Ground Rules

November 2023

FTSE/JSE Africa Index Series

v8.4



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Section 1 Introduction

1. Introduction

- 1.1 This document sets out the Ground Rules for the construction and management of the FTSE/JSE Africa Index Series. Copies of the Ground Rules are available from FTSE Russell, the JSE Limited (JSE) (see appendix A) and on the websites www.lseg.com/en/ftse-russell/ and www.lseg.com/en/ftse-russell/ and wwww.lseg.com/en/ftse-russell and <a hre
- 1.2 The FTSE/JSE Africa Index Series is designed to represent the performance of South African companies, providing investors with a comprehensive and complementary set of indices, which measure the performance of the major capital and industry segments of the African market.

1.3 FTSE Russell

FTSE Russell is a trading name of FTSE International Limited, Frank Russell Company, FTSE Global Debt Capital Markets Limited (and its subsidiaries FTSE Global Debt Capital Markets Inc. and FTSE Fixed Income Europe Limited), FTSE Fixed Income LLC, FTSE (Beijing) Consulting Limited, Refinitiv Benchmark Services (UK) Limited, Refinitiv Limited and Beyond Ratings.

- 1.4 The base currency of the index series is South African Rand.
- 1.5 The FTSE JSE Responsible Investment Index Series takes account of ESG factors in the index design.

The remaining benchmarks within the FTSE/JSE Africa Index Series Family do not take account of ESG factors in the index design and do not pursue any ESG objectives. Please see the Ground Rules for the FTSE JSE Responsible Investment Index Series for details of the relevant ESG factors.

1.6 IOSCO

- 1.6.1 FTSE Russell considers that the FTSE/JSE Africa Index Series meets the IOSCO Principles for Financial Benchmarks as published in July 2013.
- 1.7 FTSE Russell hereby notifies users of the index series that it is possible that circumstances, including external events beyond the control of FTSE Russell, may necessitate changes to, or the cessation of, the index series and therefore any financial contracts or other financial instruments that reference the index series or investment funds which use the index series to measure their performance should be able to withstand, or otherwise address the possibility of changes to, or cessation of, the index series.
- 1.8 Index users who choose to follow this index series or to buy products that claim to follow this index series should assess the merits of the index series rules-based methodology and take independent investment advice before investing their own or client funds. No liability whether as a result of negligence or otherwise is accepted by FTSE Russell or JSE for any losses, damages, claims and expenses suffered by any person as a result of:
 - any reliance on these Ground Rules;
 - any errors or inaccuracies in these Ground Rules;
 - any non-application or misapplication of the policies or procedures described in these Ground Rules; and/or
 - any errors or inaccuracies in the compilation of the index series or any constituent data.

- 1.9 There are different categories under which the FTSE/JSE Africa Index Series belong. The indices may be grouped into the following categories.
- 1.9.1 Headline indices

There are seven indices making up the headline series (the FTSE/JSE All Share Index, the FTSE/JSE Large & Mid Cap, the FTSE/JSE Large Cap, the FTSE/JSE Mid Cap Index, the FTSE/JSE Small Cap, the FTSE/JSE Fledgling Index and the FTSE/JSE Top 40 Index).

1.9.2 Tradable indices

A tradable index is any index on which a JSE-listed derivative product is based. What is important to note is that an index can change tradable status as and when the demand for derivative contracts changes. Thus, an index will no longer be tradable if the relevant derivative product is terminated.

1.9.3 All-share industry indices

The Industry Classification Benchmark (ICB) consists of four levels of classification and at the highest level there are 11 industries. The classification of the FTSE/JSE All Share Index constituents at industry level will be used to calculate an index for each of the 11 Industries.

1.9.4 All-share supersector indices

There are no indices at the supersector level.

1.9.5 All-share sector indices

The third level of the ICB is sectors. The classification of the FTSE/JSE All Share Index at Sector level will be used to calculate the sector indices.

1.9.6 Secondary markets indices

The South African market has three separate secondary markets:

- development capital;
- venture capital; and
- the alternative exchange.

Indices will be calculated for the alternative exchange only.

1.9.7 Specialist indices

A number of specialist indices are included. The detailed index qualification criteria are listed in rule 4.5.16.

1.9.8 Capped indices

Capped indices can be based on any index category of the FTSE/JSE African Index Series. It assumes the same rules for construction (shares in issue, quarterly review and corporate actions) except that the weighting is applied on a quarterly basis as per appendix B.

1.9.9 Shareholder weighted indices

The constituents of the FTSE/JSE Shareholder Weighted (SWIX) All Share Index are based on the FTSE/JSE All Share Index and selected by gross market capitalisation. The constituents of the FTSE/JSE SWIX Top 40 Index are independently ranked and selected by their SWIX net market capitalisation. All SWIX constituents are down-weighted in the SWIX indices by applying an alternate free float, called the SWIX free float. The SWIX free float represents the proportion of a constituent's share capital that is held in dematerialised form and registered on the South African share register. The SWIX free float will not exceed the FTSE/JSE company free float.

Refer to appendix C for a full description of how the SWIX free float is calculated.

1.9.10 Style indices

The primary purpose of these indices is to provide investors with a measure of the performance of value and growth companies that are constituents of the FTSE/JSE All Share Index. There are two indices representing value and growth portfolios. The FTSE/JSE Value index is designed to reflect portfolios focusing on the price and value characteristics of securities, weighted towards those companies with identifiable value characteristics. The FTSE/JSE Growth index is designed to reflect portfolios focusing on earnings and revenue growth, weighted towards those companies with identifiable growth characteristics. Detail is provided in appendix D.

1.9.11 FTSE/JSE Preference Share Index

The FTSE/JSE Preference Share Index is a market capitalisation weighted index consisting of nonconvertible, non-redeemable, floating rate preference shares schedule. (Please refer to appendix F.)

1.9.12 FTSE/JSE Equally Weighted Indices

FTSE/JSE Equally Weighted Indices are market capitalisation weighted indices consisting of stocks that are weighted equally at each quarterly review.

- 1.10 The FTSE/JSE Africa Index Series will be published on a frequency determined by FTSE Russell and JSE in consultation with the FTSE/JSE Index Series Advisory Committee.
- 1.11 Total return indices are published at the end of each working day. The total return indices are based on ex-dividend adjustments.

Section 2 Management responsibilities

Management responsibilities

2.1 FTSE Russell/JSE responsibilities

- 2.1.1 FTSE is the benchmark administrator of the index series¹.
- 2.1.2 FTSE Russell is responsible for the daily calculation and production of the index series, and will:
 - calculate all the indices in the FTSE/JSE Africa Index Series and will maintain records of the index weightings of all constituents and reserve companies;
 - make changes to the constituents and their weightings in accordance with the Ground Rules, following consultation with the JSE;
 - determine whether the status of each index should be firm, indicative, held or closed, as FTSE Russell is
 responsible for monitoring the performance of the FTSE/JSE Africa Index Series throughout the day.
 FTSE Russell will inform the JSE of all occasions when an index is not firm in the official index period
 and will inform the FTSE/JSE Index Series Advisory Committee of the reasons for all such occasions at
 the next regular meeting.
- 2.1.3 The JSE is responsible for the operation of the FTSE/JSE Africa Index Series.
 - The JSE will monitor and liaise with FTSE Russell on all changes to index and constituent data.
 - The JSE will carry out the quarterly review of the FTSE/JSE Africa Index Series and liaise with FTSE Russell on implementing the resulting constituent changes as required by the Ground Rules.

2.2 FTSE/JSE Index Series Advisory Committee

2.2.1 Committee responsibilities

The purpose of the committee is to consider and advise on matters relating to and proposed amendments to the Ground Rules governing the management of the FTSE/JSE Africa Index Series and to ensure that best practice is used in the construction and ongoing management of the indices.

In particular, the committee will:

- ensure that global standards are applied in the Ground Rules;
- advise on how to reconstruct or replace the existing index methodology;
- oversee the ongoing management of the indices, corporate actions and changes to the Ground Rules; and
- advise on the construction and methodology of new indices.

The term administrator is used in this document in the same sense as it is defined in <u>Regulation (EU) 2016/1011 of the European Parliament and of the Council of 8 June 2016 on</u> indices used as benchmarks in financial instruments and financial contracts or to measure the performance of investment funds (the European Benchmark Regulation) and <u>The</u> <u>Benchmarks (Amendment and Transitional Provision) (EU Exit) Regulations 2019</u> (the UK Benchmark Regulation).

2.2.2 The Terms of Reference of the FTSE/JSE Index Series Advisory Committee are set out on the FTSE Russell website:

FTSE_JSE_Africa_Index_Series_Advisory_Committee.pdf

2.2.3 Committee membership

The JSE appoints the chairman, deputy chairman and members of the FTSE/JSE Index Series Advisory Committee. The chairman, or in his absence the deputy chairman, will chair meetings of the committee and will represent that committee outside meetings.

No member of the Advisory Committee is on the Advisory Committee to represent that member's employer but rather is there because of that person's specific expertise and to represent the interests of the industry generally.

2.2.4 Committee secretary

A secretary to the FTSE/JSE Index Series Advisory Committee is appointed by the JSE to support the work of the committee.

2.3 Amendments and exceptions

- 2.3.1 These Ground Rules shall be subject to regular review (at least once a year) to ensure that they continue to best reflect the aims of the index series. Any changes will normally be proposed by the FTSE/JSE Advisory Committee or any of those responsible for the operation and administration of the FTSE/JSE Index Series and may be authorised only by the FTSE Russell Index Governance Board.
- 2.3.2 Where FTSE/JSE or the FTSE/JSE Index Series Advisory Committee determines that the Ground Rules are silent or do not specifically and unambiguously apply to the subject matter of any decision, any decision shall be based as far as practical on the Statement of Principles. After making any such determination, FTSE/JSE shall advise the market of its decision at the earliest opportunity. Any such treatment will not be considered as an exception or change to the Ground Rules, or to set a precedent for future action, but FTSE/JSE will consider whether the rules should subsequently be updated to provide greater clarity.

An exception to the Ground Rules may be authorised by the FTSE Russell Index Governance Board under the Statement of Principles. Where an exception is granted to the Ground Rules under this rule, FTSE/JSE shall advise the market at the earliest opportunity. Any exception shall not be deemed to create a precedent for future decisions by FTSE/JSE, the FTSE Russell Index Governance Board or the FTSE/JSE Index Series Advisory Committee.

Section 3 FTSE Russell Index policies

3. FTSE Russell Index policies

These Ground Rules should be read in conjunction with the following policy documents, which can be accessed using the links below.

3.1 Corporate Actions and Events Guide

3.1.1 Full details of changes to constituent companies due to corporate actions and events can be accessed in the Corporate Actions and Events Guide using the following link:

Corporate_Actions_and_Events_Guide.pdf

3.2 Statement of Principles for FTSE Russell Equity Indices (the Statement of Principles)

Indices need to keep abreast of changing markets and the Ground Rules cannot anticipate every eventuality. Where the rules do not fully cover a specific event or development, FTSE Russell will determine the appropriate treatment by reference to the Statement of Principles, which summarises the ethos underlying FTSE Russell's approach to index construction. The Statement of Principles is reviewed annually and any changes proposed by FTSE Russell are presented to the FTSE Russell Index Policy Advisory Board for discussion before approval by the FTSE Russell Index governance board.

The Statement of Principles can be accessed using the following link:

Statement_of_Principles.pdf

3.3 Queries, Complaints and Appeals

A constituent or prospective constituent company (or professional adviser acting on behalf of the company), a national organisation or a group of no fewer than 10 users of the indices from different organisations acting in their professional capacity may appeal against decisions taken by FTSE Russell.

FTSE Russell's complaints procedure can be accessed using the following link:

Benchmark_Determination_Complaints_Handling_Policy.pdf

FTSE Russell's appeal process can be accessed using the following link:

Appeals_Against_Decisions.pdf

3.4 Index Policy for Trading Halts and Market Closures

3.4.1 Guidance for the treatment of index changes in the event of trading halts or market closures can be found using the following link:

Index_Policy_for_Trading_Halts_and_Market_Closures.pdf

3.5 Index Policy in the Event Clients are Unable to Trade a Market or a Security

3.5.1 Details of FTSE Russell's treatment can be accessed using the following link:

Index_Policy_in_the_Event_Clients_are_Unable_to_Trade_a_Market_or_a_Security.pdf

3.6 Recalculation Policy and Guidelines

- 3.6.1 Where an inaccuracy is identified, FTSE Russell will follow the steps set out in the FTSE Russell Index Recalculation Guidelines when determining whether an index or index series should be recalculated and/or associated data products reissued. Users of the FTSE Global Equity Index Series will be notified through appropriate media.
- 3.6.2 Users of the FTSE/JSE Africa Index Series are notified through appropriate media.

