

## t14\_fcont\_2

(TMNN9w9mT8RXH1as4QZvX81GY1Ade6BoW56)

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Let  $v1\_funct\_1 : \iota \Rightarrow o$  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  $k1\_numbers : \iota$  be given. Let  $r1\_tarski : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k1\_relset\_1 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $v3\_funct\_1 : \iota \Rightarrow o$  be given. Let  $k2\_partfun1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $v1\_fcont\_2 : \iota \Rightarrow o$  be given. Let  $v2\_fcont\_1 : \iota \Rightarrow o$  be given. Assume the following.

$$\begin{aligned} \forall X0. \forall X1. ((v1\_funct\_1 X1) \wedge (m1\_subset\_1 X1 (k1\_zfmisc\_1 \\ (k2\_zfmisc\_1 k1\_numbers k1\_numbers)))) \Rightarrow ((v2\_fcont\_1 (k2\_partfun1 \\ k1\_numbers k1\_numbers X1 X0)) \Rightarrow (v1\_fcont\_2 (k2\_partfun1 k1\_numbers \\ k1\_numbers X1 X0))) \end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned} \forall X0. \forall X1. \forall X2. \forall X3. ((v1\_funct\_1 X2) \wedge \\ (m1\_subset\_1 X2 (k1\_zfmisc\_1 (k2\_zfmisc\_1 X0 X1)))) \Rightarrow ((v1\_funct\_1 \\ (k2\_partfun1 X0 X1 X2 X3)) \wedge (m1\_subset\_1 (k2\_partfun1 X0 X1 X2 X3) \\ (k1\_zfmisc\_1 (k2\_zfmisc\_1 X0 X1)))) \end{aligned} \tag{2}$$

Assume the following.

$$\begin{aligned} \forall X0. (m1\_subset\_1 X0 (k1\_zfmisc\_1 (k2\_zfmisc\_1 k1\_numbers \\ k1\_numbers))) \Rightarrow (((v1\_funct\_1 X0) \wedge (v3\_funct\_1 X0)) \Rightarrow ((v1\_funct\_1 \\ X0) \wedge (v2\_fcont\_1 X0))) \end{aligned} \tag{3}$$

### Theorem 1

$$\begin{aligned} \forall X0. \forall X1. ((v1\_funct\_1 X1) \wedge (m1\_subset\_1 X1 (k1\_zfmisc\_1 \\ (k2\_zfmisc\_1 k1\_numbers k1\_numbers)))) \Rightarrow (((r1\_tarski X0 (k1\_relset\_1 \\ k1\_numbers X1)) \wedge (v3\_funct\_1 (k2\_partfun1 k1\_numbers k1\_numbers \\ X1 X0))) \Rightarrow (v1\_fcont\_2 (k2\_partfun1 k1\_numbers k1\_numbers X1 X0))) \end{aligned}$$