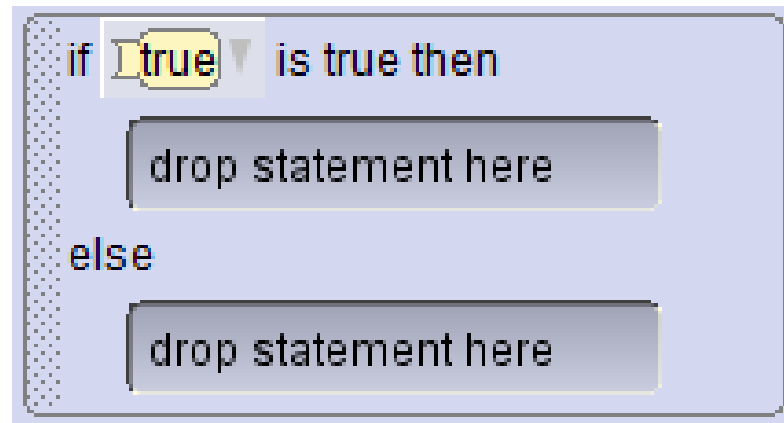


CompSci 94

Making Decisions with If statements

October 1, 2024



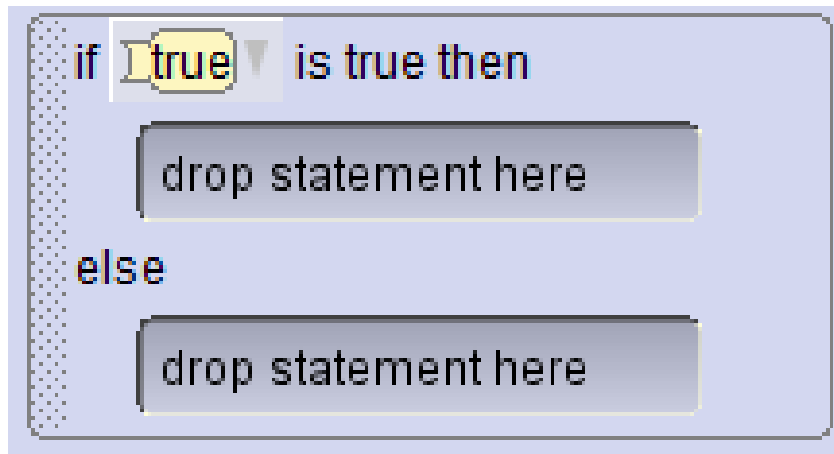
Prof. Susan Rodger

Announcements

- Assignment 3 due Oct 8!
 - Don't forget the reflect form
- Videos and QZ10 due Thursday, Oct 3 when class starts
- Don't get behind, be sure to check your grades on Canvas for Classwork

If statements

- What types can you compare in an if statement?



If statements

- What types can you compare in an if statement?
 - Numbers
 - Directions
 - Paints
 - TextStrings
 - Objects
 - etc

