REVIEWS

STEVEN GILLIS & ANNICK DE HOUWER (eds). The acquisition of Dutch. Amsterdam: Benjamins, Pp. xvi+437, 1998.

Steven Gillis and Annick de Houwer bring together Dutch and Belgian researchers to report the state of the art of research on the acquisition of Dutch. In the introduction, they give a historical overview on acquisition research in the Netherlands and in Flanders: Dutch is well studied in proportion to the size of the speech community (20 million). As is the case for many other languages, research on the acquisition of Dutch goes back to the beginning of this century, but it really accelerated with the renewed interest in children's cognitive and linguistic development some two decades ago. Currently, more than 180000 children's utterances from 79 children are accessible through the CHILDES database (MacWhinney 1995), and numerous other corpora exist but are not (yet) publicly available. This makes Dutch child language probably second only to English in being well documented. And the surveys presented in this volume show that there is an active research community that makes good use of these data.

These research activities are documented in a comprehensive overview of previous findings on the acquisition of Dutch in the introduction, as well as in four thematic chapters on the acquisition of individual linguistic domains (speech development, phonological development, syntactic development and lexical development). In these chapters, the respective authors present summaries of the topic areas, but with a strong focus on their individual research interests and theoretical orientations. All authors present sound empirical research and try to give a developmental account of the course of acquisition. The introduction and thematic chapters supplement each other, such that the reader who is interested in a particular linguistic domain will have to consult both sources to get a complete overview of the results obtained so far. What sets this volume apart from other summaries on the acquisition of individual languages (e.g. the articles in Slobin's collected volumes, Slobin 1985-97) is that the focus is not entirely on the usual suspects syntax, morphology, and semantics. Instead, two of the four thematic chapters deal with speech production and the acquisition of phonology, respectively.

First, Florien Koopmans-van Beinum & Jeanette van der Stelt discuss early speech development of normally developing children as well as of children with hearing or articulatory deficits. They present a number of methods that they and their collaborators have designed in order to gain more precise characterizations and measures for articulatory development than descriptive terms like 'cooing' can provide (p. 127). The authors introduce

their own sensorimotor approach to early communicative behaviour. This includes intersubjective tuning between infants and adults as well as the physiological development of the auditory system and speech production mechanisms. With respect to speech production these authors assume cyclic, non-modular development in which the infants' own speech production influences their own perception and vice versa (input-output model). Koopmans-van Beinum & van der Stelt analyse early sound development in terms of a source-filter model, the source being the larynx, the filter being the vocal tract. They develop a feature matrix to categorize infant sound production in terms of its phonatory (e.g. duration, intonation, voice onset and quality) and articulatory (e.g. place and manner) characteristics. The application of this matrix to the acquisition data of normally developing children yields a six-stage model, which captures the development from universal first phonations without articulatory movements to languagespecific sound and word productions. This six-stage model is applied to normalization, diagnostics, mother-infant interaction, and crosslinguistic research.

However, the rationale behind these applications is sometimes hard to follow when the authors focus on the genesis of the research projects rather than on the explication of the context of their research questions. For example, in the section on NORMALIZATION (pp. 129ff.) this term is never explained. From the content of the section it seems that the authors define children's reaching of certain developmental milestones as normalization. One of these milestones is canonical babbling, and the relationship between the onset of canonical babbling and other developmental factors is investigated. However, there seems to be no significant effect of age, gender, and other motor development (like smiling or crawling) on the onset of babbling.

More differential results are obtained when the classification system is used for diagnostic purposes: cleft palate children (with and without oral plate) do not differ significantly from a normal control group, but comparisons of individuals of each group show that the onset of articulatory development is later in cleft palate children. Articulatory development is also delayed in hearing impaired children, who not only lack access to auditory input, but also to the feedback of their own articulations. These results suggest that there is a universal onset of phonation that is probably defined by anatomical development, but language-specific differences in articulatory development and articulatory features.

Paula Fikkert takes a nativist stance in her chapter on the acquisition of Dutch phonology, and argues in favour of a holistic approach that studies phonological phenomena of the whole vocabulary rather than just individual words, segments, or processes. She takes as vantage point that the acquisition of segmental and suprasegmental phonology is constrained by phonological templates that are determined by Universal Grammar. Fikkert assumes that

universal parameters can only be set based on positive evidence, whereas language-specific settings can be made on the basis of indirect negative evidence (i.e. the 'positive' evidence that certain structures do not occur in the ambient language; p. 192).

In Fikkert's view, differences between child and adult forms can be described in terms of different phonological templates that are responsible for the output constraints in the child. These templates allow us to explain how children systematically reduce or alter input target forms such that their output matches their own current phonological templates. Based on Levelt (1994), Fikkert illustrates how output constraints operate on whole words rather than segments: at a certain stage of development, children produce words that are completely labial (e.g. pop 'doll') or completely coronal (e.g. zes 'six'). In a next phase dorsal consonants, which employ a more specified feature, are acquired. Typically, new features first occur on the right end of words, leading to productions like pik instead of kip 'chicken' (p. 177f.). Results like these support Fikkert's view that development consists of changes of the child's whole phonological system, and that at each developmental stage the child's phonological template is constrained by parameter values. This is illustrated in detail for various aspects of syllable structure: onset, rhymes, and stress. That phonological patterns or templates are crucial for the acquisition of phonological segments is demonstrated by onset-coda asymmetries found in children: although children produce nasals in syllable onset early in development, nasals are a feature found late in rhymes. With respect to rhymes, Fikkert claims that Dutch children in a first stage follow the default parameter setting of no closed syllables, although they have abundant positive evidence that Dutch allows closed syllables (the marked parameter setting).

