

# JPMORGAN CHASE & CO.

## ***Notes Linked to one or more Indices or Funds***

JPMorgan Chase & Co. may, from time to time, offer and sell notes linked to one or more indices (each, an "Index" and collectively, the "Indices") or funds (each, a "Fund" and collectively, the "Funds"). This underlying supplement no. 1-I describes potential Indices and Funds to which the notes may be linked, the relationship, if any, between JPMorgan Chase & Co. and the sponsor or publisher of the Indices and Funds and other relevant information. This underlying supplement no. 1-I supplements the terms described in the accompanying product supplement, prospectus supplement and prospectus. A separate term sheet or pricing supplement, as the case may be, will describe terms that apply to specific issuances of the notes, including any changes to description of any relevant Index or Fund specified below. We refer to such term sheets and pricing supplements generally as terms supplements. If the terms described in the relevant terms supplement are inconsistent with those described herein or in any other relevant index or fund supplement (each of which we generally refer to as an underlying supplement), or in the accompanying product supplement, prospectus supplement or prospectus, the terms described in the relevant terms supplement will control. In addition, if this underlying supplement no. 1-I and the accompanying product supplement or another relevant underlying supplement contain information relating to the same Index or Fund to which the notes are linked, the information contained in the document with the most recent date will control.

**Investing in the notes involves a number of risks. See "Risk Factors" in the accompanying product supplement and "Risk Factors" beginning on page US-1 of this underlying supplement no. 1-I.**

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of the notes or passed upon the accuracy or the adequacy of this underlying supplement no. 1-I, the accompanying product supplement, prospectus supplement and prospectus, any other relevant underlying supplement or the relevant terms supplement. Any representation to the contrary is a criminal offense.

***The notes are not bank deposits and are not insured by the Federal Deposit Insurance Corporation or any other governmental agency, nor are they obligations of, or guaranteed by, a bank.***

J.P.Morgan

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We have not authorized anyone to provide any information other than that contained or incorporated by reference in the relevant terms supplement, any other related underlying supplement, this underlying supplement no. 1-I and the accompanying product supplement, prospectus supplement and prospectus with respect to the notes offered by the relevant terms supplement and with respect to JPMorgan Chase & Co. We take no responsibility for, and can provide no assurance as to the reliability of, any other information that others may give you. This underlying supplement no. 1-I, together with the relevant terms supplement, any other related underlying supplement and the accompanying product supplement, prospectus supplement and prospectus, contains the terms of the notes and supersedes all other prior or contemporaneous oral statements as well as any other written materials including preliminary or indicative pricing terms, correspondence, trade ideas, structures for implementation, sample structures, fact sheets, brochures or other educational materials of ours. The information in the relevant terms supplement, any other related underlying supplement, this underlying supplement no. 1-I and the

accompanying product supplement, prospectus supplement and prospectus may only be accurate as of the dates of each of these documents, respectively.

The notes described in the relevant terms supplement, the accompanying product supplement, any other related underlying supplement and this underlying supplement are not appropriate for all investors, and involve important legal and tax consequences and investment risks, which should be discussed with your professional advisers. You should be aware that the regulations of the Financial Industry Regulatory Authority, or FINRA, and the laws of certain jurisdictions (including regulations and laws that require brokers to ensure that investments are suitable for their customers) may limit the availability of the notes. The relevant terms supplement, this underlying supplement no. 1-I, any other related underlying supplement and the accompanying product supplement, prospectus supplement and prospectus do not constitute an offer to sell or a solicitation of an offer to buy the notes in any circumstances in which such offer or solicitation is unlawful.

In this underlying supplement no. 1-I, any other related underlying supplement, the relevant terms supplement and the accompanying product supplement, prospectus supplement and prospectus, "we," "us" and "our" refer to JPMorgan Chase & Co., unless the context requires otherwise.

## RISK FACTORS

*Your investment in the notes will involve certain risks. Investing in the notes is not equivalent to investing in any of the indices or funds described herein or any of their component securities, commodities or commodity futures contracts. You should consider carefully the risks discussed under "Risk Factors" in the accompanying product supplement and in any other related underlying supplement, together with the following discussion of additional risks, before you decide that an investment in the notes is suitable for you.*

### Risks Relating to Certain Equity Indices

We are currently one of the companies that make up the Dow Jones Industrial Average<sup>SM</sup>, the MSCI World Index<sup>SM</sup>, the Russell 1000<sup>®</sup> Index, the Russell 3000<sup>®</sup> Index, the S&P 500<sup>®</sup> Index and the Financial Select Sector Index, but, to our knowledge, unless otherwise specified in the relevant terms supplement, we are not currently affiliated with any other company the equity securities of which are included in an Index.

We will have no ability to control the actions of the other issuers of such equity securities, including actions that could affect the value of the equity securities underlying an Index or your notes. None of the money you pay us will go to the sponsor of any Index (each, an "Index Sponsor") or any of the other issuers of the equity securities included in any Index, and none of those issuers will be involved in the offering of the notes in any way. Neither those issuers nor we will have any obligation to consider your interests as a holder of the notes in taking any corporate actions that might affect the value of your notes. See the relevant terms supplement for additional information about whether we are one of the companies included in an Index.

In the event we become affiliated with any issuers the equity securities of which are included in an Index, we will have no obligation to consider your interests as a holder of the notes in taking any action with respect to such issuer that might affect the value of your notes.

**For notes linked in whole or in part to the Russell 2000<sup>®</sup> Index, an investment in the notes will be subject to risks associated with small capitalization stocks.**

The stocks that constitute the Russell 2000<sup>®</sup> Index are issued by companies with relatively small market capitalization. The stock prices of smaller companies may be more volatile than stock prices of large capitalization companies. Small capitalization companies may be less able to withstand adverse economic, market, trade and competitive conditions relative to larger companies. These companies tend to be less well-established than large market capitalization companies. Small capitalization companies are less likely to pay dividends on their stocks, and the presence of a dividend payment could be a factor that limits downward stock price pressure under adverse market conditions.

**For notes linked in whole or in part to the S&P 500<sup>®</sup> Index, the S&P MidCap 400<sup>®</sup> Index, the S&P<sup>®</sup> Homebuilders Select Industry<sup>TM</sup> Index, the S&P<sup>®</sup> Metals & Mining Select Industry<sup>TM</sup> Index, the Financial Select Sector Index or the Technology Select Sector Index, the value of the notes could be affected by an anticipated change in ownership of these indices.**

On November 4, 2011, The McGraw-Hill Companies, Inc. ("McGraw-Hill"), the owner of the S&P Indices business, and CME Group Inc. ("CME Group"), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions. While it's unclear what effect, if any, this change in ownership will have on the indices listed above or on the notes, any changes to the methodology of a relevant Index could affect adversely the level of that Index and, accordingly, the value of your notes.

## **Risks Relating to Certain Commodity Indices**

**We and our affiliates have no affiliation with Standard & Poor's Financial Services LLC ("S&P"), UBS Securities LLC ("UBS") or CME Group Index Services LLC ("CME Indexes") and are not responsible for their public disclosure of information.**

We and our affiliates are not affiliated with S&P, UBS or CME Indexes in any way (except for arrangements discussed below in "Commodity Index Descriptions — The S&P GSCI Indices — License Agreement with Standard & Poor's" and "Commodity Index Descriptions — The DJ-UBS Commodity Indices — License Agreement") and have no ability to control S&P, UBS or CME Indexes, including any errors in or discontinuation of disclosure regarding its methods or policies relating to the calculation of the DJ-UBS Commodity Indices (as defined under "Commodity Index Descriptions — The DJ-UBS Commodity Indices" in this underlying supplement) or the S&P GSCI Indices (as defined under "Commodity Index Descriptions — The S&P GSCI Indices" in this underlying supplement). None of S&P, UBS or CME Indexes is under any obligation to continue to calculate any of the S&P GSCI Indices or DJ-UBS Commodity Indices nor are they required to calculate any successor index. If any of S&P, UBS or CME Indexes discontinues or suspends the calculation of a relevant index, it may become difficult to determine the market value of the notes or the amount payable at maturity. The calculation agent may designate a successor index selected in its sole discretion. If the calculation agent determines in its sole discretion that no successor index comparable to such index exists, the amount you receive at maturity may be determined by the calculation agent in its sole discretion.

**S&P or UBS and CME Indexes may be required to replace a contract underlying an S&P GSCI Index or a DJ-UBS Commodity Index, if the existing futures contract is terminated or replaced.**

A futures contract known as a "Designated Contract" has been selected as the reference contract for the underlying physical commodity included in each S&P GSCI Index or DJ-UBS Commodity Index. Data concerning this Designated Contract will be used to calculate each S&P GSCI Index and DJ-UBS Commodity Index. The termination or replacement of a futures contract on an established exchange occurs infrequently; however, if one or more Designated Contracts were to be terminated or replaced by an exchange, a comparable futures contract would be selected by the S&P GSCI Index Committee or UBS, as the case may be, if available, to replace each such Designated Contract. The termination or replacement of any Designated Contract may have an adverse impact on the value of the individual S&P GSCI Index or level of any DJ-UBS Commodity Index. Suspension or disruptions of market trading in the commodity and related futures markets may adversely affect the value of the notes.

**If the notes are linked in whole or in part to a DJ-UBS Commodity Index, you may in the future have exposure to contracts that are not traded on regulated futures exchanges.**

At present, the DJ-UBS Commodity Indices are composed exclusively of regulated futures contracts; however, the DJ-UBS Commodity Indices may in the future include over-the-counter contracts (such as swaps and forward contracts) traded on trading facilities that are subject to lesser degrees of regulation or, in some cases, no substantive regulation. As a result, trading in such contracts, and the manner in which prices and volumes are reported by the relevant trading facilities, may not be subject to the same provisions of, and the protections afforded by, the Commodity Exchange Act, as amended, or other applicable statutes and related regulations that govern trading on regulated futures exchanges. In addition, many electronic trading facilities have only recently initiated trading and do not have significant trading histories. As a result, the trading of contracts on such facilities and the inclusion of such contracts in a DJ-UBS Commodity Index may expose you to certain risks not presented by most exchange-traded futures contracts, including risks related to the liquidity and price histories of the relevant contracts.

**For notes linked to a DJ-UBS Commodity Index, risks associated with that DJ-UBS Commodity Index may adversely affect the market price of the notes.**

Because the Dow Jones-UBS Commodity Index<sup>SM</sup> and the Dow Jones-UBS Commodity Index 3 Month Forward<sup>SM</sup> reflect the return on exchange-traded futures contracts on nineteen different physical commodities and because the single-commodity sub-indices and the forward-month single-commodity sub-indices of Dow Jones-UBS Commodity Index<sup>SM</sup> each reflect the return on exchange-traded futures contract on a single physical commodity, notes linked to one or more of the DJ-UBS Indices may be less diversified than other funds or investment portfolios investing in a broader range of products and, therefore, could experience greater volatility. Additionally, the annual composition of the DJ-UBS Commodity Indices will be calculated in reliance upon historical price, liquidity and production data that are subject to potential errors in data sources or errors that may affect the weighting of components of the DJ-UBS Commodity Indices. Any discrepancies that require revision are not applied retroactively but will be reflected in the weighting calculations of the DJ-UBS Commodity Indices for the following year. However, UBS and CME Indexes may not discover every discrepancy. Furthermore, the annual weightings for the DJ-UBS Commodity Indices are determined each year in the third or fourth quarter and announced as promptly as practicable following the calculation by UBS under the supervision of the Dow Jones-UBS Commodity Index Supervisory Committee, which has a significant degree of discretion in exercising its supervisory duties with respect to the DJ-UBS Commodity Indices and has no obligation to take the needs of any parties to transactions involving the DJ-UBS Commodity Indices into consideration when reweighting or making any other changes to the DJ-UBS Commodity Indices. Finally, subject to the minimum/maximum diversification limits described in "Commodity Index Descriptions — The DJ-UBS Commodity Indices — Diversification Rules," the commodities underlying the exchange-traded futures contracts included in the Dow Jones-UBS Commodity Index<sup>SM</sup> and the Dow Jones-UBS Commodity Index 3 Month Forward<sup>SM</sup> from time to time are concentrated in a limited number of sectors, particularly energy and agriculture, and the single-commodity sub-indices and the forward-month single-commodity sub-indices of Dow Jones-UBS Commodity Index<sup>SM</sup> are each limited to a single commodity. An investment in the notes may therefore carry risks similar to a concentrated securities investment in a limited number of industries or sectors or in a single commodity.

**For notes linked to a DJ-UBS Commodity Index, trading and other transactions by UBS and its affiliates in the futures contracts constituting the DJ-UBS Commodity Indices and the underlying commodities may affect the level of the DJ-UBS Commodity Indices.**

UBS and its affiliates actively trade futures contracts and options on futures contracts on the commodities underlying the DJ-UBS Commodity Indices. UBS and its affiliates also actively enter into or trade market securities, swaps, options, derivatives, and related instruments that are linked to the performance of the DJ-UBS Commodity Indices, the futures contracts underlying the DJ-UBS Commodity Indices or the commodities underlying these futures contracts. Certain of UBS's affiliates may underwrite or issue other securities or financial instruments indexed to the DJ-UBS Commodity Indices and related indices, and UBS and CME Indexes and certain of their affiliates may license the DJ-UBS Commodity Indices for publication or for use by unaffiliated third parties.

These activities could present conflicts of interest and could affect the levels of the DJ-UBS Commodity Indices. For instance, a market maker in a financial instrument linked to the performance of a DJ-UBS Commodity Index may expect to hedge some or all of its position in that financial instrument. Purchase (or selling) activity in the underlying components of a DJ-UBS Commodity Index in order to hedge the market maker's position in the financial instrument may affect the market price of the futures contracts included in such DJ-UBS Commodity Index, which in turn may affect the level of such DJ-UBS Commodity Index and the value of your notes. With respect to any of the activities described above, none of UBS, CME Indexes or their respective affiliates has any obligation to take the needs of any buyers, sellers or holders of the notes into consideration at any time.

**For notes linked to one or more S&P GSCI Component Indices, any such index may be more volatile and susceptible to price fluctuations of commodities than a broader commodities index.**

Each of the S&P GSCI Component Indices (as defined under “Commodity Index Descriptions — The S&P GSCI Indices” in this underlying supplement no. 1-I) may be more volatile and susceptible to price fluctuations than a broader commodities index, such as the S&P GSCI™ or the Dow Jones-UBS Commodity Index<sup>SM</sup>. In contrast to the S&P GSCI™ and Dow Jones-UBS Commodity Index<sup>SM</sup>, which include contracts on the principal physical commodities that are actively traded, each of the S&P GSCI Component Indices is composed of contracts covering only a single physical commodity or only physical commodities in a single sector. As a result, price volatility in the contracts included in the S&P GSCI™ or the Dow Jones-UBS Commodity Index<sup>SM</sup> will likely have a greater impact on each S&P GSCI Component Index than it would on the broader S&P GSCI™ or Dow Jones-UBS Commodity Index<sup>SM</sup>, and each S&P GSCI Component Index individually will be more susceptible to fluctuations and declines in value of the physical commodities included in such index. In addition, the S&P GSCI Component Indices may be less representative of the economy and commodity markets as a whole and might therefore not serve as a reliable benchmark for commodity market performance generally.

**For notes linked to a S&P GSCI Index, changes in the composition and valuation of the S&P GSCI™ may adversely affect the market value and/or the payment at maturity.**

The composition of the S&P GSCI Indices may change over time, as additional futures contracts satisfy the eligibility criteria of the S&P GSCI™ or futures contracts currently included in the S&P GSCI™ fail to satisfy such criteria. Those changes could impact the composition and valuation of the S&P GSCI Indices. The weighting factors applied to each commodity included in the S&P GSCI™ change annually, based on changes in commodity production statistics. In addition, S&P may modify the methodology for determining the composition and weighting of the S&P GSCI™ and for calculating their value in order to assure that the S&P GSCI™ represents a measure of the performance over time of the markets for the underlying commodities represented by the S&P GSCI™ and its sub-indices. A number of modifications to the methodology for determining the contracts to be included in each S&P GSCI Index, and for valuing each S&P GSCI Index, have been made in the past several years and further modifications may be made in the future. Such changes could adversely affect the market value and/or the payment at maturity.

**For notes linked in whole or in part to an S&P GSCI Index or a DJ-UBS Commodity Index, the value of the notes could be affected by an anticipated change in ownership of these indices.**

On November 4, 2011, The McGraw-Hill Companies, Inc. (“McGraw-Hill”), the owner of the S&P Indices business, and CME Group Inc. (“CME Group”), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions. While it’s unclear what effect, if any, this change in ownership will have on the DJ-UBS Commodities Indices and the S&P GSCI Indices or on the notes, any changes to the methodology of a relevant Index could affect adversely the level of that Index and, accordingly, the value of your notes.

## Risks Relating to Certain Funds

**We are currently one of the issuers of equity securities held by the Financial Select Sector SPDR® Fund and the SPDR® S&P 500® ETF Trust, but, to our knowledge, unless otherwise specified in the relevant terms supplement, we are not currently affiliated with any other company the equity securities of which are held by a Fund.**

We are currently one of the companies that make up the Financial Select Sector SPDR® Fund and the SPDR® S&P 500® ETF Trust, but, unless otherwise specified in the relevant terms supplement, to our knowledge, we are not currently affiliated with any other issuers the equity securities of which are held by a Fund. As a result, we will have no ability to control the actions of the other issuers of such equity securities, including actions that could affect the value of the equity securities underlying an Index or your notes. None of the money you pay us will go to the investment adviser of any Fund or any of the other issuers of the equity securities held by any Fund, and none of those issuers will be involved in the offering of the notes in any way. Neither those issuers nor we will have any obligation to consider your interests as a holder of the notes in taking any corporate actions that might affect the value of your notes. See the relevant terms supplement for additional information about whether we are one of the companies held by a Fund.

In the event we become affiliated with any issuers the equity securities of which are held by a Fund, we will have no obligation to consider your interests as a holder of the notes in taking any action with respect to such issuer that might affect the value of your notes.

**If the notes are linked in whole or in part to the Financial Select Sector SPDR® Fund, risks associated with the financial services industry will affect the value of the notes.**

All or substantially all of the equity securities held by the Financial Select Sector SPDR® Fund are issued by companies whose primary line of business is directly associated with the financial services sector, including the following sub-sectors: banking, mortgage finance, consumer finance, specialized finance, investment banking and brokerage, asset management and custody, corporate lending, insurance and financial investment, and real estate, including real estate investment trusts. Financial services companies are subject to extensive government regulation which may limit both the amounts and types of loans and other financial commitments they can make, and the interest rates and fees they can charge. Profitability is largely dependent on the availability and cost of capital funds, and can fluctuate significantly when interest rates change. Credit losses resulting from financial difficulties of borrowers can negatively impact the sector. Insurance companies may be subject to severe price competition. Adverse economic, business or political developments affecting real estate could have a major effect on the value of real estate securities (which include real estate investment trusts). If the notes are linked in whole or in part to the Financial Select Sector SPDR® Fund, the value of the notes may be subject to greater volatility and be more adversely affected by a single economic, political or regulatory occurrence affecting these industries than a different investment linked to securities of a more broadly diversified group of issuers.

**If the notes are linked in whole or in part to the iShares® Barclays 20+ Year Treasury Bond Fund, the notes are subject to significant risks associated with fixed-income securities, including interest rate-related and credit-related risks.**

Investing in the notes linked to the iShares® Barclays 20+ Year Treasury Bond Fund differs significantly from investing directly in bonds to be held to maturity as the value of iShares® Barclays 20+ Year Treasury Bond Fund changes, at times significantly, during each trading day based upon the current market prices of its underlying bonds. The market prices of these bonds are volatile and significantly influenced by a number of factors, particularly the yields on these bonds as compared to current market interest rates and the actual or perceived credit quality of the issuer of these bonds.



In general, fixed-income securities are significantly affected by changes in current market interest rates. As interest rates rise, the price of fixed-income securities, including those underlying the iShares® Barclays 20+ Year Treasury Bond Fund, is likely to decrease. Securities with longer durations tend to be more sensitive to interest rate changes, usually making them more volatile than securities with shorter durations. The eligibility criteria for the securities included in the index that underlies the iShares® Barclays 20+ Year Treasury Bond Fund, which mandate that each security must have a minimum term remaining to maturity of greater than 20 years for continued eligibility, means that, at any time, only longer-term securities underlie the iShares® Barclays 20+ Year Treasury Bond Fund, which thereby increases the risk of price volatility in the underlying securities and, consequently, the volatility in the value of the Index. As a result, rising interest rates may cause the value of the bonds underlying the iShares® Barclays 20+ Year Treasury Bond Fund and the price of the iShares® Barclays 20+ Year Treasury Bond Fund to decline, possibly significantly.

Interest rates are subject to volatility due to a variety of factors, including:

- sentiment regarding underlying strength in the U.S. economy and global economies;
- expectations regarding the level of price inflation;
- sentiment regarding credit quality in the U.S. and global credit markets;
- central bank policies regarding interest rates; and
- the performance of U.S. and foreign capital markets.

Recently, U.S. treasury notes have been trading near their historic high trading price. If the price of the U.S. treasury notes reverts to its historic mean or otherwise falls, as a result of a general increase in interest rates or perceptions of reduced credit quality of the U.S. government or otherwise, the value of the bonds underlying the iShares® Barclays 20+ Year Treasury Bond Fund will decline, which could have a negative impact on the return on your notes.

**For notes linked in whole or in part to the iShares® Dow Jones Real Estate Index Fund, risks associated with the real estate industry will affect the price of shares of the iShares® Dow Jones Real Estate Index Fund and the value of the notes.**

The real estate industry is cyclical and has from time to time experienced significant difficulties. The prices of the securities included in the Dow Jones U.S. Real Estate Index and held by the iShares® Dow Jones Real Estate Index Fund and, in turn, the level of the Dow Jones U.S. Real Estate Index and the price of shares of the iShares® Dow Jones Real Estate Index Fund, as applicable, will be affected by a number of factors that may either offset or magnify each other, including:

- employment levels and job growth;
- the availability of financing for real estate;
- interest rates;
- consumer confidence;
- the availability of suitable undeveloped land;
- federal, state and local laws and regulations concerning the development of land, construction, home and commercial real estate sales, financing and environmental protection; and
- competition among companies that engage in the real estate business.

The difficulties described above could cause a downturn in the real estate industry generally or regionally and could cause the value of the securities included in the Dow Jones U.S. Real Estate Index and held by the iShares® Dow Jones Real Estate Index Fund and the level of the Dow Jones U.S. Real Estate Index and the price of shares of the iShares® Dow Jones Real Estate Index Fund, as applicable, to decline or remain flat during the term of the notes.

**For notes linked in whole or in part to the iShares® Dow Jones Real Estate Index Fund, risks associated with Real Estate Investment Trusts will affect the value of the notes.**

The Dow Jones U.S. Real Estate Index and the iShares® Dow Jones Real Estate Index Fund are composed of a variety of real-estate-related stocks including real estate investment trusts ("REITs"). REITs invest primarily in income-producing real estate or real-estate-related loans or interests. Investments in REITs, though not direct investments in real estate, are still subject to the risks associated with investing in real estate. The following are some of the conditions that might impact the structure of and cash flow generated by REITs and, consequently, the value of REITs and, in turn, the Dow Jones U.S. Real Estate Index and the iShares® Dow Jones Real Estate Index Fund:

- a decline in the value of real estate properties;
- extended vacancies of properties;
- increases in property and operating taxes;
- increased competition or overbuilding;
- a lack of available mortgage funds or other limits on accessing capital;
- tenant bankruptcies and other credit problems;
- limitation on rents, including decreases in market rates for rents;
- changes in zoning laws and governmental regulations;
- costs resulting from the clean-up of, and legal liability to third parties for, damages resulting from environmental problems;
- investments in developments that are not completed or that are subject to delays in completion;
- risks associated with borrowing;
- changes in interest rates;
- casualty and condemnation losses; and
- uninsured damages from floods, earthquakes or other natural disasters.

The factors above may either offset or magnify each other. To the extent that any of these conditions occur, they may negatively impact a REIT's cash flow and cause a decline in the share price of a REIT, and, consequently, the level of the Dow Jones U.S. Real Estate Index and the price of shares of the iShares® Dow Jones Real Estate Index Fund. In addition, some REITs have relatively small market capitalizations, which can increase the volatility of the market price of securities issued by those REITs. Furthermore, REITs are dependent upon specialized management skills, have limited diversification and are, as a result, subject to risks inherent in operating and financing a limited number of projects. To the extent that such risks increase the volatility of the market price of securities issued by REITs, they may also, consequently, increase the volatility of the Dow Jones U.S. Real Estate Index and the iShares® Dow Jones Real Estate Index Fund.

**For notes linked in whole or in part to the iShares® Dow Jones Real Estate Index Fund, there will be no direct correlation between the value of the notes or the price of the iShares® Dow Jones Real Estate Index Fund and residential housing prices.**

There is no direct linkage between the price of shares of the iShares® Dow Jones Real Estate Index Fund and residential housing prices in specific regions or residential housing prices in general. While residential housing prices may be one factor that could affect the prices of the securities held by the Real Estate Constituent and consequently the price of shares of the iShares® Dow Jones Real Estate Index Fund, the price of shares of the iShares® Dow Jones Real Estate Index Fund and therefore the value of the notes are not directly linked to movements of residential housing prices and may be affected by factors unrelated to such movements.

**For notes linked in whole or in part to the iShares® Russell 2000 Index Fund or the Market Vectors Junior Gold Miners ETF, an investment in the notes is subject to risks associated with small capitalization stocks.**

The stocks that are held by the iShares® Russell 2000 Index Fund and the Market Vectors Junior Gold Miners ETF are issued by companies with relatively small market capitalization. The stock prices of smaller companies may be more volatile than stock prices of large capitalization companies. Small capitalization companies may be less able to withstand adverse economic, market, trade and competitive conditions relative to larger companies. These companies tend to be less well-established than large market capitalization companies. Small capitalization companies are less likely to pay dividends on their stocks, and the presence of a dividend payment could be a factor that limits downward stock price pressure under adverse market conditions.

**For notes linked in whole or in part to the Market Vectors Gold Miners ETF or the Market Vectors Junior Gold Miners ETF, risks associated with the gold and silver mining industries will affect the value of the notes.**

The equity securities included in the NYSE Arca Gold Miners Index and the Market Vectors® Junior Gold Miners Index and that are generally tracked by the Market Vectors Gold Miners ETF and the Market Vectors Junior Gold Miners ETF are common stocks and ADRs of companies primarily engaged in mining for gold and silver. The shares of the Market Vectors Gold Miners ETF and the Market Vectors Junior Gold Miners ETF may be subject to increased price volatility as they are linked to a single industry, market or sector and may be more susceptible to adverse economic, market, political or regulatory occurrences affecting that industry, market or sector.

Because the Market Vectors Gold Miners ETF and the Market Vectors Junior Gold Miners ETF invest primarily in common stocks and ADRs of companies that are involved in the gold mining industries, the shares of the Market Vectors Gold Miners ETF are subject to certain risks associated with such companies. Competitive pressures may have a significant effect on the financial condition of such companies in the gold mining industry. Also, gold mining companies are highly dependent on the price of gold. Gold prices are subject to volatile price movements over short periods of time and are affected by numerous factors. These include economic factors, including, among other things, the structure of and confidence in the global monetary system, expectations of the future rate of inflation, the relative strength of, and confidence in, the U.S. dollar (the currency in which the price of gold is generally quoted), interest rates and gold borrowing and lending rates, and global or regional economic, financial, political, regulatory, judicial or other events. Gold prices may also be affected by industry factors such as industrial and jewelry demand, lending, sales and purchases of gold by the official sector, including central banks and other governmental agencies and multilateral institutions which hold gold, levels of gold production and production costs, and short-term changes in supply and demand because of trading activities in the gold market.

The Market Vectors Gold Miners ETF and the Market Vectors Junior Gold Miners ETF invest to a lesser extent in common stocks and ADRs of companies involved in the silver mining industry. Silver mining companies are highly dependent on the price of silver. Silver prices can fluctuate widely and may be affected by numerous factors. These include general economic trends, technical developments, substitution issues and regulation, as well as specific factors including industrial and jewelry demand, expectations with respect to the rate of inflation, the relative strength of the U.S. dollar (the currency in which the price of silver is generally quoted) and other currencies, interest rates, central bank sales, forward sales by producers, global or regional political or economic events, and production costs and disruptions in major silver producing countries such as the United Mexican States and the Republic of Peru. The supply of silver consists of a combination of new mine production and existing stocks of bullion and fabricated silver held by governments, public and private financial institutions, industrial organizations and private individuals. In addition, the price of silver has on occasion been subject to very rapid short-term changes due to speculative activities. From time-to-time, above-ground inventories of silver may also influence the market. The major end-uses for silver include industrial applications, photography, jewelry and silverware.

**For notes linked in whole or in part to the Market Vectors Junior Gold Miners ETF, risks associated with early stage mining companies will affect the value of the notes.**

The issuers of a significant amount of the equity securities held by the Market Vectors Junior Gold Miners ETF may be early stage mining companies that are in the exploration stage only or that hold properties that might not ultimately produce gold or silver. The exploration and development of mineral deposits involve significant financial risks over a significant period of time which even a combination of careful evaluation, experience and knowledge may not eliminate. Few properties which are explored are ultimately developed into producing mines. Major expenditures may be required to establish reserves by drilling and to construct mining and processing facilities at a site. In addition, many early stage miners operate at a loss and are dependent on securing equity and/or debt financing, which might be more difficult to secure for an early stage mining company than for a more established counterpart.

**For notes linked in whole or in part to the SPDR® Gold Trust, the price of gold is volatile and is affected by numerous factors.**

The value of the SPDR® Gold Trust is closely related to the price of gold. A decrease in the price of gold may have a material adverse effect on the value of the notes and your return on your investment in the notes. Gold is subject to the effect of numerous factors. The following describes some of the factors affecting gold.

The price of gold is primarily affected by the global demand for and supply of gold. The market for gold bullion is global, and gold prices are subject to volatile price movements over short periods of time and are affected by numerous factors, including macroeconomic factors such as the structure of and confidence in the global monetary system, expectations regarding the future rate of inflation, the relative strength of, and confidence in, the U.S. dollar (the currency in which the price of gold is usually quoted), interest rates, gold borrowing and lending rates, and global or regional economic, financial, political, regulatory, judicial or other events. Gold prices may be affected by industry factors such as industrial and jewelry demand as well as lending, sales and purchases of gold by the official sector, including central banks and other governmental agencies and multilateral institutions that hold gold. Additionally, gold prices may be affected by levels of gold production, production costs and short-term changes in supply and demand due to trading activities in the gold market. It is not possible to predict the aggregate effect of all or any combination of these factors.

**For notes linked in whole or in part to the SPDR® Gold Trust, economic or political events or crises could result in large-scale purchases or sales of gold, which could affect the price of gold and may adversely affect the value of your notes.**

Many investors, institutions, governments and others purchase and sell gold as a hedge against inflation, market turmoil or uncertainty or political events. Under such circumstances, significant large-scale purchases or sales of gold by market participants may affect the price of gold, which could adversely affect the value of your notes. Crises in the future may impair gold's price performance which would, in turn, adversely affect the shares of the SPDR® Gold Trust and your investment in the notes.

**For notes linked in whole or in part to the SPDR® Gold Trust, gold is traded on the London Bullion Market Association, so an investment in the notes may be subject to risks associated with the London Bullion Market Association.**

The SPDR® Gold Trust is closely related to its underlying commodity (*e.g.*, gold), which is traded on the London Bullion Market Association (the "LBMA"). Investments in securities indexed to the value of commodities that are traded on non-U.S. exchanges involve risks associated with the markets in those countries, including risks of volatility in those markets and governmental intervention in those markets.

The final price of gold will be determined by reference to fixing prices reported by the LBMA. The LBMA is a self-regulatory association of bullion market participants. Although all market-making members of the LBMA are supervised by the Bank of England and are required to satisfy a capital adequacy test, the LBMA itself is not a regulated entity. If the LBMA should cease operations, or if bullion trading should become subject to a value added tax or other tax or any other form of regulation currently not in place, the role of LBMA price fixings as a global benchmark for the value of gold may be adversely affected. The LBMA is a principals' market which operates in a manner more closely analogous to an over-the-counter physical commodity market than regulated futures markets, and certain features of U.S. futures contracts are not present in the context of LBMA trading. For example, there are no daily price limits on the LBMA which would otherwise restrict fluctuations in the prices of LBMA contracts. In a declining market, it is possible that prices would continue to decline without limitation within a trading day or over a period of trading days.

**For notes linked in whole or in part to the SPDR® Gold Trust, the relevant exchange for gold has no obligation to consider your interests.**

The price of the SPDR® Gold Trust is closely related to the price of gold. The relevant exchange for gold is responsible for calculating the official settlement price or fixing level, as applicable, for gold. The relevant exchange may alter, discontinue or suspend calculation or dissemination of the official settlement price or fixing level, as applicable, for gold. Any of these actions could adversely affect the value of the notes. The relevant exchange has no obligation to consider your interests in calculating or revising the official settlement price or fixing level, as applicable, for gold.

**For notes linked in whole or in part to the SPDR® Gold Trust, termination of the SPDR® Gold Trust could affect adversely the value of the notes.**

The SPDR® Gold Trust may be required to terminate and liquidate at a time that is disadvantageous to you. If the SPDR® Gold Trust is required to terminate and liquidate, such termination and liquidation could occur at a time that is disadvantageous to you, such as when the price of gold is higher than the price of gold at the time when you purchased your notes.

**The performance of the SPDR® Gold Trust may not correlate with the price of gold.**

The performance of SPDR® Gold Trust may not fully replicate the performance of the price of gold due to the fees and expenses charged by the SPDR® Gold Trust or by restrictions on access to gold due to other circumstances. The SPDR® Gold Trust does not generate any income and as the SPDR® Gold Trust regularly sells gold to pay for its ongoing expenses, the amount of gold represented by each share gradually declines over time. The SPDR® Gold Trust sells gold to pay expenses on an ongoing basis irrespective of whether the trading price of the shares rises or falls in response to changes in the price of gold. The sale of SPDR® Gold Trust's gold to pay expenses at a time of low gold prices could adversely affect the value of the notes. Additionally, there is a risk that part or all of the SPDR® Gold Trust's gold could be lost, damaged or stolen due to war, terrorism, theft, natural disaster or otherwise.

The net asset value of the SPDR® Gold Trust will reflect the performance of gold. However, because the shares of the SPDR® Gold Trust are traded on NYSE Arca, Inc. and are subject to market supply and investor demand, the market value of one Share of the SPDR® Gold Trust may differ from the net asset value per share of the SPDR® Gold Trust.

For all of the foregoing reasons, the performance of the SPDR® Gold Trust over the term of the notes may not correlate with the performance of the return on gold over the same period. Consequently, the return on the notes will not be the same as investing directly in the SPDR® Gold Trust, gold or other exchange-traded or over-the-counter instruments based on gold, and will not be the same as investing in a note or another financial product with a interest payments linked in part to the performance of the SPDR® Gold Trust.

**For notes linked in whole or in part to the SPDR® S&P® Homebuilders ETF, risks associated with the homebuilding industry will affect the value of the notes.**

The homebuilding industry is significantly affected by factors in general and local economic conditions and real estate markets as well as by weather conditions, natural disasters and geopolitical events, any of which could affect the ability of the companies the equity securities of which are held by the SPDR® S&P® Homebuilders ETF to conduct their businesses profitably. The homebuilding industry is cyclical and has from time to time experienced significant difficulties. The prices of the equity securities held by the SPDR® S&P® Homebuilders ETF and, in turn, the price of the SPDR® S&P® Homebuilders ETF, will be affected by a number of factors that may either offset or magnify each other, including:

- a decline in the value of real estate properties;
- employment levels and job growth;
- the availability of financing for home buyers;
- interest rates;
- consumer confidence;
- housing demand;
- the availability of suitable undeveloped land;
- raw material and labor shortages and price fluctuations;
- federal, state and local laws and regulations concerning the development of land, homebuilding, home sales, consumer financing and environmental protection;

- competition among companies which engage in the homebuilding business; and
- the supply of homes and other housing alternatives.

In addition, weather conditions and natural disasters such as hurricanes, tornadoes, earthquakes, floods and fires can harm the homebuilding business. Geopolitical events, such as the aftermath of the war with Iraq and the terrorist attacks on September 11, 2001, and related market disruptions could also have a significant impact on the homebuilding business.

The difficulties described above could cause an upturn or a downturn in the homebuilding industry generally or regionally and could cause the value of the equity securities held by the SPDR® S&P® Homebuilders ETF and thus the price of the SPDR® S&P® Homebuilders ETF to decline or remain flat during the term of the notes.

**For notes linked in whole or in part to the SPDR® S&P® Homebuilders ETF, there will be no direct correlation between the value of the notes or the price of the SPDR® S&P® Homebuilders ETF and residential housing prices.**

There is no direct linkage between the price of the SPDR® S&P® Homebuilders ETF and residential housing prices in specific regions or residential housing prices in general. While residential housing prices may be one factor that could affect the prices of the equity securities held by the SPDR® S&P® Homebuilders ETF and consequently the price of the SPDR® S&P® Homebuilders ETF, the price of the SPDR® S&P® Homebuilders ETF and the notes are not directly linked to movements of residential housing prices and may be affected by factors unrelated to such movements.

**For notes linked in whole or in part to the SPDR® S&P® Metals & Mining ETF, risks associated with the metals and mining industry will affect the value of the notes.**

All or substantially all of the equity securities held by the SPDR® S&P® Metals & Mining ETF are issued by companies whose primary lines of business are directly associated with the metals and mining industry. As a result, the value of the notes may be subject to greater volatility and be more adversely affected by a single economic, political or regulatory occurrence affecting this industry than a different investment linked to securities of a more broadly diversified group of issuers. The metals and mining industry can be significantly affected by international political and economic developments, energy conservation, the success of exploration projects, commodity prices and tax and other government regulations. Companies involved in the metals and mining industry may benefit from government subsidies or certain trade protections. If those subsidies or trade protections are reduced or removed, the profits of such companies may be affected, potentially drastically. In addition, competitive pressures and the cyclical nature of the metal and mining industry may have a significant effect on the financial condition of these companies. These companies are also subject to risks of changes in exchange rates, terrorist attacks, depletion of resources and reduced demand as a result of increases in energy efficiency, substitution and energy conservation. Such companies are subject to extensive federal, state and local environmental laws and regulations regarding air emissions and the disposal of hazardous materials and may be at risk for environmental damage claims. These factors could cause a downturn in the metals and mining industry and could cause the value of the equity securities held by the SPDR® S&P® Metals & Mining ETF and the price of the SPDR® S&P® Metals & Mining ETF to decline during the term of the notes.

**For notes linked in whole or in part to the Technology Select Sector SPDR® Fund, risks associated with the technology sector will affect the value of the notes.**

All or substantially all of the equity securities held by the Technology Select Sector SPDR® Fund are issued by companies whose primary line of business is directly associated with the technology sector, including the following industries: computers and peripherals; software; diversified

telecommunication services; communications equipment; semiconductors & semiconductor equipment; internet software and services; IT services; electronic equipment, instruments and components; wireless telecommunication services and office electronics. The Technology Select Sector SPDR® Fund is concentrated in the technology sector, which means the Technology Select Sector SPDR® Fund will be more affected by the performance of the technology sector than a fund or index that was more diversified. Market or economic factors impacting technology companies and companies that rely heavily on technology advances could have a major effect on the value of the Technology Select Sector SPDR® Fund. The value of stocks of technology companies and companies that rely heavily on technology is particularly vulnerable to rapid changes in technology product cycles, rapid product obsolescence, government regulation and competition, both domestically and internationally, including competition from foreign competitors with lower production costs. Technology companies and companies that rely heavily on technology, especially those of smaller, less-seasoned companies, tend to be more volatile than the overall market. Additionally, companies in the technology sector may face dramatic and often unpredictable changes in growth rates and competition for the services of qualified personnel. The difficulties described above could cause an upturn or a downturn in the technology sector generally or regionally and could cause the value of the securities held by the Technology Select Sector SPDR® Fund and thus the value of the Technology Select Sector SPDR® Fund to decline or remain flat during the term of the notes, which may adversely affect the value of your notes.

**The performance of the United States Oil Fund, LP may not fully replicate the performance of the price of light, sweet crude oil.**

United States Commodity Funds LLC, the general partner of the United States Oil Fund, LP, is responsible for investing the assets of the United States Oil Fund, LP in accordance with the objectives and policies of the United States Oil Fund, LP. The assets of the United States Oil Fund, LP consist primarily of investments in futures contracts for light, sweet crude oil, other types of crude oil, heating oil, gasoline, natural gas, and other petroleum-based fuels that are traded on the New York Mercantile Exchange, ICE Futures or other U.S. and foreign exchanges (collectively, “oil futures contracts”) and other oil interests such as cash-settled options on oil futures contracts, forward contracts for oil, and over-the-counter transactions that are based on the price of oil, other petroleum-based fuels, oil futures contracts and indices based on the foregoing (collectively, “other oil interests” and together with oil futures contracts, “oil interests”). The United States Oil Fund, LP seeks to achieve its investment objective by investing in a mix of oil futures contracts and other oil interests such that changes in the net asset value of the United States Oil Fund, LP will closely track the changes in the price of a specified oil futures contract (the “benchmark oil futures contract”). The United States Oil Fund, LP's general partner believes that the benchmark oil futures contract historically has exhibited a close correlation with the spot price of light, sweet crude oil.

There is no assurance that the general partner of the United States Oil Fund, LP will successfully implement its investment strategy and there is a risk that changes in the price of United States Oil Fund, LP units will not closely track changes in the spot price of light, sweet crude oil. The performance of the United States Oil Fund, LP may not exactly replicate the performance of the oil interests underlying the United States Oil Fund, LP because the United States Oil Fund, LP will reflect transaction costs and fees. It is also possible that the United States Oil Fund, LP may not fully replicate or may in certain circumstances diverge significantly from the performance of the oil interests underlying the United States Oil Fund, LP due to the temporary unavailability of certain securities in the secondary market or the performance of any derivative instruments contained in the United States Oil Fund, LP. This could also happen if the price of the units does not correlate closely with the United States Oil Fund, LP's net asset value; changes in the United States Oil Fund, LP's net asset value do not closely correlate with changes in the price of the benchmark oil futures contract; or changes in the price of the benchmark oil futures contract do not closely correlate with changes in the cash or spot price of light, sweet crude oil. Light, sweet crude oil has also demonstrated a lack of correlation with world crude oil prices due to structural differences between the U.S. market for crude oil and the international market for crude oil. The prices of light, sweet crude oil may be more volatile than world crude oil prices generally.



**For notes linked in whole or in part to the United States Oil Fund, LP, global energy commodity prices are primarily affected by the global demand for and supply of these commodities, but are also significantly influenced by speculative actions and by currency exchange rates.**

Prices for energy commodities, which includes crude oil, are affected by governmental programs and policies, national and international political and economic events, changes in interest and exchange rates, trading activities in commodities and related contracts, trade, fiscal, monetary and exchange control policies and, with respect to oil specifically, drought, floods, weather, government intervention, environmental policies, embargoes and tariffs. Demand for refined petroleum products by consumers, as well as the agricultural, manufacturing and transportation industries, affects the price of energy commodities. Sudden disruptions in the supplies of energy commodities, such as those caused by war, natural events, accidents or acts of terrorism, may cause prices of energy commodities futures contracts to become extremely volatile and unpredictable. Also, sudden and dramatic changes in the futures market may occur, for example, upon a cessation of hostilities that may exist in countries producing energy commodities, the introduction of new or previously withheld supplies into the market or the introduction of substitute products or commodities. In particular, supplies of crude oil may increase or decrease depending on, among other factors, production decisions by the Organization of Oil and Petroleum Exporting Countries ("OPEC") and other crude oil producers. Crude oil prices are determined with significant influence by OPEC, which has the capacity to influence oil prices worldwide because its members possess a significant portion of the world's oil supply. Crude oil prices are generally more volatile and subject to dislocation than prices of other commodities. Demand for energy commodities such as crude oil is generally linked to economic activity, and will tend to reflect general economic conditions.

**For notes linked in whole or in part to the United States Oil Fund, LP, the price of crude oil may change unpredictably and affect the price of the United States Oil Fund, LP and the value of the notes in unforeseen ways.**

The price of the United States Oil Fund, LP is linked closely to the price of light, sweet crude oil. The price of crude oil is subject to volatile price movements over short periods of time and is generally affected by numerous factors including:

- demand for refined petroleum products by consumers, as well as the agricultural, manufacturing and transportation industries;
- economic conditions that affect the end-use of crude oil as a refined product such as transport fuel, industrial fuel and in-home heating fuel;
- U.S. government regulations, such as environmental or consumption policies;
- geopolitical events, labor activity and, in particular, direct government intervention such as embargos;
- supply disruptions in major oil producing regions of the world, production decisions by OPEC and other crude oil producers and cessation of hostilities that may exist in countries producing oil;
- sudden disruptions in the supply of oil due to war, natural events, accidents or acts of terrorism; and
- the introduction of new or previously withheld supplies into the market or the introduction of substitute products or commodities.

## EQUITY INDEX DESCRIPTIONS

### THE DOW JONES INDUSTRIAL AVERAGE<sup>SM</sup>

We have derived all information contained in this underlying supplement regarding the Dow Jones Industrial Average<sup>SM</sup>, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information prepared by CME Group Index Services LLC ("CME"), a joint venture company owned 90% by CME Group Inc. and 10% by Dow Jones & Company, Inc. ("Dow Jones"). Such information reflects the policies of, and is subject to change by, CME. We make no representation or warranty as to the accuracy or completeness of such information. The Dow Jones Industrial Average<sup>SM</sup> is an index calculated, published and disseminated by CME. CME has no obligation to continue to publish, and may discontinue publication of, the Dow Jones Industrial Average<sup>SM</sup>.

The Dow Jones Industrial Average<sup>SM</sup> is reported by Bloomberg L.P. under the ticker symbol "INDU."

On November 4, 2011, The McGraw-Hill Companies, Inc. ("McGraw-Hill"), the owner of the S&P Indices business, and CME Group Inc. ("CME Group"), the 90% owner of CME Indices, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business, including the Dow Jones Industrial Average<sup>SM</sup>. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

The Dow Jones Industrial Average<sup>SM</sup> was introduced to the investing public by Charles Dow on May 26, 1896 and originally comprised only 12 stocks. It has since become one of the most well known and widely followed indicators of the U.S. stock market and is the oldest continuing stock market index in the world. The Dow Jones Industrial Average<sup>SM</sup> consists of 30 common stocks chosen as representative of the broad market of U.S. industry. Many of the companies represented in the Dow Jones Industrial Average<sup>SM</sup> are household names and leaders in their respective industries, and their stocks are widely held by both individual and institutional investors. Because the Dow Jones Industrial Average<sup>SM</sup> is so well known and its performance is generally perceived to reflect that of the overall domestic equity market, it is often used as a benchmark for investments in equities, mutual funds, and other asset classes.

The Dow Jones Industrial Average<sup>SM</sup> is a price-weighted index rather than market capitalization-weighted index. In essence, the Dow Jones Industrial Average<sup>SM</sup> consists of one share of each of the 30 stocks included in the Dow Jones Industrial Average<sup>SM</sup>. Thus, the weightings of the components of the Dow Jones Industrial Average<sup>SM</sup> are affected only by changes in their prices, while the weightings of stocks in other indices are affected by price changes and changes in shares outstanding. This distinction stems from the fact that, when initially created, the Dow Jones Industrial Average<sup>SM</sup> was a simple average (hence the name), and was computed merely by adding up the prices of the stocks in the Dow Jones Industrial Average<sup>SM</sup> and dividing that sum by the total number of stocks in the Dow Jones Industrial Average<sup>SM</sup>. However, it eventually became clear that a method was needed to smooth out the effects of stock splits and other composition changes to prevent these events from distorting the level of the Dow Jones Industrial Average<sup>SM</sup>. Therefore, a divisor was created that has been periodically adjusted over time. This divisor, when divided into the sum of the prices of the stocks in the Dow Jones Industrial Average<sup>SM</sup>, generates the number that is reported every day in newspapers, on television and radio, and over the internet. With the incorporation of the divisor, the Dow Jones Industrial Average<sup>SM</sup> can no longer be considered an average.

The components of the Dow Jones Industrial Average<sup>SM</sup> are selected by a committee composed of the managing editor of The Wall Street Journal, which is published by Dow Jones, the head of Dow Jones Indexes research and the head of CME Group research (the "Averages Committee"). The

Averages Committee was created in February 2010, when Dow Jones Indexes became part of CME. Periodically, the Averages Committee reviews and makes changes to the composition of the Dow Jones Industrial Average<sup>SM</sup>. While component selection is not governed by quantitative rules, a stock typically is added only if it has an excellent reputation, demonstrates sustained growth and is of interest to a large number of investors. The inclusion of any particular company in the Dow Jones Industrial Average<sup>SM</sup> does not constitute a prediction as to the company's future results of operations or stock market performance. For the sake of continuity, composition changes are rare, and generally have occurred only after corporate acquisitions or other dramatic shifts in a component company's core business. When such an event necessitates that one component be replaced, the entire index is reviewed. As a result, multiple component changes are often implemented simultaneously.

