

Practical No: 04

Name: Warkhade Pradip Rajendra

Class: SY IT

Roll no : 68

Title:

Write a program to demonstrate encapsulation and inheritance concept.

Source Code for Multiple Inheritance :

```
#include<iostream>
#include<string.h>

using namespace std;

class employeedata
{
    protected:
        string name,address;
        int id;
    public:
        void input1()
        {
            cout<<"Enter the name of employee :";
            getline(cin,name);
            cout<<"Enter id of the employee :";
            cin>>id;
            cout<<"Enter the address of employee:";
            cin>>address;
        }
        void display1()
        {
            cout<<"Name of employee is :"<<name<<endl;
            cout<<"Id of employee is :"<<id<<endl;
```

```

        cout<<"Address of employee is :"<<address<<endl;
    }
};

class products
{
    protected:
        string pname;
        float price;
        int pid;
    public:
        void input2()
        {
            cout<<"Enter the name of Product :";
            cin>>pname;
            cout<<"Enter the price of the product :";
            cin>>price;
            cout<<"Enter the product id :";
            cin>>pid;

        }
        void display2()
        {
            cout<<"Name of product is :"<<pname<<endl;
            cout<<"Price of the product is :"<<price<<endl;
            cout<<"Id of product is :"<<pid<<endl;

        }
};

class supplier
{
    protected:
        string sname,pname2;
        int cn;
    public:
        void input3()

```

```

    {
        cout<<"Enter the supplier name :";
        cin>>sname;
        cout<<"Enter the contact number of the supplier :";
        cin>>cn;
        cout<<"Enter the supplied product name :";
        cin>>pname2;
    }
    void display3()
    {
        cout<<"Supplier name is :"<<sname<<endl;
        cout<<"Contact number of supplier is "<<cn<<endl;
        cout<<"Supplied product name is :"<<pname2<<endl;
    }
};
class company: public employeeedata,public products,public
supplier
{
    protected:
    string cname,add2;
    int tn;
    public:
    void input4()
    {
        cout<<"Enter the name of the company:";
        cin>>cname;
        cout<<"Enter the address of the company :";
        cin>>add2;
        cout<<"Enter the total number of the employee in
the company :";
        cin>>tn;
    }
    void display4()
    {
        cout<<"Name of the company is :"<<cname<<endl;

```

```

        cout<<"Address of the company is :"<<add2<<endl;
        cout<<"Total number of employee is the company is
:"<<tn<<endl;
    }
};

int main()
{
    company a;
    a.input1();
    a.input2();
    a.input3();
    a.input4();
    a.display1();
    a.display2();
    a.display3();
    a.display4();
    return 0;
}

```

Output :

Enter the name of employee :pradip
 Enter id of the employee :1
 Enter the address of employee:jalna
 Enter the name of Product :bat
 Enter the price of the product :200
 Enter the product id :2
 Enter the supplier name :tata
 Enter the contact number of the supplier :909634
 Enter the supplied product name :book
 Enter the name of the company:tatatrust
 Enter the address of the company :kopergaon
 Enter the total number of the employee in the company :100
 Name of employee is :pradip

Id of employee is :1
Address of employee is :jalna
Name of product is :bat
Price of the product is :200
Id of product is :2
Supplier name is :tata
Contact number of supplier is 909634
Supplied product name is :book
Name of the company is :tatatruster
Address of the company is :kopergaon
Total number of employee is the company is :100

End