Words in Time

W DE G

Trends in Linguistics
Studies and Monographs 143

Editors

Walter Bisang
(main editor for this volume)
Hans Henrich Hock
Werner Winter

Words in Time

Diachronic Semantics from
Different Points of View

Edited by

Regine Eckardt
Klaus von Heusinger
Christoph Schwarze

Preface

The plan for the present book originated in the context of the Sonderforschungsbereich (collaborative research centre) 471 "Variation and Evolution in the Lexicon", funded by the Deutsche Forschungsgemeinschaft (German Research Foundation). This umbrella project was founded in the year 1997 and aims at a better understanding of innovation and diversification as processes inherent in language learning and use. The lexicon is perceived as one major locus of mental representation and of variation as a cause of change. While the majority of the projects is committed to linguistic research in the strict sense, the unique spirit of the research unit as a whole derives from the fact that complementing projects investigate language variation from the perspective of neighbouring disciplines, in particular history, literary studies, psychology and sociology. This joining together of research groups inspired many regular as well as spontaneous agreeable ways of interdisciplinary exchange on a common topic of research, which had the fruitful double effect of both deepening each individual's understanding of their own position in a larger scholarly field, and strengthening awareness of the diverse dimensions of our common subject of investigation: natural language.

A substantial part of the contributions to this volume were first presented at two events that took place at the university of Konstanz: the International Colloquium "Methodology for the interdisciplinary investigation of the lexicon", organised by Aditi Lahiri, Alexander Patschovky and Christoph Schwarze in 1998, and the workshop "Meaning Change – Meaning Variation", organised by Regine Eckardt and Klaus von Heusinger as part of the XXI. Annual Meeting of the Deutsche Gesellschaft für Sprachwissenschaft in 1999. Further scholars were invited to contribute, with the aim to strengthen the interdisciplinary profile of the collection.

The realization process of the book took longer than we anticipated, and we want to express our gratitude to the contributors for their patience and persistent faith in the eventual success of the project. We deeply regret that our thanks can no longer be addressed to our colleague and friend Andreas Blank, who passed away in 2001.

We are greatly indebted to Ulrike Brüning, Benedikt Grimmler, Christina Maier and Verena Mayer for their valuable help in editing the book and preparing a camera-ready manuscript. Bruce Mayo and Philippa Cook

generously assisted us in improving the language of non-native contributions (not least our own).

Finally, we want to thank the series editor Walter Bisang, the reviewers and Birgit Sievert from Mouton de Guyter for their encouraging and efficient cooperation and many helpful comments. Working with them has been a pleasant experience.

Contents

C. The force of grammar

Introduction: Historical linguistics as a transdisciplinary field of research

Regine Eckardt, Klaus von Heusinger, and Christoph Schwarze

1. Words in time

Word meanings are constantly changing, and the driving forces of meaning change are varied and diverse. Few semantic changes are determined by purely language-internal factors; the majority can only be understood by taking various kinds of external influences into account. Usually, linguistic investigations are concerned with language-internal processes, while investigations of language-external historical developments tend to ignore linguistic considerations. It is evident, however, that diachronic semantics can only be fully understood if we base the study of semantic change on a well-developed explicit theory of meaning, i.e., synchronic semantics, one that includes a proper place for lexical semantics of both content words and function words. From this point we can start our quest for principles of semantic change, drawing on expert knowledge about the world, on the domains of reference of words, as well as on the social and cultural environment of speakers who used the words.

When modern linguistic research in Germany slowly evolved as a new independent field of scholarly investigation in the early nineteenth century, Wilhelm von Humboldt still lived up to the ideal of the universally interested and informed investigator of language. Having received his academic education at a time when philosophy, history, philology, and even natural sciences were still hosted in the overarching Faculty of Arts, he not only envisaged *Wissenschaft* as one undivided field of intellectual effort but specifically viewed the investigation of language itself as a contribution to the larger project of general anthropology; the investigation of human nature in its cultural, psychological, sociological, historical and philosophical aspects.

Since Humboldt's time, considerable scientific progress has led to specialization in the humanities, and former subfields have emancipated themseves into self-reliant disciplines with their own methods, perspectives, aims and theories. The investigation of meaning and meaning change was continued under the label *semantics* as an advanced specialized subfield of linguistic research. While the impressive results in linguistics over the last decades fully justify these specializations, diachronic semantics remains a challenging topic of investigation. Interdisciplinary efforts are necessitated by the very nature of the object of study and, at the start of the 21st century, the time seems ripe to reunite the various branches of the humanities, each advanced and matured since the days of Humboldt, in the common exploration of the nature of language variation and change. A first step must be to strengthen the awareness of scholars in different fields of the fact that many truths can be told about the common object of investigation – natural language and languages in their cultural, social, historical and psychological settings. Facts and laws of language that are focused on by one discipline can be irregular neglectables of the next discipline, and single scholars, absorbed by their own field of expertise, are in danger to base their work on a one-sided idealization of a multi-faceted reality.

The present volume offers a collection of studies in meaning change from linguistic as well as nonlinguistic perspectives conducted by scholars in linguistics, philology, philosophy, sociology, anthropology and history. The collection comprises, and hence allows to compare, in-depth investigations of language change from different perspectives and scientific paradigms. Each of the contributions demonstrates the methods and techniques of its own core field whilst showing the fruitful mixing of perspectives of more than one discipline. In bridging the gap between disciplines, we want to strengthen sensitivity for the many dimensions of language as a social, cultural, cognitive, formal and historical object.

2. Theories of language change and meaning change

2.1. The modern classics

Wilhelm von Humboldt is commonly named as the prototype of a universal scholar. He approached the investigation of language in the course of his wider project of seeking to elucidate the general nature of human character. He was therefore interested in languages as reflecting the culture of their

speach communities, and his perspective on the diachronic investigation of individual languages can be likened to the efforts of the biographer: to understand which events and circumstances had influenced and shaped the language as it presented itself at some given point in time. Under this perspective, facts about political, social and cultural history as well as philosophical and psychological insights (at the time hardly even separated) were much more than mere anecdotal annotations to grammar.

The Schlegel-Humboldt debate about the development of Romance languages from their Latin origin can serve to illustrate this fact (see specifically Trabant 1990: 128f. and Plank 1991, 2002 for a broader overview) The point of conflict was, in simple terms, how two synthetic languages – Latin and Germanic – could give rise to descendant Romance languages that were more analytic in character. Humboldt focused in particular on the Romance future tense and article system to witness the shift from more synthetic to more analytic. We must remember that at the time, synthetic languages – most saliently Ancient Greek – were viewed as the climax of language development. The emergence of analytic elements was hence viewed as language decay. Humboldt and Schlegel were concerned with the creative potential of language. To put it in terms of the biological metaphor of language creation: Can two parental languages as such give rise to an inferior offspring, or does 'decay' arise through nonlinguistic external influence?

Schlegel held the view that the development in question occurred as a mixing of two languages when Latin-speaking communities imitated the language of the politically dominant class of Germanic intruders. Humboldt (1827–29 [1907]: 292) opposed this and argued that the development must have resulted from social and political conditions internal to the Latin-speaking society:

> Ihre sie charakterisierende Eigenthümlichkeit gieng nicht aus der Mischung Germanischer und Römischer Rede und Sprache hervor, sondern aus der durch die siegreiche Einwanderung fremder Stämme bewirkten Zerstörung des politischen Bestandes, der darauf folgenden Zerrüttung des ganzen Culturzustandes, und der diese Katastrophen begleitenden Verderbniss der Sprache (Humboldt)[1].

---

[1] "Their (= Romance languages) characteristic features did not emerge from the mixing of Germanic and Roman speech and language, but from the victorious immigration of foreign peoples and the destruction of the political system caused

Humboldt (1827–1829 [1907]: 292) hence seems to maintain the positivistic view that languages, left on their own, can only improve: decay is caused by external catastrophes and resembles a disease from which languages can recover: "(so) glänzend sie sich auch wieder aus diesem neu entwickelt haben."[2]

Humboldt and Schlegel's basic question was about language: is language change an inherently directed process? Any eventual answer would essentially have to rest on considerations about the political, cultural, social and linguistic constellations in Northern Italy and Southern France during the crucial period.

Steinthal and Lazarus are commonly quoted as Humboldt's truest followers and heirs, but Humboldt's universalist perspective on the subject of investigation was shared by linguists in the nineteenth century in general. Hermann Paul in *Prinzipien der Sprachgeschichte* states that "Die Kulturwissenschaft ist immer Gesellschaftswissenschaft. Erst Gesellschaft ermöglicht die Kultur, erst Gesellschaft macht den Menschen zu einem geschichtlichen Wesen" (Paul 1880: 7).[3] In view of the fact that Paul saw linguistics as an inherently diachronic science where a purely synchronic perspective meant severe reduction of the topic (Paul 1880: 20ff.), his statement is an indirect command to embed linguistic research in a wider historical-cultural perspective. His own work reflects this conviction in many aspects, and his observations about language and languages are constantly related to reflections on the nature of man and society (e.g. Paul 1880: ch. 14 for an illustration).

