

# Beyond the “Mirage” to a Predictive Investment Manager Ranking System

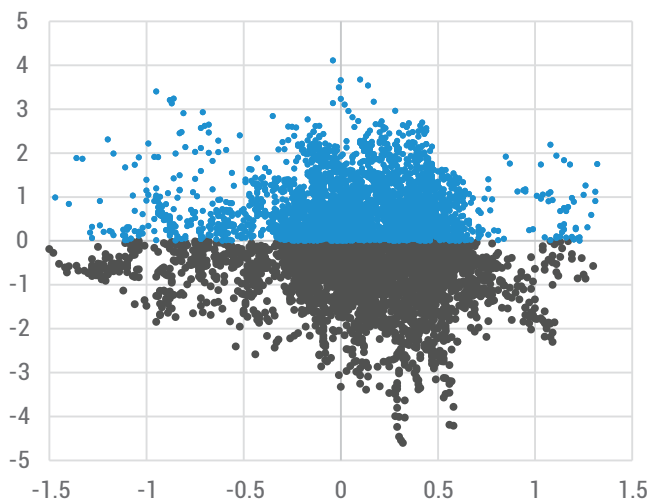
With over ten thousand mutual funds and separately managed accounts to choose from, investment allocators have their work cut out for them. They need to choose a few managers to meet their investment needs from an almost unimaginably large universe. The first step they often employ is quantitative screening.

The role of quantitative screening is to shrink the universe into a manageable size so that allocators can focus their time and energy studying the right managers. While quantitative analysis is only a portion of a firm’s manager selection process, it allows allocators to tip the scale in their favor by ensuring that they are looking at managers who give them the highest likelihood of success.

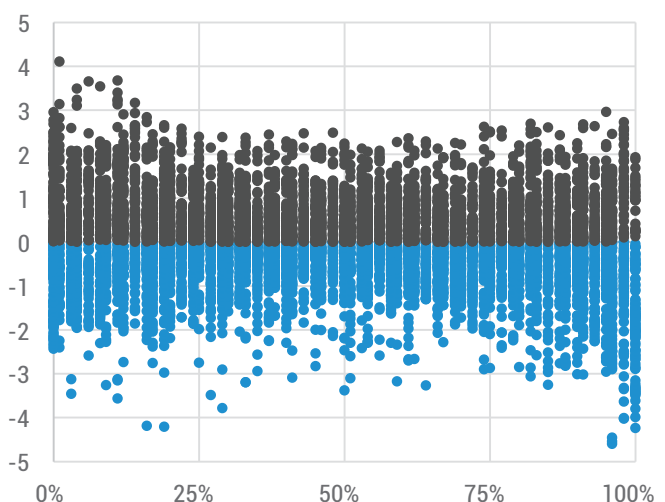
Unfortunately, many commonly used quantitative methods (such as information ratio and alpha rankings) fall short of this basic goal. While these measures are extremely useful for characterizing a manager’s past performance, whether because of the cyclical nature of style effects or the possible outsized influence of pure luck, they have limited ability to predict future relative performance.

**Charts 1 and 2** below illustrate this point using two commonly used statistics, *information ratio* and *peer group ranking*. The charts, which respectively evaluate manager rankings for these measures relative to the Z-score of the manager’s subsequent three year return, demonstrate the limited predictive ability of these statistics.

