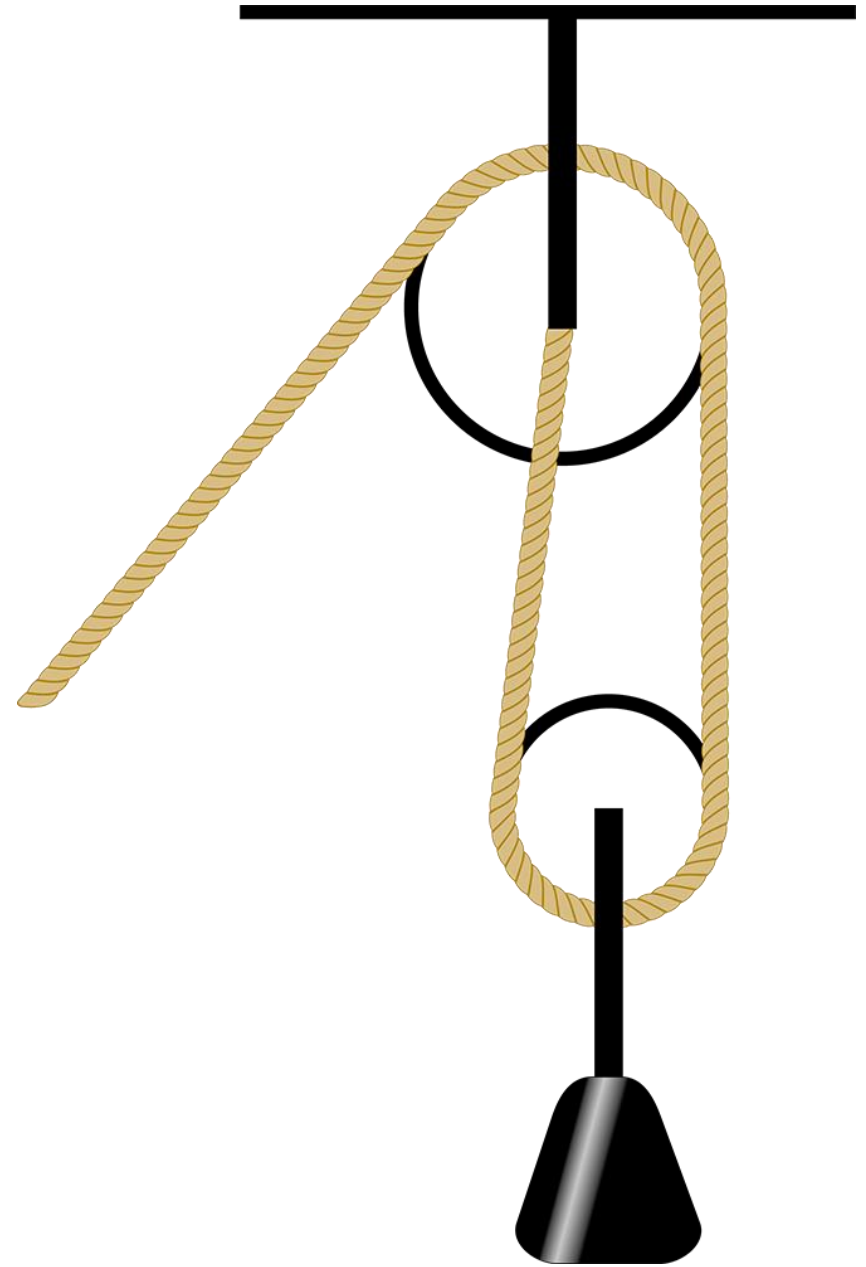
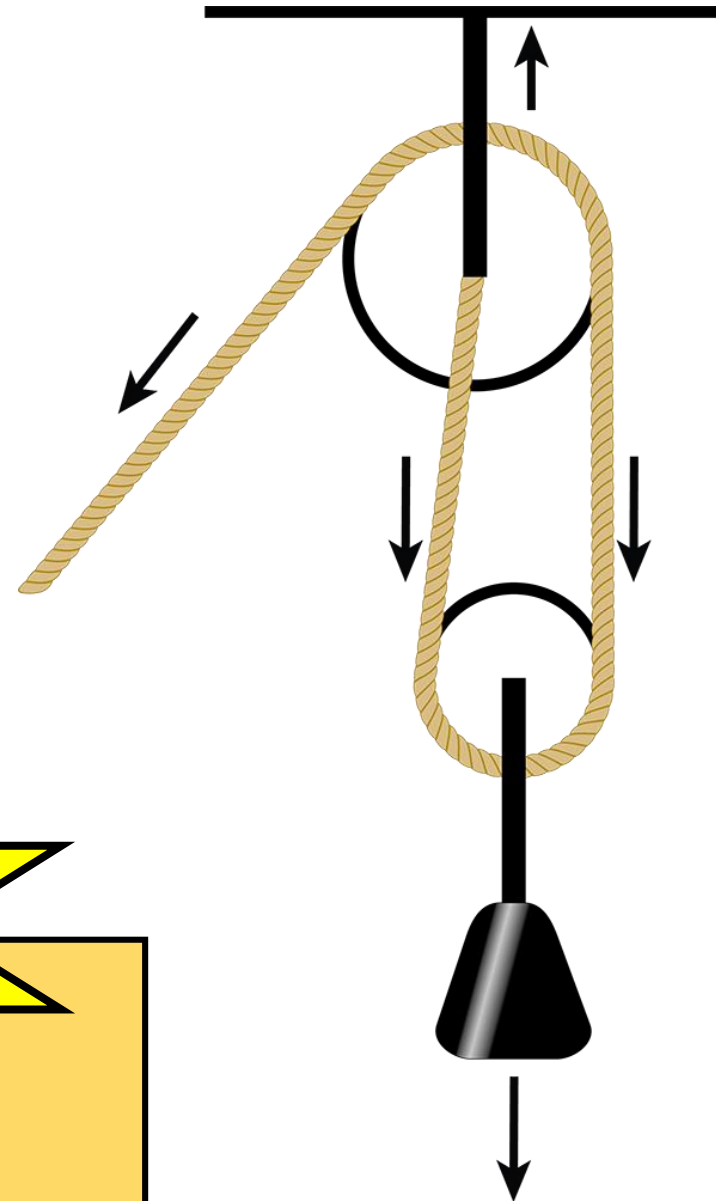


