

t28_ordinal3 (TMT- PEnJ8VHXjbRVhK9xaHSTKo3DGqrHwTMT)

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Let $v3_ordinal1 : \iota \Rightarrow o$ be given. Let $k10_ordinal2 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_xboole_0 : \iota$ be given. Let $r1_ordinal1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r1_tarski : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $v1_ordinal1 : \iota \Rightarrow o$ be given. Let $v2_ordinal1 : \iota \Rightarrow o$ be given. Assume the following.

$$\forall X0.(v3_ordinal1 X0) \Rightarrow (\forall X1.(v3_ordinal1 X1) \Rightarrow (\neg (r1_ordinal1 X0 X1) \wedge (\forall X2.(v3_ordinal1 X2) \Rightarrow (X1 \neq k10_ordinal2 X0 X2)))) \quad (1)$$

Assume the following.

$$\forall X0.(v3_ordinal1 X0) \Rightarrow (k10_ordinal2 X0 k1_xboole_0 = X0) \quad (2)$$

Assume the following.

$$\forall X0.\forall X1.((v3_ordinal1 X0) \wedge (v3_ordinal1 X1)) \Rightarrow (r1_ordinal1 X0 X1) \Leftrightarrow (r1_tarski X0 X1) \quad (3)$$

Assume the following.

$$\forall X0.(v1_ordinal1 X0) \Leftrightarrow (\forall X1.(X1 \in X0) \Rightarrow (r1_tarski X1 X0)) \quad (4)$$

Assume the following.

$$\forall X0.(v3_ordinal1 X0) \Rightarrow ((v1_ordinal1 X0) \wedge (v2_ordinal1 X0)) \quad (5)$$

Assume the following.

$$\forall X0.\forall X1.(X0 \in X1) \Rightarrow (\neg X1 \in X0) \quad (6)$$

Theorem 1

$$\forall X0.(v3_ordinal1 X0) \Rightarrow (\forall X1.(v3_ordinal1 X1) \Rightarrow (\neg (X0 \in X1) \wedge (\forall X2.(v3_ordinal1 X2) \Rightarrow (\neg (X1 = k10_ordinal2 X0 X2) \wedge (X2 \neq k1_xboole_0))))))$$