767

November 2022

Time – Three hours
(Maximum Marks: 75)

[N.B. 1. Q.No. 8 in PART – A and Q.No. 16 in PART – B are compulsory. Answer any FOUR questions from the remaining in each PART – A and PART – B.
2. Answer division (a) or division (b) of each question in PART – C.
3. Each question carries 2 marks in PART – A, 3 marks in Part – B and 10 marks in PART – C.]

PART – A

1. Write CAD definition.

2. What is meant by scaling?

3. Define CAM.

4. What is meant by coding structure?

5. List out methods of NC part programming.

6. Define CIM.

7. What are the types of AGV?

8. Write need of CE.

PART – B

9. What are the types of geometric modelling?

10. What are the functions of CAM?

11. What are the advantages of CAPP?

12. Write about word address format

13. Define coordinate system.

14. Classify according to robot axis.

15. What is augmented reality?

16. List out benefits of FMS.

[Turn over.....

PART – C

17. (a) Explain Shigley's design process.

    (Or)

    (b) Describe wire frame and surface modelling.

18. (a) Describe Optiz system and MICLASS system.

    (Or)

    (b) Explain variant and generative type CAPP.

19. (a) Explain NC part programming methods.

    (Or)

    (b) Explain mirroring using sub program.

20. (a) Explain evaluation of CIM.

    (Or)

    (b) Explain FMS layout.

21. (a) Explain sequential Vs Concurrent engineering.

    (Or)

    (b) Explain new product development processes.