

Mock Test Paper - Series II: September, 2026

Date of Paper: 26th September, 2026

Time of Paper: 2 P.M. to 5 P.M.

FINAL COURSE: GROUP – I

PAPER – 2: ADVANCED FINANCIAL MANAGEMENT

Time Allowed – 3 Hours

Maximum Marks – 100

1. The question paper comprises two parts, Part I and Part II.
2. Part I comprises Case Scenario based Multiple Choice Questions (MCQs)
3. Part II comprises questions which require descriptive type answers.

PART I – Case Scenario based MCQs (30 Marks)

Part I is compulsory.

Case Scenario I

The following data pertains to ABC Ltd.

Balance Sheet as on 31.03.25

Liabilities	Amount (₹)	Assets	Amount (₹)
Equity	45,00,000	Net Fixed Assets	24,60,000
Long Term Debt	13,30,000	Current Assets:	
Current Liabilities:		Cash	3,48,000
Accounts Payable	1,25,000	Bills Receivable	16,98,000
Outstanding Exp.	45,000	Closing Stock	14,94,000
	60,00,000		60,00,000

Income Statement for the year ending 31.03.2025

Particulars	Amount (₹)
Sales	1,35,80,000
Less: COGS	74,70,000
Gross Profit	61,10,000

Less: Indirect Exp.	33,95,000
EBIT	27,15,000
Less: Interest	1,50,000
EBT	25,65,000
Less: Tax @ 42%	10,77,300
EAT	14,87,700

In the next year it is expected that there will be an increase in Sales by 15% and interest amount shall remain unchanged.

Based on the above information, answer the following questions.

- A company's actual growth rate is significantly above its Sustainable Growth Rate (SGR). Which of the following is the most appropriate implication?

 - The company is necessarily underutilising its internal funds.
 - The company can sustain its growth entirely through internally generated funds.
 - The company may resort to External Funding Requirements to sustain the higher growth.
 - The company's growth is necessarily aligned with its internal financing capacity.

(1 Mark)
- In case there is no change in Fixed Assets in proportion of sales and no dividend is declared then External Funding Requirement (EFR) shall be.....

 - ₹ 12,18,405
 - ₹ 4,80,595
 - ₹ 12,547
 - ₹ 13,30,000

(2 Marks)
- If Total Assets change in proportion to sales and no dividend is declared, the amount of Long-Term Debt to be repaid during the financial year 2025–26 shall be _____.

 - ₹ 12,18,405
 - ₹ 4,80,595

(c) ₹ 12,547

(d) ₹ 8,49,405

(2 Marks)

4. If Total Assets change in proportion to sales, 50% of the profit is declared as dividend, and no additional Long-Term Debt is raised to meet the External Financing Requirement (EFR), the amount of fresh equity to be raised shall be _____.

(a) ₹ 12,18,405

(b) ₹ 4,80,595

(c) ₹ 12,547

(d) ₹ 8,49,405

(2 Marks)

Total = 7 Marks

Case Scenario II

Mr. Arvind Mehta, a retired corporate executive, has accumulated a diversified investment portfolio consisting of equity shares, debt securities, gold ETFs and real estate investment trusts (REITs). He consults his investment advisor annually to review his portfolio.

During the latest review, the advisor presents different approaches to asset allocation. In one approach, the portfolio is designed after considering both the prevailing capital market outlook and Mr. Mehta's financial objectives and constraints. In another approach, the portfolio is constructed using long-term historical return, risk and covariance data and is periodically rebalanced to restore the desired asset mix. A third approach assumes that Mr. Mehta's risk tolerance remains unchanged but modifies the asset allocation whenever expectations about capital market conditions change. Finally, the advisor explains an approach under which Mr. Mehta's exposure to risky assets increases as his portfolio value grows and decreases if the portfolio value falls, thereby protecting a minimum level of wealth.

Based on the above case scenario, answer the following questions.

