GENERIC

1st question:-

public class Employee {

String name;

int id;

double sal;

String departments;

public Employee(String name, int id, double sal, String departments) {

super();

this.name = name;

this.id = id;

this.sal = sal;

this.departments = departments;

}

@Override

public String toString() {

return "Employee [name=" + name + ", id=" + id + ", sal=" + sal + ", departments=" + departments + "]";

}

}

package generics;

import java.util.HashSet;

public class Company {

public static void main(String[] args) {

HashSet <Employee> h = new HashSet <>();

h.add(new Employee ("Santhi",123,20000,"Development"));

h.add(new Employee ("Nireekshan",456,20000,"Development"));

h.add(new Employee ("Raju",789,20000,"Development"));

Company.printHashSet(h);

}

private static void printHashSet(HashSet<Employee> h) {

for(Employee temp:h) {

System.out.println(temp);

}

}

}

2ND question:-

import java.util.HashMap;

public class Kirtk {

public static void main(String[] args)

{

HashMap<Integer, Double> map = new HashMap<>();

map.put(10, 110.0d);

map.put(20, 304.0d);

map.put(30, 209.0d);

map.put(40, 105.0d);

map.put(50, 301.0d);

map.put(60, 250.0d);

map.put(70, 140.0d);

map.put(80, 303.0d);

map.put(90, 200.0d);

map.put(100,12.0d);

System.out.println("Size of map is:- "

+ map.size());

System.out.println(map);

}

}

**3rd question:-**

import java.util.ArrayList;

import java.util.Arrays;

import java.util.Collections;

import java.util.List;

public class Kirtk {

public static final <T> void swap (T[] a, int i, int j) {

T t = a[i];

a[i] = a[j];

a[j] = t;

}

public static final <T> void swap (List<T> l, int i, int j) {

Collections.<T>swap(l, i, j);

}

private static void test() {

String [] a = {"Hello", "Goodbye"};

swap(a, 0, 1);

System.out.println("a:"+Arrays.toString(a));

List<String> l = new ArrayList<String>(Arrays.asList(a));

swap(l, 0, 1);

System.out.println("l:"+l);

}

public static void main(String...args)

{

test();

}

}

**4rd question:-**

package kk.com.gen;

public class Pair<K, V> {

private K key;

private V value;

public Pair(K key, V value) {

super();

this.key = key;

this.value = value;

}

public void setKey(K key) {

this.key = key;

}

public void setValue(V value) {

this.value = value;

}

public String toString() {

return key+" "+value ;

}

public static void main(String [] args) {

Pair<String,String> kv=new Pair<String,String>(String.valueOf("100"),"kirti");

System.out.println(kv);

Pair<String,String> kv1=new Pair<String,String>(String.valueOf("200"),"atharva");

System.out.println(kv1);

Pair<String,java.util.Date> p =new Pair <String,java.util.Date>("100", new java.util.Date());;

System.out.println(p);

}

}