Diving into the Defined Risk Strategy

The WHY, WHAT, and HOW of the DRS

Presenters: Marc Odo, CFA®, CAIA®, CIPM®, CFP®
Chris Hausman, CMT®

Session 5:

Diving into the Defined Risk Strategy

The WHY, WHAT, and HOW of the DRS

Marc Odo, CFA®, CAIA®, CIPM®, CFP®

Client Portfolio Manager
Swan Global Investments

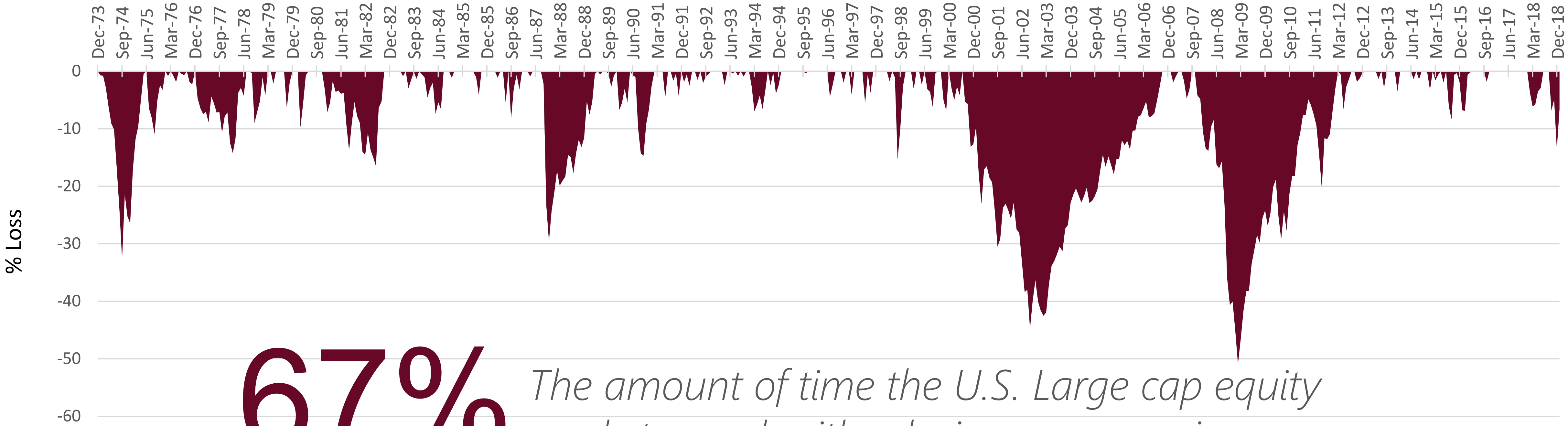
Chris Hausman, CMT®

Portfolio Manager, Managing Director-Risk
Swan Global Investments

Why does the Defined Risk Strategy exist?

The biggest risk most investors face is market risk.

Red = Time the S&P 500 Index Spent Losing/Recovering
January 1, 1974 - December 31, 2018



67% *The amount of time the U.S. Large cap equity market spends either losing or recovering.*

 Source: Zephyr and Swan Global Investments. Based on total return. Data from 1/1/1974 through 12/31/2018. Past performance is no guarantee of future results.

Why not rely on asset allocation?

Asset allocation tends to fail when investors need it most.

Long-Term Correlation Matrix: January 1988 – July 2007

	1	2	3	4	5	6
1) Russell 3000	1.00	0.62	0.61	0.52	0.41	-0.08
2) MSCI EAFE Index	0.62	1.00	0.58	0.35	0.35	0.01
3) MSCI Emerging Markets	0.61	0.58	1.00	0.43	0.30	0.04
4) Barclays U.S. Corp High Yield	0.52	0.35	0.43	1.00	0.44	-0.11
5) FTSE Nareit ALL REITs	0.41	0.25	0.30	0.44	1.00	-0.10
6) S&P GSCI	-0.08	0.01	0.04	-0.11	-0.10	1.00

0.49 or Less
0.50 to 0.69
0.70 to 0.79
0.80 to 0.89
0.90 or More

Crisis Correlation Matrix: August 2007 – February 2009

	1	2	3	4	5	6
1) Russell 3000	1.00	0.92	0.83	0.75	0.86	0.59
2) MSCI EAFE Index	0.92	1.00	0.94	0.73	0.74	0.63
3) MSCI Emerging Markets	0.83	0.94	1.00	0.75	0.62	0.69
4) Barclays U.S. Corp High Yield	0.75	0.73	0.75	1.00	0.70	0.50
5) FTSE Nareit ALL REITs	0.86	0.74	0.62	0.70	1.00	0.41
6) S&P GSCI	0.59	0.63	0.69	0.50	0.41	1.00

Swan DRS

Equity

for Portfolio Growth

Hedge

for Portfolio Preservation

Options

Offset Hedge Cost

Defined Risk Strategy – Distinct Investment Process

1 Invest in Equities

WHY?
To participate in equity markets.

- Always Invested in S&P 500 Select Sector SPDR ETFs
- Equally-weighting the sectors creates a value tilt to the portfolio

2 Hedge the Equities

WHY?
To mitigate risks of bear markets.

- Always Hedged by actively managing long-term put options (LEAPs), generally one to two years to expiration, initially
- Purchased at, or near-the-money

3 Seek Additional Return

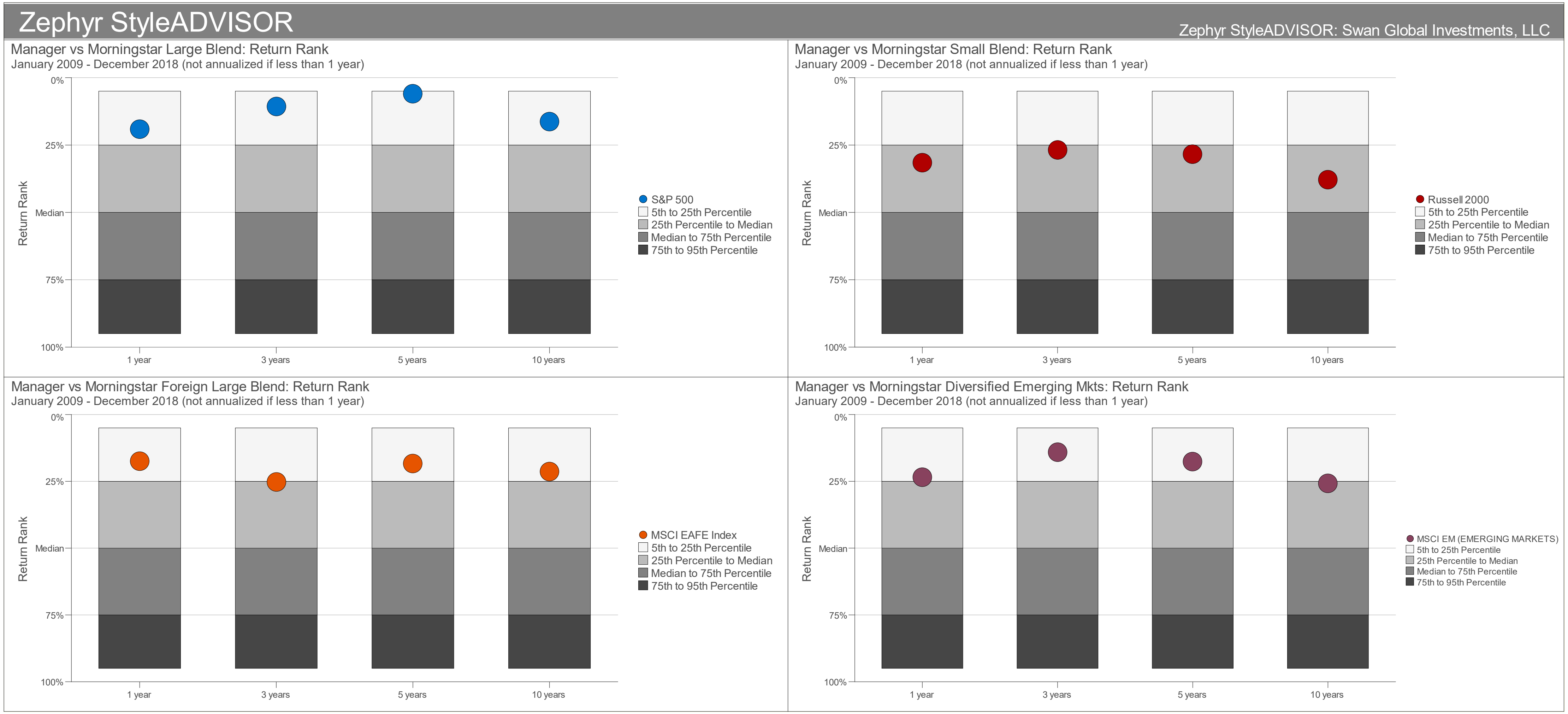
WHY?
To offset the cost of the hedge.

