t11_prvect_1 (TMKq7ppE5m4vVPJZGBmKJQ3NseSZmjuxruT)

October 27, 2020

Let $v1\_relat\_1 : \iota \Rightarrow o$ be given. Let $v2\_relat\_1 : \iota \Rightarrow o$ be given. Let $v1\_funct\_1 : \iota \Rightarrow o$ be given. Let $v1\_xboole\_0 : \iota \Rightarrow o$ be given. Let $v1\_finseq\_1 : \iota \Rightarrow o$ be given. Let $m1\_prvect\_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k3\_finseq\_1 : \iota \Rightarrow \iota$ be given. Let $m2\_subset\_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k5\_numbers : \iota$ be given. Let $k4\_finseq\_1 : \iota \Rightarrow \iota$ be given. Let $k1\_funct\_1 : \iota \Rightarrow \iota \Rightarrow \iota$ 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 $m1\_subset\_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1\_zfmisc\_1 : \iota \Rightarrow \iota$ be given. Let $k1\_relset\_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k4\_ordinal1 : \iota$ be given. Let $k9\_xtuple\_0 : \iota \Rightarrow \iota$ be given. Let $v4\_relat\_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $v3\_ordinal1 : \iota \Rightarrow o$ be given. Assume the following.

$$\forall X0.((v1\_relat\_1\ X0) \wedge ((v1\_funct\_1\ X0) \wedge (v1\_finseq\_1\ X0))) \Rightarrow (\forall X1.((v1\_relat\_1\ X1) \wedge ((v1\_funct\_1\ X1) \wedge (v1\_finseq\_1\ X1))) \Rightarrow ((k3\_finseq\_1\ X0 = k3\_finseq\_1\ X1) \Leftrightarrow (k1\_relset\_1\ k5\_numbers\ X0 = k1\_relset\_1\ k5\_numbers\ X1))) \tag{1}$$

Assume the following.

$$\forall X0.\forall X1.((\neg v1\_xboole\_0\ X0) \wedge ((\neg v1\_xboole\_0\ X1) \wedge (m1\_subset\_1\ X1\ (k1\_zfmisc\_1\ X0)))) \Rightarrow (\forall X2.(m2\_subset\_1\ X2\ X0\ X1) \Leftrightarrow (m1\_subset\_1\ X2\ X1)) \tag{2}$$

Assume the following.

$$k5\_numbers = k4\_ordinal1 \tag{3}$$

Assume the following.

$$\forall X0.((v1\_relat\_1\ X0) \wedge ((v1\_funct\_1\ X0) \wedge (v1\_finseq\_1\ X0))) \Rightarrow (k4\_finseq\_1\ X0 = k9\_xtuple\_0\ X0) \tag{4}$$

Assume the following.

$$\forall X0.\forall X1.((v1\_relat\_1\ X1) \wedge (v4\_relat\_1\ X1\ X0)) \Rightarrow (k1\_relset\_1\ X0\ X1 = k9\_xtuple\_0\ X1) \tag{5}$$

Assume the following.

$$\forall X0.((\neg v1\_xboole\_0\ X0)\wedge(v1\_relat\_1\ X0))\Rightarrow(\neg v1\_xboole\_0\ (k9\_xtuple\_0\ X0)) \tag{6}$$

Assume the following.

$$(\neg v1\_xboole\_0\ k4\_ordinal1)\wedge(v3\_ordinal1\ k4\_ordinal1) \tag{7}$$

Assume the following.

$$\forall X0.((v1\_relat\_1\ X0)\wedge((v1\_funct\_1\ X0)\wedge(v1\_finseq\_1\ X0)))\Rightarrow(m1\_subset\_1\ (k4\_finseq\_1\ X0)\ (k1\_zfmisc\_1\ k5\_numbers)) \tag{8}$$

Assume the following.

$$\forall X0.((v1\_relat\_1\ X0)\wedge((v2\_relat\_1\ X0)\wedge((v1\_funct\_1\ X0)\wedge(\neg v1\_xboole\_0\ X0))))\Rightarrow(\forall X1.((v1\_relat\_1\ X1)\wedge(v1\_funct\_1\ X1))\Rightarrow((m1\_prvect\_1\ X1\ X0)\Leftrightarrow((k9\_xtuple\_0\ X1 = k9\_xtuple\_0\ X0)\wedge(\forall X2.(m1\_subset\_1\ X2\ (k9\_xtuple\_0\ X0))\Rightarrow((v1\_funct\_1\ (k1\_funct\_1\ X1\ X2))\wedge((v1\_funct\_2\ (k1\_funct\_1\ X1\ X2)\ (k2\_zfmisc\_1\ (k1\_funct\_1\ X0\ X2)\ (k1\_funct\_1\ X0\ X2))\ (k1\_funct\_1\ X0\ X2))\wedge(m1\_subset\_1\ (k1\_funct\_1\ X1\ X2)\ (k1\_zfmisc\_1\ (k2\_zfmisc\_1\ (k2\_zfmisc\_1\ (k1\_funct\_1\ X0\ X2)\ (k1\_funct\_1\ X0\ X2))\ (k1\_funct\_1\ X0\ X2))))))))))) \tag{9}$$

Assume the following.

$$\forall X0.((v1\_relat\_1\ X0)\wedge((v1\_funct\_1\ X0)\wedge(v1\_finseq\_1\ X0)))\Rightarrow((v1\_relat\_1\ X0)\wedge((v4\_relat\_1\ X0\ k5\_numbers)\wedge((v1\_funct\_1\ X0)\wedge(v1\_finseq\_1\ X0)))) \tag{10}$$

Theorem 1

$$\forall X0.((v1\_relat\_1\ X0)\wedge((v2\_relat\_1\ X0)\wedge((v1\_funct\_1\ X0)\wedge((\neg v1\_xboole\_0\ X0)\wedge(v1\_finseq\_1\ X0)))))\Rightarrow(\forall X1.((v1\_relat\_1\ X1)\wedge((v1\_funct\_1\ X1)\wedge(v1\_finseq\_1\ X1)))\Rightarrow((m1\_prvect\_1\ X1\ X0)\Leftrightarrow((k3\_finseq\_1\ X1 = k3\_finseq\_1\ X0)\wedge(\forall X2.(m2\_subset\_1\ X2\ k5\_numbers\ (k4\_finseq\_1\ X0))\Rightarrow((v1\_funct\_1\ (k1\_funct\_1\ X1\ X2))\wedge((v1\_funct\_2\ (k1\_funct\_1\ X1\ X2)\ (k2\_zfmisc\_1\ (k1\_funct\_1\ X0\ X2)\ (k1\_funct\_1\ X0\ X2))\ (k1\_funct\_1\ X0\ X2))\wedge(m1\_subset\_1\ (k1\_funct\_1\ X1\ X2)\ (k1\_zfmisc\_1\ (k2\_zfmisc\_1\ (k2\_zfmisc\_1\ (k1\_funct\_1\ X0\ X2)\ (k1\_funct\_1\ X0\ X2))\ (k1\_funct\_1\ X0\ X2)))))))))$$