Templates and phrasal analyses of argument structure constructions

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Template-based phrasal approaches using glue semantics

- Asudeh, Giorgolo & Toivonen (2014): c-structure rule:

(1) \( V' \rightarrow V \ DP \ DP \)

\( \uparrow \downarrow \) (OBJ) \( \downarrow \) (OBJ) \( \downarrow \)

\( (\ \Omega_{\text{Benefactive}} \ ) \)

- \( \sigma \) structure with ARG1, ARG2, …

- mappings from ARG1, ARG2, … to GFs

- Template with glue-term:

(2) \( \text{Benefactive} = \) \( \Theta_{\text{ARG3}} \)

\( \lambda X \lambda Y \lambda P \lambda e. P(\varphi(x) \cap \text{beneficiary}(x) = x) = x \)

\( \{ \{\text{ARG2}, \text{ARG3} \} \cap \{\text{ARG1}, \text{ARG2} \} \cap \{\text{EVENT} \} \} \rightarrow \{\text{EVENT} \} \rightarrow \{\text{ARG2} \} \)

Derivational morphology and valence

- derivational morphology may interact with valence:

(5) a. losbar (NP[nom], NP[acc])

b. vergleichbar (NP[nom], NP[acc], PP[mit])

c. schlaffbar (NP[nom])

d. helfen (NP[nom], NP[dat])

- existence of leerfischbar ‘empty.fishable’ shows that information about accusative has to be present below word level

Missing generalizations

Language internally:

- If the c-structure rule in (1) contributes constraints on mappings, a generalization is missed since a similar rule is needed for the passive.

- If this problem can be solved by declaring all arguments to be optional, the rule does not contribute any information and one could go for the lexical approach.

- Attaching the Benefactive template to a V node causes problems with coordination (Does the info distribute to both conjuncts?):

(6) My sisters just [baked and gave] me a nutella cupcake with mint chocolate chip ice cream in the middle […] (Müller & Wechsler, 2014)

Cross linguistically:

- English and German benefactive constructions are rather similar:

(7) a. He baked her a cake.

b. Er buk ihr einen Kuchen.

e. Ios.baked her.DAT a cake

Lexical proposal

- Lexical approaches do not have these problems (Simpson, 1983; Bresnan & Zaenen, 1990).

- Lexical rule for adding result predicate and object (Müller, 2002; Briscoe & Copestake, 1999)

- Arguments are added to ARG-ST list.

- Mappings from ARG-ST to SPP and COMPS.

- Binary branching

This is not captured by the phrasal approach, since German syntax differs from English syntax.

- V2 (verb initial or final position)

- scrambling

- verbal complexes

- scrambling of arguments of higher heads

- adjuncts between arguments

- Role/template cannot be coupled with case assignment (dative passive, Acl).

(8) Sie bekam einen Kuchen gebacken.

- she got a cake baked

- Benefactive NP can be realized in different clause (extraction).

(9) Dieser Frau hat er behauptet, nie einen Kuchen zu backen.

- this.DAT woman has he.NOM claimed never an.ACC cake to bake

Resutlative construction can be combined with benefactive:

(10) [dass] er ihm den Teich leer fischt that he.NOM him the empty.fishing of the North.Sea

Schemata for English are a more restrictive variant of the schemata for German (no scrambling). (Müller, 2015b)

Generalizations captured both on the lexical and at the phrasal level.

- Phenomena interacting with valence should not be treated at the phrasal level.

- HPSG analysis implemented for German and English (Müller, 2007, 2015a)

- Final paper with full analysis at:

http://hpsg.fu-berlin.de/~stefan/Pub/lexical-integrity.html

References


Müller, Stefan & Stephen Mark Wechsler. 2014. Lexical approaches to argument structure. Theoretical Linguistics 4(2–3). 1–78. doi:10.1558/jtl%204.2-3.001


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