

t32_measure1

(TMJRRNcamq5qk5fPKD4tFbBbfoMAovrUsbJ)

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Let $v1_xboole_0 : \iota \Rightarrow o$ be given. Let $v1_prob_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $v4_prob_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $m1_subset_1 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_zfmisc_1 : \iota \Rightarrow \iota$ be given. Let $v1_funct_1 : \iota \Rightarrow o$ be given. Let $v1_funct_2 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k7_numbers : \iota$ be given. Let $v10_valued_0 : \iota \Rightarrow o$ be given. Let $v6_supinf_2 : \iota \Rightarrow o$ be given. Let $v4_measure1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k2_zfmisc_1 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $m2_subset_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r1_tarski : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $r1_xxreal_0 : \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k1_supinf_1 : \iota$ be given. Let $k12_supinf_2 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k3_measure1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k4_supinf_2 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v2_finsub_1 : \iota \Rightarrow o$ be given. Let $v2_measure1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow o$ be given. Let $k2_finsub_1 : \iota \Rightarrow \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $k4_xboole_0 : \iota \Rightarrow \iota \Rightarrow \iota$ be given. Let $v4_finsub_1 : \iota \Rightarrow o$ be given. Let $v3_finsub_1 : \iota \Rightarrow o$ be given. Let $v1_finsub_1 : \iota \Rightarrow o$ be given. Assume the following.

$$\begin{aligned}
 & \forall X0. \forall X1. ((\neg v1_xboole_0 X1) \wedge ((v2_finsub_1 X1) \wedge \\
 & ((v1_prob_1 X1 X0) \wedge (m1_subset_1 X1 (k1_zfmisc_1 (k1_zfmisc_1 \\
 & X0)))))) \Rightarrow (\forall X2. ((v1_funct_1 X2) \wedge ((v1_funct_2 X2 X1 k7_numbers) \wedge \\
 & ((v10_valued_0 X2) \wedge (v6_supinf_2 X2) \wedge (v2_measure1 X2 X0 X1) \wedge \\
 & (m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 X1 k7_numbers)))))) \Rightarrow \\
 & (\forall X3. (m2_subset_1 X3 (k1_zfmisc_1 X0) X1) \Rightarrow (\forall X4. \\
 & (m2_subset_1 X4 (k1_zfmisc_1 X0) X1) \Rightarrow ((r1_tarski X3 X4) \Rightarrow ((r1_xxreal_0 \\
 & k1_supinf_1 (k12_supinf_2 X2 X3)) \vee (k12_supinf_2 X2 (k2_finsub_1 \\
 & X1 X4 X3) = k4_supinf_2 (k12_supinf_2 X2 X4) (k12_supinf_2 X2 X3))))))))) \\
 & \tag{1}
 \end{aligned}$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.((\neg v1_xboole_0 X1)\wedge((v1_prob_1 X1 X0)\wedge \\ & ((v4_prob_1 X1 X0)\wedge(m1_subset_1 X1 (k1_zfmisc_1 (k1_zfmisc_1 \\ & X0))))))\Rightarrow(\forall X2.((v1_funct_1 X2)\wedge((v1_funct_2 X2 X1 k7_numbers)\wedge \\ & ((v10_valued_0 X2)\wedge((v6_supinf_2 X2)\wedge((v4_measure1 X2 X0 X1)\wedge \\ & (m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 X1 k7_numbers))))))\Rightarrow \\ & ((v1_funct_1 X2)\wedge((v1_funct_2 X2 X1 k7_numbers)\wedge((v10_valued_0 \\ & X2)\wedge((v6_supinf_2 X2)\wedge((v2_measure1 X2 X0 X1)\wedge(m1_subset_1 X2 \\ & (k1_zfmisc_1 (k2_zfmisc_1 X1 k7_numbers)))))))))) \end{aligned} \quad (2)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.((\neg v1_xboole_0 X0)\wedge((\neg v1_xboole_0 X1)\wedge \\ & (m1_subset_1 X1 (k1_zfmisc_1 X0))))\Rightarrow(\forall X2.(m2_subset_1 \\ & X2 X0 X1)\Leftrightarrow(m1_subset_1 X2 X1)) \end{aligned} \quad (3)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.\forall X2.\forall X3.(((\neg v1_xboole_0 \\ & X1)\wedge((v2_finsub_1 X1)\wedge((v1_prob_1 X1 X0)\wedge(m1_subset_1 X1 (k1_zfmisc_1 \\ & (k1_zfmisc_1 X0))))))\wedge((m1_subset_1 X2 X1)\wedge(m1_subset_1 X3 X1)))\Rightarrow \\ & (k3_measure1 X0 X1 X2 X3 = k4_xboole_0 X2 X3) \end{aligned} \quad (4)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.\forall X2.(((\neg v1_xboole_0 X0)\wedge(v4_finsub_1 \\ & X0))\wedge((m1_subset_1 X1 X0)\wedge(m1_subset_1 X2 X0)))\Rightarrow(k2_finsub_1 \\ & X0 X1 X2 = k4_xboole_0 X1 X2) \end{aligned} \quad (5)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.(m1_subset_1 X1 (k1_zfmisc_1 (k1_zfmisc_1 \\ & X0)))\Rightarrow(((v2_finsub_1 X1)\wedge(v1_prob_1 X1 X0))\Rightarrow(v3_finsub_1 X1)) \end{aligned} \quad (6)$$