For further information, please refer to the FTSE Russell Recalculation Policy and Guidelines document, which is available on the FTSE Russell website using the link below or by e-mailing <u>info@ftserussell.com</u>.

Recalculation_Policy_and_Guidelines_Equity_Indices.pdf

3.7 Policy for Benchmark Methodology Changes

Details of FTSE Russell's policy for making benchmark methodology changes can be accessed using the following link:

Policy_for_Benchmark_Methodology_Changes.pdf

3.8 FTSE Russell Governance Framework

3.8.1 To oversee its indices, FTSE Russell employs a governance framework that encompasses product, service and technology governance. The framework incorporates the London Stock Exchange Group's three lines of defence risk management framework and is designed to meet the requirements of the IOSCO Principles for Financial Benchmarks², the European benchmark regulation³ and the UK benchmark regulation⁴. The FTSE Russell Governance Framework can be accessed using the following link:

FTSE Russell Governance Framework.pdf

3.9 Sustainable Investment Metrics

Please see the FTSE Russell <u>Sustainable Investment Metrics</u> website for the ratings, scores and values of the environmental, social and governance (ESG) factors listed in Annex II to Delegated Regulation (EU) 2020/1816, which are taken into account in the benchmark methodology for the benchmarks within this index series.

3.10 Real Time Status Definitions

3.10.1 For indices that are calculated in real time, please refer to the following guide for details of real time status definitions:

Real_Time_Status_Definitions.pdf

² IOSCO Principles for Financial Benchmarks Final Report, FR07/13 July 2013.

³ Regulation (EU) 2016/1011 of the European Parliament and of the Council of 8 June 2016 on indices used as benchmarks in financial instruments and financial contracts or to measure the performance of investment funds.

⁴ The Benchmarks (Amendment and Transitional Provision) (EU Exit) Regulations 2019.

Section 4 Index construction

4. Index construction

4.1 Eligible securities

- 4.1.1 All classes of ordinary shares in issue, excluding inward listings affecting foreign portfolio investment allowances, are eligible for inclusion in the FTSE/JSE Africa Index Series, subject to conforming to all other rules of eligibility, free float and liquidity.
- 4.1.2 Companies that have a full listing on the main board of the JSE, subject to conforming to all other eligibility criteria, are eligible for inclusion in the FTSE/JSE Africa Index Series. Companies listed on secondary boards (markets) may be included in the category for secondary markets, but will not be included in any other indices.
- 4.1.3 For the purposes of the FTSE/JSE Africa Index Series, where a security is listed on the JSE and is traded on the JSE trading system, that security will be considered as South African for the purposes of nationality and therefore eligible for the FTSE/JSE Africa Index Series, subject to conforming to all other eligibility criteria.
- 4.1.4 Convertible preference shares and loan stocks are excluded until converted.
- 4.1.5 Companies whose business is that of holding equity and other investments (e.g. investment trusts) will be eligible for inclusion. However, those investment funds, which have been classified by the Industry Classification Benchmark (ICB) as being in ICB sector open end and miscellaneous investment vehicles 302050 are excluded. Companies classified as pyramid companies will also not be eligible.
- 4.1.6 Exchange traded funds (ETFs) and funds whose prices are a direct derivation of underlying holdings (e.g. unit trusts and mutual funds) are not eligible for inclusion.

4.2 Secondary lines

- 4.2.1 Where there are multiple lines of equity capital in a company, all are included and priced separately, provided that they pass index eligibility screens in their own right. To be considered for FTSE/JSE All Share inclusion, each individual instrument must pass the free float, liquidity and size hurdles. Size refers to each individual instrument meeting the auto addition buffer of the FTSE/JSE All Share Index. Individual instruments will be deleted from the FTSE/JSE All Share Index if its size falls below the auto deletion buffer of the index. The aggregate of the multiple lines are used for ranking by company market cap.
 - All partly paid classes of equity are priced on a fully paid basis if the calls are fixed and are payable at known future dates. Those where future calls are uncertain in either respect are priced on a partly paid basis.
- 4.2.2 For the purposes of the FTSE/JSE Africa Index Series, companies with an approved dual listed structure are treated as secondary lines of a single entity.

4.3 Free float

The entire quoted equity capital of a constituent company is included in the calculation of its market capitalisation, subject to free float restrictions.

4.3.1 Free float restrictions include:

- shares directly owned by state, regional, municipal and local governments (excluding shares held by independently managed pension schemes for governments);
- shares held by directors, senior executives and managers of the company, and by their family and direct relations, and by companies with which they are affiliated;
- shares held within employee share plans;
- shares held by public companies or by non-listed subsidiaries of public companies;
- all shares where the holder is subject to a lock-in clause (for the duration of that clause)*;
- all shares where the holder has a stated incentive to retain the shares (e.g. bonus shares paid if holding is retained for a set period of time)*;
- shares held by an investor, investment company or an investment fund for strategic reasons as evidenced by specific statements to that effect in publicly available announcements, has an employee on the board of directors of a company, has a shareholder agreement, has successfully placed a current member to the board of directors or has nominated a current member to the board of directors alongside a shareholder agreement with the company;
- shares that are subject to ongoing contractual agreements (such as swaps) where they would ordinarily be treated as restricted; and
- shares that are not accounted for on the Strate register, only for instruments classified as foreign for index purposes by the South African Reserve Bank. The Strate register calculation is determined on a three-month average basis, using the three months prior to the review month, with a one-month lag.

*Free-float changes resulting from the expiry of a lock-in or incentive will be implemented at the next quarterly review subject to the lock-in or incentive expiry date occurring on or prior to the share and float change information cut-off date, If the previously locked-in shares are sold by way of a corporate event (such as a secondary offering), any change to the free float will be applied in accordance with rule 6.6.1.

- 4.3.2 Free float restrictions where holding is 10% or greater:
 - shares that are held by sovereign wealth funds; and
 - shares held by founders, promoters, former directors, venture capital and private equity firms, private companies, individuals (including employees) and shares held by several holders acting in concert.

The shares will remain restricted until the holding falls below 10%

4.3.3 Free float restrictions where holding is 30% or greater:

For clarity, portfolio holdings (such as pension funds, insurance funds or investment companies) are generally not considered as restricted. However, where a single portfolio holding is 30% or greater, it will be regarded as strategic and therefore restricted. The shares will remain restricted until the holding falls below 30%.

If in addition to the above restricted holdings, the company's shareholders are subject to legal restrictions, including foreign ownership restrictions, that are more restrictive, the legal restriction will be applied.

4.3.4 Nominee accounts:

Shares disclosed as being held by a nominee account are typically regarded as free float. However, if a restricted shareholder (as defined under rules 4.3.1 to 4.3.3) is identified as holding shares through a nominee account then that portion of shares will be restricted.

4.3.5 Minimum free float

Companies will be eligible for index inclusion if their global free float is above 5%, notwithstanding new inward listings which will be considered for all share inclusion using a calculated SWIX free float as per rule 4.3.7.

4.3.6 Free float review

Free float will be calculated using available published information rounded to 12 decimal places. Underlying data for the calculation of free float is collected on an ongoing basis and the detailed free float percentage as maintained by the JSE is updated accordingly.

June updates

In June, a constituent's free float will be updated regardless of size. No buffers are applied.

March, September and December updates

At the March, September and December quarterly updates, a constituent with a free float of greater than 15% will have their free float updated if it moves by more than three percentage points above or below the existing free float. For example, company A on a free float of 30% would trigger a change if its free float moved to above 33% or below 27%.

A constituent with a free float of 15% or below will be subject to a one percentage point threshold. For example, company B on a free float of 8% would trigger a change if its free float moved to above 9% or below 7%.

For SWIX constituents and constituents treated as foreign in the index series, the Strate register number will be updated regardless of size. The 1% and 3% thresholds, as set out above, will not be applicable.

Quarterly updates to free float will be applied after the close of business on the third Friday of March, June, September and December. The data cut-off for these quarterly changes will be the close of business on the last business day of the month on January, April, July, and October, respectively.

Updates arising from corporate events

Free float changes resulting from corporate events will not be subject to the buffers as detailed above and will be implemented in line with the event.

4.3.7 New and newly eligible inward foreign listings

To be considered for index inclusion, new inward listings with a global free float greater than 5% and a SWIX investable market capitalisation less than 0.5% of the small cap index on the review cut-off date will have their SWIX free float adjusted such that the SWIX investable market capitalisation equals to 0.5% of the small cap index. This adjustment will only be done during the first year of listing and thereafter, the SWIX free float will be updated based on the actual Strate register number.

4.4 Liquidity

Securities must be sufficiently liquid to be traded. The following criteria are used to ensure that illiquid securities are excluded.

4.4.1 Reliable price

The FTSE/JSE Index Series Advisory Committee must be satisfied that an accurate and reliable price exists for the purposes of determining the market value of a company. The FTSE/JSE Index Series Advisory Committee may exclude a security from the FTSE/JSE Africa Index Series if it considers that an accurate and reliable price is not available. The FTSE/JSE Africa Index Series uses the last available prices from the JSE when available.

4.4.2 Size – full market capitalisation

In accordance with rule 4.1, all eligible listed companies will be included in the FTSE/JSE Africa Index Series. The FTSE/JSE Index Series Advisory Committee will review the companies, which are proposed to be included at its semi-annual meeting. The largest eligible companies ranked by full market capitalisation, i.e. before the application of any investability weightings, comprising 99% of all eligible ordinary securities listed on the JSE main board, subject to selections buffers as set out in rule 4.5.8, will be included in the FTSE/JSE All Share Index. The implementation will take effect on the next trading day following the third Friday in March and September.

4.4.3 Liquidity

Securities in the FTSE/JSE Africa Index Series will be reviewed semi-annually in March and September for liquidity*. Any period of suspension will not be included in the test. The liquidity test will be applied on a prorata basis where the testing period is less than 12 months.

*When calculating the liquidity trades per month of any security, a minimum of five trading days in each month must exist, otherwise the month will be excluded from the test.

Securities that do not turnover at least 0.5% of their shares in issue, after the application of any free float restrictions, per month in at least 10 of the 12 months prior to a semi-annual review in March and September will not be eligible for inclusion in the indices (except the FTSE/JSE Fledgling Index and selected specialist indices) for the next six months. The free floated shares in issue for each month (February of the previous year to the January before the review and August of the previous year to the July before the review) will be as determined on the last business day of each month.

An existing constituent failing to trade at least 0.5% of its shares in issue, after the application of any free float restrictions, per month for more than four of the 12 months prior to the semi-annual review will be removed after close of the index calculation on the next trading day following the third Friday in March and September.

In the case of demutualisations qualifying for early entry under rule 8.4.1 where, upon listing, the entire free float is immediately transferred to private shareholders, the addition to the FTSE/JSE All Share Index will be deferred for 20 working days after official non-conditional trading has commenced providing the securities have a turnover of a minimum of 0.5% of their shares in issue, after the application of any free float restrictions, during this period.

In assessing liquidity, data on trading volume will be obtained from the JSE.

In exceptional market conditions, if trading volumes are very low, the FTSE/JSE Index Series Advisory Committee may reduce the percentage figure stated in this rule to avoid a large number of constituents being removed from the FTSE/JSE All Share Index. This discretion may not be applied to individual securities. If the FTSE/JSE Index Series Advisory Committee intends to exercise this discretion, it must make a public statement to that effect at least two weeks prior to its guarterly review.

There is no liquidity requirement for constituents of the FTSE/JSE Fledgling Index and the FTSE/JSE Alternative Exchange Index.

4.5 Index qualification criteria

4.5.1 FTSE/JSE Top 40 Index

The FTSE/JSE Top 40 Index will consist of the 40 most investable companies ranked by investable market capitalisation, in the FTSE/JSE All Share Index. The number of constituents in this index is maintained at a constant level.

4.5.2 FTSE/JSE Top 40 Index – USD

The FTSE/JSE Top 40 Index – USD will mirror the FTSE/JSE Top 40 Index but will be calculated in USD.

