



## A STUDY ON ANALYSIS OF EQUITY SCHEMES IN SBI MUTUAL FUNDS

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### **Abstract:**

A Mutual Fund is a trust that pools the savings of a number of investors who share a common financial goal. The money collected is invested by the fund manager in different types of securities depending upon the objective of the scheme. Investing in a mutual fund can be a lot easier than buying and selling individual stocks and bonds on your own. Mutual Funds now represent perhaps most appropriate investment opportunity for most investors. As the investor always try to maximize the returns and minimize risk. The basic purpose of the study is to give broad idea on Mutual Funds and analyze various schemes to highlight diversified investment that Mutual Fund offers to its investors. Through this study one can understand how to invest in Mutual Funds and turn raw investment into ripen fruits by taking wise decisions, taking the risk factors into account. The study is to identify the best scheme among the equity funds of SBI Mutual Funds for the investors who prefer to invest in Mutual Funds by analyzing the risk and returns of the funds through standard Deviation, Alpha, Beta and Sharpe Ratio.

### **Introduction:**

The Securities and Exchange Board of India Regulations, 1993 define mutual fund as "a fund established in the form of trust by a sponsor to raise money by the trustees through the sale of units to public, under one or more schemes for investing in securities in accordance with these regulations". A Mutual Fund is an investment tool that allows small investors access to a well-diversified portfolio of equities, bonds and other securities. Each shareholder participates in the gain or loss of the fund. Investments in securities are spread across a wide cross-section of industries and sectors and thus the risk is reduced. Diversification reduces the risk because all stocks may not move in the same direction in the same proportion at the same time. Mutual fund satisfies these requirements by providing attractive returns with affordable risks. Anybody with an investible surplus of as little as a few thousand rupees can invest in Mutual Funds. Each Mutual Fund scheme has a defined investment objective and strategy.

### **Need for the Study:**

- ✓ To give an idea about the benefits available from equity schemes in SBI Mutual Fund to Investors.
- ✓ To study about various investment strategies of SBI Mutual Funds.
- ✓ Applying the various parameters to measure and evaluate the risk and the respective returns of selected mutual fund schemes.
- ✓ To analyze the best scheme among the equity funds of SBI Mutual Funds for the investors who prefer to invest in Mutual Funds.

### **Objective of the Study:**

#### **Primary Objective:**

- ✓ A Study on Analysis of equity scheme in SBI Mutual Funds.

#### **Secondary Objective:**

- ✓ Comprehensive study of mutual fund concept
- ✓ Applying the various parameters to measure and evaluate the risk and the respective returns of selected mutual fund schemes.
- ✓ Recommending good mutual fund scheme to invest and earn more returns on selected mutual fund schemes.

**Scope of the Study:** The study gives an information about the various investment opportunities in mutual funds and helps to identify the top performing equity schemes among the following schemes

- ✓ SBI Magnum Multiplier Fund.
- ✓ SBI Banking & Financial Services Fund.
- ✓ SBI Blue Chip Fund.
- ✓ SBI Magnum Equity Fund.
- ✓ SBI Magnum Midcap Fund.
- ✓ SBI Magnum Global Fund.

The study focuses on comparison of risk and return of each equity scheme with its peers (6 funds) and benchmark index to identify outperforming and underperforming mutual fund schemes.

**Limitation of the Study:** The results interpreted through the research is limited only to few equity schemes and does not include the following funds

- ✓ Index Funds
- ✓ Debt Funds
- ✓ Tax Savers
- ✓ Arbitrage
- ✓ International Funds

**Research Methodology:**

**Type of Research:** Descriptive and Analytical research has been used because the research has no control over the variables. Report can be prepared based on what has happened or what is happening. In Analytical Research, the research is done based on facts and information already available.

**Tools for Research:**

- ✓ Standard Deviation
- ✓ Alpha
- ✓ Beta
- ✓ Sharpe Ratio
- ✓ GRETl Tool

**Period of the Study:** The analysis of Equity schemes in SBI Mutual Funds was done between March, 2017 to Mar, 2018.

**Formulas for Research:**

**Standard Deviation:**

- ✓ The total risk of a given fund is measured in terms of standard deviation.
- ✓ It tells us how much the values have deviated from the mean of the values.

Standard deviation is a measure of how much an investment's returns can vary from its average return.

It is a measure of volatility and in turn, risk. The formula for standard deviation is:

$$\text{Standard Deviation} = [1/n * (r_i - r_{ave})^2]^{1/2}$$

Where;	$r_i$	=	actual rate of return
	$r_{ave}$	=	average rate of return
	$n$	=	number of time periods

In simple terms, standard deviation is the square root of the variance.