When discussing the acquisition of Dutch syntax in the next chapter, Frank Wijnen & Maaike Verrips also take the Chomskyan Principles and Parameters perspective. They address the problem of acquiring syntax in terms of the logical problem of acquisition, supposing that the language available to the child does not suffice to reach adult linguistic competence (p. 224). They intend to compare the 'logical' path of resolving the acquisition problem to the developmental path actually taken in the domains of word order, argument structure (e.g. the transitive-intransitive distinction, argument alternations, passives), argument ellipsis, and anaphora resolution. In those cases for which a crosslinguistic comparison is possible, Wijnen & Verrips discuss the implications of the Dutch findings for acquisition processes and linguistic theory in general.

One phenomenon currently under much debate is the acquisition of word order, notably a discussion of various explanations for the acquisition of verb placement. Dutch is a so-called verb second language where finite and nonfinite parts of the verb end up in different positions in main clauses: the

finite verb occurs as first or second constituent, whereas the nonfinite verb occurs in clause final position (e.g. Jan heeft gisteren kreeften gegeten 'Jan has yesterday crabs eaten' to mean Jan ate crabs yesterday). Typically, Dutch children start out with nonfinite and utterance-final verbs and acquire finite verbs and their correct placement only later. As children do not show full competence from the beginning, and as lexical learning alone cannot account for the relatively stable and gradual development from a syntactically nonfinite to a syntactically finite system, Wijnen and Verrips argue against theoretical proposals that claim that children's syntactic representations are complete and adult-like. Instead, there seems to be incremental acquisition of the semantic, morphological and distributional features connected with verb placement. The acquisition of periphrastic verbal constituents, which fill both first/second and final position, is most likely a cornerstone in this process (pp. 227ff.).

Another domain in which comparative research proves fruitful is the acquisition of anaphora and binding principles. Studies on the fine-grained syntactic processes necessary for anaphora interpretation show that the lack of a morphological case distinction between accusative and dative personal pronouns may hinder children from discovering those reference domains and binding conditions that are particular to Dutch (Philip & Coopmans, 1996).

In the final chapter, Loekie Elbers and Anita van Loon-Verwoorn discuss the acquisition of the lexicon. Like Koopmans-van Beinum and van der Stelt they assume an input-output model in which the children's own productions are the most reliable indicator of their current stage of development and of what they are likely to acquire next. Elbers & van Loon-Verwoorn are primarily concerned not with the mere growth and composition of the vocabulary found in young children, but rather with the psycholinguistic processes involved in building and structuring the mental lexicon. They distinguish a lexical network in which word form information is stored from a semantic network in which perceptual knowledge and conceptual knowledge are represented. With respect to the lexical network it seems that children need a certain amount of vocabulary before they lay connections between lexical items. The unrelatedness of early lexical items is indicated by the fact that children make fewer lexical substitution errors (malapropisms) than adults (Wijnen, 1994). After the early lexical items are decontextualized, contrastive use of words by adults seems to be an important help for children to acquire the more subtle semantic differences between words. That language itself plays a role in structuring the semantic system is revealed by crosslinguistic comparisons, as well as by comparing acquisition data of normally developing children with data from blind children and from second language learners of Dutch. In tests of their lexical organization both blind children and children who learn Dutch at school behave more like Dutch adults than do normally developing first language learners of Dutch. This suggests that decontextualized, purely verbal linguistic evidence plays an important role in reaching adult-like lexical organization and functioning.

Finally, some data on novel word formations (compounding and derivations) shed light on children's categorization processes. For example, it seems that children have little trouble in coining or comprehending novel metaphorical compounds in which the semantics of the head is extended (e.g. *haar tranen* 'hair tears' for sweat), or novel subcategorizing compounds in which the head noun is specified (e.g. *bureau lamp* 'desk lamp').

As pointed out in Catherine Snow's preface to this volume, such an extensive survey of the acquisition of a language other than English widens our understanding of what are more general facts of language acquisition, and what may or may not be considered universal. At the same time, this book is admittedly not the final word on 'The Acquisition of Dutch': It shows what we know just as well as what we do not yet know (see pp. xiv ff.). There are still some widely uncharted territories like the acquisition of Dutch morphology and pragmatics, and there are also developmental phases about which we know little. For example, there is hardly any acquisition research on Dutch children older than three and a half years of age: the survey of the available acquisition data (pp. 8off.) shows that there are no corpora of spontaneous production data by Dutch children older than four at all!

More generally, the various theoretical persuasions found in child language research on the whole are also found in the Dutch research community. Although the volume under review will without a doubt serve as a valuable and comprehensive source of reference, there is also a sense of a lack of conceptual cohesion between the individual chapters. Despite partial overlaps in the empirical issues addressed, two papers address language development from a formal nativist perspective, two stress the importance of interaction and favour a child-centered input-output model. But the book does not address how the different theoretical approaches taken in the thematic chapters might conflict with, interact with, or enrich each other. Take the case of articulatory and phonological development. Three different research perspectives and accounts of development are presented: In Chapter 1, Koopmans-van Beinum & van der Stelt describe early speech production in terms of development from universal phonations to language-specific speech motor coordination as found in first word productions. In Chapter 2, Fikkert proposes that early word productions are constrained by phonological templates that are determined by parametric options of Universal Grammar. In the introduction, Gillis & de Houwer summarize yet other research that focuses on phonological processes like cluster reduction in order to account for the differences between children's early words and the adult targets (pp. 10ff). For readers who are not minutely aware of the details of the theoretical debate in this domain it is hard if not impossible to put these findings and their interpretations into perspective: What is the relationship between

speech motor development and the acquisition of the more abstract features of phonology? Are these abstract features completely unconstrained by articulatory and attentional development? Or does motor development influence what children pay attention to as supposed in the input–output model? Admittedly, researchers of all language communities – not only the Dutch – face these questions. And of course neither editors nor authors could have resolved the open debates of acquisition theory in overview chapters such as the present ones. But it would have been helpful if the open issues and debates in the interpretation of the acquisition data had been (briefly) addressed in a final summary or outlook in order to provide the reader with some help in evaluating the claims made in the various chapters.

Nevertheless, the in-depth summaries presented in the individual chapters and the introduction, the overview of existing corpora, the joint bibliography for all papers, and the subject index (unfortunately, there is no person index) make this volume a valuable source of reference for all acquisition researchers.

