A Study on Performance of Risk and Return on Selected Mutual Funds

Dr. M. Ravichandran  
Assistant professor  
Department of Management Studies  
Anna university (BIT Campus), Trichy  

T. Iswarya  
PG Student  
Department of Management Studies  
Anna university (BIT Campus), Trichy

Abstract

A mutual fund is a pure intercessor, which performs basic function of buying and selling security happening behalf of its investors or unit holders. A proper evaluation measure will remove confusion and help small investors to choose about level of investment in many mutual fund schemes, so as to maximize the returns. Indian capital market provides various investors help them to invest various industry, securities, and commodities and to ensure the profitable return. Mutual Funds help the small and medium size investors to participate in the today’s complex and current financial scenario. Investors can participate in Mutual funds to buying the units of a detailed Scheme. In this paper we have taken selected schemes were assessed on the basis of Sharpe, Treynor and Jensen’s measures.

Keywords: Mutual funds, Net Asset Value, Standard Deviation, Sharpe, Treynor and Jensen’s

I. INTRODUCTION

In Mutual fund industry has developed by leaps and boundaries, A proper evaluation measure will remove misunderstanding and help small investors to decide approximate level of investment in various mutual fund schemes, so as to minimize the risk maximize the returns. Further the growing rivalry in the market forces the fund managers to work hard to satisfy investor and the management. A regular performance assessment of the mutual funds is essential for the investors and the fund manager also on the basis of the returns associated with the risk free security and stock market directories. The primary capital market was very inactive and reclusive. The unorganized and private player’s theaters vital role for maintaining the liquidity in the country. In short the chaotic environments raised in the economic system of the country. Some serious attention was drawn towards the financial system in India at the time of preparation phase. Most of the economist recommended for the adoption of the mixed economy proposal. The planner of Indian economy stabs to adopt the balanced economy, which has beneficial for socio economic and political areas. The prevailing government was started establishing various financial institutions for fulfilling the obligation for industries and agriculture; it also started state-owned financial institution for providing the finance without any interruption. UTI is one of the largest and oldest mutual funds in the country. Later on the other private sector companies and financial institutions adopted this mechanism and started to mobilize fund through the concept of mutual fund. India economy stood among the fastest growing economy in the world. The huge potential market is also unlocked for the mutual fund industry; this would accelerate the growth of the industry. Generally Indian economy called as a redeemable economy, 80% of population has saved more than 35% of GDP rate. The present saving shell channelized in the mutual fund industry as it proposals a variety of investment avenues. In India there is a huge scope for mutual fund area in tire I and Tire II cities. Further scope is open from agriculture sector and other allied sectors for mutual fund players from the rural areas. It is forecast that mutual fund sector would grow at a rate of 30% to 35% in resulting five years, and it will reach 300 Billion USD by 2015.

As it can be noticeable, there is huge and potential growth in the mutual fund area. The mutual fund industry is very sound and growth oriented in the next future based on the continuous developmental actions in this sector.

II. LITERATURE REVIEW

(GUPTA, oct 2013) Mutual fund industry has experienced a radical growth in the past two decades. Increase in the number of schemes with increased mobilization of funds in the preceding few years notes the importance of Indian mutual funds industry. To fulfill the expectations of millions of retail investors, the mutual funds are mandatory to function as successful institutional investors. Proper assessment of various fund performance and their contrast with other funds helps retail investors for making investment decisions. Considering the interest of retail investors modest statistical techniques like averages and rate of returns are used.

(Dr.Sarika, nov 2015) However, there are differences between the two. Saving refers to funds kept for making specific purchases in the comparatively nearby future and for emergencies. Investing, on the other hand, focuses on increasing net worth and realizing long-term financial aims. Investing involves risk of loss of principal and is more concerned on the return of investment. This total risk, calculated by standard deviation, can be divided into two parts Unsystematic risk, systematic risk. Unsystematic risk is also termed diversifiable risk. Systematic risk may be called non-diversifiable risk, avoidable risk or market risk and measured by Beta.
A Study on Performance of Risk and Return on Selected Mutual Funds

(Jain, Jul 2012) The study has investigated the performance of equity founded mutual fund schemes in India, using CAPM. In the long run, the private and public companies have achieved well. While reliance and kotak mutual fund trades have been the best performers than the UTI and SBI has worst performer. The result clearly designate that over the period of last 15 years, the perivate sector mutual fund companies have outdone then the public sectors and by observing the performance of each and every mutual fund.

(Ravikumar, Aug 2013) In their paper evaluated the performance of selected Indian mutual fund schemes in terms of five performance measures (a) Sharpe ratio (b) Treynor ratio (c) Jensen measure (d) Sharpe differential return measure (e) Fama’s mechanisms of investment performance using attuned monthly NAV of 60 schemes from 10 mutual funds for the five year dated, that is, from April 2000 to March 2005. Two Benchmark Portfolios (a) Market Index (b) Set of Fundexes was used for this purpose. Monthly antiquated on 91-days Treasury Bills was used as a surrogate for risk free rate of return.

