $35.09 \%$ | OHE_25SBM | $39.22 \%$ |  |
| TPDPS_Anlst | $15.38 \%$ | OHE_25SBM | $33.57 \%$ | WNG_Anlst | $35.09 \%$ |  |
| OHE_25SBM | $13.07 \%$ | GG_Anlst | $29.37 \%$ | ETSS_Anlst_25SBM | $30.35 \%$ |  |
| ETSS_Anlst_25SBM | $12.01 \%$ | ETSS_Anlst_25SBM | $27.53 \%$ | GG_Anlst | $30.03 \%$ |  |
| ES_Anlst_Ind10 | $8.75 \%$ | ES_Anlst_Ind10 | $13.21 \%$ | ES_Anlst_Ind10 | $14.45 \%$ |  |
| ES_Anlst_25SBM | $2.11 \%$ | ES_Anlst_25SBM | $7.42 \%$ | ES_Anlst_25SBM | $7.88 \%$ |  |


| Panel B: HDZ |  |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: |
| MEV |  |  |  |  |  |  |
| PEG_HDZ | $45.22 \%$ | PE_HDZ | $57.96 \%$ | PE_HDZ | $61.60 \%$ |  |
| BP_HDZ | $44.88 \%$ | BP_HDZ | $54.26 \%$ | BP_HDZ | $59.09 \%$ |  |
| GM_HDZ | $43.76 \%$ | GLS_HDZ | $53.27 \%$ | GLS_HDZ | $54.26 \%$ |  |
| PE_HDZ | $43.19 \%$ | GG_HDZ | $52.21 \%$ | GG_HDZ | $54.00 \%$ |  |
| MPEG_HDZ | $42.97 \%$ | FGHJ_HDZ | $48.45 \%$ | FGHJ_HDZ | $49.17 \%$ |  |
| FPM_HDZ | $39.48 \%$ | CT_HDZ | $46.27 \%$ | CT_HDZ | $48.38 \%$ |  |
| GG_HDZ | $39.26 \%$ | DKL_HDZ | $42.70 \%$ | KMY_HDZ | $44.28 \%$ |  |
| GLS_HDZ | $37.01 \%$ | KMY_HDZ | $42.56 \%$ | DKL_HDZ | $43.23 \%$ |  |
| FGHJ_HDZ | $36.11 \%$ | ETSS_HDZ_Ind10 | $40.12 \%$ | TPDPS_HDZ | $42.96 \%$ |  |
| KMY_HDZ | $34.98 \%$ | HL_HDZ | $39.85 \%$ | ETSS_HDZ_Ind10 | $42.70 \%$ |  |
| HL_HDZ | $34.53 \%$ | TPDPS_HDZ | $38.66 \%$ | HL_HDZ | $41.57 \%$ |  |
| CT_HDZ | $33.52 \%$ | MPEG_HDZ | $38.20 \%$ | MPEG_HDZ | $40.05 \%$ |  |
| DKL_HDZ | $31.95 \%$ | GM_HDZ | $37.21 \%$ | GM_HDZ | $39.33 \%$ |  |
| WNG_HDZ | $28.68 \%$ | FPM_HDZ | $36.42 \%$ | FPM_HDZ | $39.26 \%$ |  |
| ETSS_HDZ_Ind10 | $25.65 \%$ | PEG_HDZ | $34.24 \%$ | PEG_HDZ | $37.48 \%$ |  |
| TPDPS_HDZ | $17.21 \%$ | ETSS_HDZ_25SBM | $24.72 \%$ | ETSS_HDZ_25SBM | $27.16 \%$ |  |
| ETSS_HDZ_25SBM | $10.35 \%$ | WNG_HDZ | $24.39 \%$ | WNG_HDZ | $25.51 \%$ |  |
| ES_HDZ_25SBM | $1.80 \%$ | ES_HDZ_25SBM | $9.19 \%$ | ES_HDZ_25SBM | $8.92 \%$ |  |
| ES_HDZ_Ind10 | $1.35 \%$ | ES_HDZ_Ind10 | $7.14 \%$ | ES_HDZ_Ind10 | $6.94 \%$ |  |


| MEV |  |  | RMSE |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| PEG_HDZ | $45.22 \%$ | PE_HDZ | $57.56 \%$ | PE_HDZ | $61.96 \%$ |
| BP_HDZ | $44.99 \%$ | BP_HDZ | $53.88 \%$ | BP_HDZ | $59.33 \%$ |
| GM_HDZ | $43.98 \%$ | GLS_HDZ | $52.96 \%$ | GLS_HDZ | $54.01 \%$ |
| PE_HDZ | $43.53 \%$ | GG_HDZ | $50.66 \%$ | GG_HDZ | $53.68 \%$ |
| MPEG_HDZ | $42.97 \%$ | FGHJ_HDZ | $47.70 \%$ | FGHJ_HDZ | $48.95 \%$ |
| FPM_HDZ | $39.71 \%$ | CT_HDZ | $44.88 \%$ | CT_HDZ | $46.78 \%$ |
| GG_HDZ | $39.37 \%$ | KMY_HDZ | $41.39 \%$ | KMY_HDZ | $43.43 \%$ |
| GLS_HDZ | $37.35 \%$ | DKL_HDZ | $41.33 \%$ | DKL_HDZ | $42.64 \%$ |
| FGHJ_HDZ | $36.33 \%$ | ETSS_HDZ_Ind10 | $38.83 \%$ | ETSS_HDZ_Ind10 | $42.31 \%$ |
| KMY_HDZ | $35.10 \%$ | HL_HDZ | $38.37 \%$ | TPDPS_HDZ | $42.31 \%$ |
| HL_HDZ | $34.87 \%$ | TPDPS_HDZ | $37.71 \%$ | HL_HDZ | $40.47 \%$ |
| CT_HDZ | $33.63 \%$ | MPEG_HDZ | $37.45 \%$ | MPEG_HDZ | $39.55 \%$ |
| DKL_HDZ | $32.06 \%$ | FPM_HDZ | $36.27 \%$ | FPM_HDZ | $38.63 \%$ |
| WNG_HDZ | $28.80 \%$ | GM_HDZ | $35.35 \%$ | GM_HDZ | $38.30 \%$ |
| ETSS_HDZ_Ind10 | $25.76 \%$ | PEG_HDZ | $33.05 \%$ | PEG_HDZ | $37.06 \%$ |
| TPDPS_HDZ | $17.32 \%$ | ETSS_HDZ_25SBM | $24.18 \%$ | ETSS_HDZ_25SBM | $27.20 \%$ |
| ETSS_HDZ_25SBM | $10.35 \%$ | WNG_HDZ | $24.05 \%$ | WNG_HDZ | $26.02 \%$ |
| ES_HDZ_25SBM | $1.80 \%$ | ES_HDZ_25SBM | $9.20 \%$ | ES_HDZ_25SBM | $8.80 \%$ |
| ES_HDZ_Ind10 | $1.24 \%$ | ES_HDZ_Ind10 | $7.16 \%$ | ES_HDZ_Ind10 | $6.70 \%$ |

Continued in next page...

Table 101: Model Confidence Set Summary Results: Firm Leverage Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 58.00\% | BP_RW | 67.09\% | GG_RW | 69.27\% | BP_RW | 58.00\% | BP_RW | 67.28\% | GG_RW | 68.86\% |
| GG_RW | 36.31\% | GG_RW | 66.95\% | BP_RW | 68.08\% | GG_RW | 36.15\% | GG_RW | 66.89\% | BP_RW | 68.27\% |
| KMY_RW | 34.31\% | CT_RW | 53.60\% | CT_RW | 54.59\% | KMY_RW | 34.15\% | CT_RW | 53.81\% | CT_RW | 53.81\% |
| GM_RW | 24.92\% | FGHJ_RW | 46.79\% | FGHJ_RW | 48.71\% | GM_RW | 24.92\% | FGHJ_RW | 46.32\% | FGHJ_RW | 47.96\% |
| CT_RW | 19.38\% | KMY_RW | 46.20\% | KMY_RW | 46.53\% | CT_RW | 19.38\% | KMY_RW | 45.53\% | KMY_RW | 45.01\% |
| FGHJ_RW | 18.77\% | DKL_RW | 39.85\% | GLS_RW | 41.04\% | FGHJ_RW | 18.77\% | DKL_RW | 39.62\% | GLS_RW | 39.88\% |
| HL_RW | 16.77\% | GLS_RW | 39.19\% | DKL_RW | 39.52\% | HL_RW | 16.46\% | GLS_RW | 38.90\% | DKL_RW | 38.37\% |
| MPEG_RW | 16.15\% | GM_RW | 35.23\% | GM_RW | 35.23\% | MPEG_RW | 16.00\% | GM_RW | 34.23\% | GM_RW | 34.23\% |
| DKL_RW | 15.69\% | HL_RW | 34.50\% | HL_RW | 33.11\% | DKL_RW | 15.85\% | HL_RW | 34.10\% | HL_RW | 33.05\% |
| GLS_RW | 13.85\% | TPDPS_RW | 27.16\% | TPDPS_RW | 29.81\% | GLS_RW | 13.85\% | TPDPS_RW | 27.92\% | TPDPS_RW | 29.50\% |
| PE_RW | 10.92\% | MPEG_RW | 25.91\% | MPEG_RW | 27.23\% | PE_RW | 10.77\% | MPEG_RW | 25.49\% | MPEG_RW | 26.22\% |
| PEG_RW | 10.46\% | PEG_RW | 24.52\% | PEG_RW | 25.38\% | PEG_RW | 10.62\% | PEG_RW | 24.90\% | PEG_RW | 25.36\% |
| TPDPS_RW | 10.31\% | ES_RW_Ind10 | 19.17\% | ES_RW_Ind10 | 20.62\% | TPDPS_RW | 10.31\% | ES_RW_Ind10 | 19.51\% | ES_RW_Ind10 | 20.63\% |
| ETSS_RW_Ind10 | 3.23\% | PE_RW | 17.25\% | PE_RW | 17.71\% | ETSS_RW_Ind10 | 3.38\% | PE_RW | 17.15\% | PE_RW | 16.56\% |
| WNG_RW | 2.77\% | ETSS_RW_Ind10 | 15.07\% | ETSS_RW_Ind10 | 14.67\% | WNG_RW | 2.77\% | ETSS_RW_Ind10 | 15.64\% | ETSS_RW_Ind10 | 14.72\% |
| ES_RW_Ind10 | 2.62\% | ETSS_RW_25SBM | 11.24\% | ETSS_RW_25SBM | 10.64\% | ES_RW_Ind10 | 2.62\% | ETSS_RW_25SBM | 11.50\% | ETSS_RW_25SBM | 10.71\% |
| ETSS_RW_25SBM | 2.00\% | ES_RW_25SBM | 10.05\% | ES_RW_25SBM | 8.99\% | ETSS_RW_25SBM | 2.00\% | ES_RW_25SBM | 9.66\% | ES_RW_25SBM | 9.26\% |
| FPM_RW | 1.85\% | FPM_RW | 9.05\% | FPM_RW | 8.39\% | FPM_RW | 1.85\% | FPM_RW | 8.67\% | FPM_RW | 7.82\% |
| ES_RW_25SBM | 0.31\% | WNG_RW | 8.06\% | WNG_RW | 5.09\% | ES_RW_25SBM | 0.46\% | WNG_RW | 8.02\% | WNG_RW | 4.34\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 56.78\% | BP_EP | 64.77\% | BP_EP | 66.42\% | BP_EP | 57.03\% | BP_EP | 64.59\% | BP_EP | 67.08\% |
| PE_EP | 41.95\% | GG_EP | 56.84\% | GG_EP | 57.50\% | PE_EP | 41.83\% | GG_EP | 57.03\% | GG_EP | 57.62\% |
| FGHJ_EP | 34.73\% | KMY_EP | 51.02\% | KMY_EP | 52.28\% | GM_EP | 34.73\% | KMY_EP | 50.72\% | KMY_EP | 51.71\% |
| GLS_EP | 34.47\% | CT_EP | 43.16\% | CT_EP | 44.61\% | GLS_EP | 34.47\% | CT_EP | 43.43\% | CT_EP | 44.68\% |
| GM_EP | 34.47\% | PE_EP | 40.58\% | PE_EP | 42.63\% | FGHJ_EP | 34.22\% | PE_EP | 41.06\% | PE_EP | 43.43\% |
| DKL_EP | 31.05\% | GLS_EP | 37.21\% | GLS_EP | 38.07\% | KMY_EP | 31.18\% | GLS_EP | 37.19\% | GLS_EP | 38.57\% |
| KMY_EP | 30.80\% | DKL_EP | 35.56\% | DKL_EP | 37.54\% | DKL_EP | 30.93\% | DKL_EP | 35.41\% | DKL_EP | 37.19\% |
| HL_EP | 30.42\% | FGHJ_EP | 32.45\% | FGHJ_EP | 34.17\% | HL_EP | 30.29\% | FGHJ_EP | 32.00\% | TPDPS_EP | 33.97\% |
| MPEG_EP | 29.40\% | TPDPS_EP | 31.53\% | TPDPS_EP | 33.84\% | MPEG_EP | 29.40\% | TPDPS_EP | 31.54\% | FGHJ_EP | 33.38\% |
| GG_EP | 24.84\% | GM_EP | 27.03\% | GM_EP | 29.48\% | GG_EP | 25.10\% | GM_EP | 26.15\% | GM_EP | 29.37\% |
| PEG_EP | 24.59\% | HL_EP | 26.37\% | HL_EP | 28.35\% | PEG_EP | 24.71\% | HL_EP | 26.02\% | HL_EP | 27.92\% |
| CT_EP | 21.67\% | PEG_EP | 22.54\% | PEG_EP | 25.84\% | CT_EP | 21.67\% | PEG_EP | 22.21\% | PEG_EP | 25.49\% |
| TPDPS_EP | 16.22\% | MPEG_EP | 17.32\% | MPEG_EP | 18.70\% | TPDPS_EP | 16.10\% | MPEG_EP | 17.41\% | MPEG_EP | 18.46\% |
| ETSS_EP_Ind10 | 7.22\% | ETSS_EP_Ind10 | 11.10\% | ETSS_EP_Ind10 | 11.43\% | ETSS_EP_Ind10 | 7.35\% | ETSS_EP_Ind10 | 11.17\% | ETSS_EP_Ind10 | 11.96\% |
| FPM_EP | 6.97\% | FPM_EP | 6.41\% | FPM_EP | 6.35\% | FPM_EP | 6.97\% | FPM_EP | 6.77\% | FPM_EP | 7.36\% |
| ETSS_EP_25SBM | 4.06\% | ES_EP_Ind10 | 5.88\% | ES_EP_Ind10 | 5.95\% | ETSS_EP_25SBM | 3.93\% | ES_EP_Ind10 | 5.91\% | ES_EP_Ind10 | 6.70\% |
| ES_EP_Ind10 | 1.52\% | ETSS_EP_25SBM | 5.68\% | ETSS_EP_25SBM | 5.35\% | ES_EP_Ind10 | 1.39\% | ETSS_EP_25SBM | 5.58\% | ETSS_EP_25SBM | 5.58\% |
| WNG_EP | 1.27\% | WNG_EP | 3.64\% | WNG_EP | 3.44\% | WNG_EP | 1.27\% | WNG_EP | 3.68\% | WNG_EP | 3.61\% |
| ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.12\% | ES_EP_25SBM | 1.06\% | ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.10\% | ES_EP_25SBM | 1.58\% |

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Table 101: Model Confidence Set Summary Results: Firm Leverage Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  | MEV |  | RMSE |  | MAE |  |
| MEV |  | RMSE |  | MAE |  |  |  |  |  |  |  |
| BP_RI | 61.83\% | BP_RI | 66.89\% | BP_RI | 68.54\% | BP_RI | 61.58\% | BP_RI | 67.15\% | BP_RI | 68.86\% |
| PE_RI | 45.55\% | GG_RI | 56.71\% | GG_RI | 58.03\% | PE_RI | 46.06\% | GG_RI | 57.03\% | GG_RI | 59.13\% |
| GG_RI | 41.73\% | KMY_RI | 45.47\% | KMY_RI | 46.53\% | GG_RI | 41.73\% | KMY_RI | 45.86\% | KMY_RI | 47.17\% |
| FGHJ_RI | 36.77\% | PE_RI | 44.94\% | PE_RI | 45.47\% | FGHJ_RI | 37.40\% | PE_RI | 45.80\% | PE_RI | 45.86\% |
| GLS_RI | 36.26\% | GLS_RI | 41.18\% | GLS_RI | 44.48\% | GLS_RI | 36.51\% | GLS_RI | 41.00\% | GLS_RI | 44.68\% |
| KMY_RI | 30.15\% | TPDPS_RI | 37.34\% | TPDPS_RI | 39.39\% | KMY_RI | 30.53\% | TPDPS_RI | 37.52\% | FGHJ_RI | 39.49\% |
| GM_RI | 23.66\% | FGHJ_RI | 36.88\% | FGHJ_RI | 39.00\% | GM_RI | 23.28\% | FGHJ_RI | 36.14\% | TPDPS_RI | 39.03\% |
| DKL_RI | 19.34\% | DKL_RI | 30.67\% | DKL_RI | 32.25\% | DKL_RI | 19.47\% | DKL_RI | 31.27\% | DKL_RI | 32.79\% |
| TPDPS_RI | 18.07\% | GM_RI | 27.30\% | GM_RI | 29.48\% | TPDPS_RI | 18.58\% | CT_RI | 27.60\% | GM_RI | 29.30\% |
| MPEG_RI | 17.18\% | CT_RI | 26.83\% | CT_RI | 28.42\% | MPEG_RI | 17.30\% | GM_RI | 27.40\% | CT_RI | 29.11\% |
| HL_RI | 15.65\% | HL_RI | 25.78\% | HL_RI | 26.97\% | HL_RI | 15.52\% | HL_RI | 26.02\% | HL_RI | 27.33\% |
| PEG_RI | 11.83\% | PEG_RI | 24.39\% | PEG_RI | 26.64\% | PEG_RI | 11.96\% | PEG_RI | 24.05\% | PEG_RI | 26.08\% |
| CT_RI | 10.56\% | MPEG_RI | 18.90\% | MPEG_RI | 19.56\% | CT_RI | 10.81\% | MPEG_RI | 18.73\% | MPEG_RI | 19.84\% |
| ETSS_RI_Ind10 | 4.58\% | ETSS_RI_Ind10 | 13.02\% | ETSS_RI_Ind10 | 14.41\% | ETSS_RI_Ind10 | 4.71\% | ETSS_RI_Ind10 | 13.73\% | ETSS_RI_Ind10 | 14.32\% |
| FPM_RI | 2.80\% | FPM_RI | 9.91\% | FPM_RI | 10.18\% | FPM_RI | 3.05\% | FPM_RI | 10.97\% | FPM_RI | 11.17\% |
| ETSS_RI_25SBM | 1.91\% | ETSS_RI_25SBM | 8.59\% | ETSS_RI_25SBM | 8.92\% | ETSS_RI_25SBM | 2.04\% | ETSS_RI_25SBM | 9.59\% | ETSS_RI_25SBM | 8.74\% |
| WNG_RI | 1.02\% | WNG_RI | 4.49\% | WNG_RI | 3.30\% | WNG_RI | 1.02\% | WNG_RI | 4.53\% | WNG_RI | 3.42\% |
| ES_RI_Ind10 | 0.76\% | ES_RI_Ind10 | 4.16\% | ES_RI_Ind10 | 3.17\% | ES_RI_Ind10 | 0.76\% | ES_RI_Ind10 | 4.34\% | ES_RI_Ind10 | 2.96\% |
| ES_RI_25SBM | 0.13\% | ES_RI_25SBM | 2.91\% | ES_RI_25SBM | 0.93\% | ES_RI_25SBM | 0.25\% | ES_RI_25SBM | 2.76\% | ES_RI_25SBM | 1.18\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of leverage. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 102: Model Confidence Set Summary Results: Target Price Relative to Market Price Effect

|  |  |  |  |  |  |
| :--- | ---: | :--- | :--- | :--- | ---: |
| Panel A: Analysts |  |  | RMSE |  |  |
| MEV |  |  | MAE |  |  |
| BP_Anlst | $43.84 \%$ | GLS_Anlst | $55.14 \%$ | PE_Anlst | $57.83 \%$ |
| PE_Anlst | $43.38 \%$ | PE_Anlst | $52.91 \%$ | GLS_Anlst | $56.58 \%$ |
| GG_Anlst | $40.64 \%$ | BP_Anlst | $50.56 \%$ | BP_Anlst | $55.08 \%$ |
| PEG_Anlst | $39.45 \%$ | MPEG_Anlst | $47.48 \%$ | OHE_Ind10 | $49.38 \%$ |
| CT_Anlst | $38.63 \%$ | OHE_Ind10 | $46.69 \%$ | MPEG_Anlst | $48.66 \%$ |
| KMY_Anlst | $37.53 \%$ | FGHJ_Anlst | $45.58 \%$ | ETSS_Anlst_Ind10 | $46.89 \%$ |
| FPM_Anlst | $37.44 \%$ | HL_Anlst | $44.47 \%$ | FGHJ_Anlst | $46.50 \%$ |
| GLS_Anlst | $35.98 \%$ | DKL_Anlst | $43.75 \%$ | HL_Anlst | $45.19 \%$ |
| OHE_Ind10 | $35.80 \%$ | ETSS_Anlst_Ind10 | $43.29 \%$ | PEG_Anlst | $44.99 \%$ |
| GM_Anlst | $35.25 \%$ | GM_Anlst | $42.44 \%$ | CT_Anlst | $44.73 \%$ |
| MPEG_Anlst | $34.98 \%$ | PEG_Anlst | $41.98 \%$ | DKL_Anlst | $44.66 \%$ |
| FGHJ_Anlst | $34.52 \%$ | CT_Anlst | $41.52 \%$ | GM_Anlst | $43.75 \%$ |
| DKL_Anlst | $33.24 \%$ | KMY_Anlst | $41.45 \%$ | KMY_Anlst | $42.31 \%$ |
| ETSS_Anlst_Ind10 | $33.24 \%$ | FPM_Anlst | $39.03 \%$ | FPM_Anlst | $40.67 \%$ |
| HL_Anlst | $32.33 \%$ | WNG_Anlst | $35.95 \%$ | OHE_25SBM | $38.38 \%$ |
| WNG_Anlst | $30.14 \%$ | Naive | $34.25 \%$ | Naive | $38.24 \%$ |
| Naive | $16.26 \%$ | OHE_25SBM | $33.60 \%$ | TPDPS_Anlst | $37.92 \%$ |
| TPDPS_Anlst | $15.34 \%$ | TPDPS_Anlst | $33.53 \%$ | WNG_Anlst | $33.92 \%$ |
| OHE_25SBM | $14.89 \%$ | GG_Anlst | $27.24 \%$ | ETSS_Anlst_25SBM | $29.60 \%$ |
| ETSS_Anlst_25SBM | $12.42 \%$ | ETSS_Anlst_25SBM | $26.72 \%$ | GG_Anlst | $28.95 \%$ |
| ES_Anlst_Ind10 | $8.68 \%$ | ES_Anlst_Ind10 | $12.51 \%$ | ES_Anlst_Ind10 | $13.62 \%$ |
| ES_Anlst_25SBM | $2.19 \%$ | ES_Anlst_25SBM | $6.22 \%$ | ES_Anlst_25SBM | $6.42 \%$ |


| MEV |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
|  | RMSE |  |  |  |  |
| BP_Anlst | $43.74 \%$ | GLS_Anlst | $55.73 \%$ | PE_Anlst | $57.43 \%$ |
| PE_Anlst | $43.38 \%$ | PE_Anlst | $52.98 \%$ | GLS_Anlst | $56.71 \%$ |
| GG_Anlst | $40.91 \%$ | BP_Anlst | $50.88 \%$ | BP_Anlst | $54.94 \%$ |
| PEG_Anlst | $39.91 \%$ | MPEG_Anlst | $47.35 \%$ | OHE_Ind10 | $49.31 \%$ |
| CT_Anlst | $38.54 \%$ | OHE_Ind10 | $46.63 \%$ | MPEG_Anlst | $48.85 \%$ |
| KMY_Anlst | $37.72 \%$ | FGHJ_Anlst | $45.84 \%$ | FGHJ_Anlst | $46.89 \%$ |
| FPM_Anlst | $37.35 \%$ | HL_Anlst | $44.53 \%$ | ETSS_Anlst_Ind10 | $46.50 \%$ |
| GLS_Anlst | $36.35 \%$ | DKL_Anlst | $43.88 \%$ | HL_Anlst | $45.38 \%$ |
| OHE_Ind10 | $36.07 \%$ | ETSS_Anlst_Ind10 | $43.22 \%$ | PEG_Anlst | $45.25 \%$ |
| GM_Anlst | $35.34 \%$ | GM_Anlst | $42.63 \%$ | DKL_Anlst | $44.86 \%$ |
| MPEG_Anlst | $35.34 \%$ | CT_Anlst | $41.85 \%$ | CT_Anlst | $44.47 \%$ |
| FGHJ_Anlst | $34.61 \%$ | PEG_Anlst | $41.72 \%$ | GM_Anlst | $43.88 \%$ |
| ETSS_Anlst_Ind10 | $33.33 \%$ | KMY_Anlst | $41.52 \%$ | KMY_Anlst | $43.03 \%$ |
| DKL_Anlst | $33.24 \%$ | FPM_Anlst | $38.51 \%$ | FPM_Anlst | $40.67 \%$ |
| HL_Anlst | $32.42 \%$ | WNG_Anlst | $35.49 \%$ | OHE_25SBM | $38.05 \%$ |
| WNG_Anlst | $30.23 \%$ | Naive | $34.05 \%$ | Naive | $37.72 \%$ |
| Naive | $16.35 \%$ | TPDPS_Anlst | $33.79 \%$ | TPDPS_Anlst | $37.72 \%$ |
| TPDPS_Anlst | $15.62 \%$ | OHE_25SBM | $33.01 \%$ | WNG_Anlst | $33.86 \%$ |
| OHE_25SBM | $14.89 \%$ | GG_Anlst | $27.70 \%$ | ETSS_Anlst_25SBM | $29.34 \%$ |
| ETSS_Anlst_25SBM | $12.69 \%$ | ETSS_Anlst_25SBM | $26.20 \%$ | GG_Anlst | $29.01 \%$ |
| ES_Anlst_Ind10 | $8.68 \%$ | ES_Anlst_Ind10 | $12.38 \%$ | ES_Anlst_Ind10 | $13.88 \%$ |
| ES_Anlst_25SBM | $2.19 \%$ | ES_Anlst_25SBM | $6.61 \%$ | ES_Anlst_25SBM | $6.55 \%$ |


| Panel B: HDZ |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| PEG_HDZ | 45.14\% | PE_HDZ | 57.17\% | PE_HDZ | 61.30\% | PEG_HDZ | 44.95\% | PE_HDZ | 56.58\% | PE_HDZ | 60.97\% |
| BP_HDZ | 44.16\% | GLS_HDZ | 53.50\% | BP_HDZ | 58.28\% | BP_HDZ | 44.06\% | BP_HDZ | 53.50\% | BP_HDZ | 58.55\% |
| GM_HDZ | 43.18\% | BP_HDZ | 53.44\% | GLS_HDZ | 54.29\% | GM_HDZ | 43.18\% | GLS_HDZ | 52.98\% | GLS_HDZ | 54.42\% |
| PE_HDZ | 42.10\% | GG_HDZ | 50.29\% | GG_HDZ | 53.37\% | PE_HDZ | 42.20\% | GG_HDZ | 49.44\% | GG_HDZ | 52.85\% |
| MPEG_HDZ | 41.81\% | FGHJ_HDZ | 47.41\% | FGHJ_HDZ | 48.20\% | MPEG_HDZ | 41.51\% | FGHJ_HDZ | 47.09\% | FGHJ_HDZ | 48.26\% |
| GG_HDZ | 38.08\% | CT_HDZ | 45.25\% | CT_HDZ | 46.30\% | GG_HDZ | 38.37\% | CT_HDZ | 43.94\% | CT_HDZ | 46.04\% |
| FPM_HDZ | 38.08\% | DKL_HDZ | 41.58\% | KMY_HDZ | 43.29\% | FPM_HDZ | 38.27\% | DKL_HDZ | 40.67\% | KMY_HDZ | 42.63\% |
| GLS_HDZ | 36.41\% | KMY_HDZ | 41.06\% | DKL_HDZ | 42.89\% | GLS_HDZ | 36.41\% | KMY_HDZ | 40.21\% | DKL_HDZ | 42.37\% |
| FGHJ_HDZ | 35.03\% | HL_HDZ | 38.44\% | ETSS_HDZ_Ind10 | 42.11\% | FGHJ_HDZ | 35.13\% | ETSS_HDZ_Ind10 | 37.72\% | ETSS_HDZ_Ind10 | 41.72\% |
| KMY_HDZ | 33.76\% | ETSS_HDZ_Ind10 | 38.38\% | TPDPS_HDZ | 41.19\% | HL_HDZ | 33.76\% | HL_HDZ | 37.66\% | TPDPS_HDZ | 41.00\% |
| HL_HDZ | 33.66\% | MPEG_HDZ | 37.26\% | HL_HDZ | 40.86\% | KMY_HDZ | 33.76\% | TPDPS_HDZ | 36.74\% | HL_HDZ | 40.14\% |
| CT_HDZ | 32.38\% | TPDPS_HDZ | 37.26\% | MPEG_HDZ | 39.49\% | CT_HDZ | 32.19\% | MPEG_HDZ | 36.54\% | MPEG_HDZ | 39.55\% |
| DKL_HDZ | 31.40\% | GM_HDZ | 35.69\% | GM_HDZ | 37.98\% | DKL_HDZ | 31.31\% | GM_HDZ | 34.97\% | GM_HDZ | 37.72\% |
| WNG_HDZ | 27.97\% | FPM_HDZ | 34.84\% | FPM_HDZ | 37.20\% | WNG_HDZ | 27.77\% | FPM_HDZ | 34.51\% | FPM_HDZ | 37.07\% |
| ETSS_HDZ_Ind10 | 25.42\% | PEG_HDZ | 33.14\% | PEG_HDZ | 36.28\% | ETSS_HDZ_Ind10 | 25.52\% | PEG_HDZ | 32.81\% | PEG_HDZ | 35.89\% |
| TPDPS_HDZ | 17.37\% | WNG_HDZ | 23.97\% | ETSS_HDZ_25SBM | 25.80\% | TPDPS_HDZ | 17.47\% | WNG_HDZ | 23.77\% | ETSS_HDZ_25SBM | 25.67\% |
| ETSS_HDZ_25SBM | 10.79\% | ETSS_HDZ_25SBM | 23.05\% | WNG_HDZ | 25.34\% | ETSS_HDZ_25SBM | 10.89\% | ETSS_HDZ_25SBM | 22.66\% | WNG_HDZ | 25.28\% |
| ES_HDZ_25SBM | 2.16\% | ES_HDZ_25SBM | 8.84\% | ES_HDZ_25SBM | 8.32\% | ES_HDZ_25SBM | 2.16\% | ES_HDZ_25SBM | 8.19\% | ES_HDZ_25SBM | 7.73\% |
| ES_HDZ_Ind10 | 1.37\% | ES_HDZ_Ind10 | 6.94\% | ES_HDZ_Ind10 | 6.68\% | ES_HDZ_Ind10 | 1.28\% | ES_HDZ_Ind10 | 6.68\% | ES_HDZ_Ind10 | 6.35\% |

Continued in next page...

Table 102: Model Confidence Set Summary Results: Target Price Relative to Market Price Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  | MEV |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | RMSE |  | MAE |  |
| BP_RW | 57.68\% | BP_RW | 67.52\% | BP_RW | 69.35\% | BP_RW | 57.68\% | BP_RW | 67.13\% | BP_RW | 68.83\% |
| GG_RW | 36.13\% | GG_RW | 66.47\% | GG_RW | 69.02\% | GG_RW | 36.13\% | GG_RW | 66.14\% | GG_RW | 68.57\% |
| KMY_RW | 34.58\% | CT_RW | 53.57\% | CT_RW | 54.22\% | KMY_RW | 34.84\% | CT_RW | 53.31\% | CT_RW | 53.83\% |
| GM_RW | 24.52\% | FGHJ_RW | 45.97\% | FGHJ_RW | 48.46\% | GM_RW | 24.52\% | FGHJ_RW | 45.58\% | FGHJ_RW | 48.00\% |
| CT_RW | 20.26\% | KMY_RW | 43.29\% | KMY_RW | 44.14\% | CT_RW | 20.26\% | KMY_RW | 43.61\% | KMY_RW | 44.07\% |
| FGHJ_RW | 19.74\% | DKL_RW | 37.72\% | GLS_RW | 39.55\% | FGHJ_RW | 19.61\% | DKL_RW | 38.11\% | GLS_RW | 39.82\% |
| HL_RW | 18.19\% | GLS_RW | 37.07\% | DKL_RW | 38.11\% | HL_RW | 18.32\% | GLS_RW | 37.46\% | DKL_RW | 37.79\% |
| DKL_RW | 17.81\% | HL_RW | 32.09\% | GM_RW | 32.55\% | DKL_RW | 17.81\% | HL_RW | 32.48\% | GM_RW | 32.81\% |
| MPEG_RW | 15.10\% | GM_RW | 31.37\% | HL_RW | 31.89\% | MPEG_RW | 15.10\% | GM_RW | 32.22\% | HL_RW | 32.09\% |
| GLS_RW | 14.45\% | TPDPS_RW | 26.65\% | TPDPS_RW | 28.09\% | GLS_RW | 14.45\% | TPDPS_RW | 26.33\% | TPDPS_RW | 28.29\% |
| PE_RW | 10.58\% | MPEG_RW | 23.25\% | MPEG_RW | 24.82\% | PE_RW | 10.58\% | MPEG_RW | 23.44\% | MPEG_RW | 24.75\% |
| TPDPS_RW | 10.58\% | PEG_RW | 22.66\% | PEG_RW | 23.84\% | TPDPS_RW | 10.58\% | PEG_RW | 23.25\% | PEG_RW | 24.30\% |
| PEG_RW | 10.45\% | ES_RW_Ind10 | 17.68\% | ES_RW_Ind10 | 19.32\% | PEG_RW | 10.32\% | ES_RW_Ind10 | 17.81\% | ES_RW_Ind10 | 19.65\% |
| ETSS_RW_Ind10 | 3.35\% | PE_RW | 15.59\% | PE_RW | 15.59\% | ETSS_RW_Ind10 | 3.23\% | PE_RW | 15.72\% | PE_RW | 15.98\% |
| WNG_RW | 3.10\% | ETSS_RW_Ind10 | 13.56\% | ETSS_RW_Ind10 | 13.16\% | WNG_RW | 3.10\% | ETSS_RW_Ind10 | 13.75\% | ETSS_RW_Ind10 | 13.23\% |
| ES_RW_Ind10 | 2.84\% | ETSS_RW_25SBM | 10.09\% | ETSS_RW_25SBM | 9.82\% | ES_RW_Ind10 | 2.84\% | ETSS_RW_25SBM | 10.28\% | ETSS_RW_25SBM | 10.22\% |
| ETSS_RW_25SBM | 2.06\% | ES_RW_25SBM | 8.71\% | ES_RW_25SBM | 8.51\% | ETSS_RW_25SBM | 2.06\% | ES_RW_25SBM | 8.25\% | ES_RW_25SBM | 7.99\% |
| FPM_RW | 1.68\% | WNG_RW | 7.14\% | FPM_RW | 6.88\% | FPM_RW | 1.68\% | FPM_RW | 7.27\% | FPM_RW | 7.40\% |
| ES_RW_25SBM | 0.39\% | FPM_RW | 7.01\% | WNG_RW | 4.19\% | ES_RW_25SBM | 0.39\% | WNG_RW | 7.14\% | WNG_RW | 4.32\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 57.64\% | BP_EP | 64.37\% | BP_EP | 66.34\% | BP_EP | 57.85\% | BP_EP | 63.98\% | BP_EP | 66.47\% |
| PE_EP | 43.77\% | GG_EP | 55.73\% | GG_EP | 56.19\% | PE_EP | 43.66\% | GG_EP | 55.21\% | GG_EP | 56.65\% |
| GLS_EP | 36.62\% | KMY_EP | 50.10\% | KMY_EP | 50.82\% | GLS_EP | 36.84\% | KMY_EP | 49.64\% | KMY_EP | 51.21\% |
| FGHJ_EP | 36.51\% | CT_EP | 42.89\% | CT_EP | 44.20\% | FGHJ_EP | 36.51\% | CT_EP | 42.04\% | CT_EP | 44.01\% |
| GM_EP | 36.19\% | PE_EP | 40.28\% | PE_EP | 42.37\% | GM_EP | 35.86\% | PE_EP | 39.82\% | PE_EP | 42.83\% |
| DKL_EP | 32.61\% | GLS_EP | 36.15\% | GLS_EP | 37.92\% | DKL_EP | 32.72\% | GLS_EP | 36.21\% | GLS_EP | 37.79\% |
| HL_EP | 31.74\% | DKL_EP | 34.25\% | DKL_EP | 36.15\% | HL_EP | 32.07\% | DKL_EP | 34.38\% | DKL_EP | 35.82\% |
| KMY_EP | 31.20\% | FGHJ_EP | 31.04\% | TPDPS_EP | 33.40\% | KMY_EP | 31.20\% | FGHJ_EP | 31.24\% | TPDPS_EP | 33.27\% |
| MPEG_EP | 31.09\% | TPDPS_EP | 30.26\% | FGHJ_EP | 32.94\% | MPEG_EP | 30.99\% | TPDPS_EP | 29.86\% | FGHJ_EP | 33.07\% |
| GG_EP | 25.89\% | HL_EP | 24.82\% | GM_EP | 27.77\% | PEG_EP | 25.89\% | HL_EP | 24.43\% | GM_EP | 28.81\% |
| PEG_EP | 25.79\% | GM_EP | 24.69\% | HL_EP | 27.05\% | GG_EP | 25.68\% | GM_EP | 24.36\% | HL_EP | 27.11\% |
| CT_EP | 22.32\% | PEG_EP | 21.35\% | PEG_EP | 24.75\% | CT_EP | 22.43\% | PEG_EP | 21.22\% | PEG_EP | 24.69\% |
| TPDPS_EP | 17.55\% | MPEG_EP | 16.57\% | MPEG_EP | 18.01\% | TPDPS_EP | 17.33\% | MPEG_EP | 16.50\% | MPEG_EP | 17.94\% |
| ETSS_EP_Ind10 | 9.64\% | ETSS_EP_Ind10 | 10.22\% | ETSS_EP_Ind10 | 10.35\% | ETSS_EP_Ind10 | 9.43\% | ETSS_EP_Ind10 | 9.95\% | ETSS_EP_Ind10 | 10.74\% |
| FPM_EP | 6.72\% | FPM_EP | 5.96\% | FPM_EP | 5.89\% | FPM_EP | 6.72\% | FPM_EP | 5.96\% | FPM_EP | 6.02\% |
| ETSS_EP_25SBM | 4.77\% | ETSS_EP_25SBM | 5.50\% | ES_EP_Ind10 | 5.76\% | ETSS_EP_25SBM | 4.77\% | ES_EP_Ind10 | 5.04\% | ES_EP_Ind10 | 5.96\% |
| ES_EP_Ind10 | 1.84\% | ES_EP_Ind10 | 5.44\% | ETSS_EP_25SBM | 4.85\% | WNG_EP | 1.73\% | ETSS_EP_25SBM | 4.78\% | ETSS_EP_25SBM | 4.72\% |
| WNG_EP | 1.84\% | WNG_EP | 3.47\% | WNG_EP | 2.95\% | ES_EP_Ind10 | 1.63\% | WNG_EP | 3.01\% | WNG_EP | 2.82\% |
| ES_EP_25SBM | 0.54\% | ES_EP_25SBM | 2.03\% | ES_EP_25SBM | 1.11\% | ES_EP_25SBM | 0.43\% | ES_EP_25SBM | 1.77\% | ES_EP_25SBM | 1.11\% |

Table 102: Model Confidence Set Summary Results: Target Price Relative to Market Price Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 62.36\% | BP_RI | 67.26\% | BP_RI | 68.89\% | BP_RI | 62.25\% | BP_RI | 66.93\% | BP_RI | 68.70\% |
| PE_RI | 46.17\% | GG_RI | 56.78\% | GG_RI | 58.22\% | PE_RI | 46.28\% | GG_RI | 56.39\% | GG_RI | 58.09\% |
| GG_RI | 41.03\% | PE_RI | 45.06\% | KMY_RI | 46.76\% | GG_RI | 41.14\% | PE_RI | 44.60\% | KMY_RI | 46.63\% |
| FGHJ_RI | 37.86\% | KMY_RI | 44.73\% | PE_RI | 45.32\% | FGHJ_RI | 37.75\% | KMY_RI | 44.40\% | PE_RI | 45.45\% |
| GLS_RI | 36.98\% | GLS_RI | 40.47\% | GLS_RI | 44.07\% | GLS_RI | 36.87\% | GLS_RI | 39.95\% | GLS_RI | 43.94\% |
| KMY_RI | 29.21\% | TPDPS_RI | 36.94\% | TPDPS_RI | 39.03\% | KMY_RI | 29.32\% | TPDPS_RI | 36.28\% | FGHJ_RI | 39.10\% |
| GM_RI | 23.41\% | FGHJ_RI | 35.63\% | FGHJ_RI | 38.97\% | GM_RI | 23.19\% | FGHJ_RI | 35.69\% | TPDPS_RI | 38.90\% |
| TPDPS_RI | $18.82 \%$ | DKL_RI | 29.80\% | DKL_RI | 31.89\% | TPDPS_RI | 18.82\% | DKL_RI | 29.47\% | DKL_RI | 32.15\% |
| DKL_RI | 18.49\% | GM_RI | 26.85\% | GM_RI | 28.55\% | DKL_RI | 18.49\% | GM_RI | 26.98\% | GM_RI | 29.08\% |
| MPEG_RI | 16.85\% | CT_RI | 26.06\% | CT_RI | 27.64\% | MPEG_RI | 16.52\% | CT_RI | 25.15\% | CT_RI | 27.31\% |
| HL_RI | 14.99\% | HL_RI | 24.69\% | HL_RI | 27.11\% | HL_RI | 15.21\% | HL_RI | 24.43\% | HL_RI | 27.31\% |
| PEG_RI | 12.36\% | PEG_RI | 23.25\% | PEG_RI | 26.20\% | PEG_RI | 12.36\% | PEG_RI | 22.99\% | PEG_RI | 26.00\% |
| CT_RI | 9.63\% | MPEG_RI | 18.34\% | MPEG_RI | 19.97\% | CT_RI | 9.74\% | MPEG_RI | 17.81\% | MPEG_RI | 19.71\% |
| ETSS_RI_Ind10 | 5.36\% | ETSS_RI_Ind10 | 12.25\% | ETSS_RI_Ind10 | 13.29\% | ETSS_RI_Ind10 | 5.25\% | ETSS_RI_Ind10 | 11.59\% | ETSS_RI_Ind10 | 13.36\% |
| FPM_RI | 2.74\% | FPM_RI | 9.69\% | FPM_RI | 9.95\% | FPM_RI | 2.84\% | FPM_RI | 9.17\% | FPM_RI | 9.95\% |
| ETSS_RI_25SBM | 1.97\% | ETSS_RI_25SBM | 7.99\% | ETSS_RI_25SBM | 8.32\% | ETSS_RI_25SBM | 1.97\% | ETSS_RI_25SBM | 7.79\% | ETSS_RI_25SBM | 8.51\% |
| WNG_RI | 1.42\% | WNG_RI | 4.06\% | WNG_RI | 3.54\% | WNG_RI | 1.42\% | WNG_RI | 3.67\% | WNG_RI | 3.34\% |
| ES_RI_Ind10 | 0.77\% | ES_RI_Ind10 | 3.86\% | ES_RI_Ind10 | 2.75\% | ES_RI_Ind10 | 0.66\% | ES_RI_Ind10 | 3.60\% | ES_RI_Ind10 | 2.69\% |
| ES_RI_25SBM | 0.22\% | ES_RI_25SBM | 2.62\% | ES_RI_25SBM | 1.18\% | ES_RI_25SBM | 0.22\% | ES_RI_25SBM | 2.10\% | ES_RI_25SBM | 0.92\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of the ratio between target price and market price. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 103: Model Confidence Set Summary Results: Market Beta Effect
First Quartile
Fourth Quartile

|  |  |  |  |  |  |
| :--- | ---: | :--- | :--- | :--- | :--- |
| Panel A: Analysts |  |  | RMSE |  | MAE |
| MEV |  |  |  |  |  |
| PE_Anlst | $43.51 \%$ | GLS_Anlst | $52.11 \%$ | PE_Anlst | $53.61 \%$ |
| BP_Anlst | $43.51 \%$ | PE_Anlst | $49.39 \%$ | BP_Anlst | $52.97 \%$ |
| GG_Anlst | $40.85 \%$ | BP_Anlst | $48.60 \%$ | GLS_Anlst | $52.68 \%$ |
| PEG_Anlst | $40.11 \%$ | MPEG_Anlst | $44.38 \%$ | OHE_Ind10 | $46.53 \%$ |
| CT_Anlst | $38.83 \%$ | FGHJ_Anlst | $43.24 \%$ | MPEG_Anlst | $46.10 \%$ |
| KMY_Anlst | $37.34 \%$ | OHE_Ind10 | $42.95 \%$ | ETSS_Anlst_Ind10 | $45.24 \%$ |
| FPM_Anlst | $37.23 \%$ | ETSS_Anlst_Ind10 | $41.66 \%$ | FGHJ_Anlst | $42.95 \%$ |
| OHE_Ind10 | $36.28 \%$ | HL_Anlst | $41.09 \%$ | HL_Anlst | $42.38 \%$ |
| GLS_Anlst | $36.06 \%$ | DKL_Anlst | $40.52 \%$ | PEG_Anlst | $42.16 \%$ |
| MPEG_Anlst | $35.74 \%$ | GM_Anlst | $39.80 \%$ | DKL_Anlst | $41.73 \%$ |
| GM_Anlst | $34.89 \%$ | KMY_Anlst | $39.80 \%$ | CT_Anlst | $41.37 \%$ |
| FGHJ_Anlst | $34.57 \%$ | CT_Anlst | $38.87 \%$ | GM_Anlst | $41.16 \%$ |
| DKL_Anlst | $33.40 \%$ | PEG_Anlst | $38.80 \%$ | KMY_Anlst | $40.80 \%$ |
| ETSS_Anlst_Ind10 | $32.98 \%$ | FPM_Anlst | $36.29 \%$ | FPM_Anlst | $37.37 \%$ |
| HL_Anlst | $32.13 \%$ | Naive | $33.86 \%$ | TPDPS_Anlst | $37.22 \%$ |
| WNG_Anlst | $29.57 \%$ | WNG_Anlst | $33.21 \%$ | Naive | $36.94 \%$ |
| Naive | $16.06 \%$ | TPDPS_Anlst | $33.00 \%$ | OHE_25SBM | $35.58 \%$ |
| TPDPS_Anlst | $15.53 \%$ | OHE_25SBM | $30.21 \%$ | WNG_Anlst | $31.42 \%$ |
| OHE_25SBM | $13.09 \%$ | GG_Anlst | $27.77 \%$ | GG_Anlst | $27.99 \%$ |
| ETSS_Anlst_25SBM | $12.23 \%$ | ETSS_Anlst_25SBM | $24.48 \%$ | ETSS_Anlst_25SBM | $27.99 \%$ |
| ES_Anlst_Ind10 | $8.72 \%$ | ES_Anlst_Ind10 | $13.24 \%$ | ES_Anlst_Ind10 | $14.32 \%$ |
| ES_Anlst_25SBM | $2.13 \%$ | ES_Anlst_25SBM | $5.65 \%$ | ES_Anlst_25SBM | $5.87 \%$ |


| MEV | RMSE |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_Anlst | $43.40 \%$ | GLS_Anlst | $55.51 \%$ | PE_Anlst | $56.83 \%$ |
| PE_Anlst | $42.98 \%$ | PE_Anlst | $52.88 \%$ | GLS_Anlst | $55.86 \%$ |
| GG_Anlst | $40.32 \%$ | BP_Anlst | $51.21 \%$ | BP_Anlst | $55.44 \%$ |
| PEG_Anlst | $39.68 \%$ | MPEG_Anlst | $47.75 \%$ | OHE_Ind10 | $50.24 \%$ |
| CT_Anlst | $38.51 \%$ | FGHJ_Anlst | $46.64 \%$ | MPEG_Anlst | $49.41 \%$ |
| KMY_Anlst | $37.23 \%$ | OHE_Ind10 | $46.64 \%$ | ETSS_Anlst_Ind10 | $47.47 \%$ |
| FPM_Anlst | $37.23 \%$ | ETSS_Anlst_Ind10 | $44.35 \%$ | FGHJ_Anlst | $46.78 \%$ |
| OHE_Ind10 | $36.28 \%$ | HL_Anlst | $44.28 \%$ | PEG_Anlst | $45.60 \%$ |
| GLS_Anlst | $36.06 \%$ | DKL_Anlst | $43.94 \%$ | HL_Anlst | $45.25 \%$ |
| MPEG_Anlst | $35.32 \%$ | GM_Anlst | $43.10 \%$ | CT_Anlst | $45.18 \%$ |
| GM_Anlst | $34.68 \%$ | PEG_Anlst | $42.97 \%$ | GM_Anlst | $44.77 \%$ |
| FGHJ_Anlst | $34.36 \%$ | CT_Anlst | $42.62 \%$ | DKL_Anlst | $44.70 \%$ |
| DKL_Anlst | $33.09 \%$ | KMY_Anlst | $42.48 \%$ | KMY_Anlst | $43.31 \%$ |
| ETSS_Anlst_Ind10 | $33.09 \%$ | FPM_Anlst | $39.92 \%$ | FPM_Anlst | $41.09 \%$ |
| HL_Anlst | $32.13 \%$ | WNG_Anlst | $35.97 \%$ | TPDPS_Anlst | $39.15 \%$ |
| WNG_Anlst | $29.47 \%$ | Naive | $35.76 \%$ | Naive | $38.81 \%$ |
| Naive | $15.74 \%$ | TPDPS_Anlst | $35.27 \%$ | OHE_25SBM | $38.46 \%$ |
| TPDPS_Anlst | $15.21 \%$ | OHE_25SBM | $33.68 \%$ | WNG_Anlst | $34.10 \%$ |
| OHE_25SBM | $13.09 \%$ | GG_Anlst | $28.97 \%$ | ETSS_Anlst_25SBM | $30.08 \%$ |
| ETSS_Anlst_25SBM | $12.02 \%$ | ETSS_Anlst_25SBM | $27.58 \%$ | GG_Anlst | $29.31 \%$ |
| ES_Anlst_Ind10 | $8.72 \%$ | ES_Anlst_Ind10 | $13.79 \%$ | ES_Anlst_Ind10 | $14.62 \%$ |
| ES_Anlst_25SBM | $2.13 \%$ | ES_Anlst_25SBM | $7.28 \%$ | ES_Anlst_25SBM | $7.21 \%$ |


| MEV |  | RMSE |  | MAE |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | 45.35\% | PE_HDZ | 53.97\% | BP_HDZ | 58.20\% |
| BP_HDZ | 45.24\% | BP_HDZ | 52.68\% | PE_HDZ | 58.05\% |
| GM_HDZ | 43.99\% | GLS_HDZ | 49.53\% | GG_HDZ | 50.89\% |
| PE_HDZ | 43.65\% | GG_HDZ | 48.32\% | GLS_HDZ | 50.68\% |
| MPEG_HDZ | 43.08\% | FGHJ_HDZ | 44.52\% | FGHJ_HDZ | 45.24\% |
| GG_HDZ | 39.57\% | CT_HDZ | 42.66\% | CT_HDZ | 44.52\% |
| FPM_HDZ | 39.57\% | KMY_HDZ | 38.44\% | ETSS_HDZ_Ind10 | 41.30\% |
| GLS_HDZ | 37.41\% | DKL_HDZ | 37.80\% | KMY_HDZ | 41.02\% |
| FGHJ_HDZ | 36.28\% | ETSS_HDZ_Ind10 | 37.80\% | TPDPS_HDZ | 40.52\% |
| KMY_HDZ | 35.49\% | TPDPS_HDZ | 36.51\% | DKL_HDZ | 40.09\% |
| HL_HDZ | 34.92\% | HL_HDZ | 35.36\% | HL_HDZ | 37.58\% |
| CT_HDZ | 33.56\% | MPEG_HDZ | 34.29\% | MPEG_HDZ | 36.94\% |
| DKL_HDZ | 32.31\% | GM_HDZ | 33.72\% | GM_HDZ | 36.08\% |
| WNG_HDZ | 28.91\% | FPM_HDZ | 32.93\% | FPM_HDZ | 35.43\% |
| ETSS_HDZ_Ind10 | 25.51\% | PEG_HDZ | 31.50\% | PEG_HDZ | 34.43\% |
| TPDPS_HDZ | 17.35\% | WNG_HDZ | 22.48\% | WNG_HDZ | 24.41\% |
| ETSS_HDZ_25SBM | 9.98\% | ETSS_HDZ_25SBM | 21.26\% | ETSS_HDZ_25SBM | 24.05\% |
| ES_HDZ_25SBM | 1.70\% | ES_HDZ_25SBM | 7.95\% | ES_HDZ_25SBM | 8.45\% |
| ES_HDZ_Ind10 | 1.25\% | ES_HDZ_Ind10 | 7.23\% | ES_HDZ_Ind10 | 6.94\% |


| MEV |  |  |  | RMSE |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| PEG_HDZ | $45.24 \%$ | PE_HDZ | $56.90 \%$ | PE_HDZ | $61.40 \%$ |
| BP_HDZ | $44.90 \%$ | BP_HDZ | $54.82 \%$ | BP_HDZ | $59.60 \%$ |
| GM_HDZ | $43.99 \%$ | GLS_HDZ | $52.81 \%$ | GG_HDZ | $54.19 \%$ |
| PE_HDZ | $43.76 \%$ | GG_HDZ | $51.91 \%$ | GLS_HDZ | $53.98 \%$ |
| MPEG_HDZ | $43.20 \%$ | FGHJ_HDZ | $47.89 \%$ | FGHJ_HDZ | $49.00 \%$ |
| FPM_HDZ | $39.68 \%$ | CT_HDZ | $45.46 \%$ | CT_HDZ | $47.68 \%$ |
| GG_HDZ | $39.46 \%$ | KMY_HDZ | $42.34 \%$ | KMY_HDZ | $44.70 \%$ |
| GLS_HDZ | $37.64 \%$ | DKL_HDZ | $41.79 \%$ | ETSS_HDZ_Ind10 | $43.31 \%$ |
| FGHJ_HDZ | $36.17 \%$ | ETSS_HDZ_Ind10 | $39.92 \%$ | DKL_HDZ | $43.10 \%$ |
| KMY_HDZ | $35.37 \%$ | HL_HDZ | $39.22 \%$ | TPDPS_HDZ | $41.58 \%$ |
| HL_HDZ | $34.81 \%$ | TPDPS_HDZ | $38.67 \%$ | HL_HDZ | $41.09 \%$ |
| CT_HDZ | $33.45 \%$ | MPEG_HDZ | $37.63 \%$ | MPEG_HDZ | $39.71 \%$ |
| DKL_HDZ | $32.20 \%$ | GM_HDZ | $36.73 \%$ | GM_HDZ | $39.36 \%$ |
| WNG_HDZ | $28.80 \%$ | FPM_HDZ | $35.97 \%$ | FPM_HDZ | $38.12 \%$ |
| ETSS_HDZ_Ind10 | $25.51 \%$ | PEG_HDZ | $34.72 \%$ | PEG_HDZ | $37.01 \%$ |
| TPDPS_HDZ | $17.46 \%$ | ETSS_HDZ_25SBM | $24.60 \%$ | ETSS_HDZ_25SBM | $26.96 \%$ |
| ETSS_HDZ_25SBM | $9.98 \%$ | WNG_HDZ | $24.53 \%$ | WNG_HDZ | $25.50 \%$ |
| ES_HDZ_25SBM | $2.04 \%$ | ES_HDZ_25SBM | $9.84 \%$ | ES_HDZ_25SBM | $8.94 \%$ |
| ES_HDZ_Ind10 | $1.25 \%$ | ES_HDZ_Ind10 | $7.69 \%$ | ES_HDZ_Ind10 | $6.51 \%$ |

Continued in next page...

