You are using countermodel generation
for classical predicate logic.

Tableau for
$\not\models (\exists x \forall y R(x,y) \vee \forall y \exists x \neg R(x,y))$:

1.	$\neg(\exists x \forall y R(x,y) \vee \forall y \exists x \neg R(x,y))$	(A)
2.	$\neg\exists x \forall y R(x,y)$	$(\neg\vee$, 1)
3.	$\neg\forall y \exists x \neg R(x,y)$	$(\neg\vee$, 1)
4.	$\neg\forall y R(a,y)$	$(\neg\exists$, 2, $[x/a]$*)

5.	$\neg R(a,a)$	$(\neg\forall$, 4, $[y/a]$)
6.	$\neg\exists x \neg R(x,a)$	$(\neg\forall$, 3, $[y/a]$)
7.	$\neg\neg R(a,a)$	$(\neg\exists$, 6, $[x/a]$)
	$\times$	(5 , 7)

8.	$\neg R(a,b)$	$(\neg\forall$, 4, $[y/b]$*)
9.	$\neg\exists x \neg R(x,a)$	$(\neg\forall$, 3, $[y/a]$)
10.	$\neg\neg R(a,a)$	$(\neg\exists$, 9, $[x/a]$)
11.	$R(a,a)$	$(\neg\neg$, 10)
12.	$\neg\neg R(b,a)$	$(\neg\exists$, 9, $[x/b]$)
13.	$R(b,a)$	$(\neg\neg$, 12)
14.	$\neg\forall y R(b,y)$	$(\neg\exists$, 2, $[x/b]$)

15.	$\neg R(b,a)$	$(\neg\forall$, 14, $[y/a]$)
	$\times$	(13 , 15)

16.	$\neg R(b,b)$	$(\neg\forall$, 14, $[y/b]$)
	$\circ$	

The tableau is open:
The formula is refutable.

Countermodels:

Structure $\mathcal{S}_{16} = \langle \mathcal{D}, \mathcal{I} \rangle$ with

$\mathcal{D} = \quad \{a, b\}$

$\mathcal{I} : \quad R \quad \mapsto \{\langle a,a \rangle, \langle b,a \rangle\}$