EFFICIENCY

Efficiency describes both how well a fund delivers on the promises its issuers have made to investors, and how well the fund conforms to industry best practices. We expect that:

- A fund will deliver the pattern of returns it outlines in its prospectus and marketing materials.
- A fund's legal structure and operations will protect investors' interests above all else.
- Issuers will keep fund closures to a minimum in order to avoid disruption for fund holders.
- Investors' tax exposure will be as low as possible for the investment objective.
- Issuers will provide complete, current information about the fund that promotes an understanding of the fund's structure, risks, composition and performance.
- Investment costs will be low and predictable.

Our Efficiency score (0 to 100) is a weighted aggregation of objective measurements of each of these elements. Our weightings account for the scale of costs and risks to investors. Some factors, such as the expense ratio, create large, ongoing costs for investors, whereas others, like the effects of structuring a fund as a unit investment trust, have only a minor impact on most investors' overall returns.

What follows is a catalog of the data points we incorporate in our Efficiency scoring, in two sections: Costs and Risks.

COSTS

Expenses

Fund managers can create costs for investors both explicitly through fees and expenses, and implicitly through imprecise portfolio management. Both ways eat into returns.

- *Expense Ratio*. Expenses create the biggest predictable drag on fund performance. They also strongly predict future underperformance relative to a fund's index. We measure the fund's all-in expense ratio, not just the management fee. Every basis point of expense ratio costs a fund points.
- *Expense Ratio Changes* addresses the issue of expense ratio caps. If an issuer has voluntarily reduced management fees, there is a possibility that the expense ratio can rise in the future. We read the prospectus to find this out, and measure it, docking points for upcoming potential expense increases.

Portfolio Management

We measure how closely a fund's pattern of returns mimics that of its underlying index. We use a fund's daily total return NAV and its underlying index's daily returns (in natural log format) to calculate the following (we display all results in regular good old-fashioned percent format):

Whole-Period Effects

- *Goodness of Fit*, otherwise known as R^2, measures how well a fund's NAV moves in tandem with its underlying benchmark. High R^2s score well here.
- *Beta* measures how volatile a fund is relative to its benchmark. We evaluate how close to 1 the beta is.

- *Standard Error of Beta* measures how volatile the fund's returns are, stripping out the volatility of its underlying index. In a year in which a whole asset class experiences large price swings, funds that nevertheless tracked their indexes tightly will have low standard errors of beta, and will score well here.
- *Alpha* measures the extent to which a fund outperforms or underperforms its benchmark. A fund can gain or lose points for alpha, but only if we are statistically certain that the out/underperformance (net of expenses) did not happen by chance.

Daily Tracking Measurements

- *Mean Performance Difference* helps us understand how much, on average, a fund's daily returns diverge from those of its underlying index. The greater the magnitude of daily divergence, the fewer points a fund will score. For active funds that don't track indexes, these points are scaled using holding costs.
- *Standard Deviation* describes how widely any particular day's performance deviates on an average day from the performance of its underlying index. Volatility costs a fund points.
- *Standard Error* measures how widely any particular day's performance will differ from its underlying index (like standard deviation does), but allows us to make adjustments for the lesser predictive value of short data sets. Higher standard errors cost points.

Exceptions

Active Funds: Because active funds have no underlying index, we are unable to evaluate their tracking. In order to account for the drag of their expense ratios, we interpolate a mean daily difference based on their expense ratio. Active funds do not lose points for any other aspect of tracking.

Currency Funds: Because currency funds tend to have no underlying index and usually hold the currencies in specie or via derivatives, we do not evaluate currency funds for portfolio management.

Mismatches between NAVs and underlying indexes

- Index Changes: If a fund changes underlying indexes, we will splice the old and new returns series to enable us to provide continuous evaluation of the fund's tracking. If this proves impossible, we will treat the fund as a new launch, and will suspend all scoring until we have six months of returns.
- If the total return version of the fund's underlying index is unavailable, we will back out the fund's dividend yield from the mean daily difference. These funds are not eligible for alpha scoring.
- Funds with NAVs that are subject to daily fair valuation (generally done for mutual funds to prevent timing arbitrage) will produce unduly noisy tracking results. ETF.com will make efforts to obtain a non-fair valued NAV from the fund's issuer. Failing this, we grant funds with known, verified fair valuations some extra points to make up for the unwarranted losses created by the noise.
- MLPs are subject to tax treatment that prevent tight index tracking, and whose effects are path-dependent, and therefore not predictive of future results. We do not score MLPs.

