

MUTUAL FUNDS

Question 1

What are the drawbacks of investments in Mutual Funds? (4 Marks) (November 2008)

Answer

- (a) There is no guarantee of return as some Mutual Funds may under perform and Mutual Fund Investment may depreciate in value which may even effect erosion / Depletion of principal amount
- (b) Diversification may minimize risk but does not guarantee higher return.
- (c) Mutual funds performance is judged on the basis of past performance record of various companies. But this cannot take care of or guarantee future performance.
- (d) Mutual Fund cost is involved like entry load, exit load, fees paid to Asset Management Company etc.
- (e) There may be unethical Practices e.g. diversion of Mutual Fund amounts by Mutual Fund /s to their sister concerns for making gains for them.
- (f) MFs, systems do not maintain the kind of transparency, they should maintain
- (g) Many MF scheme are, at times, subject to lock in period, therefore, deny the market drawn benefits
- (h) At times, the investments are subject to different kind of hidden costs.
- (i) Redressal of grievances, if any, is not easy

Question 2

Briefly explain what is an exchange traded fund. (4 Marks) (May 2010)

Answer

Exchange Traded Funds (ETFs) were introduced in US in 1993 and came to India around 2002. ETF is a hybrid product that combines the features of an index mutual fund and stock and hence, is also called index shares. These funds are listed on the stock exchanges and

their prices are linked to the underlying index. The authorized participants act as market makers for ETFs.

ETF can be bought and sold like any other stock on stock exchange. In other words, they can be bought or sold any time during the market hours at prices that are expected to be closer to the NAV at the end of the day. NAV of an ETF is the value of the underlying component of the benchmark index held by the ETF plus all accrued dividends less accrued management fees.

There is no paper work involved for investing in an ETF. These can be bought like any other stock by just placing an order with a broker.

Some other important features of ETF are as follows:

1. It gives an investor the benefit of investing in a commodity without physically purchasing the commodity like gold, silver, sugar etc.
2. It is launched by an asset management company or other entity.
3. The investor does not need to physically store the commodity or bear the costs of upkeep which is part of the administrative costs of the fund.

Question 3

Distinguish between Open-ended and Close-ended Schemes. (4 Marks) (November 2010)

Answer

Open Ended Scheme do not have maturity period. These schemes are available for subscription and repurchase on a continuous basis. Investor can conveniently buy and sell unit. The price is calculated and declared on daily basis. The calculated price is termed as NAV. The buying price and selling price is calculated with certain adjustment to NAV. The key feature of the scheme is liquidity.

Close Ended Scheme has a stipulated maturity period normally 5 to 10 years. The Scheme is open for subscription only during the specified period at the time of launch of the scheme. Investor can invest at the time of initial issue and thereafter they can buy or sell from stock exchange where the scheme is listed. To provide an exit route some close-ended schemes give an option of selling back (repurchase) on the basis of NAV. The NAV is generally declared on weekly basis.

Question 4

Mr. X earns 10% on his investments in equity shares. He is considering a recently floated scheme of a Mutual Fund where the initial expenses are 6% and annual recurring expenses are expected to be 2%. How much the Mutual Fund scheme should earn to provide a return of 10% to Mr. X? (2 Marks)(June 2009)

Answer

$$r_2 = \frac{1}{1 - \text{initial exp}} \times r_1 + \text{recurring exp.}$$

The rate of return the mutual fund should earn;

$$= \frac{1}{1 - 0.06} \times 0.1 + 0.02$$

$$= 0.1264 \text{ or } 12.64\%$$

Question 5

A mutual fund made an issue of 10,00,000 units of ₹ 10 each on January 01, 2008. No entry load was charged. It made the following investments:

	₹
50,000 Equity shares of ₹100 each @ ₹160	80,00,000
7% Government Securities	8,00,000
9% Debentures (Unlisted)	5,00,000
10% Debentures (Listed)	<u>5,00,000</u>
	<u>98,00,000</u>

During the year, dividends of ₹ 12,00,000 were received on equity shares. Interest on all types of debt securities was received as and when due. At the end of the year equity shares and 10% debentures are quoted at 175% and 90% respectively. Other investments are at par.

