

Beyond Language Boundaries

Beyond Language Boundaries

Multimodal Use in Multilingual Contexts

Edited by

Marta Fernández-Villanueva and Konstanze Jungbluth

DE GRUYTER

This volume was sponsored by the German Academic Exchange Service (DAAD) with funds of the German Federal Foreign Office (AA), and supported by the *Europa-Universität Viadrina* (EUV) in Frankfurt (Oder) and the *Universitat de Barcelona* (UB). We proudly recognize the collaboration of the Study Group of Pragmatics and Discourse Analysis (GrEPAD), and the Study Group of Variation (GEV) at the Department of Catalan Philology of the University of Barcelona, together with the Faculty of Cultural and Social Sciences at the the European-University Viadrina in Frankfurt (Oder).

DAAD



Auswärtiges Amt



EUROPA-UNIVERSITÄT
VIADRINA
FRANKFURT (ODER)



ISBN 978-3-11-045640-0

e-ISBN [PDF] 978-3-11-045881-7

e-ISBN [EPUB] 978-3-11-045654-7

Library of Congress Cataloging-in-Publication Data

A CIP catalog record for this book has been applied for at the Library of Congress.

Bibliographic information published by the Deutsche Nationalbibliothek

The Deutsche Nationalbibliothek lists this publication in the Deutsche Nationalbibliografie; detailed bibliographic data are available on the Internet at: <http://dnb.dnb.de>.

© 2016 Walter de Gruyter GmbH, Berlin/Boston

Cover image: Maksymowicz/iStock/thinkstock

Typesetting: jürgen ullrich typesatz, Nördlingen

Printing: CPI books GmbH, Leck

☺ Printed on acid-free paper

Printed in Germany

www.degruyter.com

Introduction

The fascinating topics of multilingualism and multimodality in language use overlap in a number of ways. Where native speakers and learners of the shared language are conversing, multimodal means – including gestures – are used frequently. Furthermore, co-constructions may be observed, even across languages. Distributed among one, two or even more speakers, they expand from one-word contributions of the interlocutor to complex constructions of bilingual talk that connects several turns.

Our project funded by the DAAD (German Federal Foreign Office) as part of the *Hochschuldialog mit Südeuropa* brought together experts and young researchers from Barcelona and Frankfurt (Oder), research teams belonging to the *Universitat de Barcelona* (UB) and the European University Viadrina (EUV), along with experts from Italy and abroad. Catalunya provides an instructive example of Europe becoming multilingual, where citizens find ways to achieve competence in several languages, and to use and combine them in a natural way every single day. The readers may compare this case with other multilingual societies in Europe, younger ones such as on the German-Polish border or elsewhere, and with others in America which are discussed in this volume.

Several of the involved researchers specialize in German, some in Romance Languages, some take a more theoretical approach, while others prefer to develop their theses from empirical data. These data have a multimodal nature, which is shown in the fragments of the included transcriptions. The context of trilingual Catalunya where Catalan and Spanish beside of English is spoken by most of its citizens today served as meeting place and background. The rich research developed on their language choices and multilingual practices there combined with the perspectives on language use in plurilingual societies in Europe and America unfolded in Germany triggered heated debates. Contrary to what one might think, the widely differing backgrounds among the researchers served to enrich our fantastic experiences during two years of joined research. We are happy to share with our readers the most exciting themes to follow in search of answers to hitherto open theoretical and empirical questions.

The studies in this volume bring together three perspectives on the topic, and draw several links between them: research on multimodality, on second language (L2)/foreign language acquisition and on plurilingual language use performed by multilingual speakers. Some of the studies address the integration of gestures, language contact and multimodal aspects into grammar (Alturo, Clemente, Payrató, Tapia Yepes), while others unfold pragmatic aspects (Schmidt, Tessendorf, Zinkhahn Rhobodes). We remember that one of the foci is on language use and acquisition including code-switching, discourse markers and argument structure

(Isaeva, Mestre, Cuenca); finally, deixis, co-construction (Da Milano, Jungbluth) and acts of identity (Haid, Peters, Repiso) are discussed.

The content is divided into two parts. The first connects the chapters on Multimodal Language Use and the other one the contributions on Language Use in Multilingual Contexts. The titles already indicate the theme shared by all of them. These chapters have also in common that they all draw on empirically collected corpus data of spoken language use.

Alturo, Clemente and Payrató show how multimodal signs should be integrated into the model of Functional Discourse Grammar based on pragmatics. In doing so, multimodal signs – including prosody, facial expressions and gestures, and the combinations of (linguistic) signs belonging to different languages or varieties of a language used by multilingual speakers – can form part of one and the same grammar. Observing actions as sources of gestures, Tessendorf focuses on the example of the “brushing-away gesture”. Performed in Spanish and German conversations, among others, she discusses the capacity of this gesture to undergo metaphorical and metonymic transfer with the aim of expressing the intended meaning.

Tapia, Schmidt and Isaeva build their research on corpora of German spoken language. The first of them analyses the multimodal use of the motion verbs *kommen* and *gehen*, intertwined with a shift of the underlying argument structure and the gestural deixis. While Schmidt’s primary interest is comparing the proxemics in greetings and farewells between German and Spanish and their implications for second language learning, Isaeva analyzes learners of German focusing on the use of their gestures when searching for lexical items in their L2. Repiso uses multimodal cues and language choices to explore positionings in discourse and identity construction of multilingual teachers of German in Catalonia to challenge the idealized native speaker paradigm.