Table 103: Model Confidence Set Summary Results: Market Beta Effect, Continued

| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 58.32\% | BP_RW | 64.07\% | GG_RW | 66.28\% | BP_RW | 58.32\% | BP_RW | 66.67\% | GG_RW | 68.88\% |
| GG_RW | 36.08\% | GG_RW | 63.92\% | BP_RW | 66.21\% | GG_RW | 36.39\% | GG_RW | 66.46\% | BP_RW | 68.33\% |
| KMY_RW | 34.37\% | CT_RW | 50.47\% | CT_RW | 50.89\% | KMY_RW | 34.21\% | CT_RW | 53.01\% | CT_RW | 53.71\% |
| GM_RW | 25.04\% | FGHJ_RW | 43.38\% | FGHJ_RW | 45.53\% | GM_RW | 25.04\% | FGHJ_RW | 45.53\% | FGHJ_RW | 47.96\% |
| CT_RW | 19.28\% | KMY_RW | 42.02\% | KMY_RW | 42.88\% | CT_RW | 19.44\% | KMY_RW | 45.11\% | KMY_RW | 45.95\% |
| FGHJ_RW | 18.97\% | DKL_RW | 35.15\% | GLS_RW | 37.01\% | FGHJ_RW | 18.82\% | DKL_RW | 38.05\% | GLS_RW | 39.71\% |
| HL_RW | 16.33\% | GLS_RW | 34.65\% | DKL_RW | 35.58\% | MPEG_RW | 16.33\% | GLS_RW | 37.49\% | DKL_RW | 37.77\% |
| MPEG_RW | 16.17\% | GM_RW | 31.42\% | GM_RW | 32.64\% | HL_RW | 16.33\% | GM_RW | 34.10\% | GM_RW | 34.93\% |
| DKL_RW | 15.71\% | HL_RW | 30.57\% | HL_RW | 30.21\% | DKL_RW | 15.86\% | HL_RW | 33.19\% | HL_RW | 32.50\% |
| GLS_RW | 14.00\% | TPDPS_RW | 24.70\% | TPDPS_RW | 26.70\% | GLS_RW | 14.15\% | TPDPS_RW | 27.58\% | TPDPS_RW | 29.52\% |
| PE_RW | 10.73\% | MPEG_RW | 23.26\% | MPEG_RW | 24.48\% | PE_RW | 10.89\% | MPEG_RW | 25.57\% | MPEG_RW | 26.75\% |
| PEG_RW | 10.42\% | PEG_RW | 22.83\% | PEG_RW | 24.34\% | PEG_RW | 10.42\% | PEG_RW | 24.74\% | PEG_RW | 25.23\% |
| TPDPS_RW | 10.42\% | ES_RW_Ind10 | 17.25\% | ES_RW_Ind10 | 18.97\% | TPDPS_RW | 10.42\% | ES_RW_Ind10 | 19.68\% | ES_RW_Ind10 | 20.79\% |
| ETSS_RW_Ind10 | 3.11\% | PE_RW | 16.18\% | PE_RW | 16.96\% | ETSS_RW_Ind10 | 3.27\% | PE_RW | 17.53\% | PE_RW | 17.60\% |
| WNG_RW | 2.80\% | ETSS_RW_Ind10 | 14.10\% | ETSS_RW_Ind10 | 13.46\% | WNG_RW | 2.80\% | ETSS_RW_Ind10 | 16.08\% | ETSS_RW_Ind10 | 14.62\% |
| ES_RW_Ind10 | 2.64\% | ETSS_RW_25SBM | 10.38\% | ETSS_RW_25SBM | 9.02\% | ES_RW_Ind10 | 2.64\% | ETSS_RW_25SBM | 12.27\% | ETSS_RW_25SBM | 10.67\% |
| FPM_RW | 1.87\% | ES_RW_25SBM | 8.02\% | ES_RW_25SBM | 8.02\% | FPM_RW | 1.87\% | ES_RW_25SBM | 9.77\% | ES_RW_25SBM | 9.49\% |
| ETSS_RW_25SBM | 1.87\% | WNG_RW | 7.66\% | FPM_RW | 7.09\% | ETSS_RW_25SBM | 1.87\% | FPM_RW | 8.52\% | FPM_RW | 7.90\% |
| ES_RW_25SBM | 0.47\% | FPM_RW | 7.30\% | WNG_RW | 4.58\% | ES_RW_25SBM | 0.31\% | WNG_RW | 8.45\% | WNG_RW | 5.13\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 56.83\% | BP_EP | 62.71\% | BP_EP | 65.57\% | BP_EP | 57.22\% | BP_EP | 64.38\% | BP_EP | 66.74\% |
| PE_EP | 42.15\% | GG_EP | 55.05\% | GG_EP | 56.48\% | PE_EP | 42.15\% | GG_EP | 57.24\% | GG_EP | 58.14\% |
| GM_EP | 34.74\% | KMY_EP | 46.81\% | KMY_EP | 48.46\% | GLS_EP | 34.87\% | KMY_EP | 50.17\% | KMY_EP | 51.07\% |
| GLS_EP | 34.61\% | CT_EP | 40.23\% | CT_EP | 42.30\% | FGHJ_EP | 34.74\% | CT_EP | 43.31\% | CT_EP | 44.70\% |
| FGHJ_EP | 34.48\% | PE_EP | 37.01\% | PE_EP | 39.51\% | GM_EP | 34.61\% | PE_EP | 39.36\% | PE_EP | 41.23\% |
| DKL_EP | 30.91\% | GLS_EP | 34.36\% | GLS_EP | 36.15\% | DKL_EP | 31.16\% | GLS_EP | 36.59\% | GLS_EP | 37.56\% |
| KMY_EP | 30.65\% | DKL_EP | 32.93\% | DKL_EP | 34.36\% | KMY_EP | 31.16\% | DKL_EP | 35.55\% | DKL_EP | 36.52\% |
| HL_EP | 30.14\% | FGHJ_EP | 29.28\% | FGHJ_EP | 31.85\% | HL_EP | 30.65\% | FGHJ_EP | 31.46\% | TPDPS_EP | 34.30\% |
| MPEG_EP | 29.63\% | TPDPS_EP | 29.06\% | TPDPS_EP | 31.78\% | MPEG_EP | 29.37\% | TPDPS_EP | 31.19\% | FGHJ_EP | 33.13\% |
| GG_EP | 25.03\% | GM_EP | 24.84\% | GM_EP | 27.70\% | GG_EP | 25.03\% | GM_EP | 26.26\% | GM_EP | 29.38\% |
| PEG_EP | 24.65\% | HL_EP | 24.48\% | HL_EP | 26.13\% | PEG_EP | 24.65\% | HL_EP | 26.13\% | HL_EP | 27.79\% |
| CT_EP | 21.84\% | PEG_EP | 21.05\% | PEG_EP | 24.62\% | CT_EP | 21.97\% | PEG_EP | 22.66\% | PEG_EP | 26.06\% |
| TPDPS_EP | 16.35\% | MPEG_EP | 16.89\% | MPEG_EP | 18.40\% | TPDPS_EP | 16.09\% | MPEG_EP | 18.09\% | MPEG_EP | 18.78\% |
| ETSS_EP_Ind10 | 7.41\% | ETSS_EP_Ind10 | 10.95\% | ETSS_EP_Ind10 | 11.02\% | ETSS_EP_Ind10 | 7.41\% | ETSS_EP_Ind10 | 11.43\% | ETSS_EP_Ind10 | 11.50\% |
| FPM_EP | 6.90\% | FPM_EP | 6.30\% | ES_EP_Ind10 | 6.80\% | FPM_EP | 6.77\% | FPM_EP | 7.07\% | FPM_EP | 6.65\% |
| ETSS_EP_25SBM | 3.96\% | ES_EP_Ind10 | 6.23\% | FPM_EP | 6.59\% | ETSS_EP_25SBM | 4.21\% | ES_EP_Ind10 | 6.44\% | ES_EP_Ind10 | 6.65\% |
| ES_EP_Ind10 | 1.40\% | ETSS_EP_25SBM | 5.15\% | ETSS_EP_25SBM | 4.87\% | ES_EP_Ind10 | 1.53\% | ETSS_EP_25SBM | 5.89\% | ETSS_EP_25SBM | 5.61\% |
| WNG_EP | 1.28\% | WNG_EP | 4.51\% | WNG_EP | 3.94\% | WNG_EP | 1.28\% | WNG_EP | 4.16\% | WNG_EP | 2.91\% |
| ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.51\% | ES_EP_25SBM | 1.57\% | ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.91\% | ES_EP_25SBM | 1.39\% |

Table 103: Model Confidence Set Summary Results: Market Beta Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 61.79\% | BP_RI | 66.07\% | BP_RI | 67.72\% | BP_RI | 61.79\% | BP_RI | 67.50\% | BP_RI | 69.02\% |
| PE_RI | 45.90\% | GG_RI | 54.62\% | GG_RI | 56.91\% | PE_RI | 45.90\% | GG_RI | 57.17\% | GG_RI | 58.63\% |
| GG_RI | 41.79\% | PE_RI | 42.30\% | KMY_RI | 43.38\% | GG_RI | 41.41\% | KMY_RI | 44.84\% | KMY_RI | 45.88\% |
| FGHJ_RI | 37.56\% | KMY_RI | 42.09\% | PE_RI | 42.30\% | FGHJ_RI | 37.18\% | PE_RI | 44.07\% | PE_RI | 43.94\% |
| GLS_RI | 36.41\% | GLS_RI | 37.87\% | GLS_RI | 41.88\% | GLS_RI | 36.41\% | GLS_RI | 40.19\% | GLS_RI | 43.59\% |
| KMY_RI | 30.38\% | TPDPS_RI | 35.43\% | TPDPS_RI | 37.15\% | KMY_RI | 30.26\% | TPDPS_RI | 37.77\% | TPDPS_RI | 39.29\% |
| GM_RI | 23.59\% | FGHJ_RI | 33.72\% | FGHJ_RI | 36.79\% | GM_RI | 23.33\% | FGHJ_RI | 35.90\% | FGHJ_RI | 38.12\% |
| DKL_RI | 19.36\% | DKL_RI | 28.56\% | DKL_RI | 30.28\% | DKL_RI | 19.36\% | DKL_RI | 30.01\% | DKL_RI | 31.19\% |
| TPDPS_RI | 18.46\% | GM_RI | 25.55\% | GM_RI | 27.34\% | TPDPS_RI | 18.21\% | CT_RI | 27.44\% | CT_RI | 29.31\% |
| MPEG_RI | 17.31\% | CT_RI | 25.27\% | CT_RI | 27.06\% | MPEG_RI | 17.05\% | GM_RI | 26.13\% | GM_RI | 27.72\% |
| HL_RI | 15.38\% | HL_RI | 23.69\% | PEG_RI | 25.70\% | HL_RI | 15.51\% | HL_RI | 24.39\% | HL_RI | 26.06\% |
| PEG_RI | 12.05\% | PEG_RI | 23.26\% | HL_RI | 25.27\% | PEG_RI | 11.92\% | PEG_RI | 23.98\% | PEG_RI | 25.50\% |
| CT_RI | 10.77\% | MPEG_RI | 17.97\% | MPEG_RI | 19.40\% | CT_RI | 10.64\% | MPEG_RI | 18.30\% | MPEG_RI | 18.78\% |
| ETSS_RI_Ind10 | 4.62\% | ETSS_RI_Ind10 | 11.17\% | ETSS_RI_Ind10 | 12.03\% | ETSS_RI_Ind10 | 4.74\% | ETSS_RI_Ind10 | 12.68\% | ETSS_RI_Ind10 | 12.96\% |
| FPM_RI | 2.95\% | FPM_RI | 9.16\% | FPM_RI | 9.66\% | FPM_RI | 2.95\% | FPM_RI | 9.84\% | FPM_RI | 9.84\% |
| ETSS_RI_25SBM | 1.92\% | ETSS_RI_25SBM | 7.37\% | ETSS_RI_25SBM | 7.73\% | ETSS_RI_25SBM | 2.05\% | ETSS_RI_25SBM | 8.25\% | ETSS_RI_25SBM | 8.11\% |
| WNG_RI | 1.03\% | WNG_RI | 3.79\% | WNG_RI | 3.22\% | WNG_RI | 1.03\% | WNG_RI | 4.50\% | WNG_RI | 3.53\% |
| ES_RI_Ind10 | 0.77\% | ES_RI_Ind10 | 3.72\% | ES_RI_Ind10 | 3.15\% | ES_RI_Ind10 | 0.77\% | ES_RI_Ind10 | 4.44\% | ES_RI_Ind10 | 3.12\% |
| ES_RI_25SBM | 0.13\% | ES_RI_25SBM | 2.08\% | ES_RI_25SBM | 1.29\% | ES_RI_25SBM | 0.26\% | ES_RI_25SBM | 2.84\% | ES_RI_25SBM | 1.18\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of market beta. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 104: Model Confidence Set Summary Results: Beta Standard Error Effect

| First Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Panel A: Analysts |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  |
| PE_Anlst | 43.19\% | GLS_Anlst | 52.65\% | PE_Anlst | 54.82\% |
| BP_Anlst | 43.19\% | PE_Anlst | 50.56\% | GLS_Anlst | 54.00\% |
| GG_Anlst | 40.53\% | BP_Anlst | 49.22\% | BP_Anlst | 53.25\% |
| PEG_Anlst | 40.00\% | MPEG_Anlst | 45.56\% | MPEG_Anlst | 47.27\% |
| CT_Anlst | 38.72\% | FGHJ_Anlst | 44.21\% | OHE_Ind10 | 46.75\% |
| KMY_Anlst | 37.13\% | OHE_Ind10 | 43.61\% | ETSS_Anlst_Ind10 | 45.63\% |
| FPM_Anlst | 37.13\% | ETSS_Anlst_Ind10 | 42.94\% | FGHJ_Anlst | 43.84\% |
| OHE_Ind10 | 36.17\% | HL_Anlst | 42.12\% | PEG_Anlst | 43.54\% |
| GLS_Anlst | 35.74\% | DKL_Anlst | 41.97\% | HL_Anlst | 43.47\% |
| MPEG_Anlst | 35.53\% | KMY_Anlst | 41.15\% | DKL_Anlst | 43.02\% |
| GM_Anlst | 34.89\% | GM_Anlst | 41.08\% | CT_Anlst | 42.64\% |
| FGHJ_Anlst | 34.36\% | PEG_Anlst | 40.40\% | GM_Anlst | 42.20\% |
| DKL_Anlst | 33.19\% | CT_Anlst | 40.10\% | KMY_Anlst | 42.12\% |
| ETSS_Anlst_Ind10 | 32.77\% | FPM_Anlst | 37.27\% | FPM_Anlst | 38.46\% |
| HL_Anlst | 32.02\% | Naive | 34.65\% | TPDPS_Anlst | 37.94\% |
| WNG_Anlst | 29.26\% | WNG_Anlst | 34.06\% | Naive | 37.49\% |
| Naive | 15.53\% | TPDPS_Anlst | 33.53\% | OHE_25SBM | 35.47\% |
| TPDPS_Anlst | 15.00\% | OHE_25SBM | 30.10\% | WNG_Anlst | 32.11\% |
| OHE_25SBM | 12.77\% | GG_Anlst | 28.23\% | GG_Anlst | 28.53\% |
| ETSS_Anlst_25SBM | 12.13\% | ETSS_Anlst_25SBM | 25.17\% | ETSS_Anlst_25SBM | 28.30\% |
| ES_Anlst_Ind10 | 8.51\% | ES_Anlst_Ind10 | 13.44\% | ES_Anlst_Ind10 | 14.26\% |
| ES_Anlst_25SBM | 1.91\% | ES_Anlst_25SBM | 5.60\% | ES_Anlst_25SBM | 5.38\% |


| MEV | RMSE |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_Anlst | $43.51 \%$ | GLS_Anlst | $55.55 \%$ | PE_Anlst | MAE |
| PE_Anlst | $43.30 \%$ | PE_Anlst | $53.12 \%$ | GLS_Anlst | $57.49 \%$ |
| GG_Anlst | $40.85 \%$ | BP_Anlst | $51.32 \%$ | BP_Anlst | $55.20 \%$ |
| PEG_Anlst | $40.11 \%$ | MPEG_Anlst | $48.20 \%$ | OHE_Ind10 | $49.51 \%$ |
| CT_Anlst | $38.72 \%$ | OHE_Ind10 | $46.60 \%$ | MPEG_Anlst | $48.68 \%$ |
| KMY_Anlst | $37.66 \%$ | FGHJ_Anlst | $46.26 \%$ | ETSS_Anlst_Ind10 | $47.57 \%$ |
| FPM_Anlst | $37.23 \%$ | ETSS_Anlst_Ind10 | $44.52 \%$ | FGHJ_Anlst | $46.39 \%$ |
| OHE_Ind10 | $36.49 \%$ | HL_Anlst | $44.31 \%$ | PEG_Anlst | $45.77 \%$ |
| MPEG_Anlst | $35.85 \%$ | DKL_Anlst | $43.76 \%$ | HL_Anlst | $45.63 \%$ |
| GLS_Anlst | $35.74 \%$ | GM_Anlst | $43.69 \%$ | DKL_Anlst | $45.28 \%$ |
| GM_Anlst | $35.32 \%$ | PEG_Anlst | $43.27 \%$ | CT_Anlst | $45.01 \%$ |
| FGHJ_Anlst | $34.36 \%$ | CT_Anlst | $42.72 \%$ | GM_Anlst | $44.45 \%$ |
| DKL_Anlst | $33.62 \%$ | KMY_Anlst | $41.82 \%$ | KMY_Anlst | $43.13 \%$ |
| ETSS_Anlst_Ind10 | $33.09 \%$ | FPM_Anlst | $39.94 \%$ | FPM_Anlst | $41.05 \%$ |
| HL_Anlst | $32.45 \%$ | Naive | $36.41 \%$ | Naive | $39.18 \%$ |
| WNG_Anlst | $29.68 \%$ | WNG_Anlst | $35.92 \%$ | TPDPS_Anlst | $39.04 \%$ |
| Naive | $16.06 \%$ | TPDPS_Anlst | $35.71 \%$ | OHE_25SBM | $38.90 \%$ |
| TPDPS_Anlst | $15.64 \%$ | OHE_25SBM | $33.08 \%$ | WNG_Anlst | $33.98 \%$ |
| OHE_25SBM | $13.09 \%$ | GG_Anlst | $29.06 \%$ | ETSS_Anlst_25SBM | $30.44 \%$ |
| ETSS_Anlst_25SBM | $12.55 \%$ | ETSS_Anlst_25SBM | $27.53 \%$ | GG_Anlst | $29.06 \%$ |
| ES_Anlst_Ind10 | $8.94 \%$ | ES_Anlst_Ind10 | $14.29 \%$ | ES_Anlst_Ind10 | $14.84 \%$ |
| ES_Anlst_25SBM | $2.13 \%$ | ES_Anlst_25SBM | $7.21 \%$ | ES_Anlst_25SBM | $6.80 \%$ |


| Panel B: HDZ |  |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: |
| MEV |  |  |  | $54.22 \%$ | PE_HDZ |  |
| PEG_HDZ | $45.46 \%$ | PE_HDZ | $53.17 \%$ | BP_HDZ | $58.40 \%$ |  |
| BP_HDZ | $45.12 \%$ | BP_HDZ | $50.71 \%$ | GLS_HDZ | $58.40 \%$ |  |
| GM_HDZ | $43.76 \%$ | GLS_HDZ | $48.39 \%$ | GG_HDZ | $51.38 \%$ |  |
| PE_HDZ | $43.42 \%$ | GG_HDZ | $45.41 \%$ | FGHJ_HDZ | $45.48 \%$ |  |
| MPEG_HDZ | $42.97 \%$ | FGHJ_HDZ | $42.57 \%$ | CT_HDZ | $44.81 \%$ |  |
| GG_HDZ | $39.68 \%$ | CT_HDZ | $38.76 \%$ | KMY_HDZ | $41.22 \%$ |  |
| FPM_HDZ | $39.68 \%$ | KMY_HDZ | $38.61 \%$ | ETSS_HDZ_Ind10 | $40.70 \%$ |  |
| GLS_HDZ | $37.30 \%$ | DKL_HDZ | ETS_HDZ_Ind10 | $37.86 \%$ | DKL_HDZ |  |
| FGHJ_HDZ | $36.28 \%$ | ETSS_HDZ | $40.33 \%$ |  |  |  |
| KMY_HDZ | $35.49 \%$ | TPDPS_HDZ | $36.82 \%$ | TPDPS_HDZ | $40.25 \%$ |  |
| HL_HDZ | $34.47 \%$ | HL_HDZ | $36.00 \%$ | HL_HDZ | $37.79 \%$ |  |
| CT_HDZ | $33.45 \%$ | MPEG_HDZ | $34.58 \%$ | MPEG_HDZ | $37.12 \%$ |  |
| DKL_HDZ | $32.20 \%$ | GM_HDZ | $33.68 \%$ | GM_HDZ | $36.22 \%$ |  |
| WNG_HDZ | $28.80 \%$ | FPM_HDZ | $32.79 \%$ | PEG_HDZ | $34.88 \%$ |  |
| ETSS_HDZ_Ind10 | $25.40 \%$ | PEG_HDZ | $31.89 \%$ | FPM_HDZ | $34.80 \%$ |  |
| TPDPS_HDZ | $17.23 \%$ | WNG_HDZ | $22.63 \%$ | WNG_HDZ | $24.20 \%$ |  |
| ETSS_HDZ_25SBM | $10.20 \%$ | ETSS_HDZ_25SBM | $21.06 \%$ | ETSS_HDZ_25SBM | $23.45 \%$ |  |
| ES_HDZ_25SBM | $1.81 \%$ | ES_HDZ_25SBM | $7.02 \%$ | ES_HDZ_25SBM | $7.17 \%$ |  |
| ES_HDZ_Ind10 | $1.36 \%$ | ES_HDZ_Ind10 | $6.65 \%$ | ES_HDZ_Ind10 | $6.42 \%$ |  |
|  |  |  |  |  |  |  |


| MEV |  |  |  |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
|  | RMSE |  |  |  |  |
| PEG_HDZ | $45.24 \%$ | PE_HDZ | $56.80 \%$ | PE_HDZ | $61.10 \%$ |
| BP_HDZ | $44.90 \%$ | BP_HDZ | $54.23 \%$ | BP_HDZ | $59.15 \%$ |
| GM_HDZ | $43.88 \%$ | GLS_HDZ | $52.57 \%$ | GG_HDZ | $53.68 \%$ |
| PE_HDZ | $43.42 \%$ | GG_HDZ | $50.90 \%$ | GLS_HDZ | $53.33 \%$ |
| MPEG_HDZ | $42.86 \%$ | FGHJ_HDZ | $47.92 \%$ | FGHJ_HDZ | $48.68 \%$ |
| GG_HDZ | $39.57 \%$ | CT_HDZ | $45.21 \%$ | CT_HDZ | $47.36 \%$ |
| FPM_HDZ | $39.57 \%$ | KMY_HDZ | $42.23 \%$ | KMY_HDZ | $44.17 \%$ |
| GLS_HDZ | $37.41 \%$ | DKL_HDZ | $41.61 \%$ | DKL_HDZ | $43.07 \%$ |
| FGHJ_HDZ | $36.39 \%$ | HL_HDZ | $39.11 \%$ | TPDPS_HDZ | $42.58 \%$ |
| KMY_HDZ | $35.49 \%$ | ETSS_HDZ_Ind10 | $38.90 \%$ | ETSS_HDZ_Ind10 | $42.44 \%$ |
| HL_HDZ | $34.35 \%$ | TPDPS_HDZ | $38.77 \%$ | HL_HDZ | $40.98 \%$ |
| CT_HDZ | $33.33 \%$ | MPEG_HDZ | $37.38 \%$ | MPEG_HDZ | $39.67 \%$ |
| DKL_HDZ | $32.20 \%$ | GM_HDZ | $36.41 \%$ | GM_HDZ | $39.11 \%$ |
| WNG_HDZ | $28.68 \%$ | FPM_HDZ | $35.51 \%$ | FPM_HDZ | $38.07 \%$ |
| ETSS_HDZ_Ind10 | $25.62 \%$ | PEG_HDZ | $34.47 \%$ | PEG_HDZ | $36.62 \%$ |
| TPDPS_HDZ | $17.12 \%$ | WNG_HDZ | $25.24 \%$ | WNG_HDZ | $26.77 \%$ |
| ETSS_HDZ_25SBM | $10.20 \%$ | ETSS_HDZ_25SBM | $24.34 \%$ | ETSS_HDZ_25SBM | $26.07 \%$ |
| ES_HDZ_25SBM | $1.70 \%$ | ES_HDZ_25SBM | $9.43 \%$ | ES_HDZ_25SBM | $9.02 \%$ |
| ES__HDZ_Ind10 | $1.25 \%$ | ES_HDZ_Ind10 | $8.04 \%$ | ES_HDZ_Ind10 | $7.00 \%$ |

Continued in next page...

Table 104: Model Confidence Set Summary Results: Beta Standard Error Effect, Continued
First Quartile Fourth Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RW | 58.32\% | GG_RW | 64.90\% | GG_RW | 67.44\% | BP_RW | 58.32\% | GG_RW | 66.30\% | GG_RW | 69.14\% |
| GG_RW | 36.55\% | BP_RW | 64.53\% | BP_RW | 66.32\% | GG_RW | 36.39\% | BP_RW | 66.30\% | BP_RW | 68.24\% |
| KMY_RW | 34.37\% | CT_RW | 51.01\% | CT_RW | 51.53\% | KMY_RW | 34.21\% | CT_RW | 51.94\% | CT_RW | 53.47\% |
| GM_RW | 25.35\% | FGHJ_RW | 43.32\% | FGHJ_RW | 45.86\% | GM_RW | 25.19\% | FGHJ_RW | 45.35\% | FGHJ_RW | 47.64\% |
| CT_RW | 19.60\% | KMY_RW | 42.79\% | KMY_RW | 43.39\% | CT_RW | 19.60\% | KMY_RW | 44.94\% | KMY_RW | 45.77\% |
| FGHJ_RW | 19.13\% | DKL_RW | 35.85\% | GLS_RW | 36.45\% | FGHJ_RW | 18.97\% | DKL_RW | 38.49\% | GLS_RW | 39.67\% |
| HL_RW | 16.64\% | GLS_RW | 34.50\% | DKL_RW | 35.25\% | HL_RW | 16.64\% | GLS_RW | 37.38\% | DKL_RW | 38.42\% |
| MPEG_RW | 16.49\% | GM_RW | 31.81\% | GM_RW | 33.08\% | MPEG_RW | 16.49\% | GM_RW | 33.63\% | GM_RW | 35.78\% |
| DKL_RW | 15.86\% | HL_RW | 30.62\% | HL_RW | 29.95\% | DKL_RW | 15.86\% | HL_RW | 33.29\% | HL_RW | 32.59\% |
| GLS_RW | 14.31\% | TPDPS_RW | 24.79\% | TPDPS_RW | 26.81\% | GLS_RW | 14.31\% | TPDPS_RW | 26.56\% | TPDPS_RW | 28.85\% |
| PE_RW | 11.04\% | MPEG_RW | 23.60\% | MPEG_RW | 25.69\% | PE_RW | 11.20\% | MPEG_RW | 25.31\% | MPEG_RW | 26.84\% |
| PEG_RW | 10.42\% | PEG_RW | 23.30\% | PEG_RW | 24.65\% | PEG_RW | 10.42\% | PEG_RW | 24.83\% | PEG_RW | 25.45\% |
| TPDPS_RW | 10.42\% | ES_RW_Ind10 | 16.58\% | ES_RW_Ind10 | 18.00\% | TPDPS_RW | 10.42\% | ES_RW_Ind10 | 19.14\% | ES_RW_Ind10 | 20.74\% |
| ETSS_RW_Ind10 | 3.42\% | PE_RW | 15.38\% | PE_RW | 16.06\% | ETSS_RW_Ind10 | 3.42\% | PE_RW | 17.61\% | PE_RW | 17.27\% |
| WNG_RW | 2.80\% | ETSS_RW_Ind10 | 13.67\% | ETSS_RW_Ind10 | 12.62\% | WNG_RW | 2.80\% | ETSS_RW_Ind10 | 15.05\% | ETSS_RW_Ind10 | 14.36\% |
| ES_RW_Ind10 | 2.64\% | ETSS_RW_25SBM | 9.34\% | ETSS_RW_25SBM | 8.14\% | ES_RW_Ind10 | 2.64\% | ETSS_RW_25SBM | 11.10\% | ETSS_RW_25SBM | 10.06\% |
| ETSS_RW_25SBM | 2.02\% | ES_RW_25SBM | 7.54\% | ES_RW_25SBM | 7.24\% | ETSS_RW_25SBM | 2.02\% | ES_RW_25SBM | 9.57\% | ES_RW_25SBM | 8.81\% |
| FPM_RW | 1.87\% | WNG_RW | 7.39\% | FPM_RW | 6.80\% | FPM_RW | 1.87\% | FPM_RW | 9.36\% | FPM_RW | 7.49\% |
| ES_RW_25SBM | 0.47\% | FPM_RW | 7.24\% | WNG_RW | 4.33\% | ES_RW_25SBM | 0.47\% | WNG_RW | 8.81\% | WNG_RW | 4.79\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 57.09\% | BP_EP | 62.88\% | BP_EP | 65.42\% | BP_EP | 56.83\% | BP_EP | 64.42\% | BP_EP | 66.85\% |
| PE_EP | 42.02\% | GG_EP | 55.04\% | GG_EP | 56.46\% | PE_EP | 42.02\% | GG_EP | 57.14\% | GG_EP | 58.11\% |
| GM_EP | 34.87\% | KMY_EP | 47.27\% | KMY_EP | 49.07\% | GLS_EP | 34.74\% | KMY_EP | 50.42\% | KMY_EP | 51.32\% |
| GLS_EP | 34.74\% | CT_EP | 40.40\% | CT_EP | 42.94\% | GM_EP | 34.74\% | CT_EP | 42.86\% | CT_EP | 44.52\% |
| FGHJ_EP | 34.48\% | PE_EP | 36.89\% | PE_EP | 39.43\% | FGHJ_EP | 34.61\% | PE_EP | 39.39\% | PE_EP | 41.47\% |
| DKL_EP | 31.03\% | GLS_EP | 34.20\% | GLS_EP | 36.59\% | DKL_EP | 30.78\% | GLS_EP | 36.62\% | GLS_EP | 38.42\% |
| KMY_EP | 30.78\% | DKL_EP | 32.94\% | DKL_EP | 34.95\% | KMY_EP | 30.52\% | DKL_EP | 35.37\% | DKL_EP | 36.55\% |
| HL_EP | 30.27\% | FGHJ_EP | 29.13\% | TPDPS_EP | 32.41\% | HL_EP | 30.14\% | FGHJ_EP | 31.28\% | TPDPS_EP | 34.26\% |
| MPEG_EP | 29.37\% | TPDPS_EP | 28.98\% | FGHJ_EP | 32.11\% | MPEG_EP | 29.50\% | TPDPS_EP | 31.28\% | FGHJ_EP | 34.05\% |
| GG_EP | 25.29\% | GM_EP | 24.72\% | GM_EP | 28.23\% | GG_EP | 25.16\% | HL_EP | 26.07\% | GM_EP | 29.40\% |
| PEG_EP | 24.90\% | HL_EP | 24.72\% | HL_EP | 26.66\% | PEG_EP | 24.39\% | GM_EP | 25.87\% | HL_EP | 27.39\% |
| CT_EP | 21.84\% | PEG_EP | 21.36\% | PEG_EP | 25.24\% | CT_EP | 21.84\% | PEG_EP | 22.61\% | PEG_EP | 25.73\% |
| TPDPS_EP | 16.09\% | MPEG_EP | 16.43\% | MPEG_EP | 18.07\% | TPDPS_EP | 16.22\% | MPEG_EP | 17.82\% | MPEG_EP | 18.52\% |
| ETSS_EP_Ind10 | 7.41\% | ETSS_EP_Ind10 | 10.08\% | ETSS_EP_Ind10 | 10.75\% | ETSS_EP_Ind10 | 7.28\% | ETSS_EP_Ind10 | 11.65\% | ETSS_EP_Ind10 | 11.93\% |
| FPM_EP | 6.90\% | ES_EP_Ind10 | 5.75\% | ES_EP_Ind10 | 6.72\% | FPM_EP | 6.90\% | FPM_EP | 7.14\% | FPM_EP | 7.14\% |
| ETSS_EP_25SBM | 4.21\% | FPM_EP | 5.53\% | FPM_EP | 6.05\% | ETSS_EP_25SBM | 3.70\% | ES_EP_Ind10 | 7.00\% | ES_EP_Ind10 | 6.66\% |
| ES_EP_Ind10 | 1.53\% | ETSS_EP_25SBM | 4.56\% | ETSS_EP_25SBM | 4.78\% | ES_EP_Ind10 | 1.40\% | ETSS_EP_25SBM | 5.96\% | ETSS_EP_25SBM | 4.99\% |
| WNG_EP | 1.28\% | WNG_EP | 3.66\% | WNG_EP | 3.21\% | WNG_EP | 1.28\% | WNG_EP | 4.09\% | WNG_EP | 3.26\% |
| ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.17\% | ES_EP_25SBM | 1.64\% | ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 3.40\% | ES_EP_25SBM | 1.60\% |

Table 104: Model Confidence Set Summary Results: Beta Standard Error Effect, Continued First Quartile

Fourth Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 61.92\% | BP_RI | 65.65\% | BP_RI | 67.59\% | BP_RI | 61.67\% | BP_RI | 67.34\% | BP_RI | 69.35\% |
| PE_RI | 46.03\% | GG_RI | 54.14\% | GG_RI | 56.24\% | PE_RI | 45.90\% | GG_RI | 56.45\% | GG_RI | 58.18\% |
| GG_RI | 41.67\% | KMY_RI | 41.90\% | KMY_RI | 43.61\% | GG_RI | 41.79\% | KMY_RI | 44.52\% | KMY_RI | 45.42\% |
| FGHJ_RI | 37.69\% | PE_RI | 41.52\% | GLS_RI | 42.05\% | FGHJ_RI | 37.44\% | PE_RI | 44.31\% | PE_RI | 43.83\% |
| GLS_RI | 36.79\% | GLS_RI | 37.94\% | PE_RI | 42.05\% | GLS_RI | 36.79\% | GLS_RI | 40.43\% | GLS_RI | 43.41\% |
| KMY_RI | 30.51\% | TPDPS_RI | 35.55\% | TPDPS_RI | 37.27\% | KMY_RI | 30.90\% | TPDPS_RI | 36.89\% | TPDPS_RI | 39.39\% |
| GM_RI | 23.85\% | FGHJ_RI | 33.61\% | FGHJ_RI | 36.37\% | GM_RI | 23.59\% | FGHJ_RI | 36.20\% | FGHJ_RI | 38.07\% |
| DKL_RI | 19.49\% | DKL_RI | 28.01\% | DKL_RI | 29.95\% | DKL_RI | 19.62\% | DKL_RI | 29.40\% | DKL_RI | 30.93\% |
| TPDPS_RI | 18.59\% | CT_RI | 24.79\% | GM_RI | 27.11\% | TPDPS_RI | 18.72\% | CT_RI | 27.32\% | CT_RI | 29.54\% |
| MPEG_RI | 17.31\% | GM_RI | 24.79\% | CT_RI | 27.04\% | MPEG_RI | 17.18\% | GM_RI | 27.12\% | GM_RI | 28.71\% |
| HL_RI | 15.64\% | HL_RI | 22.85\% | HL_RI | 25.09\% | HL_RI | 15.77\% | HL_RI | 24.48\% | PEG_RI | 26.01\% |
| PEG_RI | 12.05\% | PEG_RI | 22.18\% | PEG_RI | 24.72\% | PEG_RI | 11.92\% | PEG_RI | 23.72\% | HL_RI | 25.94\% |
| CT_RI | 10.77\% | MPEG_RI | 17.33\% | MPEG_RI | 18.82\% | CT_RI | 10.90\% | MPEG_RI | 18.03\% | MPEG_RI | 19.35\% |
| ETSS_RI_Ind10 | 4.74\% | ETSS_RI_Ind10 | 10.53\% | ETSS_RI_Ind10 | 11.95\% | ETSS_RI_Ind10 | 4.74\% | ETSS_RI_Ind10 | 12.90\% | ETSS_RI_Ind10 | 13.31\% |
| FPM_RI | 3.08\% | FPM_RI | 8.89\% | FPM_RI | 9.63\% | FPM_RI | 2.95\% | FPM_RI | 10.33\% | FPM_RI | 10.06\% |
| ETSS_RI_25SBM | 2.18\% | ETSS_RI_25SBM | 7.32\% | ETSS_RI_25SBM | 7.09\% | ETSS_RI_25SBM | 2.05\% | ETSS_RI_25SBM | 8.46\% | ETSS_RI_25SBM | 8.46\% |
| WNG_RI | 1.03\% | ES_RI_Ind10 | 3.51\% | ES_RI_Ind10 | 2.99\% | WNG_RI | 1.03\% | ES_RI_Ind10 | 4.37\% | ES_RI_Ind10 | $3.26 \%$ |
| ES_RI_Ind10 | 0.77\% | WNG_RI | 3.14\% | WNG_RI | 2.69\% | ES_RI_Ind10 | 0.77\% | WNG_RI | 4.02\% | WNG_RI | 3.12\% |
| ES_RI_25SBM | 0.26\% | ES_RI_25SBM | 1.87\% | ES_RI_25SBM | 1.12\% | ES_RI_25SBM | 0.26\% | ES_RI_25SBM | 2.84\% | ES_RI_25SBM | 1.25\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using 5\% significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of market beta standard error as a proxy for firm specific risk. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