At the end of the nineteenth century, Georg von der Gabelentz still presents himself as standing firmly in Humboldt's tradition. In his 1891 *Die Sprachwissenschaft*, he provides a colorful description of the multidisciplinary early days of (German) linguistics: "Sie glich einer Colonie, deren erste Bebauer aus verschiedenen Gebieten zugewandert waren, und noch heute gereicht ihr solcher Zuzug oft zum Gewinne".[4] He continues by list-

---

thereby, as well as subsequent disruption of the cultural conditions and concomitant decay of language."

[2] "(although) they brilliantly redeveloped" (after this decay). ·

[3] "Cultural science is always social science. Only society makes culture possible, only (his) society will turn man into a historical being". Note that this passage – part of the introduction to the field of linguistics – does not even single out linguistics as an isolated subbranch of the humanities (then called 'cultural science').

[4] "It (= linguistics) was like a colony, the founders of which all came from different directions, and until today, such migrants frequently are a gain for the field."

ing the scholarly origins of the founders, among which we find classical philology, oriental studies, theology, law and medicine. The next paragraphs are devoted to describing the necessary skills and prerequisites of a good linguist. Von der Gabelentz (1891: §§2, 4) recommends not only knowledge in physiology and physics (for matters of phonetics and phonology) but more importantly psychology (because "Die Sprache ist unmittelbarster Ausfluss der Seele", language is the most immediate reflex of the soul) and finally philosophy, logic and analytic skills in order to be able to turn the multitude of observed facts into a coherent and systematic grammatical theory. Von der Gabelentz (1891: 53) summarizes that "In unserer Wissenschaft ... gilt dies, dass man sich nicht ungestraft vereinseitigt, und dass kein Ab- und Umweg ungelohnt bleibt. Geschichtlichen, länder- und völkerkundlichen, philosophischen, ästhetischen, auch wohl naturwissenschaftlichen Interessen gebe man getrost ihr Recht: ..."[5].

Linguistics in the nineteenth century was hence tightly interwoven with the humanities. The study of a language was always about the language as a historical entity, as an object that could only be understood against the background of its development over time. What is true for the discipline as a whole holds true for its subparts as well: the investigation of semantics took its origin (and even the term *semantics* itself was coined) in the investigation of meaning change.

2.2. The emancipation of linguistics

In the twentieth century, both diversification and specialization took place. The cultural sciences split into highly specialized fields, independent of each other and of linguistics, which matured from a mere preparatory subject into an academic discipline in its own right. For the first time, linguistics provided new paradigms of thought that productively influenced other sciences. The so-called linguistic turn substantially shaped the field of philosophy, and structuralist methods inspired leading schools of research in several branches of the humanities.

---

[5] "It is true for our science ... that one may not restrict one's perspective without serious retributions, and that no digression remains unrewarded. Give in freely to your historical, geographical, ethnological, philosophical, aesthetic interests and those in the natural sciences: ..."

Within the newly emancipated field, historical research was thrust into the background in favor of synchronic linguistics as an empirical science which, in turn, split up into investigations into the phonological, morphological, syntactic, semantic and pragmatic aspects of natural languages. These specializations proved extremely productive, and the field has gained many valuable insights into the linguistic and cognitive abilities of humans by focusing on specialized facets of language.

Like the field as a whole, the discipline of semantics underwent a bifurcation. On the one hand, semantics flourished as a synchronic discipline, perceiving language as a fixed system in which most factors that might lead to variation are abstracted away in favor of a more or less rigid formal treatment of meaning. Compositional semantics in the tradition of the works of Gottlob Frege (1970) and Richard Montague (1974) demonstrated over the last century that semantic research in the sobering spirit of formal logic can lead to deep and intricate findings about the nature of human language and cognition. The approach has since been refined and extended considerably, giving rise to discourse semantics (e.g. Kamp and Reyle 1993), generative lexical semantics (Pustejovsky 1995) or formal pragmatics (Kadmon 2001; Mey 2001). In recent years, the competing paradigm of cognitive semantics has sought to reconcile insights into semantic investigation with psychological facts about categorization and information processing (see Dirven and Verspoor 1998 for an overview).

On the other hand, we can draw on a modern tradition of attempts to explain meaning change, usually cast in less rigid terms. The literature on meaning change offers impressive classificatory work, notably Bréal (1900), Meillet (1925), Stern (1931), Benveniste (1960), Ullmann (1967) or recently Blank (1997). These large-scale treatments of meaning change are complemented by specialized investigations into single patterns of change, notably metaphor, metonymy, lexical fields, grammaticalization and historical pragmatics. Some of these will be reviewed in more detail below.

Most recent investigations into language change adopt a purely language-internal perspective that has already proved advantageous in synchronic research. The universalist tradition of the discipline's founders has been dismissed in favor of a concentration on the notions and techniques that have been brought to professional heights over the last 100 years. It is only a few isolated attempts that still reveal the value of conducting research at the borderline between diachronic linguistics and neighboring fields. Keller's (1990) metaphor of the invisible hand brings insights from the study of *social* interactions to bear on the investigation of language

change. Other investigations of meaning change proceed in terms of general psychology like, for instance, the prototype- based theory of meaning change in Geeraerts (1997) or the account of metonymic change in terms of figure and ground of Koch (2001). In spite of their success, these works remain the exception in the modern literature on diachronic linguistics.

2.3. Recent linguistic investigations into meaning change

In *Recent developments in historical semantics*, Ferenc Kiefer (2001: 13–14) offers the following overview of current research in the diachronic investigation into meaning:

> In sum, then, in historical semantics three main lines of research can more or less clearly be distinguished: (i) research based on semantic fields (the structuralist tradition); (ii) the application of prototype theory to historical semantics as well as cognitive linguistic accounts of metonymy and metaphor; and, finally (iii) the use of semantics as well as pragmatic principles in order to account for grammaticalization phenomena.

Apart from the recent productive co-operation of linguistics and psychology in the exploration of prototype phenomena, this quotation makes no mention of links to other cultural sciences. A closer investigation of current literature in diachronic semantics will confirm this impression.

With his famous theory of lexical fields, Jost Trier initiated a new direction in historical semantics (Trier 1931, 1973). In this line of research, the principles and methods of structuralism were systematically applied to diachronic investigation. Language is perceived as a closed coherent whole where changes never occur in isolation but, rather, affect the entire system. Trier's ideas were taken up in much subsequent work and recast within a sound theoretical basis by Coseriu (1964, 1970). The findings promise interesting repercussions for our ideas of human categorization but, nevertheless, the focus of this paradigm is predominantly language-internal.

Explicit links between psychology and historical linguistics are drawn in the work of Dirk Geeraerts (1997). He proposes that semantic changes should be approached in terms of prototype theory, thus avoiding the obvious problems of categorical lexical semantics based on binary feature systems. Future exchange between (historical) linguistics and categorization

theory in psychology promises to offer valuable insights into the nature of human thinking and reasoning (see also Blank and Koch 1999).

The investigation of metaphor is another branch of linguistic research in which psychological and semantic interests meet. Metaphor as a mode of creative language use has challenged scholars at all times (Black 1962, Lakoff and Johnson 1980, Indurkhya 1992). Moreover, in a recent line of research, it has been proposed that "emerging" metaphors can underly the meaning of new analytic grammatical constructions (Heine, Claudi and Hünnemeyer, 1991, Sweetser 1990).

Grammaticalization phenomena in general are a flourishing field of diachronic research. Lehmann (1982) is commonly perceived as an early paper defining the field, its basic terms and research agenda. Important later overviews include Traugott and Heine (1991), Hopper and Traugott (1993), Bybee et al. (1994), Pagliuca (1994), Giacalone Ramat and Hopper (1998), Campbell and Janda (2001), Traugott and Dasher (2002), and Wischer and Diewald (2002). Investigations into the emergence of grammar tie in well with the deepened understanding of the syntax-semantics interface that was achieved in the synchronic and modular approach to natural languages. Moreover, advanced computerlinguistic projects allowed separate lines of theorizing to become reunited in overarching frameworks. Application of pragmatic reasoning helped to successfully elucidate the semantic side of grammaticalization (Traugott and König 1991, Traugott and Dasher 2002). While investigations into metaphor and metonymy essentially relate change to conceptualization, grammaticalization phenomena draw attention to speakers' communicative and interactional competence and present change as a result of social interaction.[6] We will come back to this dichotomy below.

