

SIXTH SEMESTER UG DEGREE EXAMINATION, APRIL 2026

(Regular/Improvement/Supplementary)

BBA HONOURS

GBAH6E03T: FINANCIAL RISK MANAGEMENT AND DERIVATIVES

Time: 3 Hours

Maximum Marks: 80

Part A: Answer *all* the questions. Each carries *one* mark.**Choose the Correct Answer.**

1. If the variance of the error term in a regression varied widely, the data is _____.
A) Homoscedastic B) Heteroscedastic
C) Normal D) Seasonal
2. What happens in the economy if the prevailing interest rates are too high?
A) Triggering recession B) Increased unemployment
C) Reduction in consumption D) All of the above
3. VAR attempts to measure _____ in returns within a given period.
A) Risk of expected changes B) Risk of possible changes
C) Risk of future changes D) Risk of unexpected changes
4. Risk budgeting helps in _____.
A) Portfolio Construction B) Portfolio optimization
C) Both A and B D) None of the above
5. _____ is a style of options contract that allows holders to exercise their rights at any time before and including the expiration date.
A) European B) American
C) Bermuda D) Exotic

Fill in the Blanks.

6. _____ is the process of approximating the probable value of a portfolio after a given change in the value of a key factor takes place.
7. _____ arises due to the variation in the price of domestic currency against the price of a foreign currency.
8. In financial time series, _____ refers to the observation that large changes in price tend to be followed by large changes and small changes tend to be followed by small changes.
9. _____ is a statistical procedure applied in financial modeling where the probability of different outcomes in a problem cannot be simply solved due to the interference of a random variable.
10. GARCH stands for _____.

(10 × 1 = 10 Marks)**(PTO)**

Part B. Answer any *eight* questions. Each carries *two* marks.

11. What is meant by sensitivity analysis?
12. What are the advantages of the Binomial Options Pricing Model?
13. When does interest rate risk arise? Give an example.
14. Define liquidity risk.
15. Make a short note on the role of gap analysis in the management of interest rate risk.
16. How does a 'straddle' differ from a 'strangle'?
17. Make a short note on the role of autoregressive models in time series forecasting.
18. What is meant by time varying volatility?
19. How does a put option differ from a call option?
20. Name the major factors that affect credit risk in the case of financial transactions between two persons.

(8 × 2 = 16 Marks)

Part C. Answer any *six* questions. Each carries *four* marks.

21. Make a note on the different types of financial risks.
22. "Risk is the chance of having an actual outcome that is different from the expected outcome." Explain.
23. Briefly explain any four options trading strategies that can be used by a trader in a bullish market.
24. What are the underlying assumptions for the calculation of VAR using the variance-covariance approach?
25. How does the ARCH effect arise in financial time series data?
26. What are the underlying assumptions of the Black-Scholes Options Pricing Model?
27. "Management of commodity risk is essential for a stable economy". Explain.
28. "The return from every security in the stock market is a function of a limited and predefined set of factors". Do you agree? Elaborate your arguments.

(6 × 4 = 24 Marks)

Part D. Answer any *two* questions. Each carries *fifteen* marks.

29. "Derivative market is introduced to facilitate diverse needs of the market participants." Make an elaborate note on the different functions performed by the derivative markets.
30. "Futures are introduced to overcome the drawbacks of Forwards". Discuss the disadvantages of Forwards and explain how those defects are rectified by Futures.
31. "Integrated financial risk management approach uses a holistic approach and considers multiple issues for ensuring effective risk reduction". Elaborate.

(2 × 15 = 30 Marks)