Table 105: Model Confidence Set Summary Results: Earnings Variation Effect

| First Quartile |  |  |  |  |  |  |
| :--- | ---: | :--- | :--- | :--- | :--- | :---: |
| MEV |  |  | RMSE | MAE |  |  |
| Panel A: Analysts |  |  |  |  |  |  |
| PE_Anlst | $42.74 \%$ | GLS_Anlst | $55.82 \%$ | PE_Anlst | $57.92 \%$ |  |
| BP_Anlst | $42.74 \%$ | PE_Anlst | $54.04 \%$ | GLS_Anlst | $56.67 \%$ |  |
| GG_Anlst | $40.19 \%$ | BP_Anlst | $51.55 \%$ | BP_Anlst | $55.23 \%$ |  |
| PEG_Anlst | $39.34 \%$ | MPEG_Anlst | $47.93 \%$ | OHE_Ind10 | $50.30 \%$ |  |
| CT_Anlst | $38.28 \%$ | OHE_Ind10 | $47.27 \%$ | MPEG_Anlst | $49.31 \%$ |  |
| KMY_Anlst | $36.90 \%$ | FGHJ_Anlst | $47.07 \%$ | ETSS_Anlst_Ind10 | $47.53 \%$ |  |
| FPM_Anlst | $36.80 \%$ | ETSS_Anlst_Ind10 | $44.51 \%$ | FGHJ_Anlst | $46.94 \%$ |  |
| OHE_Ind10 | $35.95 \%$ | HL_Anlst | $44.44 \%$ | CT_Anlst | $45.83 \%$ |  |
| GLS_Anlst | $35.63 \%$ | DKL_Anlst | $44.44 \%$ | PEG_Anlst | $45.76 \%$ |  |
| MPEG_Anlst | $35.10 \%$ | GM_Anlst | $43.33 \%$ | HL_Anlst | $45.36 \%$ |  |
| GM_Anlst | $34.46 \%$ | PEG_Anlst | $43.20 \%$ | DKL_Anlst | $45.36 \%$ |  |
| FGHJ_Anlst | $34.15 \%$ | CT_Anlst | $42.74 \%$ | GM_Anlst | $44.18 \%$ |  |
| DKL_Anlst | $32.98 \%$ | KMY_Anlst | $42.54 \%$ | KMY_Anlst | $43.92 \%$ |  |
| ETSS_Anlst_Ind10 | $32.87 \%$ | FPM_Anlst | $40.11 \%$ | FPM_Anlst | $41.62 \%$ |  |
| HL_Anlst | $31.81 \%$ | WNG_Anlst | $36.62 \%$ | OHE_25SBM | $39.71 \%$ |  |
| WNG_Anlst | $28.84 \%$ | Naive | $35.96 \%$ | Naive | $39.38 \%$ |  |
| Naive | $15.91 \%$ | TPDPS_Anlst | $35.17 \%$ | TPDPS_Anlst | $38.86 \%$ |  |
| TPDPS_Anlst | $15.27 \%$ | OHE_25SBM | $34.39 \%$ | WNG_Anlst | $35.37 \%$ |  |
| OHE_25SBM | $13.04 \%$ | GG_Anlst | $29.98 \%$ | ETSS_Anlst_25SBM | $30.97 \%$ |  |
| ETSS_Anlst_25SBM | $11.88 \%$ | ETSS_Anlst_25SBM | $28.67 \%$ | GG_Anlst | $29.59 \%$ |  |
| ES_Anlst_Ind10 | $8.91 \%$ | ES_Anlst_Ind10 | $13.94 \%$ | ES_Anlst_Ind10 | $14.73 \%$ |  |
| ES_Anlst_25SBM | $2.12 \%$ | ES_Anlst_25SBM | $8.09 \%$ | ES_Anlst_25SBM | $7.43 \%$ |  |


| MEV |  | RMSE |  | MAE |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| BP_Anlst | $42.74 \%$ | GLS_Anlst | $55.38 \%$ | PE_Anlst | $57.61 \%$ |
| PE_Anlst | $42.42 \%$ | PE_Anlst | $52.95 \%$ | GLS_Anlst | $56.56 \%$ |
| GG_Anlst | $39.98 \%$ | BP_Anlst | $51.38 \%$ | BP_Anlst | $55.58 \%$ |
| PEG_Anlst | $39.66 \%$ | MPEG_Anlst | $47.64 \%$ | OHE_Ind10 | $50.00 \%$ |
| CT_Anlst | $37.96 \%$ | FGHJ_Anlst | $47.18 \%$ | MPEG_Anlst | $48.88 \%$ |
| KMY_Anlst | $36.80 \%$ | OHE_Ind10 | $46.39 \%$ | ETSS_Anlst_Ind10 | $47.97 \%$ |
| FPM_Anlst | $36.48 \%$ | HL_Anlst | $44.42 \%$ | FGHJ_Anlst | $46.85 \%$ |
| OHE_Ind10 | $35.84 \%$ | DKL_Anlst | $44.23 \%$ | HL_Anlst | $45.93 \%$ |
| GLS_Anlst | $35.52 \%$ | ETSS_Anlst_Ind10 | $44.23 \%$ | DKL_Anlst | $45.47 \%$ |
| MPEG_Anlst | $34.99 \%$ | GM_Anlst | $43.37 \%$ | PEG_Anlst | $45.34 \%$ |
| GM_Anlst | $34.15 \%$ | PEG_Anlst | $42.85 \%$ | CT_Anlst | $45.08 \%$ |
| FGHJ_Anlst | $33.83 \%$ | CT_Anlst | $42.65 \%$ | GM_Anlst | $44.09 \%$ |
| ETSS_Anlst_Ind10 | $32.87 \%$ | KMY_Anlst | $42.45 \%$ | KMY_Anlst | $44.03 \%$ |
| DKL_Anlst | $32.66 \%$ | FPM_Anlst | $40.03 \%$ | FPM_Anlst | $41.34 \%$ |
| HL_Anlst | $31.39 \%$ | WNG_Anlst | $36.55 \%$ | TPDPS_Anlst | $39.37 \%$ |
| WNG_Anlst | $28.84 \%$ | Naive | $35.76 \%$ | OHE_25SBM | $38.98 \%$ |
| Naive | $15.80 \%$ | TPDPS_Anlst | $35.43 \%$ | Naive | $38.98 \%$ |
| TPDPS_Anlst | $15.27 \%$ | OHE_25SBM | $34.12 \%$ | WNG_Anlst | $34.84 \%$ |
| OHE_25SBM | $13.04 \%$ | GG_Anlst | $29.33 \%$ | ETSS_Anlst_25SBM | $31.04 \%$ |
| ETSS_Anlst_25SBM | $11.88 \%$ | ETSS_Anlst_25SBM | $27.62 \%$ | GG_Anlst | $29.72 \%$ |
| ES_Anlst_Ind10 | $9.01 \%$ | ES_Anlst_Ind10 | $13.71 \%$ | ES_Anlst_Ind10 | $14.96 \%$ |
| ES_Anlst_25SBM | $2.12 \%$ | ES_Anlst_25SBM | $7.81 \%$ | ES_Anlst_25SBM | $7.87 \%$ |


| Panel B: HDZ |  |  | RMSE |  |  |
| :--- | ---: | :--- | ---: | :--- | ---: |
| MEV |  |  |  | MAE |  |
| PEG_HDZ | $45.01 \%$ | PE_HDZ | $57.59 \%$ | PE_HDZ | $62.13 \%$ |
| BP_HDZ | $43.99 \%$ | GLS_HDZ | $54.11 \%$ | BP_HDZ | $59.57 \%$ |
| GM_HDZ | $43.42 \%$ | BP_HDZ | $54.04 \%$ | GLS_HDZ | $54.64 \%$ |
| PE_HDZ | $42.97 \%$ | GG_HDZ | $51.28 \%$ | GG_HDZ | $54.31 \%$ |
| MPEG_HDZ | $42.40 \%$ | FGHJ_HDZ | $48.26 \%$ | FGHJ_HDZ | $49.90 \%$ |
| FPM_HDZ | $39.00 \%$ | CT_HDZ | $46.09 \%$ | CT_HDZ | $47.93 \%$ |
| GG_HDZ | $38.78 \%$ | DKL_HDZ | $42.14 \%$ | KMY_HDZ | $44.71 \%$ |
| GLS_HDZ | $37.07 \%$ | KMY_HDZ | $41.95 \%$ | DKL_HDZ | $43.33 \%$ |
| FGHJ_HDZ | $35.49 \%$ | HL_HDZ | $39.45 \%$ | TPDPS_HDZ | $42.93 \%$ |
| KMY_HDZ | $34.69 \%$ | ETSS_HDZ_Ind10 | $39.25 \%$ | ETSS_HDZ_Ind10 | $42.67 \%$ |
| HL_HDZ | $34.01 \%$ | TPDPS_HDZ | $38.79 \%$ | HL_HDZ | $41.29 \%$ |
| CT_HDZ | $32.99 \%$ | MPEG_HDZ | $37.67 \%$ | MPEG_HDZ | $39.97 \%$ |
| DKL_HDZ | $31.75 \%$ | GM_HDZ | $36.69 \%$ | FPM_HDZ | $39.18 \%$ |
| WNG_HDZ | $28.80 \%$ | FPM_HDZ | $36.49 \%$ | GM_HDZ | $38.92 \%$ |
| ETSS_HDZ_Ind10 | $25.06 \%$ | PEG_HDZ | $33.86 \%$ | PEG_HDZ | $36.75 \%$ |
| TPDPS_HDZ | $17.01 \%$ | WNG_HDZ | $24.85 \%$ | ETSS_HDZ_25SBM | $28.07 \%$ |
| ETSS_HDZ_25SBM | $9.98 \%$ | ETSS_HDZ_25SBM | $24.33 \%$ | WNG_HDZ | $26.43 \%$ |
| ES_HDZ_25SBM | $1.70 \%$ | ES_HDZ_25SBM | $9.07 \%$ | ES_HDZ_25SBM | $8.81 \%$ |
| ES_HDZ_Ind10 | $1.36 \%$ | ES_HDZ_Ind10 | $7.30 \%$ | ES_HDZ_Ind10 | $6.77 \%$ |


| MEV |  |  |  |  |  |  |  |  | RMSE |  |
| :--- | ---: | :--- | ---: | :--- | ---: | :---: | :---: | :---: | :---: | :---: |
| PEG_HDZ | $45.12 \%$ | PE_HDZ | $57.35 \%$ | PE_HDZ | $61.61 \%$ |  |  |  |  |  |
| BP_HDZ | $44.22 \%$ | BP_HDZ | $54.86 \%$ | BP_HDZ | $59.65 \%$ |  |  |  |  |  |
| GM_HDZ | $43.20 \%$ | GLS_HDZ | $53.28 \%$ | GLS_HDZ | $54.27 \%$ |  |  |  |  |  |
| PE_HDZ | $43.20 \%$ | GG_HDZ | $50.52 \%$ | GG_HDZ | $53.74 \%$ |  |  |  |  |  |
| MPEG_HDZ | $42.40 \%$ | FGHJ_HDZ | $48.10 \%$ | FGHJ_HDZ | $48.56 \%$ |  |  |  |  |  |
| FPM_HDZ | $39.12 \%$ | CT_HDZ | $44.55 \%$ | CT_HDZ | $46.92 \%$ |  |  |  |  |  |
| GG_HDZ | $39.00 \%$ | DKL_HDZ | $42.06 \%$ | KMY_HDZ | $43.31 \%$ |  |  |  |  |  |
| GLS_HDZ | $36.85 \%$ | KMY_HDZ | $41.21 \%$ | DKL_HDZ | $42.72 \%$ |  |  |  |  |  |
| FGHJ_HDZ | $35.49 \%$ | ETSS_HDZ_Ind10 | $39.30 \%$ | ETSS_HDZ_Ind10 | $42.65 \%$ |  |  |  |  |  |
| KMY_HDZ | $34.58 \%$ | HL_HDZ | $38.91 \%$ | TPDPS_HDZ | $42.26 \%$ |  |  |  |  |  |
| HL_HDZ | $33.90 \%$ | TPDPS_HDZ | $38.25 \%$ | HL_HDZ | $40.88 \%$ |  |  |  |  |  |
| CT_HDZ | $32.99 \%$ | MPEG_HDZ | $37.20 \%$ | MPEG_HDZ | $39.44 \%$ |  |  |  |  |  |
| DKL_HDZ | $31.41 \%$ | FPM_HDZ | $36.61 \%$ | GM_HDZ | $38.58 \%$ |  |  |  |  |  |
| WNG_HDZ | $28.80 \%$ | GM_HDZ | $36.09 \%$ | FPM_HDZ | $38.45 \%$ |  |  |  |  |  |
| ETSS_HDZ_Ind10 | $24.94 \%$ | PEG_HDZ | $33.92 \%$ | PEG_HDZ | $37.01 \%$ |  |  |  |  |  |
| TPDPS_HDZ | $16.89 \%$ | ETSS_HDZ_25SBM | $25.33 \%$ | ETSS_HDZ_25SBM | $27.30 \%$ |  |  |  |  |  |
| ETSS_HDZ_25SBM | $9.86 \%$ | WNG_HDZ | $24.67 \%$ | WNG_HDZ | $26.38 \%$ |  |  |  |  |  |
| ES_HDZ_25SBM | $1.59 \%$ | ES_HDZ_25SBM | $9.84 \%$ | ES_HDZ_25SBM | $9.25 \%$ |  |  |  |  |  |
| ES_HDZ_Ind10 | $1.36 \%$ | ES_HDZ_Ind10 | $8.33 \%$ | ES_HDZ_Ind10 | $7.15 \%$ |  |  |  |  |  |

Continued in next page...

Table 105: Model Confidence Set Summary Results: Earnings Variation Effect, Continued
First Quartile Fourth Quartile

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel C: RW |  |  |  |  |  | MEV |  | RMSE |  |  |  |
| MEV |  | RMSE |  | MAE |  |  |  | MAE |
| BP_RW | 57.72\% | BP_RW | 67.26\% | GG_RW | 69.76\% | BP_RW | 57.72\% |  |  | BP_RW | 67.98\% | GG_RW | 69.42\% |
| GG_RW | 35.73\% | GG_RW | 66.54\% | BP_RW | 68.77\% | GG_RW | 36.04\% | GG_RW | 66.60\% | BP_RW | 69.03\% |
| KMY_RW | 34.17\% | CT_RW | 54.04\% | CT_RW | 54.11\% | KMY_RW | 34.01\% | CT_RW | 54.20\% | CT_RW | 54.86\% |
| GM_RW | 24.34\% | FGHJ_RW | 46.42\% | FGHJ_RW | 49.11\% | GM_RW | 24.49\% | FGHJ_RW | 47.38\% | FGHJ_RW | 49.28\% |
| CT_RW | 19.19\% | KMY_RW | 46.02\% | KMY_RW | 46.02\% | CT_RW | 19.34\% | KMY_RW | 45.67\% | KMY_RW | 46.06\% |
| FGHJ_RW | 18.72\% | DKL_RW | 40.11\% | GLS_RW | 40.63\% | FGHJ_RW | 18.41\% | GLS_RW | 39.63\% | GLS_RW | 41.14\% |
| HL_RW | 16.54\% | GLS_RW | 38.99\% | DKL_RW | 39.25\% | HL_RW | 16.54\% | DKL_RW | 39.57\% | DKL_RW | 39.37\% |
| MPEG_RW | 15.91\% | HL_RW | 34.52\% | GM_RW | 35.24\% | MPEG_RW | 16.07\% | GM_RW | 34.84\% | GM_RW | 34.12\% |
| DKL_RW | 15.91\% | GM_RW | 34.39\% | HL_RW | 33.14\% | DKL_RW | 15.60\% | HL_RW | 34.84\% | HL_RW | 33.66\% |
| GLS_RW | 13.57\% | TPDPS_RW | 28.53\% | TPDPS_RW | 30.11\% | GLS_RW | 13.57\% | TPDPS_RW | 28.48\% | TPDPS_RW | 30.51\% |
| PE_RW | 10.76\% | MPEG_RW | 26.04\% | MPEG_RW | 27.22\% | PE_RW | 10.76\% | MPEG_RW | 25.72\% | MPEG_RW | 26.51\% |
| TPDPS_RW | 10.45\% | PEG_RW | 25.12\% | PEG_RW | 25.38\% | TPDPS_RW | 10.61\% | PEG_RW | 25.07\% | PEG_RW | 25.46\% |
| PEG_RW | 10.30\% | ES_RW_Ind10 | 19.59\% | ES_RW_Ind10 | 21.04\% | PEG_RW | 10.30\% | ES_RW_Ind10 | 19.75\% | ES_RW_Ind10 | 21.39\% |
| ETSS_RW_Ind10 | 3.28\% | PE_RW | 18.08\% | PE_RW | 17.95\% | ETSS_RW_Ind10 | 3.12\% | PE_RW | 17.45\% | PE_RW | 16.99\% |
| ES_RW_Ind10 | 2.81\% | ETSS_RW_Ind10 | 15.45\% | ETSS_RW_Ind10 | 14.60\% | ES_RW_Ind10 | 2.81\% | ETSS_RW_Ind10 | 15.55\% | ETSS_RW_Ind10 | 14.96\% |
| WNG_RW | 2.65\% | ETSS_RW_25SBM | 11.77\% | ETSS_RW_25SBM | 11.05\% | WNG_RW | 2.65\% | ETSS_RW_25SBM | 11.75\% | ETSS_RW_25SBM | 11.29\% |
| FPM_RW | 1.87\% | ES_RW_25SBM | 10.26\% | ES_RW_25SBM | 9.86\% | FPM_RW | 1.87\% | ES_RW_25SBM | 10.50\% | ES_RW_25SBM | 9.71\% |
| ETSS_RW_25SBM | 1.87\% | FPM_RW | 9.47\% | FPM_RW | 8.28\% | ETSS_RW_25SBM | 1.87\% | FPM_RW | 8.53\% | FPM_RW | 8.14\% |
| ES_RW_25SBM | 0.31\% | WNG_RW | 7.96\% | WNG_RW | 4.47\% | ES_RW_25SBM | 0.31\% | WNG_RW | 7.81\% | WNG_RW | 4.46\% |
| Panel D: EP |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_EP | 57.38\% | BP_EP | 64.56\% | BP_EP | 66.80\% | BP_EP | 57.51\% | BP_EP | 64.63\% | BP_EP | 66.93\% |
| PE_EP | 41.72\% | GG_EP | 57.07\% | GG_EP | 57.73\% | PE_EP | 41.98\% | GG_EP | 57.28\% | GG_EP | 57.61\% |
| GM_EP | 34.53\% | KMY_EP | 51.02\% | KMY_EP | 51.74\% | GLS_EP | 34.79\% | KMY_EP | 50.85\% | KMY_EP | 51.71\% |
| GLS_EP | 34.40\% | CT_EP | 43.46\% | CT_EP | 44.84\% | GM_EP | 34.66\% | CT_EP | 43.31\% | CT_EP | 44.49\% |
| FGHJ_EP | 34.15\% | PE_EP | 41.09\% | PE_EP | 43.39\% | FGHJ_EP | 34.66\% | PE_EP | 41.01\% | PE_EP | 43.64\% |
| DKL_EP | 31.07\% | GLS_EP | 37.21\% | GLS_EP | 38.13\% | DKL_EP | 31.07\% | GLS_EP | 37.86\% | GLS_EP | 38.19\% |
| KMY_EP | 30.55\% | DKL_EP | 35.37\% | DKL_EP | 36.88\% | KMY_EP | 30.55\% | DKL_EP | 35.70\% | DKL_EP | 36.48\% |
| HL_EP | 29.65\% | FGHJ_EP | 32.41\% | FGHJ_EP | 34.25\% | HL_EP | 30.04\% | FGHJ_EP | 32.28\% | FGHJ_EP | 33.92\% |
| MPEG_EP | 29.40\% | TPDPS_EP | 31.89\% | TPDPS_EP | $33.66 \%$ | MPEG_EP | 29.53\% | TPDPS_EP | 31.10\% | TPDPS_EP | 33.92\% |
| GG_EP | 24.90\% | GM_EP | 26.89\% | GM_EP | 30.05\% | GG_EP | 24.78\% | HL_EP | 26.44\% | GM_EP | 29.53\% |
| PEG_EP | 24.78\% | HL_EP | 26.36\% | HL_EP | 28.21\% | PEG_EP | 24.52\% | GM_EP | 26.31\% | HL_EP | 28.41\% |
| CT_EP | 21.57\% | PEG_EP | 22.29\% | PEG_EP | 25.90\% | CT_EP | 21.69\% | PEG_EP | 22.38\% | PEG_EP | 25.85\% |
| TPDPS_EP | 16.17\% | MPEG_EP | 17.88\% | MPEG_EP | 18.93\% | TPDPS_EP | 16.05\% | MPEG_EP | 17.45\% | MPEG_EP | 18.96\% |
| ETSS_EP_Ind10 | 7.19\% | ETSS_EP_Ind10 | 11.70\% | ETSS_EP_Ind10 | 12.43\% | ETSS_EP_Ind10 | 6.93\% | ETSS_EP_Ind10 | 11.02\% | ETSS_EP_Ind10 | 11.94\% |
| FPM_EP | 6.80\% | FPM_EP | 7.50\% | FPM_EP | 7.23\% | FPM_EP | 6.55\% | FPM_EP | 7.09\% | FPM_EP | 6.82\% |
| ETSS_EP_25SBM | 3.85\% | ES_EP_Ind10 | 6.64\% | ES_EP_Ind10 | 6.44\% | ETSS_EP_25SBM | 3.59\% | ES_EP_Ind10 | 5.97\% | ES_EP_Ind10 | 6.43\% |
| ES_EP_Ind10 | 1.54\% | ETSS_EP_25SBM | 6.25\% | ETSS_EP_25SBM | 5.52\% | ES_EP_Ind10 | 1.41\% | ETSS_EP_25SBM | 5.51\% | ETSS_EP_25SBM | 5.64\% |
| WNG_EP | 1.28\% | WNG_EP | 4.14\% | WNG_EP | 3.68\% | WNG_EP | 1.28\% | WNG_EP | 3.94\% | WNG_EP | 3.35\% |
| ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.76\% | ES_EP_25SBM | 1.58\% | ES_EP_25SBM | 0.13\% | ES_EP_25SBM | 2.69\% | ES_EP_25SBM | 1.38\% |

Table 105: Model Confidence Set Summary Results: Earnings Variation Effect, Continued

| First Quartile |  |  |  |  |  | Fourth Quartile |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Panel E: RI |  |  |  |  |  |  |  |  |  |  |  |
| MEV |  | RMSE |  | MAE |  | MEV |  | RMSE |  | MAE |  |
| BP_RI | 61.83\% | BP_RI | 67.78\% | BP_RI | 68.64\% | BP_RI | 61.83\% | BP_RI | 66.99\% | BP_RI | 69.03\% |
| PE_RI | 45.63\% | GG_RI | 57.26\% | GG_RI | 58.45\% | PE_RI | 45.50\% | GG_RI | 57.15\% | GG_RI | 58.99\% |
| GG_RI | 41.00\% | PE_RI | 46.09\% | KMY_RI | 46.55\% | GG_RI | 41.26\% | PE_RI | 46.00\% | KMY_RI | 47.05\% |
| FGHJ_RI | $36.89 \%$ | KMY_RI | 45.50\% | PE_RI | 45.96\% | FGHJ_RI | 37.02\% | KMY_RI | 45.87\% | PE_RI | 45.73\% |
| GLS_RI | 36.12\% | GLS_RI | 41.55\% | GLS_RI | 44.58\% | GLS_RI | 36.25\% | GLS_RI | 41.27\% | GLS_RI | 44.23\% |
| KMY_RI | 29.69\% | TPDPS_RI | 37.87\% | FGHJ_RI | 39.97\% | KMY_RI | 30.08\% | TPDPS_RI | 37.80\% | TPDPS_RI | 39.04\% |
| GM_RI | 23.14\% | FGHJ_RI | 37.34\% | TPDPS_RI | 39.58\% | GM_RI | 23.01\% | FGHJ_RI | 36.42\% | FGHJ_RI | 38.52\% |
| DKL_RI | 19.15\% | DKL_RI | 31.36\% | DKL_RI | 33.00\% | DKL_RI | 19.15\% | DKL_RI | 31.30\% | DKL_RI | 32.55\% |
| TPDPS_RI | 17.99\% | GM_RI | 27.88\% | GM_RI | 29.52\% | TPDPS_RI | 18.12\% | CT_RI | 27.69\% | GM_RI | 29.20\% |
| MPEG_RI | 17.22\% | CT_RI | 27.42\% | CT_RI | 28.47\% | MPEG_RI | 17.22\% | GM_RI | 27.30\% | CT_RI | 28.35\% |
| HL_RI | 15.04\% | HL_RI | 26.10\% | HL_RI | 27.81\% | HL_RI | 15.17\% | HL_RI | 25.79\% | HL_RI | 27.36\% |
| PEG_RI | 11.95\% | PEG_RI | 25.05\% | PEG_RI | 27.02\% | PEG_RI | 11.95\% | PEG_RI | 24.54\% | PEG_RI | 26.18\% |
| CT_RI | 10.54\% | MPEG_RI | 19.13\% | MPEG_RI | 20.18\% | CT_RI | 10.67\% | MPEG_RI | 18.50\% | MPEG_RI | 19.42\% |
| ETSS_RI_Ind 10 | 4.63\% | ETSS_RI_Ind10 | 13.48\% | ETSS_RI_Ind10 | 14.00\% | ETSS_RI_Ind10 | 4.50\% | ETSS_RI_Ind10 | 12.53\% | ETSS_RI_Ind10 | 13.85\% |
| FPM_RI | 2.96\% | FPM_RI | 9.99\% | FPM_RI | 10.78\% | FPM_RI | 2.83\% | FPM_RI | 10.30\% | FPM_RI | 10.43\% |
| ETSS_RI_25SBM | 1.93\% | ETSS_RI_25SBM | 9.47\% | ETSS_RI_25SBM | 9.60\% | ETSS_RI_25SBM | 1.80\% | ETSS_RI_25SBM | 8.73\% | ETSS_RI_25SBM | 8.79\% |
| WNG_RI | 1.03\% | ES_RI_Ind10 | 4.67\% | WNG_RI | 3.42\% | WNG_RI | 1.03\% | ES_RI_Ind10 | 4.66\% | WNG_RI | 3.54\% |
| ES_RI_Ind10 | 0.64\% | WNG_RI | 4.34\% | ES_RI_Ind10 | 3.22\% | ES_RI_Ind10 | 0.64\% | WNG_RI | 4.53\% | ES_RI_Ind10 | 2.95\% |
| ES_RI_25SBM | 0.26\% | ES_RI_25SBM | 3.29\% | ES_RI_25SBM | 1.05\% | ES_RI_25SBM | 0.13\% | ES_RI_25SBM | 2.89\% | ES_RI_25SBM | 1.12\% |

Using firm level data, this table reports summary results of the Model Confidence Set (MCS) test using $5 \%$ significance level and three loss functions: the measurement error variance(MEV), the Root Mean Squared Error (RMSE), and Mean Absolute Error (MAE) for the highest and lowest quartiles of firms in terms of earnings variation. The table reports the percentage of firms for which a specific model is included in the confidence set. Panel A report the results for the ICC models estimated using analysts earnings forecasts. Panel B, C, D and E report the results using ICC estimates based on mechanical earnings forecasts of Hou, van Dijk, and Zhang (2012) model (HDZ), random walk (RW) model, Li and Mohanram (2014) Earnings Persistence model (EP), and (3) Li and Mohanram (2014) Residual Income model (RI) respectively.

## Appendix B Improving Portfolio Selection Appendixes

Table 106: Out-of-Sample performance of ICC Optimal Portfolios

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_RW | 0.222 | 0.067 | 0.853 | 4.013 | 0.000 | 0.017 | 0.001 |
| PE_HDZ_Clbrtd | 0.301 | 0.138 | 0.810 | 3.609 | 0.000 | 0.097 | 0.010 |
| CT_HDZ_Clbrtd | 0.159 | 0.042 | 0.772 | 2.277 | 0.000 | 0.091 | 0.007 |
| PE_RW | 0.179 | 0.058 | 0.743 | 3.709 | 0.000 | 0.094 | 0.005 |
| DKL_HDZ_Clbrtd | 0.156 | 0.048 | 0.712 | 2.158 | 0.000 | 0.156 | 0.010 |
| HL_HDZ_Clbrtd | $0.170$ | 0.059 | 0.700 | 2.461 | 0.000 | 0.206 | 0.017 |
| FPM_RW | $0.352$ | 0.255 | 0.696 | 9.471 | 0.000 | 0.348 | 0.102 |
| FGHJ_HDZ_Clbrtd | $0.130$ | 0.035 | 0.695 | 1.683 | 0.000 | 0.088 | 0.005 |
| GLS_HDZ_Clbrtd | 0.135 | 0.039 | 0.689 | 1.892 | 0.000 | 0.125 | 0.008 |
| FGHJ_EP_Clbrtd | 0.126 | 0.035 | 0.672 | 1.464 | 0.000 | 0.068 | $0.007$ |
| FGHJ_EP | $0.164$ | $0.061$ | $0.666$ | 3.244 | $0.000$ | 0.170 | $0.009$ |
| KMY_EP | $0.270$ | 0.177 | 0.641 | 4.132 | 0.000 | 0.295 | 0.029 |
| PEG_RI_Clbrtd | 0.132 | 0.043 | 0.637 | 2.262 | 0.000 | 0.344 | 0.051 |
| HL_EP | 0.196 | 0.098 | 0.626 | 2.858 | 0.000 | 0.289 | $0.022$ |
| MPEG_RI | $0.138$ | $0.050$ | $0.618$ | 2.625 | $0.000$ | 0.295 | $0.032$ |
| GM_RI | 0.124 | 0.041 | 0.615 | 2.582 | 0.000 | 0.391 | 0.053 |
| CT_HDZ | 0.138 | 0.051 | 0.612 | 3.317 | 0.000 | 0.401 | $0.070$ |
| GLS_HDZ | 0.138 | 0.053 | 0.600 | 3.251 | 0.000 | 0.380 | $0.056$ |
| GG_HDZ | $0.181$ | $0.092$ | $0.597$ | 4.174 | $0.000$ | 0.528 | 0.120 |
| GLS_EP | 0.137 | $0.053$ | $0.593$ | 3.521 | 0.000 | $0.458$ | 0.067 |
| KMY_HDZ | 0.134 | 0.052 | 0.587 | 2.960 | 0.000 | 0.435 | $0.072$ |
| KMY_Anlst _Clbrtd | 0.090 | 0.025 | 0.571 | 1.325 | 0.000 | 0.033 | 0.011 |
| GM_Anlst _Clbrtd | 0.093 | 0.028 | 0.557 | 1.648 | 0.001 | 0.183 | 0.003 |
| DKL_EP | 0.224 | 0.163 | 0.556 | 3.147 | 0.000 | 0.520 | 0.058 |
| GLS_Anlst _Clbrtd | 0.092 | 0.028 | 0.548 | 1.628 | 0.001 | 0.197 | 0.009 |
| FGHJ_Anlst _Clbrtd | 0.088 | 0.026 | 0.547 | 1.448 | 0.001 | 0.101 | 0.007 |
| HL_Anlst _Clbrtd | 0.090 | 0.027 | 0.547 | 1.542 | 0.001 | 0.182 | 0.003 |
| DKL_Anlst _Clbrtd | 0.089 | 0.027 | 0.547 | 1.509 | 0.001 | 0.161 | 0.005 |
| GLS_EP_Clbrtd | 0.102 | 0.036 | 0.541 | 1.673 | 0.000 | 0.396 | 0.040 |
| CT_Anlst _Clbrtd | 0.089 | 0.027 | 0.540 | 1.639 | 0.001 | 0.266 | 0.014 |

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Table 106 : Out-of-Sample performance of ICC Optimal Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_HDZ | 0.112 | 0.045 | 0.531 | 2.840 | 0.000 | 0.611 | 0.120 |
| PEG_RW_Clbrtd | 0.183 | 0.121 | 0.525 | 3.423 | 0.000 | 0.668 | 0.120 |
| FGHJ_HDZ | 0.111 | 0.045 | 0.525 | 2.729 | 0.000 | 0.630 | 0.120 |
| FPM_HDZ_Clbrtd | 0.093 | 0.033 | 0.514 | 1.373 | 0.001 | 0.574 | 0.062 |
| BP_HDZ_Clbrtd | 0.803 | 2.455 | 0.512 | 9.965 | 0.000 | 0.769 | 0.189 |
| KMY_HDZ_Clbrtd | 0.158 | 0.095 | 0.511 | 3.250 | 0.002 | 0.794 | 0.233 |
| MPEG_Anlst _Clbrtd | 0.092 | 0.035 | 0.491 | 2.384 | 0.002 | 0.708 | 0.034 |
| CT_RI | 0.193 | 0.160 | 0.481 | 8.034 | 0.001 | 0.872 | 0.302 |
| MPEG_EP | 0.092 | 0.037 | 0.479 | 2.405 | 0.002 | 0.783 | 0.110 |
| HL_HDZ | 0.101 | 0.045 | 0.477 | 2.810 | 0.001 | 0.831 | 0.191 |
| GG_Anlst _Clbrtd | 0.076 | 0.026 | 0.469 | 1.580 | 0.001 | 0.662 | 0.034 |
| TrES_HDZ_10Ind | 1.013 | 4.705 | 0.467 | 60.728 | 0.000 | 0.905 | 0.284 |
| PE_Anlst _Clbrtd | 0.107 | 0.053 | 0.466 | 3.297 | 0.001 | 0.889 | 0.232 |
| CT_RW | 0.102 | 0.052 | 0.447 | 3.640 | 0.001 | 0.953 | 0.203 |
| minimum-variance | 0.068 | 0.024 | 0.437 | 1.173 | 0.002 | 1.000 | 0.072 |
| GLS_Anlst | 0.086 | 0.039 | 0.433 | 2.684 | 0.002 | 0.980 | 0.175 |
| BP_EP | 0.326 | 0.567 | 0.433 | 18.275 | 0.000 | 0.986 | 0.359 |
| MPEG_RW | 0.091 | 0.044 | 0.432 | 2.956 | 0.002 | 0.976 | 0.191 |
| HL_RI | 0.496 | 1.325 | 0.431 | 10.768 | 0.000 | 0.978 | 0.310 |
| FPM_RW_Clbrtd | 0.307 | 0.521 | 0.426 | 11.081 | 0.000 | 0.965 | 0.423 |
| FPM_Anlst_Clbrtd | 0.069 | 0.027 | 0.423 | 1.148 | 0.003 | 0.859 | 0.048 |
| DKL_RW_Clbrtd | 0.068 | 0.027 | 0.412 | 1.890 | 0.004 | 0.737 | 0.100 |
| FPM_Anlst | 0.065 | 0.027 | 0.397 | 1.829 | 0.004 | 0.718 | 0.155 |
| MPEG_EP_Clbrtd | 0.860 | 4.713 | 0.396 | 9.778 | 0.000 | 0.871 | 0.404 |
| KMY_RW | 0.124 | 0.104 | 0.384 | 14.360 | 0.004 | 0.799 | 0.323 |
| KMY_Anlst | 0.065 | 0.029 | 0.381 | 1.765 | 0.005 | 0.608 | 0.120 |
| FGHJ_Anlst | 0.069 | 0.033 | 0.380 | 2.213 | 0.005 | 0.696 | 0.256 |
| FPM_HDZ | 0.070 | 0.034 | 0.379 | 2.295 | 0.004 | 0.720 | 0.370 |
| GG_Anlst | 0.066 | 0.030 | 0.378 | 1.850 | 0.005 | 0.591 | 0.137 |
| GM_RW | 0.096 | 0.066 | 0.374 | 3.641 | 0.004 | 0.745 | 0.355 |
| DKL_RI | 1.019 | 7.608 | 0.369 | 26.290 | 0.000 | 0.795 | 0.479 |
| PEG_EP | 0.267 | 0.524 | 0.368 | 15.806 | 0.002 | 0.839 | 0.570 |

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Table 106 : Out-of-Sample performance of ICC Optimal Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_Anlst | 0.066 | 0.032 | 0.366 | 2.113 | 0.006 | 0.629 | 0.238 |
| GM_EP | 0.071 | 0.038 | 0.364 | 2.345 | 0.007 | 0.704 | 0.368 |
| PE_EP_Clbrtd | 0.336 | 0.936 | 0.347 | 75,607.777 | 0.005 | 0.758 | 0.582 |
| HL_Anlst | 0.063 | 0.033 | 0.346 | 2.161 | 0.008 | 0.558 | 0.299 |
| GM_Anlst | 0.062 | 0.033 | 0.342 | 2.108 | 0.008 | 0.535 | 0.320 |
| MPEG_HDZ | 0.075 | 0.049 | 0.338 | 2.939 | 0.005 | 0.603 | 0.495 |
| GLS_RW | 1.364 | 16.380 | 0.337 | 25.591 | 0.000 | 0.703 | 0.545 |
| TrES_Anlst _10Ind | 0.799 | 5.644 | 0.336 | 30.372 | 0.000 | 0.722 | 0.585 |
| DKL_EP_Clbrtd | 0.195 | 0.340 | 0.335 | 2.250 | 0.000 | 0.616 | 0.498 |
| GM_RI_Clbrtd | 0.521 | 2.639 | 0.320 | 13.638 | 0.002 | 0.765 | 0.728 |
| DKL_RW | 0.110 | 0.130 | 0.307 | 16.403 | 0.010 | 0.570 | 0.559 |
| 5FF_Factor | 0.837 | 7.639 | 0.303 | 14.251 | 0.000 | 0.626 | 0.661 |
| FGHJ_RI | 0.388 | 1.781 | 0.291 | 15.577 | 0.003 | 0.622 | 0.718 |
| KMY_RW_Clbrtd | 0.061 | 0.044 | 0.289 | 4.676 | 0.025 | 0.372 | 0.610 |
| PEG_Anlst | 0.067 | 0.055 | 0.286 | 3.947 | 0.016 | 0.483 | 0.594 |
| HL_RW | 0.101 | 0.126 | 0.285 | 16.301 | 0.013 | 0.504 | 0.630 |
| 3FF_Factor | 0.258 | 0.825 | 0.284 | 8.730 | 0.004 | 0.501 | 0.671 |
| MPEG_Anlst | 0.060 | 0.045 | 0.282 | 2.952 | 0.015 | 0.417 | 0.577 |
| FPM_EP | 0.115 | 0.170 | 0.278 | 11.249 | 0.030 | 0.579 | 0.766 |
| TrES_EP_10Ind | 3.829 | 190.501 | 0.277 | 122.914 | 0.000 | 0.573 | 0.735 |
| HL_RW_Clbrtd | 0.057 | 0.043 | 0.272 | 4.620 | 0.029 | 0.325 | 0.669 |
| FPM_RI | 0.164 | 0.392 | 0.263 | 6.099 | 0.029 | 0.599 | 0.813 |
| BP_Anlst | 0.747 | 8.108 | 0.262 | 163.751 | 0.018 | 0.597 | 0.781 |
| TrETSS_RI_10Ind | 4.010 | 244.051 | 0.257 | 93.776 | 0.000 | 0.508 | 0.781 |
| TrETSS_Anlst_25SBM | 2.047 | 65.972 | 0.252 | 86.650 | 0.000 | 0.472 | 0.791 |
| PEG_HDZ | 0.061 | 0.062 | 0.244 | 3.295 | 0.016 | 0.361 | 0.791 |
| TrETSS_RI_25SBM | 2.593 | 112.875 | 0.244 | 68.737 | 0.000 | 0.504 | 0.829 |
| TrOHE_25SBM | 3.798 | 245.680 | 0.242 | 274.010 | 0.001 | 0.506 | 0.837 |
| BP_Anlst _Clbrtd | 0.247 | 1.150 | 0.231 | 26.553 | 0.021 | 0.488 | 0.847 |
| GM_EP_Clbrtd | 0.345 | 2.446 | 0.220 | 13.587 | 0.002 | 0.427 | 0.888 |
| MPEG_RI_Clbrtd | 0.118 | 0.288 | 0.220 | 7.007 | 0.005 | 0.382 | 0.884 |
| BP_EP_Clbrtd | 0.621 | 8.672 | 0.211 | 9.008 | 0.001 | 0.408 | 0.915 |

[^63]Table 106 : Out-of-Sample performance of ICC Optimal Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_EP | 9.947 | 2,236.421 | 0.210 | 114.646 | 0.001 | 0.405 | 0.915 |
| GG_EP | 0.467 | 4.943 | 0.210 | 25.092 | 0.001 | 0.433 | 0.923 |
| CT_Anlst | 0.043 | 0.043 | 0.209 | 3.089 | 0.030 | 0.219 | 0.871 |
| GG_RW_Clbrtd | 0.070 | 0.113 | 0.209 | 4.554 | 0.027 | 0.332 | 0.912 |
| GG_HDZ_Clbrtd | 0.181 | 0.809 | 0.201 | 6.184 | 0.075 | 0.505 | 0.953 |
| GLS_RW_Clbrtd | 0.041 | 0.042 | 0.200 | 2.195 | 0.034 | 0.077 | 0.913 |
| TrES_RW_25SBM | 6.233 | 1,047.024 | 0.193 | 173.258 | 0.001 | 0.404 | 0.969 |
| FGHJ_RW | 1.491 | 60.411 | 0.192 | 18.581 | 0.003 | 0.365 | 0.969 |
| FPM_EP_Clbrtd | 0.038 | 0.043 | 0.186 | 2.105 | 0.035 | 0.095 | 0.978 |
| FGHJ_RI_Clbrtd | 0.113 | 0.372 | 0.186 | 4.003 | 0.019 | 0.398 | 0.987 |
| 1/N | 0.036 | 0.039 | 0.181 | 0.465 | 0.040 | 0.072 | 1.000 |
| TPDPS_RI | 0.196 | 1.214 | 0.178 | 10.995 | 0.055 | 0.462 | 0.994 |
| HL_EP_Clbrtd | 0.044 | 0.063 | 0.177 | 1.929 | 0.042 | 0.179 | 0.986 |
| BP_RW_Clbrtd | 0.982 | 31.984 | 0.174 | 70.892 | 0.020 | 0.426 | 0.982 |
| TPDPS_EP | 0.272 | 2.733 | 0.165 | 16.851 | 0.055 | 0.441 | 0.964 |
| TPDPS_EP_Clbrtd | 0.271 | 2.746 | 0.163 | 11.969 | 0.049 | 0.431 | 0.960 |
| GM_HDZ | 0.038 | 0.055 | 0.161 | 3.290 | 0.035 | 0.187 | 0.934 |
| PE_Anlst | 0.157 | 1.123 | 0.148 | 17.926 | 0.027 | 0.342 | 0.913 |
| WNG_HDZ | 0.523 | 16.618 | 0.128 | 57.323 | 0.032 | 0.358 | 0.878 |
| BP_RI | 0.136 | 1.149 | 0.127 | 18.422 | 0.075 | 0.389 | 0.880 |
| GLS_RI_Clbrtd | 0.071 | 0.335 | 0.123 | 11.509 | 0.041 | 0.219 | 0.833 |
| TPDPS_RI_Clbrtd | 0.132 | 1.195 | 0.121 | 11.335 | 0.089 | 0.374 | 0.869 |
| WNG_RW | 0.527 | 21.033 | 0.115 | 655.669 | 0.022 | 0.279 | 0.823 |
| TPDPS_HDZ_Clbrtd | 0.160 | 2.017 | 0.112 | 22.387 | 0.072 | 0.334 | 0.833 |
| WNG_RI | 0.362 | 10.701 | 0.111 | 59.506 | 0.061 | 0.309 | 0.828 |
| TrETSS_EP_10Ind | 0.102 | 1.135 | 0.096 | 23.318 | 0.063 | 0.274 | 0.799 |
| TPDPS_Anlst_Clbrtd | 1.024 | 122.718 | 0.092 | 104.729 | 0.013 | 0.217 | 0.742 |
| TrETSS_EP_25SBM | 0.260 | 8.222 | 0.091 | 24.471 | 0.045 | 0.275 | 0.774 |
| PE_RI_Clbrtd | 0.794 | 82.243 | 0.088 | 48.326 | 0.055 | 0.300 | 0.781 |
| TrES_Anlst_25SBM | 0.549 | 41.282 | 0.085 | 69.977 | 0.051 | 0.277 | 0.766 |
| BP_RW | 0.236 | 7.835 | 0.084 | 79.829 | 0.094 | 0.330 | 0.785 |
| TPDPS_RW_Clbrtd | 0.307 | 14.975 | 0.079 | 43.176 | 0.086 | 0.275 | 0.742 |

Continued in next page...

Table 106 : Out-of-Sample performance of ICC Optimal Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.238 | 14.522 | 0.063 | 109.388 | 0.042 | 0.183 | 0.658 |
| MPEG_RW_Clbrtd | 0.015 | 0.065 | 0.058 | 6.513 | 0.109 | 0.151 | 0.638 |
| KMY_RI | 0.023 | 0.386 | 0.037 | 10.333 | 0.122 | 0.195 | 0.653 |
| TrES_RI_10Ind | 0.026 | 0.643 | 0.033 | 34.872 | 0.119 | 0.194 | 0.640 |
| PE_RI | 0.095 | 13.450 | 0.026 | 17.724 | 0.133 | 0.224 | 0.655 |
| PE_EP | 0.016 | 0.939 | 0.017 | 29.229 | 0.138 | 0.133 | 0.560 |
| TPDPS_RW | 0.064 | 22.303 | 0.014 | 62.607 | 0.151 | 0.212 | 0.597 |
| FPM_RI_Clbrtd | 0.002 | 1.760 | 0.002 | 5.181 | 0.151 | 0.143 | 0.566 |
| TrETSS_RW_25SBM | -0.009 | 4.958 | - 0.004 | 60.709 | 0.161 | 0.200 | 0.584 |
| CAPM_Factor | -0.029 | 20.466 | - 0.006 | 488.579 | 0.159 | 0.173 | 0.564 |
| DKL_RI_Clbrtd | -0.005 | 0.122 | - 0.014 | 5.998 | 0.162 | 0.029 | 0.389 |
| GG_RI | - 0.180 | 15.428 | - 0.046 | 24.027 | 0.203 | 0.130 | 0.502 |
| FGHJ_RW_Clbrtd | -0.119 | 5.383 | -0.051 | 9.556 | 0.200 | 0.128 | 0.472 |
| PEG_HDZ_Clbrtd | -0.144 | 4.746 | - 0.066 | 35.891 | 0.217 | 0.129 | 0.481 |
| GM_HDZ_Clbrtd | - 0.043 | 0.412 | - 0.067 | 24.704 | 0.245 | 0.105 | 0.449 |
| CT_RI_Clbrtd | -0.037 | 0.247 | - 0.075 | 18.574 | 0.234 | 0.051 | 0.315 |
| Carhart_Factor | - 0.148 | 3.597 | - 0.078 | 27.297 | 0.209 | 0.101 | 0.419 |
| BP_HDZ | - 0.130 | 2.682 | - 0.079 | 14.688 | 0.229 | 0.121 | 0.401 |
| PE_HDZ | - 0.093 | 1.344 | - 0.080 | 18.790 | 0.219 | 0.094 | 0.412 |
| TrES_HDZ_25SBM | -0.295 | 13.154 | - 0.081 | 98.185 | 0.235 | 0.115 | 0.437 |
| TPDPS_HDZ | -0.206 | 6.320 | -0.082 | 20.517 | 0.212 | 0.102 | 0.411 |
| HL_RI_Clbrtd | - 0.077 | 0.636 | - 0.097 | 3.239 | 0.225 | 0.047 | 0.327 |
| WNG_Anlst | - 0.736 | 53.989 | - 0.100 | 121.117 | 0.609 | 0.377 | 0.622 |
| CT_EP | - 0.184 | 3.114 | -0.104 | 8.407 | 0.255 | 0.044 | 0.278 |
| TrETSS_HDZ_25SBM | - 0.497 | 15.881 | -0.125 | 49.316 | 0.243 | 0.073 | 0.327 |
| PEG_EP_Clbrtd | -0.219 | 2.837 | - 0.130 | 7.393 | 0.252 | 0.057 | 0.307 |
| MPEG_HDZ_Clbrtd | -0.157 | 1.390 | -0.133 | 7.135 | 0.277 | 0.048 | 0.308 |
| PEG_RW | - 0.259 | 2.491 | - 0.164 | 6.099 | 0.149 | 0.036 | 0.229 |
| BP_RI_Clbrtd | - 0.475 | 7.703 | -0.171 | 12.624 | 0.281 | 0.030 | 0.236 |
| GM_RW_Clbrtd | -0.101 | 0.328 | - 0.176 | 9.246 | 0.335 | 0.021 | 0.220 |
| Naive_Clbrtd | - 0.629 | 9.945 | - 0.199 | 58.932 | 0.359 | 0.032 | 0.196 |
| Naive | - 0.629 | 9.945 | -0.199 | 58.932 | 0.359 | 0.032 | 0.196 |

[^64]Table 106 : Out-of-Sample performance of ICC Optimal Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | $\mathbf{1} / \mathbf{N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| GLS_RI | -0.890 | 18.721 | -0.206 | 13.617 | 0.357 | 0.028 | 0.191 |
| GG_EP_Clbrtd | -0.254 | 1.506 | -0.207 | 10.092 | 0.351 | 0.024 | 0.196 |
| TrES_RI_25SBM | -0.883 | 17.247 | -0.213 | 64.179 | 0.384 | 0.020 | 0.165 |
| PEG_RI | -0.622 | 7.921 | -0.221 | 9.905 | 0.357 | 0.017 | 0.147 |
| PE_RW_Clbrtd | -0.933 | 17.663 | -0.222 | 11.968 | 0.351 | 0.017 | 0.154 |
| CT_RW_Clbrtd | -0.114 | 0.247 | -0.230 | 8.141 | 0.584 | 0.023 | 0.181 |
| TrETSS_HDZ_10Ind | -0.868 | 13.230 | -0.239 | 37.500 | 0.439 | 0.018 | 0.153 |
| TrETSS_RW_10Ind | - | $3,232.571-0.239$ | 702.010 | 0.385 | 0.009 | 0.107 |  |
| KMY_EP_Clbrtd | 13.598 |  |  |  |  |  |  |
| PEG_Anlst_Clbrtd | -1.021 | 18.047 | -0.240 | 6.240 | 0.409 | 0.012 | 0.124 |
| CT_EP_Clbrtd | -5.278 | 333.844 | -0.289 | 107.160 | 0.569 | 0.008 | 0.088 |
| TrES_EP_25SBM | -0.364 | 1.513 | -0.296 | 7.758 | 0.651 | 0.008 | 0.087 |
| TrOHE_10Ind | -1.329 | 20.041 | -0.297 | 93.302 | 0.648 | 0.009 | 0.087 |
| TrES_RW_10Ind | -2.982 | 92.524 | -0.310 | 106.415 | 0.746 | 0.013 | 0.103 |
| TrETSS_Anlst_10Ind | -2.791 | 80.645 | -0.311 | 52.124 | 0.671 | 0.004 | 0.063 |
| KMY_RI_Clbrtd | -4.558 | 214.561 | -0.311 | 634.936 | 0.678 | 0.006 | 0.073 |
| mean-variance | -0.162 | 0.217 | -0.348 | 16.197 | 0.921 | 0.000 | 0.012 |
| GG_RI_Clbrtd | -2.144 | 33.571 | -0.370 | 28.089 | 1.000 | 0.002 | 0.040 |

This table report the out-of-sample results of the tangency portfolio using ICC ex-ante expected return estimates, as well as other benchmark strategies. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the MeanV column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the mean-variance portfolio is zero, the $1 / \mathrm{N}$ column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the MinVar column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the minimum variance portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) non-parametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 107 : Out-of-Sample performance of ICC Timing Portfolios

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.124 | 0.039 | 0.627 | 0.484 | 0.000 | 0.001 | 0.000 |
| PE_RW | 0.082 | 0.018 | 0.602 | 0.257 | 0.042 | 0.253 | 0.079 |
| PE_HDZ | 0.089 | 0.035 | 0.474 | 0.490 | 0.000 | 0.023 | 0.001 |
| PE_HDZ_Clbrtd | 0.082 | 0.031 | 0.469 | 0.461 | 0.006 | 0.179 | 0.025 |
| TPDPS_RI | 0.091 | 0.038 | 0.464 | 0.535 | 0.001 | 0.120 | 0.009 |
| TPDPS_EP | 0.090 | 0.038 | 0.461 | 0.533 | 0.001 | 0.132 | 0.010 |
| BP_EP | 0.086 | 0.035 | 0.460 | 0.513 | 0.002 | 0.151 | 0.015 |
| PE_EP | 0.089 | 0.038 | 0.459 | 0.449 | 0.011 | 0.254 | 0.028 |
| TPDPS_RI_Clbrtd | 0.089 | 0.038 | 0.457 | 0.538 | 0.002 | 0.138 | 0.010 |
| BP_RI | 0.085 | 0.036 | 0.453 | 0.520 | 0.003 | 0.175 | 0.018 |
| TPDPS_EP_Clbrtd | 0.088 | 0.038 | 0.453 | 0.537 | 0.002 | 0.153 | 0.012 |
| CT_RI | 0.085 | 0.036 | 0.451 | 0.549 | 0.002 | 0.121 | 0.017 |
| TrES_EP_10Ind | 0.086 | 0.037 | 0.448 | 0.759 | 0.013 | 0.350 | 0.041 |
| GM_HDZ_Clbrtd | 0.081 | 0.034 | 0.445 | 0.511 | 0.001 | 0.132 | 0.004 |
| DKL_RI | 0.081 | 0.035 | 0.436 | 0.542 | 0.001 | 0.083 | 0.010 |
| GLS_RI | 0.082 | 0.036 | 0.431 | 0.536 | 0.002 | 0.060 | 0.003 |
| PEG_HDZ_Clbrtd | 0.084 | 0.038 | 0.427 | 0.573 | 0.007 | 0.285 | 0.013 |
| HL_RI | 0.079 | 0.034 | 0.426 | 0.531 | 0.002 | 0.099 | 0.011 |
| BP_RW | 0.086 | 0.041 | 0.424 | 0.646 | 0.010 | 0.365 | 0.061 |
| KMY_RI | 0.078 | 0.035 | 0.417 | 0.546 | 0.003 | 0.186 | 0.020 |
| DKL_EP | 0.076 | 0.034 | 0.415 | 0.506 | 0.000 | 0.038 | 0.002 |
| GG_RW | 0.077 | 0.035 | 0.414 | 0.498 | 0.001 | 0.055 | 0.001 |
| FPM_RI | 0.074 | 0.032 | 0.411 | 0.585 | 0.001 | 0.143 | 0.010 |
| HL_EP | 0.075 | 0.034 | 0.410 | 0.505 | 0.000 | 0.043 | 0.003 |
| FGHJ_RI | 0.075 | 0.034 | 0.405 | 0.526 | 0.001 | 0.050 | 0.001 |
| CT_HDZ_Clbrtd | 0.072 | 0.032 | 0.404 | 0.487 | 0.001 | 0.039 | 0.002 |
| TPDPS_Anlst_Clbrtd | 0.079 | 0.039 | 0.403 | 0.603 | 0.003 | 0.276 | 0.020 |
| Naive | 0.080 | 0.040 | 0.402 | 0.623 | 0.004 | 0.308 | 0.022 |
| Naive_Clbrtd | 0.080 | 0.040 | 0.402 | 0.623 | 0.004 | 0.308 | 0.022 |
| TPDPS_Anlst | 0.079 | 0.039 | 0.401 | 0.602 | 0.004 | 0.283 | 0.021 |
| BP_Anlst | 0.078 | 0.038 | 0.399 | 0.594 | 0.004 | 0.327 | 0.028 |

