

John Benjamins Publishing Company



This is a contribution from *Space and Time in Languages and Cultures*. *Linguistic diversity*.

Edited by Luna Filipović and Kasia M. Jaszczolt.

© 2012. John Benjamins Publishing Company

This electronic file may not be altered in any way.

The author(s) of this article is/are permitted to use this PDF file to generate printed copies to be used by way of offprints, for their personal use only.

Permission is granted by the publishers to post this file on a closed server which is accessible to members (students and staff) only of the author's/s' institute, it is not permitted to post this PDF on the open internet.

For any other use of this material prior written permission should be obtained from the publishers or through the Copyright Clearance Center (for USA: www.copyright.com). Please contact rights@benjamins.nl or consult our website: www.benjamins.com

Tables of Contents, abstracts and guidelines are available at www.benjamins.com

Variation in motion events

Theory and applications*

Iraide Ibarretxe-Antuñano and Alberto Hijazo-Gascón Universidad de Zaragoza

This chapter analyses the role of intratypological and dialectal variation in the lexicalisation of motion events (Talmy 1991, 2000) and its application to second language acquisition. The first part discusses intratypological variation with respect to the semantic component of Path and proposes a cline of Path salience on the basis of twenty-one languages. Then, it describes dialectal variation in Spanish and Aragonese. Results show that dialects within these two Romance languages differ in the type of linguistic resources they use as well as in their quality and quantity. The second part briefly reviews some L2 problematic areas that can benefit from these approaches such as conceptual transfer, deixis, and idiomaticity. Examples are drawn from L2 Spanish and L2 Basque.

Keywords: dialectal variation, intratypological variation, Path, second language acquisition

1. Introduction

In accordance to the general topic of this volume, the study of linguistic diversity in space and time, this chapter focuses on the lexicalisation of motion events from a cross-linguistic and cross-cultural perspective (see also Engemann et al., Hoffmann, Lewandowski and Luk, this volume). Following Talmy's (1991, 2000) theory of lexicalisation patterns, the first part analyses the role of intratypological and dialectal variation in the lexicalisation of these events. Like other authors in Part III of this volume, we aim to show that languages, despite their typological classification as verb-framed or satellite-framed, express the main semantic

^{*} Research funded by the following grants: Spanish Ministry of Science and Innovation (FF12010-14903), Spanish Ministry of Education (MEC-HUM2007-64200/FILO, IIA), and Aragonese Government (DGA-B043/2007, AHG).

component in motion events, Path, in different degrees of detail; that is to say, there is intratypological variation among languages (see also Forker, and Hoffmann, this volume). Furthermore, these different degrees of detail description are also evident in diatopic varieties of the same language, as is shown with data from two Romance languages, Aragonese and Spanish. The second part of this chapter revises the consequences of this variation for the study of second language acquisition; more concretely, it discusses some L2 problematic areas that can benefit from these approaches, such as conceptual transfer, deixis, and idiomaticity. Examples here are drawn from L2 Spanish and L2 Basque. This topic is also studied in several chapters in Part II in this volume - Chan et al. on the acquisition of tense-aspect morphology, Engemann et al. on the acquisition of caused motion events by bilinguals, and Luk on the acquisition of L2 English and L2 Japanese.

Motion events from a typological and discourse perspective

Motion events are defined as situations that contain either "movement or the maintenance of a stationary location" (Talmy 1985:85). Talmy's typological dichotomy divides languages into two groups: verb-framed languages and satellite-framed languages. The former codifies the main semantic component of the event, the Path or trajectory in our case, in the main verb whereas the latter does so in a separate element called the satellite. A further characteristic of these two types is that satellite-framed languages use the main verb to lexicalise a different semantic component, the Manner of motion, whereas in verb-framed languages, this semantic component, if mentioned at all, is found in a separate expression such as a gerund, a prepositional phrase, an adverbial phrase, etc. Let us illustrate this dichotomy with an example. For English run out, Basque speakers would say korrika irten ('running exit') whereas German speakers, on the other hand, would prefer rennen raus ('run out'). What is interesting about these two lexicalisation patterns is that they are "characteristic" ways of describing motion events in these two languages, where "characteristic" means colloquial in style, pervasive, and frequent in usage (Talmy 1985:62; 2000:27).