# Flaschenzug



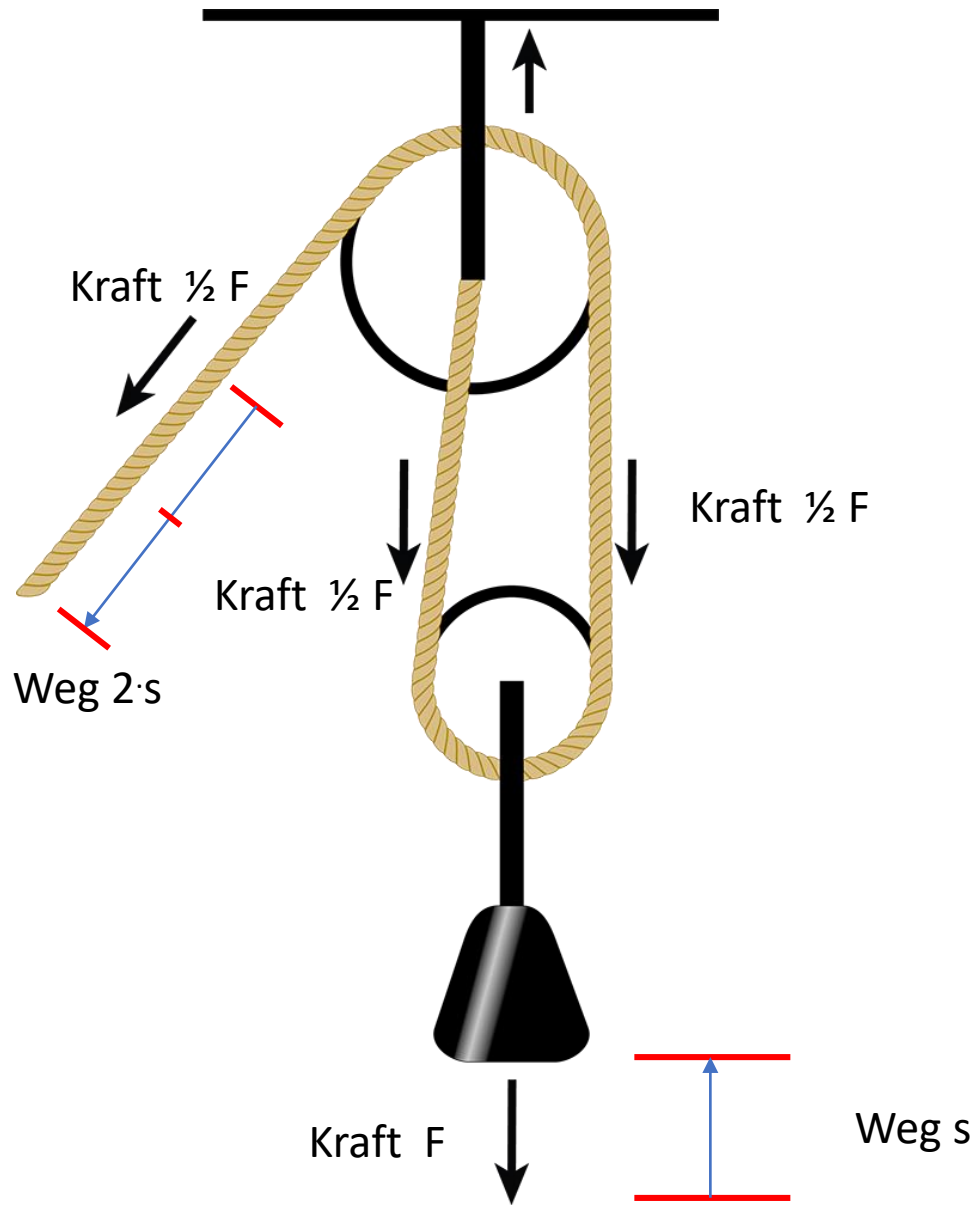
# Flaschenzug

