



CBCS SCHEME

18MCA542

Fifth Semester MCA Degree Examination, Jan./Feb. 2023

Internet of Things (IoT)

Time: 3 hrs.

Max. Marks: 100

Note: Answer any FIVE full questions, choosing ONE full question from each module.

Module-1

- 1 a. With neat diagram, explain system components of an M2M solution. (10 Marks)
b. Define IoT. Explain emerging IoT applications. (10 Marks)

OR

- 2 a. What is Global Value Chain? Explain the inputs and outputs of an M2M value chain. (10 Marks)
b. Explain Game changers with example. (10 Marks)

Module-2

- 3 a. Explain the IoT – architecture outline. (10 Marks)
b. With a neat diagram, explain information-driven value chain for IoT. (10 Marks)

OR

- 4 a. Explain global and M2M value chains. (10 Marks)
b. Explain the functions layers and capabilities of an IoT solution. (10 Marks)

Module-3

- 5 a. Explain various service and deployment models of a cloud. (10 Marks)
b. With a neat diagram, explain how IoT has been integrated with enterprise systems. (10 Marks)

OR

- 6 a. Describe Local and Wide Area Networking with example. (10 Marks)
b. Discuss the key characteristics of Cloud Computing. (10 Marks)

Module-4

- 7 a. Explain IoT Domain model with example. (10 Marks)
b. In short explain ITU-IoT reference model with a diagram. (10 Marks)

OR

- 8 a. Briefly explain the ETSI M2M high level architecture. (10 Marks)
b. Explain Information model and function model with example. (10 Marks)

Module-5

- 9 a. Explain SoA-based device integration. (10 Marks)
b. Explain the evolution of commercial building automation. (10 Marks)

OR

- 10 a. Explain various levels of SOCRADES integration architecture. (10 Marks)
b. Explain Data representation and visualization with example. (10 Marks)

Important Note : 1. On completing your answers, compulsorily draw diagonal cross lines on the remaining blank pages.
2. Any revealing of identification, appeal to evaluator and /or equations written eg, 42+8 = 50, will be treated as malpractice.