

Conservation of Momentum Problems 2



- 1.) Scan the QR code to watch the video that relates to this problem.
 - a. Using the initial positions of the two balls and the change in time, what are the initial velocity of each ball?

b. Assuming momentum is conserved, what is the velocity of the 2nd object after the collision?

c. Use the conservation of energy to prove if this collision was elastic or inelastic.



- 2.) Scan the QR code to watch the video that relates to this problem.
 - a. Is this collision (circle one) elastic inelastic perfectly inelastic

b. What is the final velocity for both objects after the collision?

c. How much energy was lost in this collision?



- 3.) Scan the QR code to watch the video that relates to this problem.
- In this explosion, what is the final velocity of the blue object?

b. What is the LEAST amount of potential energy that was present before the explosion?



- 4.) Scan the QR code to watch the video that relates to this problem.
- Predict the final velocity of both objects if this is a perfectly inelastic collision.



- 5.) Scan the QR code to watch the video that relates to this problem.
- What is the velocity of object 1 after the collision?

b. Prove if this is an elastic or inelastic equation with the use of energy.



- 6.) Scan the QR code to watch the video that relates to this problem.
- What is the velocity of red object after the collision?

b. Prove if this is an elastic or inelastic equation with the use of energy.