**package** bean;

**public** **class** Product {

**private** **int** id;

**private** String name;

**private** **int** price;

**public** Product(**int** id, String name, **int** price) {

**super**();

**this**.id = id;

**this**.name = name;

**this**.price = price;

}

**public** **int** getId() {

**return** id;

}

**public** **void** setId(**int** id) {

**this**.id = id;

}

**public** String getName() {

**return** name;

}

**public** **void** setName(String name) {

**this**.name = name;

}

**public** **int** getPrice() {

**return** price;

}

**public** **void** setPrice(**int** price) {

**this**.price = price;

}

**public** Product() {

}

@Override

**public** String toString() {

**return** "Product [id=" + id + ", name=" + name + ", price=" + price + "]";

}

}

**package** com.service;

**import** bean.Product;

**import** java.util.ArrayList;

**import** java.util.Arrays;

**import** java.util.Scanner;

**public** **class** ProductMethod {

**public** **static** **int** *id*;

**public** String name;

**public** **int** price;

**int** size;

Product[] product=**new** Product[10];

Scanner sc=**new** Scanner(System.***in***);

ArrayList<Product >p=**new** ArrayList<Product>();

**public** **void** add(**int** id,String name,**int** price)

{

p.add(**new** Product(id,name,price));

}

**public** **void** update(**int** num,**int** price)

{

**for**(**int** i=0;i<p.size();i++)

{

Product pp=p.get(i);

**if**(pp.getId()==num)

{

pp.setPrice(price);

}

}

}

**public** **void** delete(**int** id)

{

**for**(Product pp:p)

{

**if**(pp.getId()==id)

{

p.remove(pp);

**break**;

}

}

}**public** ArrayList display()

{

**return** p;

}

**public** **int** retrieve(**int** id)

{

**int** t=0;

**for**(Product pp:p)

{

**if**(pp.getId()==id)

{

t=pp.getPrice();

}

}

**return** t;

}

}

**package** ProductApp;

**import** java.util.ArrayList;

**import** java.util.Collections;

**import** java.util.Scanner;

**import** com.service.\*;

**import** bean.Product;

**public** **class** ProductApp {

**public** **static** **void** main(String[] args) {

Scanner sc=**new** Scanner(System.***in***);

**int** ch,size;

**int** id;

String name;

**int** price;

**int** n;

**boolean** flag=**true**;

System.***out***.println("Enter the number of products you have");

size=sc.nextInt();

ProductMethod pt=**new** ProductMethod();

ArrayList<Product >p=**new** ArrayList<Product>();

**do**

{

System.***out***.println("Enter your option:");

System.***out***.println("1> Add");

System.***out***.println("2> update");

System.***out***.println("3> delete");

System.***out***.println("4> display");

System.***out***.println("5> retrive");

ch=sc.nextInt();

**switch** (ch)

{

**case** 1:

System.***out***.println("1> Add");

**for**(**int** i=0;i<size;i++)

{

System.***out***.println("Enter the pid's");

id=sc.nextInt();

System.***out***.println("Enter the pname");

sc.nextLine();

name=sc.nextLine();

System.***out***.println("Enter the price");

price=sc.nextInt();

pt.add(id, name, price);

System.***out***.println();

}

**break**;

**case** 2:

System.***out***.println("2> update");

System.***out***.println("Enter the pid");

sc.nextLine();

id=sc.nextInt();

System.***out***.println("Enter the price");

price=sc.nextInt();

pt.update(id, price);

System.***out***.println();

**break**;

**case** 3:

System.***out***.println("3> delete");

System.***out***.println("Enter the pid's");

id=sc.nextInt();

pt.delete(id);

System.***out***.println(" The pid'sdeleted" +id);

**break**;

**case** 4:

System.***out***.println("4> display");

p=productm.display();

**for**(Product a:p)

{

System.***out***.println("id and Name and price " +a);

}

**break**;

**case** 5:

System.***out***.println("5> retrive");

System.***out***.println("Enter the pid's");

id=sc.nextInt();

**int** temp=pt.retrieve(id);

System.***out***.println(" The price's"+temp);

**break**;

**default**:

System.***out***.println("Invalid option:");

**break**;

}

}**while**(flag);

}

}