

Inference at *
of proof for Lemma can-apply-compose-iff:

$\vdash \forall A, B, C:\text{Type}, g:(A \rightarrow (B + \text{Top})), f:(B \rightarrow (C + \text{Top})), x:A.$
 $(\uparrow\text{can-apply}(f \circ g ; x)) \iff ((\uparrow\text{can-apply}(g;x)) \& (\uparrow\text{can-apply}(f;\text{do-apply}(g;x))))$
by ((MaAuto·)
CollapseTHEN (AllHyps (\h. ((FLemma 'can-apply-compose' [h])

CollapseTHEN (Auto·)).))·

1:

1. $A : \text{Type}$
 2. $B : \text{Type}$
 3. $C : \text{Type}$
 4. $g : A \rightarrow (B + \text{Top})$
 5. $f : B \rightarrow (C + \text{Top})$
 6. $x : A$
 7. $\uparrow\text{can-apply}(g;x)$
 8. $\uparrow\text{can-apply}(f;\text{do-apply}(g;x))$
- $\vdash \uparrow\text{can-apply}(f \circ g ; x)$