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Hoff-Ginsberg, E. Language development. New York: Brooks/Cole, 1997. Holzman, M. The language of children (2nd edition). Oxford: Blackwell, 1997.

McLaughlin, S. *Introduction to language development*. London: Singular Publishing Group, 1998.

RITCHIE, W. & BHATIA, T. J. (eds.) Handbook of child language acquisition. New York: Academic Press, 1999.

We were asked to review these four books as potential texts for courses in child language. As anyone reading this review is likely to know, language development is a very diverse subject, and it is the rare book indeed that provides adequate coverage to the empirical knowledge base of each of the topics that comprise this field, let alone the myriad array of theoretical stances and disputes that have ebbed and flowed during the past forty years. The four books will be evaluated in terms of how well they meet the challenge of providing a well-informed and current perspective on the field of language development for either an undergraduate class or a graduate class. As we shall see, each of these books holds different appeals for different audiences.

Holzman's The language of children is intended for any audience that has an interest in language development. As a result, Holzman has produced a very readable book. However, we suspect the organization and content of the book will not fit the needs of most advanced undergraduate courses in language development. In a way, this is unfortunate given Holzman's attempt to consider human language development within the context of the communicative systems and competencies of other species. This comparative framework is a relatively unique perspective, and is in fact one of the most admirable characteristics of Holzman's book. This perspective is evident throughout the book, but is most striking in the first part of the book where Holzman focuses on non-human animal communication, attempts to teach non-human animals artificial communication systems, and theoretical issues concerning the evolution of language. The remainder of the book guides the reader in a somewhat predictable fashion through the maze of developmental accomplishments that characterize language acquisition. This journey begins with the prelinguistic infant's abilities to distinguish and manipulate sounds, take turns in social interactions, and use gestures to signal desires. The next stop is the one-word period in which infants begin to use words to communicate their desires. In the next two chapters, Holzman addresses issues such as speech registers, theory of mind, categorization, and grammatical concepts involving metaphors and time. Holzman concludes with chapters on reading, bilingualism and sociolinguistics. Holzman often presents these developmental accomplishments within the context of a longitudinal study she conducted with four children. Holzman discusses aspects of language development within both nativist (e.g. Pinker's modular theory) and cognitive/constructionist (e.g. Bates' 'language is a general cognitive ability') theories of language development. We found both the collection of topics and their treatment to be a bit eclectic but believe that this book could be used successfully in a lower level undergraduate class, particularly if a comparative perspective is desired.

Hoff-Ginsberg's *Language development* is well suited as a general undergraduate text. It is well written and well organized. The first chapter is devoted to the history and development of the field of language acquisition. In this chapter, Hoff-Ginsberg describes basic questions in the field (e.g. nature vs. nurture; language specificity vs. general cognition; formalism vs. functionalism), the methods used to investigate those questions (e.g. longi-

tudinal vs. cross-sectional designs), and the available informational sources (e.g. CHILDES; journals; PsycLit). The next four chapters address phonological development, lexical development, syntactic and morphological development, and communicative development. Within each of these chapters, Hoff-Ginsberg describes development as it progresses chronologically during the first five years of life. Chapter 6 addresses the development of language after the first five years of life. This chapter considers each of the above topics as well as issues of literacy and language changes into adulthood. The next two chapters focus on issues of language development in a variety of special populations (e.g. children who are deaf, blind, or autistic) and bilingualism. The last chapter considers the biological bases of language development, including a consideration of the comparative work on communicative capacities of other species. This latter chapter could have been moved to an earlier part of the book, which would have allowed a more thorough biological and comparative theme to be developed. Throughout the book in general, though, Hoff-Ginsberg introduces and explains important concepts in language development, and also describes different research methods that have been used to gather data and evaluate hypotheses. She does a commendable job in considering theoretical perspectives in an evenhanded fashion. This book is much more detailed than Holzman's book, in terms of both empirical research and theoretical issues. As such, it is much better suited for advanced undergraduate courses. The list of key terms and review questions at the end of each chapter should prove useful to students, as should the detailed glossary at the end of the book. All in all, this is a book worthy of consideration for use in advanced undergraduate courses.

Although McLaughlin's Introduction to language development considers many of the same topics that appear in the two texts discussed above, McLaughlin's text differs from these two texts in terms of how the information is organized. His first chapter focuses on introducing and defining basic concepts and terminology that are associated with the field of language development. The next chapter yields a well-written summary of the biological bases of human language, including considerations of neurology, neurological development, and prenatal sensory development. Although some of this discussion might seem better suited for an introductory developmental psychology class, it is refreshing to see an undergraduate language development text in which the interactive nature of neurological development and experience are emphasized early in the text. Chapter 3 describes the social, cognitive, and behavioural principles that influence the development of language, and sets the stage for the next chapter's consideration of theories of language development. These first four chapters provide a solid foundation for the ensuing discussion of children's acquisition of language. Rather than devote separate chapters to individual topics such as phonological development, semantic development, syntactic development, and pragmatic development, McLaughlin opts to describe language development in a chronological fashion. Thus, we find a chapter on language development during infancy, another on language development in toddlers, two chapters on language development in preschool-age children, and finally, a chapter on language development during the school-age years. These chapters are followed by a return to a topical approach in a chapter that discusses language diversity in terms of bilingualism, dialects, and language disorders. We found the chronological approach interesting, and particularly liked how the chronological presentation helped to emphasize the fact that children are faced with the task of acquiring the various aspects of language during the same time period. Children do not acquire syntax and then learn the semantic system of their language. Nor do they acquire the semantic system before the syntactic system. When language development is taught topically, students may fail to apprehend the complexity of the task facing young children because of the focus on individual topics, a potential shortcoming that McLaughlin's 'whole child' approach alleviates. On the other hand, maintaining the theoretical and empirical threads for a variety of topics presented in a chronological fashion is not always easy, and this might result in students failing to understand the 'big picture' insofar as a particular topic is concerned. For example, discussing the manner in which children first learn to put words together within the context of early semantic development, phonological development, and pragmatic development may make it more difficult for the student to relate these early word combinations to later syntactic development. The preference for a topical or chronological approach is a matter of individual choice, and McLaughlin's book is a good choice for those opting for a chronological approach. Like Hoff-Ginsberg, McLaughlin considers a number of different theoretical approaches in an evenhanded fashion.

