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***WT LAB2***

1. **WAP to find the perimeter and area of a circle given a value of radius**

import java.lang.Math;

import java.util.\*;

public class Circle

{

public static void main(String[] args)

{

double r;

Scanner sc = new Scanner(System.in);

System.out.println("Enter the radius :");

r = sc.nextDouble();

double peri = 2 \* Math.PI \*Math.pow(r,2);

double area = Math.PI \*r \*r;

System.out.println("Perimeter = "+ peri + "\n" + "Area = " +area);

}

}

**2. WAP to find the largest among three numbers x, y, and z. You should use if-then-else**

**construct in Java.**

import java.util.\*;

public class Num

{

public static void main(String[] args)

{

System.out.println("Enter three numbers :");

Scanner sc = new Scanner(System.in);

int a , b , c;

a = sc.nextInt();

b = sc.nextInt();

c = sc.nextInt();

int max = a;

if(max < b)

{

max = b;

}

if(max < c)

{

max = c;

}

System.out.println("Largest Number = " + max);

}

}

**3.WAP to calculate sum of all the numbers divisible by 3 from 0 to n. Print the sum.**

import java.util.\*;

public class NumSum

{

public static void main(String[] args)

{

System.out.println("Enter the limit :");

Scanner sc = new Scanner(System.in);

int n;

n = sc.nextInt();

int sum = 0;

for(int i = 0 ; i <= n; ++i)

{

if(i % 3 == 0)

{

sum += i;

}

}

System.out.println("Sum = "+sum);

}

}

**4. WAP to check whether the number is an Armstrong number or not.**

**Armstrong Number: A positive number is called an Armstrong number if it is equal to the sum**

**of cubes of its digits for example 153 = 13+53+33 , 370, 371, 407, etc.**

import java.util.\*;

import java.lang.Math;

class Armstrong\_Number

{

public static void main(String[] args)

{

Scanner sc = new Scanner(System.in);

System.out.println("Enter the number : ");

int n = sc.nextInt();

int rem ;

int p = n;

int sum = 0;

while(p != 0)

{

rem = p % 10;

sum += Math.pow(rem,3);

p = p/10;

}

if(sum == n)

{

System.out.println("Armstrong number");

}

else

System.out.println("Not an Armstrong number");

}

}

**5. WAP to find the highest mark and average mark secured by him in "5" number of subjects.**

import java.util.\*;

import java.lang.Math;

class marks

{

public static void main(String[] args)

{

Scanner sc = new Scanner(System.in);

int[] arr = new int[5];

int sum = 0;

System.out.println("Enter 5 elements in the array: ");

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

{

arr[i] = sc.nextInt();

}

int max = arr[0];

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

{

sum += arr[i];

if(arr[i] > max)

{

max = arr[i];

}

}

System.out.println("Max = " +max +"\n"+ "Average = " + sum/4);

}

}