Assume the following.

$$\begin{aligned} & \forall X0.\forall X1.(m1_subset_1 X1 (k1_zfmisc_1 (k1_zfmisc_1 \\ & X0)))\Rightarrow(((v2_finsub_1 X1)\wedge(v1_prob_1 X1 X0))\Rightarrow(v1_finsub_1 X1)) \end{aligned} \quad (7)$$

Assume the following.

$$\forall X0.((v1_finsub_1 X0)\wedge(v3_finsub_1 X0))\Rightarrow(v4_finsub_1 X0) \quad (8)$$

Assume the following.

$$\forall X0.(v1_xboole_0 X0)\Rightarrow(\forall X1.(m1_subset_1 X1 (k1_zfmisc_1 X0))\Rightarrow(v1_xboole_0 X1)) \quad (9)$$

Assume the following.

$$\begin{aligned} & \forall X0. \forall X1. (m1_subset_1 X1 (k1_zfmisc_1 (k1_zfmisc_1 \\ & X0))) \Rightarrow (((\neg v1_xboole_0 X1) \wedge ((v1_prob_1 X1 X0) \wedge (v4_prob_1 X1 X0))) \Rightarrow \\ & ((\neg v1_xboole_0 X1) \wedge ((v2_finsub_1 X1) \wedge ((v1_prob_1 X1 X0) \wedge (v4_prob_1 \\ & X1 X0)))))) \end{aligned} \tag{10}$$

Theorem 1

$$\begin{aligned} & \forall X0. \forall X1. ((\neg v1_xboole_0 X1) \wedge ((v1_prob_1 X1 X0) \wedge \\ & ((v4_prob_1 X1 X0) \wedge (m1_subset_1 X1 (k1_zfmisc_1 (k1_zfmisc_1 \\ & X0)))))) \Rightarrow (\forall X2. ((v1_funct_1 X2) \wedge ((v1_funct_2 X2 X1 k7_numbers) \wedge \\ & ((v10_valued_0 X2) \wedge ((v6_supinf_2 X2) \wedge ((v4_measure1 X2 X0 X1) \wedge \\ & (m1_subset_1 X2 (k1_zfmisc_1 (k2_zfmisc_1 X1 k7_numbers)))))) \Rightarrow \\ & (\forall X3. (m2_subset_1 X3 (k1_zfmisc_1 X0) X1) \Rightarrow (\forall X4. \\ & (m2_subset_1 X4 (k1_zfmisc_1 X0) X1) \Rightarrow ((r1_tarski X3 X4) \Rightarrow ((r1_xxreal_0 \\ & k1_supinf_1 (k12_supinf_2 X2 X3)) \vee (k12_supinf_2 X2 (k3_measure1 \\ & X0 X1 X4 X3) = k4_supinf_2 (k12_supinf_2 X2 X4) (k12_supinf_2 X2 X3))))))))) \end{aligned}$$