Task: Add code to the Ball class sketch to make the ball object move across the x axis and change direction when it hits the left or right side of the canvas.

## **Step 1: Identify and comment subgoals**

Things to consider:

- What code was used in the original Bouncing Ball sketch to make this happen?
- Do we need to add attributes or methods to make this work?
- What instance variables will be used?
- Where does this new code need to go (inside Class? Constructor? In Setup function? Draw function? both?)

# Step 2 - Add code to your code. Include comments to explain what each line is doing.

#### Extensions (must include at least one to receive 4 on rubric)

**Medium** - Have the Ball also move along the y axis and bounce off of the top and bottom of the canvas.

**Spicy** - Create another class called Box. This Class should have a square or rectangle which also moves around the screen. This should use a parameterized constructor function to determine the location, size and color of each Box object that is made.

# **Rubric**

### Grade will be based on comments/subgoals/code for entire sketch

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Frequency of comments	All parts of code are commented	Most parts of code is commented	Some code is commented	Little to no code is commented
Use of comments/sub goals to demonstrate understanding	Comments/subgoals provide clear and detailed explanations which demonstrate clear understanding of what code is doing	Comments/subgoals provide adequate explanations which demonstrate general understanding of what code is doing	Comments/subgoals are unclear/require more detail to demonstrate understanding of what code is doing	Comments/subgoals are inaccurate and/or demonstrate lack of understanding of what code is doing
Mastery of Concept	Code exceeds expectations for demonstrating understanding of concept	Code meets expectations for demonstrating understanding of concept	Code is approaching expectations for demonstrating understanding of concept	Code is below expectations for demonstrating understanding of concept