4.5.3 FTSE/JSE All Share Index

The FTSE/JSE All Share Index will represent 99% of the full market capital value i.e. before the application of any investability weightings of all ordinary securities listed on the main board of the JSE, which qualify under rule 4.1 as eligible for inclusion in the index.

4.5.4 FTSE/JSE Large & Mid Cap Index

The FTSE/JSE Large & Mid Cap Index will represent 96% of the full market capital value i.e. before the application of any investability weightings of all ordinary securities listed on the main board of the JSE, which qualify under rule 4.1 as eligible for inclusion in the index.

4.5.5 FTSE/JSE Large Cap Index

The FTSE/JSE Large Cap Index will represent 85% of the full market capital value i.e. before the application of any investability weightings of all ordinary securities listed on the main board of the JSE, which qualify under rule 4.1 as eligible for inclusion in the index.

4.5.6 FTSE/JSE Mid Cap Index

The FTSE/JSE Mid Cap Index will represent 85% to 96% of the full market capital value i.e. before the application of any investability weightings of all ordinary securities listed on the main board of the JSE, which qualify under rule 4.1 as eligible for inclusion in the index.

4.5.7 FTSE/JSE Small Cap Index

The FTSE/JSE Small Cap Index will represent 96% to 99% of the full market capital value i.e. before the application of any investability weightings of all ordinary securities listed on the main board of the JSE, which qualify under rule 4.1 as eligible for inclusion in the index.

4.5.8 FTSE/JSE Fledgling Index

The FTSE/JSE Fledgling Index will represent the bottom 1% (99% to 100%) of the full market capital value i.e. before the application of any investability weightings of all ordinary securities listed on the main board of the JSE, which qualify under rule 4.1 as eligible for inclusion in the index.

4.5.9 FTSE/JSE Industrial 25 Index

The FTSE/JSE Industrial 25 Index consists of the 25 largest companies ranked by investable market capitalisation (excludes ICB industries energy 60, basic materials 55, financials 30 and real estate 35), as at the date of the review in the FTSE/JSE All Share Index. The number of constituents in this index is maintained at a constant level. Buffers will be applied at each quarterly review to provide stability. The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the 22nd position or above by investable market capitalisation; and
- current constituents will be removed from the index if they are ranked on the 29th position or below by investable market capitalisation.

4.5.10 FTSE/JSE Resources 10 Index

The FTSE/JSE Resources 10 Index consists of the 10 largest companies ranked by investable market capitalisation (ICB industry energy 60 and basic materials 55), as at the date of the review in the South African resources sector, defined as the combination of the energy and basic materials industries. The number of constituents in this index is maintained at a constant level. Buffers will be applied at each quarterly review to provide stability. The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the ninth position or above by investable market capitalisation; and
- current constituents will be removed from the index if they are ranked on the 12th position or below by investable market capitalisation.

4.5.11 FTSE/JSE Financial 15 Index

The FTSE/JSE Financial 15 Index consists of the 15 largest companies ranked by investable market capitalisation (ICB industry financials 30 and real estate 35), as at the date of the review in the financial and real estate industries. The number of constituents in this index is maintained at a constant level. Buffers will be applied at each quarterly review to provide stability. The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the 13th position or above by investable market capitalisation; and
- current constituents will be removed from the index if they are ranked on the 18th position or below by investable market capitalisation.

4.5.12 FTSE/JSE Financial and Industrial 30 Index

The FTSE/JSE Financial and Industrial 30 Index consists of the 30 largest companies ranked by investable market capitalisation (excludes ICB industry energy 60 and basic materials 55), as at the date of the review in the FTSE/JSE All Share Index excluding the energy and basic materials industries. The number of constituents in this index is maintained at a constant level. Buffers will be applied at each quarterly review to provide stability. The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the 27th position or above by investable market capitalisation; and
- current constituents will be removed from the index if they are ranked on the 34th position or below by investable market capitalisation.

4.5.13 FTSE/JSE Industry Indices

A FTSE/JSE Industry Index consists of all constituents in the FTSE/JSE All Share Index that belong to that specific Industry.

4.5.14 FTSE/JSE Sector Indices

A FTSE/JSE Sector Index consists of all constituents in the FTSE/JSE All Share Index that belong to that specific sector.

- 4.5.15 FTSE/JSE Secondary Market Indices
 - A. FTSE/JSE AltX Index (Alternative Exchange Index)

The Alternative Exchange Index consists of all eligible companies with classes of ordinary shares on the alternative exchange. These companies are adjusted for free float but not assessed for liquidity. Stocks listed on the alternative exchange are only eligible for the FTSE/JSE AltX Index and the FTSE/JSE AltX 15 Index and cannot belong to any other FTSE/JSE Index. New entrants will join the index as part of the quarterly review process.

B. FTSE/JSE AltX 15 Index

The FTSE/JSE AltX 15 Index consists of the top 15 companies from the FTSE/JSE AltX Index when ranked by investable market capitalisation. Buffers will be applied at each quarterly review to provide stability. The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the 13th position or above by investable market capitalisation; and
- Current constituents will be removed from the index if they are ranked on the 18th position or below by investable market capitalisation.

A constant number of constituents will be maintained for the FTSE/JSE AltX 15 Index. Where a greater number of companies qualify to be inserted in an index than those qualifying to be deleted, the lowest ranking constituents presently included in the index will be deleted to ensure that an equal number of companies are inserted and deleted at the periodic review. Likewise, where a greater number of companies qualify to be deleted than those qualifying to be inserted, the securities of the highest-ranking companies that are presently not included in the index will be inserted to match the number of companies being deleted at the periodic review.

Companies will be reviewed for liquidity in March and September according to the liquidity methodology in rule 4.4.

Eligible new issues that come to market after the March or September liquidity review are required to trade 0.5% of their shares in issue, after the application of investability weightings for each consecutive month prior to the next periodic review. New issues are reviewed for index eligibility at the next periodic review. Intra-review corporate events will be treated accordingly with the index series. Where a constituent is removed from the index, its replacement will be found by picking the highest-ranking non-constituent when ranked by investable market capitalisation five days prior to the constituent being removed.

- 4.5.16 Specialist indices
 - A. FTSE/JSE SA Financials and Industrials* Index (J250)

The FTSE/JSE SA Financials and Industrials Index consists of all ordinary securities listed on the JSE that do not belong to the ICB industry energy 60 and basic materials 55, which qualify under rules 6.1 to 6.4 as eligible for inclusion in the FTSE/JSE All Share index and do not belong to the ICB industries energy and basic materials.

*The JSE sectors are made up of South African resources, South African financials and South African industrials. The FTSE/JSE Financials and Industrials Index relates to South African industrials and South African financials i.e. any all-share constituents not classified as South African resources.

B. FTSE/JSE SA Listed Property Index (J253 - SAPY)

The top 20 liquid companies by full market capitalisation, taken from the all-share index and listed in the ICB industry real estate 35, with a primary listing on the JSE. The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the 17th position or above by full market capitalisation; and
- current constituents will be removed from the index if they are ranked on the 24th position or below by full market capitalisation.
- C. FTSE/JSE Capped Property Index (J254 PCAP)

The top 20 liquid companies by full market capitalisation taken from the all-share index and listed in the ICB industry real estate 35 (primary or secondary). Constituent weights will be capped at 15% o n a quarterly basis after the application of corporate actions. The capping methodology is detailed in appendix B (except for that capped percentage that may be different). The following upper and lower buffers will be used:

- non-constituents will be eligible for index inclusion if they are ranked on the 17th position or above by full market capitalisation; and
- current constituents will be removed from the index if they are ranked on the 24th position or below by full market capitalisation.
- D. FTSE/JSE SA Industrials Index (J257)

The FTSE/JSE SA Industrials Index consists of all ordinary securities listed on the JSE that do not belong to the energy 60, basic materials 55, real estate 35 and financials 30 industries, which qualify under rules 6.1 to 6.4 as eligible for inclusion in the FTSE/JSE All Share.

E. FTSE/JSE SA Resources Index (J258)

The FTSE/JSE SA Resources Index consists of all ordinary securities listed on the JSE that belong to the energy 60 and basic materials 55, which qualify under rules 6.1 to 6.4 as eligible for inclusion in the FTSE/JSE All Share Index.

F. FTSE/JSE Dividend+ Index (J259)

The FTSE/JSE Dividend+ Index is a yield-weighted index designed to select and measure the performance of higher-yielding instruments. The index selects the top 30 companies by one-year forecast dividend yield. The number of constituents in this index is maintained at a constant level (see appendix E).

G. FTSE/JSE RAFI 40 Index (J260) and FTSE/JSE RAFI 40 Index – QSR (J261)

The FTSE/JSE RAFI 40 Index is designed to reflect the top 40 companies from the FTSE/JSE All Share Index by fundamentals at the time of the March annual review. Constituent weights will be capped at 10% on a quarterly basis after application of corporate actions. For further details regarding this FTSE/JSE RAFI 40 Index and its underlying methodology, please refer to the FTSE RAFI Index Series or the FTSE RAFI QSR Index Series Ground Rules available on www.lseg.com/en/ftse-russell/.

H. FTSE/JSE RAFI All Share Index (J263) and FTSE/JSE RAFI All Share Index - QSR (J265)

The FTSE/JSE RAFI All Share Index is designed to reflect the companies from the FTSE/JSE All Share Index by fundamentals at the time of the March annual review. For further details regarding this FTSE/JSE RAFI All Share Index and its underlying methodology, please refer to the FTSE RAFI Index Series or the FTSE RAFI QSR Index Series Ground Rules, available on www.lseg.com/en/ftse-russell/.

I. FTSE/JSE RAFI All Share Capped (J283)

FTSE/JSE RAFI All Share Capped Index will consist of the constituents of the FTSE/JSE All Share Index, weighted by RAFI fundamental values at the time of the March annual review. The index will be capped at 10% on a quarterly basis. For further details regarding FTSE/JSE RAFI All Share Capped Index and its underlying methodology, please refer to the FTSE RAFI Index Series Ground Rules, available on www.lseg.com/en/ftse-russell/.

For FTSE/JSE RAFI Indices - changes to constituent companies

Additions: when a constituent is added to the underlying index universe, the constituent will be considered for inclusion at the next March annual review.

Deletions: there will be no intra-review deletions except in the event of corporate actions and events, or of securities that are subject to surveillance by stock exchanges. Such securities will be deleted in line with their removal from the underlying index.

J. FTSE/JSE Shariah All Share Index (J143)

The FTSE/JSE Shariah All Share Index is designed to reflect the Shariah-compliant companies as screened by Yasaar from the FTSE/JSE All Share Index. For further details on the Shariah screening methodology and Yasaar, please refer to the FTSE Shariah Global Equity Index Series Ground Rules, which are available on www.lseg.com/en/ftse-russell/.

K. FTSE/JSE Shariah Top 40 Index (J140)

The FTSE/JSE Shariah Top 40 Index is designed to reflect the Shariah-compliant companies as screened by Yasaar from the FTSE/JSE Top 40 Index. This index will therefore consist of the FTSE/JSE Top 40 companies that are Shariah compliant. Deletions from the underlying FTSE/JSE Top 40 Index (including re-ranking following a demerger) will be applied to the FTSE/JSE Shariah Top 40 Index where appropriate. For further details on the Shariah screening methodology and Yasaar, please refer to the FTSE Shariah Global Equity Index Series Ground Rules, which are available on www.lseg.com/en/ftse-russell/.

L. FTSE/JSE Capped Shariah Top 40 Index (J141)

The FTSE/JSE Capped Shariah Top 40 Index is designed to reflect the Shariah-compliant companies as screened by Yasaar from the FTSE/JSE Top 40 Index. This index will be capped at 12% on a quarterly basis. This index will therefore consist of the FTSE/JSE Top 40 companies, which are Shariah compliant.

M. FTSE/JSE Equally Weighted Top 40 Index (J2EQ)

The FTSE/JSE Equally Weighted Top 40 Index will consist of constituents of the FTSE/JSE Top 40 Index. This index will then be equally weighted with each company at 2.5% in each quarterly review. The company weight will be distributed accordingly depending on the size of individual security lines for any company that has more than one security line.

N. FTSE/JSE Equally Weighted Industrial 25 Index (J5EQ)

The FTSE/JSE Equally Weighted Industrial 25 Index will consist of constituents of the FTSE/JSE Industrial 25 Index. This index will then be equally weighted with each company at 4% in each quarterly review. The company weight will be distributed accordingly depending on the size of individual security lines for any company that has more than one security line.

