Flow Control MCQs:

1. What is the purpose of the if-else statement in Java?

a) It is used for loop iterations.

b) It is used for defining methods.

c) It is used for making decisions based on conditions.

d) It is used for defining class constructors.

2. How many blocks of code can an if-else statement contain?

a) One

b) Two

c) Three

d) Unlimited

3. How many blocks of code can an else-if statement contain?

a) One

b) Two

c) Three

d) Unlimited

4. What is the syntax for a simple if statement in Java?

a) if (condition) { // code }

b) if { // code }

c) (condition) if { // code }

d) if condition then { // code }

5. What is the syntax for an if-else statement in Java?

a) if (condition) { // code }

b) else (condition) { // code }

c) if (condition) { // code } else { // code }

d) if { // code } else { // code }

6. What is the primary purpose of using the else if statement in Java?

a) To terminate the program.

b) To create a loop.

c) To define a new class.

d) To provide multiple alternative conditions.

7. When can you write an if-else statement without using curly braces for the block of code?

a) when there are multiple statements inside if-else.

b) when there is only one statement inside if-else.

c) it is not possible to write if-else without curly braces

d) in any situation we can write without curly braces

8. What is the output of the following code?

```java
int x = 10;
if (x > 5)
    System.out.println("A");
else if (x > 7)
    System.out.println("B");
else
    System.out.println("C");
```

a) A

b) B

c) C

d) A and B

9.

What is the result of the following code?

```java
int num = 15;
if (num > 10)
    if (num < 20)
        System.out.println("A");
    else
        System.out.println("B");
```

a) A

b) B

c) A and B

d) No output