**//Program to count number of words in a string.**

**public** **class** CountWords {

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

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

String s;

System.***out***.println("Enter a string");

s=sc.nextLine();

String name[]=s.split("\\s");//to split string at spaces

System.***out***.println("No. of words :"+name.length);

}

}

**//Program to print initials of a name**

**public** **class** PrintInitials {

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

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

String s;

System.***out***.println("Enter full name");

s=sc.nextLine();

String name[]=s.split("\\s");

**for**(String r:name)

{

System.***out***.print(r.charAt(0)+".");

}

}

}

**//Program to count number of alphabets, numbers and special symbols in a string**

**public** **class** AlphabetNumberCount {

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

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

String s;

**char** c;

**int** ac=0,nc=0,sct=0;

System.***out***.println("Enter a string");

s=sc.next();

**for**(**int** i=0;i<s.length();i++)

{

c=s.charAt(i);

**if**(Character.*isAlphabetic*(c))

ac++;

**else** **if**(Character.*isDigit*(c))

nc++;

**else**

sct++;

}

System.***out***.println("Number of alphabets :"+ac);

System.***out***.println("Number of digits :"+nc);

System.***out***.println("Number of special characters :"+sct);

}

}

**//Program to find second minimum element in array**

**public** **class** SecondMin {

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

**int** ar[]=**new** **int**[5];

**int** i,min2;

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

System.***out***.println("Enter 5 ele");

**for**( i=0;i<5;i++)

ar[i]=sc.nextInt();

**int** min=ar[0];//Integer.MAX\_VALUE;

min2=ar[0];//Integer.MAX\_VALUE;

**for**( i=1;i<5;i++)

{

**if**(ar[i]<min)

{

min2=min;

min=ar[i];

}

**else** **if**((ar[i]< min2)|| (min==min2))

min2=ar[i];

}

System.***out***.println("min :"+min);

System.***out***.println("second min ele :"+min2);

}

}

**//Program to count number of lines,words and characters in a file**

**public** **class** CharCount {

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

{

BufferedReader reader = **null**;

//Initializing charCount, wordCount and lineCount to 0

**int** charCount = 0;

**int** wordCount = 0;

**int** lineCount = 0;

**try**

{

//Creating BufferedReader object

reader = **new** BufferedReader(**new** FileReader("e:/test.txt"));

//Reading the first line into currentLine

String currentLine = reader.readLine();

**while** (currentLine != **null**)

{

//Updating the lineCount

lineCount++;

//Getting number of words in currentLine

String[] words = currentLine.split(" ");

//Updating the wordCount

wordCount = wordCount + words.length;

//Iterating each word

**for** (String word : words)

{

//Updating the charCount

charCount = charCount + word.length();

}

//Reading next line into currentLine

currentLine = reader.readLine();

}

//Printing charCount, wordCount and lineCount

System.***out***.println("Number Of Chars In A File : "+charCount);

System.***out***.println("Number Of Words In A File : "+wordCount);

System.***out***.println("Number Of Lines In A File : "+lineCount);

}

**catch** (IOException e)

{

e.printStackTrace();

}

**finally**

{

**try**

{

reader.close(); //Closing the reader

}

**catch** (IOException e)

{

e.printStackTrace();

}

}

}

}

**//Program to search a word in a file**

**public** **class** WordSearch {

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

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

String str,a;

**boolean** b=**false**;

//File file = new File("e:/test.txt");

FileReader file = **new** FileReader("e:/test.txt");

Scanner s=**new** Scanner(file);

System.***out***.println("enter string to be searched");

str=sc.next();

**while**(s.hasNext())

{

**if**(str.equals(s.next()))

{

System.***out***.println( str +" is present in file");

b=**true**;

**break**;

}

}

**if**(b==**false**)

System.***out***.println( str +" not present in file");

}

}

**//Program to convert an array to ArrayList**

**public** **class** ArrayToList {

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

Integer ar[]={10,29,30,20};//array should be of class type ,not of primitive type

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

Collections.*addAll*(al,ar);

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

al.add(27);

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

String[] geeks = {"Rahul", "Utkarsh",

"Shubham", "Neelam"};

List<String> al2 = **new** ArrayList<String>();

// adding elements of array to arrayList.

Collections.*addAll*(al2, geeks);

System.***out***.println(al2);

}

}

**//Program to convert ArrayList to an array**

**public** **class** ListToArray {

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

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

al.add(12);

al.add(23);

al.add(34);

//Method 1

Object ar[]=al.toArray();

**for**(Object r:ar)

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

//Method 2

Integer arr[]=**new** Integer[5];

al.toArray(arr);

**for**(Integer r:arr)

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

arr[3]=23;

arr[4]=90;

**for**(Integer r:arr)

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

}

}

**//Program to convert ArrayList to Set to remove duplicates**

**public** **class** ListToSet {

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

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

al.add(12);

al.add(23);

al.add(22);

al.add(11);

al.add(12);

System.***out***.println("ArrayList :"+al);

LinkedHashSet<Integer> hs=**new** LinkedHashSet<Integer>(al);

System.***out***.println("Set :"+hs);

}

}

**//Program for substring**

**public** **class** subString {

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

String s1="welcome";

System.***out***.println(s1.substring(6));//e

System.***out***.println(s1.substring(7));//no character returned

System.***out***.println(s1.substring(7,7));//no character returned

System.***out***.println(s1.substring(4,4));//no character returned

System.***out***.println(s1.substring(7,4));//java.lang.StringIndexOutOfBoundsException: String index out of range: -3

}

}

//counting occurence of every character in a string

**public** **class** CharCountClass {

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

String s;

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

System.***out***.println("Enter a string");

s=sc.nextLine();

TreeMap<Character,Integer> hm=**new** TreeMap<Character,Integer>();

**char** c[]=s.toCharArray();

//char ch;

**for**(**char** r:c)

{

**if**(hm.containsKey(r))

{

hm.put(r,hm.get(r)+1);

}

**else**

{

hm.put(r,1);

}

}

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

}