**CHART 1 | IR vs Normalized Excess Return**

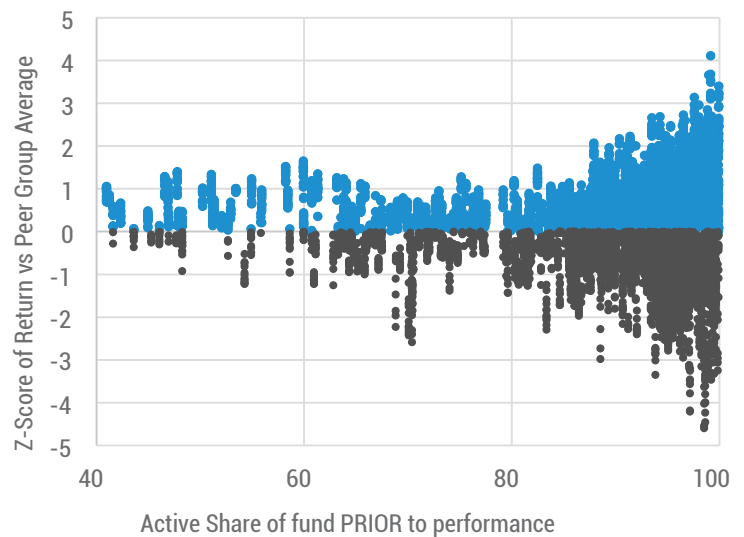


**CHART 2 | Peer Rank vs Normalized Excess Return**

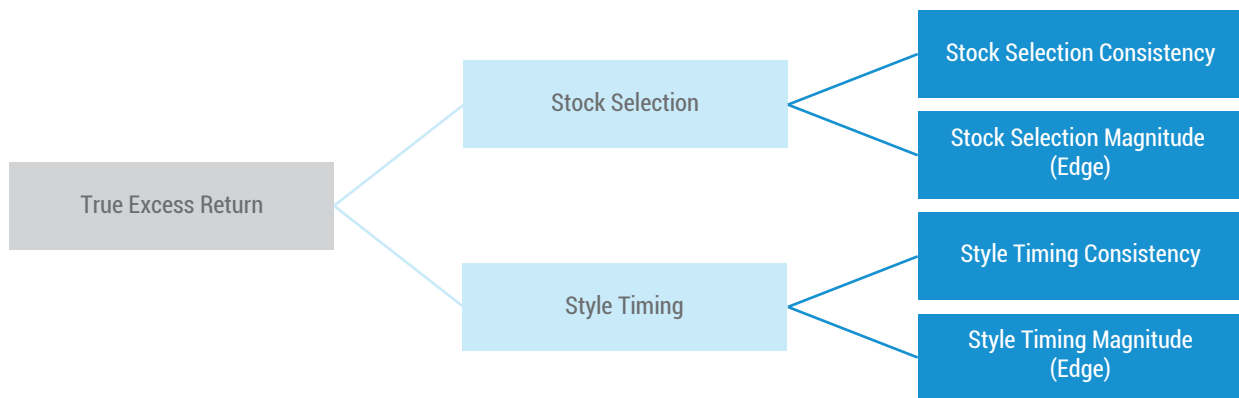


Another example of a statistic which is too often simplistically equated with manager skill is Active Share. *Active Share* is a relatively recent quantitative innovation popularized by Petajisto and Cremer in their seminal 2009 paper that identifies managers that are meaningfully different than their index. A high Active Share score implies that a manager invests outside the index while a low score implies that the manager may invest very similarly to the index. While a high Active Share is necessary to significantly outperform an index, it is not, by itself, predictive of outperformance. As shown on **Chart 3**, a high Active Share is most likely to predict either top or bottom performing managers. So while Active Share can be used as a method of eliminating index huggers from an investable universe, it is not a good tool for choosing managers when used in isolation.

**CHART 3 |** Active Share vs Normalized Excess Return\*



**CHART 4**



We are highlighting these examples to make two main points. First, that many of the statistics gathered on managers, while useful in judging a manager's performance, are not predictive of future performance. Second, while no one can perfectly predict the future, a statistical measure's ability to predict future performance can be back tested. In fact, predictability is the basis for any quantitative process and testing is the only way in which a process can have a rational basis.

