

l37_frechet

(TMZkzNURxQz4r8syUesDKcWTFiDGFNmYCoB)

October 27, 2020

Let $r1_tarski : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_tarski : \iota \Rightarrow \iota$ be given. Let $k1_numbers : \iota$ be given. Let $u1_struct_0 : \iota \Rightarrow \iota$ be given. Let $k3_frechet : \iota$ be given. Let $v2_struct_0 : \iota \Rightarrow o$ be given. Let $v1_pre_topc : \iota \Rightarrow o$ be given. Let $v2_pre_topc : \iota \Rightarrow o$ be given. Let $l1_pre_topc : \iota \Rightarrow o$ be given. Let $k2_xboole_0 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k6_subset_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k5_numbers : \iota$ 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 $k3_topmetr : \iota$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_zfmisc_1 : \iota \Rightarrow \iota$ be given. Let $k2_zfmisc_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k1_funct_4 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k6_partfun1 : \iota \Rightarrow \iota$ be given. Let $k7_funcop_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v4_pre_topc : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k8_relset_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$(\neg v2_struct_0\ k3_frechet) \wedge ((v1_pre_topc\ k3_frechet) \wedge ((v2_pre_topc\ k3_frechet) \wedge (l1_pre_topc\ k3_frechet))) \quad (1)$$

Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v2_struct_0\ X0) \wedge ((v1_pre_topc\ X0) \wedge ((v2_pre_topc\ X0) \wedge (l1_pre_topc\ X0)))) \Rightarrow ((X0 = k3_frechet) \Leftrightarrow ((u1_struct_0\ X0 = \\ & k2_xboole_0\ (k6_subset_1\ k1_numbers\ k5_numbers)\ (k1_tarski\ k1_numbers)) \wedge \\ & (\exists X1. ((v1_funct_1\ X1) \wedge ((v1_funct_2\ X1\ (u1_struct_0\ k3_topmetr) \\ & (u1_struct_0\ X0)) \wedge (m1_subset_1\ X1\ (k1_zfmisc_1\ (k2_zfmisc_1 \\ & (u1_struct_0\ k3_topmetr)\ (u1_struct_0\ X0)))))) \wedge ((X1 = k1_funct_4 \\ & (k6_partfun1\ k1_numbers)\ (k7_funcop_1\ k5_numbers\ k1_numbers)) \wedge \\ & (\forall X2. (m1_subset_1\ X2\ (k1_zfmisc_1\ (u1_struct_0\ X0))) \Rightarrow \\ & ((v4_pre_topc\ X2\ X0) \Leftrightarrow (v4_pre_topc\ (k8_relset_1\ (u1_struct_0 \\ & k3_topmetr)\ (u1_struct_0\ X0)\ X1\ X2)\ k3_topmetr)))))) \end{aligned} \quad (2)$$

Assume the following.

$$\forall X0. \forall X1. \forall X2. (X2 = k2_xboole_0\ X0\ X1) \Leftrightarrow (\forall X3. (X3 \in X2) \Leftrightarrow ((X3 \in X0) \vee (X3 \in X1))) \quad (3)$$

Assume the following.

$$\forall X0. \forall X1. (r1_tarski\ X0\ X1) \Leftrightarrow (\forall X2. (X2 \in X0) \Rightarrow (X2 \in X1)) \quad (4)$$

Theorem 1 *r1_tarski (k1_tarski k1_numbers) (u1_struct_0 k3_frechet).*