

Total No. of Questions : 10]

SEAT No. :

P2331

[Total No. of Pages : 2

[5254]-666

B.E. (Computer Engineering)
ADVANCED COMPUTER PROGRAMMING
(2012 Pattern) (Elective - I)

Time : 2½ Hours]

[Max. Marks : 70

Instructions to the candidates:

- 1) *All questions are compulsory.*
- 2) *Figures to the right indicate full marks.*

- Q1)** a) Explain with example a message - passing services in distributed programming. [5]
b) Explain simple lock and distributed lock using time stamps. [5]

OR

- Q2)** a) Write short note on: [5]
i) A single - copy distributed shared memory.
ii) A multi-copy distributed shared memory.
b) What is bounded buffer? How semaphores are useful in bounded buffer. [5]

- Q3)** a) Explain with examples autoboxing and unboxing. Where and how Java reflection API is used. [5]
b) What are the difference between HashMap and Hashtable? Also brief on Java utility classes. [5]

OR

- Q4)** a) Why list - Iterator has added () method but Iterator doesn't What is the difference between list and set in Java. [5]
b) What is Navigable map in Java? What is the benefit over map? [5]

- Q5)** a) Explain the use of services in cloud based environment. [9]
b) Write a short notes on: [8]
i) RMI
ii) Soap
iii) Servlet
iv) EJB

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OR

- Q6)** a) Explain in detail Java message service and what are the advantages of JMS? [9]
b) Write a short note on HTML and Java script programming. [8]
- Q7)** a) Explain with example the implementation of JDBC processes with mongo DB. [8]
b) Write a short note on tag based approach in web programming. [8]

OR

- Q8)** a) Write a short note on SNA. Also Write the difference between parallel & distributed systems. [8]
b) i) What are the advantages of Hadoop over RDBMS.
ii) Write short notes on:
A) HDFS Daemons.
B) Hadoop YARN. [8]
- Q9)** a) Explain the execution modes of pig Also explain word count example using pig. [8]
b) Explain searching and sorting examples in hadoop using Map Reduce. [9]

OR

- Q10)** a) Write a short notes on: [8]
i) Map Reduce Daemons.
ii) Concept of mapper.
iii) Reducer
iv) Combiner
b) Explain with examples data types and complex data types in pig. [9]