5. The asset allocation strategy that determines the optimal allocation after considering both capital market forecasts and the investor's objectives and constraints is:

(a) Strategic Asset Allocation

(b) Tactical Asset Allocation

(c) Integrated Asset Allocation

(d) Insured Asset Allocation

(1 Mark)

6. The approach that relies primarily on historical returns, risk and covariance data and periodically restores the target asset mix is:
- (a) Integrated Asset Allocation
 - (b) Strategic Asset Allocation
 - (c) Tactical Asset Allocation
 - (d) Dynamic Asset Allocation **(1 Mark)**
7. Mr. Mehta's advisor changes the portfolio allocation whenever expectations regarding capital market conditions change, while assuming that his risk tolerance remains constant. This approach is known as:
- (a) Strategic Asset Allocation
 - (b) Integrated Asset Allocation
 - (c) Insured Asset Allocation
 - (d) Tactical Asset Allocation **(1 Mark)**
8. Under which asset allocation strategy does an increase in portfolio value enable the investor to assume greater investment risk?
- (a) Strategic Asset Allocation
 - (b) Tactical Asset Allocation
 - (c) Insured Asset Allocation
 - (d) Integrated Asset Allocation **(1 Mark)**
9. Which of the following statements is correct regarding the four asset allocation strategies?
- (a) Tactical Asset Allocation periodically restores the portfolio to its original target allocation based on historical data.
 - (b) Strategic Asset Allocation changes asset allocation solely according to changing market expectations.
 - (c) Integrated Asset Allocation simultaneously considers investor-specific factors and capital market expectations while determining asset allocation.
 - (d) Insured Asset Allocation assumes that the investor's risk tolerance remains constant irrespective of changes in portfolio value. **(1 Mark)**

Total = 5 Marks

Case Scenario III

A newly established commodity exchange in India is evaluating whether agricultural and industrial commodities should be introduced for Futures and options trading. The management committee studies the “commodity characteristic approach” to assess the suitability of commodities for derivatives trading.

The committee identifies several essential characteristics for successful commodity derivatives trading. The committee also noted that where producers and buyers already rely extensively on long-term forward contracts, the need for organized derivatives markets is reduced one.

During stakeholder consultations, warehouse operators explain that commodity derivatives markets help them hedge the price risks associated with carrying inventories over time. Exporters and manufacturers further emphasize that standardized derivative contracts require homogeneous commodities so that actual delivery can occur smoothly in the Futures market. Market participants also highlight that hedgers seek not only price risk reduction but also flexibility, easy market access, and efficient clearing and settlement systems. In response, the exchange decides to strengthen both its core hedging services and peripheral convenience services.

One of the industrial participants A Ltd. (an electric wire manufacturer) is interested in using the exchange services. The company regularly purchases copper for production purposes and is currently long on 10 metric tonnes (MT) of copper at a Spot price of ₹ 1,185 per kg. Since the company intends to hold the copper inventory during the next quarter, its treasury department becomes concerned about possible adverse price movements and decides to hedge the exposure using copper Futures traded on the newly established exchange.

The company’s risk management team collects the following market data:

- Standard deviation of changes in Spot prices = 4%
- Standard deviation of changes in Futures prices = 6%
- Correlation coefficient between Spot and Futures prices = 0.75

Similarly, another participant X Ltd., a warehouse operator stores 10,000 units of a commodity currently priced at ₹ 1,600 per unit. Due to expected market volatility, the operator anticipates a decline of 12% in commodity prices over the next three months. To reduce price risk, the operator decides to hedge the inventory using commodity Futures contracts.

