

t17\_enumset1  
(TMNJ6oY8AvbZmE3BHjLnybngZWsxs1sqDr)

October 27, 2020

Let  $k5\_enumset1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k2\_xboole\_0 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k2\_tarski : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k3\_enumset1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k1\_enumset1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $k2\_enumset1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$  be given. Assume the following.

$$\forall X0.\forall X1.\forall X2.\forall X3.\forall X4.k3\_enumset1 \\ X0\ X1\ X2\ X3\ X4 = k2\_xboole\_0\ (k2\_tarski\ X0\ X1)\ (k1\_enumset1\ X2\ X3\ X4) \quad (1)$$

Assume the following.

$$\forall X0.\forall X1.\forall X2.k2\_xboole\_0\ (k2\_xboole\_0\ X0 \\ X1)\ X2 = k2\_xboole\_0\ X0\ (k2\_xboole\_0\ X1\ X2) \quad (2)$$

Assume the following.

$$\forall X0.\forall X1.\forall X2.\forall X3.\forall X4.\forall X5. \\ \forall X6.k5\_enumset1\ X0\ X1\ X2\ X3\ X4\ X5\ X6 = k2\_xboole\_0\ (k2\_enumset1 \\ X0\ X1\ X2\ X3)\ (k1\_enumset1\ X4\ X5\ X6) \quad (3)$$

Assume the following.

$$\forall X0.\forall X1.\forall X2.\forall X3.k2\_enumset1\ X0\ X1 \\ X2\ X3 = k2\_xboole\_0\ (k2\_tarski\ X0\ X1)\ (k2\_tarski\ X2\ X3) \quad (4)$$

**Theorem 1**

$$\forall X0.\forall X1.\forall X2.\forall X3.\forall X4.\forall X5. \\ \forall X6.k5\_enumset1\ X0\ X1\ X2\ X3\ X4\ X5\ X6 = k2\_xboole\_0\ (k2\_tarski \\ X0\ X1)\ (k3\_enumset1\ X2\ X3\ X4\ X5\ X6)$$