| 1. | $\forall x[J(x) \rightarrow \exists y[O(y) \land s(y,x)]]$ | Premise | {1} |
|-----|--|-----------------------------|-----|
| 2. | $J(a) \rightarrow \exists y [O(y) \land S(y,a)]$ | ∀-elimination1 | {1} |
| 3. | \neg J(a)V \exists y[O(y) \land S(y,a)] | Sequent-intro(ImplToDisj)2 | {1} |
| 4. | $\lceil \neg J(a) \rceil$ | Hypothesis | {4} |
| 5. | \neg J(a)V(O(b) \land S(b,a)) | V-introduction4 | {4} |
| 6. | $J(a) \rightarrow (O(b) \lor S(b,a))$ | Sequent-intro(DisjToImpl)5 | {4} |
| 7. | $\exists y[J(a) \rightarrow (O(y) \lor S(y,a))]$ | ∃-introduction6 | {4} |
| 8. | $\exists y[O(y) \land S(y,a)]$ | Hypothesis | {8} |
| 9. | Γ O(b) Λ S(y,a) | Hypothesis | {9} |
| 10. | \neg J(a)V(O(b) \land S(b,a)) | V-introduction9 | {9} |
| 11. | $J(a) \rightarrow (O(y)S(b,a))$ | Sequent-intro(DisjToImpl)10 | {9} |
| 12. | $\exists y[J(a) \rightarrow (O(y) \lor S(y,a))]$ | ∃-introduction11 | {9} |
| 13. | $\exists y[J(a) \rightarrow (O(y) \lor S(y,a))]$ | ∃-elimination8,9,12 | {8} |
| 14. | $\exists y[J(a) \rightarrow (O(y) \lor S(y,a))]$ | V-elimination3,4,7,8,13 | {1} |
| 15. | $\forall x[\exists y[J(x) \rightarrow (O(y) \land S(y,x))]]$ | ∀-introduction14 | {1} |
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