#### **License Agreement between Dow Jones and JPMorgan Chase & Co.**

The Dow Jones Industrial Average<sup>SM</sup> is a product of Dow Jones Indexes, a licensed trademark of CME, and has been licensed for use. "Dow Jones<sup>®</sup>," "Dow Jones Industrial Average<sup>SM</sup>," "DJIA<sup>SM</sup>" and "Dow Jones Indexes" are service marks of Dow Jones and have been licensed for use for certain purposes by JPMorgan Chase & Co. Dow Jones, CME and their respective affiliates have no relationship to the JPMorgan Chase & Co., other than the licensing of the Dow Jones Industrial Average (DJIA) and their respective service marks for use in connection with the certain financial products, including the notes.

#### **Dow Jones, CME and their respective affiliates do *not*:**

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- recommend that any person invest in the notes.
- have any responsibility or liability for or make any decisions about the timing, amount or pricing of the notes.
- have any responsibility or liability for the administration, management or marketing of the notes.
- consider the needs of the notes or the owners of the notes in determining, composing or calculating the DJIA or have any obligation to do so.

Notwithstanding the foregoing, CME Group Inc. and its affiliates may independently issue and/or sponsor financial products unrelated to the notes currently being issued by JPMorgan Chase & Co., but which may be similar to and competitive with the notes. In addition, CME Group Inc. and its affiliates actively trade financial products which are linked to the performance of the DJIA. It is possible that this trading activity will affect the value of the DJIA and the notes.

#### **Dow Jones, CME and their respective affiliates will not have any liability in connection with the notes. Specifically,**

- Dow Jones, CME and their respective affiliates do not make any warranty, express or implied, and Dow Jones, CME and their respective affiliates disclaim any warranty about:
- the results to be obtained by the notes, the owner of the notes or any other person in connection with the use of the DJIA and the data included in the DJIA;
- the accuracy or completeness of the DJIA or its data;
- the merchantability and the fitness for a particular purpose or use of the DJIA or its data;
- Dow Jones, CME and/or their respective affiliates will have no liability for any errors, omissions or interruptions in the DJIA or its data;
- under no circumstances will Dow Jones, CME and/or their respective affiliates be liable for any lost profits or indirect, punitive, special or consequential damages or losses, even if they know that they might occur.

The licensing relating to the use of the indexes and trademarks referred to above by JPMorgan Chase & Co. is solely for the benefit of JPMorgan Chase & Co., and not for any other third parties.

## THE EURO STOXX 50® INDEX

We have derived all information contained in this underlying supplement regarding the EURO STOXX 50® Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, STOXX Limited. We make no representation or warranty as to the accuracy or completeness of such information. The EURO STOXX 50® Index is calculated, maintained and published by STOXX Limited. STOXX Limited has no obligation to continue to publish, and may discontinue publication of, the EURO STOXX 50® Index.

The EURO STOXX 50® Index is reported by Bloomberg L.P. under the ticker symbol "SX5E."

The EURO STOXX 50® Index was created by STOXX Limited, a joint venture between Deutsche Börse AG and SIX Group AG. Publication of the EURO STOXX 50® Index began on February 26, 1998, based on an initial EURO STOXX 50® Index value of 1,000 at December 31, 1991. The EURO STOXX 50® Index is published in The Wall Street Journal and disseminated on the STOXX Limited website: <http://www.stoxx.com>, which sets forth, among other things, the country and industrial sector weightings of the securities included in the EURO STOXX 50® Index and updates these weightings at the end of each quarter. Information contained in the STOXX Limited website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

On March 1, 2010, STOXX Limited announced the removal of the "Dow Jones" prefix from all of its indices, including the EURO STOXX 50® Index.

### EURO STOXX 50® Index Composition and Maintenance

The EURO STOXX 50® Index is composed of 50 component stocks of market sector leaders from within the 19 EURO STOXX® Supersector indices, which represent the Eurozone portion of the STOXX Europe 600® Supersector indices. The STOXX Europe 600® Supersector indices contain the 600 largest stocks traded on the major exchanges of 18 European countries.

The composition of the EURO STOXX 50® Index is reviewed annually, based on the closing stock data on the last trading day in August. The component stocks are announced the first trading day in September. Changes to the component stocks are implemented on the third Friday in September and are effective the following trading day. The composition of the EURO STOXX 50® Index is also reviewed monthly to ensure that component stocks still remain eligible for inclusion. Any resulting changes from the monthly review are implemented on the close of the fifth trading day following the monthly review and are effective the next trading day. Changes in the composition of the EURO STOXX 50® Index are made to ensure that the EURO STOXX 50® Index includes the 50 market sector leaders from within the EURO STOXX® Index. A current list of the issuers that comprise the EURO STOXX 50® Index is available on the STOXX Limited website: <http://www.stoxx.com>. Information contained in the STOXX Limited website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

The free float factors for each component stock used to calculate the EURO STOXX 50® Index, as described below, are reviewed, calculated and implemented on a quarterly basis and are fixed until the next quarterly review.

The EURO STOXX 50® Index is also reviewed on an ongoing basis. Corporate actions (including initial public offerings, mergers and takeovers, spin-offs, delistings and bankruptcy) that affect the EURO STOXX 50® Index composition are immediately reviewed. Any changes are announced, implemented and effective in line with the type of corporate action and the magnitude of the effect.

## EURO STOXX 50® Index Calculation

The EURO STOXX 50® Index is calculated with the “Laspeyres formula,” which measures the aggregate price changes in the component stocks against a fixed base quantity weight. The formula for calculating the EURO STOXX 50® Index value can be expressed as follows:

$$\text{Index} = \frac{\text{free float market capitalization of the EURO STOXX 50® Index}}{\text{adjusted base date market capitalization of the EURO STOXX 50® Index}} \times 1,000$$

The “free float market capitalization of the EURO STOXX 50® Index” is equal to the sum of the products of the closing price, market capitalization and free float factor for each component stock as of the time the EURO STOXX 50® Index is being calculated.

The EURO STOXX 50® Index is also subject to a divisor, which is adjusted to maintain the continuity of EURO STOXX 50® Index values despite changes due to corporate actions. The following is a summary of the adjustments to any component stock made for corporate actions and the effect of such adjustment on the divisor, where shareholders of the component stock will receive “B” number of shares for every “A” share held (where applicable).

|  |  |
|--|--|
| <p>(1) <i>Split and reverse split:</i></p> <p>Adjusted price = closing price * A/B</p> <p>New number of shares = old number of shares * B/A</p> <p>Divisor: no change</p>  |  |
| <p>(2) <i>Rights offering:</i></p> <p>If the subscription price is not available or if the subscription price is equal to or greater than the closing price on the day before the effective date, then no adjustment is made</p> <p>Adjusted price = (closing price * A + subscription price * B) / (A + B)</p> <p>New number of shares = old number of shares * (A + B) / A</p> <p>Divisor: increases</p> |  |
| <p>(3) <i>Stock dividend:</i></p> <p>Adjusted price = closing price * A / (A + B)</p> <p>New number of shares = old number of shares * (A + B) / A</p> <p>Divisor: decreases</p>   | <p>(4) <i>Stock dividend of another company:</i></p> <p>Adjusted price = (closing price * A - price of other company * B) / A</p> <p>Divisor: decreases</p>                      |
| <p>(5) <i>Return of capital and share consideration:</i></p> <p>Adjusted price = (closing price – capital return announced by company * (1-</p>  | <p>(6) <i>Repurchase of shares / self tender:</i></p> <p>Adjusted price = ((price before tender * old number of shares) - (tender price * number of tendered shares)) / (old</p> |

|  |  |
|--|--|
| $\text{New number of shares} = \frac{\text{old number of shares} \times B}{A}$ <p>Divisor: decreases</p>   | $\text{New number of shares} = \frac{\text{old number of shares} - \text{number of tendered shares}}{\text{Divisor: decreases}}$   |
| <p><i>(7) Spin-off:</i><br/> Adjusted price = (closing price * A - price of spun-off shares * B) / A<br/> Divisor: decreases</p>   |  |
| <p><i>(8) Combination stock distribution (dividend or split) and rights offering:</i><br/> For this corporate action, the following additional assumptions apply:<br/> Shareholders receive B new shares from the distribution and C new shares from the rights offering for every A share held.<br/> If A is not equal to one share, all the following "new number of shares" formulae need to be divided by A:</p> |  |
| <p><i>- If rights are applicable after stock distribution (one action applicable to other):</i></p> $\text{Adjusted price} = \frac{\text{closing price} \times A + \text{subscription price} \times C \times (1 + B / A)}{(A + B) \times (1 + C / A)}$ $\text{New number of shares} = \frac{\text{old number of shares} \times ((A + B) \times (1 + C / A))}{A}$ <p>Divisor: increases</p>                           | <p><i>- If stock distribution is applicable after rights (one action applicable to other):</i></p> $\text{Adjusted price} = \frac{\text{closing price} \times A + \text{subscription price} \times C}{(A + C) \times (1 + B / A)}$ $\text{New number of shares} = \frac{\text{old number of shares} \times ((A + C) \times (1 + B / A))}{A}$ <p>Divisor: increases</p> |
| <p><i>- Stock distribution and rights (neither action is applicable to the other):</i></p> $\text{Adjusted price} = \frac{\text{closing price} \times A + \text{subscription price} \times C}{A + B + C}$ $\text{New number of shares} = \frac{\text{old number of shares} \times (A + B + C)}{A}$ <p>Divisor: increases</p>   |  |

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We have entered into an agreement with STOXX Limited ("STOXX") providing us and certain of our affiliates or subsidiaries identified in that agreement with a non-exclusive license and, for a fee, with the right to use the EURO STOXX 50® Index, which is owned and published by STOXX Limited, in connection with certain securities, including the notes.

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## THE FTSE™ 100 INDEX

We have derived all information in this underlying supplement regarding the FTSE™ 100 Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by FTSE International Limited ("FTSE"). FTSE has no obligation to continue to publish, and may discontinue publication of, the FTSE™ 100 Index. We make no representation or warranty as to the accuracy or completeness of such information.

The FTSE™ 100 Index is reported by Bloomberg L.P. under the ticker symbol "UKX."

The FTSE™100 Index is an index calculated, published and disseminated by FTSE, a company owned equally by the London Stock Exchange (the "LSE") and the Financial Times. The FTSE™ 100 Index measures the composite price performance of stocks of the largest 100 companies (determined on the basis of market capitalization) traded on the LSE. Publication of the FTSE™ 100 Index began in January 1984.

The FTSE™ 100 Index is calculated by (i) multiplying the per share price of each stock included in the FTSE™ 100 Index by the number of outstanding shares, (ii) calculating the sum of all these products (such sum being hereinafter the "FTSE Aggregate Market Value") as of the starting date of the FTSE™ 100 Index, (iii) dividing the FTSE Aggregate Market Value by a divisor which represents the FTSE Aggregate Market Value on the base date of the FTSE™ 100 Index and which can be adjusted to allow changes in the issued share capital of individual underlying stocks including the deletion and addition of stocks, the substitution of stocks, stock dividends and stock splits to be made without distorting the FTSE™ 100 Index and (iv) multiplying the result by 1,000. Because of such capitalization weighting, movements in share prices of companies with relatively larger market capitalization will have a greater effect on the level of the entire FTSE™ 100 Index than will movements in share prices of companies with relatively smaller market capitalization.

The 100 stocks included in the FTSE™ 100 Index (the "FTSE Underlying Stocks") were selected from a reference group of stocks trading on the LSE that were selected by excluding certain stocks that have low liquidity based on public float, accuracy and reliability of prices, size and number of trading days. The FTSE Underlying Stocks were selected from this reference group by selecting 100 stocks with the largest market value. A list of the issuers of the FTSE Underlying Stocks is available from FTSE.

The FTSE™ 100 Index is reviewed quarterly by the FTSE European/Middle East/Africa Regional Committee (the "Index Steering Committee") in order to maintain continuity in the level. The Index Steering Committee undertakes the reviews of the FTSE™ 100 Index and ensures that constituent changes and index calculations are made in accordance with the ground rules of the FTSE™ 100 Index. The meetings to review the constituents will be held on the Wednesday after the first Friday in March, June, September and December. Any constituent changes normally will be implemented on the trading day following the third Friday of the same month.

FTSE prepares information regarding possible companies to be included or excluded from the FTSE Index using the close of business figures from the Tuesday before a review. The review is then presented to the FTSE EMEA Committee for approval.

The FTSE Underlying Stocks may be replaced, if necessary, in accordance with deletion/addition rules that provide generally for the removal and replacement of a stock from the FTSE™ 100 Index if such stock is delisted or its issuer is subject to a takeover offer that has been declared unconditional or it has ceased, in the opinion of the Index Steering Committee, to be a viable component of the FTSE™ 100 Index. To maintain continuity, a stock will be added at the quarterly review if it has risen to 90th place or above and a stock will be deleted if at the quarterly review it



has fallen to 111th place or below, in each case ranked on the basis of market capitalization. A constant number of constituents will be maintained for the FTSE 100 Index. Where a greater number of companies qualify to be inserted in the 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 which are presently not included in the index will be inserted to match the number of companies being deleted at the periodic review.

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## THE HANG SENG CHINA ENTERPRISES INDEX

We have derived all information contained in this underlying supplement regarding the Hang Seng China Enterprises Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Hang Seng Indexes Company Limited ("HSICL"), a wholly owned subsidiary of Hang Seng Bank. We make no representation or warranty as to the accuracy or completeness of such information. The Hang Seng China Enterprises Index is calculated, maintained and published by HSICL. HSICL has no obligation to continue to publish, and may discontinue publication of, the Hang Seng China Enterprises Index.

The Hang Seng China Enterprises Index is reported by Bloomberg L.P. under the ticker symbol "HSCFI."

The Hang Seng China Enterprises Index was first calculated and published on August 8, 1994, one year after the first H-share company was listed on The Stock Exchange of Hong Kong Ltd. ("SEHK"). H-shares are Hong Kong listed shares, traded in Hong Kong dollars, of a company incorporated in the Chinese mainland. The Hang Seng China Enterprises Index is a free-float adjusted market capitalization weighted stock market index and measures the performance of certain H-share companies that have their primary listing on the main board of the SEHK. The Hang Seng China Enterprises Index includes 40 constituent stocks. The Hang Seng China Enterprises Index is calculated and disseminated real-time every 15 seconds during the trading hours on each trading day of SEHK, based on the calendar of the SEHK.

### Index Composition

#### *Defining the Eligible Stocks*

Only H-share companies with a primary listing on the main board of SEHK are eligible to be included in the Hang Seng China Enterprises Index. In addition, to be eligible for selection in the Hang Seng China Enterprises Index, a stock: (1) should be listed for at least one month by the review cut-off date; and (2) must satisfy the turnover screening requirements. Stocks that are already included in the Hang Seng China Enterprises Index must have a turnover velocity of at least 0.1% for at least 10 out of the past 12 months. To be added to the Hang Seng China Enterprises Index, a stock must have a turnover velocity of at least 0.1% for at least 10 out of the past 12 months and for each of the most recent three months. Turnover velocity is calculated by dividing the median of the daily trades shares during a specific calendar month by the freefloat-adjusted issued shares at the end of that month.

#### *Selecting the Index Companies*

The Hang Seng China Enterprises Index is reviewed quarterly with data cut-off dates as of the end of March, June, September and December each year. From the eligible stocks, final selections are made using the following methodology:

- (1) all eligible stocks are ranked by (i) full market capitalization, in terms of average month-end market capitalization in the past 12 months and (ii) freefloat-adjusted market capitalization, in terms of 12-month average market capitalization after freefloat adjustment;
- (2) the combined market capitalization ranking for each eligible stock is determined as the weighted average of the fully market capitalization ranking and the freefloat-adjusted market capitalization ranking, where each rank has a 50% weight; and
- (3) the 40 stocks that have the highest combined market capitalization ranking are selected as the constituents of Hang Seng China Enterprises Index, subject to the buffer zone rule as described below.

### *Buffer Zone and Effective Date*

Existing constituents ranked 49th or lower will be removed from the Hang Seng China Enterprises Index while non-constituent stocks ranked 32nd or above will be included. In case the number of incoming stocks is greater than the number of outgoing constituents, constituents with the lowest combined market capitalization rank will be removed from the Hang Seng China Enterprises Index in order to maintain the number of constituents at 40. If the number of incoming stocks is smaller than the number of outgoing constituents, stocks with the highest combined market capitalization rank will be added to the Hang Seng China Enterprises Index in order to maintain the number of constituents at 40.

Effective dates of constituent changes will be the next trading day after the first Friday of March, June, September and December. If that Friday falls on a public holiday, it will be postponed to the next Friday, subject to the final decision made by HSICL. Under normal circumstances, at least seven trading days' notice will be given for any constituent changes before the effective dates.

### **Index Calculation**

The calculation methodology of the Hang Seng China Enterprises Index is a free float-adjusted market capitalization weighting methodology with a 10% cap on individual stocks. The Hang Seng China Enterprises Index is a price index without adjustment for cash dividends or warrant bonuses.

The formula for the index calculation is shown below:

$$\begin{aligned}\text{Current Index} &= \frac{\text{Current Aggregate Freefloat-adjusted Market Capitalization of Constituents}}{\text{Yesterday's Aggregate Freefloat-adjusted Market Capitalization of Constituents}} \times \text{Yesterday's Closing Index} \\ &= \frac{\sum (P_t \times IS \times FAF \times CF)}{\sum (P_{t-1} \times IS \times FAF \times CF)} \times \text{Yesterday's Closing Index}\end{aligned}$$

*where:*

P<sub>t</sub> : current price at day t;

P<sub>t-1</sub> : closing price at day t-1;

IS : number of issued shares (in the case of H-share constituents, only the H-share portion is taken into calculation);

FAF : freefloat-adjusted factor, which is between 0 and 1; and

CF : capping factor, which is between 0 and 1.

*Free-float Adjustments.* Shares held by any entities (excluding custodians, trustees, mutual funds and investment companies) that control more than 5% of the shareholdings would be consisted as non-free float and are excluded from the index calculation. These include strategic holdings (holdings by governments and affiliated entities or any other entities that hold substantial shares in the company would be considered as non-freefloat unless otherwise proved), directors' and management holdings (holdings by directors, members of the board committee, principal officers or founding members), corporate cross holdings (holdings by publicly traded companies or private firms or institutions) and lock-up shares (shareholdings with a publicly disclosed lock-up arrangement). Lock-up shares with trading restrictions are classified as non-freefloat, regardless of the shareholding percentage.

The freefloat-adjusted factor represents the proportion of shares that is free-floated as a percentage of the issued shares. The freefloat-adjusted factor is rounded up to the nearest 1% if it is less than 10%; otherwise, it is rounded to the nearest 5. For companies with more than one class of shares, the freefloat-adjusted factor is calculated separately for each class of shares.

*Cap Factor.* A cap factor ("CF") is calculated quarterly, such that no individual constituent in an Index will have a weighting exceeding a cap level of 10% on the index capping date.

*Index Rebalancing.* The update of the issued shares, adjustment of the freefloat-adjusted factor and calculation of the cap factor are undertaken quarterly. In addition, the issued shares will be updated simultaneously with the index adjustment for corporate actions, such as bonus issues, rights issues, stock splits and stock consolidations. Ad hoc rebalancing will be conducted if a constituent's issued shares and/or freefloat-adjusted factor is substantially different from the production data. The Hang Seng China Enterprises Index will also be recapped in the event of constituent changes if the newly added component weighs higher than the index cap level.

### **The Stock Exchange of Hong Kong Ltd.**

Trading on the SEHK is fully electronic through an Automatic Order Matching and Execution System ("AMS"). The system is an electronic order book in which orders are matched and executed instantaneously if there are matching orders in the book, and on the basis of time/price priority. Trading takes place through trading terminals on the trading floor or through the off-floor trading devices at Exchange Participants' offices. Continuous trading is undertaken from 9:30 a.m. to 4:00 p.m. (Hong Kong time) every Hong Kong day except Saturdays, Sundays and other days on which the SEHK is closed. In addition, there is a pre-opening (auction) session from 9.00 a.m. to 9.30 a.m.

The SEHK has adopted certain measures intended to prevent any extreme short-term price fluctuations resulting from order imbalances or market volatility. Where the SEHK considers it necessary for the protection of the investor or the maintenance of an orderly market, it may at any time suspend dealings in any securities or cancel the listing of any securities in such circumstances and subject to such conditions as it thinks fit, whether requested by the listed issuer or not. The SEHK may also do so where: (1) an issuer fails, in a manner which the SEHK considers material, to comply with the SEHK Listing Rules or its Listing Agreements; (2) the SEHK considers there are insufficient securities in the hands of the public; (3) the SEHK considers that the listed issuer does not have a sufficient level of operations or sufficient assets to warrant the continued listing of the issuer's securities; or (4) the SEHK considers that the issuer or its business is no longer suitable for listing. Investors should also be aware that the SEHK may suspend the trading of individual stocks in certain limited and extraordinary circumstances, until certain price-sensitive information has been disclosed to the public. Trading will not be resumed until a formal announcement has been made. Trading of a company's shares may also be suspended if there is unusual trading activity in such shares.

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## THE HANG SENG® INDEX

We have derived all information contained in this underlying supplement regarding the Hang Seng® Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Hang Seng Indexes Company Limited ("HSICL"), a wholly owned subsidiary of Hang Seng Bank. We make no representation or warranty as to the accuracy or completeness of such information. The Hang Seng® Index is calculated, maintained and published by HSICL. HSICL has no obligation to continue to publish, and may discontinue publication of, the Hang Seng® Index.

The Hang Seng® Index is reported by Bloomberg L.P. under the ticker symbol "HSI."

The Hang Seng® Index was first calculated and published on November 24, 1969. The Hang Seng® Index is a free-float adjusted market capitalization weighted stock market index and measures the performance of the largest and most liquid companies listed in Hong Kong. The constituent stocks are grouped under finance, utilities, properties and commerce and industry sub-indexes. The Hang Seng® Index includes no more than 50 constituent stocks. The Hang Seng® Index is calculated and disseminated real-time at 15-second intervals during the trading hours of the Stock Exchange of Hong Kong Ltd. ("SEHK").

### Index Composition

#### *Defining the Eligible Companies*

Only companies with a primary listing on the main board of the SEHK are eligible to be included in the Hang Seng® Index (note that companies which are classified by SEHK as foreign companies are currently not included, as an interim policy announced in June 2010 and extended after a study and survey undertaken in the 2<sup>nd</sup> half of 2010 (report released in January 2011)). Mainland China enterprises that have an H-share listing in Hong Kong are eligible for inclusion in the Hang Seng® Index if they meet any one of the following conditions: (1) the H-share company has 100% of its ordinary share capital in the form of H-shares that are listed on the SEHK; (2) the H-share company has completed the process of share reform, with the result that there is no unlisted share capital in the company; or (3) for new H-share initial public offerings, the company has no unlisted share capital. H-shares are shares of mainland China companies listed on SEHK.

In addition, to be eligible for selection in the Hang Seng® Index, a company: (1) must be among those that constitute the top 90% of the total market capitalization of all primary listed shares listed on the SEHK (market capitalization is expressed as an average of the past 12 months); (2) must be among those that constitute the top 90% of the total turnover of all primary listed shares on the SEHK (turnover is aggregated and individually assessed for eight quarterly sub-periods for the past 24 months); and (3) should normally have a listing history of 24 months on the SEHK. For newly listed large-cap stocks, the minimum listing history may be shorter than 24 months (and can be as short as 3 months) if certain market capitalization requirements are satisfied.

#### *Selecting the Index Companies*

From the eligible companies, final selections are based on the following: (1) the market capitalization and turnover rankings of the companies; (2) the representation of the sub-sectors within the Hang Seng® Index directly reflecting that of the market; and (3) the financial performance of the companies. The Hang Seng® Index is reviewed quarterly with data cut-off dates as of the end of March, June, September and December each year. The final selection will be decided by the advisory committee after the above criteria have been taken into consideration.

Before September 2006, Hang Seng® Index was managed with a fixed number of constituents (33). In September 2006, it was decided that in order to ensure that the Hang Seng® Index remains representative of the SEHK, the number of constituents would be permitted to gradually increase to a maximum of 50. There is no fixed schedule for reaching 50 constituents. Before reaching 50, the number of outgoing constituents will not exceed the number of incoming ones. After reaching 50, new additions and deletions of the Hang Seng® Index will be of equal number and the number of constituents will remain fixed.

### *Effective Date*

Effective dates of constituent changes will be the next trading day after the first Friday of March, June, September and December. If that Friday falls on a public holiday, it will be postponed to the next Friday, subject to the final decision made by HSICL. Under normal circumstances, at least seven trading days' notice will be given for any constituent changes before the effective dates.

### **Index Calculation**

The calculation methodology of the Hang Seng® Index is a free float-adjusted market capitalization weighting methodology with a 15% cap on each constituent weighting. The Hang Seng® Index is a price index without adjustment for cash dividends or warrant bonuses.

The formula for the index calculation is shown below:

$$\begin{aligned} \text{Current Index} &= \frac{\text{Current Aggregate Freefloat-adjusted Market Capitalization of Constituents}}{\text{Yesterday's Aggregate Freefloat-adjusted Market Capitalization of Constituents}} \times \text{Yesterday's Closing Index} \\ &= \frac{\sum (P_t \times IS \times FAF \times CF)}{\sum (P_{t-1} \times IS \times FAF \times CF)} \times \text{Yesterday's Closing Index} \end{aligned}$$

*where:*

P<sub>t</sub> : current price at day t;

P<sub>t-1</sub> : closing price at day t-1;

IS : number of issued shares;

FAF : freefloat-adjusted factor, which is between 0 and 1; and

CF : capping factor, which is between 0 and 1.

*Free-float Adjustments.* Shares held by any entities (excluding custodians, trustees, mutual funds and investment companies) that control more than 5% of the shareholdings would be consisted as non-free float and are excluded from the index calculation. These include strategic holdings (holdings by governments and affiliated entities or any other entities that hold substantial shares in the company would be considered as non-freefloat unless otherwise proved), directors' and management holdings (holdings by directors, members of the board committee, principal officers or founding members), corporate cross holdings (holdings by publicly traded companies or private firms or institutions) and lock-up shares (shareholdings with a publicly disclosed lock-up arrangement). Lock-up shares with trading restrictions are classified as non-freefloat, regardless of the shareholding percentage.

The freefloat-adjusted factor represents the proportion of shares that is free-floated as a percentage of the issued shares. The freefloat-adjusted factor is rounded up to the nearest 1% if it is less than 10%; otherwise, it is rounded to the nearest 5. For companies with more than one class of shares, the freefloat-adjusted factor is calculated separately for each class of shares.

*Cap Factor.* A cap factor ("CF") is calculated quarterly, such that no individual constituent in an Index will have a weighting exceeding a cap level of 15% on the index capping date. The update of the issued shares, adjustment of the freefloat-adjusted factor and calculation of the cap factor are undertaken quarterly. In addition, the issued shares will be updated simultaneously with the index adjustment for corporate actions, such as bonus issues, rights issues, stock splits and stock consolidations. Ad hoc rebalancing will be conducted if a constituent's issued shares and/or freefloat-adjusted factor is substantially different from the production data. The Hang Seng® Index will also be recapped in the event of constituent changes if the newly added component weighs higher than the index cap level.

### **The Stock Exchange of Hong Kong Ltd.**

Trading on the SEHK is fully electronic through an Automatic Order Matching and Execution System ("AMS"). The system is an electronic order book in which orders are matched and executed instantaneously if there are matching orders in the book, and on the basis of time/price priority. Trading takes place through trading terminals on the trading floor or through the off-floor trading devices at Exchange Participants' offices. Continuous trading is undertaken from 9:30 a.m. to 4:00 p.m. (Hong Kong time) every Hong Kong day except Saturdays, Sundays and other days on which the SEHK is closed. In addition, there is a pre-opening (auction) session from 9.00 a.m. to 9.30 a.m.

The SEHK has adopted certain measures intended to prevent any extreme short-term price fluctuations resulting from order imbalances or market volatility. Where the SEHK considers it necessary for the protection of the investor or the maintenance of an orderly market, it may at any time suspend dealings in any securities or cancel the listing of any securities in such circumstances and subject to such conditions as it thinks fit, whether requested by the listed issuer or not. The SEHK may also do so where: (1) an issuer fails, in a manner which the SEHK considers material, to comply with the SEHK Listing Rules or its Listing Agreements; (2) the SEHK considers there are insufficient securities in the hands of the public; (3) the SEHK considers that the listed issuer does not have a sufficient level of operations or sufficient assets to warrant the continued listing of the issuer's securities; or (4) the SEHK considers that the issuer or its business is no longer suitable for listing. Investors should also be aware that the SEHK may suspend the trading of individual stocks in certain limited and extraordinary circumstances, until certain price-sensitive information has been disclosed to the public. Trading will not be resumed until a formal announcement has been made. Trading of a company's shares may also be suspended if there is unusual trading activity in such shares.

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## THE KOREA STOCK PRICE INDEX 200

We have derived all information contained in this underlying supplement regarding the Korea Stock Price Index 200 (the "KOSPI 200"), including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Korea Exchange ("KRX"), the publisher of the KOSPI 200. We make no representation or warranty as to the accuracy or completeness of such information. The KOSPI 200 is calculated, maintained and published by KRX. KRX has no obligation to continue to publish, and may discontinue publication of, the KOSPI 200.

The KOSPI 200 is reported by Bloomberg L.P. under the ticker symbol "KOSPI2."

The KOSPI 200 is a capitalization-weighted index of 200 Korean blue-chip stocks that make up a large majority of the total market value of the Korea Stock Exchange ("KSE"). The KOSPI 200 is the underlying index for stock index futures and options trading. The constituent stocks are selected on a basis of the market value of the individual stocks, liquidity and their relative positions in their respective industry groups.

### Selection Criteria

All common stocks listed on the KSE as of the periodic realignment date will be included in the selection process, except for the stocks which fall into one of the following categories:

- stocks with administrative issues;
- stocks with liquidation issues;
- stocks issued by securities investment companies;
- stocks that have been listed less than one year as of the last trading in April of the year in which the periodic review and selection process occurs;
- stocks belonging to the industry groups other than those industry groups listed below;
- a constituent stock merged into a non-constituent stock;
- a company established as a result of a merger between two constituent stocks; and
- any other stocks that are deemed unsuitable to be included in the constituents of the KOSPI 200.

The companies listed on the KOSPI 200 are classified into the following industry groups: (i) fisheries, (ii) mining, (iii) manufacturing, (iv) electricity and gas, (v) construction, (vi) services, (vii) post and communication and (viii) finance. The constituents of the KOSPI 200 are selected first from the non-manufacturing industry cluster, and then from the manufacturing industry cluster.

The constituents from the non-manufacturing industry cluster are selected in accordance with the following:

- Selection is made in descending order of market capitalization, from large to small, in the same industry group, while ensuring the accumulated market capitalization of the concerned industry group is within 70% of that of all industry groups.
- Notwithstanding the above, the stocks whose ranking of trading volume in descending order is below 85% of the stocks included in deliberation within the same industry group are excluded. In such case, the excluded stock is replaced by a stock that is next in ranking in market capitalization, but satisfies the trading volume criteria.

The constituents from the manufacturing industry cluster are selected in descending order of market capitalization, while excluding stocks whose ranking of trading volume in descending order is below 85% of the stocks included in the process within the same industry group. The excluded stock is replaced by a stock that is next in ranking in market capitalization, but satisfies the trading volume criteria.

Notwithstanding anything above, if a stock whose market capitalization is within the top 50 in terms of market capitalization, such stock may be included in the constituents of the KOSPI 200, by taking into consideration the influence that the industry group has on the KOSPI 200, as well as the liquidity of the concerned stock. Stocks to be placed on the replacement list are selected from the stocks included for deliberation, excluding those already selected as constituents of the KOSPI 200.

### **KOSPI 200 Calculation**

The KOSPI 200 is computed by multiplying (i) the market capitalization as of the calculation time divided by the market capitalization as of the base date, by (ii) 100. The base date of the KOSPI 200 is January 3, 1990 with a base index of 100. Market capitalization is obtained by multiplying the number of listed common shares of the constituents by the price of the concerned common share.

If the number of listed shares increases due to rights offering, bonus offering and stock dividend, which accompany ex-right or ex-dividend, such increase is included in the number of listed shares on the ex-right date or ex-dividend date.

Share prices refer to the market price established during the regular trading session. If no trading took place on such day, quotation price is used and if no quotation price is available, the closing price of the most recent trading day is used.

### **Stock Revision**

The constituents of the KOSPI 200 are realigned once a year while observing each of the following:

- An existing constituent will not be removed if the ranking of the market capitalization of such stock is within 100/110 of the ranking of the KOSPI 200 constituents of the same industry group;
- In order to be included in the constituents of the KOSPI 200, the ranking of the market capitalization of a stock must be within 90/100 of the ranking of the KOSPI 200 constituents of the same industry group;
- If the ranking of the market capitalization of an existing constituent falls below 100/110 of the ranking of the KOSPI 200 constituents of the same industry group, but there is no stock satisfying the requirement specified in the preceding clause, the existing constituent will not be removed; and
- When removing the existing constituents, a constituent whose ranking of market capitalization within the same industry group is the lowest will be removed first.

The periodic realignment date is the trading day following the day, which is the last trading day of June contracts of both the index futures and index options. In the event where a constituent of the KOSPI 200 falls under any of the following cases, such constituent shall be removed from the constituents and the removal date is as follows:

- Delisting: the trading day following the delisting date;

- Designation as administrative issue: the designation date;
- Merger: the day of trading halt; and
- It is determined that the stock is unsuitable as a constituent of the KOSPI 200: the trading day following the day of such determination, which is the last trading day of the nearest month contracts of both the index futures and index options, after the date of such decision.

When realigning the constituents of the KOSPI 200, the replacement stocks are chosen from the replacement list in accordance with the rank order. In the case of an industry group that has no stock listed on the replacement list, a replacement stock is chosen from the replacement list of manufacturing industry cluster.

## **The Korea Stock Exchange**

The KSE's predecessor, the Daehan Stock Exchange, was established in 1956. The KSE is a typical order-driven market, where buy and sell orders compete for best prices. The KSE seeks to maintain a fair and orderly market for trading and regulates and supervises its member firms.

Throughout the trading hours, orders are matched at a price satisfactory to both buy and sell sides, according to price and time priorities. The opening and closing prices, however, are determined by call auctions: at the market opening and closing, orders received for a certain period of time are pooled and matched at the price at which the most number of shares can be executed. The KSE uses electronic trading procedures, from order placement to trade confirmation. The KSE is open from 9:00 a.m. to 3:00 p.m., Korean time, during weekdays. Investors can submit their orders from 8:00 a.m., one hour before the market opening. Orders delivered to the market during the period from 8:00 a.m. to 9:00 a.m. are queued in the order book and matched by call auction method at 9:00 a.m. to determine opening prices. After opening prices are determined, the trades are conducted by continuous auctions until 2:50 p.m. (10 minutes before the market closing). Besides the regular session, the KSE conducts pre-hours and after-hours sessions for block trading and basket trading. During pre-hours sessions from 7:30 to 8:30 a.m., orders are matched at previous day's respective closing prices. After-hours sessions are open for 50 minutes from 3:10 p.m. to 4:00 p.m. During after-hours sessions, orders are matched at the closing prices of the day.

On January 26, 2004, the KSE introduced the random-end system at the opening and closing call auctions. The stated purpose of the random-end system is to prevent any distortion in the price discovery function of the KSE caused by "fake" orders placed with an intention of misleading other investors. In cases where the highest or lowest indicative price of a stock set during the last 5 minutes before the closing time of the opening (or closing) call session, 8:55-9:00 a.m. (or 2:55-3:00 p.m.), deviates from the provisional opening (or closing) price by 5% or more, the KSE delays the determination of the opening (or closing) price of the stock up to five minutes. The official opening (or closing) price of such stock is determined at a randomly chosen time within five minutes after the regular opening (or closing) time. The KSE makes public the indicative prices during the opening (or closing) call trading sessions. Pooling together all bids and offers placed during the order receiving hours for the opening (or closing) session, 8:10-9:00 a.m. (or 2:50-3:00 p.m.), the indicative opening (or closing) prices of all stocks are released to the public on a real-time basis.

The KSE sets a limit on the range that the price of individual stocks can change during a day. As of June 2004, that limit was set at 15%, which meant that the price of each stock could neither fall nor rise by more than 15% from the previous day's closing price. In addition, when the price and/or trading activities of a stock are expected to show an abnormal movement in response to an unidentified rumor or news, or when an abnormal movement is observed in the market, the KSE may halt the trading of the stock. In such cases, the KSE requests the company concerned to make a disclosure regarding the matter. Once the company makes an official announcement regarding the matter, trading can resume within an hour; however, if the KSE deems that the situation was not fully resolved by the disclosure, trading resumption may be delayed.

The KSE introduced circuit breakers in December 1998. The trading in the equity markets is halted for 20 minutes when the KOSPI 200 falls by 10% or more from the previous day's closing and the situation lasts for one minute or longer. The trading resumes by call auction where the orders submitted during the 10 minutes after the trading halt ended are matched at a single price.

#### **Disclaimers related to the Korea Exchange**

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## THE MDAX® INDEX

We have derived all information contained in this underlying supplement regarding the MDAX® Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Deutsche Börse AG ("Deutsche Börse" or the "Index Sponsor"). We make no representation or warranty as to the accuracy or completeness of such information. The MDAX® Index was developed by Deutsche Börse and is calculated, maintained and published by Deutsche Börse. Deutsche Börse has no obligation to continue to publish, and may discontinue the publication of, the MDAX® Index.

The MDAX® Index is reported by Bloomberg L.P. under the ticker symbol "MDAX."

The MDAX® Index (the "MDAX®") comprises 50 mid-cap issuers based in Germany from classic sectors (*i.e.*, sectors other than technology sectors) that are listed at the FWB® Frankfurter Wertpapierbörse (the Frankfurt Stock Exchange). These companies are selected from the continuously traded companies in the Prime Standard Segment that meet certain selection criteria. To be listed in the Prime Standard, a company must meet minimum statutory requirements, which include the regular publication of financial reports, and must satisfy additional transparency requirements. The reference date of the MDAX® is December 30, 1987.

The MDAX® is capital-weighted, meaning the weight of any individual issue is proportionate to its respective share in the overall capitalization of all Index component issues. The weight of any single company is capped at 10% of the MDAX® capitalization, measured quarterly. Weighting is based exclusively on the free float portion of the issued share capital of any class of shares involved. Both the number of shares included in the issued share capital and the free float factor are updated on one day each quarter (the "chaining date"). The MDAX® is a performance (*i.e.* total return) Index, which reinvests all income from dividend and bonus payments in the MDAX® portfolio.

### **The Working Committee for Equity Indices and the Management Board of Deutsche Börse**

The Working Committee for Equity Indices (Arbeitskreis Aktienindizes) (the "Committee") advises Deutsche Börse on all issues related to the MDAX®, recommending measures that are necessary in order to ensure the relevance of the MDAX® range and the correctness and transparency of the MDAX® calculation process. In accordance with the various rules, the Committee pronounces recommendations in respect of the composition of the MDAX®. However, any decisions on the composition of and possible modifications to the MDAX® are exclusively taken by the Management Board of Deutsche Börse (the "Board"). Such decisions are published in a press release and on Deutsche Börse's publicly available website at [www.deutsche-boerse.com](http://www.deutsche-boerse.com) in the evening after the Committee has concluded its meeting. Information contained in Deutsche Börse's website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any relevant terms supplement. We make no representation or warranty as to the accuracy or completeness of information contained on Deutsche Börse's website.

The Committee's meetings usually take place on the third trading day in each of March, June, September and December. The date for the respective next meeting is announced via a press release on Deutsche Börse's website on the evening of the current meeting.

The so-called "equity index ranking" is published monthly by Deutsche Börse, containing all relevant data in respect of the key criteria order book turnover and market capitalization. This publication also serves the Committee as a basis for decision-making at its quarterly meetings. It is produced at the beginning of each month and published via the Internet.

## Free Float

For the determination of the free float portion used to weight a company's class of shares in the MDAX® and for the ranking lists, the following definition applies:

1. All shareholdings of an owner which, on an accumulated basis, account for at least 5% of a company's share capital attributed to a class of shares are considered to be non-free float.

Shareholdings of an owner also include shareholdings:

- held by the family of the owner as defined by section §15a of the German Securities Trading Act ("WpHG");
- for which a pooling has been arranged in which the owner has an interest;
- managed or kept in safe custody by a third party for account of the owner; and
- held by a company which the owner controls as defined by section 22(3) of the German Securities Trading Act ("WpHG").

2. The definition of "non-free float"—irrespective of the size of a shareholding—covers any shareholding of an owner that is subject to a statutory or contractual qualifying period of at least six months with regard to its disposal by the owner. This applies only during the qualifying period. Shareholdings as defined by No. 1 above are counted as shareholdings for the calculation according to No. 1. Shares held by the issuing company (treasury shares) are always considered as block holdings and are not part of the free float of the share class.

3. As long as the size of such a shareholding does not exceed 25% of a company's share capital, the definition of free float includes all shareholdings held by:

- asset managers and trust companies;
- investment funds and pension funds; and
- capital investment companies or foreign investment companies in their respective special fund assets.

with the purpose of pursuing short-term investment strategies. Such shares, for which the acquirer has at the time of purchase clearly and publicly stated that strategic goals are being pursued and that the intention is to actively influence the company policies and ongoing business of the company, are not considered as such a short-term investment. In addition, shares having been acquired through a public purchase offer will not be considered as short-term investment. This does not apply to shareholdings managed or held in safe custody according to No. 1, or to venture capital companies, or other assets serving similar purposes. The shareholdings as defined by No. 1 above are not counted as shareholdings for the calculation according to No. 1.

4. In case of an ongoing takeover, shares that are under the control of the overtaking companies via derivatives will also be considered for the determination of the stock's free float. The derivatives need to be subject to registration according to legislation in WpHG and the German Securities Acquisition and Takeover Act ("WpÜG").

The various criteria in Nos. 1 to 4 are also fully applied to classes of shares that are subject to restrictions of ownership.

## Index Composition

### *Selection Criteria*

To be included or to remain in the MDAX<sup>®</sup>, companies have to satisfy certain prerequisites. All classes of the company's shares must:

- be listed in the Prime Standard segment on the Frankfurt Stock Exchange;
- be traded continuously on Deutsche Börse's electronic trading system Xetra<sup>®</sup>;
- show a free float portion of at least 10%; and
- belong to a sector or subsector that is assigned to the "Classic" (*i.e.* non-technology) area.

If, for any company, more than one class of shares fulfils the above criteria, only the respective larger or more liquid class can be included in the MDAX<sup>®</sup>. Moreover, companies must either:

- have their registered headquarters (or operating headquarters) in Germany; or
- have a major share of the stock exchange turnover at the Frankfurt Stock Exchange and their juristic headquarters in the European Union or in a European Free Trade Association state.

Operating headquarters is defined as the location of management or company administration, in part or in full. If a company has its operating headquarters in Germany, but not its registered office, this must be publicly identified by the company. The primary trading turnover requirement is met if at least 33% of aggregate turnover for each of the last three months took place on the Frankfurt Stock Exchange, including Xetra<sup>®</sup>.

To preserve the character of the MDAX<sup>®</sup>, the Board reserves the right to exclude certain companies from the MDAX<sup>®</sup> in coordination with the Committee. One possible reason for such an exclusion could be that the applicable company is a foreign holding company with headquarters in Germany, but a clear focus of business activities abroad.

Companies that satisfied the prerequisites listed above are selected for inclusion in the MDAX<sup>®</sup> according to the following two key criteria:

- order book turnover on Xetra<sup>®</sup> and in Frankfurt floor trading (within the preceding twelve months); and
- free float market capitalization (determined using the average of the volume-weighted average price ("VWAP") of the last 20 trading days prior to the last day of the month) as at a certain reporting date (last trading day of each month).

In addition, the following factors influence the decision-making process:

- the free float;
- market availability (measured on the basis of trading volumes, frequency of price determination, turnover or the Xetra<sup>®</sup> Liquidity Measure);
- sector affiliation; and
- the period during which a company has met the criteria for inclusion in, or elimination from, the MDAX<sup>®</sup> (retroactive view).



Taking all these criteria into account, the Committee submits proposals to the Board to leave the current composition of the MDAX® unchanged or to effect changes. The final decision as to whether or not to replace an Index component issue is taken by the Board.

#### *Adjustments to Index Composition*

Ordinary adjustments are made each year in March and September, based on the following criteria:

- a company can be included in the MDAX® if it has a minimum turnover ranking of 60 and a minimum market capitalization ranking of 60; and
- a company can be removed from the MDAX® if it has a turnover ranking worse than 60 or a market capitalization ranking worse than 60.

Replacements can take place if only one of the two criteria listed above is met.

Furthermore, under the “fast-entry” and “fast-exit” rules, which are applied in March, June, September and December:

- a company can be included in the MDAX® if it has a minimum turnover ranking of 40 and a minimum market capitalization ranking of 40; and
- a company can be removed from the MDAX® if it has a turnover ranking worse than 75 or a market capitalization ranking worse than 75.

Based on the rankings and further criteria involved, the Committee recommends in these cases if—and if so, against which issuer—such company is to be admitted to the MDAX®.

Finally, extraordinary adjustments to Index composition have to be performed, regardless of the “fast-exit” or “fast-entry” rules, upon occurrence of specific events, such as insolvency. In addition, a company can be removed immediately if its Index weight based on the actual market capitalization exceeds 10% and its annualized 30-day volatility exceeds 250%. The relevant figures are published by Deutsche Börse on a daily basis. The Board, in agreement with the Committee, may decide on the removal and may replace the company two full trading days after the announcement.

Adjustments are also necessary in two scenarios in the mergers and acquisitions context:

- if an absorbing or emerging company meets basis criteria for inclusion in the MDAX®, as soon as the free float of the absorbed company falls below 10%, the company is removed from the company under the ordinary or extraordinary adjustments described above; and
- if an absorbing company is already included in the MDAX® or does not meet the basis criteria for inclusion in the MDAX®, as soon as the free float of the absorbed company falls below 10%, the company is removed from the MDAX® under the ordinary or extraordinary adjustments described above. On the same date, the absorbed company is replaced by a new company after recommendation of the Committee.

The weight of the company represented in the MDAX® is adjusted to the new number of shares on the quarterly date after the merger has taken place.

#### **Index Calculation**

The MDAX® is weighted by market capitalization; however, only freely available and tradable shares (“free-float”) are taken into account. The MDAX® is a performance (*i.e.* total return) Index, which reinvests all income from dividend and bonus payments in the MDAX® portfolio.

### The Index Formula

The MDAX<sup>®</sup> is conceived according to the Laspeyres formula set out below:

$$\text{Index}_t = K_T \times \frac{\sum_{i=1}^n p_{it} \times ff_{iT} \times q_{iT} \times c_{it}}{\sum_{i=1}^n p_{i0} \times q_{i0}} \times \text{Base}$$

whereby:

- $c_{it}$  = Adjustment factor of company i at time t
- $ff_{iT}$  = Free float factor of share class I at time T
- $n$  = Number of shares in the MDAX<sup>®</sup>
- $p_{i0}$  = Closing price of share i on the trading day before the first inclusion in the MDAX
- $p_{iT}$  = Price of share i at time t
- $q_{i0}$  = Number of shares of company i on the trading day before the first inclusion in the MDAX
- $q_{iT}$  = Number of shares of company i at time T
- $t$  = Calculation time of the index
- $K_T$  = MDAX<sup>®</sup> chaining factor valid as of chaining date T
- $T$  = Date of the last chaining

The formula set out below is equivalent in analytic terms, but designed to achieve relative weighting:

$$\text{Index}_t = \frac{\sum_{i=1}^n p_{it} \cdot (K_T \cdot \frac{ff_{iT} \cdot q_{iT}}{\sum_{i=1}^n q_{i0}} \cdot 100 \cdot c_{it})}{\sum_{i=1}^n p_{i0} \cdot \frac{q_{i0}}{\sum_{i=1}^n q_{i0}} \cdot 100} \cdot \text{Base} = \frac{\sum_{i=1}^n p_{it} \cdot F_i}{A} \cdot \text{Base}$$

$$\text{Whereby: } A = \frac{\sum_{i=1}^n p_{i0} \cdot q_{i0} \cdot 100}{\sum_{i=1}^n q_{i0}}$$

$$\text{and: } F_i = K_T \cdot \frac{ff_{iT} \cdot q_{iT}}{\sum_{i=1}^n q_{i0}} \cdot 100 \cdot c_{it}$$

Index calculation can be reproduced in simplified terms by using the expression  $F_i$ :

- Multiply the current price by the respective  $F_i$  weighting factor;
- Take the sum of these products; and
- Divide this by the base value (A) which remains constant until a modification in the MDAX® composition occurs.

The  $F_i$  factors provide information on the number of shares required from each company to track the underlying Index portfolio.