Standard deviation is a basic mathematical concept that carries a lot of weight. Simply put, standard deviation measures the average amount by which individual data points differ from the mean. It is calculated by first subtracting the mean from each value, and then squaring, summing and averaging the differences to produce the variance. While variance itself is a useful indicator of range and volatility, the squaring of the individual differences means they are no longer reported in the same unit of measurement as the original data set. In the case of stock prices, the original data is in dollars and variance is in dollars squared, which is not a useful unit of measure. Standard deviation is simply the square root of the variance, bringing it back to the original unit of measure and making it much simpler to use and interpret.

**Alpha:**

Alpha is a measure of an investment's performance on a risk-adjusted basis. It takes the volatility (price risk) of a security or fund portfolio and compares its risk-adjusted performance to a benchmark index. The excess return of the investment relative to the return of the benchmark index is its "alpha." Simply stated, alpha is often considered to represent the value that a portfolio manager adds or subtracts from a fund portfolio's return. An alpha of 1.0 means the fund has outperformed its benchmark index by 1%. Correspondingly, an alpha of -1.0 would indicate underperformance of 1%. For investors, the higher the alpha the better.

**Calculation of Alpha:**

Alpha basically is the difference between the returns an investor expects from a fund, given its beta, and the return it actually produces.

$$\text{Alpha} = \{(\text{Fund return} - \text{Risk free return}) - (\text{Funds beta}) * (\text{Benchmark return} - \text{risk free return})\}$$

A positive alpha means the fund has outperformed its benchmark index. Whereas, a negative alpha indicates an underperformance of the fund. The more positive an alpha the healthier for investors.

The ideal time period for analysing alpha and beta value is one year returns from their funds.

**Beta:**

- ✓ A Beta is a measure of risk. It compares a mutual fund's volatility with that of a benchmark. If the beta of the stock is 1, it means that the returns in the stock are highly correlated to the benchmark index.
- ✓ If Beta is greater than 1, it means the stock is more volatile.
- ✓ If Beta is less than 1, than the stock is less volatile.
- ✓ Beta is a measure of the volatility, or systematic risk, of a security or a portfolio in comparison to the market as a whole. Beta is used in the capital asset pricing model (CAPM), which calculates the expected return of an asset based on its beta and expected market returns. Beta is also known as the beta coefficient.

### **Beta Calculation:**

Beta is calculated using regression analysis. Beta represents the tendency of a security's returns to respond to swings in the market. A security's beta is calculated by dividing the covariance of the security's returns and the benchmark's returns by the variance of the benchmark's returns over a specified period.

### **Uses of Beta:**

A security's beta should only be used when a security has a high R-squared value in relation to the benchmark. The R-squared measures the percentage of a security's historical price movements that could be explained by movements in a benchmark index. For example, a gold exchange-traded fund (ETF), such as the SPDR Gold Shares, is tied to the performance of gold bullion. Consequently, a gold ETF would have a low beta and R-squared in relation to a benchmark equity index, such as the Standard & Poor's (S&P) 500 Index. When using beta to determine the degree of systematic risk, a security with a high R-squared value, in relation to its benchmark, would increase the accuracy of the beta measurement.

### **Sharpe Ratio:**

The Sharpe Ratio is a measure for calculating risk-adjusted return, and this ratio has become the industry standard for such calculations. It was developed by Nobel laureate William F. Sharpe. The Sharpe ratio is the average return earned in excess of the risk-free rate per unit of volatility or total risk. Subtracting the risk-free rate from the mean return, the performance associated with risk-taking activities can be isolated. One intuition of this calculation is that a portfolio engaging in "zero risk" investment, such as the purchase of U.S. Treasury bills (for which the expected return is the risk-free rate), has a Sharpe ratio of exactly zero. Generally, the greater the value of the Sharpe ratio, the more attractive the risk-adjusted return.

### **Calculation of Sharpe Ratio:**

The Sharpe ratio has become the most widely used method for calculating risk-adjusted return; however, it can be inaccurate when applied to portfolios or assets that do not have a normal distribution of expected returns. Many assets have a high degree of kurtosis ('fat tails') or negative skewness. The Sharpe ratio also tends to fail when analyzing portfolios with significant non-linear risks, such as options or warrants. Alternative risk-adjusted return methodologies have emerged over the years, including the Sortino Ratio, Return over Maximum Drawdown (RoMaD), and the Treynor Ratio. Modern Portfolio Theory states that adding assets to a diversified portfolio that have correlations of less than one with each other can decrease portfolio risk without sacrificing return. Such diversification will serve to increase the Sharpe ratio of a portfolio.

