yesterday topic of discussion

1.Oops(HAS-A part ----> variable)
2. Identifier/variables
a. Rules of identifiers
eg: a-z,A-Z,0-9,$,_
3. Reserve words/keywords/built-in words
4. Datatypes

Datatypes

Numeric Datatype
a. whole number
1. byte(1byte)
2. short(2bytes)
3. int(4bytes) * commonly used datatype
4. long(8 bytes)
b. realnumber
1. float
2. double

float

```
System.out.println("Size of float is :: "+Float.SIZE);
System.out.println("MINVALUE of float is :: "+Float.MIN_VALUE);
System.out.println("MAXVALUE of float is :: "+Float.MAX_VALUE);
```

size: 32 bits(1 byte = 8bits, 32/8 = 4 bytes)
minvalue:1.4E-45
maxvalue: 3.4028235E38

Note: by default if u specify any real number/decimal number compiler will treat it as "double", to specify
to the compiler to treat it as float, we need to suffix it with 'F' or 'f'.

```
eg:   float  a= 10.5;//CE: possibly loss of precession
      float a = 10.5f;
      float b = 25.5F;
```

double

```
System.out.println("Size of double is :: "+Double.SIZE);
System.out.println("MINVALUE of double is :: "+Double.MIN_VALUE);
System.out.println("MAXVALUE of double is :: "+Double.MAX_VALUE);
```

size: 64s bits(1 byte = 8bits, 64/8 = 8 bytes)
minvalue:4.9E-324
maxvalue: 1.7976931348623157E308

```
eg: double d = 23.567;
    double d = 1.7976931348623157E308;
```

Note: Datatypes are actually represented to the compiler and jvm using reserve words.
reserve words are normally in "lower case".
To map primitive data as Object in java from JDK1.5 concept of "Wrapper class" was introduced in
JDK1.5 version.

```
 byte ------------> Byte(C)
short-------------> Short(C)
int    -------------> Integer(C)
long -------------> Long(C)
float -------------> Float(C)
double------------> Double(C)
```

CodeSnippets(JDK8 version)

For the code below, what should be the name of java file?

1.

```
public class HelloWorld {
    public static void main(String [] args) {
        System.out.println("Hello World!");
    }
}
```

A. Hello.java
B. World.java
C. HelloWorld.java
D. helloworld.java

2.

Does below code compile successfully?

```
public class Test {
    public static void main(String[] args) {
        System.out.println("Hello");;;;;;;;;
    }
}
```

A. yes
B. no
Ans: A
In java every statement should be terminated with ; symbol
  Note: ; means ending.

3.

What is the signature of special main method?
A. public static void main(String args)   //[] is missing
B. public static void main(String[] a)   //correct
C. public static void main()//missing String[] args
D. private static void main(String[] args)// private can't be for a main method

4.

What will be the result of compiling and executing Test class?
  java Test good morning everyone

```
private class Test{
   public static void main(String args[]) {
       System.out.println(args[1]);
   }
}
```

A. compilation error //valid answer becoz the main method class can't be private
B. good
C. morning
D. everyone

5.

For the class Test, which options, if used to replace /*INSERT*/, will print "Hurrah! I passed..." on to the console? Select 2 options.

```
public class Test {
    /*INSERT*/ {
        System.out.println("Hurrah! I passed...");
    }
}
```

A. static public void main(String[] args) // static and public can be interchanged so valid
B. public static void main(String[] a)//valid
C. static public void Main(String[] args)
D. public void main(String[] args)
E. protected static void main(String[] args)
F. public void static main(String[] args)//here static and void is interchanged is not possible

6.
Suppose you have created a java file, "MyClass.java".
Which of the following commands will compile the java file?

A. javac MyClass //invalid becoz .java is missing
B. java MyClass // javac is command is used for compilation
C. javac MyClass.class //invalid becoz .java is missing
D. javac MyClass.java //valid
E. java MyClass.java //javac is the command for compilation and java is command for execution