

More Complex Conditionals

1

Nested Conditionals

- The body of a conditional statement can itself be a conditional statement
- The logic of such nested conditionals can be arbitrarily complex
 - Can do lots of cool things
 - Can be difficult and tricky to do correctly

3

Example

- Determine if a given number is within a specified range
- Write a method that returns a string that says if a given argument is either too low, too high, or just right

4

Multi-way `if/else` Statements

- Follow the formatting suggestion in the book to avoid deeply nested conditionals' tendency to "creep" to the right off the screen
- This format hides the true logical structure, but provides an easier to read practical structure

5

Errors in Conditions

- It is easy to get compound condition expressions wrong
- Evaluate these expressions:

○ `value > 0 || value < 10`
tautology

○ `value < 0 && value > 10`
contradiction

6

Next . . .

Modeling real objects

7