Sharpe ratio = (Mean portfolio return – Risk-free rate) / Standard deviation of portfolio return

### **Application of the Sharpe Ratio:**

The Sharpe ratio is often used to compare the change in a portfolio's overall risk-return characteristics when a new asset or asset class is added to it. For example, a portfolio manager is considering adding a hedge fund allocation to his existing 50/50 investment portfolio of stocks which has a Sharpe ratio of 0.67. If the new portfolio's allocation is 40/40/20 stocks, bonds and a diversified hedge fund allocation (perhaps a fund of funds), the Sharpe ratio increases to 0.87. This indicates that although the hedge fund investment is risky as a standalone exposure, it actually improves the risk-return characteristic of the combined portfolio, and thus adds a diversification benefit. If the addition of the new investment lowered the Sharpe ratio, it should not be added to the portfolio. The Sharpe ratio can also help explain whether a portfolio's excess returns are due to smart investment decisions or a result of too much risk. Although one portfolio or fund can enjoy higher returns than its peers, it is only a good investment if those higher returns do not come with an excess of additional risk. The greater a portfolio's Sharpe ratio, the better its risk-adjusted performance has been. A negative Sharpe ratio indicates that a risk-less asset would perform better than the security being analyzed.

### **Criticisms and Alternatives:**

The Sharpe ratio uses the standard deviation of returns in the denominator as its proxy of total portfolio risk, which assumes that returns are normally distributed. Evidence has shown that returns on financial assets tend to deviate from a normal distribution and may make interpretations of the Sharpe ratio misleading. A variation of the Sharpe ratio is the Sortino ratio, which removes the effects of upward price movements on standard deviation to measure only return against downward price volatility and uses the semi variance in the denominator. The Treynor ratio uses systematic risk, or beta ( $\beta$ ) instead of standard deviation as the risk measure in the denominator.

### **GRETL Software Tool:**

GRETL is an open-source statistical package, mainly for econometrics. The name is an acronym for Gnu Regression, Econometrics and Time-series Library. It has a graphical user interface (GUI) and can be used together with TRAMO/SEATS, R, Stata, Python, Octave, Ox and Julia. It is written in C, uses GTK+ as widget toolkit for creating its GUI, and uses gnuplot for generating graphs. As a complement to the GUI it also has a command-line interface. GRETL can output models as LaTeX files. Besides English, gretl is also available in Albanian, Basque, Bulgarian, Catalan, Chinese, Czech, French, Galician, German, Greek, Italian, Polish, Portuguese (both varieties), Romanian, Russian, Spanish, Turkish and Ukrainian. GRETL has been reviewed several times in the Journal of Applied Econometrics and in the Journal of Statistical Software.

**Analysis and Interpretation:**

**SBI Magnum Midcap Fund:**

- ✓ Midcap companies are those which have successfully navigated the start-up years but are yet to reach the mature stage of the business growth cycle. They are usually in niche or emerging sectors of the economy & have a high growth potential. They are more volatile than large caps & typically fall more during downtrends but are beneficial in bringing a slight boost to an equity portfolio.
- ✓ SBI Magnum Midcap Fund aims to provide investors with opportunities for long-term growth in capital along with the liquidity of an open-ended scheme by investing predominantly in a well-diversified basket of equity stocks of Midcap companies. The fund can invest 65% - 100 % of its assets in midcap stocks. It also selectively invests in small cap stocks to generate alpha and in large cap stocks from liquidity perspective. A bottom-up strategy is followed for stock selection rather than sector calls.
- ✓ The fund is suitable for investors looking for capital appreciation with a long term investment horizon.

**Investment Objective:**

To provide investors with opportunities for long-term growth in capital along with the liquidity of an open-ended scheme by investing predominantly in a well diversified basket of equity stocks of Midcap companies.