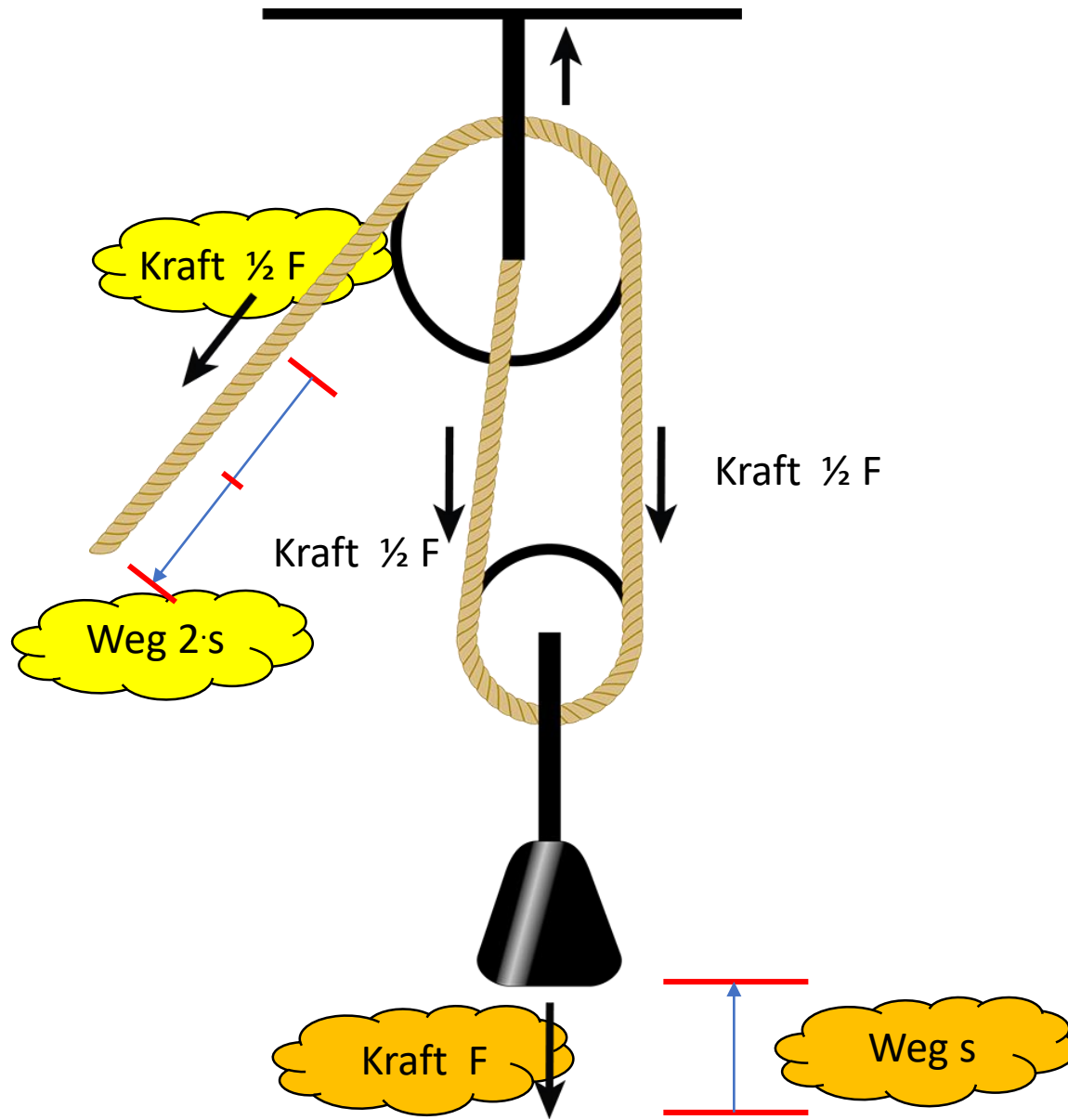
- Maschine
- notwendige Kraft wird verringert
- Weg wird verlängert



