

Index Insights | Equities

FTSE Global Equity High Income Index Series

A comprehensive and diversified benchmark representing global companies that pay relatively higher dividend yields

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In the realm of investment strategies, achieving relatively high returns while managing risk has continued to be a goal for investors. One approach that has remained a popular choice is the pursuit of high dividend yielding stocks through an equity income focused benchmark. These indices aim to provide market participants looking to capitalise on equity income potential with dividend distributions.

Dividend yield, a fundamental financial metric, is calculated by dividing the annual dividend per share by the stock's current market price, expressed as a percentage. Investors opt for high dividend yield indices for various reasons, including income generation, portfolio diversification and risk management. Stocks with dividends are often mature companies with established cash flows and show a greater-than-average commitment to returning cash to shareholders. Additionally, during periods of market volatility or economic uncertainty, dividends from such stocks may offer a shield against capital losses, providing investors with a degree of stability amidst fluctuating market conditions. Overall, dividend yield focused indices remain a crucial consideration for income-oriented market participants seeking cash flows and potential capital appreciation.

To address increasing market demand, FTSE Russell launched the FTSE Global Equity High Income Index Series in May 2024. The series is designed to track the performance of global securities exhibiting relatively high tax adjusted dividend yields. The FTSE Russell Research team has constructed a simple but comprehensive market-cap weighted methodology for the FTSE Global Equity High Income Index Series to capture high-yielding global equities while addressing concerns regarding tax implications and yield traps.

Methodology highlights:

- Reviewed based on the eight regions used to construct the FTSE All-World Index, including REITs
- Constituents are ranked based on their forecast tax-adjusted dividend yield to create a
 diversified index with relatively lower tracking error to its underlying universe. Stocks with
 the highest forecast tax-adjusted dividend yields are included
- With high yield indices, in order to avoid yield traps and exclude securities that may not be able to sustain consistent dividend payments, constituents with zero or no historical or forecast dividends are screened out. The bottom fifth percentile of companies with negative returns are also excluded

This paper presents the analysis and corresponding rationale for the methodology, along with summaries of simulated performance and characteristics of the index series:

- Section I outlines the requirements for the index series and establishes the index design goals.
- Section II, outlines the index design considerations and analysis, based on the index design goals in Section I, to determine the appropriate methodology for achieving these objectives
- Section III presents summaries of index simulated performance results and characteristics associated with the selected index methodology

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Section I: Index design goals

To design an index series that reflects the performance of securities exhibiting relatively high tax adjusted dividend yield, we identified the following index design goals:

- 1. Create a simple, intuitive methodology with effective communication to clients.
- 2. Create market cap weighted indices with relatively higher yield when compared to the benchmarks.
- 3. Incorporate country tax rate to achieve relatively higher yield in terms of net of dividend tax for tax-aware investors.
- 4. Exclude securities with a higher probability to have lower dividend in the future.
- Flexibility to create regional or country carve-outs, such as US, Developed ex US and Emerging markets.
- 6. Relatively low concentration risk and maintain diversification.
- 7. Trading concerns, relatively low turnover.

In the next section, we go through index design considerations in order to achieve the index design goals above.

Section II: Index design considerations

In order to achieve the index design goals in Section I, we have looked at the following index design considerations:

	Considerations	Goals
1	Consider factors that indicate securities to have higher probability to have lower dividend in the future	4
2	Use forecast dividend yield, trailing dividend yield, or both to rank	2
3	Ranking of securities globally, within country, or within region	5
4	Ranking and selection methods	1, 2
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The rest of the section below details analysis conducted and conclusions for the above index design considerations.

1. Factors that indicate securities to have higher probability to have lower dividend in the future

While one of the index goals is to include high yielding equity securities, it is prudent to consider if the dividend level can be maintained in the future. We evaluated factors to consider whether securities should be excluded if the factors indicate a higher probability of lower dividend in the future. The table below lists the 17 factors that we have considered alongside their rationales.

Table 1: Factors to assess if they indicate a higher probability to have lower dividend in the future

	Factors	Rationales	Definition
1.1	Zero forecast dividend	Securities that are forecasted to have no dividend	IBES forecast dividend
1.2	Zero trailing dividend	Securities that have not paid a dividend and then are forecasted to do so may lead to dividend disappointment	Last 12 month trailing dividend
1.3	Extreme return	As dividend yield is calculated as dividend per share divided by price, a rapid fall in price can inflate the dividend yield	Momentum factor*
1.4a	Extreme forecast dividend yield	Extreme forecast dividend yield may not be sustainable	IBES forecast dividend yield
1.4b	Extreme trailing dividend yield	Extreme trailing dividend yield may not be sustainable	Last 12 month trailing dividend yield
1.5a	Extreme payout ratio	Extreme payout ratio may not be sustainable	Company paid dividend/net income
1.5b	Extreme forecast payout ratio	Extreme forecast payout ratio may not be realised	Forecast company dividend/net income
1.6	Quality	Dividend may be sustained by financing rather than operating activities of a company	Composite of ROA, change in asset turnover, accruals, leverage ratio*
1.7	Piotroski Score	A score to judge a firm's financial strength that reflects on if dividend is sustainable	Piotroski Score that incorporates nine factors that speak to a firm's financial strength
1.8	ROE	A measure on how efficient equity is used that reflects on if dividend is sustainable	Return on Equity
1.9a	Sales growth	Sales growth indicates business condition to support dividend	Three year growth in reported sales
1.9b	Forecast sales growth	Forecast sales growth indicates business condition to support dividend	Forecast three year growth in sales
1.10a	EPS growth	EPS growth indicates financial condition to support dividend	Earnings per share growth
1.10b	Forecast EPS growth	Forecast EPS growth indicates financial condition to support dividend	Forecast earnings per share growth
1.11	Debt equity ratio	Debt equity ratio indicates level of debt service in sustaining dividend	Debt-to-Equity ratio
1.12a	PE	Earnings yield correlates to dividend yield in sustaining dividend	Price Earnings ratio
1.12b	Forecast PE	Forecast earnings yield correlates to dividend yield in sustaining dividend	Forecast price earnings ratio

^{*} see FTSE Global Factor Index Series Ground Rules

For the analysis in this paper, we examined constituents of the FTSE All-World Index from September 2002 to September 2023.

1.1 - Zero forecast dividend

For securities that had forecast dividend of zero, the majority of the securities did have a realised dividend of zero (3555 companies had zero realised dividend compared to 403 which had a realised dividend of greater than zero). In the index methodology, we therefore **exclude securities that have forecast dividend of zero**.

Given zero forecast dividend provides a strong signal of future dividend payments, in addition to annual rebalance, zero forecasted dividends are checked **on a quarterly basis** to exclude securities with zero forecast dividend.

For the rest of the factors, to assess how each factor may indicate level of future dividend, we define Dividend Realised Ratio as:

$$\textit{Dividend Realised Ratio} = \frac{\textit{Realised Dividend per Share}}{\textit{Forecast Dividend per Share}}$$

For detail definition, see Appendix A.

1.2 – Zero trailing dividend and 1.4b – extreme trailing dividend yield

For the charts below, we looked at all securities across all index review periods. We grouped the securities by 1) having trailing dividend yield of 0, 2) trailing dividend yield of between 0 and 1x the geographical regional average, 3) trailing dividend yield of between 1x and 2x region average, and so on. We then counted the number of securities that have 0, between 0 and 25%, between 25% and 50%, and so on in terms of Dividend Realised Ratio in each group.

25000 Sy 20000 15000 10000 5000 0 0 Regional Multiple

■0 ■>0%,<=25% ■>25%,<=50% ■>50%,<=75% ■>75%,<=100% ■>100%

Figure 1.2.1: Dividend realised ratio – trailing dividend (number of stocks)

100% 80% 60% 3 40% 8 20% 0% Regional multiple

Figure 1.2.2: Dividend realised ratio – Trailing dividend (% by count)

■0 ■>0%,<=25% ■>25%,<=50% ■>50%,<=75% ■>75%,<=100% ■>100%

Source: FTSE Russell, data as of September 2023.

