

/*1.WJA to accept two no.'s , calculate and display its sum and average value. */

```
import java.util.Scanner;

class SumAverage{

    public static void main(String args[]){

        Scanner A=new Scanner(System.in);

        System.out.print("Enter first No. :");

        double num1=A.nextDouble();

        System.out.print("Enter second No. :");

        double num2=A.nextDouble();

        double sum=num1+num2;

        double avg=sum/2.0;

        System.out.println("Sum of two no.'s="+sum);

        System.out.println("Average of two no.'s="+avg);

    }//Close of main

//Close of class
```

/*2.WJA to two no.'s , calculate and display its product and difference value. */

```
import java.util.Scanner;

class ProductDifference{

    public static void main(String args[]){

        Scanner B=new Scanner(System.in);

        System.out.print("Enter first No. :");

        double num1=B.nextDouble();
```

```

System.out.print("Enter second No. :");

double num2=B.nextDouble();

double prod=num1*num2;

double sub=num1-num2;

System.out.println("Product of two no.'s="+prod);

System.out.println("Difference of two no.'s="+sub);

} //Close of main

} //Close of class

```

/*3.WJA to accept marks obtained in languages C, C++, Java. Calculate and print the total marks obtained in languages as well as percentage as of each language is of 200 marks.

= = = = MARKSHEET = = = =

Marks Obtained in C :.....

Marks Obtained in C++ :.....

Marks Obtained in Java :.....

= = = = =

Total Marks Obtained :.....

Aggregate :.....% */

```

import java.util.Scanner;

class Marksheet{

public static void main(String args[]){

Scanner C=new Scanner(System.in);

System.out.print("Enter marks of language C :");

```

```

double c=C.nextDouble();

System.out.print("Enter marks of language C++ :");

double cpp=C.nextDouble();

System.out.print("Enter marks of language Java :");

double java=C.nextDouble();

double tot=c+cpp+java;

double percent=tot/600*100;

System.out.println("===== MARKSHEET =====");

System.out.println("Marks Obtained in language C :"+c);

System.out.println("Marks Obtained in language C++ :"+cpp);

System.out.println("Marks Obtained in language Java :"+java);

System.out.println("=====");

System.out.println("Total Marks Obtained :"+tot);

System.out.println("Aggregate \t\t:"+percent+"%");

} //Close of main

} //Close of class

```

/*4.WJA to accept radius of a circle. Calculate and print the area of circle using formula $\text{area} = \pi * r * r$. */

```

import java.util.Scanner;

class CircleArea{

public static void main(String args[]){

Scanner D=new Scanner(System.in);

final double pi=22.0/7.0;

System.out.print("Enter radius of a circle :");

```

```
double rad=D.nextDouble();

double area=pi*rad*rad;

System.out.println("Area of given Circle= "+area);

//Close of main

//Close of class
```

**/*5.WJA to accept radius of a cicle. Calculate and print the Circumference of circle using formula [Circumference=2*pi*r].
*/**

```
import java.util.Scanner;

class CircleCircumference{

public static void main(String args[]){

Scanner E=new Scanner(System.in);

final double pi=22.0/7.0;

System.out.print("Enter radius of a circle :");

double rad=E.nextDouble();

double circumference=2*pi*rad;

System.out.println("Circumference of given Circle= "+circumference);

//Close of main

//Close of class
```

/*6.WJA to accept temperature in fahrenheit. Convert the given temperature in equivalent Celcius using formula:-

$$[C=5/9(F-32)] \quad */$$

```
import java.util.Scanner;
```

```

class FahrenheitToCelcius{

public static void main(String args[]){

Scanner F=new Scanner(System.in);

System.out.print("Enter temperature in Fahrenheit :");

double fah=F.nextDouble();

double cel=5.0/9.0*(fah-32);

System.out.println("Equivalent temperature in Celcius= "+cel);

} //Close of main

} //Close of class

```

/*7.WJA to accept temperature in Celcius. Convert the given temperature in equivalent Fahrenheit using formula:-

$$[F=9/5C+32] \quad */$$

```

import java.util.Scanner;

class CelciusToFahrenheit{

public static void main(String args[]){

Scanner G=new Scanner(System.in);

System.out.print("Enter temperature in Celcius :");

double cel=G.nextDouble();

double fah=9.0/5.0*cel+32;

System.out.println("Equivalent temperature in Fahrenheit= "+fah);

} //Close of main

} //Close of class

```

/*8.WJA to accept base and height of a right-angled triangle. Calculate and print the area of given right-angled triangle using formula:-

[area=1/2*base*height]. */

```
import java.util.Scanner;

class RightAngledTriangleArea{

public static void main(String args[]){

Scanner H=new Scanner(System.in);

System.out.print("Enter the base of right-angled triangle :");

double base=H.nextDouble();

System.out.print("Enter the height of right-angled triangle :");

double height=H.nextDouble();

double area=1/2.0*base*height;

System.out.println("Area of given Right-angled triangle= "+area);

} //Close of main

} //Close of class
```

/*9.WJA to accept Employee Code, Employee Name, Post/Designation and Basic Pay of the Employee. Calculate Dearness Allowance (i.e.DA) @30% of the Basic Pay. Similarly Calculate House Rent Allowance (i.e.HRA) @20% of the Basic Pay. Calculate and print the Employee Salary Details in the given format as Income Tax is to be deductected @12% of the Gross/Total Salary.

