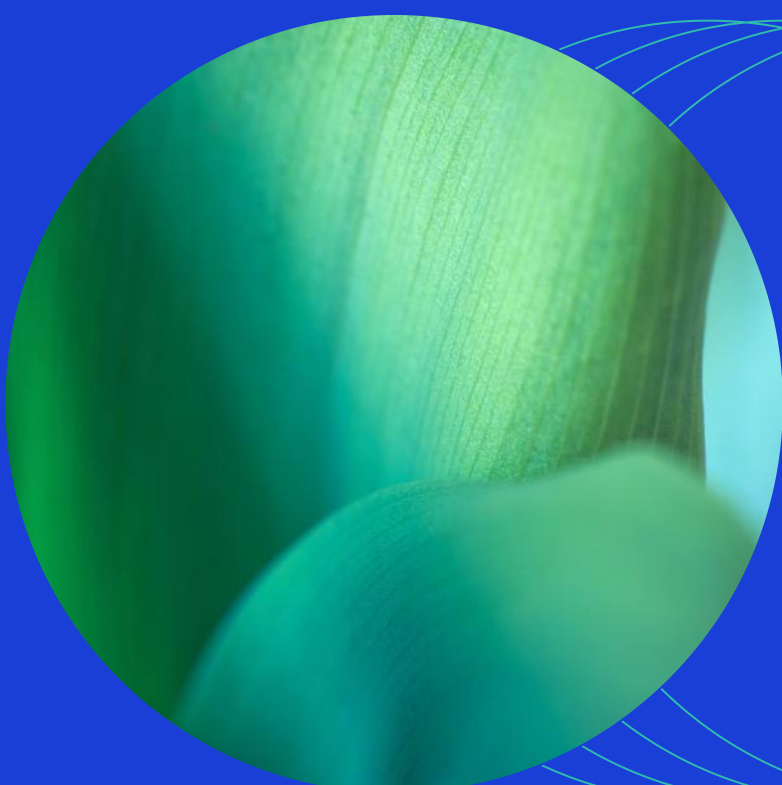
Index Methodology

July 2026

MSCI Component Exposure Methodology



Contents

1 Introduction

This document defines the MSCI Component Exposure Methodology. The Component Exposure is a measure of a company's association with a Component - a defined set of distinct business activities. It is expressed on a common scale so that companies can be compared by the strength of their association. This document describes how Components are defined, including their in-scope and out-of-scope definitions, and how the Component Exposure is calculated.

2 Calculating the Component Exposure

A company's association with a Component is modelled using two measures: Strategy Exposure and News Intensity. Each is calculated over its own calculation universe, defined per Component, relative to that Component's Theme Description[1]. The Component Exposure is derived from these two measures as set out in the following sections.

2.1 Component Strategy Exposure (SE)

Component Strategy Exposure is calculated for all companies in the Calculation Universe of the corresponding Component by matching their business segments and summary company description with the corresponding Component's 'in scope' and 'out of scope' descriptions. Strategy Exposure is calculated as an aggregate of percentage of revenue from matched segments.

2.2 Component News Intensity

Where applicable, the Component News Intensity is calculated for all companies in MSCI ACWI IMI[2] universe by matching their news summaries with the corresponding Component's 'in scope' and 'out of scope' descriptions.

2.3 Component Exposure

The Component Exposure for a company can be calculated in the following ways:

Case 1: News Intensity is not applicable

- Component Exposure = Component SE

Case 2: News Intensity is applicable

- Component News Intensity Percentile = Percentile of News Intensity relative to universe of stocks with News Intensity > 0
- Component Exposure is calculated as:

$$Component\ Exposure = 75\% \times Component\ SE + 25\% \times Component\ News\ Intensity\ Percentile$$

---

[1] For details of calculation of Strategy Exposure, News Intensity and their respective universe identification, please refer to the MSCI Strategy Exposure Calculation Methodology. The methodology book is available at: https://www.msci.com/index-methodology

[2] The MSCI ACWI IMI Index is based on the MSCI Global Investable Market Indexes (GIMI) Methodology. For details about the methodology, please refer to: https://www.msci.com/index/methodology/latest/GIMI.

2.4 Defining Components

A Component is a defined set of distinct business activities. Each Component is specified by two natural-language descriptions:

- **In-Scope Description:** the products, services, technologies and business activities that the Component represents.
- **Out-of-Scope Description:** adjacent products, services, technologies and business activities that are excluded from the Component.

