

$$\begin{aligned}
K \times K &\xrightarrow[\text{add}]{+} K \\
a + b &\stackrel{\text{A2}}{=} b + a \\
\underline{a + b} + c &\stackrel{\text{A3}}{=} a + \underline{b + c} \\
a + 0 &\stackrel{\text{A0}}{=} a = 0 + a
\end{aligned}$$

$$\begin{cases} 0 \text{ eind} \\ (0) \xrightarrow{0} K \end{cases}$$

$$a + \tilde{0} = a \Rightarrow 0 \stackrel{\text{A0}}{=} 0 + \tilde{0} \stackrel{\text{A0}}{=} \tilde{0}$$

$$a + \underline{a} \stackrel{\text{A1}}{=} 0 = \underline{a} + a$$

$$\begin{cases} -a \text{ eind} \\ K \xrightarrow{-} K \end{cases}$$

$$a + \underline{a} = 0 \Rightarrow \sim a = \sim a + 0 = \sim a + \overline{a + \underline{a}} = \underline{\sim a + a} + \underline{a} = 0 + \underline{a} = -a$$

$$-\underline{a} = a$$

$$-\underline{a} = 0 + \overline{-\underline{a}} = \overline{a + \underline{a}} + \overline{-\underline{a}} = a + \overline{\underline{a} + \overline{-\underline{a}}} = a + 0 = a$$

$$a + b = a + c \xrightarrow[\text{cancel}]{\text{add}} z = c$$

$$b \stackrel{\text{A0}}{=} 0 + b \stackrel{\text{A1}}{=} \overline{-a + a} + b \stackrel{\text{A3}}{=} \underline{-a} + \underline{a + b} \stackrel{\text{Vor}}{=} \underline{-a} + \underline{a + c} \stackrel{\text{A3}}{=} \overline{-a + a} + c \stackrel{\text{A1}}{=} 0 + c \stackrel{\text{A0}}{=} c$$

$$-\underline{a + b} = \underline{-a} + \underline{-b}$$

$$a - b = a + \underline{-b}$$