From the information given above, choose the correct answer to the following questions:

10. Using the given information related to A Ltd., the optimal hedge ratio in the copper for the company shall be.....
- (a) 0.25

- (b) 0.50
(c) 0.75
(d) 1.00 **(2 Marks)**
11. What quantity of copper Futures should the company short to achieve the optimal hedge?
(a) 2 MT
(b) 5 MT
(c) 7.5 MT
(d) 10 MT **(2 Marks)**
12. To reduce price risk, the treasury department of warehouse operator decides to hedge the inventory using commodity Futures contracts. If the hedge ratio determined by the risk manager is 0.75 then the effective loss borne by the warehouse operator after applying the hedge shall be.....
(a) ₹ 4,80,000
(b) ₹ 9,60,000
(c) ₹ 14,40,000
(d) ₹ 19,20,000 **(2 Marks)**
13. Which of the following characteristics is MOST essential for a commodity to qualify for derivatives trading?
(a) Commodity should be perishable and non-storable
(b) Commodity should be durable and storable
(c) Commodity should have government-fixed prices
(d) Commodity should have limited supply only **(1 Mark)**
14. Homogeneity of the commodity is important in commodity derivatives contracts because.....
(a) it increases transportation cost.
(b) it reduces the need for clearing systems.
(c) it allows standardization and actual delivery.
(d) it eliminates price fluctuations completely. **(1 Mark)**

15. Which of the following is considered a “convenience need” of hedgers?
- (a) Reduction in price variability
 - (b) Elimination of market supply
 - (c) Easy access to market and efficient clearing system
 - (d) Increase in commodity production (1 Mark)
16. If the company ignores the hedge ratio and shorts Futures equal to the entire exposure of 10 MT, the company will MOST likely face.....
- (a) Under-hedging risk
 - (b) Perfectly balanced hedge
 - (c) Over-hedging risk
 - (d) Elimination of basis risk completely (1 Mark)

Total = 10 Marks

Case Scenario IV

ABC Ltd., a UK firm, has a receivable \$ 20 Million due in 6 months. The company wants to cover full exposure. Following information are available:

Spot rate 1\$ = £ 0.7720 / £ 0.7840

6 months forward rate 1\$ = £ 0.7910 / £ 0.8040

Interest rates are as follows:

	US	UK
6 months deposit rate	4.50% p.a.	5.50% p.a.
6 months borrowing rate	6.00% p.a.	7.50% p.a.

Following options on pound are available:

Option	Strike rate	Price
Call	£ 0.8100	£ 0.01
Put	£ 0.8100	£ 0.02

ABC Limited has forecasted the spot rates for 6 months as follows:

Future Rates of 1\$	Probability
£ 0.7800	30%.
£ 0.8100	50%
£ 0.8300	20%

From the information given above, choose the correct answer to the following questions:

17. What will be the total expected value of option hedge in pounds, if the full exposure of 20 Million is covered?
- (a) £ 16.125 million
 - (b) £ 16.50 million
 - (c) £ 15.88 million
 - (d) £ 15.70 million
- (1 Mark)**
18. If ABC Ltd. is using forward hedge strategy, what will be total proceed in pound?
- (a) £ 15.40 million
 - (b) £ 15.88 million
 - (c) £ 16.125 million
 - (d) £ 15.82 million
- (2 Marks)**
19. What will be expected spot rate at the end of 6 months and expected cost (proceed) if no hedge strategy is adopted by the company?
- (a) £ 0.805/\$, £ 16.10 million
 - (b) £ 0.85/\$, £ 15.8 million
 - (c) £ 0.7720/\$, £ 15.44 million
 - (d) £ 0.7910/\$, £ 15.82 million
- (1 Mark)**
20. Identify which option gives the highest proceed.
- (a) Option hedge
 - (b) Forward hedge
 - (c) Money market hedge
 - (d) No hedge
- (1 Mark)**

Total = 5 Marks

Case Scenario V

The company ABC Ltd. proposes to take over XYZ Ltd. The chief executive of the company thinks that shareholders always look for the earnings per share. Therefore, he considers maximization of the earnings per share as his company's objective. The following information is available in respect of ABC Ltd. and XYZ Ltd.