[^65]Table 107 : Out-of-Sample performance of ICC Timing Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_HDZ | 0.078 | 0.038 | 0.399 | 0.585 | 0.003 | 0.293 | 0.022 |
| BP_HDZ | 0.077 | 0.038 | 0.398 | 0.570 | 0.003 | 0.314 | 0.028 |
| TPDPS_RW_Clbrtd | 0.081 | 0.042 | 0.397 | 0.574 | 0.022 | 0.562 | 0.129 |
| HL_HDZ_Clbrtd | 0.074 | 0.034 | 0.397 | 0.515 | 0.002 | 0.178 | 0.006 |
| GG_HDZ_Clbrtd | 0.073 | 0.034 | 0.396 | 0.499 | 0.002 | 0.188 | 0.006 |
| TPDPS_HDZ_Clbrtd | 0.078 | 0.038 | 0.396 | 0.586 | 0.003 | 0.307 | 0.023 |
| FGHJ_EP_Clbrtd | 0.072 | 0.033 | 0.395 | 0.478 | 0.001 | 0.084 | 0.005 |
| KMY_HDZ_Clbrtd | 0.073 | 0.035 | 0.395 | 0.519 | 0.003 | 0.227 | 0.007 |
| KMY_EP | 0.071 | 0.033 | 0.393 | 0.528 | 0.003 | 0.201 | 0.013 |
| DKL_HDZ_Clbrtd | 0.072 | 0.034 | 0.392 | 0.509 | 0.002 | 0.177 | 0.005 |
| GG_EP_Clbrtd | 0.073 | 0.035 | 0.391 | 0.565 | 0.018 | 0.568 | 0.107 |
| TrES_RI_25SBM | 0.074 | 0.036 | 0.390 | 1.068 | 0.055 | 0.610 | 0.124 |
| PE_Anlst _Clbrtd | 0.070 | 0.033 | 0.385 | 0.505 | 0.001 | 0.082 | 0.008 |
| CT_EP | 0.073 | 0.036 | 0.385 | 0.522 | 0.002 | 0.302 | 0.019 |
| GLS_EP | 0.071 | 0.034 | 0.385 | 0.510 | 0.001 | 0.080 | 0.002 |
| GLS_HDZ_Clbrtd | 0.070 | 0.034 | 0.383 | 0.494 | 0.001 | 0.116 | 0.002 |
| GLS_HDZ | 0.072 | 0.035 | 0.383 | 0.485 | 0.001 | 0.108 | 0.003 |
| CT_RW | 0.073 | 0.037 | 0.380 | 0.538 | 0.001 | 0.220 | 0.005 |
| GG_HDZ | 0.071 | 0.035 | 0.379 | 0.477 | 0.003 | 0.253 | 0.009 |
| BP_EP_Clbrtd | 0.072 | 0.036 | 0.378 | 0.547 | 0.014 | 0.502 | 0.059 |
| DKL_RW | 0.071 | 0.036 | 0.375 | 0.598 | 0.001 | 0.154 | 0.002 |
| TPDPS_RW | 0.077 | 0.043 | 0.373 | 0.589 | 0.026 | 0.665 | 0.136 |
| GLS_EP_Clbrtd | 0.068 | 0.034 | 0.371 | 0.483 | 0.001 | 0.118 | 0.003 |
| KMY_RW | 0.069 | 0.035 | 0.370 | 0.583 | 0.001 | 0.164 | 0.002 |
| BP_Anlst _Clbrtd | 0.073 | 0.039 | 0.369 | 0.598 | 0.014 | 0.561 | 0.055 |
| FGHJ_EP | 0.067 | 0.034 | 0.368 | 0.504 | 0.001 | 0.111 | 0.002 |
| GLS_RI_Clbrtd | 0.066 | 0.032 | 0.367 | 0.533 | 0.001 | 0.537 | 0.014 |
| MPEG_HDZ_Clbrtd | 0.069 | 0.035 | 0.367 | 0.515 | 0.003 | 0.476 | 0.018 |
| GG_RI | 0.075 | 0.042 | 0.366 | 0.519 | 0.082 | 0.755 | 0.215 |
| FGHJ_HDZ_Clbrtd | 0.067 | 0.033 | 0.366 | 0.485 | 0.001 | 0.187 | 0.002 |
| HL_RW | 0.069 | 0.035 | 0.366 | 0.594 | 0.001 | 0.209 | 0.003 |
| FGHJ_HDZ | 0.068 | 0.035 | 0.365 | 0.479 | 0.001 | 0.181 | 0.004 |

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Table 107 : Out-of-Sample performance of ICC Timing Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| BP_HDZ_Clbrtd | 0.072 | 0.039 | 0.365 | 0.584 | 0.021 | 0.622 | 0.076 |
| CT_HDZ | 0.067 | 0.034 | 0.365 | 0.478 | 0.002 | 0.329 | 0.011 |
| KMY_HDZ | 0.067 | 0.034 | 0.363 | 0.475 | 0.003 | 0.362 | 0.012 |
| DKL_HDZ | 0.065 | 0.034 | 0.355 | 0.475 | 0.002 | 0.419 | 0.013 |
| GLS_Anlst | 0.064 | 0.033 | 0.353 | 0.485 | 0.002 | 0.267 | 0.005 |
| MPEG_Anlst _Clbrtd | 0.064 | 0.034 | 0.351 | 0.484 | 0.001 | 0.226 | 0.002 |
| MPEG_RW | 0.064 | 0.034 | 0.349 | 0.510 | 0.002 | 0.314 | 0.004 |
| KMY_Anlst _Clbrtd | 0.063 | 0.032 | 0.349 | 0.464 | 0.001 | 0.017 | 0.004 |
| GM_RW | 0.064 | 0.034 | 0.347 | 0.513 | 0.002 | 0.353 | 0.005 |
| HL_HDZ | 0.063 | 0.033 | 0.346 | 0.473 | 0.003 | 0.557 | 0.018 |
| GLS_Anlst _Clbrtd | 0.062 | 0.033 | 0.343 | 0.481 | 0.001 | 0.126 | 0.003 |
| GM_RI_Clbrtd | 0.067 | 0.039 | 0.343 | 0.510 | 0.028 | 0.842 | 0.175 |
| GM_Anlst _Clbrtd | 0.063 | 0.033 | 0.343 | 0.475 | 0.001 | 0.198 | 0.002 |
| HL_Anlst _Clbrtd | 0.063 | 0.033 | 0.343 | 0.477 | 0.001 | 0.171 | 0.003 |
| DKL_Anlst_Clbrtd | 0.062 | 0.033 | 0.342 | 0.477 | 0.001 | 0.148 | 0.003 |
| CT_Anlst _Clbrtd | 0.062 | 0.033 | 0.341 | 0.480 | 0.001 | 0.201 | 0.005 |
| CT_RI_Clbrtd | 0.061 | 0.032 | 0.340 | 0.528 | 0.006 | 0.785 | 0.063 |
| FGHJ_Anlst _Clbrtd | 0.062 | 0.033 | 0.340 | 0.476 | 0.001 | 0.103 | 0.003 |
| PEG_RW | 0.063 | 0.035 | 0.339 | 0.523 | 0.005 | 0.643 | 0.005 |
| MPEG_RI | 0.060 | 0.032 | 0.337 | 0.487 | 0.002 | 0.722 | 0.023 |
| BP_RI_Clbrtd | 0.065 | 0.038 | 0.335 | 0.549 | 0.045 | 0.873 | 0.149 |
| CAPM_Factor | 0.056 | 0.028 | 0.335 | 0.494 | 0.183 | 0.933 | 0.404 |
| FGHJ_Anlst | 0.061 | 0.033 | 0.334 | 0.479 | 0.002 | 0.567 | 0.007 |
| PE_Anlst | 0.062 | 0.036 | 0.326 | 0.500 | 0.012 | 0.907 | 0.043 |
| KMY_RW_Clbrtd | 0.058 | 0.033 | 0.321 | 0.490 | 0.001 | 0.975 | 0.006 |
| HL_EP_Clbrtd | 0.059 | 0.034 | 0.320 | 0.496 | 0.004 | 0.995 | 0.027 |
| Minimum Variance | 0.057 | 0.032 | 0.320 | 0.460 | 0.001 | 1.000 | 0.008 |
| FPM_Anlst_Clbrtd | 0.059 | 0.034 | 0.320 | 0.473 | 0.003 | 0.999 | 0.009 |
| MPEG_HDZ | 0.058 | 0.033 | 0.320 | 0.469 | 0.006 | 0.989 | 0.047 |
| PEG_Anlst _Clbrtd | 0.060 | 0.035 | 0.319 | 0.503 | 0.005 | 0.966 | 0.009 |
| DKL_RW_Clbrtd | 0.058 | 0.033 | 0.318 | 0.493 | 0.001 | 0.878 | 0.007 |
| HL_RW_Clbrtd | 0.057 | 0.033 | 0.318 | 0.493 | 0.001 | 0.860 | 0.008 |

[^66]Table 107 : Out-of-Sample performance of ICC Timing Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrETSS_Anlst _25SBM | 0.057 | 0.032 | 0.316 | 0.837 | 0.015 | 0.965 | 0.218 |
| DKL_EP_Clbrtd | 0.058 | 0.034 | 0.315 | 0.497 | 0.005 | 0.891 | 0.030 |
| DKL_Anlst | 0.056 | 0.032 | 0.314 | 0.474 | 0.003 | 0.797 | 0.014 |
| GG_Anlst _Clbrtd | 0.057 | 0.033 | 0.313 | 0.467 | 0.003 | 0.641 | 0.008 |
| PEG_HDZ | 0.057 | 0.033 | 0.313 | 0.472 | 0.007 | 0.873 | 0.050 |
| MPEG_EP | 0.055 | 0.031 | 0.313 | 0.500 | 0.002 | 0.843 | 0.018 |
| TrES_Anlst _10Ind | 0.061 | 0.039 | 0.312 | 0.727 | 0.118 | 0.948 | 0.291 |
| TrOHE_25SBM | 0.071 | 0.052 | 0.312 | 1.173 | 0.118 | 0.950 | 0.281 |
| GG_RI_Clbrtd | 0.069 | 0.050 | 0.312 | 0.612 | 0.151 | 0.957 | 0.381 |
| PE_EP_Clbrtd | 0.058 | 0.034 | 0.312 | 0.471 | 0.085 | 0.938 | 0.256 |
| FPM_RW_Clbrtd | 0.065 | 0.043 | 0.311 | 0.573 | 0.095 | 0.938 | 0.316 |
| GM_RI | 0.055 | 0.032 | 0.310 | 0.485 | 0.008 | 0.872 | 0.066 |
| WNG_RI | 0.069 | 0.050 | 0.310 | 0.949 | 0.226 | 0.953 | 0.481 |
| FPM_HDZ_Clbrtd | 0.058 | 0.036 | 0.308 | 0.499 | 0.016 | 0.806 | 0.064 |
| GG_Anlst | 0.056 | 0.034 | 0.307 | 0.471 | 0.003 | 0.531 | 0.009 |
| KMY_RI_Clbrtd | 0.057 | 0.035 | 0.306 | 0.567 | 0.012 | 0.843 | 0.085 |
| KMY_Anlst | 0.056 | 0.033 | 0.306 | 0.469 | 0.003 | 0.498 | 0.010 |
| HL_Anlst | 0.054 | 0.032 | 0.304 | 0.473 | 0.003 | 0.540 | 0.021 |
| FPM_RI_Clbrtd | 0.060 | 0.040 | 0.303 | 0.555 | 0.061 | 0.847 | 0.143 |
| KMY_EP_Clbrtd | 0.057 | 0.035 | 0.303 | 0.516 | 0.006 | 0.658 | 0.032 |
| DKL_RI_Clbrtd | 0.055 | 0.033 | 0.302 | 0.535 | 0.006 | 0.766 | 0.071 |
| FPM_Anlst | 0.054 | 0.032 | 0.301 | 0.476 | 0.002 | 0.322 | 0.022 |
| TrES_HDZ_10Ind | 0.054 | 0.032 | 0.301 | 0.684 | 0.094 | 0.882 | 0.332 |
| CT_Anlst | 0.054 | 0.033 | 0.300 | 0.474 | 0.004 | 0.481 | 0.026 |
| MPEG_RW_Clbrtd | 0.055 | 0.034 | 0.296 | 0.640 | 0.034 | 0.740 | 0.188 |
| GLS_RW_Clbrtd | 0.053 | 0.033 | 0.293 | 0.509 | 0.002 | 0.347 | 0.019 |
| FPM_HDZ | 0.052 | 0.032 | 0.291 | 0.476 | 0.007 | 0.506 | 0.090 |
| TrES_RW_10Ind | 0.059 | 0.042 | 0.290 | 0.649 | 0.311 | 0.871 | 0.549 |
| PEG_RW_Clbrtd | 0.053 | 0.034 | 0.289 | 0.534 | 0.028 | 0.515 | 0.115 |
| GM_Anlst | 0.051 | 0.032 | 0.285 | 0.469 | 0.004 | 0.228 | 0.042 |
| CT_EP_Clbrtd | 0.052 | 0.034 | 0.281 | 0.518 | 0.019 | 0.344 | 0.114 |
| FGHJ_RI_Clbrtd | 0.051 | 0.034 | 0.277 | 0.540 | 0.008 | 0.339 | 0.107 |

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Table 107 : Out-of-Sample performance of ICC Timing Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_EP | 0.061 | 0.049 | 0.276 | 1.028 | 0.175 | 0.695 | 0.438 |
| PEG_Anlst | 0.049 | 0.032 | 0.274 | 0.491 | 0.005 | 0.243 | 0.061 |
| MPEG_Anlst | 0.049 | 0.032 | 0.274 | 0.480 | 0.006 | 0.201 | 0.078 |
| HL_RI_Clbrtd | 0.049 | 0.033 | 0.272 | 0.526 | 0.015 | 0.390 | 0.144 |
| GM_HDZ | 0.048 | 0.033 | 0.268 | 0.468 | 0.034 | 0.405 | 0.236 |
| GLS_RW | 0.053 | 0.039 | 0.268 | 0.627 | 0.050 | 0.430 | 0.226 |
| BP_RW_Clbrtd | 0.060 | 0.050 | 0.267 | 0.651 | 0.189 | 0.646 | 0.449 |
| GM_EP_Clbrtd | 0.050 | 0.035 | 0.267 | 0.507 | 0.038 | 0.486 | 0.263 |
| FPM_EP | 0.048 | 0.033 | 0.266 | 0.552 | 0.037 | 0.334 | 0.241 |
| TrOHE_10Ind | 0.045 | 0.031 | 0.260 | 0.629 | 0.207 | 0.662 | 0.569 |
| PEG_EP | 0.047 | 0.033 | 0.259 | 0.573 | 0.057 | 0.340 | 0.268 |
| MPEG_RI_Clbrtd | 0.050 | 0.038 | 0.258 | 0.490 | 0.097 | 0.536 | 0.388 |
| FGHJ_RW | 0.049 | 0.036 | 0.258 | 0.603 | 0.063 | 0.344 | 0.278 |
| GM_EP | 0.046 | 0.032 | 0.257 | 0.496 | 0.023 | 0.230 | 0.161 |
| GM_RW_Clbrtd | 0.048 | 0.037 | 0.251 | 0.668 | 0.157 | 0.443 | 0.470 |
| FPM_EP_Clbrtd | 0.044 | 0.034 | 0.238 | 0.498 | 0.049 | 0.117 | 0.280 |
| GG_EP | 0.038 | 0.026 | 0.234 | 0.546 | 0.299 | 0.537 | 0.699 |
| PEG_RI | 0.041 | 0.034 | 0.225 | 0.523 | 0.109 | 0.177 | 0.523 |
| TrES_Anlst_25SBM | 0.046 | 0.043 | 0.224 | 1.087 | 0.298 | 0.363 | 0.665 |
| TrETSS_Anlst _10Ind | 0.043 | 0.039 | 0.220 | 0.591 | 0.172 | 0.322 | 0.670 |
| TrES_RW_25SBM | 0.041 | 0.037 | 0.213 | 0.928 | 0.526 | 0.619 | 0.877 |
| PEG_EP_Clbrtd | 0.035 | 0.028 | 0.207 | 0.466 | 0.348 | 0.361 | 0.839 |
| CT_RW_Clbrtd | 0.037 | 0.031 | 0.207 | 0.561 | 0.347 | 0.405 | 0.850 |
| TrETSS_EP_10Ind | 0.039 | 0.038 | 0.201 | 0.562 | 0.118 | 0.232 | 0.820 |
| TrES_EP_25SBM | 0.040 | 0.039 | 0.200 | 1.093 | 0.408 | 0.462 | 0.899 |
| FGHJ_RW_Clbrtd | 0.038 | 0.036 | 0.198 | 0.576 | 0.203 | 0.084 | 0.773 |
| 1/N | 0.036 | 0.039 | 0.181 | 0.465 | 0.140 | 0.008 | 1.000 |
| MPEG_EP_Clbrtd | 0.030 | 0.030 | 0.174 | 0.477 | 0.424 | 0.249 | 0.954 |
| GG_RW_Clbrtd | 0.027 | 0.025 | 0.169 | 0.405 | 0.670 | 0.440 | 0.950 |
| WNG_HDZ | 0.032 | 0.037 | 0.164 | 0.708 | 0.679 | 0.405 | 0.924 |
| TrETSS_HDZ_10Ind | 0.029 | 0.033 | 0.158 | 0.520 | 0.614 | 0.301 | 0.873 |
| TrETSS_EP_25SBM | 0.029 | 0.042 | 0.144 | 0.720 | 0.596 | 0.077 | 0.671 |

Continued in next page...

Table 107 : Out-of-Sample performance of ICC Timing Portfolios, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | $\mathbf{1 / N}$ |
| :--- | :---: | :---: | :--- | :--- | :--- | :--- | :--- |
| Carhart_Factor | 0.027 | 0.037 | 0.141 | 0.641 | 0.780 | 0.389 | 0.853 |
| FPM_RW | 0.024 | 0.035 | 0.129 | 0.713 | 0.763 | 0.183 | 0.703 |
| TrES_HDZ_25SBM | 0.024 | 0.037 | 0.127 | 1.154 | 0.730 | 0.138 | 0.644 |
| TrETSS_RI_25SBM | 0.025 | 0.040 | 0.127 | 0.725 | 0.737 | 0.089 | 0.629 |
| TrETSS_HDZ_25SBM | 0.025 | 0.038 | 0.126 | 0.800 | 0.720 | 0.129 | 0.642 |
| TrETSS_RI_10Ind | 0.023 | 0.039 | 0.116 | 0.533 | 0.843 | 0.230 | 0.674 |
| 3FF_Factor | 0.027 | 0.061 | 0.109 | 0.525 | 0.922 | 0.380 | 0.758 |
| TrETSS_RW_10Ind | 0.022 | 0.048 | 0.101 | 0.613 | 0.933 | 0.202 | 0.619 |
| TrES_RI_10Ind | 0.016 | 0.032 | 0.088 | 0.683 | 0.994 | 0.141 | 0.557 |
| Mean-variance | 0.016 | 0.032 | 0.087 | 0.477 | 1.000 | 0.001 | 0.140 |
| WNG_Anlst | 0.027 | 0.123 | 0.077 | 1.794 | 0.818 | 0.202 | 0.569 |
| 5FF_Factor | 0.011 | 0.042 | 0.055 | 0.604 | 0.869 | 0.219 | 0.557 |
| PEG_RI_Clbrtd | 0.008 | 0.032 | 0.042 | 0.428 | 0.811 | 0.134 | 0.426 |
| WNG_RW | 0.008 | 0.057 | 0.033 | 0.831 | 0.763 | 0.098 | 0.372 |
| PE_RI_Clbrtd | 0.003 | 0.032 | 0.019 | 0.437 | 0.617 | 0.026 | 0.206 |
| PE_RW_Clbrtd | 0.003 | 0.035 | 0.016 | 0.202 | 0.786 | 0.251 | 0.534 |
| TrETSS_RW_25SBM | -0.009 | 0.042 | -0.042 | 0.702 | 0.250 | 0.005 | 0.031 |

This table report the out-of-sample results of the market timing portfolio using ICC ex-ante expected return estimates, as well as other benchmark strategies. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the RRT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the conventional Reward-to-Risk Timing (RRT) portfolio is zero, the $1 / \mathrm{N}$ column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the VT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the Volatility Timing (VT) portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) non-parametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 108 : ICC Optimal Portfolios - Last Non Missing Estimate Sample

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_HDZ | 0.294 | 0.056 | 1.245 | 2.310 | 0.000 | 0.000 | 0.000 |
| FGHJ_HDZ | 0.234 | 0.049 | 1.057 | 2.102 | 0.000 | 0.000 | 0.000 |
| GG_HDZ | 0.340 | 0.114 | 1.009 | 3.144 | 0.000 | 0.009 | 0.009 |
| CT_HDZ_Clbrtd | 0.226 | 0.057 | 0.944 | 2.177 | 0.000 | 0.001 | 0.000 |
| CT_HDZ | 0.251 | 0.082 | 0.875 | 3.092 | 0.002 | 0.077 | 0.077 |
| KMY_HDZ_Clbrtd | 0.234 | 0.076 | 0.848 | 2.709 | 0.001 | 0.022 | 0.004 |
| GG_RW | 0.275 | 0.105 | 0.847 | 3.221 | 0.001 | 0.058 | 0.027 |
| DKL_HDZ_Clbrtd | 0.194 | 0.055 | 0.825 | 2.201 | 0.001 | 0.014 | 0.003 |
| HL_HDZ_Clbrtd | 0.211 | 0.067 | 0.811 | 2.402 | 0.001 | 0.023 | 0.005 |
| GLS_HDZ_Clbrtd | 0.201 | 0.063 | 0.803 | 1.862 | 0.000 | 0.002 | 0.005 |
| KMY_RI | 0.398 | 0.284 | 0.747 | 6.175 | 0.000 | 0.068 | 0.116 |
| GG_HDZ_Clbrtd | 0.246 | 0.118 | 0.716 | 3.268 | 0.001 | 0.095 | 0.099 |
| GLS_EP | 0.169 | 0.059 | 0.698 | 2.512 | 0.004 | 0.086 | 0.167 |
| DKL_HDZ | 0.157 | 0.051 | 0.697 | 2.459 | 0.005 | 0.086 | 0.062 |
| PE_HDZ | 2.187 | 10.218 | 0.684 | 9.119 | 0.000 | 0.083 | 0.159 |
| GLS_Anlst | 0.120 | 0.036 | 0.632 | 1.791 | 0.004 | 0.032 | 0.069 |
| FGHJ_RI | 0.536 | 0.742 | 0.623 | 23.657 | 0.001 | 0.212 | 0.275 |
| PE_EP | 1.790 | 8.804 | 0.603 | 28.162 | 0.001 | 0.253 | 0.317 |
| PE_RW | 0.158 | 0.070 | 0.596 | 3.144 | 0.002 | 0.056 | 0.180 |
| FPM_HDZ_Clbrtd | 0.108 | 0.035 | 0.582 | 1.334 | 0.001 | 0.031 | 0.139 |
| MPEG_Anlst | 0.136 | 0.057 | 0.571 | 2.760 | 0.024 | 0.181 | 0.119 |
| HL_EP | 0.136 | 0.058 | 0.564 | 3.239 | 0.005 | 0.209 | 0.370 |
| MPEG_EP | 0.153 | 0.075 | 0.558 | 2.066 | 0.001 | 0.135 | 0.303 |
| KMY_EP_Clbrtd | 0.272 | 0.239 | 0.557 | 3.176 | 0.000 | 0.077 | 0.176 |
| GG_Anlst _Clbrtd | 0.098 | 0.032 | 0.546 | 1.388 | 0.003 | 0.013 | 0.206 |
| PE_Anlst _Clbrtd | 0.153 | 0.083 | 0.530 | 2.424 | 0.001 | 0.170 | 0.386 |
| GLS_Anlst _Clbrtd | 0.116 | 0.050 | 0.521 | 1.683 | 0.001 | 0.035 | 0.130 |
| MPEG_RI | 0.170 | 0.107 | 0.519 | 2.690 | 0.002 | 0.192 | 0.317 |
| HL_Anlst | 0.095 | 0.034 | 0.513 | 2.021 | 0.024 | 0.184 | 0.182 |
| DKL_RI_Clbrtd | 0.115 | 0.051 | 0.509 | 4.309 | 0.004 | 0.106 | 0.354 |
| TrETSS_RI_10Ind | 2.037 | 16.080 | 0.508 | 39.163 | 0.000 | 0.294 | 0.446 |

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Table 108 : ICC Optimal Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_Anlst _Clbrtd | 0.103 | 0.041 | 0.504 | 1.710 | 0.002 | 0.043 | 0.172 |
| PE_RI | 1.725 | 11.796 | 0.502 | 28.812 | 0.000 | 0.325 | 0.479 |
| PE_HDZ_Clbrtd | 0.260 | 0.275 | 0.495 | 3.596 | 0.001 | 0.188 | 0.368 |
| KMY_RI_Clbrtd | 0.144 | 0.085 | 0.493 | 3.416 | 0.003 | 0.171 | 0.346 |
| GM_Anlst | 0.089 | 0.033 | 0.492 | 1.996 | 0.029 | 0.203 | 0.216 |
| FGHJ_Anlst _Clbrtd | 0.106 | 0.049 | 0.483 | 1.604 | 0.001 | 0.055 | 0.208 |
| DKL_Anlst | 0.086 | 0.032 | 0.478 | 1.926 | 0.023 | 0.197 | 0.265 |
| DKL_EP | 0.116 | 0.060 | 0.473 | 3.785 | 0.015 | 0.376 | 0.571 |
| DKL_Anlst _Clbrtd | 0.069 | 0.022 | 0.470 | 1.124 | 0.012 | 0.072 | 0.246 |
| MPEG_EP_Clbrtd | 0.246 | 0.277 | 0.468 | 4.139 | 0.002 | 0.432 | 0.560 |
| HL_Anlst_Clbrtd | 0.071 | 0.023 | 0.466 | 1.169 | 0.015 | 0.114 | 0.221 |
| FGHJ_HDZ_Clbrtd | 0.103 | 0.049 | 0.462 | 2.362 | 0.032 | 0.491 | 0.611 |
| FGHJ_Anlst | 0.076 | 0.030 | 0.440 | 1.671 | 0.011 | 0.206 | 0.364 |
| WNG_Anlst | 1.543 | 12.507 | 0.436 | 60.576 | 0.002 | 0.424 | 0.546 |
| KMY_HDZ | 0.115 | 0.070 | 0.435 | 2.635 | 0.027 | 0.477 | 0.534 |
| HL_HDZ | 0.103 | 0.056 | 0.435 | 2.516 | 0.029 | 0.463 | 0.505 |
| GLS_RW_Clbrtd | 0.099 | 0.056 | 0.420 | 3.766 | 0.003 | 0.220 | 0.559 |
| GG_EP_Clbrtd | 0.447 | 1.139 | 0.419 | 12.299 | 0.010 | 0.559 | 0.719 |
| HL_RI | 0.529 | 1.686 | 0.408 | 13.116 | 0.001 | 0.479 | 0.688 |
| PE_RW_Clbrtd | 0.102 | 0.064 | 0.405 | 2.890 | 0.005 | 0.417 | 0.612 |
| GM_RI | 0.103 | 0.067 | 0.399 | 2.596 | 0.016 | 0.474 | 0.699 |
| TrETSS_HDZ_10Ind | 1.838 | 21.410 | 0.397 | 81.560 | 0.000 | 0.528 | 0.719 |
| GM_HDZ_Clbrtd | 1.326 | 11.726 | 0.387 | 13.611 | 0.000 | 0.562 | 0.710 |
| DKL_RW_Clbrtd | 0.089 | 0.053 | 0.386 | 1.872 | 0.005 | 0.270 | 0.574 |
| PEG_Anlst | 0.123 | 0.105 | 0.379 | 5.003 | 0.060 | 0.629 | 0.722 |
| KMY_RW_Clbrtd | 0.085 | 0.052 | 0.372 | 2.013 | 0.007 | 0.360 | 0.637 |
| KMY_Anlst | 0.060 | 0.026 | 0.369 | 1.530 | 0.024 | 0.329 | 0.654 |
| GM_EP_Clbrtd | 0.278 | 0.572 | 0.367 | 9.255 | 0.004 | 0.584 | 0.786 |
| HL_RW_Clbrtd | 0.083 | 0.051 | 0.367 | 2.000 | 0.008 | 0.380 | 0.668 |
| CT_RW_Clbrtd | 5.222 | 203.856 | 0.366 | 73.924 | 0.000 | 0.607 | 0.809 |
| FPM_Anlst_Clbrtd | 0.057 | 0.024 | 0.366 | 0.913 | 0.007 | 0.272 | 0.714 |
| GG_Anlst | 0.060 | 0.027 | 0.364 | 1.546 | 0.021 | 0.361 | 0.702 |

[^67]Table 108 : ICC Optimal Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| DKL_RI | 0.383 | 1.168 | 0.354 | 15.908 | 0.005 | 0.645 | 0.847 |
| GM_Anlst _Clbrtd | 0.065 | 0.034 | 0.351 | 1.425 | 0.045 | 0.554 | 0.759 |
| TrES_Anlst _25SBM | 2.911 | 70.265 | 0.347 | 127.860 | 0.001 | 0.655 | 0.855 |
| KMY_Anlst _Clbrtd | 0.048 | 0.019 | 0.347 | 0.955 | 0.016 | 0.124 | 0.808 |
| HL_RI_Clbrtd | 0.062 | 0.033 | 0.342 | 2.203 | 0.012 | 0.459 | 0.843 |
| BP_Anlst | 0.761 | 5.108 | 0.337 | 17.803 | 0.004 | 0.729 | 0.889 |
| TPDPS_HDZ_Clbrtd | 0.973 | 8.420 | 0.335 | 47.879 | 0.002 | 0.707 | 0.904 |
| CT_RI_Clbrtd | 0.442 | 1.845 | 0.326 | 9.962 | 0.002 | 0.722 | 0.921 |
| GG_RI_Clbrtd | 6.953 | 459.383 | 0.324 | 81.000 | 0.000 | 0.722 | 0.923 |
| BP_RI_Clbrtd | 0.599 | 3.626 | 0.315 | 23.330 | 0.002 | 0.739 | 0.946 |
| KMY_EP | 0.365 | 1.345 | 0.315 | 7.517 | 0.001 | 0.723 | 0.948 |
| FPM_RW_Clbrtd | 0.670 | 4.674 | 0.310 | 8.798 | 0.001 | 0.768 | 0.967 |
| 1/N | 0.062 | 0.043 | 0.297 | 0.230 | 0.036 | 0.741 | 1.000 |
| BP_EP | 2.562 | 74.632 | 0.297 | 42.378 | 0.000 | 0.786 | 0.998 |
| MPEG_Anlst_Clbrtd | 0.075 | 0.065 | 0.294 | 1.963 | 0.078 | 0.796 | 0.988 |
| GG_RW_Clbrtd | 0.168 | 0.328 | 0.293 | 11.868 | 0.018 | 0.822 | 0.989 |
| BP_RI | 0.654 | 5.079 | 0.290 | 22.454 | 0.010 | 0.833 | 0.976 |
| FPM_RW | 0.299 | 1.188 | 0.274 | 53.197 | 0.040 | 0.887 | 0.949 |
| CAPM_Factor | 0.335 | 1.533 | 0.271 | 11.589 | 0.017 | 0.890 | 0.938 |
| TrOHE_25SBM | 7.138 | 733.220 | 0.264 | 293.798 | 0.001 | 0.891 | 0.906 |
| GLS_EP_Clbrtd | 1.215 | 21.861 | 0.260 | 8.708 | 0.000 | 0.899 | 0.893 |
| PE_Anlst | 1.032 | 15.984 | 0.258 | 14.790 | 0.001 | 0.901 | 0.884 |
| GG_EP | 1.373 | 28.418 | 0.257 | 144.242 | 0.005 | 0.908 | 0.889 |
| PEG_EP | 1.729 | 45.275 | 0.257 | 54.398 | 0.002 | 0.908 | 0.890 |
| PEG_HDZ_Clbrtd | 21.292 | 6,879.966 | 0.257 | 454.080 | 0.005 | 0.912 | 0.880 |
| FPM_RI | 0.191 | 0.598 | 0.247 | 17.865 | 0.029 | 0.945 | 0.883 |
| GM_EP | 0.069 | 0.079 | 0.247 | 2.276 | 0.025 | 0.929 | 0.846 |
| FPM_EP | 0.208 | 0.721 | 0.244 | 11.103 | 0.010 | 0.939 | 0.849 |
| TrETSS_Anlst _10Ind | 95.149 | 151,762.3 | 102244 | 473.057 | 0.001 | 0.942 | 0.847 |
| TrES_RW_25SBM | 10.501 | 1,901.025 | 0.241 | 278.755 | 0.002 | 0.955 | 0.844 |
| Carhart_Factor | 0.276 | 1.327 | 0.239 | 18.667 | 0.026 | 0.966 | 0.869 |
| FGHJ_EP_Clbrtd | 3.056 | 169.878 | 0.234 | 331.861 | 0.000 | 0.973 | 0.827 |

[^68]Table 108 : ICC Optimal Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_RI | 1.549 | 43.984 | 0.234 | 90.724 | 0.004 | 0.975 | 0.824 |
| BP_EP_Clbrtd | 0.114 | 0.250 | 0.229 | 7.347 | 0.016 | 0.990 | 0.802 |
| Minimum Variance | 0.031 | 0.019 | 0.225 | 0.791 | 0.020 | 1.000 | 0.741 |
| PEG_RW_Clbrtd | 0.054 | 0.067 | 0.208 | 5.686 | 0.003 | 0.953 | 0.729 |
| PEG_RI_Clbrtd | 1.374 | 52.096 | 0.190 | 17.288 | 0.006 | 0.901 | 0.707 |
| PE_EP_Clbrtd | 0.227 | 1.654 | 0.177 | 17.851 | 0.039 | 0.878 | 0.686 |
| TrETSS_Anlst_25SBM | 0.117 | 0.445 | 0.175 | 33.701 | 0.040 | 0.874 | 0.691 |
| TrES_RI_10Ind | 1.183 | 52.476 | 0.163 | 155.071 | 0.011 | 0.845 | 0.667 |
| TrES_HDZ_25SBM | 1.447 | 81.864 | 0.160 | 207.299 | 0.033 | 0.845 | 0.684 |
| 5FF_Factor | 0.066 | 0.176 | 0.158 | 14.997 | 0.030 | 0.812 | 0.628 |
| TrETSS_EP_25SBM | 0.231 | 2.212 | 0.155 | 53.113 | 0.035 | 0.830 | 0.667 |
| PEG_HDZ | 0.417 | 7.316 | 0.154 | 94.342 | 0.025 | 0.828 | 0.625 |
| TPDPS_RW | 0.970 | 40.332 | 0.153 | 108.864 | 0.060 | 0.839 | 0.682 |
| CT_EP_Clbrtd | 0.153 | 1.092 | 0.147 | 13.841 | 0.024 | 0.781 | 0.515 |
| TrES_RI_25SBM | 0.624 | 18.647 | 0.144 | 153.455 | 0.039 | 0.809 | 0.617 |
| FGHJ_RW | 0.223 | 2.456 | 0.142 | 39.068 | 0.068 | 0.816 | 0.661 |
| PEG_EP_Clbrtd | 0.300 | 4.714 | 0.138 | 11.608 | 0.039 | 0.768 | 0.597 |
| FGHJ_RI_Clbrtd | 0.140 | 1.415 | 0.118 | 13.907 | 0.036 | 0.723 | 0.550 |
| GM_RI_Clbrtd | 0.094 | 0.658 | 0.116 | 22.039 | 0.047 | 0.721 | 0.516 |
| TrETSS_RI_25SBM | 0.214 | 7.197 | 0.080 | 40.640 | 0.067 | 0.656 | 0.474 |
| TPDPS_RI | 0.138 | 3.440 | 0.074 | 30.499 | 0.074 | 0.607 | 0.478 |
| CT_Anlst | 0.016 | 0.060 | 0.066 | 4.091 | 0.116 | 0.448 | 0.197 |
| TrETSS_RW_25SBM | 0.059 | 1.586 | 0.047 | 64.032 | 0.117 | 0.590 | 0.417 |
| TrES_EP_25SBM | 0.289 | 44.184 | 0.043 | 143.065 | 0.063 | 0.535 | 0.384 |
| BP_Anlst _Clbrtd | 0.055 | 2.482 | 0.035 | 17,129.334 | 0.109 | 0.591 | 0.375 |
| BP_HDZ | 0.021 | 1.645 | 0.016 | 30.972 | 0.111 | 0.562 | 0.383 |
| BP_HDZ_Clbrtd | - 0.044 | 20.557 | - 0.010 | 41.213 | 0.120 | 0.497 | 0.362 |
| PE_RI_Clbrtd | - 0.067 | 45.040 | - 0.010 | 45.211 | 0.116 | 0.519 | 0.392 |
| TrETSS_HDZ_25SBM | - 0.277 | 626.876 | -0.011 | 586.761 | 0.116 | 0.496 | 0.360 |
| Naive_Clbrtd | - 0.079 | 7.755 | - 0.028 | 58.988 | 0.138 | 0.448 | 0.239 |
| FPM_Anlst | - 0.008 | 0.073 | -0.029 | 3.701 | 0.165 | 0.309 | 0.202 |
| GM_RW_Clbrtd | - 0.050 | 2.577 | -0.031 | 18.486 | 0.111 | 0.397 | 0.353 |

Continued in next page...

Table 108 : ICC Optimal Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_RW | - 0.038 | 1.406 | - 0.032 | 13.453 | 0.135 | 0.445 | 0.321 |
| PEG_Anlst _Clbrtd | - 0.016 | 0.230 | -0.033 | 8.559 | 0.235 | 0.386 | 0.207 |
| BP_RW_Clbrtd | -0.127 | 13.372 | - 0.035 | 1,554.245 | 0.142 | 0.466 | 0.366 |
| TPDPS_Anlst_Clbrtd | - 0.161 | 6.601 | - 0.063 | 27.409 | 0.146 | 0.386 | 0.315 |
| FPM_HDZ | - 0.022 | 0.086 | - 0.074 | 3.388 | 0.231 | 0.216 | 0.138 |
| TrETSS_RW_10Ind | - 0.134 | 3.026 | - 0.077 | 88.211 | 0.206 | 0.388 | 0.291 |
| TPDPS_RW_Clbrtd | -0.358 | 14.708 | - 0.093 | 80.471 | 0.140 | 0.366 | 0.302 |
| TrOHE_10Ind | - 0.138 | 1.898 | - 0.100 | 55.896 | 0.243 | 0.349 | 0.234 |
| FGHJ_RW_Clbrtd | - 0.130 | 1.565 | - 0.104 | 17.948 | 0.227 | 0.266 | 0.204 |
| TrES_EP_10Ind | - 0.136 | 1.537 | -0.110 | 60.126 | 0.312 | 0.347 | 0.243 |
| GM_HDZ | - 0.040 | 0.127 | - 0.111 | 5.012 | 0.329 | 0.248 | 0.084 |
| MPEG_HDZ_Clbrtd | - 0.271 | 5.776 | -0.113 | 9.163 | 0.178 | 0.333 | 0.208 |
| WNG_EP | -2.647 | 495.334 | -0.119 | 102.323 | 0.174 | 0.255 | 0.097 |
| TrES_RW_10Ind | - 0.423 | 12.079 | - 0.122 | 83.929 | 0.172 | 0.263 | 0.182 |
| TrES_HDZ_10Ind | -0.344 | 7.067 | - 0.130 | 74.908 | 0.219 | 0.283 | 0.172 |
| MPEG_HDZ | - 0.053 | 0.144 | - 0.139 | 3.980 | 0.372 | 0.173 | 0.043 |
| WNG_RW | - 0.739 | 25.877 | - 0.145 | 70.465 | 0.202 | 0.207 | 0.141 |
| FGHJ_EP | - 0.909 | 33.788 | - 0.156 | 7.735 | 0.171 | 0.211 | 0.128 |
| TPDPS_Anlst | - 0.817 | 26.774 | - 0.158 | 27.134 | 0.199 | 0.214 | 0.162 |
| TPDPS_HDZ | -0.599 | 13.522 | - 0.163 | 40.039 | 0.214 | 0.213 | 0.174 |
| TPDPS_EP | -0.567 | 11.375 | - 0.168 | 67.278 | 0.300 | 0.235 | 0.156 |
| DKL_RW | - 0.214 | 1.491 | - 0.176 | 7.378 | 0.220 | 0.150 | 0.088 |
| DKL_EP_Clbrtd | -2.166 | 132.345 | - 0.188 | 120.571 | 0.228 | 0.145 | 0.078 |
| KMY_RW | - 0.234 | 1.485 | - 0.192 | 7.267 | 0.236 | 0.130 | 0.075 |
| HL_RW | - 0.240 | 1.485 | - 0.197 | 7.331 | 0.240 | 0.124 | 0.071 |
| GG_RI | - 0.465 | 5.252 | - 0.203 | 40.356 | 0.440 | 0.207 | 0.053 |
| GLS_RI_Clbrtd | - 1.299 | 38.461 | -0.209 | 21.931 | 0.228 | 0.119 | 0.076 |
| GLS_RW | - 0.269 | 1.574 | - 0.214 | 11.510 | 0.263 | 0.105 | 0.060 |
| GLS_RI | - 3.447 | 244.030 | -0.221 | 55.402 | 0.243 | 0.127 | 0.075 |
| CT_RI | -2.207 | 98.784 | - 0.222 | 28.219 | 0.220 | 0.104 | 0.075 |
| HL_EP_Clbrtd | - 0.844 | 14.116 | - 0.225 | 5.177 | 0.343 | 0.100 | 0.062 |
| GM_RW | - 0.565 | 6.072 | -0.229 | 39.029 | 0.295 | 0.099 | 0.054 |

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Table 108 : ICC Optimal Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | $\mathbf{1 / N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| PEG_RI | -0.480 | 4.318 | -0.231 | 28.712 | 0.320 | 0.123 | 0.072 |
| 3FF_Factor | -1.085 | 20.799 | -0.238 | 48.113 | 0.288 | 0.119 | 0.075 |
| TrES_Anlst_10Ind | -5.732 | 567.313 | -0.241 | 59.473 | 0.253 | 0.070 | 0.036 |
| Naive | - | $7,868.971-0.245$ | 905.301 | 0.269 | 0.102 | 0.057 |  |
| CT_EP | 21.721 |  |  |  |  |  |  |
| CT_RW | -0.262 | 1.135 | -0.246 | 33.140 | 0.361 | 0.098 | 0.066 |
| MPEG_RW | -0.147 | 0.348 | -0.249 | 12.285 | 0.416 | 0.024 | 0.004 |
| MPEG_RW_Clbrtd | -4.179 | 257.417 | -0.260 | 8.563 | 0.385 | 0.097 | 0.045 |
| TPDPS_RI_Clbrtd | -0.370 | 1.990 | -0.263 | 15.907 | 0.396 | 0.092 | 0.033 |
| MPEG_RI_Clbrtd | -0.214 | 0.594 | -0.277 | 7.253 | 0.473 | 0.058 | 0.029 |
| FPM_EP_Clbrtd | -0.273 | 0.878 | -0.292 | 4.318 | 0.503 | 0.031 | 0.020 |
| TPDPS_EP_Clbrtd | -0.709 | 5.709 | -0.297 | 24.534 | 0.443 | 0.066 | 0.023 |
| BP_RW | -0.637 | 4.516 | -0.300 | 59.252 | 0.383 | 0.063 | 0.039 |
| TrETSS_EP_10Ind | -0.408 | 1.593 | -0.323 | 31.259 | 0.545 | 0.084 | 0.033 |
| WNG_HDZ | -1.332 | 13.994 | -0.356 | 136.370 | 0.502 | 0.059 | 0.033 |
| FPM_RI_Clbrtd | -0.358 | 0.872 | -0.383 | 7.898 | 0.671 | 0.008 | 0.006 |
| Mean-variance | -0.473 | 0.857 | -0.511 | 18.063 | 1.000 | 0.020 | 0.036 |

This table report the out-of-sample results of the tangency portfolio using ICC ex-ante expected return estimates, as well as other benchmark strategies. It is similar to table (106) except that missing ICC estimates are replaced by the last non missing estimates up to 12 months ahead. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the MeanV column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the mean-variance portfolio is zero, the $1 / \mathrm{N}$ column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the MinVar column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the minimum variance portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) non-parametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 109 : ICC Timing Portfolios - Last Non Missing Estimate Sample

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | $\mathbf{1 / N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| PE_RI | 0.122 | 0.036 | 0.642 | 0.303 | 0.000 | 0.000 | 0.000 |
| PE_HDZ | 0.117 | 0.036 | 0.614 | 0.288 | 0.000 | 0.000 | 0.000 |
| PE_EP | 0.114 | 0.035 | 0.605 | 0.301 | 0.000 | 0.000 | 0.001 |
| TrES_EP_10Ind | 0.113 | 0.036 | 0.593 | 0.693 | 0.003 | 0.029 | 0.013 |
| GG_RI | 0.100 | 0.038 | 0.514 | 0.371 | 0.008 | 0.037 | 0.006 |
| TrES_Anlst_25SBM | 0.104 | 0.041 | 0.509 | 1.106 | 0.014 | 0.072 | 0.029 |
| FGHJ_RI | 0.091 | 0.032 | 0.506 | 0.327 | 0.000 | 0.000 | 0.000 |
| DKL_RI | 0.091 | 0.034 | 0.497 | 0.430 | 0.001 | 0.001 | 0.005 |
| KMY_RI | 0.093 | 0.035 | 0.495 | 0.421 | 0.001 | 0.002 | 0.005 |
| HL_RI | 0.090 | 0.034 | 0.491 | 0.407 | 0.001 | 0.001 | 0.006 |
| GLS_RI | 0.089 | 0.033 | 0.487 | 0.341 | 0.001 | 0.000 | 0.000 |
| GM_HDZ_Clbrtd | 0.096 | 0.039 | 0.484 | 0.322 | 0.003 | 0.016 | 0.003 |
| CT_RI | 0.091 | 0.037 | 0.473 | 0.410 | 0.004 | 0.058 | 0.042 |
| TrOHE_25SBM | 0.075 | 0.029 | 0.438 | 0.667 | 0.045 | 0.220 | 0.103 |
| TrES_RW_25SBM | 0.098 | 0.043 | 0.471 | 1.130 | 0.036 | 0.163 | 0.073 |
| TrES_Anlst_10Ind | 0.089 | 0.036 | 0.467 | 1.001 | 0.070 | 0.291 | 0.146 |
| CT_HDZ_Clbrtd | 0.033 | 0.037 | 0.440 | 0.300 | 0.006 | 0.033 | 0.008 |
| MPEG_EP | 0.093 | 0.039 | 0.466 | 0.394 | 0.006 | 0.017 | 0.011 |
| PE_HDZ_Clbrtd | 0.079 | 0.079 | 0.029 | 0.463 | 0.302 | 0.004 | 0.023 | 0.034

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Table 109 : ICC Timing Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GG_HDZ_Clbrtd | 0.080 | 0.035 | 0.428 | 0.273 | 0.015 | 0.030 | 0.030 |
| CT_HDZ | 0.081 | 0.036 | 0.425 | 0.262 | 0.020 | 0.059 | 0.058 |
| GLS_RI_Clbrtd | 0.079 | 0.035 | 0.422 | 0.367 | 0.011 | 0.086 | 0.024 |
| MPEG_RI | 0.075 | 0.033 | 0.413 | 0.278 | 0.011 | 0.081 | 0.044 |
| TPDPS_RI_Clbrtd | 0.084 | 0.042 | 0.412 | 0.429 | 0.020 | 0.128 | 0.067 |
| PE_EP_Clbrtd | 0.078 | 0.036 | 0.412 | 0.328 | 0.060 | 0.325 | 0.180 |
| FGHJ_EP | 0.072 | 0.031 | 0.411 | 0.263 | 0.002 | 0.003 | 0.010 |
| GLS_EP | 0.073 | 0.031 | 0.411 | 0.264 | 0.004 | 0.011 | 0.016 |
| GM_RI | 0.074 | 0.033 | 0.409 | 0.280 | 0.012 | 0.112 | 0.052 |
| TPDPS_EP | 0.085 | 0.043 | 0.409 | 0.400 | 0.037 | 0.224 | 0.083 |
| GG_RI_Clbrtd | 0.081 | 0.040 | 0.405 | 0.445 | 0.072 | 0.389 | 0.153 |
| BP_HDZ | 0.082 | 0.041 | 0.403 | 0.442 | 0.027 | 0.178 | 0.080 |
| FGHJ_RI_Clbrtd | 0.072 | 0.032 | 0.402 | 0.364 | 0.006 | 0.173 | 0.054 |
| DKL_EP | 0.070 | 0.030 | 0.402 | 0.298 | 0.010 | 0.091 | 0.042 |
| GM_EP | 0.073 | 0.033 | 0.402 | 0.277 | 0.021 | 0.281 | 0.075 |
| HL_EP | 0.070 | 0.030 | 0.400 | 0.293 | 0.015 | 0.124 | 0.052 |
| GLS_Anlst | 0.073 | 0.034 | 0.400 | 0.261 | 0.009 | 0.025 | 0.042 |
| GLS_HDZ_Clbrtd | 0.074 | 0.034 | 0.399 | 0.273 | 0.018 | 0.080 | 0.034 |
| FGHJ_HDZ_Clbrtd | 0.073 | 0.034 | 0.396 | 0.258 | 0.014 | 0.062 | 0.027 |
| KMY_RI_Clbrtd | 0.073 | 0.034 | 0.395 | 0.369 | 0.028 | 0.269 | 0.104 |
| WNG_RW | 0.097 | 0.061 | 0.395 | 0.763 | 0.329 | 0.757 | 0.514 |
| TPDPS_EP_Clbrtd | 0.081 | 0.042 | 0.394 | 0.447 | 0.027 | 0.264 | 0.100 |
| PEG_EP_Clbrtd | 0.070 | 0.032 | 0.392 | 0.324 | 0.117 | 0.609 | 0.349 |
| TPDPS_HDZ | 0.081 | 0.043 | 0.389 | 0.444 | 0.050 | 0.372 | 0.137 |
| MPEG_Anlst _Clbrtd | 0.075 | 0.037 | 0.388 | 0.275 | 0.016 | 0.061 | 0.020 |
| TrETSS_Anlst _10Ind | 0.068 | 0.031 | 0.385 | 0.484 | 0.046 | 0.579 | 0.253 |
| BP_Anlst | 0.078 | 0.042 | 0.382 | 0.456 | 0.045 | 0.396 | 0.145 |
| PEG_RI | 0.080 | 0.044 | 0.381 | 0.348 | 0.197 | 0.731 | 0.414 |
| CT_EP_Clbrtd | 0.070 | 0.034 | 0.380 | 0.319 | 0.036 | 0.337 | 0.183 |
| PEG_Anlst | 0.071 | 0.035 | 0.380 | 0.313 | 0.029 | 0.300 | 0.039 |
| DKL_HDZ | 0.072 | 0.036 | 0.380 | 0.262 | 0.044 | 0.288 | 0.154 |
| FGHJ_Anlst | 0.069 | 0.033 | 0.380 | 0.254 | 0.013 | 0.059 | 0.067 |

