

# t83\_cohsp\_1 (TMTpXN- SzUTwqKY9cySvLvtvxTNJdZBW5YTq)

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Let  $v1\_xboole\_0 : \iota \Rightarrow o$  be given. Let  $v1\_classes1 : \iota \Rightarrow o$  be given. Let  $v1\_coh\_sp : \iota \Rightarrow o$  be given. Let  $k15\_cohsp\_1 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Let  $m1\_subset\_1 : \iota \Rightarrow \iota \Rightarrow o$  be given. Let  $k14\_cohsp\_1 : \iota \Rightarrow \iota \Rightarrow \iota$  be given. Assume the following.

$$\begin{aligned} & \forall X0. ((\neg v1\_xboole\_0 X0) \wedge ((v1\_classes1 X0) \wedge (v1\_coh\_sp \\ & X0))) \Rightarrow (\forall X1. ((\neg v1\_xboole\_0 X1) \wedge ((v1\_classes1 X1) \wedge (v1\_coh\_sp \\ & X1))) \Rightarrow (k15\_cohsp\_1 X0 X1 = ReplSep2 (toset (\lambda X2 : \iota. m1\_subset\_1 \\ & X2 X0)) (\lambda X2 : \iota. toset (\lambda X3 : \iota. m1\_subset\_1 X3 X1)) (\lambda X2 : \\ & \iota. \lambda X3 : \iota. True) (\lambda X2 : \iota. \lambda X3 : \iota. k14\_cohsp\_1 X2 \\ & X3))) \end{aligned} \quad (1)$$

## Theorem 1

$$\begin{aligned} & \forall X0. ((\neg v1\_xboole\_0 X0) \wedge ((v1\_classes1 X0) \wedge (v1\_coh\_sp \\ & X0))) \Rightarrow (\forall X1. ((\neg v1\_xboole\_0 X1) \wedge ((v1\_classes1 X1) \wedge (v1\_coh\_sp \\ & X1))) \Rightarrow (\forall X2. (X2 \in k15\_cohsp\_1 X0 X1) \Leftrightarrow (\exists X3. (m1\_subset\_1 \\ & X3 X0) \wedge (\exists X4. (m1\_subset\_1 X4 X1) \wedge (X2 = k14\_cohsp\_1 X3 X4)))))) \end{aligned}$$