The second part is introduced by Jungbluth. Her multilingual data shows various kinds of co-constructions ranging from the lexicon to grammar, from input of single words by the interlocutor to the extension of already-completed sentences. The following two contributions analyse data embedded in the context of migration which urges the expression of identity. Da Milano observes, compares and interprets the deictic strategies found in her data rooted in migration contexts. Another consequence of migration may have been language attrition, which is the subject of Peters’ study. She shares with Da Milano her interest in the construction of social identity, investigating the language attitudes of two multilingual and multicultural L1 attritors. Mestre and Cuenca focus on the use of connectives and language choice in Catalan Parliamentary Debates.

The contribution of Zinkhahn Rhobodes analyses language contact phenomena between German and Polish, a lesser studied language pair. Despite the fact

that the structures of the Slavonic and Germanic language do not have many aspects in common, bilingual speakers do create mixed expressions. They may be stylized or conventionalized by young people flagging their groupness. Similar functions are observed by Haid, who studies code-switching used in modern political speeches by Putin, Obama and Merkel. Finally, Collins describes convergence and divergence of Global English spoken by L1 speakers living in the multilingual society of Luxembourg.

The outcome of the different perspectives is, on the one hand, a move toward answers to some important theoretical questions: How does one include multi-modal signs in grammar? Does crossing blur language borders? How do migrants express their changing identities? On the other hand, the studies show the different strategies and forms of language use put into practice by multilingual speakers, explore their language attitudes, and examine plurilingual speech acts and identity constructions beyond language boundaries.

We gratefully thank the two Universities and all the people involved at the academic and administrative levels for their engagement in this joint endeavour. Furthermore, without the strong commitment of our students Tininizka Zanger Montoya, Janosch Leugner and Lukas Wegenast, who joined our team at different points along the way, the aims of our project would not have been reached on time. Todd Ehresmann proofread some of the chapters, as did Maggie Peters. Last but not least, we felt warmly accompanied by Christine Henschel at all times, sharing ups and downs all along the way toward publishing our book.

Konstanze Jungbluth, Frankfurt (Oder)
 Marta Fernández-Villanueva, Barcelona
 April 2016

Table of Contents

Introduction — V

First part: **Multimodal Language Use**

Núria Alturo, Ignasi Clemente and Lluís Payrató

Notes for a Multilingual and Multimodal Functional Discourse Grammar — 3

Sedinha Tessendorf

Actions as Sources of Gestures — 34

Eduard Tapia Yepes

Argument Structure Shift for German Dynamic Verbs *gehen* and *kommen* in Situated and Embodied Communication — 55

Sarah Schmidt

Proxemics of Greetings and Farewells in Spanish and German — 73

Elena Isaeva and Marta Fernández-Villanueva

Gestures and Lexical Access Problems in German as Second Language — 93

Gemma Repiso i Puigdelliura and Marta Fernández-Villanueva

Analysing German Teachers' Identities through Multimodal and Multilingual Use — 114

Second part: **Language Use in Multilingual Contexts**

Konstanze Jungbluth

Co-Constructions in Multilingual Settings — 137

Federica Da Milano

Deictic Strategies as Expression of Identity — 153

Martí Mestre and Maria Josep Cuenca

Use of Connectives and Argumentation in Catalan Parliamentary Debate — 162

Maggie Anne Peters

Language Attitudes and Identity Construction

A Case Study Among Two L1 Attritors — 179

Dagna Zinkhahn Rhobodes

Crossing and Blurring the Language Borders

The Example of German-Polish Language Contact — 200

Janett Haid

“Yes we can! – Sí se puede!”

Speaking the Language of the Masses. Codeswitching for Creating
Togetherness with a Foreign Audience in Political Speeches — 221

Carly Collins

Global English and Multilingual Luxembourg

A Case Study of Native English Speakers — 235

Index — 251

First part: **Multimodal Language Use**

Núria Alturo, Ignasi Clemente, Universitat de Barcelona, and
Lluís Payrató, Hunter College, City University of New York

Notes for a Multilingual and Multimodal Functional Discourse Grammar

Abstract: In this chapter, we argue that Functional Discourse Grammar (FDG), with any adjustments that may be required, can constitute a useful model to explain grammatical phenomena associated with speakers' multilectal and multimodal communicative competence. In particular, we present two working hypotheses of how multilingualism and multimodality may be articulated within a FDG grammatical model: (1) languages known by the speaker provide the language-specific primitives and operators that allow the language mixing and switching operations; and (2) speech and gesture share the same primitive frames and templates, and work together in an integrated manner, in the operations of formulation, encoding and decoding. Our evidence suggests that there is a high degree of integration of language systems (verbal grammars) and modes (verbal and non-verbal), and that the contrast between primitives (which may keep the specificity of the languages and the modes involved) and levels of representation (which are specific of each multilingual and multimodal grammar) is a promising perspective to consider in future research.

Keywords: Functional Discourse Grammar (FDG), primitives, operators, levels of representation, multilingual grammar, multimodal grammar

1 Introduction¹

Formal linguistics has traditionally viewed grammar as a system with an ideal speaker-hearer, who is a member of a homogenous community, and who exclusively communicates verbally. Such view of grammar has resulted in a focus on speaker competence and in the neglect of multiple aspects of performance. Pragmatics has often become a “grammatical bin” in which multiple linguistic variation phenomena that are considered speech-related, not systematic enough,

¹ We thank the comments of editors and reviewers of this volume, and also the kindness of Kasper Kok, who allowed us to read his work in press. Our work is part of the research projects FFI21011-25236/FFI2014-56258-P (Ministerio de Ciencia e Innovación) and 2014SGR918 (Generalitat de Catalunya).

and not worthy of attention, are thrown in. However, it is difficult to adhere to this view of grammar for a number of reasons. First, research on multilingualism has documented phenomena such as cross-linguistic transfer and code-mixing and code-switching competences, the development of an interlanguage among second language learners, and the creation of pidgins and creoles. Second, research on multimodal language use has revealed that meaning-making is not an exclusive verbal process, but a process that involves different modalities and communicative means that are used simultaneously with talk; for instance, prosody, facial expressions, and manual gestures.