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Table 109 : ICC Timing Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_Anlst | 0.080 | 0.044 | 0.379 | 0.444 | 0.062 | 0.481 | 0.177 |
| MPEG_Anlst | 0.071 | 0.035 | 0.379 | 0.286 | 0.024 | 0.201 | 0.064 |
| TPDPS_Anlst_Clbrtd | 0.080 | 0.044 | 0.379 | 0.449 | 0.060 | 0.483 | 0.178 |
| TrES_RW_10Ind | 0.073 | 0.038 | 0.378 | 0.550 | 0.279 | 0.787 | 0.572 |
| TPDPS_HDZ_Clbrtd | 0.078 | 0.043 | 0.377 | 0.451 | 0.066 | 0.512 | 0.196 |
| GM_Anlst _Clbrtd | 0.071 | 0.035 | 0.376 | 0.260 | 0.017 | 0.061 | 0.039 |
| PE_Anlst _Clbrtd | 0.066 | 0.031 | 0.375 | 0.296 | 0.017 | 0.277 | 0.229 |
| Naive | 0.080 | 0.046 | 0.375 | 0.465 | 0.077 | 0.571 | 0.210 |
| DKL_RI_Clbrtd | 0.068 | 0.034 | 0.373 | 0.361 | 0.052 | 0.519 | 0.216 |
| TrES_EP_25SBM | 0.068 | 0.033 | 0.373 | 1.148 | 0.145 | 0.720 | 0.487 |
| Naive_Clbrtd | 0.079 | 0.046 | 0.371 | 0.467 | 0.082 | 0.612 | 0.233 |
| HL_Anlst | 0.068 | 0.034 | 0.370 | 0.268 | 0.025 | 0.246 | 0.102 |
| TrETSS_RI_25SBM | 0.071 | 0.037 | 0.369 | 0.613 | 0.198 | 0.791 | 0.475 |
| DKL_Anlst | 0.068 | 0.034 | 0.368 | 0.263 | 0.024 | 0.254 | 0.116 |
| PEG_HDZ_Clbrtd | 0.077 | 0.044 | 0.368 | 0.371 | 0.126 | 0.680 | 0.249 |
| KMY_EP | 0.066 | 0.033 | 0.365 | 0.329 | 0.071 | 0.628 | 0.226 |
| KMY_HDZ | 0.069 | 0.036 | 0.364 | 0.261 | 0.077 | 0.580 | 0.269 |
| TPDPS_RW_Clbrtd | 0.081 | 0.050 | 0.364 | 0.463 | 0.135 | 0.791 | 0.415 |
| BP_RW | 0.078 | 0.046 | 0.364 | 0.471 | 0.090 | 0.751 | 0.347 |
| GM_Anlst | 0.067 | 0.034 | 0.362 | 0.266 | 0.028 | 0.387 | 0.120 |
| PE_Anlst | 0.069 | 0.036 | 0.362 | 0.289 | 0.079 | 0.646 | 0.330 |
| HL_Anlst _Clbrtd | 0.067 | 0.035 | 0.362 | 0.253 | 0.024 | 0.186 | 0.108 |
| DKL_Anlst _Clbrtd | 0.067 | 0.034 | 0.362 | 0.252 | 0.023 | 0.151 | 0.114 |
| CT_Anlst_Clbrtd | 0.066 | 0.033 | 0.359 | 0.256 | 0.023 | 0.233 | 0.145 |
| GLS_Anlst_Clbrtd | 0.065 | 0.033 | 0.358 | 0.265 | 0.031 | 0.345 | 0.149 |
| HL_RI_Clbrtd | 0.065 | 0.033 | 0.358 | 0.332 | 0.074 | 0.739 | 0.312 |
| HL_HDZ | 0.068 | 0.036 | 0.358 | 0.261 | 0.082 | 0.680 | 0.295 |
| FGHJ_EP_Clbrtd | 0.063 | 0.031 | 0.357 | 0.327 | 0.094 | 0.791 | 0.327 |
| GG_EP_Clbrtd | 0.075 | 0.044 | 0.356 | 0.346 | 0.127 | 0.820 | 0.346 |
| TPDPS_RW | 0.080 | 0.051 | 0.355 | 0.468 | 0.216 | 0.899 | 0.537 |
| TrETSS_Anlst _25SBM | 0.065 | 0.034 | 0.354 | 0.760 | 0.109 | 0.847 | 0.487 |
| PEG_Anlst _Clbrtd | 0.068 | 0.037 | 0.354 | 0.285 | 0.067 | 0.693 | 0.133 |

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Table 109 : ICC Timing Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_Anlst _Clbrtd | 0.063 | 0.032 | 0.354 | 0.239 | 0.021 | 0.282 | 0.206 |
| BP_RW_Clbrtd | 0.078 | 0.048 | 0.353 | 0.497 | 0.144 | 0.875 | 0.425 |
| KMY_EP_Clbrtd | 0.067 | 0.036 | 0.353 | 0.314 | 0.138 | 0.845 | 0.346 |
| HL_EP_Clbrtd | 0.065 | 0.034 | 0.352 | 0.285 | 0.131 | 0.851 | 0.386 |
| FGHJ_Anlst _Clbrtd | 0.064 | 0.033 | 0.352 | 0.260 | 0.033 | 0.513 | 0.181 |
| CT_Anlst | 0.064 | 0.034 | 0.348 | 0.269 | 0.048 | 0.797 | 0.262 |
| MPEG_RW_Clbrtd | 0.064 | 0.034 | 0.347 | 0.431 | 0.081 | 0.940 | 0.499 |
| FPM_Anlst | 0.062 | 0.032 | 0.346 | 0.263 | 0.044 | 0.777 | 0.259 |
| FPM_RW_Clbrtd | 0.075 | 0.047 | 0.346 | 0.561 | 0.317 | 0.967 | 0.647 |
| GM_EP_Clbrtd | 0.063 | 0.034 | 0.344 | 0.325 | 0.088 | 0.941 | 0.325 |
| CT_EP | 0.061 | 0.031 | 0.343 | 0.304 | 0.110 | 0.985 | 0.478 |
| BP_Anlst _Clbrtd | 0.071 | 0.043 | 0.343 | 0.432 | 0.164 | 0.986 | 0.465 |
| TrES_RI_25SBM | 0.066 | 0.037 | 0.342 | 1.097 | 0.321 | 0.999 | 0.685 |
| VT | 0.060 | 0.030 | 0.342 | 0.227 | 0.022 | 1.000 | 0.291 |
| CT_RI_Clbrtd | 0.061 | 0.032 | 0.341 | 0.405 | 0.200 | 0.995 | 0.594 |
| DKL_EP_Clbrtd | 0.063 | 0.034 | 0.341 | 0.301 | 0.172 | 0.991 | 0.485 |
| TrOHE_10Ind | 0.068 | 0.040 | 0.340 | 0.511 | 0.312 | 0.987 | 0.684 |
| KMY_Anlst | 0.062 | 0.033 | 0.339 | 0.258 | 0.037 | 0.881 | 0.262 |
| GG_Anlst_Clbrtd | 0.062 | 0.033 | 0.337 | 0.248 | 0.033 | 0.753 | 0.259 |
| MPEG_HDZ | 0.065 | 0.038 | 0.335 | 0.261 | 0.165 | 0.872 | 0.534 |
| GM_RW | 0.062 | 0.035 | 0.333 | 0.275 | 0.075 | 0.721 | 0.340 |
| HL_RW_Clbrtd | 0.059 | 0.031 | 0.332 | 0.268 | 0.032 | 0.634 | 0.394 |
| KMY_RW_Clbrtd | 0.058 | 0.031 | 0.331 | 0.267 | 0.034 | 0.613 | 0.401 |
| FGHJ_RW_Clbrtd | 0.065 | 0.038 | 0.331 | 0.324 | 0.131 | 0.830 | 0.547 |
| FGHJ_RW | 0.062 | 0.036 | 0.330 | 0.368 | 0.135 | 0.802 | 0.572 |
| GG_Anlst | 0.060 | 0.033 | 0.330 | 0.256 | 0.052 | 0.514 | 0.350 |
| GLS_EP_Clbrtd | 0.059 | 0.033 | 0.327 | 0.327 | 0.179 | 0.785 | 0.587 |
| TrETSS_RW_25SBM | 0.062 | 0.036 | 0.327 | 0.553 | 0.171 | 0.795 | 0.628 |
| DKL_RW_Clbrtd | 0.058 | 0.031 | 0.327 | 0.281 | 0.047 | 0.471 | 0.453 |
| BP_EP_Clbrtd | 0.063 | 0.038 | 0.325 | 0.423 | 0.304 | 0.813 | 0.725 |
| DKL_RW | 0.058 | 0.032 | 0.325 | 0.334 | 0.088 | 0.530 | 0.530 |
| GM_HDZ | 0.063 | 0.038 | 0.324 | 0.262 | 0.205 | 0.698 | 0.657 |

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Table 109 : ICC Timing Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_RW_Clbrtd | 0.057 | 0.031 | 0.320 | 0.296 | 0.087 | 0.396 | 0.555 |
| FPM_HDZ_Clbrtd | 0.061 | 0.037 | 0.318 | 0.293 | 0.215 | 0.634 | 0.731 |
| CT_RW | 0.060 | 0.036 | 0.318 | 0.287 | 0.111 | 0.389 | 0.657 |
| TrES_RI_10Ind | 0.055 | 0.030 | 0.318 | 0.609 | 0.331 | 0.772 | 0.811 |
| TrETSS_RI_10Ind | 0.063 | 0.039 | 0.315 | 0.429 | 0.423 | 0.799 | 0.854 |
| MPEG_EP_Clbrtd | 0.059 | 0.035 | 0.315 | 0.341 | 0.243 | 0.712 | 0.818 |
| FPM_Anlst _Clbrtd | 0.058 | 0.034 | 0.314 | 0.261 | 0.218 | 0.554 | 0.738 |
| HL_RW | 0.056 | 0.031 | 0.314 | 0.327 | 0.118 | 0.288 | 0.700 |
| BP_HDZ_Clbrtd | 0.064 | 0.042 | 0.313 | 0.444 | 0.340 | 0.669 | 0.827 |
| KMY_RW | 0.056 | 0.032 | 0.313 | 0.331 | 0.123 | 0.271 | 0.715 |
| GG_EP | 0.071 | 0.051 | 0.312 | 0.347 | 0.379 | 0.717 | 0.867 |
| TrETSS_HDZ_25SBM | 0.063 | 0.041 | 0.312 | 0.744 | 0.376 | 0.683 | 0.847 |
| GG_RW_Clbrtd | 0.051 | 0.027 | 0.311 | 0.305 | 0.522 | 0.815 | 0.919 |
| PEG_RW_Clbrtd | 0.057 | 0.035 | 0.307 | 0.319 | 0.322 | 0.587 | 0.869 |
| TrETSS_EP_10Ind | 0.055 | 0.033 | 0.305 | 0.397 | 0.267 | 0.470 | 0.870 |
| TrES_HDZ_10Ind | 0.053 | 0.031 | 0.304 | 0.623 | 0.430 | 0.693 | 0.945 |
| FPM_HDZ | 0.056 | 0.035 | 0.301 | 0.291 | 0.334 | 0.423 | 0.953 |
| BP_RI_Clbrtd | 0.060 | 0.040 | 0.300 | 0.433 | 0.436 | 0.582 | 0.968 |
| 1/N | 0.062 | 0.043 | 0.297 | 0.230 | 0.225 | 0.291 | 1.000 |
| PE_RI_Clbrtd | 0.055 | 0.035 | 0.297 | 0.294 | 0.441 | 0.558 | 0.999 |
| GLS_RW | 0.054 | 0.033 | 0.297 | 0.396 | 0.230 | 0.297 | 0.992 |
| PE_RW | 0.072 | 0.060 | 0.294 | 0.273 | 0.740 | 0.837 | 0.987 |
| FPM_RI | 0.054 | 0.036 | 0.287 | 0.562 | 0.522 | 0.550 | 0.912 |
| CT_RW_Clbrtd | 0.060 | 0.044 | 0.286 | 0.419 | 0.594 | 0.629 | 0.923 |
| TrETSS_EP_25SBM | 0.055 | 0.038 | 0.283 | 0.539 | 0.481 | 0.379 | 0.838 |
| FPM_EP_Clbrtd | 0.050 | 0.033 | 0.279 | 0.388 | 0.451 | 0.335 | 0.762 |
| FPM_RI_Clbrtd | 0.051 | 0.035 | 0.272 | 0.506 | 0.542 | 0.265 | 0.696 |
| FPM_EP | 0.048 | 0.032 | 0.270 | 0.466 | 0.592 | 0.379 | 0.742 |
| MPEG_RW | 0.051 | 0.037 | 0.265 | 0.287 | 0.597 | 0.255 | 0.614 |
| TrETSS_HDZ_10Ind | 0.053 | 0.040 | 0.264 | 0.472 | 0.660 | 0.348 | 0.683 |
| PEG_HDZ | 0.051 | 0.039 | 0.256 | 0.274 | 0.647 | 0.108 | 0.478 |
| TrETSS_RW_10Ind | 0.047 | 0.035 | 0.253 | 0.396 | 0.796 | 0.473 | 0.713 |

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Table 109 : ICC Timing Portfolios - Last Non Missing Estimate Sample, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | $\mathbf{1 / N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| GM_RW_Clbrtd | 0.049 | 0.037 | 0.253 | 0.441 | 0.684 | 0.281 | 0.536 |
| GM_RI_Clbrtd | 0.047 | 0.037 | 0.244 | 0.389 | 0.757 | 0.112 | 0.439 |
| RRT | 0.036 | 0.028 | 0.216 | 0.265 | 1.000 | 0.022 | 0.225 |
| WNG_Anlst | 0.069 | 0.135 | 0.189 | 1.532 | 0.636 | 0.402 | 0.472 |
| WNG_RI | 0.039 | 0.050 | 0.174 | 0.865 | 0.803 | 0.277 | 0.396 |
| Carhart_Factor | 0.025 | 0.024 | 0.160 | 0.445 | 0.617 | 0.087 | 0.241 |
| MPEG_RI_Clbrtd | 0.026 | 0.036 | 0.135 | 0.385 | 0.547 | 0.085 | 0.180 |
| PEG_EP | 0.030 | 0.051 | 0.132 | 0.328 | 0.611 | 0.192 | 0.278 |
| CAPM_Factor | 0.020 | 0.034 | 0.109 | 0.427 | 0.571 | 0.213 | 0.314 |
| PEG_RI_Clbrtd | 0.022 | 0.044 | 0.103 | 0.347 | 0.454 | 0.075 | 0.157 |
| FPM_RW | 0.020 | 0.042 | 0.097 | 0.763 | 0.395 | 0.038 | 0.102 |
| WNG_EP | 0.014 | 0.048 | 0.062 | 0.990 | 0.237 | 0.017 | 0.047 |
| PEG_RW | 0.015 | 0.063 | 0.059 | 0.352 | 0.398 | 0.105 | 0.184 |
| WNG_HDZ | 0.014 | 0.066 | 0.053 | 0.474 | 0.474 | 0.218 | 0.288 |
| 3FF_Factor | 0.009 | 0.030 | 0.050 | 0.453 | 0.259 | 0.050 | 0.090 |
| 5FF_Factor | 0.004 | 0.024 | 0.023 | 0.496 | 0.128 | 0.012 | 0.035 |
| PE_RW_Clbrtd | -0.055 | 0.115 | -0.161 | 0.277 | 0.118 | 0.030 | 0.036 |

This table report the out-of-sample results of the market timing portfolio using ICC ex-ante expected return estimates, as well as other benchmark strategies. It is similar to table (107) except that missing ICC estimates are replaced by the last non missing estimates up to 12 months ahead. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the RRT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the conventional Reward-to-Risk Timing (RRT) portfolio is zero, the $1 / \mathrm{N}$ column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the VT column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the Volatility Timing (VT) portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) nonparametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 110 : ICC Optimal Portfolios with Constrained Turnover

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_EP | 0.106 | 0.046 | 0.495 | 0.146 | 0.008 | 0.354 | 0.318 |
| KMY_HDZ_Clbrtd | 0.091 | 0.037 | 0.470 | 0.143 | 0.015 | 0.259 | 0.079 |
| HL_HDZ_Clbrtd | 0.089 | 0.036 | 0.466 | 0.143 | 0.015 | 0.263 | 0.080 |
| DKL_HDZ_Clbrtd | 0.088 | 0.036 | 0.466 | 0.143 | 0.015 | 0.262 | 0.077 |
| PEG_RW_Clbrtd | 0.084 | 0.034 | 0.461 | 0.165 | 0.012 | 0.247 | 0.055 |
| GM_HDZ_Clbrtd | 0.087 | 0.038 | 0.448 | 0.129 | 0.016 | 0.306 | 0.139 |
| PEG_HDZ_Clbrtd | 0.089 | 0.041 | 0.439 | 0.146 | 0.020 | 0.332 | 0.129 |
| MPEG_HDZ_Clbrtd | 0.084 | 0.038 | 0.434 | 0.129 | 0.018 | 0.334 | 0.161 |
| CT_HDZ_Clbrtd | 0.080 | 0.034 | 0.431 | 0.121 | 0.018 | 0.344 | 0.146 |
| GM_EP | 0.081 | 0.036 | 0.430 | 0.123 | 0.016 | 0.331 | 0.287 |
| PE_RI | 0.085 | 0.039 | 0.428 | 0.121 | 0.019 | 0.357 | 0.062 |
| PE_HDZ | 0.086 | 0.043 | 0.416 | 0.119 | 0.023 | 0.406 | 0.125 |
| MPEG_EP | 0.080 | 0.037 | 0.415 | 0.119 | 0.016 | 0.364 | 0.340 |
| KMY_RI_Clbrtd | 0.074 | 0.032 | 0.414 | 0.142 | 0.017 | 0.352 | 0.249 |
| FGHJ_HDZ_Clbrtd | 0.072 | 0.033 | 0.397 | 0.142 | 0.022 | 0.422 | 0.206 |
| KMY_EP_Clbrtd | 0.071 | 0.033 | 0.395 | 0.147 | 0.018 | 0.411 | 0.365 |
| GLS_HDZ_Clbrtd | 0.073 | 0.034 | 0.395 | 0.143 | 0.023 | 0.427 | 0.223 |
| GG_HDZ_Clbrtd | 0.077 | 0.038 | 0.395 | 0.122 | 0.024 | 0.437 | 0.275 |
| FPM_HDZ_Clbrtd | 0.073 | 0.034 | 0.393 | 0.146 | 0.020 | 0.409 | 0.286 |
| GM_RI | 0.073 | 0.035 | 0.392 | 0.119 | 0.021 | 0.412 | 0.390 |
| GLS_RI_Clbrtd | 0.071 | 0.034 | 0.389 | 0.145 | 0.018 | 0.407 | 0.380 |
| MPEG_RW_Clbrtd | 0.072 | 0.035 | 0.387 | 0.128 | 0.021 | 0.441 | 0.348 |
| GM_RW_Clbrtd | 0.073 | 0.036 | 0.387 | 0.128 | 0.022 | 0.447 | 0.334 |
| MPEG_RI | 0.072 | 0.035 | 0.386 | 0.119 | 0.020 | 0.413 | 0.399 |
| DKL_RI_Clbrtd | 0.069 | 0.032 | 0.383 | 0.140 | 0.019 | 0.420 | 0.388 |
| HL_EP | 0.071 | 0.034 | 0.383 | 0.124 | 0.021 | 0.437 | 0.394 |
| GG_RI | 0.076 | 0.039 | 0.383 | 0.125 | 0.028 | 0.463 | 0.235 |
| GM_HDZ | 0.079 | 0.042 | 0.381 | 0.117 | 0.028 | 0.505 | 0.432 |
| HL_RI_Clbrtd | 0.068 | 0.031 | 0.381 | 0.140 | 0.019 | 0.423 | 0.408 |
| PE_HDZ_Clbrtd | 0.071 | 0.034 | 0.381 | 0.117 | 0.021 | 0.482 | 0.335 |
| MPEG_HDZ | 0.078 | 0.043 | 0.378 | 0.117 | 0.029 | 0.516 | 0.445 |

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Table 110 : ICC Optimal Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GM_RI_Clbrtd | 0.068 | 0.033 | 0.373 | 0.123 | 0.022 | 0.464 | 0.487 |
| FPM_EP | 0.065 | 0.030 | 0.371 | 0.125 | 0.021 | 0.480 | 0.451 |
| PEG_RW | 0.069 | 0.034 | 0.370 | 0.166 | 0.025 | 0.469 | 0.241 |
| GG_RW | 0.073 | 0.039 | 0.370 | 0.122 | 0.024 | 0.503 | 0.320 |
| GG_HDZ | 0.074 | 0.040 | 0.370 | 0.117 | 0.027 | 0.521 | 0.351 |
| DKL_EP | 0.069 | 0.035 | 0.368 | 0.124 | 0.024 | 0.483 | 0.456 |
| BP_EP | 0.079 | 0.046 | 0.368 | 0.119 | 0.026 | 0.523 | 0.505 |
| GG_RI_Clbrtd | 0.073 | 0.039 | 0.367 | 0.143 | 0.032 | 0.522 | 0.429 |
| GM_EP_Clbrtd | 0.064 | 0.031 | 0.367 | 0.126 | 0.023 | 0.489 | 0.492 |
| BP_RI | 0.078 | 0.045 | 0.367 | 0.118 | 0.025 | 0.520 | 0.513 |
| CT_HDZ | 0.074 | 0.041 | 0.366 | 0.118 | 0.029 | 0.535 | 0.403 |
| CT_RW_Clbrtd | 0.071 | 0.039 | 0.362 | 0.141 | 0.019 | 0.477 | 0.586 |
| PE_EP | 0.070 | 0.038 | 0.361 | 0.125 | 0.027 | 0.527 | 0.426 |
| FGHJ_HDZ | 0.070 | 0.038 | 0.360 | 0.119 | 0.030 | 0.552 | 0.409 |
| GG_EP_Clbrtd | 0.072 | 0.040 | 0.360 | 0.145 | 0.033 | 0.585 | 0.524 |
| KMY_RI | 0.067 | 0.034 | 0.360 | 0.119 | 0.027 | 0.515 | 0.447 |
| TPDPS_RI | 0.079 | 0.049 | 0.358 | 0.119 | 0.030 | 0.561 | 0.563 |
| MPEG_Anlst _Clbrtd | 0.073 | 0.042 | 0.357 | 0.122 | 0.032 | 0.556 | 0.513 |
| GLS_Anlst | 0.070 | 0.039 | 0.357 | 0.119 | 0.031 | 0.544 | 0.518 |
| KMY_EP | 0.067 | 0.035 | 0.356 | 0.124 | 0.026 | 0.527 | 0.573 |
| DKL_RI | 0.065 | 0.034 | 0.355 | 0.116 | 0.025 | 0.528 | 0.477 |
| GM_Anlst _Clbrtd | 0.070 | 0.040 | 0.354 | 0.122 | 0.032 | 0.560 | 0.523 |
| HL_Anlst | 0.072 | 0.041 | 0.352 | 0.118 | 0.035 | 0.575 | 0.612 |
| HL_RI | 0.064 | 0.033 | 0.352 | 0.116 | 0.025 | 0.531 | 0.508 |
| DKL_Anlst | 0.071 | 0.041 | 0.352 | 0.119 | 0.035 | 0.572 | 0.603 |
| DKL_RW_Clbrtd | 0.062 | 0.032 | 0.351 | 0.137 | 0.025 | 0.522 | 0.579 |
| GLS_HDZ | 0.068 | 0.037 | 0.350 | 0.118 | 0.031 | 0.575 | 0.470 |
| HL_EP_Clbrtd | 0.062 | 0.031 | 0.350 | 0.142 | 0.021 | 0.530 | 0.625 |
| MPEG_Anlst | 0.073 | 0.043 | 0.350 | 0.118 | 0.037 | 0.593 | 0.638 |
| FGHJ_EP_Clbrtd | 0.061 | 0.030 | 0.350 | 0.133 | 0.021 | 0.532 | 0.578 |
| FPM_HDZ | 0.067 | 0.037 | 0.349 | 0.119 | 0.030 | 0.568 | 0.605 |
| BP_RW_Clbrtd | 0.079 | 0.051 | 0.349 | 0.140 | 0.034 | 0.591 | 0.619 |

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Table 110 : ICC Optimal Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | $\mathbf{1 / N}$ |
| :--- | :---: | :---: | :--- | :--- | :--- | :--- | :--- |
| DKL_EP_Clbrtd | 0.062 | 0.031 | 0.349 | 0.142 | 0.022 | 0.536 | 0.633 |
| CT_Anlst_Clbrtd | 0.065 | 0.035 | 0.348 | 0.125 | 0.030 | 0.563 | 0.570 |
| CT_Anlst | 0.073 | 0.043 | 0.348 | 0.120 | 0.035 | 0.593 | 0.629 |
| BP_EP_Clbrtd | 0.073 | 0.044 | 0.347 | 0.139 | 0.030 | 0.568 | 0.634 |
| FGHJ_Anlst | 0.067 | 0.038 | 0.347 | 0.119 | 0.032 | 0.571 | 0.599 |
| FGHJ_RI_Clbrtd | 0.063 | 0.032 | 0.347 | 0.133 | 0.023 | 0.531 | 0.588 |
| BP_HDZ_Clbrtd | 0.077 | 0.050 | 0.347 | 0.139 | 0.032 | 0.589 | 0.618 |
| FGHJ_EP | 0.065 | 0.035 | 0.346 | 0.123 | 0.030 | 0.557 | 0.531 |
| HL_Anlst_Clbrtd | 0.065 | 0.035 | 0.346 | 0.124 | 0.032 | 0.573 | 0.583 |
| DKL_Anlst_Clbrtd | 0.064 | 0.034 | 0.345 | 0.124 | 0.031 | 0.571 | 0.585 |
| PEG_Anlst_Clbrtd | 0.070 | 0.041 | 0.345 | 0.123 | 0.035 | 0.594 | 0.617 |
| GLS_RW_Clbrtd | 0.062 | 0.032 | 0.345 | 0.138 | 0.026 | 0.555 | 0.666 |
| BP_RI_Clbrtd | 0.073 | 0.045 | 0.345 | 0.138 | 0.032 | 0.578 | 0.656 |
| GM_Anlst | 0.060 | 0.033 | 0.329 | 0.124 | 0.032 | 0.615 | 0.709 |
| TPDPS_EP_Clbrtd | 0.077 | 0.075 | 0.041 | 0.344 | 0.118 | 0.038 | 0.603 | 0.677

[^69]Table 110 : ICC Optimal Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PEG_Anlst | 0.069 | 0.044 | 0.329 | 0.117 | 0.042 | 0.657 | 0.775 |
| Naive_Clbrtd | 0.077 | 0.055 | 0.329 | 0.119 | 0.036 | 0.660 | 0.766 |
| Naive | 0.077 | 0.054 | 0.328 | 0.119 | 0.036 | 0.660 | 0.768 |
| FPM_RW_Clbrtd | 0.063 | 0.037 | 0.328 | 0.145 | 0.032 | 0.634 | 0.731 |
| TPDPS_RI_Clbrtd | 0.072 | 0.049 | 0.328 | 0.119 | 0.037 | 0.654 | 0.771 |
| TPDPS_EP | 0.073 | 0.049 | 0.327 | 0.120 | 0.038 | 0.661 | 0.760 |
| FGHJ_Anlst _Clbrtd | 0.059 | 0.033 | 0.326 | 0.124 | 0.032 | 0.624 | 0.737 |
| TrETSS_RW_25SBM | 0.065 | 0.039 | 0.325 | 0.118 | 0.035 | 0.653 | 0.819 |
| TrES_EP_25SBM | 0.064 | 0.039 | 0.324 | 0.118 | 0.034 | 0.638 | 0.801 |
| TPDPS_Anlst | 0.075 | 0.054 | 0.324 | 0.119 | 0.037 | 0.675 | 0.806 |
| PE_Anlst _Clbrtd | 0.060 | 0.035 | 0.322 | 0.121 | 0.032 | 0.664 | 0.778 |
| FPM_RI | 0.057 | 0.032 | 0.320 | 0.122 | 0.030 | 0.642 | 0.811 |
| CT_RI_Clbrtd | 0.059 | 0.034 | 0.320 | 0.121 | 0.034 | 0.658 | 0.795 |
| FPM_Anlst_Clbrtd | 0.057 | 0.032 | 0.320 | 0.146 | 0.030 | 0.635 | 0.800 |
| PEG_HDZ | 0.067 | 0.044 | 0.318 | 0.118 | 0.044 | 0.699 | 0.843 |
| GG_EP | 0.067 | 0.046 | 0.316 | 0.125 | 0.037 | 0.689 | 0.860 |
| BP_RW | 0.069 | 0.048 | 0.316 | 0.123 | 0.042 | 0.701 | 0.863 |
| CT_RI | 0.062 | 0.039 | 0.315 | 0.116 | 0.031 | 0.676 | 0.834 |
| TPDPS_RW_Clbrtd | 0.071 | 0.050 | 0.315 | 0.116 | 0.038 | 0.700 | 0.848 |
| KMY_Anlst | 0.061 | 0.038 | 0.314 | 0.122 | 0.040 | 0.679 | 0.867 |
| Carhart_Factor | 0.060 | 0.036 | 0.314 | 0.117 | 0.029 | 0.676 | 0.902 |
| WNG_RI | 0.171 | 0.297 | 0.313 | 0.315 | 0.011 | 0.710 | 0.932 |
| PE_Anlst | 0.067 | 0.046 | 0.313 | 0.120 | 0.042 | 0.713 | 0.842 |
| FPM_Anlst | 0.059 | 0.036 | 0.312 | 0.118 | 0.038 | 0.679 | 0.888 |
| BP_Anlst _Clbrtd | 0.070 | 0.052 | 0.310 | 0.119 | 0.040 | 0.713 | 0.888 |
| CT_EP_Clbrtd | 0.056 | 0.032 | 0.310 | 0.133 | 0.031 | 0.684 | 0.903 |
| TrES_Anlst_25SBM | 0.062 | 0.040 | 0.310 | 0.119 | 0.027 | 0.669 | 0.880 |
| TrES_HDZ_10Ind | 0.059 | 0.036 | 0.308 | 0.117 | 0.038 | 0.696 | 0.902 |
| GLS_EP | 0.058 | 0.035 | 0.307 | 0.124 | 0.037 | 0.697 | 0.907 |
| FPM_RW | 0.057 | 0.036 | 0.302 | 0.126 | 0.041 | 0.726 | 0.950 |
| TrES_RI_25SBM | 0.059 | 0.038 | 0.301 | 0.120 | 0.041 | 0.727 | 0.961 |
| GLS_RI | 0.056 | 0.034 | 0.301 | 0.120 | 0.039 | 0.720 | 0.965 |

[^70]Table 110 : ICC Optimal Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrOHE_25SBM | 0.061 | 0.041 | 0.298 | 0.122 | 0.044 | 0.759 | 0.997 |
| PEG_EP_Clbrtd | 0.053 | 0.032 | 0.297 | 0.148 | 0.025 | 0.712 | 0.999 |
| 1/N | 0.062 | 0.043 | 0.297 | 0.230 | 0.036 | 0.741 | 1.000 |
| PE_EP_Clbrtd | 0.058 | 0.038 | 0.297 | 0.116 | 0.041 | 0.732 | 0.998 |
| CT_RW | 0.059 | 0.039 | 0.296 | 0.132 | 0.035 | 0.732 | 0.994 |
| KMY_Anlst _Clbrtd | 0.052 | 0.030 | 0.296 | 0.123 | 0.035 | 0.727 | 0.993 |
| PE_RW | 0.065 | 0.048 | 0.295 | 0.117 | 0.039 | 0.769 | 0.988 |
| GG_Anlst | 0.057 | 0.038 | 0.295 | 0.124 | 0.044 | 0.746 | 0.983 |
| MPEG_RW | 0.055 | 0.036 | 0.292 | 0.128 | 0.040 | 0.749 | 0.943 |
| FPM_RI_Clbrtd | 0.051 | 0.032 | 0.284 | 0.144 | 0.036 | 0.766 | 0.900 |
| TrETSS_Anlst_25SBM | 0.054 | 0.037 | 0.279 | 0.124 | 0.041 | 0.805 | 0.874 |
| GM_RW | 0.053 | 0.037 | 0.278 | 0.129 | 0.049 | 0.806 | 0.796 |
| GG_Anlst _Clbrtd | 0.052 | 0.035 | 0.277 | 0.125 | 0.041 | 0.802 | 0.790 |
| TrETSS_RI_25SBM | 0.054 | 0.039 | 0.275 | 0.122 | 0.041 | 0.824 | 0.854 |
| CT_EP | 0.052 | 0.036 | 0.274 | 0.128 | 0.041 | 0.817 | 0.778 |
| 5FF_Factor | 0.050 | 0.034 | 0.272 | 0.122 | 0.041 | 0.824 | 0.824 |
| CAPM_Factor | 0.051 | 0.035 | 0.272 | 0.119 | 0.036 | 0.822 | 0.842 |
| TrES_EP_10Ind | 0.051 | 0.037 | 0.267 | 0.118 | 0.048 | 0.839 | 0.739 |
| TrETSS_EP_10Ind | 0.051 | 0.037 | 0.265 | 0.120 | 0.043 | 0.855 | 0.800 |
| HL_RW | 0.048 | 0.033 | 0.264 | 0.131 | 0.042 | 0.850 | 0.645 |
| KMY_RW | 0.048 | 0.033 | 0.264 | 0.131 | 0.042 | 0.853 | 0.640 |
| TrES_RW_25SBM | 0.053 | 0.042 | 0.258 | 0.108 | 0.053 | 0.889 | 0.465 |
| PEG_EP | 0.048 | 0.035 | 0.255 | 0.144 | 0.050 | 0.886 | 0.555 |
| DKL_RW | 0.046 | 0.035 | 0.249 | 0.137 | 0.045 | 0.906 | 0.543 |
| FGHJ_RW | 0.046 | 0.036 | 0.246 | 0.130 | 0.050 | 0.921 | 0.476 |
| PEG_RI | 0.044 | 0.032 | 0.243 | 0.141 | 0.051 | 0.926 | 0.287 |
| TrETSS_EP_25SBM | 0.047 | 0.041 | 0.233 | 0.121 | 0.057 | 0.971 | 0.535 |
| TrES_RI_10Ind | 0.045 | 0.038 | 0.232 | 0.119 | 0.058 | 0.974 | 0.474 |
| WNG_RW | 1.584 | 47.591 | 0.230 | 0.830 | 0.002 | 0.986 | 0.812 |
| 3FF_Factor | 0.042 | 0.035 | 0.225 | 0.120 | 0.053 | 0.998 | 0.588 |
| Minimum Variance | 0.031 | 0.019 | 0.225 | 0.791 | 0.020 | 1.000 | 0.741 |
| TrES_Anlst _10Ind | 0.042 | 0.036 | 0.220 | 0.117 | 0.067 | 0.984 | 0.372 |

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Table 110 : ICC Optimal Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | $\mathbf{1 / N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| WNG_HDZ | 1.543 | 49.818 | 0.219 | 1.011 | 0.003 | 0.982 | 0.787 |
| TrETSS_HDZ_10Ind | 0.039 | 0.034 | 0.213 | 0.123 | 0.059 | 0.958 | 0.359 |
| TrETSS_Anlst_10Ind | 0.039 | 0.036 | 0.206 | 0.121 | 0.066 | 0.930 | 0.400 |
| TrETSS_RI_10Ind | 0.039 | 0.036 | 0.205 | 0.114 | 0.057 | 0.932 | 0.386 |
| GLS_RW | 0.038 | 0.034 | 0.204 | 0.136 | 0.062 | 0.923 | 0.266 |
| FPM_EP_Clbrtd | 0.034 | 0.030 | 0.196 | 0.138 | 0.062 | 0.887 | 0.196 |
| PE_RI_Clbrtd | 0.036 | 0.037 | 0.187 | 0.112 | 0.059 | 0.855 | 0.249 |
| TrETSS_HDZ_25SBM | 0.037 | 0.045 | 0.175 | 0.120 | 0.083 | 0.832 | 0.319 |
| TrETSS_RW_10Ind | 0.028 | 0.042 | 0.138 | 0.118 | 0.105 | 0.721 | 0.122 |
| GG_RW_Clbrtd | 0.025 | 0.038 | 0.128 | 0.126 | 0.096 | 0.661 | 0.074 |
| MPEG_EP_Clbrtd | 0.021 | 0.039 | 0.105 | 0.124 | 0.097 | 0.609 | 0.122 |
| PE_RW_Clbrtd | 0.021 | 0.051 | 0.092 | 0.112 | 0.134 | 0.620 | 0.013 |
| MPEG_RI_Clbrtd | 0.015 | 0.034 | 0.080 | 0.116 | 0.123 | 0.505 | 0.025 |
| TrES_RW_10Ind | 0.013 | 0.037 | 0.066 | 0.105 | 0.140 | 0.510 | 0.013 |
| PEG_RI_Clbrtd | 0.012 | 0.040 | 0.061 | 0.111 | 0.116 | 0.470 | 0.044 |
| WNG_Anlst | -0.258 | 4.824 | -0.117 | 0.732 | 0.147 | 0.228 | 0.192 |
| Mean-variance | -0.473 | 0.857 | -0.511 | 18.063 | 1.000 | 0.020 | 0.036 |

This table report the out-of-sample results of the tangency portfolio with constrained turnover using ICC exante expected return estimates, as well as other benchmark strategies. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the MeanV column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the mean-variance portfolio is zero, the $1 / \mathrm{N}$ column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the MinVar column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the minimum variance portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) non-parametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 111 : ICC Timing Portfolios with Constrained Turnover

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| WNG_EP | 0.079 | 0.028 | 0.473 | 0.123 | 0.049 | 0.305 | 0.163 |
| GM_EP | 0.084 | 0.033 | 0.465 | 0.117 | 0.010 | 0.195 | 0.127 |
| MPEG_EP | 0.081 | 0.033 | 0.450 | 0.115 | 0.016 | 0.242 | 0.159 |
| PE_HDZ | 0.080 | 0.032 | 0.448 | 0.114 | 0.017 | 0.130 | 0.103 |
| PE_RW | 0.088 | 0.039 | 0.448 | 0.199 | 0.035 | 0.285 | 0.101 |
| WNG_RI | 0.088 | 0.039 | 0.446 | 0.140 | 0.101 | 0.433 | 0.244 |
| GM_HDZ_Clbrtd | 0.083 | 0.035 | 0.442 | 0.123 | 0.014 | 0.215 | 0.120 |
| PEG_RW_Clbrtd | 0.082 | 0.034 | 0.441 | 0.160 | 0.006 | 0.122 | 0.049 |
| HL_HDZ_Clbrtd | 0.081 | 0.035 | 0.435 | 0.137 | 0.012 | 0.207 | 0.109 |
| TrES_RW_10Ind | 0.067 | 0.024 | 0.433 | 0.159 | 0.021 | 0.255 | 0.187 |
| KMY_HDZ_Clbrtd | 0.081 | 0.035 | 0.432 | 0.137 | 0.014 | 0.226 | 0.121 |
| DKL_HDZ_Clbrtd | 0.080 | 0.034 | 0.432 | 0.137 | 0.013 | 0.221 | 0.117 |
| GM_RI | 0.076 | 0.032 | 0.430 | 0.115 | 0.015 | 0.269 | 0.178 |
| MPEG_RI | 0.075 | 0.032 | 0.425 | 0.116 | 0.016 | 0.289 | 0.186 |
| MPEG_HDZ_Clbrtd | 0.080 | 0.036 | 0.421 | 0.122 | 0.027 | 0.314 | 0.172 |
| PEG_HDZ_Clbrtd | 0.083 | 0.039 | 0.421 | 0.142 | 0.026 | 0.311 | 0.158 |
| KMY_EP_Clbrtd | 0.077 | 0.034 | 0.413 | 0.139 | 0.019 | 0.347 | 0.184 |
| KMY_RI_Clbrtd | 0.075 | 0.033 | 0.411 | 0.137 | 0.027 | 0.375 | 0.208 |
| TrES_EP_10Ind | 0.073 | 0.032 | 0.411 | 0.112 | 0.100 | 0.487 | 0.330 |
| GG_EP | 0.082 | 0.041 | 0.409 | 0.132 | 0.043 | 0.460 | 0.282 |
| CT_HDZ_Clbrtd | 0.073 | 0.032 | 0.409 | 0.116 | 0.028 | 0.354 | 0.215 |
| MPEG_RW_Clbrtd | 0.075 | 0.034 | 0.403 | 0.134 | 0.034 | 0.369 | 0.197 |
| KMY_RI | 0.071 | 0.031 | 0.403 | 0.116 | 0.026 | 0.377 | 0.224 |
| FPM_HDZ_Clbrtd | 0.074 | 0.034 | 0.402 | 0.139 | 0.022 | 0.402 | 0.214 |
| HL_RI | 0.070 | 0.030 | 0.401 | 0.113 | 0.029 | 0.401 | 0.246 |
| FGHJ_EP_Clbrtd | 0.070 | 0.030 | 0.400 | 0.126 | 0.035 | 0.448 | 0.254 |
| FPM_EP | 0.069 | 0.029 | 0.400 | 0.119 | 0.032 | 0.488 | 0.293 |
| HL_EP | 0.068 | 0.030 | 0.398 | 0.117 | 0.029 | 0.421 | 0.263 |
| FGHJ_RI | 0.069 | 0.030 | 0.396 | 0.117 | 0.031 | 0.392 | 0.216 |
| FGHJ_HDZ_Clbrtd | 0.072 | 0.033 | 0.394 | 0.134 | 0.035 | 0.457 | 0.237 |
| DKL_EP | 0.068 | 0.030 | 0.393 | 0.117 | 0.032 | 0.451 | 0.277 |

Continued in next page...

Table 111 : ICC Timing Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_HDZ_Clbrtd | 0.071 | 0.033 | 0.391 | 0.135 | 0.041 | 0.478 | 0.250 |
| PE_HDZ_Clbrtd | 0.065 | 0.028 | 0.391 | 0.115 | 0.065 | 0.515 | 0.330 |
| GLS_RI_Clbrtd | 0.071 | 0.033 | 0.391 | 0.138 | 0.062 | 0.534 | 0.305 |
| HL_RI_Clbrtd | 0.070 | 0.032 | 0.390 | 0.134 | 0.045 | 0.534 | 0.307 |
| TrES_RW_25SBM | 0.069 | 0.031 | 0.390 | 0.150 | 0.032 | 0.314 | 0.111 |
| DKL_RI | 0.068 | 0.031 | 0.389 | 0.113 | 0.048 | 0.515 | 0.313 |
| HL_EP_Clbrtd | 0.070 | 0.032 | 0.389 | 0.134 | 0.041 | 0.533 | 0.308 |
| KMY_EP | 0.068 | 0.031 | 0.388 | 0.118 | 0.042 | 0.519 | 0.318 |
| GG_HDZ_Clbrtd | 0.071 | 0.033 | 0.387 | 0.117 | 0.059 | 0.530 | 0.315 |
| DKL_EP_Clbrtd | 0.070 | 0.033 | 0.386 | 0.135 | 0.044 | 0.552 | 0.318 |
| PE_RI | 0.070 | 0.033 | 0.386 | 0.114 | 0.079 | 0.523 | 0.297 |
| DKL_RI_Clbrtd | 0.070 | 0.033 | 0.385 | 0.134 | 0.058 | 0.583 | 0.340 |
| TrES_EP_25SBM | 0.070 | 0.034 | 0.382 | 0.115 | 0.119 | 0.686 | 0.460 |
| PEG_RW | 0.071 | 0.035 | 0.382 | 0.161 | 0.065 | 0.555 | 0.276 |
| GM_HDZ | 0.072 | 0.036 | 0.380 | 0.115 | 0.100 | 0.674 | 0.439 |
| CT_RI_Clbrtd | 0.067 | 0.032 | 0.379 | 0.130 | 0.047 | 0.602 | 0.345 |
| TrES_RI_10Ind | 0.068 | 0.032 | 0.378 | 0.119 | 0.148 | 0.721 | 0.498 |
| FGHJ_EP | 0.065 | 0.030 | 0.378 | 0.117 | 0.041 | 0.554 | 0.296 |
| CT_EP_Clbrtd | 0.067 | 0.032 | 0.376 | 0.125 | 0.062 | 0.643 | 0.393 |
| GLS_RW_Clbrtd | 0.067 | 0.032 | 0.376 | 0.128 | 0.054 | 0.652 | 0.385 |
| GLS_EP_Clbrtd | 0.067 | 0.032 | 0.376 | 0.127 | 0.049 | 0.614 | 0.330 |
| CT_HDZ | 0.069 | 0.034 | 0.376 | 0.114 | 0.067 | 0.599 | 0.352 |
| GLS_RI | 0.065 | 0.030 | 0.376 | 0.117 | 0.060 | 0.585 | 0.305 |
| MPEG_Anlst _Clbrtd | 0.071 | 0.035 | 0.376 | 0.117 | 0.060 | 0.641 | 0.358 |
| GM_RW_Clbrtd | 0.071 | 0.036 | 0.375 | 0.128 | 0.072 | 0.630 | 0.318 |
| FPM_Anlst _Clbrtd | 0.069 | 0.034 | 0.375 | 0.139 | 0.047 | 0.642 | 0.351 |
| CT_EP | 0.066 | 0.031 | 0.374 | 0.120 | 0.044 | 0.624 | 0.366 |
| TrES_HDZ_25SBM | 0.071 | 0.036 | 0.374 | 0.118 | 0.133 | 0.743 | 0.467 |
| BP_EP | 0.070 | 0.035 | 0.372 | 0.114 | 0.118 | 0.706 | 0.450 |
| GLS_HDZ | 0.066 | 0.032 | 0.371 | 0.115 | 0.067 | 0.648 | 0.370 |
| DKL_RW_Clbrtd | 0.066 | 0.032 | 0.370 | 0.128 | 0.056 | 0.698 | 0.410 |
| DKL_HDZ | 0.068 | 0.034 | 0.370 | 0.115 | 0.075 | 0.671 | 0.395 |

Continued in next page...

