MUTUAL FUND INVESTMENT: AN OVERVIEW

Prof. Vivevk Kaushik,
Asst. Professor,
St. Paul Institute of Professional Studies Indore(M.P)

Dr. D.P.Mishra,
Founder Director,
Shri Vaishnav Institute of Management, Indore(M.P)

MEANING & INTRODUCTION
A mutual fund is a trust with professionally managed investment support that collects and channelizes the savings of a number of investors who bear a common financial goal and invests in shares, debt securities, money-market securities or a combination of these. And these investors on investments in funds are known as unit holders. These securities are professionally managed on behalf of the unit holders and each investor holds a share/unit of the portfolio in ration of their investment and net fund value, which is, entitled to profits as well as losses. Income earned or loss through these investments and the capital appreciation realized is divided among its unit holders in proportion to the number of units owned by them after deducting applicable expenses, load and taxes. A mutual fund is the most suitable investment in the reach of common people as it offers an opportunity to invest in a diversified, professionally managed basket of securities at a relatively low cost.

The flow chart below describes broadly the working of a Mutual fund:
The units of any mutual fund can be purchased or sold at the NAV (net asset value) of that particular fund. In simple terms, the NAV is simply the price per share of the fund. As stocks have a stock price, mutual funds have an NAV. Difference between a mutual fund NAV and stock price is that the NAV will not fluctuate or change throughout the day like a stock price will. The NAV is updated at the end of each trading day. When we purchase a mutual fund at a listed NAV price, that price is actually the price as of the yesterday’s close.

Net asset value (NAV) is the value of a fund's asset less the value of its liabilities per unit.

\[
\text{NAV} = \frac{\text{(Value of Assets - Value of Liabilities)}}{\text{number of units outstanding}}.
\]

**OBJECTIVES**

1. To study the Mutual Fund - concept, organizational structure and the types of mutual funds to the investors.

2. To describe recent trends of Mutual funds in India.

**HYPOTHESIS**

\( H_{01} \): There is no significant difference between the average returns of Large Cap Mutual Fund Schemes and Mid Cap Mutual Fund Schemes in India over the last 10 years.
RESEARCH METHODOLOGY

LITERATURE REVIEW
The reviews of literature facilitated theoretical back ground to the study, brought clarity and focus to the research problem and helped the researcher to identify the research gap. Some of the reviews are given below:

Treynor and Mazuy (1966) analyzed 57 fund managers and evaluated performance in terms of their market timing abilities and found that, fund managers had not successfully outguessed the market. The results recommended that, investors were completely dependent on fluctuations in the market. Improvement in the rates of return was due to the fund Managers’ ability to identify underpriced stock companies. The study adopted Treynor’s (1965) methodology for reviewing the performance of mutual funds.

Jensen (1968) designed a composite portfolio evaluation technique concerning risk-adjusted returns. He evaluated the ability of 115 fund managers in selecting securities during the period 1945-66. With the analysis of net returns it indicated that, 39 funds had above average returns, while 76 funds yielded abnormally poor returns. Using gross returns, 48 funds showed above average results and 67 funds below average results.

---


Gupta (1974)³ evaluated the performance of mutual fund industry for the period 1962-71 using Sharpe, Treynor, and Jensen models. All the funds selected under the study outperformed the market irrespective of the choice of market index. The findings indicated that all the three models gave identical results. All the mutual fund subgroups outperformed the market using DJIA while income and balanced groups underperformed S&P 500. Return per unit of risk varied with the level of volatility assumed. He concluded that, funds with higher volatility exhibited superior performance.

Ippolito’s (1989)⁴ the results of his study and conclusions were relevant and consistent with the theory of efficiency of informed investors. He projected that risk-adjusted return for the mutual fund industry was greater than zero and attributed positive alpha before load charges and identified that fund performance was not related to expenses and turnover as predicted by efficiency arguments.

M. Jayadev (1996)⁵ attempted to evaluate the performance of two growth oriented mutual funds: Mastergain and Magnum Express, on the basis of monthly returns compared to benchmark returns. He applied risk adjusted performance measures suggested by Jenson, Treynor and Sharpe. After analysis results indicate that, Mastergain has performed better according to Jenson and Treynor measures and on the basis of Sharpe ratio its performance is not up to the benchmark. The performance of Magnum Express is poor on the basis of all the three measures. It was also found that Magnum Express is well diversified and has reduced its unique risk whereas Mastergain did not. He concluded that, the two growth oriented funds

have not performed better in terms of total risk and the funds are not offering advantages of diversification and expertise to the investors.