	ABC Ltd.	XYZ Ltd.
Net Profit (Post Tax)	₹ 400 Lakh	₹ 315 Lakh
P/E ratio	10.50	10.00
Current market price per share	₹ 840	₹ 1700

The company is planning to borrow funds @ 15% rate of interest and buys out the target company by paying cash.

Assume tax rate @30%.

From the information given above, choose the correct answer to the following questions:

21. The total market value of equity of XYZ Ltd. is approximately.....
- ₹ 3150 lakh
 - ₹ 3400 lakh
 - ₹ 4200 lakh
 - ₹ 16800 lakh
- (1 Mark)**
22. Suppose if XYZ Ltd. is borrowing funds at a high interest rate to finance acquisition it will affect its EPS mainly due to.....
- increase in operating profit.
 - increase in interest burden.
 - increase in market price of shares.
 - increase in tax liability.
- (1 Mark)**
23. Suppose if ABC Ltd. is offering about ₹ 4030 Lakh to XYZ Ltd. for the proposed acquisition it will result in.....
- EPS accretion
 - EPS dilution
 - No Change
 - Risk free EPS
- (1 Mark)**

Total = 3 Marks

PART – II DESCRIPTIVE QUESTIONS

Question No.1 is compulsory. Candidates are required to answer any four questions from the remaining five questions.

Working notes should form part of the answers.

Maximum Marks – 70 Marks

1. (a) It is now 31 December 2025 and the corporate treasurer of O Ltd. is concerned about the volatility of interest rates. His company needs to immediately borrow ₹ 2 crore for a six-month period. Current interest rates are 14% per year for the type of loan O Ltd. would use, and the treasurer does not wish to pay more than this. He is considering using either of the following to hedge the interest rate risk:

- (i) Interest Rate Futures (IRFs), or
- (ii) An Interest Rate Guarantee

The corporate treasurer of O Ltd. expects interest rates to increase by 2% almost immediately and has decided to hedge the interest rate risk using IRFs as per the following details:

- June Rupee 3-month GOI Treasury Bonds Futures currently priced at 86.25.
- The standard contract size is ₹ 2,00,000 and the minimum price movement is one tick (the value of one tick is 0.01% per year of the contract size).

Required:

- (i) Demonstrate the results of using the Futures hedge under each of the following three scenarios, if for the entire six-month period:
 - (1) Interest rates increase by 2% and the Futures rates also moves by 2%.
 - (2) Interest rates increase by 2% and the Futures rates moves by 1.5%.
 - (3) Interest rates fall by 1% and the Futures rates moves by 0.75%
- (ii) As an alternative to Interest Rate Futures, the corporate treasurer has been able to purchase interest rate guarantees at a rate of 14% per annum for a premium of 0.2% of the size of the loan to be guaranteed.

Demonstrate whether the total cost of the loan after hedging in each of the three scenarios in (i) above would have been cheaper or more expensive with the

futures hedge than with the Interest Rate Guarantee. The guarantee would be effective for the entire six-month period of the loan.

Note: Ignore taxation, Margin Requirements, and the Time Value of Money.

(12 Marks)

- (b) List out the various indicators to identify the Interest Rate Risk. **(2 Marks)**
2. (a) Mr. A, an investor is contemplating to invest a large lump sum investment and shortlisted two equity managers X and Y, of which the most recent available performance information is as follows:

Manager	Year 1	Year 2	Year 3	Covariance with the equity market in Year 3
X	10.90%	5.90%	8.00%	0.82%
Y	7.50%	2.50%	10.00%	0.61%

The equity market delivered a compounded return of 21.74% over the last 3 years and 7.00% over the last year. For Year 3, the standard deviation of the equity market was 8.50% and the risk-free rate was 2.75%.

Required:

- (i) Evaluate the performance of each manager relative to the benchmark i.e. the equity market over the 3-year period.
- (ii) Calculate the risk-adjusted performance (both in absolute terms and proportionate terms) of each manager based on the Beta of the portfolio.
- (iii) Comment on the results of parts (i) and (ii) and suggest additional considerations in selecting an equity manager. **(10 Marks)**

Note: Round off calculations upto 2 decimal points.