Relational (DecimalNumber) { ==, !=, <, <=, >=, > } ▶

Relational (WholeNumber) { ==, !=, <, <=, >=, > } ▶

Relational (SThing) { ==, != } ▶

Relational (MoveDirection) { ==, != } ▶

Relational (TurnDirection) { ==, != } ▶

Relational (RollDirection) { ==, != } ▶

Relational (Key) { ==, != } ▶

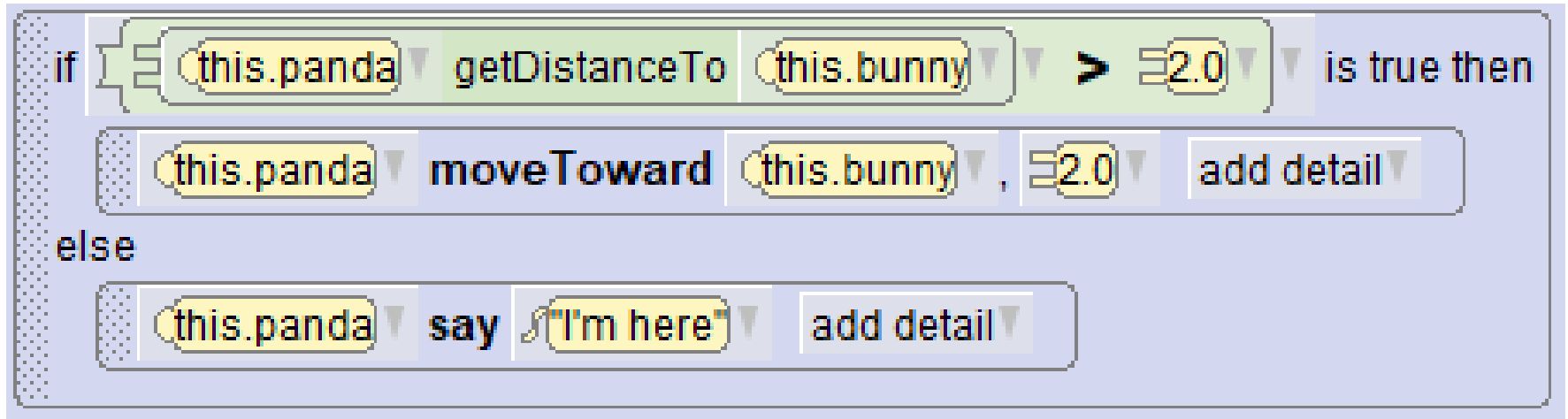
Relational (Color) { ==, != } ▶

Relational (Paint) { ==, != } ▶

TextString Comparison ▶

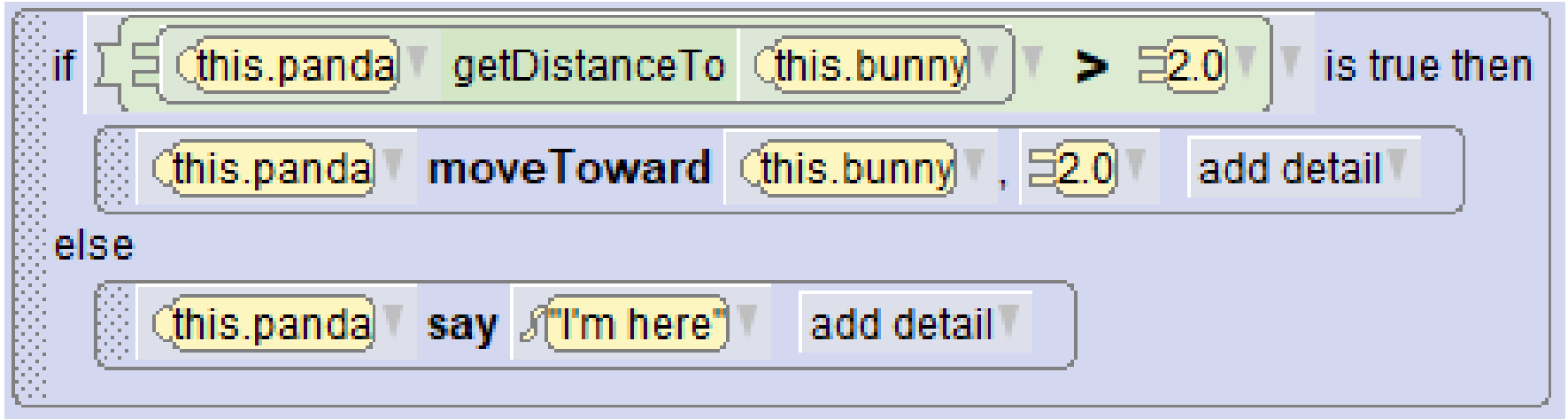
Q1 Panda distanceTo

- What does this code do when it executes?



Q1 Panda distanceTo

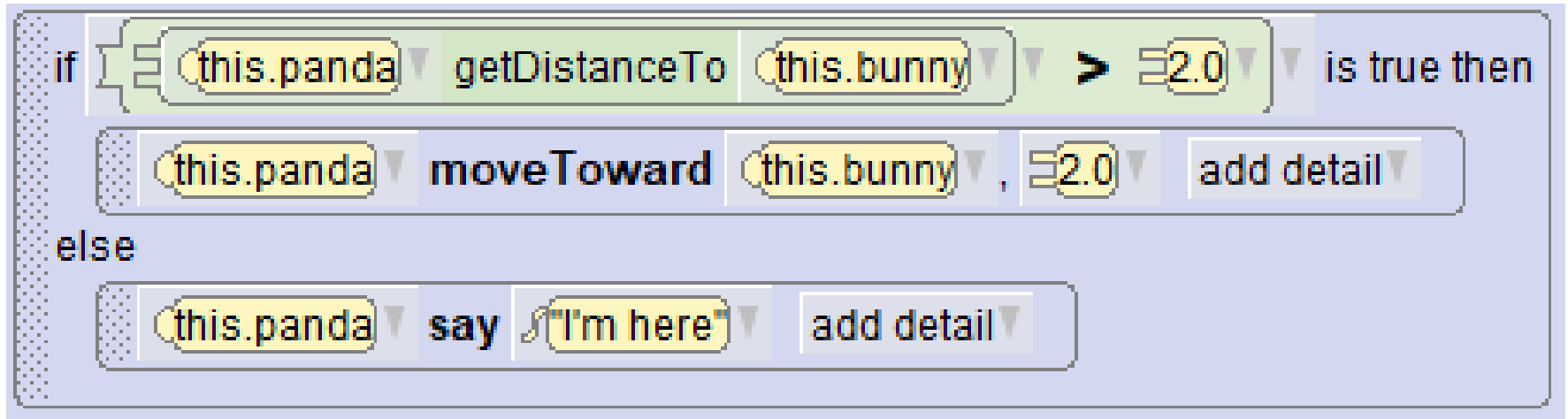
- What does this code do when it executes?



