

A Division of S&P Global

# S&P Japan 500 Buyback Indices Methodology

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## Introduction

#### **Index Objectives**

The S&P Japan 500 Buyback Indices comprise the following:

**S&P Japan 500 Buyback Index.** The index measures the performance of 50 stocks from the S&P Japan 500 with the highest buyback ratios that meet a minimum liquidity requirement. Constituents are equal weighted.

**S&P Japan 500 Buyback FCF Index.** The index measures the performance of 30 stocks from the S&P Japan 500 with high buyback ratios and high free cash flow yields that meet a minimum liquidity requirement. Constituents are Free Cash Flow Yield (FCFY) weighted, subject to a single constituent weight cap of 7.5%.

**S&P Japan 500 Buyback PE Index.** The index measures the performance of 30 stocks from the S&P Japan 500 with high buyback ratios and high earnings yields that meet a minimum liquidity requirement. Constituents are Earnings Yield (EY) weighted, subject to a single constituent weight cap of 7.5%.

For information on the S&P Japan 500, please refer to the S&P Japanese Indices Methodology, available at www.spglobal.com/spdji.

#### **Supporting Documents**

This methodology is meant to be read in conjunction with supporting documents providing greater detail with respect to the policies, procedures and calculations described herein. References throughout the methodology direct the reader to the relevant supporting document for further information on a specific topic. The list of the main supplemental documents for this methodology and the hyperlinks to those documents is as follows:

Supporting Document	URL
S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology	Equity Indices Policies & Practices
S&P Dow Jones Indices' Index Mathematics Methodology	Index Mathematics Methodology

This methodology was created by S&P Dow Jones Indices to achieve the aforementioned objective of measuring the underlying interest of each index governed by this methodology document. Any changes to or deviations from this methodology are made in the sole judgment and discretion of S&P Dow Jones Indices so that the index continues to achieve its objective.

# Eligibility Criteria and Index Construction

#### S&P Japan 500 Buyback Index

Index Universe. The index universe is the S&P Japan 500.

**Eligibility Factors.** As of the rebalancing reference date, to be eligible for index inclusion, stocks in the index universe must satisfy the following:

- Liquidity: have a minimum three-month Average Daily Value Traded (3M ADVT) of U.S. \$3 million.
- Total Market Capitalization (TMC) Data: have available TMC data at the beginning of the observation period.<sup>1</sup>

Stocks satisfying the eligibility factors form the eligible universe.

**Constituent Selection.** At each rebalancing, constituents are selected from the eligible universe as follows:

1. A buyback ratio is calculated for each eligible stock, with the stocks then ranked in descending order. The highest ranking 50 stocks are selected and added to the index.

The buyback ratio is calculated as the monetary amount of cash paid for common shares repurchased during the observation period divided by the company's total market capitalization of common shares at the beginning of the observation period.

Constituent Weighting. At each rebalancing, constituents are equal weighted.

S&P Dow Jones Indices: S&P Japan 500 Buyback Indices Methodology

<sup>&</sup>lt;sup>1</sup> The observation period is defined as four quarters ending one quarter prior to the rebalancing reference date.

#### S&P Japan 500 Buyback FCF Index

Index Universe. The index universe is the S&P Japan 500.

**Eligibility Factors.** As of the rebalancing reference date, to be eligible for index inclusion, stocks in the index universe must satisfy the following:

- Liquidity: have a minimum 3M ADVT of US\$ 7 million.
- Free Cash Flow (FCF): have available FCF data.
- TMC Data: have available TMC data at the beginning of the observation period.<sup>2</sup>

Stocks satisfying the eligibility factors form the eligible universe.

**Constituent Selection.** At each rebalancing, constituents are selected from the eligible universe as follows:

- 1. A buyback ratio is calculated for each stock in the eligible universe, with the stocks then ranked in descending order. The 50 stocks with the highest buyback ratio form the index's eligible subuniverse.
  - The buyback ratio is calculated as monetary amount of cash paid for common shares repurchased during the observation period divided by the company's total market capitalization of common shares at the beginning of the observation period.
- 2. The FCFY is calculated for each stock in the eligible sub-universe, with stocks ranked in descending order by FCFY. The highest ranking 30 stocks are selected and added to the index.
  - FCFY is computed by taking the latest available fiscal year FCF divided by the total market capitalization of the company used for the buyback ratio calculation.

