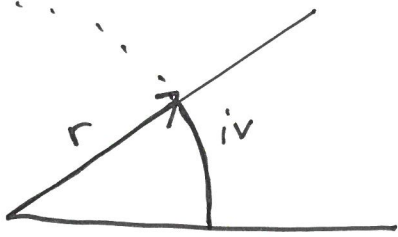


$$300\,000\,000 \frac{m}{s}$$

$$3 \cdot 10^8 \frac{m}{s}$$

$$\text{rög} (\text{radián}) = \frac{iv}{r}$$

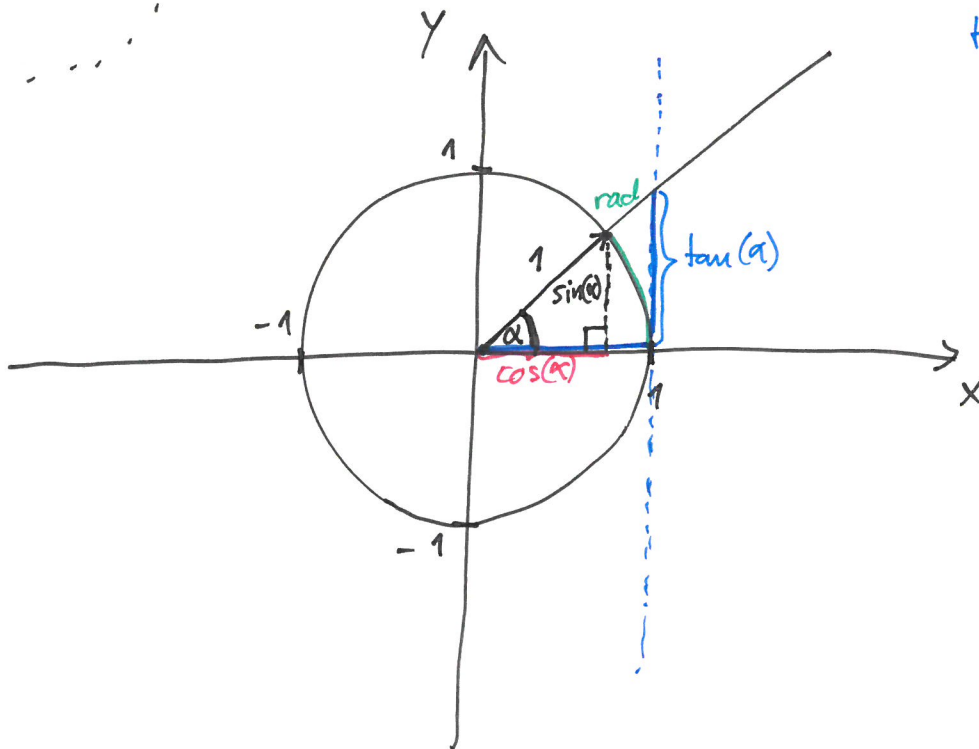
$$[\text{szög}] = \frac{m}{m} = 1$$



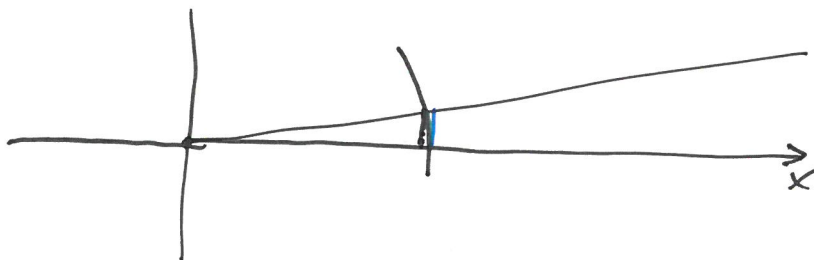
$$\sin(\alpha) = \frac{sz. b.}{a}$$

$$\cos(\alpha) = \frac{m. b.}{a}$$

$$\tan(\alpha) = \frac{sz. b.}{m. b.}$$



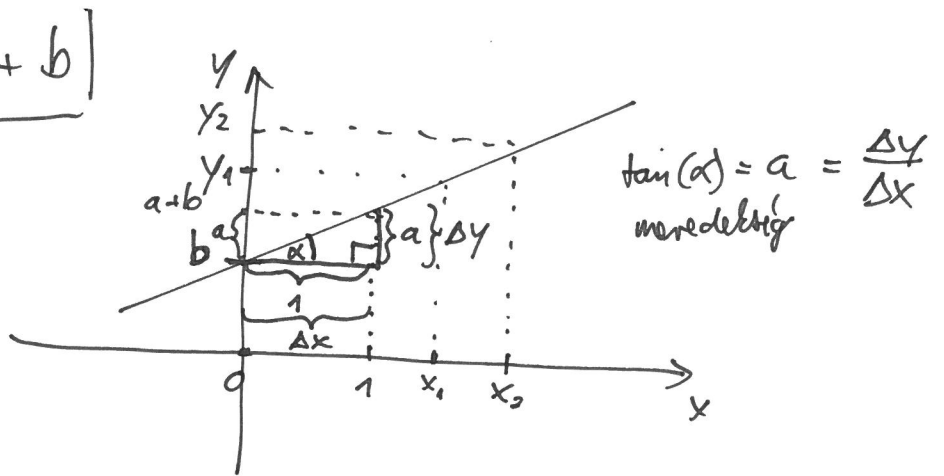
$$\text{his rögeln: } \sin(\alpha) \lesssim \alpha (\text{rad}) \lesssim \tan(\alpha)$$