O. FTSE/JSE Equally Weighted Resources 10 Index (J3EQ)

The FTSE/JSE Equally Weighted Resources 10 Index will consist of constituents of the FTSE/JSE Resources 10 Index. This index will then be equally weighted, each company at 10% in each quarterly review. The company weight will be distributed accordingly depending on the size of individual security lines for any company that has more than one security line.

P. FTSE/JSE Equally Weighted Financial 15 Index (J4EQ)

The FTSE/JSE Equally Weighted Financial 15 Index will consist of constituents of the FTSE/JSE Financial 15 Index. This index will then be equally weighted, each company at 6.66% in each quarterly review. The company weight will be distributed accordingly depending on the size of individual security lines for any company that has more than one security line.

Q. FTSE/JSE Top 40 Minimum Variance Index (J700)

The FTSE/JSE Top 40 Minimum Variance Index will consist of constituents of the FTSE/JSE Top 40 Index that minimise index volatility, based on historical return information, thereby offering potential improvements to the risk/reward trade-off of the index. Deletions from the underlying FTSE/JSE Top 40 Index (including re-ranking following a demerger) will be applied to the FTSE/JSE Top 40 Minimum Variance Index where appropriate. For further details on the methodology, please refer to the FTSE Global Minimum Variance Index Series Ground Rules, which are available on www.lseg.com/en/ftse-russell/.

R. FTSE/JSE All Share Minimum Variance Index (J703)

The FTSE/JSE All Share Minimum Variance Index will consist of constituents of the FTSE/JSE All Share Index that minimise index volatility, based on historical return information, thereby offering potential improvements to the risk/reward trade-off of the index. For further details on the methodology, please refer to the FTSE Global Minimum Variance Index Series Ground Rules, which are available on www.lseg.com/en/ftse-russell/.

S. FTSE/JSE TOP 40 Risk Target Indices (J10P, J10E, J10T, J15P, J15E, J15T, J20P, J20E, J20T)

The FTSE/JSE Top 40 Risk Target Return Index Series is part of the FTSE Volatility Target Index Series and is based upon a rules-based framework that tracks the return of an investment strategy which aims to provide an investor with risk targeted exposures to the FTSE/JSE Top 40 Index. The risk target indices make use of the empirical properties of the risk statistic and aim to provide an equity investor access to three different levels of risk exposure for the FTSE/JSE Top 40 Index: 10%, 15% and 20% respectively.

The Ground Rules are available using the following link:

FTSE Volatility Target Index Series Ground Rules.pdf

T. FTSE/JSE Resources 10 Capped Index (J310)

The FTSE/JSE Resources 10 Capped Index will consist of constituents of the FTSE/JSE Resources 10 Index. This index will be capped at 30% at each quarterly review.

U. FTSE/JSE Capped Industrial 25 Index (J311)

The FTSE/JSE Capped Industrial 25 Index will consist of constituents of the FTSE/JSE Industrial 25 Index. This index will be capped at 30% at each quarterly review.

V. FTSE/JSE All Share Factor Indices (J203VF, J203QF, J203VOF, J203SF, J203DF, J203LF, J203MF, J203CF)

The FTSE/JSE All Share Factor Indices are designed to reflect the performance of companies from the FTSE/JSE All Share Index, capped at 5%, representing a specific set of factor characteristics. For further details regarding the FTSE/JSE All Share Factor Indices and its underlying methodology, please refer to the FTSE Global Factor Index Series Ground Rules, available on www.lseg.com/en/ftse-russell/.

W. FTSE/JSE Tradable Property Index (J800)

The FTSE/JSE Tradable Property Index consists of the FTSE/JSE Large & Mid Cap Index constituents of the FTSE/JSE All Property Index, which belong to the ICB real estate industry 35. Constituent weightings are based on shareholder weighted investable market capitalisation.

The index will have a minimum of 10 constituents. If there are not sufficient companies in the eligible universe to fill 10 constituents, the index will be filled by selecting the largest real estate companies in the FTSE/JSE Small Cap Index (J202) when ranked by gross market capitalisation.

Constituent weights will be capped at 15% on a quarterly basis after the application of corporate actions. The capping methodology is detailed in appendix B (except for the capped percentage that may be different).

X. FTSE/JSE All Property Index (J803)

The FTSE/JSE All Property Index consists of all constituents of the FTSE/JSE Shareholder Weighted All Share Index, which belong to the ICB real estate industry 35.

Constituent weights will be capped at 15% on a quarterly basis after the application of corporate actions. The capping methodology is detailed in appendix B (except for the capped percentage that may be different).

Y. FTSE/JSE SA REIT Index (J805)

The FTSE/JSE SA REIT Index consists of FTSE/JSE All Share Index constituents designated as a South African REIT.

Constituent weights will be capped at 15% on a quarterly basis after the application of corporate actions. The capping methodology is detailed in appendix B (except for the capped percentage that may be different).

Z. FTSE/JSE SA Financials Index (J580)

The FTSE/JSE SA Financials Index consists of all ordinary securities listed on the JSE, which belong to the financial 30 and real estate 35 industries that qualify under rules 6.1 to 6.4 as eligible for inclusion in the FTSE/JSE All Share Index.

4.5.17 FTSE/JSE Capped Indices

Capped versions are available for the FTSE/JSE All Share Index, FTSE/JSE Shareholder Weighted All Share Index, FTSE/JSE Top 40 Index and FTSE/JSE Shareholder Weighted Top 40 Index. Each index will have the same constituents and apply the same corporate action treatments as their underlying indices.

Constituent companies are capped at 12% using prices as at the close of business on the second Friday in March, June, September and December, and shares in issue and free float adjusted for corporate actions as at the Monday after the third Friday. The capping is implemented after the close of business on the third Friday of March, June, September and December.

4.5.18 FTSE/JSE Shareholder Weighted Indices

The constituents of the FTSE/JSE Shareholder Weighted All Share Index are based on the FTSE/JSE All Share Index and selected by gross market capitalisation. The constituents of the FTSE/JSE Shareholder Weighted Top 40 index are independently ranked and selected by their SWIX net market capitalisation. The FTSE/JSE Shareholder Weighted Top 40 Index is not derived from the FTSE/JSE Top 40 Index and potentially will not have the same constituents as the FTSE/JSE Top 40 Index.

Shareholder weighted variants of the ICB industry, ICB sector and South African sector indices are calculated. The constituents of the FTSE/JSE Shareholder Weighted Industry, Sector and SA Sector Indices are identical to the respective industry, sector and South African sector indices, thus requiring no additional criteria for inclusion. However, the constituents of the FTSE/JSE Shareholder Weighted SA Sector indices with a fixed number of constituents (SWIX resource 10, SWIX industrial 25, SWIX financial 15 and SWIX financial and industrial 30) are independently ranked and selected by their SWIX net market capitalisation. The FTSE/JSE Shareholder Weighted SA Sector indices, with a fixed number of constituents, are not derived from the respective South African sector indices and potentially will not have the same constituents as the respective South African sector indices.

The SWIX free float represents the proportion of a constituent's share capital that is held in dematerialised form and registered on the South African share register, maintained by Strate.

4.5.19 FTSE/JSE Style Indices

The FTSE Style Indices will have the same constituents as the FTSE/JSE All Share Index, thus requiring no additional criteria for inclusion. There are two indices representing value and growth portfolios. All corporate actions, index additions and index deletions will be applied as per the FTSE/JSE All Share Index.

4.5.20 FTSE/JSE Responsible Investment Index Series

The Responsible Investment Index comprises constituents of the Shareholder Weighted All Share Index (J403), which are also companies that have securities included in the FTSE All World Index. This is a market capitalisation weighted index. Constituents of the eligible universe require a FTSE ESG rating of 2.9 or above.

The Responsible Investment Top 30 Index comprises the top 30 FTSE ESG-rated companies included in the Responsible Investment Index ranked by FTSE ESG ratings. This is an equally weighted index.

For further details regarding FTSE/JSE Responsible Investment Index Series and the underlying methodology, please refer to the FTSE/JSE Responsible Investment Index Series Ground Rules available on <u>www.jse.co.za</u>.

Section 5 Periodic review of constituent companies

5. Periodic review of constituent companies

5.1 Review dates

5.1.1 The FTSE/JSE Africa Index Series is reviewed semi-annually in March and September. At the March and September semi-annual reviews, liquidity is tested and the universe for the main and AltX boards are ranked to determine auto additions and deletions, subject to selection buffers. The largest eligible companies ranked by full market cap, comprising 99% of all eligible main board companies will be determined.

At the June and December periodic reviews, new issues and companies newly eligible due to passing free float, will be considered for possible inclusion in the all-share, fledgling and AltX indices. Constituents of indices with a fixed number of constituents (the FTSE/JSE Top 40, the FTSE/JSE SWIX 40, the FTSE/JSE SAPY, the FTSE/JSE PCAP, the FTSE/JSE Resources 10 Index, the FTSE/JSE Industrial 25 Index, the FTSE/JSE Financial 15 Index, the FTSE/JSE Financial and Industrial 30 Index, their shareholder weighted variants, the FTSE/JSE AltX 15 Index) will be ranked to determine auto additions and deletions, subject to selection buffers.

The index reviews will be based on data for the purpose of determining full and investable market capitalisation as at the close of business on the Monday four weeks prior to the review effective date. The free float numbers used to determine the investable market capitalisation on review cut-off date will be based on the most recent shareholder information available. If a company free float was reviewed as part of the free float review process, the updated free float number will be used to determine the investable market capitalisation for ranking purposes on cut-off date, even though these changes will only be applied to the FTSE/JSE Index Series at start of business on review effective date.

Any constituent changes will be implemented after the close of business on the third Friday of the review month (i.e. effective Monday).

- 5.1.2 Details of the outcome of the review and the dates, on which any changes are to be implemented, will be published by FTSE/JSE.
- 5.1.3 The Shariah screening from Yasaar will be reassessed quarterly in March, June, September and December. The Shariah screening process uses data as at the close of business on the Monday four weeks prior to the review effective date taking into account new companies being added to the FTSE/JSE All Share Index and the FTSE/JSE Top 40 Index and implemented after the third Friday of the review month (i.e. effective Monday).

5.2 Responsibilities and reporting

- 5.2.1 FTSE/JSE is responsible for conducting the review of constituents for the FTSE/JSE Africa Index Series.
- 5.2.2 FTSE/JSE is responsible for publishing the outcome of the quarterly review.

5.3 Rules for insertion and deletion at the review

- 5.3.1 The rules for inserting and deleting companies at the review are designed to provide stability in the selection of constituents of the FTSE/JSE Africa Index Series while ensuring that the index continues to be representative of the market by including or excluding those companies that have risen or fallen significantly.
- 5.3.2 A security will be inserted into the FTSE/JSE Top 40 Index and the FTSE/JSE SWIX Top 40 Index at the periodic review if it rises to position 35 or above when the eligible securities for each index are ranked by investable market capitalisation.
- 5.3.3 A security will be deleted from the FTSE/JSE Top 40 Index and the FTSE/JSE SWIX Top 40 index at the periodic review if it falls to position 46 or below when the eligible securities for each index are ranked by investable market capitalisation.
- 5.3.4 A security will be inserted/deleted from the FTSE/JSE All Share index, FTSE/JSE Large & Mid Cap Index, FTSE/JSE Large Cap Index, FTSE/JSE Mid Cap Index and FTSE/JSE Small Cap Index if it rises above/falls below the position stated at the periodic review.

Index	Auto addition	Auto deletion
All Share	98.5%	99.5%
Large & Mid Cap	95%	97%
Large Cap	83%	87%
Mid Cap	95%	97%
Small Cap	98.5%	99.5%

Minimum investable market capitalisation requirement for the FTSE/JSE All Share Index

An instrument will be eligible for the FTSE/JSE All Share index provided the market capitalisation of its available float is 0.5% or greater than the investable market capitalisation of the FTSE/JSE Small Cap Index on review cut-off date and it qualifies in all other respects.

A current constituent will be deleted from the FTSE/JSE All Share index should the investable market cap fall to 0.2% or below relative to the FTSE/JSE Small Cap index investable market capitalisation on review cut-off date.