**Constituent Weighting.** At each rebalancing, constituents are weighted by FCFY, subject to a single constituent weight cap of 7.5%, with any excess weight proportionally redistributed to the uncapped constituents. The process continues iteratively until no stock breaches the 7.5% cap.

S&P Dow Jones Indices: S&P Japan 500 Buyback Indices Methodology

<sup>&</sup>lt;sup>2</sup> The observation period is defined as four quarters ending one quarter prior to the rebalancing reference date.

#### S&P Japan 500 Buyback PE Index

Index Universe. The index universe is the S&P Japan 500.

**Eligibility Factors.** As of the rebalancing reference date, stocks in the index universe must satisfy the following to be eligible for index inclusion:

- Liquidity: have a minimum 3M ADVT of US\$ 7 million.
- Trailing 12-Month Earnings per Share (EPS): have available 12-month EPS data.
- TMC Data: have available TMC data at the beginning of the observation period.3

Stocks satisfying the eligibility factors form the eligible universe.

**Constituent Selection.** At each rebalancing, constituents are selected from the eligible universe as follows:

- 1. A buyback ratio is calculated for each stock in the eligible universe, with the stocks then ranked in descending order. The 50 stocks with the highest buyback ratio form the index's eligible subuniverse.
  - The buyback ratio is calculated as the monetary amount of cash paid for common shares repurchased during the observation period divided by the company's total market capitalization of common shares at the beginning of the observation period.
- 2. The EY is calculated for each stock in the eligible sub-universe, with stocks ranked in descending order by EY. The highest ranking 30 stocks are selected and added to the index.
  - EY is computed by dividing the trailing 12-month earnings per share by the price on the rebalancing reference date.

**Constituent Weighting.** At each rebalancing, constituents are weighted by EY, subject to a single constituent weight cap of 7.5%, with any excess weight proportionally redistributed to the uncapped constituents. The process continues iteratively until no stock breaches the 7.5% cap.

<sup>&</sup>lt;sup>3</sup> The observation period is defined as four quarters ending one quarter prior to the rebalancing reference date.

## **Index Maintenance**

#### Rebalancing

The indices rebalance quarterly, effective after the close on the third Friday of January, April, July, and October. The rebalancing reference dates are after the close of the last business days of December, March, June, and September, respectively.

For the S&P Japan 500 Buyback Index, index shares calculate using the closing prices of the first Friday of the rebalancing month as the reference price.

For the S&P Japan 500 Buyback FCF Index and S&P Japan 500 Buyback PE Index, index shares calculate using the closing prices on the Wednesday prior to the second Friday of the quarterly review month as the price reference date.

Additions. Except for spin-offs, an index addition is only made during the quarterly rebalancing.

**Spin-offs.** A spin-off company is added to all the indices of which the parent company is a constituent at a zero price at the market close of the day before the ex-date (with no divisor adjustment). If the spin-off company is ineligible to remain in the index, the spin-off is removed after at least one day of regular trading (with a divisor adjustment).

**Deletions.** A stock can be deleted from an index due to corporate events such as mergers and acquisitions, takeovers, delistings, or bankruptcies. Constituents removed from the S&P Japan 500 are removed from the indices simultaneously.

#### **Corporate Actions**

Index	Corporate Action Treatment	
	For more information, please refer to the	
SSD Japan 500 Buybook Indov	Equal Weighted Indices section within S&P	
S&P Japan 500 Buyback Index	Dow Jones Indices' Equity Indices Policies &	
	Practices Methodology.	
OND leaves 500 Death and 505 leaders	For more information, please refer to the Non-	
S&P Japan 500 Buyback FCF Index	Market Capitalization Weighted Indices	
S&P Japan 500 Buyback PE Index	section within S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.	

#### **Currency of Calculation and Additional Index Return Series**

The indices calculate in Japanese yen and U.S. dollars.

Real-time spot Forex rates, as supplied by WMR, are used for ongoing index calculation. The end-of-day value of the index is calculated using the real-time spot exchange rate provided by WMR at the time the index is closed.

In addition to the indices detailed in this methodology, additional return series versions of the indices may be available, including, but not limited to: currency, currency hedged, decrement, fair value, inverse, leveraged, and risk control versions. For a list of available indices, please refer to the <a href="Maintenance-S&P DJI">S&P DJI</a>
<a href="Methodology & Regulatory Status Database">Methodology & Regulatory Status Database</a>.</a>

For information on index calculation, please refer to S&P Dow Jones Indices' Index Mathematics Methodology.

