The Syntax and Semantics of Excessivity: Evidence from Germanic

1. Overview

In this talk, we address two main questions regarding the marking of 'excessivity' with an OVER-element in Germanic languages:

- How can the relevant structures (cf. (1)–(3) below) be analyzed in syntactic and semantic terms, and
- how do the two 'strategies' found in Germanic languages (prefixal vs. prepositional OVER) relate to one another?

2. Key data

Many Germanic languages use elements such as Engl. *over*, Germ. *über* or Icelandic *yfir* to express that a given activity is carried out excessively, as in (1) and (2) (from English and German).

(1) *He over-ate.*
(2) *Er über-aß sich.*
he over-ate ANPH

While in the examples given above the OVER-element is prefixed to the verb, in the Icelandic example in (3) it has the status of a preposition (cf. Putnam forthcoming).

(3) *Hans borðaði yfir sig* (*af hákarli*).
Hans ate over ANPH P shark
'Hans ate too much shark.'

We will focus on those cases where the predicates in question take either an anaphor as their argument (as in the German and Icelandic examples), or no (overt) argument at all (as in English). The relevant basic predicates are mostly activities (e.g. *work, eat*), whereas the OVER-predicates are accomplishments (*overwork, overeat*; cf. Risch's 1995 *Skalierungstyp III*).

3. Proposal

Our analysis unifies the two types of structures by regarding OVER as denoting a three-place relation between a predicate, an individual, and an event. In the Icelandic-style strategy (Type 1), OVER surfaces as a preposition, and the PP that it projects functions as an adjunct within VP. In German (Type 2), OVER is incorporated into the verb, leaving the individual argument in direct object function (cf. Biskup & Putnam 2010 for a similar proposal on Germ. [$_{V}$ *ent-* ...] and [$_{PP}$ *aus* ...]).

Based on the observation originally made by Risch (1995), most of the predicates that participate in OVER-prefixation and require the overt 'sich' element are activity verbs. We regard activity verbs as denoting individual sums of atomic events, i.e. $e = e_1 \oplus e_2 \oplus e_3 + ... + \oplus e_n$ (see for instance Rothstein 2007). Consequently, for each event described by activity verbs the number of atomic events comprised by the maximal event can (theoretically) be determined. We will refer to this number as the 'extent' of an event, and we will use a function $\lambda e[Ext(e)]$ that maps an event *e* to its extent. Moreover, we assume that (certain types of) activity verbs, while not having an intrinsic endpoint, have a 'natural endpoint', i.e. a point at which they are expected to end for extra-linguistic (e.g. physical) reasons. For example, the 'natural endpoint' of an eating event is the point at which the eater is full, and the natural endpoint of a working event is determined by factors such as fatigue, time, the completion of specific tasks, etc. The span leading up to the 'natural endpoint' of an activity will be called the 'natural extent' of that activity. We define a function $\lambda P \lambda x[NatExt(P,x)]$ that returns the natural extent of an event instantiating a predicate P, relative to an individual x. For example, NatExt(eat,John) is the natural extent of an event of eating carried out by John. The function $\lambda P \lambda x[NatExt(P,x)]$ returns natural numbers, i.e. the amount of atomic events comprised by the maximal event *e*.

According to our analysis, OVER indicates that the extent of a given event exceeds the natural extent of the relevant predicate, relative to some individual (cf. Nakanishi 2004 for a similar analysis of Japanese *-sugi*). For example, *John overate* is interpreted as 'there is an event *e* which is an event of eating carried out by John, and the extent of *e* exceeds the natural extent of an event of eating carried out by John'. Note that this analysis is not restricted to reflexive cases of OVER-predicates. For

instance, *John overwashed his jeans* is interpreted as 'there is an event *e* of washing jeans carried out by John which exceeds the natural extent of a washing event relative to the jeans in question'. As we will focus on reflexive OVER-predicates, these cases will not concern us, however.

4. Analysis

We analyze OVER as a three-place relation that takes as its arguments an individual *x,* a predicate *P*, and an event variable *e*. It indicates that the extent of the event *e* exceeds the natural extent of an event instantiating *P* relative to *x*:

(4) $[[\text{OVER}]] = \lambda x \lambda P \lambda e[P(e) \wedge \text{Ext}(e) > \text{NatExt}(P,x)]$

In the 'Icelandic' case, the OVER-predicate surfaces as a preposition. It applies to the (syntactically bound) anaphor, which, for the sake of simplicity, is represented as a copy of its antecedent (sig_{Hans}) in (5) (we assume a binding mechanism along the lines of Büring 2005):

(5) $[_{\text{PP}}$ *yfir* $sig_{\text{Hans}}]$
$\lambda x \lambda P \lambda e[P(e) \wedge \text{Ext}(e) > \text{NatExt}(P,x)]$ ($[[sig_{\text{Hans}}]]$)
$\lambda P \lambda e[P(e) \wedge \text{Ext}(e) > \text{NatExt}(P, [[sig_{\text{Hans}}]])]$

The resulting PP can adjoin to the VP *borða-* as shown in (6). We follow Kratzer (1996) in assuming that the external argument is introduced in VoiceP. The event variable of the predicate gets bound in T (cf. (7)).

(6) $[_{\text{VP}}$ *borða-* $[_{\text{PP}}$ *yfir sig* $]]$
$\lambda e[\text{eat}(e) \wedge \text{Ext}(e) > \text{NatExt}(\text{eat}, [[sig_{\text{Hans}}]])]$

(7) $[_{\text{CP}} \ldots [_{\text{TP}}$ $Hans_1$ T-*borðaði* $[_{\text{PP}}$ *yfir* sig_1 $] \ldots]$
$\exists e[\text{eat}(e) \wedge \text{Agent}(\text{Hans},e) \wedge \text{Ext}(e) > \text{NatExt}(\text{eat},\text{Hans})]$
'There is an eating event *e*, Hans is the Agent of *e* and the extent of *e* exceeds the natural extent of an eating event relative to Hans.'

In German, the meaning of the OVER-element is identical, but the derivational history is different. After applying to its complement (cf. (5) above), OVER incorporates into the verb. The syntactic derivation is shown in (8) and (9).

(8) $[_{\text{VP}}$ *über-ess-* $[_{\text{PP}}$ ~~*über*~~ $sich_{\text{Hans}}]]$
$\lambda P \lambda e[P(e) \wedge \text{Ext}(e) > \text{NatExt}(P, [[sich_{\text{Hans}}]])]$ ($\lambda e[ess\text{-}(e)]$)
$\lambda e[ess\text{-}(e) \wedge \text{Ext}(e) > \text{NatExt}(ess\text{-}, [[sich_{\text{Hans}}]])]$

(9) $[_{\text{CP}}$ $Hans_1$ C-*über-aß* $[_{\text{TP}}$ T $[_{\text{PP}}$ ~~*über*~~ $sich_1] \ldots]]$
$\exists e[ess\text{-}(e) \wedge \text{Agent}(\text{Hans},e) \wedge \text{Ext}(e) > \text{NatExt}(ess\text{-},\text{Hans})]$

Having provided a basic framework for the analysis for languages employing Type 1 (e.g. Icelandic) and Type 2 (e.g. German) structures as sketched above, we will address the questions of how the absence of an anaphoric element in English can be motivated, and how the lexical restrictions in the domain of OVER-predicates can be explained.

References

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