

Cross-Polar Nomalies

Kennedy (2001) provides an elegant account of what he calls *cross-polar anomalies* as in (1).

- (1) a. ?*John is shorter than Mary is tall.
b. *Mary is taller than John is short.

In this paper I draw attention to a systematic class of well-formed cross-polar comparisons — ‘cross-polar nomalies’. I present an interval based comparative semantics that allows for this circumscribed set of exemptions, while maintaining Kennedy’s general insight. My proposal crucially departs from the semantics for *less-comparatives* given in Heim (2006).

Cross-polar comparison — the pairing of antonymous adjectives within a comparative’s main clause and the *than* clause as in (1) — usually leads to ungrammaticality, despite the fact that antonymous adjectives like *short/tall* map objects onto the same scale of length degrees.

However, examples like (2) are perfectly well-formed and interpretable (see Faller (1998) for similar examples):

- (2) a. Unfortunately, the ladder was shorter than the house was high.
b. My yacht is shorter than yours is wide.

According to Kennedy (2001), the reason for the ungrammaticality of (1) is that positive adjectives like *wide/long/tall/high* relate objects to *positive degrees*, i.e. intervals bound by the lower end of the scale, while negative adjectives like *short* relate them to *negative degrees*, i.e. intervals that are unbounded towards the upper end of the scale, making comparison of such degrees impossible. Obviously, this excludes the comparatives in (2) as well.

The good cross-polar comparisons like (2) are characterized by two properties: First, the adjectives are not direct antonyms, but rather positive and negative adjectives that measure different dimensions (length v. height/width) onto the same scale (length). Second, the negative adjective occurs in the main clause and the positive one in the *than*-clause, not the other way around. If either of these characteristics is changed, the sentences get considerably worse:

- (3) a. ?*Unfortunately, the hose is shorter than the ladder is long.
b. ?*Unfortunately, the house is higher than the ladder is short.

The first property, the unacceptability of (1) and (3a), can be attributed to a general preference for using identical adjectives in comparison, where possible (i.e. whenever we do not compare different dimensions), cf. Faller (1998); Bierwisch (1989). In the good cases (2), there is no way to use the same adjective in

both clauses, so they are not affected by this general preference.

Yet, the second property, in particular the ungrammaticality of (3b) vis-à-vis (2), clearly shows that this preference is not the only factor determining the well-formedness of cross-polar comparisons.

I propose that the comparative of the negative adjective *shorter* can be interpreted as the *less*-comparative of the positive antonym; (2) can thus be interpreted like (4), whereas (3a) and (3b) have no similar rescue (*higher* has no interpretation as *less short*):

- (4) a. The ladder was less long than the house is high.
- b. My yacht is less long than yours is wide.

This proposal is reminiscent of Heim (2006), where negative adjectives are decomposable into a positive adjective plus a degree negation (Heim's *little*). However, according to that paper, *less* comparatives are generally *more* comparatives of negative degrees. For example (5a) has the logical form in (5b), where the comparative clause itself contains a deleted version of *little*, i.e. measures negative degrees, see the logical form in (5c):

- (5) a. The hose is less long than the ladder.
- b. the hose is more little long than the ladder ~~is little long~~
- c. the degree of shortness ('little-longness') of the hose is more than the degree of shortness of the ladder

This analysis, however, is implausible for comparative subdeletion cases like (2), where the positive measuring adjective in the *than*-clause (*high/wide*) is phonologically realized. I assume instead that *less* comparatives compare positive degrees. The sentences in (2) thus have the logical forms in (6).

- (6) a. (unfortunately) the degree of *length* that the ladder has is *less* than the degree of height the house has
- b. the degree of *length* of my yacht is *less* than the degree of width your yacht has

I implement this in a semantics for comparatives that, like Kennedy (2001) and Heim (2006) has positive and negative degrees (i.e. intervals on the degree scale that include either 0 or ∞), but, contrary to Heim (2006) has *less*-comparatives denote the inverse of a *more* comparative, rather than the *more* comparative of the antonymous adjective.