

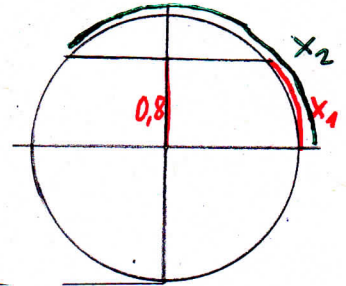
Nr. 11 a)  $\sin(x) = 0,8$

$$\arcsin(\sin(x)) = \arcsin(0,8)$$

$$x = \arcsin(0,8) \hat{=} \text{WTR } \sin^{-1}(0,8)$$

$$\underline{\underline{x_1 \approx 0,927}}$$

$$\underline{\underline{x_2 = \tilde{\pi} - x_1 \approx 2,214}}$$



b)  $\sin(x) = -0,75$

$$x = \arcsin(-0,75)$$

$$x \approx -0,848 \text{ WTR}$$

$$\text{Da } x \in [0; 2\tilde{\pi}) \Rightarrow \underline{\underline{x_1 = 2\tilde{\pi} - 0,848 \approx 5,435}}$$

$$\underline{\underline{x_2 = \tilde{\pi} + |-0,848| \approx 3,990}}$$

c)  $\sin(x) = 1 \Rightarrow \underline{\underline{x = \frac{\tilde{\pi}}{2}}}$  Einheitskreis

d)  $\sin(x) = \frac{5}{6} \Rightarrow \underline{\underline{x_1 = \arcsin\left(\frac{5}{6}\right) = 0,985}}$  WTR

$$\underline{\underline{x_2 = \tilde{\pi} - x_1 \approx 2,156}}$$

e)  $\cos(x) = 0,56 \Rightarrow \underline{\underline{x_1 = \arccos(0,56) \approx 0,976}}$  WTR

$$\underline{\underline{x_2 = 2\tilde{\pi} - x_1 = 5,307}}$$

f)  $\cos(x) = -0,4 \Rightarrow \underline{\underline{x_1 = \arccos(-0,4) \approx 1,982}}$  WTR

$$\underline{\underline{x_2 = 2\tilde{\pi} - x_1 \approx 4,301}}$$

g)  $\cos(x) = \frac{1}{2}\sqrt{3} \Rightarrow \underline{\underline{x_1 = \frac{\tilde{\pi}}{6}}}$  Tabelle Einheitskreis

$$\underline{\underline{x_2 = 2\tilde{\pi} - x_1 = \frac{11\tilde{\pi}}{6}}}$$

h)  $\cos(x) = -1 \Rightarrow \underline{\underline{x = \tilde{\pi}}}$  Einheitskreis