- If the panda is more than two units from the bunny, the panda moves two units towards the bunny
- Otherwise the panda says “I’m here”
- If the panda is 3 units from the bunny, can both the panda move and say “I’m here” happen?
 - NO! only one happens

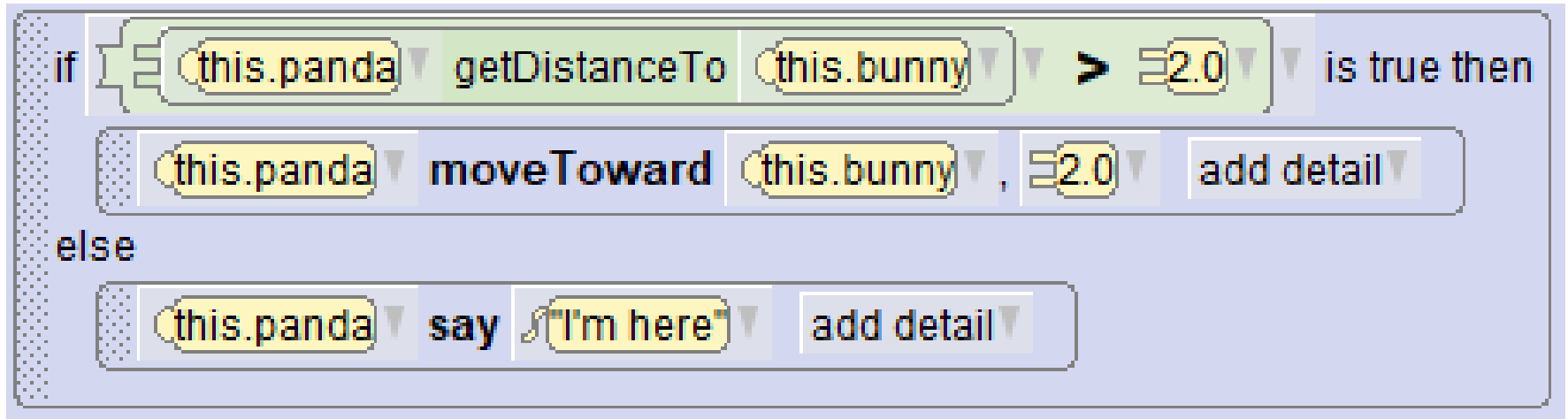
Q2. Create line w/ Panda distanceTo

- How does one create **first line** of this code?

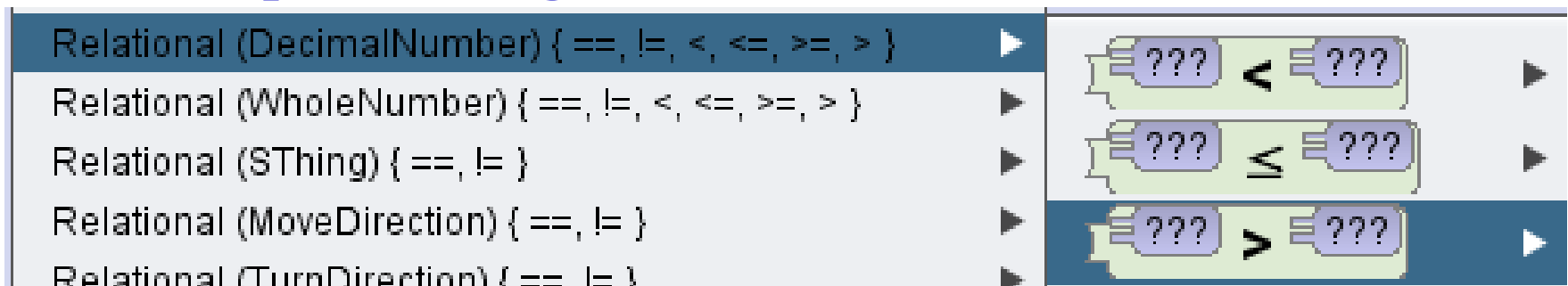


Q2. Create line w/ Panda distanceTo

- How does one create **first line** of this code?

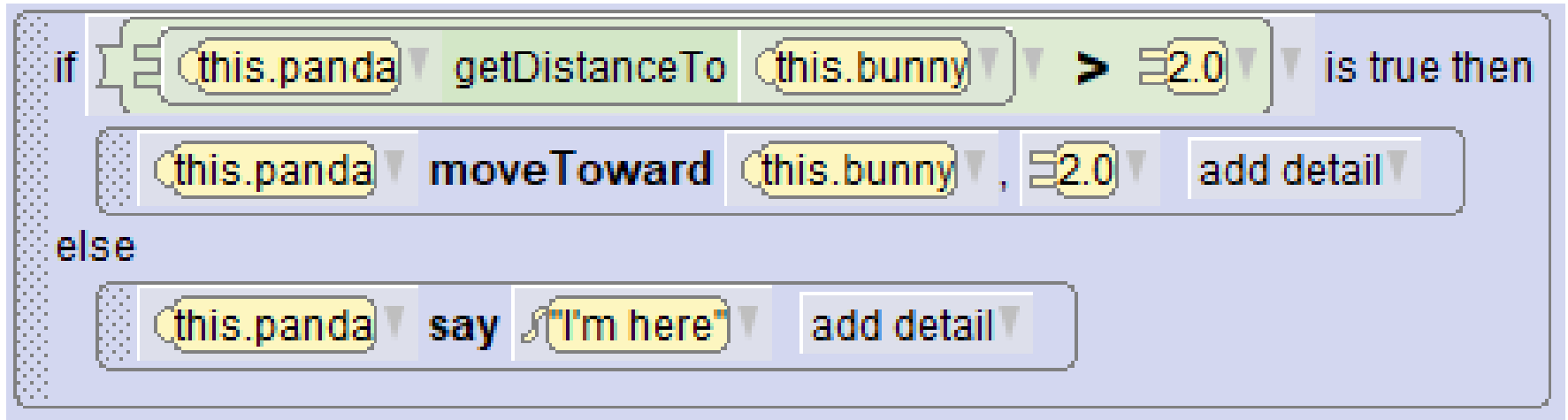


- First drag in an IF tile and select True
- Then click on True and select *decimal number compare with greater than*



