



# **IF-ELSE STATEMENT**

## **CONDITIONAL STATEMENT**

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## TOPIC OUTLINE

`if` Conditional Statement

`if-else` Conditional Statement

`if-elif-else` Conditional Statement



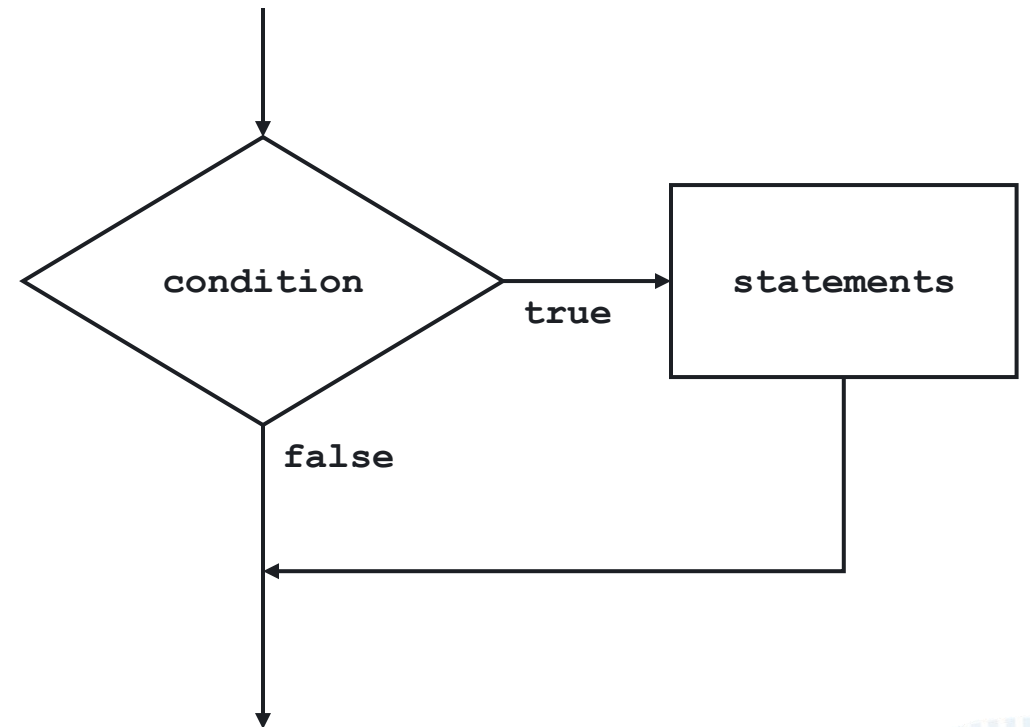
# IF STATEMENT



# IF STATEMENT

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The **if** statement is a fundamental control flow statement that allows you to execute a block of code **conditionally** based on whether a specified condition evaluates to **True** or **False**.