The Handbook of child language acquisition is a collection of chapters written by experts in their respective fields and will benefit a more knowledgeable audience. Ritchie & Bhatia have organized the chapters in this edited volume into six general topic areas: (1) innateness, maturation, and modularity, (2) semantics and syntax, (3) phonology and pragmatics, (4) research methodology and applications, (5) modality and linguistic environment, and (6) language disorders and impairments. Each chapter is a thorough treatment of a particular topic, and as a whole, the book is an excellent collection of readings on selected aspects of human language development, particularly nativist points of view. The first topic includes Chomsky's essay on the acquisition of language, Wexler's chapter on language maturation, Lust's chapter on the strong continuity hypothesis, O'Grady's chapter concerning the acquisition of syntactic representations, Bickerton's chapter on creole languages and the language bioprogram hypthesis, and Rispoli's chapter on functionalist accounts of language

acquisition. The second section on semantics and syntax includes chapters on word learning (Bloom) and the role of syntax in verb learning (Gleitman and Gillette). Phonology is discussed in Drescher's chapter, while the development of pragmatics is summarized by Ninio & Snow. The section on research methodology and applications includes a chapter that describes a modular approach to the study of language acquisition (Crain & Wexler), a chapter that addresses the issue of determining language competencies in children (Lust, Flynn, Foley & Chien), and a chapter on the CHILDES system (MacWhinney). The fifth section contains chapters on input and language acquisition (Valian), modality effects and modularity in the acquisition of American Sign Language (Lillo-Martin), and bilingualism (Bhatia & Ritchie). The final section on language disorders and impairments consists of chapters on disordered child phonology (Dinnsen) and specific language impairment (Clahsen). Although this book represents nativist positions quite well, there is no consideration of comparative issues involving non-human species (e.g. how animals communicate with each other; attempts to teach non-human animals artificial communication systems). There is also relatively little concern with biological bases or the developing child's cognitive and social capabilities. However, if one is teaching a graduate course on language acquisition, and a collection of first-rate summaries of primarily nativist positions is desired, then this is certainly a book to consider. Other aspects of this book also make it potentially useful for graduate students. Ninio & Snow's chapter on pragmatic development is an excellent summary of this topic. MacWhinney's description of the CHILDES system would benefit many students, although we hope that the continued growth and availability of CHILDES does not result in fewer and fewer students collecting original language development data. The last thing that the field needs is a relatively small set of data that are analysed over and over again, and then used to make claims about universal developmental patterns.

To sum up, each of the books we have reviewed has both strengths and weaknesses. In terms of what the books offer as texts for classes on language development, the extent to which a particular book's strengths outweigh its weaknesses depends on the intended audience and the instructor's theoretical bent.

Reviewed by Stan A. Kuczaj II & Heather M. Hill Department of Psychology, University of Southern Mississippi, Hattiesburg, MS 39406-5025, USA MARILYN A. NIPPOLD, Later language development: the school-age and adolescent years (2 ed.). Austin, TX: PRO-ED, 1998. Pp. xi+237.

Language development during the first four or five years of life is exciting and remarkable. Children commonly advance from using pregrammatical speech expressed one-word-at-a-time between approximately 1;0 and 1;6 to producing sentences, many of which are fully grammatically correct, by roughly 3;6 to 5;0. Such spoken sentences, besides revealing substantial tacit knowledge of grammar, also usually indicate considerable mastery of phonology because the phonemes making up the words in the sentences produced are often pronounced and sequenced correctly at a rate of several per second. Early lexical development is also impressive. Most four- and fiveyear-olds in industrialized societies can produce hundreds of words in intelligible and meaningful ways in conversation, and they have some comprehension of many more. Moreover, pragmatic and communicative development is considerable during the preschool years. For example, by four or five years of age, children can often use several types of speech acts to communicate a variety of different kinds of intentions, can maintain a topic of conversation for longer than when they were younger, and can construct simple but comprehensible narratives of previous experiences.

There is no question that linguistic development during early childhood is impressive and important. However, there are questions about how this period should be construed in terms of the total process of language acquisition. One view is that language development occurs primarily during early childhood and is largely complete by the end of the preschool years. In an important early presentation of this position David McNeill (1966: 15) stated that the fundamental problem to be addressed in developmental psycholinguistics 'is the simple fact that language acquisition occurs in a surprisingly short time'. McNeill went on to say: 'Grammatical speech does not begin before one-and-one-half years of age; yet as far as we can tell, the basic process is complete by three-and-one-half years'. Similar points of view are still common currently. For example, in her recent overview of language development, Barbara Bjorklund (1995: 282, 285), while not denying some modest linguistic growth beyond the preschool period, stated: 'During the three years from age 2 to age 5, children's language develops from baby talk to adultlike communication...the language of the 5- or 6-year-old child is not much different from that of an adult'. This kind of perspective is reflected perhaps in the emphasis on the early childhood years in many leading journals in the field of language development today.

A different view is that the linguistic accomplishments of preschoolers constitute an impressive and essential BEGINNING to the total process of acquiring language, but that language continues to develop in important ways throughout later childhood and adolescence and into adulthood.

Marilyn Nippold's book, Later language development: the school age and adolescent years, supports the latter view, and the many research studies and broad range of topics she considers are convincing that in several important ways language development is a protracted process extending through middle and late childhood and into adolescence and adulthood. Indeed, this book makes a compelling case that language acquisition is a life span process with no clear point of completion, a point of view which is also presented convincingly in some recent textbooks on language development (e.g. Berko-Gleason, 1997).