The goal of this chapter is to show that a pragmatically-based Functional Discourse Grammar (FDG) requires an architecture – understood as a structure of frames, figures, and constituents – that is broad enough to include multimodality, multilingualism, multidialectalism, and even the multilectalism that results from combining different registers. Although the grammatical model proposed by FDG restricts what is considered grammatical to those verbal aspects of a language that have systematic codification (Hengeveld and Mackenzie 2008), it acknowledges that communicative performance is nonetheless heterogeneous and variable: communicative interaction is the result of converging discourse modalities (e.g., verbal, vocal, and gestural), and grammars (e.g., languages, dialects, and registers). Thus, a general theory of communication should be able to explain a speaker's *pragmatic competence*, that is, the set of competences that lies between a grammatical competence understood in a strictly Chomskyan sense, and a *sociocultural and cognitive communicative competence* understood in a wide-ranging sense. We believe that a functional grammar like FDG, with any adjustments that may be required, can constitute a useful model to explain grammatical phenomena associated with speakers' multilingual and multimodal abilities.

In the sections below, we suggest that FDG may provide an adequate framework to build a model of a multilingual and multimodal grammar. In particular, we introduce two working hypotheses of how multilingualism and multimodality may be articulated within a FDG grammatical model: (1) languages known by the speaker contribute the language-specific primitives that allow the language mixing and switching operations of Formulation, Morphological Encoding, and Phonological Encoding; and (2) while the separation between speech and gesture in grammar is limited to the primitive forms and operators available, speech and gesture share the same primitive frames and templates, and work together in an integrated manner, in the operations of formulation, encoding and decoding. With an exploratory goal, we present and discuss these hypotheses, which will need to be confirmed in subsequent empirical work.

2 FDG as a model of grammar and levels of adequacy

FDG has its origins in Dik's Functional Grammar (Dik 1997a, 1997b). By the beginning of the 21st century, FG scholars began to discuss the limitations of the model, including its criteria of adequacy to psychological, sociocultural and most importantly discourse aspects. The result of those discussions was an advancement of FG and the adoption/development of a new model called Functional Discourse Grammar (FDG).²

2.1 FDG main features

FDG is a functional, structural and typologically-based theory of grammar. As a functional grammar, it aims at explaining how the ideas and intentions of individuals are formulated and encoded through the grammar of a particular language. It deals, first of all, with pragmatics, semantics, morphosyntax and phonology in grammar; but it acknowledges that grammar cannot be adequately explained without considering its interaction with the non-grammatical aspects of human communication (Hengeveld and Mackenzie 2008; Keizer 2014, 2015). Thus, FDG is thought as the Grammatical Component of a wider theory of verbal interaction, where it interacts with a Conceptual Component, a Contextual Component, and an Output component. As Figure 1 shows, this is a top-down model, working down from the Speaker's prelinguistic conceptual information and communicative intention to acoustic, orthographic, or signed output, including systematic gesture in speech and other nonverbal aspects of multimodal discourse. The basic unit of analysis is not the Sentence or the Clause, but the Discourse Act, that is, the unit that expresses the communicative intention. Besides, the model captures the role of discourse context and situational context (physical and social) in the production of a linguistic expression (Alturo et al. 2014; Connolly 2013; Connolly 2014; Cornish 2009; Rijkhoff 2008).

² For a more detailed account of FDG see Hengeveld and Mackenzie (2008), Mackenzie and Olbertz (2013), Keizer (2015), and the monographic volumes on the Interpersonal Level (Van Staden and Keizer 2009), the Representational Level (Hengeveld and Wanders 2009), the Morphosyntactic Level (Hengeveld and Wanders 2009), and the interaction between context and grammar in FDG (Alturo, Keizer and Payrató 2014). More information and updated bibliography on FDG can be found at www.functionaldiscoursegrammar.info.

