

Reg No : Name :



MAR ATHANASIUS COLLEGE OF ENGINEERING, KOTHAMANGALAM

(Govt. Aided Autonomous Institution)

Fourth Semester B.Tech. Degree Examination, May, 2026

Course Code: B24HU2T02

Course Name: ENTREPRENEURSHIP AND MANAGEMENT SKILLS FOR ENGINEERS

(Common for CE and ME branches)

Max. Marks: 100

Duration:3 Hours

PART - A: 30 Marks (10 Qns x 3 Marks)

Answer all questions

1. State any three principles of Henri Fayol's administrative theory.
2. Explain the purpose of the organizing function in management.
3. State two benefits of having diversity in a team in an organization.
4. State one advantage and one disadvantage of using an autocratic leadership style in a crisis situation.
5. Discuss the main purpose of the Empathy Canvas?
6. Define the entrepreneurial mindset.
7. Explain influencer marketing with an example.
8. Explain performance marketing with an example.
9. What are the four stages of operations in a startup?
10. Discuss different intellectual property rights and its suitability

PART - B: 70 Marks (5 Qns x 14 Marks)

Answer any One full question from each module.

Module 1

11. a) Explain different types of organizational structure in a business. (10 marks)
b) How does the organizational structure affect communication within a company? (4 marks)

OR

12. a) Discuss different steps in operational planning process. (10 marks)
b) Explain the role of evaluating and selecting alternatives in planning. (4 marks)

Module 2

13. Nexus Global Enterprises, a multinational logistics company with 300 employees across offices in the U.S., India, and Germany, recently launched a new supply chain optimization project. The project requires close collaboration between teams in different regions, including logistics analysts in India, software developers in Germany, and client relations managers in the U.S. However, the project is facing delays due to communication barriers. Initial findings from an internal review show several issues: language differences have led to misunderstandings in technical requirements between the German and Indian teams, with complex jargon causing confusion. Additionally, cultural differences in communication styles have created friction—U.S. managers prefer direct feedback, while Indian team members use more indirect approaches, leading to misaligned expectations. Virtual meetings across time zones are often poorly attended, and email chains lack clarity, resulting in duplicated work and missed deadlines. Employee feedback indicates frustration with unclear instructions and a lack of opportunities to clarify doubts, contributing to low morale and reduced productivity. The HR and project management teams are tasked with addressing these communication barriers to ensure the project is completed on time and to improve team cohesion.
- (a) Identify the types of communication barriers in this case. (6 marks)
(b) Suggest methods to improve the smooth communication in the company. (8 marks)

OR

14. a) Describe the different methods for manpower planning used by organizations. (8 marks)
b) A manufacturing company plans to double its production in the next 3 years. As the HR manager, explain which manpower planning method(s) you would apply in this situation and justify your choice. (6 marks)

Module 3

15. Using the Business Model Canvas chart, outline the business model for a platform connecting freelance graphic designers with clients globally
- OR
16. Illustrate how the Subscription Model works for digital content platforms and analyze its potential for financial sustainability.

Module 4

17. A startup manufactures eco-friendly water bottles. To produce each bottle, it spends money on raw materials, labor, and packaging. The company also pays monthly rent for its factory, salaries to office staff, and spends on marketing campaigns. Discuss the different components of costs involved in producing this product. Classify them into suitable categories and provide examples from the case to support your answer.

OR

18. a) Explain the different stages of startup funding in detail. (6 Marks)
b) A startup has developed a mobile-based fitness tracking app. The founders initially used their personal savings to build the prototype. After receiving positive feedback, they are looking to raise funds to expand their team, scale marketing efforts, and eventually enter international markets. Using this case, for each stage mention the different sources of funds and how the start up might utilize the fund. (8 Marks)

Module 5

19. a) According to DPIIT, what are the conditions to be satisfied to consider an entity as a Start-up ? (6 marks)
b) List the tax benefits to start-ups in India. (8 marks)

OR

20. a) Explain the importance of prior art search before filing a patent. (4 marks)
b) How do databases like Google Patents, USPTO, WIPO, and Espacenet help in this process? (10 marks)