Fixed Income funds

- Because of differing conventions for the time of day that fixed income securities are priced and because of the variability of results among fixed income pricing models, fixed income NAVs and index values are too noisy to produce meaningful results in the above-described tracking assessment. We substitute an evaluation of one year's worth of rolling 12-month difference in returns between the fund and its underlying index, assessing the median, maximum and minimum values. Medians closer to the fund's stated expense ratio, and tighter ranges, score well.

RISK ASSESSEMENT

Structural Risks

Fund issuers have many choices about how to legally structure their exchange-traded offerings. Each of these structures poses some level of risk to investors.

- *Open-Ended Funds* are permitted to hold derivatives and to lend securities. Each of these activities introduces some level of risk. To gauge the derivatives risk, we determine if a fund makes use of over-the-counter derivatives on a regular, large-scale daily basis, deducting points for ongoing derivative use. If firms do use OTC derivatives, we consider an issuer's treatment of cash collateral and whether such collateral is properly safeguarded, e.g., "marked to market" regularly.
  We also read funds' legal documents and interview issuers to understand whether a fund is actively engaged in securities lending, and to determine what the issuer's policies are about splitting the security-lending revenues between the ETF shareholders and the fund's issuer or its agents. We penalize a fund for creating a principal agent problem, which would show up in an issuer's policy about retaining revenues from security lending beyond covering costs of the program, or for failing to have a policy on this matter.
- *Unit Investment Trusts*, because of their requirement to hold dividend payments in cash until the fund makes a distribution, can be subject to dividend drag, as they are not able to reinvest dividends. In a rising market, dividend drag will lower a UIT's performance. Our methodology uses a fund's historic dividend yield to assess the risk of dividend drag for UITs.
- *Exchange-Traded Notes* are debt obligations between an issuer and a fund holder. The issuer could default on these obligations. We measure the current default risks via credit-default swap pricing on the securities of the issuing banks. The scoring algorithm is sufficiently flexible to lower a fund's entire efficiency score to zero in the event that the market judges an issuer's default risk to be severe.
- *Grantor Trusts* are used for physically held investments such as precious metals and currencies. They must hold a prespecified set of securities. They may not hold derivatives or lend portfolio securities. They are the most protective legal structure available for ETFs. They are not allowed to optimize or lend securities. Taxation varies by asset class held.
- *Commodities Pools* are used as the legal structure for funds holding futures contracts. These products are considered pass-through investments, so any gains made by the trust are marked to market at the end of each year and passed on to its investors, potentially creating a taxable event. Investors can be subject to pay taxes on gains regardless of whether they sold their own shares or not. Since commodities pools are classified as limited partnerships by the IRS, these types of funds distribute K-1 forms. Commodities pools are permitted to hold OTC derivatives. We assess their derivative use the same way we do for open-ended funds.

Fund Closure Risk

Investors suffer when a fund closes. Closure brings the inconvenience of having to suddenly find a new fund, possible capital gains taxes, accelerated tracking error, and potential fees and costs associated with the fund's

closure. We conducted a thorough analysis of all ETF closures to determine proximal causes. Based on that work, we assess the probability that a fund will close by looking at:

- *Regulatory Risk*, meaning potential actions by securities regulators that could force issuers to close certain types of funds. Although regulatory intervention is a rare event, its consequences are large. We assess the probability and level of consequence of regulatory action.
- *Assets Under Management* make a fund profitable and viable for the issuer. The higher the AUM, the more likely a fund will remain open for business, and the more points it will score, up to an assets threshold.
- *Issuer History of Fund Closures* tracks how long a company has been in the ETF business and whether it has a history of closing funds. An experienced firm with no prior fund liquidations is less likely to close low-AUM funds, and therefore earns points.
- *Rank Within the Competitive Landscape* measures the level of competition for investor assets within a particular market segment. We dock low-end AUM funds that are not the largest fund within their unique competitive segment of the market.
- *Fund Family Health* considers that the overall strength of a fund's issuer can affect a fund's closure risk because of the threat of mergers, acquisitions or business failure. We look at the overall asset base of the fund's legal authorities to assess financial viability, granting points to low-AUM funds from issuers with greater total asset levels.
- *Corporate Action* signals whether a fund is facing corporate events such as acquisitions, mergers and buyouts. Since such events create uncertainty for investors, low-AUM funds with pending corporate actions are penalized.
- *ETN Liquidation Price Triggers*. Many ETNs' prospectuses stipulate that if the fund's NAV falls below a certain level, the ETN must be liquidated. For ETNs only, we gauge the buffer between the fund's current NAV and the liquidation trigger price, penalizing funds when the buffer becomes overly narrow.

