

1. What is the String class in Java? Is String a data type?

- String is a sequence of characters. But in Java, string is an object that represents a sequence of characters .
String is considered as data type and is often implemented as an array data structure of bytes or words that stores a sequence of elements .

2. How can you make a String uppercase or lowercase in Java?

- To lowercase method
This Java string method converts every character of the particular string into the lower case by using the rules of the default locale.
Syntax

```
public String toLowerCase()
```

Example:

```
public class himanshu{  
public static void main(String args[]) {  
    String S1 = new String("UPPERCASE CONVERTED TO LOWERCASE");  
    //Convert to LowerCase  
    System.out.println(S1.toLowerCase());  
}  
}
```

3. Can you use String in switch case in Java? Explain it briefly.

- The Java switch case executes one statement from multiple conditions. It is like if-else-if ladder statement. The switch statement works with byte, short, int, long, enum types, String and some wrapper types like Byte, Short, Int, and Long. Since Java 7, you can use strings in the switch case .

Example:

```
public class SwitchExample {  
public static void main(String[] args) {  
    //Declaring a variable for switch expression  
    int number=20;
```

```

//Switch expression
switch(number){
//Case statements
case 10: System.out.println("10");
break;
case 20: System.out.println("20");
break;
case 30: System.out.println("30");
break;
//Default case statement
default: System.out.println("Not in 10, 20 or 30");
}
}
}

```

4. Explain different types of conditional statements in java.

- The different types of conditional statement are
 - The if statement

In Java, we use the if statement when the block of code to be executed is true.

```

int actualFloor = floor;
if (floor > 13){
actualFloor--;
} // No else needed

```

- The if - else statement

One of the two branches is executed once True (if) branch or False (else) branch.

```

int actualFloor;

```

```

if (floor > 13);
actualFloor = floor - 1;
} else {
actualFloor = floor;
}

```

5. How do you split a string in Java?

- The **string split()** method breaks a given string around matches of the given regular expression. After splitting against the given regular expression, this method returns a string array.

Two split methods are:

1. Public String [] split (String regex, int limit)

```

- public class GFG {
-     public static void main(String args[])
-     {
-         String str = "geekss@for@geekss";
-         String[] arrOfStr = str.split("@", -2);
-
-         for (String a : arrOfStr)
-             System.out.println(a);
-     }
- }

```

2. public String[] split(String regex)

```

- public class GFG {
-     public static void main(String args[])
-     {
-         String str = "GeeksforGeeks:A Computer Science
Portal";
-         String[] arrOfStr = str.split(":");
-
-         for (String a : arrOfStr)
-             System.out.println(a);
-     }
- }

```

6. How do you check if two Strings are equal in Java?

- The **equals()** method compares two strings, and returns true if the strings are equal, and false if not.

Example:

```
String myStr1 = "Hello";  
String myStr2 = "Hello";  
String myStr3 = "Another String";  
System.out.println(myStr1.equals(myStr2)); // Returns true because they  
are equal  
System.out.println(myStr1.equals(myStr3)); // false
```

5. What is the value of the variable num after the following is executed?

- ***int k = 5;***
- ***int num = 0; (answer)***
- ***int num1 = num + k * 2;***
- ***int num2 = num + k * 2;***

Are the values num1 and num2 equal after the last statement?

- The value of variable num does not change after the program is executed.
- Yes the values of num1 and num2 are equal after the last statement.