

## **Functional projections in analytic languages**

NWO Klein Programma (2008-2012)

### **General**

Languages differ with respect to which functional categories they overtly realize. Whereas some overtly realize case, others overtly realize the initiation node in the verb phrase (also known as “little *v*”). This project aims at investigating which functional categories are overtly realized in so-called “analytic” languages and to find out whether they form a natural class. To this end we will study two language groups, which are both supposedly analytic, but which are geographically and genetically wide apart from one another, Sinitic (East Asia) and Kwa (West Africa). The results will be relevant for general theorizing on (i) language types; (ii) the nature of functional categories; (iii) the distribution of functional categories; and (iv) the question whether the verbal and nominal domains are as parallel in structure as is often assumed.

### **People**

The participants in the project are Enoch Aboh and Umberto Ansaldo from the UvA, and Linda Badan, Lisa Cheng and Rint Sybesma from Leiden.

### **Functional categories**

In recent years there has been a lot of discussion concerning the nature of F-categories and their role in explaining language variation.

Concerning their nature, despite the fact, pointed out in Hoekstra (2000), that there actually is no theory of F-categories (that is, there are no clear-cut criteria on the basis of which one can decide whether something is a *bona fide* F-category; but see Fukui and Sakai 2003), it is clear that when we consider the different functions they perform, we can distinguish three different types (Hoekstra 2000; Grohmann 2003):

- type A: F-categories which are quite lexical in nature, like the “initiator”-node mentioned above, or other types of so-called light verbs; they can assign thematic roles so we may call them “thematic”;
- type B: categories which are mainly involved in the licensing of lexical material one way or another (e.g., agreement, case); we may call these “inflectional”;
- type C: categories which express discourse functions (focus, topic, clause typing, among many others); these are the “discourse F-categories”.

Hierarchically, projections of the same type apparently cluster together, with “thematic” categories being lower in the structure, and closer to the lexical core, than “inflectional” categories, which are in turn hierarchically dominated by discourse categories.

Since Borer (1984) and Ouhalla (1991), it is quite generally assumed that the functional domain is the main locus of language variation. How this variation is handled, is, however, a point of discussion. Some argue that languages differ in which F-categories from the total inventory they choose to realize, but others assume that all languages have all F-categories, but the categories may differ in how they affect the other elements in the sentence (for instance, they may or may not enforce movement).

## **Language typology**

On one of the indexes along which languages are classified, the Index of Synthesis (see Comrie 1989; going back to Schlegel 1818), a language such as German would count as “synthetic” (meaning “having a lot of flectional morphology”) and languages such as Gungbe and Mandarin as “analytic” (“lacking such morphology”). However, it is entirely unclear whether the difference between analytic and synthetic languages is only a surface phenomenon or whether they differ fundamentally. In fact, it is unclear what the ontological status of these “language types” is. What are the fundamental properties of, say, an “analytic language”? Are the main properties characterizable in terms of F-categories?

In the following, the terms “analytic” and “synthetic” are used impressionistically; one of the goals of the project is to see whether these terms have any content at all.

## **The project: the research questions**

The point of departure of this project is the observation, that Mandarin, generally assumed to be an analytic language, spells out almost completely different F-categories than does an allegedly synthetic language such as German. Our base hypothesis for this project is that language type is determined by the choice of F-categories a language realizes.

Concretely, the Research Questions this leads to are:

- I. What is the nature of the F-categories realized in analytic languages? Do these categories form a natural class? If so, by what criteria? These questions will be researched against the background of the relatively rich knowledge we have on F-categories in synthetic languages, which are much better studied (esp. Germanic and Romance; cf. Cinque 2002, Rizzi 2004, Belletti 2004).
- II. Will we find a neat divide between F-categories realized in analytic languages and those realized in synthetic languages? That is, do “analytic” and “synthetic” really mean something?
- III. What will the consequences of our findings be concerning the role F-categories play in language variation? Is the F-domain indeed the locus of language variation? If so, how exactly is this role implemented?

## **Approach**

To answer these questions, this project intends to engage in a comparative study of languages that are generally assumed to be analytic. To minimize the chance that our findings are accidental, which could be the case if we study only one language or language group, we will study languages from two groups: Sinitic (East-Asia) and Kwa (West-Africa). These language groups are chosen because:

- (a) they are not linked genetically, historically or areally;
- (b) even though they show strong similarities in certain domains of their grammars (particularly, the verb phrase and the clause), other domains (e.g., the noun phrase) show quite striking differences;

(c) languages from both groups have been studied quite extensively (though not the F-categories per se).

The fact that the Sinitic and Kwa languages are very similar in the verbal-clausal domain, and quite different in the nominal domain (point (b)), gives us an excellent chance to look at the Research Questions from different perspectives using the same languages. In the verbal-clausal domains, we study in detail how certain F-categories are realized: the F-projections here seem more or less the same, so we can study the bandwidth of variation in how they are spelled out. In the nominal domain, on the other hand, where the languages are less similar, we investigate the question whether the so-called analytic languages really spell out F-categories of a certain class only (e.g., “thematic” ones).

Typological studies are often criticized for the apparent superficiality of the phenomena compared. As noted in Croft (2003), it is fundamental for any typological approach to clearly define the elements being compared. One way this can be done is by defining structures within a specific theoretical framework, so that their comparability can be readily assessed (Newmeyer 1998). By combining cross-linguistic investigation within one theoretical framework, we believe that both empirical accuracy and theoretical significance can be achieved.

Speculating on possible outcomes, we may find that

- (a) the similarities between the two language groups are only superficial, i.e. they do not relate to deep properties of grammar. If that is the case, the notion “language type” is an epiphenomenon.
- (b) there are deep similarities in one subdomain of grammar but not in the other. This too may have consequences for broad typological claims.
- (c) there are deep similarities across the board, i.e. the “type” is justified by common deep properties of grammar.

Whichever the result of the investigation, the theoretical impact is significant: outcome (a) and (b) imply that broad typological classifications need to be revisited; outcome (c) opens up the possibility of new discoveries of universal properties of grammar

### **Organization of the research**

The research will essentially be executed in two subprojects, one investigating the verbal-clausal domains, the other focusing on the nominal domain. Both subprojects essentially concentrate on Research Question I above (nature of F-categories in analytic languages), but take the other two (esp. III) (variation) in consideration as well. With respect to variation, the investigations in the two subprojects take different thrusts. While the work in the verbal-clausal domains, in which the differences seem to be of a more restricted nature, will consist of investigating small scale variation (how certain F-categories are spelled out), the work in the nominal domain, in which the differences seem bigger, will come down to investigating whether it is really the case that only certain F-categories are spelled out in analytic languages. Naturally, we compare between the Kwa and Sinitic language groups, but also within the groups.