

ASSIGNMENT 1

Q1) wap to demonstrate ternary operator .define a variable marks .ask its value from user and using ternary operator check if marks > 40 store "Pass" in result variable else store "Fail".

```
package assignment1;

import java.util.*;
public class TernaryOperator1 {

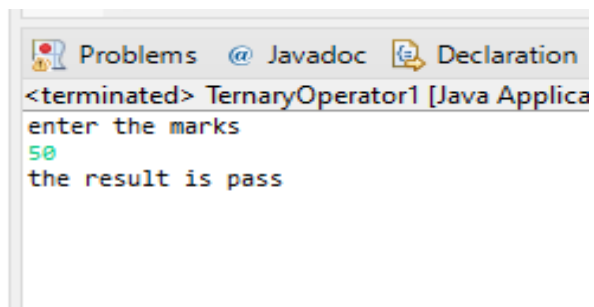
    public static void main(String[] args)
    {
        Scanner s=new Scanner(System.in);
        System.out.println("enter the marks");
        int marks=s.nextInt();

        String result=(marks>40)? "pass":"fail";
        System.out.println("the result is " +result);

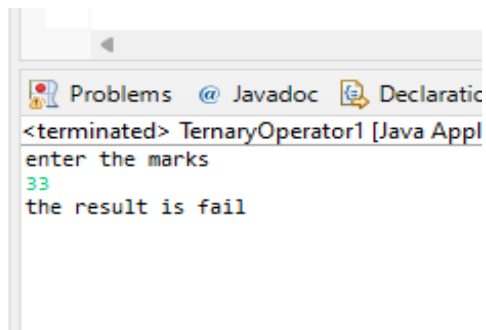
    }

}
```

output:-



The screenshot shows the output window of a Java IDE. The title bar includes 'Problems', '@ Javadoc', and 'Declaration'. The main text area displays the following output: '<terminated> TernaryOperator1 [Java Applica', 'enter the marks', '50', and 'the result is pass'. The number '50' is highlighted in green, indicating it was entered by the user.

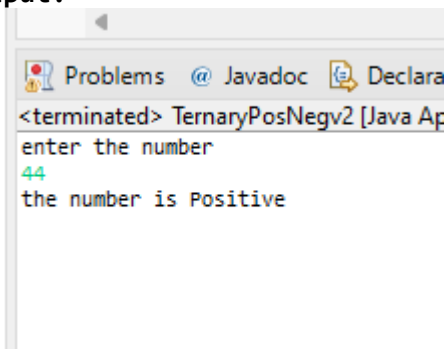


The screenshot shows the output window of a Java IDE. The title bar includes 'Problems', '@ Javadoc', and 'Declaratic'. The main text area displays the following output: '<terminated> TernaryOperator1 [Java Appl', 'enter the marks', '33', and 'the result is fail'. The number '33' is highlighted in green, indicating it was entered by the user.

Q 2) using ternary check if number entered by user is positive or negative .
In case number is positive store "Positive number" else store negative number to Result variable.

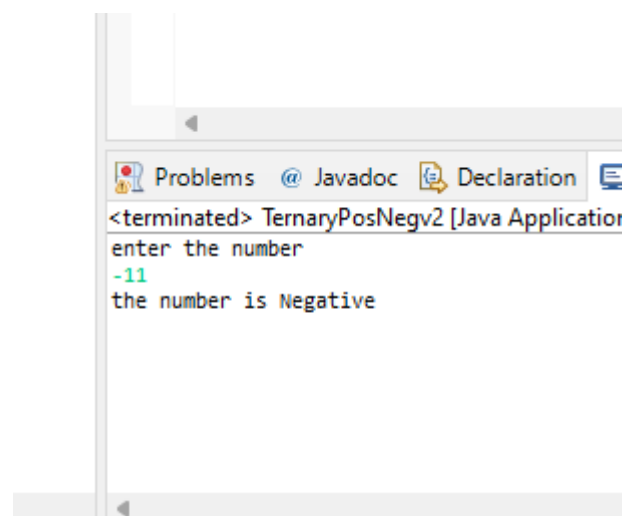
```
package assignment1;  
  
import java.util.*;  
public class TernaryPosNegv2 {  
  
    public static void main(String[] args)  
    {  
        Scanner s=new Scanner(System.in);  
        System.out.println("enter the number");  
        int num=s.nextInt();  
  
        String result=(num>0)? "Positive":"Negative";  
        System.out.println("the number is " +result);  
    }  
}
```

