

Total No. of Questions : 5]

SEAT No. :

**PC1169**

**[6317]-304**

[Total No. of Pages : 2

**T.Y.B.B.A. (Computer Application)**

**CA-504 (A) : MONGO DB**

**(2019 Pattern) (Semester-V)**

*Time : 2½ Hours]*

*[Max. Marks : 70*

*Instructions to the candidates:*

- 1) *All questions are compulsory.*
- 2) *Figures to the right indicate full marks.*
- 3) *Neat diagram must be drawn wherever necessary.*

**Q1)** Answer the following: (Any 8)

**[8×2=16]**

- a) List types of NoSQL databases.
- b) Explain Aggregation Pipeline in MongoDB.
- c) Explain collStats command.
- d) Define Horizontal Scaling.
- e) List the different command-line utilities of MongoDB.
- f) What is Multikey Index?
- g) Explain Monitoring tools related to MongoDB.
- h) Write the syntax of insertMany method.
- i) Explain any two features of MongoDB.
- j) Explain one to one relationship in Embedded Documents.

**Q2)** Answer the following: (Any 4)

**[4×4=16]**

- a) How the Runtime Configuration of MongoDB is handled? Explain in detail.
- b) Explain MongoDB CRUD Concerns (Read and Write Operations).
- c) List and explain different MongoDB shell commands related to database.
- d) Explain the different indexing reference methods in detail.
- e) Explain Cursor used in MongoDB.

**P.T.O.**

**Q3)** Answer the following: (Any 4)

**[4×4=16]**

- a) Explain Graph Database in detail.
- b) Explain analogy between RDBMS and MongoDB Data Model.
- c) Explain Batch Insert with an example.
- d) Explain MongoDB Architecture.
- e) What is Page Fault? How to get details of Page Fault in MongoDB?

**Q4)** Answer the following:

**[8×2=16]**

Write statement in MongoDB to do the following:

- a) Create a collection 'Employee' with fields ID, EmployeeName, Designation and Salary.
- b) Create a new document in the 'Employee' collection having ID=01.
- c) Write a command to show the details of 'Employee' collection.
- d) Display EmployeeName, Designation, Salary of Employees having ID=05.
- e) Display ID, EmployeeName, Designation, Salary of Employees in which designation ends with "ger".
- f) Display ID, EmployeeName, Designation of Employees whose salary is greater than 50000.
- g) Display ID, Employee Name, Salary of all Employees in readable format.
- h) Update salary of Employee having ID=05 to 75000.

**Q5)** Solve the following: (Any 2)

**[2×3=6]**

- a) Explain Monitoring at Server.
- b) Explain Delete Commands.
- c) Explain Partial Indexes.