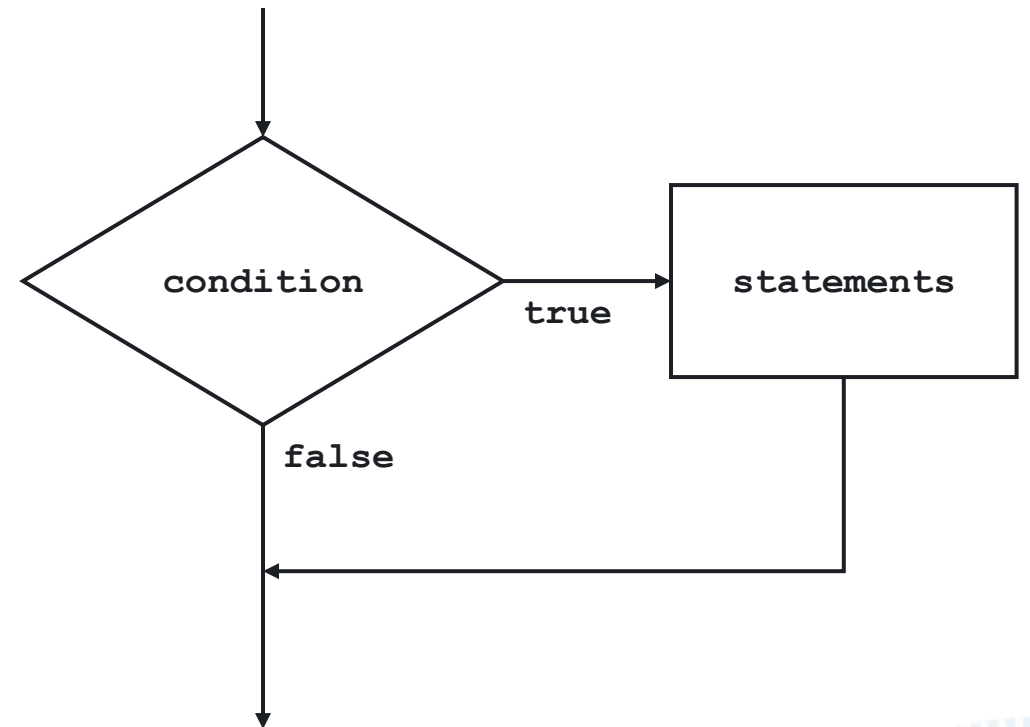
# IF STATEMENT

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Syntax of the `if` statement:

```
if condition:
```

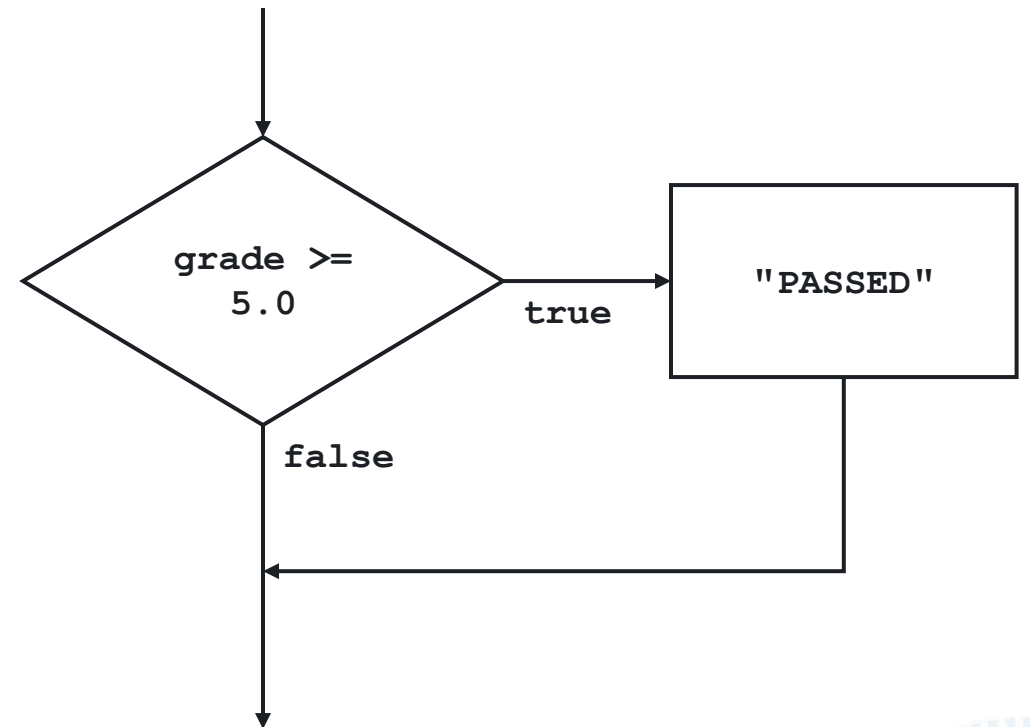
```
    // code if the condition is true
```



# EXERCISE

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```
if grade >= 5.0:  
    print("PASSED!")
```



# EXERCISE

---