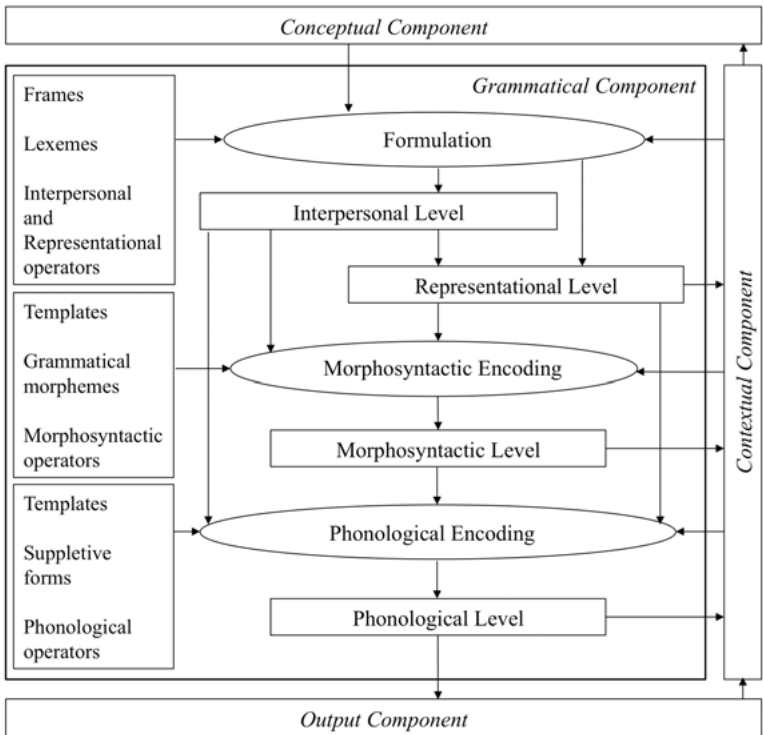


Figure 1: General layout of FDG

FDG is, also, a structural model of grammar. It analyses the linguistic representation of Discourse Acts at all levels of grammar, which allows it to account not only for clauses and sentences, but also for units smaller and larger than the clause; that is, interjections, incomplete sentences and sequences of sentences. There are four levels of grammatical organization: two levels of Formulation (the Interpersonal Level and the Representational Level), and two levels of Encoding (the Morphosyntactic Level and the Phonological Level). Furthermore, the operations of Formulation and Encoding are fed by a number of primitives: a list of possible structures (frames, templates), forms (lexemes, grammatical morphemes, suppletive forms) and operators relevant for each level (interpersonal, representational, morphosyntactic and phonological operators). Primitives play a main role in our proposal, and they will be further commented in sections 4 and 6.

The Interpersonal (IL) and the Representational (RL) levels are the outputs of pragmatic and semantic Formulation. The Morphosyntactic (ML) and the Phonological (PL) levels specify the exact way in which the pragmatic, rhetorical and semantic material is encoded. Each of these four levels is hierarchically organized

in various layers. For instance, the structure of the IL is formed by a number of layers: Move, Discourse Act, Illocution, Participant, Communicative Content. These layers, as well as the layers of RL, ML and PL, have the general structure represented in (1), where α represents a variable that is restricted by a head, π an operator representing grammatical information, and σ a modifier providing lexical optional information.

$$(1) (\pi_1 \alpha_1: [\text{head}] (\alpha_1): \sigma_1 (\alpha_1))$$

A simplified representation of the hierarchical structure of the grammar levels is given in (2), which we explain below. Within a particular level, each layer has its own set of operators, functions, and potential modifiers, which are not considered in the example.

$$(2) \text{ Plou 'it rains' (Catalan)}$$

| | |
|-----------------------------|--|
| Interpersonal Level (IL) | (M ₁ : (A ₁ : (F: DECL (F)) (P ₁)S (C ₁ : (T ₁) (C ₁)) (A ₁)) (M ₁)) |
| Representational Level (RL) | (p ₁ : (present ep ₁ : (e ₁ : (f ₁ : ploure (f ₁)) (e ₁)) (ep ₁)) (p ₁)) |
| Morphosyntactic Level (ML) | (Le ₁ : (Cl ₁ : (Vp ₁ : (Vw ₁ : ploure-prs.ind.3.sg (Vw ₁)) (Vp ₁)) (Cl ₁)) (Le ₁)) |
| Phonological Level (PL) | (U ₁ : (IP ₁ : (PP ₁ : (PW ₁ : (F ₁ : (S ₁ : /plɔw/ (S ₁)) (F ₁)) (PW ₁)) (PP ₁)) (IP ₁)) (U ₁)) |

The Move (M), at the Interpersonal Level, is considered the minimal free unit of discourse and the largest unit of interaction relevant to grammatical analysis (Hengeveld and Mackenzie 2008). Any Move may contain one or several Discourse Acts (A), which realize a communicative intention or Illocution (F) (declarative or informative in example 2), with at least one Participant³ (P) (the Speaker in 2), and the content that the Speaker wants to evoke (the Communicated Content, C). The term Communicative Content does not refer, in FDG, to the semantic content that the Speaker wishes to communicate, but to the sum of acts of Reference (R) to an entity and Ascription of a property (T) that are performed by the Speaker in a Discourse Act.

At the Representational Level, the highest layer of the hierarchy is the Propositional Content (p), that is, the mental construct of the idea being communicated. By contrast to Communicated Contents, which are *actions* bounded by

³ Inner talk might be a case of one participant only; although, in general, the presence of at least a second participant is mandatory for the speaker to start or assume this role.

the Speaker, Propositional Contents are *meanings* that can be attributed to any person belonging to the respective speech community. Each Propositional Content consists of at least one nuclear Episode (ep), which in turn consists of a number of States-of-Affairs (e) that are thematically coherent (in the sense that they share a particular time – present in (2) –, location, and the involved conversational participants/speech act participants). The abbreviation (f) in (2) refers to the Property characterizing the State-of-Affairs (e).

The Morphosyntactic Level is also organized as a hierarchy of layers. The largest unit of analysis is the Linguistic Expression (Le), which consists of at least one other unit (either a Clause or a Phrase). Clauses (Cl) consist of a configuration of Words (Xw), Phrases (Xp), and other Clauses. Syntactic functions are assigned at this layer. The heads of Phrases are usually lexical elements, whereas the heads of Words at the Clause layer are grammatical elements such as, for instance, conjunctions or particles. The Phrase layer consists of a configuration of Words (Xw), other Phrases (Xp) and embedded Clauses (Cl). Several types of Phrases are possible: Verbal Phrase (Vp), Noun Phrase (Np), Adjective Phrase (Adjp), Adverb Phrase (Advp), and Adposition Phrase (Adp). Finally, the Word (Xw) layer consists of a combination of Morphemes (Xm), other Words (Xw), Phrases (Xp), and Clauses (Cl), which makes possible to account for polysynthetic languages. There is a clear distinction between Lexemes and Words: Lexemes belong to the Representational Level, whereas Words belong to the Morphosyntactic Level.

