

Meaning of Logical Connectives:

$\phi_1, \phi_2, \dots, \phi_n \vdash \psi$, here

$\phi_1, \phi_2, \dots, \phi_n$ are the premises
Conclusion is ψ .

We define new relationship

as

$\phi_1, \phi_2, \dots, \phi_n \vDash \psi$

$\phi \rightarrow$ upper case

$\psi \rightarrow$ lower case

ϕ	ψ	$\phi \wedge \psi$	$\phi \vee \psi$	$\phi \rightarrow \psi$
T	T	T	T	T
T	F	F	T	F
F	T	F	T	T
F	F	F	F	T

ϕ	$\neg \phi$
T	F
F	T

ϕ	$\phi \leftrightarrow \psi$
T	T
F	F