For the securities that had a trailing dividend of zeros, over 30% had a realised dividend of zero (Figure 1.2.2, left-most bar, in red). We therefore **exclude securities that have trailing dividend of zero** in the index methodology.

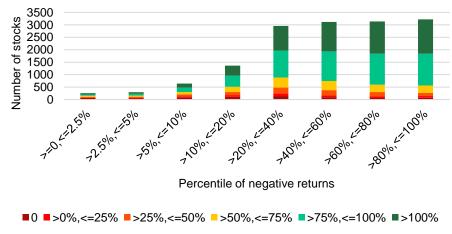
Given zero trailing dividends are a strong signal on future dividend, in addition to annual rebalance, zero trailing dividend is checked **on a quarterly basis** to exclude securities with zero trailing dividends.

While we suspected securities that have extremely high trailing dividend yield may not be able to sustain the dividend yield level, we do not see a significant impact in the data above. We therefore do not use extreme trailing dividend yield for exclusion in the index methodology.

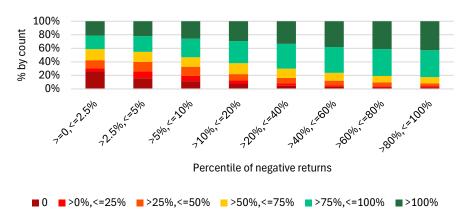
1.3 – Extreme return

For the charts below, we looked at securities that have negative returns, and grouped them into percentile within each geographical region.

1.3.1 Dividend realised ratio – Extreme return (number of stocks)



1.3.2 Dividend realised ratio – Extreme return (% by count)



Source: FTSE Russell, data as of September 2023.

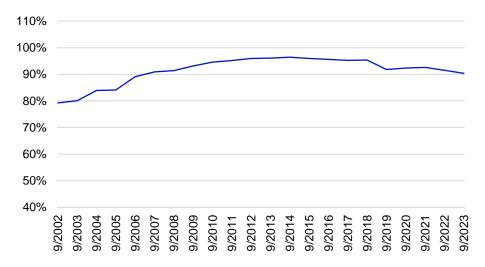
For the securities that were within the bottom 5th percentile, they had a high probability of having a lower Dividend Realised Ratio (Figure 1.3.2, two left most bars, around 80% by count). We therefore **exclude securities that are within the bottom 5th percentile with negative returns in each region**.

For the rest of the factors, we do not see a significant relationship between factor level and Dividend Realised Ratio. In addition, if we exclude based on the factors, we may potentially also exclude a sizeable portion of securities with high Dividend Realised Ratio. We therefore do not use these factors for exclusion in the index methodology. Appendix B has the results for the rest of the factors.

2. Use forecast dividend yield, trailing dividend yield, or both to rank

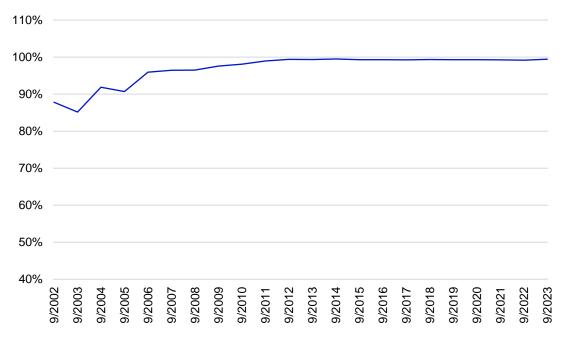
As mentioned, a zero forecast dividend often results in a zero realised dividend, we therefore use forecast dividend yield to rank securities. While companies tend to aim to have a consistent dividend policy, trailing dividends are a good indicator of future dividend payments. Forecast dividends do reflect that they are mostly close to trailing dividends. While it is possible to use trailing dividend yield when forecast dividend yield is not available, coverage of forecast dividend yield is satisfactory, especially for the recent period. (See Figure 2.1 and 2.2) In light of maintaining a simple methodology, and in case of mismatch between trailing and forecast dividend due to market disruption, we use forecast dividend vield solely in ranking in the index methodology.

Figure 2.1: Forecast dividend yield coverage (by count)



Source: FTSE Russell, data as of September 2023.

Figure 2.2: Forecast dividend yield coverage (by market cap weight)



3. Ranking of securities globally, within country, or within region

Rank globally

Selecting companies on a global basis presents challenges. Table 3.1 shows the bottom five average forecast dividend yield by country. Certain markets such as Japan will not be selected.

Table 3.1: Bottom 5 forecast dividend yield by country

Country	Average forecast dividend yield
IND	1.90
JPN	1.93
USA	1.93
DNK	2.07
IRL	2.27

Source: FTSE Russell, data as of September 2023.

After withholding taxes are applied, country representation widens even further. Table 3.2 shows the bottom five average forecast tax adjusted dividend yield by country. For example, fewer US companies are selected due to 30% US withholding tax.

Table 3.2: Bottom 5 forecast tax adjusted dividend yield by country

Country	Average forecast tax adjusted dividend yield
USA	1.41
DNK	1.54
JPN	1.70
KOR	1.75
IND	1.77

Source: FTSE Russell, data as of September 2023.

Rank within country

Selecting high yielding companies within a country has no benefit of incorporating withholding taxes.

Rank within geographical region

Given the challenge of ranking globally and ranking within country, we use **ranking within geographical region** in the index methodology. In addition, ranking within region allow the methodology to maintain high yield stocks relative to region, making the index more suitable for creating regional carve-outs.

4. Ranking and selection methods

In order to create an index with higher dividend yield relative to the benchmark, and maintain a relatively simple index methodology, we use ranking and selection. With the index level dividend yield, and resulting diversification and concentration in mind, we evaluated the following options:

Ranking:

- 1. By dividend yield
- 2. By dividend yield contribution

Selection:

- 1. Select top 50% by count
- 2. Select top 50% by market cap

Using rank by dividend yield contribution and select top 50% by market cap results in smaller security count dominated by large cap stocks (Figure 4.1). While using rank by dividend yield contribution and select top 50% by count covers a sizeable percentage of the market with limited differentiation to the underlying universe (Figure 4.2).

Figure 4.1: Ranking and selection methodology (stock count)

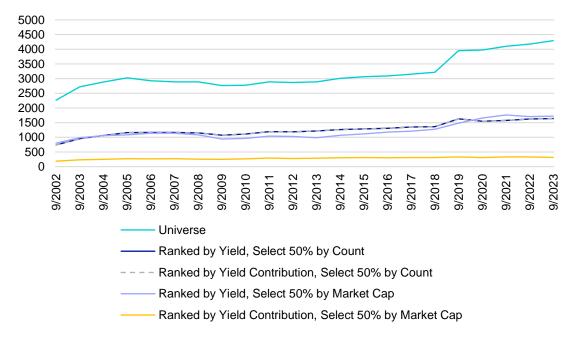
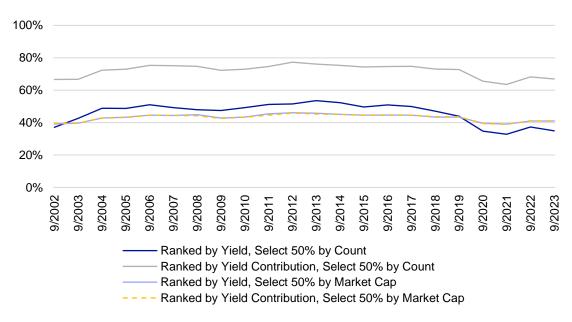


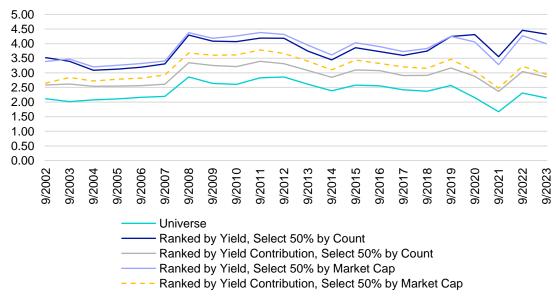
Figure 4.2: Ranking and selection methodology (market cap coverage)



Source: FTSE Russell, data as of September 2023.

