

R-state-var-compat^{0,22}

$\forall i:\text{Id}, ds:x:\text{Id} \text{ fp} \rightarrow \text{Type}, da:k:\text{Knd} \text{ fp} \rightarrow \text{Type}, x:\text{Id}, T:\text{Type}, ks:\text{Knd List},$
 $tr:(k:\{k:\text{Knd} \mid (k \in ks)\} \rightarrow \text{State}(ds) \rightarrow \text{Valtype}(da;k) \rightarrow T \rightarrow T).$

$\neg x \in \text{dom}(ds)$

$\Rightarrow (\forall A:\text{Realizer}.$

 R-Feasible(A)

$\Rightarrow \neg \text{R-occurs}(A;i;x)$

$\Rightarrow ds \parallel \text{R-ds}(A;i)$

$\Rightarrow da \parallel \text{R-da}(A;i)$

$\Rightarrow (\forall k \in ks. \text{isrcv}(k) \Rightarrow \text{R-da}(A;\text{source}(\text{lnk}(k)))(k)?\text{Void} \subseteq \rho \text{ Valtype}(da;k))$

$\Rightarrow (\forall k \in ks. k \in \text{dom}(da))$

$\Rightarrow (\forall k:\text{Knd}. (k \in ks) \Rightarrow \neg \text{write-restricted}(A;i;k))$

$\Rightarrow (\forall y:\text{Id}. y \in \text{dom}(ds \oplus x : T) \Rightarrow \neg \text{read-restricted}(A; i; y))$

$\Rightarrow \text{R-state-var}(i;ds;da;x;T;ks;tr) \parallel A$)