Output: -



The screenshot shows the output window of a Java IDE. The title bar indicates the application is terminated. The output text is as follows:

```
<terminated> TernaryPosNegv2 [Java Ap  
enter the number  
44  
the number is Positive
```



The screenshot shows the output window of a Java IDE. The title bar indicates the application is terminated. The output text is as follows:

```
<terminated> TernaryPosNegv2 [Java Application  
enter the number  
-11  
the number is Negative
```

Q 3) WAP to ask name ,age and salary of an employee and print on console.

```
package assignment1;

import java.util.*;
public class EmployeeDetails3 {

    public static void main(String[] args)
    {

        Scanner s=new Scanner(System.in);

        System.out.println("Enter The Employee Name");
        String name=s.nextLine();

        System.out.println("Enter Emoloyee Age");
        int age=s.nextInt();

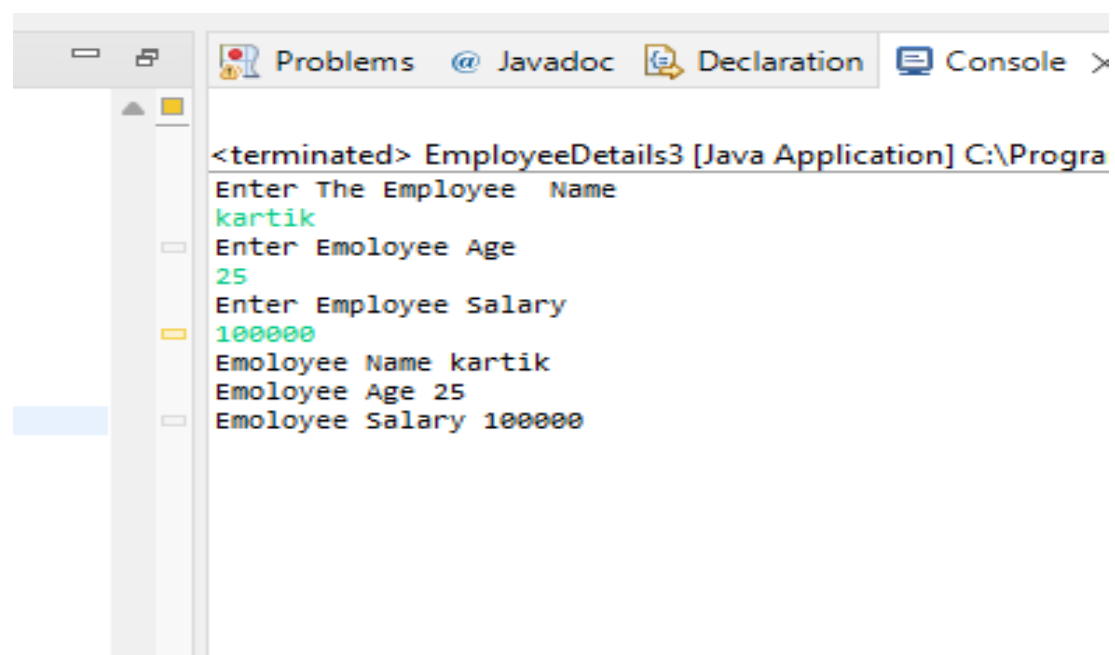
        System.out.println("Enter Employee Salary");
        int salary=s.nextInt();

        System.out.println("Emoloyee Name " +name);
        System.out.println("Emoloyee Age " +age);
        System.out.println("Emoloyee Salary " +salary);

    }

}
```

