(love) Formalize the statements
Everyone loves my baby.
My baby loves only me.
I am my baby.
and prove that the first two statements imply the last statement.

\[ \forall p \cdot (p \text{ loves mybaby}) \]
\[ (\text{mybaby loves me}) \land \neg(\exists p \cdot p=me \land (\text{mybaby loves } p)) \]
\[ me=mybaby \]

Now the proof: starting with the first two statements,
\[ (\forall p \cdot (p \text{ loves mybaby})) \land (\text{mybaby loves me}) \land \neg(\exists p \cdot p=me \land (\text{mybaby loves } p)) \]
\[ = (\forall p \cdot (p \text{ loves mybaby})) \land (\text{mybaby loves me}) \land (\forall p \cdot p=me \lor \neg(\text{mybaby loves } p)) \]
duality
specialize both \( ps \)
\[ \Rightarrow (\text{mybaby loves mybaby}) \land (\text{mybaby loves me}) \land (\forall p \cdot p=me \lor \neg(\text{mybaby loves mybaby}) \]
use the first conjunct as context
\[ = (\text{mybaby loves mybaby}) \land (\text{mybaby loves me}) \land (\text{mybaby=me} \lor \neg \top) \]
binary axiom, base, and specialize
\[ \Rightarrow \text{mybaby=me} \]

I suspect that “Everyone loves my baby.” should be formalized as
\[ \forall p \cdot p=\text{mybaby} \Rightarrow (p \text{ loves mybaby}) \]
and then the last statement is not provable from the first two.