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## Portfolio Management Needs To Mature

Mark Yamada / February 24, 2010

**T**here's not much new in the world of asset allocation despite the drubbing portfolios sustained last year.

Many of the best and the brightest minds, and the most researched and supported techniques, failed to save Humpty Dumpty from shattering on impact.

To be sure, diversification never seems to work when fear and flight take control of a market. But this understanding does little to regain the confidence of clients staring at double-digit losses.

Academics can debate whether the efficient market hypothesis is dead or whether Modern Portfolio Theory needs modernization, but investors want practical answers now. And the first question that must be answered is: Do the pants fit?

Asset allocation is the strategy investors follow to divide their money between different assets like stocks, bonds and cash. The underlying principle is that prices of different assets move in different (uncorrelated) ways, leading to the idea that diversification protects against risk, which is defined as volatility. But asset allocation says little about the investor's objectives (or pant size).

Psychologist Abraham Maslow is credited with saying "if your only tool is a hammer, every problem looks like a nail." The phrase applies well to the investment business because advisors too often believe maximizing return is every investor's goal, all of the time. While it can be argued that conservative, moderate or aggressive risk profiles determine the kinds of investments chosen, these solutions are likely constructed only on perceived risk tolerance not on investor's needs.

Maslow is best known for his "hierarchy of needs," and in that context an investor should think of his or her pool of investment capital as a "hierarchy of goals." These include:

**Goal 1** – covers basic needs such as food, clothing and shelter;

**Goal 2** – covers lifestyle enhancements such as a cottage, vacations, and French rather than Chilean wine; and

**Goal 3** – allows a client to leave a legacy such as paying for the grandchildren's educations, or philanthropy.

In this context, a typical split may be basic (60%), enhanced lifestyle (25%), and legacy (15%).

One can then assign risks to each goal.

### The Belt Approach

**Goal 1** is important; the advisor can't take much risk here. So go with about 80% bonds and 20% equities.

**Goal 2** offers more flexibility, perhaps 60% equities and 40% bonds.

**Goal 3** has a longer time horizon goal, so go with around 80% equities and 20% bonds.

By weighting each goal based on the investor's preferences, the final asset mix will better reflect his or her needs. And, regardless of investing methodology, this approach helps investors understand the relationship of their asset mix to needs.

A more sophisticated methodology is to use value-at-risk (VaR).

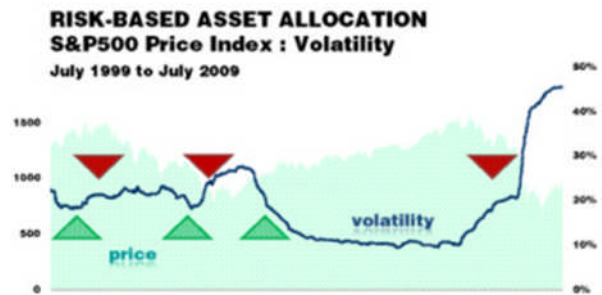
Ioulia Tretiakova, our director of quantitative strategies, notes that this approach creates a return floor for the portfolio. So, if the investor's risk number (or VaR) is eight, then an investing time horizon of about eight years is suggested. And, the minimum expected return at the end of that eight-year period will be the return of all capital plus inflation with a 95% historical probability. While this isn't 100%, it suggests a high confidence level with a return floor. This is possible because risk is persistent.

VaR has gotten a bit of a black eye because similar analysis, abused by Wall Street mortgage bankers, contributed to overconfident assumptions in pricing and selling collateralized debt obligations. We, however, assume an extra margin for error, three standard deviations (SD) versus the 1.6-to-2.0 standard deviations normally used. But during a tsunami risk event like 2008, even this isn't going to save the portfolio. And that's why the client also needs suspenders!

### Back To Braces

Rebalancing to a fixed asset mix (say 60% equities, 40% bonds) is a popular tactic among professional and retail investors alike. It's simple and intellectually satisfying.

Selling an asset class as it rises to buy others sounds right (sell high/buy low). Doing this from 1990 to 2001, before and during the technology bubble, meant selling stocks into the run up to maintain a 60:40 mix during the entire period.