In terms of resulting index level yield, rank by dividend yield contribution results in lower index level dividend yield (Figure 4.3).

Figure 4.3: Ranking and selection methodology (index level Trailing yield)



While ranking by dividend yield and selecting the top 50% by count is largely similar to selecting top 50% by market cap, there is potential for extreme cases where high yield stocks are all small in one geographical region, resulting in a small weight in that region. We therefore do not use rank by dividend yield and select top 50% by count.

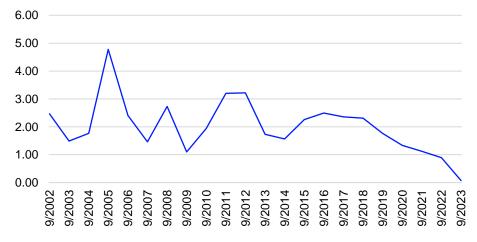
With consideration in security count, market cap coverage, and the resulting index level dividend yield, ranking by dividend yield and selection by market cap is used in the index methodology. The table below summarises the rationales for the selection rules.

Rank by \ Select 50% by	Count	Market Cap
Yield	 Potentially extreme case when high yield stocks are all small in one geographical region, resulting in small region weight 	
	×	~
Yield Contribution	 High Market Cap Coverage with limited differentiation to underlying universe 	 Low stock count dominated by large cap stocks
	 Low Yield Uplift 	 Low yield uplift
	×	×

5. Ranking with gross of dividend tax yield versus net of dividend tax yield

Ranking with net of dividend tax yield results in better outcome when the result is measured in net of dividend tax yield at the index level. While the enhancement is modest (Figure 5), we rank with net of dividend tax yield in line with index design goals.

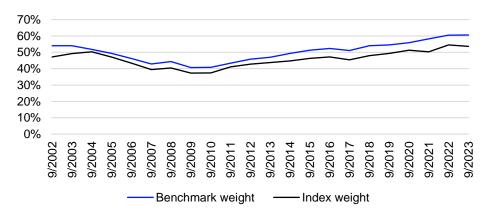
Figure 5: Yield enhancement using net of dividend tax yield to rank (bps)



6. Country and industry constraints

Country and industry weights, compared to underlying benchmark, in terms of both absolute and relative weights are modest. To allow high dividend yield securities to be selected and weighted accordingly, we do not constrain country and industry weights. Figures 6.1 to 6.4 show country and industry maximum absolute as well as relative weights versus the underlying benchmark.

Figure 6.1: Maximum country weight



Source: FTSE Russell, data as of September 2023.

Figure 6.2: Maximum industry weight

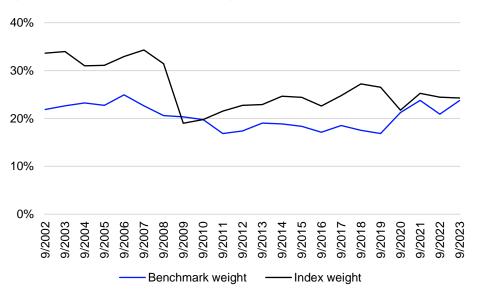
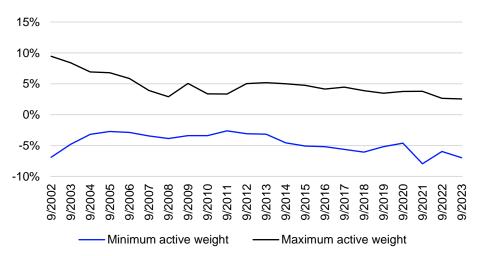
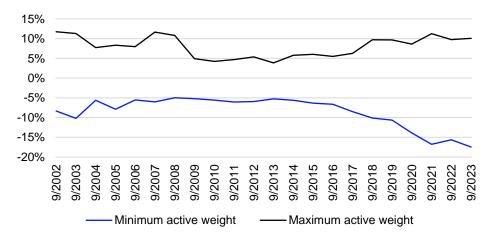


Figure 6.3: Maximum country active weight



Source: FTSE Russell, data as of September 2023.

Figure 6.4: Maximum industry active weight



Source: FTSE Russell, data as of September 2023.

Overall, the index is underweight in Technology and Consumer Discretionary while overweight in Financials and Utilities.

7. Consideration of Real Estate

Given REITs are required to distribute a certain percentage of income by regulation, there is potential for REITs to be overweight in a high dividend yield index. We do not see significant overweight of Real Estate (Figure 7), and we therefore do not treat REITs separately in the index methodology.

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Figure 7: Real Estate active weight (Real Estate overweight)

Source: FTSE Russell, data as of September 2023.

8. Company capping

Figure 8 shows maximum company weights over time. Historically maximum company weights were less than 5%. We do not apply company capping in the index methodology.

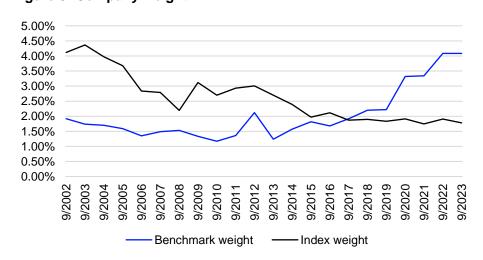


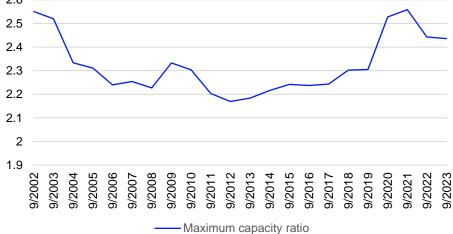
Figure 8: Company weight

9. Capacity ratio

Figure 9: Maximum capacity ratio

Given we are selecting top 50% of the securities by market cap, and we are weighting securities by market cap weights, capacity does not pose an issue. We therefore do not have capacity ratio constraint in the index methodology. Figure 9 shows maximum capacity ratio overtime.

2.6 2.5

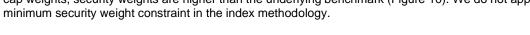


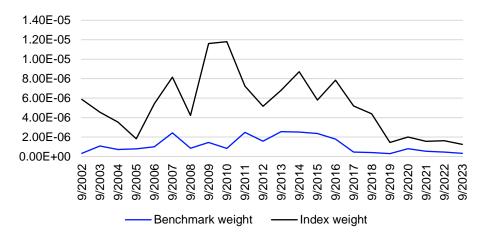
Source: FTSE Russell, data as of September 2023.

10. Minimum security weight

Figure 10: Minimum security weight (minimum stock weight)

Given we are selecting top 50% of securities by market cap, and we are weighting securities by market cap weights, security weights are higher than the underlying benchmark (Figure 10). We do not apply minimum security weight constraint in the index methodology.

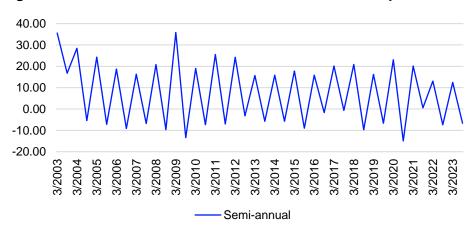




11. Rebalance frequency

While companies do not normally make significant change in dividend policy, we have tested to see the trade-off between rebalance frequency and maintaining index level dividend yield. Figure 11.1 and Table 11 show the cost of rebalance in terms of turnover while figure 11.2 shows the benefit of rebalance in terms of index level dividend yield.

Figure 11.1: Cost – Index review turnover differences compared to annual rebalance



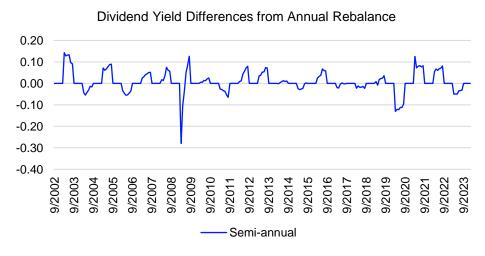
Source: FTSE Russell, data as of September 2023.