- (b) List out the different types of risk associated with investment in Collateralized Debt Obligations (CDOs). **(4 Marks)**
3. (a) MFA enters into a 14-day Repo with MFB, facilitated by an independent agent, Bank C which charges a commission of 0.15% p.a. (on the nominal value of securities).

The Repo involves 10% Government of India Bonds 2028 at a repo rate of 5.65% for a nominal value of ₹ 8 crore. The clean price of the bond (i.e., excluding accrued interest) is ₹ 99.42. The initial margin requirement is 2%, and the number of days of accrued interest is 262 days.

Required:

- (i) Overall what above arrangement is called.
- (ii) The dirty price of the bond.
- (iii) The amount of funds exchanged in the first leg of the Repo.
- (iv) Repayment at maturity.
- (v) The effective annualised cost of funds to MFA.

Note: 1. Assuming 360 days a year.

- 2. Round off all the final computations nearest to the rupees and percentages upto four decimal points. **(6 Marks)**

- (b) Explain briefly the different types of risks to which investors in a securitization transaction are exposed. **(4 Marks)**

Either

- (c) Suppose a Large-cap Mutual Fund is benchmarked to a particular Index. Index and the same Mutual Fund realised the following returns over 5 years –

Year	Return on Index	Return of Mutual Fund
1	8%	7%
2	3%	2%
3	9%	8%
4	6%	9%
5	5%	5.50%

Assess the Fund's performance vis-à-vis the benchmark return over a period of five years. **(4 Marks)**

Or

Explain any two important lessons that can be learnt from the real-life cases of derivative mishaps. In each case, mention the name of the relevant Case Study along with the lesson learnt. **(4 Marks)**

- 4. (a) ABC Ltd. operates a fleet of cabs. One of its lot of cabs has completed its useful life of 10 years and has been fully depreciated for accounting purposes. The management is considering whether to dispose of this lot immediately as junk or retain it for a few more years before disposal, as the prices of the metals used in the manufacture of the cabs are fluctuating significantly.

If retained, the company will incur annual storage costs. The expected annual storage costs likely to be incurred for each cab at the end of each year is as follows:

Particulars	End of Year 1	End of Year 2	End of Year 3
Storage Cost (₹)	90,000	1,05,000	1,19,000

The expected junk value of each cab depends on the expected price per kg of the relevant metal. Each cab is expected to weigh approximately 2,000 kg. The expected selling price per kg of the relevant metal, along with the associated probabilities, for each of the next three years is as follows:

Probability	Year 1	Year 2	Year 3
0.30	₹ 60.00	₹ 50.00	₹ 35.00
0.50	₹ 70.00	₹ 57.50	₹ 42.00
0.20	₹ 85.00	₹ 76.25	₹ 52.50

The cost of capital of ABC Ltd. is 10%.

Required:

- Suggest the optimal year for disposal of the same of cabs as junk.
- Suppose that, due to a significant increase in demand for scrap metal, the estimated junk value at the end of Year 3 is revised upward as follows:

Probability	Expected Price
0.30	₹ 132.50
0.50	₹ 200.00
0.20	₹ 311.00

Comment whether the disposal decision will change.

Note: (i) For the calculation purpose use following PVFs:

Year	1	2	3
PVFs @ 10%	0.9091	0.8264	0.7513

- While scrap rate per kg can be considered upto two decimal points, other calculations to be rounded off upto whole numbers. **(10 Marks)**
- (b) Explain various characteristics of Venture Capital Financing. **(4 Marks)**

5. (a) ABN-Amro Bank, Amsterdam, wants to purchase ₹ 80 million for funding its account with Canara Bank, New Delhi.