- Actively managing shorter-term options portfolio
- Utilizing a disciplined, rules-based approach

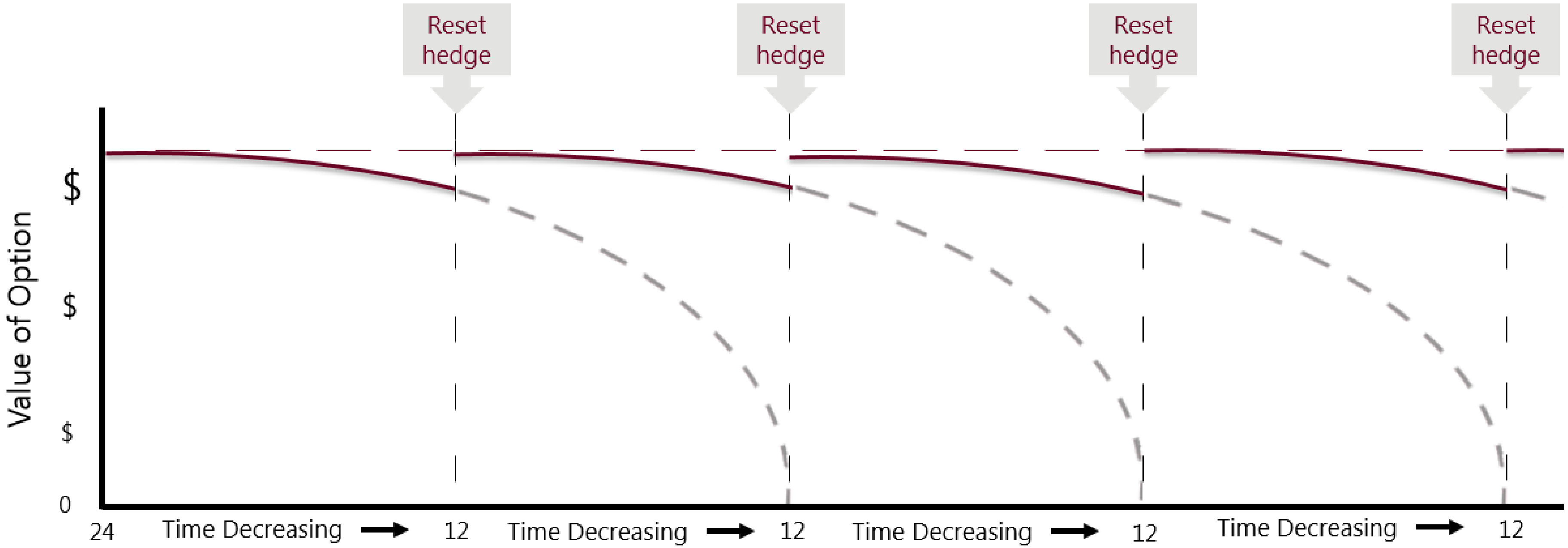
The Process is

Transparent | Disciplined | Repeatable

Why use passive ETFs for core exposure?



Why use long-term LEAPs for hedging?



By rolling the hedge annually:

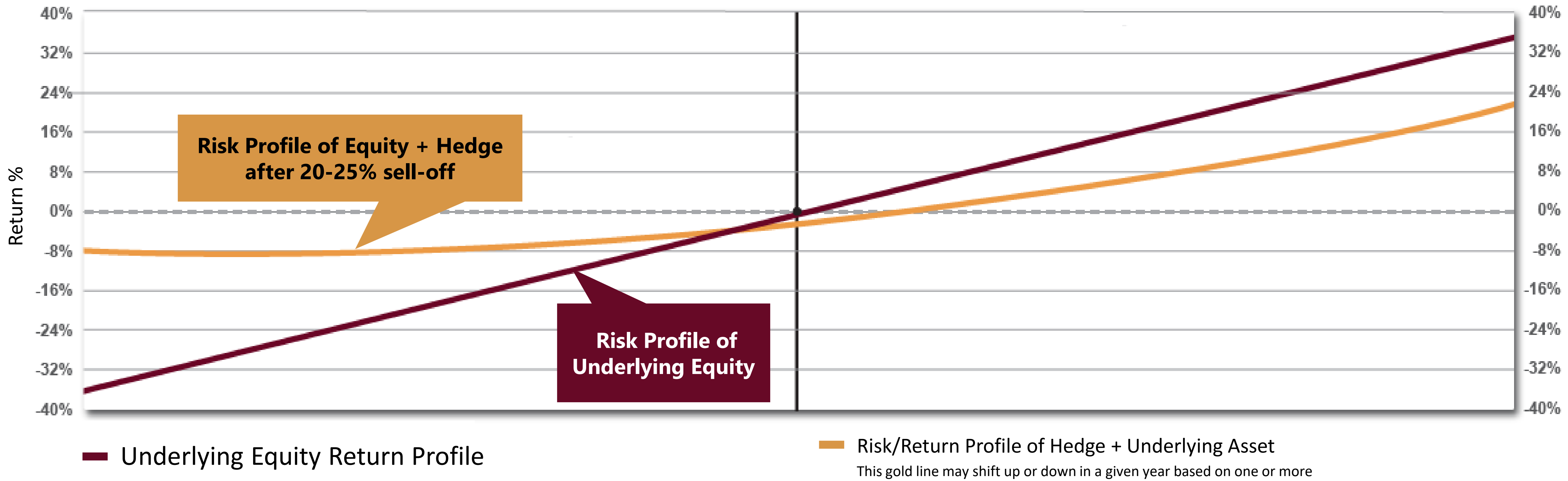
- The portfolio is always hedged;
- The DRS is not under duress to seek protection;
- The DRS is not exposed to the steeper drop off in value of put option.

 Source: Swan Global Investments. Note: This graphic is for illustrative purposes only to demonstrate the concept of resetting the hedge and does not represent a specific trade.

Why not use short-term hedges?

