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BICS-035

01832

DIPLOMA IN COMPUTER SCIENCE AND ENGINEERING (BTCSVI)

Term-End Examination

December, 2011

BICS-035 : JAVA BASIC AND OBJECT MODELING DESIGN

Time : 2 hours *Maximum Marks : 70*

Note : *Attempt **any five** questions. Question No.1 is compulsory.*

1. (a) What is the Acronym of OOP ? **7x2=14**

(i) Object oriented programming.

(ii) Object orientation programming.

(iii) Object oriented program.

(iv) None of above.

(b) _____ literal are enclosed in single quotes. Fill the blank from any one of following.

(i) String (ii) Character

(iii) Boolean (iv) Integer

(c) A class is denoted by :

(i) Rectangle (ii) Oval

(iii) Circle (iv) None of above

(d) Which of the following diagram's is used for dynamic modelling ?

(i) Class (ii) Object

(iii) Use case (iv) Interaction

(e) Polymorphism can be described as :

(i) Hiding many different implementation behind one Interface.

(ii) Inheritance

(iii) Aggregation and Association

(iv) Generalization

(f) Dynamic modelling support only state event (True/False)

(g) Functional modelling is represented with E-R diagram (True/False).

2. (a) Identify the characteristics of OOP.

(b) Describe the following **7x2=14**

(i) Exception handling

(ii) Runtime exception

(iii) I/O Exception

3. (a) What is an Interface ? What is the syntax for creating an Interface and explain.

(b) Explain the some basic Java libraries with an example. **7x2=14**

4. (a) Define object, class, link and associations.

(b) What is Inheritance ? Explain different type of Inheritance. **7x2=14**

5. (a) Define UML. What are the major features of UML ?

(b) Briefly explain, state diagram of UML by taking one example. **7x2=14**

6. (a) Define use case diagram. What is the difference between sequence and collaboration diagram ?

(b) What are the difference between generalization and specialization with an example ? **7x2=14**

7. (a) Define Dynamic and Functional Modelling with example.

(b) Define object diagram and component diagram with example. **7x2=14**

8. Write short note on the following (***any four***) : **3.5x4=14**

(a) Advantage of Java.

(b) Meta data.

(c) Candidate Key.

(d) Deployment Diagram.

(e) State chart diagram.

(f) Activity diagram.