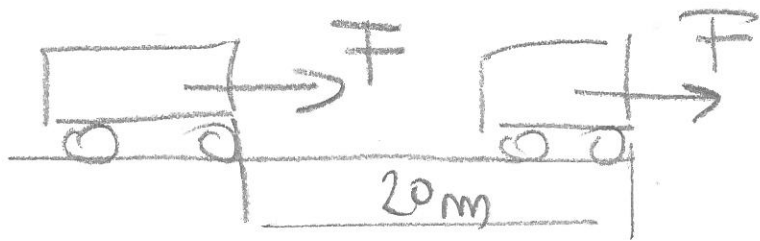


DELOVNI LIST - DELO!

① $F = 60\text{ N}$

$r = 20\text{ m}$



a) $A = ?$

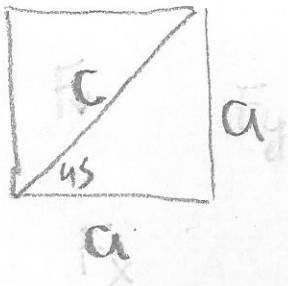
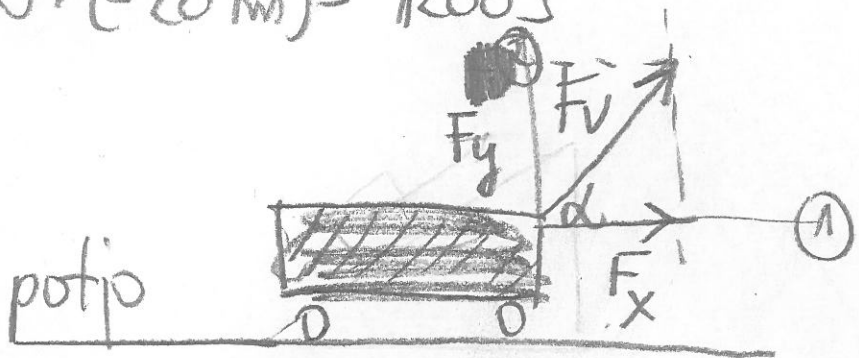
$A = F \cdot r = 1200\text{ J}$

b) $A = ?$

$A = F \cdot r = -60\text{ N} \cdot (-20\text{ m}) = 1200\text{ J}$

c) $\alpha = 45^\circ$

$F_x = ?$ je || s potjo



$\rightarrow c^2 = a^2 + a^2 = 2a^2$

$c^2 = 2a^2$

$a = \sqrt{\frac{c^2}{2}} = \frac{c}{\sqrt{2}} = \frac{\sqrt{2} \cdot c}{2}$

$F_x = \frac{\sqrt{2} \cdot 60}{2} = 42,4\text{ N}$

$F_y = 42,4\text{ N}$ ker je $\alpha = 45^\circ$

ali MERILO

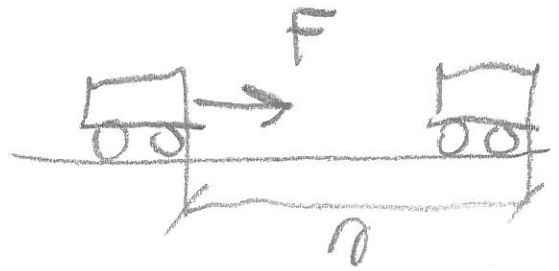
$A = F_x \cdot r = \underline{\underline{848\text{ N}}}$

d) $A = \phi$

$$2) F = 30 \text{ kN} = 30 \cdot 10^3 \text{ N}$$

$$A = 120 \text{ MJ} = 120 \cdot 10^6 \text{ J}$$

$$r = ?$$



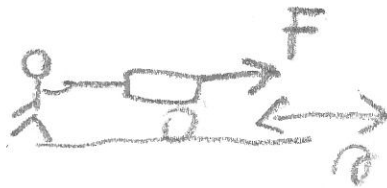
$$A = F \cdot r$$

$$r = \frac{A}{F} = \frac{120 \cdot 10^6 \text{ N} \cdot \text{m}}{30 \cdot 10^3 \text{ N}} = 4 \cdot 10^3 \text{ m} = 4 \text{ km}$$

