

Total No. of Questions :12]

SEAT No. :

P2948

[Total No. of Pages :3

[4958] - 186

T. E. (Computer Engg.)

PRINCIPLES OF PROGRAMMING LANGUAGES

(Semester - II) (2008 Pattern)

Time : 3 Hours]

[Max. Marks :100

Instructions to the candidates:

- 1) *Answer the Q.1 OR Q.2 and Q.3 OR Q.4 and Q.5 OR Q.6 and Q.7 OR Q.8. Q.9 OR Q.10, Q.11 OR Q.12.*
- 2) *Neat diagram must be drawn whenever necessary.*
- 3) *Figures to the right side indicate full marks.*
- 4) *Assume suitable data if necessary.*

SECTION - I

Q1) a) What are characteristics of good programming language? **[8]**

b) Explain role of programming languages? **[8]**

OR

Q2) a) Explain with examples different parameter passing methods. **[8]**

b) What is type checking and binding and binding times. **[8]**

Q3) a) What are desirable and undesirable characteristics of procedural programming. **[8]**

b) What are the design principles of procedure programming. **[8]**

OR

P.T.O.

Q4) a) Explain the structure of program in PASCAL. [8]

b) Explain procedures and functions with example in PASCAL. [8]

Q5) a) Explain access specifies in Java with examples. [8]

b) What is Applet life cycle of applet. [10]

OR

Q6) a) What is exception and explain with example the types of exception. [8]

b) What is JDBC and JDBC drivers? Write simple program to display records from database. [10]

SECTION - II

Q7) a) Explain the inheritance, interface and sealed class in C#. [8]

b) Describe the structure of C# program. [8]

OR

Q8) a) Draw and explain various component of NET framework. [8]

b) Explain delegates and event handlers in C#. [8]

Q9) a) Explain backtracking and searching techniques. [8]

b) Explain resolution and unification with examples. [8]

OR

- Q10)a)** i) Explain fact, rule and goal statements. [8]
ii) What is cut operator in PROLOG?
- b) Explain applications of logic programming. [8]

- Q11)a)** What is ambiguity, free and bound identifiers, reductions in lambda calculus. [8]
- b) Explain the list manipulation functions. [10]

OR

- Q12)a)** What are different applications of Functional Programming? [10]
- b) Write a program to calculate factorial in LISP. [8]
- i) with loop
- ii) without loop (recursion)