The advances in the field of diachronic semantics in the last decades cannot conceal the fact that restriction to just only language-internal considerations alone severely limits the insights that we can hope to gain. We will discuss three cases in which linguistic theorizing essentially rests on results provided by neighboring sciences.

The first case is the Humboldt-Schlegel debate reported above. At the time, scholars (tacitly or explicitly drawing an analogy to biological evolu-

---

[6] It should be added that none of the named authors would claim that cognitive or communicative abilities *alone* can account for language change. Yet, in comparing different branches of investigation, it seems legitimate to highlight the distinctive assumptions.

tion) were trying to evaluate the hypothesis that language development was directed and that it led from minor to more and more improved and refined types of grammar, culminating in *synthetic* languages (Hopper and Traugott 1993: 19f.). The development from Late Latin to the Romance languages was a striking counterexample to this claim. How should one evaluate this well-documented development in the opposite direction? Humboldt's answer, as witnessed by the quotation above, was that certain language-ex-ternal factors could lead to language *decay* (i.e. developments in a more analytical direction), whereas language development in an un-disturbed cultural setting was language improvement. But whatever conclusion one would have come to, it was clear that in-depth knowledge of language-external facts concerning the time period at issue was mandatory in addressing this question.

It would certainly be premature to claim that such issues are no longer of relevance for modern linguistics. The current agreement that grammars of languages all over the globe are of equal complexity and that no type presents an evolutionary endpoint could only be reached by carefully evaluating informed hypotheses about the influence of one or the other external historical event on language change.

The next case shows how such "big" questions turn into very specific issues with very concise answers. In recent years of grammaticalization research, a common feeling has grown to the effect that many of the competing hypotheses in the field can only be evaluated on the basis of more detailed historical knowledge about the wheres and whens of the instances of change in question. The nature of the *onset contexts* of reanalysis and change is one of the topics currently under debate (Kuteva 2001, Heine 2002, Diewald 2002, Traugott and Dasher 2002 among others).

Let us consider a concrete example. The German intensifier *selbst* (≈ English -*self*) developed a new use in the sense of a focus particle *selbst* (≈ English *even*) during the eighteenth century. Scholars agree that the point of emergence must be located somehow between almost synonymous sentence pairs like the following:

(1)   *Venus selbst war nicht schöner als Anna.*
      'Venus herself was not more beautiful than Anna.'

(2)   *Selbst Venus war nicht schöner als Anna.*
      'Even Venus was not more beautiful than Anna.'

In spite of the plausibility of this claim, it was still an open question under which circumstances a native speaker of German (between 1700 and 1800) would be whimsical enough to start using *selbst* in the sense in (2) rather than confining herself to the conservative use in (1). The issue of when a potential ambiguity metamorphoses into actual change has often been speculated about, often on the basis of disquietingly little empirical evidence. One could envisage a standard explanation on the basis of *error*, *uninformed language use* or *misunderstanding*.

Yet, a philological survey into the uses of *selbst* strongly suggests that we should trust more in both the competence of speakers and the flexible adaptive potential of natural languages rather than blaming it all on error (note how the notion of *decay* reappears at the horizont). A survey of contemporary documents suggests that ambiguous uses arose earliest in poetry and dramatic verse. Examples can be found where *selbst* in the old sense can only be justified by costly pragmatic accommodation while *selbst* in the modern sense – which speakers might have envisaged before as a latent possibility in their language – fitted perfectly (Eckardt 2001, 2003: ch. 6). Such examples offer plausible onset uses for modern *selbst* in semantic-pragmatic terms. However, the analysis looks wildly implausible in sociological terms. Clearly today, in 2003, language innovation in poetry and rhymed drama would hardly ever have a chance to spread. Can we hence trust the philological findings?

At this point, research in cultural history informs us that in 1750, such a spread was not as unlikely as today. At that time, we witness an increased public interest in literary writing in German, which was seen as part of defining German culture and science, as opposed to the common European humanistic tradition – expressing itself in Latin. A large part of the educated classes was engaged in these attempts in quite practical ways. Literary circles flourished, honourable citizens spent their leisure time with literary discussion and poetic competition (Dietze 1963, von Borries and von Borries 1991). A new use of a word like *selbst*, initiated by leading figures in the normative efforts to define good use of German, therefore had a very good chance of entering into educated and common language. Coming back to the initial linguistic hypothesis, we find that it was in fact strengthened by reference to language-external facts.

What may look like just another isolated word history in fact reflects a broader discussion in the field of grammaticalization research. Competing hypotheses about the driving forces in grammaticalization maintain that (a) metaphoric processes (see Heine, Claudi, and Hünnemeyer 1991, and sub-

sequent work by Heine and collaborators) versus (b) communicative-pragmatic constellations are the most prominent cause of reanalysis and language change (the latter was first proposed in Traugott and König 1991 and refined in later work by Traugott and colleagues). The opposing positions take up the older dichotomy of language internal and external factors in a new, more refined sense. A *metaphor*-based account suggests that our common cognitive capacities are the driving force in language change. The account in terms of *historical pragmatics* assumes that language change is driven by our communicative and pragmatic competence, more generally the capacity for social interaction through language. We find ourselves in a situation much similar to the Humboldt-Schlegel dispute. Once more, an informed answer to this question will have to rest on solid ground work in other disciplines such as sociology, cultural sciences, psychology, history and literary studies; each applied in careful case studies offering a sound empirical basis for future theoretical work.

We take the current developments as an indication that diachronic linguistics in general, and diachronic semantics in particular, are at the threshold of a new cycle of research. Building on the solid foundation of almost 100 years of synchronic semantic research, the Big Questions in the field seem to re-emerge, calling for the universalist perspective that was shunned for a century. At this point, it might be beneficial to recall the holistic concept of language as a formal, cultural, historical and social object that informed the scientific work of the pioneers of the field in the nineteenth century, and to see how this view contributes to our understanding of meaning as a panchronic notion. Yet, the world has changed and our knowledge has increased. Today, universalist competence of a new quality can be achieved through the co-operation of researchers in different disciplines. We will, however, have to sharpen our awareness of possible points of exchange, illuminating shifts of perspective, and focus, methods, possibilities and limits of each discipline as it addresses language as an object of research.

3. Diachronic semantics from different points of view

Matters change as time goes by. First and foremost, the world and its objects undergo changes, old things vanish and new things emerge. Likewise, our beliefs are constantly adjusted, renewed, extended and corrected as we learn more about the world and its inhabitants. And finally, there is lan-

guage change. We have the clear intuition that we can and should distinguish these modes of change and that each is exemplified by its own prototypical cases.

Stern (1931: 194) nicely discusses *changes in the domain of referents* as "not very interesting" for the purpose of developing a theory of meaning change. Focusing on the word *ship*, he points out that the word previously denoted wooden vessels, propelled by windpower or oars. In the wake of technical progress, the term *ship* was extended to steam boats, motor-driven ships and ships with nuclear propulsion. Yet, we have a clear intuition that these changes essentially rest on technical progress, paired with a completely conservative use of the word *ship*.

It is perhaps more difficult to draw the line between *knowledge increase* and meaning change. Still, we find examples of an increase of knowledge, perhaps even with repercussions on language use, which occur under constant meanings. For instance, at some time the comparison of the inner organs of whales with those of other fish and mammals suggested that whales should be classed with the latter rather than the former. This however was perceived as a *correction* of the previous classification of whales and not as a change in the meaning of 'fish'. Earlier generations would call a whale a 'fish' because they lacked knowledge about its inner structure, *not* because they lacked proper knowledge about the meaning of 'fish'.

Meaning changes proper are changes in the conventions that determine the referents of a word. When Latin *trahere* ('to pull') changed to French *traire* ('to milk'), speakers adopted the additional convention to restrict the word to actions of pulling at a specific place (an udder) and with a specific purpose. Evidently, there is no concomitant change in knowledge (milking cows and goats was a technique known before) nor in the world (neither goats nor cows nor farmers underwent substantial changes).

These observations pose several exciting challenges for the semanticist. On the empirical side, studies in word history will frequently address cases that cannot be cleanly assigned to one of the three modes of change. Changes in the world, in knowledge and in linguistic conventions are inextricably inter-woven and we cannot hope to gain a full picture as long as we restrict our attention to the clean cases. The papers in the first part *Changing beliefs, diversifying worlds, and flexible meanings*, written by Andreas Blank, David Kronenfeld and Gabriella Rundblad, David J. Wasserstein and Judith Meinschaefer, offer an inspiring vista into the intricate exchanges between political developments, economical factors, social con-

stellations in and between language communities, conceptualization and language use.

