

1: $\neg \forall x. \neg R(x)$ premise

2: $\neg \exists y. R(y)$ assumption

3: actual i assumption

...

4: $\neg R(i)$

5: $\forall x. \neg R(x)$ \forall intro 3-4

6: \perp \neg elim 5,1

7: $\exists y. R(y)$ contra (classical) 2-6