**TYPES OF MUTUAL FUNDS**

As discussed earlier equity Mutual Funds can be classified as Large-cap, Mid-cap, Small-cap and diversified or Multi-cap funds based on the size of the companies in which the fund invests and not the size of the mutual fund itself.

**Large Cap Mutual Funds:** Large cap mutual funds invest in large cap companies i.e. companies which have market capitalization of more than Rs 100 billion (Rs 10,000 crores). One can look at the BSE-Sensex or BSE-100 Index as a reference point for large cap stocks. Example: Birla Sunlife Top 100

**Mid Cap Mutual Funds:** The Mid-cap oriented mutual fund schemes invest in companies having moderate market capitalization, ranges from Rs 20 billion (Rs. 2,000 crores) to Rs 100 billion (Rs 10,000 crores ). BSE Mid-cap index can be considered as the reference point for midcap stocks. Example: HDFC Mid-cap Opportunities Fund

**Small Cap Mutual Funds:** The Small-cap oriented mutual fund schemes invest in companies having small market capitalization which is less than Rs 20 billion (Rs. 2000 crores). BSE Small cap index can be considered as the reference point for small cap stocks.

Example: DSP Micro-cap Fund

**Multi Cap Funds:** The Multi-cap oriented mutual fund schemes invest in diversified mutual funds which can invest in stocks across market capitalization. The scheme’s assets can be invested in shares of large, medium (or) small size companies.

Example: HDFC Equity Fund

Which Mutual Fund market cap suits investors?

If one prefers to construct the best mutual fund portfolio, he needs to allocate money across the various market cap funds. It should be noted that market
capitalization is just one the important factors only moreover your investment plan should be based on other important factors like your financial goals, time-frame, mutual fund scheme’s investing style, load factors and taxation.

(RECENT TRENDS IN MUTUAL FUNDS IN INDIA)

Lackluster stock market performance, rising inflation and anticipation of a rise in interest rates has led to a tapering of growth in the Indian mutual fund industry in the recent years. In the year 2014, change in government and rise in expectations of people leads to sudden growth in capital market. A parallel growth was also observed in the Indian mutual fund industry. Over the last 5 years, the Assets Under Management (AUM) of Indian mutual fund industry grew from 67093099 lakhs in FY 2012 to 182958449 lakhs in FY 2017 showing a compound annual growth rate (CAGR) of 22.21%. Further, the AUM of the Indian mutual fund industry witnessed an exceptional growth of 35.17% in FY2017. According to Association of Mutual Funds in India (AMFI) data, AUM grew from Rs. 13.53 lakh crore in March 2016 to Rs. 18.29 lakh crore in March 2017. The CAGR gives an impression that the industry has produced impressive growth throughout the period (refer Table --).
Table --: Growth in AUM

<table>
<thead>
<tr>
<th>YEAR</th>
<th>AUM (in Lakh)</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td>67093099</td>
<td></td>
</tr>
<tr>
<td>2013</td>
<td>82319526</td>
<td>22.70</td>
</tr>
<tr>
<td>2014</td>
<td>91079508</td>
<td>10.65</td>
</tr>
<tr>
<td>2015</td>
<td>119477358</td>
<td>31.18</td>
</tr>
<tr>
<td>2016</td>
<td>135344347</td>
<td>13.28</td>
</tr>
<tr>
<td>2017</td>
<td>182958349</td>
<td>35.17</td>
</tr>
</tbody>
</table>

Source: www.amfiindia.com

Market Share

AUM penetration of the Indian mutual fund industry as a per cent of GDP is only Approx. 6 percent (Paul, 2014). Despite the relatively low penetration of mutual funds in India, the market is highly concentrated. Though, there are 44 AMCs currently operating in the sector, the AUM of the industry is concentrated with five leading fund houses. Approximately 57 per cent of the total AUM is shared by, ICICI, HDFC, Reliance, Birla Sun Life and SBI Mutual fund (refer Table 2).