On the theoretical side, they pertain to the task of developing an adequate notion of *meaning*. It is widely agreed that a word's meaning arises in the tension between its referents and the pieces of knowledge that relate the word to other words of a language. Proper names offer one particularly clear case where the reference of a name determines its meaning.[7] The complementary case can be exemplified by words that receive their meaning by explicit definition, like in *a sow is a female adult pig*. The vast majority of word meanings, however, emerges in a dynamic equilibrium between knowledge and reference that is hard to explicate. As a result, we face a potential paradox. Not all changes in referents induce meaning change. Not all changes in knowledge induce meaning change. And yet, knowledge and reference conspire to determine a word's meaning. The contributions in the second section *The meaning of meaning change*, written by Hans Rott, Ulrike Haas-Spohn, and Regine Eckardt offer three different answers to this paradox.

The third part, *The force of grammar,* comprises studies in meaning change that highlight the beneficial combination of advanced linguistic tools and theories with the methods of other disciplines such as thorough philological analysis, research into social interaction and discourse analysis. While the great value of philological, social, and anthropological research in the investigation of meaning change is already established in several contributions in part one and two, the papers by Eva-Maria Gerö and Arnim von Stechow, Miriam Butt and Wilhelm Geuder, Walter Breu, and Susanne Günthner address changes that, in addition, require a high degree of linguistic sophistication in order to reach an adequate analysis. Studies of that kind impressively prove that the temporary retreat to synchronic linguistic theorizing did not necessarily lead the field away from diachronic research. On the contrary, we witness a renewed co-operation of linguistics and the humanities, investigating classical issues at a higher level.

---

[7] See Devitt and Sterelny (1999) against the descriptive theory of names.

3.1. Changing beliefs, diversifying worlds, and flexible meanings

We will now proceed to summarize the articles in the order in which they appear in the volume. The first two contributions, by Andreas Blank and David Kronenfeld and Gabriella Rundblad, both perceive meaning change as change in the conceptualization of our world. The authors share the view that object domains are conceptualized into semantic or conceptual fields which are structured by certain parameters. Languages map sets of words (lexical fields) onto these semantic/conceptual fields, and the relation between lexical structure and conceptual structure is shaped by cognitive processes such as metonymy and metaphor. Blank as well as Kronenfeld and Rundblad argue that meaning reflects our conceptualization of the world, and that change in the conceptualization results in meaning change. Hence, both contributions base their inquiry into diachronic semantics on a modern version of the classical theory of lexical fields (Trier 1931), extended and refined by notions from cognitive linguistics and anthropology.

In his contribution *Words and concepts in time: Towards a diachronic cognitive onomasiology*, ANDREAS BLANK demonstrated that onomasiology, i.e. the way we name the objects we refer to, renders a more truthful representation of the way we conceive and conceptualize objects than does the traditional perspective of semasiology (the investigation into the meaning of expressions). Blank's investigation into conceptualization is based on detailed contrastive comparisons of how different languages name one and the same object. One of his examples is words for 'small piece of wood for lighting candles, cigarettes etc.'. The English word *match* was formed as a metaphor from the word *match* '(lamp) wick', while the French word *allumette* for the same object is derived from *allum-* 'to light' and a suffix with the meaning 'instrument for...', and the German *Streichholz* is a compound that combines *Holz* 'wood' with *streichen* 'to rub' – thus the composition refers to the act of lighting. Blank argues that onomasiological principles not only structure the synchronic lexical fields, but also restrict the process of meaning change. He concludes that the principles of lexical change can only be understood if we start from the cognitive level of concepts and proceed in the onomasiological direction towards the realm of words. This leads Blank to a diachronic cognitive onomasiology as the background theory for diachronic semantics.

Blank's article adopts a typological perspective, demonstrating both that the same real object can be conceptualized in different ways in different cultures as well as investigating the implications of this for meaning

change. In contrast, the contribution of DAVID KRONENFELD and GABRIELLA RUNDBLAD illustrates the successful interaction between structural linguistics and anthropology in the investigation of one language community. In *The semantic structure of lexical fields: Variation and change*, the authors start from Trier's (1931) notion of lexical field and apply it to names of watercourses in English. They argue that the particular name for a certain type of watercourse can only be understood in opposition or relation to other names in the lexical field, and they proceed to a detailed and informed account of the diachronic development of the entire lexical field. While they closely follow Trier's program in his seminal book, they present an application that lends an additional dimension to the method. Their research program addresses a conceptual domain that allows for inquiries into the language external, historical, social and economical factors that drive the changes of the lexical field.

The authors perceive language as grounded in a speech community where the use of words and terms is driven by the speakers' interests and needs – a perspective that is taken up later in Eckardt's contribution and set to work in her theory of reference. They use methods from cognitive anthropology and cultural linguistics (a position that is characterized more closely in their article) for describing the status of a particular word in a lexical field. Moreover, the authors combine methods of linguistic field research with philological analysis in order to characterize the lexical field of watercourses from late Old and Middle English up to the present: the vocabularies of contemporary speakers are assessed by using questionnaires and interviews. The semantic fields of speakers of earlier times are reconstructed indirectly by inferences based on contemporary usage, complemented by relevant contextual and functional information from source texts and dictionary information.

One major finding of Kronenfeld and Rundblad's analysis is that the lexical field of watercourses at earlier times was organized on the basis of the features QUANTITY, SPEED and QUALITY, while the contemporary system is mainly organized by the feature QUANTITY. This falls in line with the observation that the contemporary lexical field comprises fewer names than at earlier stages. In addition, the authors show that differentiation mainly concerns middle and small watercourses. As an example, they focus on the words *burn* and *brook*, words that are used more or less synonymously for 'river' in modern English. The word *burn* (Old English *burna* 'a bubbling or running watercourse with clear water') was more frequently used in Old English than *brook* (Old English *brôc* by metonymic transfer

from 'marsh' meaning 'marshy watercourse'). At a later stage, *brook* became more frequent than *burn*. The historical explanation is that early colonization preferred places with clear and running water (= *burn*), while later colonization had to take less favorable places with rather opaque and muddy water (= *brook*). In terms of historical semantics, the most interesting point is that these changes in everyday life not only effect changes in the frequency of use of one or another word (which would be a trivial result) but, moreover, determine subsequent semantic developments, for instance the subsequent use of one rather than another word as a general cover term.

DAVID WASSERSTEIN's contribution *khalîfa – A word study* treats the semantic evolution of the Arabic word *khalîfa* 'caliph'. The word, originally labelling the position of the unique, divinely justified political leader of the Islamic world, is evidently closely interwoven with the society's political reality, history, and the interests of leading figures in society. Similar key words in politics (and religion) frequently lead a fascinating semantic double life: while the content of the word is unofficially defined by interested and influential parties, official decisions can subsequently be justified with reference to the word's semantics, pointing out that the course of events proceeds 'true to the word'. Wasserstein's article offers a detailed and informed case study of this kind. We witness a case in which the clean distinction between meaning change and reference change, proposed at the beginning of this section, breaks down completely. The very emergence and the subsequent evolution of the notion and referents of *khalîfa* originates from human political activities, and linguists ordinarily refrain from investigating similar cases because they would lead them beyond the safe ground of their own methods and expertise. It is not surprising that the study of *khalîfa* is written by a historian rather than by a linguist, offering well-prepared material for semantic investigation.

Wasserstein's study raises several intriguing questions for the linguist. Are the changes in the use of the word under study changes of its meaning? Or is the variation in the use of *khalîfa* just a reflection of the polysemy inherent to the root *kh.l.f*, from which the word is derived? Or should the story of *khalîfa* be understood as a variation in elliptic usage? As can be gathered from Wasserstein's analysis, *khalîfa* 'deputy', 'successor' is a relational noun and the variation, at least in part, might correlate with elided material. Different answers could be envisaged, to a certain degree depending on the theoretical position adopted by the specific scholar. The contributions in the second part of the book will demonstrate the discrepan-

cies that can arise even in a formal semantic treatment of the meanings and meaning changes of ontologically extremely simple words like 'gold', 'water' or 'jade' (natural kind terms). The meaning and development of a word like *khalîfa* evidently exceeds such cases in complexity by several dimensions. It remains a challenging goal for semantic theory to account for the kind of variation documented in Wasserstein's contribution.