Q2. Create line w/ Panda distanceTo

- How does one create **first line** of this code?

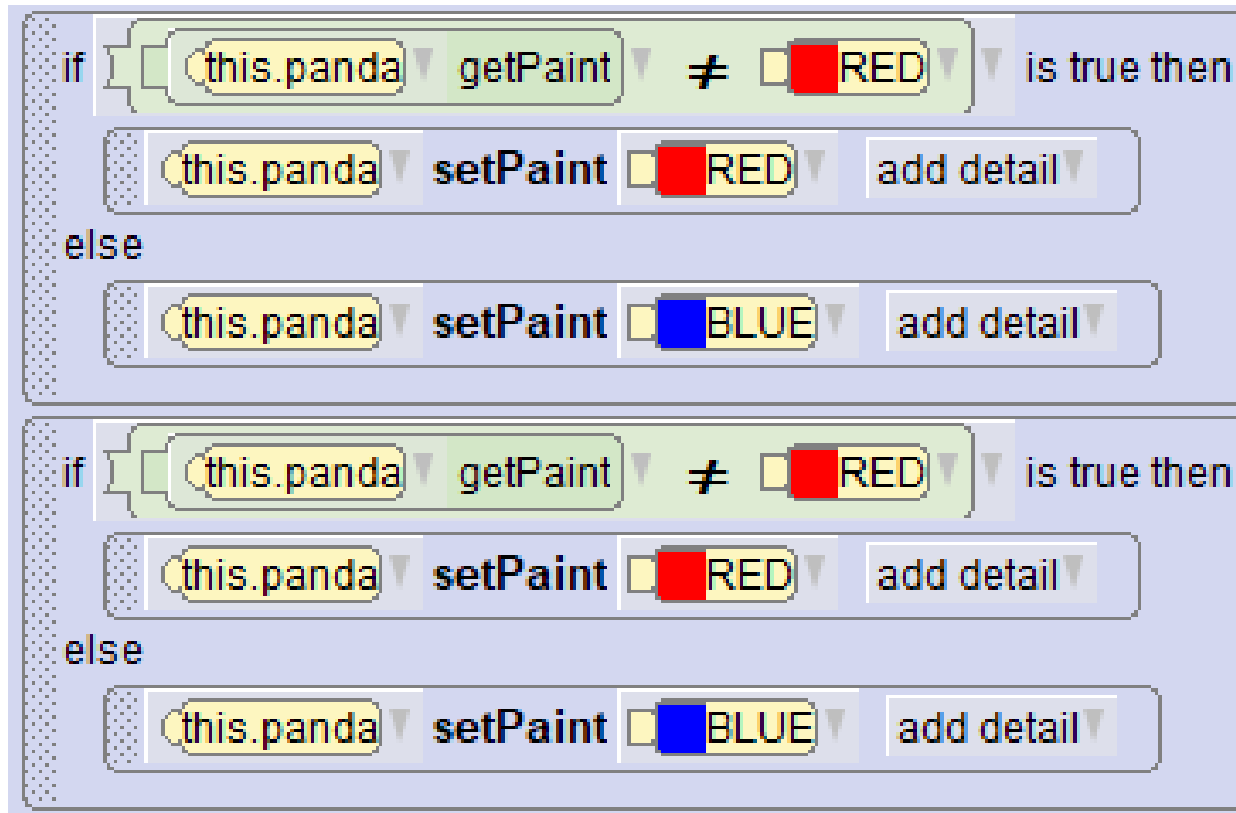


- First drag in an IF tile and select True
- Then click on True and select *decimal number compare with greater than*
- Select numbers 1.0 and 2.0
- Replace the 1.0 by dragging the function over it