Tax Risk

When investors hold a fund in a taxable account, the returns can be eroded by capital gains distributions, which force an investor to pay taxes on unrealized gains.

- *Average Capital Gains Distributions.* Capital gains distributions are an unqualified negative for investors. In most asset categories, portfolio managers can use the creation/redemption process to eliminate capital gains from their accounts. We penalize funds for distributing capital gains.
- *Undistributed Capital Gains/Losses* can build up in a portfolio. We credit a fund for having a reserve of capital losses and penalize it for realized-but-undistributed capital gains.
- *Tax on Sale* considers the tax treatment of sales; the fund loses points if sales of shares are taxed, in full or in part, as ordinary income rather than capital gains. Funds taxed on sale at a rate in between ordinary income and capital gains rates get partial credit.
- *Tax on Distributions* considers the tax treatment of distributions; the fund is penalized if the majority of its distributions are taxed as ordinary income rather than qualified dividends.
- *Marked to Market Annually* identifies whether a fund is marked to market annually for tax purposes. If yes, points are deducted.

Transparency

Issuers vary in the degree to which they provide vital information on their websites. We dock a fund for failing to publish vital information. We look for timely publication of:

- *Legal Documents*, including the prospectus, and, when relevant, the statement of additional information, annual reports and semiannual reports.
- *Fund Holdings*, meaning a complete report covering the fund's entire portfolio, published daily before the open of the New York Stock Exchange. Delayed or incomplete portfolio disclosure results in demerits.

- *Index Construction Rules* give investors sufficient guidance about the underlying index's definition of its investment universe, security selection rules and weighting practices.
- *Ex-Dividend Dates* allow investors to anticipate the timing of a fund's future payouts.
- *Counterparty Names for OTC contracts* allow investors to assess the level of risk between settlement periods.

TRADABILITY

Tradability accounts for the expense and uncertainty that an investor might encounter in buying or selling a fund in the open market. We expect that:

- An ETF should trade at a volume that gives investors comfort that there will continue to be a steady stream of market participants who are interested in trading the fund, thereby providing liquidity and fair pricing.
- Retail investors should be able to buy shares in a fund at a scale that suits them without paying onerous costs; therefore, the posted bid/ask spread of an ETF should be narrow.
- Investors can trade with confidence in ETFs whose underlying holdings are hedgeable during U.S. market hours. Hedgeability of the underlying securities for international funds works to U.S. investors' advantage.
- An institutional investor should be able to trade large blocks of an ETF without significantly altering its price relative to its NAV.
- An ETF's portfolio should be designed to limit market impact in the creation/redemption process.
- Creation/redemption fees should be low, and scaled to the creation unit size in dollars.
- Issuers should allow and engage in creations and redemptions daily, enabling funds to trade as close to NAV as possible.

Our Tradability is built from measurements of each of these elements, combining the results to create a score from 0 to 100. As with the Efficiency score, we weight some Tradability items higher than others, in keeping with our assessment of their importance. Tradability data points:

Volume

- *Median Daily Dollar Volume* gives us a sense of how much money flows into and out of a fund on a daily basis. This helps us gauge investors' interest in the fund, and gives us a sense of how easy it will be for an investor to buy or sell shares. We chose to use the median rather than the mean measure of volume since this reduces the risk of one-off block orders distorting the average. Funds with high median daily dollar volumes score well on this measure.
- *Creation Units Traded per Day* measures how easy it is for market makers to eliminate basis risk through the creation/redemption process. A high number of creation units traded per day enable authorized participants (APs) to make tight markets and not charge extra for the service of creating liquidity, because they won't have to hold inventory for long. The less market makers charge for their services, the less end-investors will pay for their transactions. Funds with average daily share volumes over a creation-unit-size-based threshold will score well here.