Long-Term Hedging (LEAP)	*Vs.*	*Short-Term Hedging*
➢ Can be longer in duration than bear markets keeping investors always hedged		➢ May expire during a bear market leaving investors unhedged
➢ Not under duress to rehedge during crisis		➢ Possibly cost prohibitive during crisis
➢ Opportunity to acquire more shares during major market sell-offs		➢ Harder to monetize the hedge to buy more shares during bear markets
➢ Less frequent adjustments, less market timing risk		➢ Shorter adjustment periods means more timing risk

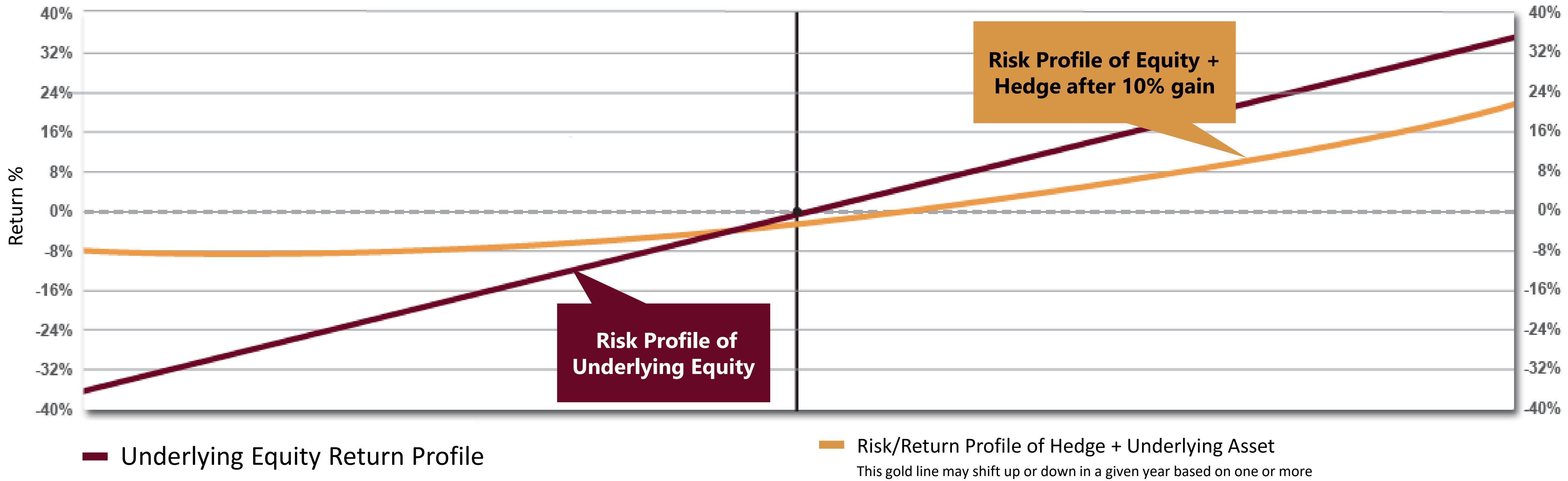
Why re-hedge after a 20-25% sell-off?



This gold line may shift up or down in a given year based on one or more factors that may impact the pricing of options.

Always Hedged

Why not re-hedge continuously through year to lock in gains?



This gold line may shift up or down in a given year based on one or more factors that may impact the pricing of options.

Always Hedged

Why doesn’t the DRS market-time the hedge?

Go risk-on/risk-off?

- Very difficult to get timing right
- Hedging becomes expensive when everyone else is buying

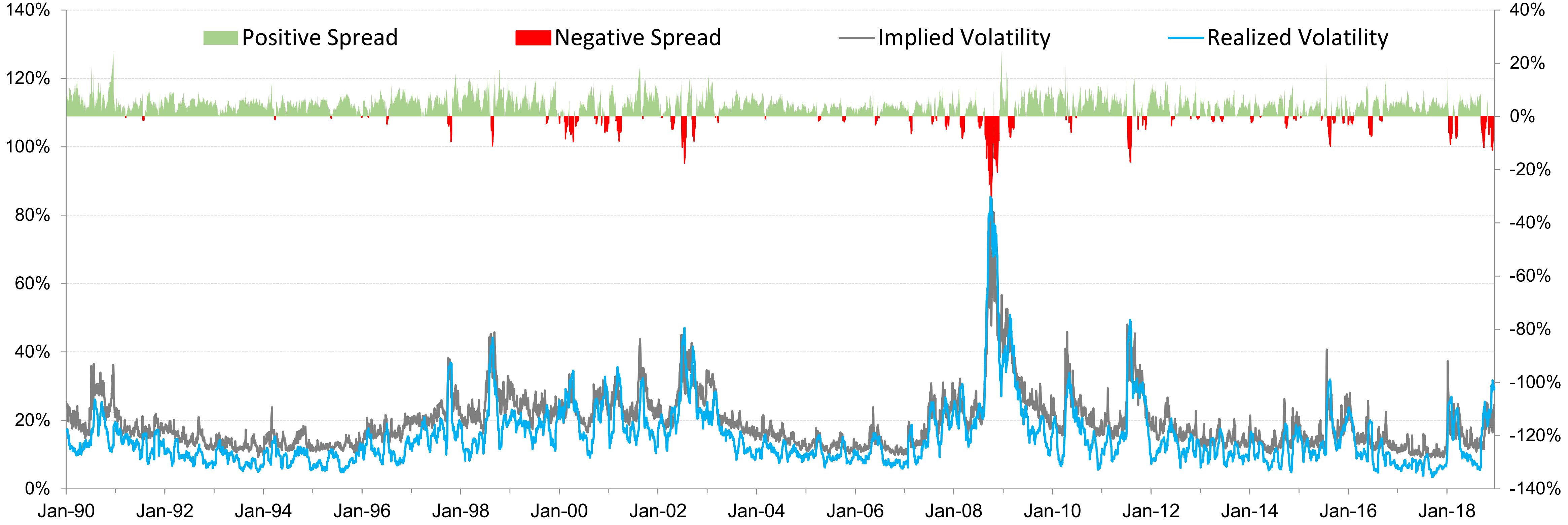
Why does the DRS engage in the premium collection trades?

- Offset carrying cost of hedge
- Potentially increase up capture in rising market
- Potential to capitalize on increased volatility premium in down markets
- Historically the income component has been responsible for about half of the DRS's total return

Why are short volatility trades profitable?

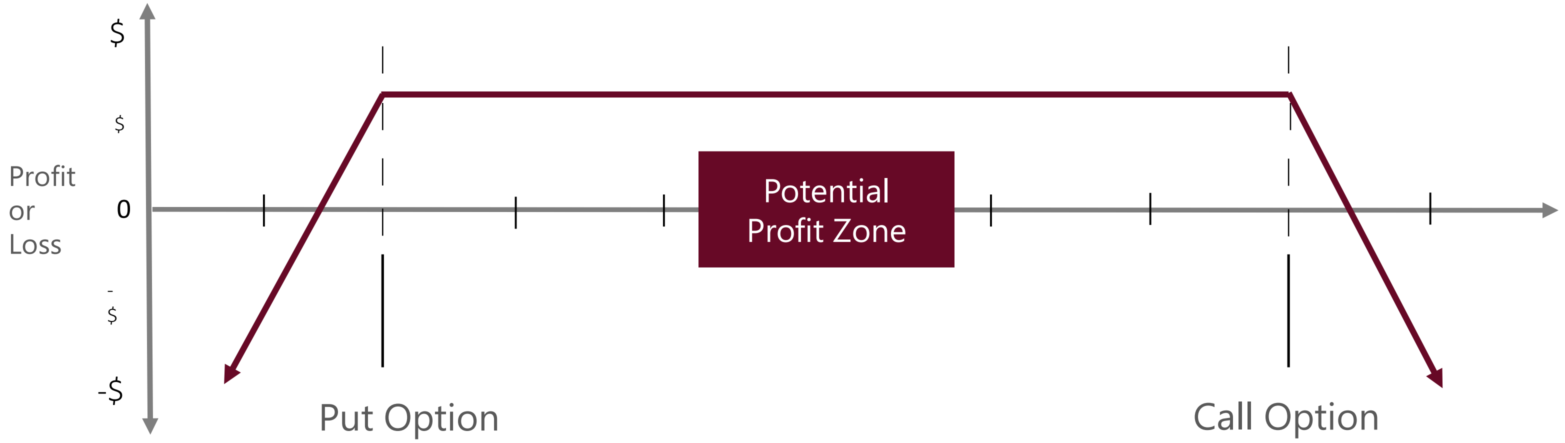
Historical Implied Volatility vs. Realized Volatility

Implied vs. Realized Volatility - Jan 1, 1990– Dec 31, 2018



 Source: Bloomberg and SG Financial Engineering, from 1/1/1990 to 12/31/2018 Note: This graphic is for illustrative purposes only to demonstrate the concept of resetting the hedge and does not represent a specific trade.

How do we typically harvest option premium?