<table>
<thead>
<tr>
<th>Rank</th>
<th>Fund Houses</th>
<th>AUM (in Lakh)</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>ICICI Prudential Mutual Fund</td>
<td>24296130.61</td>
<td>13.28</td>
</tr>
<tr>
<td>2</td>
<td>HDFC Mutual Fund</td>
<td>23717761.00</td>
<td>12.96</td>
</tr>
<tr>
<td>3</td>
<td>Reliance Mutual Fund</td>
<td>21089063.82</td>
<td>11.53</td>
</tr>
<tr>
<td>4</td>
<td>Birla Sun Life Mutual Fund</td>
<td>19504900.94</td>
<td>10.66</td>
</tr>
<tr>
<td>5</td>
<td>SBI Mutual Fund</td>
<td>15702527.68</td>
<td>8.58</td>
</tr>
<tr>
<td>6</td>
<td>Others</td>
<td>78647965.78</td>
<td>42.99</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td>182958349.83</td>
<td>100</td>
</tr>
</tbody>
</table>

Source AMFI- as on 31st March 2017
Indian Mutual Fund industry’s Avg. Assets Under Management (AAUM) are at all time high - 19.47 Lakh Crore (INR 19.47 Trillion). Average Assets Under Management (AAUM) of Indian Mutual Fund Industry for the month of May 2017 stood at 19.47 lakh crore. Assets Under Management (AUM) as on May 31, 2017 stood at 19.04 lakh crore. The AUM of the Indian MF Industry has grown from 3.26 trillion as on 31st March 2007 to 19.04 trillion as on 31st May, 2017, about six-fold increase in a span of 10 years. The MF Industry’s AUM has grown from 5.87 trillion as on 31st March, 2012 to 19.04 trillion as on 31st May, 2017, more than three-fold increase in a span of 5 years. The Industry’s AUM had crossed the milestone of 10 Trillion (10 Lakh Crore) for the first time in May 2014 and in a short span of less than three years, the AUM size has crossed 19.04 lakh crore last month, almost doubled.

The total number of accounts (or folios as per mutual fund parlance) as on May 31, 2017 stood at 5.72 crore (57.2 million), while the number of folios under Equity, ELSS and Balanced schemes, wherein the maximum investment is from retail segment stood at 4.60 crore (46 million).

**Source:** amfiindia.com

**SUMMARY OF RISK, RETURN, BETA AND R SQUARE (APRIL 2007 TO MARCH 2017)**

<table>
<thead>
<tr>
<th>S.No.</th>
<th>Schemes</th>
<th>Scheme Return</th>
<th>Scheme Risk</th>
<th>Beta</th>
<th>R Square</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>ICICI Multicap</td>
<td>1.1726</td>
<td>6.6974</td>
<td>0.649</td>
<td>0.514</td>
</tr>
<tr>
<td>2</td>
<td>HDFC Equity</td>
<td>1.3464</td>
<td>7.3252</td>
<td>0.961</td>
<td>0.941</td>
</tr>
<tr>
<td>3</td>
<td>Reliance Equity Opportunities</td>
<td>1.3676</td>
<td>7.1913</td>
<td>0.938</td>
<td>0.929</td>
</tr>
<tr>
<td>4</td>
<td>Birla Equity</td>
<td>1.2809</td>
<td>7.2009</td>
<td>0.954</td>
<td>0.959</td>
</tr>
<tr>
<td>5</td>
<td>SBI Multicap</td>
<td>1.0344</td>
<td>6.6338</td>
<td>0.878</td>
<td>0.957</td>
</tr>
</tbody>
</table>
Table ---represents the results of return, risk, beta and coefficient of determination of selected schemes with benchmark return and risk. It is clear from the table, all the five schemes shows competency to make out a strong case for investment as they have given more return as compare to benchmark index. The maximum return was from Reliance Equity Opportunities (1.3675), followed by HDFC Equity (1.3464) and minimum return was from SBI Multicap (1.0344).

In the context of risk involved in the scheme, it was found from the table -- that all five schemes have more risk. Standard Deviation of selected diversified schemes is to measure the risk of the fund return. Higher the value of Standard Deviation of the fund returns, greater the risk carried by the fund. It is observed that maximum deviation of fund returns is shown by HDFC Equity (7.3252), followed by Birla Equity whereas SBI Multicap (6.6338) was the least risky scheme with lower Standard Deviation.

