

t26\_xtuple\_0 (TMM-  
DrrB6sjyPwqVYDvDNbJsdcdBQ8K6PYHA)

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Let  $r1\_tarski : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k5\_xboole\_0 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k9\_xtuple\_0 : \iota \Rightarrow \iota$  be given. Let  $k4\_xboole\_0 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k2\_xboole\_0 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. r1\_tarski (k4\_xboole\_0 (k9\_xtuple\_0 X0) \\ & (k9\_xtuple\_0 X1)) (k9\_xtuple\_0 (k4\_xboole\_0 X0 X1)) \end{aligned} \quad (1)$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. k9\_xtuple\_0 (k2\_xboole\_0 X0 X1) = k2\_xboole\_0 \\ & (k9\_xtuple\_0 X0) (k9\_xtuple\_0 X1) \end{aligned} \quad (2)$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. \forall X2. \forall X3. ((r1\_tarski X0 X1) \wedge \\ & (r1\_tarski X2 X3)) \Rightarrow (r1\_tarski (k2\_xboole\_0 X0 X2) (k2\_xboole\_0 \\ & X1 X3)) \end{aligned} \quad (3)$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. k5\_xboole\_0 X0 X1 = k2\_xboole\_0 (k4\_xboole\_0 \\ & X0 X1) (k4\_xboole\_0 X1 X0) \end{aligned} \quad (4)$$

**Theorem 1**

$$\begin{aligned} & \forall X0. \forall X1. r1\_tarski (k5\_xboole\_0 (k9\_xtuple\_0 X0) \\ & (k9\_xtuple\_0 X1)) (k9\_xtuple\_0 (k5\_xboole\_0 X0 X1)) \end{aligned}$$