- Systematically seek option premium income to help subsidize the cost of the hedge
- Market neutral, rules-based options strategy
- Predetermined adjustment and exit triggers

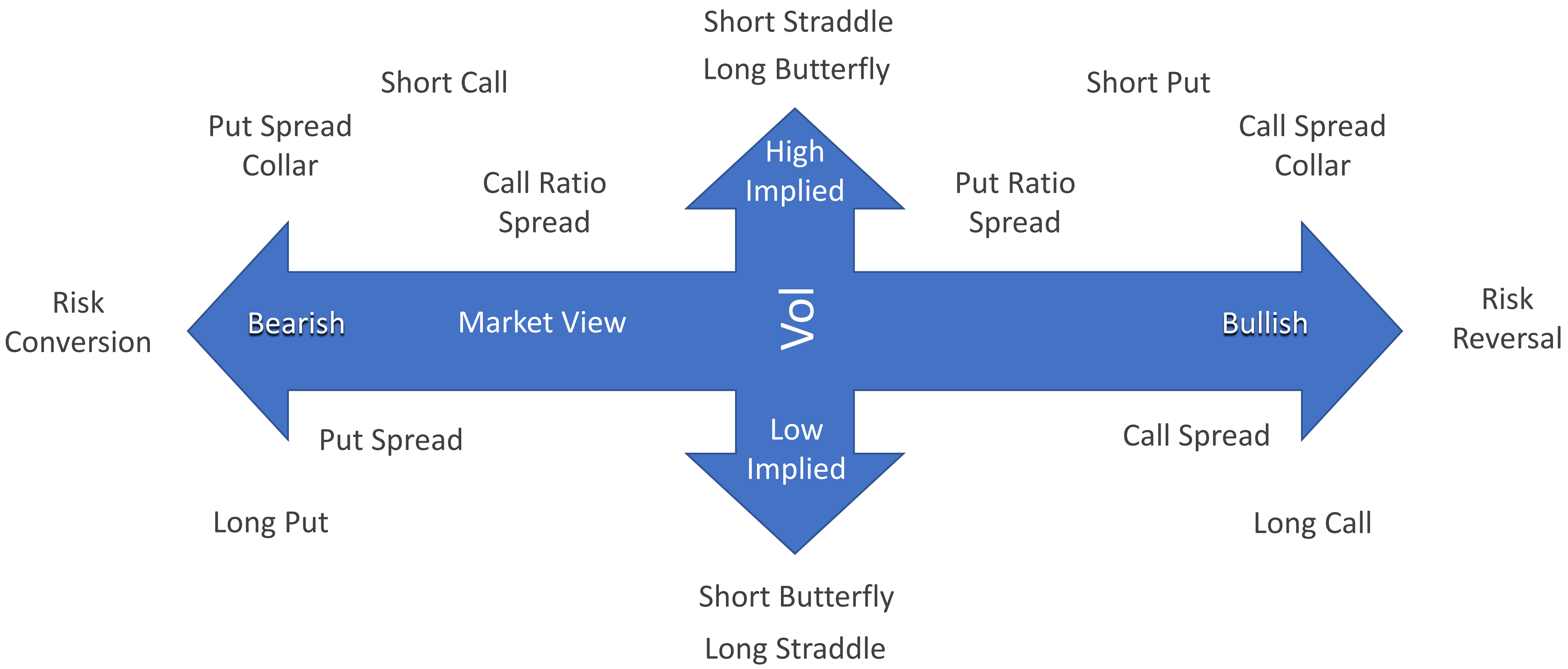
Always seeking returns in a variety of market conditions

 Source: Swan Global Investments. Note: This graphic is for illustrative purposes only to demonstrate the concept of resetting the hedge and does not represent a specific trade.

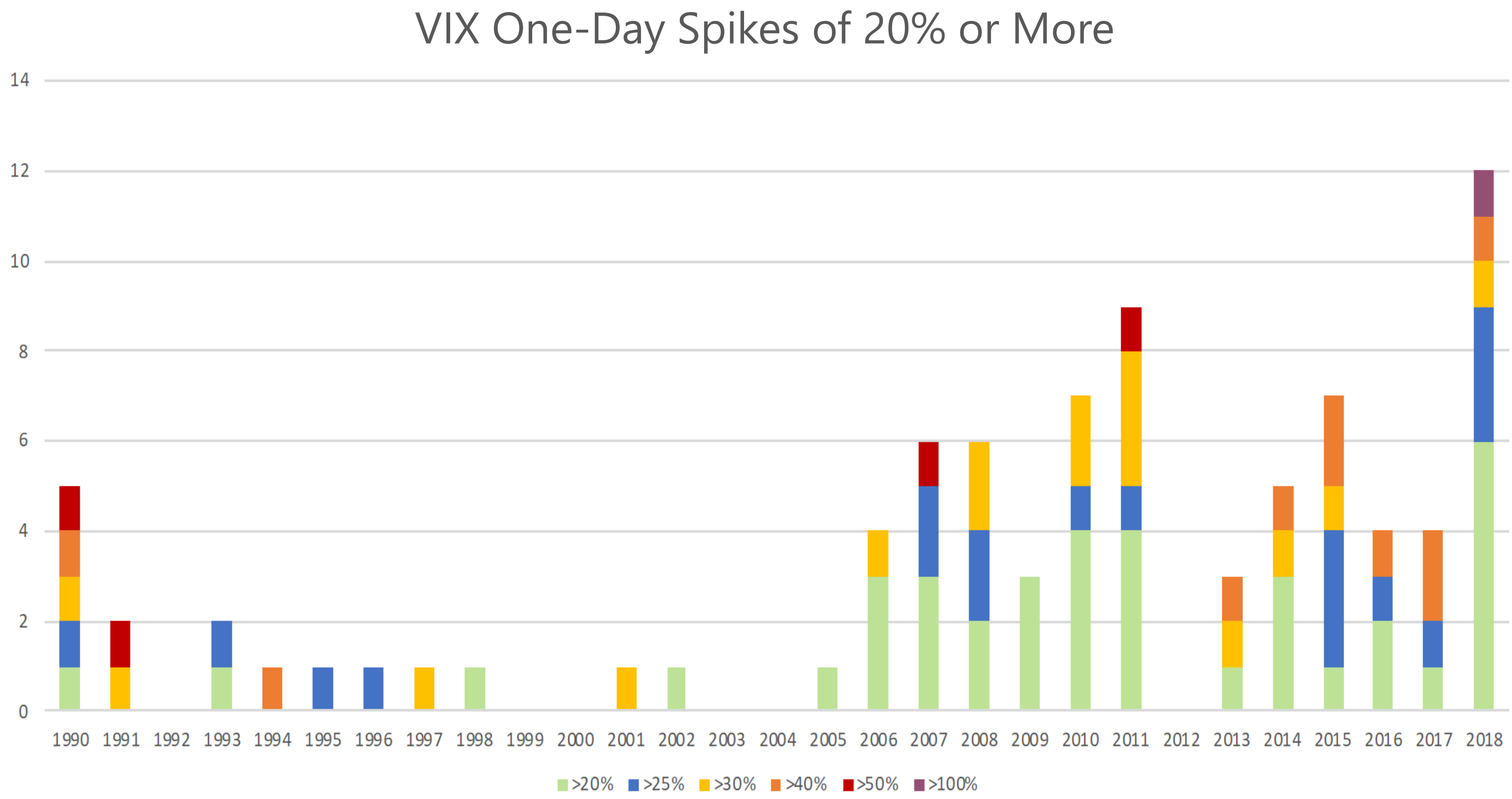
What are some examples of active management?