5.3.5 Rules for insertion in the FTSE/JSE Africa All Share Index

Non-constituents:

- Eligible companies at or above 83% of the index universe by full market capital value (i.e. before the application of any investability weightings) will be included in the FTSE/JSE Large Cap Index.
- Eligible companies ranked below 83% but within the top 95% of the index universe by full market capital value (i.e. before the application of any investability weightings) will be included in the FTSE/JSE Mid Cap Index.
- Eligible companies ranked below the top 95%, but within the top 98.5% of the index universe by full
 market capital value (i.e. before the application of any investability weightings) will be included in the
 FTSE/JSE Small Cap Index.

Existing constituents:

Large cap constituents will remain in the FTSE/JSE Large Cap Index if they fall within the top 87% of the ranking described in rule 5.3.4. If they are ranked between 87% and 97% of the index universe, they will move to the FTSE/JSE Mid Cap. If they are ranked below 97% of the index universe but within the top 99.5% of the index universe, they will move to the FTSE/JSE Small Cap Index. If they are ranked below 99.5% of the index universe by full market capital value (i.e. before the application of any investability weightings), they will be excluded from the FTSE/JSE All Share Index.

- Mid cap constituents will move to the FTSE/JSE Large Cap Index if they fall within the top 83% of the ranking described in rule 5.3.4. If they are ranked between 83% and 97% of the index universe, they will remain in the FTSE/JSE Mid Cap Index. If they are ranked below 97% of the index universe but within the top 99.5% of the index universe, they will move to the FTSE/JSE Small Cap Index. If they are ranked below 99.5% of the index universe by full market capital value (i.e. before the application of any investability weightings), they will be excluded from the FTSE/JSE All Share Index.
- Small cap constituents will move to the FTSE/JSE Large Cap Index if they fall within the top 83% of the ranking described in rule 5.3.4. If they are ranked between 83% and 95% of the index universe by full market capital value (i.e. before the application of any investability weightings) they will move to the FTSE/JSE Mid Cap Index. If they are ranked below 95% of the index universe but within the top 99.5% of the index universe, they will remain in the FTSE/JSE Small Cap Index. If they are ranked below 95% of the index universe by full market capital value (i.e. before the application of any investability weightings), they will be excluded from the FTSE/JSE All Share Index.
- 5.3.6 A constant number of constituents will be maintained for the FTSE/JSE Top 40 Index, SWIX 40 Index, the FTSE/JSE Industrial 25 Index, the FTSE/JSE Resources 10 Index, FTSE/JSE Financial 15 Index, the FTSE/JSE Financial and Industrial 30 Index, the FTSE/JSE AltX 15 Index, the FTSE/JSE SA Listed Property Index and the FTSE/JSE Capped Property Index. Where a greater number of companies qualify to be inserted in an index than those qualifying to be deleted, the lowest ranking constituents presently included in the index will be deleted to ensure that an equal number of companies are inserted and deleted at the periodic review. Likewise, where a greater number of companies, which are presently not included in the index, will be inserted to match the number of companies being deleted at the periodic review.
- 5.3.7 A constant number of constituents will not be maintained for the FTSE/JSE All Share Index, FTSE/JSE Large Cap Index, FTSE/JSE Large & Mid Cap Index, FTSE/JSE Mid Cap Index, FTSE/JSE Small Capitalisation Index, the FTSE/JSE Fledgling Index, the FTSE/JSE Industry Indices, the FTSE/JSE Sector Indices, or their Shareholder Weighted variants, or the FTSE/JSE Specialist Indices that do not have a fixed number of constituents. Stocks, which fall out of the above indices due to suspension, takeover, etc. will not be replaced, nor will a constituent of these indices be removed to accommodate new issues or new companies arising from restructuring of constituents, etc.
- 5.3.8 At the June and December reviews, any new issue that has satisfied the liquidity rule and has a full market capitalisation equal to or above the full market capitalisation of the constituent immediately above the auto addition buffer of the all-share (98.5%), at the previous semi-annual review, will join the relevant index based on the buffers within the all-share index. This will be applicable to the large and mid cap, large cap, mid cap and small cap indices. Any new issue that falls below the auto addition buffer of the all-share index, immediately after the previous semi-annual review, will join the fledgling index if it passes all other eligibility criteria.
- 5.3.9 Where a company is deleted after review changes have been published, but before the periodic changes have been implemented, the highest-ranking company from the new reserve list, excluding current index constituents, will replace the deleted company.

When a constituent is removed from the SA Listed Property or the Capped Property Index, the highestranking non-constituent when ranked by full market capitalisation (before the application of any investability weightings) in the eligible universe will become eligible for inclusion into the index and will be added to the index simultaneously. If no eligible constituent is available, no constituent addition will be made to the indices.

5.4 Monitoring of eligible companies

5.4.1 The market capitalisation of companies eligible for inclusion in the FTSE/JSE Africa Index Series is monitored by FTSE/JSE. All listed ordinary securities on the JSE will be used to conduct the periodic reviews.

5.5 Reserve lists

- 5.5.1 FTSE/JSE will be responsible for publishing the five highest-ranking non-constituents of the FTSE/JSE Top 40 Index and SWIX 40 index at the time of the periodic review. The appropriate reserve list will be used should one or more constituents are deleted from the FTSE/JSE Top 40 during the period up to the next quarterly review.
- 5.5.2 FTSE/JSE will also be responsible for publishing the three highest-ranking non-constituents of the FTSE/JSE Industrial 25 Index, the FTSE/JSE Resources 10 Index, FTSE/JSE Financial 15 Index, the FTSE/JSE Financial and Industrial 30 Index, the FTSE/JSE AltX 15 Index, the FTSE/JSE SA Listed Property Index and the FTSE/JSE Capped Property Index at the time of the periodic review.

Section 6 Changes to constituent companies

6. Changes to constituent companies

6.1 Corporate actions and events

Full details of changes to constituent companies due to corporate actions and events can be accessed in the corporate actions and events guide using the following link:

Corporate Actions and Events Guide.pdf

A corporate action is an action on shareholders with a prescribed ex-date. The share price will be subject to an adjustment on the ex-date. These include the following:

- capital repayments;
- rights issues/entitlement offers;
- stock conversion;
- splits (sub-division)/reverse splits (consolidation); and
- scrip issues (capitalisation or bonus Issue).

A corporate event is a reaction to company news (event) that may impact the index depending on the index rules. For example, a company announces a strategic shareholder is offering to sell their shares (secondary share offer) – this could result in a free float weighting change in the index. Where an index adjustment is required, FTSE Russell will provide notice advising of the timing of the change.

6.2 Removal and replacement

- 6.2.1 If a constituent is de-listed from the JSE, ceases to have a firm quotation, is subject to a takeover or has, in the opinion of the chairman and deputy chairman of the FTSE/JSE Index Series Advisory Committee (or their nominated deputies), ceased to be a viable constituent as defined by the Ground Rules, it will be removed from the list of constituents and replaced by the highest-ranking company by market capitalisation eligible on the reserve list as at the close of the index calculation two days prior to the deletion where applicable.
- 6.2.2 Where the company to be removed is a constituent of the FTSE/JSE 40 Index or SWIX 40 Index, the replacement company will be taken from the highest-ranking company by investable market capitalisation on the FTSE/JSE Top 40 Index and SWIX 40 reserve list as calculated at the time of the replacement. When the company is removed from the FTSE/JSE Large & Mid Cap Index, FTSE/JSE Large Cap Index, FTSE/JSE Mid Cap Index, the FTSE/JSE Industry Indices, the FTSE/JSE Sector Indices or their shareholder weighted variants, it will not be replaced. For all the FTSE/JSE Equally Weighted Indices, the replacement constituent will take the weight of the removed constituent. If there is more than one constituent deleted at the same time, an average weight will be taken and all replacement constituents will be given the average weight when included to the index.

- 6.2.3 Where the company to be removed is a constituent of a FTSE/JSE index, apart from the indices in rule 6.2.2, which has a fixed number of constituents (the FTSE/JSE Resources 10 Index, the FTSE/JSE Industrial 25 Index, the FTSE/JSE Financial 15 Index, the FTSE/JSE Financial and Industrial 30 Index or their shareholder weighted variants, or the FTSE/JSE AltX 15 Index), the replacement company will be the highest-ranking company, by investable market capitalisation, in the relevant reserve list as described in rule 5.5.2, as calculated at the time of the replacement. Where the company to be removed is a constituent of the FTSE/JSE SA Listed Property Index or the FTSE/JSE Capped Property Index the replacement company will be the highest-ranking company, by full market capitalisation, in the relevant reserve list, as calculated at the time of the replacement.
- 6.2.4 Changes to the FTSE/JSE Large & Mid Cap Index, the FTSE/JSE Large Cap Index, the FTSE/JSE Mid Cap Index and the FTSE/JSE Small Cap Index will be applied automatically to the FTSE/JSE All Share Index.
- 6.2.5 The removal and replacement are effected simultaneously, before the start of the index calculation on the second day following the day on which the event justifying removal was announced. Announcements made after the close of the index calculation are normally deemed to be made on the following business day.
- 6.2.6 A company deleted following a takeover, with a remaining free float of 5% or less, will not be re-considered for index inclusion until completion of a one-year trading record.
- 6.2.7 Constituents removed in accordance with rule 6.2.4, but which continue to trade thereafter, will be considered for re-inclusion to the index at the next review, subject to <u>Section 4</u> and that at least six months has passed between deletion and the implementation date of the changes arising from the review.

6.3 Mergers, restructuring and complex takeovers

- 6.3.1 If the effect of a merger or takeover is that one constituent in the FTSE/JSE Top 40 is absorbed by another constituent, the resulting company will remain a constituent of the appropriate index and a vacancy will be created. This vacancy will be filled by selecting the highest-ranking security in the appropriate reserve as at the close of the index calculation two days prior to the deletion and related indices adjusted in accordance with rule 6.2. For all the FTSE/JSE Fixed Constituent Equally Weighted Indices, the resulting constituent will retain the weight of the acquiring company in the merger (i.e. there will be no change to the acquiring company's weight) and the replacement constituent will take the weight of the company being deleted from the index in the merger.
- 6.3.2 If a constituent company in the FTSE/JSE Top 40 is taken over by a non-constituent company, the original constituent will be removed and replaced by the highest-ranking non-constituent on the appropriate reserve list. Any eligible company resulting from the takeover will be eligible to become the replacement company if it is ranked higher than any company on the reserve list. The replacement constituent will take the weight of the deleted company in all the FTSE/JSE Equally Weighted Indices.
- 6.3.3 If a constituent company is split to form two or more companies, then the resulting companies will be eligible for inclusion as index constituents in the appropriate FTSE/JSE African Indices if they are eligible in all respects. If a constituent of a fixed index splits into two or more companies, the applicable fixed index will be re-ranked using the close price on the first day of trade of the spin-off company and the smallest constituent(s) will be removed. e.g. a FTSE/JSE Top 40 Index constituent split into two companies may result in one or both of these companies remaining in the FTSE/JSE Top 40 Index. Where both companies remain in the FTSE/JSE Top 40 Index, the smallest FTSE/JSE Top 40 Index constituent will be deleted from the index. The weights will be adjusted accordingly for all the FTSE/JSE Equally Weighted Indices. If there are no changes to the constituents, the same weight is used for the company involved in the spin-off. If both remain then the largest company in the spin-off will take the weight of the parent company. The smallest company will then take the weight of the deleted company in the index.
- 6.3.4 In case of a spin-off or distribution in specie, the new constituent(s)/distributions will be added to all indices that the original company belonged to for a period of at least three days (more if the spun-off company does not trade on the effective date). Index constituent changes resulting from a spin-off will be determined based on the market values at close on day one of trading and applied using market values at close on day three of trading, following the date that the split begins trading. Consequently, the top 40 or any other index with a fixed number of constituents may have extra company(s) for at least three days or a resources index may have a non-resources company for at least three days.

For all the FTSE/JSE Equally Weighted Indices, the weights will be adjusted allowing for the companies in a spin-off event. On the day the smallest company(s) is/are deleted, the smallest constituent in the spin-off process will take the weight of the removed company(s), while the larger constituent will take the sum weight of the spun-off companies. If one of the spun-off entities is ineligible it will be deleted from the index, and its weight will be incorporated by the remaining constituent involved in the spin-off. In a distribution involving the inclusion of a temporary line, the weight of the distribution will be held within the temporary line until after settlement, at which point it will merge into the distributing company.