For the inputs necessary to calculate certain types of indices, including decrement, dynamic hedged, fair value, and risk control indices, please refer to the Parameters documents available at <a href="https://www.spglobal.com/spdji">www.spglobal.com/spdji</a>.

#### **Other Adjustments**

In cases where there is no achievable market price for a stock being deleted, it can be removed at a zero or minimal price at the Index Committee's discretion, in recognition of the constraints faced by investors in trading bankrupt or suspended stocks.

### **Base Date and History Availability**

The index history availability, base date, and base value are shown in the table below.

Index	Launch Date	First Value Date	Base Date	Base Value
S&P Japan 500 Buyback Index	10/17/2014	01/16/2004	01/16/2004	100
S&P Japan 500 Buyback FCF Index	09/04/2014	01/16/2004	01/16/2004	1000
S&P Japan 500 Buyback PE Index	06/23/2015	01/16/2004	01/16/2004	1000

## **Index Data**

#### **Calculation Return Types**

S&P Dow Jones Indices calculates multiple return types which vary based on the treatment of regular cash dividends. The classification of regular cash dividends is determined by S&P Dow Jones Indices.

- Price Return (PR) versions are calculated without adjustments for regular cash dividends.
- Gross Total Return (TR) versions reinvest regular cash dividends at the close on the ex-date without consideration for withholding taxes.
- Net Total Return (NTR) versions, if available, reinvest regular cash dividends at the close on the ex-date after the deduction of applicable withholding taxes.

In the event there are no regular cash dividends on the ex-date, the daily performance of all three indices will be identical.

For a complete list of indices available, please refer to the daily index levels file (".SDL").

For more information on the classification of regular versus special cash dividends as well as the tax rates used in the calculation of net return, please refer to S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.

For more information on the calculation of return types, please refer to S&P Dow Jones Indices' Index Mathematics Methodology.

## **Index Governance**

#### **Index Committee**

An S&P Dow Jones Indices' Index Committee maintains the indices. All committee members are full-time professional members of S&P Dow Jones Indices' staff. The Committee meets regularly. At each meeting, the Committee reviews pending corporate actions that may affect index constituents, statistics comparing the composition of the indices to the market, companies that are being considered as candidates for addition to an index, and any significant market events. In addition, the Index Committee may revise index policy covering rules for selecting companies, treatment of dividends, share counts or other matters.

S&P Dow Jones Indices considers information about changes to its indices and related matters to be potentially market moving and material. Therefore, all Index Committee discussions are confidential.

S&P Dow Jones Indices' Index Committees reserve the right to make exceptions when applying the methodology if the need arises. In any scenario where the treatment differs from the general rules stated in this document or supplemental documents, clients will receive sufficient notice, whenever possible.

In addition to the daily governance of indices and maintenance of index methodologies, at least once within any 12-month period, the Index Committee reviews the methodology to ensure the indices continue to achieve the stated objectives, and that the data and methodology remain effective. In certain instances, S&P Dow Jones Indices may publish a consultation inviting comments from external parties.

For information on Quality Assurance and Internal Reviews of Methodology, please refer to S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.

# **Index Policy**

#### **Announcements**

All index constituents are evaluated daily for data needed to calculate index levels and returns. All events affecting the daily index calculation are typically announced in advance via the Index Corporate Events report (.SDE), delivered daily to all clients. Any unusual treatment of a corporate action or short notice of an event may be communicated via email to clients.

For more information, please refer to the Announcements section of S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.

#### **Pro-forma Files**

In addition to the corporate events file (.SDE), S&P Dow Jones Indices provides constituent pro-forma files each time the indices rebalance. The pro-forma file is typically provided daily in advance of the rebalancing date and contains all constituents and their corresponding weights and index shares effective for the upcoming rebalancing. Since index shares are assigned based on prices prior to the rebalancing effective date, the actual weight of each stock at the rebalancing differs from these weights due to market movements.

Please visit <u>www.spglobal.com/spdji</u> for a complete schedule of rebalancing timelines and pro-forma delivery times.

#### **Holiday Schedule**

The indices are calculated daily, throughout the calendar year. The only days an index is not calculated are on days when all exchanges where the index's constituents are listed are officially closed.

A complete holiday schedule for the year is available on S&P Dow Jones Indices' Web site at www.spqlobal.com/spdii.