Table 11: Cost - Annual turnover

Annual	Semi-annual
36.95	51.84

Source: FTSE Russell, data as of September 2023.

Figure 11.2: Benefit - Dividend yield differences compared to annual rebalance



Given the additional turnover if semi-annual rebalance is added, and the modest enhancement of index level yield, we do not include a semi-annual rebalance in the index methodology. As mentioned in earlier sections, given zero forecast dividend and zero trailing dividend are strong signals for zero future dividend, we do apply a quarterly check to exclude securities with zero forecast or trailing dividend to maintain a balanced trade-off between turnover and index level dividend yield.

12. Buffer rules

To potentially further reduce turnover, instead of re-selecting top 50% of securities in each review, we assessed allowing a buffer for security addition and deletion. We have evaluated 45/55, 40/60, and 40/75 for addition/deletion buffer.

By definition, e.g., dividend yield differences between 40th and 75th percentile are higher than between 45th and 55th percentile. For details, <u>Appendix C</u> has dividend yield levels for the 40th, 45th, 55th, 60th, and 75th percentile for each region. The wider the buffer, the larger the range of dividend yield of stocks may be included in the index.

We looked at the trade-off between turnover (Table 12, Figure 12.1)/addition (Figure 12.2)/deletion (Figure 12.3) as a cost, and the resulting index level yield as a benefit.

Table 12: Cost – Average annual index review turnover

No Buffer	45/55	40/60	40/75
36.95	30.53	27.12	22.35

Source: FTSE Russell, data as of September 2023.

Figure 12.1: Trade-off – Change in index level yield (benefit) vs. change in turnover (cost)

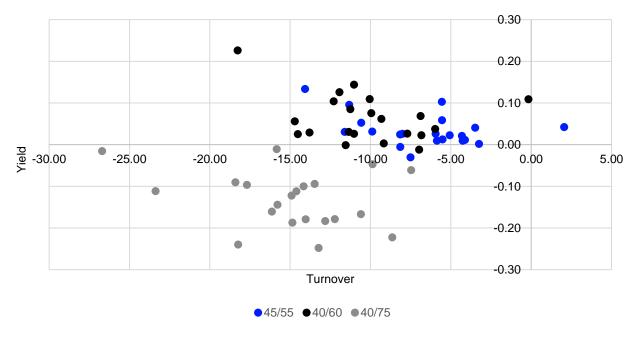
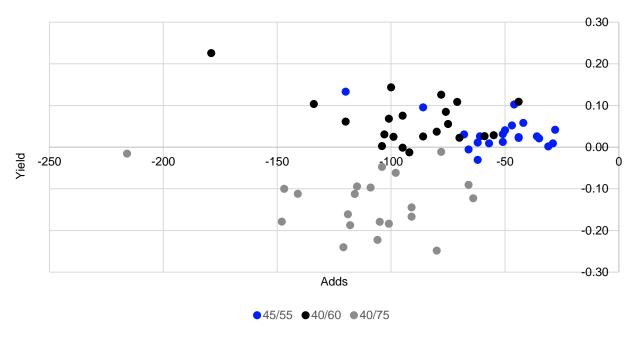
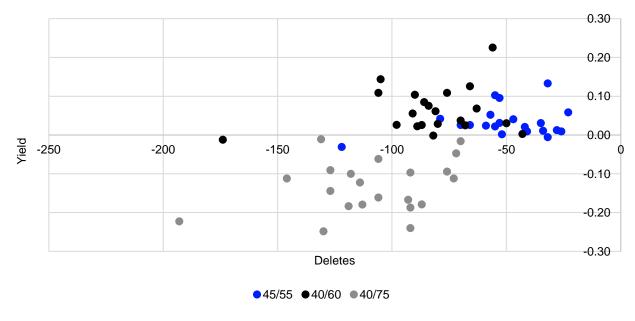


Figure 12.2: Trade-off – Change in index level yield (benefit) vs. change in number of adds (cost)



Source: FTSE Russell, data as of September 2023.

Figure 12.3: Trade-off – Change in index level yield (benefit) vs. change in number of deletes (cost)



Source: FTSE Russell, data as of September 2023.

Considering the balance between turnover/additions/deletions, index level dividend yield and yield differences within the buffer range, we use 45/55 as the buffer rule in the index methodology.

In summary, below is the resulting methodology used in consideration to achieve index design goals:

- 1. Create a simple, intuitive methodology with effective communication to clients.
 - Use simple rank and select methodology.
- 2. Create market cap weighted indices with relatively higher yield when compared to the benchmark.
 - Rank by security forecast dividend yield.
- Incorporate country tax rate to achieve relatively higher yield in terms of net of dividend tax for taxaware investors.
 - Rank by security forecast net of dividend tax yield.
- 4. Exclude securities with higher probability to have lower dividend in the future.
 - Exclude securities with zero forecast or trailing dividend and extreme negative return.
- Potentially to create regional or country carve-outs, such as US, Developed ex US, and Emerging markets.
 - Rank securities within region.
- 6. Relatively low concentration risk and maintain diversification.
 - Select top 50% securities by dividend yield and weighted by market cap.
- 7. Trading concerns, relatively low turnover.
 - Incorporate buffer rules. Annual rebalance with quarterly removal of securities with zero forecast or trailing dividend to balance turnover vs. maintaining index level dividend yield.

Section III: Index simulated performance results and characteristics

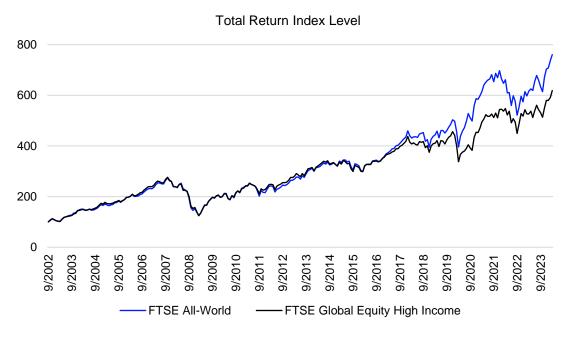
With the index methodology, we have simulated the performance from September 2002 to March 2024. Below is a summary of the performance and characteristics.

Table 13.1: Simulated performance and characteristics

Index	Annualised return (%)	Annualised volatility (%)	Maximum drawdown (%)	Tracking error (%)	Beta	Up capture ratio (%)	Down capture ratio (%)	Annual 2-way turnover (%)
FTSE All- World	9.90	15.55	-54.47					
FTSE Global Equity High Income	8.85	14.89	-54.91	3.98	0.93	89.87	93.96	30.37

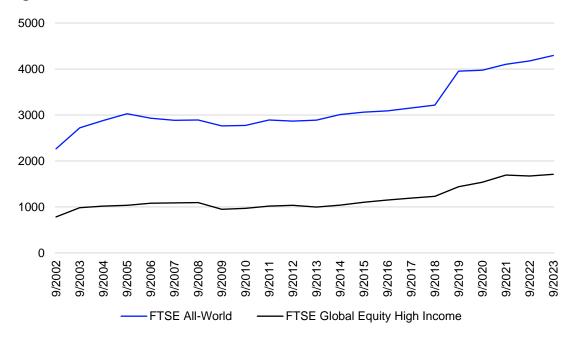
Source: FTSE Russell, data as of September 2023. Past performance is no guarantee of future returns. Returns shown prior to index or rate launch reflect hypothetical historical performance. Please see the end for important legal disclosures.

Figure 13.1: Simulated performance



Source: FTSE Russell, data as of September 2023. Past performance is no guarantee of future returns. Returns shown prior to index or rate launch reflect hypothetical historical performance. Please see the end for important legal disclosures.

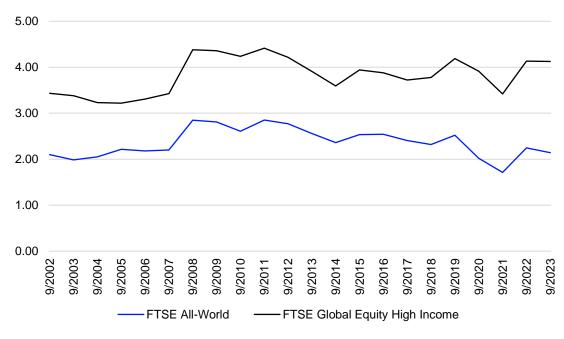
Figure 13.2: Number of stocks



Source: FTSE Russell, data as of September 2023.