Meanwhile, the technology sector's weight in the S&P 500 Index rose from 8% to more than 30%, and the one-year moving average of S&P volatility rose from 12.5 to more than 15. Was the risk in the market the same at the beginning of the period compared with the peak? Of course it wasn't. Nevertheless, many investors' portfolios maintained the same static volatility risk profile throughout.

Rebalancing to a constant volatility means reducing risk when market volatility rises (sell stocks and buy bonds or cash) and vice versa when it is low or falling.

Fast forward to 2004 and we have 12-month volatility low and stable until 2007. The S&P 500

continued to climb during this period and rising volatility provided a good caution signal into 2008.

We set the weight of S&P 500 in a simple equity/cash asset mix to target the constant level of volatility of 15% (the long-term volatility of S&P 500). The target weight of the S&P 500 is calculated as  $[(\text{target volatility})/(\text{current volatility})]^2$  (the ratio of variances, hence the ratio is squared).

For example, the most recent 252-day volatility of 45% and target volatility of 15% (long-term level of volatility of S&P 500) result in  $(0.15/0.45)^2 = 11.1\%$ . The rest is allocated to cash earning 3% per annum. The resulting risk-based asset mix beats the S&P 500 by 3.68% per year with just over half the risk.

In short, portfolio management needs to grow up. Polarizing theories need revisiting. Choosing between value and growth, large cap/small cap, top-down/bottom-up, active/passive, and fundamental/technical analysis is the investment world's way to divide and conquer.

These labels have become marketing tag lines that simplify approaches because human nature prefers short cuts. Advisors need to explain themselves to clients and complexity rarely wins business. Markets aren't always so simple. Using both belt and suspenders to keep your pants up may seem silly, but tell that to the investors with their pants around their ankles. ●



## ETF Tax Advantages

Mark Yamada / March 01, 2010

**T**he three key characteristics that make exchange-traded funds (ETFs) tax-efficient are easily defined. They are:

1. Index-based ETFs have extremely low turnover. Transactions trigger gains taxable in the hands of unit holders.
2. The redemption of ETFs allows for in-kind transfers, allowing sponsors to transfer out the lowest cost shares without incurring tax. This maintains the adjusted-cost base closer to the market value. Unit holders pay most taxes when they sell the ETF, effectively deferring taxes until realized.
3. The creation method and exchange-traded nature of ETFs means supply and demand are balanced in the marketplace and units do not have to be sold (incurring a possible tax liability) to meet redemption requirements as mutual funds do. As a consequence, ETFs hold less cash to earn taxable income (albeit not much lately given low interest rates).

These tax-minimizing characteristics are a big relief for taxable investors. Had they owned mutual funds, they could be subjected to big taxes unrelated to their actual investment results. Paying for the capital gains or income received by others is just silly.

### Tax Losses

ETFs are ideally suited for capturing tax losses. The conventional way is to replace a losing stock position with an ETF. Example: sell Research in Motion (RIM) at a loss to buy iShares Canadian Tech Sector ETF (XIT). The loss in the stock position is captured to be used to offset capital gains in the current year, back three years or carried forward indefinitely. The portfolio exposure, to the technology sector in this case, is maintained.

Another effective tactic is to swap between ETFs with similar underlying risk. An example is iShares S&P 500 (IVV) and SPDR 500 (SPY). Both have the S&P 500 as their underlying index but because the ETFs have different sponsors, BlackRock and State Street Global Advisors respectively, they are considered different securities for tax purposes. Therefore, they may be traded simultaneously to capture a loss. The 30-day waiting period to avoid a superficial loss is not required.

Holding a core portfolio of ETFs and owning a satellite portfolio of individual stocks is a good way to protect capital gains generated by the stock portfolio by applying tax losses generated from the core. Some firms may offer a tax-loss-capture module, like PÜR Investing, that does this automatically.

## Caution

Ioulia Tretiakova, director of quantitative strategies for PÜR Investing, says while ETFs have tax-efficient characteristics, some have shocked investors at tax time. The 2008 experience with some leveraged Rydex Inverse sector series ETFs is shown below.

