

Inference at * 1 2 1 1

of proof for Lemma wellfounded_functionality_wrt_implies:

1. $T_1 : \text{Type}$
2. $T_2 : \text{Type}$
3. $r_1 : T_1 \rightarrow T_1 \rightarrow \mathbb{P}$
4. $r_2 : T_2 \rightarrow T_2 \rightarrow \mathbb{P}$
5. $T_1 = T_2$
6. $\forall x, y : T_1. r_1(x, y) \Leftarrow r_2(x, y)$
7. $P : T_2 \rightarrow \mathbb{P}$
8. $j : T_1$
9. $\forall k : T_1. r_1(k, j) \Rightarrow P(k)$
10. $k : T_2$
11. $r_2(k, j)$

$\vdash P(k)$
by (((BackThruHyp 9)
CollapseTHEN (Thin 9)).)
CollapseTHEN ((Auto_aux (first_nat
1:n) ((first_nat 1:n), (first_nat 4:n)) (first_tok :t) inil_term))).

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9. $k : T_2$
10. $r_2(k, j)$

$\vdash r_1(k, j)$
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