

t7_polynom2 (TMQsj- FotCVMD28Q6XH9VV33ehdptW2wE557)

October 27, 2020

Let $v1_xboole_0 : \iota \Rightarrow o$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_zfmisc_1 : \iota \Rightarrow \iota$ be given. Let $v1_partfun1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $v1_relat_2 : \iota \Rightarrow o$ be given. Let $v4_relat_2 : \iota \Rightarrow o$ be given. Let $v8_relat_2 : \iota \Rightarrow o$ be given. Let $k2_zfmisc_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $r3_orders_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k7_pre_poly : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_xboole_0 : \iota$ be given. Let $m2_finseq_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $m1_finseq_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $v1_relat_1 : \iota \Rightarrow o$ be given. Let $v1_funct_1 : \iota \Rightarrow o$ be given. Let $v1_finseq_1 : \iota \Rightarrow o$ be given. Let $k4_finseq_1 : \iota \Rightarrow \iota$ be given. Let $k9_xtuple_0 : \iota \Rightarrow \iota$ be given. Let $v5_relat_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k2_relset_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k10_xtuple_0 : \iota \Rightarrow \iota$ be given. Let $v4_relat_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k5_numbers : \iota$ be given. Let $v1_finset_1 : \iota \Rightarrow o$ be given. Let $v7_ordinal1 : \iota \Rightarrow o$ be given. Let $r1_xxreal_0 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k7_partfun1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k4_tarski : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$\forall X0. \forall X1. \neg(v1_xboole_0 X0) \wedge ((X0 \neq X1) \wedge (v1_xboole_0 X1)) \quad (1)$$

Assume the following.

$$\forall X0. \forall X1. \neg(X0 \in X1) \wedge (v1_xboole_0 X1) \quad (2)$$

Assume the following.

$$\forall X0. (v1_xboole_0 X0) \Rightarrow (X0 = k1_xboole_0) \quad (3)$$

Assume the following.

$$\forall X0. \forall X1. (m2_finseq_1 X1 X0) \Leftrightarrow (m1_finseq_1 X1 X0) \quad (4)$$

Assume the following.

$$\forall X0. ((v1_relat_1 X0) \wedge ((v1_funct_1 X0) \wedge (v1_finseq_1 X0))) \Rightarrow (k4_finseq_1 X0 = k9_xtuple_0 X0) \quad (5)$$

Assume the following.

$$\forall X0. \forall X1. ((v1_relat_1 X1) \wedge (v5_relat_1 X1 X0)) \Rightarrow (k2_relset_1 X0 X1 = k10_xtuple_0 X1) \quad (6)$$

Assume the following.

$$\forall X0.\exists X1.(m1_finseq_1 X1 X0)\wedge((v1_relat_1 X1)\wedge(v4_relat_1 X1 k5_numbers)\wedge((v5_relat_1 X1 X0)\wedge((v1_funct_1 X1)\wedge((v1_xboole_0 X1)\wedge((v1_finset_1 X1)\wedge(v1_finseq_1 X1)))))) \quad (7)$$

Assume the following.

$$\forall X0.(v1_xboole_0 X0)\Rightarrow(v1_xboole_0 (k10_xtuple_0 X0)) \quad (8)$$

Assume the following.

$$\forall X0.(v1_xboole_0 X0)\Rightarrow(v1_xboole_0 (k9_xtuple_0 X0)) \quad (9)$$

Assume the following.

$$\begin{aligned} &\forall X0.\forall X1.((v1_finset_1 X1)\wedge(m1_subset_1 X1 (k1_zfmisc_1 X0)))\Rightarrow(\forall X2.((v1_partfun1 X2 X0)\wedge((v1_relat_2 X2)\wedge((v4_relat_2 X2)\wedge((v8_relat_2 X2)\wedge(m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 X0 X0))))))\Rightarrow((r3_orders_1 X2 X1)\Rightarrow(\forall X3.(m2_finseq_1 X3 X0)\Rightarrow((X3 = k7_pre_poly X0 X1 X2)\Leftrightarrow((k2_relset_1 X0 X3 = X1)\wedge(\forall X4.(v7_ordinal1 X4)\Rightarrow(\forall X5.(v7_ordinal1 X5)\Rightarrow(((X4 \in k4_finseq_1 X3)\wedge(X5 \in k4_finseq_1 X3))\Rightarrow((r1_xxreal_0 X5 X4)\vee((k7_partfun1 X0 X3 X4\neq k7_partfun1 X0 X3 X5)\wedge(k4_tarski (k7_partfun1 X0 X3 X4) (k7_partfun1 X0 X3 X5) \in X2)))))))))) \quad (10) \end{aligned}$$

Theorem 1

$$\forall X0.\forall X1.((v1_xboole_0 X1)\wedge(m1_subset_1 X1 (k1_zfmisc_1 X0)))\Rightarrow(\forall X2.((v1_partfun1 X2 X0)\wedge((v1_relat_2 X2)\wedge((v4_relat_2 X2)\wedge((v8_relat_2 X2)\wedge(m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 X0 X0))))))\Rightarrow((r3_orders_1 X2 X1)\Rightarrow(k7_pre_poly X0 X1 X2 = k1_xboole_0)))$$