Table 111 : ICC Timing Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MPEG_Anlst | 0.069 | 0.035 | 0.370 | 0.116 | 0.107 | 0.742 | 0.465 |
| FGHJ_HDZ | 0.067 | 0.032 | 0.370 | 0.115 | 0.066 | 0.660 | 0.378 |
| GG_HDZ | 0.067 | 0.033 | 0.370 | 0.113 | 0.092 | 0.673 | 0.402 |
| GG_EP_Clbrtd | 0.072 | 0.038 | 0.370 | 0.147 | 0.071 | 0.632 | 0.230 |
| TrOHE_25SBM | 0.069 | 0.035 | 0.369 | 0.120 | 0.244 | 0.825 | 0.576 |
| GLS_Anlst | 0.067 | 0.033 | 0.369 | 0.116 | 0.085 | 0.718 | 0.434 |
| TrETSS_RW_25SBM | 0.068 | 0.034 | 0.369 | 0.117 | 0.162 | 0.795 | 0.533 |
| CT_RW_Clbrtd | 0.069 | 0.035 | 0.369 | 0.143 | 0.102 | 0.729 | 0.428 |
| PE_Anlst _Clbrtd | 0.064 | 0.030 | 0.368 | 0.117 | 0.082 | 0.729 | 0.472 |
| TPDPS_RI | 0.071 | 0.037 | 0.368 | 0.115 | 0.115 | 0.733 | 0.459 |
| GM_Anlst _Clbrtd | 0.068 | 0.034 | 0.368 | 0.116 | 0.066 | 0.709 | 0.402 |
| FPM_EP_Clbrtd | 0.067 | 0.033 | 0.368 | 0.140 | 0.076 | 0.749 | 0.448 |
| FGHJ_Anlst | 0.067 | 0.033 | 0.368 | 0.115 | 0.081 | 0.733 | 0.442 |
| MPEG_HDZ | 0.070 | 0.036 | 0.367 | 0.114 | 0.112 | 0.762 | 0.484 |
| FGHJ_RW_Clbrtd | 0.069 | 0.035 | 0.367 | 0.140 | 0.097 | 0.746 | 0.434 |
| HL_RW_Clbrtd | 0.065 | 0.031 | 0.366 | 0.127 | 0.063 | 0.740 | 0.437 |
| HL_HDZ | 0.068 | 0.034 | 0.365 | 0.115 | 0.091 | 0.741 | 0.446 |
| HL_Anlst | 0.068 | 0.034 | 0.365 | 0.116 | 0.105 | 0.774 | 0.480 |
| KMY_RW_Clbrtd | 0.065 | 0.032 | 0.365 | 0.127 | 0.067 | 0.756 | 0.447 |
| FGHJ_RI_Clbrtd | 0.066 | 0.032 | 0.365 | 0.125 | 0.090 | 0.758 | 0.436 |
| GLS_EP | 0.063 | 0.030 | 0.364 | 0.117 | 0.063 | 0.698 | 0.367 |
| GG_RW | 0.065 | 0.032 | 0.363 | 0.116 | 0.078 | 0.733 | 0.418 |
| FPM_RI | 0.063 | 0.030 | 0.363 | 0.117 | 0.088 | 0.794 | 0.490 |
| DKL_Anlst | 0.067 | 0.034 | 0.363 | 0.116 | 0.106 | 0.794 | 0.491 |
| KMY_HDZ | 0.067 | 0.034 | 0.362 | 0.115 | 0.100 | 0.765 | 0.458 |
| DKL_Anlst _Clbrtd | 0.066 | 0.033 | 0.362 | 0.117 | 0.071 | 0.770 | 0.444 |
| HL_Anlst _Clbrtd | 0.066 | 0.034 | 0.362 | 0.117 | 0.072 | 0.772 | 0.444 |
| FPM_HDZ | 0.066 | 0.034 | 0.361 | 0.116 | 0.109 | 0.813 | 0.519 |
| CT_Anlst_Clbrtd | 0.066 | 0.033 | 0.361 | 0.117 | 0.073 | 0.779 | 0.458 |
| GM_Anlst | 0.067 | 0.034 | 0.361 | 0.116 | 0.117 | 0.818 | 0.512 |
| PE_EP | 0.066 | 0.033 | 0.360 | 0.119 | 0.128 | 0.806 | 0.492 |
| GLS_Anlst _Clbrtd | 0.065 | 0.033 | 0.359 | 0.117 | 0.076 | 0.799 | 0.462 |

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Table 111 : ICC Timing Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_Anlst_Clbrtd | 0.064 | 0.032 | 0.359 | 0.116 | 0.076 | 0.807 | 0.480 |
| FGHJ_Anlst _Clbrtd | 0.065 | 0.033 | 0.358 | 0.117 | 0.076 | 0.812 | 0.472 |
| BP_EP_Clbrtd | 0.066 | 0.034 | 0.358 | 0.135 | 0.149 | 0.846 | 0.542 |
| GG_RI_Clbrtd | 0.069 | 0.037 | 0.357 | 0.135 | 0.180 | 0.847 | 0.489 |
| TrETSS_EP_10Ind | 0.063 | 0.031 | 0.356 | 0.118 | 0.169 | 0.884 | 0.605 |
| FPM_Anlst | 0.064 | 0.032 | 0.356 | 0.115 | 0.113 | 0.855 | 0.540 |
| CT_RI | 0.065 | 0.034 | 0.356 | 0.111 | 0.134 | 0.867 | 0.565 |
| BP_RI | 0.068 | 0.036 | 0.356 | 0.113 | 0.177 | 0.865 | 0.571 |
| WNG_Anlst | 0.107 | 0.091 | 0.355 | 0.153 | 0.457 | 0.901 | 0.706 |
| TrES_HDZ_10Ind | 0.058 | 0.027 | 0.354 | 0.117 | 0.162 | 0.892 | 0.608 |
| CT_Anlst | 0.066 | 0.034 | 0.354 | 0.116 | 0.135 | 0.885 | 0.561 |
| GM_EP_Clbrtd | 0.062 | 0.032 | 0.351 | 0.122 | 0.131 | 0.904 | 0.554 |
| TPDPS_HDZ | 0.068 | 0.038 | 0.350 | 0.116 | 0.171 | 0.922 | 0.579 |
| GM_RW | 0.064 | 0.033 | 0.348 | 0.120 | 0.099 | 0.917 | 0.491 |
| TPDPS_EP | 0.067 | 0.037 | 0.348 | 0.116 | 0.166 | 0.939 | 0.590 |
| PEG_Anlst _Clbrtd | 0.066 | 0.036 | 0.347 | 0.119 | 0.128 | 0.939 | 0.553 |
| TPDPS_EP_Clbrtd | 0.066 | 0.036 | 0.347 | 0.116 | 0.168 | 0.947 | 0.608 |
| MPEG_RW | 0.063 | 0.033 | 0.346 | 0.119 | 0.110 | 0.942 | 0.506 |
| TPDPS_HDZ_Clbrtd | 0.067 | 0.038 | 0.346 | 0.116 | 0.182 | 0.961 | 0.606 |
| PEG_Anlst | 0.064 | 0.035 | 0.345 | 0.117 | 0.190 | 0.971 | 0.637 |
| TrOHE_10Ind | 0.066 | 0.036 | 0.345 | 0.119 | 0.266 | 0.981 | 0.701 |
| HL_RW | 0.060 | 0.031 | 0.344 | 0.121 | 0.103 | 0.976 | 0.552 |
| KMY_RW | 0.060 | 0.031 | 0.342 | 0.121 | 0.109 | 0.997 | 0.566 |
| VT | 0.060 | 0.030 | 0.342 | 0.227 | 0.022 | 1.000 | 0.291 |
| TrES_RI_25SBM | 0.061 | 0.032 | 0.341 | 0.117 | 0.162 | 0.992 | 0.636 |
| BP_HDZ_Clbrtd | 0.065 | 0.036 | 0.341 | 0.135 | 0.195 | 0.992 | 0.646 |
| DKL_RW | 0.060 | 0.031 | 0.340 | 0.123 | 0.115 | 0.981 | 0.582 |
| KMY_Anlst | 0.062 | 0.034 | 0.340 | 0.116 | 0.150 | 0.980 | 0.637 |
| PEG_EP_Clbrtd | 0.058 | 0.030 | 0.339 | 0.156 | 0.090 | 0.956 | 0.469 |
| TPDPS_RI_Clbrtd | 0.064 | 0.036 | 0.338 | 0.116 | 0.200 | 0.964 | 0.676 |
| TrETSS_RI_25SBM | 0.061 | 0.033 | 0.338 | 0.120 | 0.279 | 0.970 | 0.720 |
| BP_RI_Clbrtd | 0.063 | 0.035 | 0.337 | 0.134 | 0.240 | 0.957 | 0.696 |

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Table 111 : ICC Timing Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TrES_Anlst_25SBM | 0.063 | 0.035 | 0.337 | 0.115 | 0.208 | 0.948 | 0.683 |
| TPDPS_Anlst_Clbrtd | 0.066 | 0.039 | 0.336 | 0.117 | 0.217 | 0.946 | 0.674 |
| TPDPS_Anlst | 0.066 | 0.039 | 0.334 | 0.116 | 0.227 | 0.922 | 0.693 |
| GG_Anlst _Clbrtd | 0.061 | 0.033 | 0.334 | 0.117 | 0.137 | 0.906 | 0.661 |
| GG_Anlst | 0.061 | 0.034 | 0.333 | 0.117 | 0.162 | 0.910 | 0.678 |
| BP_HDZ | 0.065 | 0.038 | 0.333 | 0.114 | 0.228 | 0.912 | 0.720 |
| PE_Anlst | 0.061 | 0.034 | 0.331 | 0.116 | 0.217 | 0.880 | 0.702 |
| FPM_RI_Clbrtd | 0.060 | 0.033 | 0.331 | 0.139 | 0.190 | 0.891 | 0.709 |
| Carhart_Factor | 0.057 | 0.030 | 0.330 | 0.116 | 0.380 | 0.930 | 0.836 |
| Naive | 0.066 | 0.040 | 0.330 | 0.117 | 0.254 | 0.881 | 0.730 |
| CAPM_Factor | 0.054 | 0.027 | 0.329 | 0.136 | 0.328 | 0.917 | 0.823 |
| BP_Anlst | 0.064 | 0.038 | 0.329 | 0.115 | 0.261 | 0.879 | 0.760 |
| Naive_Clbrtd | 0.065 | 0.040 | 0.329 | 0.117 | 0.257 | 0.873 | 0.736 |
| BP_RW_Clbrtd | 0.067 | 0.041 | 0.327 | 0.139 | 0.262 | 0.862 | 0.748 |
| CT_RW | 0.058 | 0.032 | 0.326 | 0.121 | 0.174 | 0.821 | 0.738 |
| GG_RI | 0.063 | 0.037 | 0.326 | 0.123 | 0.334 | 0.855 | 0.760 |
| TPDPS_RW_Clbrtd | 0.067 | 0.043 | 0.324 | 0.112 | 0.340 | 0.853 | 0.797 |
| TPDPS_RW | 0.067 | 0.044 | 0.323 | 0.115 | 0.360 | 0.854 | 0.803 |
| BP_Anlst _Clbrtd | 0.062 | 0.037 | 0.322 | 0.116 | 0.260 | 0.795 | 0.788 |
| PEG_HDZ | 0.062 | 0.037 | 0.321 | 0.115 | 0.276 | 0.810 | 0.812 |
| TrETSS_Anlst_25SBM | 0.056 | 0.031 | 0.318 | 0.122 | 0.300 | 0.806 | 0.854 |
| GG_RW_Clbrtd | 0.056 | 0.033 | 0.312 | 0.184 | 0.185 | 0.491 | 0.794 |
| FGHJ_RW | 0.054 | 0.032 | 0.304 | 0.123 | 0.283 | 0.564 | 0.935 |
| TrETSS_Anlst _10Ind | 0.051 | 0.029 | 0.304 | 0.116 | 0.376 | 0.683 | 0.948 |
| 1/N | 0.062 | 0.043 | 0.297 | 0.230 | 0.225 | 0.291 | 1.000 |
| PE_EP_Clbrtd | 0.055 | 0.035 | 0.295 | 0.114 | 0.445 | 0.583 | 0.984 |
| PEG_RI_Clbrtd | 0.051 | 0.030 | 0.295 | 0.145 | 0.282 | 0.440 | 0.969 |
| PEG_EP | 0.051 | 0.030 | 0.295 | 0.137 | 0.355 | 0.443 | 0.970 |
| BP_RW | 0.058 | 0.041 | 0.289 | 0.121 | 0.492 | 0.585 | 0.939 |
| MPEG_EP_Clbrtd | 0.048 | 0.031 | 0.272 | 0.132 | 0.510 | 0.250 | 0.712 |
| TrETSS_EP_25SBM | 0.051 | 0.035 | 0.271 | 0.117 | 0.573 | 0.397 | 0.785 |
| 5FF_Factor | 0.045 | 0.028 | 0.269 | 0.120 | 0.669 | 0.575 | 0.852 |

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Table 111 : ICC Timing Portfolios with Constrained Turnover, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | $\mathbf{1 / N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| GM_RI_Clbrtd | 0.046 | 0.032 | 0.261 | 0.125 | 0.609 | 0.244 | 0.626 |
| GLS_RW | 0.044 | 0.030 | 0.253 | 0.127 | 0.651 | 0.187 | 0.572 |
| FPM_RW_Clbrtd | 0.042 | 0.030 | 0.241 | 0.165 | 0.698 | 0.049 | 0.431 |
| MPEG_RI_Clbrtd | 0.044 | 0.034 | 0.240 | 0.122 | 0.844 | 0.362 | 0.638 |
| PE_RW_Clbrtd | 0.048 | 0.042 | 0.232 | 0.220 | 0.849 | 0.069 | 0.155 |
| TrETSS_HDZ_25SBM | 0.044 | 0.036 | 0.232 | 0.118 | 0.895 | 0.314 | 0.575 |
| TrES_Anlst_10Ind | 0.038 | 0.028 | 0.228 | 0.116 | 0.895 | 0.168 | 0.485 |
| TrETSS_HDZ_10Ind | 0.041 | 0.033 | 0.224 | 0.124 | 0.949 | 0.353 | 0.586 |
| TrETSS_RI_10Ind | 0.040 | 0.034 | 0.219 | 0.123 | 0.978 | 0.216 | 0.435 |
| RRT | 0.036 | 0.028 | 0.216 | 0.265 | 1.000 | 0.022 | 0.225 |
| PEG_RI | 0.037 | 0.030 | 0.215 | 0.138 | 0.994 | 0.068 | 0.188 |
| PE_RI_Clbrtd | 0.035 | 0.033 | 0.196 | 0.110 | 0.852 | 0.100 | 0.323 |
| FPM_RW | 0.033 | 0.029 | 0.193 | 0.127 | 0.726 | 0.006 | 0.089 |
| 3FF_Factor | 0.031 | 0.032 | 0.173 | 0.117 | 0.750 | 0.244 | 0.443 |
| TrETSS_RW_10Ind | 0.027 | 0.034 | 0.145 | 0.123 | 0.596 | 0.100 | 0.238 |
| WNG_RW | 0.025 | 0.040 | 0.124 | 0.132 | 0.486 | 0.070 | 0.110 |
| WNG_HDZ | -0.001 | 0.049 | -0.004 | 0.115 | 0.189 | 0.040 | 0.074 |

This table report the out-of-sample results of the market timing portfolio with constrained turnover using ICC ex-ante expected return estimates, as well as other benchmark strategies. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the RRT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the conventional Reward-to-Risk Timing (RRT) portfolio is zero, the $1 / \mathrm{N}$ column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the VT column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the Volatility Timing (VT) portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) nonparametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 112 : ICC Timing Portfolios - An Alternative Tuning Parameter $\eta=2$

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.151 | 0.041 | 0.750 | 0.511 | 0.000 | 0.004 | 0.000 |
| PE_RW | 0.087 | 0.018 | 0.651 | 0.272 | 0.022 | 0.338 | 0.051 |
| GM_HDZ_Clbrtd | 0.103 | 0.031 | 0.587 | 0.546 | 0.000 | 0.086 | 0.001 |
| DKL_RI | 0.104 | 0.036 | 0.554 | 0.578 | 0.001 | 0.128 | 0.009 |
| PE_HDZ_Clbrtd | 0.092 | 0.028 | 0.548 | 0.493 | 0.003 | 0.257 | 0.019 |
| HL_HDZ_Clbrtd | 0.099 | 0.033 | 0.542 | 0.545 | 0.001 | 0.114 | 0.003 |
| CT_HDZ_Clbrtd | 0.094 | 0.030 | 0.541 | 0.515 | 0.000 | 0.022 | 0.002 |
| CT_RI | 0.105 | 0.038 | 0.540 | 0.585 | 0.001 | 0.248 | 0.018 |
| DKL_HDZ_Clbrtd | 0.097 | 0.032 | 0.538 | 0.537 | 0.001 | 0.114 | 0.003 |
| TrES_EP_10Ind | 0.106 | 0.039 | 0.535 | 0.833 | 0.005 | 0.461 | 0.015 |
| HL_RI | 0.100 | $0.035$ | 0.533 | 0.570 | 0.002 | 0.167 | 0.012 |
| KMY_RI | 0.101 | 0.036 | 0.533 | 0.595 | 0.002 | 0.204 | 0.014 |
| PE_HDZ | 0.101 | 0.037 | 0.528 | 0.551 | 0.001 | 0.237 | 0.004 |
| KMY_HDZ_Clbrtd | 0.097 | 0.034 | 0.527 | 0.555 | 0.002 | 0.210 | 0.004 |
| GLS_HDZ_Clbrtd | 0.094 | 0.033 | 0.520 | 0.523 | 0.001 | 0.117 | 0.002 |
| GLS_RI | $0.099$ | 0.036 | 0.520 | 0.607 | 0.004 | 0.258 | 0.009 |
| PEG_HDZ_Clbrtd | 0.105 | 0.041 | 0.518 | 0.611 | 0.008 | 0.434 | 0.011 |
| GG_HDZ_Clbrtd | 0.091 | 0.033 | 0.504 | 0.535 | 0.002 | 0.279 | 0.007 |
| FGHJ_RI | 0.092 | 0.034 | 0.504 | 0.583 | 0.002 | 0.199 | 0.005 |
| FGHJ_EP_Clbrtd | 0.089 | 0.032 | 0.501 | 0.501 | 0.001 | 0.128 | 0.004 |
| FGHJ_HDZ_Clbrtd | 0.089 | 0.032 | 0.500 | 0.511 | 0.001 | 0.160 | 0.002 |
| KMY_RW | 0.093 | 0.035 | 0.497 | 0.680 | 0.000 | 0.152 | 0.001 |
| BP_EP | 0.094 | 0.036 | 0.495 | 0.563 | 0.007 | 0.541 | 0.041 |
| GG_RW | 0.090 | 0.033 | 0.493 | 0.540 | 0.001 | 0.258 | 0.004 |
| DKL_RW | 0.094 | 0.037 | 0.491 | 0.719 | 0.001 | 0.220 | 0.002 |
| GLS_HDZ | 0.090 | 0.034 | 0.489 | 0.525 | 0.001 | 0.188 | 0.004 |
| BP_RI | 0.093 | 0.036 | 0.488 | 0.571 | 0.009 | 0.586 | 0.049 |
| FPM_RI | 0.088 | 0.032 | 0.488 | 0.659 | 0.002 | 0.389 | 0.019 |
| DKL_EP | 0.092 | 0.036 | 0.487 | 0.543 | 0.001 | 0.318 | 0.010 |
| MPEG_HDZ_Clbrtd | 0.089 | 0.033 | 0.487 | 0.556 | 0.002 | 0.416 | 0.008 |
| HL_RW | 0.091 | 0.036 | 0.485 | 0.705 | 0.001 | 0.239 | 0.002 |

Continued in next page...

Table 112: ICC Timing Portfolios - An Alternative Tuning Parameter $\eta=2$, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| GLS_EP_Clbrtd | 0.087 | 0.033 | 0.484 | 0.504 | 0.001 | 0.192 | 0.003 |
| HL_EP | 0.089 | 0.035 | 0.480 | 0.540 | 0.001 | 0.350 | 0.011 |
| GLS_EP | 0.087 | 0.033 | 0.479 | 0.545 | 0.001 | 0.180 | 0.005 |
| GG_EP_Clbrtd | 0.088 | 0.035 | 0.473 | 0.629 | 0.010 | 0.702 | 0.066 |
| MPEG_Anlst _Clbrtd | 0.084 | 0.032 | 0.467 | 0.533 | 0.002 | 0.324 | 0.005 |
| FGHJ_EP | 0.083 | 0.032 | 0.465 | 0.544 | 0.001 | 0.239 | 0.005 |
| FGHJ_HDZ | 0.086 | 0.034 | 0.465 | 0.525 | 0.001 | 0.361 | 0.006 |
| PE_Anlst _Clbrtd | 0.083 | 0.032 | 0.465 | 0.569 | 0.004 | 0.488 | 0.023 |
| PE_EP | 0.092 | 0.039 | 0.463 | 0.486 | 0.024 | 0.739 | 0.062 |
| GM_Anlst _Clbrtd | 0.081 | 0.031 | 0.456 | 0.510 | 0.001 | 0.280 | 0.005 |
| GLS_Anlst_Clbrtd | 0.080 | 0.031 | 0.455 | 0.513 | 0.001 | 0.233 | 0.005 |
| TPDPS_RI_Clbrtd | 0.097 | 0.045 | 0.454 | 0.611 | 0.017 | 0.782 | 0.069 |
| KMY_EP | 0.083 | 0.034 | 0.453 | 0.571 | 0.005 | 0.633 | 0.030 |
| GG_HDZ | 0.084 | 0.034 | 0.453 | 0.509 | 0.005 | 0.614 | 0.014 |
| TPDPS_RI | 0.096 | 0.045 | 0.450 | 0.609 | 0.018 | 0.806 | 0.076 |
| TPDPS_EP | 0.095 | 0.045 | 0.450 | 0.606 | 0.018 | 0.808 | 0.076 |
| TrES_RI_25SBM | 0.088 | 0.038 | 0.449 | 1.246 | 0.047 | 0.848 | 0.114 |
| FGHJ_Anlst_Clbrtd | 0.079 | 0.031 | 0.449 | 0.503 | 0.001 | 0.205 | 0.005 |
| GLS_Anlst | 0.081 | 0.033 | 0.449 | 0.527 | 0.003 | 0.476 | 0.007 |
| HL_Anlst_Clbrtd | 0.080 | 0.032 | 0.448 | 0.512 | 0.001 | 0.389 | 0.005 |
| DKL_Anlst _Clbrtd | 0.079 | 0.031 | 0.446 | 0.510 | 0.001 | 0.394 | 0.006 |
| TPDPS_EP_Clbrtd | 0.095 | 0.045 | 0.446 | 0.608 | 0.019 | 0.830 | 0.078 |
| CT_RW | 0.088 | 0.039 | 0.444 | 0.602 | 0.004 | 0.708 | 0.015 |
| KMY_HDZ | 0.081 | 0.034 | 0.441 | 0.508 | 0.005 | 0.719 | 0.020 |
| KMY_Anlst_Clbrtd | 0.077 | 0.030 | 0.441 | 0.485 | 0.001 | 0.187 | 0.009 |
| BP_Anlst | 0.089 | 0.041 | 0.439 | 0.637 | 0.013 | 0.854 | 0.067 |
| DKL_HDZ | 0.080 | 0.033 | 0.438 | 0.513 | 0.004 | 0.744 | 0.021 |
| DKL_RW_Clbrtd | 0.077 | 0.031 | 0.438 | 0.538 | 0.001 | 0.425 | 0.005 |
| BP_EP_Clbrtd | 0.085 | 0.038 | 0.438 | 0.605 | 0.031 | 0.870 | 0.099 |
| KMY_RW_Clbrtd | 0.076 | 0.030 | 0.435 | 0.529 | 0.001 | 0.452 | 0.006 |
| CT_Anlst_Clbrtd | 0.077 | 0.031 | 0.435 | 0.524 | 0.002 | 0.638 | 0.011 |
| BP_HDZ | 0.087 | 0.040 | 0.434 | 0.624 | 0.014 | 0.880 | 0.070 |

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Table 112: ICC Timing Portfolios - An Alternative Tuning Parameter $\eta=2$, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_HDZ | 0.081 | 0.035 | 0.433 | 0.526 | 0.007 | 0.818 | 0.027 |
| HL_RW_Clbrtd | 0.075 | 0.030 | 0.433 | 0.539 | 0.001 | 0.505 | 0.007 |
| BP_Anlst _Clbrtd | 0.090 | 0.044 | 0.431 | 0.663 | 0.030 | 0.914 | 0.090 |
| HL_HDZ | 0.078 | 0.033 | 0.431 | 0.510 | 0.005 | 0.834 | 0.026 |
| BP_RW | 0.092 | 0.046 | 0.430 | 0.657 | 0.024 | 0.921 | 0.121 |
| r_HighLow_Clbrtd | 0.095 | 0.050 | 0.425 | 0.646 | 0.033 | 0.953 | 0.131 |
| FGHJ_Anlst | 0.076 | 0.032 | 0.425 | 0.518 | 0.004 | 0.836 | 0.013 |
| MPEG_RW | 0.077 | 0.033 | 0.424 | 0.554 | 0.004 | 0.871 | 0.013 |
| BP_HDZ_Clbrtd | 0.088 | 0.043 | 0.422 | 0.645 | 0.038 | 0.968 | 0.109 |
| GLS_RI_Clbrtd | 0.073 | 0.031 | 0.417 | 0.574 | 0.005 | 0.991 | 0.028 |
| VT | 0.071 | 0.029 | 0.416 | 0.470 | 0.001 | 1.000 | 0.016 |
| PEG_RW_Clbrtd | 0.075 | 0.033 | 0.416 | 0.566 | 0.009 | 0.999 | 0.024 |
| GM_RW | 0.076 | 0.033 | 0.414 | 0.563 | 0.005 | 0.973 | 0.020 |
| CT_EP | 0.083 | 0.041 | 0.413 | 0.574 | 0.008 | 0.976 | 0.067 |
| PEG_HDZ | 0.073 | 0.031 | 0.413 | 0.504 | 0.006 | 0.970 | 0.033 |
| GG_RI | 0.084 | 0.041 | 0.411 | 0.580 | 0.062 | 0.979 | 0.185 |
| PEG_RW | 0.076 | 0.034 | 0.411 | 0.543 | 0.008 | 0.940 | 0.011 |
| HL_EP_Clbrtd | 0.073 | 0.032 | 0.409 | 0.525 | 0.006 | 0.901 | 0.023 |
| CT_RI_Clbrtd | 0.071 | 0.031 | 0.408 | 0.578 | 0.011 | 0.943 | 0.085 |
| PEG_Anlst _Clbrtd | 0.076 | 0.034 | 0.408 | 0.562 | 0.011 | 0.913 | 0.018 |
| GG_Anlst _Clbrtd | 0.072 | 0.031 | 0.406 | 0.486 | 0.003 | 0.748 | 0.010 |
| MPEG_RI | 0.070 | 0.030 | 0.405 | 0.526 | 0.006 | 0.875 | 0.046 |
| DKL_EP_Clbrtd | 0.073 | 0.033 | 0.404 | 0.529 | 0.007 | 0.824 | 0.023 |
| CAPM_Factor | 0.069 | 0.029 | 0.403 | 0.548 | 0.089 | 0.945 | 0.273 |
| GLS_RW_Clbrtd | 0.070 | 0.030 | 0.401 | 0.559 | 0.002 | 0.763 | 0.013 |
| MPEG_HDZ | 0.070 | 0.031 | 0.401 | 0.506 | 0.009 | 0.843 | 0.052 |
| FPM_Anlst_Clbrtd | 0.072 | 0.032 | 0.401 | 0.498 | 0.006 | 0.773 | 0.016 |
| TPDPS_Anlst_Clbrtd | 0.085 | 0.047 | 0.394 | 0.644 | 0.041 | 0.867 | 0.146 |
| GG_Anlst | 0.070 | 0.032 | 0.393 | 0.492 | 0.005 | 0.550 | 0.012 |
| MPEG_EP | 0.066 | 0.029 | 0.392 | 0.544 | 0.003 | 0.681 | 0.025 |
| DKL_RI_Clbrtd | 0.070 | 0.032 | 0.392 | 0.581 | 0.008 | 0.794 | 0.053 |
| TPDPS_Anlst | 0.085 | 0.047 | 0.392 | 0.643 | 0.041 | 0.853 | 0.147 |

[^71]Table 112: ICC Timing Portfolios - An Alternative Tuning Parameter $\eta=2$, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | 0.076 | 0.038 | 0.392 | 0.567 | 0.021 | 0.776 | 0.058 |
| KMY_Anlst | 0.069 | 0.031 | 0.391 | 0.489 | 0.005 | 0.511 | 0.015 |
| GM_RI_Clbrtd | 0.075 | 0.037 | 0.390 | 0.544 | 0.019 | 0.836 | 0.139 |
| FPM_HDZ_Clbrtd | 0.074 | 0.036 | 0.389 | 0.529 | 0.016 | 0.713 | 0.051 |
| TPDPS_HDZ_Clbrtd | 0.084 | 0.046 | 0.389 | 0.638 | 0.041 | 0.835 | 0.155 |
| TPDPS_HDZ | 0.083 | 0.046 | 0.388 | 0.639 | 0.042 | 0.829 | 0.158 |
| WNG_EP | 0.087 | 0.050 | 0.388 | 0.971 | 0.053 | 0.825 | 0.141 |
| FPM_RW_Clbrtd | 0.080 | 0.043 | 0.386 | 0.617 | 0.038 | 0.835 | 0.171 |
| KMY_EP_Clbrtd | 0.071 | 0.034 | 0.385 | 0.555 | 0.010 | 0.629 | 0.022 |
| Naive_Clbrtd | 0.085 | 0.049 | 0.384 | 0.645 | 0.047 | 0.815 | 0.172 |
| Naive | 0.085 | 0.049 | 0.384 | 0.645 | 0.047 | 0.815 | 0.172 |
| DKL_Anlst | 0.066 | 0.030 | 0.382 | 0.502 | 0.009 | 0.460 | 0.037 |
| TrETSS_Anlst_25SBM | 0.071 | 0.035 | 0.378 | 0.949 | 0.011 | 0.794 | 0.174 |
| FPM_Anlst | 0.064 | 0.029 | 0.375 | 0.502 | 0.006 | 0.254 | 0.047 |
| BP_RI_Clbrtd | 0.075 | 0.040 | 0.373 | 0.605 | 0.082 | 0.766 | 0.225 |
| GG_RI_Clbrtd | 0.082 | 0.052 | 0.360 | 0.666 | 0.099 | 0.765 | 0.305 |
| GM_RI | 0.063 | 0.030 | 0.360 | 0.525 | 0.020 | 0.570 | 0.120 |
| HL_Anlst | 0.062 | 0.030 | 0.359 | 0.501 | 0.012 | 0.252 | 0.063 |
| KMY_RI_Clbrtd | 0.065 | 0.033 | 0.358 | 0.613 | 0.019 | 0.532 | 0.075 |
| MPEG_RW_Clbrtd | 0.065 | 0.033 | 0.358 | 0.679 | 0.031 | 0.510 | 0.147 |
| FGHJ_RI_Clbrtd | 0.064 | 0.033 | 0.353 | 0.586 | 0.011 | 0.378 | 0.087 |
| HL_RI_Clbrtd | 0.062 | 0.032 | 0.350 | 0.567 | 0.019 | 0.456 | 0.109 |
| GM_RW_Clbrtd | 0.066 | 0.036 | 0.349 | 0.712 | 0.064 | 0.545 | 0.185 |
| CT_Anlst | 0.061 | 0.031 | 0.348 | 0.524 | 0.020 | 0.235 | 0.098 |
| FPM_RI_Clbrtd | 0.066 | 0.038 | 0.341 | 0.600 | 0.068 | 0.519 | 0.146 |
| FPM_HDZ | 0.058 | 0.029 | 0.337 | 0.512 | 0.019 | 0.291 | 0.167 |
| MPEG_RI_Clbrtd | 0.064 | 0.036 | 0.337 | 0.526 | 0.042 | 0.511 | 0.184 |
| GM_EP_Clbrtd | 0.061 | 0.033 | 0.335 | 0.546 | 0.030 | 0.438 | 0.144 |
| TrES_RW_10Ind | 0.067 | 0.040 | 0.335 | 0.729 | 0.210 | 0.700 | 0.433 |
| TrES_Anlst _10Ind | 0.067 | 0.041 | 0.333 | 0.839 | 0.140 | 0.595 | 0.333 |
| TPDPS_RW_Clbrtd | 0.076 | 0.054 | 0.329 | 0.607 | 0.116 | 0.624 | 0.429 |
| TrOHE_10Ind | 0.057 | 0.030 | 0.327 | 0.672 | 0.086 | 0.550 | 0.372 |

[^72]Table 112: ICC Timing Portfolios - An Alternative Tuning Parameter $\eta=2$, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| TPDPS_RW | 0.076 | 0.054 | 0.326 | 0.634 | 0.113 | 0.600 | 0.411 |
| PEG_Anlst | 0.055 | 0.030 | 0.319 | 0.533 | 0.014 | 0.163 | 0.131 |
| GM_Anlst | 0.054 | 0.030 | 0.311 | 0.498 | 0.032 | 0.098 | 0.190 |
| PEG_EP | 0.053 | 0.031 | 0.302 | 0.591 | 0.046 | 0.165 | 0.219 |
| GM_HDZ | 0.054 | 0.032 | 0.301 | 0.509 | 0.067 | 0.273 | 0.312 |
| CT_EP_Clbrtd | 0.055 | 0.033 | 0.301 | 0.560 | 0.061 | 0.109 | 0.227 |
| GM_EP | 0.051 | 0.029 | 0.300 | 0.554 | 0.034 | 0.199 | 0.216 |
| FPM_EP | 0.052 | 0.030 | 0.295 | 0.612 | 0.062 | 0.154 | 0.332 |
| PEG_EP_Clbrtd | 0.048 | 0.027 | 0.295 | 0.489 | 0.122 | 0.389 | 0.455 |
| TrOHE_25SBM | 0.068 | 0.054 | 0.294 | 1.323 | 0.197 | 0.443 | 0.454 |
| CT_RW_Clbrtd | 0.050 | 0.030 | 0.291 | 0.620 | 0.110 | 0.417 | 0.478 |
| PE_EP_Clbrtd | 0.053 | 0.035 | 0.286 | 0.480 | 0.178 | 0.369 | 0.477 |
| FPM_EP_Clbrtd | 0.051 | 0.032 | 0.286 | 0.532 | 0.062 | 0.104 | 0.247 |
| MPEG_Anlst | 0.050 | 0.030 | 0.286 | 0.519 | 0.050 | 0.082 | 0.308 |
| FGHJ_RW | 0.055 | 0.038 | 0.281 | 0.757 | 0.103 | 0.226 | 0.386 |
| GG_EP | 0.044 | 0.025 | 0.277 | 0.604 | 0.196 | 0.389 | 0.572 |
| TrES_HDZ_10Ind | 0.047 | 0.031 | 0.268 | 0.748 | 0.154 | 0.339 | 0.554 |
| GLS_RW | 0.053 | 0.041 | 0.262 | 0.792 | 0.132 | 0.183 | 0.481 |
| WNG_Anlst | 0.078 | 0.088 | 0.262 | 0.718 | 0.250 | 0.323 | 0.493 |
| WNG_RI | 0.061 | 0.057 | 0.255 | 1.081 | 0.350 | 0.450 | 0.717 |
| FGHJ_RW_Clbrtd | 0.045 | 0.034 | 0.242 | 0.640 | 0.149 | 0.084 | 0.478 |
| TrES_Anlst_25SBM | 0.055 | 0.054 | 0.238 | 1.313 | 0.339 | 0.297 | 0.708 |
| PEG_RI | 0.043 | 0.032 | 0.237 | 0.538 | 0.153 | 0.076 | 0.587 |
| TrES_RW_25SBM | 0.046 | 0.038 | 0.235 | 1.046 | 0.391 | 0.437 | 0.810 |
| BP_RW_Clbrtd | 0.057 | 0.059 | 0.234 | 0.661 | 0.328 | 0.262 | 0.720 |
| FPM_RW | 0.043 | 0.035 | 0.232 | 0.820 | 0.275 | 0.263 | 0.743 |
| MPEG_EP_Clbrtd | 0.037 | 0.028 | 0.220 | 0.498 | 0.215 | 0.205 | 0.775 |
| GG_RW_Clbrtd | 0.034 | 0.026 | 0.208 | 0.453 | 0.485 | 0.353 | 0.899 |
| Carhart_Factor | 0.039 | 0.039 | 0.200 | 0.748 | 0.500 | 0.338 | 0.940 |
| TrETSS_Anlst _10Ind | 0.039 | 0.042 | 0.189 | 0.652 | 0.326 | 0.128 | 0.949 |
| TrES_EP_25SBM | 0.039 | 0.043 | 0.186 | 1.227 | 0.398 | 0.235 | 0.979 |
| 1/N | 0.036 | 0.039 | 0.181 | 0.465 | 0.233 | 0.016 | 1.000 |

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Table 112: ICC Timing Portfolios - An Alternative Tuning Parameter $\eta=2$, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | $\mathbf{1 / N}$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| TrETSS_EP_10Ind | 0.035 | 0.043 | 0.168 | 0.630 | 0.317 | 0.093 | 0.919 |
| TrETSS_RI_10Ind | 0.030 | 0.044 | 0.144 | 0.577 | 0.572 | 0.162 | 0.832 |
| TrETSS_HDZ_10Ind | 0.026 | 0.034 | 0.143 | 0.567 | 0.586 | 0.148 | 0.827 |
| TrES_RI_10Ind | 0.027 | 0.035 | 0.143 | 0.768 | 0.632 | 0.122 | 0.835 |
| 3FF_Factor | 0.036 | 0.063 | 0.143 | 0.586 | 0.694 | 0.280 | 0.878 |
| TrETSS_RW_10Ind | 0.030 | 0.051 | 0.133 | 0.661 | 0.699 | 0.175 | 0.797 |
| WNG_HDZ | 0.022 | 0.039 | 0.113 | 0.762 | 0.777 | 0.153 | 0.740 |
| TrES_HDZ_25SBM | 0.021 | 0.045 | 0.099 | 1.366 | 0.783 | 0.076 | 0.619 |
| TrETSS_EP_25SBM | 0.019 | 0.045 | 0.087 | 0.880 | 0.835 | 0.028 | 0.465 |
| TrETSS_HDZ_25SBM | 0.014 | 0.041 | 0.069 | 0.921 | 0.917 | 0.047 | 0.474 |
| RRT | 0.009 | 0.031 | 0.053 | 0.512 | 1.000 | 0.001 | 0.233 |
| TrETSS_RI_25SBM | 0.011 | 0.043 | 0.053 | 0.834 | 1.000 | 0.018 | 0.388 |
| 5FF_Factor | 0.011 | 0.045 | 0.051 | 0.714 | 0.992 | 0.118 | 0.578 |
| PEG_RI_Clbrtd | 0.007 | 0.030 | 0.039 | 0.447 | 0.947 | 0.070 | 0.467 |
| PE_RI_Clbrtd | 0.004 | 0.031 | 0.024 | 0.451 | 0.861 | 0.015 | 0.329 |
| PE_RW_Clbrtd | 0.004 | 0.035 | 0.019 | 0.216 | 0.896 | 0.137 | 0.545 |
| WNG_RW | 0.002 | 0.065 | 0.008 | 0.868 | 0.838 | 0.054 | 0.376 |
| TrETSS_RW_25SBM | -0.023 | 0.044 | -0.107 | 0.801 | 0.303 | 0.003 | 0.035 |

This table report the out-of-sample results of the market timing portfolio using ICC ex-ante expected return estimates with a Tuning Parameter $\eta=2$, as well as other benchmark strategies. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the RRT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the conventional Reward-to-Risk Timing (RRT) portfolio is zero, the $1 / \mathrm{N}$ column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the VT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the Volatility Timing (VT) portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) non-parametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 113 : ICC Optimal Portfolios - An Alternative Estimation Window

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.134 | 0.042 | 0.653 | 0.475 | 0.000 | 0.001 | 0.000 |
| PE_RW | 0.080 | 0.018 | 0.594 | 0.253 | 0.136 | 0.303 | 0.110 |
| PE_HDZ | 0.094 | 0.037 | 0.492 | 0.481 | 0.002 | 0.020 | 0.001 |
| PE_HDZ_Clbrtd | 0.087 | 0.032 | 0.487 | 0.454 | 0.017 | 0.164 | 0.022 |
| BP_RW | 0.105 | 0.048 | 0.483 | 0.629 | 0.036 | 0.210 | 0.025 |
| PE_EP | 0.094 | 0.040 | 0.468 | 0.440 | 0.047 | 0.282 | 0.040 |
| TPDPS_RI | 0.093 | 0.040 | 0.467 | 0.529 | 0.011 | 0.146 | 0.013 |
| TPDPS_RW_Clbrtd | 0.098 | 0.044 | 0.464 | 0.569 | 0.071 | 0.346 | 0.067 |
| TPDPS_EP | 0.092 | 0.040 | 0.464 | 0.527 | 0.013 | 0.160 | 0.014 |
| TPDPS_RI_Clbrtd | 0.092 | 0.040 | 0.463 | 0.533 | 0.013 | 0.158 | 0.013 |
| TrES_EP_10Ind | 0.090 | 0.038 | 0.462 | 0.757 | 0.058 | 0.359 | 0.048 |
| BP_EP | 0.088 | 0.036 | 0.461 | 0.509 | 0.020 | 0.185 | 0.021 |
| GM_HDZ_Clbrtd | 0.085 | 0.034 | 0.461 | 0.492 | 0.017 | 0.128 | 0.004 |
| TPDPS_EP_Clbrtd | 0.091 | 0.040 | 0.458 | 0.532 | 0.015 | 0.179 | 0.016 |
| TPDPS_RW | 0.101 | 0.049 | 0.456 | 0.594 | 0.081 | 0.354 | 0.058 |
| TrES_RI_25SBM | 0.091 | 0.040 | 0.456 | 1.062 | 0.099 | 0.387 | 0.068 |
| BP_RI | 0.087 | 0.037 | 0.456 | 0.516 | 0.024 | 0.210 | 0.025 |
| CT_RI | 0.087 | 0.037 | 0.451 | 0.546 | 0.013 | 0.170 | 0.025 |
| GG_EP_Clbrtd | 0.084 | 0.036 | 0.442 | 0.553 | 0.089 | 0.392 | 0.068 |
| GLS_RI | 0.085 | 0.037 | 0.441 | 0.525 | 0.011 | 0.078 | 0.002 |
| DKL_EP | 0.082 | 0.036 | 0.433 | 0.500 | 0.002 | 0.042 | 0.002 |
| DKL_RI | 0.082 | 0.036 | 0.433 | 0.535 | 0.009 | 0.154 | 0.017 |
| HL_EP | 0.081 | 0.035 | 0.431 | 0.498 | 0.002 | 0.041 | 0.002 |
| GG_RW | 0.081 | 0.036 | 0.429 | 0.489 | 0.004 | 0.054 | 0.001 |
| HL_RI | 0.080 | 0.036 | 0.424 | 0.524 | 0.010 | 0.169 | 0.017 |
| FPM_RI | 0.078 | 0.034 | 0.423 | 0.581 | 0.007 | 0.175 | 0.012 |
| PEG_HDZ_Clbrtd | 0.085 | 0.041 | 0.422 | 0.548 | 0.088 | 0.418 | 0.032 |
| CT_HDZ_Clbrtd | 0.076 | 0.033 | 0.420 | 0.478 | 0.007 | 0.042 | 0.002 |
| FGHJ_EP_Clbrtd | 0.078 | 0.034 | 0.419 | 0.469 | 0.003 | 0.053 | 0.003 |
| KMY_RI | 0.081 | 0.037 | 0.419 | 0.542 | 0.019 | 0.258 | 0.029 |
| KMY_EP | 0.077 | 0.034 | 0.416 | 0.521 | 0.002 | 0.168 | 0.011 |

Continued in next page...

Table 113 : ICC Optimal Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_HDZ_Clbrtd | 0.078 | 0.036 | 0.412 | 0.505 | 0.029 | 0.227 | 0.006 |
| Naive_Clbrtd | 0.084 | 0.041 | 0.412 | 0.619 | 0.041 | 0.347 | 0.027 |
| Naive | 0.084 | 0.041 | 0.412 | 0.619 | 0.041 | 0.347 | 0.027 |
| HL_HDZ_Clbrtd | 0.077 | 0.035 | 0.411 | 0.498 | 0.020 | 0.180 | 0.005 |
| DKL_HDZ_Clbrtd | 0.076 | 0.035 | 0.410 | 0.495 | 0.018 | 0.165 | 0.004 |
| TPDPS_Anlst_Clbrtd | 0.082 | 0.040 | 0.409 | 0.598 | 0.033 | 0.325 | 0.025 |
| GG_RI | 0.086 | 0.044 | 0.409 | 0.514 | 0.206 | 0.637 | 0.186 |
| TPDPS_Anlst | 0.082 | 0.040 | 0.408 | 0.597 | 0.033 | 0.328 | 0.025 |
| CT_RW | 0.080 | 0.038 | 0.407 | 0.524 | 0.004 | 0.142 | 0.003 |
| GLS_EP | 0.077 | 0.035 | 0.407 | 0.498 | 0.006 | 0.062 | 0.001 |
| PE_Anlst _Clbrtd | 0.075 | 0.034 | 0.407 | 0.498 | 0.007 | 0.076 | 0.005 |
| GG_HDZ_Clbrtd | 0.076 | 0.035 | 0.405 | 0.490 | 0.031 | 0.263 | 0.008 |
| BP_Anlst | 0.081 | 0.040 | 0.405 | 0.591 | 0.047 | 0.377 | 0.035 |
| TPDPS_HDZ | 0.080 | 0.039 | 0.405 | 0.578 | 0.033 | 0.340 | 0.028 |
| TPDPS_HDZ_Clbrtd | 0.080 | 0.040 | 0.404 | 0.581 | 0.035 | 0.353 | 0.028 |
| GLS_HDZ_Clbrtd | 0.075 | 0.035 | 0.404 | 0.483 | 0.009 | 0.084 | 0.001 |
| CAPM_Factor | 0.067 | 0.028 | 0.401 | 0.503 | 0.284 | 0.702 | 0.273 |
| BP_HDZ | 0.079 | 0.039 | 0.400 | 0.566 | 0.043 | 0.390 | 0.040 |
| GM_RI_Clbrtd | 0.075 | 0.035 | 0.400 | 0.497 | 0.081 | 0.505 | 0.075 |
| GLS_EP_Clbrtd | 0.075 | 0.035 | 0.398 | 0.472 | 0.004 | 0.066 | 0.002 |
| GLS_RI_Clbrtd | 0.074 | 0.034 | 0.398 | 0.524 | 0.025 | 0.429 | 0.013 |
| GG_HDZ | 0.076 | 0.036 | 0.397 | 0.468 | 0.018 | 0.230 | 0.008 |
| DKL_RW | 0.077 | 0.037 | 0.397 | 0.582 | 0.003 | 0.116 | 0.002 |
| GLS_HDZ | 0.076 | 0.036 | 0.397 | 0.475 | 0.007 | 0.115 | 0.003 |
| FGHJ_RI | 0.075 | 0.036 | 0.397 | 0.512 | 0.009 | 0.199 | 0.003 |
| CT_EP | 0.077 | 0.038 | 0.396 | 0.518 | 0.017 | 0.359 | 0.026 |
| KMY_RW | 0.075 | 0.036 | 0.391 | 0.567 | 0.004 | 0.127 | 0.002 |
| BP_EP_Clbrtd | 0.075 | 0.037 | 0.391 | 0.542 | 0.077 | 0.523 | 0.065 |
| FGHJ_EP | 0.073 | 0.035 | 0.389 | 0.492 | 0.007 | 0.085 | 0.001 |
| HL_RW | 0.074 | 0.037 | 0.388 | 0.578 | 0.004 | 0.155 | 0.002 |
| FGHJ_HDZ_Clbrtd | 0.071 | 0.034 | 0.385 | 0.475 | 0.010 | 0.138 | 0.001 |
| BP_Anlst _Clbrtd | 0.077 | 0.040 | 0.383 | 0.594 | 0.082 | 0.571 | 0.056 |

[^73]Table 113 : ICC Optimal Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_RI_Clbrtd | 0.070 | 0.033 | 0.382 | 0.521 | 0.059 | 0.557 | 0.054 |
| MPEG_HDZ_Clbrtd | 0.072 | 0.036 | 0.382 | 0.496 | 0.058 | 0.481 | 0.019 |
| FGHJ_HDZ | 0.072 | 0.036 | 0.380 | 0.471 | 0.008 | 0.192 | 0.004 |
| KMY_HDZ | 0.071 | 0.035 | 0.379 | 0.465 | 0.025 | 0.350 | 0.012 |
| CT_HDZ | 0.071 | 0.035 | 0.379 | 0.469 | 0.021 | 0.342 | 0.012 |
| BP_HDZ_Clbrtd | 0.076 | 0.040 | 0.378 | 0.579 | 0.104 | 0.636 | 0.080 |
| MPEG_RW | 0.070 | 0.035 | 0.375 | 0.496 | 0.008 | 0.167 | 0.001 |
| GM_RW | 0.070 | 0.035 | 0.375 | 0.497 | 0.008 | 0.174 | 0.001 |
| GLS_Anlst | 0.069 | 0.035 | 0.371 | 0.475 | 0.013 | 0.242 | 0.003 |
| PEG_RW | 0.071 | 0.037 | 0.371 | 0.512 | 0.011 | 0.365 | 0.002 |
| DKL_HDZ | 0.069 | 0.035 | 0.370 | 0.466 | 0.026 | 0.427 | 0.014 |
| KMY_Anlst _Clbrtd | 0.067 | 0.034 | 0.364 | 0.456 | 0.005 | 0.026 | 0.003 |
| MPEG_Anlst_Clbrtd | 0.068 | 0.035 | 0.364 | 0.475 | 0.011 | 0.272 | 0.002 |
| GLS_Anlst _Clbrtd | 0.067 | 0.034 | 0.364 | 0.471 | 0.008 | 0.098 | 0.001 |
| HL_HDZ | 0.067 | 0.035 | 0.362 | 0.464 | 0.037 | 0.559 | 0.018 |
| DKL_Anlst _Clbrtd | 0.067 | 0.034 | 0.361 | 0.468 | 0.008 | 0.136 | 0.002 |
| HL_Anlst _Clbrtd | 0.067 | 0.035 | 0.360 | 0.468 | 0.009 | 0.162 | 0.002 |
| CT_Anlst _Clbrtd | 0.066 | 0.034 | 0.360 | 0.471 | 0.009 | 0.190 | 0.003 |
| FGHJ_Anlst _Clbrtd | 0.066 | 0.034 | 0.359 | 0.466 | 0.008 | 0.075 | 0.002 |
| GM_Anlst _Clbrtd | 0.066 | 0.035 | 0.358 | 0.466 | 0.010 | 0.230 | 0.002 |
| MPEG_RI | 0.064 | 0.033 | 0.355 | 0.479 | 0.062 | 0.700 | 0.022 |
| HL_EP_Clbrtd | 0.066 | 0.035 | 0.353 | 0.485 | 0.036 | 0.670 | 0.015 |
| FGHJ_Anlst | 0.065 | 0.034 | 0.352 | 0.469 | 0.019 | 0.527 | 0.005 |
| DKL_EP_Clbrtd | 0.065 | 0.035 | 0.348 | 0.486 | 0.042 | 0.766 | 0.016 |
| WNG_RI | 0.078 | 0.051 | 0.346 | 0.943 | 0.501 | 0.961 | 0.450 |
| BP_RI_Clbrtd | 0.068 | 0.039 | 0.346 | 0.544 | 0.211 | 0.924 | 0.173 |
| KMY_RI_Clbrtd | 0.066 | 0.037 | 0.343 | 0.557 | 0.136 | 0.932 | 0.066 |
| TrOHE_25SBM | 0.079 | 0.054 | 0.343 | 1.157 | 0.296 | 0.964 | 0.237 |
| FPM_Anlst_Clbrtd | 0.064 | 0.035 | 0.342 | 0.465 | 0.031 | 0.861 | 0.006 |
| KMY_EP_Clbrtd | 0.065 | 0.036 | 0.340 | 0.506 | 0.070 | 0.945 | 0.018 |
| MPEG_EP | 0.061 | 0.032 | 0.339 | 0.490 | 0.053 | 0.957 | 0.010 |
| DKL_Anlst | 0.062 | 0.034 | 0.339 | 0.463 | 0.039 | 0.939 | 0.007 |