#### *Calculation Frequency*

Index calculation is performed on every exchange trading day in Frankfurt, using prices traded on Deutsche Börse's electronic trading system Xetra®, whereby the last determined prices are used. The MDAX® is calculated continuously once a second. The MDAX® is distributed as soon as current prices are available for 35 companies belonging to the MDAX®. As long as opening prices for individual shares are not available, the particular closing prices of the previous day are taken instead for calculating the indices.

In the event of a suspension during trading hours, the last price determined before such a suspension is used for all subsequent computations. If such suspension occurs before the start of trading, the closing price of the previous day is taken instead. The "official" closing index level is calculated using the respective closing prices (or last prices) established on Xetra®.

#### *Adjustments and Corrections*

The MDAX® is adjusted for exogenous influences (e.g. price-relevant capital changes) by means of certain correction factors, assuming a reinvestment according to the "opération blanche." If the absolute amount of the accumulated distributions (dividends, bonus and special distributions, spin-offs or subscription rights on other security-classes) between two regular chaining dates accounts for more than 10% of the market capitalization of the distributing company on the day before the first distribution, the part of the distribution exceeding the 10% will not be reinvested in a single stock but in the overall Index portfolio per unscheduled chaining date.

The Board reserves the right to correct any incorrect index values with immediate effect after becoming aware of such incorrect index values. A historic correction is usually applied as of the start of the calculation of the current business day. Deutsche Börse will inform the general public of any such corrections immediately.

#### **Licensing Agreement with Deutsche Börse**

The MDAX® Index is a registered trademark of Deutsche Börse. The notes are neither sponsored nor promoted, distributed or in any other manner supported by Deutsche Börse (the "Licensor"). Neither the publication of the MDAX® by the Licensor nor the granting of a license regarding the MDAX® as well as the MDAX® trademark for the utilization in connection with the notes or other securities or financial products that are derived from the MDAX®, represents a recommendation by the Licensor for a capital investment or contains in any manner a warranty or opinion by the Licensor with respect to the attractiveness on an investment in the notes.

## THE MSCI INDICES

We have derived all information contained in this underlying supplement regarding the MSCI Brazil Index, the MSCI Canada Index, the MSCI EAFE® Index, the MSCI Emerging Markets Index, the MSCI Europe Index, the MSCI Korea Index, the MSCI Malaysia Index, the MSCI Mexico Investable Market Index, the MSCI Pacific Ex-Japan Index, the MSCI Singapore Index, the MSCI South Africa Index, the MSCI Taiwan Index, the MSCI Turkey Investable Market Index and the MSCI World Index<sup>SM</sup> (each, an “MSCI Index” and together, the “MSCI Indices”), including, without limitation, their make-up, method of calculation and changes in their components, from publicly available information. Such information reflects the policies of, and is subject to change by, MSCI Inc. (“MSCI”). We make no representation or warranty as to the accuracy or completeness of such information. The MSCI Indices are calculated, maintained and published by MSCI. MSCI has no obligation to continue to publish, and may discontinue publication of, any of the MSCI Indices.

### Transition

On March 28, 2007, MSCI announced changes to the methodology used by MSCI to calculate its Standard and Small Cap Indices. The transition of the Standard and Small Cap Indices to the MSCI Global Investable Market Indices occurred in two phases, the first completed as of November 30, 2007 and the second completed as of May 30, 2008. The current index calculation methodology used to formulate the MSCI Indices (and which is also used to formulate the MSCI Global Investable Market Indices) (the “MSCI Global Investable Market Indices Methodology”) was implemented as of June 1, 2008.

### The MSCI Brazil Index

The MSCI Brazil Index is a free float-adjusted, capitalization-weighted index of securities traded primarily on the Bolsa de Valores de São Paulo. The MSCI Brazil Index is reported by Bloomberg L.P. under the ticker symbol “MXBR.” Component companies must meet objective criteria for inclusion in the MSCI Brazil Index, taking into consideration unavailable strategic shareholdings and limitations to foreign ownership. The MSCI Brazil Index has a base date of December 31, 1987.

### The MSCI Canada Index

The MSCI Canada Index is a free float-adjusted, capitalization-weighted index that aims to capture 85% of the (publicly available) total market capitalization in Canada. The MSCI Canada Index consists of stocks traded primarily on the Toronto Stock Exchange. The MSCI Canada Index is calculated daily in U.S. dollars. The MSCI Canada Index is reported by Bloomberg, L.P. under the ticker symbol “MXCA.” Component companies must meet objective criteria for inclusion in the MSCI Canada Index, taking into consideration unavailable strategic shareholdings and limitations to foreign ownership.

### The MSCI EAFE® Index

The MSCI EAFE® Index is a free float-adjusted market capitalization index intended to measure the equity market performance of certain developed markets. The MSCI EAFE® Index is calculated daily in U.S. dollars and published in real time every 15 seconds during market trading hours. As of November 9, 2011, the MSCI EAFE® Index consisted of the following 22 developed market country indices: Australia, Austria, Belgium, Denmark, Finland, France, Germany, Greece, Hong Kong, Ireland, Israel, Italy, Japan, the Netherlands, New Zealand, Norway, Portugal, Singapore, Spain, Sweden, Switzerland and the United Kingdom. Effective May 2010, Israel has been reclassified as a developed market and has been included in the MSCI EAFE® Index. The MSCI EAFE® Index is reported by Bloomberg L.P. under the ticker symbol “MXEA.”

### **The MSCI Emerging Markets Index**

The MSCI Emerging Markets Index is a free float-adjusted market capitalization index that is designed to measure equity market performance of global emerging markets. The MSCI Emerging Markets Index is calculated daily in U.S. dollars and published in real time every 15 seconds during market trading hours. As of November 9, 2011, the MSCI Emerging Markets Index consisted of the following 21 emerging market country indices: Brazil, Chile, China, Colombia, Czech Republic, Egypt, Hungary, India, Indonesia, Korea, Malaysia, Mexico, Morocco, Peru, Philippines, Poland, Russia, South Africa, Taiwan, Thailand and Turkey. Effective May 2010, Israel has been reclassified as a developed market and is no longer included in the MSCI Emerging Markets Index. The MSCI Emerging Markets Index is reported by Bloomberg L.P. under the ticker symbol "MXEF."

### **The MSCI Europe Index**

The MSCI Europe Index is a free float-adjusted market capitalization weighted index that is designed to measure the equity market performance of the developed markets in Europe. As of November 9, 2011, the MSCI Europe Index consisted of the following 16 developed market country indices: Austria, Belgium, Denmark, Finland, France, Germany, Greece, Ireland, Italy, the Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom. The MSCI Europe Index is reported by Bloomberg Financial Markets under ticker symbol "MXEU."

### **The MSCI Korea Index**

The MSCI Korea Index is a free float-adjusted market capitalization index of securities listed on the Korea Exchange. The MSCI Korea Index is calculated daily in the local currencies and published in real time every 15 seconds during market trading hours. The MSCI Korea Index is reported by Bloomberg L.P. under the ticker symbol "MXKR."

### **The MSCI Malaysia Index**

The MSCI Malaysia Index is a free float-adjusted market capitalization index of securities listed on the Bursa Malaysia. The MSCI Malaysia Index is calculated daily in the local currencies and published in real time every 15 seconds during market trading hours. The MSCI Singapore Index is reported by Bloomberg L.P. under the ticker symbol "MXMY."

### **The MSCI Mexico Investable Market Index**

The MSCI Mexico Investable Market Index is a free float-adjusted market capitalization index of securities listed on the Mexican Stock Exchange. Component companies must meet objective criteria for inclusion in the MSCI Mexico Investable Market Index, taking into consideration unavailable strategic shareholdings and limitations to foreign ownership. The MSCI Mexico Investable Market Index has a base date of December 31, 1987 and is reported by Bloomberg under the ticker symbol "MXMX".

### **The MSCI Pacific Ex-Japan Index**

The MSCI Pacific Ex-Japan Index is a free float-adjusted market capitalization index that is designed to measure equity market performance of certain developed markets in the Pacific. The MSCI Pacific Ex-Japan Index is calculated daily in U.S. dollars. As of November 9, 2011, the MSCI Pacific Ex-Japan Index consisted of the following 4 developed country indices: Australia, Hong Kong, New Zealand and Singapore. The MSCI Pacific Ex-Japan Index is reported by Bloomberg L.P. under the ticker symbol "MXAPJ."

### **The MSCI Singapore Index**

The MSCI Singapore Index is a free float-adjusted market capitalization index of securities listed on the Singapore Stock Exchange. The MSCI Singapore Index is calculated daily in the local currencies and published in real time every 15 seconds during market trading hours. The MSCI Singapore Index is reported by Bloomberg L.P. under the ticker symbol "SIMSCI."

### **The MSCI South Africa Index**

The MSCI South Africa Index is a free float-adjusted market capitalization index of securities listed on the JSE Limited. The MSCI South Africa Index is calculated daily in the local currencies and published in real time every 15 seconds during market trading hours. The MSCI South Africa Index is reported by Bloomberg L.P. under the ticker symbol "MXZA."

### **The MSCI Taiwan Index**

The MSCI Taiwan Index is a free float-adjusted market capitalization index of securities listed on the Taiwan Stock Exchange. The MSCI Taiwan Index is calculated daily in the local currencies and published in real time every 15 seconds during market trading hours. The MSCI Taiwan Index is reported by Bloomberg L.P. under the ticker symbol "TAMSCI."

### **The MSCI Turkey Investable Market Index**

The MSCI Turkey Investable Market Index is a free float-adjusted market capitalization index of securities listed on the Istanbul Stock Exchange. The MSCI Turkey Investable Market Index is calculated daily in the local currencies and published in real time every 15 seconds during market trading hours. The MSCI Turkey Investable Market Index is reported by Bloomberg L.P. under the ticker symbol "MXTR."

### **The MSCI World Index<sup>SM</sup>**

The MSCI World Index<sup>SM</sup> is a free float-adjusted market capitalization index intended to measure the equity market performance of certain developed equity markets. The MSCI World Index<sup>SM</sup> is calculated daily in U.S. dollars and published in real time every 15 seconds during market trading hours. As of November 9, 2011, the MSCI World Index<sup>SM</sup> consisted of the following 24 developed market country indices: Australia, Austria, Belgium, Canada, Denmark, Finland, France, Germany, Greece, Hong Kong, Ireland, Israel, Italy, Japan, the Netherlands, New Zealand, Norway, Portugal, Singapore, Spain, Sweden, Switzerland, the United Kingdom and the United States. Effective May 2010, Israel has been reclassified as a developed market and has been included in the MSCI World Index<sup>SM</sup>. The MSCI World Index<sup>SM</sup> is reported by Bloomberg L.P. under the ticker symbol "MXWO."

### **Constructing the MSCI Global Investable Market Indices**

MSCI undertakes an index construction process that involves: (i) defining the Equity Universe; (ii) determining the Market Investable Equity Universe for each market; (iii) determining market capitalization size segments for each market; (iv) applying Index Continuity Rules for the MSCI Standard Index; (v) creating style segments within each size segment within each market; and (vi) classifying securities under the Global Industry Classification Standard (the "GICS").

The "relevant market" with respect to a single country index is equivalent to the single country, except in DM-classified countries in Europe (as described below), where all such countries are first aggregated into a single market for index construction purposes. Subsequently, individual DM Europe country indices within the MSCI Europe Index are derived from the constituents of the MSCI Europe Index under the MSCI Global Investable Market Indices Methodology.

The “relevant market” with respect to a composite index includes each of the single countries which comprise the composite index.

The “Global Investable Equity Universe” is the aggregation of all Market Investable Equity Universes. The “DM Investable Equity Universe” is the aggregation of all the Market Investable Equity Universes for Developed Markets.

#### *Defining the Equity Universe*

(i) Identifying Eligible Equity Securities: The Equity Universe initially looks at securities listed in any of the countries in the MSCI Global Index Series, which will be classified as Developed Markets (“DM”), Emerging Markets (“EM”) or Frontier Markets (“FM”). All listed equity securities, or listed securities that exhibit characteristics of equity securities, except mutual funds, exchange traded funds, equity derivatives, limited partnerships, and most investment trusts, are eligible for inclusion in the Equity Universe. Real Estate Investment Trusts (“REITs”) in some countries and certain income trusts in Canada are also eligible for inclusion.

(ii) Country Classification of Eligible Securities: Each company and its securities (*i.e.*, share classes) are classified in one and only one country, which allows for a distinctive sorting of each company by its respective country.

#### *Determining the Market Investable Equity Universes*

A Market Investable Equity Universe for a market is derived by applying investability screens to individual companies and securities in the Equity Universe that are classified in that market. A market is equivalent to a single country, except in DM Europe, where all DM countries in Europe are aggregated into a single market for index construction purposes. Subsequently, individual DM Europe country indices within the MSCI Europe Index are derived from the constituents of the MSCI Europe Index under the Global Investable Market Indices methodology.

The investability screens used to determine the Investable Equity Universe in each market are as follows:

- (i) Equity Universe Minimum Size Requirement: This investability screen is applied at the company level. In order to be included in a Market Investable Equity Universe, a company must have the required minimum full market capitalization. A company will meet this requirement if its cumulative free float-adjusted market capitalization is within the top 99% of the Equity Universe sorted in descending order by full market capitalization.
- (ii) Equity Universe Minimum Float-Adjusted Market Capitalization Requirement: This investability screen is applied at the individual security level. To be eligible for inclusion in a Market Investable Equity Universe, a security must have a free float-adjusted market capitalization equal to or higher than 50% of the Equity Universe Minimum Size Requirement.
- (iii) DM and EM Minimum Liquidity Requirement: This investability screen is applied at the individual security level. To be eligible for inclusion in a Market Investable Equity Universe, a security must have adequate liquidity as measured by the Annualized Traded Value Ratio (“ATVR”) and the Frequency of Trading. The ATVR screens out extreme daily trading volumes, taking into account the free float-adjusted market capitalization size of securities. The aim of the 12-month and 3-month ATVR together with 3-month Frequency of Trading is to select securities with a sound long and short-term liquidity. A minimum liquidity level of 20% of 3-month ATVR and 90% of 3-month Frequency of Trading over the last 4 consecutive quarters, as well as 20% of 12-month ATVR are required for the inclusion of a security in a Market Investable Equity Universe of a Developed Market. A

minimum liquidity level of 15% of 3-month ATVR and 80% of 3-month Frequency of Trading over the last 4 consecutive quarters, as well as 15% of 12-month ATVR are required for the inclusion of a security in a Market Investable Equity Universe of an Emerging Market.

In instances when a security does not meet the above criteria, the security will be represented by a relevant liquid eligible Depository Receipt if it is trading in the same geographical region. Depository Receipts are deemed liquid if they meet all the above mentioned criteria for 12-month ATVR, 3-month ATVR and 3-month Frequency of Trading.

- (iv) **Global Minimum Foreign Inclusion Factor Requirement:** This investability screen is applied at the individual security level. To be eligible for inclusion in a Market Investable Equity Universe, a security's Foreign Inclusion Factor ("FIF") must reach a certain threshold. The FIF of a security is defined as the proportion of shares outstanding that is available for purchase in the public equity markets by international investors. This proportion accounts for the available free float of and/or the foreign ownership limits applicable to a specific security (or company). In general, a security must have an FIF equal to or larger than 0.15 to be eligible for inclusion in a Market Investable Equity Universe.
- (v) **The Minimum Length of Trading Requirement:** This investability screen is applied at the individual security level. For an initial public offering ("IPO") to be eligible for inclusion in a Market Investable Equity Universe, the new issue must have started trading at least four months before the implementation of the initial construction of the index or at least three months before the implementation of a semi-annual index review. This requirement is applicable to small new issues in all markets. Large IPOs are not subject to the Minimum Length of Trading Requirement and may be included in a Market Investable Equity Universe and the Standard Index outside of a Quarterly or semi-annual index review.

#### *Defining Market Capitalization Size Segments for Each Market*

Once a Market Investable Equity Universe is defined, it is segmented into the following size-based indices:

- Investable Market Index (Large + Mid + Small)
- Standard Index (Large + Mid)
- Large Cap Index
- Mid Cap Index
- Small Cap Index

Creating the Size Segment Indices in each market involves the following steps: (i) defining the Market Coverage Target Range for each size segment; (ii) determining the Global Minimum Size Range for each size segment; (iii) determining the Market Size-Segment Cutoffs and associated Segment Number of Companies; (iv) assigning companies to the size segments; and (v) applying final size-segment investability requirements and index continuity rules.



### *Index Continuity Rules for the Standard Indices*

In order to achieve index continuity, as well as provide some basic level of diversification within a market index, notwithstanding the effect of other index construction rules, a minimum number of five constituents will be maintained for a DM Standard Index and a minimum number of three constituents will be maintained for an EM Standard Index.

If after the application of the index construction methodology, a Standard Index contains fewer than five securities in a Developed Market or three securities in an Emerging Market, then the largest securities by free float-adjusted market capitalization are added to the Standard Index in order to reach five constituents in that Developed Market or three in that Emerging Market. At subsequent index reviews, if the free float-adjusted market capitalization of a non-index constituent is at least 1.50 times the free float-adjusted market capitalization of the smallest existing constituent after rebalancing, the larger free float-adjusted market capitalization security replaces the smaller one.

### *Creating Style Indices within Each Size Segment*

All securities in the investable equity universe are classified into Value or Growth segments using the MSCI Global Value and Growth methodology.

### *Classifying Securities under the Global Industry Classification Standard*

All securities in the Global Investable Equity Universe are assigned to the industry that best describes their business activities. To this end, MSCI has designed, in conjunction with Standard & Poor's, the Global Industry Classification Standard ("GICS"). The GICS entails four levels of classification: (1) sector; (2) industry groups; (3) industries; (4) sub-industries. Under the GICS, each company is assigned uniquely to one sub-industry according to its principal business activity. Therefore, a company can belong to only one industry grouping at each of the four levels of the GICS.

## **Maintenance of the MSCI Global Investable Market Indices**

The MSCI Global Investable Market Indices are maintained with the objective of reflecting the evolution of the underlying equity markets and segments on a timely basis, while seeking to achieve index continuity, continuous investability of constituents and replicability of the indices, and index stability and low index turnover.

In particular, index maintenance involves:

- (i) semi-annual index reviews ("SAIRs") in May and November of the Size Segment and Global Value and Growth Indices, which include:
  - updating the indices on the basis of a fully refreshed Equity Universe;
  - taking buffer rules into consideration for migration of securities across size and style segments; and
  - updating FIFs and Number of Shares ("NOS").

The objective of the SAIRs is to systematically reassess the various dimensions of the Equity Universe for all markets on a fixed semi-annual timetable. A SAIR involves a comprehensive review of the Size Segment and Global Value and Growth Indices.

(ii) quarterly index reviews (“QIRs”) in February and August of the Size Segment Indices aimed at:

- including significant new eligible securities (such as IPOs that were not eligible for earlier inclusion) in the index;
- allowing for significant moves of companies within the Size Segment Indices, using wider buffers than in the SAIR; and
- reflecting the impact of significant market events on FIFs and updating NOS.

QIRs are designed to ensure that the indices continue to be an accurate reflection of the evolving equity marketplace. This is achieved by a timely reflection of significant market driven changes that were not captured in the index at the time of their actual occurrence but are significant enough to be reflected before the next SAIR. QIRs may result in additions or deletions due to migration to another Size Segment Index, and changes in FIFs and in NOS. Only additions of significant new investable companies are considered, and only for the Standard Index. The buffer zones used to manage the migration of companies from one segment to another are wider than those used in the SAIR. The style classification is reviewed only for companies that are reassigned to a different size segment.

- (iii) Ongoing event-related changes. Ongoing event-related changes to the indices are the result of mergers, acquisitions, spin-offs, bankruptcies, reorganizations and other similar corporate events. They can also result from capital reorganizations in the form of rights issues, bonus issues, public placements and other similar corporate actions that take place on a continuing basis. These changes generally are reflected in the indices at the time of the event. Significantly large IPOs are included in the indices after the close of the company’s tenth day of trading.

### **Announcement Policy**

The results of the SAIRs are announced at least two weeks in advance of their effective implementation dates as of the close of the last business day of May and November. The results of the QIRs are announced at least two weeks in advance of their effective implementation dates as of the close of the last business day of February and August. All changes resulting from corporate events are announced prior to their implementation.

The changes are typically announced at least ten business days prior to the changes becoming effective in the indices as an “expected” announcement, or as an “undetermined” announcement, when the effective dates are not known yet or when aspects of the event are uncertain. MSCI sends “confirmed” announcements at least two business days prior to events becoming effective in the indices, provided that all necessary public information concerning the event is available. The full list of all new and pending changes is delivered to clients on a daily basis, between 5:30 p.m. and 6 p.m., US Eastern Time through the Advance Corporate Events (ACE) File.

In exceptional cases, events are announced during market hours for same or next day implementation. Announcements made by MSCI during market hours are usually linked to late company disclosure of corporate events or unexpected changes to previously announced corporate events.

In the case of secondary offerings representing more than 5% of a security’s number of shares for existing constituents, these changes will be announced prior to the end of the subscription period when possible and a subsequent announcement confirming the details of the event (including the date of implementation) will be made as soon as the results are available.

Both primary equity offerings and secondary offerings for U.S. securities, representing at least 5% of the security's number of shares, will be confirmed through an announcement during market hours for next day or shortly after implementation, as the completion of the events cannot be confirmed prior to the notification of the pricing.

Early deletions of constituents due to bankruptcy or other significant cases are announced as soon as practicable prior to their implementation.

## Index Calculation

### *Price Index Level*

The MSCI Indices are calculated using the Laspeyres' concept of a weighted arithmetic average together with the concept of chain-linking. As a general principle, today's index level is obtained by applying the change in the market performance to the previous period index level.

$$PriceIndexLevelUSD_t = PriceIndexLevelUSD_{t-1} \times \frac{IndexAdjustedMarketCapUSD_t}{IndexInitialMarketCapUSD_t}$$

$$PriceIndexLevelLocal_t = PriceIndexLevelLocal_{t-1} \times \frac{IndexAdjustedMarketCapForLocal_t}{IndexInitialMarketCapUSD_t}$$

Where:

- *PriceIndexLevelUSD<sub>t-1</sub>* is the Price Index level in USD at time t-1.
- *IndexAdjustedMarketCapUSD<sub>t</sub>* is the Adjusted Market Capitalization of the index in USD at time t.
- *IndexInitialMarketCapUSD<sub>t</sub>* is the Initial Market Capitalization of the index in USD at time t.
- *PriceIndexLevelLocal<sub>t-1</sub>* is the Price Index level in local currency at time t-1.
- *IndexAdjustedMarketCapForLocal<sub>t</sub>* is the Adjusted Market Capitalization of the index in USD converted using FX rate as of t-1 and used for local currency index at time t.

Note: *IndexInitialMarketCapUSD* was previously called *IndexUnadjustedMarketCapPreviousUSD*

### *Security Price Index Level*

$$SecurityPriceIndexLevel_t = SecurityPriceIndexLevel_{t-1} \times \frac{SecurityAdjustedMarketCapForLocal_t}{SecurityInitialMarketCapUSD_t}$$

$$SecurityAdjustedMarketCapForLocal_t =$$

$$\frac{EndOfDayNumberOfShares_{t-1} \times PricePerShare_t \times InclusionFactor_t \times PAF_t}{FXrate_{t-1}} \times \frac{ICI_t}{ICI_{t-1}}$$

$$SecurityInitialMarketCapUSD_t = \frac{EndOfDayNumberOfShares_{t-1} \times PricePerShare_{t-1} \times InclusionFactor_t}{FXrate_{t-1}}$$

Where:

- $SecurityPriceIndexLevel_{t-1}$  is Security Price Index level at time t-1.
- $SecurityAdjustedMarketCapForLocal_t$  is the Adjusted Market Capitalization of security s in USD converted using FX rate as of t-1.
- $SecurityInitialMarketCapUSD_t$  is the Initial Market Capitalization of security s in USD at time t.
- $EndOfDayNumberOfShares_{t-1}$  is the number of shares of security s at the end of day t-1.
- $PricePerShare_t$  is the price per share of security s at time t.
- $PricePerShare_{t-1}$  is the price per share of security s at time t-1.
- $InclusionFactor_t$  is the inclusion factor of security s at time t. The inclusion factor can be one or the combination of the following factors: Foreign Inclusion Factor, Domestic Inclusion Factor Growth Inclusion Factor, Value Inclusion Factor, Index Inclusion Factor.
- $PAF_t$  is the Price Adjustment Factor of security s at time t.
- $FXrate_{t-1}$  is the FX rate of the price currency of security s vs USD at time t-1. It is the value of 1 USD in foreign currency.
- $ICI_t$  is the Internal Currency Index of price currency at time t. The ICI is different than 1 when a country changes the internal value of its currency (e.g., from Turkish Lira to New Turkish Lira – ICI = 1,000,000).
- $ICI_{t-1}$  is the Internal Currency Index of price currency at time t-1.

*Index Market Capitalization*

$IndexAdjustedMarketCapUSD_t =$

$$\sum_{S \in I, t} \frac{EndOfDayNumberOfShares_{t-1} \times PricePerShare_t \times InclusionFactor_t \times PAF_t}{FXrate_t}$$

$IndexAdjustedMarketCapForLocal_t =$

$$\sum_{S \in I, t} \frac{EndOfDayNumberOfShares_{t-1} \times PricePerShare_t \times InclusionFactor_t \times PAF_t}{FXrate_{t-1}} \times \frac{ICI_t}{ICI_{t-1}}$$

$IndexInitialMarketCapUSD_t =$

$$\sum_{S \in I, t} \frac{EndOfDayNumberOfShares_{t-1} \times PricePerShare_t \times InclusionFactor_t}{FXrate_{t-1}}$$

Where:

- $EndOfDayNumberOfShares_{t-1}$  is the number of shares of security s at the end of day t-1.
- $PricePerShare_t$  is the price per share of security s at time t.
- $PricePerShare_{t-1}$  is the price per share of security s at time t-1.
- $InclusionFactor_t$  is the inclusion factor of security s at time t. The inclusion factor can be one or the combination of the following factors: Foreign Inclusion Factor, Domestic Inclusion Factor Growth Inclusion Factor, Value Inclusion Factor, Index Inclusion Factor.
- $PAF_t$  is the Price Adjustment Factor of security s at time t.

- $FXrate_t$  is the FX rate of the price currency of security  $s$  vs USD at time  $t$ . It is the value of 1 USD in foreign currency.
- $FXrate_{t-1}$  is the FX rate of the price currency of security  $s$  vs USD at time  $t-1$ . It is the value of 1 USD in foreign currency.
- $ICI_t$  is the Internal Currency Index of price currency at time  $t$ . The ICI is different than 1 when a country changes the internal value of its currency (*e.g.*, from Turkish Lira to New Turkish Lira –  $ICI = 1,000,000$ ).
- $ICI_{t-1}$  is the Internal Currency Index of price currency at time  $t-1$ .

## Corporate Events

### *Mergers and Acquisitions*

As a general principle, MSCI implements M&As as of the close of the last trading day of the acquired entity or merging entities (last offer day for tender offers), regardless of the status of the securities (index constituents or non-index constituents) involved in the event. MSCI uses market prices for implementation. This principle applies if all necessary information is available prior to the completion of the event and if the liquidity of the relevant constituent(s) is not expected to be significantly diminished on the day of implementation. Otherwise, MSCI will determine the most appropriate implementation method and announce it prior to the changes becoming effective in the indices.

### *Tender Offers*

In tender offers, the acquired or merging security is generally deleted from an index at the end of the initial offer period, when the offer is likely to be successful and / or if the free float of the security is likely to be substantially reduced (this rule is applicable even if the offer is extended), or once the results of the offer have been officially communicated and the offer has been successful and the security's free float has been substantially reduced, if all required information is not available in advance or if the offer's outcome is uncertain. The main factors considered by MSCI when assessing the outcome of a tender offer (not in order of importance) are: the announcement of the offer as friendly or hostile, a comparison of the offer price to the acquired security's market price, the recommendation by the acquired company's board of directors, the major shareholders' stated intention whether to tender their shares, the required level of acceptance, the existence of pending regulatory approvals, market perception of the transaction, official preliminary results if any, and other additional conditions for the offer.

In certain cases, securities may be deleted earlier than the last offer day. For example, in the case of tender offers in the United Kingdom, a security is typically deleted two business days after the offer is declared unconditional in all respects.

If a security is deleted from an index, the security will not be reinstated immediately after its deletion even when the tender offer is subsequently declared unsuccessful and/or the free float of the security is not substantially reduced. It may be reconsidered for index inclusion at the following regularly scheduled index review.

### *Late Announcements of Completion of Mergers and Acquisitions*

When the completion of an event is announced too late to be reflected as of the close of the last trading day of the acquired or merging entities, implementation occurs as of the close of the following day or as soon as practicable thereafter. In these cases, MSCI uses a calculated price for the acquired or merging entities. The calculated price is determined using the terms of the transaction and the price of the acquiring or merged entity, or, if not appropriate, using the last trading day's market price of the acquired or merging entities.

### *Conversions of Share Classes*

Conversions of a share class into another share class resulting in the deletion and/or addition of one or more classes of shares are implemented as of the close of the last trading day of the share class to be converted.

### *Spin-Offs*

On the ex-date of a spin-off, a PAF is applied to the price of the security of the parent company. The PAF is calculated based on the terms of the transaction and the market price of the spun-off security. If the spun-off entity qualifies for inclusion, it is included as of the close of its first trading day. In cases of spin-offs of partially owned companies, the post-event free float of the spun-off entity is calculated using a weighted average of the existing shares and the spun-off shares, each at their corresponding free float. Any resulting changes to FIFs and/or DIFs are implemented as of the close of the ex-date.

In cases of spin-offs of partially-owned companies, the post-event free float of the spun-off entity is calculated using a weighted average of the existing shares and the spun-off shares, each at their corresponding free float. Any resulting changes to FIFs and/or DIFs are implemented as of the close of the ex-date.

When the spun-off security does not trade on the ex-date, a “detached” security is created to avoid a drop in the free float-adjusted market capitalization of the parent entity, regardless of whether the spun-off security is added or not. The detached security is included until the spun-off security begins trading, and is deleted thereafter. Generally, the value of the detached security is equal to the difference between the cum price and the ex price of the parent security.

### *Corporate Actions*

Corporate actions such as splits, stock dividends and rights issues, which affect the price of a security, require a price adjustment. In general, the PAF is applied on the ex-date of the event to ensure that security prices are comparable between the ex-date and the cum date. To do so, MSCI adjusts for the value of the right and/or the value of the special assets that are distributed and the changes in number of shares and FIF, if any, are reflected as of the close of the ex-date. In general, corporate actions do not impact the free float of the securities because the distribution of new shares is carried out on a pro rata basis to all existing shareholders. Therefore, MSCI will generally not implement any pending number of shares and/or free float updates simultaneously with the event.

If a security does not trade for any reason on the ex-date of the corporate action, the event will be generally implemented on the day the security resumes trading.

### *Share Placements and Offerings*

Changes in number of shares and FIF resulting from primary equity offerings representing at least 5% of the security's number of shares are generally implemented as of the close of the first trading day of the new shares, if all necessary information is available at that time. Otherwise, the event is implemented as soon as practicable after the relevant information is made available. A primary equity offering involves the issuance of new shares by a company. Changes in number of shares and FIF resulting from primary equity offerings representing less than 5% of the security's number of shares are deferred to the next regularly scheduled index review following the completion of the event. For public secondary offerings of existing constituents representing at least 5% of the security's number of shares, where possible, MSCI will announce these changes and reflect them shortly after the results of the subscription are known. Secondary public offerings that, given lack of sufficient notice, were not reflected immediately will be reflected at the next regularly scheduled index review. Secondary offerings involve the distribution of existing shares of current shareholders' in a listed company and are usually pre-announced by a company or by a company's shareholders and open for public subscription during a pre-determined period.

### *Debt-to-Equity Swaps*

In general, large debt-to-equity swaps involve the conversion of debt into equity originally not convertible at the time of issue. In this case, changes in numbers of shares and subsequent FIF and/or DIF changes are implemented as of the close of the first trading day of the newly issued shares, or shortly thereafter if all necessary information is available at the time of the swap. In general, shares issued in debt-to-equity swaps are assumed to be issued to strategic investors. As such, the post event free float is calculated on a pro forma basis assuming that all these shares are non-free float. Changes in numbers of shares and subsequent FIF and/or DIF changes due to conversions of convertible bonds or other convertible instruments, including periodical conversions of preferred stocks and small debt-to-equity swaps are implemented at a following regularly scheduled index review.

### *Suspensions and Bankruptcies*

MSCI will remove from an index as soon as practicable companies that file for bankruptcy, companies that file for protection from their creditors. MSCI will delete from an index after 40 business days of suspension securities of companies facing financial difficulties (*e.g.*, liquidity issues, debt repayment issues, companies under legal investigation, etc.) with at least two business days advance notice. Subsequently, if and when these securities resume normal trading, they may be considered as a potential addition to an index at the next scheduled semi-annual index review. Securities of companies suspended due to pending corporate events (*e.g.*, merger, acquisition, etc.), will continue to be maintained in an index until they resume trading regardless of the duration of the suspension period. When the primary exchange price is not available, MSCI will delete securities at an over the counter or equivalent market price when such a price is available and deemed relevant. If no over the counter or equivalent price is available, the security will be deleted at the smallest price (unit or fraction of the currency) at which a security can trade on a given exchange. For securities that are suspended, MSCI will carry forward the market price prior to the suspension during the suspension period.

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## THE NASDAQ-100 INDEX®

We have derived all information contained in this underlying supplement regarding the NASDAQ-100 Index®, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by The Nasdaq Stock Market, Inc. ("Nasdaq"). We make no representation or warranty as to the accuracy or completeness of such information. The NASDAQ-100 Index® was developed by Nasdaq and is calculated, maintained and published by The NASDAQ OMX Group, Inc. ("NASDAQ OMX"). Neither Nasdaq nor NASDAQ OMX has any obligation to continue to publish, and may discontinue publication of, the NASDAQ-100 Index®.

### General

The NASDAQ-100 Index® is a modified market capitalization-weighted index of 100 of the largest stocks of non-financial companies listed on The Nasdaq Global Market tier of The NASDAQ Stock Market. The NASDAQ-100 Index®, which includes companies across a variety of major industry groups, was launched on January 31, 1985, with a base index value of 250.00. On January 1, 1994, the base index value was reset to 125.00. Current information regarding the market value of the NASDAQ-100 Index® is available from Nasdaq as well as numerous market information services. The NASDAQ-100 Index® is reported by Bloomberg L.P. under the ticker symbol "NDX."

The NASDAQ-100 Index® share weights of the component securities of the NASDAQ-100 Index® at any time are based upon the total shares outstanding in each of those securities and are additionally subject, in certain cases, to rebalancing. Accordingly, each underlying stock's influence on the level of the NASDAQ-100 Index® is directly proportional to the value of its NASDAQ-100 Index® share weight.

### Calculation of the NASDAQ-100 Index®

At any moment in time, the value of the NASDAQ-100 Index® equals the aggregate value of the then-current NASDAQ-100 Index® share weights of each of the NASDAQ-100 Index® component securities, which are based on the total shares outstanding of each such NASDAQ-100 Index® component security, multiplied by each such security's respective last sale price on The NASDAQ Stock Market (which may be the official closing price published by The NASDAQ Stock Market), and divided by a scaling factor (the "divisor"), which becomes the basis for the reported NASDAQ-100 Index® value. The divisor serves the purpose of scaling such aggregate value to a lower order of magnitude which is more desirable for NASDAQ-100 Index® reporting purposes.

### Underlying Stock Eligibility Criteria

#### *Initial Eligibility Criteria*

To be eligible for initial inclusion in the NASDAQ-100 Index®, a security must be listed on The NASDAQ Stock Market and meet the following criteria:

- the security's U.S. listing must be exclusively on the NASDAQ Global Select Market or the NASDAQ Global Market (unless the security was dually listed on another U.S. market prior to January 1, 2004 and has continuously maintained such listing);
- the security must be issued by a non-financial company;
- the security may not be issued by an issuer currently in bankruptcy proceedings;
- the security must have an average daily trading volume of at least 200,000 shares;

- if the security is of a foreign issuer (a foreign issuer is determined based on its country of organization), it must have listed options on a recognized options market in the United States or be eligible for listed-options trading on a recognized options market in the United States;
- only one class of security per issuer is allowed;
- the issuer of the security may not have entered into a definitive agreement or other arrangement which would likely result in the security no longer being NASDAQ-100 Index® eligible;
- the issuer of the security may not have annual financial statements with an audit opinion that is currently withdrawn;
- the security must have “seasoned” on the NASDAQ Stock Market or another recognized market (generally, a company is considered to be seasoned if it has been listed on a market for at least two years; in the case of spin-offs, the operating history of the parent will be considered); and
- if the security would otherwise qualify to be in the top 25% of the securities included in the NASDAQ-100 Index® by market capitalization for the six prior consecutive month-ends, then a one-year “seasoning” criterion would apply.

#### ***Continued Eligibility Criteria***

In addition, to be eligible for continued inclusion in the NASDAQ-100 Index® the following criteria apply:

- the security’s U.S. listing must be exclusively on the NASDAQ Global Select Market or the NASDAQ Global Market (unless the security was dually listed on another U.S. market prior to January 1, 2004 and has continuously maintained such listing);
- the security must be issued by a non-financial company;
- the security may not be issued by an issuer currently in bankruptcy proceedings;
- the security must have an average daily trading volume of at least 200,000 shares as measured annually during the ranking review process described below;
- if the security is of a foreign issuer, it must have listed options on a recognized options market in the United States or be eligible for listed-options trading on a recognized options market in the United States, as measured annually during the ranking review process;
- the security must have an adjusted market capitalization equal to or exceeding 0.10% of the aggregate adjusted market capitalization of the NASDAQ-100 Index® at each month-end. In the event a company does not meet this criterion for two consecutive month-ends, it will be removed from the NASDAQ-100 Index® effective after the close of trading on the third Friday of the following month; and
- the issuer of the security may not have annual financial statements with an audit opinion that is currently withdrawn.

These NASDAQ-100 Index® eligibility criteria may be revised from time to time by Nasdaq without regard to the notes.

For the purposes of NASDAQ-100 Index® eligibility criteria, if the security is a depositary receipt representing a security of a non-U.S. issuer, then references to the “issuer” are references to the issuer of the underlying security.

## Annual Ranking Review

The composition of the NASDAQ-100 Index<sup>®</sup> is evaluated on an annual basis, except under extraordinary circumstances that may result in an interim evaluation, as follows (this evaluation is referred to herein as the “Ranking Review”). Securities listed on The NASDAQ Stock Market that meet the applicable eligibility criteria are ranked by market value. NASDAQ-100 Index<sup>®</sup>-eligible securities which are already in the NASDAQ-100 Index<sup>®</sup> and which are ranked in the top 100 eligible securities (based on market capitalization) are retained in the NASDAQ-100 Index<sup>®</sup>. A security that is ranked 101 to 125 is also retained, provided that such security was ranked in the top 100 eligible securities as of the previous Ranking Review or was added to the NASDAQ-100 Index<sup>®</sup> subsequent to the previous Ranking Review. Securities not meeting such criteria are replaced. The replacement securities chosen are those NASDAQ-100 Index<sup>®</sup>-eligible securities not currently in the NASDAQ-100 Index<sup>®</sup> that have the largest market capitalization. The data used in the ranking includes end of October market data from The NASDAQ Stock Market and is updated for total shares outstanding submitted in a publicly filed SEC document via EDGAR through the end of November.

Generally, the list of annual additions and deletions is publicly announced via a press release in the early part of December. Replacements are made effective after the close of trading on the third Friday in December. Moreover, if at any time during the year other than the Ranking Review, a NASDAQ-100 Index<sup>®</sup> security no longer meets the continued eligibility criteria or is otherwise determined by Nasdaq to become ineligible for continued inclusion in the NASDAQ-100 Index<sup>®</sup>, the security will be replaced with the largest market capitalization security not currently in the NASDAQ-100 Index<sup>®</sup> and meeting the NASDAQ-100 Index<sup>®</sup> initial eligibility criteria listed above. Ordinarily, a security will be removed from the NASDAQ-100 Index<sup>®</sup> at its last sale price. If, however, at the time of its removal the security is halted from trading on its primary listing market and an official closing price cannot readily be determined, the security may, in Nasdaq’s discretion, be removed at a zero price. The zero price will be applied to the security after the close of the market but prior to the time the official closing value of the NASDAQ-100 Index<sup>®</sup> is disseminated.

## Index Maintenance

Changes in the price and/or the aggregate value of the then-current NASDAQ-100 Index<sup>®</sup> share weights of each of the NASDAQ-100 Index<sup>®</sup> component securities driven by corporate events such as stock dividends, stock splits and certain spin-offs and rights issuances are adjusted on the ex-date. If the change in total shares outstanding arising from other corporate actions is greater than or equal to 10.0%, the change will be made to the NASDAQ-100 Index<sup>®</sup> as soon as practicable. Otherwise, if the change in total shares outstanding is less than 10.0%, then all such changes are accumulated and made effective at one time on a quarterly basis after the close of trading on the third Friday in each of March, June, September and December. The NASDAQ-100 Index<sup>®</sup> share weights for those underlying stocks are derived from each security’s total shares outstanding. The NASDAQ-100 Index<sup>®</sup> share weights for those underlying stocks are adjusted by the same percentage amount by which the total shares outstanding have changed in those NASDAQ-100 Index<sup>®</sup> securities. In the case of a special cash dividend, a determination is made on an individual basis whether to make an adjustment to the last sale price of a NASDAQ-100 Index<sup>®</sup> component security in accordance with its dividend policy. If it is determined that an adjustment will be made, it will be reflected in the last sale price prior to the market open on the ex-date. Ordinarily, whenever there is a change in the NASDAQ-100 Index<sup>®</sup> share weights, a change in a component security included in the NASDAQ-100 Index<sup>®</sup>, or a change to the price of a component security due to spin-off, rights issuances or special cash dividends, Nasdaq adjusts the divisor to ensure that there is no discontinuity in the level of the NASDAQ-100 Index<sup>®</sup> that might otherwise be caused by any such change. All changes will be announced in advance and will be reflected in the NASDAQ-100 Index<sup>®</sup> prior to market open on the effective date of such changes.

## Index Rebalancing

The NASDAQ-100 Index<sup>®</sup> is calculated under a “modified capitalization-weighted” methodology, which is a hybrid between equal weighting and conventional capitalization weighting. This methodology is expected to: (1) retain in general the economic attributes of capitalization weighting; (2) promote portfolio weight diversification (thereby limiting domination of the NASDAQ-100 Index<sup>®</sup> by a few large stocks); (3) reduce NASDAQ-100 Index<sup>®</sup> performance distortion by preserving the capitalization ranking of companies; and (4) reduce market impact on the smallest NASDAQ-100 Index<sup>®</sup> securities from necessary weight rebalancings.

Under the methodology employed, on a quarterly basis coinciding with Nasdaq’s quarterly scheduled weight adjustment procedures, the NASDAQ-100 Index<sup>®</sup> securities are categorized as either “Large Stocks” or “Small Stocks” depending on whether their current percentage weights (after taking into account scheduled weight adjustments due to stock repurchases, secondary offerings or other corporate actions) are greater than, or less than or equal to, the average percentage weight in the NASDAQ-100 Index<sup>®</sup> (*i.e.*, as a 100-stock index, the average percentage weight in the NASDAQ-100 Index<sup>®</sup> is 1.0%).

This quarterly examination will result in a NASDAQ-100 Index<sup>®</sup> rebalancing if either one or both of the following two weight distribution requirements are not met: (1) the current weight of the single largest market capitalization component security must be less than or equal to 24.0% and (2) the “collective weight” of those component securities the individual current weights of which are in excess of 4.5%, when added together, must be less than or equal to 48.0%. In addition, Nasdaq may conduct a special rebalancing if it is determined necessary to maintain the integrity of the NASDAQ-100 Index<sup>®</sup>.

If either one or both of these weight distribution requirements are not met upon quarterly review, or Nasdaq determines that a special rebalancing is required, a weight rebalancing will be performed. First, relating to weight distribution requirement (1) above, if the current weight of the single largest component security exceeds 24.0%, then the weights of all Large Stocks (those greater than 1%) will be scaled down proportionately towards 1.0% by enough for the adjusted weight of the single largest component security to be set to 20.0%. Second, relating to weight distribution requirement (2) above, for those component securities the individual current weights or adjusted weights in accordance with the preceding step of which are in excess of 4.5%, if their “collective weight” exceeds 48.0%, then the weights of all Large Stocks will be scaled down proportionately towards 1.0% by just enough for the “collective weight,” so adjusted, to be set to 40.0%.

The aggregate weight reduction among the Large Stocks resulting from either or both of the above rescalings will then be redistributed to the Small Stocks in the following iterative manner. In the first iteration, the weight of the largest Small Stock will be scaled upwards by a factor which sets it equal to the average Index weight of 1.0%. The weights of each of the smaller remaining Small Stocks will be scaled up by the same factor reduced in relation to each stock’s relative ranking among the Small Stocks such that the smaller the component security in the ranking, the less the scale-up of its weight. This is intended to reduce the market impact of the weight rebalancing on the smallest component securities in the NASDAQ-100 Index<sup>®</sup>.

In the second iteration, the weight of the second largest Small Stock, already adjusted in the first iteration, will be scaled upwards by a factor which sets it equal to the average index weight of 1.0%. The weights of each of the smaller remaining Small Stocks will be scaled up by this same factor reduced in relation to each stock’s relative ranking among the Small Stocks such that, once again, the smaller the component stock in the ranking, the less the scale-up of its weight.

Additional iterations will be performed until the accumulated increase in weight among the Small Stocks exactly equals the aggregate weight reduction among the Large Stocks from rebalancing in accordance with weight distribution requirement (1) and/or weight distribution requirement (2).

Then, to complete the rebalancing procedure, once the final percent weights of each of the component securities are set, the NASDAQ-100 Index® share weights will be determined anew based upon the last sale prices and aggregate capitalization of the NASDAQ-100 Index® at the close of trading on the last day in February, May, August and November. Changes to the share weights will be made effective after the closing of trading on the third Friday in March, June, September and December. Changes to the NASDAQ-100 Index® share weights will be made effective after the close of trading on the third Friday in March, June, September and December, and an adjustment to the NASDAQ-100 Index® divisor will be made to ensure continuity of the NASDAQ-100 Index®.

Ordinarily, new rebalanced weights will be determined by applying the above procedures to the current NASDAQ-100 Index® share weights. However, NASDAQ OMX may from time to time determine rebalanced weights, if necessary, by instead applying the above procedure to the actual current market capitalization of the component securities. In such instances, NASDAQ OMX would announce the different basis for rebalancing prior to its implementation.

NASDAQ OMX may, from time to time, exercise reasonable discretion as it deems appropriate in order to ensure the integrity of the NASDAQ-100 Index®.

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## THE NIKKEI 225 INDEX

The J.P. Morgan Alternative Index Japan Equity Momentum Strategy and the J.P. Morgan Alternative Index Mean Reversion Japan Strategy are linked to a synthetic exposure to the performance of the J.P. Morgan Japanese Equity Futures (G) Tracker, which is directly linked to the Nikkei 225 Index. We have derived all information contained in this underlying supplement regarding the Nikkei 225 Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by Nikkei Inc. We make no representation or warranty as to the accuracy or completeness of such information. The Nikkei 225 Index was developed by Nikkei Inc. and is calculated, maintained and published by Nikkei Inc. Nikkei Inc. has no obligation to continue to publish, and may discontinue the publication of, the Nikkei 225 Index.

The Nikkei 225 Index is reported by Bloomberg L.P. under the ticker symbol “NKY.”

The Nikkei 225 Index is a stock index that measures the composite price performance of selected Japanese stocks. The Nikkei 225 Index, as of the date of this underlying supplement, is based on 225 underlying stocks (the “Nikkei Underlying Stocks”) trading on the Tokyo Stock Exchange (“TSE”) representing a broad cross-section of Japanese industries.

All 225 Nikkei Underlying Stocks are stocks listed in the First Section of the TSE. Stocks listed in the First Section of the TSE are among the most actively traded stocks on the TSE. Nikkei Inc. rules require that the 75 most liquid issues (one-third of the component count of the Nikkei 225 Index) be included in the Nikkei 225 Index. Nikkei Inc. first calculated and published the Nikkei 225 Index in 1970.

The 225 companies included in the Nikkei 225 Index are divided into six sector categories: Technology, Financials, Consumer Goods, Materials, Capital Goods/Others and Transportation and Utilities. These six sector categories are further divided into 36 industrial classifications as follows:

- Technology — Pharmaceuticals, Electrical Machinery, Automobiles, Precision Machinery, Telecommunications;
- Financials — Banks, Miscellaneous Finance, Securities, Insurance;
- Consumer Goods — Marine Products, Food, Retail, Services;
- Materials — Mining, Textiles, Paper and Pulp, Chemicals, Oil, Rubber, Ceramics, Steel, Nonferrous Metals, Trading House;
- Capital Goods/Others — Construction, Machinery, Shipbuilding, Transportation Equipment, Miscellaneous Manufacturing, Real Estate; and
- Transportation and Utilities — Railroads and Buses, Trucking, Shipping, Airlines, Warehousing, Electric Power, Gas.

