METHODOLOGY BOOK FOR: MSCI USA AI 100 Index - MSCI USA AI 100 Excess Return Index

November 2024

Contents

1. Introduction

The MSCI USA AI 100 Index[1] (the 'Index') aims to represent the performance of a set of companies that are selected from the MSCI USA IMI Index ("Parent Index") and are associated with the increased adoption and utilization of artificial intelligence, robots, and automation.

The MSCI USA AI 100 Excess Return Index is designed to represent the performance of an investment strategy tracking the MSCI USA AI 100 Index after deducting borrowing cost.

[1] The index is governed by a set of methodology and policy documents ("Methodology Set"), including the present index methodology document. Please refer to Appendix I for more details.

2. Index Construction

The Index is constructed from the MSCI USA IMI Index, the Parent Index. The Index selects companies which are assessed to have high exposure to business activities such as:

- Robotics/ Artificial Intelligence
- Internet of Things/ Smart Homes
- Cloud Computing
- Cybersecurity
- Medical Robotics
- Social Media Automation
- Vehicle Automation

MSCI may seek input from outside market experts on the ongoing evolution of the themes underlying the Index. However, such input is advisory only in nature. MSCI alone decides whether to use such input at all or to what extent. Receipt of such input, like any other feedback on MSCI indexes, may or may not lead to a change to the index or index methodology.

2.1 Eligible Universe

All securities from the Parent Index that are in the MSCI ACWI IMI Robotics & AI Index are included in the Eligible Universe.

2.2 Selected Universe

Stocks from the Eligible Universe with a relevance score[2] of 25%[3] or more are included in the Selected Universe. Further filtering is applied to the Selected Universe as detailed below.

2.2.1 GICS®[4] sector and GICS sub industry filtering score

Stocks mapped to the following GICS sub industries are excluded from the Selected Universe:

[2] Please refer to the MSCI Thematic Relevance Score Methodology at www.msci.com/index-methodology.

[3] The Relevance Scores used correspond to those calculated for MSCI ACWI IMI Robotics & AI Index. For more details on the steps followed to generate the Relevance Scores please see the corresponding methodologies, available at: www.msci.com/index-methodology

[4] GICS, the global industry classification standard jointly developed by MSCI and S&P Global Market Intelligence.

No.	GICS Sector	GICS Sub Industries
1	Communication Services	• Wireless Telecommunication Services • Alternative Carriers • Broadcasting • Interactive Home Entertainment • Integrated Telecommunication Services
2	Health Care	• Pharmaceuticals
3	Information Technology	• IT Consulting & Other Services

2.2.2 Liquidity criteria

Securities with 3-month ADTV (Average Daily Traded Value) greater than or equal to USD 5 Million are selected for inclusion in the Index. If this information is not available, the security will be excluded.

ADTV is calculated as:

$$ADTV_{3M} = \frac{ATV_{3M}}{252}$$

Where ATV_{3M} is annualized 3-month Average Traded Value of the security.

2.2.3 Volatility score selection

Securities with a Volatility Score that falls into the bottom three quartiles of the Parent Index are selected for inclusion in the Index. The Volatility Score of a security is calculated using the following formula:

$$Volatility\ Score = Max(3M\ volatility, 12M\ volatility)$$

Where:

$3M\ volatility =$ 3-month price volatility of a security calculated based on the 12 weekly prices from the last end of week prior to Index review date.

$12M\ volatility =$ 12-month price volatility of a security calculated based on the last 52 prices from the last end of week prior to Index review date.

If the price of a security is not available within the 3 month or 12 month of the calculation, the security will not be considered.

2.2.4 Security selection

From the securities remaining in section 2.2.3, the top 100 securities with the highest Relevance Score are selected. In case of a tie in the Relevance Score the security with the highest weight in the Parent Index will be selected first.

In the event that the number of securities remaining after section 2.2.3 is below 100, all the securities from the Eligible Universe are selected.

2.3 Weighting scheme

Stocks included in the Index are weighted by the product of Relevance Score and their weight in the Parent Index. Additionally, constituent weights are capped at the issuer level to mitigate concentration risk in the Index. The issuer weight in the Index is capped at 10% at every rebalance.

3. Constructing the MSCI USA AI 100 Excess Return Index

The MSCI USA AI 100 Excess Return Index is constructed by applying the MSCI Excess Return Indexes Methodology[5] to the gross total return variant of the MSCI USA AI 100 Index on each index calculation day[6].

[5] Please refer to the MSCI Excess Return Indexes methodology at https://www.msci.com/index-methodology

[6] The short-term rate used for the application of the Excess Return Indexes methodology is USD Libor overnight until December 31st, 2018, and USD SOFR overnight from January 1st 2019.