Finally, the Phonological Level contains phonological representations of Discourse Acts. In parallel with the previous levels, the Phonological Level is organized hierarchically in several layers: Utterance (U), Intonational Phrase (IP), Phonological Phrase (PP), Phonological Word (PW), Foot (F) and Syllable (S). This hierarchical view of phonological structure follows the tradition of Prosodic Phonology (Auer 1993; Nestor and Vogel 1986). It is assumed that not all layers are necessarily relevant to every Utterance and that there can be languages lacking a particular layer. Recursivity is also allowed.

Not all phonological information is introduced at the Phonological Level. It is the case, for instance, of proper names: proper names, which have reference but not semantic meaning, are introduced at the Interpersonal Level and take already there their phonological form. In the operation of encoding, at the Phonological Level, that information is inserted into an Utterance. On the other hand, lexical items introduced at the Interpersonal and Representational levels may be marked at the Morphosyntactic Level for phonological specifications of stress position, tone pattern and quantity indications, thus avoiding confusion between forms. The Phonological Level deals with meaning oppositions that are not discriminated at the Morphosyntactic Level.

The third characterizing feature of FDG is typology. FDG theory is heavily grounded on extensive work on linguistic typology, and it offers an adequate framework for the comparison of languages and the explanation of linguistic universals at all levels of grammar. This allows accounting not only for morphological and syntactic typology (as it is mostly the case in linguistic typology tradition), but also for semantic and pragmatic typology. An example of this is given in (3). The first part of the example, (3a), shows that the Turkish interrogative particle *mi* can be attached to a Clause, to a Nominal Phrase, or to an interjection (Hengeveld and Mackenzie 2010: 11). This contrasts with the interrogative particle *que* in some Catalan dialects, which according to Rigau and Prieto (2007) expresses pragmatic information related to proximity and low-cost interaction: as we show in (3b), the Catalan interrogative *que* can only be attached to a Clause (3b, instance a; and not in instances b and c):

(3)

(3a) Turkish interrogative particle *mi*, which displays vowel harmony (Hengeveld and Mackenzie 2010)

(1) *Ahmet sinema-ya git-ti mi?*
 Ahmet cinema-DAT go-PAST INTER
 ‘Did Ahmet go to the movies?’

b. *Bugün mü?*
 today INTER
 ‘Today?’

c. *Tamam mı?*
 OK INTER
 ‘OK?’

(3b) Catalan interrogative particle *que*

a. *Que vindràs demà?*
 INTER come-FUT.IND.2.SG tomorrow
 ‘Are you coming tomorrow?’

b. **Que demà?*
 INTER tomorrow

c. **Que d’acord?*
 INTER interjection:agreement

2.2 Levels of adequacy

Functional studies have traditionally included three levels of adequacy: typological, psychological and pragmatic (Butler 1999). However, recent studies have shifted from psychological adequacy to cognitive adequacy (Butler 2009). In regard to typological adequacy, functional theory is expected to account for grammars of languages of any type, and to be a useful tool to highlight similarities

and differences between languages. The functional model is also required to integrate cognitive or psychological adequacy. It must have explicative validity to account for creation and interpretation of psycholinguistic processes, and also provide clear information about the nature of conceptualization and of cognitive abilities. Furthermore, FDG is also able to assign pragmatic functions (e.g., topic, focus, and contrast), since as a functional grammar, it has pragmatic adequacy. That is, FDG allows the appropriate and coherent production⁴ of utterances in context.

The foundational tenets of a functional grammar focus precisely on *language use* rather than on an abstract language capacity. Furthermore, these tenets align a functional grammar more closely with cognitive linguistics, since cognitive abilities tend to be grouped rather than to be separated modularly. Such consideration, as well as the need to consider discourse and contextual aspects (Butler 1999: 228), point to the evolution of the functional model and to its potential future: a functional grammar with a more comprehensive discourse/pragmatic adequacy:

To attempt to formulate an exhaustive model that has the capacity to include subordinate models, not only of subjacent/underlying semantics and of utterance formation/production, but also of discourse structure, as well as of the social and psychological contexts of language use and its complex meaning-form relationships. (Butler 1999: 241)

Discourse/pragmatic adequacy, according to Butler's *desiderata* (1999: 256), is understood as (1) the construction of a model of the social contexts in which texts are produced and received, (2) the exploration of discourse models, and (3) the integration of these models in the grammar itself. In Butler's words (1999: 256), such integration will generate "significant changes in the latter [the new integrated grammar] and will lead to the formalization of a global model of linguistic communication," with the testing of predictions that this new integrated model will produce according to the interrelations between language and context.

Indeed, this has been the evolution of FDG. Specifically, FDG has aimed to improve cognitive and pragmatic explanatory adequacies of discourse, which has been the general aim in the functional tradition (Butler 1999; González-García and Butler 2006). As for cognitive adequacy, the FDG grammar model reflects psychological evidence of speech production following Levelt's model of lan-

⁴ FDG literature mostly takes a perspective of monological production. For a focus on dialogical discourse considering reception, see Giomi (2014) and Mackenzie (2014).

guage processing (Levelt 1989), with the Conceptualizer, the Formulator and the Articulator modules corresponding to the Conceptual, the Grammatical and the Output Components in FDG. Furthermore, communicative intentions and acts, as they are described in the general functional literature (Nuyts 1989), generate (a) the formulation and encoding of conceptual and contextual information in the Grammatical Component, and (b) the feed from the Contextual Component to the Conceptual Component, as suggested by Keizer (2014: 418, figure 411).

Within this theoretical framework, our proposal involves the integration and development of two types of speaker cognitive ability, as well as the representation of these two abilities in the model (grammatical and communicative):

- (a) An ability to use two or more languages (or two or more varieties of the same language), and the need of the model to account and explain specific phenomena related to multilingualism and multidialectalism, such as code-mixing and code-switching.
- (b) An ability to coordinate verbal and nonverbal components of an utterance, and to produce and interpret multimodal messages that converge to create a joint and indivisible meaning.