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Table 113 : ICC Optimal Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | 0.065 | 0.037 | 0.339 | 0.491 | 0.114 | 0.977 | 0.048 |
| Minimum Variance | 0.061 | 0.033 | 0.337 | 0.450 | 0.013 | 1.000 | 0.006 |
| MPEG_HDZ | 0.062 | 0.034 | 0.337 | 0.460 | 0.095 | 0.998 | 0.045 |
| KMY_RW_Clbrtd | 0.062 | 0.034 | 0.337 | 0.480 | 0.019 | 0.978 | 0.005 |
| TrES_Anlst_10Ind | 0.067 | 0.039 | 0.336 | 0.720 | 0.278 | 0.996 | 0.274 |
| PEG_EP | 0.062 | 0.034 | 0.336 | 0.556 | 0.199 | 0.990 | 0.088 |
| DKL_RW_Clbrtd | 0.061 | 0.034 | 0.334 | 0.484 | 0.021 | 0.850 | 0.006 |
| HL_RW_Clbrtd | 0.061 | 0.034 | 0.334 | 0.483 | 0.022 | 0.817 | 0.007 |
| HL_Anlst | 0.061 | 0.033 | 0.334 | 0.463 | 0.051 | 0.892 | 0.008 |
| DKL_RI_Clbrtd | 0.062 | 0.035 | 0.334 | 0.526 | 0.105 | 0.954 | 0.062 |
| PEG_Anlst _Clbrtd | 0.064 | 0.037 | 0.333 | 0.494 | 0.074 | 0.931 | 0.013 |
| GG_Anlst _Clbrtd | 0.062 | 0.034 | 0.333 | 0.458 | 0.024 | 0.766 | 0.004 |
| KMY_Anlst | 0.062 | 0.034 | 0.333 | 0.459 | 0.032 | 0.821 | 0.003 |
| GG_Anlst | 0.062 | 0.035 | 0.333 | 0.461 | 0.028 | 0.815 | 0.003 |
| PEG_HDZ | 0.061 | 0.034 | 0.331 | 0.462 | 0.113 | 0.890 | 0.048 |
| GG_RI_Clbrtd | 0.075 | 0.052 | 0.330 | 0.604 | 0.460 | 0.963 | 0.390 |
| GM_RI | 0.059 | 0.033 | 0.328 | 0.476 | 0.178 | 0.875 | 0.068 |
| FPM_HDZ_Clbrtd | 0.063 | 0.037 | 0.327 | 0.488 | 0.139 | 0.822 | 0.060 |
| FPM_Anlst | 0.059 | 0.033 | 0.324 | 0.466 | 0.051 | 0.463 | 0.012 |
| CT_Anlst | 0.060 | 0.034 | 0.324 | 0.465 | 0.069 | 0.612 | 0.017 |
| TrES_HDZ_10Ind | 0.059 | 0.034 | 0.323 | 0.677 | 0.422 | 0.911 | 0.343 |
| PEG_Anlst | 0.059 | 0.034 | 0.323 | 0.479 | 0.101 | 0.696 | 0.014 |
| WNG_Anlst | 0.169 | 0.276 | 0.322 | 1.854 | 0.486 | 0.708 | 0.479 |
| GM_RW_Clbrtd | 0.062 | 0.037 | 0.321 | 0.655 | 0.223 | 0.826 | 0.160 |
| GM_Anlst | 0.058 | 0.033 | 0.319 | 0.458 | 0.089 | 0.490 | 0.015 |
| MPEG_Anlst | 0.058 | 0.034 | 0.318 | 0.469 | 0.108 | 0.576 | 0.022 |
| BP_RW_Clbrtd | 0.074 | 0.054 | 0.317 | 0.653 | 0.435 | 0.868 | 0.334 |
| FPM_RI_Clbrtd | 0.063 | 0.041 | 0.315 | 0.527 | 0.273 | 0.801 | 0.192 |
| GLS_RW_Clbrtd | 0.058 | 0.034 | 0.314 | 0.497 | 0.079 | 0.477 | 0.017 |
| PE_EP_Clbrtd | 0.060 | 0.037 | 0.312 | 0.468 | 0.453 | 0.833 | 0.386 |
| MPEG_RI_Clbrtd | 0.058 | 0.034 | 0.311 | 0.479 | 0.298 | 0.748 | 0.166 |
| GLS_RW | 0.061 | 0.039 | 0.310 | 0.613 | 0.209 | 0.662 | 0.129 |

[^74]Table 113 : ICC Optimal Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_RI_Clbrtd | 0.058 | 0.035 | 0.310 | 0.515 | 0.172 | 0.622 | 0.100 |
| CT_EP_Clbrtd | 0.058 | 0.035 | 0.309 | 0.506 | 0.173 | 0.547 | 0.093 |
| GG_EP | 0.051 | 0.028 | 0.308 | 0.528 | 0.513 | 0.828 | 0.450 |
| FPM_HDZ | 0.055 | 0.033 | 0.305 | 0.467 | 0.206 | 0.458 | 0.105 |
| GM_EP_Clbrtd | 0.056 | 0.035 | 0.301 | 0.482 | 0.341 | 0.655 | 0.245 |
| FGHJ_RI_Clbrtd | 0.057 | 0.036 | 0.301 | 0.529 | 0.158 | 0.455 | 0.118 |
| FPM_RW_Clbrtd | 0.064 | 0.045 | 0.301 | 0.568 | 0.498 | 0.762 | 0.444 |
| TrES_RW_10Ind | 0.063 | 0.044 | 0.300 | 0.643 | 0.644 | 0.846 | 0.606 |
| MPEG_RW_Clbrtd | 0.056 | 0.036 | 0.298 | 0.637 | 0.299 | 0.570 | 0.257 |
| PEG_RW_Clbrtd | 0.055 | 0.035 | 0.291 | 0.523 | 0.282 | 0.367 | 0.203 |
| TrOHE_10Ind | 0.051 | 0.032 | 0.287 | 0.626 | 0.610 | 0.709 | 0.533 |
| GM_HDZ | 0.053 | 0.034 | 0.287 | 0.459 | 0.381 | 0.396 | 0.243 |
| GM_EP | 0.052 | 0.033 | 0.286 | 0.487 | 0.330 | 0.314 | 0.112 |
| FGHJ_RW | 0.054 | 0.037 | 0.284 | 0.592 | 0.356 | 0.384 | 0.247 |
| TrETSS_Anlst_25SBM | 0.051 | 0.033 | 0.281 | 0.826 | 0.475 | 0.560 | 0.462 |
| PEG_RI | 0.052 | 0.034 | 0.279 | 0.516 | 0.429 | 0.356 | 0.242 |
| FPM_EP | 0.051 | 0.034 | 0.274 | 0.544 | 0.418 | 0.283 | 0.311 |
| FGHJ_RW_Clbrtd | 0.053 | 0.039 | 0.272 | 0.554 | 0.555 | 0.460 | 0.372 |
| CT_RW_Clbrtd | 0.046 | 0.031 | 0.262 | 0.544 | 0.728 | 0.575 | 0.686 |
| FPM_EP_Clbrtd | 0.049 | 0.035 | 0.260 | 0.491 | 0.470 | 0.136 | 0.275 |
| WNG_EP | 0.058 | 0.049 | 0.260 | 0.985 | 0.711 | 0.504 | 0.650 |
| TrETSS_Anlst _10Ind | 0.046 | 0.038 | 0.239 | 0.611 | 0.792 | 0.312 | 0.726 |
| PEG_EP_Clbrtd | 0.041 | 0.030 | 0.236 | 0.456 | 0.860 | 0.421 | 0.810 |
| TrES_EP_25SBM | 0.047 | 0.040 | 0.235 | 1.086 | 0.887 | 0.534 | 0.850 |
| TrES_Anlst_25SBM | 0.049 | 0.044 | 0.233 | 1.085 | 0.848 | 0.307 | 0.770 |
| TrES_RW_25SBM | 0.044 | 0.038 | 0.226 | 0.929 | 0.949 | 0.596 | 0.923 |
| MPEG_EP_Clbrtd | 0.039 | 0.030 | 0.225 | 0.459 | 0.924 | 0.375 | 0.870 |
| Mean-variance | 0.041 | 0.038 | 0.212 | 0.466 | 1.000 | 0.013 | 0.918 |
| TrETSS_EP_25SBM | 0.044 | 0.043 | 0.212 | 0.721 | 0.997 | 0.208 | 0.947 |
| 1/N | 0.040 | 0.038 | 0.206 | 0.456 | 0.918 | 0.006 | 1.000 |
| TrETSS_EP_10Ind | 0.040 | 0.038 | 0.202 | 0.568 | 0.922 | 0.168 | 0.969 |
| GG_RW_Clbrtd | 0.031 | 0.025 | 0.195 | 0.403 | 0.932 | 0.466 | 0.956 |

[^75]Table 113 : ICC Optimal Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | MeanV | MinV | $\mathbf{1 / N}$ |
| :--- | :---: | :--- | :--- | :--- | :--- | :--- | :--- |
| TrES_HDZ_25SBM | 0.038 | 0.037 | 0.194 | 1.142 | 0.904 | 0.304 | 0.928 |
| Carhart_Factor | 0.036 | 0.038 | 0.187 | 0.625 | 0.898 | 0.466 | 0.930 |
| WNG_HDZ | 0.035 | 0.037 | 0.184 | 0.690 | 0.882 | 0.420 | 0.906 |
| TrETSS_RI_25SBM | 0.036 | 0.042 | 0.177 | 0.732 | 0.757 | 0.157 | 0.800 |
| TrETSS_RW_10Ind | 0.038 | 0.046 | 0.177 | 0.609 | 0.825 | 0.335 | 0.855 |
| TrETSS_RI_10Ind | 0.034 | 0.037 | 0.175 | 0.541 | 0.812 | 0.314 | 0.845 |
| TrETSS_HDZ_25SBM | 0.030 | 0.037 | 0.157 | 0.804 | 0.668 | 0.128 | 0.667 |
| TrETSS_HDZ_10Ind | 0.026 | 0.031 | 0.145 | 0.526 | 0.660 | 0.203 | 0.678 |
| FPM_RW | 0.026 | 0.036 | 0.137 | 0.709 | 0.626 | 0.153 | 0.600 |
| 3FF_Factor | 0.033 | 0.062 | 0.133 | 0.508 | 0.736 | 0.391 | 0.754 |
| 5FF_Factor | 0.023 | 0.042 | 0.110 | 0.596 | 0.618 | 0.284 | 0.652 |
| PEG_RI_Clbrtd | 0.020 | 0.035 | 0.105 | 0.412 | 0.580 | 0.218 | 0.579 |
| TrES_RI_10Ind | 0.019 | 0.033 | 0.103 | 0.677 | 0.505 | 0.135 | 0.515 |
| WNG_RW | 0.010 | 0.056 | 0.041 | 0.813 | 0.314 | 0.092 | 0.334 |
| PE_RI_Clbrtd | 0.007 | 0.033 | 0.038 | 0.434 | 0.217 | 0.029 | 0.203 |
| TrETSS_RW_25SBM | 0.005 | 0.042 | 0.022 | 0.691 | 0.131 | 0.013 | 0.090 |
| PE_RW_Clbrtd | 0.002 | 0.036 | 0.010 | 0.202 | 0.444 | 0.221 | 0.465 |

This table report the out-of-sample results of the tangency portfolio using ICC ex-ante expected return estimates, as well as other benchmark strategies using an alternative estimation window of 90 months. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the MeanV column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the meanvariance portfolio is zero, the $1 / \mathrm{N}$ column contains the p -value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the MinVar column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the minimum variance portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) nonparametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

Table 114 : ICC Timing Portfolios - An Alternative Estimation Window

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_RI | 0.134 | 0.042 | 0.653 | 0.475 | 0.000 | 0.001 | 0.000 |
| PE_RW | 0.080 | 0.018 | 0.594 | 0.253 | 0.136 | 0.303 | 0.110 |
| PE_HDZ | 0.094 | 0.037 | 0.492 | 0.481 | 0.002 | 0.020 | 0.001 |
| PE_HDZ_Clbrtd | 0.087 | 0.032 | 0.487 | 0.454 | 0.017 | 0.164 | 0.022 |
| BP_RW | 0.105 | 0.048 | 0.483 | 0.629 | 0.036 | 0.210 | 0.025 |
| PE_EP | 0.094 | 0.040 | 0.468 | 0.440 | 0.047 | 0.282 | 0.040 |
| TPDPS_RI | 0.093 | 0.040 | 0.467 | 0.529 | 0.011 | 0.146 | 0.013 |
| TPDPS_RW_Clbrtd | 0.098 | 0.044 | 0.464 | 0.569 | 0.071 | 0.346 | 0.067 |
| TPDPS_EP | 0.092 | 0.040 | 0.464 | 0.527 | 0.013 | 0.160 | 0.014 |
| TPDPS_RI_Clbrtd | 0.092 | 0.040 | 0.463 | 0.533 | 0.013 | 0.158 | 0.013 |
| TrES_EP_10Ind | 0.090 | 0.038 | 0.462 | 0.757 | 0.058 | 0.359 | 0.048 |
| BP_EP | 0.088 | 0.036 | 0.461 | $0.509$ | 0.020 | $0.185$ | 0.021 |
| GM_HDZ_Clbrtd | 0.085 | 0.034 | 0.461 | 0.492 | 0.017 | 0.128 | 0.004 |
| TPDPS_EP_Clbrtd | 0.091 | 0.040 | 0.458 | 0.532 | 0.015 | 0.179 | 0.016 |
| TPDPS_RW | 0.101 | 0.049 | 0.456 | 0.594 | 0.081 | 0.354 | 0.058 |
| TrES_RI_25SBM | 0.091 | 0.040 | 0.456 | 1.062 | 0.099 | 0.387 | 0.068 |
| BP_RI | 0.087 | 0.037 | 0.456 | 0.516 | 0.024 | 0.210 | 0.025 |
| CT_RI | $0.087$ | $0.037$ | 0.451 | $0.546$ | $0.013$ | $0.170$ | $0.025$ |
| GG_EP_Clbrtd | 0.084 | 0.036 | 0.442 | 0.553 | 0.089 | 0.392 | 0.068 |
| GLS_RI | 0.085 | 0.037 | 0.441 | 0.525 | 0.011 | 0.078 | 0.002 |
| DKL_EP | 0.082 | 0.036 | 0.433 | 0.500 | 0.002 | 0.042 | 0.002 |
| DKL_RI | 0.082 | $0.036$ | 0.433 | $0.535$ | $0.009$ | $0.154$ | $0.017$ |
| HL_EP | 0.081 | 0.035 | 0.431 | 0.498 | 0.002 | 0.041 | 0.002 |
| GG_RW | 0.081 | 0.036 | 0.429 | 0.489 | 0.004 | 0.054 | 0.001 |
| HL_RI | 0.080 | 0.036 | 0.424 | 0.524 | 0.010 | 0.169 | 0.017 |
| FPM_RI | 0.078 | 0.034 | 0.423 | 0.581 | 0.007 | 0.175 | 0.012 |
| PEG_HDZ_Clbrtd | 0.085 | 0.041 | 0.422 | 0.548 | 0.088 | 0.418 | 0.032 |
| CT_HDZ_Clbrtd | 0.076 | 0.033 | 0.420 | 0.478 | 0.007 | 0.042 | 0.002 |
| FGHJ_EP_Clbrtd | 0.078 | 0.034 | 0.419 | 0.469 | 0.003 | 0.053 | 0.003 |
| KMY_RI | 0.081 | 0.037 | 0.419 | 0.542 | 0.019 | 0.258 | 0.029 |
| KMY_EP | 0.077 | 0.034 | 0.416 | 0.521 | 0.002 | 0.168 | 0.011 |

Continued in next page...

Table 114 : ICC Timing Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| KMY_HDZ_Clbrtd | 0.078 | 0.036 | 0.412 | 0.505 | 0.029 | 0.227 | 0.006 |
| Naive_Clbrtd | 0.084 | 0.041 | 0.412 | 0.619 | 0.041 | 0.347 | 0.027 |
| Naive | 0.084 | 0.041 | 0.412 | 0.619 | 0.041 | 0.347 | 0.027 |
| HL_HDZ_Clbrtd | 0.077 | 0.035 | 0.411 | 0.498 | 0.020 | 0.180 | 0.005 |
| DKL_HDZ_Clbrtd | 0.076 | 0.035 | 0.410 | 0.495 | 0.018 | 0.165 | 0.004 |
| TPDPS_Anlst_Clbrtd | 0.082 | 0.040 | 0.409 | 0.598 | 0.033 | 0.325 | 0.025 |
| GG_RI | 0.086 | 0.044 | 0.409 | 0.514 | 0.206 | 0.637 | 0.186 |
| TPDPS_Anlst | 0.082 | 0.040 | 0.408 | 0.597 | 0.033 | 0.328 | 0.025 |
| CT_RW | 0.080 | 0.038 | 0.407 | 0.524 | 0.004 | 0.142 | 0.003 |
| GLS_EP | 0.077 | 0.035 | 0.407 | 0.498 | 0.006 | 0.062 | 0.001 |
| PE_Anlst _Clbrtd | 0.075 | 0.034 | 0.407 | 0.498 | 0.007 | 0.076 | 0.005 |
| GG_HDZ_Clbrtd | 0.076 | 0.035 | 0.405 | 0.490 | 0.031 | 0.263 | 0.008 |
| BP_Anlst | 0.081 | 0.040 | 0.405 | 0.591 | 0.047 | 0.377 | 0.035 |
| TPDPS_HDZ | 0.080 | 0.039 | 0.405 | 0.578 | 0.033 | 0.340 | 0.028 |
| TPDPS_HDZ_Clbrtd | 0.080 | 0.040 | 0.404 | 0.581 | 0.035 | 0.353 | 0.028 |
| GLS_HDZ_Clbrtd | 0.075 | 0.035 | 0.404 | 0.483 | 0.009 | 0.084 | 0.001 |
| CAPM_Factor | 0.067 | 0.028 | 0.401 | 0.503 | 0.284 | 0.702 | 0.273 |
| BP_HDZ | 0.079 | 0.039 | 0.400 | 0.566 | 0.043 | 0.390 | 0.040 |
| GM_RI_Clbrtd | 0.075 | 0.035 | 0.400 | 0.497 | 0.081 | 0.505 | 0.075 |
| GLS_EP_Clbrtd | 0.075 | 0.035 | 0.398 | 0.472 | 0.004 | 0.066 | 0.002 |
| GLS_RI_Clbrtd | 0.074 | 0.034 | 0.398 | 0.524 | 0.025 | 0.429 | 0.013 |
| GG_HDZ | 0.076 | 0.036 | 0.397 | 0.468 | 0.018 | 0.230 | 0.008 |
| DKL_RW | 0.077 | 0.037 | 0.397 | 0.582 | 0.003 | 0.116 | 0.002 |
| GLS_HDZ | 0.076 | 0.036 | 0.397 | 0.475 | 0.007 | 0.115 | 0.003 |
| FGHJ_RI | 0.075 | 0.036 | 0.397 | 0.512 | 0.009 | 0.199 | 0.003 |
| CT_EP | 0.077 | 0.038 | 0.396 | 0.518 | 0.017 | 0.359 | 0.026 |
| KMY_RW | 0.075 | 0.036 | 0.391 | 0.567 | 0.004 | 0.127 | 0.002 |
| BP_EP_Clbrtd | 0.075 | 0.037 | 0.391 | 0.542 | 0.077 | 0.523 | 0.065 |
| FGHJ_EP | 0.073 | 0.035 | 0.389 | 0.492 | 0.007 | 0.085 | 0.001 |
| HL_RW | 0.074 | 0.037 | 0.388 | 0.578 | 0.004 | 0.155 | 0.002 |
| FGHJ_HDZ_Clbrtd | 0.071 | 0.034 | 0.385 | 0.475 | 0.010 | 0.138 | 0.001 |
| BP_Anlst _Clbrtd | 0.077 | 0.040 | 0.383 | 0.594 | 0.082 | 0.571 | 0.056 |

Continued in next page...

Table 114 : ICC Timing Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| CT_RI_Clbrtd | 0.070 | 0.033 | 0.382 | 0.521 | 0.059 | 0.557 | 0.054 |
| MPEG_HDZ_Clbrtd | 0.072 | 0.036 | 0.382 | 0.496 | 0.058 | 0.481 | 0.019 |
| FGHJ_HDZ | 0.072 | 0.036 | 0.380 | 0.471 | 0.008 | 0.192 | 0.004 |
| KMY_HDZ | 0.071 | 0.035 | 0.379 | 0.465 | 0.025 | 0.350 | 0.012 |
| CT_HDZ | 0.071 | 0.035 | 0.379 | 0.469 | 0.021 | 0.342 | 0.012 |
| BP_HDZ_Clbrtd | 0.076 | 0.040 | 0.378 | 0.579 | 0.104 | 0.636 | 0.080 |
| MPEG_RW | 0.070 | 0.035 | 0.375 | 0.496 | 0.008 | 0.167 | 0.001 |
| GM_RW | 0.070 | 0.035 | 0.375 | 0.497 | 0.008 | 0.174 | 0.001 |
| GLS_Anlst | 0.069 | 0.035 | 0.371 | 0.475 | 0.013 | 0.242 | 0.003 |
| PEG_RW | 0.071 | 0.037 | 0.371 | 0.512 | 0.011 | 0.365 | 0.002 |
| DKL_HDZ | 0.069 | 0.035 | 0.370 | 0.466 | 0.026 | 0.427 | 0.014 |
| KMY_Anlst _Clbrtd | 0.067 | 0.034 | 0.364 | 0.456 | 0.005 | 0.026 | 0.003 |
| MPEG_Anlst _Clbrtd | 0.068 | 0.035 | 0.364 | 0.475 | 0.011 | 0.272 | 0.002 |
| GLS_Anlst _Clbrtd | 0.067 | 0.034 | 0.364 | 0.471 | 0.008 | 0.098 | 0.001 |
| HL_HDZ | 0.067 | 0.035 | 0.362 | 0.464 | 0.037 | 0.559 | 0.018 |
| DKL_Anlst _Clbrtd | 0.067 | 0.034 | 0.361 | 0.468 | 0.008 | 0.136 | 0.002 |
| HL_Anlst _Clbrtd | 0.067 | 0.035 | 0.360 | 0.468 | 0.009 | 0.162 | 0.002 |
| CT_Anlst _Clbrtd | 0.066 | 0.034 | 0.360 | 0.471 | 0.009 | 0.190 | 0.003 |
| FGHJ_Anlst _Clbrtd | 0.066 | 0.034 | 0.359 | 0.466 | 0.008 | 0.075 | 0.002 |
| GM_Anlst _Clbrtd | 0.066 | 0.035 | 0.358 | 0.466 | 0.010 | 0.230 | 0.002 |
| MPEG_RI | 0.064 | 0.033 | 0.355 | 0.479 | 0.062 | 0.700 | 0.022 |
| HL_EP_Clbrtd | 0.066 | 0.035 | 0.353 | 0.485 | 0.036 | 0.670 | 0.015 |
| FGHJ_Anlst | 0.065 | 0.034 | 0.352 | 0.469 | 0.019 | 0.527 | 0.005 |
| DKL_EP_Clbrtd | 0.065 | 0.035 | 0.348 | 0.486 | 0.042 | 0.766 | 0.016 |
| WNG_RI | 0.078 | 0.051 | 0.346 | 0.943 | 0.501 | 0.961 | 0.450 |
| BP_RI_Clbrtd | 0.068 | 0.039 | 0.346 | 0.544 | 0.211 | 0.924 | 0.173 |
| KMY_RI_Clbrtd | 0.066 | 0.037 | 0.343 | 0.557 | 0.136 | 0.932 | 0.066 |
| TrOHE_25SBM | 0.079 | 0.054 | 0.343 | 1.157 | 0.296 | 0.964 | 0.237 |
| FPM_Anlst_Clbrtd | 0.064 | 0.035 | 0.342 | 0.465 | 0.031 | 0.861 | 0.006 |
| KMY_EP_Clbrtd | 0.065 | 0.036 | 0.340 | 0.506 | 0.070 | 0.945 | 0.018 |
| MPEG_EP | 0.061 | 0.032 | 0.339 | 0.490 | 0.053 | 0.957 | 0.010 |
| DKL_Anlst | 0.062 | 0.034 | 0.339 | 0.463 | 0.039 | 0.939 | 0.007 |

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Table 114 : ICC Timing Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| PE_Anlst | 0.065 | 0.037 | 0.339 | 0.491 | 0.114 | 0.977 | 0.048 |
| VT | 0.061 | 0.033 | 0.337 | 0.450 | 0.013 | 1.000 | 0.006 |
| MPEG_HDZ | 0.062 | 0.034 | 0.337 | 0.460 | 0.095 | 0.998 | 0.045 |
| KMY_RW_Clbrtd | 0.062 | 0.034 | 0.337 | 0.480 | 0.019 | 0.978 | 0.005 |
| TrES_Anlst_10Ind | 0.067 | 0.039 | 0.336 | 0.720 | 0.278 | 0.996 | 0.274 |
| PEG_EP | 0.062 | 0.034 | 0.336 | 0.556 | 0.199 | 0.990 | 0.088 |
| DKL_RW_Clbrtd | 0.061 | 0.034 | 0.334 | 0.484 | 0.021 | 0.850 | 0.006 |
| HL_RW_Clbrtd | 0.061 | 0.034 | 0.334 | 0.483 | 0.022 | 0.817 | 0.007 |
| HL_Anlst | 0.061 | 0.033 | 0.334 | 0.463 | 0.051 | 0.892 | 0.008 |
| DKL_RI_Clbrtd | 0.062 | 0.035 | 0.334 | 0.526 | 0.105 | 0.954 | 0.062 |
| PEG_Anlst _Clbrtd | 0.064 | 0.037 | 0.333 | 0.494 | 0.074 | 0.931 | 0.013 |
| GG_Anlst_Clbrtd | 0.062 | 0.034 | 0.333 | 0.458 | 0.024 | 0.766 | 0.004 |
| KMY_Anlst | 0.062 | 0.034 | 0.333 | 0.459 | 0.032 | 0.821 | 0.003 |
| GG_Anlst | 0.062 | 0.035 | 0.333 | 0.461 | 0.028 | 0.815 | 0.003 |
| PEG_HDZ | 0.061 | 0.034 | 0.331 | 0.462 | 0.113 | 0.890 | 0.048 |
| GG_RI_Clbrtd | 0.075 | 0.052 | 0.330 | 0.604 | 0.460 | 0.963 | 0.390 |
| GM_RI | 0.059 | 0.033 | 0.328 | 0.476 | 0.178 | 0.875 | 0.068 |
| FPM_HDZ_Clbrtd | 0.063 | 0.037 | 0.327 | 0.488 | 0.139 | 0.822 | 0.060 |
| FPM_Anlst | 0.059 | 0.033 | 0.324 | 0.466 | 0.051 | 0.463 | 0.012 |
| CT_Anlst | 0.060 | 0.034 | 0.324 | 0.465 | 0.069 | 0.612 | 0.017 |
| TrES_HDZ_10Ind | 0.059 | 0.034 | 0.323 | 0.677 | 0.422 | 0.911 | 0.343 |
| PEG_Anlst | 0.059 | 0.034 | 0.323 | 0.479 | 0.101 | 0.696 | 0.014 |
| WNG_Anlst | 0.169 | 0.276 | 0.322 | 1.854 | 0.486 | 0.708 | 0.479 |
| GM_RW_Clbrtd | 0.062 | 0.037 | 0.321 | 0.655 | 0.223 | 0.826 | 0.160 |
| GM_Anlst | 0.058 | 0.033 | 0.319 | 0.458 | 0.089 | 0.490 | 0.015 |
| MPEG_Anlst | 0.058 | 0.034 | 0.318 | 0.469 | 0.108 | 0.576 | 0.022 |
| BP_RW_Clbrtd | 0.074 | 0.054 | 0.317 | 0.653 | 0.435 | 0.868 | 0.334 |
| FPM_RI_Clbrtd | 0.063 | 0.041 | 0.315 | 0.527 | 0.273 | 0.801 | 0.192 |
| GLS_RW_Clbrtd | 0.058 | 0.034 | 0.314 | 0.497 | 0.079 | 0.477 | 0.017 |
| PE_EP_Clbrtd | 0.060 | 0.037 | 0.312 | 0.468 | 0.453 | 0.833 | 0.386 |
| MPEG_RI_Clbrtd | 0.058 | 0.034 | 0.311 | 0.479 | 0.298 | 0.748 | 0.166 |
| GLS_RW | 0.061 | 0.039 | 0.310 | 0.613 | 0.209 | 0.662 | 0.129 |

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Table 114 : ICC Timing Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | 1/N |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HL_RI_Clbrtd | 0.058 | 0.035 | 0.310 | 0.515 | 0.172 | 0.622 | 0.100 |
| CT_EP_Clbrtd | 0.058 | 0.035 | 0.309 | 0.506 | 0.173 | 0.547 | 0.093 |
| GG_EP | 0.051 | 0.028 | 0.308 | 0.528 | 0.513 | 0.828 | 0.450 |
| FPM_HDZ | 0.055 | 0.033 | 0.305 | 0.467 | 0.206 | 0.458 | 0.105 |
| GM_EP_Clbrtd | 0.056 | 0.035 | 0.301 | 0.482 | 0.341 | 0.655 | 0.245 |
| FGHJ_RI_Clbrtd | 0.057 | 0.036 | 0.301 | 0.529 | 0.158 | 0.455 | 0.118 |
| FPM_RW_Clbrtd | 0.064 | 0.045 | 0.301 | 0.568 | 0.498 | 0.762 | 0.444 |
| TrES_RW_10Ind | 0.063 | 0.044 | 0.300 | 0.643 | 0.644 | 0.846 | 0.606 |
| MPEG_RW_Clbrtd | 0.056 | 0.036 | 0.298 | 0.637 | 0.299 | 0.570 | 0.257 |
| PEG_RW_Clbrtd | 0.055 | 0.035 | 0.291 | 0.523 | 0.282 | 0.367 | 0.203 |
| TrOHE_10Ind | 0.051 | 0.032 | 0.287 | 0.626 | 0.610 | 0.709 | 0.533 |
| GM_HDZ | 0.053 | 0.034 | 0.287 | 0.459 | 0.381 | 0.396 | 0.243 |
| GM_EP | 0.052 | 0.033 | 0.286 | 0.487 | 0.330 | 0.314 | 0.112 |
| FGHJ_RW | 0.054 | 0.037 | 0.284 | 0.592 | 0.356 | 0.384 | 0.247 |
| TrETSS_Anlst _25SBM | 0.051 | 0.033 | 0.281 | 0.826 | 0.475 | 0.560 | 0.462 |
| PEG_RI | 0.052 | 0.034 | 0.279 | 0.516 | 0.429 | 0.356 | 0.242 |
| FPM_EP | 0.051 | 0.034 | 0.274 | 0.544 | 0.418 | 0.283 | 0.311 |
| FGHJ_RW_Clbrtd | 0.053 | 0.039 | 0.272 | 0.554 | 0.555 | 0.460 | 0.372 |
| CT_RW_Clbrtd | 0.046 | 0.031 | 0.262 | 0.544 | 0.728 | 0.575 | 0.686 |
| FPM_EP_Clbrtd | 0.049 | 0.035 | 0.260 | 0.491 | 0.470 | 0.136 | 0.275 |
| WNG_EP | 0.058 | 0.049 | 0.260 | 0.985 | 0.711 | 0.504 | 0.650 |
| TrETSS_Anlst _10Ind | 0.046 | 0.038 | 0.239 | 0.611 | 0.792 | 0.312 | 0.726 |
| PEG_EP_Clbrtd | 0.041 | 0.030 | 0.236 | 0.456 | 0.860 | 0.421 | 0.810 |
| TrES_EP_25SBM | 0.047 | 0.040 | 0.235 | 1.086 | 0.887 | 0.534 | 0.850 |
| TrES_Anlst_25SBM | 0.049 | 0.044 | 0.233 | 1.085 | 0.848 | 0.307 | 0.770 |
| TrES_RW_25SBM | 0.044 | 0.038 | 0.226 | 0.929 | 0.949 | 0.596 | 0.923 |
| MPEG_EP_Clbrtd | 0.039 | 0.030 | 0.225 | 0.459 | 0.924 | 0.375 | 0.870 |
| RRT | 0.041 | 0.038 | 0.212 | 0.466 | 1.000 | 0.013 | 0.918 |
| TrETSS_EP_25SBM | 0.044 | 0.043 | 0.212 | 0.721 | 0.997 | 0.208 | 0.947 |
| 1/N | 0.040 | 0.038 | 0.206 | 0.456 | 0.918 | 0.006 | 1.000 |
| TrETSS_EP_10Ind | 0.040 | 0.038 | 0.202 | 0.568 | 0.922 | 0.168 | 0.969 |
| GG_RW_Clbrtd | 0.031 | 0.025 | 0.195 | 0.403 | 0.932 | 0.466 | 0.956 |

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Table 114 : ICC Timing Portfolios - An Alternative Estimation Window, Continued

| Startegy | Mean | Var | Sharpe | Turnover | RRT | VT | $\mathbf{1 / N}$ |
| :--- | :---: | :---: | :--- | :--- | :--- | :--- | :--- |
| TrES_HDZ_25SBM | 0.038 | 0.037 | 0.194 | 1.142 | 0.904 | 0.304 | 0.928 |
| Carhart_Factor | 0.036 | 0.038 | 0.187 | 0.625 | 0.898 | 0.466 | 0.930 |
| WNG_HDZ | 0.035 | 0.037 | 0.184 | 0.690 | 0.882 | 0.420 | 0.906 |
| TrETSS_RI_25SBM | 0.036 | 0.042 | 0.177 | 0.732 | 0.757 | 0.157 | 0.800 |
| TrETSS_RW_10Ind | 0.038 | 0.046 | 0.177 | 0.609 | 0.825 | 0.335 | 0.855 |
| TrETSS_RI_10Ind | 0.034 | 0.037 | 0.175 | 0.541 | 0.812 | 0.314 | 0.845 |
| TrETSS_HDZ_25SBM | 0.030 | 0.037 | 0.157 | 0.804 | 0.668 | 0.128 | 0.667 |
| TrETSS_HDZ_10Ind | 0.026 | 0.031 | 0.145 | 0.526 | 0.660 | 0.203 | 0.678 |
| FPM_RW | 0.026 | 0.036 | 0.137 | 0.709 | 0.626 | 0.153 | 0.600 |
| 3FF_Factor | 0.033 | 0.062 | 0.133 | 0.508 | 0.736 | 0.391 | 0.754 |
| 5FF_Factor | 0.023 | 0.042 | 0.110 | 0.596 | 0.618 | 0.284 | 0.652 |
| PEG_RI_Clbrtd | 0.020 | 0.035 | 0.105 | 0.412 | 0.580 | 0.218 | 0.579 |
| TrES_RI_10Ind | 0.019 | 0.033 | 0.103 | 0.677 | 0.505 | 0.135 | 0.515 |
| WNG_RW | 0.010 | 0.056 | 0.041 | 0.813 | 0.314 | 0.092 | 0.334 |
| PE_RI_Clbrtd | 0.007 | 0.033 | 0.038 | 0.434 | 0.217 | 0.029 | 0.203 |
| TrETSS_RW_25SBM | 0.005 | 0.042 | 0.022 | 0.691 | 0.131 | 0.013 | 0.090 |
| PE_RW_Clbrtd | 0.002 | 0.036 | 0.010 | 0.202 | 0.444 | 0.221 | 0.465 |

This table report the out-of-sample results of the market timing portfolio using ICC ex-ante expected return estimates, as well as other benchmark strategies using an alternative estimation window of 90 months. For each portfolio strategy, the Mean column contains the annualised average monthly excess return, the Var column contains the annualised average return variance, the Sharpe column contains the annualised average Sharpe ratio, the Turnover column contains the average monthly turnover, the RRT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the conventional Reward-to-Risk Timing (RRT) portfolio is zero, the $1 / \mathrm{N}$ column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the $1 / \mathrm{N}$ portfolio is zero, the VT column contains the p-value for the hypothesis test that the difference of the Sharpe ratio between the corresponding portfolio and the Volatility Timing (VT) portfolio is zero. P-values were computed using the Ledoit and Wolf (2008) non-parametric bootstrap method with a block size of 10 and 5,000 replications. The historical window used for computing the covariance matrix, and the first moment for the portfolios is 60 months. The covariance matrix is Ledoit and Wolf (2004) estimator.

# Appendix C The Effects of Risk Similarities on Mergers and Acquisitions 

C. 1 Unbounded ICC Estimates

Table 115: Merger Pairs and ICC Similarity

|  | Industry, Size, Year Match <br> (1) <br> (2) |  |  | Industry, Size, B/M, Year Match <br> (3) <br> (4) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | 2.129 | 2.123 | *** | 1.986 | 1.994 | *** |
|  | (14.016) | (10.621) |  | (13.223) | (10.184) |  |
| Same_State_Indicator |  | 1.792 | *** |  | 1.594 | *** |
|  |  | (14.447) |  |  | (13.045) |  |
| Target_BM |  | -0.015 | *** |  |  |  |
|  |  | (-4.412) |  |  |  |  |
| Target_Cash |  | -0.070 |  |  | -0.028 |  |
|  |  | (-0.332) |  |  | (-0.131) |  |
| Target_HHI |  | -5.528 | *** |  | -5.538 | *** |
|  |  | (-34.583) |  |  | (-34.731) |  |
| Target_Leverage |  | 0.294 | ** |  | 0.463 | *** |
|  |  | (2.065) |  |  | (3.084) |  |
| Target_RD_to_Asset |  | 1.624 | *** |  | 1.359 | *** |
|  |  | (5.197) |  |  | (4.577) |  |
| Target_ROA |  | 0.250 | ** |  | 0.094 |  |
|  |  | (2.489) |  |  | (0.863) |  |
| Target_Sales_Growth |  | -0.218 | ** |  | -0.255 | *** |
|  |  | (-3.57) |  |  | (-3.756) |  |
| Acquirer_BM |  | -0.022 | *** |  |  |  |
|  |  | (-3.639) |  |  |  |  |
| Acquirer_Cash |  | -1.019 | *** |  | -0.785 | ** |
|  |  | (-3.079) |  |  | (-2.402) |  |
| Acquirer_HHI |  | -53.706 | *** |  | - 53.829 | ** |
|  |  | (-35.683) |  |  | (-35.648) |  |
| Acquirer_Leverage |  | 0.566 | ** |  | 0.682 | ** |
|  |  | (2.499) |  |  | (2.994) |  |
| Acquirer_RD_to_Asset |  | 1.493 | * |  | 1.409 |  |
|  |  | (1.757) |  |  | (1.489) |  |
| Acquirer_ROA |  | - 0.225 |  |  | -0.670 | *** |
|  |  | (-1.21) |  |  | (-2.847) |  |
| Acquirer_Sales_Growth |  | 0.880 | *** |  | 1.006 | ** |
|  |  | (6.455) |  |  | (7.784) |  |
| Deal Fixed Effect | Yes | Yes |  | Yes | Yes |  |
| SE Clustered at Actual Deal Level | Yes | Yes |  | Yes | Yes |  |
| No. Of Obs. | 16,203 | 16,203 |  | 16,203 | 16,203 |  |
| Pesudo R-squared | 0.031 | 0.863 |  | 0.029 | 0.863 |  |

The table reports results of conditional logit model of the likelihood of an observation being an actual (as opposed to hypothetical) merger on acquirer-target Implied Cost of Capital (ICC) similarity and other control variables. This table is identical to table (58) except that ICC estimates above 100 or below zero are not dropped. The dependent variable is a binary that takes the value of 1 if the observation is an actual merger deal, and the value of zero if the observation is a pseudo-firm pair from the control group. Following Bena and Li (2014) and Bereskin, Byun, Officer, and Oh (2018), for each actual deal, control group deals are formed by pairing the actual acquirer with up to 5 pseudo targets (identified by industry, year, and closest total assets to the actual target for the models 1 and 2; and matched by industry, year, and closest total assets and Book-to-Market ratio in models 3 and 4), and by pairing each actual target with up to 5 pseudo-acquirers using the same criteria. Constants are estimated but not reported. All specifications include deal fixed effects. All specification report $t$-statistics below coefficients based on standard errors clustered at the actual deal level.

Table 116: Likelihood of Deal Completion

|  | (1) |  | (2) |  | (3) |  | (4) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | $\begin{array}{r} 1.231 \\ (11.937) \end{array}$ | *** | $\begin{array}{r} 1.025 \\ (16.792) \end{array}$ | *** | $\begin{array}{r} 1.205 \\ (18.432) \end{array}$ | *** |  |  |
| High_ICC_Similarity_Indicator |  |  |  |  |  |  | $\begin{array}{r} 1.459 \\ (70.545) \end{array}$ | *** |
| Low_ICC_Similarity_Indicator |  |  |  |  |  |  | $\begin{array}{r} -0.185 \\ (-5.13) \end{array}$ | *** |
| Same_Industry_Indicator | $\begin{array}{r} 0.121 \\ (1.735) \end{array}$ | * | $\begin{gathered} 0.195 \\ (7.81) \end{gathered}$ | *** | $\begin{array}{r} 0.229 \\ (9.819) \end{array}$ | *** | $\begin{array}{r} 0.218 \\ (9.709) \end{array}$ | *** |
| Relative_Size | $\begin{gathered} -0.016 \\ (-0.291) \end{gathered}$ |  | $\begin{gathered} -0.076 \\ (-1.713) \end{gathered}$ | * | $\begin{array}{r} -0.070 \\ (-1.883) \end{array}$ | * | $\begin{gathered} -0.069 \\ (-1.837) \end{gathered}$ | * |
| Tender_Offer_Indicator | $\begin{array}{r} 0.438 \\ (6.512) \end{array}$ | *** | $\begin{array}{r} 0.362 \\ (12.506) \end{array}$ | *** | $\begin{array}{r} 0.459 \\ (20.565) \end{array}$ | *** | $\begin{array}{r} 0.415 \\ (20.316) \end{array}$ | *** |
| All_Cash_Indicator | $\begin{array}{r} 0.224 \\ (3.353) \end{array}$ | *** | $\begin{gathered} -0.191 \\ (-7.646) \end{gathered}$ | *** | $\begin{array}{r} -0.257 \\ (-13.127) \end{array}$ | *** | $\begin{array}{r} -0.227 \\ (-11.487) \end{array}$ | *** |
| Same_State_Indicator | $\begin{array}{r} 0.009 \\ (0.054) \end{array}$ |  | $\begin{gathered} -0.040 \\ (-1.111) \end{gathered}$ |  | $\begin{gathered} -0.024 \\ (-0.878) \end{gathered}$ |  | $\begin{array}{r} -0.012 \\ (-0.48) \end{array}$ |  |
| High_Tech_Indicator | $\begin{gathered} 0.199 \\ (2.65) \end{gathered}$ | *** | $\begin{array}{r} 0.241 \\ (8.676) \end{array}$ | *** | $\begin{array}{r} 0.206 \\ (9.767) \end{array}$ | *** | $\begin{array}{r} 0.176 \\ (8.597) \end{array}$ | *** |
| Acquirer and Target Controls | No |  | Yes |  | Yes |  | Yes |  |
| Year Fixed Effect | No |  | No |  | Yes |  | Yes |  |
| No. Of Obs. | 2,434 |  | 2,434 |  | 2,434 |  | 2,434 |  |
| Pesudo R-squared | 0.026 |  | 0.123 |  | 0.158 |  | 0.178 |  |

The table reports the likelihood of the deal completion using Logit model. This table is identical to table (59) except that ICC estimates above 100 or below zero are not dropped. The main sample of completed deals have been expanded to include announced but uncompleted transactions using the same filter criteria used to generate the main sample in terms of ownership percentages, deal value, and other characteristics. The dependent variable equals 1 if the deal is completed, and 0 if the deal is withdrawn. The acquirer and target controls (suppressed coefficients) are RD/Assets, Size, Cash and Short-term investments/Assets, and Book-toMarket ratio. Constant terms are estimated but not reported. t-statistics based on standard errors clustered by industry group are reported below coefficients.

Table 117: Duration of Deal Completion

|  | (1) |  | $\mathbf{( 2 )}$ |  | (3) |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| High_ICC_Similarity_Indicator | 0.347 | $* * *$ | 0.343 | $* * *$ | 0.323 | $* * *$ |
|  | $(8.509)$ |  | $(4.255)$ |  | $(3.232)$ |  |
| Low_ICC_Similarity_Indicator | -0.191 | $* * *$ | -0.199 | $* * *$ | -0.197 |  |
|  | $(-5.698)$ |  | $(-2.841)$ |  | $(-0.626)$ |  |
| Same_State_Indicator | -0.100 | $*$ | -0.108 |  | -0.119 |  |
|  | $(-1.672)$ |  | $(-0.954)$ |  | $(-1.251)$ |  |
| Relative_Size | -0.021 | $* * *$ | -0.036 | $* * *$ | -0.029 |  |
|  | $(-4.253)$ |  | $(-2.83)$ |  | $(-0.536)$ |  |
| Tender_Offer_Indicator | 0.665 | $* * *$ | 0.657 | $* * *$ | 0.722 | $*$ |
|  | $(7.767)$ |  | $(7.624)$ |  | $(1.787)$ |  |
| All_Cash_Indicator | 0.477 | $* * *$ | 0.407 | $* * *$ | 0.393 | $* * *$ |
|  | $(9.195)$ |  | $(5.514)$ |  | $(4.987)$ |  |
| Same_Industry_Indicator | -0.206 | $* * *$ | -0.160 | $* * *$ | -0.166 |  |
|  | $(-7.813)$ |  | $(-2.662)$ |  | $(-0.943)$ |  |
| High_Tech_Indicator | 0.293 | $* * *$ | 0.151 | $* * *$ | 0.153 |  |
|  | $(3.782)$ |  | $(3.422)$ |  | $(1.144)$ |  |
| Acquirer and Target Controls | No |  | Yes |  | Yes |  |
| Year Fixed Effect | No |  | No |  | Yes |  |
| No. of Observations | 1925 |  | 1925 |  | 1925 |  |

The table reports the hazard ratio of deal completion time estimated using Cox proportional hazard model. This table is identical to table (60) except that ICC estimates above 100 or below zero are not dropped. The dependent variable is the number of days between the announcement date and the effective date of a deal and is measured for completed deals only. The acquirer and target controls (suppressed coefficients) are RD/Assets, Size, Cash and Short-term investments/Assets, and Book-to-Market ratio. Constant terms are estimated but not reported. Statistics based on standard errors clustered by industry group are reported below coefficients.

Table 118: Combined Announcement Returns

|  | (1) |  | (2) |  | (3) |  | (4) |  | (5) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | $\begin{array}{r} \hline 0.013 \\ (1.988) \end{array}$ | ** | $\begin{array}{r} \hline 0.014 \\ (2.106) \end{array}$ | ** |  |  | $\begin{array}{r} \hline 0.013 \\ (1.988) \end{array}$ | ** | $\begin{array}{r} \hline 0.014 \\ (2.235) \end{array}$ | ** |
| High_ICC_Similarity_Indicator |  |  |  |  | $\begin{array}{r} 0.003 \\ (0.403) \end{array}$ |  |  |  |  |  |
| Low_ICC_Similarity_Indicator |  |  |  |  | $\begin{gathered} -0.001 \\ (-0.213) \end{gathered}$ |  |  |  |  |  |
| Same_Industry_Indicator | $\begin{array}{r} 0.000 \\ (-0.123) \end{array}$ |  | $\begin{array}{r} 0.001 \\ (-0.269) \end{array}$ |  | $\begin{gathered} -0.001 \\ (-0.056) \end{gathered}$ |  | $\begin{gathered} -0.001 \\ (-0.145) \end{gathered}$ |  | $\begin{array}{r} -0.001 \\ (-0.137) \end{array}$ |  |
| Same_State_Indicator | $\begin{array}{r} 0.005 \\ (1.279) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.037) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.226) \end{array}$ |  | $\begin{array}{r} 0.005 \\ (1.311) \end{array}$ |  | $\begin{array}{r} 0.005 \\ (1.249) \end{array}$ |  |
| High_Tech_Indicator | $\begin{array}{r} -0.006 \\ (-0.963) \end{array}$ |  | $\begin{array}{r} -0.010 \\ (-2.573) \end{array}$ | ** | $\begin{array}{r} -0.006 \\ (-1.001) \end{array}$ |  | $\begin{gathered} -0.006 \\ (-0.982) \end{gathered}$ |  | $\begin{array}{r} -0.005 \\ (-0.867) \end{array}$ |  |
| Relative_Size | $\begin{gathered} 0.008 \\ (2.17) \end{gathered}$ | ** | $\begin{array}{r} 0.008 \\ (2.063) \end{array}$ | ** | $\begin{array}{r} 0.008 \\ (2.168) \end{array}$ | ** | $\begin{array}{r} 0.008 \\ (2.207) \end{array}$ | ** | $\begin{array}{r} 0.008 \\ (2.022) \end{array}$ | ** |
| All_Cash_Indicator | $\begin{array}{r} 0.019 \\ (4.044) \end{array}$ | *** | $\begin{array}{r} 0.019 \\ (3.935) \end{array}$ | *** | $\begin{array}{r} 0.018 \\ (4.006) \end{array}$ | *** | $\begin{array}{r} 0.019 \\ (4.225) \end{array}$ | *** | $\begin{array}{r} 0.019 \\ (4.053) \end{array}$ | *** |
| Tender_Offer_Indicator | $\begin{array}{r} 0.004 \\ (0.799) \end{array}$ |  | $\begin{array}{r} 0.005 \\ (0.877) \end{array}$ |  | $\begin{array}{r} 0.005 \\ (0.862) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.808) \end{array}$ |  | $\begin{array}{r} 0.005 \\ (0.732) \end{array}$ |  |
| Total_Size | $\begin{gathered} -0.007 \\ (-5.711) \end{gathered}$ | *** | $\begin{gathered} -0.007 \\ (-4.983) \end{gathered}$ | *** | $\begin{gathered} -0.007 \\ (-5.563) \end{gathered}$ | ** | $\begin{gathered} -0.007 \\ (-6.664) \end{gathered}$ | ** | $\begin{array}{r} -0.006 \\ (-3.673) \end{array}$ | *** |
| Book_To_Market | $\begin{array}{r} 0.000 \\ (2.611) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.757) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.631) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.685) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.714) \end{array}$ | *** |
| Leverage | $\begin{array}{r} 0.022 \\ (1.588) \end{array}$ |  | $\begin{array}{r} 0.026 \\ (1.687) \end{array}$ | * | $\begin{array}{r} 0.021 \\ (1.519) \end{array}$ |  | $\begin{array}{r} 0.021 \\ (1.6) \end{array}$ |  | $\begin{array}{r} 0.021 \\ (1.601) \end{array}$ |  |
| Cash | $\begin{array}{r} 0.001 \\ (0.031) \end{array}$ |  | $\begin{gathered} -0.014 \\ (-0.367) \end{gathered}$ |  | $\begin{array}{r} 0.002 \\ (0.047) \end{array}$ |  | $\begin{array}{r} 0.002 \\ (0.041) \end{array}$ |  | $\begin{array}{r} 0.000 \\ (-0.001) \end{array}$ |  |
| Merger_Pair_likelihood_Inverse_Mill_ratio |  |  |  |  |  |  | $\begin{aligned} & 0.003 \\ & (0.18) \end{aligned}$ |  |  |  |
| Completion_likelihood_Inverse_Mill_ratio |  |  |  |  |  |  |  |  | $\begin{array}{r} 0.022 \\ (0.284) \end{array}$ |  |
| Year Fixed Effect | Yes |  | Yes |  | Yes |  | Yes |  | Yes |  |
| Industry Fixed Effect | No |  | Yes |  | Yes |  | Yes |  | Yes |  |
| No. of Observations | 1925 |  | 1925 |  | 1925 |  | 1925 |  | 1925 |  |
| R-Square | 0.295 |  | 0.292 |  | 0.294 |  | 0.294 |  | 0.294 |  |

The table reports $[-3,+3] 7$-day cumulative abnormal returns (CAR) around merger announcement of actual deals regression on ICC similarity between the merger pairs and other control variables. This table is identical to table (61) except that ICC estimates above 100 or below zero are not dropped. The t-statistics reported below coefficients are based on industry clustered standard errors. Models 4 and 5 present the results using Heckman's two stage self-selection correction, where the inverse Mills ratio is based on merger-pair likelihood and merger-completion likelihood.