### Standards for Listing and Maintenance

A Nikkei Underlying Stock may be deleted or added by Nikkei Inc. Any stock becoming ineligible for listing in the First Section of the TSE due to any of the following reasons will be deleted from the Nikkei Underlying Stocks: (i) bankruptcy of the issuer, (ii) merger of the issuer with, or acquisition of the issuer by, another company, (iii) delisting of such stock, (iv) transfer of such stock to the “Seiri-Post” because of excess debt of the issuer or because of any other reason or (v) transfer of such stock to the Second Section. In addition, a component stock transferred to the “Kanri-Post” (Posts for stocks under supervision) is in principle a candidate for deletion. Nikkei Underlying Stocks with relatively low liquidity, based on trading value and rate of price fluctuation

over the past five years, may be deleted by Nikkei Inc. Upon deletion of a stock from the Nikkei Underlying Stocks, Nikkei Inc. will select a replacement for such deleted Nikkei Underlying Stock in accordance with certain criteria. In an exceptional case, a newly listed stock in the First Section of the TSE that is recognized by Nikkei Inc. to be representative of a market may be added to the Nikkei Underlying Stocks. In such a case, an existing Nikkei Underlying Stock with low trading volume and deemed not to be representative of a market will be deleted by Nikkei Inc.

A list of the issuers of the Nikkei Underlying Stocks constituting the Nikkei 225 Index is available from the Nikkei Economic Electronic Databank System and from the Stock Market Indices Data Book published by Nikkei Inc. Nikkei Inc. may delete, add or substitute any stock underlying the Nikkei 225 Index.

### **Calculation of the Nikkei 225 Index**

The Nikkei 225 Index is a modified, price-weighted index (*i.e.*, a Nikkei Underlying Stock's weight in the index is based on its price per share rather than the total market capitalization of the issuer) which is calculated by (i) multiplying the per share price of each Nikkei Underlying Stock by the corresponding weighting factor for such Nikkei Underlying Stock (a "Weight Factor"), (ii) calculating the sum of all these products and (iii) dividing such sum by a divisor (the "Divisor"). The Divisor was initially set at 225 for the date of May 16, 1949 using historical numbers from May 16, 1949, the date on which the TSE was reopened. The Divisor was 24.966 as of September 28, 2011, and is subject to periodic adjustments as set forth below. Each Weight Factor is computed by dividing ¥50 by the par value of the relevant Nikkei Underlying Stock, so that the share price of each Nikkei Underlying Stock when multiplied by its Weight Factor corresponds to a share price based on a uniform par value of ¥50. The stock prices used in the calculation of the Nikkei 225 Index are those reported by a primary market for the Nikkei Underlying Stocks (currently the TSE). The level of the Nikkei 225 Index is calculated once per minute during TSE trading hours.

In order to maintain continuity in the Nikkei 225 Index in the event of certain changes due to non-market factors affecting the Nikkei Underlying Stocks, such as the addition or deletion of stocks, substitution of stocks, stock splits or distributions of assets to stockholders, the Divisor used in calculating the Nikkei 225 Index is adjusted in a manner designed to prevent any instantaneous change or discontinuity in the level of the Nikkei 225 Index. Thereafter, the Divisor remains at the new value until a further adjustment is necessary as the result of another change. As a result of such change affecting any Nikkei Underlying Stock, the Divisor is adjusted in such a way that the sum of all share prices immediately after such change multiplied by the applicable Weight Factor and divided by the new Divisor (*i.e.*, the level of the Nikkei 225 Index immediately after such change) will equal the level of the Nikkei 225 Index immediately prior to the change.

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In addition, the Nikkei 225 Index Sponsor gives no assurance regarding any modification or change in any methodology used in calculating the Nikkei 225 Index and is under no obligation to continue the calculation, publication and dissemination of the Nikkei 225 Index.

### **The Tokyo Stock Exchange**

The TSE is one of the world's largest securities exchanges in terms of market capitalization. Trading hours are currently from 9:00 a.m. to 11:00 a.m. and from 12:30 p.m. to 3:00 p.m., Tokyo time, Monday through Friday.

Due to the time zone difference, on any normal trading day the TSE will close prior to the opening of business in New York City on the same calendar day. Therefore, the closing level of the Nikkei 225 Index on a trading day will generally be available in the United States by the opening of business on the same calendar day.

The TSE has adopted certain measures, including daily price floors and ceilings on individual stocks, intended to prevent any extreme short-term price fluctuations resulting from order imbalances. In general, any stock listed on the TSE cannot be traded at a price lower than the applicable price floor or higher than the applicable price ceiling. These price floors and ceilings are expressed in absolute Japanese yen, rather than percentage limits based on the closing price of the stock on the previous trading day. In addition, when there is a major order imbalance in a listed stock, the TSE posts a "special bid quote" or a "special asked quote" for that stock at a specified higher or lower price level than the stock's last sale price in order to solicit counter-orders and balance supply and demand for the stock. Prospective investors should also be aware that the TSE may suspend the trading of individual stocks in certain limited and extraordinary circumstances, including, for example, unusual trading activity in that stock. As a result, changes in the Nikkei 225 Index may be limited by price limitations or special quotes, or by suspension of trading, on individual stocks that make up the Nikkei 225 Index, and these limitations, in turn, may adversely affect the value of the notes.



## THE RUSSELL INDICES

We have derived all information contained in this underlying supplement regarding the Russell 1000<sup>®</sup> Index, the Russell 2000<sup>®</sup> Index and the Russell 3000<sup>®</sup> Index (each, a “Russell Index” and collectively, the “Russell Indices”), including, without limitation, their make-up, method of calculation and changes in their components, from publicly available information. Such information reflects the policies of, and is subject to change by, Russell Investments (“Russell”). We make no representation or warranty as to the accuracy or completeness of such information. The Russell Indices were developed by Russell Investment Group (formerly, Frank Russell Company) and are calculated, maintained and published by Russell, a subsidiary of Russell Investment Group. Russell has no obligation to publish, and may discontinue the publication of, the Russell Indices.

### The Russell 1000<sup>®</sup> Index

The Russell 1000<sup>®</sup> Index measures the composite price performance of stocks of 1,000 companies (with respect to the Russell 1000<sup>®</sup> Index, the “Component Stocks”) domiciled in the U.S. and its territories. All stocks included in the Russell 1000<sup>®</sup> Index are traded on a major U.S. exchange. The companies included in the Russell 1000<sup>®</sup> Index are the 1,000 largest companies that form the Russell 3000E<sup>™</sup> Index, which is composed of the 4,000 largest U.S. companies as determined by market capitalization and represents approximately 99% of the U.S. equity market. The Russell 1000<sup>®</sup> Index is reported by Bloomberg L.P. under the ticker symbol “RIY.”

### The Russell 2000<sup>®</sup> Index

The Russell 2000<sup>®</sup> Index measures the capitalization-weighted price performance of the small-cap stocks included in the Russell 2000<sup>®</sup> Index (with respect to the Russell 2000<sup>®</sup> Index, the “Component Stocks”) and is designed to track the performance of the small capitalization segment of the U.S. equity market. All stocks included in the Russell 2000<sup>®</sup> Index are traded on a major U.S. exchange. The companies included in the Russell 2000<sup>®</sup> Index are the middle 2,000 of the companies that form the Russell 3000E<sup>™</sup> Index, which is composed of the 4,000 largest U.S. companies as determined by market capitalization and represents approximately 99% of the U.S. equity market. The Russell 2000<sup>®</sup> Index is reported by Bloomberg L.P. under the ticker symbol “RTY.”

### The Russell 3000<sup>®</sup> Index

The Russell 3000<sup>®</sup> Index measures the capitalization-weighted price performance of the stocks included in the Russell 3000<sup>®</sup> Index (with respect to the Russell 2000<sup>®</sup> Index, the “Component Stocks”) and is designed to represent the broad U.S. equity market. All stocks included in the Russell 3000<sup>®</sup> Index are traded on a major U.S. exchange. The companies included in the Russell 3000<sup>®</sup> Index are the 3,000 largest U.S. companies that form the Russell 3000E<sup>™</sup> Index, which is composed of the 4,000 largest U.S. companies as determined by market capitalization and represents approximately 99% of the U.S. equity market. The Russell 3000<sup>®</sup> Index consists of the 3,000 companies included in the Russell 1000<sup>®</sup> Index and the Russell 2000<sup>®</sup> Index, which are subsets of the Russell 3000E<sup>™</sup> Index, and represents approximately 98% of the U.S. equity market. The Russell 3000E<sup>™</sup> Index is not the same as the Russell 3000<sup>®</sup> Index, which is a subset of the Russell 3000E<sup>™</sup> Index. The Russell 3000<sup>®</sup> Index is reported by Bloomberg L.P. under the ticker symbol “RAY.”

### Selection of Stocks Underlying the Russell Indices

The Russell Indices are sub-indices of the Russell 3000E<sup>™</sup> Index. To be eligible for inclusion in the Russell 3000E<sup>™</sup> Index, and, consequently, a Russell Index, a company’s stock must be listed on the last trading day in May of a given year and Russell must have access to documentation verifying the company’s eligibility for inclusion. Eligible initial public offerings are added to Russell Indices at

the end of each calendar quarter, based on total market capitalization rankings within the market-adjusted capitalization breaks established during the most recent reconstitution. To be added to any Russell Index during a quarter outside of reconstitution, initial public offerings must meet additional eligibility criteria.

U.S. companies are eligible for inclusion in the Russell 3000E™ Index and, consequently, the Russell Indices. Russell uses the following method for determining whether a company is a U.S. company. If a company incorporates in, has a stated headquarters location in, and also trades in the same country (ADRs and ADSs are not eligible), the company is assigned to its country of incorporation. If any of the three do not match, Russell then defines 3 Home Country Indicators ("HCIs"). The HCIs are as follows:

- country of incorporation;
- country of headquarters; and
- country of the most liquid exchange as defined by 2-year average daily dollar trading volume (ADDTV) from all exchanges within a country.

After the HCIs are defined, the next step in the country assignment involves an analysis of assets by location. Russell cross-compares the primary location of the company's assets with the three HCIs. If the primary location of assets matches ANY of the HCIs, then the company is assigned to its primary asset location.

If there is not enough information to determine a company's primary country of assets, Russell uses the primary location of the company's revenue for the same cross-comparison and assigns the company to the appropriate country in a similar fashion. In 2011, Russell began using an average of two years of assets or revenues data for analysis to reduce potential turnover.

If conclusive country details cannot be derived from assets or revenue, Russell assigns the company to the country where its headquarters are located unless the country is a Benefit Driven Incorporation (BDI) country. If the country in which its headquarters are located is a BDI country, the company is assigned to the country of its most liquid stock exchange. The BDI countries are Anguilla, Antigua and Barbuda, Bahamas, Barbados, Belize, Bermuda, British Virgin Islands, Cayman Islands, Channel Islands, Cook Islands, Faroe Islands, Gibraltar, Isle of Man, Liberia, Marshall Islands, Netherlands Antilles, Panama and Turks and Caicos Islands.

The following securities are specifically excluded from the Russell Indices: (i) stocks that are not traded on a major U.S. exchange; (ii) preferred stock, convertible preferred stock, redeemable shares, participating preferred stock, warrants, rights and trust receipts; (iii) royalty trusts, limited liability companies, closed-end investment companies (business development companies or BDCs are eligible), blank check companies, special purpose acquisition companies (SPACs) and limited partnerships.

The primary criteria used to determine the initial list of securities eligible for the Russell 3000E™ Index is total market capitalization, which is defined as the price of the shares times the total number of available shares. All common stock share classes are combined in determining market capitalization. If multiple share classes have been combined, the price of the primary trading vehicle (usually the most liquid) is used in the calculations. In cases where the common stock share classes act independently of each other (*e.g.*, tracking stocks), each class is considered for inclusion separately. Stocks must trade at or above \$1.00 (on their primary exchange) on the last trading day in May of each year to be eligible for inclusion in any Russell Index. In order to reduce unnecessary turnover, if an existing Component Stock's closing price is less than \$1.00 on the last trading day in May, it will be considered eligible if the average of the daily closing prices (from its primary

exchange) during the month of May is equal to or greater than \$1.00. Quarterly IPO additions must have a close price at or above \$1.00 on the last day of their eligibility period in order to qualify for index inclusion. If a stock, new or existing, does not have a close price at or above \$1.00 (on its primary exchange) on the last trading day in May, but does have a close price at or above \$1.00 on another major U.S. exchange, the stock will be eligible for inclusion.

Companies with only a total market capitalization of less than \$30 million are not eligible for inclusion in the Russell 3000E™ Index and, consequently, the Russell Indices. Companies with only a small portion of their shares available in the marketplace are not eligible for inclusion in the Russell 3000E™ Index and, consequently, the Russell Indices. Companies with 5% or less float will be removed from eligibility.

The Russell Indices are reconstituted annually to reflect changes in the marketplace. The list of companies is ranked based on total market capitalization as of the last trading day in May, with the actual reconstitution effective on the first trading day following the final Friday of June each year, except that if the last Friday of June of any year is the 28<sup>th</sup>, 29<sup>th</sup> or 30<sup>th</sup>, reconstitution will occur on the preceding Friday. Changes in the constituents are pre-announced and subject to change if any corporate activity occurs or if any new information is received prior to release.

### **Capitalization Adjustments**

As a capitalization-weighted index, the each Russell Index reflects changes in the capitalization, or market value, of the Component Stocks relative to the capitalization on a base date. The current value of each Russell Index is calculated by adding the market values of the Component Stocks, which are derived by multiplying the price of each stock by the number of available shares, to arrive at the total market capitalization of the 2,000 stocks. The total market capitalization is then divided by a divisor, which represents the “adjusted” capitalization of the applicable Russell Index on the base date of December 31, 1986. To calculate the Russell Indices, last sale prices will be used for exchange-traded and NASDAQ stocks. If a Component Stock is not open for trading, the most recently traded price for that security will be used in calculating the Russell Indices. In order to provide continuity for the value of the Russell Indices, the applicable divisor is adjusted periodically to reflect events including changes in the number of common shares outstanding for Component Stocks, company additions or deletions, corporate restructurings and other capitalization changes.

Available shares are assumed to be shares available for trading. Exclusion of capitalization held by other listed companies and large holdings of private investors (10% or more) is based on information recorded in SEC corporate filings, including DEF 14, 424B and 10K filings (but not 13F filings), or other reliable sources in the event of missing or questionable data.

The following types of shares are considered unavailable for the purposes of capitalization determinations:

- ESOP or LESOP shares — corporations that have Employee Stock Ownership Plans that comprise 10% or more of the shares outstanding are adjusted;
- Corporate cross-owned shares — corporate cross-ownership occurs when shares of a company in the applicable Russell Index are held by another member of a Russell index (including Russell Global Indexes). Any percentage held in this class will be adjusted;
- Large private and corporate shares — large private and corporate holdings are defined as those shares held by an individual, a group of individuals acting together or a corporation not in the applicable Russell Index that own 10% or more of the shares outstanding. However, not to be included in this class are institutional holdings, which are: investment companies, partnerships, insurance companies, mutual funds, banks or venture capital funds;

- Unlisted share classes — classes of common stock that are not traded on a U.S. securities exchange;
- Initial public offering lock-ups — shares locked-up during an initial public offering are not available to the public and will be excluded from the market value at the time the initial public offering enters the applicable Russell Index; and
- Government Holdings:
  - Direct government holders: Those holdings listed as “government of” are considered unavailable and will be removed entirely from available shares;
  - Indirect government holders: Shares held by government investment boards and/or investment arms will be treated similar to large private holdings and removed if the holding is greater than 10%; and
  - Government pensions: Any holding by a government pension plan is considered institutional holdings and will not be removed from available shares.

### **Corporate Actions Affecting the Russell Indices**

The following summarizes the types of maintenance adjustments considered with respect to the Russell Indices and indicates whether or not an adjustment to a Russell Index is required.

- “No Replacement” Rule — Securities that leave the relevant Russell Indices, between reconstitution dates, for any reason (*e.g.*, mergers, acquisitions or other similar corporate activity) are not replaced. Thus, the number of securities in the relevant Russell Indices over a year will fluctuate according to corporate activity.
- Rules for Deletions — When a stock is acquired, delisted or moves to the pink sheets or bulletin boards on the floor of a U.S. securities exchange, the stock is deleted from the relevant Russell Indices at the market close on the effective date or when the stock is no longer trading on the exchange if Russell is able to determine the status of the corporate action to be final prior to 2:00 p.m. Eastern Standard Time, or the following day if Russell is able to determine the status of the corporate action to be final after 2:00 p.m. Eastern Standard Time. Companies that file for a Chapter 7 liquidation bankruptcy will be removed from the relevant Russell Indices at the time of the bankruptcy filing; whereas, companies filing for a Chapter 11 reorganization bankruptcy will remain a member of the relevant Russell Indices, unless the company is delisted from the primary exchange, in which case normal delisting rules apply. Members of the relevant Russell Indices that are re-incorporated in another country are deleted when the re-incorporation is final.
- Rules for Additions — The only additions between reconstitution dates are as a result of spin-offs and initial public offerings. Spin-off companies are added to the parent company’s index and capitalization tier of membership, if the spin-off company is sufficiently large. To be eligible, the spun-off company’s total market capitalization must be greater than the market-adjusted total market capitalization of the smallest security in the Russell 3000E™ Index at the latest reconstitution. If a U.S. spin-off occurs from a Russell Global ex-U.S. Index member, the spun-off company will be placed in the parent’s index and capitalization tier of the Russell Global Index. A member of the Russell Global Index that is reincorporating to the United States or one of the eligible countries/regions described above will be added to the Russell 3000E™ Index when the reincorporation is final.

- **Merger and Acquisition** — When mergers or acquisitions occur, changes to the membership and weighting of members within the relevant Russell Indices occur. In the event a merger or acquisition occurs between members of the relevant Russell Indices, the acquired company is deleted and its market capitalization moves to the acquiring stock according to the terms of the merger; hence, mergers have no effect on the relevant Russell Indices total capitalization. Shares are updated for the acquiring stock at the time the transaction is final. If the acquiring company is a member of the relevant Russell Indices, but the acquired company is not, the shares for the acquiring stock are adjusted at month-end. If the acquiring company is not a member of any of the Russell Indexes, there are two possibilities:
  - **Reverse Merger** — If the acquiring company is a private, non-publicly traded company or OTC company, Russell will review the action to determine if it is considered a reverse merger, defined as a transaction that results in a publicly traded company that meets all requirements for inclusion in a Russell Index. If it is determined that an action is a reverse merger, the newly formed entity will be placed in the appropriate market capitalization index after the close of the day following the completion of the merger. The acquired company will be removed from the current index simultaneously.
  - **Standard Action** — The acquired company is deleted after the action is final.
- **Delisted Stocks** — When stocks from the relevant Russell Indices are deleted as a result of exchange delisting or reconstitution, the price used will be the closing primary exchange price on the day of deletion, or the following day using the closing OTC bulletin board price. However, there may be corporate events, such as mergers or acquisitions, that result in the lack of current market price for the deleted security and in such an instance the latest primary exchange closing price available will be used.
- **Rule for Re-Classification and Re-Incorporation** — For re-classification of shares, adjustments will be made at the open of the ex-date using previous day closing prices. Companies that reincorporate and no longer trade in the U.S. are immediately deleted.

### **Updates to Share Capital Affecting the Russell Indices**

Each month, the Russell Indices are updated for changes to shares outstanding as companies report changes in share capital to the SEC. Effective April 30, 2002, only cumulative changes to available shares greater than 5% are reflected in the Russell Indices. This does not affect treatment of major corporate events, which are effective on the ex-date.

### **Pricing of Securities Included in the Russell Indices**

Effective on January 1, 2002, primary exchange closing prices are used in the daily Russell Index calculations. FT Interactive data is used as the primary source for U.S. security prices, income, and total shares outstanding. Prior to January 1, 2002, composite closing prices, which are the last trade price on any U.S. exchange, were used in the daily Russell Index calculations.

### **Disclaimers**

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## THE S&P 500® INDEX

We have derived all information contained in this underlying supplement regarding the S&P 500® Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Standard & Poor's Financial Services LLC ("S&P"). We make no representation or warranty as to the accuracy or completeness of such information. The S&P 500® Index was developed by S&P and is calculated, maintained and published by S&P. S&P has no obligation to continue to publish, and may discontinue the publication of, the S&P 500® Index.

The S&P 500® Index is reported by Bloomberg L.P. under the ticker symbol "SPX."

On November 4, 2011, The McGraw-Hill Companies, Inc. ("McGraw-Hill"), the owner of the S&P Indices business, and CME Group Inc. ("CME Group"), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business, including the S&P 500® Index. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

The S&P 500® Index is intended to provide a performance benchmark for the U.S. equity markets. The calculation of the level of the S&P 500® Index (discussed below in further detail) is based on the relative value of the aggregate Market Value (as defined below) of the common stocks of 500 companies (the "S&P Component Stocks") as of a particular time as compared to the aggregate average Market Value of the common stocks of 500 similar companies during the base period of the years 1941 through 1943. Historically, the "Market Value" of any S&P Component Stock was calculated as the product of the market price per share and the number of the then-outstanding shares of such S&P Component Stock. As discussed below, on March 21, 2005, S&P began to use a new methodology to calculate the Market Value of the S&P Component Stocks and on September 16, 2005, S&P completed its transition to the new calculation methodology. The 500 companies are not the 500 largest companies listed on the New York Stock Exchange (the "NYSE") and not all 500 companies are listed on such exchange. S&P chooses companies for inclusion in the S&P 500® Index with the objective of achieving a distribution by broad industry groupings that approximates the distribution of these groupings in the common stock population of the U.S. equity market. S&P may from time to time, in its sole discretion, add companies to, or delete companies from, the S&P 500® Index to achieve the objectives stated above. Relevant criteria employed by S&P include the viability of the particular company, the extent to which that company represents the industry group to which it is assigned, the extent to which the company's common stock is widely-held and the Market Value and trading activity of the common stock of that company.

On March 21, 2005, S&P began to calculate the S&P 500® Index based on a half float-adjusted formula, and on September 16, 2005, the S&P 500® Index became fully float-adjusted. S&P's criteria for selecting stocks for the S&P 500® Index was not changed by the shift to float adjustment. However, the adjustment affects each company's weight in the S&P 500® Index (*i.e.*, its Market Value).

Under float adjustment, the share counts used in calculating the S&P 500® Index reflect only those shares that are available to investors, not all of a company's outstanding shares. S&P defines three groups of shareholders whose holdings are subject to float adjustment:

- holdings by other publicly traded corporations, venture capital firms, private equity firms, strategic partners, or leveraged buyout groups;
- holdings by government entities, including all levels of government in the United States or foreign countries; and

- holdings by current or former officers and directors of the company, founders of the company or family trusts of officers, directors or founders, as well as holdings of trusts, foundations, pension funds, employee stock ownership plans, or other investment vehicles associated with and controlled by the company.

However, treasury stock, stock options, equity participation units, warrants, preferred stock, convertible stock and rights are not part of the float. In cases where holdings in a group exceed 10% of the outstanding shares of a company, the holdings of that group will be excluded from the float-adjusted count of shares to be used in the S&P 500® Index calculation. Mutual funds, investment advisory firms, pension funds or foundations not associated with the company and investment funds in insurance companies, shares that trust beneficiaries may buy or sell without difficulty or significant additional expense beyond typical brokerage fees, and, if a company has multiple classes of stock outstanding, shares in an unlisted or non-traded class if such shares are convertible by shareholders without undue delay and cost, are also part of the float. Shares held in a trust to allow investors in countries outside the country of domicile (*e.g.*, ADRs, CDIs and Canadian exchangeable shares) are normally part of the float.

For each stock, an investable weight factor ("IWF") is calculated by dividing the available float shares, defined as the total shares outstanding less shares held in one or more of the three groups listed above where the group holdings exceed 10% of the outstanding shares, by the total shares outstanding. (On March 21, 2005, the S&P 500® Index moved halfway to float adjustment, meaning that if a stock has an IWF of 0.80, the IWF used to calculate the S&P 500® Index between March 21, 2005 and September 16, 2005 was 0.90. On September 16, 2005, S&P began to calculate the S&P 500® Index on a fully float-adjusted basis, meaning that if a stock has an IWF of 0.80, the IWF used to calculate the S&P 500® Index on and after September 16, 2005 is 0.80.) The float-adjusted Index is calculated by dividing the sum of the IWF multiplied by both the price and the total shares outstanding for each stock by the Index Divisor. For companies with multiple classes of stock, S&P calculates the weighted average IWF for each stock using the proportion of the total company market capitalization of each share class as weights.

As of the date of this underlying supplement, the S&P 500® Index is calculated using a base-weighted aggregate methodology: the level of the S&P 500® Index reflects the total Market Value of all 500 S&P Component Stocks relative to the S&P 500® Index's base period of 1941–43 (the "Base Period").

An indexed number is used to represent the results of this calculation in order to make the value easier to work with and track over time.

The actual total Market Value of the S&P Component Stocks during the Base Period has been set equal to an indexed value of 10. This is often indicated by the notation 1941–43=10. In practice, the daily calculation of the S&P 500® Index is computed by dividing the total Market Value of the S&P Component Stocks by a number called the Index Divisor. By itself, the Index Divisor is an arbitrary number. However, in the context of the calculation of the S&P 500® Index, it is the only link to the original Base Period level of the S&P 500® Index. The Index Divisor keeps the S&P 500® Index comparable over time and is the manipulation point for all adjustments to the S&P 500® Index ("Index Maintenance").

Index Maintenance includes monitoring and completing the adjustments for company additions and deletions, share changes, stock splits, stock dividends and stock price adjustments due to company restructurings or spin-offs.

To prevent the level of the S&P 500® Index from changing due to corporate actions, all corporate actions which affect the total Market Value of the S&P 500® Index require an Index Divisor adjustment. By adjusting the Index Divisor for the change in total Market Value, the level of the S&P 500® Index remains constant. This helps maintain the level of the S&P 500® Index as an



accurate barometer of stock market performance and ensures that the movement of the S&P 500® Index does not reflect the corporate actions of individual companies in the S&P 500® Index. All Index Divisor adjustments are made after the close of trading and after the calculation of the closing level of the S&P 500® Index. Some corporate actions, such as stock splits and stock dividends, require simple changes in the common shares outstanding and the stock prices of the companies in the S&P 500® Index and do not require Index Divisor adjustments.

The table below summarizes the types of Index Maintenance adjustments and indicates whether or not an Index Divisor adjustment is required.

| Type of Corporate Action  | Comments   | Divisor Adjustment |
|---|--|--------------------|
| Company added/deleted   | Net change in market value determines divisor adjustment.  | Yes                |
| Change in shares outstanding  | Any combination of secondary issuance, share repurchase or buy back – share counts revised to reflect change.  | Yes                |
| Stock split   | Share count revised to reflect new count. Divisor adjustment is not required since the share count and price changes are offsetting.   | No                 |
| Spin-off  | If the spun-off company is not being added to the index, the divisor adjustment reflects the decline in index market value ( <i>i.e.</i> , the value of the spun-off unit).  | Yes                |
| Spin-off  | Spun-off company added to the index, another company removed to keep number of names fixed. Divisor adjustment reflects deletion.  | Yes                |
| Change in IWF due to a corporate action or a purchase or sale by an inside holder | Increasing (decreasing) the IWF increases (decreases) the total market value of the index. The divisor change reflects the change in market value caused by the change to an IWF.  | Yes                |
| Special dividend  | When a company pays a special dividend the share price is assumed to drop by the amount of the dividend; the divisor adjustment reflects this drop in index market value.  | Yes                |
| Rights offering   | Each shareholder receives the right to buy a proportional number of additional shares at a set (often discounted) price. The calculation assumes that the offering is fully subscribed. Divisor adjustment reflects increase in market cap measured as the shares issued multiplied by the price paid. | Yes                |

Stock splits and stock dividends do not affect the Index Divisor, because following a split or dividend, both the stock price and number of shares outstanding are adjusted by S&P so that there is no change in the Market Value of the S&P Component Stock. All stock split and dividend adjustments are made after the close of trading on the day before the ex-date.

Each of the corporate events exemplified in the table requiring an adjustment to the Index Divisor has the effect of altering the Market Value of the S&P Component Stock and consequently of altering the aggregate Market Value of the S&P Component Stocks (the "Post-Event Aggregate

Market Value"). In order that the level of the S&P 500® Index (the "Pre-Event Index Value") not be affected by the altered Market Value (whether increase or decrease) of the affected Component Stock, a new Index Divisor ("New Divisor") is derived as follows:

$$\frac{\text{Post-Event Aggregate Market Value}}{\text{New Divisor}} = \text{Pre-Event Index Value}$$

$$\text{New Divisor} = \frac{\text{Post-Event Aggregate Market Value}}{\text{Pre-Event Index Value}}$$

A large part of the Index Maintenance process involves tracking the changes in the number of shares outstanding of each of the S&P 500® Index companies. Four times a year, on a Friday close to the end of each calendar quarter, the share totals of companies in the S&P 500® Index are updated as required by any changes in the number of shares outstanding. After the totals are updated, the Index Divisor is adjusted to compensate for the net change in the total Market Value of the S&P 500® Index. In addition, any changes over 5% in the current common shares outstanding for the S&P 500® Index companies are carefully reviewed on a weekly basis, and when appropriate, an immediate adjustment is made to the Index Divisor.

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## THE S&P MIDCAP 400® INDEX

We have derived all information contained in this underlying supplement regarding the S&P MidCap 400® Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, S&P. We make no representation or warranty as to the accuracy or completeness of such information. The S&P MidCap 400® Index was developed by S&P and is calculated, maintained and published by S&P. S&P has no obligation to continue to publish, and may discontinue the publication of, the S&P MidCap 400® Index.

The S&P MidCap 400® Index is reported by Bloomberg L.P. under the ticker symbol "MID."

On November 4, 2011, The McGraw-Hill Companies, Inc. ("McGraw-Hill"), the owner of the S&P Indices business, and CME Group Inc. ("CME Group"), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business, including the S&P MidCap 400® Index. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

The S&P MidCap 400® Index is intended to provide a performance benchmark for the medium capitalization segment of the U.S. equity markets. It tracks the stock price movement of 400 companies with mid-sized market capitalizations, primarily ranging from US \$1 billion to US \$4.4 billion. The market capitalization requirements are reviewed periodically so as to ensure consistency with market standards. The S&P MidCap 400® Index is maintained with similar methodologies and rules as the S&P 500® Index, with variations only to account for differences in capitalization requirements.

The calculation of the level of the S&P MidCap 400® Index (discussed below in further detail) is based on the relative value of the aggregate Market Value (as defined below) of the common stocks of 400 companies (the "S&P MidCap Component Stocks") as of a particular time as compared to the aggregate average Market Value of the common stocks of 400 similar companies on the base date of June 28, 1991 (the "base date"). Historically, the "Market Value" of any S&P MidCap Component Stock was calculated as the product of the market price per share and the number of the then-outstanding shares of such S&P MidCap Component Stock. As discussed below, on March 21, 2005, S&P began to use a new methodology to calculate the Market Value of the S&P MidCap Component Stocks and on September 16, 2005, S&P completed its transition to the new calculation methodology. S&P chooses companies for inclusion in the S&P MidCap 400® Index with the objective of achieving a distribution by broad industry groupings that approximates the distribution of these groupings in the common stock population of the medium capitalization segment of the U.S. equity market. S&P may from time to time, in its sole discretion, add companies to, or delete companies from, the S&P MidCap 400® Index to achieve the objectives stated above. Relevant criteria employed by S&P include the viability of the particular company, the extent to which that company represents the industry group to which it is assigned, the extent to which the company's common stock is widely-held and the Market Value and trading activity of the common stock of that company.

On March 21, 2005, S&P began to calculate the S&P MidCap 400® Index based on a half float-adjusted formula, and on September 16, 2005, the S&P MidCap 400® Index became fully float adjusted. S&P's criteria for selecting stocks for the S&P MidCap 400® Index was not changed by the shift to float adjustment. However, the adjustment affects each company's weight in the S&P MidCap 400® Index (*i.e.*, its Market Value).

Under float adjustment, the share counts used in calculating the S&P MidCap 400® Index reflect only those shares that are available to investors, not all of a company's outstanding shares. S&P defines three groups of shareholders whose holdings are subject to float adjustment:

- holdings by other publicly traded corporations, venture capital firms, private equity firms, strategic partners, or leveraged buyout groups;
- holdings by government entities, including all levels of government in the United States or foreign countries; and
- holdings by current or former officers and directors of the company, founders of the company, or family trusts of officers, directors, or founders, as well as holdings of trusts, foundations, pension funds, employee stock ownership plans, or other investment vehicles associated with and controlled by the company.

However, treasury stock, stock options, equity participation units, warrants, preferred stock, convertible stock and rights are not part of the float. In cases where holdings in a group exceed 10% of the outstanding shares of a company, the holdings of that group will be excluded from the float-adjusted count of shares to be used in the S&P MidCap 400® Index calculation. Mutual funds, investment advisory firms, pension funds or foundations not associated with the company and investment funds in insurance companies, shares that trust beneficiaries may buy or sell without difficulty or significant additional expense beyond typical brokerage fees, and, if a company has multiple classes of stock outstanding, shares in an unlisted or non-traded class if such shares are convertible by shareholders without undue delay and cost, are also part of the float. Shares held in a trust to allow investors in countries outside the country of domicile (*e.g.* ADRs, CDIs and Canadian exchangeable shares) are normally part of the float.

For each stock, an investable weight factor ("IWF") is calculated by dividing the available float shares, defined as the total shares outstanding less shares held in one or more of the three groups listed above where the group holdings exceed 10% of the outstanding shares, by the total shares outstanding. (On March 21, 2005, the S&P MidCap 400® Index moved halfway to float adjustment, meaning that if a stock has an IWF of 0.80, the IWF used to calculate the S&P MidCap 400® Index between March 21, 2005 and September 16, 2005 was 0.90. On September 16, 2005, S&P began to calculate the S&P MidCap 400® Index on a fully float-adjusted basis, meaning that if a stock has an IWF of 0.80, the IWF used to calculate the S&P MidCap 400® Index on and after September 16, 2005 is 0.80.) The float-adjusted Index is calculated by dividing the sum of the IWF multiplied by both the price and the total shares outstanding for each stock by the Index Divisor. For companies with multiple classes of stock, S&P calculates the weighted average IWF for each stock using the proportion of the total company market capitalization of each share class as weights.

As of the date of this underlying supplement, the S&P MidCap 400® Index is calculated using a base-weighted aggregate methodology: the level of the S&P MidCap 400® Index reflects the total Market Value of all 400 S&P MidCap Component Stocks relative to the S&P MidCap 400® Index's Base Date. An indexed number is used to represent the results of this calculation in order to make the value easier to work with and track over time.

The actual total Market Value of the S&P MidCap Component Stocks on the Base Date has been set equal to an indexed value of 100. This is often indicated by the notation 6/28/91 = 100. In practice, the daily calculation of the S&P MidCap 400® Index is computed by dividing the total Market Value of the S&P MidCap Component Stocks by a number called the Index Divisor. By itself, the Index Divisor is an arbitrary number. However, in the context of the calculation of the S&P MidCap 400® Index, it is the only link to the original Base Period level of the S&P MidCap 400® Index. The Index Divisor keeps the S&P MidCap 400® Index comparable over time and is the manipulation point for all adjustments to the S&P MidCap 400® Index ("Index Maintenance").

Index Maintenance includes monitoring and completing the adjustments for company additions and deletions, share changes, stock splits, stock dividends and stock price adjustments due to company restructurings or spin-offs.

To prevent the level of the S&P MidCap 400® Index from changing due to corporate actions, all corporate actions which affect the total Market Value of the S&P MidCap 400® Index require an Index Divisor adjustment. By adjusting the Index Divisor for the change in total Market Value, the level of the S&P MidCap 400® Index remains constant. This helps maintain the level of the S&P MidCap 400® Index as an accurate barometer of stock market performance and ensures that the movement of the S&P MidCap 400® Index does not reflect the corporate actions of individual companies in the S&P MidCap 400® Index. All Index Divisor adjustments are made after the close of trading and after the calculation of the closing level of the S&P MidCap 400® Index. Some corporate actions, such as stock splits and stock dividends, require simple changes in the common shares outstanding and the stock prices of the companies in the S&P MidCap 400® Index and do not require Index Divisor adjustments.

The table below summarizes the types of Index Maintenance adjustments and indicates whether or not an Index Divisor adjustment is required.

| Type of Corporate Action   | Comments   | Divisor Adjustment |
|--|--|--------------------|
| Company added/deleted  | Net change in market value determines divisor adjustment.  | Yes                |
| Change in shares outstanding   | Any combination of secondary issuance, share repurchase or buy back – share counts revised to reflect change.  | Yes                |
| Stock split  | Share count revised to reflect new count. Divisor adjustment is not required since the share count and price changes are offsetting.   | No                 |
| Spin off   | If the spun off company is not being added to the index, the divisor adjustment reflects the decline in index market value ( <i>i.e.</i> , the value of the spun off unit).  | Yes                |
| Spin off   | Spun off company added to the index, another company removed to keep number of names fixed. Divisor adjustment reflects deletion.  | Yes                |
| Change in IWF due to a corporate action or a purchase or sale by an inside holder. | Increasing (decreasing) the IWF increases (decreases) the total market value of the index. The divisor change reflects the change in market value caused by the change to an IWF.  | Yes                |
| Special dividend   | When a company pays a special dividend the share price is assumed to drop by the amount of the dividend; the divisor adjustment reflects this drop in index market value.  | Yes                |
| Rights offering  | Each shareholder receives the right to buy a proportional number of additional shares at a set (often discounted) price. The calculation assumes that the offering is fully subscribed. Divisor adjustment reflects increase in market cap measured as the shares issued multiplied by the price paid. | Yes                |

Stock splits and stock dividends do not affect the Index Divisor, because following a split or dividend, both the stock price and number of shares outstanding are adjusted by S&P so that there is no change in the Market Value of the S&P MidCap Component Stock. All stock split and dividend adjustments are made after the close of trading on the day before the ex-date.

Each of the corporate events exemplified in the table requiring an adjustment to the Index Divisor has the effect of altering the Market Value of the S&P MidCap Component Stock and consequently of altering the aggregate Market Value of the S&P MidCap Component Stocks (the "Post-Event Aggregate Market Value"). In order that the level of the S&P MidCap 400® Index (the "Pre-Event Index Value") not be affected by the altered Market Value (whether increase or decrease) of the affected Component Stock, a new Index Divisor ("New Divisor") is derived as follows:

$$\frac{\text{Post - Event Aggregate Market Value}}{\text{New Divisor}} = \text{Pre - Event Index Value}$$

$$\text{New Divisor} = \frac{\text{Post - Event Aggregate Market Value}}{\text{Pre - Event Index Value}}$$

A large part of the Index Maintenance process involves tracking the changes in the number of shares outstanding of each of the S&P MidCap 400® Index companies. Four times a year, on a Friday close to the end of each calendar quarter, the share totals of companies in the S&P MidCap 400® Index are updated as required by any changes in the number of shares outstanding. After the totals are updated, the Index Divisor is adjusted to compensate for the net change in the total Market Value of the S&P MidCap 400® Index. In addition, any changes over 5% in the current common shares outstanding for the S&P MidCap 400® Index companies are carefully reviewed on a weekly basis, and when appropriate, an immediate adjustment is made to the Index Divisor.

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S&P and J.P. Morgan Securities LLC have entered into a non-exclusive license agreement providing for the sub-license to us, and certain of our affiliated or subsidiary companies, in exchange for a fee, of the right to use the S&P MidCap 400® Index, which is owned and published by S&P, in connection with certain securities, including the notes.

The notes are not sponsored, endorsed, sold or promoted by S&P or its third party licensors. Neither S&P nor its third party licensors makes any representation or warranty, express or implied, to the owners of the notes or any member of the public regarding the advisability of investing in securities generally or in the notes particularly or the ability of the S&P MidCap 400® Index to track general stock market performance. S&P's and its third party licensor's only relationship to JPMorgan Chase & Co. is the licensing of certain trademarks and trade names of S&P and the third party licensors and of the S&P MidCap 400® Index which is determined, composed and calculated by S&P or its third party licensors without regard to JPMorgan Chase & Co. or the notes. S&P and its third party licensors have no obligation to take the needs of JPMorgan Chase & Co. or the owners of the notes into consideration in determining, composing or calculating the S&P MidCap 400® Index. Neither S&P nor its third party licensors is responsible for and has not participated in the determination of the prices and amount of the notes or the timing of the issuance or sale of the notes or in the determination or calculation of the equation by which the notes are to be converted into cash. S&P has no obligation or liability in connection with the administration, marketing or trading of the notes.

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## THE S&P SELECT INDUSTRY INDICES

We have derived all information contained in this underlying supplement regarding the S&P® Homebuilders Select Industry™ Index and the S&P® Metals & Mining Select Industry™ Index (each, a “Select Industry Index” and collectively, the “Select Industry Indices”), including, without limitation, their make-up, method of calculation and changes in their components, from publicly available information. Such information reflects the policies of, and is subject to change by, Standard & Poor’s Financial Services LLC (“S&P”). We have not independently verified such information. We make no representation or warranty as to the accuracy or completeness of such information. S&P has no obligation to continue to calculate and publish, and may discontinue calculation and publication of the Select Industry Indices.

On November 4, 2011, The McGraw-Hill Companies, Inc. (“McGraw-Hill”), the owner of the S&P Indices business, and CME Group Inc. (“CME Group”), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices. The ownership of the Select Industry Indices may change as a result. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

Additional information concerning the Select Industry Indices may be obtained at the S&P website ([www.indices.standardandpoors.com](http://www.indices.standardandpoors.com)). Information contained in the S&P website is not incorporated by reference in, and should not be considered part of, this underlying supplement.

### **The S&P Total Market Index**

The S&P Total Market Index (the “S&P TM Index”) offers broad market exposure to companies of all market capitalization, including all common equities listed on the New York Stock Exchange (including NYSE Arca), the NYSE Amex, the NASDAQ Global Select Market, the NASDAQ Select Market and the NASDAQ Capital Market. Only U.S. companies are eligible for inclusion in the S&P TM Index.

### **The S&P® Homebuilders Select Industry™ Index**

The S&P® Homebuilders Select Industry™ Index is an equal-weighted index that is designed to measure the performance of the homebuilders sub-industry portion of the S&P TM Index, a benchmark that measures the performance of the U.S. equity market. The S&P® Homebuilders Select Industry™ Index includes companies in the following sub-industries: homebuilding, building products, home furnishings, home improvement retail, homefurnishing retail and household appliances. Each of the component stocks in the S&P® Homebuilders Select Industry™ Index is a constituent company within the homebuilding sub-industry of the S&P TM Index. The S&P® Homebuilders Select Industry™ Index is reported by Bloomberg L.P. under the ticker symbol “SPSIHO.”

### **The S&P® Metals & Mining Select Industry™ Index**

The S&P® Metals & Mining Select Industry™ Index is an equal-weighted index that is designed to measure the performance of the Metals & Mining sub-industry portion of the S&P TM Index, a benchmark that measures the performance of the U.S. equity market. The S&P® Metals & Mining Select Industry™ Index includes companies in the following sub-industries: aluminum, coal & consumable fuels, diversified metals & mining, gold, precious metals & minerals and steel. Each of the component stocks in the S&P® Metals & Mining Select Industry™ Index is a constituent company within the metals and mining sub-industry of the S&P TM Index. The S&P® Metals & Mining Select Industry™ Index is reported by Bloomberg L.P. under the ticker symbol “SPSIMM.”



## Index Eligibility

For purposes of membership in the a Select Industry Index, S&P applies the inclusion and exclusion criteria separately. Membership is based on a company's GICS classification, as well as liquidity and market cap requirements.

### Index Inclusion Criteria

To be eligible for inclusion in a Select Industry Index, companies must be in the S&P TM Index, must be included in the relevant GICS sub-industry (*i.e.* homebuilding) and must satisfy one of the two following combined size and liquidity criteria:

1. float-adjusted market capitalization above US\$500 million and float-adjusted liquidity ratio ("FALR") above 90%; or
2. float-adjusted market capitalization above US\$400 million and float-adjusted liquidity ratio above 150%.

All companies satisfying the above requirements are included in a Select Industry Index. The total number of companies in each Select Industry Index should be at least 35. If there are fewer than 35 stocks in a Select Industry Index, stocks from a supplementary list of highly correlated sub-industries, that meet the market capitalization and liquidity thresholds above, are included in order of their float-adjusted market capitalization to reach 35 constituents. Minimum market capitalization requirements may be relaxed to ensure there are at least 22 companies in each Select Industry Index as of each rebalancing effective date.

### Index Exclusion Criteria

Existing index constituents are removed at the quarterly rebalancing effective date if either their float-adjusted market capitalization falls below US\$300 million or their FALR falls below 50%.

### Eligibility Factors

*Market Capitalization.* Float-adjusted market capitalization should be at least US\$400 million for inclusion in a Select Industry Index. Existing index components must have a float-adjusted market capitalization of US\$300 million to remain in the applicable Select Industry Index at each rebalancing.

*Liquidity.* The liquidity measurement used is a liquidity ratio, defined as dollar value traded over the previous 12-months divided by the float-adjusted market capitalization as of the applicable Select Industry Index rebalancing reference date.

Stocks having a float-adjusted market capitalization above US\$500 million must have a liquidity ratio greater than 90% to be eligible for addition to a Select Industry Index. Stocks having a float-adjusted market capitalization between US\$400 and US\$500 million must have a liquidity ratio greater than 150% to be eligible for addition to a Select Industry Index. Existing index constituents must have a liquidity ratio greater than 50% to remain in the applicable Select Industry Index at the quarterly rebalancing. The length of time to evaluate liquidity is reduced to the available trading period for IPOs or spin-offs that do not have 12 months of trading history.

*Domicile.* U.S. companies only.

*Takeover Restrictions.* At the discretion of S&P, constituents with shareholder ownership restrictions defined in company Bylaws may be deemed ineligible for inclusion in a Select Industry Index. Ownership restrictions preventing entities from replicating the index weight of a company may be excluded from the eligible universe or removed from the applicable Select Industry Index.

*Turnover.* S&P believes turnover in index membership should be avoided when possible. At times a company may appear to temporarily violate one or more of the addition criteria. However, the addition criteria are for addition to a Select Industry Index, not for continued membership. As a result, an index constituent that appears to violate criteria for addition to a Select Industry Index will not be deleted unless ongoing conditions warrant a change in the composition of the applicable Select Industry Index.

*Sector Classification.* A Select Industry Indices includes companies in the applicable GICS sub-industries set forth above.

## Index Construction and Calculations

The Select Industry Indices are equal-weighted, with adjustments to constituent weights to ensure concentration and liquidity requirements, and calculated by the divisor methodology.

The initial divisor is set to have a base index value of 1000 on December 17, 1999. The index value is simply the index market value divided by the index divisor:

$$\text{Index Value} = (\text{Index Market Value}) / \text{Divisor}$$

$$\text{Index Market Value} = \sum_{i=1}^N P_i \times \text{Shares}_i \times \text{IWF}_i \times \text{AWF}_i$$

where N is the number of stocks in the index,  $P_i$  the price of stock,  $\text{IWF}_i$  is the float factor of stock, and  $\text{AWF}_i$  is the adjustment factor of stock  $i$  assigned at each index rebalancing date,  $t$ , which makes all index constituents modified market capitalization equal (and, therefore, equal weight), while maintaining the total market value of the overall index. The AWF for each index constituent,  $i$ , at rebalancing date,  $t$ , is calculated by:

$$\text{AWF}_{i,t} = Z / N \times \text{FloatAdjustedMarketValue}_{i,t}$$

where Z is an index specific constant set for the purpose of deriving the AWF and, therefore, each stock's share count used in the index calculation (often referred to as modified index shares).

In order to maintain index series continuity, it is also necessary to adjust the divisor at each rebalancing.

$$(\text{Index Value})_{\text{before rebalance}} = (\text{Index Value})_{\text{after rebalance}}$$

Therefore,

$$(\text{Divisor})_{\text{after rebalance}} = (\text{Index Market Value})_{\text{after rebalance}} / (\text{Index Value})_{\text{before rebalance}}$$

## Constituent Weightings

At each quarterly rebalancing, stocks are initially equally-weighted using closing prices as of the second Friday of the last month of quarter as the reference price. Adjustments are then made to ensure that there are no stocks whose weight in the applicable Select Industry Index is more than can be traded in a single day for a US\$ 500 million portfolio.

S&P calculates a maximum basket liquidity weight for each stock in the applicable Select Industry Index using the ratio of its three-month average daily value traded to US\$ 500 million. Each stock's weight in the applicable Select Industry Index is, then, compared to its maximum basket liquidity weight and is set to the lesser of its maximum basket liquidity weight or its initial equal weight. All excess weight is redistributed across the applicable Select Industry Index to the

uncapped stocks. If necessary, a final adjustment is made to ensure that no stock in the applicable Select Industry Index has a weight greater than 4.5%. This step of the iterative weighting process may force the weight of those stocks limited to their maximum basket liquidity weight to exceed that weight. In such cases, S&P will make no further adjustments.