Output:-



```
<terminated> EmployeeDetails3 [Java Application] C:\Progra
Enter The Employee Name
kartik
Enter Emoloyee Age
25
Enter Employee Salary
100000
Emoloyee Name kartik
Emoloyee Age 25
Emoloyee Salary 100000
```

Q 4) wap that ask two numbers from user and print greater number among two

```
package assignment1;

import java.util.*;
public class GreaterNumber4 {

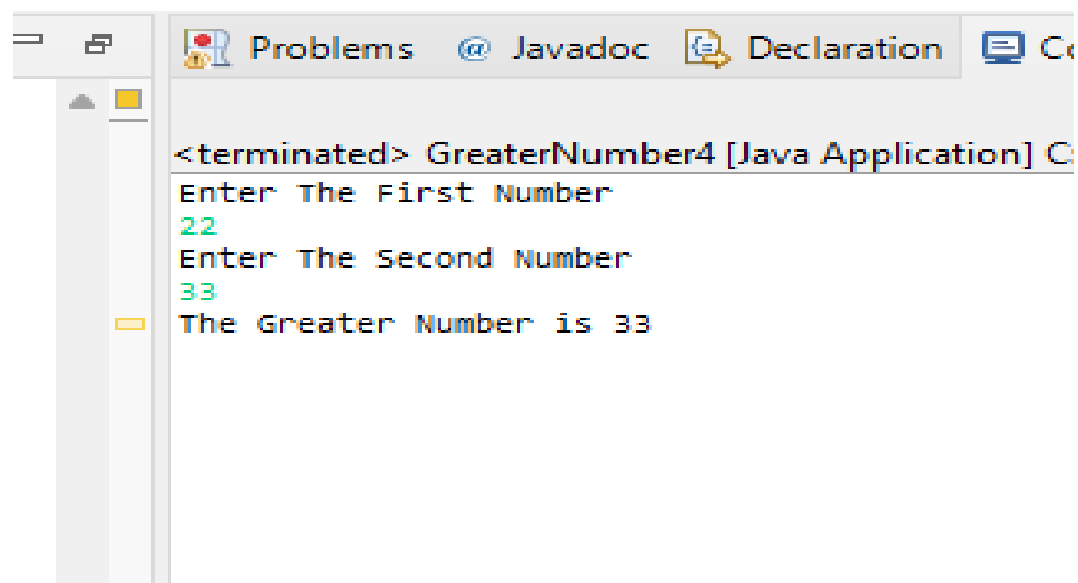
    public static void main(String[] args)
    {
        Scanner s=new Scanner(System.in);
        System.out.println("Enter The First Number");
        int a=s.nextInt();

        System.out.println("Enter The Second Number");
        int b=s.nextInt();

        if(a>b)
        {
            System.out.println("The Greater Number is " +a);
        }

        else
        {
            System.out.println("The Greater Number is " +b);
        }
    }
}
```

Output:



```
<terminated> GreaterNumber4 [Java Application] C
Enter The First Number
22
Enter The Second Number
33
The Greater Number is 33
```