(Bansal, May 2012) However, there are variations between the two. Saving refers to funds kept for making specific purchases in the fairly near future and for crises. Investing, on the other hand, focuses on increasing net value and achieving long-term financial goals. Investing involves risk of loss of principal and is more anxious on the return of investment. This total risk, measured by standard deviation, can be divided into two parts Unsystematic risk, methodical risk. Unsystematic risk is also called diversifiable risk. Systematic risk may be called non-diversifiable risk, inevitable risk or market risk and measured by Beta.

III. OBJECTIVES

The objectives of the study is,
- To study and analysis the five year annual growth return given in their schemes.
- To help the investors, where choosing the top mutual fund allowing to their risk among selected schemes factors.
- To measure the risk return relationship of selected sector fund schemes.
- To classify the return and compare the schemes of growth return.

IV. RESEARCH METHODOLOGY

This research paper is analyzed and data collected from secondary data. And this research paper is a descriptive research design has applied.

A. Secondary sources:

In this research paper data were collected from various edited books, conceptual paper, newspaper, magazines, journal, published reports of mutual funds.

Financial tools for analysis:
Mutual funds schemes identifying the performance of mutual funds were calculating with the help of these models.
- Sharpe model
- Treynor model
- Jensen model

B. Data analysis:

The study based risk and return on mutual fund schemes. It has been consider and determine top 5 schemes as its UTI transportation and logistics fund, SBI pharma fund, Birla sunlife MNC fund, Relaince pharma fund, ICICI prudential banking and financial service fund. For this calculation of the risk is used the daily growth of net asset value (NAV) of the mutual funds along with closing price.

1) Alpha:
It’s basically is difference between the returns an investors expected from a fund A positive alpha means the fund has outperformed its benchmark index and negative alpha indicates underperformance of the fund.

2) Beta:
Measure the volatility of a particular fund in comparison to the market as that is the extent to which the fund’s return is impacted factors. Beta is calculated using a statistical tool called regression analysis.

3) Standard deviation:
The total risk is that how much the risk of the return on a fund is deviating the expected return based on performance of the funds. And it indicates that the net asset value (NAV) of the mutual fund more volatile than risk than a fund with lower standard deviation.

4) Sharpe ratio:
SR is an important measure that evaluates the return that a fund the generate relative to the risk taken Risk is measured by standard deviation. It is used for the fund that has low correlation with the benchmark. It indicates that risk-free asset would perform better than the fund being analyzed.

5) R-Squared:
Measures the relationship between a portfolio and benchmark and its thought percentage from 1 to 100 not measured the performance of the portfolio.
A Study on Performance of Risk and Return on Selected Mutual Funds

Here we analysis the last 5 year return on mutual fund. And calculate the net asset value NAV. and standard deviation from the return. Beta value analyzed for the UTI transportation and logistics fund(1.16), SBI pharma fund(0.88), Birla sun life fund(0.73), reliance pharma fund(088), And ICICI prudential banking and financial service fund(0.85) of top 5 schemes.

<table>
<thead>
<tr>
<th>Name of the scheme</th>
<th>Sharpe Ratio</th>
<th>R-squared (%)</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>UTI transportation and logistics fund</td>
<td>1.55</td>
<td>61</td>
<td>I</td>
</tr>
<tr>
<td>SBI pharma fund</td>
<td>1.37</td>
<td>85</td>
<td>III</td>
</tr>
<tr>
<td>Birla sunlife fund</td>
<td>1.41</td>
<td>53</td>
<td>II</td>
</tr>
<tr>
<td>Reliance pharma fund</td>
<td>1.01</td>
<td>95</td>
<td>IV</td>
</tr>
<tr>
<td>ICICI prudential banking and financial service fund</td>
<td>1.23</td>
<td>90</td>
<td>V</td>
</tr>
</tbody>
</table>

Analyzed the sharpe ratio form the beta value as it’s the schemes the ratio were find from the CAPM. Then calculate R-Squared value of scheme of mutual funds. And then rank the schemes.

C. Findings of the Study:

The present study respond that, in most of the cases mean return on equity mutual fund scheme more than the risk return on other mutual fund schemes and SBI, ICICI, Birla sunlife, reliance, UTI term deposit rates. Further equity mutual fund schemes show that remarkable return for the period of 1st year and 5th year. Mutual fund provide both income and capital appreciation while avoiding excessive risk. The mean return on hybrid mutual fund schemes has shown instability during the study period, and served the purpose of hybrid funds only during the period of 6 months. 1st year and 5th year. The mean return on debt mutual fund schemes top 5 selected schemes was consistently positive from the 5 schemes.

- 70-100% is the good correlation between the returns
- 40-70% is the average correlation between the returns
- 1-40% is the low correlation between the returns

V. Conclusion

The performance of risk based mutual fund schemes using CAPM. In the long run, the private n and public sector companies have performed far better than the public sector. Monthly NAV of different schemes have been used to calculate the returns from the fund schemes. BSE-sensex has been used for market portfolio. The historical performance of the selected schemes were evaluated on the basis of sharpe, treynor, and Jensen’s measure whose results will be useful for investors for taking better investment decisions. From Treynor results, it found that 19 out of 29 schemes had outperformed the benchmark. There taken sharpe ratio and then R-Squared value shows the positive Alpha value and indicates performance the schemes.

Reference