Nippold's book is a revised version of an earlier edited volume. It focuses primarily on the period from six to eighteen years, although there is also some discussion of earlier developments in the preschool period and later ones during adulthood. The coverage of topics is quite extensive and includes research on the lexicon, syntax, comprehension of linguistic ambiguity, verbal analogies and syllogisms, various forms of figurative language including metaphors, similes, idioms, and proverbs, and several discourse skills including conversation, narration, persuasion, and negotiation. In all cases research reveals that development is a protracted process, extending from childhood to adolescence and adulthood. Moreover, in many instances empirical findings indicate not only quantitative changes with age (e.g. increases in vocabulary size, sentence length, the number of persuasive attempts used to convince a listener of something), but also qualitative changes (e.g. in the kinds of words and meanings known, sentences produced, strategies used to persuade). As Nippold suggests, to detect qualitative changes in the school years and beyond, it is often necessary to compare the language of children or adolescents separated by two or more years and to look in the right places. For example, if one were to compare a spontaneous speech sample of a six-year-old child with that of a child a few years older, one might not be overly impressed by the differences. But if one acknowledges that reading and writing are language skills, the older child who can read books to her younger sister and can write stories on her word processor seems to be far in advance of the younger child and to have developed qualitatively different linguistic abilities.

Although Nippold gives this example early in her book and identifies the attainment of literacy skills as a likely contributor to many of the later linguistic developments she describes, the processes involved in actually learning to read and write are not treated as separate topics. Rather, after a helpful introductory chapter, she considers later language development with respect to several domains for which preschool children have already acquired some competence. In Chapters 2–4, she focuses on the lexicon. This is a good topic to start with because word knowledge is important for most if not all of the remaining areas treated, and because research indicates extensive lexical and semantic development after the early childhood years.

For example, research she discusses in Chapter 2 indicates that words are learned more rapidly throughout the school years than in the preschool period (Miller & Gildea, 1987; Anglin, 1993). Moreover, the kinds of words learned (e.g. abstract words such as *condone*, metacognitive terms such as *hypothesize*, adverbs of likelihood such as *probably*) and meanings understood (e.g. the psychological versus the physical meaning of *bright*) are often qualitatively different from those learned and understood earlier. In Chapter 3 she reviews research indicating that the ability to retrieve words from memory in spoken or written communication improves in speed and accuracy into adolescence and adulthood. This may reflect changes in the use of 'word finding' strategies. In Chapter 4 she describes studies showing that definitional skills improve from the early school years through adolescence and into adulthood in terms of both content and form, thus reflecting both semantic development and growth of metalinguistic knowledge about the syntactic conventions used in producing definitions.

In Chapters 5 and 6 Nippold discusses research indicating that understanding of verbal analogies and syllogisms begins in early childhood and steadily improves through later childhood and adolescence. The next three chapters are concerned with various forms of figurative language including metaphors and similes, idioms, and proverbs. Here, as elsewhere, she discusses her own research, which is extensive and carefully done. Although a case can be made that preschoolers understand and produce some figurative expressions (Winner, 1997), the evidence indicates that comprehension of each kind of figurative language steadily improves through childhood and into adolescence and adulthood. (Metaphoric production actually seems to decline in the elementary school years, but Nippold argues that the CAPACITY to produce metaphors nonetheless likely increases monotonically throughout childhood and beyond.) When children misconstrue metaphors, idioms, and proverbs, they often do so in terms of literal interpretations of their constituent words. Nippold presents evidence indicating that familiar idioms and proverbs are understood earlier than unfamiliar ones, which supports what she calls the 'language experience hypothesis', the view that understanding figurative expressions develops through meaningful exposure to the expressions. Additionally, transparent idioms (which are semantically related to and extensions of the literal meanings of the idiomatic expressions, Gibbs, 1987) and concrete proverbs are understood earlier than opaque idioms and abstract proverbs. These findings she interprets as supporting the 'metasemantic hypothesis', the view that understanding figurative expressions develops through active analysis of the literal meanings of the words that comprise them.

Chapter 10 deals with the appreciation of linguistic ambiguity in sentences, jokes, riddles, and advertisements. Appreciation of ambiguity requires an understanding of the double meanings of such expressions, and has been

shown to improve throughout childhood and adolescence. Some studies have suggested that phonological and lexical ambiguity are understood earlier than surface and deep structure ambiguity, but ambiguous sentences of any type can vary widely in difficulty as a result of several factors, and perhaps especially the vocabulary used in the sentences. Sarcastic expressions are also considered in this chapter, and rightly so because they can be viewed as ambiguous. The listener must decide if such expressions are to be interpreted literally or as the opposite of their literal meanings. Research indicates that sarcasm is difficult for preschoolers to understand, that young school children rely heavily on vocal intonation, and that with age during the school years children increasingly attend to contextual cues that are primarily linguistic to interpret sarcasm.

In Chapter 11, on syntactic attainments, both intrasentential and intersentential developments are considered. For both spoken and written language, research reveals that, when context is held constant, mean sentence length (in words or morphemes) gradually increases with age throughout the school years during childhood and adolescence. Mean sentence length increases for several reasons. Expansion of both noun and verb phrases contributes to later grammatical development. Likewise, complex sentences containing an independent clause and a dependent (embedded) clause, and compound-complex sentences containing two or more independent clauses and one or more dependent clauses, show notable increases in the language produced during later childhood and adolescence. Relatedly, during the school years children and adolescents increasingly learn greater numbers of the subordinating (e.g. although, because, unless) and coordinating (e.g. but, so, yet) conjunctions used to link clauses within sentences. Intersentential syntactic development during this time consists, in part, of the increasing use of cohesion devices such as adverbial conjuncts (e.g. moreover, consequently) and of synonyms, near-synonyms, and other kinds of semantically related terms that serve to link adjacent sentences in discourse.

