

t47_matrix_1

(TMSD7TGKHK92NeDb7PJUnKA4qxpo6eAqfgZ)

October 27, 2020

Let $v1_xboole_0 : \iota \Rightarrow o$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k5_numbers : \iota$ be given. Let $v1_matrix_1 : \iota \Rightarrow o$ be given. Let $m2_finseq_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k3_finseq_2 : \iota \Rightarrow \iota$ be given. Let $r1_xxreal_0 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $np_1 : \iota$ be given. Let $k3_finseq_1 : \iota \Rightarrow \iota$ be given. Let $k1_matrix_1 : \iota \Rightarrow \iota$ be given. Let $k3_matrix_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k16_matrix_1 : \iota \Rightarrow \iota$ be given. Let $k4_tarski : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k2_matrix_1 : \iota \Rightarrow \iota$ be given. Let $v7_ordinal1 : \iota \Rightarrow o$ be given. Let $k4_ordinal1 : \iota$ be given. Assume the following.

$$\begin{aligned} & \forall X0. (\neg v1_xboole_0 X0) \Rightarrow (\forall X1. ((v1_matrix_1 X1) \wedge \\ & (m2_finseq_1 X1 (k3_finseq_2 X0))) \Rightarrow (k16_matrix_1 X1 = ReplSep2 \\ & (toset (\lambda X2 : \iota. m1_subset_1 X2 k5_numbers)) (\lambda X2 : \iota. \\ & toset (\lambda X3 : \iota. m1_subset_1 X3 k5_numbers)) (\lambda X2 : \iota. \lambda X3 : \\ & \iota. k4_tarski X2 X3 \in k2_matrix_1 X1) (\lambda X2 : \iota. \lambda X3 : \iota. \\ & k3_matrix_1 X0 X1 X2 X3))) \end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. (v7_ordinal1 X1) \Rightarrow (\forall X2. (v7_ordinal1 \\ & X2) \Rightarrow (\forall X3. ((v1_matrix_1 X3) \wedge (m2_finseq_1 X3 (k3_finseq_2 \\ & X0))) \Rightarrow (((r1_xxreal_0 np_1 X1) \wedge ((r1_xxreal_0 X1 (k3_finseq_1 \\ & X3)) \wedge ((r1_xxreal_0 np_1 X2) \wedge (r1_xxreal_0 X2 (k1_matrix_1 X3)))) \Rightarrow \\ & (k4_tarski X1 X2 \in k2_matrix_1 X3)))) \end{aligned} \tag{2}$$

Assume the following.

$$k5_numbers = k4_ordinal1 \tag{3}$$

Assume the following.

$$\forall X0. (m1_subset_1 X0 k4_ordinal1) \Rightarrow (v7_ordinal1 X0) \tag{4}$$

Theorem 1

$$\begin{aligned} \forall X0.(\neg v1_xboole_0 X0) \Rightarrow (\forall X1.(m1_subset_1 X1 k5_numbers) \Rightarrow \\ (\forall X2.(m1_subset_1 X2 k5_numbers) \Rightarrow (\forall X3.((v1_matrix_1 \\ X3) \wedge (m2_finseq_1 X3 (k3_finseq_2 X0))) \Rightarrow (((r1_xxreal_0 np_1 \\ X1) \wedge ((r1_xxreal_0 X1 (k3_finseq_1 X3)) \wedge ((r1_xxreal_0 np_1 X2) \wedge \\ (r1_xxreal_0 X2 (k1_matrix_1 X3)))))) \Rightarrow (k3_matrix_1 X0 X3 X1 X2 \in \\ k16_matrix_1 X3)))))) \end{aligned}$$