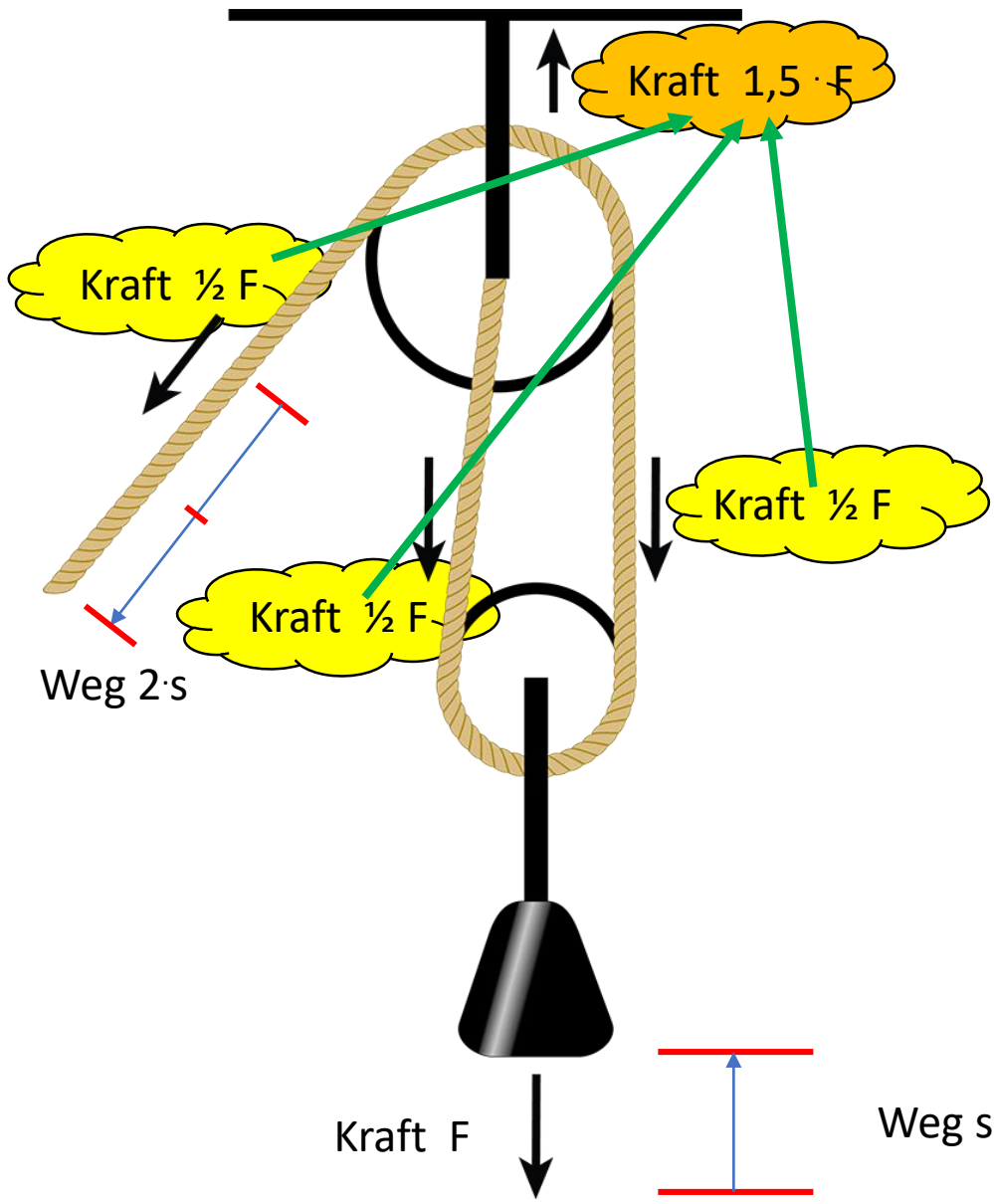
**Goldene Regel  
der Mechanik**

Was man an Kraft spart,  
muss man an Weg zusetzen.

