

EXP 4.Program to implement method and constructor overloading

Program :

```
import java.io.*;

public class Methodov
{
    static void sum (int a,int b)
    {
        System.out.println("Sum of 2 Integers is:"+(a+b));
    }
    static void sum (int a,int b,int c)
    {
        System.out.println("Sum of 3 integers is :"+(a+b+c));
        //changing no. of parameters
    }
}
```

```

static void sum (float a,float b)
{
    System.out.println("Sum of 2 floating point no.s is:"+ (a+b));
    // changing data type of paramters
}

public static void main(int a)
{
    System.out.println("Computing square using main:"+(a*a));
    //Overloading main method
}

public Methodov(int a,int b)
{
    System.out.println("Product of 2 Integers :"+(a*b));
}

public Methodov(String x,String y,String z)
{
    System.out.println(x+" "+y+" "+z);        //Overloading constructor
}


public static void main(String args[]) throws Exception
{
    int a=100,b=900,c=890;
    float d =90,e=990;

```

```
String x="constructor",y="got",z="overloaded_here";
```

```
BufferedReader br = new BufferedReader(new  
InputStreamReader(System.in));
```

```
System.out.println("*****  
*****");
```

```
System.out.printf("\n\n");
```

```
System.out.println("Enter a no. to be squared:");
```

```
int sq = Integer.parseInt(br.readLine());
```

```
System.out.println("***This is an example of Main function getting  
overloaded***");
```

```
main(sq);
```

```
System.out.printf("\n");
```

```
System.out.println("***Function 'Sum' got overloaded here***");
```

```
sum(a,b);
```

```
System.out.printf("\n");
```

```
System.out.println("case 1: Changing no. of parameters");
```

```
sum(a,b,c);
```

```
System.out.printf("\n");
```

```
System.out.println("case 2: Changing data type of parameters");  
sum(d,e);  
System.out.printf("\n\n");
```

```
System.out.println("***This is an Example of constructor getting  
overloaded***");
```

```
Methodov cons = new Methodov (7,9);  
Methodov cons1 = new Methodov (x,y,z);  
System.out.printf("\n\n");
```

```
System.out.println("*****  
*****");
```

```
}  
  
}
```

Output :

Command Prompt

```
C:\Users\hp\Desktop\Java\Practicals code\exp 4>javac Methodov.java
```

```
C:\Users\hp\Desktop\Java\Practicals code\exp 4>java Methodov
```

```
*****
```

```
Enter a no. to be squared:
```

```
7
```

```
***This is an example of Main function getting overloaded***
```

```
Computing square using main:49
```

```
***Function 'Sum' got overloaded here***
```

```
Sum of 2 Integers is:1000
```

```
case 1: Changing no. of parameters
```

```
Sum of 3 integers is :1890
```

```
case 2: Changing data type of parameters
```

```
Sum of 2 floating point no.s is:1080.0
```

```
***This is an Example of constructor getting overloaded***
```

```
Product of 2 Integers :63
```

```
constructor got overloaded_here
```

```
*****
```