The case study of Kronenfeld and Rundblad on names for watercourses highlighted the interdependencies between economic interests and language use. Political and historical expertise were indispensable for an adequate account of *khalîfa* by Wasserstein. JUDITH MEINSCHAEFER's study *Words in discourse – On the diachronic lexical semantics of 'discours'* exemplifies yet another method of accessing earlier language stages. On the basis of a scrupulous analysis of historical texts, Meinschaefer offers a detailed account of the stages of use of French *discours*. The article takes its starting point from a careful philological evaluation of the use of *discours* in the works of Michel de Montaigne and Jean-Jacques Rousseau, counter-checked by lexicographic information in historical dictionaries. Yet, the strong linguistic background of the author leads her to new ground.

First, Meinschaefer's article goes beyond the unquestioned application of philological text analysis in that she offers justification for this method on the basis of a linguistic analysis of the contexts of use of the term under scrutiny. When we read and try to understand texts of the past, we are in fact confronted with a fundamental problem. Initially, all that contemporary readers have at their disposal is their semantic competence of the present day language. As their experience in reading historic texts increases, the readers may come to feel that they are acquiring a specific competence for older stages of the language. But how can we be sure that this is not just an illusion? Historians and literary scholars usually trust their intuition or appeal to the so-called hermeneutic method, which basically is a circular verification of interpretative consistency. Both positions are in contradiction with the analytical tradition to which modern linguistics is committed. Meinschaefer shows how a painstaking distributional analysis can help to make our understanding of word meanings in historical texts more transparent. The reader may decide whether this approach actually frees us from the hermeneutic method or merely makes that method seem more acceptable.

A second point of interest is tightly connected with the first. The domain of reference of the word under study, French *discours*, is entirely located in the realm of culture. This puts the topic of Meinschaefer's contri-

bution close to Wasserstein's, and it is revealing to compare the different approaches taken by the historian, the linguist and the scholar in literature (in part demonstrated in Meinschaefer's article). Of course, Kronenfeld and Rundblad's anthropological perspective (adequate for what one might call 'geographic kinds'), and the philosopher's interest in natural kind terms, exemplified by the articles of Rott and Haas-Spohn, mark other prominent positions in the landscape of historical word study. Ordinarily, linguists and philosophers prefer to study problems of lexical meaning with respect to words that denote artifacts or natural kinds. Meinschaefer bridges the apparent abyss by integrating the object of her study into an ontology familiar to semanticists: *discours* refers to a kind, more specifically, to a "cultural kind".

The third point of interest rests upon the second. Since *discours* refers to a cultural kind rather than to some irreducible aspect of intellectual life, Hilary Putnam's (1975) concept of division of labor can successfully be applied to the diachronic study of this word. In analogy to the definition of the meaning of *water* or *gold*, we must distinguish between the experts' meaning of *discours* and common usage. Meinschaefer investigates the writings of Michel de Montaigne and Jean-Jacques Rousseau who can justifiably be viewed as experts in the domain of cultural kinds, and even more as agents in the development of expert knowledge: both authors exert influence on the meaning of the word by restricting the previously existing amount of polysemy. Common usage then follows the experts' restrictions to some extent, but the speakers do not fully acquire the experts' knowledge. This may lead to further semantic innovations such as, in the case of *discours*, the emergence of a negative connotation in Modern French.

3.2. The meaning of meaning change

One of the major challenges for the historical semanticist consists in teasing apart changes in the world, changes in knowledge, and changes in meaning. This point was illustrated by several of the case studies in part one of the book, such as, for instance, Judith Meinschaefer's and David J. Wasserstein's papers which discuss closely interwoven changes in meaning and matter. The papers in the second part of the book illustrate that a clean, meaningful and empirically adequate distinction between meaning change, belief revision and reference change is anything but trivial, even if we con-

centrate our attention to a class of expressions that are semantically fairly simple.

The papers by Rott, Haas-Spohn and Eckardt address the meaning of natural kind terms and illustrate that different guiding questions will lead to different preferences with respect to the most appropriate semantic account. The working linguist will be most interested in an account of word meaning and change of meaning that reflects the empirical linguistic facts correctly and in a simple manner. In the philosophy of science, however, the question of language change is inextricably connected with the question of scientific progress: there is a shared belief that scientific progress typically means that we learn more about the *same* thing, referred to by a name with constant meaning. Only in exceptional cases would we admit that science underwent a paradigm change where not only knowledge, but the entire way of talking about a given subject has changed (see Kuhn 1962).

Yet, according to one commonly held view, the meaning of a word arises holistically from the entirety of speakers' world knowledge concerning that word (the position is discussed in detail in the contribution of Hans Rott). Obviously, this view comprises an unhealthy over-eagerness to diagnose a Kuhnian paradigm change whenever we acquire a new bit of knowledge about some term: in terms of this theory, scientific progress can only mean that we know *different* things about *different* notions rather than (as one would intuitively like to say) learning *more* about the *old* notions. The three contributions by Rott, Haas-Spohn and Eckardt demonstrate the tensions that arise between the linguistic and the philosophical perspective in addressing these issues.

HANS ROTT's contribution *Theoretical concepts in flux – Conceptual knowledge and theory change* investigated the relation between world knowledge and meaning. Rott recapitulates the classical insight that there seem to be two kinds of facts that can be reported with respect to a given word. A sentence like *bachelors are adult unmarried men* seems to report a fact about the meaning of *bachelor* and is tautological for anyone who can claim to master the word. In contrast, a sentence like *bachelors develop strange eating habits* reports an empirical fact about bachelors. Rott relates this distinction to the philosophical dichotomy between *analytic* and *synthetic* judgements. In a historical survey, he perspicuously traces the notions of *analyticity* and *syntheticity* in the works of Immanuel Kant, Gottlob Frege and William O. Quine. At least the former two philosophers developed these notions primarily on the basis of the example of mathematical truths (*analytic*) in contrast to scientific findings (*synthetic*), and it is a

challenging task to apply their notions to the case of truths *about* word meanings, in contrast to truths that are communicated *with* words (i.e. word meanings). Rott's summary not only offers a lucid overview for readers without a strong background in analytical philosophy, but it also brings to light the constant truths underlying the never-ending debate on the relation between analytic sentences and lexical knowledge, thus paving the way for his own proposal.

Rott approaches the classical distinction between analytic and synthetic statements on the basis of the techniques and methods of formal logic. More specifically, his account is formulated in terms of belief revision and theory change. Rott takes advantage of the fact that investigations into logic, model theory and nonstandard logics over the last decades have resulted in very clear, explicit and concise ways to distinguish *languages*, *interpretations*, *theories* and *theory change*. He proposes a systematic way to relate changes in language, changes in meaning, and changes in theory in a coherent and adequate manner. Following the classical method of indirect axiomatic characterization of the core properties of a given phenomenon, Rott explicates links between the property of *being an analytical statement*, *being stable under minor belief revisions* and the process of *major change of an epistemic state*. The resulting account is an indispensable gauge for any empirical diachronic investigation in areas where the history of language and the history of ideas are closely interwoven and hard to separate. Rott modestly restricts his attention to the meanings of words that are part of scientific discourse, but in the context of the overall volume, his theory gains impact in the stimulating confrontation with more demanding case studies such as those presented in part one.

With her contribution *Meaning change as character change*, ULRIKE HAAS-SPOHN takes a different line in the meaning representation of natural kind terms. She takes up the proposal of Putnam (1975) according to which the meanings of natural kind terms such as, for instance, *gold* or *water* are constituted by direct reference: any piece of gold will represent the entire extension of the kind, and naming a piece of gold *gold* will yield a name that refers to all and exactly this extension. Haas-Spohn reconstructs Putnam's account in terms of Kaplan's (1977) two-dimensional semantics, originally designed to capture the meaning of context-dependent words like *I*, *here*, and *now*. Haas-Spohn carefully recapitulates the core ideas and techniques of both works, thereby making her paper readily accessible to a wide readership with only elementary knowledge of logical semantics.

The most important advantage, Haas-Spohn proposes, lies in the fact that her account allows us to disconnect the link between identical reference and necessary identity of natural kind terms. She can explain why the insight that *"water is H_2O"* constituted a true piece of scientific progress at the time of discovery even though the natural kind terms *water* and H_2O are coextensional by logical necessity (following the original theory in Putnam 1975). Her proposal in fact conceives of language as an inherently historical entity and it amounts to making the respective natural language itself a context-dependent object. The meanings of words *can* change between earlier and later contexts of use. Scientific progress, according to her proposal, sometimes actually *does* amount to an adjustment of meaning, yet in a carefully circumscribed manner. Haas-Spohn's contribution hence offers a detailed and well-justified answer to the question "how do meanings arise and change?". She manages to capture central observations in language philosophy and the philosophy of science and offers a convincing synthesis of apparently conflicting standpoints.