In the context of Beta (β) which implies the responsiveness of the return on the mutual fund scheme in association with the fluctuations in the benchmark index. Beta (β) is a measure of systematic risk. It is observed from the table that all the five Diversified schemes of mutual fund have registered beta less than one which indicates that they are less risky compared to their benchmark index during this period. Out of the selected schemes it was found that HDFC Equity (0.9617) is more aggressive and is risky followed by Birla Equity (0.9545) whereas ICIC (0.6498) found to be less risky among the selected diversified scheme.

The co-efficient of determination ($R^2$) is measured with the market index of S&P BSE 500 for the period of study. Co-efficient of determination ($R^2$) is a mark that will give information about the variability of a model or its fitness. High value of $R^2$ shows higher diversification of the schemes portfolio that can easily hold the market variability. R Square measures the level of diversification, It is found from the table the highest R Square value was found in Birla (0.959) followed by SBI
(0.957), HDFC (.941) and Reliance (0.929) which indicated that these schemes have performed well diversification except ICICI which have value (0.513) it means this scheme is moderately diversified.

Average Scheme returns, measure of systematic risk Beta ($\beta$) and Co-efficient of Determination (R2) presents meaningful information regarding risk and return trade off in mutual fund schemes, for more significant appraisal of mutual fund schemes through risk-return relationship it is advisable to do analysis by using different measures of performance as given by Sharpe, Tryenor and Jensen models.

**HYPOTHESIS TESTING**

H$_{01}$: There is no significant difference between the average returns of Large Cap Mutual Fund Schemes and Mid Cap Mutual Fund Schemes in India over the last 10 years.

**Group Statistics on** Large Cap Mutual Fund Schemes and Mid Cap Mutual Fund Schemes (10 Years)

<table>
<thead>
<tr>
<th>SCHEME</th>
<th>N</th>
<th>Mean</th>
<th>Std. Deviation</th>
<th>Std. Error Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>MF</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>LC</td>
<td>5</td>
<td>1.1727</td>
<td>.08298</td>
<td>.03711</td>
</tr>
<tr>
<td>MC</td>
<td>5</td>
<td>1.4450</td>
<td>.12584</td>
<td>.05628</td>
</tr>
</tbody>
</table>

From the table on group statistics on Large Cap Mutual Fund Schemes and Mid Cap Mutual Fund Schemes towards the performance over the last 10 years observed that the mean of Large Cap Mutual Fund Schemes is 1.172 at 0.0829 SD and the mean of Mid Cap Mutual Fund Schemes is 1.445 at .125 SD indicated a difference in both funds. From the mean on returns, it was found that Mid Cap Mutual Fund Schemes is better than that of the Large Cap Mutual Fund Schemes for investment of 10 years.
**Independent Samples Test on Large Cap Mutual Fund Schemes and Mid Cap Mutual Fund Schemes (10 Years)**

<table>
<thead>
<tr>
<th></th>
<th>Levene's Test for Equality of Variances</th>
<th>t-test for Equality of Means</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>F</td>
<td>Sig.</td>
</tr>
<tr>
<td>Equal variances assumed</td>
<td>.908</td>
<td>.369</td>
</tr>
<tr>
<td>Equal variances not assumed</td>
<td>4.04</td>
<td>6.926</td>
</tr>
</tbody>
</table>

From the table no t (4.040), p<0.05 and so the stated null hypothesis is rejected. This implies that on an average the last 10 years returns of Large Cap Mutual Fund and Mid Cap Mutual Fund schemes are significantly different at 5% level of significance. Hence, it is concluded that there is a significant difference between the average returns of Large Cap Mutual Fund Schemes and Mid Cap Mutual Fund Schemes in India over the last 10 years.

**CONCLUSION**

Saving and investments are two different financial terminologies. While saving worked in the past, today you need to invest. Saving is a part of one's income that they put away regularly, it does not necessarily provide returns and even may not meets short-term needs. But Investing on the other hand, provides returns and
helps us grow our capital, which in turn, will help us fulfilling our financial goals. Mutual Fund, today, has emerged as one of the most popular financial investment tools. The mutual fund industry is the rising and fast growing segment of the Indian Financial Market. It provides a variety of schemes to suit the needs and risk return profile of different categories of investors. Above paper shows importance and benefits of Mutual fund investment. It has also provided the information of recent trends in India which is very useful for currents investment.

BIBLIOGRAPHY


www.amfiindia.com