#### Rebalancing

The Index Committee may change the date of a given rebalancing for reasons including market holidays occurring on or around the scheduled rebalancing date. Any such change will be announced with proper advance notice where possible.

#### **Unexpected Exchange Closures**

For information on Unexpected Exchange Closures, please refer to S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.

#### **Recalculation Policy**

For information on the recalculation policy, please refer to S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.

For information on Calculations and Pricing Disruptions, Expert Judgment and Data Hierarchy, please refer to S&P Dow Jones Indices' Equity Indices Policies & Practices Methodology.

### **Contact Information**

For questions regarding an index, please contact: <a href="mailto:index\_services@spglobal.com">index\_services@spglobal.com</a>.

## **Index Dissemination**

Index levels are available through S&P Dow Jones Indices' Web site at <a href="www.spglobal.com/spdji">www.spglobal.com/spdji</a>, major quote vendors (see codes below), numerous investment-oriented Web sites, and various print and electronic media.

#### **Tickers**

The table below lists headline indices covered by this document. All versions of the below indices that may exist are also covered by this document. Please refer to the <u>S&P DJI Methodology & Regulatory</u> <u>Status Database</u> for a complete list of indices covered by this document.

Index	Return Type	BBG
	Price Return	SPJBJP
S&P Japan 500 Buyback Index (JPY)	Total Return	SPJBJT
	Net Total Return	SPJBJN
	Price Return	SPJP5BUP
S&P Japan 500 Buyback Index (USD)	Total Return	SPJP5BUT
	Net Total Return	SPJP5BUN
	Price Return	SPJBFJP
S&P Japan 500 Buyback FCF Index (JPY)	Total Return	SPJBFJT
	Net Total Return	SPJBFJN
	Price Return	SPJBFUP
S&P Japan 500 Buyback FCF Index (USD)	Total Return	SPJBFUT
	Net Total Return	SPJBFUN
	Price Return	SPJBPJP
S&P Japan 500 Buyback PE Index (JPY)	Total Return	SPJBPJT
	Net Total Return	SPJBPJN
	Price Return	SPJBPUP
S&P Japan 500 Buyback PE Index (USD)	Total Return	SPJBPUT
	Net Total Return	SPJBPUN

#### **Index Data**

Daily constituent and index level data are available via subscription.

For product information, please contact S&P Dow Jones Indices, <a href="www.spglobal.com/spdji/contact-us">www.spglobal.com/spdji/contact-us</a>.

### Web site

For further information, please refer to S&P Dow Jones Indices' Web site at www.spglobal.com/spdji.

# Appendix I

### **Methodology Changes**

Methodology changes since January 1, 2015 are as follows:

	<b>Effective Date</b>	Methodology	
Change	(After Close)	Previous	Updated
Exchange	6-July-2015	WM/Refinitiv foreign exchange	Spot foreign exchange rates
Rate:		rates taken at London close.	taken at Asia close.
S&P Japan			
500 Buyback			
FCF Index			

# Appendix II

#### **ESG Disclosures**

EXPLANATION OF HOW ENVIRONMENTAL, SOCIAL & GOVERNANCE (ESG) FACTORS ARE REFLECTED IN THE KEY ELEMENTS OF THE BENCHMARK METHODOLOGY <sup>4</sup>		
1.	Name of the benchmark administrator.	S&P Dow Jones Indices LLC.
2.	Underlying asset class of the ESG benchmark. <sup>5</sup>	N/A
3.	Name of the S&P Dow Jones Indices benchmark or family of benchmarks.	S&P DJI Equity Indices Benchmark Statement
4.	Do any of the indices maintained by this methodology take into account ESG factors?	No
Appendix latest update:		January 2021
Appendix first publication:		January 2021

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<sup>&</sup>lt;sup>4</sup> The information contained in this Appendix is intended to meet the requirements of the European Union Commission Delegated Regulation (EU) 2020/1817 supplementing Regulation (EU) 2016/1011 of the European Parliament and of the Council as regards the minimum content of the explanation of how environmental, social and governance factors are reflected in the benchmark methodology and the retained EU law in the UK [The Benchmarks (amendment and Transitional Provision) (EU Exit) Regulations 2019l.

<sup>&</sup>lt;sup>5</sup> The 'underlying assets' are defined in European Union Commission Delegated Regulation (EU) 2020/1816 supplementing Regulation (EU) 2016/1011 of the European Parliament and of the Council as regards the explanation in the benchmark statement of how environmental, social and governance factors are reflected in each benchmark provided and published.