According to Slobin (1996, 2004) and his Thinking for Speaking hypothesis, there are important discourse consequences for these two lexicalisation patterns, since speakers of a particular language tend to focus on different aspects of the motion event. There are typical "typologies of rhetoric" (Slobin 1996:218) that are highly intertwined with the codability possibilities that each language offers. Satellite-framed language speakers use more Manner-specifying verbs when describing moving Figures in space and the verb inventory as a whole in these

languages is larger than the one used by verb-framed speakers. As Berman and Slobin (1994:118–199) put it:

The satellite-framed languages in our sample also tend towards greater specification of manner, probably because the lexicon provides a large collection of verbs that conflate manner with change of location (*crawl*, *swoop*, *tumble*, etc.), often conflating cause as well (*dump*, *hurl*, *shove*, etc.). In verb-framed languages, such elaboration is more of a "luxury", since path and manner are elaborated in separate expressions, which are generally optional, and which are less compact in form [e.g. 'exit flying (from the hole)' vs 'fly out (of the hole)']. As a consequence of these differences, it seems – at least in our data – that English and German narrations are characterized by a great deal of dynamic path and manner description, while Spanish, Hebrew, and Turkish narrations are less elaborated in this regard, but are often more elaborated in description of locations of protagonists and objects and of endstates of motion.

Although both Talmy's and Slobin's approaches have been successfully used to analyse motion event phenomena in a wide variety of languages (Strömqvist and Verhoeven 2004) and from a theoretical as well as applied perspective (Guo et al. 2009; Han and Cadierno 2010), they also raise some important problematic issues.

One of the most debated problems is the insufficiency of Talmy's bipartite classification when it comes to account for some of the motion structures found in the languages of the world. There are patterns that are not so clear-cut. On the one hand, it seems that there are what we could call "mixed" languages. We include in this category two different cases: (a) languages in which speakers indistinctively use both verb-framed and satellite-framed constructions in their characteristic descriptions of motion events, for example Serbo-Croatian (Filipović 2007), and (b) languages which, despite their affiliation to one lexicalisation pattern, show motion constructions typical from the opposite lexicalisation group. This is the case of Chantyal (Noonan 2003), Basque (Ibarretxe-Antuñano 2004a, b), and Aragonese (Hijazo-Gascón and Ibarretxe-Antuñano 2010): all these languages are considered verb-framed but they also offer (pseudo)-satellite constructions. On the other hand, it seems that there are languages that cannot be classified either as satellite- or verb-framed; they use a third lexicalisation pattern, sometimes known as "equipollent" (Slobin 2004), where the semantic components of Path and Manner are codified in equivalent elements. This is the case of serial verb languages such as Thai (Zlatev and Yangklang 2004) and Ewe (Ameka and Essegbey in press), where each semantic component is expressed in a different main verb. Other languages such as Jaminjung were also initially included in this group of equipollently-framed languages (Slobin 2004; Schultze-Bernt 2006).

Recent research (Schultze-Bernt 2007; Hoffmann this volume), however, shows that Jaminjung is better classified as a verb-framed language with a high-pathsalience (Ibarretxe-Antuñano 2009).

Another problematic area is the variation that exists within each of these lexicalisation patterns. Sometimes it is taken for granted that all languages that belong to the same group necessarily behave in the same way, that is, they show similar characterisations of motion events in terms of the degree of expressiveness and detail. However, it has been shown that this is not the case: variation exists intratypologically (Ibarretxe-Antuñano 2004a, b, 2009; Slobin 2004, 2006) and even diatopically (Berthele 2004, 2006). For example, although Japanese and Spanish are both verb-framed languages, the former seems to pay more attention to the Manner component, partly thanks to its rich and expressive mimetic inventory that allows Japanese speakers to describe this semantic component in great detail and in a compact way (Sugiyama 2005). Similarly, if one compares how Basque and Spanish speakers describe Path, it is clear that the former usually gives many more details about trajectories than the latter (Ibarretxe-Antuñano 2004a, b).

