

Unobserved Actions of Mutual Funds

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SUMMARY

Several scandals in the mutual fund industry have recently received keen attention from investigators, regulators, and the media. Despite extensive disclosure requirements, mutual fund investors do not observe all actions of fund managers. For example, fund investors do not observe the exact timing of trades and the corresponding transactions costs. On the one hand, fund investors may benefit from unobserved interim trades by skilled fund managers who use their informational advantage to time the purchases and the sales of individual stocks optimally. On the other hand, they may bear hidden costs, such as trading costs, agency costs, and negative investor externalities. In this paper, we analyze the impact of unobserved actions on mutual fund performance.

We measure the impact of unobserved actions by comparing the actual mutual fund performance with the performance of a hypothetical portfolio that invests in the previously disclosed fund holdings. We term this return difference the return gap. The impact of unobserved actions is included in the investor return but not in the return of the hypothetical portfolio. For example, commissions paid by mutual funds to their brokers or stale-price arbitrage losses do not directly affect the returns of the holdings, but they do adversely affect the returns to investors. On the other hand, the value-creating interim trades increase the disclosed fund return relative to the return of a hypothetical portfolio that invests in the previously disclosed holdings. As a result, the return gap is negatively related to the hidden costs and positively related to the hidden benefits of a mutual fund. Consequently, the return gap is a direct measure of the value added (or subtracted) by the fund manager relative to the previously disclosed holdings.

Analyzing monthly return data on more than 2,500 unique U.S. equity funds over the period 1984-2003, we show that the average return gap is close to zero. In particular, the equally weighted return gap for all mutual funds in our sample equals 1.1 basis points per month, while the value-weighted return gap equals -1.0 basis points per month. These results indicate that the magnitude of unobserved actions is relatively small in the aggregate. Thus, fund managers' trades in the aggregate create sufficient value to offset trading costs and other hidden costs of fund management.

At the same time, we document a substantial cross-sectional variation in the return gap, indicating that hidden costs are more important for some funds, while hidden benefits are more pronounced for others. We also find strong persistence in the return gap for up to five years into the future, which suggests that the return gap is driven by systematic factors. Moreover, we find persistence in the return gap not only for the worst performers but also for the best performers.

Our main result shows that the past return gap helps predict fund performance. Funds with high past return gaps tend to perform consistently better before and after adjusting for differences in their risks and styles. Specifically, the decile portfolio of funds with the highest lagged return gap yields an average excess return of 1.2% per year relative to the market return, whereas the decile portfolio of funds with the lowest return gap generates an average excess return of -2.2% per year. The return difference between the two portfolios is statistically and economically significant.

The return gap measures a fund's short-term performance due to unobserved actions and captures the manager's value added relative to the previously disclosed holdings. It reflects investment skills, trading costs, and agency costs. We show that the return gap is important for predicting fund performance and for identifying funds with negative unobserved actions that adversely affect investor returns. We argue that investors should take into account the return gap when selecting mutual funds.