

Activity

Index No: 23CDS0843

1. Declare variable to store the following.

- Student name
 - GPA
 - Registration number
- print all values

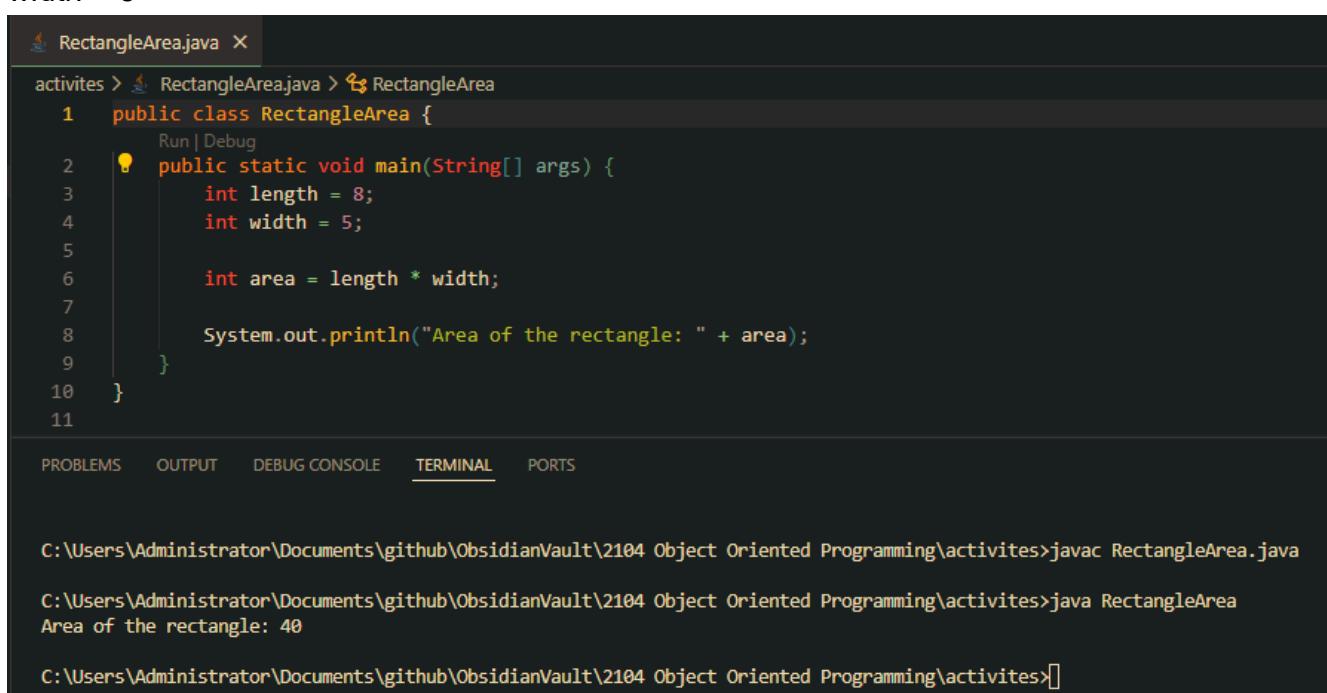


```
StudentInfo.java X
activites > StudentInfo.java > ...
1 public class StudentInfo {
2     Run | Debug
3     public static void main(String[] args) {
4         String studentName = "Yehan";
5         double gpa = 3.8;
6         String registrationNumber = "23CDS0843";
7
8         System.out.println("Student Name: " + studentName);
9         System.out.println("GPA: " + gpa);
10        System.out.println("Registration Number: " + registrationNumber);
11    }
12 }
```

C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>java StudentInfo
 Student Name: Yehan
 GPA: 3.8
 Registration Number: 23CDS0843

2. Write a Java program to calculate the area of a rectangle using

- length = 8
- width = 5



```
RectangleArea.java X
activites > RectangleArea.java > RectangleArea
1 public class RectangleArea {
2     Run | Debug
3     public static void main(String[] args) {
4         int length = 8;
5         int width = 5;
6
7         int area = length * width;
8
9         System.out.println("Area of the rectangle: " + area);
10    }
11 }
```

PROBLEMS	OUTPUT	DEBUG CONSOLE	TERMINAL	PORTS
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C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>javac RectangleArea.java
 C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>java RectangleArea
 Area of the rectangle: 40
 C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>[]

3. Given the following code, write final value of x.

```
int x = 5;
x += 3;
x *= 2;
x -= 4;
```

FINAL OUTPUT: 12 (x is now 12)

4. Write a Java program to check whether two numbers are equal and print the result.

```
activites > EqualNumbers.java > EqualNumbers > main(String[])
1  public class EqualNumbers {
2      Run | Debug
3      public static void main(String[] args) {
4          int num1 = 100;
5          int num2 = 100;
6
7          if (num1 == num2) {
8              System.out.println("The numbers are equal.");
9          } else {
10             System.out.println("The numbers are not equal.");
11         }
12     }
13 }
```

PROBLEMS OUTPUT DEBUG CONSOLE TERMINAL PORTS

C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>java EqualNumbers.java
The numbers are equal.

C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>

5. Write a Java program to check whether a number is between 10 and 20.

```
activites > NumberRange.java > NumberRange > main(String[])
1  public class NumberRange {
2      Run | Debug
3      public static void main(String[] args) {
4          int number = 15;
5
6          if (number >= 10 && number <= 20) {
7              System.out.println("The number is between 10 and 20.");
8          } else {
9              System.out.println("The number is not between 10 and 20.");
10         }
11     }
12 }
```

PROBLEMS OUTPUT DEBUG CONSOLE TERMINAL PORTS

C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>java NumberRange.java
The number is between 10 and 20.

6. Write a Java program to check whether a student has passed or failed.

- Pass mark = 50

```

activites > PassFail.java > PassFail > main(String[])
 1  public class PassFail {
 2      Run | Debug
 3      public static void main(String[] args) {
 4          int marks = 65;
 5
 6          if (marks >= 50) {
 7              System.out.println("Student has passed.");
 8          } else {
 9              System.out.println("Student has failed.");
10          }
11      }
12  }

```

PROBLEMS OUTPUT DEBUG CONSOLE TERMINAL PORTS

```
C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>java PassFail.java
Student has passed.
```

7. What will be the output of the following code?

```

boolean isRaining = false;
System.out.println(!isRaining);

```

OUTPUT: true

8. A user can access a system if:

- The user is logged in
- AND the account is active

write a Java program to check this condition

```

activites > SystemLogin.java > SystemLogin > main(String[])
 1  public class SystemLogin {
 2      Run | Debug
 3      public static void main(String[] args) {
 4          boolean isLoggedIn = true;
 5          boolean isAccountActive = true;
 6
 7          if (isLoggedIn && isAccountActive) {
 8              System.out.println("Access granted.");
 9          } else {
10              System.out.println("Access denied.");
11          }
12      }
13  }

```

PROBLEMS OUTPUT DEBUG CONSOLE TERMINAL PORTS

```
C:\Users\Administrator\Documents\github\ObsidianVault\2104 Object Oriented Programming\activites>java SystemLogin.java
Access granted.
```