

EC6301-OBJECT ORIENTED PROGRAMMING AND DATA STRUCTURES

2Mark Questions with Answers

UNIT-II

INHERITANCE and POLYMORPHISM

1. What is a virtual base class?

When a class is declared as virtual C++ takes care to see that only copy of that class is inherited, regardless of how many inheritance paths exist between the virtual base class and a derived class.

2. What is the difference between base class and derived class?

The biggest difference between the base class and the derived class is that the derived class contains the data members of both the base and its own data members. The other difference is based on the visibility modes of the data members.

3. What are the rules governing the declaration of a class of multiple inheritance?

More than one class name should be specified after the : symbol.

Visibility modes must be taken care of.

If several inheritance paths are employed for a single derived class the base class must be appropriately declared

4. Mention the types of inheritance

- Single inheritance.
- Multiple inheritance.
- Hierarchical inheritance.
- Multilevel inheritance.
- Hybrid inheritance.

5. Define dynamic binding.

Dynamic binding means that the code associated with a given procedure call is not known until the time of the call at run-time.

6. What do you mean by pure virtual functions?

A pure virtual function is a function declared in a base class that has no definition relative to the base class. In such cases, the compiler requires each derived class to either define the function or redeclare it as a pure virtual function. A class containing pure virtual functions cannot be used to declare any objects of its own.