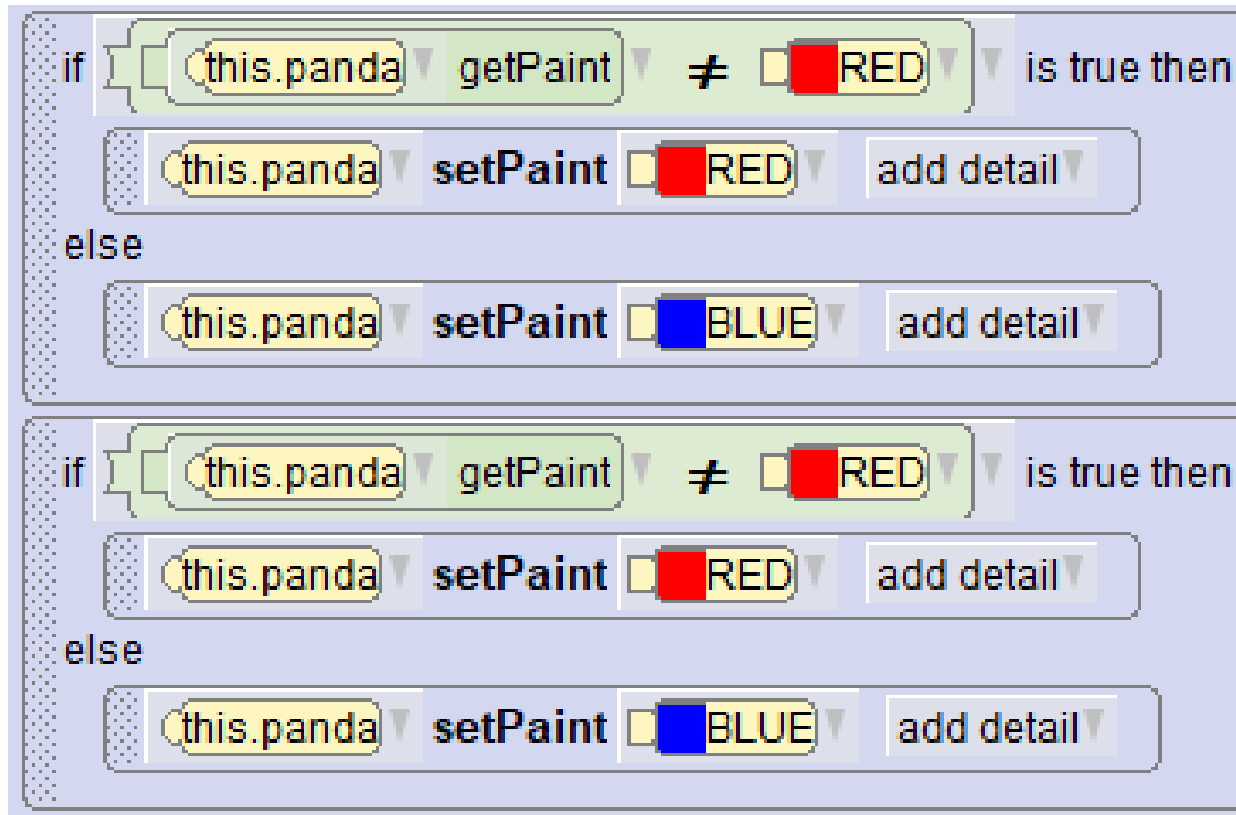
Q3 Making decisions - If statement

- What happens when this code runs?



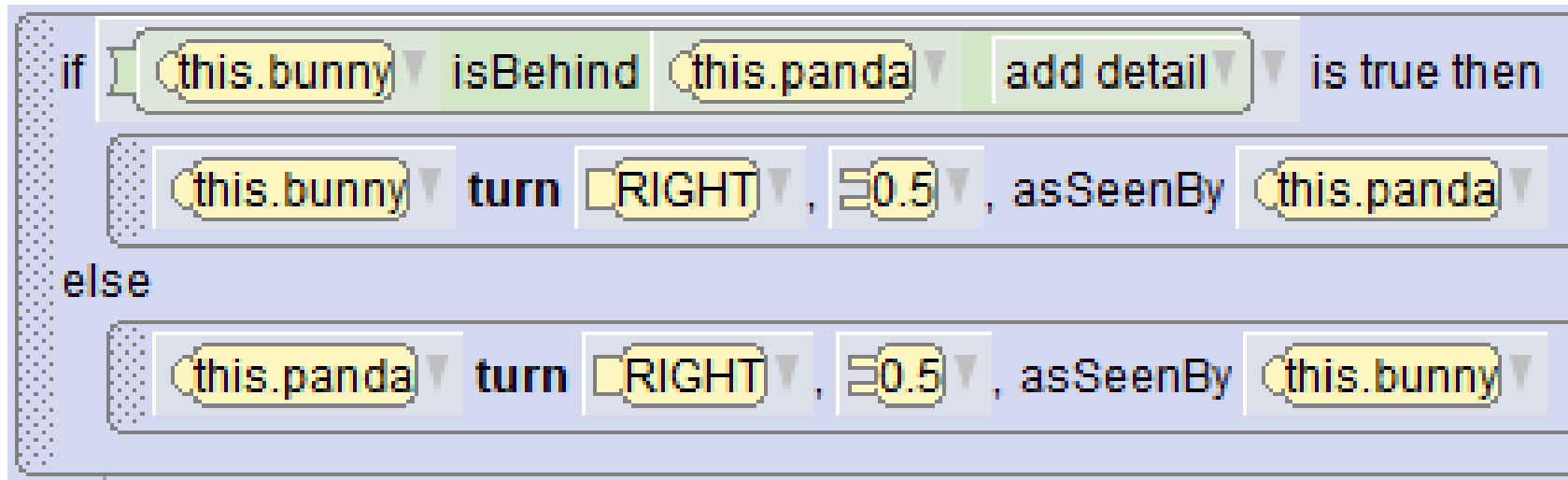
Q3 Making decisions - If statement

- What happens when this code runs?

