

t30\_rfinseq2  
(TMNnNNErtC3JiEQm8o68CQjtvdq5wmbG8cx)

October 27, 2020

Let  $m2\_finseq\_1 : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k1\_numbers : \iota$  be given. Let  $k4\_finseq\_1 : \iota \Rightarrow \iota$  be given. Let  $k5\_rfinseq2 : \iota \Rightarrow \iota$  be given. Let  $k3\_finseq\_1 : \iota \Rightarrow \iota$  be given. Let  $v1\_relat\_1 : \iota \Rightarrow o$  be given. Let  $v1\_funct\_1 : \iota \Rightarrow o$  be given. Let  $v1\_finseq\_1 : \iota \Rightarrow o$  be given. Let  $r2\_classes1 : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $m1\_finseq\_1 : \iota \Rightarrow \iota \Rightarrow o$  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  $k5\_numbers : \iota$  be given. Let  $v8\_valued\_0 : \iota \Rightarrow o$  be given. Assume the following.

$$\begin{aligned} \forall X0.((v1\_relat\_1 X0) \wedge ((v1\_funct\_1 X0) \wedge (v1\_finseq\_1 X0))) \Rightarrow \\ (\forall X1.((v1\_relat\_1 X1) \wedge ((v1\_funct\_1 X1) \wedge (v1\_finseq\_1 \\ X1))) \Rightarrow ((r2\_classes1 X0 X1) \Rightarrow ((k3\_finseq\_1 X0 = k3\_finseq\_1 X1) \wedge \\ (k4\_finseq\_1 X0 = k4\_finseq\_1 X1)))) \end{aligned} \tag{1}$$

Assume the following.

$$\forall X0. \forall X1. (m2\_finseq\_1 X1 X0) \Leftrightarrow (m1\_finseq\_1 X1 X0) \tag{2}$$

Assume the following.

$$\forall X0. \forall X1. (m2\_finseq\_1 X1 X0) \Rightarrow ((v1\_funct\_1 X1) \wedge (v1\_finseq\_1 X1) \wedge (m1\_subset\_1 X1 (k1\_zfmisc\_1 (k2\_zfmisc\_1 k5\_numbers X0)))) \tag{3}$$

Assume the following.

$$\forall X0. \forall X1. (m1\_finseq\_1 X1 X0) \Rightarrow ((v1\_relat\_1 X1) \wedge (v1\_funct\_1 X1) \wedge (v1\_finseq\_1 X1)) \tag{4}$$

Assume the following.

$$\forall X0. (m1\_finseq\_1 X0 k1\_numbers) \Rightarrow ((v8\_valued\_0 (k5\_rfinseq2 X0)) \wedge (m2\_finseq\_1 (k5\_rfinseq2 X0) k1\_numbers)) \tag{5}$$

Assume the following.

$$\begin{aligned} \forall X0.(m2\_finseq\_1 X0 k1\_numbers) \Rightarrow (\forall X1.((v8\_valued\_0 \\ X1) \wedge (m2\_finseq\_1 X1 k1\_numbers)) \Rightarrow ((X1 = k5\_r\_finseq2 X0) \Leftrightarrow (r2\_classes1 \\ X0 X1))) \end{aligned} \tag{6}$$

**Theorem 1**

$$\begin{aligned} \forall X0.(m2\_finseq\_1 X0 k1\_numbers) \Rightarrow ((k4\_finseq\_1 (k5\_r\_finseq2 \\ X0) = k4\_finseq\_1 X0) \wedge (k3\_finseq\_1 (k5\_r\_finseq2 X0) = k3\_finseq\_1 \\ X0)) \end{aligned}$$