$$A \otimes (B \otimes (C \otimes D)) \stackrel{\alpha^{-1}}{\longleftarrow} (A \otimes B) \otimes (C \otimes D) \stackrel{\alpha}{\longrightarrow} ((A \otimes B) \otimes C) \otimes D$$

$$\downarrow^{\alpha^{-1} \otimes 1}$$

$$A \otimes ((B \otimes C) \otimes D) \stackrel{\alpha}{\longrightarrow} (A \otimes (B \otimes C)) \otimes D$$