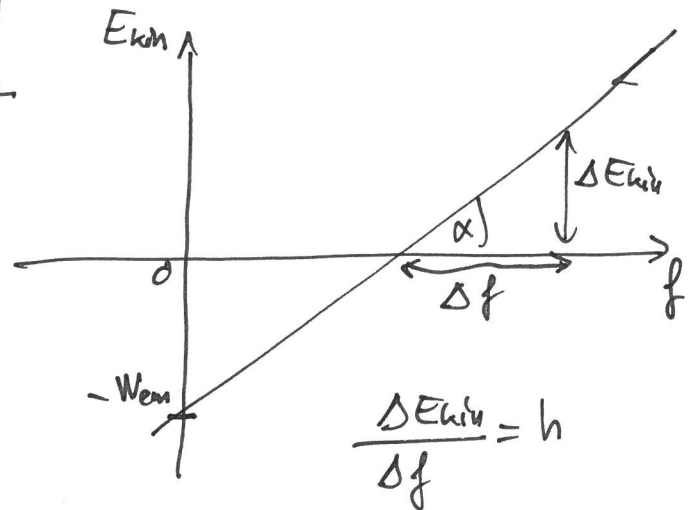
$$y = a \cdot x + b$$

bei $x = 0$
 also $y = a \cdot 0 + b = b$

bei $x = 1$
 also $y = a \cdot 1 + b = a + b$



$$\Delta y = a \cdot \Delta x$$



1000 € 20%/a

$1000 + 1000 \cdot 20\% = 1200 \text{ €}$ $= 1000 \cdot 1,2$

$1000 = 1440$ $= 1000 \cdot 1,2 \cdot 1,2$

$1000 \cdot 1,2^{10} = 8192$

$1000 \cdot 1,4^{10} = 28925$

$$\Lambda_t = \Lambda_0 \cdot \left(\frac{1}{2}\right)^{\frac{t}{30 \text{ ev}}} = \Lambda_0 \cdot 2^{-\frac{t}{30 \text{ ev}}}$$

$$y = y_0 \cdot a^x$$

a liegen e. (2, 10)

2.718..

$$y = y_0 \cdot e^{-p \cdot x}$$

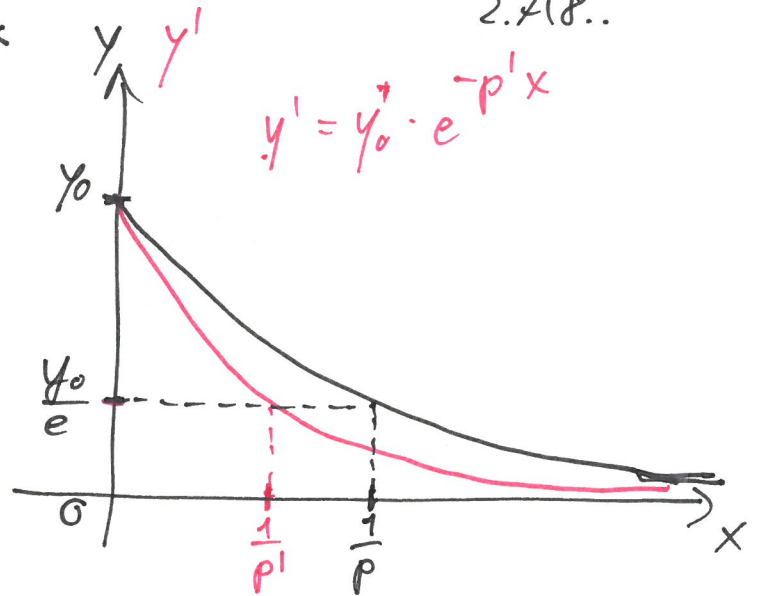
$$y' = y_0 \cdot e^{-p'x}$$

ha
 $x = 0$

also
 $y = y_0$

ha
 $x \rightarrow \infty$

also
 $y \rightarrow 0$



$$e^{-\infty} = \frac{1}{e^{\infty}} = \frac{1}{\infty} = 0$$

ha
 $x = \frac{1}{p}$

$$y = y_0 \cdot e^{-p \cdot \frac{1}{p}} = y_0 \cdot e^{-1} = \frac{y_0}{e}$$

$$p' > p$$

$$p, p' > 1$$

$$\frac{1}{p'} < \frac{1}{p}$$

$$y = y_0 \cdot e^{-px}$$

$$\log(a \cdot b) = \log(a) + \log(b)$$

$$\log(a^b) = b \cdot \log(a)$$

$$\log(y) = \log(y_0 \cdot e^{-px})$$

$$= \log(y_0) + \log(e^{-px})$$

$$\log(y) = \log(y_0) + (-p \cdot x) \cdot \log(e)$$

$$\underline{\log(y)} = (-p) \cdot (\log(e)) \cdot \underline{x} + \log(y_0)$$

$$y = a \cdot \frac{x}{|-3-|} + b$$