## Index Maintenance

The membership to the Select Industry Indices is reviewed quarterly. Rebalancings occur after the closing on the third Friday of the quarter ending month. The reference date for additions and deletions is after the closing of the last trading date of the previous month. Closing prices as of the second Friday of the last month of the quarter are used for setting index weights.

## Timing of Changes

*Additions.* Companies are added between rebalancings only if a deletion in the applicable Select Industry Index causes the stock count to fall below 22. In those cases, each stock deletion is accompanied with a stock addition. The new company will be added to the applicable Select Industry Index at the weight of the deleted constituent. In the case of mergers involving at least one index constituent, the merged company will remain in the applicable Select Industry Index if it meets all of the eligibility requirements. The merged company will be added to the applicable Select Industry Index at the weight of the pre-merger index constituent. If both companies involved in a merger are index constituents, the merged company will be added at the weight of the company deemed the acquirer in the transaction. In the case of spin-offs, the applicable Select Industry Index will follow the S&P TM Index's treatment of the action. If the S&P TM Index treats the pre- and post-spin company as a deletion/addition action, using the stock's when-issued price, the applicable Select Industry Index will treat the spin-off this way as well.

*Deletions.* A company is deleted from the applicable Select Industry Index if the S&P TM Index drops the constituent. If a constituent deletion causes the number of companies in the relevant index to fall below 22, each stock deletion is accompanied with a stock addition. In case of GICS changes, where a company does not belong to a qualifying sub-industry after the classification change, it is removed from the applicable Select Industry Index at the next rebalancing.

## Adjustments

The tables below summarize the types of index maintenance adjustments and indicate whether or not an index adjustment is required.

### *S&P TM Index Actions*

| <u>S&amp;P TM Index Action</u> | <u>Adjustment Made to a Select Industry Index</u>                         | <u>Divisor Adjustment</u> |
|--------------------------------|---|---------------------------|
| Constituent deletion           | If the constituent is a member of a Select Industry Index, it is dropped. | Yes                       |

| <b>S&amp;P TM Index Action</b>                    | <b>Adjustment Made to a Select Industry Index</b>  | <b>Divisor Adjustment</b>                          |
|---|--|--|
| Constituent addition                              | Only in cases where the deletion causes the component count to fall below 22 stocks, then the deletion is accompanied by an addition assuming the weight of the dropped stock.<br><br>When a stock is removed from a Select Industry Index at a price of \$0.00, the stock's replacement will be added to the applicable Select Industry Index at the weight using the previous day's closing value, or the most immediate prior business day that the deleted stock was not valued at \$0.00. | No, except in the case of stocks removed at \$0.00 |
| Share changes between quarterly share adjustments | None   | No   |
| Quarterly share changes                           | There is no direct adjustment, however, on the same date the index rebalancing will take place.  | Only because of the index rebalancing              |
| GICS change                                       | None. If, after the GICS change, a company no longer qualifies to belong to a Select Industry Index, it is removed at the next rebalancing.  | No   |

*Corporate Actions*

| <b>Type of Corporate Action</b>   | <b>Adjustment Made to a Select Industry Index</b>  | <b>Divisor Adjustment</b> |
|---|--|---------------------------|
| Spin-off  | In general, both the parent company and spin-off companies will remain in the applicable Select Industry Index until the next index rebalancing, regardless of whether they conform to the theme of the applicable Select Industry Index. When there is no market-determined price available for the spin, the spin is added to the applicable Select Industry Index at zero price at the close of the day before the ex-date. | No                        |
| Rights Offering   | The price is adjusted to the price of the parent company minus (the price of the rights subscription/rights ratio). The index shares change so that the company's weight remains the same as its weight before the spin-off.   | No                        |
| Stock Dividend, Stock Split or Reverse Stock Split                        | The index shares are multiplied by and price is divided by the split factor.   | No                        |
| Share Issuance or Share Repurchase, Equity Offering or Warrant Conversion | None   | No                        |
| Special Dividends   | Price of the stock making the special dividend payment is reduced by the per share special dividend amount after the close of trading on the day before the dividend ex-date.  | Yes                       |

## **THE SELECT SECTOR INDICES**

We have derived all information contained in this underlying supplement regarding the Financial Select Sector Index and the Technology Select Sector Index (each, a "Select Sector Index" and collectively, the "Select Sector Indices"), including, without limitation, their make up, method of calculation and changes in their components, from publicly available information. Such information reflects the policies of, and is subject to change by, Standard & Poor's Financial Services LLC ("S&P") or the Merrill, Lynch Pierce Fenner & Smith, Inc., as index compilation agent (the "Index Compilation Agent"). We make no representation or warranty as to the accuracy or completeness of such information. For further information about the S&P 500® Index, please see "— The S&P 500® Index" above.

On November 4, 2011, The McGraw-Hill Companies, Inc. ("McGraw-Hill"), the owner of the S&P Indices business, and CME Group Inc. ("CME Group"), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices. The ownership of the Select Sector Indices may change as a result. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

The stocks included in the Select Sector Indices are selected by the Index Compilation Agent in consultation with S&P from the universe of companies represented by the S&P 500® Index. The composition and weighting of the stocks included in the Select Sector Indices will likely differ from the composition and weighting of stocks included in any similar S&P 500® sector index that is published and disseminated by S&P. S&P acts as the index calculation agent in connection with the calculation and dissemination of the Select Sector Indices. S&P's only relationship to the Index Compilation Agent is the licensing of certain trademarks and trade names of S&P and of the S&P 500® Index which is determined, composed and calculated by S&P without regard to the Index Compilation Agent.

### **The Financial Select Sector Index**

The Financial Select Sector Index is a modified market capitalization-based index, intended to provide an indication of the pattern of common stock price movements of companies that are components of the S&P 500® Index and are involved in the development or production of financial products. Companies in the Financial Select Sector Index include a wide array of diversified financial services firms whose business lines range from investment management to commercial and business banking. The Financial Select Sector Index is one of the nine Select Sector sub-indices of the S&P 500® Index, each of which we refer to as a "Select Sector Index."

As of November 8, 2011, the Financial Select Sector Index had a 13.86% weighting in the S&P 500® Index based on the market capitalization of the constituent stocks.

### **The Technology Select Sector Index**

The Technology Select Sector Index is a modified market capitalization-based index, intended to provide an indication of the pattern of common stock price movements of companies that are components of the S&P 500® Index and are involved in the development or production of technology products, which include products developed by defense manufacturers, telecommunications equipment, microcomputer components, integrated computer circuits and process monitoring systems. The Technology Select Sector Index is one of the nine Select Sector sub-indices of the S&P 500® Index, each of which we refer to as a "Select Sector Index."

As of November 8, 2011, the Technology Select Sector Index had a 22.71% weighting in the S&P 500® Index based on the market capitalization of the constituent stocks.

## Construction and Maintenance

The Select Sector Indices are developed and maintained in accordance with the following criteria:

- Each of the component stocks in the Select Sector Indices (the “Component Stocks”) is a constituent company of the S&P 500® Index.
- Each stock in the S&P 500® Index is allocated to one and only one of the Select Sector Indices.
- The Index Compilation Agent assigns each constituent stock of the S&P 500® Index to a Select Sector Index. The Index Compilation Agent, after consultation with S&P, assigns a particular company’s stock to the a Select Sector Index on the basis of such company’s sales and earnings composition and the sensitivity of the company’s stock price and business results to the common factors that affect other companies in that Select Sector Index. S&P has sole control over the removal of stocks from the S&P 500® Index and the selection of replacement stocks to be added to the S&P 500® Index. However, S&P will play only a consulting role in the assignment of the S&P 500® Index constituent stocks to the Select Sector Indices, that assignment being the sole responsibility of the Index Compilation Agent.
- The Select Sector Indices are calculated by S&P using a modified “market capitalization” methodology. This design ensures that each of the Component Stocks within a Select Sector Index is represented in a proportion consistent with its percentage with respect to the total market capitalization of that Select Sector Index. Under certain conditions, however, the number of shares of a Component Stock within a Select Sector Index may be adjusted to conform to Internal Revenue Code requirements.
- The Select Sector Indices are calculated using the same methodology utilized by S&P in calculating the S&P 500® Index, using a base-weighted aggregate methodology. See “— The S&P 500® Index” above. The daily calculation of a Select Sector Index is computed by dividing the total market value of the companies in that Select Sector Index by a number called the index divisor.

The Index Compilation Agent at any time may determine that a Component Stock which has been assigned to one Select Sector Index has undergone such a transformation in the composition of its business that it should be removed from that Select Sector Index and assigned to a different Select Sector Index. In the event that the Index Compilation Agent notifies the S&P that a Component Stock’s Select Sector Index assignment should be changed, the S&P will disseminate notice of the change following its standard procedure for announcing index changes and will implement the change in the affected Select Sector Indices on a date no less than one week after the initial dissemination of information on the sector change to the maximum extent practicable. It is not anticipated that Component Stocks will change sectors frequently.

Component Stocks removed from and added to the S&P 500® Index will be deleted from and added to the appropriate Select Sector Index on the same schedule used by S&P for additions and deletions from the S&P 500® Index insofar as practicable.

## THE TOPIX® INDEX

We have derived all information contained in this underlying supplement regarding the Tokyo Stock Price Index, or the TOPIX® Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information, including the websites of the TSE and other sources we believe to be reliable. Such information reflects the policies of, and is subject to change by, the TSE. The TOPIX® Index was developed by the TSE and is calculated, maintained and published by the TSE. We make no representation or warranty as to the accuracy or completeness of such information.

The TOPIX® Index is reported by Bloomberg L.P. under the ticker symbol "TPX."

The TOPIX® Index was developed by the TSE. Publication of the TOPIX® Index began on July 1, 1969, based on an initial Index value of 100 at January 4, 1968, which was reset at 1,000 on April 1, 1998. The TOPIX® Index is computed and published every second via TSE's Market Information System, and is reported to securities companies across Japan and available worldwide through computerized information networks.

The component stocks of the TOPIX® Index consist of all Japanese common stocks listed on the First Section of the TSE which have an accumulative length of listing of at least six months. The TOPIX® Index measures changes in the aggregate market value of these stocks. The TSE Japanese stock market is divided into two sections: the First Section and the Second Section. Listings of stocks on the TSE are divided between these two sections, with stocks listed on the First Section typically being limited to larger, longer established and more actively traded issues and the Second Section to smaller and newly listed companies. The component stocks of the TOPIX® Index are determined based on market capitalization and liquidity. Review and selection of component stocks is conducted semiannually, based on market data as of the base date for selection.

The TOPIX® Index is a weighted index, with the market price of each component stock multiplied by the number of shares listed. The TSE is responsible for calculating and maintaining the TOPIX® Index, and can add, delete or substitute the stocks underlying the TOPIX® Index or make other methodological changes that could change the value of the TOPIX® Index. The underlying stocks may be removed, if necessary, in accordance with deletion/addition rules which provide generally for the deletion of a stock from the TOPIX® Index if such stock ceases to meet the criteria for inclusion. Stocks listed on the Second Section of the TSE may be transferred to the First Section if they satisfy applicable criteria. Such criteria include numerical minimum values for number of shares listed, number of shareholders and average monthly trading volume, among others. Similarly, when a First Section stock falls within the coverage of TSE rules prescribing reassignment thereof to the Second Section, such stock will be removed from the First Section. As of October 27, 2011, stocks of 1,674 Japanese companies were assigned to the First Section of the TSE and stocks of 431 companies were assigned to the Second Section.

The TOPIX® Index is not expressed in Japanese Yen, but is presented in terms of points (as a decimal figure) rounded off to the nearest one-hundredth. The TOPIX® Index is calculated by multiplying 100 by the figure obtained by dividing the current free-float adjusted market value (the current market price per share at the time of the index calculation multiplied by the number of free-float adjusted common shares listed on the First Section of the TSE at the same instance) (the "Current Market Value") by the base market value (*i.e.*, the Current Market Value on the base date) (the "Base Market Value").

The calculation of the TOPIX® Index can be represented by the following formula:

$$\text{Index} = \frac{\text{Current Market Value}}{\text{Base Market Value}} \times 100$$

In order to maintain continuity, the Base Market Value is adjusted from time to time to ensure that it reflects only price movements resulting from auction market activity, and to eliminate the effects of other factors and prevent any instantaneous change or discontinuity in the level of the TOPIX® Index. Such factors include, without limitation: new listings, delistings, new share issues either through public offerings or through rights offerings to shareholders, issuance of shares as a consequence of exercise of convertible bonds or warrants, and transfer of listed securities from the First Section to the Second Section of the TSE.

The formula for the adjustment is as follows:

$$\frac{\text{Adjusted Market Value on Adjustment Date}}{\text{Base Market Value before adjustment}} = \frac{(\text{Adjusted Market Value on Adjustment Date} \pm \text{Adjustment Amount})}{\text{Base Market Value after adjustment}}$$

Where Adjustment Amount is equal to the changes in the number of shares included in the calculation of the TOPIX® Index *multiplied* by the price of those shares used for the purposes of the adjustment.

Therefore,

$$\text{New Base Market Value} = \frac{\text{Old Base Market Value} \times (\text{Adjusted Market Value on Adjustment Date} \pm \text{Adjustment Amount})}{\text{Adjusted Market Value on Adjustment Date}}$$

The Base Market Value remains at the new value until a further adjustment is necessary as a result of another change. As a result of such change affecting the Current Market Value or any stock underlying the TOPIX® Index, the Base Market Value is adjusted in such a way that the new value of the TOPIX® Index will equal the level of the TOPIX® Index immediately prior to such change.

No adjustment is made to the Base Market Value, however, in the case of events such as stock splits or decreases in capital without compensation, which theoretically do not affect market value.

### License Agreement with the TSE

We have entered into a non-exclusive license agreement with the TSE providing for the license to J.P. Morgan Securities LLC and certain of our affiliated or subsidiary companies, in exchange for a fee, of the right to use the TOPIX® Index, which is owned and published by the TSE, in connection with the notes.

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### **The Tokyo Stock Exchange**

The TSE is one of the world’s largest securities exchanges in terms of market capitalization. Trading hours are currently from 9:00 a.m. to 11:00 a.m. and from 12:30 p.m. to 3:00 p.m., Tokyo time, Monday through Friday.

Due to the time zone difference, on any normal trading day the TSE will close prior to the opening of business in New York City on the same calendar day. Therefore, the closing level of the TOPIX® Index on a trading day will generally be available in the United States by the opening of business on the same calendar day.

The TSE has adopted certain measures, including daily price floors and ceilings on individual stocks, intended to prevent any extreme short-term price fluctuations resulting from order imbalances. In general, any stock listed on the TSE cannot be traded at a price lower than the applicable price floor or higher than the applicable price ceiling. These price floors and ceilings are expressed in absolute Japanese yen, rather than percentage limits based on the closing price of the stock on the previous trading day. In addition, when there is a major order imbalance in a listed stock, the TSE posts a “special bid quote” or a “special asked quote” for that stock at a specified higher or lower price level than the stock’s last sale price in order to solicit counter-orders and balance supply and demand for the stock. Prospective investors should also be aware that the TSE may suspend the trading of individual stocks in certain limited and extraordinary circumstances, including, for example, unusual trading activity in that stock. As a result, changes in the TOPIX® Index may be limited by price limitations or special quotes, or by suspension of trading, on individual stocks that make up the TOPIX® Index, and these limitations, in turn, may adversely affect the value of the notes.

## COMMODITY INDEX DESCRIPTIONS

### THE DOW JONES-UBS COMMODITY INDICES

#### General

We have derived all information contained in this underlying supplement regarding the Dow Jones-UBS Commodity Index<sup>SM</sup>, its single-commodity sub-indices or the forward-month version of Dow Jones-UBS Commodity Index<sup>SM</sup> or its single-commodity sub-indices (each a “DJ-UBS Commodity Index” and collectively, the “DJ-UBS Commodity Indices”), including, without limitation, their make-up, methods of calculation and changes in their components from (i) publicly available sources and (ii) a summary of the Dow Jones-UBS Commodity Index<sup>SM</sup> Handbook (a document that is considered proprietary to UBS Securities LLC (“UBS”) and CME Group Index Services LLC (“CME Indexes”) and is available to those persons who enter into a license agreement available at [www.djindexes.com/ubs/index.cfm?go=handbook](http://www.djindexes.com/ubs/index.cfm?go=handbook)). Such information reflects the policies of, and is subject to change by, UBS and CME Indexes. We have not independently verified this information. You, as an investor in the notes, should make your own investigation into the DJ-UBS Commodity Indices, UBS and CME Indexes. UBS and CME Indexes are not involved in the offer of the notes in any way and have no obligation to consider your interests as a holder of the notes. UBS and CME Indexes have no obligation to continue to publish the DJ-UBS Commodity Indices, and may discontinue publication of the DJ-UBS Commodity Indices at any time in their sole discretion. Information contained in the Dow Jones website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

In May 2009, UBS completed its acquisition of the commodity index business of AIG Financial Products Corp. (“AIG-FP”), including AIG-FP’s rights to the Dow Jones — AIG Commodity Index<sup>SM</sup>, its single-commodity sub-indices and the forward-month versions of Dow Jones — AIG Commodity Index<sup>SM</sup> and its single-commodity sub-indices. The Dow Jones — AIG Commodity Index<sup>SM</sup> was rebranded as “Dow Jones-UBS Commodity Index<sup>SM</sup>” and the related indices were similarly rebranded. In addition, UBS and Dow Jones & Company, Inc. (“Dow Jones”) entered into an agreement to jointly market the DJ-UBS Commodity Indices. Dow Jones subsequently assigned all its interest in the joint marketing agreement to CME Indexes.

On November 4, 2011, The McGraw-Hill Companies, Inc. (“McGraw-Hill”), the owner of the S&P Indices business, and CME Group Inc. (“CME Group”), the 90% owner of CME Indices, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business. The ownership of the DJ-UBS Commodity Indices may change as a result. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

#### Overview

The Dow Jones-UBS Commodity Index<sup>SM</sup> was introduced in July of 1998 to provide a unique, diversified, economically rational and liquid benchmark for commodities as an asset class. The Dow Jones-UBS Commodity Index<sup>SM</sup> currently is composed of the prices of nineteen exchange-traded futures contracts on physical commodities. A futures contract is a bilateral agreement providing for the purchase and sale of a specified type and quantity of a commodity or financial instrument during a stated delivery month for a fixed price. For a general description of the commodity futures markets, please see “— The Commodity Futures Markets” below. The commodities included in the Dow Jones-UBS Commodity Index<sup>SM</sup> for 2011 and 2012 are as follows: aluminum, coffee, copper, corn, cotton, crude oil, unleaded gasoline, gold, heating oil, lean hogs, live cattle, natural gas, nickel, silver, soybean oil, soybeans, sugar, wheat and zinc. Futures contracts and options on futures contracts on the Dow Jones-UBS Commodity Index<sup>SM</sup> are currently listed for trading on the Chicago Board of Trade (“CBOT”), New York Board of Trade (“NYBOT”), Commodities Exchange division of the New York Mercantile Exchange (“COMEX”), New York Mercantile Exchange (“NYMEX”), London Metals Exchange (“LME”) and ICE Futures Europe.

The Dow Jones-UBS Commodity Index<sup>SM</sup> is a proprietary index that AIG International, Inc. developed and that UBS and CME calculate. The methodology for determining the composition and weighting of the Dow Jones-UBS Commodity Index<sup>SM</sup> and for calculating its value is subject to modification by UBS and CME Indexes at any time.

The Dow Jones-UBS Commodity Index<sup>SM</sup> is composed of exchange-traded futures contracts on physical commodities and is designed to be a highly liquid and diversified benchmark for commodities as an asset class. Its component weightings are determined primarily based on liquidity data, which is the relative amount of trading activity of a particular commodity. The Dow Jones-UBS Commodity Index<sup>SM</sup> is published by Bloomberg L.P. under the ticker symbols "DJUBS" for the excess return version and "DJUBSTR" for the total return version.

The single-commodity sub-indices of the Dow Jones-UBS Commodity Index<sup>SM</sup> follow the methodology of the Dow Jones-UBS Commodity Index<sup>SM</sup>, except that the calculation of each single-commodity sub-index utilizes the prices of the relevant futures contracts (listed under "— Designated Contracts for Each Commodity") and the relevant Commodity Index Multiplier (determined as described under "— Commodity Index Multipliers"). The single-commodity sub-indices of the Dow Jones-UBS Commodity Index<sup>SM</sup> are published by Bloomberg L.P. If the notes are linked in whole or in part to a single-commodity sub-index of the Dow Jones-UBS Commodity Index<sup>SM</sup>, the ticker symbol will be provided in the relevant terms supplement.

UBS and CME Indexes also publish forward-month versions of the Dow Jones-UBS Commodity Index<sup>SM</sup> and its single-commodity sub-indices that trades longer-dated commodity futures contracts. The Dow Jones-UBS Commodity Index 3 Month Forward<sup>SM</sup> follows the methodology of the Dow Jones-UBS Commodity Index<sup>SM</sup>, except that the futures contracts used for calculating the Dow Jones-UBS Commodity Index 3 Month Forward<sup>SM</sup> are advanced, as compared to the Dow Jones-UBS Commodity Index<sup>SM</sup>, such that the delivery months for the reference contracts are later than those of the corresponding reference contracts used for the Dow Jones-UBS Commodity Index<sup>SM</sup>. The Dow Jones-UBS Commodity Index 3 Month Forward<sup>SM</sup> is published by Bloomberg L.P. under the ticker symbols "DJUBSF3" for the excess return version and "DJUBSF3T" for the total return version.

The forward-month single-commodity sub-indices of the Dow Jones-UBS Commodity Index<sup>SM</sup> follow the methodology of the Dow Jones-UBS Commodity Index<sup>SM</sup>, except that the calculation of each forward-month single-commodity sub-index utilizes the prices of the relevant futures contracts (as listed under "— Designated Contracts for Each Commodity") and the relevant Commodity Index Multiplier (determined as described under "— Commodity Index Multipliers"). In addition, the futures contracts used for calculating the forward-month single-commodity sub-indices are advanced, as compared to the futures contracts included in the Dow Jones-UBS Commodity Index<sup>SM</sup>, such that the delivery months for the reference contracts are later than those of the corresponding reference contracts used for the single-commodity sub-indices. The forward-month single-commodity sub-indices of the Dow Jones-UBS Commodity Index<sup>SM</sup> are published by Bloomberg L.P. If the notes are linked in whole or in part to includes a forward-month single-commodity sub-index of the Dow Jones-UBS Commodity Index<sup>SM</sup>, the ticker symbol will be provided in the relevant terms supplement.

UBS and CME Indexes publish both a total return version and excess return version of each of the DJ-UBS Commodity Indices. The total return version of each DJ-UBS Commodity Index reflects the returns on a fully collateralized investment in the excess return version of such DJ-UBS Commodity Index. Accordingly, the total return version of each DJ-UBS Commodity Index combines the returns of the relevant excess return version with returns on cash collateral invested in Treasury Bills. The cash collateral returns are calculated using the most recent weekly auction high rate for 3 Month U.S. Treasury Bills, as reported on the website [www.publicdebt.treas.gov/AI/OFBills](http://www.publicdebt.treas.gov/AI/OFBills) under the column heading "Discount Rate %," published by the Bureau of the Public Debt of the U.S. Treasury (or any successor source). Information contained in the Bureau of the Public Debt of the U.S. Treasury website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement. Weekly auction high rates are generally published once each week on Monday. The notes may be linked to the excess return or the total return version of the DJ-UBS Commodity Indices.

UBS and its affiliates actively trade futures contracts and options on futures contracts on the commodities that underlie the Dow Jones-UBS Commodity Index<sup>SM</sup>, as well as commodities, including commodities included in the Dow Jones-UBS Commodity Index<sup>SM</sup>. For information about how this trading may affect the value of the DJ-UBS Commodity Indices, see “Risk Factors — For notes linked to a DJ-UBS Commodity Index, trading and other transactions by UBS and its affiliates in the futures contracts constituting the DJ-UBS Commodity Indices and the underlying commodities may affect the level of the DJ-UBS Commodity Indices.”

### **The Dow Jones-UBS Commodity Index Supervisory and Advisory Committees**

UBS and CME Indexes have established the Dow Jones-UBS Commodity Index Supervisory Committee (the “Supervisory Committee”) and the Dow Jones-UBS Commodity Index Advisory Committee (the “Advisory Committee”) to assist them in connection with the operation of the Dow Jones-UBS Commodity Index<sup>SM</sup>. The Supervisory Committee is comprised of three members, two of whom are appointed by UBS and one of whom is appointed by CME Indexes, and makes all final decisions related to the Dow Jones-UBS Commodity Index<sup>SM</sup>, with advice and recommendations from the Advisory Committee. The Advisory Committee includes six to twelve members drawn from the financial and academic communities. Both the Supervisory and Advisory Committees meet annually to consider any changes to be made to the Dow Jones-UBS Commodity Index<sup>SM</sup> for the coming year. These committees may also meet at such other times as may be necessary.

### **Four Main Principles Guiding the Creation of the Dow Jones-UBS Commodity Index<sup>SM</sup>**

The Dow Jones-UBS Commodity Index<sup>SM</sup> was created using the following four main principles:

- **ECONOMIC SIGNIFICANCE.** A commodity index should fairly represent the importance of a diversified group of commodities to the world economy. To achieve a fair representation, the Dow Jones-UBS Commodity Index<sup>SM</sup> uses both liquidity data and dollar-weighted production data in determining the relative quantities of included commodities. The Dow Jones-UBS Commodity Index<sup>SM</sup> primarily relies on liquidity data, or the relative amount of trading activity of a particular commodity, as an important indicator of the value placed on that commodity by financial and physical market participants. The Dow Jones-UBS Commodity Index<sup>SM</sup> also relies on production data as a useful measure of the importance of a commodity to the world economy. Production data alone, however, may underestimate the economic significance of storable commodities (*e.g.*, gold) relative to non-storable commodities (*e.g.*, live cattle). Production data alone also may underestimate the investment value that financial market participants place on certain commodities, and/or the amount of commercial activity that is centered around various commodities. Accordingly, production statistics alone do not necessarily provide as accurate a blueprint of economic importance as the markets themselves. The Dow Jones-UBS Commodity Index<sup>SM</sup> thus relies on data that is both endogenous to the futures market (liquidity) and exogenous to the futures market (production) in determining relative weightings.
- **DIVERSIFICATION.** A second major goal of the Dow Jones-UBS Commodity Index<sup>SM</sup> is to provide diversified exposure to commodities as an asset class. Disproportionate weighting of any particular commodity or sector increases volatility and negates the concept of a broad-based commodity index. Instead of diversified commodities exposure, the investor is unduly subjected to micro-economic shocks in one commodity or sector. As described further below, diversification rules have been established and are applied annually. Additionally, the Dow Jones-UBS Commodity Index<sup>SM</sup> is re-balanced annually on a price-percentage basis in order to maintain diversified commodities exposure over time.

- **CONTINUITY.** The third goal of the Dow Jones-UBS Commodity Index<sup>SM</sup> is to be responsive to the changing nature of commodity markets in a manner that does not completely reshape the character of the Dow Jones-UBS Commodity Index<sup>SM</sup> from year to year. The Dow Jones-UBS Commodity Index<sup>SM</sup> is intended to provide a stable benchmark so that end-users may be reasonably confident that historical performance data (including such diverse measures as correlation, spot yield, roll yield and volatility) is based on a structure that bears some resemblance to both the current and future composition of the Dow Jones-UBS Commodity Index<sup>SM</sup>.
- **LIQUIDITY.** Another goal of the Dow Jones-UBS Commodity Index<sup>SM</sup> is to provide a highly liquid index. The explicit inclusion of liquidity as a weighting factor helps to ensure that the Dow Jones-UBS Commodity Index<sup>SM</sup> can accommodate substantial investment flows. The liquidity of an index affects transaction costs associated with current investments. It also may affect the reliability of historical price performance data.

These four principles represent goals of the Dow Jones-UBS Commodity Index<sup>SM</sup> and its creators, and there can be no assurance that these goals will be reached by either UBS or CME Indexes.

### **Composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> — Commodities Available for Inclusion**

A number of commodities have been selected which are believed to be sufficiently significant to the world economy to merit consideration for inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup> and that are tradeable through a qualifying related futures contract. With the exception of several metals contracts (aluminum, lead, tin, nickel and zinc) that trade on the London Metal Exchange ("LME"), each of the potential commodities is the subject of a futures contract that trades on a U.S. exchange.

As of the date of this underlying supplement, the 23 commodities available for inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup> were aluminum, cocoa, coffee, copper, corn, cotton, crude oil, gold, heating oil, lead, lean hogs, live cattle, natural gas, nickel, platinum, silver, soybean oil, soybeans, sugar, tin, unleaded gasoline, wheat and zinc.

The 19 Dow Jones-UBS Commodities for 2011 and 2012 are as follows: aluminum, coffee, copper, corn, cotton, crude oil, gold, heating oil, lean hogs, live cattle, natural gas, nickel, silver, soybean oil, soybeans, sugar, unleaded gasoline, wheat and zinc.

### **Designated Contracts for Each Commodity**

A futures contract known as a Designated Contract is selected by UBS for each commodity available for inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup>. UBS may select more than one Designated Contract for certain commodities or may select Designated Contracts that are traded outside of the United States or in currencies other than the U.S. Dollar in light of the principles of Index design set out in "— Four Main Principles Guiding the Creation of the Dow Jones-UBS Commodity Index<sup>SM</sup>" above. Additionally, in the event that changes in regulations concerning position limits materially affect the ability of market participants to replicate the Dow Jones-UBS Commodity Index<sup>SM</sup> in the underlying futures markets, it may become appropriate to include multiple Designated Contracts for one or more commodities in order to enhance liquidity.

Historically, through and including the composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> for 2011, UBS has chosen as the Designated Contract for each Commodity one contract that is traded in North America and denominated in U.S. dollars (with the exception of several LME contracts). Beginning with the composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> for 2012, UBS has added the Brent crude contract listed below as an additional Designated Contract with respect to the crude oil component.

The termination or replacement of a futures contract on an established exchange occurs infrequently; if a Designated Contract were to be terminated or replaced, a comparable futures contract, if available, would be selected to replace that Designated Contract. The Supervisory Committee may, however, terminate, replace or otherwise change a Designated Contract, or make other changes to the Dow Jones-UBS Commodity Index<sup>SM</sup>, pursuant to special meetings. Please see "Risk Factors — S&P or UBS and CME Indexes may be required to replace a contract underlying a S&P GSCI Index or a DJ-UBS Commodity Index, if the existing futures contract is terminated or replaced."

The Designated Contracts for the 2012 Dow Jones-UBS Commodities are set forth below. The Designated Contracts for the 2011 Dow Jones-UBS Commodities are the same as the 2012 Dow Jones-UBS Commodities set forth below except that the weighting of the crude oil component will be determined by reference to the NYMEX contract for WTI (West Texas Intermediate) Crude Oil only.

**Dow Jones-UBS Commodity Index<sup>SM</sup> Breakdown by Commodity**

| Commodity   | Designated Contract                        | Exchange              | Units             | Price quote      |
|-------------|--|-----------------------|-------------------|------------------|
| Aluminum    | High Grade Primary Aluminum                | LME                   | 25 metric tons    | \$/metric ton    |
| Coffee      | Coffee "C"                                 | NYBOT*                | 37,500 lbs        | cents/<br>pound  |
| Copper**    | Copper                                     | COMEX***              | 25,000 lbs        | cents/<br>pound  |
| Corn        | Corn                                       | CBOT                  | 5,000 bushels     | cents/<br>bushel |
| Cotton      | Cotton                                     | NYBOT                 | 50,000 lbs        | cents/<br>pound  |
| Crude Oil   | WTI (West Texas Intermediate)<br>Crude Oil | NYMEX                 | 1,000 barrels     | \$/barrel        |
| Crude Oil   | Brent Crude Oil                            | ICE Futures<br>Europe | 1,000 barrels     | \$/barrel        |
| Gold        | Gold                                       | COMEX                 | 100 troy oz.      | \$/troy oz.      |
| Heating Oil | Heating Oil                                | NYMEX                 | 42,000<br>gallons | cents/<br>gallon |
| Live Cattle | Live Cattle                                | CME^                  | 40,000 lbs        | cents/<br>pound  |
| Lean Hogs   | Lean Hogs                                  | CME^                  | 40,000 lbs        | cents/<br>pound  |
| Natural Gas | Henry Hub Natural Gas                      | NYMEX                 | 10,000<br>mmbtu   | \$/mmbtu         |
| Nickel      | Primary Nickel                             | LME                   | 6 metric tons     | \$/metric ton    |
| Silver      | Silver                                     | COMEX                 | 5,000 troy oz.    | \$/troy oz.      |
| Soybeans    | Soybeans                                   | CBOT                  | 5,000 bushels     | cents/<br>bushel |
| Soybean Oil | Soybean Oil                                | CBOT                  | 60,000 lbs        | cents/<br>pound  |

| Commodity                | Designated Contract   | Exchange | Units          | Price quote      |
|--------------------------|---|----------|----------------|------------------|
| Sugar                    | World Sugar No. 11  | NYBOT    | 112,000 lbs    | cents/<br>pound  |
| Unleaded Gasoline (RBOB) | Reformulated Gasoline Blendstock for Oxygen Blending <sup>†</sup> | NYMEX    | 42,000 gal     | cents/gallon     |
| Wheat                    | Wheat   | CBOT     | 5,000 bushels  | cents/<br>bushel |
| Zinc                     | Special High Grade Zinc   | LME      | 25 metric tons | \$/metric ton    |

\* The New York Board of Trade ("NYBOT") located in New York City.

\*\* The Dow Jones-UBS Commodity Index<sup>SM</sup> uses the High Grade Copper Contract traded on the COMEX division of the New York Mercantile Exchange for copper contract prices and LME volume data in determining the weighting for the Dow Jones-UBS Commodity Index<sup>SM</sup>.

\*\*\* The New York Commodities Exchange ("COMEX") located in New York City.

^ The Chicago Mercantile Exchange ("CME") located in Chicago, Illinois.

† Represents a replacement of the New York Harbor Unleaded Gasoline contract. This replacement occurred during the regularly scheduled roll of futures contracts comprising the Dow Jones-UBS Commodity Index<sup>SM</sup> in April 2006.

In addition to the commodities set forth in the above table, cocoa, lead, platinum and tin also are considered annually for inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup>.

### Commodity Groups

For purposes of applying the diversification rules discussed above and below, the commodities available for inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup> are assigned to Commodity Groups. The Commodity Groups, and the commodities currently included in each Commodity Group, are as follows:

| Commodity Group:  | Commodities:  | Commodity Group: | Commodities:                             |
|-------------------|---|------------------|--|
| Energy            | Crude Oil<br>Heating Oil<br>Natural Gas<br>Unleaded Gasoline (RBOB) | Livestock        | Lean Hogs<br>Live Cattle                 |
| Precious Metals   | Gold<br>Silver<br>Platinum  | Grains           | Corn<br>Soybeans<br>Soybean Oil<br>Wheat |
| Industrial Metals | Aluminum<br>Copper<br>Lead<br>Nickel<br>Tin<br>Zinc                 | Softs            | Cocoa<br>Coffee<br>Cotton<br>Sugar       |

## Dow Jones-UBS Commodity Index<sup>SM</sup> Breakdown by Commodity Group

The Commodity Group Breakdown set forth below is based on the weightings and composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> set forth under "The Dow Jones-UBS Commodity Index<sup>SM</sup> 2012 Commodity Index Percentages" below.

|                   |        |
|-------------------|--------|
| Energy            | 32.63% |
| Precious Metals   | 12.56% |
| Industrial Metals | 18.64% |
| Livestock         | 5.75%  |
| Grains            | 22.09% |
| Softs             | 8.33%  |

The Commodity Group Breakdown set forth below is based on the weightings and composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> set forth under "The Dow Jones-UBS Commodity Index<sup>SM</sup> 2011 Commodity Index Percentages" below.

|                   |        |
|-------------------|--------|
| Energy            | 33.00% |
| Precious Metals   | 13.74% |
| Industrial Metals | 17.84% |
| Livestock         | 5.36%  |
| Grains            | 22.38% |
| Softs             | 7.68%  |

## Annual Reweightings and Rebalancings of The Dow Jones-UBS Commodity Index<sup>SM</sup>

The Dow Jones-UBS Commodity Index<sup>SM</sup> is reweighted and rebalanced each year in January on a price-percentage basis. The annual weightings for the Dow Jones-UBS Commodity Index<sup>SM</sup> are determined each year in the third or fourth quarter by UBS under the supervision of the Supervisory Committee following advice from the Advisory Committee and are published as promptly as practicable following the calculation. The annual weightings for the next calendar year are implemented the following January.

For example, the composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> for 2012 was approved by the Dow Jones-UBS Index Oversight Committee in October of 2010 and published on October 11, 2011. The January 2012 reweighting and rebalancing will be based on the following percentages:

### The Dow Jones-UBS Commodity Index<sup>SM</sup> 2012 Commodity Index Percentages

| Commodity        |           | Weighting  |
|------------------|-----------|------------|
| Crude Oil        |           | 15.000000% |
| WTI Crude Oil:   | 9.687164% |            |
| Brent Crude Oil: | 5.312836% |            |
| Natural Gas      |           | 10.765109% |
| Gold             |           | 9.793633%  |



| Commodity         | Weighting |
|-------------------|-----------|
| Soybeans          | 7.084197% |
| Copper            | 7.063949% |
| Corn              | 6.670520% |
| Aluminum          | 5.876747% |
| Wheat             | 4.961809% |
| Sugar             | 3.758390% |
| Live Cattle       | 3.634988% |
| Heating Oil       | 3.459529% |
| Unleaded Gasoline | 3.405982% |
| Soybean Oil       | 3.372386% |
| Zinc              | 3.118735% |
| Silver            | 2.769133% |
| Nickel            | 2.579840% |
| Coffee            | 2.572395% |
| Lean Hogs         | 2.112660% |
| Cotton            | 2.000000% |

In addition, the composition of the Dow Jones-UBS Commodity Index<sup>SM</sup> for 2011 was approved by the Dow Jones-UBS Index Oversight Committee in October of 2010 and published on October 29, 2010. The January 2011 reweighting and rebalancing was based on the following percentages:

**The Dow Jones-UBS Commodity Index<sup>SM</sup> 2011 Commodity Index Percentages**

| Commodity         | Weighting  |
|-------------------|------------|
| Crude Oil         | 14.709297% |
| Natural Gas       | 11.218962% |
| Gold              | 10.449067% |
| Soybeans          | 7.856815%  |
| Copper            | 7.539090%  |
| Corn              | 6.978537%  |
| Aluminum          | 5.203285%  |
| Wheat             | 4.605238%  |
| Heating Oil       | 3.575070%  |
| Unleaded Gasoline | 3.496671%  |
| Live Cattle       | 3.359133%  |
| Sugar             | 3.326014%  |

| Commodity   | Weighting |
|-------------|-----------|
| Silver      | 3.289633% |
| Soybean Oil | 2.937244% |
| Zinc        | 2.849355% |
| Coffee      | 2.355773% |
| Nickel      | 2.250815% |
| Lean Hogs   | 2.000000% |
| Cotton      | 2.000000% |

Information concerning the Dow Jones-UBS Commodity Index<sup>SM</sup>, including weightings and composition, may be obtained at the Dow Jones web site. Information contained in the Dow Jones web site is not incorporated by reference in, and should not be considered part of, this underlying supplement or any terms supplement.

### **Determination of Relative Weightings**

The relative weightings of the Dow Jones-UBS Commodities are determined annually according to both liquidity and dollar-adjusted production data in 2/3 and 1/3 shares, respectively. Each June, for each commodity designated for potential inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup>, liquidity is measured by the Commodity Liquidity Percentage ("CLP") and production by the Commodity Production Percentage ("CPP"). The CLP for each commodity is determined by taking a five-year average of the product of trading volume and the historical dollar value of the Designated Contract for that commodity, and dividing the result by the sum of such products for all commodities which were designated for potential inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup>. The CPP is determined for each commodity by taking a five-year average of annual world production figures, adjusted by the historical dollar value of the Designated Contract, and dividing the result by the sum of such production figures for all the commodities which were designated for potential inclusion in the Dow Jones-UBS Commodity Index<sup>SM</sup>. The CLP and the CPP are then combined (using a ratio of 2:1) to establish the Commodity Index Percentage ("CIP") for each commodity. This CIP is then adjusted in accordance with certain diversification rules in order to determine the commodities which will be included in the Dow Jones-UBS Commodity Index<sup>SM</sup> (the "Dow Jones-UBS Commodities") and their respective percentage weights.

### **Diversification Rules**

The Dow Jones-UBS Commodity Index<sup>SM</sup> is designed to provide diversified exposure to commodities as an asset class. To ensure that no single commodity or commodity sector dominates the Dow Jones-UBS Commodity Index<sup>SM</sup>, the following diversification rules are applied to the annual reweighting and rebalancing of the Dow Jones-UBS Commodity Index<sup>SM</sup> as of January of each year:

- No single commodity (*e.g.*, natural gas or silver) may constitute more than 15% of the Dow Jones-UBS Commodity Index<sup>SM</sup>.
- No single commodity, together with its derivatives (*e.g.*, crude oil, together with heating oil and unleaded gasoline), may constitute more than 25% of the Dow Jones-UBS Commodity Index<sup>SM</sup>.
- No related group of commodities designated as a "Commodity Group" (*e.g.*, energy, precious metals, livestock or grains) may constitute more than 33% of the Dow Jones-UBS Commodity Index<sup>SM</sup>.
- No single commodity included in the Dow Jones-UBS Commodity Index<sup>SM</sup> may constitute less than 2% of the Dow Jones-UBS Commodity Index<sup>SM</sup>.

Following the annual reweighting and rebalancing of the Dow Jones-UBS Commodity Index<sup>SM</sup> in January, the percentage of any commodity included in The Dow Jones-UBS Commodity Index<sup>SM</sup> (the "Index Commodity") or Commodity Group at any time prior to the next reweighting or rebalancing will fluctuate and may exceed or be less than the percentages established in January.

### Commodity Index Multipliers

Following application of the diversification rules discussed above, CIPs are incorporated into the Dow Jones-UBS Commodity Index<sup>SM</sup> by calculating the new unit weights for each Index Commodity. Near the beginning of each new calendar year, the CIPs, along with the settlement prices determined on that date for Designated Contracts included in the Dow Jones-UBS Commodity Index<sup>SM</sup>, are used to determine a Commodity Index Multiplier ("CIM") for each Index Commodity. This CIM is used to achieve the percentage weightings of the Dow Jones-UBS Commodities, in dollar terms, indicated by their respective CIPs. After the CIMs are calculated, they remain fixed throughout the year. As a result, the observed price percentage of each Index Commodity will float throughout the year, until the CIMs are reset the following year based on new CIPs.

### Calculations

The price return version of the Dow Jones-UBS Commodity Index<sup>SM</sup> is calculated by Dow Jones, in conjunction with UBS, by applying the impact of the changes to the futures prices of commodities included in the Dow Jones-UBS Commodity Index<sup>SM</sup> (based on their relative weightings). Once the CIMs are determined as discussed above, the calculation of the price return version of the Dow Jones-UBS Commodity Index<sup>SM</sup> is a mathematical process whereby the CIMs for the Dow Jones-UBS Commodities are multiplied by the prices in U.S. dollars for the applicable Designated Contracts. These products are then summed. The percentage change in this sum is then applied to the prior Dow Jones-UBS Commodity Index<sup>SM</sup> price return level to calculate the new Dow Jones-UBS Commodity Index<sup>SM</sup> price return level.

The total return version of the Dow Jones-UBS Commodity Index<sup>SM</sup> is calculated by Dow Jones, in conjunction with UBS, by applying the impact of the changes in the level of the price return version of the Dow Jones-UBS Commodity Index<sup>SM</sup> and adding interest that could be earned on funds committed to the trading of the underlying futures contracts. Once the level of the price return version of the Dow Jones-UBS Commodity Index<sup>SM</sup> is determined as discussed above, the daily return on a 3-month T-bill is added to the percentage change in the price return version of the Dow Jones-UBS Commodity Index<sup>SM</sup> (as compared with the prior Dow Jones-UBS Commodity Index<sup>SM</sup> price return level) to obtain the total return. The total return is then applied to the prior Dow Jones-UBS Commodity Index<sup>SM</sup> total return level to calculate the new Dow Jones-UBS Commodity Index<sup>SM</sup> total return level.

## Dissemination and Publication

Dow Jones disseminates the Dow Jones-UBS Commodity Index<sup>SM</sup> level approximately every fifteen (15) seconds (assuming the Dow Jones-UBS Commodity Index<sup>SM</sup> level has changed within such fifteen-second interval) from 8:00 a.m. to 3:30 p.m. (New York time), and publishes the final Dow Jones-UBS Commodity Index<sup>SM</sup> level for each DJ-UBS Business Day at approximately 4:00 p.m. (New York time) on each such day. Dow Jones-UBS Commodity Index<sup>SM</sup> levels can also be obtained from the official websites of both UBS and Dow Jones Indexes and are also published in *The Wall Street Journal*.

A "DJ-UBS Business Day" is a day on which the sum of the Commodity Index Percentages (as defined below in "Annual Reweightings and Rebalancings of the Dow Jones-UBS Commodity Index<sup>SM</sup>") for the Dow Jones-UBS Commodities that are open for trading is greater than 50%. For example, based on the weighting of the Dow Jones-UBS Commodities for 2011, if the CBOT and the New York Mercantile Exchange ("NYMEX") are closed for trading on the same day, a DJ-UBS Business Day will not exist.

## The Dow Jones-UBS Commodity Index<sup>SM</sup> Is a Rolling Index

The Dow Jones-UBS Commodity Index<sup>SM</sup> is composed of futures contracts on physical commodities. Unlike equities, which typically entitle the holder to a continuing stake in a corporation, commodity futures contracts normally specify a certain date for the delivery of the underlying commodity. In order to avoid delivering the underlying physical commodities and to maintain exposure to the underlying physical commodities, periodically futures contracts on physical commodities specifying delivery on a nearby date must be sold and futures contracts on physical commodities that have not yet reached the delivery period must be purchased. The rollover for each contract occurs over a period of five DJ-UBS Business Days each month according to a pre-determined schedule. This process is known as "rolling" a futures position. The Dow Jones-UBS Commodity Index<sup>SM</sup> is a "rolling index."

## Dow Jones-UBS Commodity Index<sup>SM</sup> Calculation Disruption Events

From time to time, disruptions can occur in trading futures contracts on various commodity exchanges. The daily calculation of the Dow Jones-UBS Commodity Index<sup>SM</sup> will be adjusted in the event that UBS determines that any of the following index calculation disruption events exists:

- (a) the termination or suspension of, or material limitation or disruption in the trading of any futures contract used in the calculation of the Dow Jones-UBS Commodity Index<sup>SM</sup> on that day;
- (b) the settlement price of any futures contract used in the calculation of the Dow Jones-UBS Commodity Index<sup>SM</sup> reflects the maximum permitted price change from the previous day's settlement price;
- (c) the failure of an exchange to publish official settlement prices for any futures contract used in the calculation of the Dow Jones-UBS Commodity Index<sup>SM</sup>; or
- (d) with respect to any futures contract used in the calculation of the Dow Jones-UBS Commodity Index<sup>SM</sup> that trades on the LME, a business day on which the LME is not open for trading.

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This underlying supplement and the relevant terms supplement relates only to the notes and does not relate to the exchange-traded physical commodities underlying any of the Dow Jones-UBS Commodity Index<sup>SM</sup> components. Purchasers of the notes should not conclude that the inclusion of a futures contract in the Dow Jones-UBS Commodity Index<sup>SM</sup> is any form of investment recommendation of the futures contract or the underlying exchange-traded physical commodity by Dow Jones, UBS AG, UBS Securities, CME Indexes or any of their subsidiaries or affiliates. The information in this underlying supplement regarding the Dow Jones-UBS Commodity Index<sup>SM</sup> components has been derived solely from publicly available documents. None of Dow Jones, UBS AG, UBS Securities, CME Indexes or any of their subsidiaries or affiliates has made any due diligence inquiries with respect to the Dow Jones-UBS Commodity Index<sup>SM</sup> components in connection with the notes. None of Dow Jones, UBS AG, UBS Securities, CME Indexes or any of their subsidiaries or affiliates makes any representation that these publicly available documents or any other publicly available information regarding the Dow Jones-UBS Commodity Index<sup>SM</sup> components, including without limitation a description of factors that affect the prices of such components, are accurate or complete.

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## **The Commodity Futures Markets**

Contracts on physical commodities are traded on regulated futures exchanges, in the over-the-counter market and on various types of physical and electronic trading facilities and markets. As of the date of this underlying supplement, all of the contracts included in the DJ-UBS Commodity Indices are exchange-traded futures contracts. An exchange-traded futures contract is a bilateral agreement providing for the purchase and sale of a specified type and quantity of a commodity or financial instrument during a stated delivery month for a fixed price. A futures contract on an index of commodities typically provides for the payment and receipt of a cash settlement based on the value of such commodities. A futures contract provides for a specified settlement month in which the commodity or financial instrument is to be delivered by the seller (whose position is described as "short") and acquired by the purchaser (whose position is described as "long") or in which the cash settlement amount is to be made.

