

Model Question Paper**Seventh Semester B.E. Degree Examination (2021-22)****BIG DATA AND ANALYTICS****Time: 03 Hours****Max Marks: 100****Note: Answer any FIVE full questions, choosing ONE question from each Module.****MODULE-1**

- 1 a. Define Big Data. Explain the Evolution of Big Data and their characteristics (10 Marks)
- b. What is grid computing? List and explain the features, drawbacks of grid computing (10 Marks)

OR

- 2 a. Discuss the functions of each of the five layers in Big Data architecture design (10 Marks)
- b. Illustrate the various phases involved in Big Data Analytics with neat diagram. (10 Marks)

MODULE-2

- 3 a. Illustrate the Hadoop core components with neat diagram (10 Marks)
- b. Discuss the Hadoop system and ecosystem components in four layers (10 Marks)

OR

- 4 a. Illustrate YARN based execution model and its functions With a neat diagram (10 Marks)
- b. Discuss the Apache sqoop import and export methods with neat diagram (10 Marks)

MODULE-3

- 5 a. Discuss the NoSQL data stores and their characteristic features (10 Marks)
- b. Illustrate the key value pairs in data architectural patterns with an example (10 Marks)

OR

- 6 a. Discuss the functions of MangoDB query language and database commands (10 Marks)
- b. Illustrate the CQL commands and their functionality (10 Marks)

MODULE-4

- 7** a. Describe the MapReduce execution steps with neat diagram (10 Marks)
- b. Discuss the functions of Group By, partitioning and combining using one example for each (10 Marks)

OR

- 8** a. Illustrate main features and Architecture of Hive with neat diagram. (10 Marks)
- b. Discuss the pig Latin data types and examples (10 Marks)

MODULE-5

- 9** a. Discuss Analysis of Variances(ANOVA) and correlation indicators of linear relationship (10 Marks)
- b. Describe the regression analysis predict the value of the dependent variable in case of linear regression (10 Marks)

OR

- 10** a. Illustrate the various phases in text mining process pipeline (10 Marks)
- b. Describe the web content mining and three phases for web usage mining (10 Marks)