The resulting index level yield is around 2x the underlying universe in the recent period.

Figure 13.3: Index level yield



Included below are characteristics of the snapshot of the September 2023 index review.

Top 10 Stocks by weight

Table 13.2: Top 10 stocks by weight as of September 2023 index review

Company	ICB Industry	Country	Index weight	Benchmark weight	Weight difference
Exxon Mobil Corporation	Energy	USA	1.77	0.69	1.08
JPMorgan Chase & Co	Financials	USA	1.70	0.66	1.04
Johnson & Johnson	Health Care	USA	1.57	0.61	0.96
Procter & Gamble	Consumer Staples	USA	1.44	0.56	0.88
Broadcom	Technology	USA	1.43	0.56	0.87
Home Depot	Consumer Discretionary	USA	1.33	0.52	0.81
Chevron	Energy	USA	1.13	0.44	0.69
Merck & Co	Health Care	USA	1.11	0.43	0.68
AbbVie Inc	Health Care	USA	1.04	0.41	0.63
PepsiCo	Consumer Staples	USA	0.99	0.39	0.61

Source: FTSE Russell, data as of September 2023.

Industry weights

Table 13.3: Industry stock count and weights as of September 2023 index review

ICB Industry	Index count	Index weight	Benchmark count	Benchmark weight	Weight difference
Basic Materials	151	4.86	380	3.71	1.15
Consumer Discretionary	209	8.71	642	14.13	-5.42
Consumer Staples	115	9.72	330	6.18	3.54
Energy	117	10.66	177	4.99	5.67
Financials	392	24.39	610	13.89	10.50
Health Care	48	9.12	354	11.52	-2.40
Industrials	278	11.77	777	13.03	-1.27
Real Estate	134	4.52	241	2.45	2.07
Technology	72	5.79	419	24.17	-18.38
Telecommunications	68	4.77	135	3.02	1.75
Utilities	126	5.69	229	2.91	2.78

Region weights

Table 13.4: Region stock count and weights as of September 2023 index review

Region	Index count	Index weight	Benchmark count	Benchmark weight	Weight difference
Latin America	48	1.19	148	1.05	0.14
Asia Pacific ex Japan ex China	392	9.37	886	8.55	0.83
China	390	2.60	1238	3.25	-0.64
Developed Europe	259	19.84	537	16.02	3.82
Emerging Europe	25	0.19	150	0.26	-0.06
Japan	240	7.90	513	6.24	1.66
Middle East and Africa	79	1.69	185	1.35	0.34
North America	277	57.20	637	63.29	-6.09

Source: FTSE Russell, data as of September 2023.

Country weights

Table 13.5: Country stock count and weights as of September 2023 index review

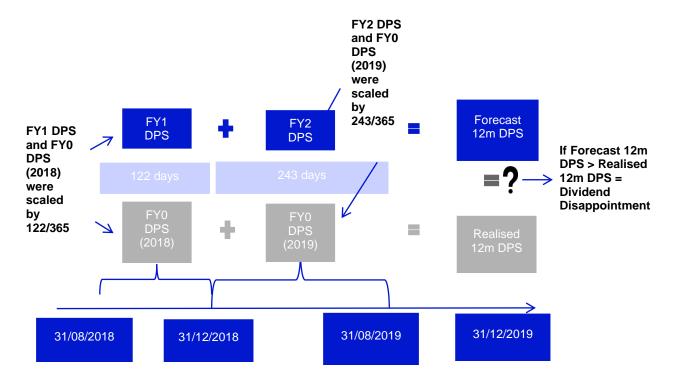
Country	Index count	Index weight	Benchmark count	Benchmark weight	Weight difference	Country	Index count	Index weight	Benchmark count	Benchmark weight	Weight difference
AU	58	3.41	111	1.97	1.43	PHIL	11	0.07	27	0.08	0.00
BELG	5	0.17	14	0.25	-0.07	POL	5	0.10	10	0.07	0.03
BRAZ	31	0.89	83	0.64	0.26	PTL	2	0.08	4	0.05	0.03
CAN	34	4.33	49	2.43	1.90	QA	12	0.19	17	0.10	0.09
CHL	2	0.04	21	0.07	-0.02	ROU	2	0.02	6	0.01	0.00
CHN	390	2.60	1238	3.25	-0.64	SAF	20	0.37	41	0.34	0.02
COL	5	0.04	5	0.02	0.02	SAU	21	0.64	56	0.47	0.17
CZE	4	0.04	5	0.02	0.03	SI	31	0.83	35	0.33	0.49
DEN	2	0.03	19	0.76	-0.74	SP	17	1.34	24	0.65	0.69
EGY	0	0.00	3	0.01	-0.01	SWED	15	0.56	55	0.73	-0.16
FIN	9	0.48	14	0.28	0.20	SWIT	14	1.79	51	2.41	-0.62
FRA	32	2.96	70	2.89	0.07	THAI	27	0.32	50	0.25	0.07
GER	32	3.09	73	2.05	1.04	TUR	11	0.06	100	0.13	-0.07
GRC	4	0.03	25	0.06	-0.02	TWN	62	1.75	119	1.63	0.12
HK	54	1.04	78	0.65	0.39	UAE	17	0.32	29	0.19	0.13
HUN	3	0.03	4	0.03	0.00	UK	71	6.66	107	3.82	2.83
IND	30	0.50	212	1.82	-1.33	USA	243	52.88	588	60.86	-7.98
INDO	21	0.34	40	0.23	0.11						
IRE	2	0.07	5	0.07	-0.01						
ISL	1	0.01	10	0.01	-0.01						
ISR	6	0.15	30	0.15	0.00						
ITA	20	1.27	35	0.68	0.59						
JA	240	7.90	513	6.24	1.66						
KOR	60	0.67	159	1.33	-0.66						

Index Insights | Equities

Country	Index count	Index weight	Benchmark count	Benchmark weight	Weight difference	Country	Index count	Index weight	Benchmark count	Benchmark weight	Weight difference
KWT	3	0.02	9	0.09	-0.07						
MAL	29	0.38	39	0.18	0.20						
MEX	10	0.22	39	0.33	-0.11						
NETH	14	0.70	31	1.08	-0.38						
NOR	12	0.40	18	0.18	0.23						
NZ	8	0.08	15	0.08	0.00						
OEST	7	0.13	7	0.05	0.08						
PAK	1	0.00	1	0.00	0.00						

Appendix A – Dividend realised ratio

- 1. At each review we calculate a 12-month forecast DPS using DPS forecasts for FY1 and FY2.
- 2. We then calculate the realised DPS using a proportion of realised DPS for each corresponding fiscal year.
- 3. We compared 1) with 2) checking if forecast DPS was realised.
 - Forecast < Realised = Dividend Surprise
 - Forecast > Realised = Dividend Disappointment



All data in the Appendix sourced from FTSE Russell, as of September 2023.

