

Chapter 5: If Function, Nested If Function, Count Function & CountIf Function

Learning Objectives

- At the end of this session, students will:
 - Understand If Function with example.
 - Understanding Nested If Function with example.
 - Understanding Count Function.
 - Understanding CountIf Function.

IF Function

The IF function is a logical function in Excel that returns one value if a condition is true and another value if it's false.

Syntax

- IF(condition, value_if_true, value_if_false)

Example:

=IF(A1>50, "Pass", "Fail")

Explanation: If the value in cell A1 is greater than 50, it returns "Pass"; otherwise, it returns "Fail".

Nested IF Function

A Nested IF function is when multiple IF functions are used within one another to evaluate more complex conditions.

Syntax

- `IF(condition1,value_if_true1,IF(condition2,value_if_true2,value_if_false2))`

Example:

`=IF(A1>=90, "A", IF(A1>=80, "B", IF(A1>=70, "C", "F")))`

Explanation: This function assigns grades based on the value in A1:

- A if A1 is 90 or more
- B if A1 is 80 to 89
- C if A1 is 70 to 79
- F if A1 is below 70

Count Function

The COUNT function counts the number of numeric values in a range of cells.

Syntax:

- COUNT(value1, [value2], ...)

Explanation:

Value1,value 2..are the values or cell reference you want to include in the count.

Example:

	A
1	
2	10
3	Text
4	20
5	30

Formula:

=COUNT(A1:A5)

Result:

3

Explanation:

Only the numbers 10, 20, and 30 are counted.
Text and blank cells are ignored.

CountIf Function

The COUNTIF function counts the number of cells in a range that meet a specific condition or criteria.

Syntax:

COUNTIF(range, criteria)

Explanation:

Range – cell range

Criteria - condition

Example – Count numbers greater than 10

	A	
1	5	
2	15	
3	10	
4	20	
5	5	

Formula:

=COUNTIF(A1:A5, ">10")

Result:

2

Explanation:

Only the values 15 and 20 are greater than 10.

Summary Table

Function	Description
COUNT	Counts numeric values only
COUNTIF	Counts values that match a condition

Review Questions

- **Explain the following terms:**
 - If function
 - Nested If Function
 - Count Function
 - CountIf Function

Thank

you

