$$ {}^{g}\overbrace{\mathsf{b} \ltimes \daleth} = \frac{d}{dt}_{t=0} {}^{\mathsf{b}\mathfrak{e}^{t}g}\daleth $$

$$ \underbrace{\mathsf{g}\mathsf{g}'}\circledast = \underbrace{\mathsf{g}'\circledast}\underbrace{\mathsf{g}\circledast} $$

$$ \gamma_g \underbrace{\mathsf{g}\circledast} = \underbrace{\mathsf{g}\circledast}\gamma_g $$

$$ \mathsf{b} \in \mathfrak{k} \Longrightarrow \underbrace{\mathsf{b}\mathsf{g}} \circledast \daleth = 0 $$

$$ {}^{g}\overbrace{\mathsf{b} \ltimes \daleth} = \frac{d}{dt}_{t=0} {}^{K^{\mathsf{b}}\mathfrak{e}^{t}g}\daleth = \frac{d}{dt}_{t=0} {}^{Kg}\daleth = 0 $$

$$ \Longrightarrow \underbrace{\mathsf{b}\mathsf{g}} \circledast \daleth = \underbrace{\mathsf{g}\circledast}\underbrace{\mathsf{b}\circledast}\daleth = 0 $$

$$ \mathsf{g} \in \mathfrak{k}\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}} + \overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}\mathfrak{n} + \mathsf{g}_{\mathfrak{a}} \Longrightarrow \underbrace{\mathsf{g}\mathsf{g}'}_{\mathfrak{a}} = \mathsf{g}_{\mathfrak{a}}\mathsf{g}'_{\mathfrak{a}} $$

$$ \mathsf{g}\mathsf{g}' - \mathsf{g}_{\mathfrak{a}}\mathsf{g}'_{\mathfrak{a}} = \mathsf{g}\underbrace{\mathsf{g}' - \mathsf{g}'_{\mathfrak{a}}} + \underbrace{\mathsf{g} - \mathsf{g}_{\mathfrak{a}}}\mathsf{g}'_{\mathfrak{a}} $$

$$ \in \mathsf{g}\underbrace{\mathfrak{k}\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}} + \overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}\mathfrak{n}} + \underbrace{\mathfrak{k}\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}} + \overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}\mathfrak{n}}\mathsf{g}'_{\mathfrak{a}} $$

$$ = \mathfrak{k}\underbrace{\mathsf{g}\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}} + \underbrace{\mathsf{g}\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}}\mathfrak{n} + \mathfrak{k}\underbrace{\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}\mathsf{g}'_{\mathfrak{a}}} + \underbrace{\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}\mathsf{g}'_{\mathfrak{a}}}\mathfrak{n} \subset \mathfrak{k}\overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}} + \overbrace{\underset{\mathbb{N}}{\mathbb{C}}\bigtriangleup\underline{G}}\mathfrak{n} $$

$$ \mathsf{g} = \underset{\in\mathfrak{k}}{\mathsf{b}}\,\mathsf{g}' + \mathsf{g}_{\mathfrak{a}} + \mathsf{g}''\underset{\in\mathfrak{n}}{\bar{\mathsf{b}}} $$

$$ \mathsf{g}\circledast\daleth = \mathsf{g}'\circledast\underbrace{\mathsf{b}\ltimes\daleth}_{=0} + \mathsf{g}_{\mathfrak{a}}\circledast\daleth + \bar{\mathsf{b}}\ltimes\underbrace{\mathsf{g}''\circledast\daleth} $$

$$ {}^{a}\overbrace{\bar{\mathsf{b}}\ltimes\underbrace{\mathsf{g}''\circledast\daleth}} = {}^{e}\overbrace{\gamma_a\underbrace{\bar{\mathsf{b}}\ltimes}\underbrace{\mathsf{g}''\circledast\daleth}} = {}^{e}\overbrace{\underbrace{\bar{\mathsf{b}}\ltimes}\gamma_a\underbrace{\mathsf{g}''\circledast\daleth}} = \frac{d}{dt}_{t=0} {}^{\bar{\mathsf{b}}\mathfrak{e}^{t}}\overbrace{\gamma_a\underbrace{\mathsf{g}''\circledast}\daleth} = 0 $$

$$ \daleth N \text{ fix } \Longleftarrow {}^{n}\overbrace{\gamma_a\underbrace{\mathsf{g}''\circledast}\daleth} = {}^{e}\overbrace{\gamma_n\gamma_a\underbrace{\mathsf{g}''\circledast}\daleth} = {}^{e}\overbrace{\gamma_a\gamma_{n'}\underbrace{\mathsf{g}''\circledast}\daleth} = {}^{a}\overbrace{\underbrace{\mathsf{g}''\circledast}\gamma_{n'}\daleth} = {}^{a}\overbrace{\mathsf{g}''\circledast\daleth} \text{ unabh von } n \in N $$