- 6.3.5 If the effect of a merger or takeover is that one constituent is absorbed by another constituent in any other index with a fixed number of constituents, the resulting company will remain a constituent of the index and a vacancy will be created. This vacancy will be filled by selecting the highest ranking non constituent in the relevant industry as at the close of the index calculation two days prior to the deletion.
- 6.3.6 If a constituent of any other index with a fixed number of constituents is taken over by a non-constituent company, the original constituent will be removed and replaced by the highest-ranking non-constituent in the relevant industry(ies). Any eligible company resulting from the takeover will be eligible to become the replacement company if it is the highest ranking non constituent company as at the close of the index calculation two days prior to the completion of the acquisition based on the combined value of the company after the merger.

6.4 New issues

6.4.1 Where a company, whether an existing constituent or not, undertakes an initial public offering (IPO) of a new equity security, that security will be eligible for fast entry inclusion to the FTSE/JSE Africa Index Series if its full market capitalisation amounts to 1% or more of the full capitalisation of the FTSE/JSE All Share Index, before the application of individual constituent investability weightings) FTSE/JSE will normally decide to include the new security as a constituent of the FTSE/JSE Africa Index Series, for the indices that it qualifies for after the close of business on the fifth day of official trading. In all cases, advance notification confirming the timing of the inclusion of the new constituent will be given accordingly. The fast entry rule is not applicable to the FTSE/JSE Top 40, FTSE/JSE SWIX 40 (and their derivative indices), FTSE/JSE Specialist Property Indices and any index with a fixed number of constituents, and not to any share that is classified as foreign, for index purposes. In the event of the fifth day of trading occurring during the week of the index review, an eligible fast entrant will be added to the index concurrent with the review effective date.

Please note: only those shares being offered for sale in the IPO will be included within the index weighting at the time of fast entry inclusion (subject to not being categorised as restricted shares as defined in rule 4.3).

- 6.4.2 For this rule, a company that is relisted following suspension or is reorganised or renamed or which arises from a demerger or complex reorganisation of another company which is not an existing constituent, shall not be considered to be a new issue. However, an IPO that arises from a demerger shall be considered as a new issue.
- 6.4.3 New issues, including demutualisations, that do not qualify as early entrants to the FTSE/JSE Africa Index Series as defined under rule 6.4.1 will become eligible for inclusion at the next quarterly review of constituents providing they have, since the commencement of official non-conditional trading, a minimum trading record of at least 20 trading days prior to the date of the review and turnover of a minimum of 0.5% of their shares in issue, after the application of any free float restrictions, per month in each month that the share traded.
- 6.4.4 The inclusion of early entries as defined under rule 6.4.1, excluding demutualisations, will not require a minimum trading record.
- 6.4.5 Variable, best effort and direct listing IPOs* will not be considered for fast entry inclusion since FTSE/JSE would be:
 - unable to confirm if the minimum free float requirement has been met; and
 - unable to assign an accurate free float for the purposes of the index calculation.

6.4.6 Variable, best effort and direct listing IPOs will be considered for index inclusion at the next quarterly review if, by the review cut-off date, a public disclosure* (which has been published post-IPO) is available confirming the updated shareholder structure. Index inclusion remains subject to meeting all other eligibility criteria. If the post-IPO shareholder structure has not been disclosed by the review cut-off date, the evaluation of the company will be deferred to a subsequent quarterly review.

*A public disclosure is typically by way of a company filing, stock exchange notice or shareholding regulatory announcement.

6.5 Suspension of dealing

If a constituent of a FTSE/JSE Africa Index, other than the FTSE/JSE Top 40 Index, is suspended, the constituent may remain in the FTSE/JSE Africa Index, at the price at which it is suspended, for up to 20 business days, whilst a suspended constituent of the FTSE/JSE Top 40 Index may remain in the index for up to five business days. During this time FTSE/JSE may delete the constituent immediately at zero value in cases it is expected that the constituent will not recommence trading. If a constituent is declared bankrupt, placed under curatorship, business rescue or placed in provisional liquidation, the last traded price will be adjusted down to zero value and it will subsequently be removed from the index with appropriate notice (typically T+2).

- If the company is a constituent of the top 40 index, the constituent will continue to be included in the index for a period of five business days. If the constituent continues to be suspended at the end of that period, it will be removed from the index with T+2 notice at the last traded price.
- In all other cases, the constituent will continue to be included in the index for a period of up to 20 business days at its last traded price.
- If, following review once a constituent has been suspended for 20 business days, a decision is taken to remove the constituent, FTSE Russell will provide notice (via an informative notice) of 20 business days (the notice period) that it intends to remove the constituent, at zero value, at the conclusion of the notice period*. If the security has not resumed trading at the conclusion of the notice period, it will be removed with two days' notice.

*If, during the notice period, further details are disclosed as to the reason for a company's suspension, those reasons (and any possible resumption of trade date) will be taken into account when determining if the company should remain on notice.

- If the suspended company resumes trading prior to the expiry of the notice period, the company will
 remain in its indices as normal.
- If, during the notice period, further details are disclosed as to the reason for a company's suspension, those reasons (and any possible resumption of trade date) will be taken into account when determining if the company should remain on notice.
- If a suspended constituent resumes trading on or before the last business day of the notice period, the deletion notice will be rescinded and the constituent will be retained in the index. However, where the constituent resumes trading after the 40th business day of suspension, the constituent will continue to be removed from the index as previously announced but in these circumstances the deletion will instead be implemented at market value unless there are barriers that render a market value irreplicable. In this event, the company will continue to be removed at zero.
 - If the notice period expires in the week preceding an index review, the company will be removed at zero value in line with the review date (subject to it not resuming trading during that week). In certain limited circumstances where the index weight of the constituent is significant and FTSE/JSE determines that a market-related value can be established for the suspended constituent, for example because similar company securities continue to trade, deletion may take place at the market-related value instead. In such circumstances, FTSE/JSE will set out its rationale for the proposed treatment of the constituent at the end of the suspension period. The company would then be removed at that value at the end of the notice period.

- In certain limited circumstances where the index weight of the constituent is significant and FTSE/JSE determines that a market-related value can be established for the suspended constituent, for example because similar company securities continue to trade, deletion may take place at the market-related value instead. In such circumstances, FTSE/JSE will set out its rationale for the proposed treatment. The company would then be removed at that value at the end of the notice period.
- If a constituent has been removed from the index and trading is subsequently restored, the constituent will only be re-considered for inclusion after a period of 12 months from its deletion. For the purposes of index eligibility, it will be treated as a new issue.

*The suspended companies policy also applies to constituents which have a price that FTSE/JSE considers to be unreliable.

6.6 Changes to constituent weightings

6.6.1

For the purposes of computing the FTSE/JSE Africa Index Series and to prevent a large number of insignificant weighting changes only shares and float changes occasioned by primary or secondary offerings will be updated outside of the quarterly update cycle where:

- there is a USD one billion investable market cap change related to a primary/secondary offering; or
- there is a resultant 5% change in index shares related to a primary or secondary offerings and a USD 250 million investable market cap change.

These changes will be implemented after the close on the day that the subscription period closes, assuming two days' notice can be provided; if two days' notice cannot be provided prior to the end of the subscription period, the change will still proceed with two days' notice and will be implemented at the earliest opportunity.

For example: subscription close is Monday 4 April and discovery of the event is Friday 1 April. Therefore, implementation will occur with two days' notice, effective on Wednesday 6 April (i.e. close of business Tuesday 5 April).

If discovery of the event occurs more than two days after the close of the subscription period, the changes will be deferred until the quarterly review cycle.

For example: subscription close is Monday 4 April and discovery of the event is Wednesday 6 April. Therefore, implementation will occur with two days' notice, effective on Monday 11 April (i.e. close of business Friday 8 April). However, if discovery occurred after Wednesday 6 April, the update will be deferred until the next quarterly review.

Please note:

- Index shares is defined as the number of shares in issue x free float.
- The market close price on the day prior to discovery (converted, if necessary, using the WM/Refinitiv 16:00 spot rates from the day prior to discovery) will be used to calculate whether the intra-quarter thresholds have been triggered. Any change to the market price between this date and index implementation will not result in a cancellation of the change. Similarly, if discovery occurs at the beginning of the subscription period and it does not achieve the triggers for intra-quarter implementation; but during the subscription period, the market price moves upwards and the thresholds are consequently triggered, the event will not be implemented and it will be deferred until the quarterly index review.
- The share and free float change triggers are calculated from an international investor stance. In the event
 that an index constituent is represented both in a global and domestic index (e.g. FTSE/JSE Top 40 and
 FTSE Global Equity Index Series), the update will only be implemented if the parameters are breached at
 global level. Such a situation may arise where a constituent is subject to a foreign ownership restriction in
 the global index.
- 6.6.2 Adjustments to reflect a major change in the amount or structure of a constituent company's issued capital must be made before the start of the index calculation on the day on which the change takes effect (e.g. the ex-date for a rights or capitalisation issue). Announcements of corporate events, which are made after the close of the index calculation, are normally deemed to be made on the following day.

6.6.3 Quarterly updates

In June, a constituent's shares are updated regardless of size. No buffers are applied. In March, September, and December, share changes greater than 1% will be updated.

The data cut-off for the March, June, September, and December changes will be the close of business on the last business day of the month in January, April, July, and October, respectively. Quarterly updates to shares are applied after the close of business on the third Friday of March, June, September and December.

- 6.6.4 Free float and share changes resulting from corporate events are not subject to the buffers as detailed in rules 6.6.1 and 6.6.3 and will be implemented in line with the event.
- 6.6.5 All adjustments are made before the start of the index calculation on the day concerned unless market conditions prevent this.
- 6.6.6 Corporate actions in non-market capitalisation indices that bring about a change to the shares in issue, free float or price of a constituent will be treated with a corresponding change to the constituent weighting factor in that index, resulting in both the weight of the constituent in the index, and the index divisor itself being unchanged.

Index code	Index name
J2EQ	Equally Weighted Top 40
J3EQ	Equally Weighted Resource 10
J4EQ	Equally Weighted Financial 15
J5EQ	Equally Weighted Industrial 25
J259	Dividend+
J260	RAFI 40*
J263	RAFI All Share*
J283	Capped RAFI All Share*
J261	RAFI 40 – QSR*
J265	RAFI All Share – QSR*

This is relevant to the following indices:

*Please note that capital reductions are not treated on a market capitalisation neutral basis and will result in a price adjustment.

6.7 Dummy lines

Temporary non-tradable instruments referred to as dummy lines, with the identifier DUMMY embedded in the ISIN code, may be used in the FTSE/JSE Africa Index Series on an ad hoc basis to deal with complexities surrounding certain corporate events. The dummy line would be created to temporarily reflect the terms of a complex corporate event while ensuring that the index reflects investor experience and remains replicable.

The use of the dummy line would be announced in advance through an information notice. On the ex-date of the event there would be an addition of the dummy line, which corresponds to the value of the distributed terms or rights.

More details on the use of dummy lines in corporate action events can be found in the Corporate Actions and Events Guide:

Corporate_Actions_and_Events_Guide.pdf

Section 7 Industry Classification Benchmark (ICB)

7. Industry Classification Benchmark (ICB)

7.1 Classification of constituents within industry and sectors⁵

- 7.1.1 The classification of a constituent may change from time to time.
- 7.1.2 The constituents of the corresponding industry indices, sector indices and the specialist indices based on a particular subsector will be affected when the classification of a company changes.
- 7.1.3 Details of the ICB are available from FTSE Russell and published on the FTSE Russell website (<u>www.lseg.com/en/ftse-russell/</u>) and can be accessed using the following link:

Industry Classification Benchmark

⁵ FTSE indices migrated to the new ICB classification system in March 2021.

Section 8 Index calculation

8. Index calculation

8.1 Index algorithm

- 8.1.1 All indices within the FTSE/JSE Africa Index Series will be displayed to one decimal point.
- 8.1.2 The FTSE/JSE Africa Index Series is calculated using the following formula:

$$\sum_{i=1}^{N} \frac{\left(p_i \times s_i \times f_i \times c_i\right)}{d}$$

Where:

- i=1, 2, ..., N;
- N is the number of securities in the index;
- *p_i* is the latest trade price of the component security (or the price at the close of the index on the previous day);
- s_i is the number of shares in issue used by FTSE Russell for the security, as defined in these Ground Rules;
- *f_i* is the investability weighting factor to be applied to a security to allow amendments to its weighting, expressed as a number between 0 and 1, where 1 represents a 100% free float. This factor is published by FTSE/JSE for each security in the underlying index;
- c_i is the capping factor to be applied to a security to correctly weight that security in the index. This factor
 maps the investable market capitalisation of each stock to a notional market capitalisation for inclusion in
 the index; and
- d is the divisor, a figure that represents the total issued share capital of the index at the base date. The
 divisor can be adjusted to allow changes in the issued share capital of individual securities to be made
 without distorting the Index.