- Step into trades
- Set bands wider or narrower
- Close out trades earlier
- Buy risk mitigation further out (i.e., iron condors, spreads)
- Only trade one side (i.e., only have short call or short put on
- Not trade at all

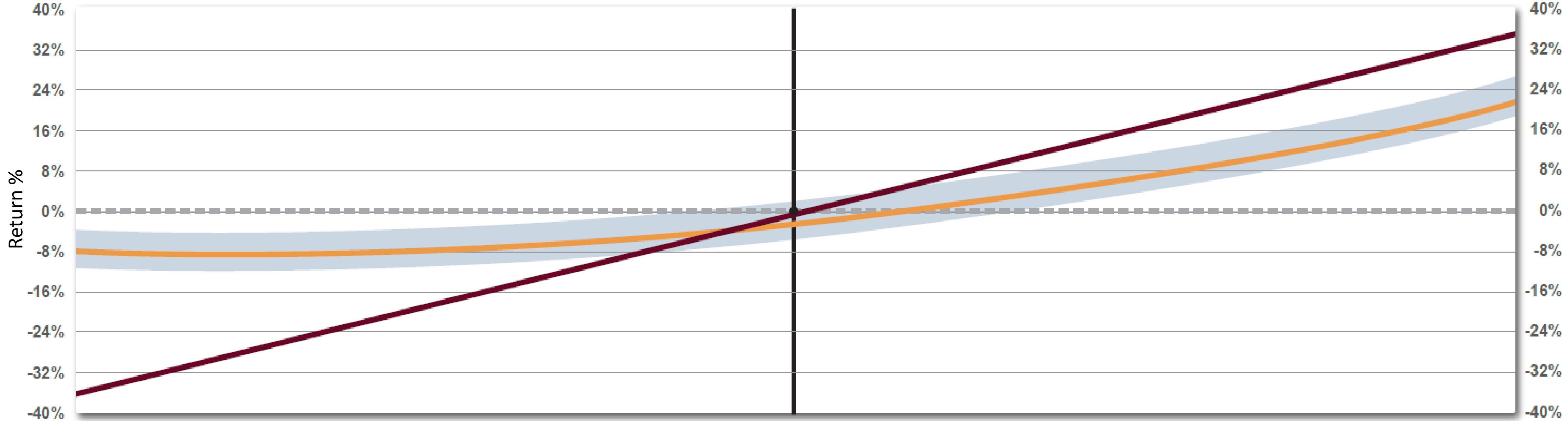
Why don't we do strangles exclusively?



Why are volatility spikes seemingly more frequent?



How do these pieces come together?



S&P 500 Index TR Annual Return

Risk/Return Profile of Hedge + Underlying Asset

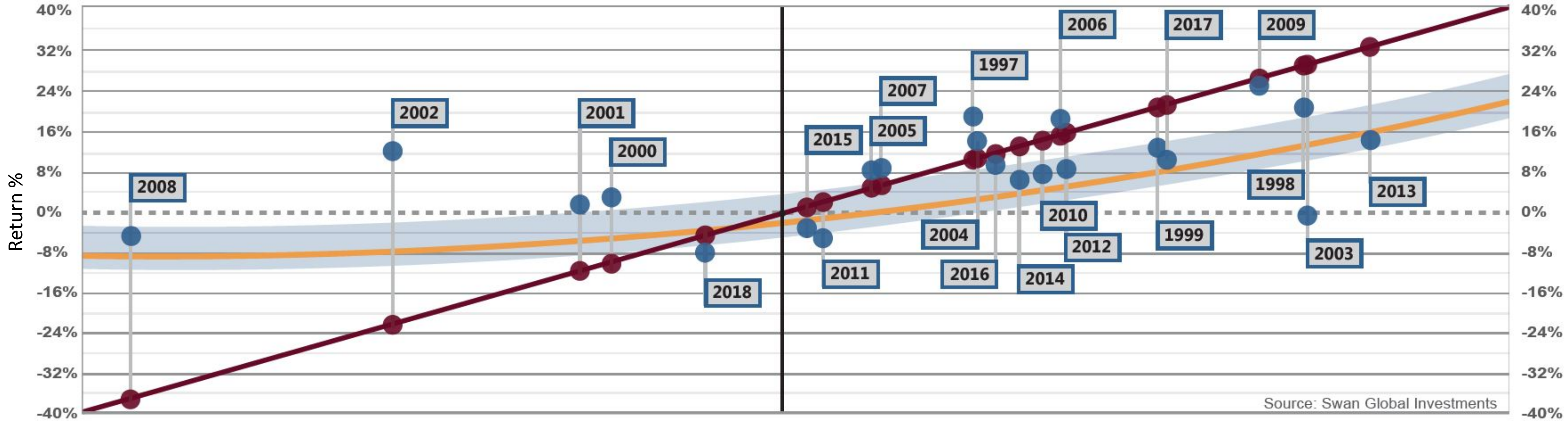
This gold line may shift up or down in a given year based on one or more factors that may impact the pricing of options.

Option Premium Trades Create Our Targeted Return Band

The top edge of the blue-shaded band is defined by the average annual return for the options trading component of the DRS, while the bottom edge is defined by the worst annual return for this component of the DRS.

How has it worked out?

Swan Defined Risk Strategy – Select Composite (net of fees)



S&P 500 Index TR Annual Return

Swan DRS Select Composite Annual Return (net)

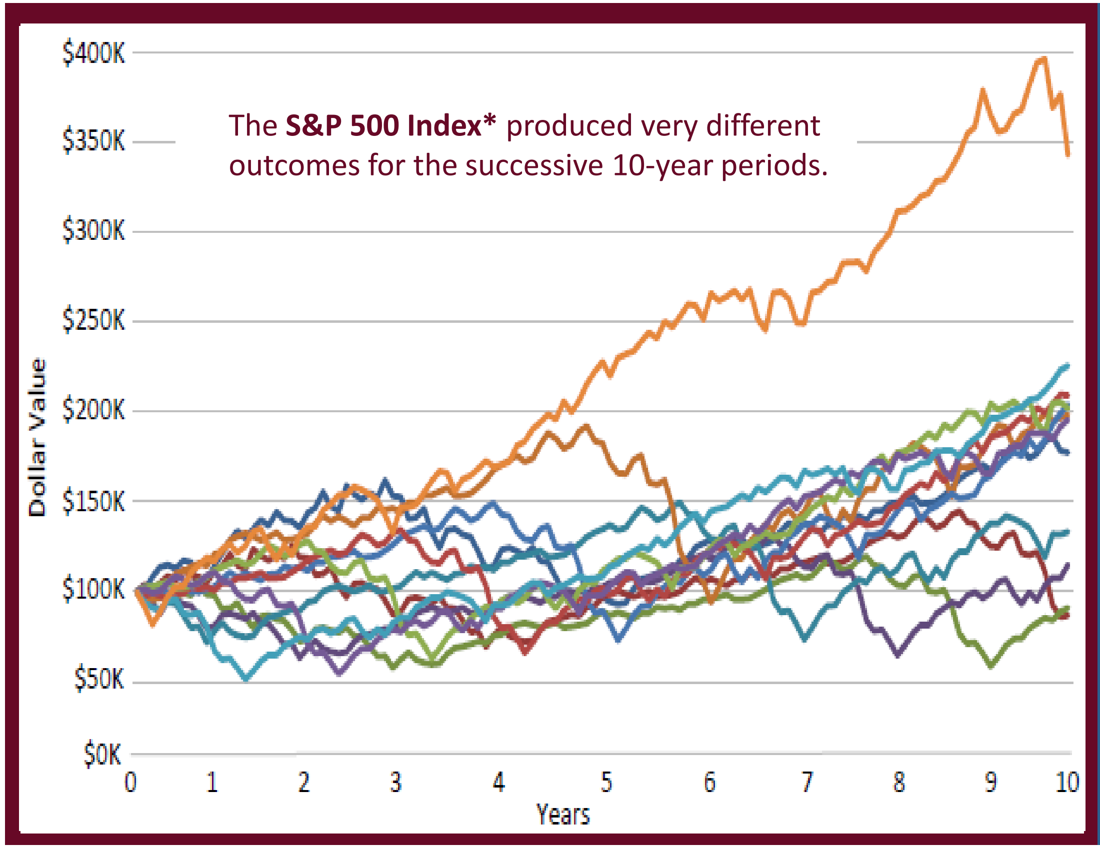
Risk/Return Profile of Hedge + Underlying Asset

