

t29_topreala
(TMUZJ42oQEws78Pyaqz4Y19fZB9fzyAppUG)

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Let $v1_xreal_0 : \iota \Rightarrow o$ be given. Let $k1_funct_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k19_euclid : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $np_1 : \iota$ be given. Let $np_2 : \iota$ be given. Let $k4_funct_4 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k10_finseq_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. \forall X2. \forall X3. ((X0 \neq X1) \Rightarrow (k1_funct_1 \\ & (k4_funct_4 X0 X1 X2 X3) X0 = X2)) \wedge (k1_funct_1 (k4_funct_4 X0 X1 X2 \\ & X3) X1 = X3) \end{aligned} \tag{1}$$

Assume the following.

$$\forall X0. \forall X1. k10_finseq_1 X0 X1 = k4_funct_4 np_1 np_2 X0 X1 \tag{2}$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. ((v1_xreal_0 X0) \wedge (v1_xreal_0 X1)) \Rightarrow (k19_euclid \\ & X0 X1 = k10_finseq_1 X0 X1) \end{aligned} \tag{3}$$

Theorem 1

$$\begin{aligned} & \forall X0. (v1_xreal_0 X0) \Rightarrow (\forall X1. (v1_xreal_0 X1) \Rightarrow ((k1_funct_1 \\ & (k19_euclid X0 X1) np_1 = X0) \wedge (k1_funct_1 (k19_euclid X0 X1) np_2 = \\ & X1))) \end{aligned}$$