

t4_qc_lang3
(TMHuYn7kWAKZj76363oVZ12v8oKeKLeNNB5)

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Let $m1_qc_lang1 : \iota \Rightarrow o$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k9_qc_lang1 : \iota \Rightarrow \iota$ be given. Let $v2_qc_lang1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k24_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k23_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k17_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_zfmisc_1 : \iota \Rightarrow \iota$ be given. Let $k3_qc_lang1 : \iota \Rightarrow \iota$ be given. Let $v1_funct_1 : \iota \Rightarrow o$ be given. Let $v1_funct_2 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k2_zfmisc_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k3_funct_2 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k12_qc_lang1 : \iota \Rightarrow \iota$ be given. Let $k1_subset_1 : \iota \Rightarrow \iota$ be given. Let $v3_qc_lang1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k18_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v4_qc_lang1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k19_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k20_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k4_subset_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v5_qc_lang1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k22_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k7_subset_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_tarski : \iota \Rightarrow \iota$ be given. Let

$k21_qc_lang1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$\begin{aligned}
& \forall X0.(m1_qc_lang1 X0) \Rightarrow (\forall X1.(m1_subset_1 X1 (k9_qc_lang1 \\
& X0)) \Rightarrow (\forall X2.(m1_subset_1 X2 (k1_zfmisc_1 (k3_qc_lang1 X0))) \Rightarrow \\
& ((X2 = k24_qc_lang1 X0 X1) \Leftrightarrow (\exists X3.((v1_funct_1 X3) \wedge ((v1_funct_2 \\
& X3 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 X0))) \wedge (m1_subset_1 \\
& X3 (k1_zfmisc_1 (k2_zfmisc_1 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 \\
& X0)))))) \wedge ((X2 = k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 \\
& X0)) X3 X1) \wedge (\forall X4.(m1_subset_1 X4 (k9_qc_lang1 X0)) \Rightarrow (\forall X5. \\
& (m1_subset_1 X5 (k1_zfmisc_1 (k3_qc_lang1 X0))) \Rightarrow (\forall X6. \\
& (m1_subset_1 X6 (k1_zfmisc_1 (k3_qc_lang1 X0))) \Rightarrow (((X4 = k12_qc_lang1 \\
& X0) \Rightarrow (k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 X0)) \\
& X3 X4 = k1_subset_1 (k3_qc_lang1 X0))) \wedge (((v2_qc_lang1 X4 X0) \Rightarrow (\\
& k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 X0)) X3 \\
& X4 = k23_qc_lang1 X0 (k17_qc_lang1 X0 X4)) \wedge (((v3_qc_lang1 X4 \\
& X0) \wedge (X5 = k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 \\
& X0)) X3 (k18_qc_lang1 X0 X4))) \Rightarrow (k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 \\
& (k3_qc_lang1 X0)) X3 X4 = X5) \wedge (((v4_qc_lang1 X4 X0) \wedge ((X5 = k3_funct_2 \\
& (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 X0)) X3 (k19_qc_lang1 \\
& X0 X4) \wedge (X6 = k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 \\
& X0)) X3 (k20_qc_lang1 X0 X4)))) \Rightarrow (k3_funct_2 (k9_qc_lang1 X0) (\\
& k1_zfmisc_1 (k3_qc_lang1 X0)) X3 X4 = k4_subset_1 (k3_qc_lang1 \\
& X0) X5 X6) \wedge (((v5_qc_lang1 X4 X0) \wedge (X5 = k3_funct_2 (k9_qc_lang1 \\
& X0) (k1_zfmisc_1 (k3_qc_lang1 X0)) X3 (k22_qc_lang1 X0 X4))) \Rightarrow (\\
& k3_funct_2 (k9_qc_lang1 X0) (k1_zfmisc_1 (k3_qc_lang1 X0)) X3 \\
& X4 = k7_subset_1 (k3_qc_lang1 X0) X5 (k1_tarSKI (k21_qc_lang1 X0 \\
& X4)))))))))))))))))
\end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned}
& \forall X0.\forall X1.((m1_qc_lang1 X0) \wedge (m1_subset_1 X1 (k9_qc_lang1 \\
& X0))) \Rightarrow (m1_subset_1 (k24_qc_lang1 X0 X1) (k1_zfmisc_1 (k3_qc_lang1 \\
& X0)))
\end{aligned} \tag{2}$$

Theorem 1

$$\begin{aligned}
& \forall X0.(m1_qc_lang1 X0) \Rightarrow (\forall X1.(m1_subset_1 X1 (k9_qc_lang1 \\
& X0)) \Rightarrow ((v2_qc_lang1 X1 X0) \Rightarrow (k24_qc_lang1 X0 X1 = k23_qc_lang1 X0 \\
& (k17_qc_lang1 X0 X1))))
\end{aligned}$$