

t6_classes1 (TMJHGrXaD- NxXG5a3PDdFvHbTZ5WuZkM84oT)

October 27, 2020

Let $r1_tarski : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_classes1 : \iota \Rightarrow \iota$ be given. Let $k1_card_1 : \iota \Rightarrow \iota$ be given. Let $v2_classes1 : \iota \Rightarrow o$ be given. Let $v1_classes1 : \iota \Rightarrow o$ be given. Let $k9_setfam_1 : \iota \Rightarrow \iota$ be given. Let $r1_classes1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Assume the following.

$$\begin{aligned} & \forall X0.(v2_classes1 X0) \Leftrightarrow ((v1_classes1 X0) \wedge ((\forall X1. \\ & (X1 \in X0) \Rightarrow (k9_setfam_1 X1 \in X0)) \wedge (\forall X1. ((r1_tarski X1 X0) \wedge \\ & (k1_card_1 X1 \in k1_card_1 X0)) \Rightarrow (X1 \in X0)))) \end{aligned} \quad (1)$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. (X1 = k1_classes1 X0) \Leftrightarrow ((r1_classes1 X0 X1) \wedge \\ & (\forall X2. (r1_classes1 X0 X2) \Rightarrow (r1_tarski X1 X2))) \end{aligned} \quad (2)$$

Assume the following.

$$\forall X0. \forall X1. (r1_classes1 X0 X1) \Leftrightarrow ((X0 \in X1) \wedge (v2_classes1 X1)) \quad (3)$$

Theorem 1

$$\begin{aligned} & \forall X0. \forall X1. ((r1_tarski X0 (k1_classes1 X1)) \wedge (k1_card_1 \\ & X0 \in k1_card_1 (k1_classes1 X1))) \Rightarrow (X0 \in k1_classes1 X1) \end{aligned}$$