ETF	Gain
Rydex Inverse 2x Sector Energy	86.61%
Rydex Inverse 2x Sector Technology	59.46%
Rydex Inverse 2x Sector Financial	42.35%

Tretiakova explains that inverse, leveraged long and leveraged inverse ETFs use swaps and derivative instruments rather than securities that can be transferred in kind. This creates potential tax liability when the contracts are closed out. Capital gains, influenced by volatility and the expiration of futures contracts related to the underlying sectors on January 1, 2009, were huge for several Rydex ETFs. In Canada, a similar situation is not expected although in 2012 the Horizons Beta Pro's leveraged ETF products listed below have OTC derivative contracts maturing. A different Canadian structure, unavailable in the U.S., allows sponsors to better minimize taxes. At any rate, leveraged ETFs should always be watched carefully.

ETF	Date	Symbol
HBP S&P/TSX Financials Bull Plus ETF	June 11, 2012	HFU
HBP S&P/TSX Financials Bear Plus ETF	June 11, 2012	HFD
HBP S&P/TSX Financials Bull Plus ETF	June 18, 2012	HEU
HBP S&P/TSX Financials Bear Plus ETF	June 18, 2012	HED
HBP S&P/TSX Global Gold Bull Plus ETF	June 25, 2012	HGU
HBP S&P/TSX Global Gold Bear Plus ETF	June 25, 2012	HGD

## Screening ETFs For Tax Efficiency

While it should be clear by now that taxable investors should always use ETFs rather than mutual funds, differences in the tax efficiency of ETFs bears some attention. Like other forms of investing, "tax" should never be the prime reason to make an investment, however, it is common sense to be mindful of an instrument's tax impact.

Screening ETFs by the proportional size of their historical distributions is a fair way to assess their tax efficiency. It is these distributions that incur the tax that investors seek to avoid. To be fair, indexes that change their components or are in start-up mode, may incur more transactions and more taxable activity. This should diminish over time. When choosing between similar ETFs, picking the one with better tax efficiency may improve your after-tax return. ●

## Bird-Brained Stock Picking

Mark Yamada / April 01, 2010

**E**very week at home, as a keen young portfolio manager, I would pore over the charts of all the stocks traded on the New York and American Stock Exchanges that were included in a binder with 12 charts to the page, 24 in total when open.

My pet cockatiel—named Dow Jones—would fly around the room as I worked. One day, he landed on my shoulder and walked down my arm onto the chart book. He shuffled around and showed his displeasure in a unique bird-like way on one of the charts. The next day that stock went down sharply! A humorous coincidence!

He did it the next week and the next. Each stock that received a “deposit” went down in price. Still a humorous coincidence, but I realized it represented a random key to how many people make investment decisions.

People do what they think worked for them in the past regardless of the method’s randomness. Sometimes their lottery ticket selection strategy is more systematic. No wonder so many investors end up with a portfolio of random securities with no plan or purpose.

There is less guesswork with exchange-traded funds (ETFs). These securities track broad indices, commodities, currencies, sectors and industries and allow investors to take leveraged long and short positions. They offer diversification, the ability to sell short, buy on margin, and trade like a stock during regular exchange hours.

There are only three basic ways to build portfolios with them—all others are variations. Over the next three issues, I will examine each of these.

Here is a brief overview of how ETF portfolio construction works:

### Fundamental Approaches

The fundamental approaches use some form of “top down” or “bottom up” analysis. Assessing views of global, region and local economies and their impact on sectors, industries and companies, ETFs lend themselves nicely to these strategies because they make country, regional, sector and industry investing simple.

Institutional managers can use ETFs to establish broad exposure before making specific securities investments and they can hedge existing exposure by shorting the relevant ETF. Portfolios for individual investors can similarly benefit from diversified exposure to elements identified by the portfolio manager.

“Bottom up” managers, or stock pickers who screen for superior growth, value a combination of both or other factors, have style ETFs as well as large, mid-cap, and small capitalization alternatives in different regions and sectors to choose from.

Many large portfolios and pension schemes employ “core” plus “satellite” or “tactical” approaches. They create a passive core cheaply and select active alpha-seeking strategies around that core.



ETFs offer flexibility and choice at a low cost so these traditional approaches can be applied to private client portfolios effectively. The tax efficiency of separately managed accounts combines nicely with ETFs so many firms will be encouraged to transition pooled and mutual fund assets to this format. Indeed, low costs contribute to better performance, so complacent product vendors should pay attention.

### Market Timing

Today, there are 1,000 ETFs available worldwide, with another 500 or so in registration, a fact attractive to many. Include currency; commodity; leveraged or enhanced; long and short; so-called “fundamental” and even Chinese real estate ETFs, and the possibilities grow.