Q 5) wap to ask product name and price of product from user and calculate discount
i.e
if price > 2000 then discount is 10 percent of price
else
discount is 7 % of price

```
package assignment1;

import java.util.*;
public class Discount5 {

    public static void main(String[] args)
    {
        Scanner s=new Scanner(System.in);
        System.out.println("Enter The Product name");
        String proname=s.nextLine();

        System.out.println("Enter The Product Price");
        int price=s.nextInt();

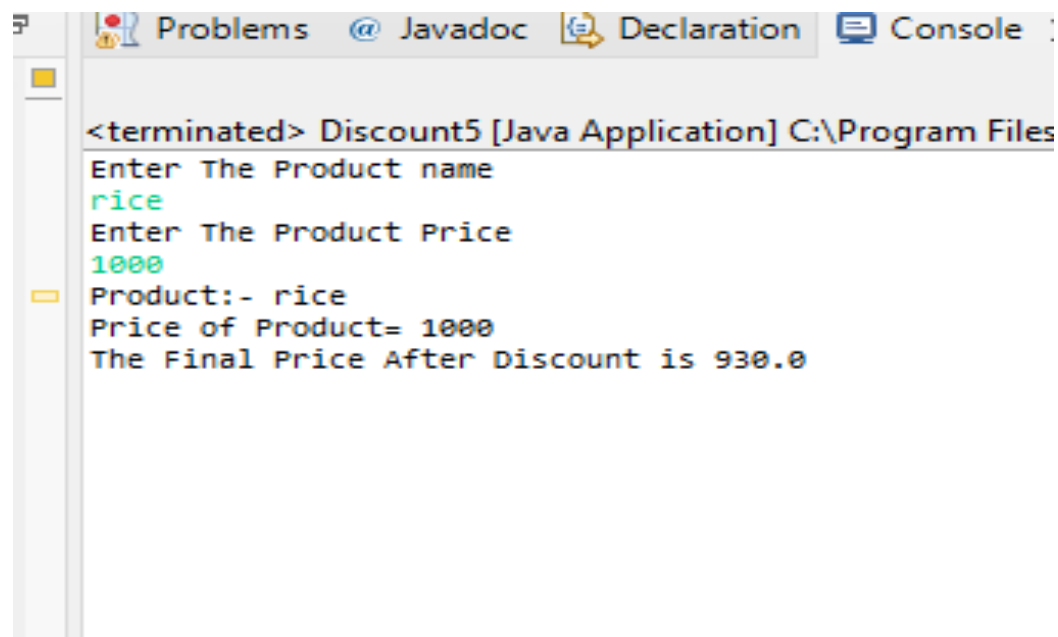
        if (price>2000)
        {
            double discount= 90;

            double finalprice=(price*discount)/100;
            System.out.println("Product:- " +praname);
            System.out.println("Price of Product= " +price);
            System.out.println("The Final Price After Discount is "
+finalprice);
        }
        else
        {
            double discount=93;

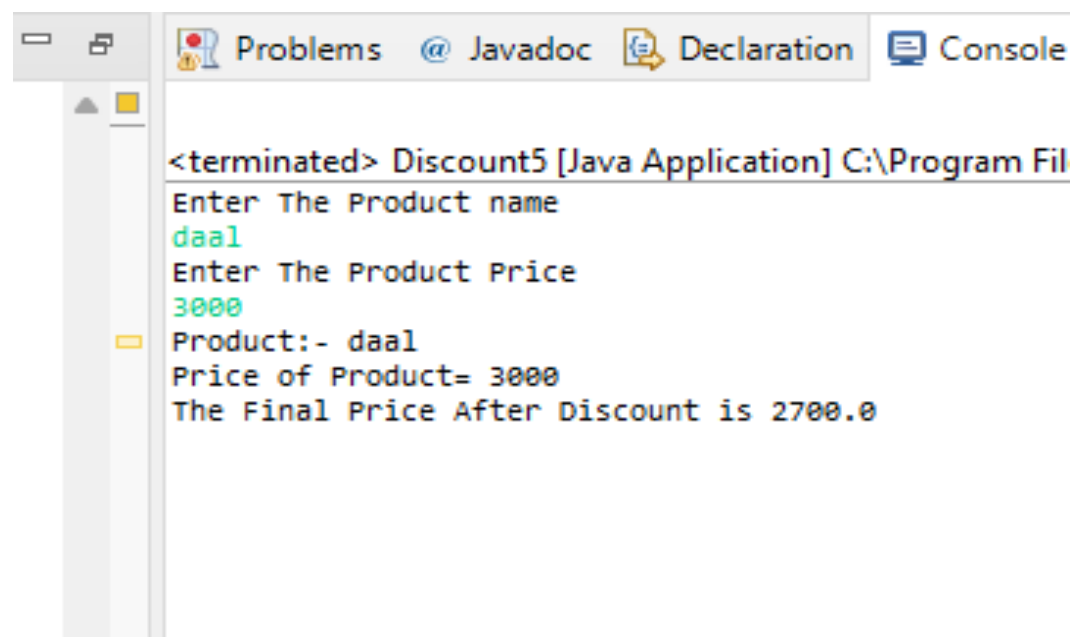
            double finalprice=(price*discount)/100;

            System.out.println("Product:- " +praname);
            System.out.println("Price of Product= " +price);
            System.out.println("The Final Price After Discount
is " +finalprice);
        }
    }
}
```

