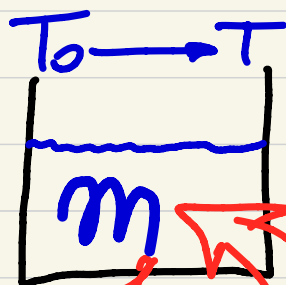



CALORIMETRIA - PARTE II

1. TIPOS DE CALOR.

↔ CALOR SENSÍVEL.



É aquele que, cedido ou recebido, gera variação de temperatura.

$$Q_s = m \cdot c \cdot \Delta T$$

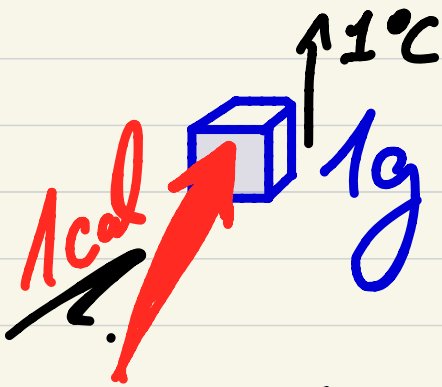
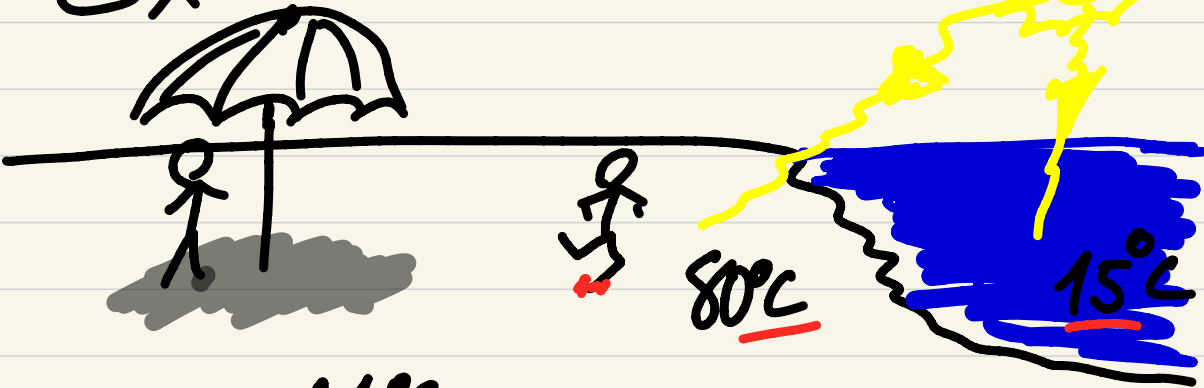
Diagram showing the equation $Q_s = m \cdot c \cdot \Delta T$ with arrows pointing to each term: Q_s points to 'Quantidade de calor sensível', m points to 'massa', c points to 'calor específico sensível', and ΔT points to 'Var. de Temp.'.

Quantidade
de calor
sensível

calor
específico
sensível

Var. de
Temp.

Ex:



$$c = 1,0 \text{ cal/g}^\circ\text{C}$$

A'g.



$$c = 0,2 \text{ cal/g}^\circ\text{C}$$

Areia

UNIDADES

$$Q_s \begin{cases} \longrightarrow \text{cal} \\ \longrightarrow \text{J} * \text{S.I.} \end{cases}$$
$$1 \text{ cal} \longrightarrow 4,2 \text{ J}$$

$$m \begin{cases} \longrightarrow \text{g} \\ \longrightarrow \text{Kg} * \text{S.I.} \end{cases}$$

$$T \begin{cases} \longrightarrow ^\circ\text{C} \\ \longrightarrow ^\circ\text{F} \\ \longrightarrow \text{K} * \text{S.I.} \end{cases}$$

c → $\frac{\text{cal}}{\text{g} \cdot ^\circ\text{C}}$
→ $\frac{\text{J}}{\text{kg} \cdot \text{K}}$ *S.I.

$$Q_s = m \cdot c \cdot \Delta T$$

$$c = \frac{Q_s}{m \cdot \Delta T}$$

• CAPACIDADE TÉRMICA (C)

$$C = \frac{Q_s}{\Delta T} = m \cdot c$$