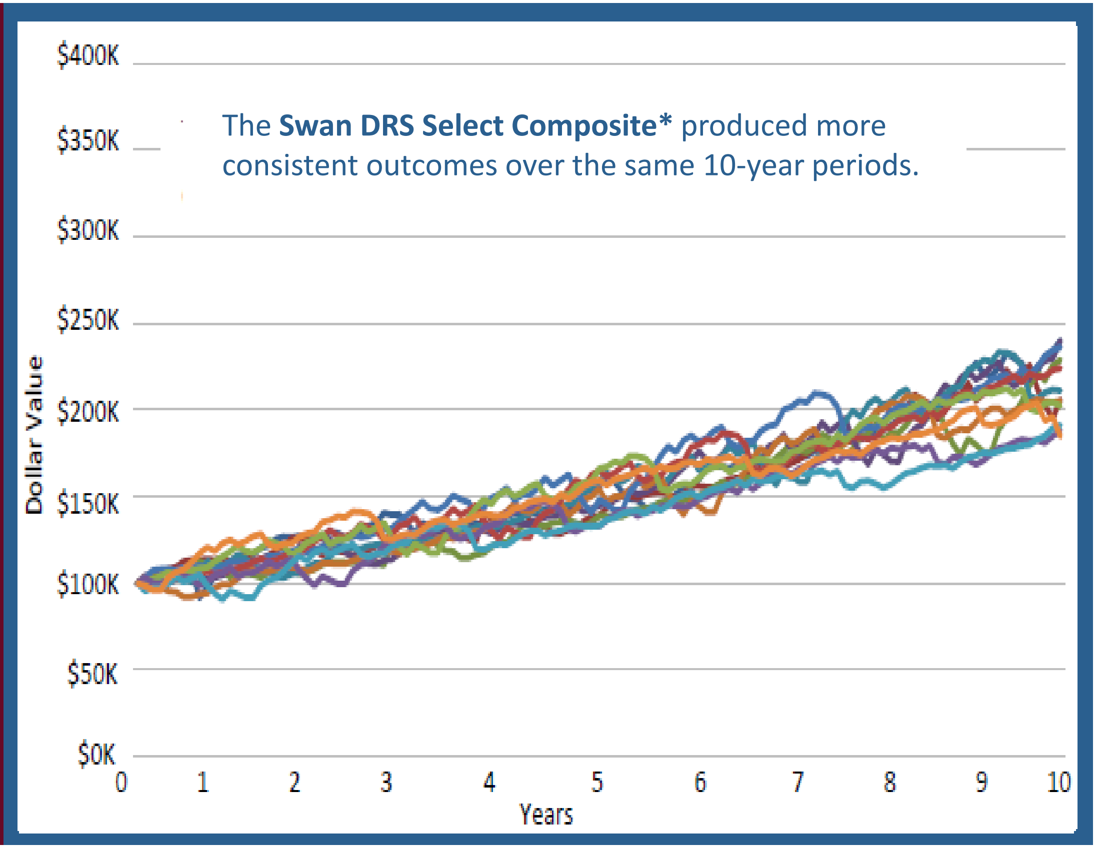
This gold line may shift up or down in a given year based on one or more factors that may impact the pricing of options.

Option Premium Trades Create Our Targeted Return Band

The top edge of the blue-shaded band is defined by the average annual return for the options trading component of the DRS, while the bottom edge is defined by the worst annual return for this component of the DRS.

What happens when you produce consistent results?





The graphs above show an investment of $100,000 over twelve successive, 10-year investment periods. The first period is 1/1998 to 12/2007; the last period is 1/2009 to 12/2018.

All but one of these periods contain at least one bull market and one bear market (1/2009 to 12/2018).

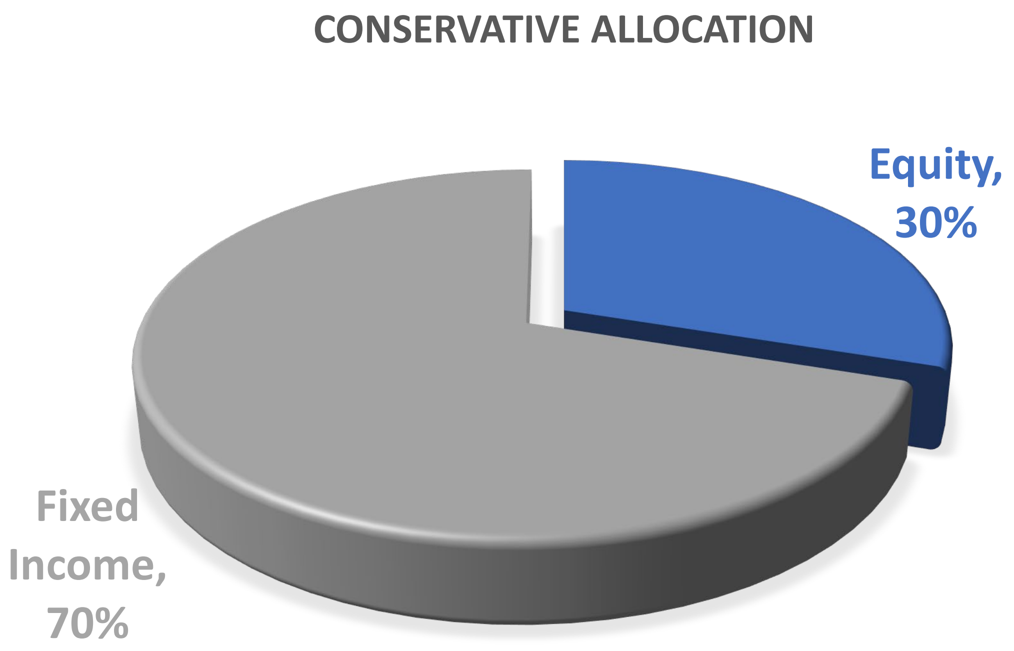
 * Source: Zephyr StyleADVISOR and Swan Global Investments. All data based on historical performance of the S&P Total Return Index and the Swan Defined Risk Strategy Select Composite.
NOTE – this chart is for illustration purposes, not a guarantee of future performance and should not serve as the sole determining factor for making investment decisions.

Where does the DRS fit in a portfolio?

A core equity complement/supplement	**Swan DRS outperformed S&P 500 Index in 72.66% of rolling 10 year periods**
A **fixed income** complement	Swan DRS never lost money in any 3 year period, worst 2 year period loss was -0.80%
Absolute return/alternative	Research suggests Swan DRS can shift the annualized efficient frontier

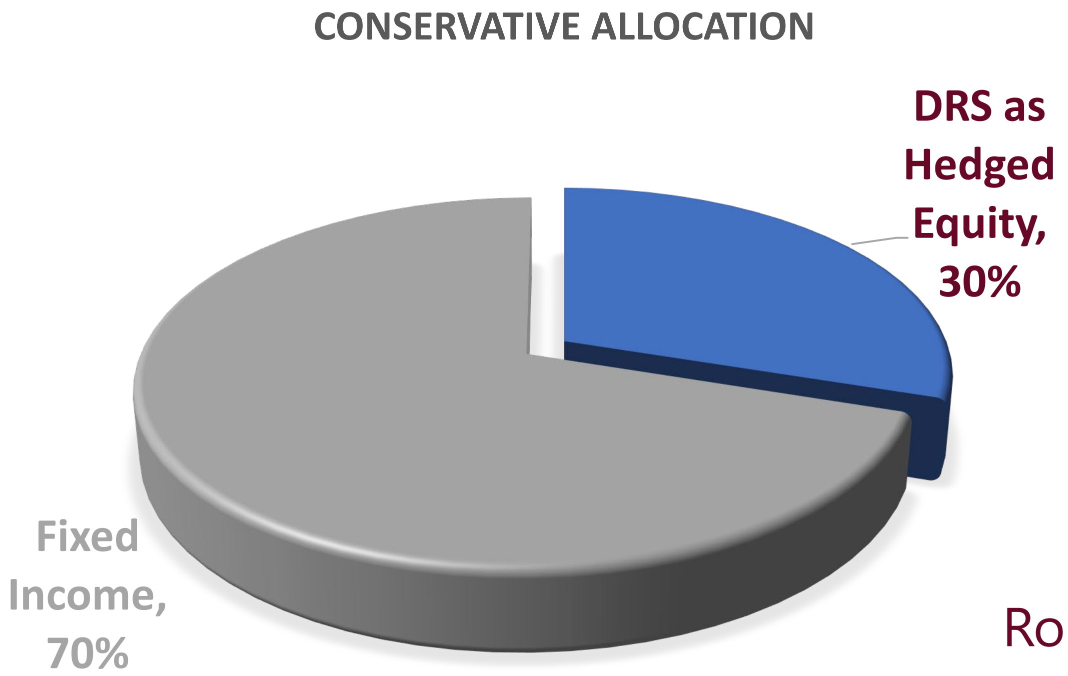
All data above refers to Swan Defined Risk Strategy Select Composite and performance net of fees, since inception in July 1997.

