

$$v_T(t) = A \cdot \cos(\omega t + \theta)$$

$$\omega = 2\pi \cdot \underline{F}$$

$$v(t) = 25 \cos(150\pi \cdot 10^3 t + \theta)$$

$$F = \frac{1}{T} = 75 \text{ kHz}$$

$$0 = 25 \cos(150\pi \cdot 10^3 t + \theta)$$

$$T = 13,33 \mu\text{s}$$

$$0 = \cos(150\pi \cdot 10^3 t + \theta)$$

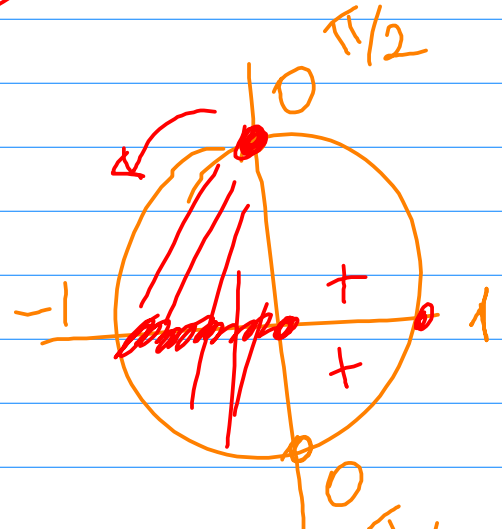
$$\rightarrow t = 513,3 \mu\text{s}$$

$$0 = \cos(241,7 + \theta)$$

$$\cos^{-1}(0) = 241,7 + \theta$$

$$\frac{\pi}{2} = 241,7 + \theta \rightarrow \theta = -240,13 \text{ rad}$$

$$\theta^\circ = \frac{180}{\pi} \cdot (-240,13) = -13765,4^\circ$$



$$\theta^\circ = \underbrace{-85,4^\circ + 38 \times 360^\circ}_{\downarrow}$$

$$v(t) = 25 \cdot \cos(150000\pi t - 85,4^\circ)$$