



- Notes :
1. All questions are compulsory and carry equal marks.
 2. Draw a neat and labelled diagram wherever necessary.
 3. Avoid vague answers.

Either:

1. a) What is control structures? Explain any one of them using suitable example. 4
- b) Explain function prototyping in detail. 4

OR

- c) Design Inline function for add and multiply of two integers numbers. 4
- d) Explain the following. 4
 - i) Call by Reference.
 - ii) Call by Value

Either:

2. a) Explain the characteristics of OOP in detail. 4
- b) Explain the following. 4
 - i) Data Members.
 - ii) Member function.

OR

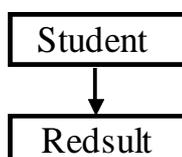
- c) Explain Arrays within class in detail. 4
- d) Design a class "Employee" with appropriate members to demonstrate array of object. 4

Either:

3. a) Explain the multiple constructors in a class in detail. 4
- b) Explain Unary and Binary operator overloading in detail. 4

OR

- c) Write a program to single inheritance for following structure. Student class (rollno., sub1, sub2) and Result Class (total, avg.) 4



- d) Explain Destructor in Derived classes in detail. 4

Either:

4. a) Explain the concept of Painter to objects in detail. 4
b) Explain Virtual function in detail using suitable example. 4

OR

- c) Explain the following. 4
i) 'New' operators
ii) 'Delete' operators
d) Explain Random Access of file in detail . 4
5. Solve all the questions.
- a) Write a short note on Manipulators. 2
b) Define class and sub class in detail. 2
c) Write a rules for operator overloading. 2
d) Explain the command line arguments in brief. 2
