T1-29 s. 27

a) $s = 11\,m$ $\quad T = \frac{32\,s}{10} = 3{,}2\,s$

$n = 10$

$t_1 = 32\,s$

$t_2 = 4\,s$ $\quad V = \frac{s}{t_2} = \frac{11\,m}{4\,s} = 2{,}75\,m/s$

$f = \frac{1}{T} = \frac{1}{3{,}2\,s} \approx 0{,}3125\,Hz$

Aaltoliikkeen perusyhtälö

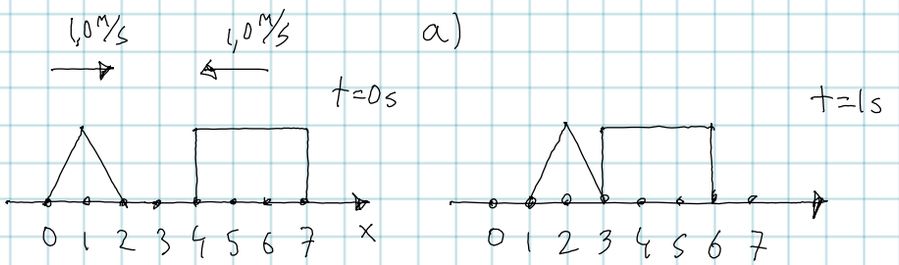
$v = \lambda \cdot f$

$\lambda = \frac{v}{f} = \frac{2{,}75\,m/s}{0{,}3125\,Hz}$

$\lambda \approx 9\,m$

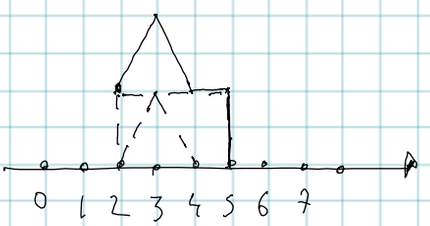
b) $\frac{11\,m}{8{,}8\,m} \approx 1{,}3$ = V: aluksen pituiselle matkalle mahtuu yksi kokonainen aalto.

T1-31

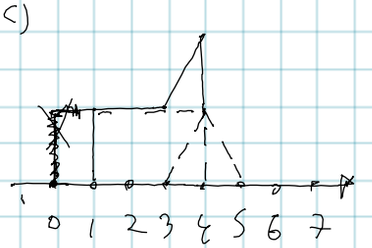


a)

b)



c)



d)