Reg. No. : ....

Name : ....

IV Semester M.C.A. (Including Lateral Entry Stream) Degree
(C.B.S.S. – Reg./Supple./ Imp.) Examination, May 2020
(2014 Admission Onwards)
MCA 4C19 : ADVANCED JAVA PROGRAMMING

Time : 3 Hours

Max. Marks : 80

SECTION – A

Answer **any ten** questions. **Each** question carries **three** marks.

(10×3=30)

1. What are functionalities of Servlets in CGI technology ?

2. How to handle exceptions thrown by application with another Servlets ?

3. What is the basic principles of RMI architecture ?

4. Compare and contrast between the Serialization and Deserialization.

5. What is a Naming Service ?

6. What are the functionalities of LDAP in a directory service ?

7. List out the various steps involved in the creation of stateless EJB.

8. What is stateful session bean ?

9. What are the merits of JSP explicit objects ?

10. How to avoid direct access of JSP pages from client browser ?

11. How to disable java code or scripting in JSP page ?

12. What are Scriptlet, Expression and Declaration in JSP ?

SECTION – B

Answer **all** questions. **Each** question carries **ten** marks. (5×10=50)

13. a) i) Explain the structure of a Servlet program with a Servlet template. 5

    ii) List and explain methods involved in the Servlet life cycle. 5

OR

  b) Explain the steps in detail involved in sending the Cookies to the client. 10

14. a) What are the classes in Java used in object serialization ? Describe how object serialization can be used in RMI. 10

OR

  b) Create a client/server application using RMI in Java to perform remote calculations. 10

15. a) Briefly explain components of JNDI with a neat diagram. 10

OR

  b) What is the core interface of JNDI ? Explain the difference between JNDI lookup and search. 10

16. a) i) List the differences between stateless session bean and stateful session bean. 5

    ii) Explain any four annotations used in EJB along with their meaning. 5

OR

  b) Demonstrate a program to implement an Entity bean. 10

17. a) With an example, describe the various tags available in JSP. 10

OR

  b) i) Briefly explain JSP implicit objects. 5

    ii) Discuss briefly JSP application development. 5