

# t20\_ordinal1 (TMN- VmiN1DeLW9ucANSDQepUjHwJZ5pdxMVQ)

October 27, 2020

Let  $v3\_ordinal1 : \iota \Rightarrow o$  be given. Let  $r1\_tarski : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k1\_xboole\_0 : \iota$  be given. Let  $r1\_ordinal1 : \iota \Rightarrow \iota \Rightarrow o$  be given. Assume the following.

$$\forall X0. \neg(X0 \neq k1\_xboole\_0) \wedge (\forall X1. \neg X1 \in X0) \quad (1)$$

Assume the following.

$$\forall X0. \forall X1. \neg(X0 \in X1) \wedge (\forall X2. \neg(X2 \in X1) \wedge (\forall X3. \neg(X3 \in X1) \wedge (X3 \in X2))) \quad (2)$$

Assume the following.

$$\forall X0. (v3\_ordinal1 X0) \Rightarrow (\forall X1. (v3\_ordinal1 X1) \Rightarrow ((r1\_ordinal1 X0 X1) \vee (X1 \in X0))) \quad (3)$$

Assume the following.

$$\forall X0. \forall X1. (v3\_ordinal1 X1) \Rightarrow ((X0 \in X1) \Rightarrow (v3\_ordinal1 X0)) \quad (4)$$

Assume the following.

$$\forall X0. \forall X1. (r1\_tarski X0 X1) \Leftrightarrow (\forall X2. (X2 \in X0) \Rightarrow (X2 \in X1)) \quad (5)$$

## Theorem 1

$$\forall X0. \forall X1. (v3\_ordinal1 X1) \Rightarrow (\neg(r1\_tarski X0 X1) \wedge ((X0 \neq k1\_xboole\_0) \wedge (\forall X2. (v3\_ordinal1 X2) \Rightarrow (\neg(X2 \in X0) \wedge (\forall X3. (v3\_ordinal1 X3) \Rightarrow ((X3 \in X0) \Rightarrow (r1\_ordinal1 X2 X3))))))))$$