

Experiment - 1

Aim :- To implement following Java programs -

- (a) Factorial of a number.
- (b) To determine if year is leap year or not.
- (c) Fibonacci Series
- (d) To check whether a number is palindrome or not.
- (e) To find largest number in an array.

Software Used :- NetBeans IDE 8.0.

Theory :-

Some basic commands and terms :-

Java.util Package :- It contains the collections framework, legacy collection classes, event model, date and time facilities, internationalization and miscellaneous utility classes (a string tokenizer, a random-number generator, and a bit array).

public static void main (String args []) :-

Java program processing starts from the main() method which is a mandatory part of every Java program.

public :- This is the access modifier of the main method.

`static` :- When java runtime starts, there is no object of the class present. If the main method won't be static, JVM would be not be able to call it because there is no object of the class is present.

`System.out.println()` :- It is a java statement that prints the argument passed, into the `System.out` which generally `stdout`.

"`out`" is a static member field of `System` class and is of type `PrintStream`.

`Scanner` Class in Java :- `Scanner` is a class in `java.util` package used for obtaining the input of the primitives types like `int`, `double` etc. and strings.

Sometimes, we have to check if the next value we read is of a certain type or if the input has ended (EOF marker encountered).

`nextInt()` :- The `Java.util.Scanner.nextInt()` method scans the next token of the input as an `int`. The `Scanner.nextInt()` method simply returns `int` if the token on the scanner buffer can be interpreted or translated into `int` data type.