

t18_matrix_7 (TM-
RkSMXg1adc9Y8sQJBazm4wezCuAvHAV4d)

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Let $v7_ordinal1 : \iota \Rightarrow o$ be given. Let $m1_matrix_2 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k12_matrix_2 : \iota \Rightarrow \iota$ be given. Let $k2_funct_2 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k2_finseq_1 : \iota \Rightarrow \iota$ be given. Let $k11_matrix_2 : \iota \Rightarrow \iota$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $u1_struct_0 : \iota \Rightarrow \iota$ be given. Let $k13_matrix_2 : \iota \Rightarrow \iota$ be given. Let $v1_xboole_0 : \iota \Rightarrow o$ be given. Let $v3_matrix_2 : \iota \Rightarrow o$ be given. Let $v15_algstr_0 : \iota \Rightarrow o$ be given. Let $l3_algstr_0 : \iota \Rightarrow o$ be given. Let $k1_binop_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $u2_algstr_0 : \iota \Rightarrow \iota$ be given. Let $k1_partfun1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$\begin{aligned} \forall X0.(v7_ordinal1 X0) \Rightarrow (\forall X1.(m1_matrix_2 X1 (k12_matrix_2 \\ X0)) \Rightarrow (m1_subset_1 (k2_funct_2 (k2_finseq_1 (k11_matrix_2 (k12_matrix_2 \\ X0)))) X1) (u1_struct_0 (k13_matrix_2 X0)))) \end{aligned} \quad (1)$$

Assume the following.

$$\begin{aligned} \forall X0.((\neg v1_xboole_0 X0) \wedge (v3_matrix_2 X0)) \Rightarrow (\forall X1. \\ (m1_matrix_2 X1 X0) \Leftrightarrow (m1_subset_1 X1 X0)) \end{aligned} \quad (2)$$

Assume the following.

$$\begin{aligned} \forall X0.(v7_ordinal1 X0) \Rightarrow ((\neg v1_xboole_0 (k12_matrix_2 X0)) \wedge \\ (v3_matrix_2 (k12_matrix_2 X0))) \end{aligned} \quad (3)$$

Assume the following.

$$\begin{aligned} \forall X0.(v7_ordinal1 X0) \Rightarrow ((v15_algstr_0 (k13_matrix_2 X0)) \wedge \\ (l3_algstr_0 (k13_matrix_2 X0))) \end{aligned} \quad (4)$$

Assume the following.

$$\begin{aligned}
& \forall X0.(v7_ordinal1\ X0) \Rightarrow (\forall X1.((v15_algstr_0\ X1) \wedge \\
& (l3_algstr_0\ X1)) \Rightarrow ((X1 = k13_matrix_2\ X0) \Leftrightarrow ((u1_struct_0\ X1 = k12_matrix_2 \\
& X0) \wedge (\forall X2.(m1_matrix_2\ X2\ (k12_matrix_2\ X0)) \Rightarrow (\forall X3. \\
& (m1_matrix_2\ X3\ (k12_matrix_2\ X0)) \Rightarrow (k1_binop_1\ (u2_algstr_0 \\
& X1)\ X2\ X3 = k1_partfun1\ (k2_finseq_1\ (k11_matrix_2\ (k12_matrix_2 \\
& X0)))\ (k2_finseq_1\ (k11_matrix_2\ (k12_matrix_2\ X0)))\ (k2_finseq_1 \\
& (k11_matrix_2\ (k12_matrix_2\ X0)))\ (k2_finseq_1\ (k11_matrix_2 \\
& (k12_matrix_2\ X0)))\ X2\ X3))))))
\end{aligned} \tag{5}$$

Theorem 1

$$\begin{aligned}
& \forall X0.(v7_ordinal1\ X0) \Rightarrow (\forall X1.(m1_matrix_2\ X1\ (k12_matrix_2 \\
& X0)) \Rightarrow (m1_matrix_2\ (k2_funct_2\ (k2_finseq_1\ (k11_matrix_2\ (k12_matrix_2 \\
& X0)))\ X1)\ (k12_matrix_2\ X0)))
\end{aligned}$$