


# Assignment 02:

Write a script that reads numbers from the user until they enter '0'. The script should also print whether each number is odd or even.

## Code:

 CheckEvenOdd - Notepad

File Edit Format View Help

```
import java.util.Scanner;

public class CheckEvenOdd {
    public static void main(String[] args) {
        Scanner scanner = new Scanner(System.in);

        while (true) {
            System.out.print("Enter a number (enter 0 to exit): ");
            int num = scanner.nextInt();

            if (num == 0) {
                System.out.println("Exiting the program...");
                break;
            } else {
                String result = (num % 2 == 0) ? "even" : "odd";
                System.out.println("The number " + num + " is " + result + ".");
            }
        }

        scanner.close();
    }
}
```

## Output: -

```
C:\Windows\System32\cmd.exe
Microsoft Windows [Version 10.0.19045.4291]
(c) Microsoft Corporation. All rights reserved.

C:\Users\user\Desktop>javac CheckEvenOdd.java

C:\Users\user\Desktop>java CheckEvenOdd
Enter a number (enter 0 to exit): 4
The number 4 is even.
Enter a number (enter 0 to exit): 5
The number 5 is odd.
Enter a number (enter 0 to exit): 6
The number 6 is even.
Enter a number (enter 0 to exit): 13
The number 13 is odd.
Enter a number (enter 0 to exit): 15
The number 15 is odd.
Enter a number (enter 0 to exit): 8
The number 8 is even.
Enter a number (enter 0 to exit): 9
The number 9 is odd.
Enter a number (enter 0 to exit): 56
The number 56 is even.
Enter a number (enter 0 to exit): 77
The number 77 is odd.
Enter a number (enter 0 to exit): 89
The number 89 is odd.
Enter a number (enter 0 to exit): 0
Exiting the program...

C:\Users\user\Desktop>
```

## Explanation:

- 1.Import the Scanner class: This is used to read input from the user.
- 2.Create a Scanner object: This object (scanner) is used to capture user input.

3. Loop until the user enters '0':
  - . Prompt the user: Ask the user to enter a number.
  - . Read the number: Use `scanner.nextInt()` to read the number entered by the user.
  - . Check if the number is '0': If the user enters '0', print "Exiting..." and break out of the loop.
  - . Determine if the number is odd or even:
    - . If the number is divisible by 2 (`number % 2 == 0`), it is even.
    - . Otherwise, it is odd.

4. Close the Scanner: It's a good practice to close the scanner to free up resources.

This program will continue to prompt the user for numbers and print whether each number is odd or even until '0' is entered.