Bid/Ask Spread

Bid/ask spread predicts the market impact an investor will face, particularly for smaller investors who do not operate at sufficient size to tap into the block liquidity mentioned below. The wider the spread, the greater the cost for an investor to trade, and therefore, the worse the score on this metric.

Market Hours Overlap

Market hours overlap evaluates the hedgeability of the fund's underlying securities during U.S. market hours. This is important, because hedgeability influences trading costs. We grant points to funds on a scale, with a high percentage of underlying securities that trade during U.S. market hours leading to high scores on this item.

Institutional Trading Data

The spreads and volumes that investors see when trading electronically does not always reflect the true liquidity of the fund. Because APs can buy or sell the underlying securities in the open market and then create or redeem shares of an ETF, APs can often execute large trades without moving the market, no matter the number of ETF shares posted on the open market.

Liquidity providers have complex models to create on-demand, real-time risk pricing for any size order in any ETF. ETF.com has partnered with Knight Equity Markets to create a true cost assessment model for executing large trades in ETFs. We use this cost (in basis points) to score the block liquidity of a fund. The cheaper Knight's estimate is, the better the score on this item.

- *Underlying volume per unit* measures the percentage of the median daily volume in underlying securities represented by one creation unit. Where possible, we use the fund's creation basket as a basis for assessing the recent median liquidity of each component. We express underlying liquidity as a weighted average percent of total volume traded. If creation baskets are not available, we use our understanding of the underlying market to estimate this value.
- *Creation Fees per unit* measures the costs that APs incur when transacting with an issuer. The higher these fees, on a percentage basis, the more points we deduct, because APs will pass these costs along to investors.

Creation/Redemption Impairment

When the creation/redemption process halts or becomes impaired, market makers are no longer able to eliminate exposure to the fund's securities or to shares of the fund. This can cause the market price to deviate from NAV, and can cause investors to lose money because price and NAV have decoupled. We assess the health of the creation/redemption process, docking points for impairment or cessation of creations and/or redemptions. Premiums and discounts in and of themselves do not trigger penalties, because oftentimes they result from timing discrepancies between the last trade and the market close.

FIT

We believe most investors choose an ETF to express an investment opinion, and to access the pattern of returns expected from that opinion, e.g., gold will rise, large-cap U.S. stocks will fall, bonds will provide a certain level of risk-adjusted return. The proliferation of ETFs has made it both possible and daunting for investors to find the fund that best expresses their precise views. Fit solves this problem by making plain what a fund's strategy and exposure are, and enables investors to make informed exposure decisions.

To measure Fit in equities, ETF.com first defines each fund's market segment, and then compares a fund's performance and holdings to those of a benchmark that reflects the segment as a whole. Please see our ETF Classification System for a complete explanation of how ETF.com assigns a segment to a fund.

We expect that:

- An investor should be able to understand and predict the pattern of returns that a fund will deliver under particular market conditions, in relation to the returns of the broad segment.
- Claims of outperformance should be held to a high standard of proof.
- Investors should be completely informed about the specific exposures that a fund carries, and should *understand* how those compare to the broader segment's exposures.

The Fit scores signal how closely a fund resembles its ETF.com Segment Benchmark. A high Fit score indicates similarities; a low Fit score announces significant differences. The Fit scores are not meant to measure cost and risk, as Efficiency and Tradability scores do. Rather, the Fit scores alert an investor to pay attention to a fund's strategy and exposures. Simply put, the higher the Fit score, the better the fund resembles the broad market.

Note: In Efficiency, we measure how well a fund tracks *its own index* (as described in the fund's prospectus). In Fit, we compare a fund to the appropriate *ETF.com Segment Benchmark*: a broad-based, market-cap-weighted index that we have chosen as being most representative of its segment. We define segments in our ETF Classification System Rules & Methodology white paper.

HISTORIC RETURNS ANALYSIS

We compare historic returns of the fund and the segment benchmark to understand their relationship over time. The results of this comparison allow us to see the effects of the fund's construction methods. Our scores credit a close relationship between the two, which indicates that investors in the fund have received the returns of the broad market. We perform this analysis for Equities, Fixed Income, Currency, and Commodities funds. We also apply it in a modified fashion to some Alternatives funds—Absolute Returns and Volatility.

