

Logical Notation	S-Expression
P	P
$\neg \varphi$	(not φ)
$\varphi \wedge \psi \wedge \dots \wedge \chi$	(and $\varphi \psi \dots \chi$)
$\varphi \vee \psi \vee \dots \vee \chi$	(or $\varphi \psi \dots \chi$)
$\varphi \rightarrow \psi$	(implies $\varphi \psi$)
$\varphi \leftrightarrow \psi$	(iff $\varphi \psi$)
$R(a, b \dots z)$	($R \ a \ b \dots z$)
$\varphi \Leftrightarrow \psi$	[EQUIVALENT $\varphi \psi$]
$\varphi \Rightarrow \psi$	[SUBSUMES $\varphi \psi$]
φ is a tautology	[IS φ TAUTOLOGY]
φ is a contradiction	[IS φ CONTRADICTION]
φ is a contingency	[IS φ CONTINGENCY]
φ and ψ are contradictory	[CONTRADICTORY $\varphi \psi$]
φ and ψ are contrary	[CONTRARY $\varphi \psi$]
φ and ψ are subcontrary	[SUBCONTRARY $\varphi \psi$]