Find out the Net Asset Value (NAV) per unit given that operating expenses paid during the year amounted to ₹ 5,00,000. Also find out the NAV, if the Mutual fund had distributed a dividend of ₹ 0.80 per unit during the year to the unit holders. (8 Marks) (November 2009)

Answer

In order to find out the NAV, the cash balance at the end of the year is calculated as follows-

	₹
Cash balance in the beginning (₹ 100 lakhs – ₹ 98 lakhs)	2,00,000
Dividend Received	12,00,000
Interest on 7% Govt. Securities	56,000
Interest on 9% Debentures	45,000
Interest on 10% Debentures	<u>50,000</u>

	15,51,000
(-) Operating expenses	<u>5,00,000</u>
Net cash balance at the end	<u>10,51,000</u>
Calculation of NAV	₹
Cash Balance	10,51,000
7% Govt. Securities (at par)	8,00,000
50,000 equity shares @ ₹ 175 each	87,50,000
9% Debentures (Unlisted) at cost	5,00,000
10% Debentures @90%	<u>4,50,000</u>
Total Assets	<u>1,15,51,000</u>
No. of Units	10,00,000
NAV per Unit	₹ 11.55

Calculation of NAV, if dividend of ₹ 0.80 is paid –

Net Assets (₹ 1,15,51,000 – ₹ 8,00,000)	₹ 1,07,51,000
No. of Units	10,00,000
NAV per unit	₹ 10.75

Question 6

Based on the following information, determine the NAV of a regular income scheme on per unit basis:

	₹ Crores
Listed shares at Cost (ex-dividend)	20
Cash in hand	1.23
Bonds and debentures at cost	4.3
Of these, bonds not listed and quoted	1
Other fixed interest securities at cost	4.5
Dividend accrued	0.8
Amount payable on shares	6.32
Expenditure accrued	0.75
Number of units (₹ 10 face value)	20 lacs
Current realizable value of fixed income securities of face value of ₹ 100	106.5
The listed shares were purchased when Index was	1,000

Present index is	2,300
Value of listed bonds and debentures at NAV date	8

There has been a diminution of 20% in unlisted bonds and debentures. Other fixed interest securities are at cost.

(6 Marks) (May 2010)

Answer

Particulars	Adjustment Value ₹ crores
Equity Shares	46.00
Cash in hand	1.23
Bonds and debentures not listed	0.80
Bonds and debentures listed	8.00
Dividends accrued	0.80
Fixed income securities	4.50
Sub total assets (A)	61.33
Less: Liabilities	
Amount payable on shares	6.32
Expenditure accrued	0.75
Sub total liabilities (B)	7.07
Net Assets Value (A) – (B)	54.26
No. of units	20,00,000
Net Assets Value per unit (₹ 54.26 crore / 20,00,000)	₹ 271.30

Question 7

An investor purchased 300 units of a Mutual Fund at ₹ 12.25 per unit on 31st December, 2009. As on 31st December, 2010 he has received ₹ 1.25 as dividend and ₹ 1.00 as capital gains distribution per unit.

Required :

- The return on the investment if the NAV as on 31st December, 2010 is ₹ 13.00.
- The return on the investment as on 31st December, 2010 if all dividends and capital gains distributions are reinvested into additional units of the fund at ₹ 12.50 per unit.

(8 Marks)(May 2011)

Answer

Return for the year (all changes on a per year basis)

	₹ /Unit
Change in price (₹ 13.00 – ₹ 12.25)	0.75
Dividend received	1.25
Capital gain distribution	<u>1.00</u>
Total Return	<u>3.00</u>

$$\text{Return on investment} = \frac{3.00}{12.25} \times 100 = 24.49\%$$

If all dividends and capital gain are reinvested into additional units at ₹ 12.50 per unit the position would be.

$$\text{Total amount reinvested} = ₹ 2.25 \times 300 = ₹ 675$$

$$\text{Additional units added} = \frac{₹ 675}{12.50} = 54 \text{ units}$$

$$\text{Value of 354 units as on 31-12-2010} = ₹ 4,602$$

$$\text{Price paid for 300 units on 31-12-2009} (300 \times ₹ 12.25) = ₹ 3,675$$

$$\text{Return} = \frac{₹ 4,602 - ₹ 3,675}{₹ 3,675} = \frac{₹ 927}{₹ 3,675} = 25.22\%$$