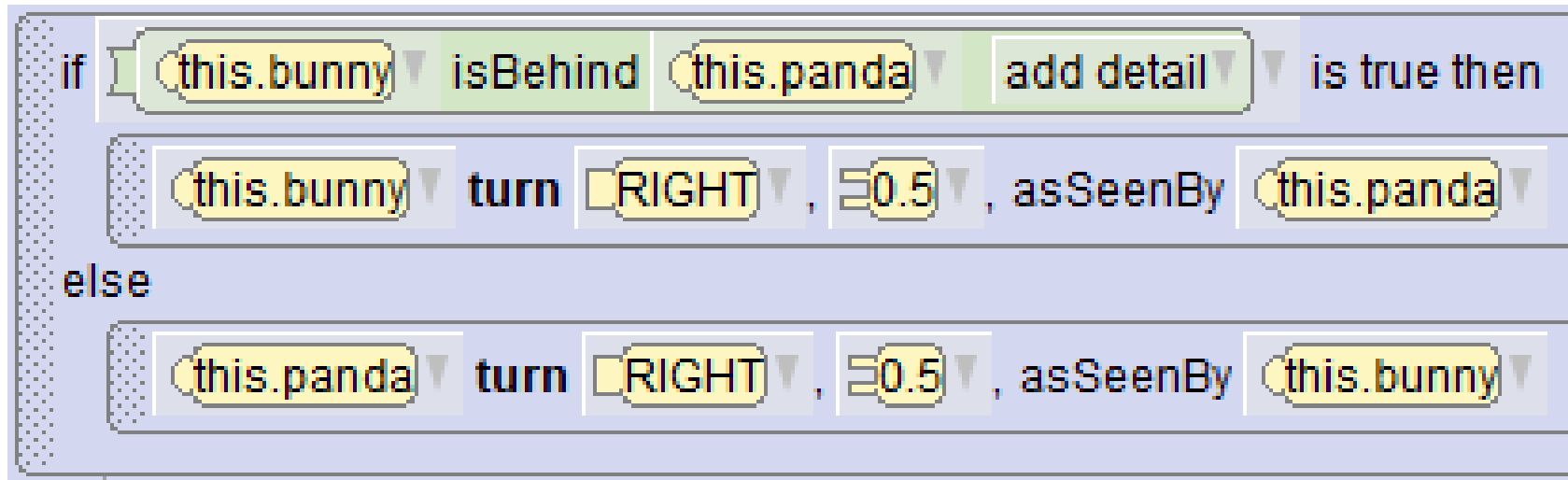


– Panda turns red and then panda turns blue

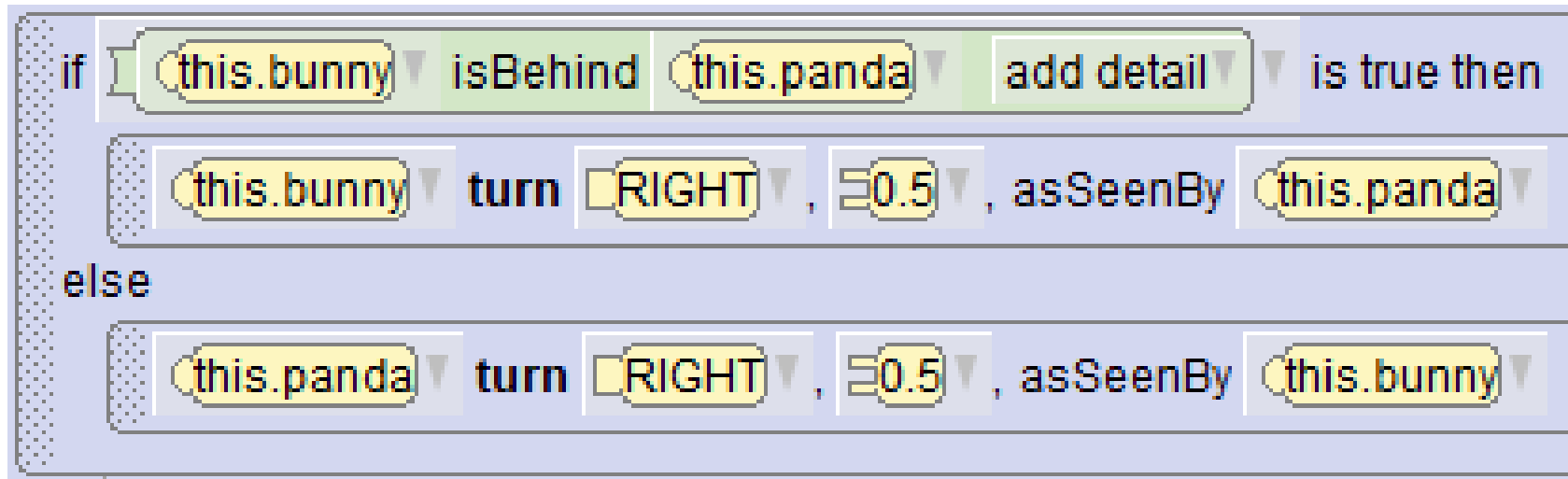
Q4 What happens when this If executes?