 Source: Zephyr StyleADVISOR and Swan Global Investments. All data based on historical performance of the S&P Total Return Index and the Swan DRS Select Composite net of fees, as of 12/31/2018. Prior performance is not a guarantee of future results.



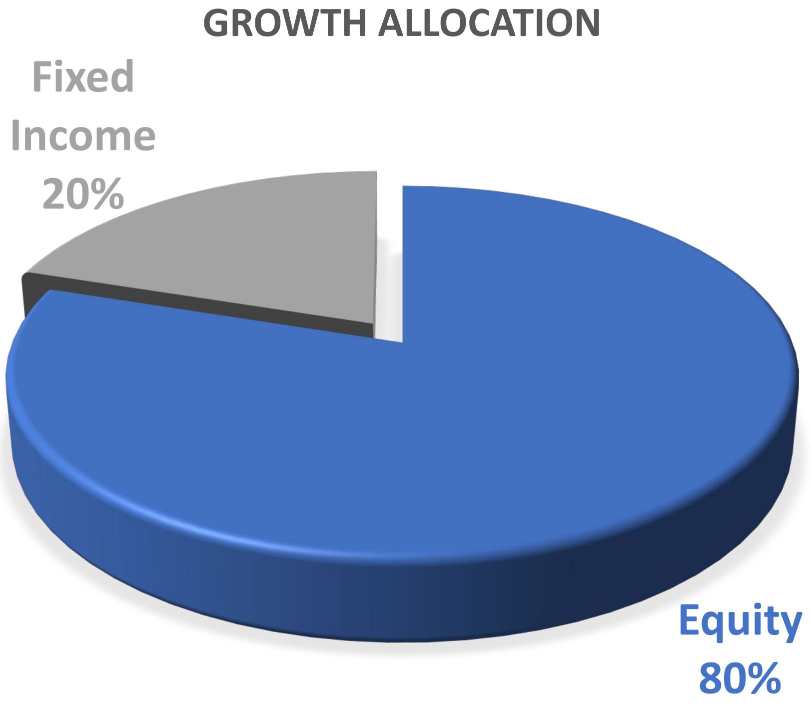
Role in a conservative portfolio: Hedged Equity

- Bonds are Treasuries, Municipal bonds
- Equity needed since bonds aren't beating inflation
- Terrified of downside risk in equity



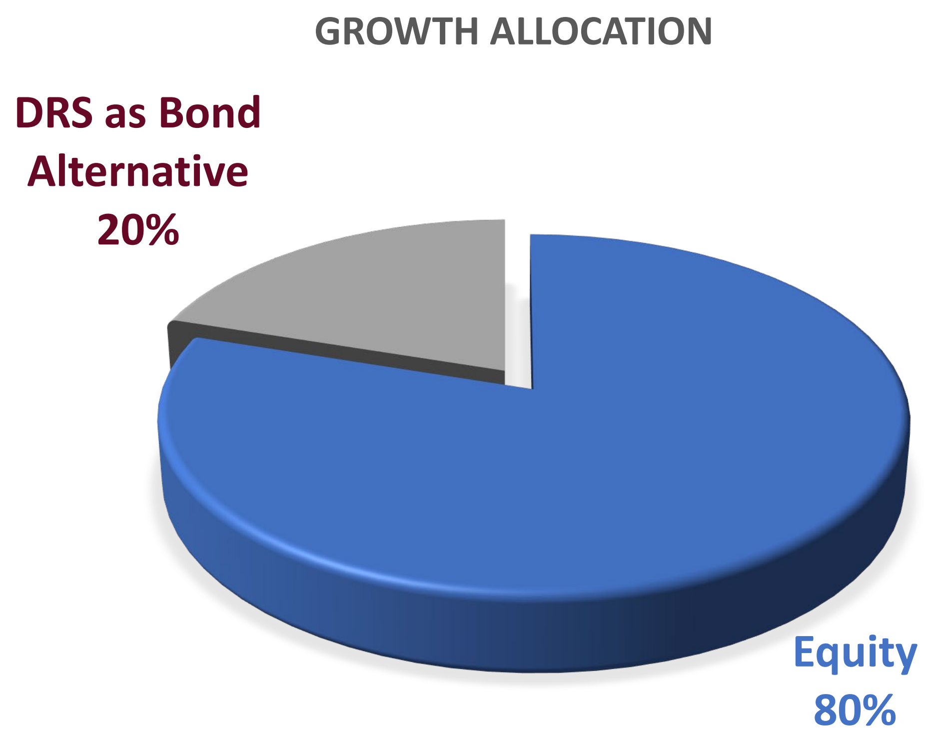
Role in a conservative portfolio: Hedged Equity

- Bonds are Treasuries, Municipal bonds
- Equity needed since bonds aren't beating inflation
- DRS is equity exposure with downside risk mitigation



Role in a growth portfolio: Capital Preservation

- Portfolio is positioned for growth
- Still needs to have a "safe" portion
- Bonds are seen as dead weight in a growth portfolio



Role in a growth portfolio: Capital Preservation

- Bond complement or Bond alternative
- De-risking portfolio, removing beta
- Allows bets to be made elsewhere

Disclosures: Swan Defined Risk Collective Investment Funds

Prior to the inception date of the Swan Collective Investment Funds (CIFs), the investment manager maintained an investment strategy which is used in the CIFs. The Swan Collective Investment Funds and the Swan DRS strategy performance represent separate products. The strategy performance is primarily shown to give potential investors additional information on how the option overlay strategy employed by the Swan Collective Investment Funds has performed over a longer time horizon. The Swan DRS strategy is only an allocation of each Swan CIF and as a result the Swan DRS performance and the CIF performance may differ materially due to other strategy and allocation exposures in the CIFs, fees, participant and portfolio transactions and other factors. The strategy performance does not necessarily represent what investor returns would have been in the Swan Collective Investment Funds.

About Swan Global Investments

Swan Global Investments is an asset management firm with $5.03 billion in assets under management (as of December 31, 2018). It was formed in 1997 to offer a proprietary strategy designed to hedge against large stock market declines. The Defined Risk Strategy is an actively managed, hedged equity, rules-based process. It is available in mutual funds, separately managed accounts, and as an overlay to customize existing equity portfolios. Through a combination of techniques that seek to hedge the market and generate market-neutral income, the goal of the DRS is to minimize large losses in bear markets and outperform the S&P 500 over a full market. Swan's expanding portfolio of investment offerings is managed out of Durango, CO with affiliated offices in Tampa and Puerto Rico. In addition to managing the five Collective Investment Funds, Swan offers its Defined Risk Strategy through separate accounts and mutual funds. For more information, please visit http://swanglobalinvestments.com.