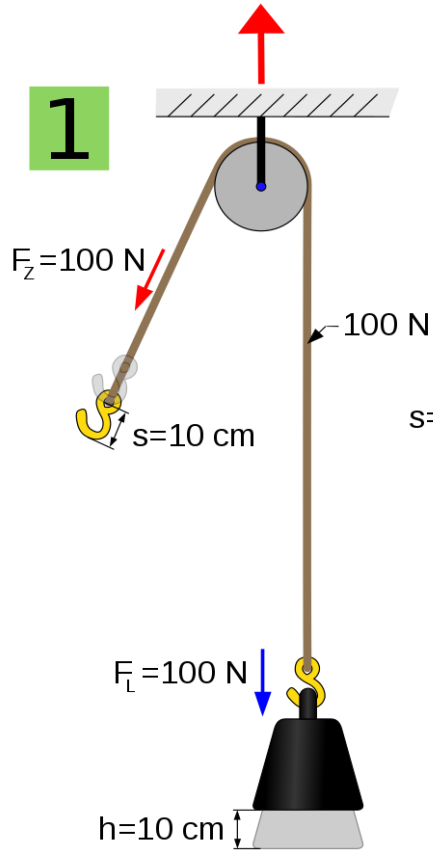




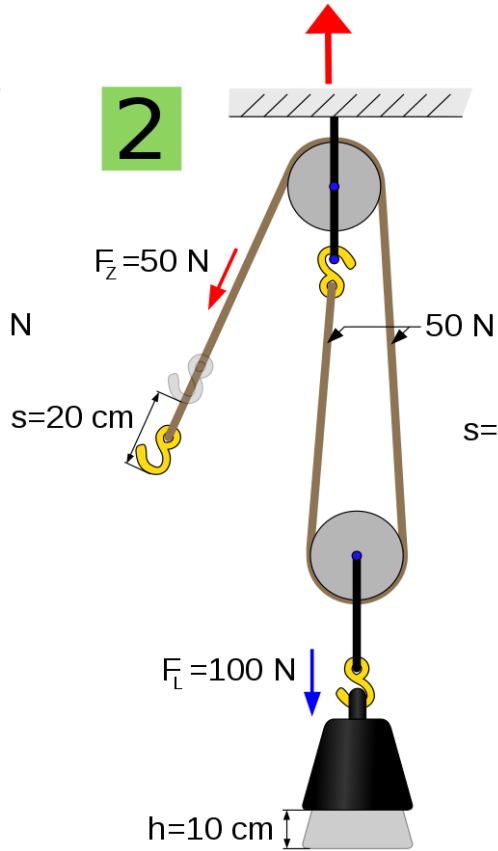
$$\frac{1}{2} F \cdot 2 \cdot s = F \cdot s$$



