FACULTY OF Engineering & Technology

Variables in JAVA

1. A variable is a container which holds the value
2. Every variable must have some data type in JAVA
3. **Variable** is name of *reserved area allocated in memory*.

Types of Variables
There are three types of variables in Java:
1. Local variable
2. Instance variable
3. Static variable

1. Local Variable
A variable declared inside the body of the method is called local variable. You can use
this variable only within that method and the other methods in the class aren't even aware
 that the variable exists. A local variable cannot be defined with "static" keyword.
2) Instance Variable: A variable declared inside the class but outside the body of the method
, is called instance variable. It is not declared as static. It is called instance variable because
 its value is instance specific and is not shared among instances.
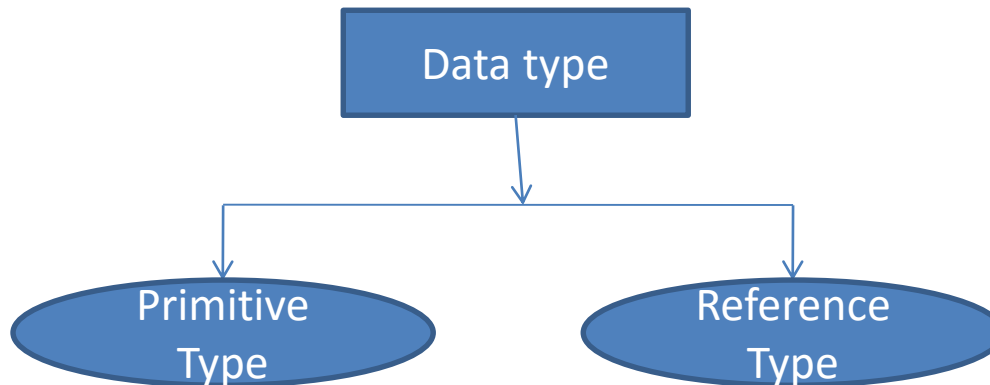**3) Static variable:**
A variable which is declared as static is called static variable. It cannot be local. You can
create a single copy of static variable and share among all the instances of the class.
Memory allocation for static variable happens only once when the class is loaded in the memory.

Example:

```
class Test{
int i=50;//instance variable
static int j=100;//static variable
void method(){
int k=90;//local variable
}
}//end of class
```

// is used for single line comment

Primitive Data Types
1. These are the basic building blocks of data manipulation.
2. These are the most basic data types available in Java language

There are 8 types of primitive data types:
1. boolean
2. byte
3. char
4. Short
5. int
6. long
7. float
8. double