```
grade = 4.5
```

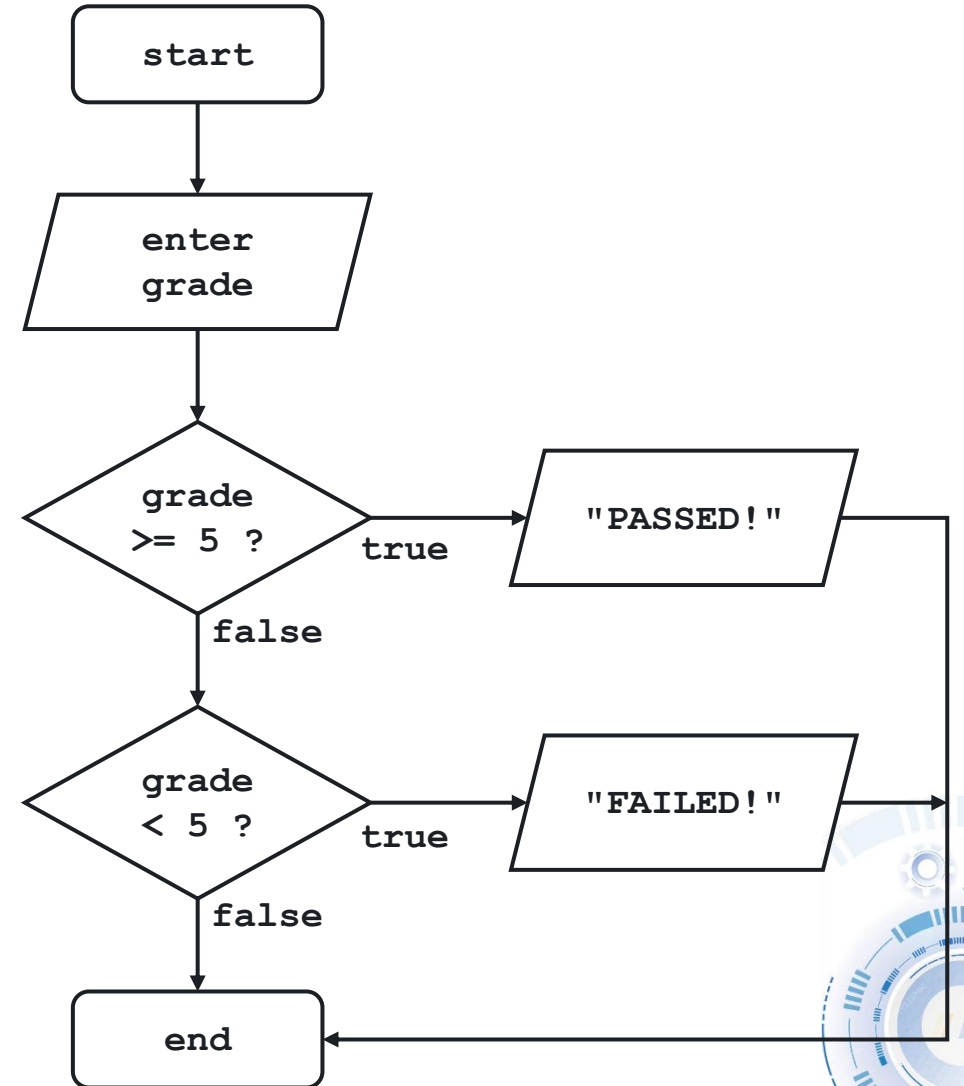
```
# evaluate grade
```

