

## cless-eq-loc<sup>11,40</sup>

$\forall E, X_1, X_2: \text{Type}, \text{info}: (E \rightarrow ((:\text{Id} \times X_1) + (:\text{IdLnk} \times E) \times X_2)), \text{pred}?: (E \rightarrow (?E)).$   
 $\text{SWellFounded}(\text{pred}!(e; e'))$   
 $\Rightarrow (\forall e: E. (\neg(\uparrow \text{first}(e))) \Rightarrow (\text{loc}(\text{pred}(e)) = \text{loc}(e) \in \text{Id}))$   
 $\Rightarrow (\forall e, e': E. (\text{loc}(e) = \text{loc}(e') \in \text{Id}) \Rightarrow (\text{pred}?(e) = \text{pred}?(e')) \Rightarrow (e = e'))$   
 $\Rightarrow (\forall e, e': E.$   
     $(\text{loc}(e) = \text{loc}(e') \in \text{Id})$   
     $\Rightarrow e < e'$   
     $\Rightarrow (e \text{ rel\_plus}(E; (\lambda x, y. (\neg(\uparrow \text{first}(y))) \text{ c} \wedge (x = \text{pred}(y) \in E))) e'))$