There is no purchase price paid or received on the purchase or sale of a futures contract. Instead, an amount of cash or cash equivalents must be deposited with the broker as "initial margin." This amount varies based on the requirements imposed by the exchange clearing houses, but may be as low as 5% or less of the value of the contract. This margin deposit provides collateral for the obligations of the parties to the futures contract.

By depositing margin in the most advantageous form (which may vary depending on the exchange, clearing house or broker involved), a market participant may be able to earn interest on its margin funds, thereby increasing the potential total return that may be realized from an investment in futures contracts. The market participant normally makes to, and receives from, the broker subsequent payments on a daily basis as the price of the futures contract fluctuates. These payments are called "variation margin" and make the existing positions in the futures contract more or less valuable, a process known as "marking to market."

Futures contracts are traded on organized exchanges, known as "contract markets" in the United States, through the facilities of a centralized clearing house and a brokerage firm which is a member of the clearing house. The clearing house guarantees the performance of each clearing member which is a party to the futures contract by, in effect, taking the opposite side of the transaction. At any time prior to the expiration of a futures contract, subject to the availability of a liquid secondary market, a trader may elect to close out its position by taking an opposite position on the exchange on which the trade obtained the position. This operates to terminate the position and fix the trader's profit or loss.

U.S. contract markets, as well as brokers and market participants, are subject to regulation by the Commodity Futures Trading Commission. Futures markets outside the United States are generally subject to regulation by comparable regulatory authorities. However, the structure and nature of trading on non-U.S. exchanges may differ from the foregoing description. From their inception to the present, the DJ-UBS Commodity Indices have been composed exclusively of futures contracts traded on regulated exchanges.

## THE S&P GSCI INDICES

We have derived all information contained in this underlying supplement regarding the S&P GSCI Indices (as defined below), including, without limitation, their make-up, method of calculation and changes in their components, from publicly available information. Such information reflects the policies of, and is subject to change by, Standard & Poor's Financial Services LLC ("S&P"), the publisher of the S&P GSCI Indices. We make no representation or warranty as to the accuracy or completeness of such information. The S&P GSCI Indices are determined, composed and calculated by S&P, without regard to the notes. S&P acquired the rights to the S&P GSCI™ from Goldman, Sachs & Co. in 2007. Goldman, Sachs & Co. established and began calculating the S&P GSCI™ in May 1991. The former name of the S&P GSCI™ was the Goldman Sachs Commodity Index, or GSCI®. S&P has no obligation to continue to publish, and may discontinue publication of, any S&P GSCI Index.

On November 4, 2011, The McGraw-Hill Companies, Inc. ("McGraw-Hill"), the owner of the S&P Indices business, and CME Group Inc. ("CME Group"), the 90% owner of the CME Group and Dow Jones & Company, Inc. joint venture that owns the Dow Jones Indexes business, announced a new joint venture, S&P/Dow Jones Indices, which will own the S&P Indices business and the Dow Jones Indexes business. The ownership of the S&P GSCI Indices may change as a result. McGraw-Hill and CME Group expect the S&P/Dow Jones Indices to be operational in the first half of 2012, subject to regulatory approval and other conditions.

The notes may be linked in whole or in part to the performance of the S&P GSCI™ Index ("S&P GSCI™"), the S&P GSCI™ Light Energy Index or certain of the S&P GSCI™'s commodity sector sub-indices: the S&P GSCI™ Agriculture Index, the S&P GSCI™ Energy Index, the S&P GSCI™ Industrial Metals Index, the S&P GSCI™ Livestock Index and the S&P GSCI™ Precious Metals Index (each a "S&P GSCI Sector Index," and together, the "S&P GSCI Sector Indices"), or the S&P GSCI™'s single commodity sub-indices (each a "S&P GSCI Single Component Index," and collectively, the "S&P GSCI Single Component Indices"). We refer to the S&P GSCI Single Component Indices and S&P GSCI Sector Indices collectively as the "S&P GSCI Component Indices," and together with the S&P GSCI™ and the S&P GSCI™ Light Energy Index, the "S&P GSCI Indices," and each, a "S&P GSCI Index." If the notes are linked to any S&P GSCI Single Component Index, any relevant disclosure for such S&P GSCI Single Component Index will be provided in the relevant terms supplement.

S&P publishes excess return and total return versions of each of the S&P GSCI Indices. The relevant terms supplement will specify whether the notes are linked to the excess return or total return version of the S&P GSCI Indices. The excess return versions of the S&P GSCI Indices is based on price levels of the futures contracts included in such S&P GSCI Index as well as the discount or premium obtained by 'rolling' hypothetical positions in such contracts forward as they approach delivery. The total return versions of the S&P GSCI Indices incorporate the returns of the excess return versions, except that the total return indices also reflect interest earned on hypothetical, fully collateralized contract positions on the included commodities.

The S&P GSCI™ is an index on a world production-weighted basket of principal non-financial commodities (*i.e.*, physical commodities) that satisfy specified criteria. The S&P GSCI™ is designed to be a measure of the performance over time of the markets for these commodities. The only commodities represented in the S&P GSCI™ are those physical commodities on which active and liquid contracts are traded on trading facilities in major industrialized countries. The commodities included in the S&P GSCI™ are weighted, on a production basis, to reflect the relative significance (in the view of S&P, as described below) of such commodities to the world economy. The fluctuations in the value of the S&P GSCI™ are intended generally to correlate with changes in the prices of such physical commodities in global markets. The S&P GSCI™ has been normalized such that its hypothetical level on January 2, 1970 was 100. Futures contracts on the S&P GSCI™, and options on such futures contracts, are currently listed for trading on the Chicago Mercantile Exchange.

The S&P GSCI™ Light Energy Index is composed of the same commodity futures contracts as the S&P GSCI™ but with those weights for contracts in the energy sector having been divided by 4. Because the weights of energy-related S&P GSCI™ commodities are reduced in the S&P Light Energy Index relative to the S&P GSCI™, the relative weights of the remaining S&P GSCI™ commodities are necessarily increased. As a result, although the S&P Light Energy Index contains all of the S&P GSCI™ commodities that are included in the S&P GSCI™, they are not world-production weighted in the same manner as the S&P GSCI™ and may not serve as a benchmark for changes in inflation or other economic factors. In particular, because of the significance of energy-related commodities to the world economy, a significant reduction in the weights of these commodities in the S&P GSCI™ Light Energy Index will substantially limit the effect of changes in energy prices on the S&P GSCI™ Light Energy Index. Increases in the prices of energy commodities, therefore, will not increase the level of the S&P GSCI™ Light Energy Index to the same extent as the S&P GSCI™.

The S&P GSCI™ Agriculture Index is a world production-weighted index of certain agricultural commodities in the world economy, including Wheat, Kansas Wheat, Corn, Soybeans, Cotton, Sugar, Coffee and Cocoa. The S&P GSCI™ Energy Index is a world production-weighted index of certain energy commodities in the world economy, including Crude Oil, Brent Crude Oil, RBOB Gasoline, Heating Oil, Gasoil and Natural Gas. The S&P GSCI™ Industrial Metals Index is a world production-weighted index of certain industrial metals commodities in the world economy, including High Grade Primary Aluminum, Copper, Standard Lead, Primary Nickel and Special High Grade Zinc. The S&P GSCI™ Livestock Index is a world production-weighted index of certain livestock commodities in the world economy, including live cattle, feeder cattle and lean hogs. The S&P GSCI™ Precious Metals Index is a world production-weighted index consisting of two precious metals commodities in the world economy: Gold and Silver.

Set forth below is a summary of the methodology used to calculate the S&P GSCI Indices. Since the S&P GSCI™ is the parent index of the S&P GSCI Component Indices, the methodology for compiling the S&P GSCI™ relates as well to the methodology of compiling the S&P GSCI Component Indices. Each of the S&P GSCI Component Indices reflecting portions of the S&P GSCI™ is calculated in the same manner as the S&P GSCI™, except that (i) the daily contract reference price, CPWs and roll weights (each as discussed below) used in performing such calculations are limited to those of the commodities included in the relevant sub-index and (ii) each sub-index has a separate normalizing constant (discussed below). The methodology for determining the composition and weighting of the S&P GSCI™ and for calculating its value is subject to modification in a manner consistent with the purposes of the S&P GSCI™, as described below. S&P makes the official calculations of the S&P GSCI Indices.

### **The Index Committee and the Index Advisory Panel**

S&P has established an index committee (the “Index Committee”) to oversee the daily management and operations of the S&P GSCI™, and is responsible for all analytical methods and calculation of the S&P GSCI Indices. The Index Committee consists of full-time professional members of S&P’s staff. At each meeting, the Index Committee reviews any issues that may affect index constituents, statistics comparing the composition of the indices to the market, commodities that are being considered as candidates for an addition to an index and any significant market events. In addition, the Index Committee may revise index policy covering rules for selecting commodities or other matters.

S&P 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 has established an index advisory panel (the “Advisory Panel”) to assist it in connection with the operation of the S&P GSCI™. The Advisory Panel meets on an annual basis and at other times at the request of the Index Committee. The principal purpose of the Advisory Panel is to advise S&P with respect to, among other things, the calculation of the S&P GSCI™, the effectiveness of the S&P GSCI™ as a measure of commodity futures market performance and the need for changes in the composition or in the methodology of the S&P GSCI™. The Advisory Panel acts solely in an advisory and consultative capacity; the Index Committee makes all decisions with respect to the composition, calculation and operation of the S&P GSCI™.

### **Composition of the S&P GSCI™**

In order to be included in the S&P GSCI™, a contract must satisfy the following eligibility criteria:

- the contract must be in respect of a physical commodity and not a financial commodity;
- the contract must have a specified expiration or term or provide in some other manner for delivery or settlement at a specified time, or within a specified period, in the future;
- the contract must, at any given point in time, be available for trading at least five months prior to its expiration or such other date or time period specified for delivery or settlement;
- the contract must be traded on an exchange, facility or other platform (referred to as a “trading facility”) that allows market participants to execute spread transactions, through a single order entry, between the pairs of contract expirations included in the S&P GSCI™ that, at any given point in time, will be involved in the rolls to be effected in the next three roll periods (defined below);
- the contract must be denominated in U.S. dollars; and
- the contract must be traded on or through a trading facility that has its principal place of business or operations in a country that is a member of the Organization for Economic Cooperation and Development and that:
  - makes price quotations generally available to its members or participants (and to S&P) in a manner and with a frequency that is sufficient to provide reasonably reliable indications of the level of the relevant market at any given point in time;
  - makes reliable trading volume information available to S&P with at least the frequency required by S&P to make the monthly determinations;
  - accepts bids and offers from multiple participants or price providers; and
  - is accessible by a sufficiently broad range of participants.

The price of the relevant contract that is used as a reference or benchmark by market participants (referred to as the “daily contract reference price”) generally must have been available on a continuous basis for at least two years prior to the proposed date of inclusion in the S&P GSCI™. In appropriate circumstances, S&P may determine that a shorter time period is sufficient or that historical daily contract reference prices for such contract may be derived from daily contract reference prices for a similar or related contract. The daily contract reference price may be (but is not required to be) the settlement price or other similar price published by the relevant trading facility for purposes of margining transactions or for other purposes.

At and after the time a contract is included in the S&P GSCI™, the daily contract reference price for such contract must be published between 10:00 a.m. and 4:00 p.m., New York City time, on each business day relating to such contract by the trading facility on or through which it is traded and must generally be available to all members of, or participants in, such facility (and to S&P) on the same day from the trading facility or through a recognized third-party data vendor. Such publication must include, at all times, daily contract reference prices for at least one expiration or settlement date that is five months or more from the date the determination is made, as well as for all expiration or settlement dates during such five-month period.

For a contract to be eligible for inclusion in the S&P GSCI™, volume data with respect to such contract must be available for at least the three months immediately preceding the date on which the determination is made. The following eligibility criteria apply:

- In order to be added to the S&P GSCI™, a contract that is not included in the S&P GSCI™ at the time of determination and that is based on a commodity that is not represented in the S&P GSCI™ at such time must have an annualized total dollar value traded over the relevant period of at least U.S. \$15 billion. The total dollar value traded is the dollar value of the total quantity of the commodity underlying transactions in the relevant contract over the period for which the calculation is made, based on the average of the daily contract reference prices on the last day of each month during the period.
- In order to continue to be included in the S&P GSCI™, a contract that is already included in the S&P GSCI™ at the time of determination and that is the only contract on the relevant commodity included in the S&P GSCI™ must have an annualized total dollar value traded of at least U.S. \$5 billion over the relevant period and of at least U.S. \$10 billion during at least one of the three most recent annual periods used in making the determination.
- In order to be added to the S&P GSCI™, a contract that is not included in the S&P GSCI™ at the time of determination and that is based on a commodity on which there are one or more contracts already included in the S&P GSCI™ at such time must have an annualized total dollar value traded over the relevant period of at least U.S. \$30 billion.
- In order to continue to be included in the S&P GSCI™, a contract that is already included in the S&P GSCI™ at the time of determination and that is based on a commodity on which there are one or more contracts already included in the S&P GSCI™ at such time must have an annualized total dollar value traded, over the relevant period of at least U.S. \$10 billion over the relevant period and of at least U.S. \$20 billion during at least one of the three most recent annual periods used in making the determination.

In addition to the volume requirements described above, a contract must have a minimum reference percentage dollar weight:

- In order to continue to be included in the S&P GSCI™, a contract that is already included in the S&P GSCI™ at the time of determination must have a reference percentage dollar weight of at least 0.10%. The reference percentage dollar weight of a contract is determined by multiplying the CPW (defined below) of a contract by the average of its daily contract reference prices on the last day of each month during the relevant period. These amounts are summed for all contracts included in the S&P GSCI™ and each contract's percentage of the total is then determined.
- In order to be added to the S&P GSCI™, a contract that is not included in the S&P GSCI™ at the time of determination must have a reference percentage dollar weight of at least 1.00% at the time of determination.

In the event that two or more contracts on the same commodity satisfy the eligibility criteria, such contracts are included in the S&P GSCI™ in the order of their respective total quantity traded during the relevant period (determined as the total quantity of the commodity underlying transactions in the relevant contract), with the contract having the highest total quantity traded being included first. No further contracts are included if such inclusion results in the portion of the S&P GSCI™ attributable to such commodity exceeding a particular level.

If under the procedure set forth in the preceding paragraph, additional contracts could be included with respect to several commodities at the same time, the procedure is first applied to the commodity that has the smallest portion of the S&P GSCI™ attributable to it at the time of determination. Subject to the other eligibility criteria, the contract with the highest total quantity traded on such commodity is included. Before any additional contracts on any commodity are included, the portion of the S&P GSCI™ attributable to all commodities is recalculated. The selection procedure described above is then repeated with respect to the contracts on the commodity that then has the smallest portion of the S&P GSCI™ attributable to it.

The contracts currently included in the S&P GSCI™ are all futures contracts traded on the New York Mercantile Exchange, Inc. ("NYMEX"), ICE Futures Europe ("ICE-Europe"), ICE Futures U.S. ("ICE-US"), the Chicago Mercantile Exchange ("CME"), the Chicago Board of Trade ("CBOT"), the Kansas City Board of Trade ("KBT"), the Commodities Exchange Inc. ("CMX") and the London Metal Exchange ("LME").

The quantity of each of the contracts included in the S&P GSCI™ is determined on the basis of a five-year average (referred to as the "world production average") of the production quantity of the underlying commodity from sources determined by S&P to be reasonably accurate and reliable, such as the United Nations Industrial Commodity Statistics Yearbook. However, if a commodity is primarily a regional commodity, based on its production, use, pricing, transportation or other factors, S&P may calculate the weight of such commodity based on regional, rather than world, production data. At present, natural gas is the only commodity the weight of which is calculated on the basis of regional production data, with the relevant region being North America.

The five-year moving average is updated annually for each commodity included in the S&P GSCI™, based on the most recent five-year period (ending approximately two years prior to the date of calculation and moving backwards) for which complete data for all commodities is available. The contract production weights (the "CPWs") used in calculating the S&P GSCI™ are derived from world or regional production averages, as applicable, of the relevant commodities, and are calculated based on the total quantity traded for the relevant contract and the world or regional production average, as applicable, of the underlying commodity. However, if the volume of trading in the relevant contract, as a multiple of the production levels of the commodity, is below specified thresholds, the CPW of the contract is reduced until the threshold is satisfied. This is designed to ensure that trading in each such contract is sufficiently liquid relative to the production of the commodity.

In addition, S&P performs this calculation on a monthly basis and, if the multiple of any contract is below the prescribed threshold, the composition of the S&P GSCI™ is reevaluated, based on the criteria and weighting procedure described above. This procedure is undertaken to allow the S&P GSCI™ to shift from contracts that have lost substantial liquidity into more liquid contracts, during the course of a given year. As a result, it is possible that the composition or weighting of the S&P GSCI™ will change on one or more of these monthly evaluation dates. In addition, regardless of whether any changes have occurred during the year, S&P reevaluates the composition of the S&P GSCI™ at the conclusion of each year, based on the above criteria. Other commodities that satisfy such criteria, if any, will be added to the S&P GSCI™. Commodities included in the S&P GSCI™ that no longer satisfy such criteria, if any, will be deleted.

S&P also determines whether modifications in the selection criteria or the methodology for determining the composition and weights of and for calculating the S&P GSCI™ are necessary or appropriate in order to assure that the S&P GSCI™ represents a measure of commodity market performance. S&P has the discretion to make any such modifications.

### **Contract Expirations**

Because the S&P GSCI™ comprises actively traded contracts with scheduled expirations, it can only be calculated by reference to the prices of contracts for specified expiration, delivery or settlement periods, referred to as “contract expirations.” The contract expirations included in the S&P GSCI™ for each commodity during a given year are designated by S&P, *provided* that each such contract must be an “active contract.” An “active contract” for this purpose is a liquid, actively traded contract expiration, as defined or identified by the relevant trading facility or, if no such definition or identification is provided by the relevant trading facility, as defined by standard custom and practice in the industry.

If a trading facility deletes one or more contract expirations, the S&P GSCI™ will be calculated during the remainder of the year in which such deletion occurs based on the remaining contract expirations designated by S&P. If a trading facility ceases trading in all contract expirations relating to a particular contract, S&P may designate an eligible replacement contract on the commodity. To the extent practicable, the replacement will be in effect during the next monthly review of the composition of the S&P GSCI™. If that timing is not practicable, S&P will determine the date of the replacement and will consider a number of factors, including the differences between the existing contract and the replacement contract specifications and contract expirations.

### **Value of the S&P GSCI™**

The value of the S&P GSCI™ on any given day is equal to the total dollar weight of the S&P GSCI™ divided by a normalizing constant that assures the continuity of the S&P GSCI™ over time. The total dollar weight of the S&P GSCI™ is the sum of the dollar weight of each of the underlying commodities.

The dollar weight of each such commodity on any given day is equal to:

- the “daily contract reference price” (discussed below),
- multiplied by the appropriate CPWs, and
- during a roll period, the appropriate “roll weights” (discussed below).

The daily contract reference price used in calculating the dollar weight of each commodity on any given day is the most recent daily contract reference price made available by the relevant trading facility, except that the daily contract reference price for the most recent prior day will be used if the exchange is closed or otherwise fails to publish a daily contract reference price on that day. In addition, if the trading facility fails to make a daily contract reference price available or publishes a daily contract reference price that, in the reasonable judgment of S&P, reflects manifest error, the relevant calculation will be delayed until the price is made available or corrected; *provided* that, if the price is not made available or corrected by 4:00 p.m., New York City time, S&P may, if it deems such action to be appropriate under the circumstances, determine the appropriate daily contract reference price for the applicable futures contract in its reasonable judgment for purposes of the relevant S&P GSCI™ calculation.

The “roll weight” of each commodity reflects the fact that the positions in contracts must be liquidated or rolled forward into more distant contract expirations as they approach expiration. If actual positions in the relevant markets were rolled forward, the roll would likely need to take place over a period of days. Since the S&P GSCI™ is designed to replicate the performance of actual investments in the underlying contracts, the rolling process incorporated in the S&P GSCI™ also takes place over a period of days at the beginning of each month (referred to as the “roll period”). On each day of the roll period, the “roll weights” of the first nearby contract expiration on a particular commodity and the more distant contract expiration into which it is rolled are adjusted, so that the hypothetical position in the contract on the commodity that is included in the S&P GSCI™ is gradually shifted from the first nearby contract expiration to the more distant contract expiration.

If on any day during a roll period any of the following conditions exists, the portion of the roll that would have taken place on that day is deferred until the next day on which such conditions do not exist:

- no daily contract reference price is available for a given contract expiration;
- any such price represents the maximum or minimum price for such contract month, based on exchange price limits (referred to as a “Limit Price”);
- the daily contract reference price published by the relevant trading facility reflects manifest error, or such price is not published by 4:00 p.m., New York City time. In that event, S&P may, but is not required to, determine a daily contract reference price and complete the relevant portion of the roll based on such price; *provided*, that, if the trading facility publishes a price before the opening of trading on the next day, S&P will revise the portion of the roll accordingly; or
- trading in the relevant contract terminates prior to its scheduled closing time.

If any of these conditions exist throughout the roll period, the roll with respect to the affected contract will be effected in its entirety on the next day on which such conditions no longer exist.

### **Contract Daily Return**

The contract daily return on any given day is equal to the sum, for each of the commodities included in the S&P GSCI™, of the applicable daily contract reference price on the relevant contract multiplied by the appropriate CPW and the appropriate “roll weight,” divided by the total dollar weight of the S&P GSCI™ on the preceding day, minus one.

### **Calculation of the S&P GSCI Indices**

#### *Excess return S&P GSCI Indices*

The value of any excess return version of a S&P GSCI Index on any day on which the S&P GSCI™ is calculated (an “S&P GSCI™ Business Day”) is equal to the product of:

- the value of the applicable S&P GSCI Index on the immediately preceding S&P GSCI™ Business Day; and
- one plus the contract daily return of the applicable S&P GSCI Index on the S&P GSCI™ Business Day on which the calculation is made.

### *Total Return S&P GSCI Indices*

The value of any total return version of a S&P GSCI Index on any S&P GSCI™ Business Day reflects the value of an investment in the excess return version of that S&P GSCI Index together with a Treasury bill return and is equal to the product of:

- the value of the applicable S&P GSCI Index on the immediately preceding S&P GSCI™ Business Day;
- one plus the sum of the contract daily return and the Treasury Bill return on the S&P GSCI™ Business Day on which the calculation is made; and
- one plus the Treasury Bill return for each non-S&P GSCI™ Business Day since the immediately preceding S&P GSCI™ Business Day.

The Treasury Bill return is the return on a hypothetical investment in the applicable S&P GSCI Index at a rate equal to the interest rate on a specified U.S. Treasury Bill.

### **Information**

All information contained herein relating to the S&P GSCI™ and each of the S&P GSCI Indices, including their make-up, method of calculation, changes in their components and historical performance, has been derived from publicly available information.

The information contained herein with respect to each of the S&P GSCI Indices and the S&P GSCI™ reflects the policies of, and is subject to change by, S&P.

Current information regarding the market value of the S&P GSCI Indices is available from S&P and from numerous public information sources. We make no representation that the publicly available information about the S&P GSCI Indices is accurate or complete.

### **License Agreement with Standard & Poor's**

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**THERETO. S&P, ITS AFFILIATES AND THEIR THIRD PARTY LICENSORS SHALL NOT BE SUBJECT TO ANY DAMAGES OR LIABILITY FOR ANY ERRORS, OMISSIONS OR DELAYS THEREIN. S&P MAKES NO EXPRESS OR IMPLIED WARRANTIES, AND EXPRESSLY DISCLAIMS ALL WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR USE WITH RESPECT TO THE MARKS, THE S&P GSCI INDICES OR ANY DATA INCLUDED THEREIN. WITHOUT LIMITING ANY OF THE FOREGOING, IN NO EVENT WHATSOEVER SHALL S&P, ITS AFFILIATES OR THEIR THIRD PARTY LICENSORS BE LIABLE FOR ANY INDIRECT, SPECIAL, INCIDENTAL, PUNITIVE OR CONSEQUENTIAL DAMAGES, INCLUDING BUT NOT LIMITED TO, LOSS OF PROFITS, TRADING LOSSES, LOST TIME OR GOODWILL, EVEN IF THEY HAVE BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES, WHETHER IN CONTRACT, TORT, STRICT LIABILITY OR OTHERWISE.**

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### **The Commodity Futures Markets**

Contracts on physical commodities are traded on regulated futures exchanges, in the over-the-counter market and on various types of physical and electronic trading facilities and markets. As of the date of this underlying supplement, all of the contracts included in the S&P GSCI Indices are exchange-traded futures contracts. An exchange-traded futures contract is a bilateral agreement providing for the purchase and sale of a specified type and quantity of a commodity or financial instrument during a stated delivery month for a fixed price. A futures contract on an index of commodities typically provides for the payment and receipt of a cash settlement based on the value of such commodities. A futures contract provides for a specified settlement month in which the commodity or financial instrument is to be delivered by the seller (whose position is described as "short") and acquired by the purchaser (whose position is described as "long") or in which the cash settlement amount is to be made.

There is no purchase price paid or received on the purchase or sale of a futures contract. Instead, an amount of cash or cash equivalents must be deposited with the broker as "initial margin." This amount varies based on the requirements imposed by the exchange clearing houses, but may be as low as 5% or less of the value of the contract. This margin deposit provides collateral for the obligations of the parties to the futures contract.

By depositing margin in the most advantageous form (which may vary depending on the exchange, clearing house or broker involved), a market participant may be able to earn interest on its margin funds, thereby increasing the potential total return that may be realized from an investment in futures contracts. The market participant normally makes to, and receives from, the broker subsequent payments on a daily basis as the price of the futures contract fluctuates. These payments are called "variation margin" and make the existing positions in the futures contract more or less valuable, a process known as "marking to market."

Futures contracts are traded on organized exchanges, known as "contract markets" in the United States, through the facilities of a centralized clearing house and a brokerage firm which is a member of the clearing house. The clearing house guarantees the performance of each clearing member which is a party to the futures contract by, in effect, taking the opposite side of the transaction. At any time prior to the expiration of a futures contract, subject to the availability of a liquid secondary market, a trader may elect to close out its position by taking an opposite position on the exchange on which the trader obtained the position. This operates to terminate the position and fix the trader's profit or loss.

U.S. contract markets, as well as brokers and market participants, are subject to regulation by the Commodity Futures Trading Commission. Futures markets outside the United States are generally subject to regulation by comparable regulatory authorities. However, the structure and nature of trading on non-U.S. exchanges may differ from the foregoing description. From their inception to the present, the S&P GSCI Indices have been composed exclusively of futures contracts traded on regulated exchanges.

## **FUND DESCRIPTIONS**

### **THE FINANCIAL SELECT SECTOR SPDR® FUND**

We have derived all information contained in this underlying supplement regarding the Financial Select Sector SPDR® Fund, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by the Select Sector SPDR® Trust (the “Select Sector Trust”) and SSgA Funds Management, Inc. (“SSFM”). We make no representation or warranty as to the accuracy or completeness of such information. The Financial Select Sector SPDR® Fund is an investment portfolio managed by SSFM, the investment adviser to the Financial Select Sector SPDR® Fund. The Financial Select Sector SPDR® Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca under the ticker symbol “XLF.”

The Select Sector Trust is a registered investment company that consists of nine separate investment portfolios (each, a “Select Sector SPDR® Fund”), including the Financial Select Sector SPDR® Fund. Each Select Sector SPDR® Fund is an index fund that invests in a particular sector or group of industries represented by a specified Select Sector Index. The companies included in each Select Sector Index are selected on the basis of general industry classifications from a universe of companies defined by the S&P 500® Index. The Select Sector Indices (each, a “Select Sector Index”) upon which the Select Sector SPDR® Funds are based together comprise all of the companies in the S&P 500® Index. The investment objective of each Select Sector SPDR® Fund is to provide investment results that, before expenses, correspond generally to the price and yield performance of publicly traded equity securities of companies in a particular sector or group of industries, as represented by a specified market sector index.

Information provided to or filed with the SEC by the Select Sector Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-57791 and 811-08837, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding the Select Sector Trust or the Financial Select Sector SPDR® Fund, please see the Select Sector Trust’s prospectus. In addition, information about the Select Sector Trust, SSFM and the Financial Select Sector SPDR® Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the Select Sector Trust website at <http://www.sectorspdrs.com>. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the Select Sector Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

#### **Investment Objective**

The Financial Select Sector SPDR® Fund seeks investment results that correspond generally to the price and yield performance, before fees and expenses, of publicly traded equity securities of companies in the financial services sector, as represented by the Financial Select Sector Index. The Financial Select Sector Index measures the performance of the financial services sector of the U.S. equity market. The Financial Select Sector Index includes companies in the following industries: diversified financial services, insurance, commercial banks, capital markets, real estate investment trusts, consumer finance, thrifts and mortgage finance and real estate management and development. For more information about the Financial Select Sector Index, see “Equity Index Descriptions — The Select Sector Indices” above.



## Investment Strategy — Indexing

The Financial Select Sector SPDR® Fund employs a replication strategy in attempting to approximate the performance of Financial Select Sector Index, which means that the Financial Select Sector SPDR® Fund typically invests in substantially all of the securities represented in the Financial Select Sector Index in approximately the same proportions as the Financial Select Sector Index. There may, however, be instances where SSFM may choose to overweight another stock in the Financial Select Sector Index, purchase securities not included in the Financial Select Sector Index that SSFM believes are appropriate to substitute for a security included in the Financial Select Sector Index or utilize various combinations of other available investment techniques in seeking to track the Financial Select Sector Index. The Financial Select Sector SPDR® Fund will normally invest at least 95% of its total assets in common stocks that comprise the Financial Select Sector Index. The Financial Select Sector SPDR® Fund may invest its remaining assets in cash and cash equivalents or money market instruments, such as repurchase agreements and money market funds. Swaps, options and futures contracts, convertible securities and structured notes may be used by the Financial Select Sector SPDR® Fund in seeking performance that corresponds to the Financial Select Sector Index and in managing cash flows. SSFM anticipates that, under normal circumstances, it may take several business days for additions and deletions to the Financial Select Sector Index to be reflected in the portfolio composition of the Financial Select Sector SPDR® Fund. The Board of Trustees of the Select Sector Trust may change the Financial Select Sector SPDR® Fund's investment strategy and other policies without shareholder approval.

There may, however, be instances where SSFM will utilize a sampling strategy. Sampling means that SSFM will use quantitative analysis to select securities, including securities in the relevant index, outside of the index and derivatives, that have a similar investment profile as the relevant index in terms of key risk factors, performance attributes and other characteristics. These include industry weightings, market capitalization, and other financial characteristics of securities.

## Correlation

The Financial Select Sector Index is a theoretical financial calculation, while the Financial Select Sector SPDR® Fund is an actual investment portfolio. The performance of the Financial Select Sector SPDR® Fund and the Financial Select Sector Index will vary somewhat due to operating expenses, transaction costs, cash flows, regulatory requirements and operational inefficiencies.

## Holdings Information

As of November 8, 2011, the Financial Select Sector SPDR® Fund included 81 companies. The Financial Select Sector SPDR® Fund's three largest holdings are Wells Fargo & Company, Berkshire Hathaway Inc. and JPMorgan Chase & Co. The following table summarizes the Financial Select Sector SPDR® Fund's holdings in individual companies as of such date.

### Top holdings in individual securities as of November 8, 2011

| Company                     | Percentage of Total Holdings |
|-----------------------------|------------------------------|
| Wells Fargo & Company       | 8.70%                        |
| Berkshire Hathaway Inc.     | 8.54%                        |
| JPMorgan Chase & Co.        | 8.48%                        |
| Citigroup Inc.              | 5.69%                        |
| Bank of America Corporation | 4.11%                        |

| <b>Company</b>                | <b>Percentage of<br/>Total Holdings</b> |
|-------------------------------|---|
| The Goldman Sachs Group, Inc. | 3.41%                                   |
| American Express Company      | 3.31%                                   |
| U.S. Bancorp                  | 3.13%                                   |
| Simon Property Group, Inc.    | 2.38%                                   |
| MetLife, Inc.                 | 2.25%                                   |

The information above was compiled from the Select Sector Trust website. We make no representation or warranty as to the accuracy of the information above. Information contained in the Select Sector Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

#### **Historical Performance of the Financial Select Sector SPDR® Fund**

We will provide historical price information with respect to the shares of the Financial Select Sector SPDR® Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

#### **Disclaimer**

The notes are not sponsored, endorsed, sold or promoted by the Select Sector Trust or SSFM. Neither the Select Sector Trust nor SSFM makes any representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. Neither the Select Sector Trust nor SSFM has any obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## THE iSHARES® BARCLAYS 20+ YEAR TREASURY BOND FUND

We have derived all information regarding the iShares® Barclays 20+ Year Treasury Bond Fund (the “20+ Treasury Fund”) contained in this underlying supplement, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, iShares®, Inc. (“iShares®”), iShares® Trust, BlackRock Institutional Trust Company, N.A. (“BTC”) and BlackRock Fund Advisors (“BFA”). BFA is currently the investment advisor to the 20+ Treasury Fund and is a wholly owned subsidiary of BTC, which in turn is a wholly owned subsidiary of BlackRock, Inc. The 20+ Treasury Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca, Inc. (“NYSE Arca”) under the ticker symbol “TLT.” We make no representation or warranty as to the accuracy or completeness of the information derived from these public sources.

The iShares® Trust is a registered investment company that consists of numerous separate investment portfolios, including the 20+ Treasury Fund. Information provided to or filed with the SEC by iShares® Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-92935 and 811-09729, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding the 20+ Treasury Fund, please see the 20+ Treasury Fund’s prospectus. In addition, information about iShares® and the 20+ Treasury Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the iShares® website at [www.ishares.com](http://www.ishares.com). Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

### Investment Objective and Strategy

The 20+ Treasury Fund seeks to provide investment results that correspond generally to the price and yield performance, before fees and expenses, of the long-term sector of the United States Treasury market as defined by the Barclays Capital U.S. 20+ Year Treasury Bond Index (the “20+ Treasury Index”).

BFA uses a “passive” or indexing approach to try to achieve the investment objective of the 20+ Treasury Fund. The 20+ Treasury Fund does not try to “beat” the index it tracks and does not seek temporary defensive positions when markets decline or appear overvalued. The 20+ Treasury Fund uses a representative sampling indexing strategy (as described below under “Representative Sampling”) to try to track the 20+ Treasury Index.

The 20+ Treasury Fund may or may not hold all of the securities in the 20+ Treasury Index. The 20+ Treasury Fund generally invests at least 90% of its assets in the bonds included in the 20+ Treasury Index and at least 95% of its assets in U.S. government bonds. The 20+ Treasury Fund may invest up to 10% of its assets in U.S. government bonds not included in the 20+ Treasury Index, but which BFA believes will help the 20+ Treasury Fund track the 20+ Treasury Index. The 20+ Treasury Fund also may invest up to 5% of its assets in repurchase agreements collateralized by U.S. government obligations and in cash and cash equivalents, including shares of money market funds advised by BFA. The 20+ Treasury Fund may lend securities representing up to one-third of the value of the 20+ Treasury Fund’s total assets (including the value of the collateral received).

### Representative Sampling

Representative sampling is an indexing strategy that involves investing in a representative sample of securities that collectively has an investment profile similar to the 20+ Treasury Index. The securities selected are expected to have, in the aggregate, investment characteristics (based on factors such as market capitalization and industry weightings), fundamental characteristics (such as return variability, duration, maturity or credit ratings and yield) and liquidity measures similar to those of the 20+ Treasury Index.

## Correlation

The 20+ Treasury Index is a theoretical financial calculation while the 20+ Treasury Fund is an actual investment portfolio. The performance of the 20+ Treasury Fund and the 20+ Treasury Index may vary due to transaction costs, non-U.S. currency valuation, asset valuations, corporate actions (such as mergers and spin-offs), timing variances and differences between the portfolio of the 20+ Treasury Fund and that of the 20+ Treasury Index resulting from legal restrictions (such as diversification requirements) that apply to the 20+ Treasury Fund but not to the 20+ Treasury Index or to the use of representative sampling. "Tracking error" is the difference between the performance (return) of the portfolio of the 20+ Treasury Fund and that of the 20+ Treasury Index. BFA expects that, over time, the 20+ Treasury Fund's tracking error will not exceed 5%. Because the 20+ Treasury Fund uses a representative sampling indexing strategy, it can be expected to have a larger tracking error than if it used a replication indexing strategy. "Replication" is an indexing strategy in which a fund invests in substantially all of the securities in its underlying index in approximately the same proportions as in the underlying index.

## Industry Concentration Policy

The 20+ Treasury Fund will concentrate its investments (*i.e.*, hold 25% or more of its total assets) in a particular industry or group of industries to approximately the same extent that the 20+ Treasury Index is concentrated. For purposes of this limitation, securities of the U.S. government (including its agencies and instrumentalities), repurchase agreements collateralized by U.S. government securities and securities of state or municipal governments and their political subdivisions are not considered to be issued by members of any industry.

## Holdings Information

The holding information for the 20+ Treasury Fund is updated on a daily basis. As of November 7, 2011, 98.79% of the 20+ Treasury Fund's holdings consisted of bonds, 0.03% consisted of cash and 1.19% was in other assets, including dividends booked but not yet received. The following tables summarize the top 10 holdings of the 20+ Treasury Fund as of such date.

### Top 10 Holdings as of November 7, 2011

| Security                               | Percentage of<br>Total Holdings |
|--|---------------------------------|
| U.S. Treasury Bonds, 05/15/2041, 4.38% | 8.58%                           |
| U.S. Treasury Bonds, 02/15/2040, 4.62% | 8.34%                           |
| U.S. Treasury Bonds, 11/15/2040, 4.25% | 8.27%                           |
| U.S. Treasury Bonds, 05/15/2040, 4.38% | 8.10%                           |
| U.S. Treasury Bonds, 02/15/2041, 4.75% | 8.09%                           |
| U.S. Treasury Bonds, 11/15/2039, 4.38% | 7.90%                           |
| U.S. Treasury Bonds, 08/15/2040, 3.88% | 7.87%                           |
| U.S. Treasury Bonds, 08/15/2041, 3.75% | 7.76%                           |
| U.S. Treasury Bonds, 08/15/2039, 4.50% | 6.63%                           |
| U.S. Treasury Bonds, 05/15/2039, 4.25% | 5.80%                           |

The information above was compiled from the iShares® website. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

## **Disclaimer**

The notes are not sponsored, endorsed, sold or promoted by BTC. BTC makes no representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. BTC has no obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## **The Barclays Capital U.S. 20+ Year Treasury Bond Index**

We have derived all information contained in this underlying supplement regarding the Barclays Capital U.S. 20+ Year Treasury Bond Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Barclays Capital Inc. ("BCI"). We make no representation or warranty as to the accuracy or completeness of such information. The Barclays Capital U.S. 20+ Year Treasury Bond Index is calculated, maintained and published by BCI. BCI is under no obligation to continue to publish, and may discontinue publication of, the Barclays Capital U.S. 20+ Year Treasury Bond Index.

The Barclays Capital U.S. 20+ Year Treasury Bond Index measures the performance of public obligations of the U.S. Treasury. The Barclays Capital U.S. 20+ Year Treasury Bond Index is market capitalization weighted, includes all publicly issued U.S. Treasury securities that meet the criteria for inclusion and is rebalanced once a month on the last calendar day of the month. The U.S. Treasury securities included in the Barclays Capital U.S. 20+ Year Treasury Bond Index must have a remaining maturity of greater than 20 years, are rated investment grade (at least Baa3 by Moody's Investors Service, Inc. or BBB- by Standard and Poor's Financial Services, LLC) and have \$250 million or more of outstanding face value. In addition, the securities must be denominated in U.S. dollars and must be fixed-rate and non-convertible. Certain special issuances, such as state and local government series bonds ("SLGs") and coupon issues that have been stripped from assets already included, are excluded from the Barclays Capital U.S. 20+ Year Treasury Bond Index.

## THE iSHARES® DOW JONES REAL ESTATE INDEX FUND

We have derived all information contained in this underlying supplement regarding the iShares® Dow Jones U.S. Real Estate Index Fund (the “Real Estate Fund”), including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by iShares®, Inc. (“iShares®”), iShares® Trust, BlackRock Institutional Trust Company, N.A. (“BTC”) and BlackRock Fund Advisors (“BFA”). BFA is currently the investment adviser to the Real Estate Fund and is a wholly owned subsidiary of BTC, which in turn is a wholly owned subsidiary of BlackRock, Inc. The Real Estate Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca, Inc. (“NYSE Arca”) under the ticker symbol “IYR.” We make no representation or warranty as to the accuracy or completeness of the information derived from these public sources.

iShares® Trust is a registered investment company that consists of numerous separate investment portfolios, including the Real Estate Fund. Information provided to or filed with the SEC by iShares® Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-92935 and 811-09729, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding iShares® Trust, BFA, and the Real Estate Fund, please see the Real Estate Fund’s prospectus. In addition, information about iShares® and the Real Estate Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the iShares® website at [www.ishares.com](http://www.ishares.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

### Investment Objective and Strategy

The Real Estate Fund seeks to provide investment results that correspond generally to the price and yield performance, before fees and expenses, of publicly traded securities in the real estate sector of the U.S equity market, as measured by the Dow Jones U.S. Real Estate Index (the “Real Estate Index”).

BFA uses a “passive” or indexing approach to try to achieve the investment objective of the Real Estate Fund. The Real Estate Fund does not try to “beat” the index it tracks and does not seek temporary defensive positions when markets decline or appear overvalued. The Real Estate Fund uses a representative sampling indexing strategy (as described below under “Representative Sampling”) to try to track the Real Estate Index.

The Real Estate Fund may or may not hold all of the securities in the Real Estate Index. The Real Estate Fund generally invests at least 90% of its assets in securities of the Real Estate Index and in depositary receipts representing securities of the Real Estate Index. The Real Estate Fund may invest the remainder of its assets in securities not included in the Real Estate Index, but which BFA believes will help the Real Estate Fund track the Real Estate Index, and in futures contracts, options on futures contracts, options and swaps as well as cash and cash equivalents, including shares of money market funds advised by BFA or its affiliates.

### Representative Sampling

Representative sampling involves investing in a representative sample of securities that collectively has an investment profile similar to the Real Estate Index. The securities selected are expected to have, in the aggregate, investment characteristics (based on factors such as market capitalization and industry weightings), fundamental characteristics (such as return variability and yield) and liquidity measures similar to those of the Real Estate Index.

## Correlation

The Real Estate Index is a theoretical financial calculation, while the Real Estate Fund is an actual investment portfolio. The performance of the Real Estate Fund and the Real Estate Index may vary due to transaction costs, non-U.S. currency valuations, asset valuations, corporate actions (such as mergers and spin-offs), timing variances and differences between the Real Estate Fund's portfolio and the Real Estate Index resulting from legal restrictions (such as diversification requirements) that apply to the Real Estate Fund but not to the Real Estate Index or the use of representative sampling. "Tracking error" is the difference between the performance (return) of the Real Estate Fund's portfolio and that of the Real Estate Index. BFA expects that, over time, the Real Estate Fund's tracking error will not exceed 5%. Because the Real Estate Fund uses a representative sampling indexing strategy, it can be expected to have a larger tracking error than if it used a replication indexing strategy. "Replication" is an indexing strategy in which a fund invests in substantially all of the securities in its underlying index in approximately the same proportions as in the underlying index.

## Industry Concentration Policy

The Real Estate Fund will concentrate its investments (*i.e.*, hold 25% or more of its total assets) in a particular industry or group of industries to approximately the same extent that the Real Estate Index is concentrated. For purposes of this limitation, securities of the U.S. government (including its agencies and instrumentalities) and repurchase agreements collateralized by U.S. government securities are not considered to be issued by members of any industry.

## Holdings Information

The holding information for the Real Estate Fund is updated on a daily basis. As of November 8, 2011, 99.79% of the Real Estate Fund's holdings consisted of stock, 0.05% consisted of cash and 0.16% was in other assets, including dividends booked but not yet received. The following tables summarize the Real Estate Fund's top holdings as of such date.

### Top 10 Holdings as of November 8, 2011

| Company                         | Percentage of<br>Total Holdings |
|---------------------------------|---------------------------------|
| Simon Property Group, Inc.      | 9.43%                           |
| Public Storage                  | 4.40%                           |
| Equity Residential              | 4.31%                           |
| Annaly Capital Management, Inc. | 3.95%                           |
| HCP, Inc.                       | 3.88%                           |
| Vornado Realty Trust            | 3.80%                           |
| Boston Properties, Inc.         | 3.60%                           |
| Ventas, Inc.                    | 3.54%                           |
| Prologis Inc.                   | 3.36%                           |
| Avalonbay Communities, Inc.     | 3.04%                           |

The information above was compiled from the iShares® website. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

## Historical Performance of the Real Estate Fund

We will provide historical price information with respect to the shares of the Real Estate Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

## Disclaimer

The securities are not sponsored, endorsed, sold or promoted by BTC. BTC makes no representations or warranties to the owners of the securities or any member of the public regarding the advisability of investing in the securities. BTC has no obligation or liability in connection with the operation, marketing, trading or sale of the securities.

## The Dow Jones U.S. Real Estate Index

We have derived all information contained in this underlying supplement regarding the Dow Jones U.S. Real Estate Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, Dow Jones Indexes ("Dow Jones"). We make no representation or warranty as to the accuracy or completeness of such information. The Dow Jones U.S. Real Estate Index is calculated, maintained and published by Dow Jones. Dow Jones is under no obligation to continue to publish, and may discontinue publication of, the Dow Jones U.S. Real Estate Index.

### *Dow Jones U.S. Real Estate Index Composition and Maintenance*

The Dow Jones U.S. Real Estate Index measures the performance of the real estate sector of the United States equity market. Component companies include those that invest directly or indirectly in real estate through development, investment or ownership; companies that provide services to real estate companies but do not own the properties themselves (agencies, brokers, leasing companies, management companies and advisory services); and real estate investment trusts or corporations ("REITs") or listed property trusts ("LPTs") that invest in office, industrial, retail, residential, specialty (*e.g.*, health care), hotel, lodging and other properties or that are directly involved in lending money to real estate owners and operators or indirectly through the purchase of mortgages or mortgage-backed securities. REITs are passive investment vehicles that invest primarily in income producing real estate or real estate-related loans and interests.

The Dow Jones U.S. Real Estate Index is one of the 19 supersector indices that make up the Dow Jones U.S. Index. The Dow Jones U.S. Real Estate Index is a subset of the Dow Jones U.S. Financials Index, which in turn is a subset of the Dow Jones U.S. Index. The Dow Jones U.S. Index is part of the Dow Jones Global Index<sup>SM</sup> family, which is a benchmark family that represents approximately 95% of the float-adjusted market capitalization of countries that are open to foreign investors. The Dow Jones Global Index<sup>SM</sup> family represents 42 countries. The Dow Jones U.S. Real Estate Index is weighted by float-adjusted market capitalization, rather than full market capitalization, to reflect the actual number of shares available to investors.

To establish the investable universe, index component candidates are filtered through screens for share class and liquidity. For share class, index component candidates must be common shares or other securities that have the characteristics of common equities. All classes of common shares, both fully and partially paid, are eligible. Fixed dividend shares and securities such as convertible notes, warrants, rights, mutual funds, unit investment trusts, closed-end fund shares and shares in limited partnerships are not eligible. Temporary issues arising from corporate actions, such as "when-issued shares," are considered on a case-by-case basis when necessary to maintain continuity in a company's index membership. REITs, LPTs and similar real-property-owning pass-through structures taxed as REITs by their domiciles also are eligible. Multiple classes of shares are included if each issue, on its own merit, meets the other eligibility criteria. For liquidity, securities that have had more than ten non-trading days during the past quarter are excluded.



Stocks in the investable universe are sorted by float-adjusted market capitalization. Stocks in the top 95% of the index universe by float-adjusted market capitalization (as of December 1998) are selected as components of the Dow Jones U.S. Index, excluding stocks that fall within the bottom 1% of the universe by float-adjusted market capitalization (as currently measured) and within the bottom 0.01% of the universe by turnover (as currently measured).

Stocks selected as components of the Dow Jones U.S. Index are then classified into Subsectors based on their primary source of revenue. The Subsectors are rolled up into Sectors, which in turn are rolled up into Supersectors and finally into Industries. Subsectors, Sectors, Supersectors and Industries are defined by a proprietary classification system used by Dow Jones. The Dow Jones U.S. Real Estate Index is a Supersector that is a subset of the Dow Jones Financials Index.