Section 9 Status of indices

9. Status of indices

9.1 The FTSE/JSE Africa Index Series is calculated in real time.
 The indices are calculated on actual trades generated by the JSE trading system during the trading hours of the JSE.
 For further details of real-time definitions please refer to the following guide:

For further details of real-time definitions please refer to the following guide:

Real_Time_Status_Definitions.pdf

- 9.2 The official opening and closing hours of the FTSE/JSE Africa Index Series are in line with the trading hours on the JSE trading system. Variations to the official hours of the indices are published by FTSE/JSE as appropriate.
- 9.3 The FTSE/JSE Africa Index Series is calculated on all days when the JSE is open for trading.

Section 10 Appendix A – further information

10. Appendix A – further information

Contacting FTSE and JSE

Further information on the FTSE/JSE Africa Index Series is available from FTSE and the JSE.

Enquiries should be addressed in the first instance to:

JSE Limited

Indices Department One Exchange Square 2 Gwen Lane Sandown 2196 Sandton 2146 Republic of South Africa

Tel: +27 (11)520 7137 Website: <u>www.jse.co.za</u>

FTSE Russell

Client services FTSE Russell 10 Paternoster Square London EC4M 7LS

Tel: +44 (0)20 7866 1810 Fax: +44 (0)20 7866 1804 E-mail: <u>info@ftserussell.com</u> Website: <u>FTSE / JSE</u>

The FTSE Russell Sustainable Investment Metrics website can be found using the following link:

Sustainable Investment Metrics

Section 11 Appendix B – methodology for capping indices

11. Appendix B – methodology for capping indices

11.1 Capping methodology at quarterly reviews

Capping will only be applied at the quarterly review and therefore the percentage weight of any constituent in the index may move above/below the capped level during the quarter due to price changes and corporate actions.

- 1. The capping procedure is applied to the indices after the close of business on the third Friday of March, June, September and December and will be effective at the start of business on the following business day.
- 2. Any changes in constituents or corporate actions/events which take place on the following business day will be taken into account before the capping procedure is applied.
- 3. The calculation of the constituent weighting factors will be based on instrument prices taken on the second Friday of March, June, September and December.
- 4. On completion of the above steps, the capping procedure is applied using the below algorithm. Please note: the algorithm is applied to each constituent which requires capping, i.e. any constituent whose uncapped weight is greater than the capping level.

The constituent capping factor c_i is given by:

$$c_{i} = \frac{Z}{I \times (p_{i} \times s_{i} \times f_{i})} \sum_{j \in J} (p_{j} \times s_{j} \times f_{j})$$

Where:

- i denotes the security to be capped;
- j denotes an uncapped security;
- J is the subset of securities that are uncapped;
- p_k is the official closing price of the kth security;
- s_k is the number of shares in issue of the kth security;
- f_k is the free float factor of the kth security;
- I is the percentage of the index represented by all uncapped constituents; and
- Z is the percentage capping level.

The constituent capping factor is calculated for all constituents whose uncapped weight after the application of investability weightings is greater than the capping level. The weights of the capped and uncapped

constituents in the index are then calculated. If following the application of this capping procedure other constituents have moved above the capping level in weight, then the process is repeated including the new constituent(s) which require capping.

FTSE/JSE Capped and equally weighted indices

The construction of the FTSE/JSE Capped and Equally Weighted Indices follows the construction of existing FTSE/JSE Indices and only differ with regards to the maximum weight of each constituent. For clarity, the following characteristics of the FTSE/JSE Capped and Equally Weighted Indices will remain identical to that of the index on which they are based:

- number of constituents and also the list of constituents;
- application of liquidity screening;
- free float bands;
- eligibility criteria; and
- underlying data such as shares in issue, share prices and so on.

List of capped and equally weighted indices in the FTSE/JSE Africa Index Series:

Index code	Index name	Based on	Capping level
J141	Capped Shariah Top 40	Shariah Top 40	12%
J2EQ	Equally Weighted Top 40	Тор 40	2.5%
J3EQ	Equally Weighted Resource 10	Resource 10	10%
J4EQ	Equally Weighted Financial 15	Financial 15	6.67%
J5EQ	Equally Weighted Industrial 25	Industrial 25	4%
J254	Capped Property	N/A	15%
J260	RAFI 40	All Share*	10%
J283	Capped RAFI All Share	All Share*	10%
J261	RAFI 40 – QSR	All Share*	10%
J300	Capped Top 40	Тор 40	12%
J303	Capped All Share	All Share	12%
J310	Resources 10 Capped Index	Resources 10 Index	30%
J311	Capped Industrial 25 Index	Industrial 25	30%
J430	Capped Shareholder Weighted Top 40	Shareholder Weighted Top 40	12%
J433	Capped Shareholder Weighted All Share	Shareholder Weighted All Share	12%
J800	Tradable Property Index	Large & Mid Cap	15%
J803	All Property Index	Shareholder Weighted All Share	15%
J805	SA REIT Index	All Share	15%

*Note: at the time of the March annual review.

Group entity capping

To meet the requirements for capping two entities together, on review cut-off date:

- both company A and its related company B must be listed on the JSE and be constituents or prospective review constituents of the all-share index;
- consider the gross market capitalisation of company A and the value of its holding in company B at prevailing market prices and the current cross-holding percentage;
- if the market value of company A's holding in company B is greater than 75% of the total gross market capitalisation of company A, then both companies should be considered as a single entity for capping purposes in all capped indices in which both entities are constituents; and
- if the value of company A's holding in company B falls below 65% of company A's total gross market capitalisation at a subsequent quarterly review, then the two entities will no longer be capped as one entity.

Group entity capping applies to all indices that have a fixed capping level based on an underlying market capitalisation weighting or SWIX weighting. It does not apply to any equally weighted indices or any non-market capitalisation weighted indices.

Section 12 Appendix C – methodology for shareholder weighted indices

12. Appendix C – methodology for shareholder weighted indices

12.1 Shareholder weighted index calculation

The SWIX free float is based on the portion of listed share capital, on the South African share register, in dematerialised form. This information is obtained from Strate (Strate is the authorised central securities depository for the electronics settlement of all financial instruments in South Africa).

An average of the total holdings on the South African share register, in the three months prior to the review month, with a one-month lag, is used to calculate the SWIX free float. If this figure is not available, the FTSE/JSE company free float is used.

In addition, all securities deemed not available for local trade but included on the South African share register will be subtracted from the free float number calculated as per above.

Where the company's free float is lower than its SWIX free float, the company free float will be used.

Min (South African Register-Locally Unavailable Scrip) Total Listed Shares ; Company Free Float

The SWIX free float is calculated for all constituents of the SWIX indices.

The constituents of the FTSE/JSE Shareholder Weighted Top 40 index are independently ranked and selected by their SWIX net market capitalisation. The FTSE/JSE SWIX Top 40 Index is not derived from the FTSE/JSE Top 40 Index and potentially will not have the same constituents as the FTSE/JSE Top 40 Index.

The construction of the FTSE/JSE SWIX All Share Index follows the construction of the FTSE/JSE All Share Index. The following characteristics of the FTSE/JSE SWIX All Share Index will remain identical to that of the FTSE/JSE All Share:

- number of constituents and the list of constituents;
- application of liquidity screening;
- index calculation method (shares in issue * free float * price), eligibility criteria;
- underlying data such as shares in issue, share prices and so on; and
- application of corporate actions.

Section 13 Appendix D – methodology for style indices

13. Appendix D – methodology for style indices

13.1 Eligible securities

The constituents of the FTSE/JSE Style Indices will mirror the constituents of the FTSE/JSE All Share Index at all times.

13.2 Index data elements

All index related data of constituents of the FTSE/JSE Style Indices, including but not limited to shares in issue, free float and closing prices, will be identical to that of the FTSE/JSE All Share Index.

13.3 Calculation frequency

The FTSE/JSE Style Indices will only be calculated the end of the day.

13.4 Periodic review of constituents

The constituents of the FTSE/JSE Style Indices will mirror the constituents of the FTSE/JSE All Share Index at all times, including the changes at quarterly index reviews. The style items (including value and growth rankings) as calculated from basic accounting data will be reviewed semi-annually in March and September of each year. These changes will be applied simultaneously with the respective quarterly index reviews.

13.5 Fundamental data items

- 13.5.1 The basic accounting data to calculate the above measures are provided by IRESS.
- 13.5.2 Basic accounting data is accumulated for each constituent and used to calculate the style items. The following style items are used to calculate the style ranking for each company.

Value measures

- Book to price

Book to price is a company's common/ordinary equity capital at the most recent fiscal year-end divided by the company's market capitalisation at the review date. Common/ordinary equity is generally as reported, but is adjusted to exclude minority interest, preferred stock and selected items as appropriate.

- Sales to price

Sales to price is a company's most recent annual sales value divided by the company's market capitalisation at the review date. A more detailed definition of sales is provided under the three-year historic sales growth heading.

- Dividend yield

Dividend yield reflects the dividend declared per share and/or paid for the security in question for the most recent fiscal year, divided by the share price. It excludes special dividends but includes extra dividends. It is based on the gross dividend of a security, including normal withholding tax but excluding the special tax credit available in some countries.

- Cash flow to price

Cash flow to price is generally a company's most recent cash flow for the year divided by the market capitalisation of the company at the review date. If the cash flow is not reported it is estimated based on net income plus depreciation and other non-cash items.

Growth measures

- Three-year historic earnings per share growth

Three-year historic EPS growth is the average of the company's three most recent consecutive absolute EPS annual growth values. The most recent EPS value should be less than 18 months old (in developed markets). Annual earnings per share (EPS) is for the 12 months to fiscal year-end. EPS is calculated as net income after taxes, minority interest and preferred dividends, but before amortisation of intangibles and after-tax extraordinary items, divided by adjusted shares.

Three-year historic sales growth

Three-year historic sales growth reflects the average of the company's three most recent consecutive absolute net sales or revenue annual growth values. The most recently reported sales value should be less than 18 months old (in developed markets). Sales values are for the 12 months to the company's fiscal year end and are generally as reported by the company. However, sales are generally adjusted to exclude excise taxes, sales from non-operating activities and discontinued operations in addition to sales generated by associated companies. If the company has changed its year end and a 12-month figure is not reported, the reported value is annualised. A sales value is also calculated for banks, insurance and financial companies and includes interest, investment and premium income in addition to commission and fees as appropriate.

- Two-year forward earnings per share growth

EPS estimates are generally based on net income from continuing operations divided by weighted average shares outstanding for the year.

Two-year forward sales growth

Sales estimates generally reflect sales derived from the company's core-operating activities. Generally, transportation and non-operating costs are excluded from gross revenues for industrial corporations. Bank revenues include interest and non-interest income. Insurance revenues are comprised of net technical income and net financial income.

Return on equity* (one – pay-out ratio)

Return on equity is earnings per share (EPS) for the most recent fiscal year divided by the previous year's book value per share. Payout ratio is dividend per share (DPS) divided by EPS. Values are again for the 12 months to the most recent fiscal year-end. More detailed EPS, book value and dividend per share definitions can be found under the three-year historic EPS growth, book to price and dividend yield headings respectively.

