

B. TECH.
(SEM VI) THEORY EXAMINATION 2018-19
INTERNET OF THINGS

Time: 3 Hours**Total Marks: 70****Note: 1.** Attempt all Sections. If require any missing data; then choose suitably.

SECTION A

1. Attempt all questions in brief. 2 x 7 = 14

- (a) What is Zigbee?
- (b) Differentiate between Raspberry Pi and desktop computer.
- (c) What are different challenges of IoT.
- (d) Explain different characteristics of IoT.
- (e) What is the role of things and Internet of IoT?
- (f) What is requirement of IoT protocol standardization?
- (g) Why do IoT system have to be self-adapting and self configuring?

SECTION B

2. Attempt any three of the following: 7 x 3 = 21

- (a) What is relation between WSN and IoT? Explain with example.
- (b) Why security required in IoT? Explain detail various security in Internet of Things.
- (c) Write in detail business model scenario for Internet of Things.
- (d) Explain Data visualization and its importance in IoT.
- (e) Explain layered IOT architecture using a figure.

SECTION C

3. Attempt any one part of the following: 7 x 1 = 7

- (a) Explain the application of IoT in home automation systems.
- (b) What is threat analysis in Internet of Things? Explain detail threat analysis.

4. Attempt any one part of the following: 7 x 1 = 7

- (a) Explain in detail access control and message integrity of Internet of Things.
- (b) How Big Data can be used in IoT? Explain in detail.

5. Attempt any one part of the following: 7 x 1 = 7

- (a) What is Role of the Internet of Things for Increased Autonomy and Agility in Collaborative Production Environments?
- (b) Explain the concepts and terminology of RFID Application.

6. Attempt any one part of the following: 7 x 1 = 7

- (a) Explain with example MQTT Protocol. What is role of MQTT protocol in IoT?
- (b) What is Identity management in Internet of Things? Explain any 2 Identity management techniques of Internet of Things.

7. Attempt any one part of the following: 7 x 1 = 7

- (a) Discuss What are the components and communication media required for making smart building.
- (b) Explain about Internet of Thing using PLC technology.