Submit your answers to the following problems to Canvas. Make sure to upload the Java source code files (.java).

Note: Check the following video to avoid problems when using nextInt() and nextLine(): Link

Problem 1: Design a program that can read two integer numbers from the keyboard, and print its multiplication.

```
> Input a number: 6
> Input another number: 3
> Result: 18
```

Problem 2: Design a program that can read 4 phrases or words from the keyboard. Then, it should print a sentence using the captured values. Come up with a creative sentence yourself.

To concatenate Strings and variables, remember that you can use the addition (+) operator.

```
> Name of a pet: Bruno
> Name of a dog breed: Australian Cattle Dog
> Its Favorte toy: freesbee
> Its favorite food: apples

Bruno is my Australian Cattle Dog. He/she loves playing with his
freesebee. After playing for a couple of hours, he/she loves to eat
apples.
```

Problem 3: Today is Martina's birthday, so his friends got together to buy a cake for her. Design a program that can capture the price, diameter (in centimeters), and the amount of slices the cake will be divided into. With this information, calculate:

- The total area of the cake
- The total area of each cake slice
- The price for each slice

Hint: By default, Java includes the Math class, which allows programmers to use mathematical constants. If you need to refer to the value of PI, you can use Math.PI, as seen below.

```java
//3.141592653589793
double pi = Math.PI;
```

Example:

```
> Cake diamater(cm): 25
> Cake price ($): 250
> Cake slices: 10

> Area of the cake: 490.8738521234052 cm2
> Area for each slice: 49.08738521234052 cm2
> Price for each slice: $ 25.0
```

Challenge problem! (For extra credit). Build a program that can model the following interaction:

A customer enters a shop to buy some goods. Let's say milk boxes. We simulate a simple cash register. The user is the cashier and uses our cash register to calculate the total price and the rest for the customer.

Our cash register asks the cashier:

- How many boxes the customer has bought.
- The price for each box.
- The amount of cash the customer gives to the cashier.

The cash register prints the total and the rest.