

t11_integra7

(TMRGTisTFgSzETeqfYirgEXP4AfMzyT7FqT)

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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 $r1_integra7 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r1_tarski : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_relset_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $r2_fdiff_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r2_relset_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k2_fdiff_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k2_partfun1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $r1_fdiff_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. ((v1_funct_1 X1) \wedge (m1_subset_1 X1 (k1_zfmisc_1 \\ & \quad (k2_zfmisc_1 k1_numbers k1_numbers)))) \Rightarrow (\forall X2. ((v1_funct_1 \\ & X2) \wedge (m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 k1_numbers k1_numbers)))) \Rightarrow \\ & ((r1_integra7 X0 X1 X2) \Leftrightarrow ((r2_fdiff_1 X1 X0) \wedge (r2_relset_1 k1_numbers \\ & \quad k1_numbers (k2_fdiff_1 X1 X0) (k2_partfun1 k1_numbers k1_numbers \\ & \quad X2 X0)))))) \end{aligned} \tag{1}$$

Assume the following.

$$\begin{aligned} & \forall X0. ((v1_funct_1 X0) \wedge (m1_subset_1 X0 (k1_zfmisc_1 (k2_zfmisc_1 \\ & \quad k1_numbers k1_numbers)))) \Rightarrow (\forall X1. (r2_fdiff_1 X0 X1) \Leftrightarrow ((\\ & \quad r1_tarski X1 (k1_relset_1 k1_numbers X0)) \wedge (\forall X2. (m1_subset_1 \\ & X2 k1_numbers) \Rightarrow ((X2 \in X1) \Rightarrow (r1_fdiff_1 (k2_partfun1 k1_numbers \\ & \quad k1_numbers X0 X1) X2)))))) \end{aligned} \tag{2}$$

Theorem 1

$$\begin{aligned} & \forall X0. \forall X1. ((v1_funct_1 X1) \wedge (m1_subset_1 X1 (k1_zfmisc_1 \\ & \quad (k2_zfmisc_1 k1_numbers k1_numbers)))) \Rightarrow (\forall X2. ((v1_funct_1 \\ & X2) \wedge (m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 k1_numbers k1_numbers)))) \Rightarrow \\ & ((r1_integra7 X0 X1 X2) \Rightarrow (r1_tarski X0 (k1_relset_1 k1_numbers \\ & \quad X1)))) \end{aligned}$$