Appendix B – Relationship between factors and dividend realised ratio

Figure B-1.4a.1: Dividend realised ratio – Extreme forecast dividend yield (number of stocks)

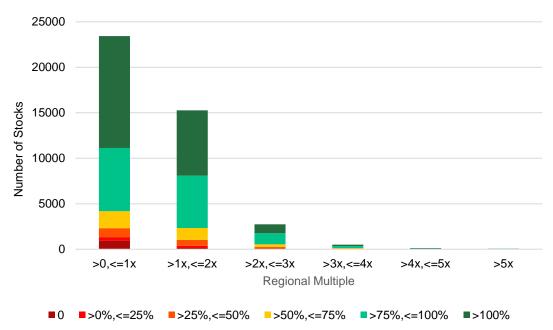


Figure B-1.4a.2: Dividend realised ratio – Extreme forecast dividend yield (% by count)

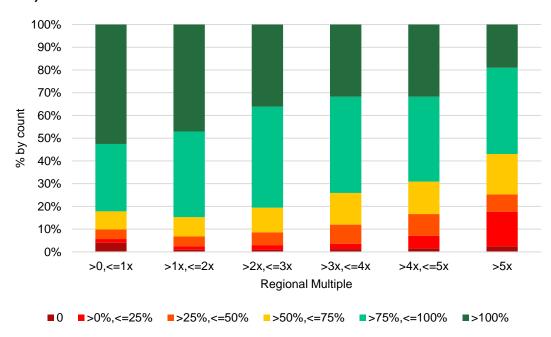


Figure B-1.5a.1: Dividend realised ratio – Extreme payout ratio (number of stocks)

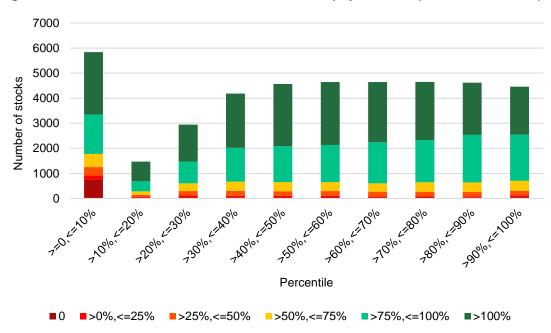


Figure B-1.5a.2: Dividend realised ratio – Extreme payout ratio (% by count)

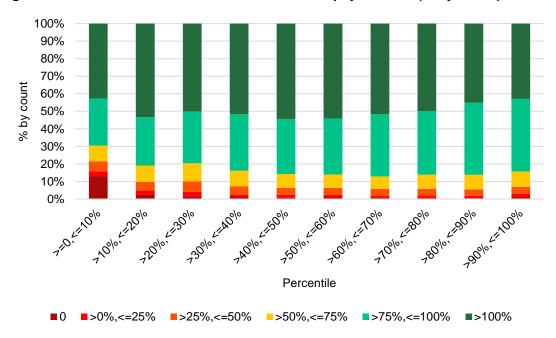


Figure B-1.5b.1: Dividend realised ratio – Extreme forecast payout ratio (number of stocks)

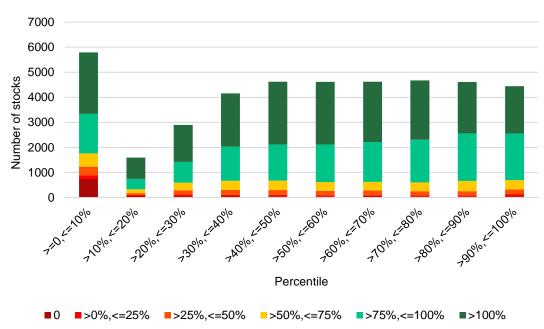


Figure B-1.5b.2: Dividend realised ratio – Extreme forecast payout ratio (% by count)

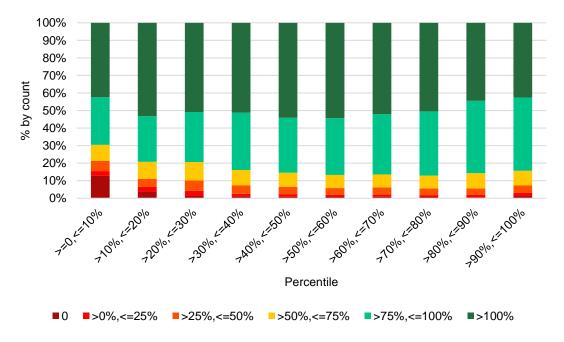


Figure B-1.6.1: Dividend realised ratio – Quality (number of stocks)

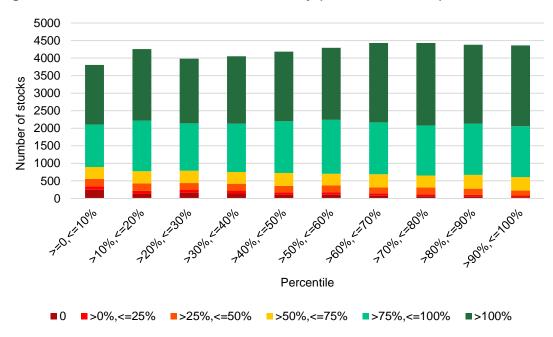


Figure B-1.6.2: Dividend realised ratio – Quality (% by count)

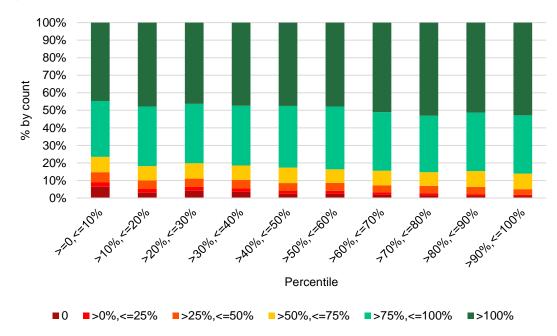


Figure B-1.7.1: Dividend realised ratio – Piotroski score (number of stocks)

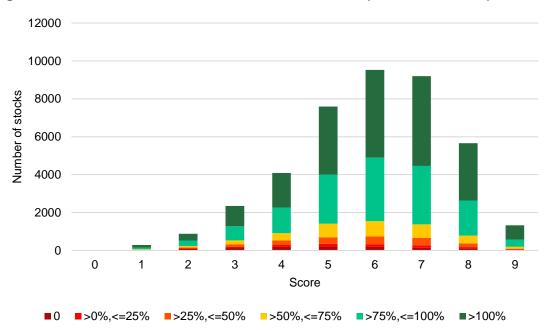


Figure B-1.7.2: Dividend realised ratio – Piotroski score (% by count)

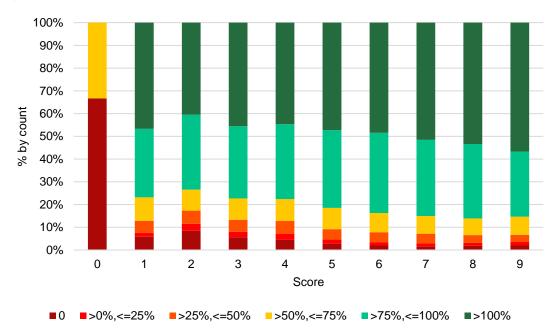


Figure B-1.8.1: Dividend realised ratio – ROE (number of stocks)

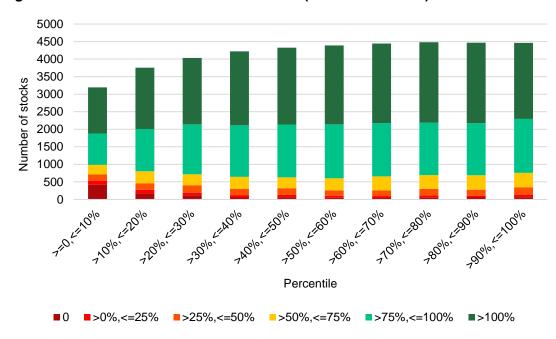


Figure B-1.8.2: Dividend realised ratio - ROE (% by count)

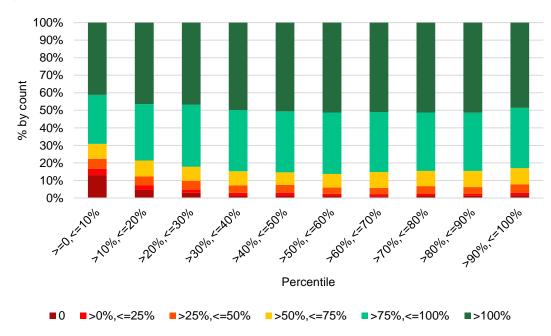


Figure B-1.9a.1: Dividend realised ratio – Sales growth (number of stocks)