Diatopic variation has not yet received the attention it deserves in this framework. As Berthele suggests (2004: 26), some categories and distinctions have been taken for granted in typological studies; due to methodological reasons, typologists usually simplify the diversity that exists within one language, and, consequently, treat languages as "homogenized categories such as 'German', 'Spanish', 'French'". However, authors such as Berthele (2006) for Swiss German, and Schwarze (1985) for Italian have shown that the study of varieties within one language is worthwhile. Berthele, for instance, shows that Muotathal, a Swiss German dialect spoken in the Schwyz canton, is characterised by an infrequent use of Manner verbs and by a more complex, both syntactically and lexically, description of the Path component, which usually involves two pieces of information about the trajectory. Two characteristics that make this variety different from other Swiss German dialects and the standard language.

Despite these problems, this approach is still a useful tool for analysis and it has been successfully applied to the study of second language acquisition (see Cadierno (2008) and Stam (2010) for an overview). Research in this area has shown that learners are able to develop and acquire the characteristic motion event rhetorical style in the L2, but that even the most advanced learners still exhibit some transfer effects from their native language. Most of these studies have been applied to discriminate between languages that belong to different lexicalisation patterns - e.g. Danish and Spanish (Cadierno 2004; Cadierno and Ruiz 2006), Dutch, English, and Spanish (Kellerman and Van Hoof 2003), English, Danish, and Japanese (Cadierno and Robinson 2009), English and French (De

Knop and Dirven 2008; Engemann et al. this volume; Harley 1989; Harley and King 1989), English and Spanish (Hohenstein et al. 2006; Navarro and Nicoladis 2005; Negueruela et al. 2004; Stam 2006), English and Japanese (Luk this volume) – and to a lesser extent to the study of how these patterns affect the acquisition of motion events in languages within the same typological ground, e.g. Dutch and English (Gullberg 2009), English and Serbo-Croatian (Filipović and Vidaković 2010), Russian and English (Hasko 2010), Italian, French, and Spanish (Hijazo-Gascón 2011), Russian, German, and Danish (Cadierno 2010), Spanish and Basque (Ibarretxe-Antuñano 2004c, 2010).

3. Variation within typological patterns: Theoretical issues

3.1 Intratypological variation

As previously mentioned, Talmy's theory does not seem to take into account that languages that share the same lexicalisation pattern, and therefore, a similar characteristic expression of motion, show a different degree of detailed elaboration of semantic components. In other words, languages might belong to the same group, but this does not imply that they characterise the motion event in the same way, both qualitatively and quantitatively. We define intratypological variation as the phenomenon that shows that languages vary in the degree of detailed description with respect to the semantic components in a given event independently from the lexicalisation pattern they belong to.

In order to illustrate this intratypological variation we are going to focus on the main semantic component of the motion event, Path. Authors such as Slobin (2004: 238) have argued that due to the compulsoriness of this component, "we can't compare languages in terms of the accessibility of path as a category", as it might be done with the Manner component, which is optional: "without a path verb or satellite or other path element, there is no motion event". However, it has also been shown that languages, when compared on the basis of the number of Path elements that accompany main verbs, can be situated along a continuum or cline of path salience. In a previous study, Ibarretxe-Antuñano (2009) shows that speakers of languages that belong to different genetic families as well as different lexicalisation patterns vary in how much information they mention together with the main motion verb. Table 1 presents an improved and revised version of her results.

Salience is understood in terms of ease of accessibility and codability, see Slobin (2004).