**SBI Magnum Equity Fund:**

- ✓ Large caps are typically mature, established companies & are relatively more stable than mid & small cap stocks. Historically we have seen that during a downturn in the business cycle, large caps tend to outperform mid & small cap stocks & therefore, also recover faster than them. Large cap companies are essential to generate stability in an investor's portfolio.
- ✓ SBI Magnum Equity Fund aims to provide the investor long – term capital appreciation by investing in high growth companies along with the liquidity of an open-ended scheme through investments primarily in equities and the balance in debt and money market instruments. SBI Magnum Equity Fund is positioned as large cap fund. It has a robust investment process & follows a top-down approach for investment, starting with analysing the broader economic outlook, then identifying the sectors & eventually narrowing down to stock selection.
- ✓ The fund is suitable for investors who are looking for long term capital appreciation with relatively lower risk.

**Investment Objective:**

To provide the investor long-term capital appreciation by investing in high growth companies along with the liquidity of an open-ended scheme through investments primarily in equities and the balance in debt and money market instruments

**SBI Blue Chip Fund:**

- ✓ Blue chip companies are typically large businesses, with substantial market share & leadership in their respective industries. They historically have shown successful growth, high visibility and reach, good credit ratings and greater brand equity amongst the public. Investing in such companies brings relative consistency to a portfolio.
- ✓ SBI Blue chip Fund aims to provide investors with opportunities for long-term growth in capital through an active management of investments in a diversified basket of equity stocks of companies whose market capitalization is at least equal to or more than the least market capitalised stock of S&P BSE 100 Index. Currently, the fund is predominantly large cap with opportunistic allocations to high conviction midcaps (up to 20%).
- ✓ The fund is suitable for investors who want exposure to blue chip Indian companies from a medium to long term perspective.

**Investment Objective:** To provide investors with opportunities for long-term growth in capital through an active management of investments in a diversified basket of equity stocks of companies whose market capitalization is at least equal to or more than the least market capitalized stock of S&PBSE100Index.

**SBI Magnum Multiplier Fund:**

- ✓ Multi cap funds invest across market cap & sectors. They have the flexibility to adapt their portfolios according to the market cycle & are not restrictive to any specific segment of the market. Different segments in the market perform in different phases. Multi cap funds have the potential to go anywhere & generate long term capital appreciation.
- ✓ SBI Magnum Multiplier Fund is a diversified equity fund, which invests across market capitalization i.e. large, mid and small cap stocks, with an endeavour to generate long term capital appreciation through investment in equities of high growth companies.
- ✓ The fund is suitable for investors looking for capital appreciation with a long term investment horizon.

**Investment Objective:**

The investment objective of the scheme is to provide investors long term capital appreciation/dividend along with the liquidity of an open-ended scheme

**SBI Magnum Global Fund:**

- ✓ Midcap companies are those which have successfully navigated the start-up years but are yet to reach the mature stage of the business growth cycle. They are usually in niche or emerging sectors of the economy & have a high growth potential. However, they are more volatile than large caps & typically fall more during downtrends. Within the midcap universe, quality businesses have withstood market downturns relatively better than other companies. In fact, a quality investment philosophy is integral to find businesses which will survive & prosper in most market phases.
- ✓ SBI Magnum Global Fund aims to provide investors maximum growth opportunity through well-researched investments in Indian equities, PCDs and FCDs from selected industries with high growth potential and in bonds. The fund is positioned as a midcap biased fund with a quality investment philosophy. It follows a bottom-up strategy based on stock selection rather than sector calls. The stock selection is tilted towards companies with a strong business franchise, competitive advantage, good management quality, reasonable valuations & relatively higher return on capital.
- ✓ The fund is suitable for investors looking for capital appreciation with a long term investment horizon.

**Investment Objective:**

"The investment objective of the scheme is to provide investors long term capital appreciation/dividend along with the liquidity of an open-ended scheme".

**SBI Banking & Financial Services Fund:**

- ✓ Banking & Financial Services sector are the fundamental drivers of economic growth and development in a country. In effect, the health of the economy is a mirror reflection of the banking and financial services sector in the country.
- ✓ SBI Banking & Financial Services Fund is an open-ended sector fund that invests in banking & financial services sector companies that are poised to grow along with the emerging Indian economy. The Fund invests at least 80% of the portfolio in companies forming part of the Banking & Financial Services sector, across market capitalisation following a bottom-up stock selection process.
- ✓ The fund is suitable for high-risk appetite investors who are bullish on the prospects of the banking and financial services sector & are looking to add a sector fund to their core portfolio in order to boost overall returns.

**Investment Objective:**

"The investment objective of the scheme is to generate long-term capital appreciation to unit holders from a portfolio that is invested predominantly in equity and equity related securities of companies engaged in banking and financial services. However, there can be no assurance that the investment objective of the Scheme will be realized."