```
if grade >= 5.0:
```

```
    print("PASSED!")
```

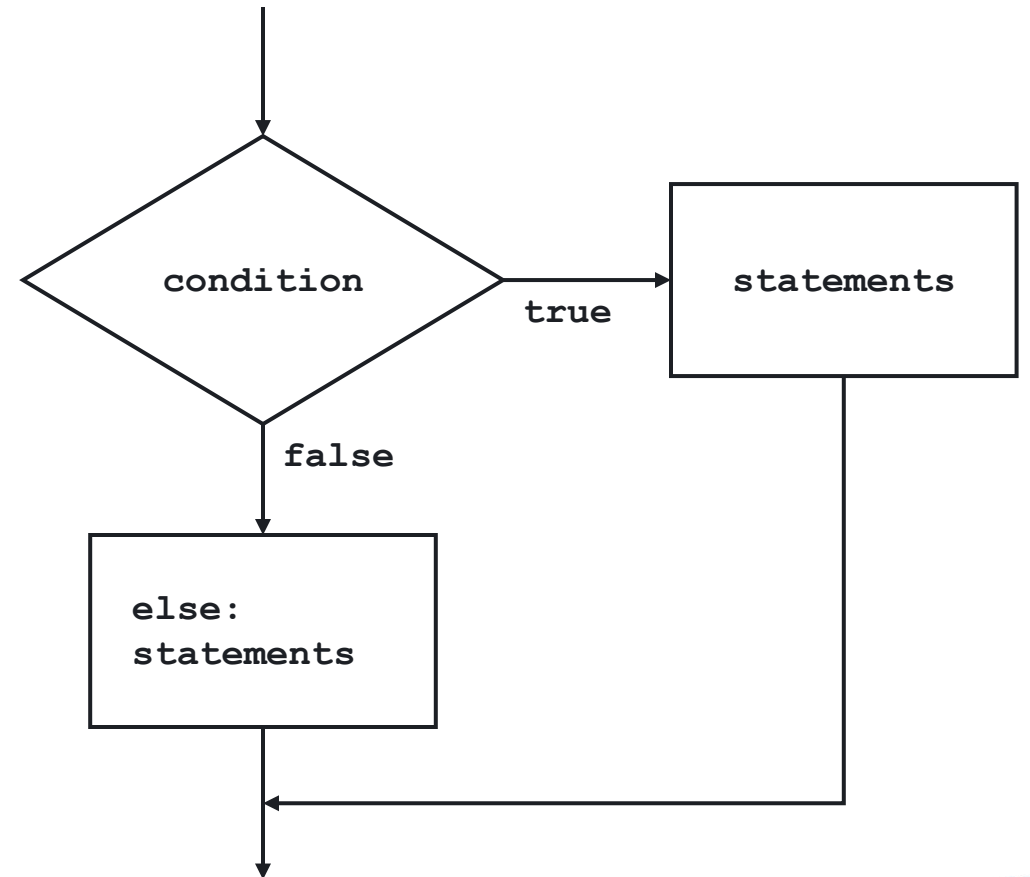
```
if grade < 5.0:
```

```
    print("FAILED!")
```



# IF-ELSE STATEMENT

The if-else statement extends the **if** statement by providing an alternative block of code to execute if the condition is **False**.





# IF-ELSE STATEMENT

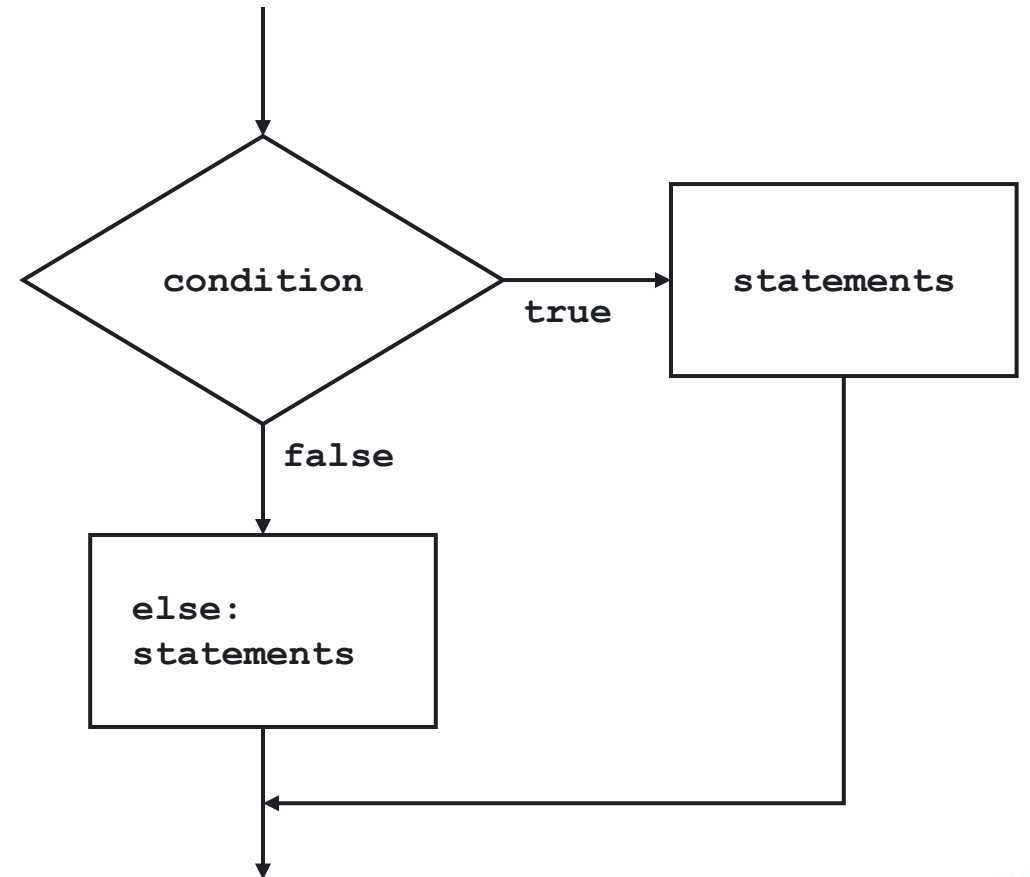
Syntax of the **if-else** statement:

```
if condition:
```

```
    // code if the condition is true
```

```
else:
```

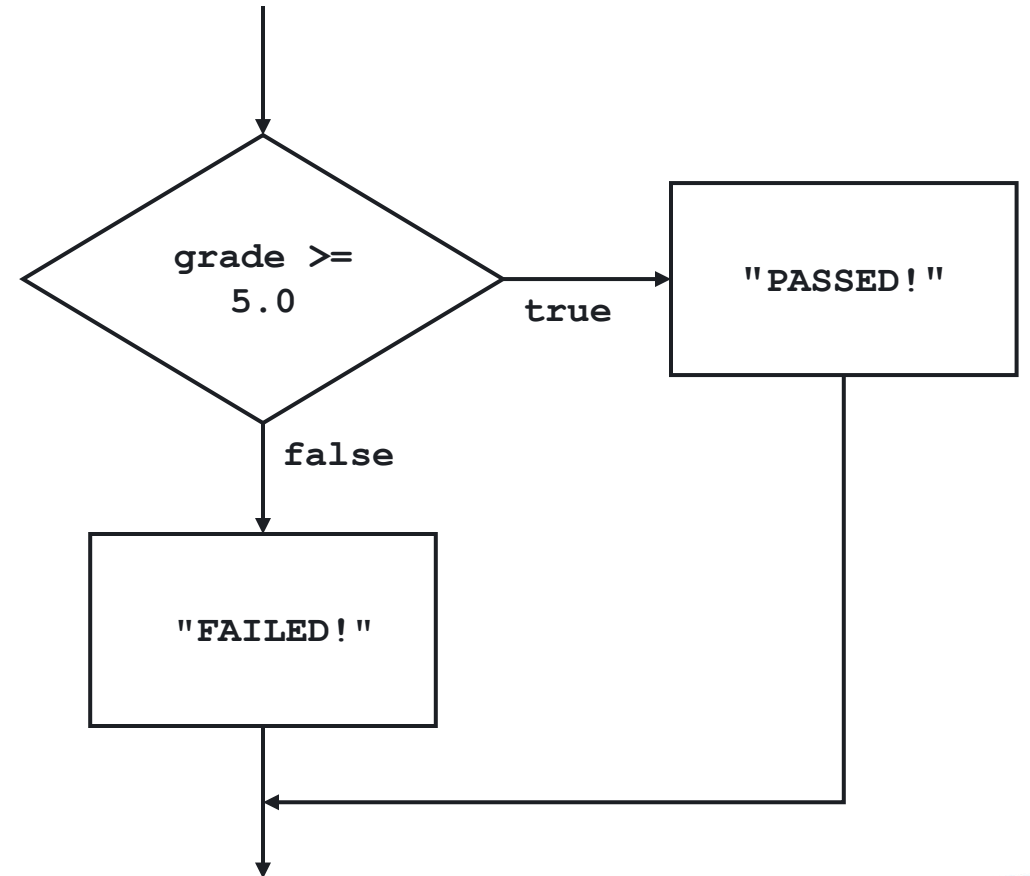
```
    // code if the condition is  
    false
```



# EXERCISE

---