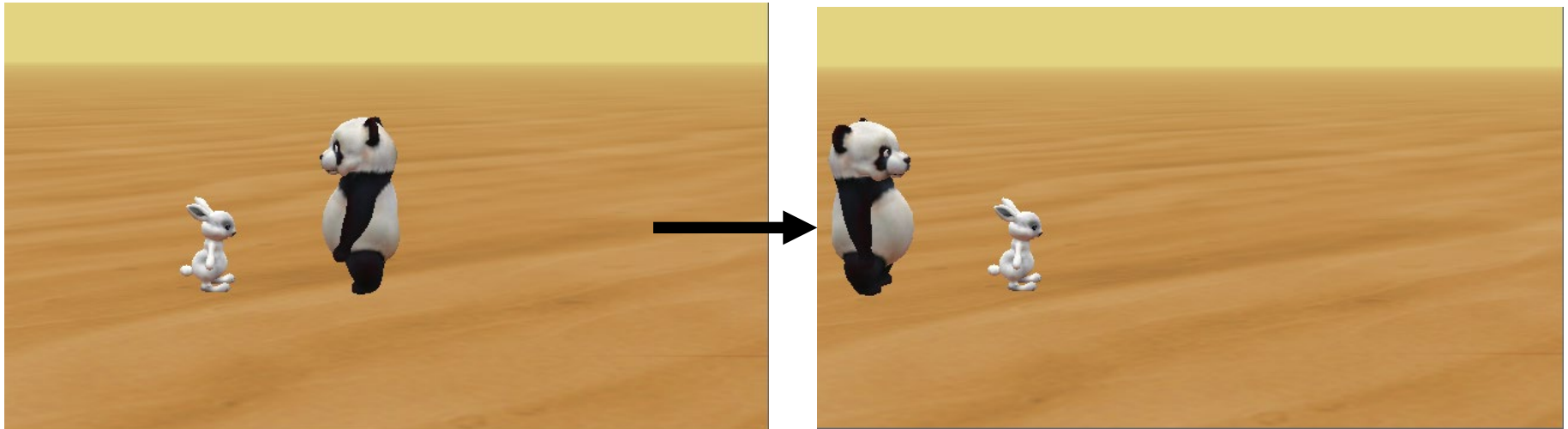
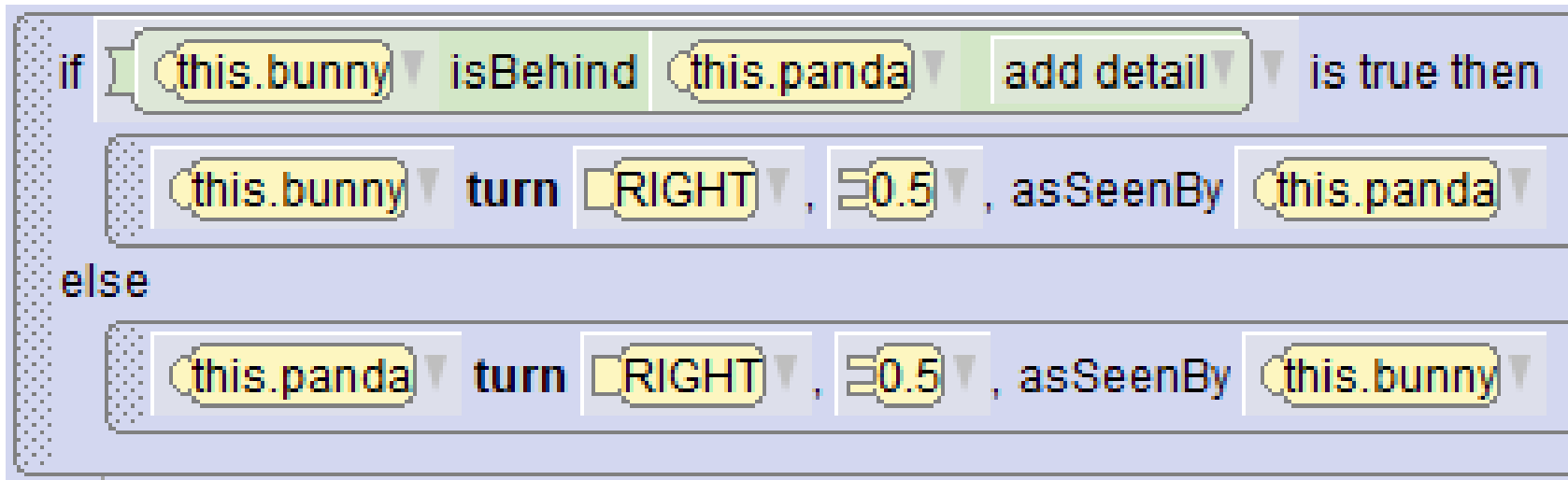
Q4 What happens when this If executes?