**GRETl Output:**

The S&P BSE SENSEX returns are kept as independent variable and the Mutual fund returns are kept as dependent variable and the least squares are calculated in GRETl software which is one of the famous software used by fund managers and wealth managers in asset managing process.

Table 1: SBI Banking & Financial Services Direct Growth Fund

Model 1: OLS, using observations 1-249

Dependent variable: Mutual Fund Returns

	Coefficient	Std. Error	t-ratio	p-value
Const	0.00013431	0.00030852	0.4354	0.66368
INDEX_RETURNS	1.02656	0.0515123	19.9284	<0.00001
Mean dependent variable	0.000851	S.D. dependent variable		0.007793
Sum squared residuals	0.005775	S.E. of regression		0.004835
R-squared	0.616543	Adjusted R-squared		0.614990
F(1, 247)	397.1397	P-value(F)		2.50e-53
Log-likelihood	975.3145	Akaike criterion		-1946.629
Schwarz criterion	-1939.594	Hannan-Quinn		-1943.797

Table 2: SBI Magnum Multiplier Direct Growth Fund

Model 2: OLS, using observations 1-249

Dependent variable: Mutual Fund Returns

	Coefficient	Std. Error	t-ratio	p-value
Const	0.00399555	0.00405306	-0.9858	0.32519
INDEX_RETURNS	1.13438	0.67672	1.6763	0.09495
Mean dependent variable	-0.003204	S.D. dependent variable		0.063752
Sum squared residuals	0.996603	S.E. of regression		0.063520
R-squared	0.011248	Adjusted R-squared		0.007245
F(1, 247)	2.809940	P-value(F)		0.094947

Log-likelihood	334.0308	Akaike criterion	-664.0616
Schwarz criterion	-657.0267	Hannan-Quinn	-661.2299

Table 3: SBI Blue chip Direct Growth Fund  
Model 3: OLS, using observations 1-249  
Dependent variable: Mutual Fund Returns

	Coefficient	Std. Error	t-ratio	p-value
Const	4.31475e-05	0.00018226	0.2367	0.81306
INDEX_RETURNS	0.921878	0.0304318	30.2932	<0.00001
Mean dependent variable	0.000687	S.D. dependent variable		0.006190
Sum squared residuals	0.002015	S.E. of regression		0.002856
R-squared	0.787924	Adjusted R-squared		0.787066
F(1, 247)	917.6793	P-value(F)		3.78e-85
Log-likelihood	1106.371	Akaike criterion		-2208.742
Schwarz criterion	-2201.707	Hannan-Quinn		-2205.911

Table 4: SBI Magnum Equity Direct Growth Fund  
Model 4: OLS, using observations 1-249  
Dependent variable: Mutual Fund Returns

	Coefficient	Std. Error	t-ratio	p-value
Const	-3.16717e-05	0.000158134	-0.2003	0.84142
INDEX_RETURNS	0.904912	0.0264029	34.2732	<0.00001
Mean dependent variable	0.000600	S.D. dependent variable		0.005934
Sum squared residuals	0.001517	S.E. of regression		0.002478
R-squared	0.826259	Adjusted R-squared		0.825555
F(1, 247)	1174.654	P-value(F)		7.49e-96
Log-likelihood	1141.733	Akaike criterion		-2279.466
Schwarz criterion	-2272.431	Hannan-Quinn		-2276.634

Table 5: SBI Magnum Midcap Direct Growth Fund  
Model 5: OLS, using observations 1-249  
Dependent variable: Mutual Fund Returns

	Coefficient	Std. Error	t-ratio	p-value
Const	7.81861e-05	0.000341136	0.2292	0.81891
INDEX_RETURNS	0.76151	0.0569579	13.3697	<0.00001
Mean dependent variable	0.000610	S.D. dependent variable		0.007005
Sum squared residuals	0.007060	S.E. of regression		0.005346
R-squared	0.419846	Adjusted R-squared		0.417497
F(1, 247)	178.7488	P-value(F)		4.88e-31
Log-likelihood	950.2922	Akaike criterion		-1896.584
Schwarz criterion	-1889.550	Hannan-Quinn		-1893.753

Table 6: SBI Magnum Global Direct Growth Fund  
Model 6: OLS, using observations 1-249  
Dependent variable: Mutual Fund Returns

