



$$v = .459 \text{ m/s} \quad v = 0$$

$$v = .2153 \text{ m/s} \quad v = .2127 \text{ m/s}$$

$$p = m \cdot v$$

$$= .5 \cdot .6759$$

$$= .338 \text{ kg} \cdot \text{m/s}$$

$$p = m \cdot v$$

$$= 1 \cdot 0$$

$$= 0$$

$$p = m \cdot v$$

$$= .5 \cdot .2153$$

$$= .108 \text{ kg} \cdot \text{m/s}$$

$$p = m \cdot v$$

$$= 1 \cdot .2127$$

$$= .2127 \text{ kg} \cdot \text{m/s}$$

$$p = 0.338 \text{ kg} \cdot \text{m/s}$$

$$p = 0.321 \text{ kg} \cdot \text{m/s}$$

The Law of Conservation of momentum tells us: \_\_\_\_\_

The momentum of the 1<sup>st</sup> cart should be transferred to \_\_\_\_\_.

The momentums before/after the collision are close because...