Singleton Indefinites (re. Schwarzschild 2000)

1. If a (particular) friend of mine from Texas had died in the fire, I would have inherited a fortune.

(Fodor & Sag 1982)

- 2. Fodor & Sag: ambiguity of indefinites referential (type e) vs. existential quantifier
- 3. Intermediate scope readings:

Every member of the club was convinced that if a (particular) friend of his from Texas had died in the fire, he would have inherited a fortune.

 The modern account: indefinites can be interpreted via choice-functions (Reinhart, Winter, Kratzer, Matthewson, Chierchia).

∃f: if f(friend of mine from Texas) had died in the fire, I would have inherited a fortune

∀y: y member of the club → ∃f: y convinced that: if f(friend of y's from Texas) had died in the fire y would have inherited a fortune

or:

(\exists f:) \forall y: y member of the club \rightarrow

y convinced that: if f(y, friend of y's from Texas) had died in the fire y would have inherited a fortune

- 5. Suspicion: indefinites are not that special, perhaps there is a more widely applicable mechanism that as a limiting case produces pseudo-scope indefinites.
- 6. Idea: the mechanism that produces pseudo-scope indefinites is the same one that effects domain restriction on quantifiers of all sorts.
- 7. One implementation:

Matthewson: in St'át'imcets, the indefinite determiner (which she analyzes as introducing a choice-function) also occurs under real quantifiers.

DET friend(s) of mine \rightarrow a/some friend(s) of mine all DET friends of mine \rightarrow all the friends of mine

- 8. Perhaps, indefinites, even pseudo-scope ones, are always existential quantifiers.
 -> Pseudo-scope indefinites can occur in *there*-insertion contexts
 Some linguists dislike every paper in which there is a particular example of Chomsky's.
- 9. If the restriction of an existential quantifier is true of exactly one individual, the quantifier behaves logically like a (type-lifted) referential noun phrase. Schwarzschild calls indefinites with such an interpretation "singleton indefinites". [An idea along these lines was first proposed by Uli Sauerland in a squib for my 1995 seminar on context-dependency.]
- 10. Schwarzschild's claim: indefinites with unexpected wide scope interpretations are simply singleton indefinites. That is, to get such wide scope, the context must provide a restriction that characterizes a singleton set.
- 11. This will of course rarely be the case unless contextual domain restriction supplements the overtly expressed restriction.
- 12. If a friend of mine from Texas had died in the fire, I would have inherited a fortune. if $\exists x (C(x) \& x \text{ friend of mine from Texas } \& x \text{ had died in the fire}),$ I would have inherited a fortune

If the context is such that the free variable C is assigned a value that contains exactly one relative of mine from Texas, then the sentence will be truth-conditionally equivalent to one in which the indefinite would have had wide scope over the conditional.

13. Every member of the club was convinced that if a friend of his from Texas had died in the fire, he would have inherited a fortune.

Schwarzschild argues that this as well can be analyzed as involving a singleton indefinite as long as the contextual domain restriction varies with the higher

quantifier.

 $\forall y: y \text{ member of the club} \rightarrow$ y convinced that: if $\exists x \left(C_y(x) \& x \text{ friend of } y \text{'s from Texas } \& x \text{ had died in the fire} \right)$ y would have inherited a fortune

Assuming that for each member of the club C_y characterizes exactly one relative of y's from Texas, this should be equivalent to a logical form where the indefinite has scope outside the conditional but still under the universal quantifier.

- 14. One apparently quite tough problem with this kind of account is that it appears a speaker could utter our sentence without expecting the hearer to be able to determine to any extent at all what the value of C should be. Schwarschild argues that this property is one that C shares with other contextual parameters. [There is also relevant discussion in Fodor & Sag 1982.]
- 15. We can go further: the extent of C does not have to be known to the speaker either. Again, Schwarzschild would say that this is not a defect of the account but just a feature of some contextual parameters.
- 16. Arguments for existential force (see Ludlow & Neale, recast by J. Stanley in his commentary on my 1999 conference paper):

The general suspicion problem

"Suppose that Jane suspects that there is a relative of hers who is such that if that relative dies then Jane will inherit a house. However, Jane has no idea who this relative would be. On this basis, Jane utters:

If a relative of mine dies, then I will inherit a house. But I don't know who it is." The lucky guess problem

"Suppose Jane, in a bout of irrationality, asserts:

If a relative of mine dies, then I will inherit a house.

She has absolutely no one in particular in mind. Furthermore, she would deny, of many of her relatives, that if they die, then she would inherit a house."

- 17. Schwarzschild's argument against existential wide-scope:Nobody believes that I have seen a certain Buñuel movie. [Cresti 1995:130 (96)]
- 18. Chierchia (2000) has shown that approaches to pseudo-scope indefinites that do not employ existential closure fail when such indefinites occur in downward entailing environments. Consider:

Contrary to what was thought, not every member of the club would have inherited a fortune if a (particular) friend of his from Texas had died in the fire.

This can quite easily be read in a way paraphraseable by "not every member of the club is such that there is a friend of his from Texas such that if that friend had died in the fire, the member would have inherited a fortune".

- 19. We might want to introduce existential closure over contextual domain restrictions to solve Chierchia's problem within Schwarzschild's approach.
- 20. Note immediately that this cannot be allowed for domain restrictions on ordinary quantifiers:

Everyone is having a good time.

- \neq There is a domain C such that everyone in C is having a good time.
- = Everyone in the contextually salient domain C is having a good time.
- 21. Perhaps then, existential closure is for some reason only available with existential quantifiers (see Matthewson for some ideas about why this may be so).
- 22. But Schwarzschild's story depended on it just so happening that C picked out a singleton. If we now bind off C existentially but still want to maintain parts of the singleton story, we need to build in singleton-ness into the logical form.

 $\exists C: singleton(C) \& if \exists x (C(x) \& x friend of mine from Texas \& x had died in the fire), I would have inherited a fortune$

23. Attempt #1: C itself is a singleton.

- 24. Attempt #2: Call C a singleton restriction iff for every predicate P, C&P is true of exactly one individual.
- 25. Attempt #3: Call C a singleton restriction for another predicate P iff C&P is true of exactly one individual.
- 26. Attempt #4: Let's go a different way (suggested in von Fintel 1999, which Schwarzschild 2000 took off from). Do contextual domain restriction via subset selection function.
- 27. Call C a singleton subset selection function iff for any predicate P (that C is defined for if C is a partial function) C(P) is true of exactly one individual.
- 28. "Not every member of the club is such that there is a singleton subset selection function C such that if there is something in C(friend of that member from Texas) and that the thing had died in the fire, the member would have inherited a fortune."
- 29. Subset selection function can be used in general for domain restriction, so we replicate one advantage of Schwarzschild's account: a unification of domain restriction and pseudo-scope for indefinites.
- 30. We also replicate the fact that pseudo-scope indefinites still can be existential quantifiers in some sense (*there*-insertion).
- 31. But we add the possibility of explicit existential claims about singleton subset selection functions.