The Dow Jones U.S. Real Estate Index is reviewed by Dow Jones on a quarterly basis. Shares outstanding totals for component stocks are updated during the quarterly review. However, if the number of float-adjusted shares outstanding for an index component changes by more than 10% due to a corporate action, the shares total will be adjusted immediately after the close of trading on the date of the event. Whenever possible, Dow Jones will announce the change at least two business days prior to its implementation. Changes in shares outstanding due to stock dividends, splits and other corporate actions also are adjusted immediately after the close of trading on the day they become effective. Quarterly reviews are implemented during March, June, September and December. Both component changes and share changes become effective at the opening on the first Monday after the third Friday of the review month. Changes to the Dow Jones U.S. Real Estate Index are implemented after the official closing values have been established. All adjustments are made before the start of the next trading day. Constituent changes that result from the periodic review will be announced on the second Friday of the third month of each quarter (*e.g.*, March, June, September and December).

In addition to the scheduled quarterly review, the Dow Jones U.S. Real Estate Index is reviewed on an ongoing basis. Changes in index composition and related weight adjustments are necessary whenever there are extraordinary events such as delistings, bankruptcies, mergers or takeovers involving index components. In these cases, each event will be taken into account as soon as it is effective. Whenever possible, the changes in the index components will be announced at least two business days prior to their implementation date. In the event that a component no longer meets the eligibility requirements, it will be removed from the Dow Jones U.S. Real Estate Index.

## THE iSHARES® MSCI BRAZIL INDEX FUND

We have derived all information contained in this underlying supplement regarding the iShares® MSCI Brazil Index Fund (the “EWZ Fund”), including, without limitation, its make up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, iShares®, Inc., BlackRock Institutional Trust Company, N.A. (“BTC”) and BlackRock Fund Advisors (“BFA”). The EWZ Fund is an investment portfolio maintained and managed by iShares®, Inc. BFA is currently the investment adviser to the EWZ Fund. The EWZ Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca under the ticker symbol “EWZ.” We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

iShares®, Inc. is a registered investment company that consists of numerous separate investment portfolios, including the EWZ Fund. Information provided to or filed with the SEC by iShares®, Inc. pursuant to the Securities Act of 1933 and the Investment Company Act of 1940 can be located by reference to SEC file numbers 033-97598 and 811-09102, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding iShares®, Inc., BFA and the EWZ Fund, please see the EWZ Fund’s prospectus. In addition, information about iShares® and the EWZ Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the iShares® website at [www.ishares.com](http://www.ishares.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

### Investment Objective and Strategy

The EWZ Fund seeks to provide investment results that correspond generally to the price and yield performance, before fees and expenses, of publicly traded securities in the Brazilian market, as measured by the MSCI Brazil Index. The EWZ Fund holds equity securities traded primarily in Brazil. The MSCI Brazil Index was developed by MSCI Inc. (“MSCI”) as an equity benchmark for Brazilian stock performance, and is designed to measure equity market performance in Brazil. For more information about the MSCI Brazil Index, please see “The MSCI Indices” in this underlying supplement.

As of September 30, 2011, the EWZ Fund’s three largest equity securities were Petrobras Petroleo Brasileiro SA, Preferred; Cia Vale do Rio Doce, Preferred-Class A and Itau Unibanco Banco Multiplo SA. Its three largest sectors were financials, materials and energy.

The EWZ Fund uses a representative sampling indexing strategy (as described below under “Representative Sampling”) to try to track the MSCI Brazil Index. The EWZ Fund generally invests at least 95% of its assets in the securities of the MSCI Brazil Index and in depositary receipts representing securities included in the MSCI Brazil Index. The EWZ Fund will at all times invest at least 80% of its assets in the securities of the MSCI Brazil Index or in depositary receipts representing securities included in the MSCI Brazil Index. The EWZ Fund may invest the remainder of its assets in other securities, including securities not in the MSCI Brazil Index, but which BFA believes will help the EWZ Fund track the MSCI Brazil Index, futures contracts, options on futures contracts, other types of options and swaps related to the MSCI Brazil Index, as well as cash and cash equivalents, including shares of money market funds affiliated with BFA or its affiliates.

### Representative Sampling

BFA uses a “representative sampling” indexing strategy to manage the EWZ Fund. “Representative sampling” is an indexing strategy that involves investing in a representative sample of securities that collectively has an investment profile similar to the MSCI Brazil Index. Securities selected are expected to have, in the aggregate, investment characteristics (based on factors such as

market capitalization and industry weightings), fundamental characteristics (such as return variability and yield) and liquidity measures similar to those of the MSCI Brazil Index. The EWZ Fund may or may not hold all of the securities in the MSCI Brazil Index.

### Correlation

The MSCI Brazil Index is a theoretical financial calculation, while the EWZ Fund is an actual investment portfolio. The performance of the EWZ Fund and the MSCI Brazil Index may vary due to transaction costs, non-U.S. currency valuation, asset valuations, corporate actions (such as mergers and spin-offs), timing variances and differences between the EWZ Fund's portfolio and the MSCI Brazil Index resulting from legal restrictions (such as diversification requirements) that apply to the EWZ Fund but not to the MSCI Brazil Index or the use of representative sampling. "Tracking error" is the difference between the performance (return) of a fund's portfolio and that of its underlying index. BFA expects that, over time, the EWZ Fund's tracking error will not exceed 5%. The EWZ Fund, using a representative sampling strategy, can be expected to have a greater tracking error than a fund using a replication strategy. Replication is a strategy in which a fund invests in substantially all of the securities in its underlying index in approximately the same proportions as in the underlying index.

### Industry Concentration Policy

The EWZ Fund will concentrate its investments (*i.e.*, hold 25% or more of its total assets) in a particular industry or group of industries to approximately the same extent that the MSCI Brazil Index is concentrated. For purposes of this limitation, securities of the U.S. government (including its agencies and instrumentalities) and repurchase agreements collateralized by U.S. government securities are not considered to be issued by members of any industry.

### Holdings Information

As of September 30, 2011, 99.46% of the EWZ Fund's holdings consisted of equity securities, 0.06% consisted of cash and 0.48% was in other assets, including dividends booked but not yet received. The following tables summarize the EWZ Fund's top holdings in individual companies and by sector as of such date.

#### Top holdings in individual securities as of September 30, 2011

| Company                                     | Percentage of Total Holdings |
|---|------------------------------|
| Petrobras Petroleo Brasileiro SA, Preferred | 9.56%                        |
| Cia Vale do Rio Doce, Preferred-Class A     | 9.42%                        |
| Itau Unibanco Banco Multiplo SA             | 7.91%                        |
| Petrobras Petroleo Brasileiro SA            | 7.40%                        |
| Cia Vale do Rio Doce, ADR                   | 6.54%                        |
| Banco Bradesco SA, Preferred                | 6.14%                        |
| Cia de Bebidas das Americas, Preferred      | 5.05%                        |
| Itausa-Investimentos Itau, Preferred        | 2.70%                        |
| BRF Brasil Foods SA                         | 2.58%                        |
| BM&F Bovespa SA                             | 2.06%                        |

### Top holdings by sector as of September 30, 2011

| Sector                     | Percentage of<br>Total Holdings |
|----------------------------|---------------------------------|
| Financials                 | 24.23%                          |
| Materials                  | 23.00%                          |
| Energy                     | 20.23%                          |
| Consumer Staples           | 10.91%                          |
| Utilities                  | 6.06%                           |
| Consumer Discretionary     | 4.35%                           |
| Telecommunication Services | 3.59%                           |
| Industrials                | 3.59%                           |
| Information Technology     | 2.59%                           |
| Health Care                | 0.92%                           |
| Other/Undefined            | 0.54%                           |

The information above was compiled from the iShares® website. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

### Historical Performance of the EWZ Fund

We will provide historical price information with respect to the shares of the EWZ Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

### Disclaimer

The notes are not sponsored, endorsed, sold, or promoted by BTC. BTC makes no representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. BTC has no obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## THE iSHARES® MSCI EMERGING MARKETS INDEX FUND

We have derived all information contained in this underlying supplement regarding the iShares® MSCI Emerging Markets Index Fund (the “EEM Fund”), including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, iShares®, Inc., BlackRock Institutional Trust Company, N.A. (“BTC”) and BlackRock Fund Advisors (“BFA”). The EEM Fund is an investment portfolio maintained and managed by iShares®, Inc. BFA is currently the investment adviser to the EEM Fund. The EEM Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca, Inc. (“NYSE Arca”) under the ticker symbol “EEM.” We make no representation or warranty as to the accuracy or completeness of the information derived from these public sources.

iShares®, Inc. is a registered investment company that consists of numerous separate investment portfolios, including the EEM Fund. Information provided to or filed with the SEC by iShares®, Inc. pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 033-97598 and 811-09102, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding iShares®, Inc., BFA and the EEM Fund, please see the EEM Fund’s prospectus. In addition, information about iShares® and the EEM Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the iShares® website at [www.ishares.com](http://www.ishares.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

### Investment Objective and Strategy

The EEM Fund seeks to provide investment results that correspond generally to the price and yield performance, before fees and expenses, of publicly traded securities in emerging markets, as measured by the MSCI Emerging Markets Index. The EEM Fund holds equity securities traded primarily in the global emerging markets. The MSCI Emerging Markets Index was developed by MSCI Inc. (“MSCI”) as an equity benchmark for international stock performance, and is designed to measure equity market performance in the global emerging markets. For more information about the MSCI Emerging Markets Index, please see “The MSCI Indices” in this underlying supplement.

As of September 30, 2011, the EEM Fund holdings by country consisted of the following 23 countries: Brazil, Chile, China, Colombia, Czech Republic, Egypt, Hong Kong, Hungary, India, Indonesia, Luxembourg, Malaysia, Mexico, Peru, Philippines, Poland, Russia, South Africa, South Korea, Taiwan, Thailand, Turkey and the United States. In addition, as May 31, 2011, the EEM Fund’s three largest holdings by country were China, Brazil and South Korea. As of such date, its three largest equity securities were Samsung Electronics Co., Ltd., Petróleo Brasileiro S.A. - Preferred and Vale S.A., and its three largest sectors were financials, energy and materials.

The EEM Fund uses a representative sampling indexing strategy (as described below under “Representative Sampling”) to try to track the MSCI Emerging Markets Index. The EEM Fund generally invests at least 90% of its assets in securities of the MSCI Emerging Markets Index and depository receipts representing securities in the MSCI Emerging Markets Index. In addition, the EEM Fund may invest up to 10% of its assets in other securities, including securities not in the MSCI Emerging Markets Index, but which BFA believes will help the EEM Fund track the MSCI Emerging Markets Index, futures contracts, options on futures contracts, other types of options and swaps related to the MSCI Emerging Markets Index, as well as cash and cash equivalents, including shares of money market funds affiliated with BFA or its affiliates.

## Representative Sampling

The EEM Fund pursues a “representative sampling” indexing strategy in attempting to track the performance of the MSCI Emerging Markets Index, and generally does not hold all of the equity securities included in the MSCI Emerging Markets Index. The EEM Fund invests in a representative sample of securities that collectively has an investment profile similar to the MSCI Emerging Markets Index. Securities selected are expected to have, in the aggregate, investment characteristics (based on factors such as market capitalization and industry weightings), fundamental characteristics (such as return variability and yield) and liquidity measures similar to those of the MSCI Emerging Markets Index.

## Correlation

The MSCI Emerging Markets Index is a theoretical financial calculation, while the EEM Fund is an actual investment portfolio. The performance of the EEM Fund and the MSCI Emerging Markets Index will vary due to transaction costs, foreign currency valuation, asset valuations, corporate actions (such as mergers and spin-offs), timing variances, and differences between the EEM Fund’s portfolio and the MSCI Emerging Markets Index resulting from legal restrictions (such as diversification requirements) that apply to the EEM Fund but not to the MSCI Emerging Markets Index or the use of representative sampling. A figure of 100% would indicate perfect correlation. “Tracking error” is the difference between the performance (return) of the EEM Fund’s portfolio and the MSCI Emerging Markets Index. BFA expects that, over time, the EEM Fund’s tracking error will not exceed 5%. The EEM Fund, using a representative sampling indexing strategy, can be expected to have a greater tracking error than a fund using a replication indexing strategy. Replication is an indexing strategy in which a fund invests in substantially all of the securities in its underlying index in approximately the same proportions as in the underlying index.

## Industry Concentration Policy

The EEM Fund will concentrate its investments (*i.e.*, hold 25% or more of its total assets) in a particular industry or group of industries to approximately the same extent that the MSCI Emerging Markets Index is concentrated. For purposes of this limitation, securities of the U.S. government (including its agencies and instrumentalities) and repurchase agreements collateralized by U.S. government securities are not considered to be issued by members of any industry.

## Holdings Information

As of September 30, 2011, 99.56% of the EEM Fund’s holdings consisted of equity securities, 0.12% consisted of cash and 0.33% was in other assets, including dividends booked but not yet received. The following tables summarize the EEM Fund’s top holdings in individual companies and by sector as of such date.

### Top holdings in individual securities as of September 30, 2011

| Company                              | Percentage of Total Holdings |
|--------------------------------------|------------------------------|
| Samsung Electronics Co., Ltd.        | 2.57%                        |
| China Mobile Limited                 | 1.92%                        |
| OAO Gazprom                          | 1.65%                        |
| América Móvil SAB De C.V.            | 1.42%                        |
| Petróleo Brasileiro S.A. - Preferred | 1.39%                        |
| Vale S.A.                            | 1.34%                        |

| <b>Company</b>                          | <b>Percentage of<br/>Total Holdings</b> |
|---|---|
| Petróleo Brasileiro S.A.                | 1.37%                                   |
| CNOOC Ltd.                              | 0.99%                                   |
| Itaú Unibanco Holding S.A.              | 0.97%                                   |
| Industrial and Commercial Bank of China | 0.97%                                   |

**Top holdings by sector as of September 30, 2011**

| <b>Sector</b>              | <b>Percentage of<br/>Total Holdings</b> |
|----------------------------|---|
| Financials                 | 22.89%                                  |
| Energy                     | 13.90%                                  |
| Materials                  | 13.53%                                  |
| Information Technology     | 13.10%                                  |
| Telecommunication Services | 8.62%                                   |
| Consumer Discretionary     | 8.13%                                   |
| Consumer Staples           | 7.92%                                   |
| Industrials                | 6.98%                                   |
| Utilities                  | 3.30%                                   |
| Health Care                | 1.17%                                   |
| Other/Undefined            | 0.46%                                   |

The information above was compiled from the iShares® website. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

**Historical Performance of the EEM Fund**

We will provide historical price information with respect to the shares of the EEM Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

**Disclaimer**

The securities are not sponsored, endorsed, sold or promoted by BTC. BTC makes no representations or warranties to the owners of the securities or any member of the public regarding the advisability of investing in the securities. BTC has no obligation or liability in connection with the operation, marketing, trading or sale of the securities.

## THE iSHARES® MSCI EAFE INDEX FUND

We have derived all information contained in this underlying supplement regarding the iShares® MSCI EAFE Index Fund (the “EFA Fund”), including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, iShares® Trust, BlackRock Institutional Trust Company, N.A. (“BTC”) and BlackRock Fund Advisors (“BFA”). The EFA Fund is an investment portfolio maintained and managed by iShares® Trust. BFA is currently the investment adviser to the EFA Fund. The EFA Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca, Inc. (“NYSE Arca”) under the ticker symbol “EFA.” We make no representation or warranty as to the accuracy or completeness of the information derived from these public sources.

iShares® Trust is a registered investment company that consists of numerous separate investment portfolios, including the EFA Fund. Information provided to or filed with the SEC by iShares® Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-92935 and 811-09729, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding iShares® Trust, BFA and the EFA Fund, please see the EFA Fund’s prospectus. In addition, information about iShares® and the EFA Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the iShares® website at [www.ishares.com](http://www.ishares.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

### Investment Objective and Strategy

The EFA Fund seeks to provide investment results that correspond generally to the price and yield performance, before fees and expenses, of publicly traded securities in developed European, Australasian and Far Eastern markets, as measured by the MSCI EAFE® Index. The EFA Fund holds equity securities traded primarily in certain developed markets. The MSCI EAFE® Index was developed by MSCI Inc. (“MSCI”) as an equity benchmark for international stock performance, and is designed to measure equity market performance in certain developed markets. For more information about the MSCI EAFE® Index, please see “The MSCI Indices” in this underlying supplement.

As of September 30, 2011, the EFA Fund holdings by country consisted of the following 30 countries: Australia, Austria, Belgium, Bermuda, Cayman Islands, China, Cyprus, Denmark, Finland, France, Germany, Greece, Hong Kong, Ireland, Israel, Italy, Japan, Jersey, Luxembourg, Macau, the Netherlands, New Zealand, Norway, Portugal, Singapore, Spain, Sweden, Switzerland, the United States and the United Kingdom. In addition, as of September 30, 2011, the EFA Fund’s three largest holdings by country were Japan, the United Kingdom and France. As of such date, its three largest equity securities were Nestle S.A., HSBC Holdings plc, and Vodafone Group plc, and its three largest sectors were financials, industrials and consumer staples.

The EFA Fund uses a representative sampling indexing strategy (as described below under “Representative Sampling”) to try to track the MSCI EAFE® Index. The EFA Fund generally invests at least 90% of its assets in securities of the MSCI EAFE® Index and depository receipts representing securities of the MSCI EAFE® Index. In addition, the EFA Fund may invest up to 10% of its assets in securities not included in the MSCI EAFE® Index but which BFA believes will help the EFA Fund track the MSCI EAFE® Index and in futures contracts, options on futures contracts, options and swaps as well as cash and cash equivalents, including shares of money market funds advised by BFA or its affiliates.



## Representative Sampling

The EFA Fund pursues a “representative sampling” indexing strategy in attempting to track the performance of the MSCI EAFE® Index, and generally does not hold all of the equity securities included in the MSCI EAFE® Index. The EFA Fund invests in a representative sample of securities that collectively has an investment profile similar to the MSCI EAFE® Index. Securities selected are expected to have, in the aggregate, investment characteristics (based on factors such as market capitalization and industry weightings), fundamental characteristics (such as return variability and yield) and liquidity measures similar to those of the MSCI EAFE® Index.

## Correlation

The MSCI EAFE® Index is a theoretical financial calculation, while the EFA Fund is an actual investment portfolio. The performance of the EFA Fund and the MSCI EAFE® Index will vary due to transaction costs, foreign currency valuation, asset valuations, corporate actions (such as mergers and spin-offs), timing variances, and differences between the EFA Fund’s portfolio and the MSCI EAFE® Index resulting from legal restrictions (such as diversification requirements) that apply to the EFA Fund but not to the MSCI EAFE® Index or the use of representative sampling. “Tracking error” is the difference between the performance (return) of the EFA Fund’s portfolio and that of the MSCI EAFE® Index. BFA expects that, over time, the EFA Fund’s tracking error will not exceed 5%. The EFA Fund, using a representative sampling indexing strategy, can be expected to have a greater tracking error than a fund using a replication indexing strategy. Replication is an indexing strategy in which a fund invests in substantially all of the securities in its underlying index in approximately the same proportions as in the underlying index.

## Industry Concentration Policy

The EFA Fund will concentrate its investments (*i.e.*, hold 25% or more of its total assets) in a particular industry or group of industries to approximately the same extent that the MSCI EAFE® Index is concentrated. For purposes of this limitation, securities of the U.S. government (including its agencies and instrumentalities) and repurchase agreements collateralized by U.S. government securities are not considered to be issued by members of any industry.

## Holdings Information

As of September 30, 2011 99.37% of the EFA Fund’s holdings consisted of equity securities, 0.04% consisted of cash and 0.59% was in other assets, including dividends booked but not yet received. The following tables summarize the EFA Fund’s top holdings in individual companies and by sector as of such date.

### Top holdings in individual securities as of September 30, 2011

| Company            | Percentage of Total Holdings |
|--------------------|------------------------------|
| Nestle S.A.        | 2.05%                        |
| HSBC Holdings plc  | 1.48%                        |
| Vodafone Group plc | 1.43%                        |
| Novartis AG        | 1.41%                        |
| BP plc             | 1.23%                        |
| Roche Holding AG   | 1.23%                        |

| <b>Company</b>        | <b>Percentage of<br/>Total Holdings</b> |
|-----------------------|---|
| Royal Dutch Shell plc | 1.21%                                   |
| BHP Billiton Limited  | 1.17%                                   |
| Glaxosmithkline plc   | 1.15%                                   |
| Toyota Motor Corp     | 1.03%                                   |

**Top holdings by sector as of September 30, 2011**

| <b>Sector</b>              | <b>Percentage of<br/>Total Holdings</b> |
|----------------------------|---|
| Financials                 | 22.00%                                  |
| Industrials                | 12.31%                                  |
| Consumer Staples           | 11.31%                                  |
| Consumer Discretionary     | 10.12%                                  |
| Materials                  | 9.98%                                   |
| Health Care                | 9.64%                                   |
| Energy                     | 8.10%                                   |
| Telecommunication Services | 6.17%                                   |
| Information Technology     | 4.90%                                   |
| Utilities                  | 4.83%                                   |
| Other/Undefined            | 0.63%                                   |

The information above was compiled from the iShares® website. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or the relevant terms supplement.

**Historical Performance of the EFA Fund**

We will provide historical price information with respect to the shares of the EFA Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

**Disclaimer**

The securities are not sponsored, endorsed, sold or promoted by BTC. BTC makes no representations or warranties to the owners of the securities or any member of the public regarding the advisability of investing in the securities. BTC has no obligation or liability in connection with the operation, marketing, trading or sale of the securities.

## THE iSHARES® RUSSELL 2000 INDEX FUND

We have derived all information contained in this underlying supplement regarding the iShares® Russell 2000 Index Fund, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, iShares® Trust, BlackRock Institutional Trust Company, N.A. (“BTC”) and BlackRock Fund Advisors (“BFA”). The iShares® Russell 2000 Index Fund is an investment portfolio maintained and managed by iShares® Trust. BFA is currently the investment adviser to the iShares® Russell 2000 Index Fund. The iShares® Russell 2000 Index Fund is an exchange-traded fund (“ETF”) that trades on the NYSE Arca, Inc. (“NYSE Arca”) under the ticker symbol “IWM.” We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

iShares® Trust is a registered investment company that consists of numerous separate investment portfolios, including the iShares® Russell 2000 Index Fund. Information provided to or filed with the SEC by iShares® Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-92935 and 811-09729, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding iShares® Trust, BFA and the iShares® Russell 2000 Index Fund, please see the iShares® Russell 2000 Index Fund’s prospectus. In addition, information about iShares® Trust and the iShares® Russell 2000 Index Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the iShares® website at [www.ishares.com](http://www.ishares.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

### Investment Objective and Strategy

The iShares® Russell 2000 Index Fund seeks investment results that correspond generally to the price and yield performance, before fees and expenses, of the Russell 2000® Index. See “Equity Index Descriptions — The Russell Indices” above for more information about the Russell 2000® Index. The iShares® Russell 2000 Index Fund’s investment objective and the Russell 2000® Index may be changed without shareholder approval.

As of November 7, 2011, the iShares® Russell 2000 Index Fund’s three largest holdings were Healthspring, Inc., Netlogic Microsystems, Inc., and World Fuel Services Corporation, and its three largest sectors were financial services, technology and consumer discretionary.

The iShares® Russell 2000 Index Fund uses a representative sampling indexing strategy (as described below under “— Representative Sampling”) to try to track the Russell 2000® Index. The iShares® Russell 2000 Index Fund generally invests at least 90% of its assets in the securities of the Russell 2000® Index and in depositary receipts representing securities of the Russell 2000® Index. The iShares® Russell 2000 Index Fund may invest the remainder of its assets in securities not included in the Russell 2000® Index, but which BFA believes will help the iShares® Russell 2000 Index Fund track the Russell 2000® Index. The iShares® Russell 2000 Index Fund also may invest its other assets in futures contracts, options on futures contracts, options and swaps, as well as cash and cash equivalents, including shares of money market funds affiliated with BFA or its affiliates.

### Representative Sampling

The iShares® Russell 2000 Index Fund pursues a “representative sampling” indexing strategy in attempting to track the performance of the Russell 2000® Index. The iShares® Russell 2000 Index Fund invests in a representative sample of securities in the Russell 2000® Index that collectively has an investment profile similar to the Russell 2000® Index. The securities selected are expected to

have, in the aggregate, investment characteristics (based on factors such as market capitalization and industry weightings), fundamental characteristics (such as return variability and yield) and liquidity measures similar to those of the Russell 2000® Index. The iShares® Russell 2000 Index Fund may or may not hold all of the securities that are included in the Russell 2000® Index.

## Correlation

The Russell 2000® Index is a theoretical financial calculation, while the iShares® Russell 2000 Index Fund is an actual investment portfolio. The performance of the iShares® Russell 2000 Index Fund and the Russell 2000® Index may vary due to transaction costs, non-U.S. currency valuation, asset valuations, corporate actions (such as mergers and spin-offs), timing variances and differences between the iShares® Russell 2000 Index Fund's portfolio and the Russell 2000® Index resulting from legal restrictions (such as diversification requirements) that apply to the iShares® Russell 2000 Index Fund but not to the Russell 2000® Index or due to the use of representative sampling. "Tracking error" is the difference between the performance (return) of the iShares® Russell 2000 Index Fund's portfolio and that of the Russell 2000® Index. BFA expects that, over time, the iShares® Russell 2000 Index Fund's tracking error will not exceed 5%. Because the fund uses a representative sampling indexing strategy, it can be expected to have a greater tracking error than if it used a replication indexing strategy. "Replication" is an indexing strategy in which a fund invests in substantially all of the securities in its underlying index in approximately the same proportions as in the underlying index.

## Industry Concentration Policy

The iShares® Russell 2000 Index Fund will concentrate its investments (*i.e.*, hold 25% or more of its total assets) in a particular industry or group of industries to approximately the same extent that the Russell 2000® Index is concentrated. For purposes of this limitation, securities of the U.S. government (including its agencies and instrumentalities) and repurchase agreements collateralized by U.S. government securities are not considered to be issued by members of any industry.

## Holdings Information

As of November 7, 2011, 99.88% of the iShares® Russell 2000 Index Fund's holdings consisted of equity securities, 0.06% consisted of cash and 0.05% consisted of other assets, including dividends booked but not yet received. The following tables summarize the iShares® Russell 2000 Index Fund's top holdings in individual companies and by sector as of such date.

### Top holdings in individual securities as of November 7, 2011

| Company                            | Percentage of Total Holdings |
|------------------------------------|------------------------------|
| Healthspring, Inc.                 | 0.33%                        |
| Netlogic Microsystems, Inc.        | 0.30%                        |
| World Fuel Services Corporation    | 0.26%                        |
| Jack Henry and Associates, Inc.    | 0.25%                        |
| Home Properties, Inc.              | 0.25%                        |
| Nu Skin Enterprises, Inc.          | 0.25%                        |
| American Campus Communities, Inc.  | 0.24%                        |
| Clean Harbors, Inc.                | 0.24%                        |
| Complete Production Services, Inc. | 0.24%                        |
| Signature Bank                     | 0.24%                        |

### Top holdings by sector as of November 7, 2011

| Sector                 | Percentage of<br>Total Holdings |
|------------------------|---------------------------------|
| Financial Services     | 22.37%                          |
| Technology             | 15.19%                          |
| Consumer Discretionary | 14.60%                          |
| Producer Durables      | 14.04%                          |
| Health Care            | 12.33%                          |
| Materials & Processing | 6.92%                           |
| Energy                 | 6.74%                           |
| Utilities              | 4.63%                           |
| Consumer Staples       | 3.06%                           |
| S-T Securities         | 0.06%                           |
| Other/Undefined        | 0.05%                           |

The information above was compiled from the iShares® website. We make no representation or warranty as to the accuracy of the information above. Information contained in the iShares® website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### Historical Performance of the iShares® Russell 2000 Index Fund

We will provide historical price information with respect to the shares of the iShares® Russell 2000 Index Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

### Disclaimer

The notes are not sponsored, endorsed, sold or promoted by BFA. BFA makes no representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. BFA has no obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## **THE MARKET VECTORS GOLD MINERS ETF**

We have derived all information contained in this underlying supplement regarding the Market Vectors Gold Miners ETF (the "GDX Fund") from publicly available information. Such information reflects the policies of, and is subject to change by, Market Vectors ETF Trust and Van Eck Associates Corporation ("Van Eck"). We make no representation or warranty as to the accuracy or completeness of such information. The GDX Fund is an investment portfolio of the Market Vectors ETF Trust (the "Trust"). Van Eck is currently the investment adviser to the GDX Fund. The GDX Fund is an exchange-traded fund that trades on the NYSE Arca, Inc. under the ticker symbol "GDX." We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

The Trust is a registered investment company that consists of numerous separate investment portfolios, including the GDX Fund. Information provided to or filed with the SEC by the Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-123257 and 811-10325, respectively, through the SEC's website at <http://www.sec.gov>. For additional information regarding the Trust, Van Eck and the GDX Fund, please see the GDX Fund's prospectus. In addition, information about the Trust and the GDX Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the Van Eck website at [www.vaneck.com](http://www.vaneck.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the Van Eck website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### **Investment Objective and Strategy**

The GDX Fund seeks to replicate as closely as possible, before fees and expenses, the price and yield performance of the NYSE Arca Gold Miners Index (the "Gold Miners Index"). See "The NYSE Arca Gold Miners Index" below for more information about the Gold Miners Index. The GDX Fund's investment objective may be changed without shareholder approval.

As of November 8, 2011, the GDX Fund's three largest holdings were Barrick Gold Corporation, Goldcorp Inc. and Newmont Mining Corporation, and as of September 30, 2011, its three largest countries by holding were Canada, the United States and South Africa.

### **Indexing Investment Approach**

The GDX Fund uses a "passive" or indexing investment approach to attempt to approximate the investment performance of the Gold Miners Index. The GDX Fund will normally invest at least 80% of its total assets in companies that are involved in the gold mining industry. The GDX Fund normally invests at least 80% of its total assets in securities that comprise the Gold Miners Index. The GDX Fund may also utilize convertible securities and participation notes to seek performance that corresponds to the Gold Miners Index. The GDX Fund may or may not hold all of the securities that are included in the Gold Miners Index.

### **Correlation**

The Gold Miners Index is a theoretical financial calculation, while the GDX Fund is an actual investment portfolio. The performance of the GDX Fund and the Gold Miners Index may vary somewhat due to operating expenses, transaction costs, and differences between the GDX Fund's portfolio and the Gold Miners Index resulting from legal restrictions that apply to the GDX Fund but not to the Gold Miners Index or lack of liquidity. Van Eck expects that, over time, the correlation between the GDX Fund's performance and that of the Gold Miners Index before fees and expenses will be 95% or better. A figure of 100% would indicate perfect correlation.

## Industry Concentration Policy

The GDX Fund may concentrate its investments in a particular industry or group of industries to the extent that the Gold Miners Index concentrates in an industry or group of industries.

## Holdings Information

As of November 8, 2011, 100.00% of the GDX Fund's holdings consisted of equity securities and 0.00% consisted of cash and other assets. The following tables summarize the GDX Fund's top holdings in individual companies and by country as of such date.

### Top holdings in individual securities as of November 8, 2011

| Company                               | Percentage of Total Holdings |
|---------------------------------------|------------------------------|
| Barrick Gold Corporation              | 16.17%                       |
| Goldcorp Inc.                         | 13.39%                       |
| Newmont Mining Corporation            | 11.00%                       |
| AngloGold Ashanti Limited             | 5.74%                        |
| Kinross Gold Corporation              | 5.17%                        |
| Gold Fields Limited                   | 4.85%                        |
| Yamana Gold Inc.                      | 4.59%                        |
| Randgold Resources Limited            | 4.58%                        |
| Compania De Minas Buenaventura S.A.A. | 4.56%                        |
| Eldorado Gold Corporation             | 4.31%                        |

### Top holdings by country as of September 30, 2011

| Sector         | Percentage of Total Holdings |
|----------------|------------------------------|
| Canada         | 63.90%                       |
| United States  | 14.50%                       |
| South Africa   | 13.00%                       |
| Peru           | 4.30%                        |
| United Kingdom | 4.20%                        |

The information above was compiled from the Van Eck website. We make no representation or warranty as to the accuracy of the information above. Information contained in the Van Eck website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

## Historical Performance of the GDX Fund

We will provide historical price information with respect to the shares of the GDX Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

## **Disclaimer**

The notes are not sponsored, endorsed, sold or promoted by Van Eck. Van Eck makes no representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. Van Eck has no obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## **The NYSE Arca Gold Miners Index**

We have derived all information contained in this underlying supplement regarding the Gold Miners Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information and information supplied by the NYSE Arca. Such information reflects the policies of, and is subject to change by, the NYSE Arca. We make no representation or warranty as to the accuracy or completeness of such information. The Gold Miners Index was developed by the NYSE Amex (formerly the American Stock Exchange) and is calculated, maintained and published by the NYSE Arca. The NYSE Arca has no obligation to continue to publish, and may discontinue the publication of, the Gold Miners Index.

The Gold Miners Index is reported by Bloomberg L.P. under the ticker symbol "GDM."

The Gold Miners Index is a modified market capitalization weighted index comprised of publicly traded companies involved primarily in the mining of gold or silver.

## **Eligibility Criteria for Index Components**

The Gold Miners Index includes common stocks and ADRs of selected companies that are involved in mining for gold and silver and that are listed for trading on the NYSE or the NYSE Amex or quoted on The NASDAQ Stock Market. Only companies with market capitalization greater than \$100 million that have a daily average trading volume of at least 50,000 shares over the past six months are eligible for inclusion in the Gold Miners Index.

## **Index Calculation**

The Gold Miners Index is calculated using a modified market capitalization weighting methodology. The Gold Miners Index is weighted based on the market capitalization of each of the component securities, modified to conform to the following asset diversification requirements, which are applied in conjunction with the scheduled quarterly adjustments to the Gold Miners Index:

- (1) the weight of any single component security may not account for more than 20% of the total value of the Gold Miners Index;
- (2) the component securities are split into two subgroups—large and small, which are ranked by market capitalization weight in the Gold Miners Index. Large stocks are defined as having a Gold Miners Index weight greater than or equal to 5%. Small securities are defined as having a Gold Miners Index weight below 5%; and
- (3) the aggregate weight of those component securities which individually represent more than 4.5% of the total value of the Gold Miners Index may not account for more than 50% of the total Gold Miners Index value.

The Gold Miners Index is reviewed quarterly so that the Gold Miners Index components continue to represent the universe of companies involved in the gold mining industry. The NYSE Arca may at any time and from time to time change the number of securities comprising the group by adding or deleting one or more securities, or replacing one or more securities contained in the group with one or more substitute securities of its choice, if in the NYSE Arca's discretion such



addition, deletion or substitution is necessary or appropriate to maintain the quality and/or character of the Gold Miners Index. Changes to the Gold Miners Index compositions and/or the component share weights in the Gold Miners Index typically take effect after the close of trading on the third Friday of each calendar quarter month in connection with the quarterly index rebalance.

At the time of the quarterly rebalance, the weights for the components stocks (taking into account expected component changes and share adjustments), are modified in accordance with the following procedures.

- **Diversification Rule 1:** If any component stock exceeds 20% of the total value of the Gold Miners Index, then all stocks greater than 20% of the Gold Miners Index are reduced to represent 20% of the value of the Gold Miners Index. The aggregate amount by which all component stocks are reduced is redistributed proportionately across the remaining stocks that represent less than 20% of the index value. After this redistribution, if any other stock then exceeds 20%, the stock is set to 20% of the index value and the redistribution is repeated.

- **Diversification Rule 2:** The components are sorted into two groups, large are components with a starting index weight of 5% or greater and small are those that are under 5% (after any adjustments for Diversification Rule 1). Each group in aggregate will represent 50% of the index weight. The weight of each of the large stocks will be scaled down proportionately with a floor of 5% so that the aggregate weight of the large components will be reduced to represent 50% of the Gold Miners Index. If any component stock falls below a weight equal to the product of 5% and the proportion by which the stocks were scaled down following this distribution, then the weight of the stock is set equal to the product of 5% and the proportion by which the stocks were scaled down, the components with weights greater than 5% will be reduced proportionately. The weight of each of the small components will be scaled up proportionately from the redistribution of the large components. If any component stock exceeds a weight equal to the product of 4.5% and the proportion by which the stocks were scaled down following this distribution, then the weight of the stock is set equal to the product of 4.5% and the proportion by which the stocks were scaled down. The redistribution of weight to the remaining stocks is repeated until the entire amount has been redistributed.

## **Index Maintenance**

The Gold Miners Index is reviewed quarterly to ensure that at least 90% of the index weight is accounted for by index components that continue to meet the initial eligibility requirements. Components will be removed from the Gold Miners Index during the quarterly review, if the market capitalization falls below \$50 million or the traded average daily shares for the previous six months is lower than 25,000 shares. In conjunction with the quarterly review, the share weights used in the calculation of the Gold Miners Index are determined based upon current shares outstanding modified, if necessary, to provide greater Index diversification, as described above. The index components and their share weights are determined and announced prior to taking effect. The share weight of each component stock in the index portfolio remains fixed between quarterly reviews except in the event of certain types of corporate actions such as stock splits, reverse stock splits, stock dividends, or similar events. The share weights used in the index calculation are not typically adjusted for shares issued or repurchased between quarterly reviews. However, in the event of a merger between two components, the share weight of the surviving entity may be adjusted to account for any stock issued in the acquisition. The NYSE Arca may substitute stocks or change the number of stocks included in the Gold Miners Index, based on changing conditions in the industry or in the event of certain types of corporate actions, including mergers, acquisitions, spin-offs, and reorganizations. In the event of component or share weight changes to the index portfolio, the payment of dividends other than ordinary cash dividends, spin-offs, rights offerings, re-capitalization, or other corporate actions affecting a component stock of the Gold Miners Index; the index divisor may be adjusted to ensure that there are no changes to the index level as a result of non-market forces.

## **THE MARKET VECTORS JUNIOR GOLD MINERS ETF**

We have derived all information contained in this underlying supplement regarding the Market Vectors Junior Gold Miners ETF (the “GDXJ Fund”) from publicly available information. Such information reflects the policies of, and is subject to change by, Market Vectors ETF Trust and Van Eck Associates Corporation (“Van Eck”). We make no representation or warranty as to the accuracy or completeness of such information. The GDXJ Fund is an investment portfolio of the Market Vectors ETF Trust (the “Trust”). Van Eck is currently the investment adviser to the GDXJ Fund. The GDXJ Fund is an exchange-traded fund that trades on the NYSE Arca, Inc. under the ticker symbol “GDXJ.” We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

The Trust is a registered investment company that consists of numerous separate investment portfolios, including the GDXJ Fund. Information provided to or filed with the SEC by the Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-123257 and 811-10325, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding the Trust, Van Eck and the GDXJ Fund, please see the GDXJ Fund’s prospectus. In addition, information about the Trust and the GDXJ Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the Van Eck website at [www.vaneck.com](http://www.vaneck.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the Van Eck website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### **Investment Objective and Strategy**

The GDXJ Fund seeks to replicate as closely as possible, before fees and expenses, the price and yield performance of the Market Vectors® Junior Gold Miners Index (the “Junior Gold Miners Index”). See “Market Vectors® Junior Gold Miners Index” below for more information about the Junior Gold Miners Index. The GDXJ Fund’s investment objective may be changed without shareholder approval.

As of November 8, 2011, the GDXJ Fund’s three largest holdings were Aurico Gold Inc., Alamos Gold Inc. and Silvercorp Metals Inc., and as of September 30, 2011, its three largest countries by holding were Canada, Australia and the United States.

### **Indexing Investment Approach**

The GDXJ Fund uses a “passive” or indexing investment approach to attempt to approximate the investment performance of the Junior Gold Miners Index. The GDXJ Fund will normally invest at least 80% of its total assets in companies that are involved in the gold mining industry. The GDXJ Fund invests in foreign and domestic publicly traded companies of small- and medium-capitalization that are involved primarily in the mining for gold and/or silver. The GDXJ Fund normally invests at least 80% of its total assets in securities that comprise the Junior Gold Miners Index. The GDXJ Fund may also utilize convertible securities and participation notes to seek performance that corresponds to the Junior Gold Miners Index. The GDXJ Fund may or may not hold all of the securities that are included in the Junior Gold Miners Index.

### **Correlation**

The Junior Gold Miners Index is a theoretical financial calculation, while the GDXJ Fund is an actual investment portfolio. The performance of the GDXJ Fund and the Junior Gold Miners Index may vary somewhat due to operating expenses, transaction costs, and differences between the GDXJ Fund’s portfolio and the Junior Gold Miners Index resulting from legal restrictions that apply to the GDXJ Fund but not to the Junior Gold Miners Index or lack of liquidity. Van Eck expects that, over time, the correlation between the GDXJ Fund’s performance and that of the Junior Gold Miners Index before fees and expenses will be 95% or better. A figure of 100% would indicate perfect correlation.

### Industry Concentration Policy

The GDXJ Fund may concentrate its investments in a particular industry or group of industries to the extent that the Junior Gold Miners Index concentrates in an industry or group of industries.

### Holdings Information

As of November 8, 2011, 100.00% of the GDXJ Fund's holdings consisted of equity securities and 0.00% consisted of cash and other assets. The following tables summarize the GDXJ Fund's top holdings in individual companies and by country as of such date.

#### Top holdings in individual securities as of November 8, 2011

| <b>Company</b>               | <b>Percentage of<br/>Total Holdings</b> |
|------------------------------|---|
| Aurico Gold Inc.             | 6.67%                                   |
| Alamos Gold Inc.             | 4.39%                                   |
| Silvercorp Metals Inc.       | 3.55%                                   |
| Perseus Mining Ltd.          | 3.28%                                   |
| Medusa Mining Ltd.           | 2.66%                                   |
| Nevsun Resources Ltd.        | 2.63%                                   |
| Minefinders Corporation Ltd. | 2.57%                                   |
| Kirkland Lake Gold Inc.      | 2.52%                                   |
| B2Gold Corp.                 | 2.21%                                   |
| Endeavour Silver Corp.       | 2.17%                                   |

#### Top holdings by country as of September 30, 2011

| <b>Sector</b>  | <b>Percentage of<br/>Total Holdings</b> |
|----------------|---|
| Canada         | 66.40%                                  |
| Australia      | 19.50%                                  |
| United States  | 6.90%                                   |
| United Kingdom | 2.80%                                   |
| South Africa   | 2.10%                                   |
| China          | 1.70%                                   |
| Cayman Islands | 0.60%                                   |

The information above was compiled from the Van Eck website. We make no representation or warranty as to the accuracy of the information above. Information contained in the Van Eck website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### ***Disclaimer***

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### **The Market Vectors® Junior Gold Miners Index**

We have derived all information contained in this underlying supplement regarding the Junior Gold Miners Index, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, the 4asset-management GmbH (the "Index Owner"). We make no representation or warranty as to the accuracy or completeness of such information. The Junior Gold Miners Index was developed by the Index Owner and is maintained and published by the Index Owner. The Junior Gold Miners Index is calculated by Structured Solutions AG. The Index Owner has no obligation to continue to publish, and may discontinue the publication of, the Junior Gold Miners Index.

The Junior Gold Miners Index is reported by Bloomberg L.P. under the ticker symbol "MVGDJX."

The Junior Gold Miners Index tracks the performance of the small-cap segment of the global gold and silver mining industries. The Junior Gold Miners Index was launched on August 31, 2009 with a base index value of 1000 as of December 31, 2003.

### **Index Composition and Maintenance**

#### ***The Index Universe***

The index universe includes only common stocks and stocks with similar characteristics from financial markets that are freely investable for foreign investors and that provide real-time and historical component and currency pricing. Companies from financial markets that are not freely investable for foreign investors or that do not provide real-time and historical component and currency pricing may still be eligible if they have a listing on an eligible exchange and if they meet all the size and liquidity requirements on that exchange.

Only stocks that have a full market capitalization exceeding US\$50 million are eligible for the index universe.

In addition, to be included in the index universe, a security must:

- generate at least 50% of its revenues from gold mining;
- generate at least 50% of its revenues from silver mining;
- own properties that have the potential to generate at least 50% of its revenues from gold or silver when developed; or
- primarily invest in gold or silver.

#### ***Investable Index Universe***

Any stocks from the index universe that have had ten or more non-trading days in a three-month period prior to a quarterly review are ineligible for inclusion in the Junior Gold Miners Index. Companies with a free-float (or shares available to foreign investors) of less than 5% for existing index components or less than 10% for new components are ineligible for inclusion.

In addition to the above, stocks that are currently not in the Junior Gold Miners Index must meet the following size and liquidity requirements:

- a full market capitalization exceeding US\$150 million;
- a three-month average-daily-trading volume of at least US\$1 million at the current review and also at the previous two reviews; and
- at least 250,000 shares traded per month over the last six months at the current review and also at the previous two reviews.

For stocks already in the Junior Gold Miners Index the following applies:

- a full market capitalization exceeding US\$75 million; and
- a three-month average-daily-trading volume of at least US\$0.6 million at the current review or at one of the previous two reviews; or
- at least 200,000 shares traded per month over the last six months at the current review or at one of the previous two reviews.

The Index Owner can, in exceptional cases, use price sources other than the home market even if these price sources are less liquid than the home market listing.

For each stock, the pricing from the respective home market is used. In cases where ADRs, GDRs or similar products, or a secondary listing exists either on an exchange in the U.S., Canada or in the UK, the alternative price source is used (instead of the home market price source) if it meets at least three-times the standard liquidity requirements at a quarterly review, *i.e.*:

- a three-month average-daily-trading volume of at least US\$3.0 million at the current review and also at the previous two reviews; and
- at least 750,000 shares traded per month over the last six months at the current review and also at the previous two reviews.

The Index Owner can, in exceptional cases, use price sources other than the home market even if these price sources are less liquid than the home market listing. Once the price source is switched to the alternative price source, the standard liquidity requirements apply again.

#### *Index Constituent Selection*

The Junior Gold Miners Index is reviewed on a quarterly basis. The Index Owner can, in exceptional cases, add stocks to the Junior Gold Miners Index and also remove stocks from the Junior Gold Miners Index.

The target coverage of the Junior Gold Miners Index is 100% of the free-float market capitalization of the investable universe with at least 25 companies. Index constituents are selected using the following procedure:

- (1) All companies in the index universe are valued by full market capitalization (all secondary lines are grouped). All companies (and not securities) are sorted by full market capitalization in descending order.
- (2) Companies covering the top 90% of the full market capitalization are excluded. Only companies ranking between 90% and 98% qualify for the selection. Existing index companies ranking between 80% and 90% or 98% and 99% also qualify for the selection.

- (3) All companies which qualified in step 2 are now viewed as securities (companies with secondary lines are un-grouped and treated separately). Only securities that meet all requirements of the investable index universe are added to the Junior Gold Miners Index.

The revenue quota for each company is reviewed quarterly; only companies with at least 50% of their revenues in the gold or silver sector are eligible. The revenue quota for companies that have already been in the Junior Gold Miners Index may drop to 25% and these companies would still be eligible. The Index Owner can, in exceptional cases, add stocks to the Junior Gold Miners Index with a lower revenue portion.

#### *Review Schedule*

The Junior Gold Miners Index is reviewed quarterly and changes to the Junior Gold Miners Index are implemented and based on the closing prices of the third Friday of every quarter-end month (*i.e.*, March, June, September and December). If the third Friday is not a business day, then the review will take place on the last business day before the third Friday. If an index constituent does not trade on the third Friday of a quarter-end month, then the last available price for that index constituent will be used. Changes become effective on the next business day.

The reviews are based on the (adjusted) closing data on the last business day in February, May, August and November. If an index constituent does not trade on the last business day in February, May, August or November, then the last available price for this index constituent will be used. The component changes to the Junior Gold Miners Index are announced on the 2nd Friday in a quarter-end month (*i.e.*, March, June, September and December). The Junior Gold Miners Index data (*e.g.*, new number of shares, new free-float factors, and new company weighting cap factors) is announced on the 2nd Friday in a quarter-end month (*i.e.*, March, June, September and December). The weighting cap factors are based on closing data from on the 2nd Wednesday in a quarter-end month (*i.e.*, March, June, September and December).

For purposes of this Appendix A, "business day" means any day (other than a Saturday or Sunday) on which commercial banks and foreign exchange markets settle payments in Stuttgart and London.

#### *Ongoing Maintenance*

In addition to the periodic reviews, the Junior Gold Miners Index is continually reviewed for corporate events (*e.g.*, mergers, takeovers, spin-offs, delistings and bankruptcies) that affect the index components.

*Replacements.* For all corporate events that result in a stock deletion from the Junior Gold Miners Index, the deleted stock will be replaced immediately only if the number of components in the Junior Gold Miners Index would drop below 22. The replacement stock will be added at the same weight as the deleted stock. In all other cases, the additional weight resulting from the deletion will be re-distributed proportionally across all other index constituents.

*Changes to Free-Float Factor and Number of Shares.* Changes to the number of shares or the free-float factors due to corporate actions like stock dividends, splits, rights issues, etc. are implemented immediately and will be effective the next trading day (*i.e.*, the ex date). All other changes are implemented at the quarterly review and will be effective the next trading day after implementation.

*Illiquidity.* Illiquid stocks are deleted immediately if their illiquidity is due to:

- not being traded for 10 consecutive days;
- being suspended from trading for 10 consecutive days; or
- ongoing bankruptcy proceedings: a company that has filed for bankruptcy will be deleted from the Junior Gold Miners Index based either on the traded stock price on its primary market, if available, or the OTC stock price. If neither price is available, the company will be deleted at US\$0.