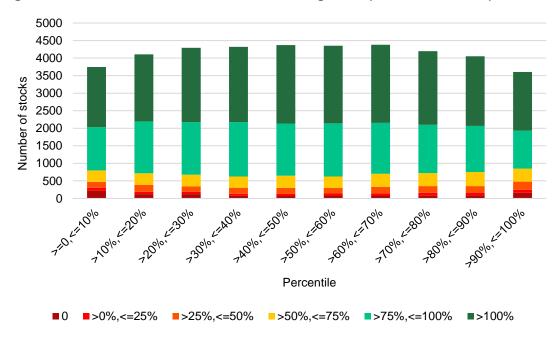


Figure B-1.9a.2: Dividend realised ratio - Sales growth (% by count)

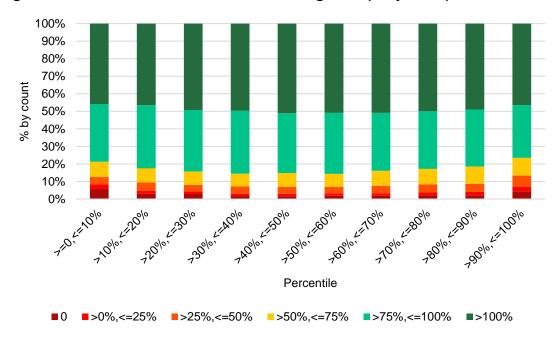


Figure B-1.9b.1: Dividend realised ratio – Forecast sales growth (number of stocks)

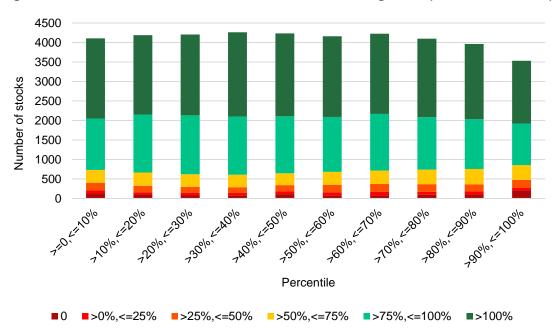


Figure B-1.9b.2: Dividend realised ratio – Forecast sales growth (% by count)

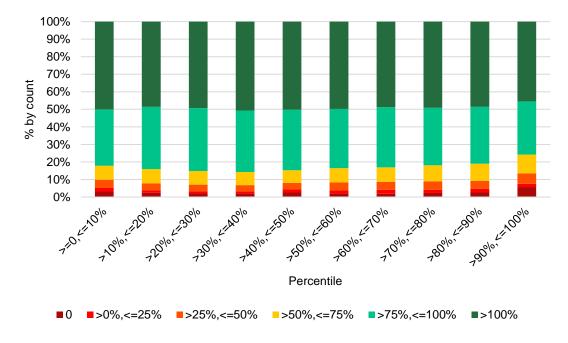


Figure B-1.10a.1: Dividend realised ratio – EPS growth (number of stocks)

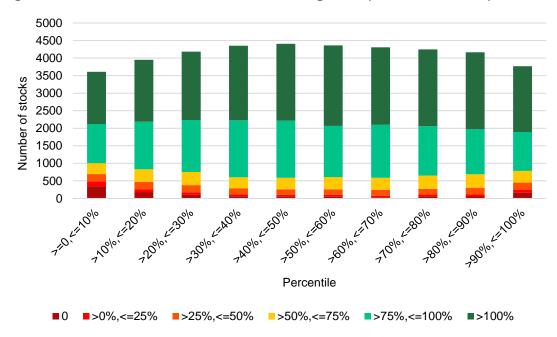


Figure B-1.10a.2: Dividend Realised Ratio - EPS growth (% by count)

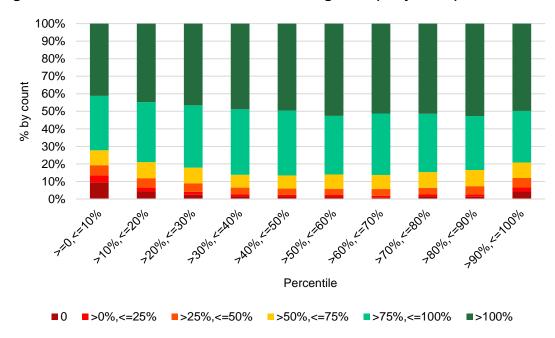


Figure B-1.10b.1: Dividend realised ratio – Forecast EPS growth (number of stocks)

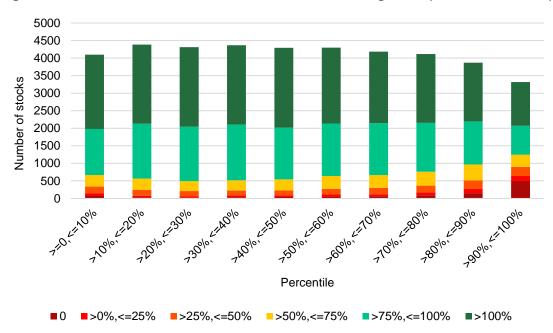


Figure B-1.10b.2: Dividend realised ratio - Forecast EPS growth (% by count)

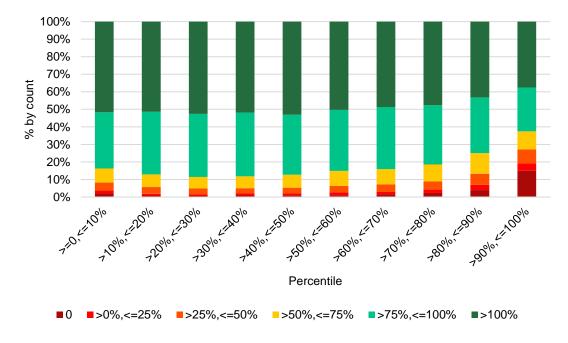


Figure B-1.11.1: Dividend realised ratio – Debt equity ratio (number of stocks)

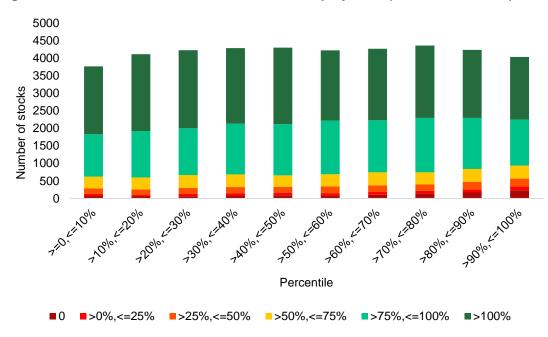


Figure B-1.11.2: Dividend realised ratio - Debt equity ratio (% by count)

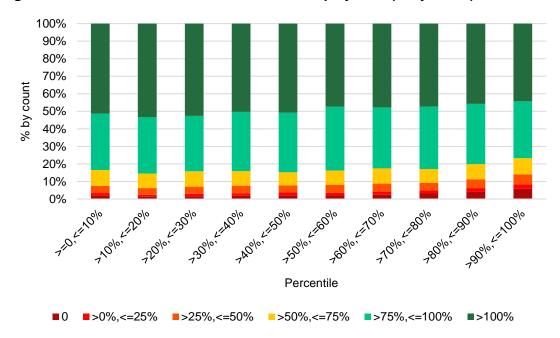


Figure B-1.12a.1: Dividend realised ratio – PE (Number of stocks)

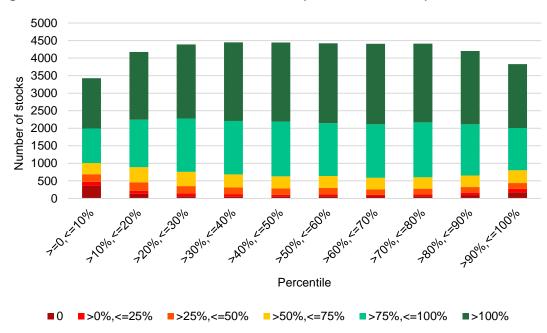


Figure B-1.12a.2: Dividend realised ratio – PE (% by count)

