

$$\underbrace{\downarrow \Downarrow \downarrow}_{z \downarrow} = \downarrow_z \overset{z}{\downarrow}$$

$$\underbrace{\downarrow \Downarrow \downarrow}_{z \downarrow} * \underbrace{\downarrow \Downarrow \downarrow}_{z \downarrow} = \underbrace{\downarrow * \downarrow}_{z \downarrow} \Downarrow \downarrow$$

$$\begin{aligned} \text{LHS}_{z \downarrow} &= \downarrow_z \overset{z}{\downarrow} \underbrace{\downarrow \Downarrow \downarrow}_{z \downarrow} - \downarrow_z \overset{z}{\downarrow} \underbrace{\downarrow \Downarrow \downarrow}_{z \downarrow} = \downarrow_z \overset{z}{\downarrow} \underbrace{\downarrow \Downarrow \downarrow \downarrow \Downarrow \downarrow}_{z \downarrow} - \downarrow_z \overset{z}{\downarrow} \underbrace{\downarrow \Downarrow \downarrow \downarrow \Downarrow \downarrow}_{z \downarrow} \\ &= \downarrow_z \underbrace{\downarrow \overset{z}{\sim} \downarrow}_{z \downarrow} - \downarrow_z \underbrace{\downarrow \overset{z}{\sim} \downarrow}_{z \downarrow} = \downarrow_z \downarrow_z \overset{z}{\downarrow} + \downarrow_z \downarrow_z \overset{z}{\downarrow} - \downarrow_z \downarrow_z \overset{z}{\downarrow} - \downarrow_z \downarrow_z \overset{z}{\downarrow} = \text{RHS}_{z \downarrow} \end{aligned}$$