

t22_prelamb

(TMXxnc5FtH3eWrVefJEroYYYnxRcBFSJ7zP)

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Let $v2_struct_0 : \iota \Rightarrow o$ be given. Let $v10_prelamb : \iota \Rightarrow o$ be given. Let $l2_prelamb : \iota \Rightarrow o$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $u1_struct_0 : \iota \Rightarrow \iota$ be given. Let $r2_prelamb : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k6_finseq_1 : \iota \Rightarrow \iota$ be given. Let $k2_prelamb : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_prelamb : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k12_finseq_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $l1_prelamb : \iota \Rightarrow o$ be given. Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0 X0) \wedge ((v10_prelamb X0) \wedge (l2_prelamb \\ & \quad X0))) \Rightarrow (\forall X1. (m1_subset_1 X1 (u1_struct_0 X0)) \Rightarrow (\forall X2. \\ & \quad (m1_subset_1 X2 (u1_struct_0 X0)) \Rightarrow ((r2_prelamb X0 (k12_finseq_1 \\ & \quad (u1_struct_0 X0) X1) X2) \Rightarrow ((r2_prelamb X0 (k6_finseq_1 (u1_struct_0 \\ & \quad X0)) (k2_prelamb X0 X2 X1)) \wedge (r2_prelamb X0 (k6_finseq_1 (u1_struct_0 \\ & \quad X0)) (k1_prelamb X0 X1 X2)))))) \end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0 X0) \wedge ((v10_prelamb X0) \wedge (l2_prelamb \\ & \quad X0))) \Rightarrow (\forall X1. (m1_subset_1 X1 (u1_struct_0 X0)) \Rightarrow (\forall X2. \\ & \quad (m1_subset_1 X2 (u1_struct_0 X0)) \Rightarrow (\forall X3. (m1_subset_1 X3 \\ & \quad (u1_struct_0 X0)) \Rightarrow (r2_prelamb X0 (k12_finseq_1 (u1_struct_0 \\ & \quad X0)) (k1_prelamb X0 X1 X2)) (k1_prelamb X0 (k1_prelamb X0 X3 X1) (k1_prelamb \\ & \quad X0 X3 X2)))))) \end{aligned} \tag{2}$$

Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0 X0) \wedge ((v10_prelamb X0) \wedge (l2_prelamb \\ & \quad X0))) \Rightarrow (\forall X1. (m1_subset_1 X1 (u1_struct_0 X0)) \Rightarrow (\forall X2. \\ & \quad (m1_subset_1 X2 (u1_struct_0 X0)) \Rightarrow (\forall X3. (m1_subset_1 X3 \\ & \quad (u1_struct_0 X0)) \Rightarrow (r2_prelamb X0 (k12_finseq_1 (u1_struct_0 \\ & \quad X0)) (k2_prelamb X0 X1 X2)) (k2_prelamb X0 (k2_prelamb X0 X1 X3) (k2_prelamb \\ & \quad X0 X2 X3)))))) \end{aligned} \tag{3}$$

Assume the following.

$$\forall X0. (l2_prelamb X0) \Rightarrow (l1_prelamb X0) \tag{4}$$

Assume the following.

$$\forall X0.\forall X1.\forall X2.(((\neg v2_struct_0 X0)\wedge(l1_prelamb X0))\wedge((m1_subset_1 X1 (u1_struct_0 X0))\wedge(m1_subset_1 X2 (u1_struct_0 X0))))\Rightarrow(m1_subset_1 (k2_prelamb X0 X1 X2) (u1_struct_0 X0)) \quad (5)$$

Assume the following.

$$\forall X0.\forall X1.\forall X2.(((\neg v2_struct_0 X0)\wedge(l1_prelamb X0))\wedge((m1_subset_1 X1 (u1_struct_0 X0))\wedge(m1_subset_1 X2 (u1_struct_0 X0))))\Rightarrow(m1_subset_1 (k1_prelamb X0 X1 X2) (u1_struct_0 X0)) \quad (6)$$

Theorem 1

$$\begin{aligned} & \forall X0.((\neg v2_struct_0 X0)\wedge((v10_prelamb X0)\wedge(l2_prelamb X0)))\Rightarrow(\forall X1.(m1_subset_1 X1 (u1_struct_0 X0))\Rightarrow(\forall X2. \\ & (m1_subset_1 X2 (u1_struct_0 X0))\Rightarrow(\forall X3.(m1_subset_1 X3 \\ & (u1_struct_0 X0))\Rightarrow((r2_prelamb X0 (k6_finseq_1 (u1_struct_0 \\ & X0)) (k2_prelamb X0 (k2_prelamb X0 (k2_prelamb X0 X1 X2) (k2_prelamb \\ & X0 X3 X2)) (k2_prelamb X0 X1 X3)))\wedge(r2_prelamb X0 (k6_finseq_1 (\\ & u1_struct_0 X0)) (k1_prelamb X0 (k1_prelamb X0 X3 X1) (k1_prelamb \\ & X0 (k1_prelamb X0 X2 X3) (k1_prelamb X0 X2 X1)))))))) \end{aligned}$$