We use a fund's and segment benchmark's daily returns (in natural log format) to calculate the following, which we display in regular percentage format:

Tracking Measurements

To gauge how representative the fund is of the market, we measure the fund's composition against that of our segment benchmark.

- *Goodness of Fit*, otherwise known as R^2, in Fit measures how well a fund tracks the ETF.com segment benchmark. Higher R^2s earn more points.
- *Beta* measures how volatile a fund is relative to the ETF.com segment benchmark. Betas near 1 score well.
- *Mean Performance Difference* helps us understand how much, on average, a fund's daily returns diverge from those of the ETF.com segment benchmark. The smaller the daily performance difference, the better the score.
- *Standard Error* measures how widely any particular day's performance differed from ETF.com's segment benchmark, adjusted for the age of the fund. Again, smaller is better.

Risk-Adjusted Returns Analysis

We determine whether the fund takes on a proper amount of risk by comparing its risk/reward profile to that of our segment benchmark.

- *Alpha* measures the extent to which a fund outperforms or underperforms our benchmark. A fund can gain points for Fit alpha, but only if we are sufficiently certain that the outperformance did not happen by chance. The longer alpha is sustained, the greater the credit.
- *Up/Down Capture Statistics* reflect how the fund performs in rising versus falling markets. We examine returns data sets, measuring up and down markets separately. We reward a fund that takes on more risk in up markets than in down markets, but only if we think the risk metric is sufficiently predictive. As with alpha, the longer the risk-on/risk-off advantage has lasted, the higher the credit.
- *Downside Standard Deviation* measures the degree that a fund's returns deviate from our benchmark's returns on days when the fund underperforms the segment benchmark. We grant more points to funds with low downside standard deviations and fewer points to funds with high ones.

Risk-Adjusted Returns Analysis – Alternatives: Absolute Returns

Absolute returns funds have a specific value proposition for investors—steady positive returns, uncorrelated to the major asset classes. To evaluate how well absolute returns funds deliver on their core promise, we compare these funds' returns to the risk-free rate. We have adapted the asset-class returns analysis methodology to make it suitable to assessing that value proposition.

- *Goodness of Fit*, as described above, compares the fund's returns to the returns of each of the global equity, fixed income and commodities benchmarks. Because absolute returns funds should have low correlations to other asset classes, lower R^2s earn more points.
- *Mean Performance Difference* versus the risk-free rate helps us understand the returns the fund delivers over a set period. The higher the return over the risk-free rate, the more points the fund earns, up to a threshold.
- *Daily Standard Deviation* versus the risk-free rate shows the variability of the fund's returns. As volatility increases over a threshold, the fund loses points because its returns are less predictable.

- *Skew versus the risk-free rate* examines the relationship of the median daily return to the mean. The mean can be heavily influenced by outlier results, whereas the median will exclude extreme values. The relationship between the two gives an indication of the stability and value of the bulk of the returns data. We reward funds for having a positive skew, e.g., median returns above the mean.
- *Kurtosis versus the risk-free rate* measures the distribution of the returns for "fat tails"—black-swan events. The more predictable and consistent the returns, the better for investors. Funds with fewer fat tails gain points.

Risk-Adjusted Returns Analysis – Alternatives: Volatility

For volatility funds, past performance is particularly unpredictive of future performance, because the volatility funds' returns are greatly influenced by the shape of the futures curve. We do not score these funds on either alpha or *up/down* capture statistics.

Exceptions

Funds with NAVs that are subject to daily fair valuation (generally done for mutual funds to prevent timing arbitrage) will produce unduly noisy tracking results. ETF.com will make efforts to obtain a non-fairvalued NAV from the fund's issuer. Failing this, we use the fund's underlying index data as a NAV proxy, and then deduct a penalty to adjust for tracking error.

TILTS

The Tilts section compares the holdings of a fund to the constituents of its segment benchmark, thus describing the fund's current exposure. Our scores credit a close relationship between the two securities sets, which indicates the fund has exposures similar to those of the broad market. We look at asset-class-appropriate exposures; for example, duration and credit in fixed income, weighted average market cap in equities, and contract tenor and decay in fixed income. For ETNs, we use underlying index constituent data as a proxy for holdings, when available.

Equity

Overlaps

We look to see how well the fund's holdings overlap with those of the segment benchmark. We reward high overlaps in the following areas:

- *Holdings Overlap* gauges security-level overlap between the fund and the segment benchmark.
- *Sector/Industry coverage* compares the economic exposures of the fund's holdings to those of the segment benchmark.
- *Country Differences* compares the overlap in country coverage, as measured by companies' domiciles.

