### **Nested if-else Problems**

## 1. Determine if a Number is Even, Odd, or Zero:

Write a program to check if the user-input number is zero, even, or odd.

# 2. Classify Triangle by Sides:

Ask the user for three side lengths of a triangle. Determine if the triangle is equilateral, isosceles, or scalene using nested if-else.

# 3. Check Voting Eligibility:

Ask the user for their age and citizenship status. Use nested if-else to check:

- If the user is at least 18 years old and
- If they are a citizen, they are eligible to vote.
- If not, they are not eligible due to citizenship.
- If under 18, display not eligible due to age.

#### 4. Student Scholarship Eligibility:

Ask the user for their grade and family income. Determine:

- If the grade is greater than or equal to 85, check income:
- If income is less than \$40,000, they are eligible for a full scholarship.
- Otherwise, they are eligible for a partial scholarship.
- If the grade is below 85, display not eligible for scholarship.

### 5. Nested Restaurant Menu:

Create a program where the user selects a meal type (e.g., Vegetarian or Non-Vegetarian) and then selects a specific dish:

- If Vegetarian:
- Options are Salad or Soup.
- If Non-Vegetarian:
- Options are Chicken or Fish.

Display their final choice.