## Disclaimer

#### Performance Disclosure/Back-Tested Data

Where applicable, S&P Dow Jones Indices and its index-related affiliates ("S&P DJI") defines various dates to assist our clients in providing transparency. The First Value Date is the first day for which there is a calculated value (either live or back-tested) for a given index. The Base Date is the date at which the index is set to a fixed value for calculation purposes. The Launch Date designates the date when the values of an index are first considered live: index values provided for any date or time period prior to the index's Launch Date are considered back-tested. S&P DJI defines the Launch Date as the date by which the values of an index are known to have been released to the public, for example via the company's public website or its data feed to external parties. For Dow Jones-branded indices introduced prior to May 31, 2013, the Launch Date (which prior to May 31, 2013, was termed "Date of introduction") is set at a date upon which no further changes were permitted to be made to the index methodology, but that may have been prior to the Index's public release date.

Please refer to the methodology for the Index for more details about the index, including the manner in which it is rebalanced, the timing of such rebalancing, criteria for additions and deletions, as well as all index calculations.

Information presented prior to an index's launch date is hypothetical back-tested performance, not actual performance, and is based on the index methodology in effect on the launch date. However, when creating back-tested history for periods of market anomalies or other periods that do not reflect the general current market environment, index methodology rules may be relaxed to capture a large enough universe of securities to simulate the target market the index is designed to measure or strategy the index is designed to capture. For example, market capitalization and liquidity thresholds may be reduced. In addition, forks have not been factored into the back-test data with respect to the S&P Cryptocurrency Indices. For the S&P Cryptocurrency Top 5 & 10 Equal Weight Indices, the custody element of the methodology was not considered; the back-test history is based on the index constituents that meet the custody element as of the Launch Date. Back-tested performance reflects application of an index methodology and selection of index constituents with the benefit of hindsight and knowledge of factors that may have positively affected its performance, cannot account for all financial risk that may affect results and may be considered to reflect survivor/look ahead bias. Actual returns may differ significantly from, and be lower than, back-tested returns. Past performance is not an indication or guarantee of future results.

Typically, when S&P DJI creates back-tested index data, S&P DJI uses actual historical constituent-level data (e.g., historical price, market capitalization, and corporate action data) in its calculations. As ESG investing is still in early stages of development, certain datapoints used to calculate certain ESG indices may not be available for the entire desired period of back-tested history. The same data availability issue could be true for other indices as well. In cases when actual data is not available for all relevant historical periods, S&P DJI may employ a process of using "Backward Data Assumption" (or pulling back) of ESG data for the calculation of back-tested historical performance. "Backward Data Assumption" is a process that applies the earliest actual live data point available for an index constituent company to all prior historical instances in the index performance. For example, Backward Data Assumption inherently assumes that companies currently not involved in a specific business activity (also known as "product involvement") were never involved historically and similarly also assumes that companies currently involved in a specific business activity were involved historically too. The Backward Data Assumption allows the hypothetical back-test to be extended over more historical years than would be feasible using only actual data. For more information on "Backward Data Assumption" please refer to the FAQ. The methodology and factsheets of any index that employs backward assumption in the back-tested history will explicitly state so. The methodology will include an Appendix with a table setting forth the specific

data points and relevant time period for which backward projected data was used. Index returns shown do not represent the results of actual trading of investable assets/securities. S&P DJI maintains the index and calculates the index levels and performance shown or discussed but does not manage any assets.

Index returns do not reflect payment of any sales charges or fees an investor may pay to purchase the securities underlying the Index or investment funds that are intended to track the performance of the Index. The imposition of these fees and charges would cause actual and back-tested performance of the securities/fund to be lower than the Index performance shown. As a simple example, if an index returned 10% on a US \$100,000 investment for a 12-month period (or US \$10,000) and an actual asset-based fee of 1.5% was imposed at the end of the period on the investment plus accrued interest (or US \$1,650), the net return would be 8.35% (or US \$8,350) for the year. Over a three-year period, an annual 1.5% fee taken at year end with an assumed 10% return per year would result in a cumulative gross return of 33.10%, a total fee of US \$5,375, and a cumulative net return of 27.2% (or US \$27,200).

#### **Intellectual Property Notices/Disclaimer**

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