2.4.1 Hardware for AI

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In scope	Out of scope
Hardware for AI	Companies designing or producing hardware specifically for AI workloads, including AI processors and accelerators, AI-optimized memory and advanced packaging, AI semiconductor design tools, and specialized interconnect, lithography and fabrication equipment.	General-purpose CPUs, commodity memory and legacy semiconductors not optimized for AI; design tools without AI-specific capabilities; data center and cloud operators; general data center infrastructure; and hardware used only for conventional IT workloads.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity[3] with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.2 Energy Providers for AI

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

[3] For details on the semantic similarity matching, please refer to the MSCI Strategy Exposure Calculation Methodology. The methodology book is available at: https://www.msci.com/index-methodology

The component is designed to capture the following:

Component	In Scope	Out of Scope
Energy Providers for AI	Companies providing power systems or grid infrastructure engineered specifically for AI compute; clean energy systems and storage solutions with dedicated AI data center off-take agreements; and energy-as-a-service models for hyperscale AI workloads.	Utilities, power generation, clean energy, storage and power equipment serving general demand without AI-specific capacity, contracts or positioning, as well as energy providers without demonstrated supply relationships with AI data centers.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.3 AI Data Center Infrastructure

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Data Center Infrastructure	Companies providing physical infrastructure for AI data centers and compute clusters, including servers, networking, storage, cooling and power equipment, AI-optimized colocation and liquid-cooled facilities, and high-speed interconnect technologies designed for AI workloads.	Cloud platforms or GPU-as-a-service providers; general-purpose data centers not engineered for AI; networking hardware not optimized for AI throughput; and traditional IT infrastructure or generic compute unrelated to AI.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.4 AI Cloud Compute

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Cloud Compute	Hyperscale cloud platforms, GPU cloud providers and neoclouds delivering on-demand AI compute and machine-learning services, including AI-optimized compute instances, managed training infrastructure and inference-as-a-service.	General-purpose cloud providers without differentiated AI compute; software and data platforms with only incidental AI capabilities; hardware, semiconductor and device manufacturers; IT services, consultants, resellers and integrators; and conventional infrastructure not specific to AI.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.5 AI Data Infrastructure

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Data Infrastructure	Companies providing AI-focused platforms and services to acquire, generate, label, clean, structure, validate or store data for AI	General databases, data warehouses, storage, analytics, hardware and data collection without an AI-specific focus; model development, training

Component	In Scope	Out of Scope
	workflows, including synthetic data, human feedback services, AI data marketplaces and specialized vector or embedding storage.	and deployment tools; AI software or physical applications; traditional data-entry services; and conventional data preparation for reporting.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.6 AI Model Development

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Model Development	Companies developing and releasing large-scale general-purpose AI models – large language models and multimodal foundation models; and open-weight models with commercial licensing.	Domain or task-specific models; training, deployment and data-processing tools; software or physical applications built on models; third-party model fine-tuning without proprietary base-model development; models without a commercial release or API; frameworks, toolkits, consulting and research services.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.7 AI Model Training

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Model Training	Platforms and tools for pre-deployment training, fine-tuning and experimentation – such as distributed training frameworks, model-optimization pipelines, GPU/TPU orchestration, experiment tracking, feature stores and AutoML.	Foundation model development; post-deployment inference or monitoring tools; AI software applications for end users; AI physical applications; data labeling; traditional relational databases without vector search; and conventional DevOps.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.8 AI Deployment and Operations

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Deployment and Operations	Companies providing tools for post-deployment AI operationalization – such as inference serving, model monitoring, model versioning, observability, scaling, governance and explainability; and AI guardrails, safety filtering, adversarial defence and content authentication.	Foundation model development and pre-deployment training tools; AI physical applications and data labeling; general cybersecurity; IT services, consultants, integrators and resellers; advertising, media and surveillance platforms; and rule-based moderation or manual compliance.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.9 AI Software Applications

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Software Applications	Companies building software and analytics products where AI is explicitly core to product functionality.	AI embedded in physical products or devices; foundation model development; AI training platforms or tools; AI deployment or operations tools; data processing or labeling services; software where AI is peripheral or optional; rule-based software without AI; and AI consultancy or professional services.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

2.4.10 AI Physical Applications

Theme Description: Same as Component's in-scope description as described below.

