Assignment 6

- Ans 1. Conditional operators are such operators which selects one or two expressions for evaluation, which is based on the value of the first operands. It is also known as ternary operator as it takes three arguments.
- Ans 2. There are three types of operators based on the number of operands. An operator is called a unary, binary, or ternary operator based on the number of operands. If an operator takes one operand, it is called a unary operator, if it takes two operands, it is called a binary operator and if it takes three operands, it is called a ternary operator.
- Ans 3. The switch case in java is used to select one of many code blocks for execution. Thus, it is like an if-else-if ladder statement. It works with a lot of data types. The switch statement is used to test the equality of a variable against several values specified in the test cases.
- Ans 4. **Operator precedence** is a concept of determining the group of terms in an expression.

The operator precedence is responsible for evaluating the expressions.

When two operators share a single operand, the operator having the highest precedence goes first. For example: x + y * z is treated as x + (y * z), whereas x * y + z is treated as (x * y) + z, because "*" operator has highest precedence in comparison of "+" operator.

Ans 5. Conditional statements in Java are the executable block of code dependent on certain conditions. These statements are also known as decision statements or selection statements in Java.

Statements like -> if statement, if else statement and switch statement.

Use of conditional statements-> To specify a block of code to be executed, if a specified condition is true or use "else" to specify a block of code to be executed, if the same condition is false.

Ans 6. Syntax of if else statement:

```
if (boolean_expression)
{
```

```
/* statement(s) will execute if the boolean
expression is true */
} else
{
   /* statement(s) will execute if the boolean
expression is false */
}
```

Ans 7. Types of iterative statements in java are:

- For loop: Executes a set of statements a fixed number of times.
- While loop: Repeats a set of statements while a given condition is true.
- Do-while loop: Repeats a set of statements at least once and then continues to repeat as long as a given condition is true.

Ans 8. Difference between for loop and do while loop:

For loop	Do while loop
Statement(s) is executed	Condition is checked after
once the condition is	the statement(s) is
checked	executed.
It might be that statement(s)	Statement(s) is executed at
gets executed zero times	least once.
For the single statement,	Brackets are always

bracket is not compulsory.	compulsory.
Initialization may be outside	Initialization may be outside
or in condition box.	or within the loop.
for loop is entry controlled	do-while is exit controlled
loop.	loop.
for(init; condition; iteration	do
)	{
{	statement(s);
statement (s);	}
}	while (condition);

Ans 9. Program to print numbers from 1 to 10:

```
public class loop {
    public static void main(String [] args)
    {
        int n=10;
        for(int i=1;i<=10;i++)
        {
            System.out.println(i);
        }
    }
}</pre>
```