Fundamentals

We check how the fund compares to the segment benchmark on a number of fundamental metrics.

- *Market Capitalization* evaluates a fund's weighted average market cap compared to that of the segment benchmark. The closer the two measurements, the higher the score here.
- *Price/Earnings,* in combination with Price/Book and Dividend Yield, compare the fund's orientation on the value/growth spectrum to that of the segment benchmark. In all cases, the closer the metrics for the fund are to those of the benchmark, the higher the score

Concentration

- *Concentration Ratio* (specifically, the Herfindahl Index) measures how concentrated a fund is in relation to the segment benchmark.

Fixed Income

Overlaps

- *Holdings Overlap* gauges security-level overlap between the fund and the segment benchmark.
- *Sector/Industry coverage* compares the economic exposures of the fund's holdings to those of the segment benchmark.
- *Country Differences* compares the overlap in country coverage with that of the benchmark, as measured by companies' domiciles.
- *Currency Differences* compares the overlap in the currency of quotation between the fund and the segment benchmark.

Fundamentals

- *Yield to Maturity* compares the most recent expected yield of the bonds in the fund relative to the segment benchmark, if all positions were held to maturity.
- *Credit Rating* compares the weight of portfolio in the fund and segment benchmark at each credit ratings level.

- *Effective Duration* compares the fund's interest-rate risk to that of the segment benchmark. It measures and contrasts the expected percentage change of the fund or benchmark if all interest rates change in parallel.
- *Convexity* compares the steepness of change of the fund's interest-rate risk relative to that of the segment benchmark.
- *Key Rate Durations* compare the sensitivity of the fund and segment-benchmark shifts in the two-year rate only or the 10-year rate only.
- *Credit Spread Duration* compares the sensitivity of the fund and benchmark to changes in the overall credit environment.

Currency

Overlaps

- *Currency Differences* compares the overlap in the currency of quotation between the fund and the segment benchmark.
- *Effective Duration* evaluates the fund's interest-rate risk. It measures and contrasts the expected percentage change of the fund or benchmark if all interest rates change in parallel. A duration of zero is ideal; higher durations lose points, on a graduated basis.

Concentration

- *Concentration Ratio* (specifically, the Herfindahl Index) measures how concentrated a fund is in relation to the segment benchmark.

Commodities

Overlaps

- *Holdings Overlap by Commodity* gauges security-level overlap between the fund and the segment benchmark.
- *Sector coverage* compares the economic exposures of the fund's holdings to those of the segment benchmark.
- *Weighted Average Decay* compares the fund's expected decay (the relationship of the price of the contract held to the spot price, proxied by the front-month contract), to the expected decay in the benchmark. When the contract held is the front-month contract, we approximate decay as from the next month to the front month. If the fund's decay suggests that holding the fund will be less costly than holding the benchmark, the fund gains points.

Alternatives: Volatility

- *Weighted Average Decay to spot* evaluates the fund's expected decay vs. VIC spot prices. If the fund's decay suggests that the contracts the fund holds are cheaper on a weighted average basis than the spot VIX price, the fund gains points.
- *Weighted Average Decay to open interest* evaluates the fund's expected decay versus the average decay of the weighted open interest. If the fund's decay suggests that holding the fund will be less costly than holding "the volatility market," the fund gains points. If the fund's decay is more costly than "the market's," the fund loses points.

A note on the handling of funds that take risks away from our chosen benchmarks:

We have chosen to credit (penalize) funds that have generated historic risk-adjusted outperformance (underperformance) against the benchmark. We grant greater credit for longer periods of risk-adjusted outperformance, and assess greater penalties for long periods of risk-adjusted underperformance than we do for shorter periods. Nevertheless, we know that persistence of outperformance remains uncertain, and that most academic studies suggest against persistence. The performance-related credits (demerits) are confined to the Historic Returns Analysis section of Fit.

The Tilts section assesses current risk against the benchmark. Funds that currently take risks against the benchmark will lose Fit points in Tilts. Thus we balance granting rewards for past performance with applying demerits for current risk. If the current risk pays off, we will credit the fund in future reports with a bonus for longer-term outperformance, as described above.