

Lab 2

Create a new Eclipse project named **YourStudentId_Lab2** and add a class named **Tester2** to the project.

Experiment with basic Java learned in Chapter 2:

1. Declare some (at least 2 integer variables and 2 decimal variables) valid variables of java primitive data types (int, float, ...). Display them in your eclipse console output.
2. Do some mathematical operations with some arithmetic operators (+, -, *, /...). Display the results in your eclipse console output.
3. Try to assign a decimal variable to an integer variable. What happens? Write your explanations in Java comment.
4. Try to assign an integer variable to a decimal variable. What happens? Write your explanations in Java comment.
5. Declare an integer constant variable named DAYS_OF_YEAR, and assign 365 to it.
6. Declare a byte variable and a short variable, and assign DAYS_OF_YEAR to them, then display the results in the console.

```
byte byteVar = (byte)DAYS_OF_YEAR;
```

7. Declare a decimal constant variable named PI, and assign 3.1415926 to it. Calculate the area and perimeter of a circle which radius is 10. Display the result in the console.

```
final double PI = 3.1415926;  
int r = 10;  
double circleArea = PI * r * r;  
...
```

8. Use methods(ceil, round, floor) in Math class to get the rounding value of circle area. Display the result in the console.

```
System.out.println("The ceil of circle area= " + Math.ceil(circleArea));  
...
```

Submission: Submit your project as “zip (or rar) file” via WM5. No other submissions will be graded.

Reminder: Please zip **the whole project**

Deadline: Tomorrow’s midnight (for both Mon56 and Tue23)