

t47_parsp_2
(TMZj95udi7xEN3SfCD6s1SVmTRzKuCCxw9G)

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Let $v2_struct_0 : \iota \Rightarrow o$ be given. Let $v2_parasp_1 : \iota \Rightarrow o$ be given. Let $v1_parasp_2 : \iota \Rightarrow o$ be given. Let $l1_parasp_1 : \iota \Rightarrow o$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $u1_struct_0 : \iota \Rightarrow \iota$ be given. Let $r3_parasp_2 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r2_parasp_2 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0 X0) \wedge ((v2_parasp_1 X0) \wedge ((v1_parasp_2 \\ & X0) \wedge (l1_parasp_1 X0)))) \Rightarrow (\forall X1. (m1_subset_1 X1 (u1_struct_0 \\ & X0)) \Rightarrow (\forall X2. (m1_subset_1 X2 (u1_struct_0 X0)) \Rightarrow (\forall X3. \\ & (m1_subset_1 X3 (u1_struct_0 X0)) \Rightarrow (\forall X4. (m1_subset_1 X4 \\ & (u1_struct_0 X0)) \Rightarrow (\neg (r2_parasp_2 X0 X1 X2 X3 X4) \wedge (r2_parasp_2 X0 \\ & X1 X2 X4 X3)))))) \end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0 X0) \wedge ((v2_parasp_1 X0) \wedge ((v1_parasp_2 \\ & X0) \wedge (l1_parasp_1 X0)))) \Rightarrow (\forall X1. (m1_subset_1 X1 (u1_struct_0 \\ & X0)) \Rightarrow (\forall X2. (m1_subset_1 X2 (u1_struct_0 X0)) \Rightarrow (\forall X3. \\ & (m1_subset_1 X3 (u1_struct_0 X0)) \Rightarrow (\forall X4. (m1_subset_1 X4 \\ & (u1_struct_0 X0)) \Rightarrow ((r3_parasp_2 X0 X1 X2 X3 X4) \Leftrightarrow (\neg (\neg (X1 = X2) \wedge (X3 = \\ & X4)) \wedge (\forall X5. (m1_subset_1 X5 (u1_struct_0 X0)) \Rightarrow (\forall X6. \\ & (m1_subset_1 X6 (u1_struct_0 X0)) \Rightarrow (\neg (r2_parasp_2 X0 X5 X6 X1 X2) \wedge \\ & (r2_parasp_2 X0 X5 X6 X3 X4)))))))))) \end{aligned} \tag{2}$$

Theorem 1

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0 X0) \wedge ((v2_parasp_1 X0) \wedge ((v1_parasp_2 \\ & X0) \wedge (l1_parasp_1 X0)))) \Rightarrow (\forall X1. (m1_subset_1 X1 (u1_struct_0 \\ & X0)) \Rightarrow (\forall X2. (m1_subset_1 X2 (u1_struct_0 X0)) \Rightarrow ((r3_parasp_2 \\ & X0 X1 X2 X2 X1) \Rightarrow (X1 = X2)))) \end{aligned}$$