

Trudgill, Peter. 1986. *Dialects in contact*. Oxford: Blackwell.

Linguistic theory and grammatical description. Current Issues in Linguistic Theory 75. Edited by Flip G. Droste and John E. Joseph. Amsterdam: Benjamins, 1991. 353 pp. US\$110.00

Reviewed by John R. Roberts
Summer Institute of Linguistics, Papua
New Guinea Branch

The editors of this book, Droste and Joseph (D&J), have assembled an excellent collection of essays on nine current linguistic theories. After an introduction in which D&J present their motivations and purposes for this volume and why these theories in particular should be included there is a chapter devoted to each theory. The nine theories presented are: Government and Binding Theory (GB), Relational Grammar (RG), Lexical Functional Grammar (LFG), Generalized Categorical Grammar: the Lambek Calculus (GCG), Logical Semantics (LS), Generalized Phrase Structure Grammar (GPSG), Functional Grammar (FG), Cognitive Grammar (CG), and Word Grammar (WG). The last three are presented by the originators of these particular theories: Simon Dik, Ronald Langacker and Richard Hudson respectively.

D&J maintain that Chomsky's transformational generative grammar (TGG) virtually defined the mainstream of linguistics in America and Europe from about 1964 to 1975. During this time its major challenger was one of its own off-shoots, known as

'generative semantics'. With the demise of generative semantics in the 1970s a whole range of competing linguistic theories arose to either take off from TGG in some other direction or to challenge TGG directly. D&J have therefore chosen these nine theories because they have been developed and have survived from the mid-1970s or later and also because they all have three characteristics which are common to the 'generative enterprise' of defining what human language is: (a) they are **universalistic** in approach, their goal being to define the phenomenon 'language' rather than to specify the make-up of one or more particular languages; (b) they are **mentalistic**, in that they aim at a description of deep-rooted regularities underlying linguistic activity in general; and (c) they incline towards the **algorithmic**, i.e. they seek a system of rules—or at least tendencies—explaining the operation of language in a finite series of well-described steps. In their coverage of the current linguistic scene D&J therefore leave out any theoretical approach that is not concordant with the general aims of generative grammar. So contemporary approaches to linguistic theory such as Systemic-Functional Grammar (Halliday) or Typological-Functional Grammar (Greenberg, Comrie, Givan, Bybee, etc.) are not included. Nevertheless, the book presents fairly concisely all the main formal approaches that are current in linguistic theory.

In the introduction D&J give an overview of what these different (formal) linguistic theories cover. For example, some have a syntactic base (e.g. GB, RG and LFG), some have a semantic base (e.g. GCG, LS and GPSG) and some have a pragmatic-cognitive base (e.g. FG, CG and WG). On p.19 D&J give a helpful chart

comparing the characteristic features of the different theories. This helps the reader to get a feel of where each theory is coming from and what the proponents are trying to achieve.

The nine theories described can be grouped into three groups of three. The first three, GB, RG and LFG, are the most directly descended from TGG of the 1970s. De Geest and Jaspers (DG&J) discuss GB, which springs from Chomsky (1981), and is the direct descendant of TGG. This is an introductory work and DG&J only cover the basics of GB theory. They acknowledge that GB is much changed from earlier versions of TGG in that it is no longer transformational or generative but rather a set of 'static' principles which evaluate representations. For example, the Phrase Structure (PS) component is virtually eliminated by the Projection Principle and X-bar theory. However, DG&J maintain that the basic principles of GB are still the same as under TGG, i.e. to construct a Universal Grammar. They also point out that as research continues so the model will continue to change. For anyone wanting to study this theory in more depth, a fuller introductory work, such as Haegeman (1991), would be recommended.

Whereas in GB grammatical functions (GFs), such as subject and object, are derived from the constituent structure, in RG they are taken as grammatical primitives. Aissen discusses RG and runs through the basics of this theory, which has its origins in lectures by Perlmutter and Postal beginning in 1974. RG is strong in GF changing devices such as passive, antipassive and other types of voice. However, it is weak in that no phonological, morphological, or semantic analyses have been articulated within RG. Aissen gives a good introduction to RG in this chapter. A good introductory textbook on RG not mentioned by Aissen is Blake (1990).

LFG, which originated with Bresnan (1982), is presented by Wescot and Zaenen. In RG constituent structure is abandoned in favour of GFs. However, RG still has underlying structures involving transformations, i.e. GF changing rules. LFG also takes GFs as basic, however, LFG does not have GF changing rules. Rather all sentence structures are lexically conditioned and sentences are constructed on the basis of the dependency relationships expressed in the lexicon. So the relation between active and passive verbs in English, for example, is captured by lexical redundancy rules.