== = Employee Salary Details == = Current Date&Time.....

Employee Code :.....

Employee Name :.....

Post/Designation :.....

Basic Pay in Rs. :.....

Dearness Allowance in Rs. :.....

House Rent Allowance in Rs. :.....

=====

Gross/Total Salary in Rs. :.....

Income Tax Deduction in Rs. :.....

=====

Net Salary in Rs. :..... */

```
import java.util.*;

class EmployeeSalary{

public static void main (String args[]){

Scanner l=new Scanner(System.in);

System.out.print("Enter Employee Code :");

String ecode=l.nextLine();

System.out.print("Enter Employee Name :");

String ename=l.nextLine();

System.out.print("Enter Employee Post/Designation :");

String post=l.nextLine();

System.out.print("Enter Basic Pay of the Employee :");
```

```

double basic=l.nextDouble();

double da=basic*30/100;

double hra=basic*20/100;

double gross=basic+da+hra;

double itax=gross*12/100;

double netsal=gross-itax;

System.out.println("= = = Employee Salary Details = = = Dated :"+new Date());

System.out.println("Employee Code :"+ecode.toUpperCase());

System.out.println("Employee Name :"+ename.toUpperCase());

System.out.println("Post/Designation :"+post.toUpperCase());

System.out.println("Basic Pay in Rs. :"+basic);

System.out.println("Dearness Allowance in Rs. :"+da);

System.out.println("House Rent Allowance in Rs. :"+hra);

System.out.println("= = = = =");

System.out.println("Gross/Total Salary in Rs. :"+gross);

System.out.println("Income Tax Deduction in Rs. :"+itax);

System.out.println("= = = = =");

System.out.println("Net Salary in Rs. :"+netsal);

} //Close of main

} //Close of class

```

/*10.WJA to accept Product Code, Product Name, Company Name, Product Type, Product M.R.P. and Quantity taken. Calculate and print the Bill/Invoice on purchase of Products/Goods in the following format as 30% discount

availables on all products. Finally Customer/Consumer has to pay 1% VAT on bill payment:-

== Bill/Invoice Details == Current Date&Time ==

Product/Item Code :.....

Product/Item Name :.....

Company Name :.....

Product/Item Type :.....

M.R.P. in Rs. :.....

Quantity taken :.....

=====

Total Bill Amount in Rs. :.....

Discount Amount in Rs. :.....

=====

Payable Amount in Rs. :.....

1% VAT Amount in Rs. :.....

=====

Net Bill/Invoice Amount in Rs. :..... */

```
import java.util.*;

class Invoice{

public static void main (String args[]){

Scanner J=new Scanner(System.in);

System.out.print("Enter Product/Item Code :");
```

```
String pcode=J.nextLine();

System.out.print("Enter Product/Item Name :");

String pname=J.nextLine();

System.out.print("Enter Company Name :");

String cname=J.nextLine();

System.out.print("Enter Product/Item Type :");

String ptype=J.nextLine();

System.out.print("Enter M.R.P. in Rs. :");

double mrp=J.nextDouble();

System.out.print("Enter No. of Quantity taken :");

int quantity=J.nextInt();

double billamt=mrp*quantity;

double discount=billamt*30/100;

double payamt=billamt-discount;

double vat=payamt*1/100;

double netamt=payamt+vat;

System.out.println("== Bill/Invoice Details == Dated :"+new Date());

System.out.println("Product/Item Code :"+pcode.toUpperCase());

System.out.println("Product/Item Name :"+pname.toUpperCase());

System.out.println("Company Name :"+cname.toUpperCase());

System.out.println("Product/Item Type :"+ptype.toUpperCase());

System.out.println("M.R.P. in Rs. :"+mrp);

System.out.println("No. of Quantity taken :"+quantity);

System.out.println("=====");

System.out.println("Total Bill Amount in Rs. :"+billamt);
```

```
System.out.println("Discount Amount in Rs. :"+discount);  
  
System.out.println("=====");  
  
System.out.println("Payable Amount in Rs. :"+payamt);  
  
System.out.println("1% VAT Amount in Rs. :"+vat);  
  
System.out.println("=====");  
  
System.out.println("Net Bill/Invoice Amount in Rs. :"+netamt);  
  
}//Close of main  
  
}//Close of class
```

Java Apps on Mathematical Calculation