	Coefficient	Std. Error	t-ratio	p-value
Const	0.00043620	0.00048786	0.8941	0.37214
INDEX_RETURNS	0.726133	0.0814566	8.9144	<0.00001
Mean dependent variable	0.000943	S.D. dependent variable		0.008772
Sum squared residuals	0.014440	S.E. of regression		0.007646
R-squared	0.243412	Adjusted R-squared		0.240349
F(1, 247)	79.46585	P-value(F)		1.11e-16
Log-likelihood	861.2105	Akaike criterion		-1718.421
Schwarz criterion	-1711.386	Hannan-Quinn		-1715.589

**Findings and Suggestions:**

Table 7: Standard Deviation of the Mutual Fund Schemes

Particulars	Standard Deviation
S&P Index	0.00596
SBI Banking & Financial Services Fund	0.007793
SBI Magnum Multiplier Fund	0.063752
SBI Blue chip Fund	0.006190
SBI Magnum Equity Fund	0.005934

SBI Magnum Midcap Fund	0.007005
SBI Magnum Global Fund	0.008772

**Suggestions:**

- ✓ For high risk customers it is suggested to invest in SBI Magnum Multiplier Fund.
- ✓ For customers who want to take only moderate level risk it is suggested to invest in SBI Magnum Global Fund, SBI Banking & Financial Services Fund and SBI Magnum Midcap Fund.
- ✓ For low risk customers it is suggested to invest in SBI Blue Chip Fund & SBI Magnum Equity Fund.

Table 8: Alpha of the Mutual Fund Schemes

Particulars	ALPHA
SBI Banking & Financial Services Fund	0.000134318
SBI Magnum Multiplier Fund	-0.00399555
SBI Blue chip Fund	0.0000431
SBI Magnum Equity Fund	-0.0000317
SBI Magnum Midcap Fund	0.0000782
SBI Magnum Global Fund	0.0004362

**Suggestions:**

- ✓ Alpha which is the measure of excess return of the fund in comparison with the S&P Index is high only in SBI Magnum Global Fund.
- ✓ SBI Magnum Global Fund and SBI Banking & Financial Services Fund show good performance when compared to other direct growth funds.
- ✓ SBI Magnum Midcap Fund and SBI Magnum Blue chip Fund show better performance with S&P index.
- ✓ SBI Magnum Equity Fund and SBI Magnum Multiplier Fund show poor performance in comparison with S&P Index.

Table 9: Beta of the Mutual Fund Schemes

Particulars	BETA
SBI Banking & Financial Services Fund	1.02656
SBI Magnum Multiplier Fund	1.13438
SBI Blue chip Fund	0.921878
SBI Magnum Equity Fund	0.904912
SBI Magnum Midcap Fund	0.76151
SBI Magnum Global Fund	0.726133

**Suggestions:**

- ✓ Beta which is the measure of the volatility in funds has been perfectly correlated with the S&P Index Returns.
- ✓ SBI Magnum Multiplier Fund and SBI Magnum Banking & Financial Fund has 1.13438 and 1.02656 as beta which is highly volatile in nature.
- ✓ SBI Blue chip Fund, SBI Magnum Equity Fund, SBI Magnum Midcap Fund and SBI Magnum Global Fund has beta less than 1 which says about its lower volatility.

Table 10: Sharpe Ratio of the Mutual Fund Schemes

Particulars	SHARPE Ratio
SBI Banking & Financial Services Fund	-8.6807
SBI Magnum Multiplier Fund	-1.1246
SBI Blue chip Fund	-10.955
SBI Magnum Equity Fund	-11.443
SBI Magnum Midcap Fund	-9.692
SBI Magnum Global Fund	-7.7018

**Suggestions:**

- ✓ The Sharpe Ratio which says the risk adjusted return of the portfolio has been negative in comparison with the S&P Index.
- ✓ The SBI Magnum Multiplier Fund Has lowest risk adjusted return and preferably the best fund among the rest.
- ✓ The SBI Magnum Equity Fund portfolio has higher negativity in comparison to every other fund.
- ✓ The rest of the funds such as SBI Blue chip, Global, Midcap & Banking And Finance Fund has medium risk adjusted return and its is suggested to invest in these funds.

**Conclusion:**

The study has identified the best scheme among the equity funds of SBI Mutual Funds for the investors who prefer to invest in Mutual Funds. The schemes are analyzed based on their risk and return. The risks are classified based on the values of Standard deviation and Beta while the return is classified based on the average

annual returns and alpha. These results help the investors to invest in diversified schemes and also help them in gaining confidence about their return on investment. The results of the project also help the company in maintaining their current portfolio, analyzing the existing funds and also to keep the value of beta to minimum in order to reduce the risks in portfolios.

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