

Inference at * 1
of proof for Lemma do-apply-p-filter:

1. $T : \text{Type}$
2. $P : T \rightarrow \mathbb{P}$
3. $f : \forall x:T. \text{Dec}(P(x))$
4. $x : T$

$\vdash (\uparrow \text{isl}(\text{case } f(x) \text{ of } \text{inl}(p) \Rightarrow \text{inl } x \mid \text{inr}(p) \Rightarrow \text{inr } p))$
 $\Rightarrow (\text{outl}(\text{case } f(x) \text{ of } \text{inl}(p) \Rightarrow \text{inl } x \mid \text{inr}(p) \Rightarrow \text{inr } p) = x)$
by (((GenConcl $f(x) = z$)
CollapseTHEN (Auto·))·)
CollapseTHEN ((ID (-2)·)

CollapseTHEN (((Reduce 0)
CollapseTHEN (Auto·))·))·