3 Multilingual discourse

The phenomena of code-mixing and code-switching have shown the very high degree of interrelation between two or more linguistic systems in a multilingual speaker's mind. Romaine's ([1994] 1996: 74) work greatly illustrates such interrelation, particularly because the instances that she collected come from different communities and languages, and from languages with significantly different typological systems:

- (4) a. *Kio ke six, seven hours te school de vic spend karde ne, the are speaking English all the time* (Panjabi/English)
- b. *Will you rubim of? Ol man will come* (Tok Pisin/English)
- c. *Sano että tulla tånne että I'm very sick* (Finish/English)
- d. *Kodomotachi liked it* (Japanese/English)
- e. *Have agua, please* (Spanish/English)
- f. *Won o arrest a single person* (Yoruba/English)
- g. *This morning I hantar my baby tu dekat babysitter tu lah* (Malaysian/English)

In fact, the phenomena of code-mixing and code-switching occur regardless of the linguistic typologies of the languages involved. The alternation between Spanish and Catalan (languages that are close typologically) but also the alternation between Spanish and Basque (languages that are distant typologically) clearly

illustrate this point. As an example of code-mixing, Romaine ([1994] 1996: 75) reports the following example between Spanish and English in New York City:

- (5) *But I use to eat bofe, the brain. And then they stopped selling it because tenían, este, le encontraron que tenía worms. I used to make some bofe! Después yo hacía uno d'esos [sic] concoctions: the garlic con cebolla, y hacía un mojo, y yo dejaba que se curara eso for a couple of hours.*

A significant amount of linguistic research has documented the ability of bilingual speakers to coordinate two or more linguistic systems seamlessly. Research on bilingual speakers' abilities has also resulted in the development of concepts such as *multicompetence* (Bassetti and Cook 2011; Cook 2008), and *translanguage* and *translanguaging* (García and Otheguy 2014). According to García and Otheguy (2014: 646), translanguage or translanguaging “refers to language practices by bilinguals that appear to be indifferent to the social adscription of some features to some language box and of others to another language box.” In this manner, multilingual speakers “do not have ‘languages’, rather, they have an interconnected whole, an ecosystem of mutual interdependence of possibly heteronamed linguistic features forming a single web, where translanguaging is the speech product generated by the web” (García and Otheguy 2014: 646). In a similar way, multilingual speakers' abilities to coordinate two or more linguistic systems seamlessly are analogous to speakers' abilities to coordinate functional varieties or registers from a complex functional repertoire. Thus, stylistic and functional variation in speakers' *performance* shows an ability to coordinate sequences that belong to different registers. From an intralinguistic variation perspective, this ability is also observable in the *performance* of speakers who alternate, for example, between two different geographical dialects of the same language.

4 Multilingual discourse in Functional Discourse Grammar

We believe that FDG may provide an adequate framework to build a model of a multilingual grammar. Our working hypothesis is that the languages known by the speaker contribute the language-specific primitives that feed the language mixing and switching operations of Formulation and Encoding (Morphological Encoding and Phonological Encoding), whereas the result of the operations of Formulation and Encoding in code-mixing and code-switching is a multilingual grammar with its own specific structure (see Jungbluth, in this volume, regarding

the issue of whether code-mixing and code-switching are actually different). This is illustrated in Figure 2:

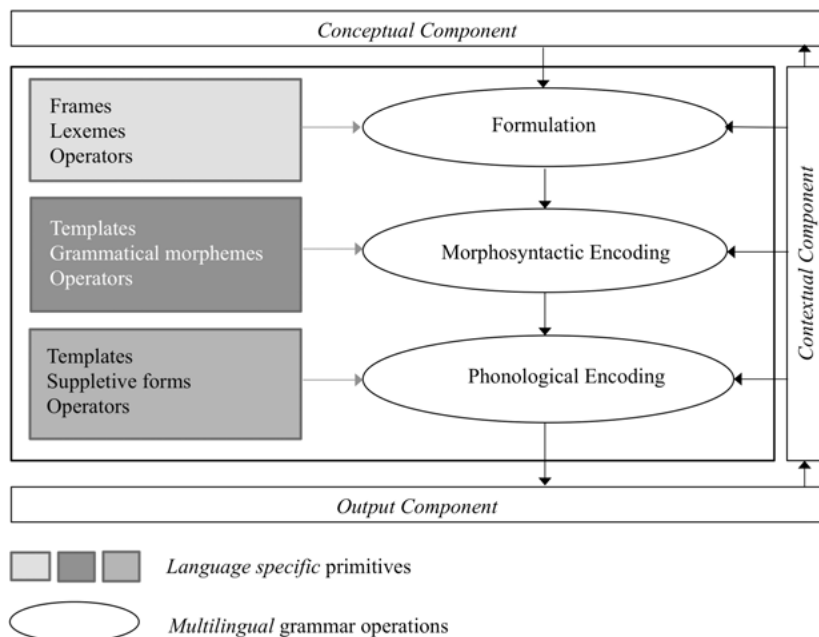


Figure 2: Primitives of the Grammatical Component in FDG

There are three kinds of primitives in FDG (Hengeveld and Mackenzie 2008: 19–22; Keizer 2015: 30–31):

- Structuring primitives** (Frames for Formulation, Templates for Encoding): these primitives define the possible combinations of elements at each level; that is, the possible combinations of pragmatic and semantic units at IL (Interpersonal Level) and RL (Representational Level), the order of elements within a Clause or Phrase at ML (Morphosyntactic Level), and the possible intonation and stress patterns at PL (Phonological Level).
- Forms**: the relevant linguistic elements at each level; that is, the lexemes drawn from the lexicon at IL and RL, the elements expressing grammatical information at ML (unmodifiable elements such as auxiliaries, particles, and affixes), and suppletive forms at PL (e.g. irregular forms).
- Operators**: each level of representation takes its particular operators, which are used to represent interpersonal, representational, morphosyntactic and phonological information that is not fully predictable. For instance: the identifiability of a referent at IL, ‘real-word’ information about number or

tense at RL, placeholders for forms or sets of forms at ML, and prosodic features such as a rising tone at PL.