OUTPUT:-



```
<terminated> Discount5 [Java Application] C:\Program Files
Enter The Product name
rice
Enter The Product Price
1000
Product:- rice
Price of Product= 1000
The Final Price After Discount is 930.0
```



```
<terminated> Discount5 [Java Application] C:\Program Fil
Enter The Product name
daal
Enter The Product Price
3000
Product:- daal
Price of Product= 3000
The Final Price After Discount is 2700.0
```

Q 6) Wap to swap two numbers.

```
package assignment1;

import java.util.*;
public class Swap6 {

    public static void main(String[] args)
    {
        Scanner s=new Scanner(System.in);
        System.out.println("Enter the First no");
        int first=s.nextInt();
        System.out.println("Enter the Second no");
        int second=s.nextInt();

        System.out.println("First No Before Swap " +first);
        System.out.println("Second No Before Swap " +second);

        int temporary=first;

        first=second;

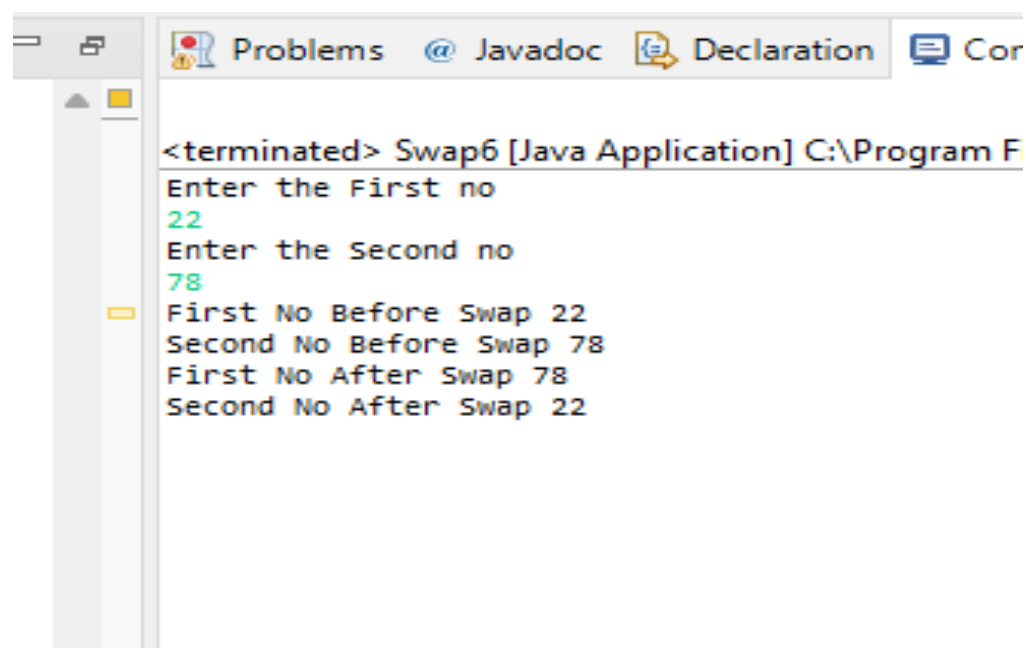
        second=temporary;

        System.out.println("First No After Swap " +first);
        System.out.println("Second No After Swap " +second);

    }

}
```

OUTPUT: -



```
<terminated> Swap6 [Java Application] C:\Program F
Enter the First no
22
Enter the Second no
78
First No Before Swap 22
Second No Before Swap 78
First No After Swap 78
Second No After Swap 22
```

