

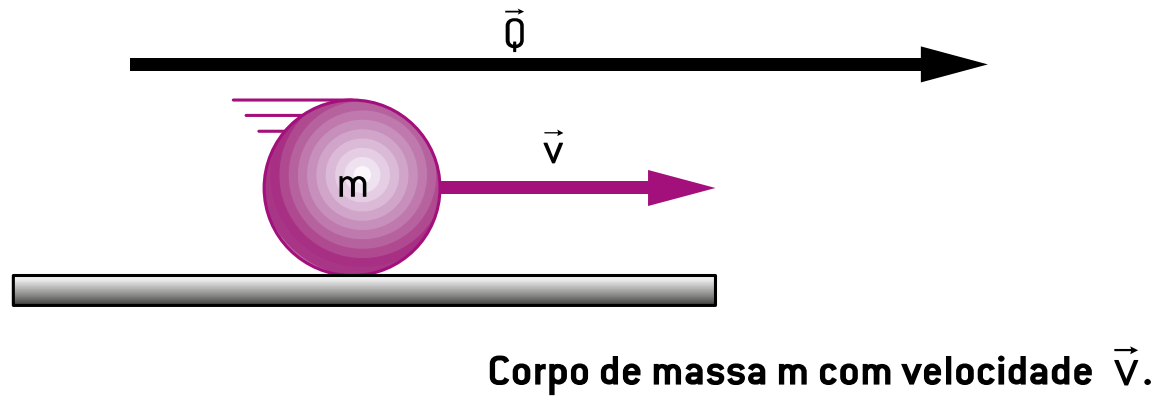
Quantidade de Movimento e Impulso

Profº. André Astro
Física

Quantidade de Movimento e Impulso



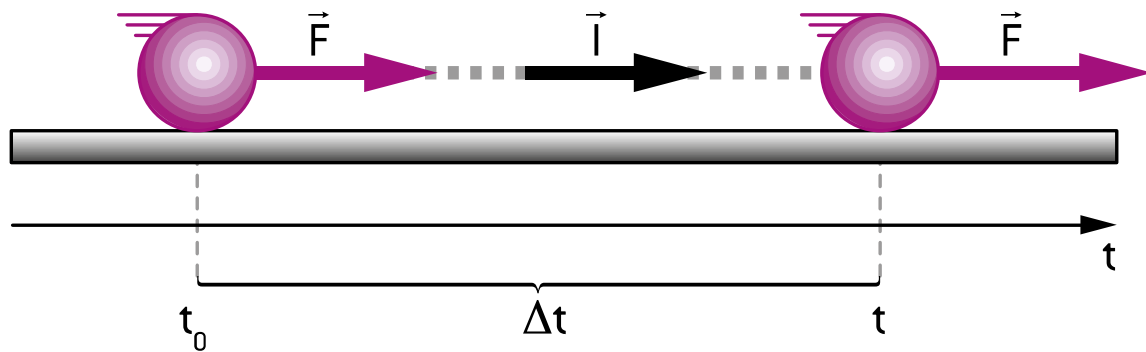
Quantidade de Movimento



$$\vec{Q} = m \cdot \vec{v}$$

(Kg) . (m/s)