```
if grade >= 5.0:  
    print("PASSED!")  
else:  
    print("FAILED!")
```



# EXERCISE

---

```
grade = 5.0
```

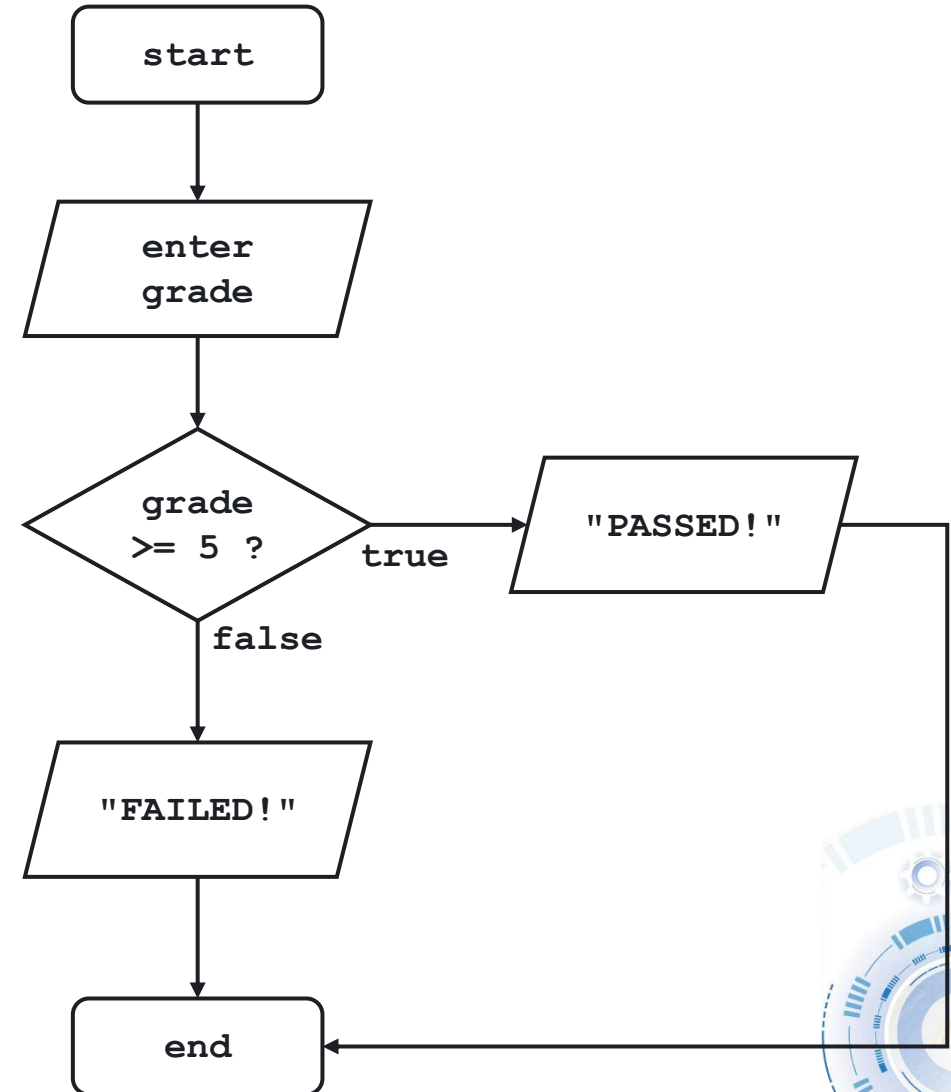
```
# evaluate grade
```

```
if grade >= 5.0:
```

```
    print("PASSED!")
```

```
else:
```

```
    print("FAILED!")
```



# CASCADING IF-ELSE STATEMENT

Syntax of the cascading if-else statement:

```
if condition 1:
```

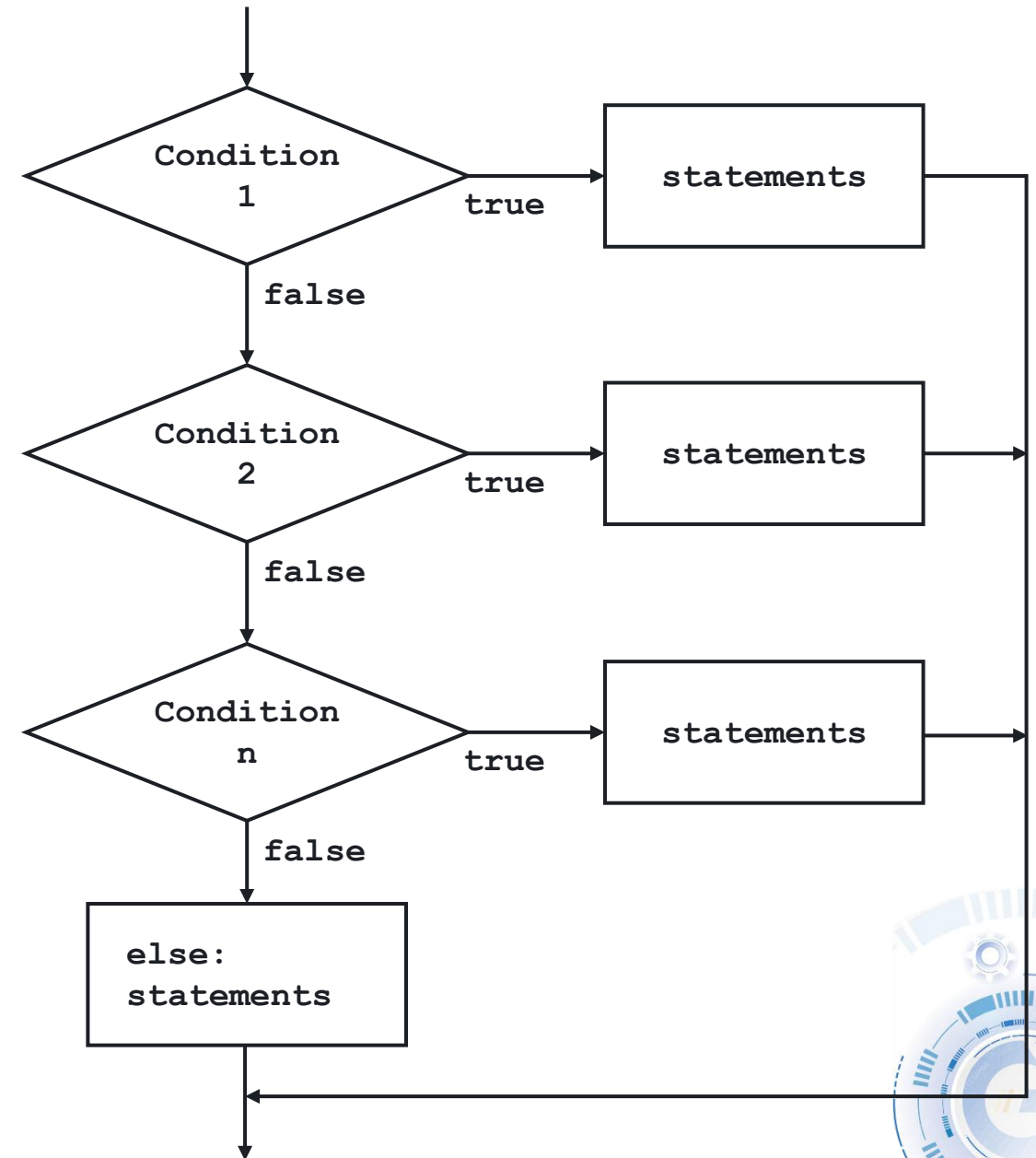
```
    // if the condition 1 is true
```