Q 7 How to swap two numbers without using a third variable?

```
package assignment1;

import java.util.*;
public class SwapNo3Variable7 {

    public static void main(String[] args)
    {
        Scanner s=new Scanner(System.in);
        System.out.println("Enter The First No");
        int first=s.nextInt();
        System.out.println("Enter The Second No");
        int second=s.nextInt();

        System.out.println("First No Before Swap " +first);
        System.out.println("Second NO Before Swap " +second);

        first=first+second;

        second=first-second;

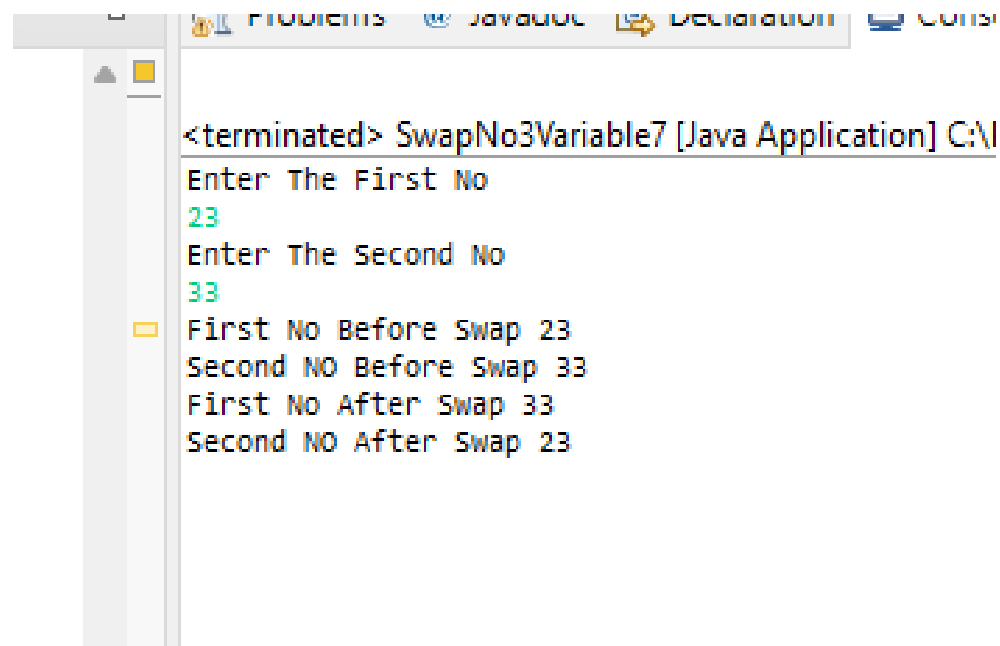
        first=first-second;

        System.out.println("First No After Swap " +first);
        System.out.println("Second NO After Swap " +second);

    }

}
```

OUTPUT: -



```
<terminated> SwapNo3Variable7 [Java Application] C:\I
Enter The First No
23
Enter The Second No
33
First No Before Swap 23
Second NO Before Swap 33
First No After Swap 33
Second NO After Swap 23
```