In the last two chapters four spoken discourse skills are considered: conversation, narration, persuasion, and negotiation. Although preschoolers acquire some important discourse abilities (Nelson, 1996), development of each of these skills continues well into the school years, and where relevant data are available (i.e. for conversation and negotiation), through the adolescent years as well. Conversational development is characterized by increases in topic maintenance, the graceful shifting of topics, and the adjustment of speech to the listener's thoughts and feelings (Brinton & Fujiki, 1984). Narratives not only become longer with development, but become better organized and more cohesive. In the case of stories, more subplots are introduced and more is said regarding the characters' emotions, thoughts, and intentions. Research based primarily on hypothetical tasks

indicates that as children develop through the school years, their persuasive attempts are better organized, contain a larger number of different arguments, and increasingly rely less on negative strategies such as whining and begging, and more on socially positive strategies such as bargaining and stating advantages to the listener as a reason to comply. With respect to negotiation, there are also gradual improvements throughout childhood and into adolescence. Increasingly with age young people show greater awareness of the thoughts, needs, and feelings of others, use verbal reasoning and cooperative and collaborative strategies, and show a willingness to compromise in their attempts to resolve conflicts. All the discourse skills treated in Chapters 12 and 13 require verbal, pragmatic, and cognitive competence, and development in each case appears to reflect increasing social perspective-taking abilities.

Overall, this is a terrific book, and an important one because of the compelling case it makes that language develops in many significant ways throughout all of childhood and adolescence and into adulthood. The author has an ease with the material and she is able to present and discuss the research in a lucid, straightforward manner. Most chapters contain helpful summaries and suggestions for future research. In Chapters 8 and 9 she presents appendices listing large sets of idioms and proverbs with ratings of familiarity, and, in the case of idioms, of transparency as well. These could well be useful to researchers interested in figurative language. Although the book's focus is on basic research, in several places she comments on the relation between such research and related psychometric tests. For example, on pp. 52-56 she discusses what numerous tests of intelligence and language development have shown about the growth of definitional skill, while at the same time pointing out the advantages of basic research on this question. The book should be very useful to researchers interested in later language acquisition and could be used in courses on language development when the instructor wishes to treat this part of the process as well as language acquisition in early childhood.

No doubt, some readers will have questions about some of the conclusions reached. For example, several, but by no means all, of the methods described for assessing linguistic skills and knowledge appear to require metalinguistic competence (the ability to reflect on, analyse, and discuss language), and this might lead to an underestimation of some of the skills and knowledge studied, particularly in younger children. But Nippold is quite aware of this issue and often recommends focusing on more naturalistic settings in future research to deal with it. On the other hand, she makes a good case that the growth of metalinguistic competence is an important part of the process of later language development and that it contributes to it in various ways. Moreover, many of the studies presented used methods that do not require

metalinguistic competence, and ultimately the book is still convincing that language development is a protracted process extending from childhood through adolescence and into adulthood.

This excellent book covers a lot. But in her Preface the author indicates that she is planning to update the material in subsequent editions more frequently, and there are some topics and issues relevant to later language development that could be treated more extensively in future editions. One such topic concerns cross-cultural and cross-linguistic studies of later language development. With one exception, all the studies examined involved English-speaking participants from technological societies. All were attending or had attended schools in which they were exposed to instruction in reading and writing and other skills relevant to later language development. Although it would be an ambitious undertaking, it would be worthwhile in a subsequent edition to discuss what is known about later language development in other cultures, including nontechnological societies in which children do not go to school. It seems very likely that some of the later developments considered in the book depend on formal education and the attainment of literacy. It would be necessary, however, to examine crosscultural and cross-linguistic research to get a clear sense of which of them are culturally specific and which are culturally universal. Another topic possibly worth considering is learning to read and write, because these developments can be viewed as part of the total process of language acquisition (at least in those who do learn these skills). Some treatment of later phonological development might also be included. And although morphological knowledge is discussed in an interesting way briefly in Chapter 2, a more extensive treatment might be presented in a future edition. Although inflectional morphology is largely learned in the preschool years, many aspects of compound formation and most aspects of derivational morphology that are eventually learned are acquired gradually in the school years and subsequently. Many linguists have noted that compound formation and derivation are the two most important processes of word formation, and thus the gradual mastery of the rules underlying them is an important topic for later language development.

Finally, readers of future editions might welcome more theoretical interpretation of the research than there is in this edition. In fairness to the author there are some interesting theoretical discussions for certain specific topics (e.g. the mechanisms that might account for semantic development, in Chapter 2, the growth of definitional skill, in Chapter 4, and the learning of figurative language, in Chapters 7, 8 and 9). Moreover, in Chapter 1 the author suggests that four kinds of processes contribute in important ways to several of the developments considered in the book: learning to read and write; the growth of metalinguistic competence; the transition from concrete to abstract reasoning; and the increasing ability to take the social perspective

REVIEWS

of others. And she does illustrate the potential operation of these processes at various points in the subsequent twelve chapters of her book. Still, even further consideration of the theoretical implications of the research described would be valued. For example, although the author briefly touches on the connections between language development and cognitive development, and on the implications of the research considered for the notion of a critical or sensitive period in language acquisition, more theoretical discussion of these and other issues in subsequent editions would be of great interest. The current edition does not have a final chapter bringing everything together (it ends with a chapter on persuasion and negotiation), and such a chapter including more theoretical interpretation and discussion of the likely processes and mechanisms underlying later language development might be appreciated by many readers.

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MICHAEL BAMBERG (ed.), Narrative Development: six approaches. Mahwah, NJ: Erlbaum, 1997. Pp. 278.

Narrative development is at the crossroads of several disciplines and theoretical approaches to child development. The most striking feature of the volume edited by Bamberg is that it highlights the multiple dimensions to be explored in this area of development, the many ways to approach each one of these dimensions, and their different implications for our understanding of

children. In particular, the chapters in this volume spell out in detail a wide range of perspectives on children's narratives in the broader context of interrelated aspects of human development. They thus open new directions of interdisciplinary research that are not typically represented in the available literature.