The contribution *Meaning change in conceptual Montague semantics* by REGINE ECKARDT likewise relates to the seminal paper by Putnam (1975). However, she criticizes Putnam's referential theory of meaning in at least two respects. First, Eckardt insists that the account's narrow focus on natural kind terms, perhaps tolerable from the philosophical point of view, is untenably limited for linguistic purposes. Second, she argues that Putnam's theory forces one to adopt a counter-intuitive notion of meaning change. Looking at real word histories, the author demonstrates the discrepancies between meaning changes in an intuitive sense, and meaning changes in the terms of Putnam.

Eckardt agrees with Putnam that frequently, a word's meaning seems to be determined by ostensive reference to selected or prototypical exemplars of a kind. Yet, she maintains the view that 'natural kinds' should not be given a special status in the communicative practices of speakers. She proposes that natural kind terms in fact represent just another way of classifying the world into discrete categories and should not be treated in a separate theory of lexical semantics.

The author develops a theory of word meaning in which a word's meaning is established on the basis of reference to a typical exemplar *plus a mode of categorization*. The mode of categorization is determined relative to the interests, knowledge and needs of the interacting speakers. The interaction between referent and speakers' interests in establishing word meaning faithfully mirrors the findings of Kronenfeld and Rundblad who

illustrate this process in their empirical study of watercourse names. These examples, as well as others offered in the article, suggest that the resulting account can treat a major part of the lexicon of a language rather than being restricted to a limited class of words in the expert language of natural sciences.

The resulting theory retains Putnam's view that expert languages have a special status in the negotiation of meanings, but these experts are now coherently integrated into a uniform theory of word meaning. Putnam's stereotypes – his account for the ordinary man's kind of lexical knowledge – can likewise be located as an integral part of such an overarching theory of lexical meaning. This seems to be a more satisfactory perspective than Putnam's suggestion to treat stereotype knowledge as a secondary, inferior mode of meaning representation for the purposes of everyday language. Finally, Eckardt evaluates the account against the history of the word *jade* (and its Chinese predecessor), a real instance of language use and knowledge acquisition. The resulting picture is compared to Putnam's treatment of the case, pointing out that the philosopher's theory will necessitate a counter-intuitive extension of the notion of meaning change.

The two preceding papers are written against a common scholarly and terminological background and yet show two divergent strategies for reconciling semantic theory with the facts of historical developments. Reading either contribution against the background of the other, we see how the dialogue between historical semantics and analytical philosophy can highlight different aspects of the phenomenon under scrutiny, depending on the guiding research question. The philosopher will justifiably call to mind that there are certain indisputable fixed points in human thinking and reasoning that no semantic theory should weaken or blur. The linguist, in contrast, will want to exploit the systematic philosophical groundwork within a broader range of phenomena, and will use core philosophical insights to develop theories that render a less idealized picture of communicative reality.

3.3. The force of grammar

The articles in the first two parts of the volume focus mainly on language-external forces in meaning change. The third part comprises contributions that demonstrate how advanced grammatical and semantic theorizing conspires with expertise in discourse analysis, classical philology, and socio-

logical field research in the investigation of grammaticalization processes, language contact phenomena and reanalysis. These contributions introduce an additional level of compexity in that the authors have to keep track not only of words and their meaning but also of so-called functional elements, meaningful parts of the sentence that, moreover, play the syntactic-semantic role of joints between other parts of the sentence. Changes in meaning occur in coherence with changes in syntax, and the question of which one be the driving force is still unsettled. Case studies like the following hence rest on fully developed theories of morphology, syntax and semantics but also require philological expertise, sociolinguistic methods ans techniques of field research. Notably, studies about on-going language change like those of Breu and Günthner can, moreover, take advantage of the fact that the researchers are intimately acquainted with the social, historical, cultural and political situation of the contemporary speech communities under investigation. Consequently, we anticipate that future co-operation between linguistics and the neighboring disciplines in the field of grammaticalization research will lead to results of a new quality.

The contribution *Tense in time: The Greek perfect* by EVA GERÖ and ARNIM VON STECHOW is a study on a classical problem of historical linguistics. Addressing the evolution of the Greek perfect, the authors combine the methods of formal syntax and semantics with the philological knowledge of old texts. The formal representation of the meaning contribution of tense and aspect markers constitutes one of the core topics in formal semantic research, and older theories that rest on metaphoric circumscriptions of tense and aspect meanings have been replaced by systems that explicate tacit reference parameters and the complex cross-references between the temporal location of states and events that are lexicalized in tense and aspect systems in natural languages. The present article represents one of the first attempts to bring these results to bear on the investigation of language change, and the authors demonstrate an impressive co-operation between expertise in classical philology and semantic proficiency in the diagnosis and representation of aspect meanings.

As a result, their account offers more than just another way to represent the evolution of the Greek perfect. The authors trace the gradual generalizations and subtle shifts that lead from one language stage to the next and are able to explicate how minimal semantic changes, interacting with contextually driven adaptions of meanings and pragmatic inferencing, can result in considerable semantic shifts at the surface level. Gerö and Stechow's analysis also relates aspect marking in Old Greek to tense and

aspect marking in other languages; the authors explicitly refer to English, German and Swedish (the languages for which the authors' model of tense semantics was originally developed). The resulting picture allows us to combine a language internal view of the tense/aspect system of a given language with a more universal explication of a constant small set of parameters, notions and relations that underlie the tense systems of many languages.

We should also point out that Gerö and Stechow's contribution can be read at two levels. Readers with a background in semantics will appreciate this paper as an example of how the infelicitous separation of theory-oriented linguistics and classical philology may be overcome. Those readers who do not have this background, on the other hand, are not expected to take lectures in formal semantics in order to understand the paper. Informal summaries between formal parts allow an intuitive understanding of the authors' notion of 'Extended Now' and how it can help to resolve a much-debated puzzle in the history of Greek, and the more technical parts may be appreciated as the formal verification of the prose rendering of the account.

MIRIAM BUTT and WILHELM GEUDER's contribution *Light verbs in Urdu and grammaticalization* is, just like Gerö and von Stechow's study on the Greek perfect, an investigation which combines results of current linguistic theory with philological knowledge about a group of languages which is well documented over an extremely long period. The authors address the development of light verbs in Urdu and related contemporary and earlier Indo-Aryan languages. After a very careful introduction to the prosodic, syntactic and semantic characteristics that distinguish light verbs in Hindi and Urdu from auxiliaries and full lexical verbs, Butt and Geuder proceed to the question of whether Indo-Aryan light verbs are, as has been claimed, the result of an on-going process of grammaticalization. They observe that these verbs do not fit very well into the pattern known as the *grammaticalization cline*. In answer to this puzzle, they argue that the origin and the surprising stability of light verbs and their transparent relationship with phonologically and morphologically identical full verbs can be better explained by assuming lexical and syntactic variation based upon polysemy.

Whatever the status of light verbs with respect to grammaticalization eventually may be, it is clear that light verbs enter into a combination with the main verb that is syntactically, as well as semantically, much more intricate than what we know from common auxiliaries and tense constructions. A large part of the article focuses on the subtle interactions at the

syntax-semantics interface that allow the light verb to contribute to both argument structure and content of the overall construction in a way that derives semi-transparently from the original content verb. According to Butt and Geuder, the meanings of Indo-Aryan light verbs emerge by dropping one or more semantic features of the full verb in such a way that the verb can no longer describe an independent event. Light verbs contribute to the description of the event referent of the main verb in a way that can be compared to adverbial modifiers in languages like English or German. Yet, the interaction between main and light verbs is evidently of higher complexity in that the light verb and the lexical verb build up a shared argument structure. Butt and Geuder can show that the special nature of light verbs is also reflected by their behavior over time. In contrast to other pathways of verb grammaticalization, light verbs seem to mark a stable point in grammar; they remain unaffected by further change over millenia.

WALTER BREU's contribution *Bilingualism and linguistic interference in the Slavic-Romance contact area of Molise* presents a classical study of language change by language contact. He investigates the language contact situation in Molise (Southern Italy) between the Slavic dialect of a community of immigrants who entered Italy around 1500, and Italian. The study hence takes up the traditional theme of language change in a bilingual community that was a main topic even in Humboldt's time. However, while Humboldt and his contemporaries were still most concerned with the moral qualities of speakers and their languages, Breu's investigation focuses on the co-existence of two different conceptualizations of the world in the mind of the bilingual speaker. On the basis of data that were collected over several decades in the contact area, Breu has the possibility of tracing and documenting the pathways and limits of analogical levelling at all linguistic levels with a degree of detail that is beyond reach in the investigation of language change in classical languages.