```
elif condition 2:
```

```
    // if the condition 2 is true
```

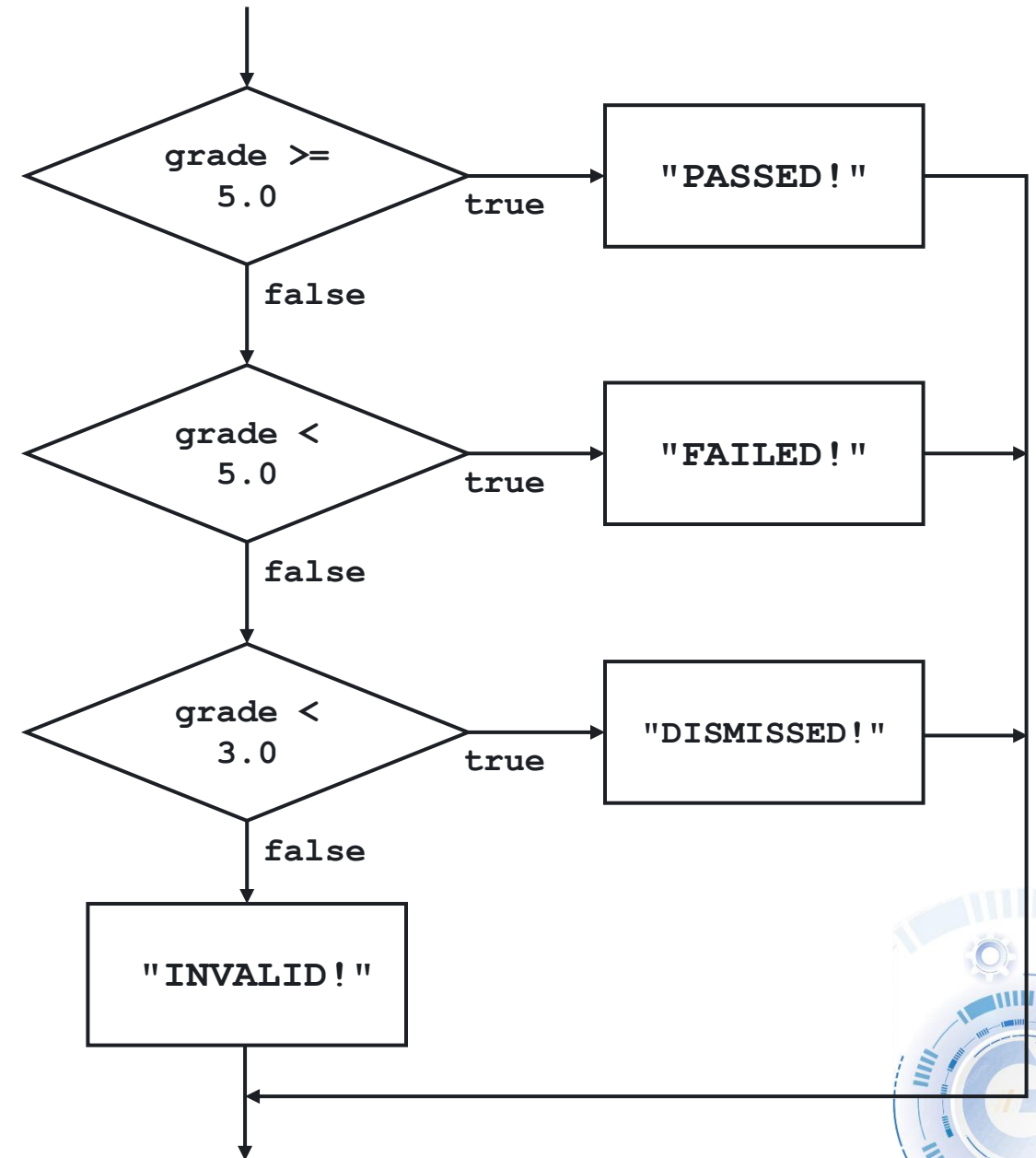
```
else:
```

```
    // if condition 1 and 2 are false
```



# EXERCISE

```
if grade >= 5.0:  
    print("PASSED!")  
  
elif grade < 5.0:  
    print("FAILED!")  
  
elif grade < 3.0:  
    print("DISMISSED!")  
  
else:  
    print("INVALID!")
```



# LABORATORY

