

MBA (FT)

A

Paper F-3102— SECURITY ANALYSIS AND INVESTMENT MANAGEMENT

Time : 3 hours

Maximum Marks : 70

(Write your Roll No. on the top immediately on receipt of this question paper.)

Answer any five questions. All questions carry equal marks.

1. (A) Differentiate between Investment, Speculation and Gambling.

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(B) A 30-year Government treasury bond with 8% p.a. coupon rate is currently selling at par. The probability distribution of its yield to maturity a year from now is as follows:

State of economy	Probability	Yield to maturity
Boom	0.20	11%
Normal growth	0.50	8%
Recession	0.30	7%

i) Derive the probability distribution of the 1-year holding period return (HPR).

ii) Compute the mean and standard deviation of the HPR on the bond.

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(C) State some dominating risk factors involved equity investments as compared to bond investment.

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2. (A) An investor has gathered the following information about an equity share:

Year	Earnings per share	Dividend per share	Book value per share	Market price per share
2005	10	6.25	30	30
2006	12	8.20	33.80	37
2007	15	9.75	39.05	42
2008	17.5	11.50	45.05	49.50
2009	21	16.20	49.85	55
2010	25	19.85	55	64

This investor expects a return of 35% from his investment. Suggest him at what price should he buy this stock using dividend discount model with sustainable growth rate.

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(B) Explain the Economic Analysis under top-down approach of equity investment.

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(C) What are the theoretical drawbacks of Price/Earning ratios?

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3. (A) The following data pertains to a stock under the Information Technology sector.

Current EPS	= ₹ 19.00
Capital expenditure per share	= ₹ 28.00
Depreciation per share	= ₹ 17.00
Increase in in waking capital per share	= ₹ 8.00
Debt ratio of the firm	= ₹ 17%

If supernormal growth rate is 25% for the next 6 year and then, the company is expected to grow at a constant rate of 10%, calculate the value per share using free cash flow to equity method provided the required rate of return is 15%.

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(B) Explain the active equity management strategies.

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(C) Discuss the factors affecting the following relative valuation ratios of equity analysis:

- PEG ratio
- Price to book value ratio
- Price to sales ratio

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4. (A) Debentures of Kellor corporation with a par value of ₹ 1,000 currently selling at ₹ 960, maturing in next 5 year and have a 7% p.a. coupon rate paid semiannually.

- Calculate the current yield.
- Calculate the yield to maturity.
- Realized compound yield for an investor with a 3-year holding period and a reinvestment rate of 6% over the period. At the end of 3 year, an identical bond will yield 7%.
- What are the major drawbacks of the above three values so computed?

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(B) Explain the theories of term structure of interest rates.

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5. (A) You are considering the following bond for inclusion in your fixed income portfolio:

Coupon rate	10% p.a.	Yield to maturity	10%
Per value	₹ 1,000	Term to maturity	10 year

- What is the duration of this bond?
- Compute modified duration of the bond.
- Why is the bond's duration less than its maturity?
- What will be the effect of the following independent changes on the duration of the bond:
  - Coupon rate is 8% rather than 10%.
  - Yield to maturity in 12% rather than 10%.
  - Maturity period is 8 year rather than 10%.

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**(B) Explain passive bond management strategies.**

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6. **(A) How do the following tools of technical analysis guide to predict the trends?**

- i) Market breadth
- ii) Bar chart pattern
- iii) Oscillators
- iv) Moving averages

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**(B) When does a market said to be efficient under EMH? Suggest certain aspects of Indian Stock Market which will make it more efficient.**

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7. Write short notes on any *four* of the following:

- i) Applicability of geometric and arithmetic mean in stock returns analysis.
- ii) Bottom-up approach of equity investment.
- iii) Investment opportunities of various investors as per Industry Life Cycle theory.
- iv) Rate anticipation strategy of active bond management.
- v) Difference between Fundamental Analysis, Technical Analysis and EMH.

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