

t35_ftacell1

(TMG9VSFVcPnTHNMX2bEYxT4LGYe5jTrwz21)

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Let $k4_tarski : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k10_finseq_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k14_twoscomp : \iota$ be given. Let $k3_msafree2 : \iota \Rightarrow \iota$ be given. Let $k19_ftacell1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k48_gfacirc1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k4_twoscomp : \iota$ be given. Let $k45_gfacirc1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v2_struct_0 : \iota \Rightarrow o$ be given. Let $v1_circcomb : \iota \Rightarrow o$ be given. Let $v2_circcomb : \iota \Rightarrow o$ be given. Let $l1_msualg_1 : \iota \Rightarrow o$ be given. Let $k2_circcomb : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k49_gfacirc1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v11_struct_0 : \iota \Rightarrow o$ be given. Let $v1_msualg_1 : \iota \Rightarrow o$ be given. Let $v3_circcomb : \iota \Rightarrow o$ be given. Let $k46_gfacirc1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k43_gfacirc1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$\begin{aligned} & \forall X0.((\neg v2_struct_0 X0) \wedge ((v1_circcomb X0) \wedge ((v2_circcomb \\ & X0) \wedge (l1_msualg_1 X0)))) \Rightarrow (\forall X1.((\neg v2_struct_0 X1) \wedge ((v1_circcomb \\ & X1) \wedge ((v2_circcomb X1) \wedge (l1_msualg_1 X1)))) \Rightarrow (\forall X2.(X2 \in \\ & k3_msafree2 X0) \Rightarrow ((X2 \in k3_msafree2 (k2_circcomb X0 X1)) \wedge (X2 \in k3_msafree2 \\ & (k2_circcomb X1 X0)))))) \end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. \forall X2. (k4_tarski (k10_finseq_1 X0 \\ & X1) k14_twoscomp \in k3_msafree2 (k49_gfacirc1 X0 X1 X2)) \wedge ((k48_gfacirc1 \\ & X0 X1 X2 \in k3_msafree2 (k49_gfacirc1 X0 X1 X2)) \wedge ((k4_tarski (k10_finseq_1 \\ & X0 X1) k4_twoscomp \in k3_msafree2 (k49_gfacirc1 X0 X1 X2)) \wedge ((k4_tarski \\ & (k10_finseq_1 X1 X2) k4_twoscomp \in k3_msafree2 (k49_gfacirc1 X0 \\ & X1 X2)) \wedge ((k4_tarski (k10_finseq_1 X2 X0) k4_twoscomp \in k3_msafree2 \\ & (k49_gfacirc1 X0 X1 X2)) \wedge (k45_gfacirc1 X0 X1 X2 \in k3_msafree2 (k49_gfacirc1 \\ & X0 X1 X2)))))) \end{aligned} \tag{2}$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.\forall X2.(\neg v2_struct_0 (k49_gfacirc1 \\ & X0 X1 X2))\wedge((\neg v11_struct_0 (k49_gfacirc1 X0 X1 X2))\wedge((v1_msualg_1 \\ & (k49_gfacirc1 X0 X1 X2))\wedge((v1_circcomb (k49_gfacirc1 X0 X1 X2))\wedge \\ & ((v2_circcomb (k49_gfacirc1 X0 X1 X2))\wedge((v3_circcomb (k49_gfacirc1 \\ & X0 X1 X2))\wedge(l1_msualg_1 (k49_gfacirc1 X0 X1 X2))))))))) \end{aligned} \quad (3)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.\forall X2.k49_gfacirc1 X0 X1 X2 = k2_circcomb \\ & (k46_gfacirc1 X0 X1 X2) (k43_gfacirc1 X0 X1 X2) \end{aligned} \quad (4)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.\forall X2.\forall X3.\forall X4.k19_ftacell1 \\ & X0 X1 X2 X3 X4 = k2_circcomb (k49_gfacirc1 X0 X1 X2) (k49_gfacirc1 \\ & (k48_gfacirc1 X0 X1 X2) X4 X3) \end{aligned} \quad (5)$$

Theorem 1

$$\begin{aligned} & \forall X0.\forall X1.\forall X2.\forall X3.\forall X4.(k4_tarski \\ & (k10_finseq_1 X0 X1) k14_twoscomp \in k3_msafree2 (k19_ftacell1 \\ & X0 X1 X2 X3 X4))\wedge((k48_gfacirc1 X0 X1 X2 \in k3_msafree2 (k19_ftacell1 \\ & X0 X1 X2 X3 X4))\wedge((k4_tarski (k10_finseq_1 X0 X1) k4_twoscomp \in k3_msafree2 \\ & (k19_ftacell1 X0 X1 X2 X3 X4))\wedge((k4_tarski (k10_finseq_1 X1 X2) \\ & k4_twoscomp \in k3_msafree2 (k19_ftacell1 X0 X1 X2 X3 X4))\wedge((k4_tarski \\ & (k10_finseq_1 X2 X0) k4_twoscomp \in k3_msafree2 (k19_ftacell1 X0 \\ & X1 X2 X3 X4))\wedge((k45_gfacirc1 X0 X1 X2 \in k3_msafree2 (k19_ftacell1 \\ & X0 X1 X2 X3 X4))\wedge((k4_tarski (k10_finseq_1 (k48_gfacirc1 X0 X1 X2) \\ & X4) k14_twoscomp \in k3_msafree2 (k19_ftacell1 X0 X1 X2 X3 X4))\wedge((\\ & k48_gfacirc1 (k48_gfacirc1 X0 X1 X2) X4 X3 \in k3_msafree2 (k19_ftacell1 \\ & X0 X1 X2 X3 X4))\wedge((k4_tarski (k10_finseq_1 (k48_gfacirc1 X0 X1 X2) \\ & X4) k4_twoscomp \in k3_msafree2 (k19_ftacell1 X0 X1 X2 X3 X4))\wedge((k4_tarski \\ & (k10_finseq_1 X4 X3) k4_twoscomp \in k3_msafree2 (k19_ftacell1 X0 \\ & X1 X2 X3 X4))\wedge((k4_tarski (k10_finseq_1 X3 (k48_gfacirc1 X0 X1 X2)) \\ & k4_twoscomp \in k3_msafree2 (k19_ftacell1 X0 X1 X2 X3 X4))\wedge((k45_gfacirc1 \\ & (k48_gfacirc1 X0 X1 X2) X4 X3 \in k3_msafree2 (k19_ftacell1 X0 X1 X2 \\ & X3 X4)))))))))) \end{aligned}$$