In the Molise language community, Italian is the adstratum (or superstratum) language, while Molisian Slavic is the substrat language. Breu, illustrating his claim with well-chosen examples, proposes that bilingual speakers combine the two grammatical systems in the most economic way rather than using two different grammatical systems. He shows that if the two languages differ with respect to polysemy, speakers tend to level this distinction between the two systems in favor of a constellation in which both languages observe an isomorphic mapping between concepts and words. For instance, the Italian word *prima* 'first' and 'earlier' corresponds to two words in the Slavic dialect, namely *prvo* 'first' and *prije* 'earlier'.

While conservative speakers still carefully obey this distinction, the majority of current (bilingual) speakers use *prvo* for both meanings 'first' and 'earlier', corresponding to their use of Italian *prima*. Breu calls this change *polysemisation*. Extending the perspective to linguistic objects in general, Breu also considers interferences at the morphosyntactic level such as declension or the tense-aspect system and convincingly argues that the cause of a lexical or grammatical change in one language is often a parallel construction in the contact language. In reviewing numerous cases of adjustment between the two systems, Breu notes that there are certain intriguing restrictions: if the adstrat language Italian has more words for a semantic field than Molisian Slavic, i.e. if Italian is more differentiated, he rarely observes a levelling process with respect to a higher differentiation of Molisian Slavic and innovation of new forms.

Breu finally traces the innovation of functional elements such as articles, and his findings bring to light yet another factor motivating words to undergo grammaticalization. Breu notes that the development of an indefinite article in Molisian Slavic is also covered by polysemisation. The indefinite article *na* 'one' is developing from the homonymous numeral parallel to the Italian pattern, where the indefinite article *uno, una* has the same form as the numeral for 'one' *uno, una*. Molisian Slavic indeed exploits a potential polysemy of the word denoting 'one' rather than building up a full article system in analogy to the Italian superstratum. This, Breu points out, is proved by the fact that Molisian Slavic has not developed a definite article: in Italian, the definite article and the demonstrative are quite different forms and offer no basis for transfer. This shows that the coexistence of similar linguistic forms with different functions has not only a special function language internally, as demonstrated by Günthner for German conjunctions and by Butt and Geuder for Urdu light verbs, but it is also a driving factor in interference between two contact languages.

Finally, SUSANNE GÜNTHNER's contribution is a detailed account of an on-going process of meaning change. In her article *Lexical-grammatical variation and development: The use of conjunctions as discourse markers in everyday spoken German*, Günthner argues that the conjunctions *weil* 'because' and *obwohl* 'although' have grammaticalized into discourse markers. She discusses conversational data from colloquial German collected in the last 30 years and proves that the variations in the use of *weil* and *obwohl* are not – as prescriptive school grammars would have it – due to mistaken or erroneous language use. To the contrary, Günthner shows that two homophonic variants of *weil*, a discourse marker variant and a

conjunction variant, can be clearly distinguished by their different meanings, scope properties, prosodic behavior, syntactic behavior as well as pragmatic implications. A similar distinction is demonstrated for *obwohl*.

The most prominent difference is that the conjunction *weil* introduces a subordinated verb final sentence (*... weil er Grippe hat* '... because he has flu') while the discourse marker *weil* introduces an independent verb-second sentence (*... weil (-) sie läuft total deprimiert durch die Gegend* '... because (-) she is walking around looking totally depressed'). The conjunction *weil* is prosodically integrated into the main clause, while the discourse marker *weil* constitutes its own prosodic phrase. In terms of semantics, co-ordinating *weil* offers a cause for the truth of the fact denoted by the main clause whereas the discourse marker offers the reason *why* the speaker makes the assertion in the other clause. More subtle semantic distinctions can be drawn regarding the scope interaction of *weil* and negation. Finally, the author shows that there is a small closed lexical class of conjunctions with similar behavior (*weil, obwohl, während, wobei*). The descriptive part of Günthner's article demonstrates impressively that a detailed linguistic analysis of different uses of a word can elucidate grammatical systematicity and structure in cases where schoolgrammars retreat to a simple black-and-white picture.

While Günthner's work includes a valuable linguistic description of a piece of present day German grammar, the true merits of the article lie in its developmental perspective. The analysis is based on a corpus of spoken dialogues of colloquial German spanning 30 years which allows minimal intermediate steps in the development to be traced. We hence have the fascinating possibility of witnessing an on-going language development. It has frequently been noted (see Janda 2001: 316f. and references therein) that the investigation of contemporary language variation and change has several considerable advantages over the investigation of past changes. Not only can the researcher gather data with a degree of detail that can practically never be achieved in written corpora,[8] but we also have the possibility of eliciting negative judgements (ungrammaticality, unintelligibility, inappropriateness). Most importantly, the investigating linguist is acquainted

---

[8] Note that even corpora of present day language are in most cases restricted to specific kinds of texts, mostly newspapers. Only the internet offers resources that come close to spoken colloquial language, but it seems unclear whether advances in technology will be conservative and retain written web texts long enough to turn them into a useable resource for diachronic research.

with the non-linguistic context of variation to a degree that would require the work of several specialists if it were to be reconstructed for earlier language stages.

We, as well as the quoted scholars, do not suggest restricting attention to current variation and giving up interest in earlier changes altogether. Only under a long-term perspective can we single out and understand the equilibria of grammatical systems (like the tense/aspect system that emerged in the process described by Gerö and Stechow). Only the long-term perspective reveals the points of inertia (like the light verbs considered in Butt and Geuder). Only under a long-term perspective can general trends in conceptual variation become visible (like those documented by Breu). Only the long-term perspective allows us to single out stable systems of categorization in the tension between 'natural' properties and 'relevant aspects' of the objects in our environment (as in the case of semantic field of watercourse names in English, presented by Kronenfeld and Rundblad). Similarly, it is only Günthner's experience in the long-term perspective that allows her to name the lasting trends emerging from her data. Studies in on-going language variation and change, however, will set new standards for the level of finegrainedness of further investigations into past language variation and language history. This highlights the pressing need for the diachronic linguist to cooperate with experts in the humanities, history, psychology, cultural sciences and anthropology in order to achieve equally detailed descriptions and evaluations of past language changes.

The present volume aims at provoking this kind of co-operation by presenting, and hence drawing attention to, investigations into meaning change conducted under different perspectives. We present in-depth studies illustrating the scholarly perspective of different disciplines that all pertain to meaning change. All are written by professional researchers in their field, exemplifying their methods, assumptions and results. Several contributions are the result of interdisciplinary co-operation of two authors, or of a single author with strong support from external consultants. More interestingly though, we see various clusters of articles which, in synopsis, highlight particular questions about meaning change which, in turn, reveal their full depth only under a multidimensional perspective. The collection will hence increase sensitivity of points of mutual exchange and beneficial dovetailing of different fields. Historical semantics is a research field that offers, and also requires, different points of view. Only if it is conducted in this spirit can it reveal to the scholar the best that it has to offer.

References

Benveniste, Émile
   1960   *Problèmes de linguistique générale.* Paris: Gallimard.
Black, Michael
   1962   Metaphor. In *Models and Metaphors*, Michael Black (ed.), 25–47.
             Ithaca, NY: Cornell University Press.
Blank, Andreas
   1997   *Prinzipien des lexikalischen Bedeutungswandels am Beispiel der*
             romanischen Sprachen. (Beihefte zur *Zeitschrift für Romanische*
             Philologie 285). Tübingen: Niemeyer.
Blank, Andreas and Peter Koch (eds.)
   1999   *Historical Semantics and Cognition.* Berlin/New York: Mouton de
             Gruyter.
van Borries, Ernst and Erika van Borries
   1991   *Deutsche Literaturgeschichte.* Vol. 1. *Mittelalter, Humanismus, Re-*
             formationszeit, Barock. München: Deutscher Taschenbuch Verlag.
Bréal, Michel
   1900   *Essai de sémantique: Science des significations.* Paris: Hachette.
             Transl. in *Semantics: Studies in the Science of Meaning*, Michel
             Bréal, 1964. New York: Dover Publications.
Bybee, Joan, Revere Perkins, and William Pagliuca
   1994   *The Evolution of Grammar.* Chicago: The University of Chicago
             Press.
Campbell, Lyle and Josef Janda (eds.)
   2001   Grammaticalization: A critical assessment. *Language Sciences* 23:
             2–3.
Coseriu, Eugenio
   1964   Pour une sémantique diachronique structurale. In *Travaux de lin-*
             guistique et de littérature 2 (1), 139–186.
Coseriu, Eugenio, Gunter Narr, and Erich Brauch
   1970   *Einführung in die strukturelle Betrachtung des Wortschatzes.* Tübin-
             gen: Spangenberg.
Devitt, Michael and Kim Sterelny
   1999   *Language and Reality: An Introduction to the Philosophy of Lan-*
             guage. 2nd ed. Oxford: Blackwell.
Dietze, Walter
   1963   *Quirinus Kuhlmann, Ketzer und Poet.* Berlin: Rütten und Loenning.
Diewald, Gabriele
   2002   A model for relevant types of contexts in grammaticalization. In *New*
             Reflections on Grammaticalization, Ilse Wischer and Gabriele
             Diewald (eds.), 103–120. Amsterdam/Philadelphia: John Benjamins.