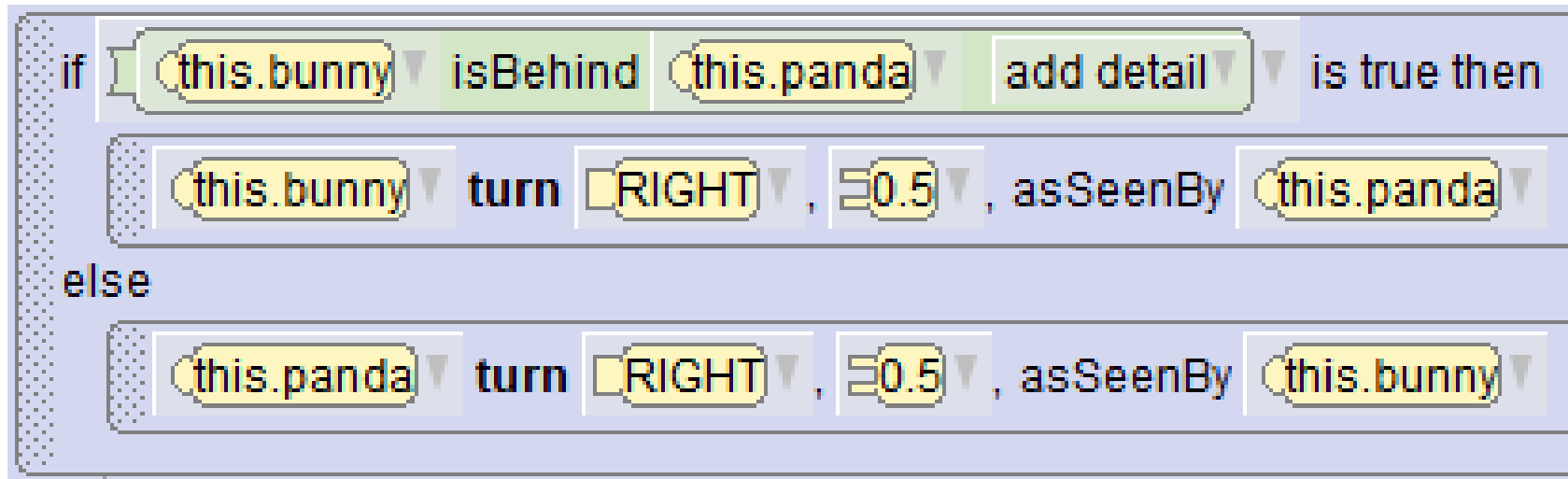
Q5 Execute a copy of the if again? (execute the same code a second time)



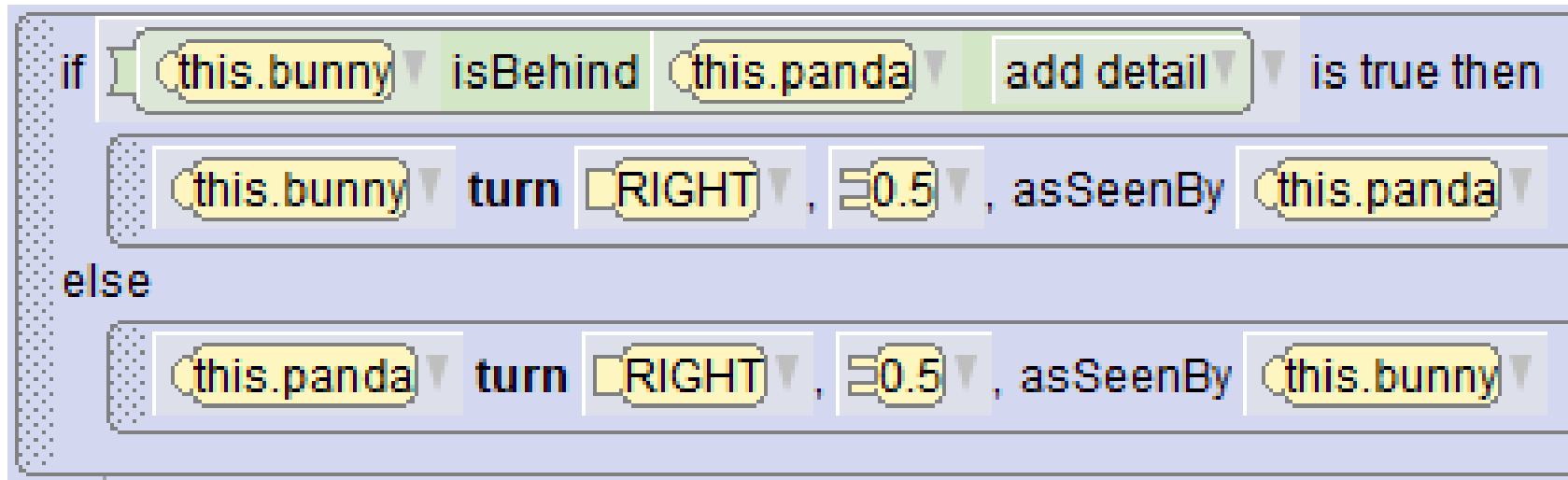
Q5 Execute a copy of the if again?



Q6 Execute a third copy of the if?



Q6 Execute a third copy of the if?



Class Today

- Working with making decisions