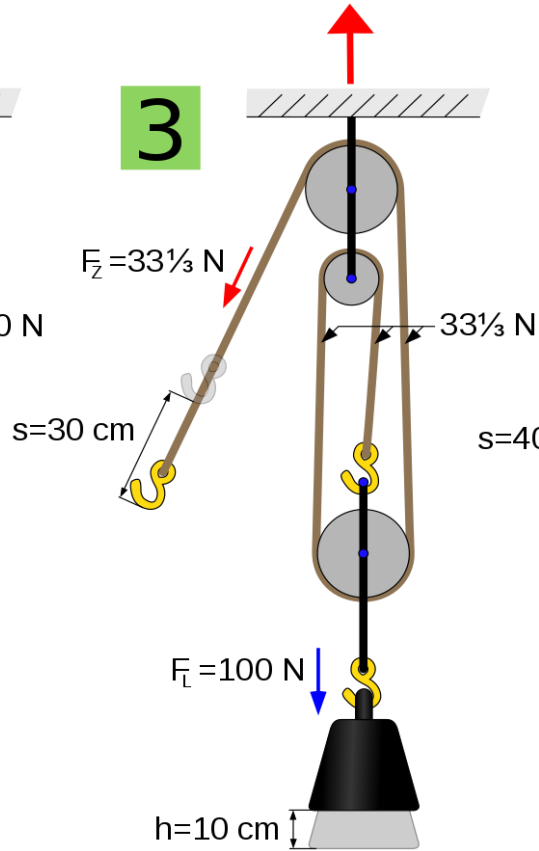
$$F_H = 200 \text{ N}$$

**1****1:1**

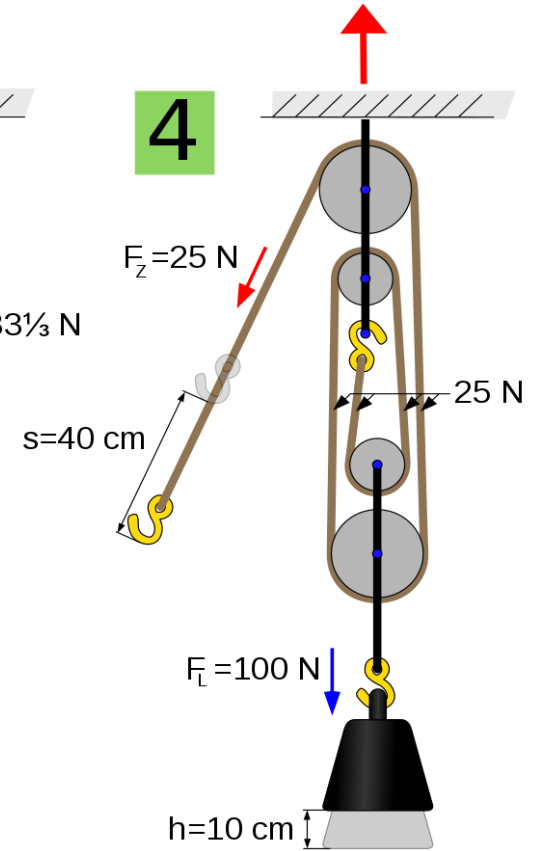
$$F_H = 150 \text{ N}$$

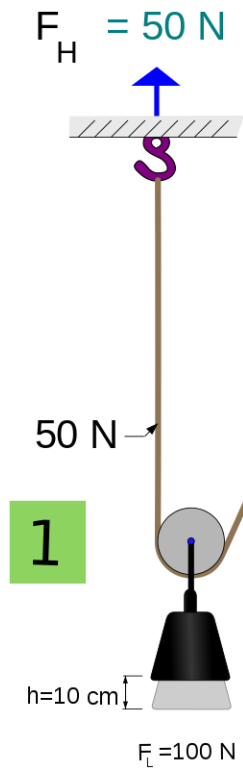
**2****1:2**

$$F_H = 133\frac{1}{3} \text{ N}$$