As indicated in the title, the book presents six different approaches to narrative development. The first approach is proposed by Stein & Albro (Building complexity and coherence: children's use of goal-structured knowledge in telling stories). These authors assume that children's narrative activity is guided by underlying COGNITIVE SCHEMATA that are available to children very early and that reflect knowledge of the rules defining the well-formedness of stories. This type of approach has given rise to a large number of writings in developmental psychology and has led to a variety of proposals concerning the precise nature of the underlying representations upon which children rely when producing or comprehending stories. These proposals take the form of STORY GRAMMARS, meant to define the basic narrative units and rules necessary for their organization into a well-formed story (e.g. Mandler & Johnson, 1977; Stein & Glenn, 1979). At the centre of the authors' framework is a goal-plan organization which includes a protagonist capable of intentional action, a statement of his or her goals, the actions carried out towards these goals, and the outcomes related to the attainment or nonattainment of these goals. Stein & Albro tested children's knowledge of story structure and complexity on the basis of narratives elicited (in kindergarten, third and fifth grades) by means of story stems to be completed. The numerous and detailed analyses presented focus on several aspects of these narratives. The results show that a large majority of children from the youngest age on have a minimal concept of a story. This concept is goalbased, revolves around a clear goal-action-outcome organization, and provides a coherent organization of episodic sequences. Perhaps the most striking developmental change is an increase in the number of protagonists introduced in the goal-directed stories. This result reflects young children's difficulties in accessing and interrelating internal states and actions sim-

The second approach is proposed by Quasthoff (An interactive approach to narrative development). In this revised ethnomethodological approach to conversational analysis, interpersonal processes are central in understanding children's narrative development. The data presented consist of conversational narratives elicited on the basis of a staged incident (an adult trips over a cord and drops a tape recorder). The analyses examine different patterns in adult—child interaction, with particular attention to three domains: Global structure, related to the ability to open and close discourse sequences; the co-construction of the Global semantic coherence of the narrative, which involves the ability to Elaborate the content of

each discourse unit; narrative discourse patterns, reflecting the ability to DRAMATIZE the recounted events when replaying them. The results show that five-year-old children are not sensitive to global discourse constraints. Fiveyear-olds also provide information that does not relate to the interlocutor's expectations, and they do not differentiate linguistic forms such as reported speech. In contrast, seven-year-olds begin to establish global narrative constraints, produce chunks of multiple sentences that expand episodic knots, and begin to show concern for replaying patterns through adult help. By age ten to fourteen years, children mark the global structure of the narrative by means of discourse markers, expand all event knots, and show increasing formal proficiency in replaying events. These different profiles, however, are not independent of the behaviours adopted by the adults, who provide different types of demands or information to children according to their ages. Quastoff proposes that the telos of the adult-child dyad changes over time and argues for the existence of a DISCOURSE ACQUISITION SUPPORT SYSTEM during narrative development.

Bamberg proposes a third approach (A constructivist approach to narrative development), according to which the child constructs experience and self out of cultural practices. In this process language plays the central role of providing a pre-existing symbolic system allowing multiple forms of representation as a function of different discourse ends. Bamberg also distinguishes and relates two central notions: GENRE, which 'takes account of different classes of form-function (linguistic-discursive) relationships and the way they exist as conventionalized (rhetorical) situations' (p. 94), and VIEWPOINT, related to how 'linguistic choices are made to instruct an audience to construct a relationship between what is said and the context from a particular point of view' (p. 94). Within this framework, Bamberg analyses narratives produced by German- and English-speaking children (preschoolers, first graders, third graders). Children were asked to narrate a picture book, as well as to answer EMOTION QUESTIONS involving a BEING or a MAKING situation and distinct perspectives (e.g. 'Can you tell me about one time when you were [made someone] very very angry/sad?" 'How would you explain to me what it means to be [make someone else] angry/sad?', p. 97). The many results reported can be illustrated in several ways. First, when narrating the book, children use various devices to construct the events from the perspective of the main characters (protagonists). For example, they use referring expressions in such a way as to differentiate the protagonists from other characters (antagonists), as well as passive constructions to promote the protagonists' actions and to demote those of the antagonists. Secondly, children's responses in answer to emotion questions show different ways of treating situations as HAPPENINGS vs. EVENTS as a function of age. Bamberg argues for a complex interplay between the IDEATIONAL and INTERPERSONAL functions of language, such that the construction of narrative content is not

independent of the construction of the interactive motivation for telling the story. Furthermore, he warns us against reducing narration to one genre, since each of the different genres examined has its own developmental course and purpose.

McCabe provides a fourth view (Developmental and cross-cultural aspects of children's narration), which aims at relating multiple influences on narrative development. This chapter shows the importance of taking into consideration the role of parental input in children's narrative development and of particular cultural expectations concerning the minimal requirements of a 'good' story. On the basis of a large longitudinal study of individual differences between the ages of three and six years, McCabe shows that the development of the ability to produce narratives depends on children's anticipation of habitual interventions on the part of parents. Roughly, when parents talk much about past events to their children and get them to elaborate particular components of narratives, children later display welldeveloped personal narratives which contain orientations, causal explanations linked to psychological motivation, and reported speech events. Finally, McCabe embeds narrative behaviours in their cultural context and documents how cultural expectations may also influence what parents and children do in a variety of narrative situations. Examples of narratives produced by Japanese, European North American, and African-American children show differences of several types, such as the global type of children's narrative organization, the extent to which they compress similar experiences into one thematically unified story, or the length and expansion of their narratives. In this respect, McCabe calls for a multicultural literacy curriculum in the educational system and for new methods of clinical assessement. Perhaps this research can be best summarized by the author's repeated conclusion that 'storytellers are made, not born' (pp. 160, 170).

