

hyp

$(P \wedge Q) \wedge R \vdash P \wedge Q \wedge R$

\wedge -E(L)

$(P \wedge Q) \wedge R \vdash P \wedge Q$

$(P \wedge Q) \wedge R, P \wedge Q \vdash P$

cut

$(P \wedge Q) \wedge R \vdash P$

$(P \wedge Q) \wedge R \vdash Q \wedge R$

\wedge -I

$(P \wedge Q) \wedge R \vdash P \wedge (Q \wedge R)$