- 13.5.3 The style items are subsequently normalised,
 - The data on each x-axis is truncated (see below). Outliers beyond the truncation limits remain outside of the truncation limit itself. No data item is discarded.
 - The truncation levels for each fundamental data item are as follows:

Value measures	Lower level	Upper level
Book to price	-20	20
Sales to price	-30	30
Dividend yield	0	20
Cash flow to price	-200	200

Growth measures	Lower level	Upper level
Three-year historic earnings per share growth	-200	200
Three-year historic sales growth	-70	70
Two-year forward earnings per share growth	-200	200
Two-year forward sales growth	-70	70
Return on equity* (one – payout ratio)	-300	300

- Following truncation, the data on each x-axis then has three standard deviations applied. Again, any
 outliers beyond three standard deviations remain outside of the three standard deviation limit. No data
 is discarded.
- The x-axis is then ranked so that 0 appears at the value end of the axis and 100 at the growth end. For the four value data items, the value measure is then found by identifying where on the x-axis each constituent lies and allocating that number as the value measure for each of the four value data items. The growth measures for the five growth data items are found in the same way. Those constituents which remain outside the truncation and standard deviation limits are then allocated the style rankings (either 0 or 100) dependant on which end of the x-axis they are.
- To find the value ranking for each constituent, the four value measures for the constituent are added and divided by four.
- To find the growth measures for each constituent, the five growth measures for the constituent are added and divided by five.
- If one or more of the value or growth measures are missing the value or growth measure will be divided by the requisite number of data items available.
- For the VR or GR to be calculated in this way, data on at least one value date item and one growth data item must be available for the constituent. If this is not the case the constituent will have both value and growth rankings applied from its subsector classification.
- The allocation of VR and GR by sub sector only occurs when there is no data item available for value and no data item available for growth.
- In this case, both the VR and GR are calculated by taking the average of all the value rankings and then the average of all the growth rankings in the companies sub sector as defined by the Industry Classification Benchmark system provided at least two constituents are available in this subsector. If there are less than two constituents on a regional basis, then the FTSE All-World Index will be used.
- Once the VR and GR have been calculated, they are then used to determine the overall style tanking (OSR) for each index constituent. The OSR is the average of the VR and GR for each constituent. The OSR is used to determine the value and growth weighting for each constituent in the FTSE/JSE All Share Index.

13.6 Index construction at semi-annual review

The companies in the FTSE/JSE All Share Index are ranked according to their OSR. Growth is at the top (high OSR) of the ranking and value at the bottom (low OSR) of the ranking.

Constituents showing high-growth characteristics (OSR tending towards 100) will be allocated to the growth index of the underlying style benchmark at a weight of 100%.

Constituents showing high-value characteristics (OSR tending towards 0) will be allocated to the value index of the style benchmark at a weight of 100%.

The constituents covering the middle 30% of the investable market capitalisation of the FTSE/JSE All Share Index will be allocated across both the value and growth indices according to the following bands:

Investable market capitalisation	Style weighting in index
Between 55% and 64.99%	75% growth/25% value
Between 45% and 54.99%	50% growth/50% value
Between 35.01% and 44.99%	25% growth/75% value

The methodology gives rise to certain company's investable market capitalisation falling either side of a particular band. In these circumstances, the constituent's style weight will be apportioned across the bands to ensure that its investable market capitalisation remains the same as in the underlying benchmark.

In the case of a fast entry to the FTSE All Share Index, the value ranking (VR) and growth ranking (GR) will be determined by reference to the Industry Classification Benchmark system subsector of the fast entry constituent. In the first instance this will be by reference to the relevant Subsector of the fast entry constituent in the FTSE/JSE All Share Index. If there are less than two companies in the subsector, reference will be made to the relevant global subsector in the FTSE All World Index.

Rights issues, scrip issues and similar corporate events will be applied in the same way as they are applied to the FTSE/JSE All Share Index. No change will be made to the VR, GR, OSR or style weighting of the company due to the event.

In the case of a takeover the VR, GR and OSR of the largest company by full market capitalisation will be applied to the company(ies) being taken over.

In the case of a merger the VR, GR and OSR of the largest company, as defined by the full market capitalisation of the companies subject to the merger, will be adopted by the newly merged company.

In the case of a demerger the VR, GR and OSR of the demerged companies will remain the same as the unmerged company. The demerged companies will be treated as separate companies for VR, GR and OSR purposes at the next FTSE/JSE Style Index review.

13.7 FTSE/JSE Style Index algorithms

Let:

$F_{cst} =$	free float of company s at time t
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SW_{cst} = the style weighting of company s at time t

N_{cst} = number of shares in issue for company s at time t

 P_{cst} = price in local currency for company s at time t

S = summation of company data within all-share

I_{ct} = value of index at time t

A FTSE/JSE Style Index at time t

$$I_{ct} = \frac{\sum_{s} N_{cst} P_{cst} F_{cst} S W_{cst}}{B_{ct}}$$

where B_{ct} is the index base adjusted for past capital changes.

Section 14 Appendix E – FTSE/JSE Dividend+ Index

14. Appendix E – FTSE/JSE Dividend+ Index

14.1 FTSE/JSE Dividend+ Index methodology

The FTSE/JSE Dividend+ Index is a yield weighted index designed to select and measure the performance of higher yielding stocks within the universe of the FTSE/JSE All Share Index. The FTSE/JSE Dividend+ Index selects the top 30 stocks by one-year forecast dividend yield. The constituents' weightings in the index are determined by their dividend yield as opposed to market capitalisation.

14.2 Review universe

At review the universe will comprise of constituents from the FTSE/JSE Large & Mid Cap index, excluding property companies where property companies are defined as those belonging to the real estate industry 35.

14.3 Index data elements

All data elements will be inherited from the FTSE/JSE Africa Index Series. The dividend yield data will be based on the one-year dividends per share forecast/estimates (excluding capital repayments and special dividends) sourced from Refinitiv. To be able to rank the review universe the one-year dividends per share forecast/estimates are divided by the underlying stock price at the review data cut-off date. The data will be obtained from the data provider on the cut-off date of the periodic review. In cases where no forecast exists for a current constituent, it will be removed from the index.

The dividend yield of the index will be calculated according to the existing methodology for the FTSE/JSE Africa Index Series, which include event types of cash dividends (CD) and interest payments for loan stock (IT) as shown on the JSE corporate actions schedule.

14.4 Periodic review of constituents

The index will be reviewed semi-annually in March and September as part of the FTSE/JSE quarterly index review.

At the time of the semi-annual review the selection of Dividend+ Index constituents is based on data taken on review cut date (the Monday four weeks prior to the review effective date). Dividend+ factors for constituents are calculated using price data from the second Friday of March and September.

The semi-annual reviews will be implemented in line with the FTSE/JSE Africa Index Series – implemented after the close of trading on the third Friday (i.e. effective Monday) of March and September.

The review universe outlined in rule 14.2 is screened for liquidity by removing the bottom 5% of companies; ranked in descending order by one-year median daily traded value. The daily traded value is obtained from the sum of the actual daily value traded (actual traded price multiplied by the respective trading volume) over 12 full months prior to the review cut-off date.

The review universe is then ranked in descending order by the forecast/estimate one-year dividend yields. To reduce index turnover buffers are used. Constituents that rank 20th place or above are added to the index, constituents that rank below 40th place are removed from the index. Both 20 and 40 are dependent on the current fixed number of constituents in the index.

To maintain a consistent 30 stocks at review, if there are less than 30 constituents after the above process, the next highest-ranking non-constituent is added until the 30 index stocks are selected. If more constituents are added than deleted at review and this leads to an index of greater than 30 constituents, the lowest-ranking constituents are removed until the index comprises of 30 constituents.

Where a company has more than one line of stock and both are eligible for inclusion into the index, both lines will be included and counted individually. If the two lines have different dividend yields, they will be treated separately according to their dividend forecast.

To prevent a large number of constituent changes a maximum limit of five additions and five deletions are used at each periodic review.

14.5 Calculation methodology

Each of the 30 index constituents are weighted within the index at review by their forecast/estimate one-year dividend yields. This constitutes the dividend yield (DY) factor for each constituent. The DY factor is applied to the investable market capitalisation of each stock to either increase or reduce the stocks weight within the index. This factor will be adjusted for corporate actions between semi-annual reviews to maintain market capitalisation neutrality.

14.6 Calculation frequency

The FTSE/JSE Dividend+ price index will be calculated in real time every 15 seconds. A total return index will be calculated on an end-of-day basis.

14.7 Main calculation currency

The index will be calculated and published in Rands only.

14.8 Intra-review changes

This index will maintain a constant number of 30 constituents. Intra-review changes will be in line with the underlying FTSE/JSE All Share Index. A constituent will be removed from the FTSE/JSE Dividend+ Index if it is also removed from the underlying FTSE/JSE All Share Index.

If a constituent is acquired by a non-constituent, the company will be removed from the FTSE/JSE Dividend+ Index.

Where two index constituents merge or one index constituent is acquired by another constituent, the factor that is applied to the investable market capitalisation is adjusted so that the new entity remains the same weight within the index as the combined remerged index weights. If an index constituent has a complex reorganisation or demerger, the newly spun-off company will be removed from the index after two days. To maintain transparency in this index, a reserve list will be determined at the semi-annual reviews. The reserve list will consist of five eligible non-constituents with the highest one-year forward-dividend yield.

14.9 FTSE/JSE Dividend+ Index algorithm

The index algorithm and calculation methodology are detailed below:

- F_{cst} = free float of company s at time t
- *N_{cst}* = number of shares in issue for company s at time t
- P_{cst} = price in local currency for company s at time t
- S = summation of company data within all-share
- *I_{ct}* = value of index at time t
- C_{cst} = dividend factor that is applied to each security to allow its weight within the index to be adjusted according to each forecast dividend yield

A FTSE/JSE Dividend+ Index at time t

$$I_{ct} = \frac{\sum_{s} N_{cst} P_{cst} F_{cst} C_{cst}}{B_{ct}}$$

where B_{ct} is the index base adjusted for past capital changes.

Section 15 Appendix F – FTSE/JSE Preference Share Index

15. Appendix F – FTSE/JSE Preference Share Index

15.1 FTSE/JSE Preference Share Index methodology

Preference shares are defined as shares bearing a fixed annual rate of dividend with a prior right over all ordinary shares in the distribution of dividends from annual profits and a prior claim to repayment of capital on a winding-up of the company. Unless such shares are specifically defined as non-cumulative the company is liable for any arrears of preference dividends.

The main purpose of the index is to create a transparent asset class.

15.2 Universe

The universe of this index will consist of only floating rate perpetual preference shares and only the ones that are not convertible.

15.3 Underlying data

The underlying data for this index will be drawn entirely from the JSE. No data is required from external parties. The floating rate preference shares (FR-PS) should all have a free float set at 100% for the following reasons:

- there is no capital gain from the FR-PS;
- they are held like bonds; and
- FR-PS have no voting rights.

15.4 Calculation methodology

A price and a total return index will be calculated.

The index will be market capitalisation weighted.

The index will only be calculated the end of the day.

15.5 Periodic reviews

This index will be reviewed quarterly in line with the current FTSE/JSE indices. The fast entry rule will not apply to this index. Additions will only be considered at quarterly index reviews.

Preference shares will be reviewed for liquidity in March and September according to the liquidity methodology in rule 4.4.

Eligible new issues that come to market after the March or September liquidity review are required to trade 0.5% of their shares in issue, after the application of investability weightings for each consecutive month prior to the next periodic review. New issues are reviewed for index eligibility at the next periodic review.

Preference shares with a market capitalisation below R100 million on the review cut-off date will not be eligible for inclusion in the index.

15.6 Corporate actions

Corporate actions will be treated according to what appears on the JSE CA schedule. The issuers of the preference shares are the best people to determine these. A blanket application of corporate actions to the preference shares and the underlying companies will not be accurate.

Section 16 Appendix G – FTSE/JSE Net of Tax Indices

16. Appendix G – FTSE/JSE Net of Tax Indices

16.1 List of FTSE/JSE Net of Tax Indices

In addition to the FTSE/JSE Africa Total Return Indices, which are calculated gross of South African dividend withholding tax but net of foreign dividend withholding taxes, the following equivalent net total return indices will also be calculated:

Index code	Index name	
JNX4	Shareholder Weighted Top 40 Index Net TRI	
JNS4	Shariah Top 40 Index Net TRI	
JNR4	RAFI 40 Index Net TRI	
JN00	Top 40 Index Net TRI	
JNOU	Top 40 Index – USD Net TRI	

In calculating net total return indices, withholding tax is deducted from the declared dividend with the resulting net dividend used in the XD adjustment.

Formula for determining net dividends:

$$\left(\left(GLR - STC _ CR \right) - \left(\frac{WT\% - FT\% + SARR\%}{100} \right) \right) + STC _ CR$$

Where:

GLR	=	Gross local rate
STC_CR	=	Secondary tax on companies credit rate
WT	=	Withholding tax
FT	=	Foreign tax
SARR	=	South African residents' reclaim

Please note: the resulting net dividend amounts used in the calculation of the above indices are published within the daily JSE CA schedule.

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