4. Maintenance of the Index

4.1 Semi-annual Index review

The Index is reviewed on a Semi-Annual basis in May and November to coincide with the May and November Index Reviews of the Parent Index, and the changes are implemented at the end of May and November. In general, the pro forma Index is announced nine business days before the effective date.

During the Semi-Annual Index Review, the Eligible Universe and Selected Universe are updated.

In general, MSCI uses the company business segment names, business description and revenue data as of two business days prior the rebalancing date for the Semi-Annual Index Review.

4.2 Annual Index Review

The set of relevant words (as described in section 2.2) are reviewed by MSCI during the May Semi-Annual Index Review.

4.3 Ongoing event-related maintenance

The general treatment of corporate events in the Index aims to minimize turnover outside of Index Reviews. The methodology aims to appropriately represent an investor's participation in an event based on relevant deal terms and pre-event weighting of the Index constituents that are involved. Further, changes in Index market capitalization that occur as a result of corporate event implementation will be offset by a corresponding change in the Variable Weighting Factor (VWF) of the constituent.

The following section briefly describes the treatment of common corporate events within the Index. No new securities will be added (except where noted below) to the Index between Index Reviews. Parent Index deletions will be reflected simultaneously.

EVENT TYPE	EVENT DETAILS
New additions to the Parent Index	A new security added to the Parent Index (such as IPO and other early inclusions) will not be added to the Index.
Spin-Offs	All securities created as a result of the spin-off of an existing Index constituent will be added to the Index at the time of event implementation. Reevaluation for continued inclusion in the Index will occur at the subsequent Index Review.
Merger/Acquisition	For Mergers and Acquisitions, the acquirer's post event weight will account for the proportionate amount of shares involved in deal consideration, while cash proceeds will be invested across the Index.

	If an existing Index constituent is acquired by a non-Index constituent, the existing constituent will be deleted from the Index and the acquiring non-constituent will not be added to the Index.
Changes in Security Characteristics	A security will continue to be an Index constituent if there are changes in characteristics (country, sector, size segment, etc.) Reevaluation for continued inclusion in the Index will occur at the subsequent Index Review.

Further detail and illustration regarding specific treatment of corporate events relevant to this Index can be found in the MSCI Corporate Events Methodology.

The MSCI Corporate Events methodology book is available at:
https://www.msci.com/index-methodology.

Appendix 1: Methodology Set

The Index is governed by a set of methodology and policy documents (“Methodology Set”), including the present index methodology document as mentioned below:

- Description of methodology set – www.msci.com/index/methodology/latest/ReadMe
- MSCI Corporate Events Methodology – www.msci.com/index/methodology/latest/CE
- MSCI Index Calculation Methodology – www.msci.com/index/methodology/latest/IndexCalc
- MSCI Index Glossary of Terms – www.msci.com/index/methodology/latest/IndexGlossary
- MSCI Index Policies – www.msci.com/index/methodology/latest/IndexPolicy
- MSCI Global Investable Market Indexes Methodology – www.msci.com/index/methodology/latest/GIMI
- MSCI Risk Control Indexes Methodology - www.msci.com/index/methodology/latest/RC

The Methodology Set for the Indexes can also be accessed from MSCI’s webpage https://www.msci.com/index-methodology in the section ‘Search Methodology by Index Name or Index Code’.

Contact us

msci.com/contact-us

AMERICAS

United States	+ 1 888 588 4567 *
Canada	+ 1 416 687 6270
Brazil	+ 55 11 4040 7830
Mexico	+ 52 81 1253 4020

EUROPE, MIDDLE EAST & AFRICA

South Africa	+ 27 21 673 0103
Germany	+ 49 69 133 859 00
Switzerland	+ 41 22 817 9777
United Kingdom	+ 44 20 7618 2222
Italy	+ 39 02 5849 0415
France	+ 33 17 6769 810

ASIA PACIFIC

China	+ 86 21 61326611
Hong Kong	+ 852 2844 9333
India	+ 91 22 6784 9160
Malaysia	1800818185 *
South Korea	+ 82 70 4769 4231
Singapore	+ 65 67011177
Australia	+ 612 9033 9333
Taiwan	008 0112 7513 *
Thailand	0018 0015 6207 7181 *
Japan	+ 81 3 4579 0333

* toll-free

About MSCI

MSCI is a leading provider of critical decision support tools and services for the global investment community. With over 50 years of expertise in research, data and technology, we power better investment decisions by enabling clients to understand and analyze key drivers of risk and return and confidently build more effective portfolios. We create industry-leading research-enhanced solutions that clients use to gain insight into and improve transparency across the investment process.

To learn more, please visit www.msci.com.

The process for submitting a formal index complaint can be found on the index regulation page of MSCI's website at: https://www.msci.com/index-regulation.

Notice and disclaimer