Challenge 4: Implement a Calculator Class

In this exercise, you have to implement a calculator which can perform addition, subtraction, multiplication, and division.

WE'LL COVER THE FOLLOWING

Problem Statement

Write a Java **class** called `Calculator` with

- `private` *fields*:
  - `num1` and `num2` (**double** type)

And *methods*:

- `add()`, a *method* which returns the addition of two numbers
- `subtract()`, a *method* which returns the subtraction of num1 from num2
- `multiply()`, a *method* which returns the multiplication of numbers
- `divide()`, a *method* which returns the division of num2 by num1
- Define a parameterized constructor which takes two parameters `num1` and `num2` and assigns these variables to the respective fields in the class.

Input

Pass double point numbers in the parameterized constructor

Output

addition, subtraction, division, and multiplication

Sample Input

```
Calculator obj = new Calculator(10, 94);
obj.add()
obj.subtract()
obj.multiply()
obj.divide()
```

Sample Output

```
104
84
940
9.4
```

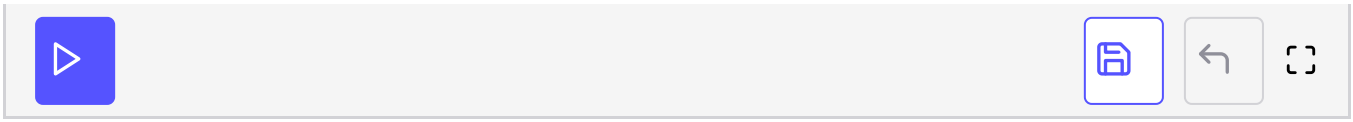
Coding Exercise

First, take a close look and design a step-by-step algorithm before jumping to the implementation. This problem is designed for your practice, so initially try to solve it on your own. If you get stuck, you can always refer to the solution provided in the solution review.

Good Luck!

```
class Calculator {
  // write class fields here

  public Calculator() {
    //write definition here
  }

  double add(double n1, double n2) {
    //write definition here

    return 0;
  }

  double subtract(double n1, double n2) {
    //write definition here

    return 0;
```

```
  double multiply(double n1, double n2) {
    //write definition here

    return 0;
  }

  double divide(double n1, double n2) {
    //write definition here

    return 0;
  }

}

class Demo {

  public static void main(String args[]) {
    Calculator obj = new Calculator();

    System.out.println(obj.add(10, 94));
    System.out.println(obj.subtract(10, 94));
    System.out.println(obj.multiply(10, 94));
    System.out.println(obj.divide(10, 94));
  }

}
```



The solution will be explained in the next lesson.