These three types of primitives are exemplified in (6), where we show a Communicated Content (C) frame, a Propositional Content (p) frame, a lexeme, and a politeness operator. These four elements are selected in the operation of Formulation as part of the task of grammatically formulating a conceptual representation in pragmatic and semantic grammatical representations.

- (6) *Vostè és el primer*
 2.SG.polite be. PRS.IND.3.SG the.M first.M
 ‘You are the first one’
- 6a. C frame of (6): $(\Pi C: [(T)_{\Phi} (R)_{\Phi}]: \Sigma (C))_{\Phi}$
 6b. p frame of (6): $(\pi p: (f_1) (x_1) (p))_{\Phi}$
 6c. Lexeme: *Primer*
 6d. POLITENESS OPERATOR at R: +h (high politeness), encoded as *vostè*
 IL: (+h R: [-S, +A] (R))

Where: Π, π = one or more operators

Φ, φ = the function of the linguistic unit

T = a SubAct of Ascription (e.g. the ascription of being the first one)

R = a SubAct of Reference (e.g. reference to the addressee)

f = any lexical property

x = an individual

Σ = one or more modifiers at the layer of C

S = Speaker

A = Addressee

The complete pragmatic (IL) and semantic (RL) representations of (6) are shown in (7):

- (7) IL: $(A: (F: DECL (F)) (P_i)_S (P_j)_A (\Pi C: [(T) (+h R: [-S, +A] (R))] (C)) (A))$
 RL: $(\pi p: (ep: (\pi e: [(f: primer (f)) (1x)]: \sigma (e))_{\Phi} (p)_{\varphi})$

Note that suggesting language-specific primitives in a multilingual grammar *does not* assume that multilingual speakers keep the language-specific Formulation and Encoding of the grammar of their monolingual discourses in L1 or L2⁵, which is a defining feature of (monolingual) Functional Discourse Grammar:

5 In the sense of Herdina and Jessner (2002).

Although the model as a whole has universal validity, the primitives available at each level, and the representations resulting from the operations of Formulation and Encoding, are language specific. Each language can therefore be said to have its own FDG. (Keizer 2014: 40)

Instead, we are suggesting that only the primitives of a multilingual grammar keep separated the specificity of L1 and L2, whereas the representations resulting from the operations of Formulation and Encoding are specific of that particular multilingual grammar. This may change in time, as the multilingual grammar evolves into a new monolingual grammar with its own specific primitives (this would be the case for creoles and pidgins).

In a multilingual grammar, the speaker would select primitives of all the available languages to perform a single (multilingual) task of building Pragmatic (IL) and Semantic (RL) representations of conceptual representations, as shown in (8):

(8) *Al seu despatx ens vam veure (.) dos o tres vegades*⁶

‘We met at her office two or three times’

| A-l | seu | despatx | ens | vam | veure | (.) | dos o tres vegades |
|---------|-------|---------|-----------|--------------|----------|-------|---------------------------|
| At-the | POSS. | office | ACC.RECP. | go.AUX.past. | see. INF | Pause | two or three times |
| | 3.SG | | 1.PL | 1.PL | | | |
| Catalan | | | | | | | Spanish |

IL: (A: (F: DECL (F)) (P_i)_S (P_j)_A (C: [(T) _φ (R₁) _φ (R₂) _φ (R₃) _φ] (C)) _φ (A)) _φ
 RL: (τ_p: (past ep: (τ_e: [(f_i: [(f_j: veure (f_i)) (mx) (l: despatx (l))] (f_i))] [(f_k: (q: -dues o tres vegades- (q)) (f_k))] (f_i)): σ (e)) _φ (p)) _φ

Where: l = location

m = more than one

q = quantity

If we adjust the model to reflect a speaker’s multilingual and multilectal characteristics, we will obtain the model proposed in Figure (3), which is a programmatic proposal that needs to be subject to future verifications.

⁶ Fragment from a response by Maria Victoria Álvarez in the Parliament of Catalonia during a session of the Investigation Committee on Fraud, Fiscal Evasion, and Political Corruption (April 10, 2015, recording by Televisió de Catalunya) <http://www.ccma.cat/324/victoria-alvarez-jose-zaragoza-i-alicia-van-decidir-gravar-me-en-unes-estones-doci-relaxat/noticia/2656072/>