Changes are announced immediately, implemented three trading days later and become effective the next trading day after implementation. The Index Owner can, in exceptional cases or in temporary situations, decide differently.

*Initial Public Offerings (IPOs).* An IPO stock is eligible for fast-track addition to the Junior Gold Miners Index once (either at the next quarterly review if it has been trading for at least 30 days prior to the review snapshot dates (*i.e.*, the last trading day in February, May, August or November) or else at the then following quarterly review). In order to be added to the Junior Gold Miners Index the IPO stock has to meet the size and liquidity requirements:

- the IPO must have a full market capitalization exceeding US\$150 million;
- the IPO must have an average-daily-trading volume of at least US\$1 million; and
- the IPO must have traded least 250,000 shares per month (or per 22 days).

*Changes due to Mergers & Takeovers.* A merger or takeover is deemed successful if it has been declared wholly unconditional and has received approval of all regulatory agencies with jurisdiction over the transaction. The result of a merger or takeover is one surviving stock and one or more non-surviving stocks that may not necessarily be de-listed from the respective trading system(s). A surviving stock that does not qualify for the Junior Gold Miners Index will be deleted immediately. A surviving stock that qualifies for the Junior Gold Miners Index is added to the Junior Gold Miners Index and replaces the largest of the original stocks. The Index Owner can, in exceptional cases, decide differently.

*Changes due to Spin-Offs.* Each spin-off stock is immediately added to the Junior Gold Miners Index for at least one trading day. If a spin-off company does not qualify for the Junior Gold Miners Index it will be deleted based on its first closing price. The Index Owner can, in exceptional cases, decide differently.

### Index Calculation

The value of the Junior Gold Miners Index is calculated using the Laspeyres' formula, rounded to two decimal places, with stock prices converted to U.S. dollars:

$$\text{Index Value} = \frac{\sum_{i=1}^n p_i \times q_i \times ff_i \times cf_i \times fx_i}{D} = \frac{M}{D}$$

where (for all stocks (i) in the Junior Gold Miners Index):

$p_i$  = stock price (rounded to four decimal places);

$q_i$  = number of shares;

$ff_i$  = free-float factor (rounded to two decimal places);

$fx_i$  = exchange rate (local currency to U.S. Dollar) (rounded to six decimal places);

$cf_i$  = sector-weighting cap factor (if applicable, otherwise set to 1) (rounded to six decimal places);

M = free-float market capitalization of the Junior Gold Miners Index; and

D = divisor (rounded to six decimal places).

#### *Free-Float*

The Junior Gold Miners Index is free-float adjusted—that is, the number of shares outstanding is reduced to exclude closely held shares from the index calculation. At times, other adjustments are made to the share count to reflect foreign ownership limits. These are combined with the block-ownership adjustments into a single multiplier. To avoid unwanted double counting, either the block-ownership adjustment or the restricted stocks adjustment is applied, whichever produces the higher result.

#### *Sector-Weighting Cap Factor*

Companies determined to be “silver” stocks may not constitute more than 20% of the Junior Gold Miners Index. If at a quarterly review, the aggregated weighting of all silver stocks represents more than 20% of the Junior Gold Miners Index, a sector-weighting cap factor is applied. The sector-weighting cap factor is calculated to ensure that the aggregated weighting of all gold stocks will not be less than 80% and the aggregated weighting of all silver stocks is capped at 20%. If the aggregated weighting of all gold stocks represents more than 80% of the Junior Gold Miners Index, then no sector-weighting cap factor is needed.

#### *Company-Weighting Cap Factors*

Companies in the Junior Gold Miners Index are weighted according to their free-float market capitalization. To ensure portfolio diversity, the company-weighting cap factors are applied to individual companies if they exceed a certain weight in the Junior Gold Miners Index. The company-weighting cap factors are reviewed quarterly and applied, if necessary.

The company-weighted cap factors are applied differently to gold companies and silver companies. For gold companies, all companies are ranked by their free-float market capitalization, and the maximum weight for any single stock is 8.0%. If a stock exceeds the maximum weight, then the weight will be reduced to the maximum weight and the excess weight shall be re-distributed proportionally across all other index constituents. This process is repeated until no stocks have weights exceeding the respective maximum weight.

The company-weighting scheme will be applied to the largest stocks and the excess weight after each step shall be re-distributed across all other (smaller) stocks in the Junior Gold Miners Index on a proportional basis:

- If the largest two stocks exceed 8.0%, then both will be capped at 8.0%.
- If the 3rd largest stock exceeds 7.0%, then it will be capped at 7.0%.
- If the 4th largest stock exceeds 6.5%, then it will be capped at 6.5%.
- If the 5th largest stock exceeds 6.0%, then it will be capped at 6.0%.
- If the 6th largest stock exceeds 5.5%, then it will be capped at 5.5%.
- If the 7th largest stock exceeds 5.0%, then it will be capped at 5.0%.
- If any other stock exceeds 4.5%, then it will be capped at 4.5%.



For silver companies, the maximum weight of any single silver stock is 4.5% and the excess weight will be redistributed proportionally across all other silver stock index constituents. If the excess weight cannot be redistributed proportionally across all other silver stock index constituents due to the weight restriction of 4.5%, then the remaining excess weight will be re-distributed proportionally across all other gold stock index constituents.

### *Divisor Adjustments*

Index maintenance should not change the level of the Junior Gold Miners Index. This is accomplished with an adjustment to the divisor. Any change to the stocks in the Junior Gold Miners Index that alters the total market value of the Junior Gold Miners Index while holding stock prices constant will require a divisor adjustment.

$$\text{Divisor}_{\text{new}} = \text{Divisor}_{\text{old}} \times \frac{\sum_{i=1}^n p_i \times q_i \times f_{fi} \times c_{fi} \times f_{xi} \pm \Delta MC}{\sum_{i=0}^n p_i \times q_i \times f_{fi} \times c_{fi} \times f_{xi}}$$

where  $\Delta MC$  is the difference between closing market capitalization and adjusted closing market capitalization of the Junior Gold Miners Index.

### *Data Correction*

Incorrect or missing input data will be corrected immediately.

### *Corporate Action Related Adjustments*

Corporate actions range widely from routine share issuances or buy backs to unusual events like spin-offs or mergers. These are listed on the table below with notes about the necessary changes and whether the divisor will be adjusted.

#### **Special cash dividend**

Divisor change: Yes

$$p_{i, \text{adjusted}} = p_i - (\text{Dividend} \times (1 - \text{Withholding Tax}))$$

#### **Split**

Divisor change: No

Shareholders receive "B" new shares for every "A" share held.

$$p_{i, \text{adjusted}} = p_i \times \frac{A}{B}$$

- $q_{i, \text{adjusted}} = q_i \times \frac{B}{A}$

#### **Rights offering**

Divisor change: Yes

Shareholders receive "B" new shares for every "A" share held.

If the subscription-price is either not available or not smaller than the closing price, then no adjustment will be done.

- $$P_{i, \text{adjusted}} = \frac{(p_i \times A) + (\text{Subscription Price} \times B)}{A + B}$$

- $$Q_{i, \text{adjusted}} = q_i \times \frac{A + B}{A}$$

### Stock dividend

Divisor change: Yes

Shareholders receive "B" new shares for every "A" share held.

- $$p_{i, \text{adjusted}} = p_i \times \frac{A}{(A + B)}$$

$$Q_{i, \text{adjusted}} = q_i \times \frac{(A + B)}{A}$$

- 

### Spin-offs

Divisor change: Yes

Shareholders receive "B" new shares for every "A" share held.

$$p_{i, \text{adjusted}} = \frac{(p_i \times A) - (\text{Price of Spun - off Company} \times B)}{A}$$

### Addition/deletion of a company

Divisor change: Yes

Net change in market value determines the divisor adjustment.

### Changes in shares outstanding

Divisor change: Yes

Any combination of secondary issuance, share repurchase or buy back will be updated at the quarterly review.

### Changes to free-float

Divisor change: Yes

Increasing (decreasing) the free-float increases (decreases) the total market value of the Junior Gold Miners Index and changes will be updated at the quarterly review.

With corporate actions where cash or other corporate assets are distributed to shareholders, the price of the stock will drop on the ex-dividend day (the first day when a new shareholder is not eligible to receive the distribution.) The effect of the divisor adjustment is to prevent the price drop from causing a corresponding drop in the Index.

Corporate actions are announced at least three days prior to implementation.

## **Dissemination**

The Junior Gold Miners Index is calculated weekdays between 01:00 and 23:30 (CET) and the index values are disseminated to data vendors every 15 seconds. The Junior Gold Miners Index is disseminated on days when at least one of the underlying stock exchanges of the Junior Gold Miners Index is open for trading.

## THE SPDR® GOLD TRUST

We have derived all information contained in this underlying supplement regarding the SPDR® Gold Trust (the “Gold Trust”), including, without limitation, its structure, the creation and redemption of its shares and their valuation, from publicly available information. Such information reflects the policies of, and is subject to change by, the Gold Trust and World Gold Trust Services, LLC, the sponsor of the Gold Trust. BNY Mellon Asset Servicing, a division of The Bank of New York Mellon, is the trustee of the Gold Trust, and HSBC Bank USA, N.A. is the custodian of the Gold Trust. The Gold Trust is an investment trust, formed on November 12, 2004. The Gold Trust trades under the ticker symbol “GLD” on the NYSE Arca, Inc. (“NYSE Arca”). We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

Information provided to or filed with the Securities and Exchange Commission (the “SEC”) by the Gold Trust pursuant to the Securities Act of 1933, as amended, and the Securities Exchange Act of 1934, as amended, can be located by reference to SEC file numbers 333-153150 and 001-32356, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding the Gold Trust, please see the Gold Trust’s prospectus. In addition, information about the Gold Trust may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the public website of the Gold Trust maintained by the sponsor at <http://www.spdrgoldshares.com>. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the SPDR® Gold Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

### Investment Objective and Strategy

The investment objective of the Gold Trust is to reflect the performance of the price of gold bullion, less the Gold Trust’s expenses. The Gold Trust holds gold bars. The Gold Trust issues shares in exchange for deposits of gold and distributes gold in connection with the redemption of shares. The shares of the Gold Trust are intended to offer investors an opportunity to participate in the gold market through an investment in securities. The ownership of the shares of the Gold Trust is intended to overcome certain barriers to entry in the gold market, such as the logistics of buying, storing and insuring gold.

The shares of the Gold Trust represent units of fractional undivided beneficial interest in and ownership of the Gold Trust, the primary asset of which is allocated (or secured) gold. The Gold Trust is not managed like a corporation or an active investment vehicle. The gold held by the Gold Trust will only be sold: (1) on an as-needed basis to pay the Gold Trust’s expenses, (2) in the event the Gold Trust terminates and liquidates its assets, or (3) as otherwise required by law or regulation.

The Gold Trust’s assets only consist of allocated gold bullion, gold credited to an unallocated gold account, gold receivable when recorded (representing gold covered by contractually binding orders for the creation of shares where the gold has not yet been transferred to the Gold Trust’s account) and, from time to time, cash, which will be used to pay expenses.

### Creation and Redemption

The Gold Trust creates and redeems the shares of the Gold Trust (“Shares”) from time to time, but only in one or more baskets (a “Basket” equals a block of 100,000 Shares). The creation and redemption of Baskets requires the delivery to the Gold Trust or the distribution by the Gold Trust of the amount of gold and any cash represented by the Baskets being created or redeemed, the amount of which is based on the combined net asset value of the number of Shares included in the Baskets being created or redeemed. The initial amount of gold required for deposit with the Gold Trust to create Shares for the period from the formation of the Gold Trust to the first day of trading of the Shares on the NYSE was 10,000 ounces per Basket. The number of ounces of gold required to

create a Basket or to be delivered upon the redemption of a Basket gradually decreases over time, due to the accrual of the Gold Trust's expenses and the sale of the Gold Trust's gold to pay the Gold Trust's expenses. Baskets may be created or redeemed only by authorized participants, who pay a transaction fee for each order to create or redeem Baskets and may sell the Shares included in the Baskets they create to other investors.

#### *Valuation of Gold; Computation of Net Asset Value*

The Net Asset Value ("NAV") of the Gold Trust is the aggregate value of the Gold Trust's assets less its liabilities (which include estimated accrued but unpaid fees and expenses). In determining the NAV of the Gold Trust, the trustee values the gold held by the Gold Trust on the basis of the price of an ounce of gold as set by the afternoon session of the twice daily fix of the price of an ounce of gold which starts at 3:00 PM London, England time and is performed by the five members of the London gold fix. The trustee determines the NAV of the Gold Trust on each day the NYSE Arca is open for regular trading, at the earlier of the London PM Fix for the day or 12:00 PM New York time. If no London PM Fix is made on a particular evaluation day or if the London PM Fix has not been announced by 12:00 PM New York time on a particular evaluation day, the next most recent London gold price fix (AM or PM) is used in the determination of the NAV of the Gold Trust, unless the trustee, in consultation with the sponsor, determines that such price is inappropriate to use as the basis for such determination. The trustee also determines the NAV per Share, which equals the NAV of the Gold Trust, divided by the number of outstanding Shares.

#### **Termination of the SPDR® Gold Trust**

The sponsor may, and it is anticipated that the sponsor will, direct the trustee to terminate and liquidate the Gold Trust at any time after the first anniversary of the Gold Trust's formation when the NAV of the Gold Trust is less than \$350 million (as adjusted for inflation). The sponsor may also direct the trustee to terminate the Gold Trust if the Commodity Futures Trading Commission, or the CFTC, determines that the Gold Trust is a commodity pool under the Commodity Exchange Act of 1936, as amended, or the CEA. The trustee may also terminate the Gold Trust upon the agreement of shareholders owning at least 66 $\frac{2}{3}$ % of the outstanding Shares.

The trustee will terminate and liquidate the Gold Trust if any of the following events occur:

- the Depository Trust Company, the securities depository for the Shares, is unwilling or unable to perform its functions under the Gold Trust indenture and no suitable replacement is available;
- the Shares are de-listed from the NYSE Arca and are not listed for trading on another U.S. national securities exchange or through the NASDAQ Stock Market within five business days from the date the Shares are de-listed;
- the NAV of the Gold Trust remains less than \$50 million for a period of 50 consecutive business days;
- the sponsor resigns or is unable to perform its duties or becomes bankrupt or insolvent and the trustee has not appointed a successor and has not itself agreed to act as sponsor;
- the trustee resigns or is removed and no successor trustee is appointed within 60 days;
- the custodian resigns and no successor custodian is appointed within 60 days;
- the sale of all of the Gold Trust's assets;

- the Gold Trust fails to qualify for treatment, or ceases to be treated, for US federal income tax purposes, as a grantor trust; or
- the maximum period for which the Gold Trust is allowed to exist under New York law ends.

Upon the termination of the Gold Trust, the trustee will, within a reasonable time after the termination of the Gold Trust, sell the Gold Trust's gold bars and, after paying or making provision for the Gold Trust's liabilities, distribute the proceeds to the shareholders.

### **Historical Performance of the Gold Trust**

We will provide historical price information with respect to the shares of the Gold Trust in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

### **Disclaimer**

The Shares of the Gold Trust are neither interests in nor obligations of the sponsor, the trustee or State Street Global Markets, LLC, as the marketing agent. The notes are not sponsored, endorsed, sold, or promoted by the sponsor, the trustee or the marketing agent. The sponsor, the trustee and the marketing agent make no representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. None of the sponsor, the trustee or the marketing agent has any obligation or liability in connection with the operation, marketing, trading or sale of the notes.

### **Gold**

The price of gold is primarily affected by the global demand for and supply of gold. The market for gold bullion is global, and gold prices are subject to volatile price movements over short periods of time and are affected by numerous factors, including macroeconomic factors such as the structure of and confidence in the global monetary system, expectations regarding the future rate of inflation, the relative strength of, and confidence in, the U.S. dollar (the currency in which the price of gold is usually quoted), interest rates, gold borrowing and lending rates and global or regional economic, financial, political, regulatory, judicial or other events. Gold prices may be affected by industry factors such as industrial and jewelry demand as well as lending, sales and purchases of gold by the official sector, including central banks and other governmental agencies and multilateral institutions that hold gold. Additionally, gold prices may be affected by levels of gold production, production costs and short-term changes in supply and demand due to trading activities in the gold market.

## THE SPDR® S&P 500® ETF TRUST

We have derived all information contained in this underlying supplement regarding the SPDR® S&P 500® ETF Trust, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, State Street Bank and Trust Company, as trustee of the SPDR® S&P 500® ETF Trust ("SSBTC"), and PDR Services LLC, as sponsor of the SPDR® S&P 500® ETF Trust ("PDRS"). The SPDR® S&P 500® ETF Trust is a unit investment trust that issues securities called "Trust Units" or "Units." The SPDR® S&P 500® ETF Trust is an exchange-traded fund ("ETF") that trades on the NYSE Arca, Inc. ("NYSE Arca") under the ticker symbol "SPY." We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

The SPDR® S&P 500® ETF Trust is an investment company registered under the Investment Company Act of 1940, as amended. Trust Units represent an undivided ownership interest in a portfolio of all, or substantially all, of the common stocks of the S&P 500® Index. Information provided to or filed with the SEC by the SPDR® S&P 500® ETF Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 033-46080 and 811-06125, respectively, through the SEC's website at <http://www.sec.gov>. For additional information regarding the SPDR® S&P 500® ETF Trust, SSBTC and PDRS, please see the SPDR® S&P 500® ETF Trust's prospectus. In addition, information about the SPDR® S&P 500® ETF Trust, SSBTC and PDRS may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the SPDR® S&P 500® ETF Trust website at <https://www.spdrs.com/product/fund.seam?ticker=SPY>. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the SPDR® S&P 500® ETF Trust's website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

### Investment Objective and Strategy

The SPDR® S&P 500® ETF Trust's objective is to provide investment results that, before expenses, generally correspond to the price and yield performance of the S&P 500® Index. See "Equity Index Descriptions — The S&P 500® Index" below for more information about the S&P 500® Index. The Trust holds stocks and cash and is not actively managed by traditional methods, which typically involve effecting changes in the holdings of stocks and cash on the basis of judgments made relating to economic, financial and market considerations. To maintain the correspondence between the composition and weightings of the stocks held by the SPDR® S&P 500® ETF Trust and the component stocks of the S&P 500® Index, which we refer to as "Index Securities," SSBTC adjusts the holdings of the SPDR® S&P 500® ETF Trust from time to time to conform to periodic changes in the identity and/or relative weightings of the Index Securities. SSBTC aggregates certain of these adjustments and makes changes to the holdings of the SPDR® S&P 500® ETF Trust at least monthly or more frequently in the case of significant changes to the S&P 500® Index. Any change in the identity or weighting of an Index Security will result in a corresponding adjustment to the prescribed holdings of the SPDR® S&P 500® ETF Trust effective on any day that the New York Stock Exchange ("NYSE") is open for business following the day on which the change to the S&P 500® Index takes effect after the close of the market.

The value of Trust Units fluctuates in relation to changes in the value of the holdings of the SPDR® S&P 500® ETF Trust. The market price of each individual Trust Unit may not be identical to the net asset value of such Trust Unit.

The SPDR® S&P 500® ETF Trust may not be able to replicate exactly the performance of the S&P 500® Index because the total return generated by the SPDR® S&P 500® ETF Trust's portfolio of stocks and cash is reduced by the expenses of the SPDR® S&P 500® ETF Trust and transaction costs incurred in adjusting the actual balance of the SPDR® S&P 500® ETF Trust's portfolio. In addition, it is

possible that the SPDR® S&P 500® ETF Trust may not always fully replicate the performance of the S&P 500® Index due to the unavailability of certain Index Securities in the secondary market or due to other extraordinary circumstances.

As of November 8, 2011, the SPDR® S&P 500® ETF Trust's three largest holdings were Exxon Mobil Corporation, Apple Inc. and International Business Machines Corporation and its three largest sectors were information technology, financials and energy.

## Holdings Information

The following tables summarize the SPDR® S&P 500® ETF Trust's top holdings in individual companies and by sector as of November 8, 2011.

### Top Holdings in Individual Securities as of November 8, 2011

| Name                            | Weight | Shares Held |
|---------------------------------|--------|-------------|
| Exxon Mobil Corporation         | 3.33%  | 37,690,412  |
| Apple Inc.                      | 3.24%  | 7,186,891   |
| International Business Machines | 1.92%  | 9,257,750   |
| Chevron Corporation             | 1.87%  | 15,526,923  |
| Microsoft Corporation           | 1.74%  | 57,802,844  |
| Johnson & Johnson               | 1.53%  | 21,242,756  |
| Procter & Gamble Company        | 1.52%  | 21,300,172  |
| AT&T Inc                        | 1.50%  | 45,937,680  |
| General Electric Company        | 1.50%  | 82,172,160  |
| The Coca-Cola Company           | 1.36%  | 17,809,220  |

### Top Holdings by Sector as of November 8, 2011

| Sector                     | Percentage of Total Holdings |
|----------------------------|------------------------------|
| Information Technology     | 19.69%                       |
| Financials                 | 13.84%                       |
| Energy                     | 12.53%                       |
| Health Care                | 11.42%                       |
| Consumer Staples           | 11.01%                       |
| Consumer Discretionary     | 10.61%                       |
| Industrials                | 10.50%                       |
| Utilities                  | 3.68%                        |
| Materials                  | 3.61%                        |
| Telecommunication Services | 3.01%                        |



The information above was compiled from the SPDR® S&P 500® ETF Trust's website. We make no representation or warranty as to the accuracy of the information above. Information contained in the SPDR® S&P 500® ETF Trust's website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

#### **Historical Performance of the SPDR® S&P 500® ETF Trust**

We will provide historical price information with respect to the shares of the SPDR® S&P 500® ETF Trust in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

#### **Disclaimer**

The notes are not sponsored, endorsed, sold or promoted by the SPDR® S&P 500® ETF Trust, SSBTC or PDRS. None of the SPDR® S&P 500® ETF Trust, SSBTC or PDRS makes any representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. None of the SPDR® S&P 500® ETF Trust, SSBTC or PDRS has any obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## THE SPDR® S&P® HOMEBUILDERS ETF

We have derived all information contained in this underlying supplement regarding the SPDR® S&P® Homebuilders ETF (the “Homebuilders ETF”), including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by SPDR® Series Trust and SSgA Funds Management, Inc. (“SSFM”). We make no representation or warranty as to the accuracy or completeness of such information. The Homebuilders ETF is an investment portfolio maintained and managed by SSFM. SSFM is the investment adviser to the Homebuilders ETF. The Homebuilders ETF is an exchange-traded fund (“ETF”) that trades on the NYSE Arca under the ticker symbol “XHB.” The inception date of the Homebuilders ETF is January 31, 2006. Prior to January 8, 2007, the Homebuilders ETF was known as the SPDR® Homebuilders ETF.

The SPDR® Series Trust consists of separate investment portfolios (each, a “SPDR® Series Fund”). Each SPDR® Series Fund is an index fund that invests in a particular industry or group of industries represented by one of the S&P Select Industry Indices (the “Select Industry Indices” and each, a “Select Industry Index”). The companies included in each Select Industry Index are selected on the basis of Global Industry Classification Standards (“GICS”) from a universe of companies defined by the S&P® Total Market Index (the “S&P TM Index”), a U.S. total market composite index. The investment objective of each Select Industry SPDR® Fund is to seek to replicate as closely as possible, before expenses, the performance of an index derived from a particular industry or group of industries, as represented by the relevant Select Industry Index.

SPDR® Series Trust is a registered investment company that consists of numerous separate investment portfolios, including the Homebuilders ETF. Information provided to or filed with the SEC by SPDR® Series Trust pursuant to the Securities Act of 1933 and the Investment Company Act of 1940 can be located by reference to SEC file numbers 333-57793 and 811-08839, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding SPDR® Series Trust, SSFM or the Homebuilders ETF, please see the SPDR® Series Trust’s prospectus. In addition, information about SPDR® Series Trust, SSFM and the Homebuilders ETF may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the SPDR® Series Trust website at <http://www.SPDRETFs.com>. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the SPDR® Series Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### Investment Objective and Strategy

The Homebuilders ETF seeks to replicate as closely as possible, before expenses, the performance of the S&P® Homebuilders Select Industry™ Index (the “Homebuilders Index”). The Homebuilders Index measures the performance of the homebuilding industry of the U.S. equity market. The Homebuilders Index includes companies in the following sub-industries: homebuilding, building products, home furnishings, home improvement retail, homefurnishing retail and household appliances. For more information about the Homebuilders Index, please see “Equity Index Descriptions — The S&P Select Industry Indices” above.

### Replication

In seeking to track the performance of the Homebuilders Index, the Homebuilders ETF employs a “replication” strategy, which means that the Homebuilders ETF typically invests in substantially all of the securities represented in the Homebuilders Index in approximately the same proportions as the Homebuilders Index. Under normal market conditions, the Homebuilders ETF generally invests substantially all, but at least 80%, of its total assets in the securities included in the Homebuilders Index. In addition, the Homebuilders ETF may invest in equity securities that are not included in the Homebuilders Index, cash and cash equivalents or money market instruments, such as repurchase agreements and money market funds (including money market funds advised by SSFM).

## Correlation

The Homebuilders Index is a theoretical financial calculation, while the Homebuilders ETF is an actual investment portfolio. The Homebuilders ETF seeks to track the performance of the Homebuilders Index as closely as possible (*i.e.*, achieve a high degree of correlation with the Homebuilders Index). However, the performance of the Homebuilders ETF and the Homebuilders Index will vary somewhat due to operating expenses, transaction costs, cash flows, regulatory requirements and operational inefficiencies.

## Holdings Information

As of November 8, 2011, the Homebuilders ETF included 34 companies. The Homebuilders ETF's three largest holdings are The Ryland Group, Inc., PulteGroup, Inc. and Select Comfort Corporation. The following table summarizes the Homebuilders ETF's holdings in individual companies as of such date.

### All Holdings in Individual Securities as of November 8, 2011

| Ticker | Name                              | Sector                 | Weight |
|--------|-----------------------------------|------------------------|--------|
| RYL    | The Ryland Group, Inc.            | Consumer Discretionary | 4.23%  |
| PHM    | PulteGroup, Inc.                  | Consumer Discretionary | 4.17%  |
| SCSS   | Select Comfort Corporation        | Consumer Discretionary | 4.16%  |
| LEN    | Lennar Corporation                | Consumer Discretionary | 4.01%  |
| MHK    | Mohawk Industries, Inc.           | Consumer Discretionary | 3.77%  |
| DHI    | D.R. Horton, Inc                  | Consumer Discretionary | 3.77%  |
| MAS    | Masco Corporation                 | Industrials            | 3.74%  |
| TOL    | Toll Brothers, Inc.               | Consumer Discretionary | 3.72%  |
| PIR    | Pier 1 Imports, Inc.              | Consumer Discretionary | 3.69%  |
| WSM    | Williams-Sonoma, Inc.             | Consumer Discretionary | 3.67%  |
| LOW    | Lowe's Companies, Inc.            | Consumer Discretionary | 3.60%  |
| TPX    | Tempur-Pedic International Inc.   | Consumer Discretionary | 3.58%  |
| HD     | The Home Depot, Inc.              | Consumer Discretionary | 3.57%  |
| LII    | Lennox International Inc.         | Industrials            | 3.47%  |
| OC     | Owens Corning                     | Industrials            | 3.42%  |
| USG    | USG Corporation                   | Industrials            | 3.40%  |
| BBBY   | Bed Bath & Beyond Inc.            | Consumer Discretionary | 3.38%  |
| LEG    | Leggett & Platt, Inc.             | Consumer Discretionary | 3.22%  |
| MDC    | M.D.C. Holdings, Inc              | Consumer Discretionary | 3.20%  |
| NVR    | NVR, Inc.                         | Consumer Discretionary | 3.14%  |
| AOS    | A. O. Smith Corporation           | Industrials            | 3.11%  |
| WHR    | Whirlpool Corporation             | Consumer Discretionary | 3.04%  |
| LL     | Lumber Liquidators Holdings, Inc. | Consumer Discretionary | 3.04%  |

| <b>Ticker</b> | <b>Name</b>                                | <b>Sector</b>          | <b>Weight</b> |
|---------------|--|------------------------|---------------|
| AWI           | Armstrong World Industries, Inc.           | Industrials            | 2.94%         |
| AAN           | Aaron's, Inc.                              | Consumer Discretionary | 2.79%         |
| IRBT          | iRobot Corporation                         | Consumer Discretionary | 2.74%         |
| LZB           | La Z Boy Inc                               | Consumer Discretionary | 1.78%         |
| SSD           | Simpson Manufacturing Co., Inc.            | Industrials            | 1.75%         |
| ETH           | Ethan Allen Interiors Inc.                 | Consumer Discretionary | 1.67%         |
| NX            | Quanex Building Products Corporation       | Industrials            | 1.62%         |
| HELE          | Helen of Troy Limited                      | Consumer Discretionary | 1.31%         |
| UFPI          | Universal Forest Products, Inc.            | Industrials            | 0.78%         |
| GFF           | Griffon Corporation                        | Industrials            | 0.49%         |
| 85749P9A      | State Street Institutional Liquid Reserves | Unassigned             | 0.02%         |

As of November 8, 2011, the Homebuilders ETF's three largest sub-industries were Homebuilding, Building Products and Homefurnishing Retail. The following table summarizes the Homebuilders ETF's sub-industries as of such date.

#### **Industry Breakdown of the Homebuilders ETF as of November 8, 2011**

| <b>Industry</b>         | <b>Net Assets</b> |
|-------------------------|-------------------|
| Homebuilding            | 26.26%            |
| Building Products       | 24.72%            |
| Home Furnishing Retail  | 17.69%            |
| Home Furnishings        | 14.02%            |
| Home Improvement Retail | 10.22%            |
| Household Appliances    | 7.09%             |
|                         | 100.00%           |

The information above was compiled from the SPDR® Series Trust website. We make no representation or warranty as to the accuracy of the information above. Information contained in the SPDR® Series Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

#### **Historical Performance of the SPDR® S&P 500® ETF Trust**

We will provide historical price information with respect to the shares of the SPDR® S&P 500® ETF Trust in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

#### **Disclaimer**

The notes are not sponsored, endorsed, sold or promoted by State Street Global Markets, LLC ("SSGM"). SSGM makes no representations or warranties to the owners of the notes or any member of the public regarding the advisability of investing in the notes. SSGM has no obligation or liability in connection with the operation, marketing, trading or sale of the notes.

## THE SPDR® S&P® METALS & MINING ETF

We have derived all information contained in this underlying supplement regarding the SPDR® S&P® Metals & Mining ETF (the “Metals & Mining ETF”), including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by SPDR® Series Trust and SSgA Funds Management, Inc. (“SSFM”). We make no representation or warranty as to the accuracy or completeness of such information. The Metals & Mining ETF is an investment portfolio maintained and managed by SSFM. SSFM is the investment adviser to the Metals & Mining ETF. The Metals & Mining ETF is an exchange-traded fund (“ETF”) that trades on the NYSE Arca under the ticker symbol “XME.” The inception date of the Metals & Mining ETF is June 19, 2006. Prior to January 8, 2007 the Metals & Mining ETF was known as the SPDR® Metals and Mining ETF.

The SPDR® Series Trust consists of separate investment portfolios (each, a “SPDR® Series Fund”). Each SPDR® Series Fund is an index fund that invests in a particular industry or group of industries represented by one of the S&P Select Industry Indices (the “Select Industry Indices” and each, a “Select Industry Index”). The companies included in each Select Industry Index are selected on the basis of Global Industry Classification Standards (“GICS”) from a universe of companies defined by the S&P® Total Market Index (the “S&P TM Index”), a U.S. total market composite index. The investment objective of each Select Industry SPDR® Fund is to provide investment results that, before expenses, correspond generally to the price and yield performance of publicly traded equity securities of companies in a particular industry or group of industries, as represented by the relevant Select Industry Index.

SPDR® Series Trust is a registered investment company that consists of numerous separate investment portfolios, including the Metals & Mining ETF. Information provided to or filed with the SEC by SPDR® Series Trust pursuant to the Securities Act of 1933 and the Investment Company Act of 1940 can be located by reference to SEC file numbers 333-57793 and 811-08839, respectively, through the SEC’s website at <http://www.sec.gov>. For additional information regarding SPDR® Series Trust, SSFM or the Metals & Mining ETF, please see the SPDR® Series Trust’s prospectus. In addition, information about SPDR® Series Trust, SSFM and the Metals & Mining ETF may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the SPDR® Series Trust website at <https://www.spdrs.com>. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the SPDR® Series Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### Investment Objective and Strategy

The Metals & Mining ETF seeks to replicate as closely as possible, before fees and expenses, the total return of the S&P Metals & Mining Select Industry Index (the “Metals & Mining Index”). The Metals & Mining Index represents the metals and mining sub-industry portion of the U.S. equity market. The Metals & Mining Index includes companies in the following sub-industries: aluminum, coal & consumable fuels, diversified metals & mining, gold, precious metals & minerals and steel. For more information about the Metals & Mining Index, please see “Equity Index Descriptions — The S&P Select Industry Indices” above.

### Replication

In seeking to track the performance of the Metals & Mining Index, the Metals & Mining ETF employs a “replication” strategy, which means that the Metals & Mining ETF typically invests in substantially all of the securities represented in the Metals & Mining Index in approximately the same proportions as the Metals & Mining Index. Under normal market conditions, the Metals & Mining ETF generally invests substantially all, but at least 80%, of its total assets in the securities included in the Metals & Mining Index. In addition, the Metals & Mining ETF may invest in equity securities that are not included in the Metals & Mining Index, cash and cash equivalents or money market instruments, such as repurchase agreements and money market funds (including money market funds advised by SSFM).

## Correlation

The Metals & Mining Index is a theoretical financial calculation, while the Metals & Mining ETF is an actual investment portfolio. The Metals & Mining ETF seeks to track the performance of the Metals & Mining Index as closely as possible (*i.e.*, achieve a high degree of correlation with the Metals & Mining Index). However, the performance of the Metals & Mining ETF and the Metals & Mining Index will vary somewhat due to operating expenses, transaction costs, cash flows, regulatory requirements and operational inefficiencies.

## Holdings Information

As of November 8, 2011, the Metals & Mining ETF included 41 companies, and the Metals & Mining ETF's three largest holdings were RTI International Metals, Inc., Worthington Industries, Inc. and Commercial Metals Company. The following table summarizes the Metals & Mining ETF's holdings in individual companies as of such date.

### All Holdings in Individual Securities as of November 8, 2011

| Ticker | Name                                 | Sector    | Weight |
|--------|--------------------------------------|-----------|--------|
| RTI    | RTI International Metals, Inc.       | Materials | 3.28%  |
| WOR    | Worthington Industries, Inc.         | Materials | 3.27%  |
| CMC    | Commercial Metals Company            | Materials | 3.25%  |
| STLD   | Steel Dynamics, Inc.                 | Materials | 3.17%  |
| SCHN   | Schnitzer Steel Industries, Inc.     | Materials | 3.15%  |
| NUE    | Nucor Corporation                    | Materials | 3.12%  |
| RS     | Reliance Steel & Aluminum            | Materials | 3.08%  |
| CRS    | Carpenter Technology Corporation     | Materials | 3.07%  |
| CLD    | Cloud Peak Energy Inc                | Energy    | 3.04%  |
| AKS    | AK Steel Holding Corporation         | Materials | 2.92%  |
| ATI    | Allegheny Technologies Incorporated  | Materials | 2.91%  |
| CMP    | Compass Minerals International, Inc. | Materials | 2.89%  |
| GSM    | Globe Specialty Metals, Inc.         | Materials | 2.88%  |
| NEM    | Newmont Mining Corporation           | Materials | 2.87%  |
| TIE    | Titanium Metals Corporation          | Materials | 2.83%  |
| CNX    | CONSOL Energy Inc.                   | Energy    | 2.73%  |
| CENX   | Century Aluminum Company             | Materials | 2.71%  |
| CDE    | Coeur d'Alene Mines Corporation      | Materials | 2.64%  |
| X      | United States Steel Corporation      | Materials | 2.63%  |
| FCX    | Freeport-McMoRan Copper & Gold Inc.  | Materials | 2.61%  |
| RGLD   | Royal Gold, Inc.                     | Materials | 2.59%  |
| ACI    | Arch Coal, Inc.                      | Energy    | 2.44%  |

| <b>Ticker</b> | <b>Name</b>                                | <b>Sector</b> | <b>Weight</b> |
|---------------|--|---------------|---------------|
| JRCC          | James River Coal Company                   | Energy        | 2.44%         |
| ANR           | Alpha Natural Resources, Inc.              | Energy        | 2.43%         |
| AA            | Alcoa Inc.                                 | Materials     | 2.43%         |
| BTU           | Peabody Energy Corporation                 | Energy        | 2.42%         |
| CLF           | Cliffs Natural Resources Inc               | Materials     | 2.40%         |
| SWC           | Stillwater Mining Company                  | Materials     | 2.34%         |
| HL            | Hecla Mining Company                       | Materials     | 2.31%         |
| WLT           | Walter Energy, Inc.                        | Materials     | 2.24%         |
| ANV           | Allied Nevada Gold Corp.                   | Materials     | 2.23%         |
| PCX           | Patriot Coal Corporation                   | Energy        | 2.16%         |
| HAYN          | Haynes International, Inc.                 | Materials     | 2.07%         |
| UXG           | U.S. Gold Corporation                      | Materials     | 2.06%         |
| MCP           | Molycorp, Inc.                             | Materials     | 2.04%         |
| KALU          | Kaiser Aluminum Corp.                      | Materials     | 1.70%         |
| ACO           | AMCOL International Corporation            | Materials     | 1.30%         |
| ZINC          | Horsehead Holding Corp.                    | Materials     | 1.22%         |
| MTRN          | Materion Corp                              | Materials     | 0.99%         |
| GMO           | General Moly, Inc.                         | Materials     | 0.83%         |
| 85749P9A      | State Street Institutional Liquid Reserves | Unassigned    | 0.29%         |

As of November 8, 2011, the Metals & Mining ETF's three largest sub-industries were Steel, Diversified Metals & Mining and Coal & Consumable Fuels. The following table summarizes the Metals & Mining ETF's sub-industries as of such date.

**Industry Breakdown of the Metals & Mining ETF as of November 8, 2011**

| <b>Industry</b>             | <b>Net Assets</b> |
|-----------------------------|-------------------|
| Steel                       | 35.14%            |
| Diversified Metals & Mining | 23.18%            |
| Coal & Consumable Fuels     | 17.72%            |
| Gold                        | 9.78%             |
| Precious Metals & Minerals  | 7.31%             |
| Aluminum                    | 6.86%             |

The information above was compiled from the SPDR® Series Trust website. We make no representation or warranty as to the accuracy of the information above. Information contained in the SPDR® Series Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement.

### **Historical Performance of the SPDR® S&P 500® ETF Trust**

We will provide historical price information with respect to the shares of the SPDR® S&P 500® ETF Trust in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

### **Disclaimer**

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## THE TECHNOLOGY SELECT SECTOR SPDR® FUND

We have derived all information contained in this underlying supplement no. 1-I regarding the Technology Select Sector SPDR® Fund, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by the Select Sector SPDR® Trust (the "Select Sector Trust") and SSgA Funds Management, Inc. ("SSgA FM"). We make no representation or warranty as to the accuracy or completeness of such information. The Technology Select Sector SPDR® Fund is an investment portfolio managed by SSgA FM, the investment adviser to the Technology Select Sector SPDR® Fund. The Technology Select Sector SPDR® Fund is an exchange-traded fund ("ETF") that trades on the NYSE Arca under the ticker symbol "XLK."

The Select Sector Trust is a registered investment company that consists of nine separate investment portfolios (each, a "Select Sector SPDR® Fund"), including the Technology Select Sector SPDR® Fund. Each Select Sector SPDR® Fund is an index fund that invests in a particular sector or group of industries represented by a specified Select Sector Index. The companies included in each Select Sector Index are selected on the basis of general industry classifications from a universe of companies defined by the S&P 500® Index. The Select Sector Indices (each, a "Select Sector Index") upon which the Select Sector SPDR® Funds are based together comprise all of the companies in the S&P 500® Index. The investment objective of each Select Sector SPDR® Fund is to provide investment results that, before expenses, correspond generally to the price and yield performance of publicly traded equity securities of companies in a particular sector or group of industries, as represented by a specified market sector index.

Information provided to or filed with the SEC by the Select Sector Trust pursuant to the Securities Act of 1933, as amended, and the Investment Company Act of 1940, as amended, can be located by reference to SEC file numbers 333-57791 and 811-08837, respectively, through the SEC's website at <http://www.sec.gov>. For additional information regarding the Select Sector Trust or the Technology Select Sector SPDR® Fund, please see the Technology Select Sector SPDR® Fund's prospectus. In addition, information about the Select Sector Trust, SSgA FM and the Technology Select Sector SPDR® Fund may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the Select Sector Trust website at <http://www.sectorspdrs.com>. We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the Select Sector Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement no. MS-9-A-II or any terms supplement.

### Investment Objective

The Technology Select Sector SPDR® Fund seeks investment results that correspond generally to the price and yield performance, before fees and expenses, of publicly traded equity securities of companies in the technology sector, as represented by the Technology Select Sector Index. The Technology Select Sector Index measures the performance of the technology sector of the U.S. equity market. The Technology Select Sector Index includes companies in the following industries: computers and peripherals; software; diversified telecommunication services; communications equipment; semiconductors & semiconductor equipment; internet software and services; IT services; electronic equipment, instruments and components; wireless telecommunication services and office electronics. For more information about the Technology Select Sector Index, see "Equity Index Descriptions — The Select Sector Indices" above.

## Investment Strategy — Replication

The Technology Select Sector SPDR® Fund employs a replication strategy in attempting to approximate the performance of Technology Select Sector Index, which means that the Technology Select Sector SPDR® Fund typically invests in substantially all of the securities represented in the Technology Select Sector Index in approximately the same proportions as the Technology Select Sector Index. There may, however, be instances where SSgA FM may choose to overweight another stock in the Technology Select Sector Index, purchase securities not included in the Technology Select Sector Index that SSgA FM believes are appropriate to substitute for a security included in the Technology Select Sector Index or utilize various combinations of other available investment techniques in seeking to track the Technology Select Sector Index. Under normal market conditions, the Technology Select Sector SPDR® Fund generally invests substantially all, but at least 95%, of its total assets in the securities composing the Technology Select Sector Index. In addition, the Technology Select Sector SPDR® Fund may invest in cash and cash equivalents or money market instruments, such as repurchase agreements and money market funds (including money market funds advised by SSgA FM). Swaps, options and futures contracts, convertible securities and structured notes may be used by the Technology Select Sector SPDR® Fund in seeking performance that corresponds to the Technology Select Sector Index and in managing cash flows. SSgA FM anticipates that, under normal circumstances, it may take several business days for additions and deletions to the Technology Select Sector Index to be reflected in the portfolio composition of the Technology Select Sector SPDR® Fund. The Board of Trustees of the Select Sector Trust may change the Technology Select Sector SPDR® Fund's investment strategy and certain other policies without shareholder approval.

There may, however, be instances where SSgA FM will utilize a sampling strategy. Sampling means that SSgA FM will use quantitative analysis to select securities, including securities in the relevant index, outside of the index and derivatives, that have a similar investment profile as the relevant index in terms of key risk factors, performance attributes and other characteristics. These include industry weightings, market capitalization, and other financial characteristics of securities.

## Correlation

The Technology Select Sector Index is a theoretical financial calculation, while the Technology Select Sector SPDR® Fund is an actual investment portfolio. The performance of the Technology Select Sector SPDR® Fund and the Technology Select Sector Index will vary somewhat due to operating expenses, transaction costs, cash flows, regulatory requirements and operational inefficiencies. For example, it may take several business days for additions and deletions to the Technology Select Sector Index to be reflected in the portfolio composition of the Technology Select Sector SPDR® Fund. A figure of 100% would indicate perfect correlation. Any correlation of less than 100% is called "tracking error."

## Holdings Information

As of November 8, 2011, the Technology Select Sector SPDR® Fund included 84 companies. The Technology Select Sector SPDR® Fund's three largest holdings are Apple Inc., International Business Machines Corp. and Microsoft Corp. The following table summarizes the Technology Select Sector SPDR® Fund's holdings in individual companies as of such date.

| Company                                     | Percentage of Total Holdings |
|---|------------------------------|
| Apple Inc.                                  | 14.15%                       |
| International Business Machines Corporation | 8.40%                        |
| Microsoft Corporation                       | 7.61%                        |

| <b>Company</b>              | <b>Percentage of<br/>Total Holdings</b> |
|-----------------------------|---|
| AT&T Inc.                   | 6.56%                                   |
| Google Inc.                 | 5.80%                                   |
| Oracle Corporation          | 5.02%                                   |
| Intel Corporation           | 4.17%                                   |
| Verizon Communications Inc. | 4.01%                                   |
| Cisco Systems, Inc.         | 3.78%                                   |
| QUALCOMM Incorporated       | 3.62%                                   |

The information above was compiled from the Select Sector Trust website. We make no representation or warranty as to the accuracy of the information above. Information contained in the Select Sector Trust website is not incorporated by reference in, and should not be considered a part of, this underlying supplement no. 1-I or any terms supplement.

#### **Historical Performance of the Technology Select Sector SPDR® Fund**

We will provide historical price information with respect to the shares of the Technology Select Sector SPDR® Fund in the relevant terms supplement. You should not take any such historical prices as an indication of future performance.

#### **Disclaimer**

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## THE UNITED STATES OIL FUND, LP

We have derived all information contained in this underlying supplement regarding the United States Oil Fund, LP, including, without limitation, its make-up, method of calculation and changes in its components, from publicly available information. Such information reflects the policies of, and is subject to change by, United States Commodity Funds LLC (the “general partner of the United States Oil Fund, LP”), formerly known as Victoria Bay Asset Management, LLC. We make no representations or warranty as to the accuracy or completeness of the information derived from these public sources.

The units of the United States Oil Fund, LP (which we refer to as “shares of the United States Oil Fund, LP” for purposes of this underlying supplement) trade on the NYSE Arca under the ticker symbol “USO.”

Information provided to or filed with the SEC by the United States Oil Fund, LP pursuant to the Securities Act of 1933 and the Securities Exchange Act of 1934 can be located by reference to SEC file numbers 333-153310 and 001-32834, respectively, through the SEC’s website at <http://www.sec.gov>. The United States Oil Fund, LP is not a mutual fund or any other type of investment company within the meaning of the Investment Company Act of 1940, as amended, and is not subject to regulation thereunder. For additional information regarding the United States Oil Fund, LP and United States Commodity Funds LLC, please see United States Oil Fund, LP’s prospectus. In addition, information about the United States Oil Fund, LP may be obtained from other sources including, but not limited to, press releases, newspaper articles and other publicly disseminated documents and the United States Oil Fund, LP website at [www.unitedstatesoilfund.com](http://www.unitedstatesoilfund.com). We make no representation or warranty as to the accuracy or completeness of such information. Information contained in the United States Oil Fund, LP website is not incorporated by reference in, and should not be considered a part of, this underlying supplement or any terms supplement.

The United States Oil Fund, LP, a Delaware limited partnership, is a commodity pool that issues units that may be purchased and sold on the NYSE Arca. The United States Oil Fund, LP was organized as a limited partnership under Delaware law on May 12, 2005. The United States Oil Fund, LP has a limited operating history and began trading shares of the United States Oil Fund, LP on April 10, 2006. The general partner of the United States Oil Fund, LP is a single member limited liability company formed in Delaware on May 10, 2005 that is registered as a commodity pool operator with the Commodity Futures Trading Commission and is a member of the National Futures Association. The general partner of the United States Oil Fund, LP is also the investment advisor to the United States Oil Fund, LP.

The investment objective of the United States Oil Fund, LP is for changes in percentage terms of the net asset value of the units of United States Oil Fund, LP to reflect the changes in percentage terms of the spot price of light, sweet crude oil delivered to Cushing, Oklahoma as measured by the changes in the price of the futures contract for light, sweet crude oil traded on the New York Mercantile Exchange (the “benchmark oil futures contract”) that is the near month contract to expire, except when the near month contract is within two weeks of expiration, in which case it will be measured by the futures contract that is the next month contract to expire, less the United States Oil Fund, LP’s expenses. The United States Oil Fund, LP seeks to achieve its investment objective by investing in futures contracts for light, sweet crude oil and other types of crude oil, heating oil, gasoline, natural gas and other petroleum-based fuels that are traded on the New York Mercantile Exchange, ICE Futures or other U.S. and foreign exchanges (collectively, “oil futures contracts”) and other oil-related investments such as cash-settled options on Oil Futures Contracts, forward contracts for oil, cleared swap contracts and over-the-counter transactions that are based on the price of crude oil, heating oil, gasoline, natural gas and other petroleum-based fuels, oil futures contracts and indices based on the foregoing (collectively, “other oil interests”). The general partner believes that the daily changes in prices of the benchmark oil futures contract have historically closely tracked the daily changes in the spot price of light, sweet crude oil.