Rule Name	What You Need	How to Cite (Annotate) It	Assumption Set	Example
Kule Name	what You Need	How to Cite (Annotate) it	Assumption Set	
			la alcada all a accomunitación forma	1 (1) A A
			Include all assumptions from	2 (2) B A
&I	2 lines, m and k	m, k &I	lines m and k	1,2 (3) A&B 1,2&I
			Include all assumptions from	1 (1) A&B A
&E	1 line m: must be a conjunction	m &E	line m	1 (2) A 1&E
			Include all assumptions from	1 (1) PA
vl	1 line m: can be anything	m vI	line m	1 (2) PvQ 1vI
	2 lines, m and k: m must be a			
	disjunction, and k must be the			
	denial (negation) of one of the			1 (1) PvQ A
	disjuncts in m. Conclude		Include all assumptions from	2 (2) ~Q A
vE	remaining disjunct.	m. k vE	lines m and k	1,2 (3) P 1,2vE
	remaining disjuncti	,	mes m unu x	1 (1) P A
	2 lines, m and k: m must be an			1(1) 7
	assumption, and k can be any line.			ľ
				·
	Conclude a conditional of the form			
	(m->k), and discharge the		Include all assumptions at k	2,3 (5) Q&R 2,3 &I
->	assumption at m.	k ->I (m)	except for m	2,3 (6) P->(Q&R) 5->I(1)
	2 lines, m and k: m must be a			
	conditional, and k must be the			
	antecedent of the conditional at			1 (1) P->Q A
	m. Conclude consequent of		Include all assumptions from	2 (2) P A
->E	conditional at m.	m, k ->E	lines m and k	1,2 (3) Q 1,2->E
	2 lines, m and k: m must be a			
	conditional of the form (P->Q), and			1 (1) P->Q A
	k must be a conditional of the		Include all assumptions from	2 (2) Q->P A
<->	form (Q->P)	m, k <->I	lines m and k	1,2 (3) P<->Q 1,2 <->I
×71	Torin (Q >1)	111, K \ 21	inies iii diid k	1,2 (3) 1 < >Q 1,2 < >1
	1 line <i>m</i> : must be a biconditional			
			la alcala all a secondi a a form	1/1/0.00
_	of the form (P<->Q). Conclude	_	Include all assumptions from	1 (1) P<->Q A
<-> E	either P->Q or Q->P.	<i>m</i> <->E	line m	1 (2) P->Q 1 <->E
	2 lines, m and k , that contradict			
	each other, and a line I that is an			
	assumption (/ can be the same as			
	lines m or k). Conclude the denial			1 (1) P A
	of I, and discharge the assumption		Include all assumptions at m	2 (2) ~P A
RAA	at I.	m, k RAA (I)	and k except for l.	1 (3) ~~P 1,2 RAA (2)
			·	
ΑΙ				
	1 line <i>m</i> : must be a sentence with			
	at least one name embedded in a			
	predicate letter. This name			
	cannot appear in any of the lines in			
	the assumption set at m .			1 (1) ∀xPx A
	Conclude a universally quantified			1 (1) VXFX A 1 (2) Pa 1∀E
			In alcode all accommanding a funge	` '
	sentence with the name replaced		Include all assumptions from	1 (3) Pa v Ga 2vl
	by an universally bound variable.	m ∀I	line m	1 (4) ∀x(PxvGx) 3 ∀I
∀Ε	1 line m: must be a universally			
	quantified sentence. Conclude any		Include all assumptions from	1 (1) ∀xPx A
	instance of m.	m ∀E	line m	1 (2) Pa 1∀E
	1 line <i>m</i> : must be a sentence with			
7.	at least one name embedded in a			
31	predicate letter. Conclude an			
	existentially quantified sentence			
	with the name replaced by an		Include all assumptions from	1 (1) Pa A
	existentially bound variable.	m ∃I	line <i>m</i>	1 (2) 3xPx 1 3I
	existentially bound variable.	I	inc m	- (2) - \(\tau \) \(\tau \) \(\tau \)
	21:			
	3 lines <i>m</i> , <i>k</i> l: <i>m</i> must be an			
	existentially quantified sentence, k			
	must be an assumed instance of			
	m, and I must be a sentence that			
	does not contain the name			
	instantiated at k. This name			
	cannot appear in sentence m,			
	sentence k, or in any of the			1 (1) ∃xPx A
	assumptions at k except for m.			2 (2) Pa A
	Conclude a sentence that repeats			2 (3) PavGa 2vI
	the content at line I, and discharge		Include all assumptions from	2 (4) ∃x(Px v Gx) 3∃I
∃E	m.	m, I ∃E (k)	lines m and l except for k .	1 (5) ∃x(Px v Gx) 1,4 ∃E (2)
J.	III.	III, I L (N)	pinies m. and r. except for K.	1 (3) 1/(r v Ox) 1,4 3E (2)