Q 8) wap to check is number is even or odd..

```
package assignment1;

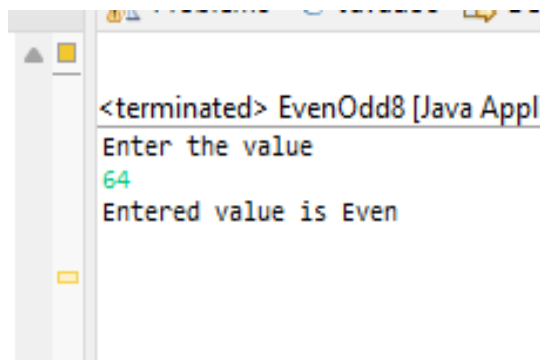
import java.util.*;
public class EvenOdd8 {

    public static void main(String[] args)
    {
        Scanner s=new Scanner (System.in);
        System.out.println("Enter the value");
        int val=s.nextInt();

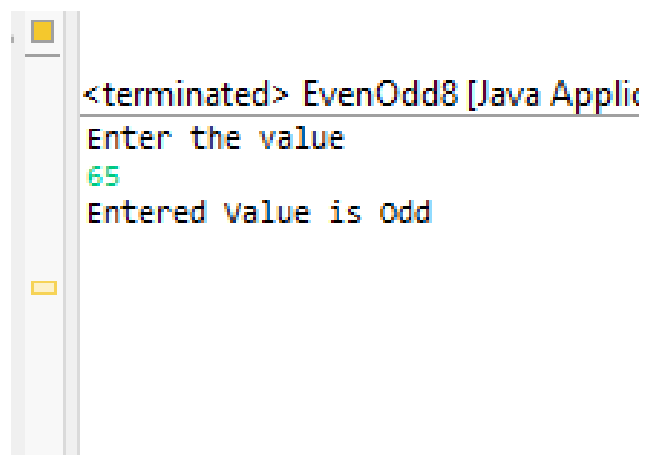
        if (val%2==0)
        {
            System.out.println("Entered value is Even");
        }

        else
        {
            System.out.println("Entered Value is Odd");
        }
    }
}
```

OUTPUT:-



```
<terminated> EvenOdd8 [Java Appl]
Enter the value
64
Entered value is Even
```



```
<terminated> EvenOdd8 [Java Applic]
Enter the value
65
Entered Value is Odd
```

Q 9 A school has following rules for grading system:

- a. Below 25 - F
- b. 25 to 45 - E
- c. 45 to 50 - D
- d. 50 to 60 - C
- e. 60 to 80 - B
- f. Above 80 - A

Ask user to enter marks and print the corresponding grade .

```
package assignment1;

import java.util.*;
public class GradingSystem9 {

    public static void main(String[] args)
    {
        Scanner s=new Scanner (System.in);
        System.out.println("Enter the Marks");
        int marks=s.nextInt();

        if(marks<=100)
        {
            if(marks>80)
            {
                System.out.println("grade A");
            }

            else if (marks>60 && marks<80)
            {
                System.out.println("Grade B");
            }

            else if (marks>50 && marks<60)
            {
                System.out.println("Grade C");
            }

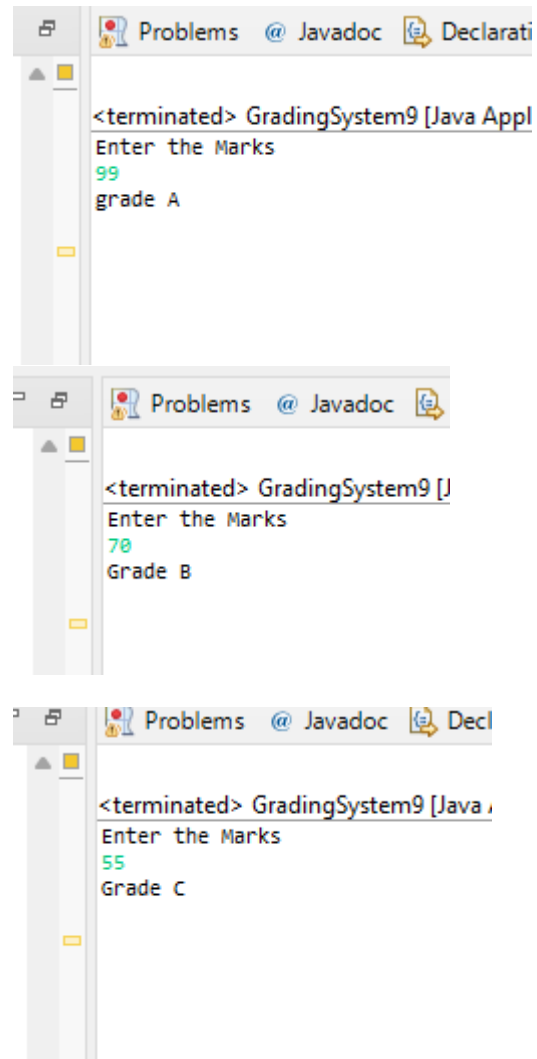
            else if (marks>45 && marks<50)
            {
                System.out.println("Grade D");
            }

            else if (marks>25 && marks<45)
            {
                System.out.println("Grade E");
            }

            else if (marks<25)
            {
                System.out.println("Grade F");
            }
        }
    }
}
```

```
        else
        {
            System.out.println("Entred marks is invalid ");
        }
    }
}
```