Out of this amount, ₹ 30 million will be purchased against US dollars (US\$) and credited to Canara Bank's US\$ account with Citi Bank, New York. The balance amount will be purchased against British pounds (£) and credited to Canara Bank's £ account with Bank of London, London.

The prevailing inter-bank exchange rates are per \$, ₹ 91.3625/3700 & per £, \$ 1.4060/70.

Required:

- (i) State the nature of ABN-Amro Bank's ₹ account with Canara Bank, New Delhi, and the nature of Canara Bank's £ account with Bank of London, London, from ABN-Amro Bank's perspective.
- (ii) Determine the equivalent amounts in US\$ and £ to be credited to the respective accounts of Canara Bank.

Note: Round off all calculations upto whole numbers.

(6 Marks)

- (b) H Ltd. agrees to buy over the business of B Ltd. effective from 1st April, 2026. The summarized Balance Sheets of H Ltd. and B Ltd. as on 31st March 2026 are as follows:

Balance sheet as at 31st March, 2026 (In Crores of Rupees)

Liabilities:	H. Ltd	B. Ltd.
Paid up Share Capital		
- Equity Shares of ₹ 100 each	350.00	--
- Equity Shares of ₹ 10 each	--	6.50
Reserve & Surplus	950.00	25.00
Total	1,300.00	31.50
Assets:		
Net Fixed Assets	220.00	0.50
Net Current Assets	1,020.00	29.00
Deferred Tax Assets	60.00	2.00
Total	1,300.00	31.50

H Ltd. proposes to buy out B Ltd. and decided to issue 11,61,550 shares of ₹ 100 each to the shareholders of B Ltd. As per the terms of the exchange ratio was on

a Fair Value basis arrived on the Net Asset basis and Earnings capitalization method respectively for both H Ltd. and B Ltd.

Additional information is provided to you as part of the scheme of buying:

- (1) The weighted average post tax maintainable profits of H Ltd. and B Ltd. for the last 4 years are ₹ 300 crores and ₹ 10 crores respectively.
- (2) Both the companies envisage a capitalization rate of 8%.
- (3) H Ltd. has a contingent liability of ₹ 300 crores as on 31st March, 2026.

Required:

Apprise the weights assigned to values of shares based on Net Asset basis and Earnings capitalization method for arriving at the Fair Value. **(8 Marks)**

Note: Round off calculations upto 4 decimal points while computing ratio of weights assigned and values of shares upto 2 decimal points.

6. (a) As per market information, Zero-Coupon Bonds of different maturities are available in the market as follows:

Year	Price (% of Par Value)
1	96.1538
2	92.4556
3	88.8996

Suppose ABC Pension Fund is holding an asset that will yield an income of ₹ 2 crore every year only for the next two years.

Required:

You have been engaged as consultant to prepare answers along with adequate supporting calculations of the following questions:

- (i) If the interest rate changes by 10 bps, estimate how much the value of asset will change in terms of ₹ lac.
- (ii) Suggest a hedging strategy to hedge the interest rate risk using Interest Rate Futures available at contract value of ₹ 1,00,000 and a modified duration of 5.
- (iii) Demonstrate how the value of total position i.e., Asset and Futures insensitive to the change in interest rate. **(8 Marks)**

- Note:** (1) Assume a flat term Structure of interest rates.
(2) Round off all calculations upto 4 decimal points.
(3) No. of IRF to be rounded off to whole numbers.

(b) Consider the following information on two stocks, X and Y:

Year	Return on X (%)	Return on Y (%)
2024-25	10	12
2025-26	16	18

Required:

- (i) Determine Standard Deviation of return from each of the two stocks.
- (ii) Determine the Co-variance and Correlation coefficient between the returns of the two stocks.
- (iii) Advise whether diversification of investment with these two investments will provide any risk reduction.
- (iv) Calculate the return and risk of a portfolio containing X and Y in the proportion of 40% and 60%.
- (v) Suggest the proportionate weights to be assigned to these two securities so as to minimise the risk of the portfolio.

(6 Marks)