Traders feed on volatility. So it's good news that the dampened relative volatility of groups of securities—which counters traders' need for action—is offset by better liquidity from the ETF structure.

Leveraged ETFs that offer the holder two times the daily price movement of an index are available; inverse versions go up two times the daily fall in price of an index. This is the type of action that traders want. But leveraged ETFs are not just for traders.

Trading has done much to democratize capital markets for individual investors; specialized education in financial analysis is not required. Technical analysis, the trader's discipline, doesn't care about companies, products, margins or market share. All that matters is price movement.

Within the movement of prices (and sometimes trading volume) lies all the necessary information needed to make buy and sell decisions. Anybody can apply these methods to the price of anything. This is pure market timing. ●

## Tracking ETF Error

Mark Yamada / April 13, 2010

**T**he 1 kg of stewing beef I bought ended up tasting like pork. When confronted, the butcher retorted “Well buddy, it’s meat isn’t it?”

Most consumers would be incensed at this response, but for some reason, investors are far more tolerant. It may be that mutual funds have dulled our expectations by underperforming their benchmarks for decades.

But for exchange-traded funds (ETFs), the standards should be higher, because their benchmarks are transparent indices and—for the most part—the goal is replication.

### Tracking Error: What Is It And Why Is It Important?

Mathematically, a tracking error is the standard deviation of the difference between index and ETF returns. For example: a 4% tracking error means annual ETF returns will be within  $\pm 4\%$  of index return, two times out of three.

Ioulia Tretiakova, director of quantitative strategies, PUR Investing Inc., affirms that while tracking error can be important if ETFs are used to hedge a portfolio, understanding tracking error helps individual investors employ these vehicles more effectively.

There are three ways to replicate an index:

**Stratified sampling:** buy only some of the underlying securities. Think of it as ordering a chicken and getting one wing, one breast, one leg, and one thigh.

**Optimization:** use underlying securities and/or derivative instruments to mimic an index’s return. In other words, you’re buying chicken fingers.

**Full replication:** buying all the components of an index is the most effective way to minimize tracking error. So, you order a chicken and you get the whole bird.

Ordering a chicken and getting chicken fingers may not bother some investors, but it’s important that they understand the possibility that this is what can happen.

To be fair, stratified sampling and optimization can be the only practical approaches given size and liquidity considerations. For example, the DEX Universe Bond Index has 1,058 holdings, while the popular iShares CDN Bond Index Fund (XBB) that mirrors it holds only 301 issues.

“Regulation has an impact,” Tretiakova observes. “There is no maximum security weight for ETFs in Canada, but in the U.S. there is a 19.99% cap. Hence the return of Vanguard’s Information Technology ETF (VGT) lagged its benchmark MSCI U.S. Investable Market Information Technology Index, by 50% since inception (1/26/2004 to 1/3/2010) in part because the index weight of AT&T was 49% and only 19.99% for VGT.”

That's sort of like ordering three chickens and getting the two-bird maximum.

### Should Daily Returns Be Used To Calculate Tracking Error?

The index underlying the iShares MSCI EAFE Index Fund (EFA) and its "Loonie-hedged" cousin, XIN, does not have a contemporaneous closing time, so using daily closing NAVs and index values for tracking error calculations makes little sense; like roosters crowing dawn in each time zone.

On the other hand, the tracking error of leveraged ETFs (in Canada, the Horizon BetaPro series) should be calculated using periods no longer than daily.

Over the longer term, daily rebalancing will cause divergence made all the greater by volatility. The investor orders an egg and gets a two-egg omelet.

The multiple-of-daily-index-return objective of leveraged ETFs is not completely accurate, warns Tretiakova.

What actually happens, in the case of a 2X ETF, is that "there is twice the total return minus one times the cost of capital. Currently, this is slightly better for investors than the stated objective of twice the price return because dividend yields are slightly higher than the cost of capital. However, when these two rates vary, the difference may be more significant," she adds.

### ETFs With Unusual Tracking Error

Some ETFs operate without a specifically stated benchmark, defining only broad asset class exposure.