OUTPUT:-



```
Problems @ Javadoc Dec
<terminated> GradingSystem9 [Java
Enter the Marks
47
Grade D
```

```
Problems @ Javadoc Dec
<terminated> GradingSystem9 [Java
Enter the Marks
30
Grade E
```

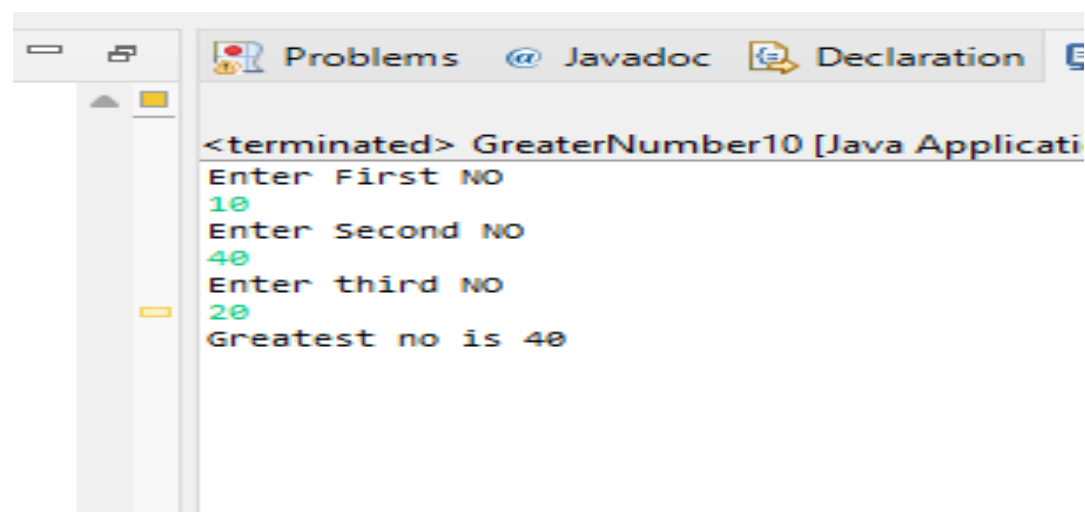
```
Problems @ Javadoc Decl
<terminated> GradingSystem9 [Java
Enter the Marks
18
Grade F
```

```
Problems @ Javadoc Declaratio
<terminated> GradingSystem9 [Java Applic
Enter the Marks
110
Entred marks is invalid
```

Q 10)wap to check greater number among three numbers.

```
package assignment1;  
  
import java.util.*;  
  
public class GreaterNumber10 {  
  
    public static void main(String[] args)  
    {  
        Scanner s=new Scanner(System.in);  
        System.out.println("Enter First NO");  
        int a=s.nextInt();  
        System.out.println("Enter Second NO");  
        int b=s.nextInt();  
        System.out.println("Enter third NO");  
        int c=s.nextInt();  
  
        if (a>b && a>c)  
        {  
            System.out.println("Greatest no is " +a);  
        }  
  
        else if (b>a && b>c)  
        {  
            System.out.println("Greatest no is " +b);  
        }  
  
        else  
        {  
            System.out.println("Greatest no is " +c);  
        }  
    }  
}
```

OUTPUT:-



```
<terminated> GreaterNumber10 [Java Applicati  
Enter First NO  
10  
Enter Second NO  
40  
Enter third NO  
20  
Greatest no is 40
```