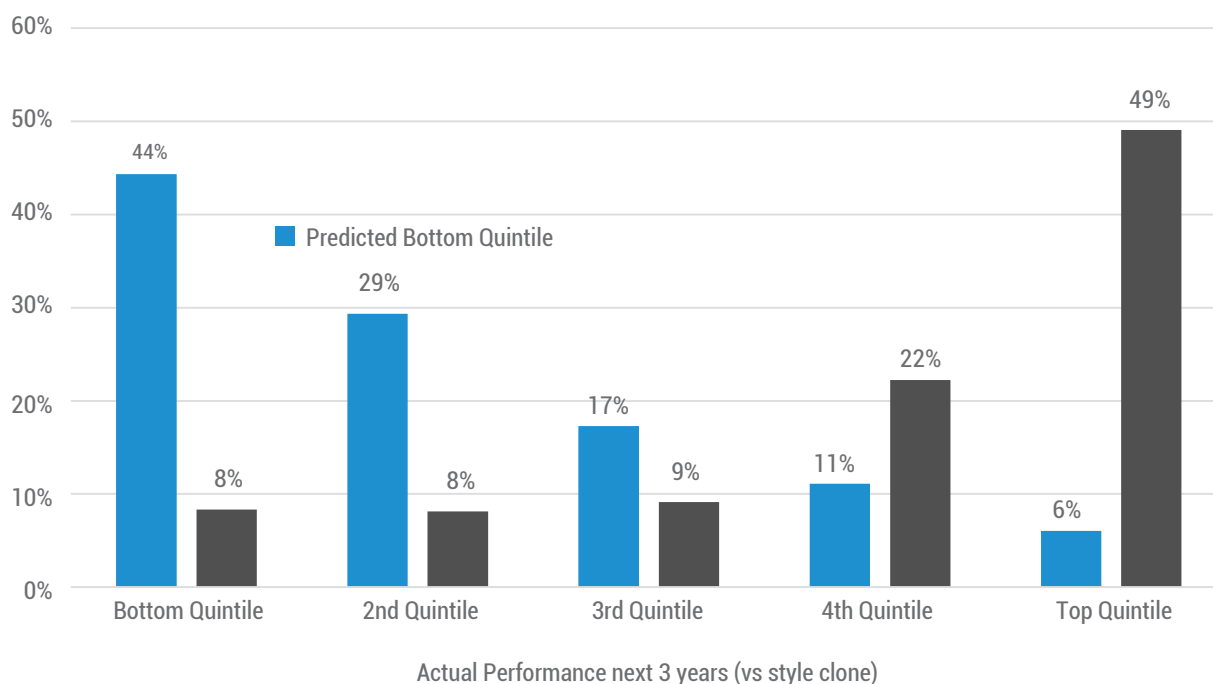
It is from these points from which Aapryl was developed. Based on years of research and back tested results, Aapryl focuses on the predictive value of statistics with the goal of providing investment allocators with a more predictive quantitative screening method. In the coming months, we plan to publish a paper that more fully explains our research findings, but in the interim, we thought this would be a good opportunity to highlight some key aspects of our research findings.

Our goal is to identify managers that are most likely to provide true excess return in the future. To do so, we systematically create a "clone" portfolio which is most representative of a manager's style, and dissect the resulting excess return (manager's return less the clone portfolio return) into components to better understand the drivers of performance. We also analyze the manager's return texture by measuring the consistency and magnitude of excess return with respect to both stock selection and style (or factor) timing. **Chart 4** provides a pictorial overview of the resultant methodology. It is only through the quantitative sifting afforded by this process, that concepts such as Active Share (though our methodology substitutes Active Share with a proprietary adaptation called the Active Opportunity Score,

which helps correct for the benchmark specification and cyclicity challenges of Active Share) become useful for predictive performance forecasting. Simply put, the degree to which a manager makes active bets is necessary for outperformance; but is only valuable as a predictor of skill when combined with other analysis such as systematically extracting the manager's style effects and examining their edge and consistency for both stock selection and style (or factor) timing.

This may sound complicated, but as can be seen on **Chart 5** below, the process allows us to substantially exceed the results that one would expect from a random or less predictive process. To explain, one would expect that a manager performance forecasting exercise which is devoid of skill to result in around 20% of the forecasts to fall into one of the five quintiles. Using our process, close to 50% of the managers that subsequently fell into the top quartile were forecasted to do so; and equally importantly, close to 44% of those that subsequently fell into the bottom quartile were forecasted to do so.

CHART 5



These results represent a dramatic improvement over commonly used screening criteria. Again, we recognize that selecting a manager should also involve intensive organizational and portfolio analysis. But qualitative due diligence is by definition, time consuming and can be expensive. Therefore, it is critical to utilize a front-end quantitative screening process that efficiently identifies a sub-set of managers which have a higher probability of relative outperformance and weeds out the managers who appear to be skilled but are really benefiting from style effects or luck.

For more information on how Aapryl's proprietary methodologies can be used please contact us at [info@aapryl.com](mailto:info@aapryl.com)