

t23_ltlaxio1

(TMZZt88kuKkxmRoQZLeoX6g8XPsdPiQAZHq)

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Let $m1_subset.1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_hilbert1 : \iota$ be given. Let $v1_funct.1 : \iota \Rightarrow o$ be given. Let $v1_funct.2 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k5_numbers : \iota$ be given. Let $k1_zfmisc.1 : \iota \Rightarrow \iota$ be given. Let $k10_ltlaxio1 : \iota$ be given. Let $k2_zfmisc.1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $r1_ltlaxio1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r2_ltlaxio1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k6_domain.1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v1_xboole.0 : \iota \Rightarrow o$ be given. Let $k1_tarski : \iota \Rightarrow \iota$ be given. Let $v5_hilbert1 : \iota \Rightarrow o$ be given. Let $v1_hilbert1 : \iota \Rightarrow o$ be given. Let $v2_hilbert1 : \iota \Rightarrow o$ be given. Let $v3_hilbert1 : \iota \Rightarrow o$ be given. Let $v4_hilbert1 : \iota \Rightarrow o$ be given. Assume the following.

$$\forall X0. \forall X1. \forall X2. ((X0 \in X1) \wedge (m1_subset.1 X1 (k1_zfmisc.1 X2))) \Rightarrow (m1_subset.1 X0 X2) \quad (1)$$

Assume the following.

$$\forall X0. \forall X1. ((\neg v1_xboole.0 X0) \wedge (m1_subset.1 X1 X0)) \Rightarrow (k6_domain.1 X0 X1 = k1_tarski X1) \quad (2)$$

Assume the following.

$$v5_hilbert1 k1_hilbert1 \quad (3)$$

Assume the following.

$$\forall X0. \forall X1. ((\neg v1_xboole.0 X0) \wedge (m1_subset.1 X1 X0)) \Rightarrow (m1_subset.1 (k6_domain.1 X0 X1) (k1_zfmisc.1 X0)) \quad (4)$$

Assume the following.

$$\forall X0. \forall X1. (X1 = k1_tarski X0) \Leftrightarrow (\forall X2. (X2 \in X1) \Leftrightarrow (X2 = X0)) \quad (5)$$

Assume the following.

$$\begin{aligned} & \forall X0. ((v1_funct.1 X0) \wedge ((v1_funct.2 X0 k5_numbers (k1_zfmisc.1 \\ & k10_ltlaxio1)) \wedge (m1_subset.1 X0 (k1_zfmisc.1 (k2_zfmisc.1 k5_numbers \\ & (k1_zfmisc.1 k10_ltlaxio1)))))) \Rightarrow (\forall X1. (m1_subset.1 X1 \\ & (k1_zfmisc.1 k1_hilbert1)) \Rightarrow ((r2_ltlaxio1 X0 X1) \Leftrightarrow (\forall X2. \\ & (m1_subset.1 X2 k1_hilbert1) \Rightarrow ((X2 \in X1) \Rightarrow (r1_ltlaxio1 X0 X2)))))) \end{aligned} \quad (6)$$

Assume the following.

$$\forall X0.(v5_hilbert1\ X0)\Rightarrow((\neg v1_xboole_0\ X0)\wedge((v1_hilbert1\ X0)\wedge((v2_hilbert1\ X0)\wedge((v3_hilbert1\ X0)\wedge(v4_hilbert1\ X0)))))) \quad (7)$$

Theorem 1

$$\begin{aligned} \forall X0.(m1_subset_1\ X0\ k1_hilbert1)\Rightarrow(\forall X1.((v1_funct_1\ X1)\wedge((v1_funct_2\ X1\ k5_numbers\ (k1_zfmisc_1\ k10_ltlaxio1))\wedge \\ (m1_subset_1\ X1\ (k1_zfmisc_1\ (k2_zfmisc_1\ k5_numbers\ (k1_zfmisc_1\ k10_ltlaxio1))))))\Rightarrow((r1_ltlaxio1\ X1\ X0)\Leftrightarrow(r2_ltlaxio1\ X1\ (k6_domain_1 \\ k1_hilbert1\ X0)))) \end{aligned}$$