About Gordon Asset Management

Gordon Asset Management, LLC is an independent investment advisory firm located in the Raleigh-Durham area of NC and manages over 150 corporate retirement plans as a plan level fiduciary under ERISA section 3(21)A(ii) without discretion or with discretion under ERISA 3(38) as an investment manager. The firm is certified as an investment advisor with the Centre for Fiduciary Excellence (www.CEFEX.org) for adhering to global best practices in fiduciary excellence. Please contact Gordon Asset Management at wealthqb.com if you are interested in reviewing the CIT documents and disclosures.

About Alta Trust Company

Alta Trust Company is a South Dakota chartered trust company that partners with world class investment managers such as Swan and Gordon to provide retirement plans with quality investment options. Collective Investment Trusts are bank maintained trusts and are not registered with the Securities and Exchange Commission. Alta Trust Company is the trustee for the Swan Defined Risk Collective Investment Funds.

Past performance is no guarantee of future results. A Fund's strategy, like most investment strategies, involves risks, including possible loss of principal. Before investing in any Fund, please consider the Fund's investment objective, strategies, risks, and expenses. Be sure to consult with your financial, legal and professional tax advisers prior to investment in any fund.

Please contact Gordon Asset Management at www.wealthqb.com if you are interested in reviewing the CIT documents and disclosures.

For Investment related questions please contact Swan Global Investments at: (970) 382-8901.

For general inquiries please contact Alta Trust at: 866-516-4015. Or visit the Fund web page at www.trustalta.com/swan.

Important Disclosures

Swan Global Investments, LLC. is a SEC registered Investment Advisor that specializes in managing money using the proprietary Defined Risk Strategy (DRS). Please note that registration of the Advisor does not imply a certain level of skill or training. Further information may be obtained by contacting the company directly at 970-382-8901 or www.swanglobalinvestments.com. Swan Global Investments, LLC, Swan Global Management, LLC, Swan Capital Management, LLC, and Swan Wealth Advisors, LLC are affiliated entities. Sources: Swan Global Investments, Zephyr StyleADVISOR, and Morningstar; all information is provided "as is" without warranty of any kind. Swan assumes no responsibility for typographical errors, inaccuracies or other errors which may occur.

This presentation is for information purposes only and does not constitute any investment advice or tax advice. DRS performance results are presented in U.S. dollars and are net-of-actual-fees and trading expenses and reflect the reinvestment of dividends and capital gains. Actual fees may vary based on, among other factors, account size and custodial relationship. No current or prospective client should assume future performance of any specific investment strategy will be profitable or equal to past performance levels. All investment strategies have the potential for profit or loss. Changes in investment strategies, contributions or withdrawals may cause the performance results of a client's investment portfolio to differ materially from the reported composite performance. Different types of investments involve varying degrees of risk and there can be no assurance that any specific investment will either be suitable or profitable for a client's investment portfolio. Historical performance results for market indices and/or categories generally do not reflect the deduction of transaction and/or custodial charges or the deduction of an investment management fee, the incurrence of which would have the effect of decreasing historical performance results.

All Swan products utilize the Defined Risk Strategy ("DRS"), but may vary by asset class, regulatory offering type, etc. Accordingly, all Swan DRS product offerings will have different performance results due to offering differences and comparing results among the Swan products and composites may be of limited use. Historical performance results for market indices and/or categories generally do not reflect the deduction of transaction and/or custodial charges or the deduction of an investment management fee, the incurrence of which would have the effect of decreasing historical performance results. Economic factors, market conditions, and investment strategies will affect the performance of any portfolio and there are no assurances that it will match or outperform any particular benchmark.

The benchmarks used for the DRS Select Composite are the S&P 500 Index, which consists of approximately 500 large cap stocks, and a 60/40 blended composite, weighted 60% in the aforementioned S&P 500 Index and 40% in the Barclays US Aggregate Bond Index. The 60/40 is rebalanced monthly. The Barclays US Aggregate Bond Index is a broad-based flagship benchmark that measures the investment grade, US dollar-denominated, fixed-rate taxable bond market. The index includes Treasuries, government-related and corporate securities, MBS (agency fixed-rate and hybrid ARM pass-throughs), ABS and CMBS (agency and non-agency). The S&P 500 Index is often used as a proxy for the overall U.S. equity market. Indexes and other benchmarks used herein are generally unmanaged and have no fees or expenses. An investment cannot be made directly in an index or some of these benchmarks. Swan's investments may consist of securities which vary significantly from those in the benchmark indexes listed above and performance calculation methods may not be entirely comparable. Accordingly, comparing results shown to those of such indexes and benchmarks may be of limited use.

Swan claims compliance with the Global Investment Performance Standards (GIPS®) and has prepared and presented this report in compliance with GIPS. Swan's compliance with GIPS has been independently verified for the periods July 1, 1997 through December 31, 2017. The Spaulding Group conducted Swan's verification. A copy of the verification report is available upon request. To receive copies of the report, please call (970) 382-8901 or email operations@swanglobalinvestments.com. Verification assesses whether (1) the firm has complied with all the composite construction requirements of GIPS on a firm-wide basis, and (2) the firm's policies and procedures are designed to calculate and present performance in compliance with GIPS. Verification does not ensure the accuracy of any specific composite presentation.

The Swan Defined Risk Strategy Select Composite demonstrates the performance of non-qualified assets managed by Swan Global Investments, LLC since inception. It includes discretionary individual accounts whose account holders seek the upside potential of owning stock, and the desire to eliminate most of the risk associated with owning stock. The Composite relies on LEAPS and other options to manage this risk. Individual accounts own S&P 500 exchange traded funds and LEAPS associated with the exchange traded funds as well as multiple other option spreads that represent other indices that are widely traded. The Defined Risk Strategy was designed to protect investors from substantial market declines, provide income in flat or choppy markets, and to benefit from market appreciation. Stock and options are the primary components of the strategy.

Swan offers and manages The Defined Risk Strategy ("DRS") for its clients including individuals, institutions and other investment advisor firms. Swan Global Investments has affiliated advisers including Swan Global Management, LLC and Swan Capital Management, LLC. There are eight DRS Composites offered: 1) The DRS Select Composite which includes non-qualified accounts; 2) The DRS IRA Composite which includes qualified accounts; 3) The DRS Composite which combines the DRS Select and DRS IRA Composites; 4) The DRS Institutional Composite which includes high net-worth, non-qualified accounts that utilize cash-settled, index-based options held at custodians that allow participation in Clearing Member Trade Agreement (CMTA) trades; 5) The Defined Risk Fund Composite which includes mutual fund accounts invested in the S&P 500; 6) The DRS Emerging Markets Composite which includes mutual fund accounts invested in emerging markets; 7) The DRS Foreign Developed Composite which includes all research and development account(s), and mutual fund accounts invested in foreign developed markets; 8) The DRS U.S. Small Cap Composite which includes all research and development account(s), and mutual fund accounts invested in U.S. small cap issues. Additional information regarding Swan's policies and procedures for calculating and reporting performance returns is available upon request.

The charts and graphs contained herein should not serve as the sole determining factor for making investment decisions. To the extent that you have any questions regarding the applicability of any specific issue presented or discussed, you are encouraged to consult with Swan Global Investments. All information, including that used to compile charts, is obtained from sources believed to be reliable, but Swan Global Investments does not guarantee its reliability. The Put Hedge examples presented may not be indicative of all Put Hedge's engaged by Swan. It is a hypothetical example, not shown for purposes of highlighting specific successful strategies, but rather as a general indicator of Swan's general experience and strategic outlook. The example does not represent an actual trade or investment. There is no guarantee that such hypothetical investments would have been, or will be, profitable for, or executed by, Swan.

Swan uses options in the DRS strategy. Options carry additional risks and are not suitable for all clients. Clients must read and understand the current options risk disclosure documents prior to entering into any options or other derivatives transactions. Prior to implementing a call writing program or any of the strategies described herein, a client should further discuss this investment process with other financial, legal and/or tax advisors. The options risk disclosure document is located at: http://optionsclearing.com/about/publications/character-risks.jsp.

196-SGI-042619