**Day 2**

**Inheritance:** Inheritance is use to inherits the properties and behaviour of old class to new class.

To achieve inheritance in java we need to use extends.

class OldClass { super class or base class or parent class

property

behaviour

}

class newClass extends OldClass{ sub class or child class or derived class.

property

behaviour

}

Type of inheritance

1. Single inheritance : one super class and one sub class

Class A {}

Class B extends A{}

1. Multilevel inheritance : one super class and n number of sub classes connected one by one

Class A {}

Class B extends A {}

Class C extends B{}

1. Hierarchical inheritance : one super class and n number of sub classes connected directly to super class

Class A {}

Class B extends A{}

Class C extends A{}

1. Multiple inheritance : more than one super class and one sub class

Class A {}

Class B {}

Class C extends A,B{} java doesn’t support this type of inheritance. Which we can achieve using interface.

Oops relationship

Manager/ Developer is a Employee

Employee has a Address

class Employee {

id,name,salary

Scanner obj = new Scanner();

Address add = new Address();

readEmp()

disEmp();

}

class Manager extends Employee{

numberOfEmp;

readMgr()

disMgr()

}

class Developer extends Employee{

projectName;

readDev()

disDev()

}

class ProjectManager extends Manager{

clientId

readPMgr();

disPmgr();

}

class Address {

city,state

Scanner obj = new Scanner();

readAdd()

disAdd();

}