For example, the Claymore Broad Emerging Markets ETF (CWO, launched April 7, 2009) states, "The manager will select an Emerging Markets Benchmark Index such as the MSCI Emerging Markets Index, the FTSE RAFI Emerging Index or another widely recognized emerging markets index in order to provide such exposure and may change the Emerging Markets Benchmark Index at its discretion without unitholder approval." The challenge is trying to determine the tracking error when the target index is changing. One comfort these unitholders have is that the indices for groups of emerging markets will likely have similar volatility (risk), which means the advertised chicken will unlikely end up being pork chops!

### Finding Tracking Error Information

Most ETF sponsors offer tracking error information on their Web sites. Often shown in chart form, price movements of ETFs are easily compared with their underlying index. The actual tracking error of Canadian-traded ETFs and how they compare to others is available at [www.purinvesting.com/demo/Screen.htm](http://www.purinvesting.com/demo/Screen.htm).

A cost to investors, tracking error is well worth monitoring. It's one way of keeping ETF sponsors honest and assuring you don't get salt pork when you expected steak. ●

## Building An ETF Portfolio

Mark Yamada / May 07, 2010

**F**undamental analysis is the stuff of cocktail parties, water-cooler gossip, and 24-hour financial news networks. Based on business facts, the main allure of fundamental analysis is the intellectual satisfaction it provides: it is logical. Most professional money managers use fundamental analysis in some form of top-down or bottom-up analysis. Regardless of portfolio size, controlling costs is important, and ETFs can help.

### Top-down

Starting with global, regional and local economies, this approach assesses the impact of the economy on sectors, industries and companies. ETFs lend themselves nicely to these strategies because they make country, sector and industry investing simple. For example, institutional managers can use ETFs to establish broad exposure before making specific investments and they can hedge existing exposure by shorting the relevant ETF.

During the banking crisis in 2008, shorting financial stocks was prohibited, but there was no such restriction on ETFs. Institutions used ETFs to maintain liquidity in the face of uncertainty. Portfolios for individual investors can similarly benefit from diversified exposure. Just remember, sector and industry ETFs tend to be more expensive than broad-based ETFs.

Bottom-up managers, also known as stock pickers, screen for superior growth, value, a combination of both and other factors. Investors have “style” ETFs as well as large, mid-cap, and small-capitalization alternatives in different regions and sectors from which to choose. There are even two value-focused Canadian equity ETFs.

Many institutions and pension funds use a core-and-satellite approach. They select active alpha-seeking strategies around a passive core. ETFs are an obvious choice for core portfolios because of their low cost. In Canada, some ETF sponsors offer a prêt-à-porter core portfolio: Claymore’s Balanced Growth Coreportfolio™ ETF (CBN)—consisting of other Claymore ETFs—has approximately 62% equities, with bonds, real estate and gold making up the balance. The “listed” MER for CBN is 0.25% per annum, but a recent prospectus shows the cost in 2009 was 0.70%, so MERs for individual holdings make this choice more expensive. iShares’ Growth Core Portfolio Builder Fund (XGR) also offers a group of iShares ETFs bundled with an MER of 0.60%, all in. These may be a good solution for investors with less than \$10,000 to invest.

Investors who can afford to purchase at least five \$2,000 positions may be better off buying individual ETFs—if they have the inclination to do so. Five positions cost about \$100 in commissions to set up and

about 0.30% per annum in MERs. Assuming two rebalancing trades a year (\$40), the \$10,000 investor, with annual costs of about 0.34%, makes back the initial commission costs in three-and-a-half years.

### It Just Doesn't Matter

Fundamental stock picking can be detailed. Let's use Research in Motion as an example. A growth manager, viewing earnings and revenue growth over the year ending March 31, 2010 of 29.8% and 35.1% respectively, may conclude that the 17 PE ratio is low, based on current interest rates and prospects for double-digit growth for several years.

A value manager may be concerned that because gross margins fell from 46.1% to 44.0%, the rapidly growing 37% of sales from developing countries is cannibalizing margins, meaning the average BlackBerry selling price may fall below \$300, eroding profitability. Hence the dilemma of fundamental analysis: no one knows when or if the market will recognize one view or the other.