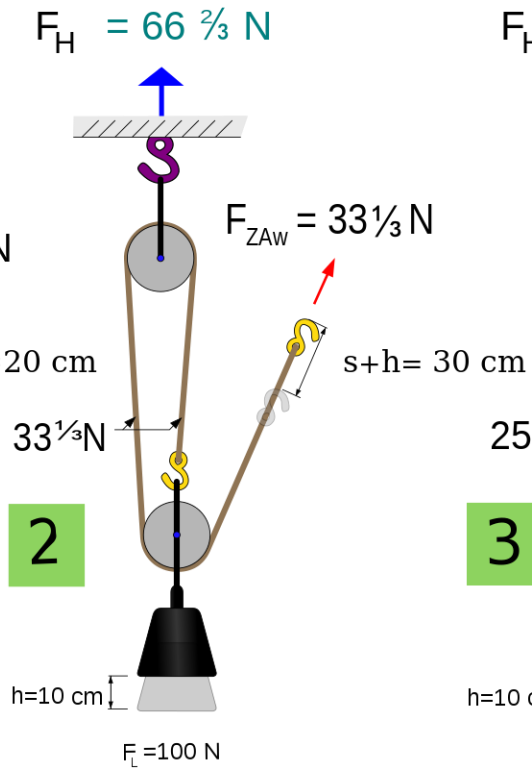
**3****1:3**

$$F_H = 125 \text{ N}$$

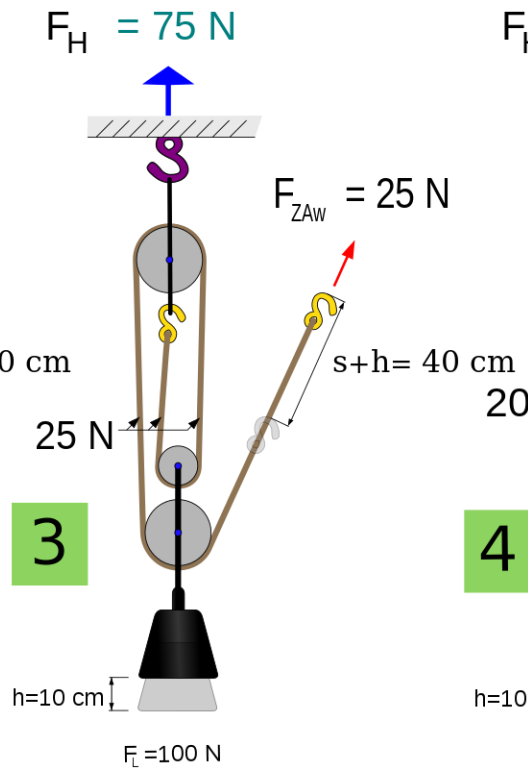
**4****1:4**



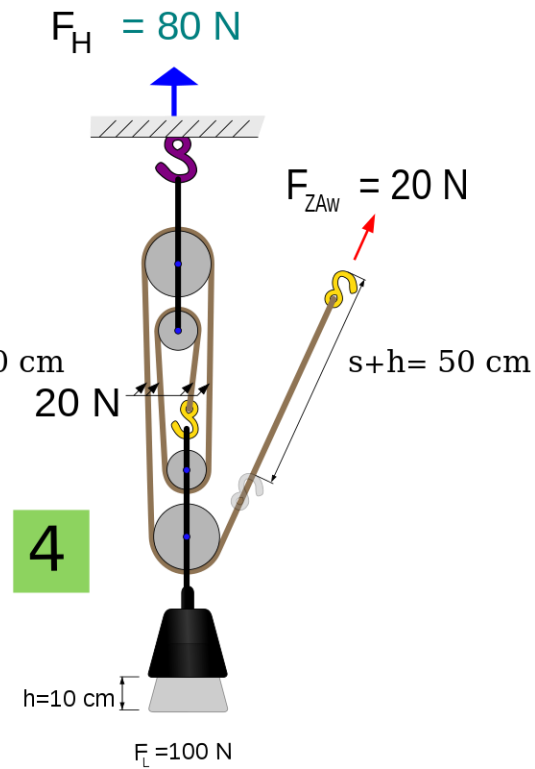
1:2



1:3



1:4



1:5