Klasyczny liniowy rachunek zdań

Formuły: zmienne zdaniowe; stałe: 1 (jeden), 0 (zero), $\top$ (top) i $\bot$ (dno), oraz wyrażenia postaci: $\varphi \oplus \psi$ (φ plus ψ), $\varphi \parr \psi$ (φ par ψ), $\varphi \mathbin{\&} \psi$ (φ wraz z ψ), $\varphi \otimes \psi$ (φ razy ψ), $\varphi \multimap \psi$ (φ implikuje ψ), $\varphi^{\bot}$ (nie φ), $!\,\varphi$ (oczywiście φ), $?\,\varphi$ (być może φ), gdzie φ i ψ są formułami.

Aksjomaty: sekwenty postaci $\varphi \vdash \varphi$.

Wymiana: $\dfrac{\Gamma, \varphi, \psi, \Delta \vdash \Sigma}{\Gamma, \psi, \varphi, \Delta \vdash \Sigma}$(LX) $\quad \dfrac{\Gamma \vdash \Delta, \varphi, \psi, \Sigma}{\Gamma \vdash \Delta, \psi, \varphi, \Sigma}$ (RX)

Wraz &: $\dfrac{\Gamma, \varphi \vdash \Sigma}{\Gamma, \varphi \mathbin{\&} \psi \vdash \Sigma}$ (L&) $\dfrac{\Gamma, \psi \vdash \Sigma}{\Gamma, \varphi \mathbin{\&} \psi \vdash \Sigma} \quad \dfrac{\Gamma \vdash \varphi, \Sigma \quad \Gamma \vdash \psi, \Sigma}{\Gamma \vdash \varphi \mathbin{\&} \psi, \Sigma}$ (R&)

Tensor $\otimes$: $\dfrac{\Gamma, \varphi, \psi \vdash \Sigma}{\Gamma, \varphi \otimes \psi \vdash \Sigma}$ (L$\otimes$) $\quad \dfrac{\Gamma \vdash \varphi, \Sigma \quad \Delta \vdash \psi, \Pi}{\Gamma, \Delta \vdash \varphi \otimes \psi, \Sigma, \Pi}$ (R$\otimes$)

Plus $\oplus$: $\dfrac{\Gamma, \varphi \vdash \Sigma \quad \Gamma, \psi \vdash \Sigma}{\Gamma, \varphi \oplus \psi \vdash \Sigma}$ (L$\oplus$) $\quad \dfrac{\Gamma \vdash \varphi, \Sigma}{\Gamma \vdash \varphi \oplus \psi, \Sigma}$ (R$\oplus$) $\dfrac{\Gamma \vdash \psi, \Sigma}{\Gamma \vdash \varphi \oplus \psi, \Sigma}$

Par $\parr$: $\dfrac{\Gamma, \varphi \vdash \Sigma \quad \Delta, \psi \vdash \Pi}{\Gamma, \Delta, \varphi \parr \psi \vdash \Sigma, \Pi}$ (L$\parr$) $\quad \dfrac{\Gamma \vdash \varphi, \psi, \Sigma}{\Gamma \vdash \varphi \parr \psi, \Sigma}$ (R$\parr$)

Implikacja: $\dfrac{\Gamma \vdash \varphi, \Sigma \quad \Delta, \psi \vdash \Pi}{\Gamma, \Delta, \varphi \multimap \psi \vdash \Sigma, \Pi}$ (L$\multimap$) $\quad \dfrac{\Gamma, \varphi \vdash \psi, \Sigma}{\Gamma \vdash \varphi \multimap \psi, \Sigma}$ (R$\multimap$)

Negacja: $\dfrac{\Gamma \vdash \varphi, \Sigma}{\Gamma, \varphi^{\bot} \vdash \Sigma}$ (L$^{\bot}$) $\quad \dfrac{\Gamma, \varphi \vdash \Sigma}{\Gamma \vdash \varphi^{\bot}, \Sigma}$ (R$^{\bot}$)

Jedynka: $\dfrac{\Gamma \vdash \Sigma}{\Gamma, 1 \vdash \Sigma}$ (L1) $\quad \vdash 1$ (R1)

Dno: $\bot \vdash$ (L$\bot$) $\quad \dfrac{\Gamma \vdash \Sigma}{\Gamma \vdash \Sigma, \bot}$ (R$\bot$)

Zero i Top: $\Gamma, 0 \vdash \Sigma$ (L0) $\quad \Gamma \vdash \top, \Sigma$ (R$\top$) $\quad$ (nie ma R0 or L$\top$)

Oczywiście: $\dfrac{\Gamma \vdash \Sigma}{\Gamma, !\,\varphi \vdash \Sigma}$ (O !) $\dfrac{\Gamma, \varphi \vdash \Sigma}{\Gamma, !\,\varphi \vdash \Sigma}$ (L !) $\dfrac{!\,\Gamma \vdash \varphi, ?\,\Sigma}{!\,\Gamma \vdash !\,\varphi, ?\,\Sigma}$ (R !) $\dfrac{\Gamma, !\,\varphi, !\,\varphi \vdash \Sigma}{\Gamma, !\,\varphi \vdash \Sigma}$ (S !)

Być może: $\dfrac{\Gamma \vdash \Sigma}{\Gamma \vdash ?\,\varphi, \Sigma}$ (O ?) $\dfrac{\Gamma \vdash \varphi, \Sigma}{\Gamma \vdash ?\,\varphi, \Sigma}$ (R ?) $\dfrac{!\,\Gamma, \varphi \vdash ?\,\Sigma}{!\,\Gamma, ?\,\varphi \vdash ?\,\Sigma}$ (L ?) $\dfrac{\Gamma \vdash ?\,\varphi, ?\,\varphi, \Sigma}{\Gamma \vdash ?\,\varphi, \Sigma}$ (S ?)

Cięcie: $\dfrac{\Gamma \vdash \varphi, \Sigma \quad \Delta, \varphi \vdash \Pi}{\Gamma, \Delta \vdash \Sigma, \Pi}$ (Cut)

Wariant intuicjonistyczny: Sekwenty są tylko postaci $\Gamma \vdash \varphi$, bez $\parr$, ?, $^{\bot}$ ani $\bot$.