Highly related to McCabe's view is the fifth approach proposed by Nicolopoulou (Children and narratives: toward an interpretive and socio-cultural approach), who views narrative activity as 'a form of SYMBOLIC ACTION linking the CONSTRUCTION OF REALITY with the FORMATION OF IDENTITY' (emphasis in the original, p. 180). Taking as a starting point a number of interpretive approaches (e.g. Bakhtin, Bruner, Feldman, Geertz, Vygotsky, Wertsch), this chapter proposes an orienting theoretical framework in which socially constructed tools such as language are constitutive of higher mental functions. It relies on the idea that NARRATIVE GENRE provides 'constitutive mental models for ordering and interpreting human experience' (p. 191). Nicolopoulou applies such an approach to an assessment of preschool children's narrative styles, with particular attention to spontaneously generated narratives in relation to play. Within a Vygotskian framework play is seen as fusing imagination and spontaneity, on the one hand, and action governed by self-imposed rules, on the other hand. It

thereby provides the dynamic mechanism for development and pushes the child beyond his or her previous achievements. The usefulness of this framework is illustrated with data from a project in which children (of four to five years) dictate stories, which are then read out loud and collectively acted out in a classroom context. One of the striking findings from this research is that children's narratives display an unexpectedly high degree of complexity and sophistication for this age range, including plot structures which go well beyond mere descriptions or scripts and which have not been observed at this age in previous studies. In order to account for these divergent findings, Nicolopoulou suggests that the context of this socially constructed narrative activity accelerates the development of children's narrative abilities.

Finally, the last approach is proposed by Hermans (Self-narrative in the life course: a contextual approach), who examines how narrative activity can inform us about the development of self. Hermans first reviews a number of classical metaphors traditionally used for the study of human development. None of these take into account the particulars of people's life experiences: FORMISM classifies people on the basis of general traits; MECHANISTIC models conceive of humans as reactive machines, whose responses are a function of antecedent events providing efficient causes; ORGANISTIC models conceive of the human organism as actively engaged in a process of structural change that follows a series of discontinuous stages along a telos. Hermans adopts the metaphor of CONTEXTUALISM, for which events are meaningful only when they are located in their particular spatio-temporal context. Furthermore, borrowing Bakhtin's metaphor of the Self as a polyphonic novel, Hermans proposes to view the individual as consisting of 'multiple authors entering into dialogical relationships with each other and creating a complex organization of the self' (p. 239). The self is seen as consisting of different Ipositions and narratives as being told from different I-perspectives. Illustrations are provided with a case study extracted from a data base elicited by a SELF-CONFRONTATION METHOD. Subjects are asked to tell about important events in their past, present and future life, then to rate a number of affect terms according to the extent to which they experience the corresponding affects. On the basis of various indices, Hermans argues for the need to conceive of the self as reflecting different systems of VALUATIONS, whereby subjects actively construct meaning in different simultaneous ways.

As can be seen from these highlights, then, this volume provides a rich theoretical basis for the study of narrative development from a variety of complementary perspectives. Two types of critical remarks could be raised. The first set of remarks is of a methodological nature. The chapters range from descriptions of anecdotal case studies to the statistical analyses of large volumes of data. In some cases, a more precise presentation of the coding criteria used in the analyses would have provided stronger support for the

proposed claims, hypotheses, and models. Thus, some criteria used for the coding of narrative content or for conversational analyses may be insufficiently justified or described. For example, the analysis of EXPLICIT GOALS (see Stein & Albro's chapter) does not define the type of explicitness observed, ignoring the contribution of children's developing discourse cohesion. As a result, it collapses the FOREGROUNDED expression of psychological states as a narrative unit in its own right (e.g. to want) and the BACKGROUNDED expression of goals as part of the temporal-aspectual contour of actions in another narrative unit (e.g. to start to). Similarly, the properties provided for OUTCOMES in the same chapter (such as several dimensions of transitivity) need not be specific to this type of unit, being more generally characteristic of all foregrounded events in cohesive discourse (also see related comments in Hickmann, 1998). In addition, the interpretation of categories such as replaying patterns (see Quasthoff's chapter) is based on children's inclusion of reported speech, which has been shown to be subject to developmental change from a psycholinguistic point of view (e.g. Hickmann, 1993). More generally, the brief summaries provided for several types of results across other chapters (e.g. McCabe's, Nicopolou's, Herman's) leave us somewhat hungry for more precise empirical information in order to interpret the data. Finally, a number of methodologies imply some level of regulation or of metalinguistic awareness that could have affected the results, e.g. the 'transcription' of oral speech into the written modality (see Nicolopoulou's chapter) or the task of reflecting on affect terms presented in writing and in isolation (see Hermans' chapter).

The second set of remarks is more of a theoretical nature. Some contrasts among competing approaches would have benefitted from closer attention to decisive empirical evidence. Children's linguistic differentiation between protagonists and antagonists (see Bamberg's chapter) is interpreted as showing the expression of PERSPECTIVE in discourse, which is not at all incompatible with alternative theories focusing on the pragmatics of information structure. In addition, in the light of current crosslinguistic research (e.g. Berman & Slobin, 1994; Bowerman, 1989; Bowerman & Levinson, in press; Gumperz & Levinson, 1996; Hickmann, 1995), more attention could have been placed on the possibility that some of the observed patterns need not be universal. In this respect, several chapters (see especially Bamberg's, Nicolopoulou's, and McCabe's) point to cultural variability, without touching on the complex question of the relation between language and culture.

Despite these few points, this book is a necessary reference for all researchers interested in narrative development. Furthermore, it goes well beyond the study of narrative *per se* to encompass quite a number of fundamental issues in the study of human development. It is addressed to scholars and advanced students interested in some of the latest developments

REVIEWS

characterizing the field of children's narrative discourse. Unlike many other collected volumes, it provides a platform for explicitly confronting varied claims and assumptions that would go (and have gone previously) unnoticed otherwise. This kind of contribution may seem surprising to many researchers of narrative development, as it is quite unusual in appealing to diverse theories that stem from different disciplines (cognitive, clinical, and developmental psychology, linguistics, literary analysis, sociology, anthropology) within the same publication. Emphasis is clearly placed on comparing and linking different conceptions of narrative development as a starting point for broader discussions concerning the most essential characteristics of our species in the areas of human action, cognition, communication, social interaction, culture, and self.

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