Guess what? If you are looking to build a diversified portfolio, it doesn't matter. Here's why. Ioulia Tretiakova, Director of Quantitative Research for PUR Investing says, "When buying RIM shares, company-related factors account for about 85% of total return, the market only 15%. But in a 50-stock portfolio, fully 85% of the return from this portfolio comes from the broad market and only 15% from company-specific elements." Recognizing the fallacy of hindsight, one could have purchased iShares Technology ETF (XIT), got a 22% exposure to RIM and not been as exposed to a schizophrenic view about short-term results.

ETFs offer low-cost flexibility, so fundamental approaches can be effectively used to benefit individual investors. Broad diversification reduces the need for company-specific research and allows for all the benefits of mutual funds without the costs. Indeed, low costs contribute to better performance, so complacent product vendors should pay attention. ●

## Using ETFs For Portfolio Building: Part 1

Mark Yamada / June 22, 2010



**Reader Alert:** *This is the first of a three-part series on how ETFs can help control costs when constructing core portfolios.*

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## Using ETFs For Portfolio Building: Part 2

Mark Yamada / July 15, 2010



**Reader Alert:** *This is the second of a three-part series on how ETFs can help control costs when constructing core portfolios.*

The alarm rings reliably every morning just before daybreak. If it doesn't sound, does that mean the sun will not rise?

Maybe, if you live in the shadow of Iceland's volcano, but otherwise get a new battery! The difference between coincidence and causality is important and too easily blurred in the investment business. In my experience, technical analysis is particularly prone to this kind of distortion, establishing links like, "The stock went up BECAUSE it broke out of a six-month period of consolidation."

### Technical Analysis

Technical analysis's simple underlying tenet is that security prices go up or down based on supply and demand that is best determined by studying the price and volume activity of a security. The theory holds that all information about a security is reflected in its price. Furthermore, prices tend to move in trends and, since technical analysis holds that history repeats itself, these price patterns can be identified to indicate future price movement. Most online brokerage firms offer pattern recognition and other technical trading tools.

Specialized education in financial analysis is not required for technical analysis – it doesn't care about companies, products, margins or market share. All that matters is price movement. Some portfolio managers and analysts may use traditional fundamental analysis (balance sheet, income statement and business analysis) for security selection and use technical analysis as a short-term tool to time entry or exit points. Academic research is unclear about the value of technical analysis, although momentum has proven a useful area of study.

Some technical approaches are geared for the longer term (defined here as any period longer than one year). The Elliott Wave Principle, for example, is based on the Fibonacci sequence of numbers (0, 1, 1, 2, 3, 5, 8, 13 etc). Based on a third-century Southeast Asian hypothesis, the Western version of this sequence was used to explain the rate of growth in a hypothetical population of rabbits. Beyond zero, the sequence is the sum of the previous two numbers. The waves in up and down trends are said to follow this sequence. While longer-term applications exist, technical analysis is primarily a tool for trading.



## Trading With ETFs

One of the most attractive attributes of exchange-traded funds is they offer good diversification. As groups of securities, ETFs are usually well diversified (although there are always exceptions) and diversification dampens volatility. This is great for the long-term investor looking to build long-term returns. But it is suboptimal for the trader. Traders thrive on volatility, but ETFs dampen it. One solution is leveraged ETFs. In Canada, levered ETFs offer the holder two times the daily price movement of an index. Inverse versions go up two times the inverse daily price movement of an index. In the U.S., three-times leverage is available. If action is what traders want, levered ETFs provide it.

Leveraged ETFs come with a special warning that higher volatility can distort returns because of the compounding effect. Volatility drag is real and should always be considered.

## Other Factors

Some argue that stock selection is a mug's game and that the proliferation of ETFs has allowed them to trade in relatively concentrated areas. One example is Canadian banks, through Bank of Montreal's S&P/TSX Equal Weight Banks Index ETF (ZEB); another less-focused way that includes insurance companies and Power Corp. is the iShares S&P/TSX Capped Financials Index Fund (XFN). It may be easier to make a call on a sector with more confidence than on an individual security.

## Guidelines

ETFs have removed barriers and changed the rules of investing. Nevertheless, it may be useful to have some guidelines if you intend to trade, using technical analysis or any other method.

Volatility is your friend. Leveraged ETFs give you the pop and adrenaline rush you crave, but watch out for volatility drag from compounding during extended periods of fluctuation. Here is a link to [PUR's volatility drag calculator](#).

