

t21\_trees\_9  
(TMJ4jttigjh9aST5Q3cg9m9V9uJb1gtfi38a)

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Let  $v1\_xboole\_0 : \iota \Rightarrow o$  be given. Let  $v3\_trees\_3 : \iota \Rightarrow o$  be given. Let  $r1\_tarski : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k9\_trees\_9 : \iota \Rightarrow \iota$  be given. Let  $m1\_subset\_1 : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $m1\_trees\_1 : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k9\_xtuple\_0 : \iota \Rightarrow \iota$  be given. Let  $k5\_trees\_2 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Assume the following.

$$\forall X0. \forall X1. (m1\_subset\_1 X0 X1) \Rightarrow ((v1\_xboole\_0 X1) \vee (X0 \in X1)) \quad (1)$$

Assume the following.

$$\forall X0. \forall X1. (X0 \in X1) \Rightarrow (m1\_subset\_1 X0 X1) \quad (2)$$

Assume the following.

$$\begin{aligned} \forall X0. \forall X1. ((\neg v1\_xboole\_0 X1) \wedge (v3\_trees\_3 X1)) \Rightarrow ( \\ (X0 \in k9\_trees\_9 X1) \Leftrightarrow (\exists X2. (m1\_subset\_1 X2 X1) \wedge (\exists X3. \\ (m1\_trees\_1 X3 (k9\_xtuple\_0 X2)) \wedge (X0 = k5\_trees\_2 X2 X3)))) \end{aligned} \quad (3)$$

Assume the following.

$$\forall X0. \forall X1. (r1\_tarski X0 X1) \Leftrightarrow (\forall X2. (X2 \in X0) \Rightarrow (X2 \in X1)) \quad (4)$$

**Theorem 1**

$$\begin{aligned} \forall X0. ((\neg v1\_xboole\_0 X0) \wedge (v3\_trees\_3 X0)) \Rightarrow (\forall X1. \\ ((\neg v1\_xboole\_0 X1) \wedge (v3\_trees\_3 X1)) \Rightarrow ((r1\_tarski X0 X1) \Rightarrow (r1\_tarski \\ (k9\_trees\_9 X0) (k9\_trees\_9 X1)))) \end{aligned}$$