**EMPLOYEE MANAGEMENT SYSTEM**

**package** com.Employee1;

**import** java.io.File;

**import** java.io.FileInputStream;

**import** java.io.FileOutputStream;

**import** java.io.IOException;

**import** java.io.ObjectInputStream;

**import** java.io.ObjectOutputStream;

**import** java.io.Serializable;

**import** java.util.ArrayList;

**import** java.util.Scanner;

@SuppressWarnings("serial")

**class** Employee **implements** Serializable{

**int** id;

String name;

**float** salary;

**long** contact\_no;

String email\_id;

**public** Employee(**int** id, String name, **float** salary, **long** contact\_no, String email\_id)

{

**this**.id = id;

**this**.name = name;

**this**.salary = salary;

**this**.contact\_no = contact\_no;

**this**.email\_id = email\_id;

}

**public** String toString()

{

**return** "\nEmployee Details :" + "\nID: " + **this**.id + "\nName: " + **this**.name + "\nSalary: " +

**this**.salary + "\nContact No: " + **this**.contact\_no + "\nEmail-id: " + **this**.email\_id;

}

}

**public** **class** EmployeeManagement

{

**static** **void** display(ArrayList<Employee> al)

{

System.***out***.println("\n--------------Employee List---------------\n");

System.***out***.println(String.*format*("%-10s%-15s%-10s%-20s%-10s", "ID","Name","salary","contact-no","Email-Id"));

**for**(Employee e : al)

{

System.***out***.println(String.*format*("%-5s%-20s%-10s%-15s%-10s",e.id,e.name,e.salary,e.contact\_no,e.email\_id));

}

}

@SuppressWarnings("unchecked")

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

{

**int** id;

String name;

**float** salary;

**long** contact\_no;

String email\_id;

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

ArrayList<Employee> al = **new** ArrayList<Employee>();

File f = **null**;

FileInputStream fis = **null**;

ObjectInputStream ois = **null**;

FileOutputStream fos = **null**;

ObjectOutputStream oos =**null**;

**try**{

f = **new** File("N:/Java Work Space/Eclipse Programs/Employee Management Tool/src/EmployeeDataList1.txt");

**if**(f.exists())

{

fis = **new** FileInputStream(f);

ois = **new** ObjectInputStream(fis);

al = (ArrayList<Employee>)ois.readObject();

}

}

**catch**(Exception exp){

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

}

**do**

{

System.***out***.println("\n\*\*\*\*\*\*\*\*\*Welcome to the Employee Management System\*\*\*\*\*\*\*\*\*\*\n");

System.***out***.println("1). Add Employee to the DataBase\n" +

"2). Search for Employee\n" +

"3). Edit Employee details\n" +

"4). Delete Employee Details\n" +

"5). Display all Employees working in this company\n" +

"6). EXIT\n");

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

**int** ch = sc.nextInt();

**switch**(ch)

{

**case** 1:System.***out***.println("\nEnter the following details to ADD list:\n");

System.***out***.println("Enter ID :");

id = sc.nextInt();

System.***out***.println("Enter Name :");

name = sc.next();

System.***out***.println("Enter Salary :");

salary = sc.nextFloat();

System.***out***.println("Enter Contact No :");

contact\_no = sc.nextLong();

System.***out***.println("Enter Email-ID :");

email\_id = sc.next();

al.add(**new** Employee(id, name, salary, contact\_no, email\_id));

*display*(al);

**break**;

**case** 2: System.***out***.println("Enter the Employee ID to search :");

id = sc.nextInt();

**int** i=0;

**for**(Employee e: al)

{

**if**(id == e.id)

{

System.***out***.println(e+"\n");

i++;

}

}

**if**(i == 0)

{

System.***out***.println("\nEmployee Details are not available, Please enter a valid ID!!");

}

**break**;

**case** 3: System.***out***.println("\nEnter the Employee ID to EDIT the details");

id = sc.nextInt();

**int** j=0;

**for**(Employee e: al)

{

**if**(id == e.id)

{

j++;

**do**{

**int** ch1 =0;

System.***out***.println("\nEDIT Employee Details :\n" +

"1). Employee ID\n" +

"2). Name\n" +

"3). Salary\n" +

"4). Contact No.\n" +

"5). Email-ID\n" +

"6). GO BACK\n");

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

ch1 = sc.nextInt();

**switch**(ch1)

{

**case** 1: System.***out***.println("\nEnter new Employee ID:");

e.id =sc.nextInt();

System.***out***.println(e+"\n");

**break**;

**case** 2: System.***out***.println("Enter new Employee Name:");

e.name =sc.nextLine();

System.***out***.println(e+"\n");

**break**;

**case** 3: System.***out***.println("Enter new Employee Salary:");

e.salary =sc.nextFloat();

System.***out***.println(e+"\n");

**break**;

**case** 4: System.***out***.println("Enter new Employee Contact No. :");

e.contact\_no =sc.nextLong();

System.***out***.println(e+"\n");

**break**;

**case** 5: System.***out***.println("Enter new Employee Email-ID :");

e.email\_id =sc.next();

System.***out***.println(e+"\n");

**break**;

**case** 6: j++;

**break**;

**default** : System.***out***.println("\nEnter a correct choice from the List :");

**break**;

}

}

**while**(j==1);

}

}

**if**(j == 0)

{

System.***out***.println("\nEmployee Details are not available, Please enter a valid ID!!");

}

**break**;

**case** 4: System.***out***.println("\nEnter Employee ID to DELETE from the Databse :");

id = sc.nextInt();

**int** k=0;

**try**{

**for**(Employee e: al)

{

**if**(id == e.id)

{

al.remove(e);

*display*(al);

k++;

}

}

**if**(k == 0)

{

System.***out***.println("\nEmployee Details are not available, Please enter a valid ID!!");

}

}

**catch**(Exception ex){

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

}

**break**;

**case** 5: **try** {

al = (ArrayList<Employee>)ois.readObject();

} **catch** (ClassNotFoundException e2) {

System.***out***.println(e2);

} **catch** (Exception e2) {

System.***out***.println(e2);

}

*display*(al);

**break**;

**case** 6: **try** {

fos = **new** FileOutputStream(f);

oos = **new** ObjectOutputStream(fos);

oos.writeObject(al);

} **catch** (IOException e1) {

e1.printStackTrace();

}

**catch**(Exception e2){

e2.printStackTrace();

}

**finally**{

**try** {

fis.close();

ois.close();

fos.close();

oos.close();

} **catch** (Exception e1) {

e1.printStackTrace();

}

}

System.***out***.println("\nYou have chosen EXIT !! Saving Files and closing the tool.");

sc.close();

System.*exit*(0);

**break**;

**default** : System.***out***.println("\nEnter a correct choice from the List :");

**break**;

}

}

**while**(**true**);

}

}