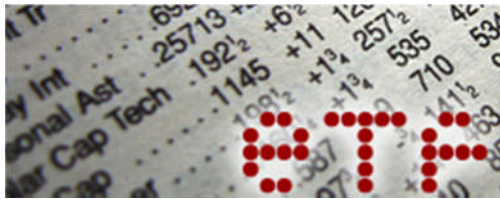
Concentrated ETFs such as single commodity, currencies and narrowly focused ETFs – for example, the five holdings of iShares Technology ETF (XIT) – can be reasonable trading vehicles; and if you must, sector ETFs.

The rules apply to the short side as well – volatility is good. However, ETFs make shorting easy, so all ETFs are fair game.

When using technical analysis to trade, remember the clock. Those patterns are man-made and like it or not, the sun will rise in the morning. ●

## Using ETFs For Portfolio Building: Part 3

Mark Yamada / September 01, 2010



**Reader Alert:** *This is the final installment of a three-part series on how ETFs can help control costs when constructing core portfolios.*

After the past couple of years, investors not only know about volatility, they likely have the scars to prove it! Exchange-traded funds (ETFs) are well known for their low cost, tax efficiency and diversified exposure to markets, asset classes, sectors, commodities and industries. Less well known is that ETFs provide neat packets of stable risk that can be used not only to construct tailored portfolios, but also to control risk easily and more effectively than ever before.

### Case For More Volatility

Capital-market volatility threatens the adequacy of RRSPs, the solvency of defined benefit pension plans, the patience of clients and the sanity of advisors. Systemic risk — from deregulation and interconnected global financial and banking structures, exacerbated by an explosion in derivatives use, high-frequency trading and advances in information technology — suggests that “returns are likely to remain highly heteroskedastic, showing periods of consistently high and low volatility,” says Ioulia Tretiakova, manager of quantitative strategies, PU•R Investing Inc. Nothing in currently proposed banking reform legislation suggests otherwise. The problem is capital markets dislike uncertainty most of all.

Even if you believe the credit crisis was a once-in-a-lifetime aberration, as an advisor, you have a duty to clients to protect them from it.

### Managing Volatility

Diversification theory suggests selecting assets that don't move in the same direction at the same time (uncorrelated). This is smart, because if one asset class (say, Canadian equities) is zigging while another (gold) is zagging, the volatility of the combined portfolio is dampened. But very much like a balance sheet, these relationships are more a snapshot than an income or cash flow statement, which shows changes between periods.

Two important things to keep in mind: The correlation between asset classes can and does change over time; and Market volatility can override correlations.

These caveats are too often ignored or forgotten by investment professionals and retail investors alike. Because they are already individually diversified, ETFs provide reliable risk that can be assembled into effective portfolios. Low and negative correlations are the best combinations for diversification.

Market volatility is a big challenge for investors and their advisors. Let's assume a 60% stock, 40% bond portfolio was considered appropriate for an investor in 2005. As the stock market rose in 2006 and 2007, the portfolio sold stocks and bought bonds to rebalance to the 60:40 fixed-asset mix. This seems reasonable, because we're supposed to sell high and buy low, right? But was the risk of the portfolio the same in 2008-2009 as it was in 2005? Clearly not.

A better solution would have been to maintain the risk represented by the 60:40 asset mix consistently through periods of market volatility. The risk of a portfolio should represent the risk tolerance of the investor — that doesn't change in good or bad markets. If "12" represents the risk of a 60:40 mix in 2005, the risk of the portfolio would have spiked to over 30 in 2008-2009! To keep this portfolio at 12, equities would have needed to represent 20% and bonds 80% in mid-2008. A less-disruptive alternative would have been to add the iPath S&P 500 VIX Short Term Futures ETN (VXX) to the mix. Either approach, though, would have saved serious money for investors.

### ETFs Level The Playing Field

The idea of managing to a consistent risk is a sophisticated institutional approach on two levels. Firstly, the idea of budgeting risk is a concept used only by the largest pension funds and institutional pools of capital. No mutual fund in Canada uses this strategy as far as I know. Secondly, managing volatility is a cutting-edge idea. The availability of volatility ETFs like VXX and VXZ (the mid-term version of VXX) makes these tactics available to individual investors. Hedging long positions with short or inverse ETFs is also a tactical option, but that's a subject for another time.