Component in-scope/out-of-scope:

The component is designed to capture the following:

Component	In Scope	Out of Scope
AI Physical Applications	Companies building physical products and devices where AI is explicitly integrated and essential to core functionality – enabling	AI software and analytics products; foundation model development; semiconductor, server, contract manufacturing and component

Component	In Scope	Out of Scope
	autonomous perception, decision-making or action.	suppliers; traditional automotive, inspection, testing and cybersecurity providers; and ADAS, robotics, automation or other physical products where AI is not explicitly integrated or is peripheral.

Calculation Universe for Component Strategy Exposure (SE):

The Calculation Universe is constructed by combining the current index constituents with the top 300 companies from the MSCI ACWI IMI index which share the highest semantic similarity with the Theme Description, based on their summary company description.

News Intensity Applicability: Yes

Contact us

About MSCI Inc.

MSCI (NYSE: MSCI Inc.) strengthens global markets by connecting participants across the financial ecosystem with a common language. Our research-based data, analytics and indexes, supported by advanced technology, set standards for global investors and help our clients understand risks and opportunities so they can make better decisions and unlock innovation. We serve asset managers and owners, private-market sponsors and investors, hedge funds, wealth managers, banks, insurers and corporates.

To learn more, please visit www.msci.com
msci.com/contact-us

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.

AMERICA

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

Notice and disclaimer

The data, data feeds, databases, reports, text, graphs, charts, images, videos, recordings, models, metrics, analytics, indexes, ratings, scores, cases, estimates, assessments, software, websites, products, services and other information and materials contained herein or delivered in connection with this notice (collectively, the "Information") are copyrighted, trade secrets (when not publicly available), trademarks and proprietary property of MSCI Inc. or its subsidiaries (collectively, "MSCI"), MSCI's licensors, direct or indirect suppliers and authorized sources, and/or any third party contributing to the Information (collectively, with MSCI, the "Information Providers"). All rights in the Information are reserved by MSCI and its Information Providers and user(s) shall not, nor assist others to, challenge or assert any rights in the Information.

Unless you contact MSCI and receive its prior written permission, you must NOT use the Information, directly or indirectly, in whole or in part (i) for commercial purposes, (ii) in a manner that competes with MSCI or impacts its ability to commercialize the Information or its services, (iii) to provide a service to a third party, (iv) to permit a third party to directly or indirectly access, use or resell the Information, (v) to redistribute or resell the Information in any form, (vi) to include the Information in any materials for public dissemination such as fund factsheets, market presentations, prospectuses, and investor information documents (e.g. KIIDs or KIDs), (vii) to create or as a component of any financial products, whether listed or traded over the counter or on a private placement basis or otherwise, (viii) to create any indexes, ratings or other data products, including in derivative works combined with other indexes or data or as a policy, product or performance benchmarks for active, passive or other financial products, (ix) to populate a database, or (x) to train, use as an input to, or otherwise in connection with any artificial intelligence, machine learning, large language models or similar technologies except as licensed and expressly authorized under MSCI's AI Contracting Supplement at https://www.msci.com/legal/supplemental-terms-for-client-use-of-artificial-intelligence.

The intellectual property rights of MSCI and its Information Providers may not be misappropriated or used in a competitive manner through the use of third-party data or financial products linked to the Information, including by using an MSCI index-linked future or option in a competing third-party index to provide an exposure to the underlying MSCI index or by using an MSCI index-linked ETF to create a financial product that provides an exposure to the underlying MSCI index without obtaining a license from MSCI.

The user or recipient of the Information assumes the entire risk of any use it may make, permit or cause to be made of the Information. NONE OF THE INFORMATION PROVIDERS MAKES ANY EXPRESS OR IMPLIED WARRANTIES OR REPRESENTATIONS WITH RESPECT TO THE INFORMATION (OR THE RESULTS TO BE OBTAINED BY THE USE THEREOF), AND TO THE MAXIMUM EXTENT PERMITTED BY APPLICABLE LAW, EACH INFORMATION PROVIDER EXPRESSLY DISCLAIMS ALL IMPLIED WARRANTIES (INCLUDING ANY IMPLIED WARRANTIES OF ORIGINALITY, ACCURACY, TIMELINESS, SUITABILITY, NON-INFRINGEMENT, COMPLETENESS, MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE) WITH RESPECT TO ANY OF THE INFORMATION. Without limiting any of the foregoing and to the maximum extent permitted by applicable law, in no event shall MSCI or any other Information Provider have any liability arising out of or relating to any of the Information, including for any direct, indirect, special, punitive, consequential (including lost profits) or any other damages, even if notified of the possibility of such damages. The foregoing shall not exclude or limit any liability that may not by applicable law be excluded or limited.