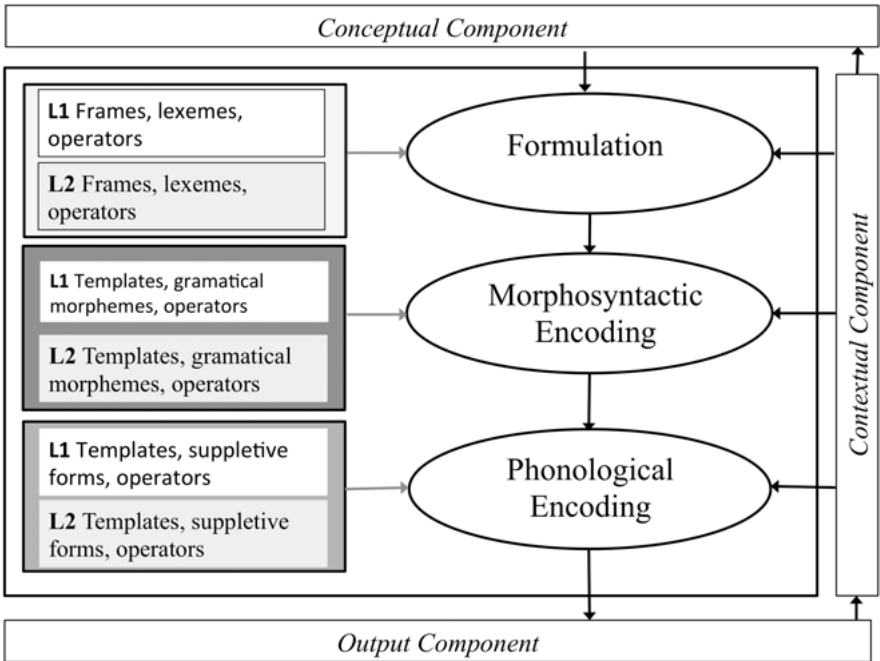


Figure 3: Multilingualism and Multilectalism in FDG

Each operation involves the selection of the relevant L1 or L2 primitives. In (8) above, for instance, the formulation of each semantic entity takes a lexeme from one particular language: Catalan or Spanish. Thus, at the Representational Level lexemes for quantity are selected from Spanish (*dos o tres veces*, ‘two or three times’), whereas for location (*al seu despatx*, ‘at her office’), individual (more than one individual or (mx)) and configurational property (*ens vam veure*, ‘see each other’) the speaker selects Catalan lexemes.

We can now apply this model to the formal analysis of the grammatical formulation and encoding of occurrences of code-mixing and code-switching. This is illustrated in (9), which shows the operations, primitives, and level representations involved, (IP, RL, ML, PL), in a multilingual communicative act performed by Maria. L1 (Spanish) is given in bold, whereas L2 (Catalan) is given in roman capitalized letters:

- (9) Laia: *Què li passa, al Joan?* (lit. ‘What happens to John?’)
 Maria: ***Creo que està*** *MALALT* (lit. ‘I believe that [John] is ill’)
 (Spanish) (CATALAN)

| Operation | Primitives | Representation at IL, RL, ML and PL levels |
|--------------------------------|--|--|
| Formulation (Interpersonal) | $(A_1: (F_1: \blacklozenge (F_1) (P_1)_s (P_2)_A) (\cap C_1: [(T_1)_{\text{FOC}} (R_1)_{\text{TOP}}]: \Sigma (C_1)]_{\phi} (A_1))$ | IL: $(A_1: (F_1: \text{DECL} (F_1)) (P_1)_s (P_2)_A (\cap C_1: [(T_1)_{\text{FOC}} (R_1)_{\text{TOP}}] (C_1)]_{\phi} (A_1))$ |
| Formulation (Representational) | $(_{\pi}P: [(f_1) (p_1)_{\phi}])$ creer , MALALT | RL: $(_{\pi}p_1: [(f_1: \text{creer} (f_1)) (1x_1) (ep_1: (_{\pi} e_1: [(f_2: \text{MALALT} (f_2)) (x_2)_U]: \sigma (e_1))]_{\phi} (p_1)_{\phi})$ |
| Morphosyntactic Encoding | $(Le_1: [(^{\text{decl}}Cl_1) (^{\text{sub}}Cl_2)] (Le_1))$ estar , present , indicative , 1.sg , 3.sg | ML: $(Le_1: [(^{\text{decl}}Cl_1: (Vp_1: (Vw_1: \text{creer-prs.ind.1.sg} (Vw_1) (Vp_1)) (Np_1)_{\text{Subj}} (Cl_1)) (^{\text{sub}}Cl_2: (Np_2)_{\text{Subj}} (Vp_2: [(Vw_2: \text{estar-prs.ind.3.sg.} (Vw_2)) (Aw_2: \text{MALALT.m.sg} (Aw_2))] (Vp_2)) (Cl_2)) (Le_1))$ |
| Phonological Encoding | $(IP_1: [(PP_1: [(PW_1) (PW_2)] (PP_1))] (IP_1))$ falling tone, /e/, /l/, /ə/... | $(_{\text{f}}IP_1: [(PP_1: (PW_1: /'kreo/ (PW_1)) (PP_1)) (PP_2: [(PW_2: /kes'ta/) (PW_3: /mə 'lal)] (PP_2))] (IP_1))$ |

5 Speaker multimodal ability

Speakers display a clear multimodal ability, that is, an ability to generate meaning using different codes – primarily verbal and gestural – that are coordinated and complementary. Speakers are not just verbal or linguistic codifiers and decoders, but communicators who produce messages with different modes and relying on different channels. The ability to combine different modes and channels has long been recognized, but particularly has been taken into consideration during recent years. Without going too further back in time – otherwise one would need to include classic and medieval rhetoric – Birdwhistell's work may constitute a first modern analysis of the complementarity and integration that is observable in the use of linguistic and gestural systems. Birdwhistell collected his most important work in a book appropriately entitled *Kinesics and Context. Essays on Body Motion Communication* (Birdwhistell 1970), in which he also included many studies published in his previous 1952 book. Birdwhistell constructed a detailed and systematic series of bridges between the use of linguistic elements and bodily elements (i.e., posture and gesturality).

Birdwhistell's innovation was to transfer the theoretical apparatus of North American linguistic structuralism of his time, mainly distributionalism, to the analysis of bodily conduct and movement. His theoretical transfer ultimately failed, illustrating that a simple transfer of a linguistic theoretical apparatus to the analysis of bodily conduct cannot capture the complexities of nonverbal