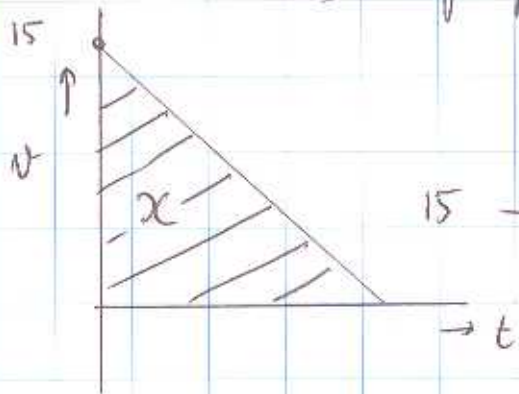


1. waarneming: snelheid neemt af tot $0,0 \text{ m}\cdot\text{s}^{-1}$
 \rightarrow hoogste punt



$$\Delta v = g \cdot \Delta t \quad (1,53 \text{ s})$$

$$x = \frac{1}{2} \cdot \Delta v \cdot \Delta t$$

$$x_{\text{balkon}} = x - 10$$

$1,5 \text{ m}$

- 2.

$$x_{\text{balkon}} = \frac{1}{2} g \cdot t^2$$

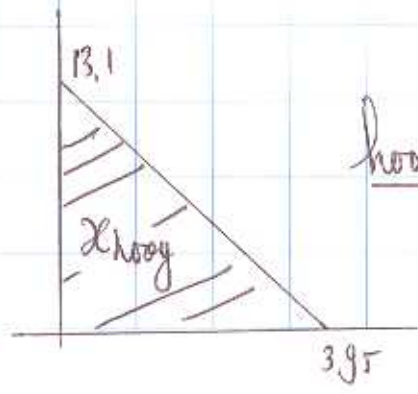
$$v = g \cdot t$$

$5,4 \text{ m}\cdot\text{s}^{-1}$

3. raagstelling niet juist: het voorwerp was omhoog gegooid!
 zie figuur: $a_p = \frac{\Delta v}{\Delta t} \leftarrow 3,95$

$$3,3 \text{ m}\cdot\text{s}^{-2}$$

- 4.



hoogste punt:

$$x_{\text{hoog}} = \frac{1}{2} \cdot v \cdot t \leftarrow 3,95$$

26 m

5. waarmeting: het hele "rondje" is 360°
per dag $13,3^\circ$

$$\text{omlooptijd } T = \frac{360}{13,3} \times 24$$

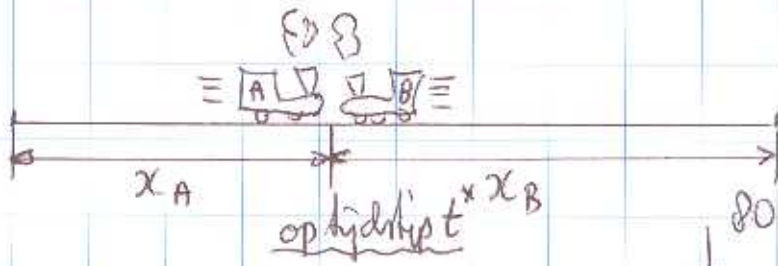
$$T = 6,50 \cdot 10^2 \text{ uur} \hat{=} 27,1 \text{ dag}$$

6. $v = \frac{2\pi r}{T} \leftarrow 384,4 \cdot 10^3$

antwoord vraag 5

$$v = 372 \cdot 10^3 \text{ km} \cdot \text{u}^{-1}$$

7

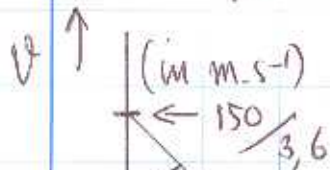


$$0,304 \text{ u} \hat{=} 18 \text{ min}$$

$$x_{\text{tot}} = x_A + x_B = (v_A + v_B) \cdot t$$

$$M_0 \uparrow \quad \quad \quad \uparrow \quad \quad \quad \uparrow \quad \quad \quad \uparrow$$

$$v_A \cdot t \quad \quad \quad v_B \cdot t$$



8.

$$x_{\text{sen}} = \frac{1}{2} v \cdot t$$

$$\frac{150}{3,6} \rightarrow 1,06 \cdot 10^2 \text{ s}$$

$$v = a \cdot t \rightarrow 0,39 \text{ m} \cdot \text{s}^{-2}$$