**16th Day Internship Report**

Date: 23 June 2025

Topic: Java Loops – for, while, and do-while

Today’s Learning Summary:

On the 23rd day of the internship, we focused on understanding and practicing looping constructs in Java, which are essential for executing a block of code multiple times. The main types of loops we covered are:

**1. for Loop:**

Purpose: Best used when the number of iterations is known.

Syntax:

for (int i = 0; i < 5; i++) {

System.out.println(i);

}

**2. while Loop:**

Purpose: Used when the number of iterations is unknown and depends on a condition.

Syntax:

int i = 0;

while (i < 5) {

System.out.println(i);

i++;

}

**3. do-while Loop:**

Purpose: Similar to while, but guarantees at least one execution of the loop body.

Syntax:

int i = 0;

do {

System.out.println(i);

i++;

} while (i < 5);

**Conclusion:**

We concluded that:

The for loop is preferred for definite iteration.

The while loop is suitable for conditional repetition.

The do-while loop is ideal when at least one execution is required regardless of the condition.

This session enhanced our logic-building skills and deepened our understanding of iterative structures in Java programming.