

t233_member_1
(TMXYy8oU2x1gSfr7KXT5F1ig3BPCn9gLKAw)

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Let $v1_membered : \iota \Rightarrow o$ be given. Let $v1_xcmplx_0 : \iota \Rightarrow o$ be given. Let $k6_numbers : \iota$ be given. Let $k27_member_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k5_xboole_0 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k7_member_1 : \iota \Rightarrow \iota$ be given. Let $k13_member_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k25_member_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_tarski : \iota \Rightarrow \iota$ be given. Let $k15_member_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$\forall X0.(v1_membered X0) \Rightarrow (\forall X1.(v1_membered X1) \Rightarrow (k7_member_1 (k13_member_1 X0 X1) = k13_member_1 (k7_member_1 X0) (k7_member_1 X1))) \quad (1)$$

Assume the following.

$$\forall X0.(v1_membered X0) \Rightarrow (\forall X1.(v1_membered X1) \Rightarrow (k7_member_1 (k5_xboole_0 X0 X1) = k5_xboole_0 (k7_member_1 X0) (k7_member_1 X1))) \quad (2)$$

Assume the following.

$$\forall X0.(v1_membered X0) \Rightarrow (\forall X1.(v1_membered X1) \Rightarrow (\forall X2.(v1_xcmplx_0 X2) \Rightarrow ((X2 \neq k6_numbers) \Rightarrow (k25_member_1 (k5_xboole_0 X0 X1) X2 = k5_xboole_0 (k25_member_1 X0 X2) (k25_member_1 X1 X2)))))) \quad (3)$$

Assume the following.

$$\forall X0.(v1_membered X0) \Rightarrow (k7_member_1 (k7_member_1 X0) = X0) \quad (4)$$

Assume the following.

$$\forall X0.(v1_xcmplx_0 X0) \Rightarrow (v1_membered (k1_tarski X0)) \quad (5)$$

Assume the following.

$$\forall X0.\forall X1.((v1_membered X0) \wedge (v1_membered X1)) \Rightarrow (v1_membered (k5_xboole_0 X0 X1)) \quad (6)$$

Assume the following.

$$\forall X0.\forall X1.((v1_membered\ X0)\wedge(v1_xcmplx_0\ X1))\Rightarrow(v1_membered\ (k27_member_1\ X0\ X1)) \quad (7)$$

Assume the following.

$$\forall X0.(v1_membered\ X0)\Rightarrow(v1_membered\ (k7_member_1\ X0)) \quad (8)$$

Assume the following.

$$\forall X0.(v1_membered\ X0)\Rightarrow(\forall X1.(v1_xcmplx_0\ X1)\Rightarrow(k27_member_1\ X0\ X1 = k15_member_1\ X0\ (k1_tarski\ X1))) \quad (9)$$

Assume the following.

$$\forall X0.(v1_membered\ X0)\Rightarrow(\forall X1.(v1_xcmplx_0\ X1)\Rightarrow(k25_member_1\ X0\ X1 = k15_member_1\ (k1_tarski\ X1)\ X0)) \quad (10)$$

Assume the following.

$$\forall X0.(v1_membered\ X0)\Rightarrow(\forall X1.(v1_membered\ X1)\Rightarrow(k15_member_1\ X0\ X1 = k13_member_1\ X0\ (k7_member_1\ X1))) \quad (11)$$

Assume the following.

$$\forall X0.\forall X1.((v1_membered\ X0)\wedge(v1_membered\ X1))\Rightarrow(k13_member_1\ X0\ X1 = k13_member_1\ X1\ X0) \quad (12)$$

Theorem 1

$$\forall X0.(v1_membered\ X0)\Rightarrow(\forall X1.(v1_membered\ X1)\Rightarrow(\forall X2.(v1_xcmplx_0\ X2)\Rightarrow((X2\neq k6_numbers)\Rightarrow(k27_member_1\ (k5_xboole_0\ X0\ X1)\ X2 = k5_xboole_0\ (k27_member_1\ X0\ X2)\ (k27_member_1\ X1\ X2))))))$$