The interaction between aspectual morphology and middle formation

The central aim of this paper is to provide a cross-linguistically coherent approach to 'middle constructions', illustrated in (1). It will be shown that understanding aspect is crucial for explaining the cross-linguistic variation attested in the syntactic characterization of the verbs in (1).

- (1) a. This book reads easily
 - b. Dit book leest makelijk this book reads easily
 - c. Ce livre se lit facilement this book REFL reads easily
 - d. Afto to vivlio diavazete efxarista this the book read-PASS-3SG with pleasure

Across languages, middles do not behave syntactically in a uniform way: as Ackema & Schoorlemmer (1994, 1995, 2002) have shown, in Dutch and English they pattern with unergatives, whereas in French (Authier & Reed 1996, Dobrovie-Sorin 2002, Zribi-Hertz 2003) and Greek (Tsimpli 1989) they behave like unaccusatives. Moreover, in the former type of language, the agent is syntactically inert, whereas in the latter it is syntactically active (and sometimes even present in the guise of a *by*-phrase). A syntactic characterization of the middle is not feasible.

I follow Condoravdi (1989) in treating the middle as a semantic, rather than a syntactic notion. I specify the middle interpretation (MI) as follows:

(2) MI = the ascription of a property to the notional object of an otherwise eventive verb, whose agent receives an arbitrary (free choice) interpretation.

and derive the syntactic properties common to middles in all languages from the shared semantic characteristics. The differences are then argued to fall out from the different means languages have at their disposal with respect to encoding of genericity in morphological aspect. More specificially, I propose that the crosslinguistic variation concerning the realization of MI is captured by the following:

- (3) A language will employ an unaccusative structure to convey MI iff imperfective aspect is morphologically encoded.
- where availability of imperfective aspect is defined as in (4):
- (4) A language has imperfective morphology iff in at least one tense it has two distinct verb forms for episodic and nonepisodic uses, i.e. iff genericity ⇒ imperfectivity.

I propose that the assignment of an arbitrary interpretation to the agent be taken to mean that at some (presyntactic) level of representation the latter is a covert form of the free-choice item *any(one)*—henceforth ANY*. Just like its overt counterpart, ANY* is a polarity item. In the case of middles, its licensor is genericity (GEN). The crosslinguistic variation is derived if we assume a direct correlation between the form GEN takes in different languages (in the sense of (4)) and the (c)overtness of the understood free-choice agent of middles:

- (5) a. Morphologically overt GEN licenses a syntactically active ANY*
 - b. Morphologically covert GEN licenses a syntactically inert ANY*

I make use of Aloni's (2002) suggestion for the modal semantics of GEN (6), which is designed to capture free choice readings of (overt) *any*. GEN universally quantifies over alternative propositions obtained by varying the assignment to existentially quantified variables. In our case, the existential quantifier is ANY*.

(6) GEN(φ) = $\forall \alpha \forall_{f(w)} w' || \varphi ||_{w'}$

The approach outlined accounts for the contrast between French/Greek vs. English/Dutch/Hebrew. A potential counterexample is Russian, which has the morphological distinction between perfective and imperfective, but whose 'middles' seem to be of the

English/Dutch type. However, in Russian generic statements can be made using perfective aspect on the verb, and conversely imperfective verb forms can be used in episodic contexts, i.e. in Russian, genericity is not encoded in imperfective aspect. So in the relevant sense, Russian fails to encode GEN in imperfective aspect, much like English and Dutch.

The discussion above has an obvious bearing on the nature of the syntax-lexical semantics interface. First, the attested cross-linguistic variation in the status of the grammatical subject of the middle (Surface-/ Deep-structure subject) poses a challenge to any rigid mapping principle such as the UTAH, and also conflicts with a view of the syntax-lexical semantics interface a la Hale & Keyser (1993). Second, the data from Dutch and English, especially, argue for the existence of a presyntactic level of representation, in which the arguments of a predicate are represented and manipulated in ways distinct from purely syntactic operations. It seems that a more flexible view of the interface is needed, according to which thematic roles are not (expected to be) realized by arguments appearing in unique structural positions. A structural definition of, for instance, the notion of 'Patient' is not feasible given the evidence reported here.

Last but not least, the very notion of 'the middle construction' needs to be revisited. Middles are parasitic on independently available constructions: unergatives in English and Dutch, unaccusatives in Greek and French. Given that there is no way of syntactically characterizing 'the middle construction' in a uniform way across languages, syntactically there *is* no middle construction. Middle is the interpretation existing structures receive.

If this approach is on the right tract, the inescapable conclusion is that the relevance of aspect is far greater than what meets the eye.

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