Dirven, René and Marjolijn Verspoor
    1998   *Cognitive Exploration of Language and Linguistics.* Amsterdam/
              Philadelphia: John Benjamins.

Eckardt, Regine
    2001   Reanalysing 'selbst'. *Natural Language Semantics* 9: 371–412.
    2003   *The Structure of Change. Meaning Change under Reanalysis.* Ha-
              bilitationsschrift, ZAS, Berlin and Humboldt University, Berlin.

Frege, Gottlob
    1879   *Begriffsschrift.* Halle an der Saale, 1879. Reprinted in Ignacio An-
              gelelli (ed.), *Begriffsschrift und andere Aufsätze.* Hildesheim: Olms
              (1964). Engl. version. transl. and edited by Jean van Heijenoort and
              Kurt Gödel. Cambridge, Mass.: Harvard University Press.

von der Gabelentz, Georg
    1891   *Die Sprachwissenschaft: Ihre Aufgaben, Methoden und bisherigen
              Ergebnisse.* Leipzig. Reprint. Tübingen: Vogt, 1969.

Geeraerts, Dirk
    1997   *Diachronic Prototype Semantics: A Contribution to Historical Lexi-
              cology.* Oxford: Clarendon Press.

Giacalone Ramat, Anna and Paul Hopper
    1998   *The limits of grammaticalization.* (Typological studies in language
              37). Amsterdam: Benjamins.

Heine, Bernd
    2002   On the role of context in grammaticalization. In *New Reflections on
              Grammaticalization,* Ilse Wischer and Gabriele Diewald (eds.),
              83–102. Amsterdam/Philadelphia: John Benjamins.

Heine, Bernd, Ulrike Claudi, and Friederike Hünnemeyer
    1991   *Grammaticalization: A Conceptual Framework.* Chicago: The Uni-
              versity of Chicago Press.

Hopper, Paul J. and Elizabeth Closs Traugott
    1993   *Grammaticalization.* Cambridge: Cambridge University Press.

von Humboldt, Wilhelm
    1827–29 Über die Verschiedenheiten des menschlichen Sprachbaues. In *Wil-
              helm von Humboldts Werke.* Vol. 6, Albert Leitzmann (ed.),
              111–303. Berlin: B. Behr's. Photomechanic Reproduction. Berlin: de
              Gruyter, 1968; [1907].

Indurkhya, Bipin
    1992   *Metaphor and Cognition: An Interactionist Approach.* Dordrecht:
              Kluwer Academic Publishers.

Jackendoff, Ray
    1998   Why a conceptualist view of reference? A reply to Abbott. *Linguis-
              tics and Philosophy* 21 (2): 211–220.

Janda, Richard D.
    2001   Beyond "pathways" and "unidirectionality". On the discontinuity of language transmission and the counterability of grammaticalization. In *Grammaticalization: A Critical Assessment. Language Sciences* 23 (2–3), Lyle Campbell and Richard D. Janda (eds.), 265–340.

Kadmon, Nirit
    2001   *Formal Pragmatics: Semantics, Pragmatics, Presupposition, and Focus.* Malden, MA: Blackwell.

Kamp, Hans and Uwe Reyle
    1993   *From Discourse to Logic: Introduction to Modeltheoretic Semantics of Natural Language, Formal Logic and Discourse Representation Theory.* Dordrecht: Kluwer.

Kaplan, David
    1977   "Demonstratives". In *Themes from Kaplan*, Joseph Almog, John Perry, and H. Wetterstein (eds.), 481–563. Oxford, 1989.

Keller, Rudi
    1998   *A Theory of Linguistic Signs.* Oxford: Oxford University Press.

Kiefer, Ferenc
    2001   Recent developments in historical semantics. In *Semantica e lessicologia storica. Atti del XXXII Congresso Internazionale di Studi, Budapest, 29–31 ottobre 1998*, Zsuzsanna Fábián and Giampaolo Salvi (eds.), 13–24. Rome: Bulzoni.

Koch, Peter
    2001   Metonymy: Unity in diversity. *Journal of Historical Pragmatics* 2 (2).

Kuteva, Tania
    2001   *Auxiliation: An Enquiry into the Nature of Grammaticalization.* Oxford: Oxford University Press.

Kuhn, Thomas S.
    1962   *The Structure of Scientific Revolutions.* Chicago: Chicago University Press.

Lahiri, Aditi, Alexander Patschovsky, and Christoph Schwarze
    1999   *Issues in Interdisciplinary Research on the Lexicon.* Arbeitspapier Nr. 99, Department of Linguistics, University of Konstanz.

Lakoff, George and Mark Johnson
    1980   *Metaphors we Live by.* Chicago: The University of Chicago Press.

Lehmann, Christian
    1982   Thoughts on Grammaticalization. In print Munich: Lincom (1995).

Mey, Jacob L.
    2001   *Pragmatics: An Introduction.* 2nd ed. Oxford/Malden, MA: Blackwell.

Meillet, Antoine
    1925   La méthode comparative en linguistique historique. Oslo: Asche-
            houg. Transl. in *The comparative method in historical linguistics*.
            Paris: Champion, 1970.

Montague, Richard
    1974   *Formal philosophy: Selected papers of Richard Montague*. Rich-
            mond H. Thomason (ed.). New Haven: Yale University Press.

Pagliuca, William
    1994   *Perspectives on grammaticalization*. Amsterdam/Philadelphia: Ben-
            jamins.

Paul, Hermann
    1880   *Principien der Sprachgeschichte*. Halle: Niemeyer.

Plank, Frans
    1991   Hypology, typology: The Gabelentz puzzle. *Folia Linguistica* 25
            (3–4): 421–458.
    2001   Language typology, language classification, and the search for uni-
            versals. In *History of the Language Sciences*. Vol. 2, Sylvain
            Auroux, E.F.K. Koerner, Hans-Josef Niederehe, and Kees Versteegh
            (eds.), 1399–1414. Berlin: Mouton de Gruyter.

Pustejovsky, James
    1995   *The Generative Lexicon*. Cambridge, MA: MIT Press.

Putnam, Hilary
    1975   The Meaning of 'Meaning'. In *Mind, Language and Reality: Phi-
            losophical Papers*. Vol. 2, Hilary Putnam (ed.), 215–271. Cam-
            bridge: Cambridge University Press.

Stern, Gustaf
    1931   *Meaning and Change of Meaning: With Special Reference to the
            English Language*. (Acta Universitatis Gothoburgensis 38,1.) Goete-
            borg: Elander[Dr.].

Sweetser, Eve E.
    1990   *From Etymology to Pragmatics: Metaphorical and Cultural Aspects
            of Semantic Structure*. (Cambridge studies in linguistics 54.) Cam-
            bridge: Cambridge University Press.

Trabant, Jürgen
    1990   *Traditionen Humboldts*. Frankfurt/Main: Suhrkamp Taschenbuch
            Wissenschaft.

Traugott, Elizabeth Closs and Richard B. Dasher
    2002   *Regularities in Semantic Change*. Cambridge: Cambridge University
            Press.

Traugott, Elizabeth Closs and Bernd Heine (eds.)
    1991   Approaches to Grammaticalization. Amsterdam/Philadelphia: John
            Benjamins.

Traugott, Elizabeth Closs and Ekkehart König
    1991   The semantics-pragmatics of grammaticalization. In *Approaches to grammaticalization*. Vol. 1, Elizabeth C. Traugott and Bernd Heine (eds.), 189–218. Amsterdam/Philadelphia: John Benjamins.

Trier, Jost
    1931   *Der Deutsche Wortschatz im Sinnbezirk des Verstandes. Die Geschichte eines sprachlichen Feldes.* Vol. 1: *Von den Anfängen bis zum Beginn des 13. Jahrhunderts.* Heidelberg: Winter.
    1973   *Aufsätze und Vorträge zur Wortfeldtheorie.* Anthony van der Lee (ed.). The Hague: Mouton.

Ullmann, Stephen
    1967   *The Principles of Semantics.* Oxford: Blackwell.

Wischer, Ilse and Gabriele Diewald
    2002   *New Reflections on Grammaticalization.* (Typological Studies in Language 49.) Amsterdam/Philadelphia: John Benjamins.

A. Changing believes, diversifying worlds, and flexible meanings