$$3) A = ?$$

$$F = 50 \text{ N}$$

$$r = 8 \text{ m}$$



$$A = F \cdot r = 400 \text{ J}$$

$$4) F = 100 \text{ N}$$

$$r = 0,35 \text{ km} = 350 \text{ m}$$

$$A = F \cdot r = 35000 \text{ J} = 35 \text{ kJ}$$

$$5) A = 150 \text{ J}$$

$$r = 10 \text{ m}$$

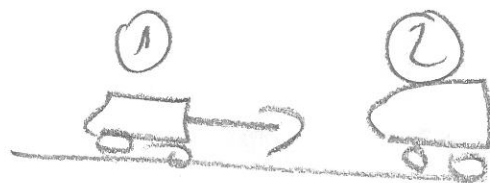


$$F = ?$$

$$A = F \cdot r$$

$$F = \frac{A}{r} = \frac{150 \text{ J}}{10 \text{ m}} = \frac{150 \cdot \text{N} \cdot \text{m}}{10 \text{ m}} = \underline{\underline{15 \text{ N}}}$$

⑥ $A = 0,1 \text{ MJ} = 0,1 \cdot 10^6 \text{ J}$
 $r = 200 \text{ mm}$

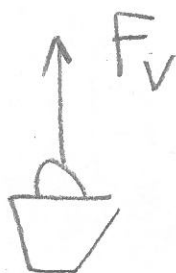


$$A = F \cdot r$$

$$F = \frac{A}{r} = \frac{0,1 \cdot 10^6 \text{ N} \cdot \text{m}}{200} = \frac{0,1 \cdot 10^6}{2 \cdot 10^2} = 0,05 \cdot 10^4 =$$

$$= \underline{\underline{500 \text{ N}}}$$

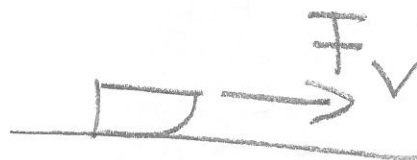
⑦ $A = 32 \text{ J}$
 $m = 8 \text{ kg}$
 $r = ?$



$$A = F \cdot r$$

$$r = \frac{A}{m} = \frac{32}{8} = 4 \text{ mm}$$

⑧ $m = 14 \text{ kg}$
 $F_v = \frac{F_g}{2} = \frac{140}{2} = 70 \text{ N}$



$$A = 0,77 \text{ kJ} = 770 \text{ J}$$

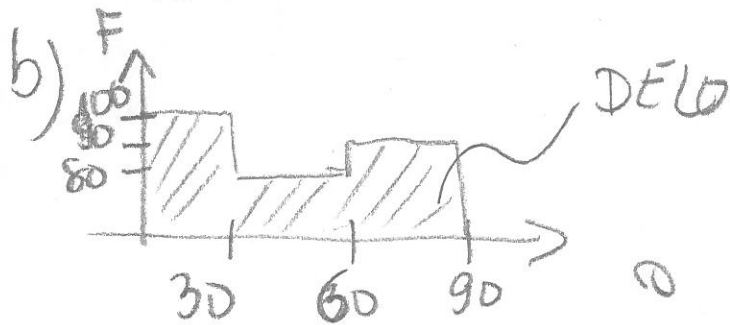
$$r = ?$$

$$A = F_v \cdot r$$

$$r = \frac{A}{F_v} = \frac{770 \text{ N} \cdot \text{m}}{70 \text{ N}} = \underline{\underline{11 \text{ mm}}}$$

g) $r_1 = 30 \text{ m}$; $F_1 = 100 \text{ N}$
 $r_2 = 30 \text{ m}$; $F_2 = 80 \text{ N}$
 $r_3 = 30 \text{ m}$; $F_3 = 90 \text{ N}$

a) $A_1 = F_1 \cdot r_1 = 3000 \text{ J}$
 $A_2 = -11- = 2400 \text{ J}$
 $A_3 = -11- = 2700 \text{ J}$
 $A_{\text{CELOTNO}} = \cancel{30} 8100 \text{ J}$