Table 119: Abnormal Operating Performance

|  | (1) |  |  |  | (2) |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | High_Similarity |  | Low_Similarity |  | High_Similarity |  | Low_Similarity |  |
| Constant | 0.004 | *** | 0.008 |  | 0.038 | *** | -0.022 |  |
|  | (2.839) |  | (1.775) |  | (3.110) |  | (-1.349) |  |
| Abnormal_PreMerger_ROA | 0.475 | *** | 0.555 | *** | 0.316 | ** | 0.624 | *** |
|  | (7.864) |  | (8.775) |  | (2.301) |  | (6.980) |  |
| Same_Industry_Indicator |  |  |  |  | -0.022 | * | 0.034 | ** |
|  |  |  |  |  | (-1.819) |  | (1.980) |  |
| Same_State_Indicator |  |  |  |  | -0.001 |  | -0.002 |  |
|  |  |  |  |  | (-0.090) |  | (-0.146) |  |
| Relative_Size |  |  |  |  | -0.016 | * | 0.001 |  |
|  |  |  |  |  | (-1.787) |  | (0.753) |  |
| High_Tech_Indicator |  |  |  |  | -0.020 |  | -0.034 |  |
|  |  |  |  |  | (-1.276) |  | (-1.531) |  |
| Adjusted_R2 | 0.294 |  | 0.381 |  | 0.226 |  | 0.521 |  |
| No. of Observations | 481 |  | 482 |  | 481 |  | 482 |  |

The table reports the OLS regression results explaining industry-adjusted (abnormal) post-merger operating performance as defined in Healy, Palepu, and Ruback (1992). This table is identical to table (62) except that ICC estimates above 100 or below zero are not dropped. Operating profitability is defined as EBITDA scaled by the market value of the company assets. The abnormal operating performance is calculated as the company operating profitability minus the industry median performance. The post-merger abnormal operating performance over the 3 post-merger years is regressed against a synthetic pre-merger abnormal operating performance - that is computed as a value-weighted average of the target's and the acquirer's operating performance in the year before the merger- and a list of relevant pair-controls. The intercept is therefore is the post-merger operating performance independent of pre-merger performance. The regression is estimated separately for the top quartile of ICC similarity, and the bottom quartile of ICC similarity. $t$-statistics using robust standard errors are reported below coefficients in parentheses.

Table 120: Post-Acquisition Goodwill Write-offs

|  | (1) | (2) |  |
| :--- | ---: | ---: | :--- |
| ICC_Similarity | -0.028 |  |  |
|  | $(-0.274)$ |  |  |
| High_ICC_Similarity_Indicator |  | -0.169 | $* *$ |
|  |  | $(-2.498)$ |  |
| Low_ICC_Similarity_Indicator |  | -0.087 |  |
|  |  | $(-1.207)$ |  |
| Relative_PE_Ratio | 0.000 | 0.000 |  |
|  | $(0.628)$ | $(0.888)$ |  |
| Goodwill_Prct | 0.000 | 0.000 |  |
|  | $(0.588)$ | $(0.729)$ |  |
| Relative_Size | 0.161 | $* * *$ | 0.177 |
|  | $(2.618)$ | $(2.858)$ |  |
| Ln_Market_Value | -0.027 | $*$ | -0.028 |
|  | $(-1.712)$ | $(-1.761)$ |  |
| Stock_Prct | 0.067 | 0.048 |  |
|  | $(0.821)$ | $(0.595)$ |  |
| Year Fixed Effect | Yes | Yes |  |
| Industry Fixed Effect | Yes | Yes |  |
| Pesudo-R2 | 0.249 | 0.248 |  |
| No. of Observations | 807 | 807 |  |

The table reports a Tobit regression results of post-acquisitions goodwill write-offs by acquiring firms on ICC similarity index and control variables as in Gu and Lev (2011) and Bereskin, Byun, Officer, and Oh (2018). This table is identical to table (63) except that ICC estimates above 100 or below zero are not dropped. The sample is restricted to acquirers with only one acquisition in 7 years window centred on the acquisition announcement date to ensure that any write-offs are attributable to the acquisitions under consideration. The dependent variable is measured as goodwill write-offs in the 3 years following the acquisition scaled by total assets from the year before the acquisition. Constant terms are estimated but not reported. The t-statistics under each coefficient is based on robust standard errors. Tobit models is used due to fact that the dependent variable have a lower bound of zero.

## C. 2 CAR Estimation Period

Table 121: Combined Announcement Returns, 3 Days Estimation Period

|  | (1) |  | (2) |  | (3) |  | (4) |  | (5) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | $\begin{array}{r} \hline 0.026 \\ (2.836) \end{array}$ | *** | $\begin{array}{r} \hline 0.022 \\ (2.278) \end{array}$ | ** |  |  | $\begin{array}{r} \hline 0.026 \\ (2.850) \end{array}$ | *** | $\begin{array}{r} \hline \hline 0.029 \\ (2.411) \end{array}$ | ** |
| High_ICC_Similarity_Indicator |  |  |  |  | $\begin{array}{r} 0.001 \\ (0.095) \end{array}$ |  |  |  |  |  |
| Low_ICC_Similarity_Indicator |  |  |  |  | $\begin{gathered} -0.003 \\ (-0.651) \end{gathered}$ |  |  |  |  |  |
| Same_Industry_Indicator | $\begin{array}{r} 0.004 \\ (0.785) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.772) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.842) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.769) \end{array}$ |  | $\begin{array}{r} 0.003 \\ (0.743) \end{array}$ |  |
| Same_State_Indicator | $\begin{array}{r} 0.004 \\ (1.209) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.042) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.223) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.196) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.287) \end{array}$ |  |
| High_Tech_Indicator | $\begin{gathered} -0.009 \\ (-2.234) \end{gathered}$ | ** | $\begin{gathered} -0.012 \\ (-2.686) \end{gathered}$ | *** | $\begin{gathered} -0.009 \\ (-2.107) \end{gathered}$ | ** | $\begin{gathered} -0.009 \\ (-2.267) \end{gathered}$ | ** | $\begin{gathered} -0.009 \\ (-1.94) \end{gathered}$ | * |
| Relative_Size | $\begin{array}{r} 0.007 \\ (1.554) \end{array}$ |  | $\begin{array}{r} 0.006 \\ (1.462) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.531) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.562) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.479) \end{array}$ |  |
| All_Cash_Indicator | $\begin{array}{r} 0.015 \\ (2.988) \end{array}$ | *** | $\begin{array}{r} 0.016 \\ (3.141) \end{array}$ | *** | $\begin{array}{r} 0.015 \\ (2.957) \end{array}$ | *** | $\begin{array}{r} 0.015 \\ (2.989) \end{array}$ | *** | $\begin{array}{r} 0.016 \\ (3.030) \end{array}$ | *** |
| Tender_Offer_Indicator | $\begin{array}{r} 0.007 \\ (1.308) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.289) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.348) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.321) \end{array}$ |  | $\begin{array}{r} 0.008 \\ (1.272) \end{array}$ |  |
| Total_Size | $\begin{gathered} -0.008 \\ (-6.649) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-6.735) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-6.695) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-7.057) \end{gathered}$ | *** | $\begin{gathered} -0.007 \\ (-6.764) \end{gathered}$ | *** |
| Book_To_Market | $\begin{array}{r} 0.000 \\ (2.499) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.618) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.525) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.531) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.449) \end{array}$ | ** |
| Leverage | $\begin{array}{r} 0.025 \\ (1.620) \end{array}$ |  | $\begin{array}{r} 0.027 \\ (1.576) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.561) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.636) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.628) \end{array}$ |  |
| Cash | $\begin{array}{r} 0.030 \\ (0.577) \end{array}$ |  | $\begin{array}{r} 0.014 \\ (0.338) \end{array}$ |  | $\begin{array}{r} 0.030 \\ (0.579) \end{array}$ |  | $\begin{array}{r} 0.030 \\ (0.587) \end{array}$ |  | $\begin{array}{r} 0.000 \\ (0.553) \end{array}$ |  |
| Merger_Pair_Liklihood_Inverse_Mills_ratio |  |  |  |  |  |  | $\begin{array}{r} 0.004 \\ (0.258) \end{array}$ |  |  |  |
| Completion_Liklihood_Inverse_Mills_ratio |  |  |  |  |  |  |  |  | $\begin{array}{r} 0.029 \\ (0.379) \end{array}$ |  |
| Year Fixed Effect | Yes |  | Yes |  | Yes |  | Yes |  | Yes |  |
| Industry Fixed Effect | No |  | Yes |  | Yes |  | Yes |  | Yes |  |
| No. of Observations | 1752 |  | 1752 |  | 1752 |  | 1752 |  | 1752 |  |
| R-Square | 0.320 |  | 0.317 |  | 0.319 |  | 0.319 |  | 0.319 |  |

The table reports [-1,+1] 3-day cumulative abnormal returns (CAR) around merger announcement of actual deals regression on ICC similarity between the merger pairs and other control variables. The t-statistics reported below coefficients are based on industry clustered standard errors. Models 4 and 5 present the results using Heckman's two stage self-selection correction, where the inverse Mills ratio is based on merger-pair likelihood and merger-completion likelihood.

Table 122: Combined Announcement Returns, 11 Days Estimation Period

|  | (1) |  | (2) |  | (3) |  | (4) |  | (5) |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ICC_Similarity | $\begin{array}{r} \hline 0.026 \\ (2.836) \end{array}$ | *** | $\begin{array}{r} \hline 0.022 \\ (2.278) \end{array}$ | ** |  |  | $\begin{array}{r} \hline 0.026 \\ (2.850) \end{array}$ | *** | $\begin{array}{r} \hline \hline 0.029 \\ (2.411) \end{array}$ | ** |
| High_ICC_Similarity_Indicator |  |  |  |  | $\begin{array}{r} 0.001 \\ (0.095) \end{array}$ |  |  |  |  |  |
| Low_ICC_Similarity_Indicator |  |  |  |  | $\begin{gathered} -0.003 \\ (-0.651) \end{gathered}$ |  |  |  |  |  |
| Same_Industry_Indicator | $\begin{array}{r} 0.004 \\ (0.785) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.772) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.842) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (0.769) \end{array}$ |  | $\begin{array}{r} 0.003 \\ (0.743) \end{array}$ |  |
| Same_State_Indicator | $\begin{array}{r} 0.004 \\ (1.209) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.042) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.223) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.196) \end{array}$ |  | $\begin{array}{r} 0.004 \\ (1.287) \end{array}$ |  |
| High_Tech_Indicator | $\begin{gathered} -0.009 \\ (-2.234) \end{gathered}$ | ** | $\begin{gathered} -0.012 \\ (-2.686) \end{gathered}$ | *** | $\begin{gathered} -0.009 \\ (-2.107) \end{gathered}$ | ** | $\begin{gathered} -0.009 \\ (-2.267) \end{gathered}$ | ** | $\begin{gathered} -0.009 \\ (-1.94) \end{gathered}$ | * |
| Relative_Size | $\begin{array}{r} 0.007 \\ (1.554) \end{array}$ |  | $\begin{array}{r} 0.006 \\ (1.462) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.531) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.562) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.479) \end{array}$ |  |
| All_Cash_Indicator | $\begin{array}{r} 0.015 \\ (2.988) \end{array}$ | *** | $\begin{array}{r} 0.016 \\ (3.141) \end{array}$ | *** | $\begin{array}{r} 0.015 \\ (2.957) \end{array}$ | *** | $\begin{array}{r} 0.015 \\ (2.989) \end{array}$ | *** | $\begin{array}{r} 0.016 \\ (3.030) \end{array}$ | *** |
| Tender_Offer_Indicator | $\begin{array}{r} 0.007 \\ (1.308) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.289) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.348) \end{array}$ |  | $\begin{array}{r} 0.007 \\ (1.321) \end{array}$ |  | $\begin{array}{r} 0.008 \\ (1.272) \end{array}$ |  |
| Total_Size | $\begin{gathered} -0.008 \\ (-6.649) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-6.735) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-6.695) \end{gathered}$ | *** | $\begin{gathered} -0.008 \\ (-7.057) \end{gathered}$ | *** | $\begin{gathered} -0.007 \\ (-6.764) \end{gathered}$ | *** |
| Book_To_Market | $\begin{array}{r} 0.000 \\ (2.499) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.618) \end{array}$ | *** | $\begin{array}{r} 0.000 \\ (2.525) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.531) \end{array}$ | ** | $\begin{array}{r} 0.000 \\ (2.449) \end{array}$ | ** |
| Leverage | $\begin{array}{r} 0.025 \\ (1.620) \end{array}$ |  | $\begin{array}{r} 0.027 \\ (1.576) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.561) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.636) \end{array}$ |  | $\begin{array}{r} 0.025 \\ (1.628) \end{array}$ |  |
| Cash | $\begin{array}{r} 0.030 \\ (0.577) \end{array}$ |  | $\begin{array}{r} 0.014 \\ (0.338) \end{array}$ |  | $\begin{array}{r} 0.030 \\ (0.579) \end{array}$ |  | $\begin{array}{r} 0.030 \\ (0.587) \end{array}$ |  | $\begin{array}{r} 0.000 \\ (0.553) \end{array}$ |  |
| Merger_Pair_Liklihood_Inverse_Mills_ratio |  |  |  |  |  |  | $\begin{array}{r} 0.004 \\ (0.258) \end{array}$ |  |  |  |
| Completion_Liklihood_Inverse_Mills_ratio |  |  |  |  |  |  |  |  | $\begin{array}{r} 0.029 \\ (0.379) \end{array}$ |  |
| Year Fixed Effect | Yes |  | Yes |  | Yes |  | Yes |  | Yes |  |
| Industry Fixed Effect | No |  | Yes |  | Yes |  | Yes |  | Yes |  |
| No. of Observations | 1752 |  | 1752 |  | 1752 |  | 1752 |  | 1752 |  |
| R-Square | 0.320 |  | 0.317 |  | 0.319 |  | 0.319 |  | 0.319 |  |

The table reports $[-5,+5]$ 11-day cumulative abnormal returns (CAR) around merger announcement of actual deals regression on ICC similarity between the merger pairs and other control variables. The t-statistics reported below coefficients are based on industry clustered standard errors. Models 4 and 5 present the results using Heckman's two stage self-selection correction, where the inverse Mills ratio is based on merger-pair likelihood and merger-completion likelihood.

## References

Andersson, Ola, 2008, On the role of patience in collusive Bertrand duopolies, Economics Letters, 100(1):60-63.

Angrist, Joshua D. and Jorn-Steffen Pischke. Mostly Harmless Econometrics: An Empiricistís Companion. NJ: Princeton University, Princeton, 2008.

Ardia, David and Kris Boudt, 2015, Implied Expected Returns and the Choice of a Mean-Variance Efficient Portfolio Proxy, The Journal of Portfolio Management, 41(4): 68-81.

Ashton, David and Pengguo Wang, 2013, Terminal valuations, growth rates and the implied cost of capital, Review of Accounting Studies, 18(1):261-290.

Barberis, Nicholas, 2000, Investing for the Long Run when Returns Are Predictable, The Journal of Finance, 55(1):225-264.

Barron, Orie E., David G. Harris, and Mary Stanford, 2005, Evidence That Investors Trade on Private Event-Period Information around Earnings Announcements, The Accounting Review, 80(2):403-421.

Barry, Christopher B., 1974, Portfolio Analysis Under Uncertain Means, Variances, and Covariances, The Journal of Finance, 29(2):515-522.

Bawa, Vijay S., Stephen J. Brown, and Roger W. Klein. Estimation risk and optimal portfolio choice. North-Holland Publ. Co., N.Y, 1979.

Bena, Jan and Kai Li, 2014, Corporate Innovations and Mergers and Acquisitions, The Journal of Finance, 69(5):1923-1960.

Bereskin, Fred, Seong K. Byun, Micah S. Officer, and Jong-Min Oh, 2018, The Effect of Cultural Similarity on Mergers and Acquisitions: Evidence from Corporate Social Responsibility, Journal of Financial and Quantitative Analysis, 53(05):1995-2039.

Best, Michael J. and Robert R. Grauer, 1992, Positively Weighted Minimum-Variance Portfolios and the Structure of Asset Expected Returns, The Journal of Financial and Quantitative Analysis, 27(4):513.

Bettinazzi, Emanuele LM, Danny Miller, Mario Daniele Amore, and Guido Corbetta, 2018, Ownership similarity in mergers and acquisitions target selection, Strategic Organization, pages 1-32.

Black, Fischer and Robert Litterman, 1992, Global Portfolio Optimization, Financial Analysts Journal, 48(5):28-43.

Bloom, Nicholas, Mark Schankerman, and John Van Reenen, 2013, Identifying Technology Spillovers and Product Market Rivalry, Econometrica, 81(4):1347-1393.

Botosan, Christine A, 1997, Summary Disclosure Level and the Cost of Equity Capital, The Accounting Review, 72(3):323-349.

Botosan, Christine A. and Marlene A. Plumlee, 2002, A Re-examination of Disclosure Level and the Expected Cost of Equity Capital, Journal of Accounting Research, 40(1):21-40.

Botosan, Christine A. and Marlene A. Plumlee, 2005, Assessing Alternative Proxies for the Expected Risk Premium, The Accounting Review, 80(1):21-53.

Botosan, Christine A., Marlene A. Plumlee, and HE Wen, 2011, The Relation between Expected Returns, Realized Returns, and Firm Risk Characteristics*, Contemporary Accounting Research, 28(4):1085-1122.

Boubaker, Sabri, Narjess Boubakri, Jocelyn Grira, and Asma Guizani, 2018, Sovereign wealth funds and equity pricing: Evidence from implied cost of equity of publicly traded targets, Journal of Corporate Finance, 53:202-224.

Boubakri, Narjess, Omrane Guedhami, and Dev Mishra, 2010, Family control and the implied cost of equity: Evidence before and after the Asian financial crisis, Journal of International Business Studies, 41(3):451-474.

Boubakri, Narjess, Omrane Guedhami, Dev Mishra, and Walid Saffar, 2012, Political connections and the cost of equity capital, Journal of Corporate Finance, 18(3):541-559.

Bradley, Michael, Anand Desai, and E.Han Kim, 1988, Synergistic gains from corporate acquisitions and their division between the stockholders of target and acquiring firms, Journal of Financial Economics, 21(1):3-40.

Bradshaw, Mark T., 2004, How Do Analysts Use Their Earnings Forecasts in Generating Stock Recommendations?, The Accounting Review, 79(1):25-50.

Butler, Kirt C. and Domingo Castelo Joaquin, 1998, A Note on Political Risk and the Required Return on Foreign Direct Investment, Journal of International Business Studies, 29(3):599-607.

Câmara, António, San-Lin Chung, and Yaw-Huei Wang, 2009, Option implied cost of equity and its properties, Journal of Futures Markets, 29(7):599-629.

Campbell, John Y., 1991, A Variance Decomposition for Stock Returns, Economic Journal, 101(405):157-79.

Campbell, John Y. and Robert J. Shiller, 1988, The Dividend-Price Ratio and Expectations of Future Dividends and Discount Factors, Review of Financial Studies, 1(3):195-228.

Carhart, Mark M., 1997, On Persistence in Mutual Fund Performance, The Journal of Finance, 52(1):57-82.

Carlson, Murray, Adlai Fisher, and Ron Giammarino, 2010, SEO Risk Dynamics, Review of Financial Studies, 23(11):4026-4077.

Chan, K.C., GA Karolyi, and RM Stulz, 1992, Global financial markets and the risk premium on US equity, Journal of Financial Economics, 32(2):137-167.

Chan, Louis K.C. and Josef Lakonishok, 1993, Are the Reports of Beta's Death Premature?, The Journal of Portfolio Management, 19(4):51-62.

Chava, Sudheer and Amiyatosh Purnanandam, 2010, Is Default Risk Negatively Related to Stock Returns?, Review of Financial Studies, 23(6):2523-2559.

Chen, Feiqiong and Yin Wang, 2014, Integration risk in cross-border M\&A based on internal and external resource: empirical evidence from China, Quality $\mathcal{E}$ Quantity, 48(1):281295.

Chen, Huafeng Jason, Marcin Kacperczyk, and Hernán Ortiz-Molina, 2011a, Labor Unions, Operating Flexibility, and the Cost of Equity, Journal of Financial and Quantitative Analysis, 46(01):25-58.

Chen, Kevin C. W., Zhihong Chen, and K. C. John Wei, 2011b, Agency Costs of Free Cash Flow and the Effect of Shareholder Rights on the Implied Cost of Equity Capital, Journal of Financial and Quantitative Analysis, 46(01):171-207.

Chen, Kevin C.W., Zhihong Chen, and K.C. John Wei, 2009, Legal protection of investors, corporate governance, and the cost of equity capital, Journal of Corporate Finance, 15 (3):273-289.

Chopra, Vijay Kumar, 1993, Improving optimization, The Journal of Investing, 2(3):51-59.

Claus, James and Jacob Thomas, 2001, Equity Premia as Low as Three Percent? Evidence from Analysts' Earnings Forecasts for Domestic and International Stock Markets, The Journal of Finance, 56(5):1629-1666.

Damodaran, Aswath. Investment valuation: Tools and techniques for determining the value of any asset. John Wiley \& Sons, New Jersey, 3 edition, 2012.

Daske, Holger, 2006, Economic Benefits of Adopting IFRS or US-GAAP - Have the Expected Cost of Equity Capital Really Decreased?, Journal of Business, Finance, and Accounting, 33(3-4):329-373.

Datta, Deepak K., 1991, Organizational fit and acquisition performance: Effects of postacquisition integration, Strategic Management Journal, 12(4):281-297.

De Roos, Nicolas, 2004, A model of collusion timing, International Journal of Industrial Organization, 22(3):351-387.

DeMiguel, Victor, Lorenzo Garlappi, and Raman Uppal, 2009, Optimal Versus Naive Diversification: How Inefficient is the $1 / \mathrm{N}$ Portfolio Strategy?, Review of Financial Studies, 22(5):1915-1953.

DeMiguel, Victor, Yuliya Plyakha, Raman Uppal, and Grigory Vilkov, 2013, Improving Portfolio Selection Using Option-Implied Volatility and Skewness, Journal of Financial and Quantitative Analysis, 48(06):1813-1845.

Deng, Xin, Jun-koo Kang, and Buen Sin Low, 2013, Corporate social responsibility and stakeholder value maximization: Evidence from mergers, Journal of Financial Economics, 110(1):87-109.

Dhaliwal, Dan, Linda Krull, and Oliver Zhen Li, 2007, Did the 2003 Tax Act reduce the cost of equity capital?, Journal of Accounting and Economics, 43(1):121-150.

Diebold, Francis X and Robert S Mariano, 1995, Comparing Predictive Accuracy, Journal of Business $\mathcal{E}$ Economic Statistics, 13:253-263.

Easton, Peter, 2001, Discussion of: "When Capital Follows Profitability: Non-linear Residual Income Dynamics", Review of Accounting Studies, 6(2/3):267-274.

Easton, Peter, 2006, Use of Forecasts of Earnings to Estimate and Compare Cost of Capital Across Regimes, Journal of Business, Finance, and Accounting, 33(3-4):374-394.

Easton, Peter, Gary Taylor, Pervin Shroff, and Theodore Sougiannis, 2002, Using Forecasts of Earnings to Simultaneously Estimate Growth and the Rate of Return on Equity Investment, Journal of Accounting Research, 40(3):657-676.

Easton, Peter D., 2004, PE Ratios, PEG Ratios, and Estimating the Implied Expected Rate of Return on Equity Capital, The Accounting Review, 79(1):73-95.

Easton, Peter D. and Steven J. Monahan, 2005, An Evaluation of Accounting Based Measures of Expected Returns, The Accounting Review, 80(2):501-538.

Easton, Peter D. and Steven J. Monahan, 2016, Review of Recent Research on Improving Earnings Forecasts and Evaluating Accounting-based Estimates of the Expected Rate of Return on Equity Capital, Abacus, 52(1):35-58.

Easton, Peter D. and Gregory A. Sommers, 2007, Effect of analysts' optimism on estimates of the expected rate of return implied by earnings forecasts, Journal of Accounting Research, 45(5):983-1015.

Easton, Peter D, Trevor S Harris, and James A Ohlson, 1992, Aggregate accounting earnings can explain most of security returns, Journal of Accounting and Economics, 15(2-3):119142.

Echterling, F., B. Eierle, and S. Ketterer, 2015, A review of the literature on methods of computing the implied cost of capital, International Review of Financial Analysis, 42: 235-252.

El Ghoul, Sadok, Omrane Guedhami, Chuck C.Y. Kwok, and Dev R. Mishra, 2011, Does corporate social responsibility affect the cost of capital?, Journal of Banking $\mathcal{E}$ Finance, 35(9):2388-2406.

El Ghoul, Sadok, Omrane Guedhami, Yang Ni, Jeffrey Pittman, and Samir Saadi, 2012, Does Religion Matter to Equity Pricing?, Journal of Business Ethics, 111(4):491-518.

Elton, Edwin J., 1999, Presidential Address: Expected Return, Realized Return, and Asset Pricing Tests, The Journal of Finance, 54(4):1199-1220.

Fama, Eugene F. and Kenneth R. French, 1993, Common risk factors in the returns on stocks and bonds, Journal of Financial Economics, 33(1):3-56.

Fama, Eugene F. and Kenneth R. French, 1997, Industry costs of equity, Journal of Financial Economics, 43(2):153-193.

Fama, Eugene F. and Kenneth R. French, 1998, Value versus Growth: The International Evidence, The Journal of Finance, 53(6):1975-1999.

Fama, Eugene F. and Kenneth R. French, 2002, The Equity Premium, Journal of Finance, 57(2):637-659.

Fama, Eugene F. and Kenneth R. French, 2015, A five-factor asset pricing model, Journal of Financial Economics, 116(1):1-22.

Fama, Eugene F. and James D. MacBeth, 1973, Risk, Return, and Equilibrium: Empirical Tests, Journal of Political Economy, 81(3):607-636.

Fan, Joseph P. H. and Vidhan K. Goyal, 2006, On the Patterns and Wealth Effects of Vertical Mergers, The Journal of Business, 79(2):877-902.

Feldman, M. L. and M. F. Spratt. Five frogs on a log: a CEO's field guide to accelerating the transition in mergers, acquisitions, and gut wrenching change. Wiley, Chichester, UK, 2001.

Fitzgerald, Tristan, Stephen Gray, Jason Hall, and Ravi Jeyaraj, 2013, Unconstrained estimates of the equity risk premium, Review of Accounting Studies, 18(2):560-639.

Foerster, Stephen R. and G. Andrew Karolyi, 1999, The Effects of Market Segmentation and Investor Recognition on Asset Prices: Evidence from Foreign Stocks Listing in the United States, The Journal of Finance, 54(3):981-1013.

Frank, Murray Z. and Tao Shen, 2016, Investment and the weighted average cost of capital, Journal of Financial Economics, 119(2):300-315.

Frost, PA and JE Savarino, 1988, For better performance: Constrain portfolio weights, The Journal of Portfolio Management, 15(1):29-34.

Garlappi, Lorenzo, Raman Uppal, and Tan Wang, 2007, Portfolio Selection with Parameter and Model Uncertainty: A Multi-Prior Approach, Review of Financial Studies, 20(1): 41-81.

Gebhardt, William R., Charles M. C. Lee, and Bhaskaran Swaminathan, 2001, Toward an Implied Cost of Capital, Journal of Accounting Research, 39(1):135-176.

Gerakos, Joseph J. and Robert B. Gramacy, 2013, Regression-Based Earnings Forecasts, Chicago Booth Research Paper, 12(26).

Gode, Dan and Partha Mohanram, 2003, Inferring the Cost of Capital Using the Ohlson Juettner Model, Review of Accounting Studies, 8(4):399-431.

Goldfarb, D. and G. Iyengar, 2003, Robust Portfolio Selection Problems, Mathematics of Operations Research, 28(1):1-38.

Gordon, Joseph R. and Myron J. Gordon, 1997, The Finite Horizon Expected Return Model, Financial Analysts Journal, 53(3):52-61.

Gordon, Myron. The investment, financing, and valuation of the corporation. R.D. Irwin, Homewood Ill., 1962.

Green, Jeremiah, John R. M. Hand, and X. Frank Zhang, 2013, The supraview of return predictive signals, Review of Accounting Studies, 18(3):692-730.

Griffin, John M., 2002, Are the Fama and French Factors Global or Country Specific?, Review of Financial Studies, 15(3):783-803.

Grinblatt, Mark S., Ronald W. Masulis, and Sheridan Titman, 1984, The valuation effects of stock splits and stock dividends, Journal of Financial Economics, 13(4):461-490.

Grossman, Sanford Jay, Joseph E. Stiglitz, Sanford Grossman, and Joseph Stiglitz, 1980, On the Impossibility of Informationally Efficient Markets, American Economic Review, 70(3):393-408.

Grullon, Gustavo, George Kanatas, and James P. Weston, 2004, Advertising, Breadth of Ownership, and Liquidity, Review of Financial Studies, 17(2):439-461.

Gu, Feng and Baruch Lev, 2011, Overpriced Shares, Ill-Advised Acquisitions, and Goodwill Impairment, The Accounting Review, 86(6):1995-2022.

Guay, Wayne, SP Kothari, and Susan Shu, 2011, Properties of implied cost of capital using analysts' forecasts, Australian Journal of Management, 36(2):125-149.

Guedhami, Omrane and Dev Mishra, 2009, Excess Control, Corporate Governance and Implied Cost of Equity: International Evidence, Financial Review, 44(4):489-524.

Gupta, Kartick, 2018, Environmental Sustainability and Implied Cost of Equity: International Evidence, Journal of Business Ethics, 147(2):343-365.

Hackbarth, Dirk and Erwan Morellec, 2008, Stock Returns in Mergers and Acquisitions, The Journal of Finance, 63(3):1213-1252.

Hail, Luzi and Christian Leuz, 2006, International Differences in the Cost of Equity Capital: Do Legal Institutions and Securities Regulation Matter?, Journal of Accounting Research, 44(3):485-531.

Hann, Rebecca N., Maria Ogneva, and Oguzhan Ozbas, 2013, Corporate Diversification and the Cost of Capital, The Journal of Finance, 68(5):1961-1999.

Hansen, Peter R., Asger Lunde, and James M. Nason, 2011, The Model Confidence Set, Econometrica, 79(2):453-497.

Harford, Jarrad, Dirk Jenter, and Kai Li, 2011, Institutional cross-holdings and their effect on acquisition decisions, Journal of Financial Economics, 99(1):27-39.

Harford, Jarrad, Mark Humphery-Jenner, and Ronan Powell, 2012, The sources of value destruction in acquisitions by entrenched managers, Journal of Financial Economics, 106 (2):247-261.

Harrington, Joseph E., 1989, International journal of industrial organization., Collusion among asymmetric firms: The case of different discount factors, 7(2):289-307.

Harrison, Jeffrey S., Michael A. Hitt, Robert E. Hoskisson, and R. Duane Ireland, 1991, Synergies and Post-Acquisition Performance: Differences versus Similarities in Resource Allocations, Journal of Management, 17(1):173-190.

Harvey, Campbell R., 1991, The World Price of Covariance Risk, The Journal of Finance, 46(1):111-157.

Harvey, David I., Stephen Leybourne, and Paul Newbold. International journal of forecasting., volume 13. Elsevier Science, 1997.

Healy, Paul M., Krishna G. Palepu, and Richard S. Ruback, 1992, Does corporate performance improve after mergers?, Journal of Financial Economics, 31(2):135-175.

Homburg, Christian and Matthias Bucerius, 2005, A Marketing Perspective on Mergers and Acquisitions: How Marketing Integration Affects Postmerger Performance, Journal of Marketing, 69(1):95-113.

Hong, Harrison and Jeffrey D. Kubik, 2003, Analyzing the Analysts: Career Concerns and Biased Earnings Forecasts, The Journal of Finance, 58(1):313-351.

Hong, Harrison, Jeffrey D. Kubik, and Amit Solomon, 2000, Security Analysts’ Career Concerns and Herding of Earnings Forecasts, The RAND Journal of Economics, 31(1): 121.

Hope, Ole-Kristian, Tony Kang, Wayne B. Thomas, and Yong Keun Yoo, 2009, Impact of Excess Auditor Remuneration on the Cost of Equity Capital around the World, Journal of Accounting, Auditing $\mathcal{E}$ Finance, 24(2):177-210.

Hou, Kewei, Mathijs A. Dijkvan , and Yinglei Zhang, 2012, The implied cost of capital: A new approach, Journal of Accounting and Economics, 53(3):504-526.

Ishii, Joy and Yuhai Xuan, 2014, Acquirer-target social ties and merger outcomes, Journal of Financial Economics, 112(3):344-363.

Jaffe, Adam B., 1986, Technological Opportunity and Spillovers of R\&D: Evidence from Firms' Patents, Profits and Market Value, NBER, 1815.

Jagannathan, Ravi and Tongshu Ma, 2003, Risk Reduction in Large Portfolios: Why Imposing the Wrong Constraints Helps, The Journal of Finance, 58(4):1651-1683.

Jobson, J. D. and B. Korkie, 1980, Estimation for Markowitz Efficient Portfolios, Journal of the American Statistical Association, 75(371):544-554.

Jorion, Philippe, 1985, International Portfolio Diversification with Estimation Risk, The Journal of Business, 58(3):259-278.

Jorion, Philippe, 1986, Bayes-Stein Estimation for Portfolio Analysis, The Journal of Financial and Quantitative Analysis, 21(3):279.

Kadlec, Gregory B. and John J. Mcconnell, 1994, The Effect of Market Segmentation and Illiquidity on Asset Prices: Evidence from Exchange Listings, The Journal of Finance, 49(2):611-636.

Kan, Raymond and Guofu Zhou, 2007, Optimal Portfolio Choice with Parameter Uncertainty, The Journal of Financial and Quantitative Analysis, 42(3):621-656.

Kandel, Shmuel and Robert F. Stambaugh, 1996, On the Predictability of Stock Returns: An Asset-Allocation Perspective, The Journal of Finance, 51(2):385-424.

Karolyi, G. Andrew and Rene M. Stulz, 2003, Are financial assets priced locally or globally?, Handbook of the Economics of Finance, 1, Part 2:975-1020.

Kirby, Chris and Barbara Ostdiek, 2012, It's All in the Timing: Simple Active Portfolio Strategies that Outperform Naïve Diversification, The Journal of Financial and Quantitative Analysis, 47:437-467.

Kostakis, Alexandros, Nikolaos Panigirtzoglou, and George Skiadopoulos, 2011, Market Timing with Option-Implied Distributions: A Forward-Looking Approach, Management Science, 57(7):1231-1249.

Kourtis, Apostolos, 2015, A Stability Approach to Mean-Variance Optimization, Financial Review, 50(3):301-330.

Kourtis, Apostolos, George Dotsis, and Raphael N. Markellos, 2012, Parameter uncertainty in portfolio selection: Shrinking the inverse covariance matrix, Journal of Banking and Finance, 36(9):2522-2531.

Kruger, Philipp, Augustin Landier, and David Thesmar, 2015, The WACC Fallacy: The Real Effects of Using a Unique Discount Rate, The Journal of Finance, 70(3):1253-1285.

Lakonishok, Josef. Is Beta Dead or Alive? In AIMR Conference Proceedings, Volume 1993, Issue 6, pages 38-41, New York, 1993. CFA Institute.

Lamoureux, Christopher G. and Percy Poon, 1987, The Market Reaction to Stock Splits, The Journal of Finance, 42(5):1347-1370.

Larsson, Rikard and Sydney Finkelstein, 1999, Integrating Strategic, Organizational, and Human Resource Perspectives on Mergers and Acquisitions: A Case Survey of Synergy Realization, Organization Science, 10(1):1-26.

Ledoit, Oliver and Michael Wolf, 2008, Robust performance hypothesis testing with the Sharpe ratio, Journal of Empirical Finance, 15(5):850-859.

Ledoit, Olivier and Michael Wolf, 2004, Honey, I Shrunk the Sample Covariance Matrix, The Journal of Portfolio Management, 30(4):110-119.

Lee, Charles, David Ng, and Bhaskaran Swaminathan, 2009, Testing International Asset Pricing Models Using Implied Costs of Capital, Journal of Financial and Quantitative Analysis, 44(02):307.

Lee, Charles M.C., Eric C. So, and Charles C. Y. Wang, 2017, Evaluating Implied Cost of Capital Estimates, Harvard Business School Accounting E Management Unit Working Paper, 15(022).

Levi, Maurice D., Kai Li, and Feng Zhang, 2012, Risk Homeostasis and Corporate Acquisitions, The Journal of Behavioral Finance $\mathcal{E}$ Economics, 2(1):21-49.

Li, Kevin K. and Partha Mohanram, 2014, Evaluating cross-sectional forecasting models for implied cost of capital, Review of Accounting Studies, 19(3):1152-1185.

Li, Yan, David T. Ng, and Bhaskaran Swaminathan, 2013, Predicting market returns using aggregate implied cost of capital, Journal of Financial Economics, 110(2):419-436.

Lin, Chen, Lai Wei, and Wensi Xie, 2018, Managerial Entrenchment, Shareholder Activism, and Information Production, Journal of Financial and Quantitative Analysis (JFQA), Forthcoming.

Liu, Jing, Doron Nissim, and Jacob Thomas, 2002, Equity Valuation Using Multiples, Journal of Accounting Research, 40(1):135-172.

Lundblad, Christian, 2007, The risk return tradeoff in the long run: 1836 2003, Journal of Financial Economics, 85(1):123-150.

MacKinlay, Craig A. and Lubos Pastor, 2000, Asset Pricing Models: Implications for Expected Returns and Portfolio Selection, Review of Financial Studies, 13(4):883-916.

Makri, Marianna, Michael A. Hitt, and Peter J. Lane, 2009, Complementary technologies, knowledge relatedness, and invention outcomes in high technology mergers and acquisitions, Strategic Management Journal, 31(6):602-628.

Malkiel, Burton G., 1979, The Capital Formation Problem in the United States, The Journal of Finance, 34(2):291-306.

Meier, Jean-Marie A. and Henri Servaes, 2016, The Bright Side of Fire Sales, EFA 2016 Oslo Meetings Paper.

Merton, Robert C., 1974, On the Pricing of Corporate Debt: The Risk Structure of Interest Rates, The Journal of Finance, 29(2):449.

Merton, Robert C., 1980, On estimating the expected return on the market, Journal of Financial Economics, 8(4):323-361.

Miller, Darius P., 1999, The market reaction to international cross-listings: evidence from Depositary Receipts, Journal of Financial Economics, 51(1):103-123.

Mitchell, Mark, Todd Pulvino, and Erik Stafford, 2004, Price Pressure around Mergers, The Journal of Finance, 59(1):31-63.

Nekrasov, Alexander and Maria Ogneva, 2011, Using earnings forecasts to simultaneously estimate firm-specific cost of equity and long-term growth, Review of Accounting Studies, 16(3):414-457.

O'Hanlon, John and Anthony Steele, 2000, Estimating the Equity Risk Premium Using Accounting Fundamentals, Journal of Business Finance, and Accounting, 27(9\&10):10511083.

Ohlson, James A., 2000, Residual Income Valuation: The Problems, Stern School of Business, New York University Working Paper.

Ohlson, James A., 2005, On Accounting-Based Valuation Formulae*, Review of Accounting Studies, 10(2-3):323-347.

Ohlson, James A. and Beate E. Juettner-Nauroth, 2005, Expected EPS and EPS Growth as Determinantsof Value, Review of Accounting Studies, 10(2-3):349-365.

Ortiz-Molina, Hernán and Gordon M. Phillips, 2014, Real Asset Illiquidity and the Cost of Capital, Journal of Financial and Quantitative Analysis, 49(01):1-32.

Pastor, Lubos, 2000, Portfolio Selection and Asset Pricing Models, The Journal of Finance, 55(1):179-223.

Pastor, Lubos and Robert F. Stambaugh, 2000, Comparing asset pricing models: an investment perspective, Journal of Financial Economics, 56(3):335-381.

Pastor, Lubos, Meenakshi Sinha, and Bhaskaran Swaminathan, 2008, Estimating the intertemporal risk-return tradeoff using the implied cost of capital, Journal of Finance, 63 (6):2859-2897.

Ramaswamy, Kannan, 1997, The Performance Impact Of Strategic Similarity In Horizontal Mergers: Evidence From The U.S. Banking Industry, Academy of Management Journal, 40(3):697-715.

Richardson, Scott A., Richard G. Sloan, Mark T. Soliman, and İrem Tuna, 2005, Accrual reliability, earnings persistence and stock prices, Journal of Accounting and Economics, 39(3):437-485.

Rubinstein, Mark, 1976, The Valuation of Uncertain Income Streams and the Pricing of Options, The Bell Journal of Economics, 7(2):407.

Shrieves, Ronald E. and John M. Wachowicz, 2001, Free cash flow (FCF), economic value added (EVA), and net present value (NPV): A reconciliation of variations of discounted-cash-flow (DCF) valuation, The Engineering Economist, 46(1):33-52.

S\&P Global, . S\&P Composite 1500® FactSheet- S\&P Dow Jones Indices, 2017.

Thomas, Anisya S., Robert J. Litschert, and Kannan Ramaswamy, 1991, The performance impact of strategy - manager coalignment: An empirical examination, Strategic Management Journal, 12(7):509-522.

Thomson Reuters, , 2010, I/B/E/S on Datastream User Guide Version 5.0, page 17.

Tombak, Mihkel M., 2002, Mergers to Monopoly, Journal of Economics $\mathcal{E}$ Management Strategy, 11(3):513-546.

Verrecchia, Robert E, 1982, Information Acquisition in a Noisy Rational Expectations Economy, Econometrica, 50(6):1415-30.

Vuolteenaho, Tuomo, 2002, What drives firm-level stock returns?, Journal of Finance, 57 (1):233-264.

Wang, Charles C. Y., 2015, Measurement Errors of Expected-Return Proxies and the Implied Cost of Capital, Harvard Business School Accounting $\mathcal{E}$ Management Unit (Working Papers), 13(098).

Wang, Cong and Fei Xie, 2009, Corporate Governance Transfer and Synergistic Gains from Mergers and Acquisitions, Review of Financial Studies, 22(2):829-858.

Wang, Pengguo, 2018, Future Realized Return, Firm-specific Risk and the Implied Expected Return, Abacus, 54(1):105-132.

Weber, Yaakov, Oded Shenkar, and Adi Raveh, 1996, National and Corporate Cultural Fit in Mergers/Acquisitions: An Exploratory Study, Management Science, 42(8):1215-1227.

Welch, Ivo, 2000, Views of Financial Economists on the Equity Premium and on Professional Controversies, The Journal of Business, 73(4):501-537.

Wermers, Russ, 1999, Mutual Fund Herding and the Impact on Stock Prices, The Journal of Finance, 54(2):581-622.

Williams, John. The theory of investment value,. Harvard University Press, Cambridge Mass., 1938.

Wong, Pauline and Noel O'Sullivan, 2001, The Determinants and Consequences of Abandoned Takeovers, Journal of Economic Surveys, 15(2):145-186.

Zhang, Xiao-Jun, 2000, Conservative accounting and equity valuation, Journal of Accounting and Economics, 29(1):125-149.


[^0]:    ${ }^{1}$ The notation used in this model and in all subsequent models is simplified, in that $F C F_{t}$, for instance, does not refer to a random variable. A more precise notation would be $E_{t}\left[F C F_{t+1}\right]$. Therefore, phrases such as "expected cash flow" are redundant, and whenever the word "expected" is used it is only to highlight and remind the reader that I am in fact using expectations. This would be true later for future dividends, residual income, earnings, ...etc.

[^1]:    ${ }^{2}$ The Clean Surplus Accounting formula is $b p s_{t}=b p s_{t-1}+e p s_{t}-d p s_{t}$; solving for $d p s_{t}$ and substituting in the Dividend Discount Model $V_{0}^{E}=\sum_{t=1}^{\infty}\left(\frac{d p s_{t}}{\left(1+r_{E}\right)^{\prime}}\right)$, would yield equation (3).

[^2]:    ${ }^{3}$ A highly unorthodox method of computing earnings per share could make the clean surplus accounting hold always by making it capturing all the transactions that go through other comprehensive income and equity without passing through the income statement conventionally. Further discussion is in Ohlson (2005)
    ${ }^{4}$ ROE in this context uses beginning book value of equity in the denominator not average book value of equity.

[^3]:    ${ }^{7}$ Some of these studies precede Ohlson and Juettner-Nauroth (2005) publication date by few years as they were using prior working papers that go as early as the year 2000.
    ${ }^{8}$ Fama and French (1997) 48 industry classifications is used. In the median calculation, from 5 to 10 years of past data were used, and they excluded observations with negative net income. Using the mean instead of the median resulted in no changes to the results. Gode and Mohanram (2003) used a variant where the industry median is the moving median of ROE of all firms in the industry (not only those with positive ROE), but they winsorized the industry medians at the risk free rate and at $20 \%$.

[^4]:    ${ }^{9}$ This is not equivalent to growth of the earnings or cash flows to be zero, instead, it only suggest value neutrality of such growth.

[^5]:    ${ }^{10}$ See equations (1) and (2)
    ${ }^{11}$ More discussion on these topics is present in standard investments and corporate finance text books such as Damodaran (2012).

[^6]:    ${ }^{12}$ In a document titled Estimates History Start Dates by Region and Measures Ref 09/16 published in 2016 by Thomson Reuters

[^7]:    Continued in next page..

[^8]:    ${ }^{13}$ Echterling, Eierle, and Ketterer (2015) provide an updated review of this research.

[^9]:    ${ }^{14}$ This equivalent to the usual constraint used in portfolio optimization problems $\sum_{i=1}^{N} w_{i t}=1$.

[^10]:    ${ }^{15}$ The Sharpe is negative to few of the portfolios since the excess expected return estimate is negative. Although a negative Sharpe is difficult to evaluate, the comparison between strategies is still valid. In the analysis provided, it does not affect the conclusions.

[^11]:    ${ }^{16}$ In a similar fashion, Mitchell, Pulvino, and Stafford (2004) provide evidence of significant shareholder portfolio rebalancing triggered from stock-financed mergers which can result in portfolios inconsistent with the shareholders investment strategies.

[^12]:    ${ }^{17}$ One standard deviation increase in the ICC similarity increases the odds of a pair of firms merging by $64.4 \%$ if the ICC estimates are not capped at $100 \%$ and floored at $0 \%$ (See the Appendix C.1).
    ${ }^{18} 31.33 \%$ when the ICC estimates are capped at $100 \%$ and floored at $0 \%$ (See the Appendix C.1).
    ${ }^{19} 38 \%$ without ICC truncating (See the Appendix C.1)

[^13]:    ${ }^{20}$ Examples of other recent finance studies that employ the ICC are Hann, Ogneva, and Ozbas (2013), OrtizMolina and Phillips (2014), and Frank and Shen (2016).

[^14]:    ${ }^{21}$ Echterling, Eierle, and Ketterer (2015) provide an updated review of this research.

[^15]:    ${ }^{22}$ Bereskin et al. (2018) test $80 \%$ threshold as robustness check.

[^16]:    ${ }^{23}$ Thomson Reuters ESG Scores Guide, issued in May 2018.

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