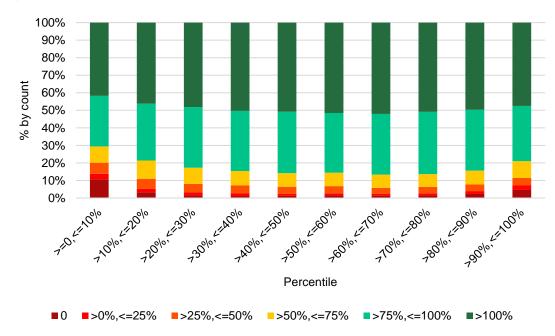


Figure B-1.12b.1: Dividend realised ratio – Forecast PE (number of stocks)

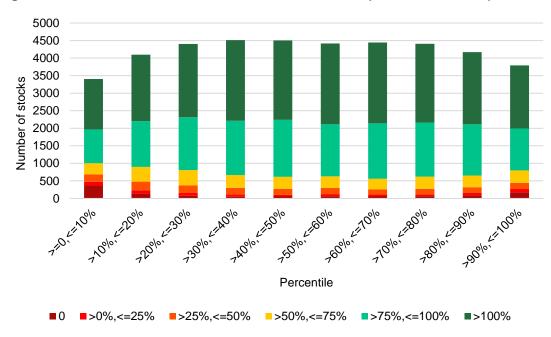
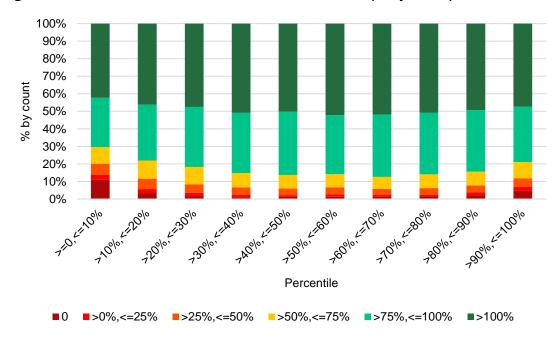


Figure B-1.12b.2: Dividend realised ratio – Forecast PE (% by count)



Appendix C – Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each region

Figure D-12.1: Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each review (Asia Pacific ex Japan ex China)

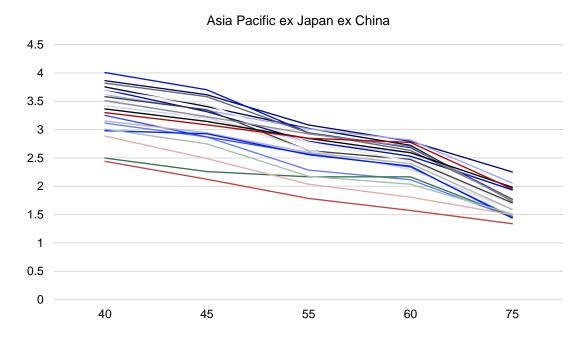


Figure D-12.2: Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each review (China)

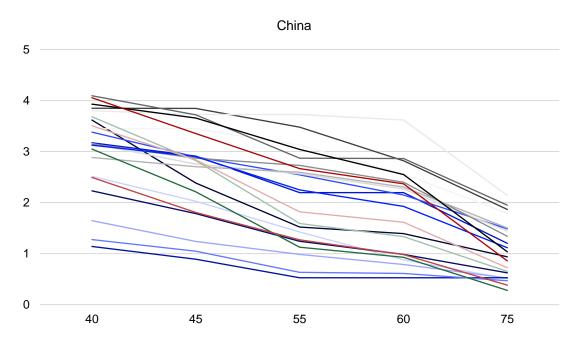


Figure D-12.3: Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each review (Japan)

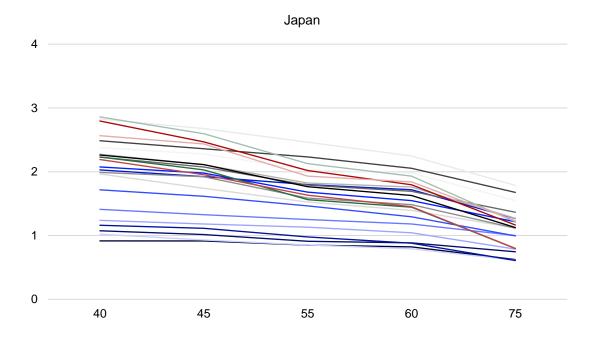


Figure D-12.4: Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each review (Developed Europe)

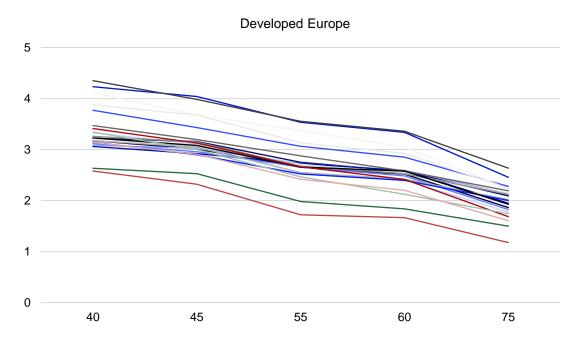


Figure D-12.5: Dividend Yield Level at 40th, 45th, 55th, 60th, 75th percentile for each review (Emerging Europe)

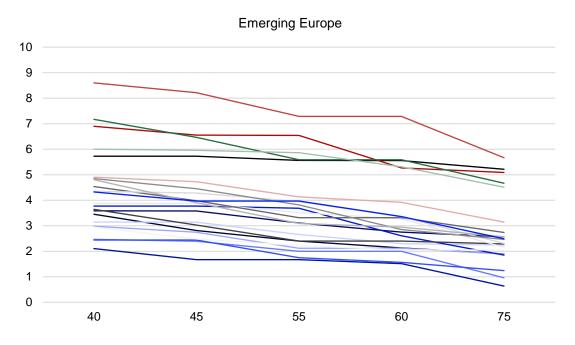


Figure D-12.6: Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each review (Middle East and Africa)

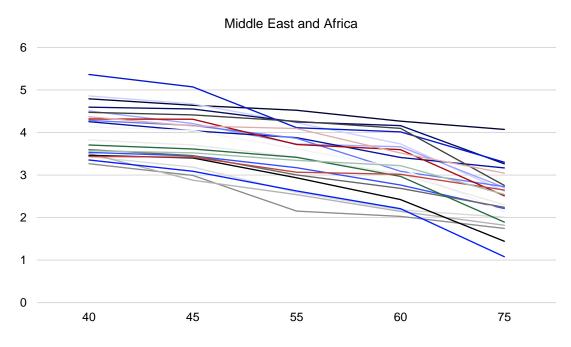


Figure D-12.7: Dividend yield level at 40th, 45th, 55th, 60th, 75th percentile for each review (Latin America)

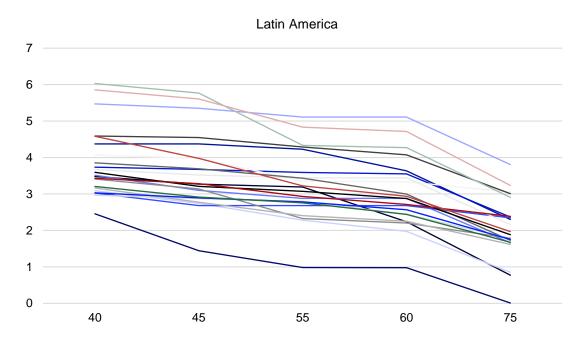
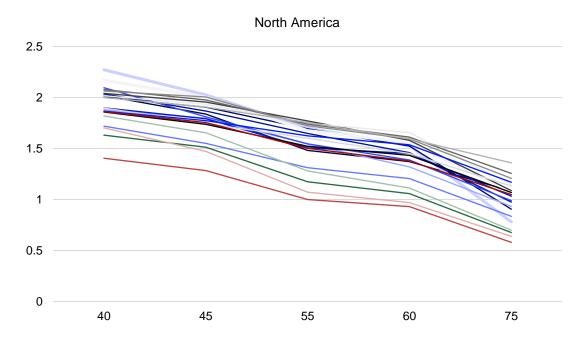


Figure D-12.8: Dividend yield level at 40^{th} , 45^{th} , 55^{th} , 60^{th} , 75^{th} percentile for each review (North America)



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