

## Challenge 3: Print a Matrix

In this challenge, you will figure out how to print a Matrix using a two-dimensional Array.

### We'll cover the following

- Problem statement
  - Function prototype
  - Sample input
  - Sample output pictorial representation

## Problem statement #

As we have already discussed that a *two-dimensional* array can also be thought of a *matrix*.

Implement a Java method to **initialize & print** a two-dimensional array of size **n x n** in the form of a matrix. You should initialize and Print an array of size 3 x 3 as:

- The *diagonal* of the *array* should be filled with **0**.
- The *lower side* should be filled will **-1s**.
- *upper side* should be filled with **1s**.

**Note:** In order to move a value to the next line you can use `\n`.

## Function prototype #

```
void printMat(int n)
```

## Sample input #

```
int n = 3;
```

## Sample output pictorial representation #

0	1	1
-1	0	1
-1	-1	0

Sample Output Array

Try to implement the solution by *yourself* once you have understood the *problem statement* clearly. Referring to the solution part should be your last resort.

**Good luck!**

```
class TwoDimArr {  
    public static void printMat(int n) {  
        //write the code for making and printing the matrix here  
        //use can use \n to move numbers to next line in the matrix  
        //use " " to add space between numbers in matrix  
        System.out.println(); //comment out this line when you start writing code  
    }  
}
```



Printing the Matrix

Let's discuss the solution of the above challenge in the next lesson.