ETFs offer the potential to bend and shape risk in ways previously available only to institutional portfolio managers with hundreds of millions of dollars under management. This capability comes with the responsibility for advisors to up their game, but the payoff will benefit both their clients and their practices. ●

## Keep ETFs Simple

Mark Yamada / October 01, 2010

**I met a broker from Rochester at breakfast** on the second day of an ETF conference in Albany, New York. I was a speaker on the first day and a moderator on the second, and was curious about the audience's knowledge level and how the message was getting through.

"Do you use ETFs in your practice?" I asked.

He admitted he had purchased some SPDRs (Standard & Poor's Depository Receipts, SPY) for his largest client.

"I went to a meeting with her auditor and all he said was 'I see that your broker bought an ETF for your portfolio; he must be doing a good job for you!'" he said. "I'm here to find out what I bought and why they're so good!"

There's a halo effect over ETF use that transcends their undeniably beneficial use in portfolios. But we, in the industry, should not rest on our laurels.

The directness that has accompanied the electronic revolution and social media can bite, so making ETFs just another offering on the investment product buffet could be dangerous. Take, for example, the Ally Bank commercials that show conventional bankers as insensitive to clients, who are portrayed as kids. Fine print, exclusionary offers, undisclosed information, run-arounds, and the now ubiquitous "egg-management fee" are offered as proofs of the big-bank practices that "even kids know" aren't fair.

It could be argued that banks deserve this treatment. But then again, mutual funds could be painted with the same brush and with them, the entire investment profession. In Canada, the major banks, through branches and wholly owned brokerage firms, account for two-thirds of all mutual fund sales. And yes, mutual fund fees seem inexplicably large in relationship to what they deliver, particularly when compared with ETF fees.

But mutual funds still provide retail investors with professional management and diversification while sharing expenses. That their structure is outdated is not entirely their fault: lack of transparency in an era of full disclosure, once-a-day pricing in a 24-hour-a-day global market, bundled fees when everything is being unbundled (except cellphone and cable TV packages, strangely enough); the traditional mutual fund format struggles to keep up.

And the same fate may await practitioners if they treat ETFs as just a bunch of mutual funds and stuff them into client portfolios like last year's hot performer. ETFs should be used to provide the kinds of solutions, continuous client value and vehicles for managing risk for which they are so well suited, with costs justified and construction communicated simply and effectively.

There are lots of ETFs, and more and more appear each week. While there are many ways to sort them, keeping things simple has great appeal, because it's easier to explain to clients.

Ioulia Tretiakova, Director of Quantitative Strategies at PUR Investing, classifies the ETF universe into two basic categories: those that are passive and those with embedded strategies.

“Passive ETFs follow a simple index or an unleveraged commodity. They are characterized by low fees. Those with embedded strategies are everything else. ETFs with embedded strategies often have higher fees. Leveraged and inverse ETFs and those that follow a manipulated index like revenue or fundamentally weighted, are examples. Actively managed ETFs are the most obvious examples of an embedded strategy.”

Explaining to clients that a low-cost core of passive ETFs is an effective way to capture beta or exposure to market returns will help. You could build a core of actively managed mutual funds or ETFs with embedded strategies that try to outperform your benchmark, but it's difficult to identify successful ones in advance, extremely difficult to pick them consistently year after year, and you risk the inefficiency from fund overlap (see the September Advisor's Edge Report article “How Many?”). You do, however, know their cost in advance. Go with what you know: It's logical and clients understand it.

With your passive core established, consider the manageable characteristics of ETFs (or other assets) that make the most impact on portfolios. Cost and diversification are the most important, followed by liquidity, tax efficiency and tracking error.

And what about returns? They can't be predicted in advance, but by capturing the market return inexpensively with a core of passive products, you can select other “satellite” assets around the core that position the portfolio to perform.

Diversified exposure to areas you feel will do well – such as small capitalization stocks, emerging markets or commodities – can be added as individual securities, passive ETFs, mutual funds or ETFs with embedded strategies.

If the satellite investments chronically underperform the core, you'll know and so will your clients. But what to do about it will be clear. In coming issues, we'll examine the considerations for satellite assets more closely.

Keeping portfolio construction and classification of ETFs simple will help clients understand what you are doing, help dispel the mystery of the egg-management fee and will ultimately distinguish ETFs as a signature part of the portfolio menu. ●