Impulso

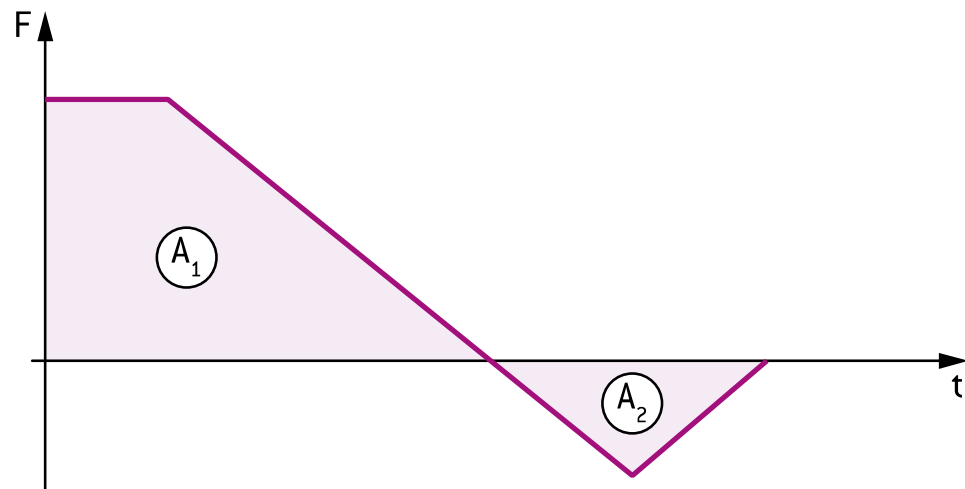


$$\vec{I} = \vec{F} \cdot \Delta t$$

(N) · (s)

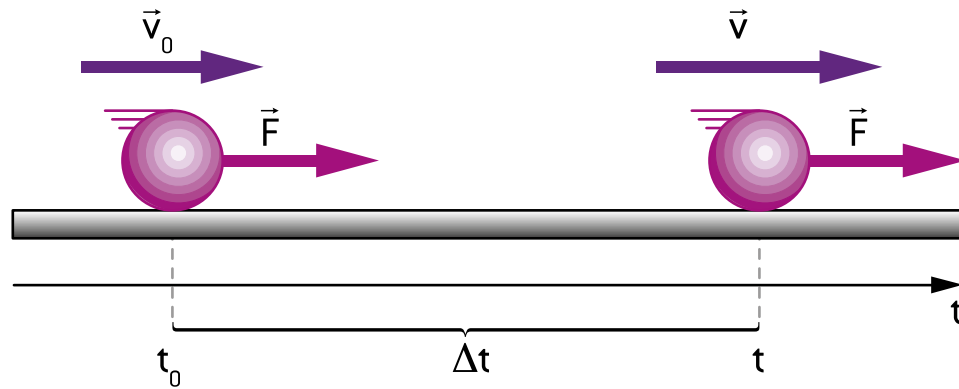
E se a força não for constante?

Gráfico



$$A \stackrel{N}{=} I$$

Tem como unir os dois conceitos?



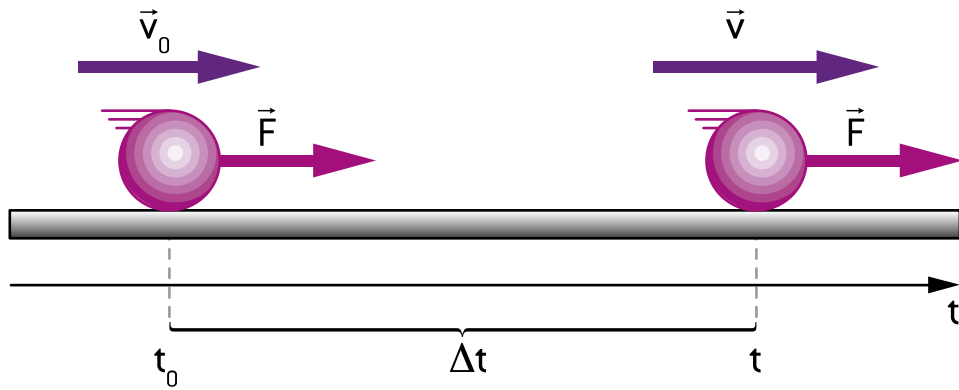
$$\vec{I}_R = \Delta \vec{Q}$$

$$(\text{N}) \cdot (\text{s}) \quad (\text{Kg}) \cdot (\text{m/s})$$

$$(\text{Kg} \cdot \text{m/s}^2) \cdot (\text{s})$$

$$(\text{Kg}) \cdot (\text{m/s})$$

Teorema do Impulso



$$\vec{I}_R = \Delta \vec{Q}$$

$$F \cdot \Delta t = Q_{final} - Q_{Inicial}$$

Física do AirBag



OBRIGADO

Prof.^a André Astro
Física