

Inference at \* 1  
of proof for Lemma before-adjacent:

1.  $T : \text{Type}$
  2.  $T \text{ List}$
  3.  $x : T$
  4.  $y : T$
  5.  $\text{no\_repeats}(T; [])$
  6.  $\text{adjacent}(T; []; x; y)$
  7.  $z : T$
  8.  $z \text{ before } y \in []$
- $\vdash z \text{ before } x \in [] \vee (z = x)$   
by ((FLemma 'adjacent-nil' [6])  
CollapseTHEN (Auto·)).