

5/4/10

Notes for Collision Lab

For each trial

Before (STATED in lab)



EMPTY

$$\begin{array}{ll}
 m \cdot v = p & m \cdot v = p \\
 0.5 \cdot 0.35 = .175 \frac{\text{kg} \cdot \text{m}}{\text{s}} & .5 \cdot 0 = 0 \frac{\text{kg} \cdot \text{m}}{\text{s}}
 \end{array}$$

add

$$.175 + 0 =$$

$$.175 \frac{\text{kg} \cdot \text{m}}{\text{s}}$$

close enough!

collision

After (PREDICTION) Before each trial is done



After (WHAT ACTUALLY HAPPENS)

$$\begin{array}{ll}
 m \cdot v = p & m \cdot v = p \\
 .5 \cdot 0 = 0 \frac{\text{kg} \cdot \text{m}}{\text{s}} & .5 \cdot 0.37 = .185 \frac{\text{kg} \cdot \text{m}}{\text{s}}
 \end{array}$$

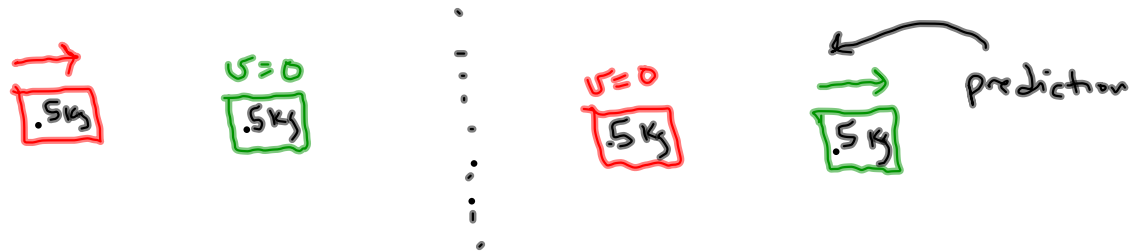
add

$$.185 + 0 =$$

$$.185 \frac{\text{kg} \cdot \text{m}}{\text{s}}$$

After you've made and tested your prediction, you'll use Logger Pro to make measurements. Do the total momentums before and after the collision match up? (Are they close enough?)

Case #1



Case #2