The Information, including index construction, ratings, historical data, or analysis, is not a prediction or guarantee of future performance, and must not be relied upon as such. Past performance is not indicative of future results. The Information may contain back tested data. Back-tested performance based on back-tested data is not actual performance but is hypothetical. There are frequently material differences between back tested performance results and actual results subsequently achieved by any investment strategy. The Information may include "Signals," defined as quantitative attributes or the product of methods or formulas that describe or are derived from calculations using historical data. Signals are inherently backward-looking because of their use of historical data, and they are inherently inaccurate, not intended to predict the future and must not be relied upon as such. The relevance, correlations and accuracy of Signals frequently change materially over time.

The Information may include data relating to indicative prices, evaluated pricing or other information based on estimates or evaluations (collectively, "Evaluations") that are not current and do not reflect real-time traded prices. No evaluation method, including those used by the Information Providers, may consistently generate evaluations or estimates that correspond to actual "traded" prices of any relevant securities or other assets. Evaluations are subject to change at any time without notice and without any duty to update or inform you, may not reflect prices at which actual transactions or collateral calls may occur or have occurred. The market price of securities, financial instruments, and other assets can be determined only if and when executed in the market. There may be no, or may not have been any, secondary trading market for the relevant securities, financial instruments or other assets. Private capital, equity, credit and other assets and their prices may be assessed infrequently, may not be priced on a secondary market, and shall not be relied upon as an explicit or implicit valuation of a particular instrument. Any reliance on fair value estimates and non-market inputs introduces potential biases and subjectivity. Internal Rate of Return metrics are not fully representative without full disclosure of fund cash flows, assumptions, and time horizons.

The Information does not constitute, and must not be relied upon as, investment advice, credit ratings, or proxy advisory or voting services. None of the Information Providers, their products or services, are fiduciaries or make any recommendation, endorsement, or approval of any investment decision or asset allocation. Likewise, the Information does not represent an offer to sell, a solicitation to buy, or an endorsement of any security, financial product, instrument, investment vehicle, or trading strategy, whether or not linked to or in any way based on any MSCI index, rating, subcomponent, or other Information (collectively, "Linked Investments").The Information should not be relied on and is not a substitute for the skill, judgment and experience of any user when making investment and other business decisions. MSCI is not responsible for any user's compliance with applicable laws and regulations. All Information is impersonal, not tailored to the needs of any person, entity or group of persons, not objectively verifiable in every respect, and may not be based on information that is important to any user.

It is not possible to invest in an index. Exposure to an asset class or trading strategy or other category represented by an index is only available through third party investable instruments (if any) based on that index. MSCI makes no assurance that any Linked Investments will accurately track index performance or provide positive investment returns. Index returns do not represent results of actual trading of investible assets/securities. MSCI maintains and calculates indexes but does not manage assets. The calculation of indexes and index returns may deviate from the stated methodology. Index returns do not reflect payment of any sales charges or fees an investor may pay to purchase securities underlying the index or Linked Investments. The imposition of these fees and charges would cause the performance of a Linked Investment to be different than the MSCI index performance.

Information provided by MSCI Solutions LLC and certain related entities ("MSCI Solutions"), including materials utilized in MSCI sustainability and climate products, have not been submitted to, nor received approval from any regulatory body. MSCI sustainability and climate offerings, research and data are produced by, and ratings are solely the opinion of MSCI Solutions. Other MSCI products and services may utilize information from MSCI Solutions, Barra LLC or other affiliates. More information can be found in the relevant methodologies on www.msci.com. MSCI Indexes are administered by MSCI Limited (UK) and MSCI Deutschland GmbH. No regulated use of any MSCI private real assets indexes in any jurisdiction is permitted without MSCI's express written authorization. The process for applying for MSCI's express written authorization can be found at: https://www.msci.com/index-regulation.

MSCI receives compensation in connection with licensing its indexes and other Information to third parties. MSCI Inc.'s revenue includes fees based on assets in Linked Investments. Information can be found in MSCI Inc.'s company filings on the Investor Relations section of msci.com. Issuers mentioned in MSCI Solutions materials or their affiliates may purchase research or other products or services from one or more MSCI affiliates, manage financial products