⑩ $h = 1,5 \text{ m}$

$N_G = 50$ $F_G = 60 \text{ N}$

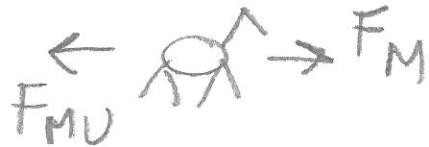
$N_D = 50$ $F_D = 40 \text{ N}$

$A_G = F_G \cdot 1,5 = 90 \text{ N}$

$A_D = F_D \cdot 1,5 = 60 \text{ N}$

$A = 50 \cdot A_G + 50 \cdot A_D = 50 (A_G + A_D) = 50 \cdot 150 =$
 $= \underline{\underline{7500 \text{ J}}}$

11) $A = 2$

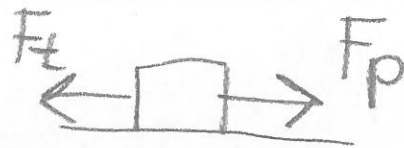


$F_M = 1200 \text{ N}$
 $r = 1,5 \text{ m}$ } $A_M = F \cdot r = 1200 \cdot 1,5 = 1800 \text{ J}$

$F_{MU} = -800 \text{ N}$
 $r = 1,5 \text{ m}$ } $A_{MU} = F \cdot r = -800 \cdot 1,5 = -1200 \text{ J}$

$A = 600 \text{ J}$

12) $F_p = 900 \text{ N}$
 $F_t = 300 \text{ N}$
 $r = 12 \text{ m}$



$A_p = F_p \cdot r = 10800 \text{ J}$

$A_t = -3600 \text{ J}$

$A = \text{skupno} = 7200 \text{ J}$

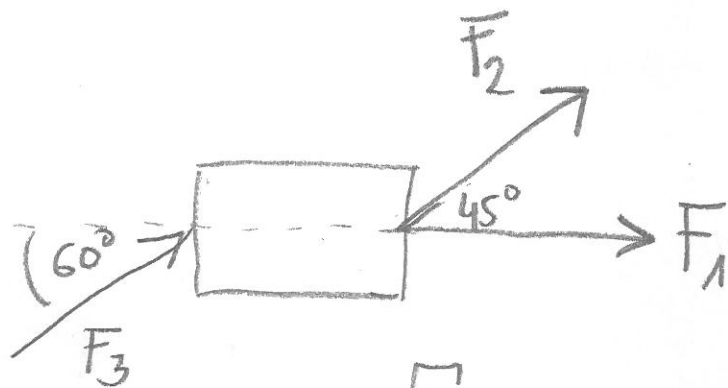
13) TLORIS

$F_1 = F_2 = F_3$

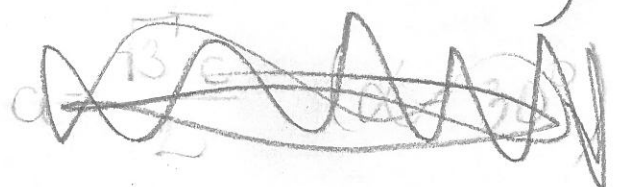
$A_1 = F_1 \cdot r$

$A_2 = F_{2x} \cdot r$

$A_3 = F_{3x} \cdot r$

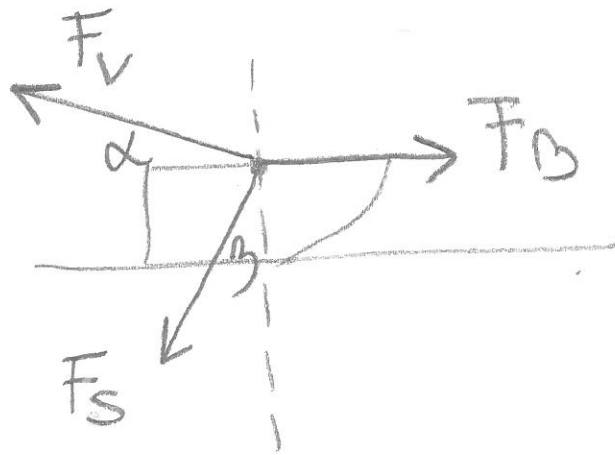


MERILLO! ali $a = \frac{\sqrt{2} c}{2}$ ($\alpha = 45^\circ$)



14

$$\alpha = 45^\circ$$
$$\beta = 30^\circ$$



RAZSTAVIS F !

DOLŽĪS TISTE KOMPONENTE, KI OPR. DELO

($F \parallel 0$)