The three linguistic models of GCG, LS and GPSG are all based on the work of the logician Richard Montague, commonly called Montague Grammar. All three models dispense with the PS-rules required in TGG and attempt to match the syntax on a one-to-one basis with the seman-

tics. GCG is explained by Moortgat. GCG projects the information usually encoded in PS trees onto the internal structure of categories assigned to lexical items, thus eliminating the need for an explicit PS component. The category system provides an infinite supply of possible category objects, recursively construed out of two small finite sets, a set of basic categories (atoms)—also called syntactic types—and a set of category-forming connectives. Moortgat discusses the basics of GCG and also demonstrates how a recent innovation, known as the Lambek-Gentzen calculus, has enabled the categorial connectives to be developed into a full logic and has therefore removed some of the shortcomings of previous versions of GCG.

LS, which springs out of the work of Dowty, Wall and Peters (1981), is described by Van Eynde. This chapter has three parts: the first presents the principles and basic assumptions of LS; the second shows how those principles can be used for the analysis of natural language (i.e. Montague Grammar); and the third gives a survey of recent developments in the field. Perhaps the most interesting area of development in LS is in discourse representation and situation semantics, an area into which none of the other theories discussed in this volume have so far ventured.

GPSG is described by Steurs. GPSG was developed by Gerald Gazdar and is more fully articulated in Gazdar et al (1985). GPSG again eliminates the PS component of TGG and the syntactic structure of a sentence is a single phrase marker. It also eliminates the need for a transformational component. The information encoded in PS trees is assigned to categories by sets of feature specifications which rules can access. Syntactic generalisations are viewed as generalisations about the set of rules which make up the grammar. These are called metarules. Under the metarule schema, for example, active sentences can be mapped onto passive sentences. GPSG is also able to handle certain syntactic constructions which TGG was not able to handle adequately, such as coordinate structures and unbounded dependencies.

Whereas the first three theories discussed are syntactically based and the second three are semantically based, the last three have a pragmatic or cognitive base. They also have the distinction of being word-oriented. FG began with Dik (1978) and is described by Dik himself. Even though FG has linguistic expressions for semantic, syntactic and pragmatic functional relations, Dik explains that the ethos behind FG is that the study of language use (pragmatics) precedes the study of the formal and semantic properties of linguistic expressions. FG is word-oriented in that linguistic expressions are

built up from predicates and terms which are stored in the lexicon. Underlying predications are mapped onto linguistic expressions through a system of expression rules, which determine the form (i.e. constituent structure) and the order of the constituents. Thus, whereas under TGG and GB constituent structure is basic and all GFs are derived from structure, under FG semantic, syntactic and pragmatic functions are basic and the constituent structure is derived from these GFs. However, FG has the same shortcoming as RG in that there is no formal phonological component to the theory.

CG began with Langacker (1982) and has been developed in subsequent works. Langacker describes the basic notions of CG. He maintains that a number of fundamental assumptions in current linguistic theory are erroneous and yet are apparently accepted without question. These are: that language is a self-contained system amenable to algorithmic characterisation, with sufficient autonomy to be studied in essential isolation from broader cognitive concerns; that grammar (syntax in particular) is an independent aspect of linguistic structure distinct from both lexicon and semantics; and that meaning is properly described by some type of formal logic based on truth conditions. In CG grammatical structures are viewed as inherently symbolic and provide for the structuring and conventional symbolisation of conceptual content. Lexicon, morphology and syntax form a continuum of symbolic units divided only arbitrarily into separate components of grammar.

Finally, Hudson and van Langendoek discuss the basics of WG, which began with Hudson (1984). WG is unique amongst the theories presented in this volume in that it deals with the whole of syntax without referring to anything but words—hence the title ‘Word Grammar’. It is also unique in that it is the only theory to offer an alternative to constituent structure which is not based on GFs. In WG dependency relations between words are considered basic and constituents grouped around words are derivative, whereas a grammar based on PS structure assumes that the relation between constituent structure and dependency is the other way around. One advantage of this approach is that, whereas under a constituent structure grammar like GB discontinuous constituents cannot be tolerated, they are readily handled under a dependency-based theory like WG. Like RG and LFG, under WG GFs are also considered to be basic and not derived. Another advantage that WG has over other alternatives to TGG and GB is that dependency relations apply equally well to phonology, as discussed in Lass (1984).

References

- Blake, B. 1990. *Relational grammar*. London: Routledge.
- Bresnan, J., ed. 1982. *The mental representation of grammatical relations*. Cambridge, Mass.: MIT.
- Chomsky, N. 1981. *Lectures on government and binding*. Dordrecht: Foris.
- Dik, S.C. 1978. *Functional grammar*. Amsterdam: North-Holland.
- Dowty, D., R. Wall and S. Peters. 1981. *Introduction to Montague semantics*. Dordrecht: Reidel.
- Gazdar, G., E. Klein, G.K. Pullum and I. Sag. 1985. *Generalised phrase structure grammar*. Cambridge, Mass.: Harvard University Press.
- Haegeman, L. 1991. *Introduction to government and binding theory*. Oxford: Blackwell.
- Hudson, R.A. 1984. *Word grammar*. Oxford: Blackwell.
- Langacker, R.W. 1982. Space grammar, analysability, and the English passive. *Language* 58.22-80.
- Lass, R. 1984. *Phonology: an introduction to basic concepts*. Cambridge: Cambridge University Press.