^{© 2012.} John Benjamins Publishing Company All rights reserved

Table 1. Path salience cline			High-path salience
Languageslexicalisation pattern	Minus-ground	Plus-ground	+
Chantyal ^v (Noonan 2003)	0%	100%	A
Basque ^v (Ibarretxe-Antuñano 2004a, b)	11.86%	88.14%	
Swedish ^s (Ragnarsdóttir and Strömqvist 2004)	12%	42%	
Icelandic ^s (Ragnarsdóttir and Strömqvist 2004) ^a	14%	71%	
English ^s (Slobin 1996)	18%	82%	
Polish ^s (Szczybelski Zborowski 2006)	23%	77%	
German ^s (Berthele 2006, Slobin 1997)	26%	74%	
Turkish ^v (Aksu-Koç 1994)	27.27%	72.72%	
Danish ^s (Cadierno 2004)	29.51%	70,49%	
French ^v (Berthele 2006)	31%	69%	
Spanish ^v (Slobin 1996)	37%	63%	
Malay ^v (Huang and Tanangkingsing 2005)	42%	58%	
Mandarin Chinesee (Chen 2005)	48%	52%	
Thaie (Zlatev and Yangklang 2004)	51%	49%	
Tsoue (Huang and Tanangkingsing 2005)	52%	48%	
Tagalog ^v (Huang and Tanangkingsing 2005)	55%	45%	
Cebuano ^v (Huang and Tanangkingsing 2005)	59%	41%	
W. Greenlandic ^v (Engberg and Blytmann 2004)	60%	40%	
Saisiyat ^v (Huang and Tanangkingsing 2005)	61%	39%	_
Squliq ^v (Huang and Tanangkingsing 2005)	64%	36%	
Mapuchee (Becerra-Parra 2008)	65%	35%	
			Low-path salience

a Ragnarsdóttir and Strömqvist (2004:126) classify motion events intro three groups: verb only, verb+particle/adverb, verb+PP. Since they do not use the notion of satellite, group two includes cases of minus- and plus-ground clauses, and therefore this group has not been included. This is why the percentages do not add up to 100%.

Table 1 contains information from twenty-one languages: eleven verb-framed, six satellite-framed, and four equipollently-framed. Data come from different studies (see references) that use the Frog stories as their elicitation tool and follow the procedure described in Berman and Slobin (1994). In this table, only the descriptions for falling scenes are considered. The main distinction is between minusground and plus-ground verbs (Slobin 1996). The former are cases where the verb is alone (*fall*) or with a satellite (*fall down*), and the latter those that contain an extra Path element (*fall from the cliff*). As shown in this table, there is a cline of path salience that cross-cuts the three lexicalisation patterns and classifies languages along a continuum between two ends: high-path-salient languages which offer rich and frequent descriptions of Path (e.g. Chantyaly, Basquey, or Swedishs),

and low-path-salient languages which provide poor elaborations (e.g. Saisiyat^v, Squliq^v, or Mapuche^e).

Ibarretxe-Antuñano (2004d, 2009) also argues that there is a relation between path salience and the structural, discursive, and typological characteristics of each language. This author offers an open-ended list of those possible factors that play a role in the classification of a given language alongside this cline. These are not compulsory for every language, that is, some factors are present in some languages but not in others, but the more factors a language shows the more chances it has to be classified as a high-path-salient language. So far seven factors have been discussed: (a) space and motion lexicon: linguistic devices available to describe space and motion, e.g. prepositions, cases, spatial nouns, etc., (b) word order: the most frequent order of the syntactic constituents in a sentence, (c) verb omission: if the verb (by ellipsis or VP-gapping) can be omitted, (d) dummy verbs: semantically poor verbs (e.g. make) used to create new Path verbs, (e) redundancy: pleonastic usage of words describing the same phenomenon, (f) culture: space and motion are important in the cultural system of a given community, and (g) conceptual orality: this concept stems from Koch and Oesterreicher's distinction between conceptually oral and conceptually written languages (Koch and Oesterreicher 1985; Oesterreicher 2001). Languages are characterised by a number of morphosyntactic, semantic, and pragmatic properties that are always present in the speaker's use of language, regardless of their form of communication (oral or written). For instance, elliptic constructions, congruence violations, low type-token ratios in the lexicon, redundancy, lexical variation, hyperbolic expressions, turn-taking signals, and self-corrections are typical characteristics of conceptually oral languages that would appear in both oral and written texts. Table 2 sketches the distribution of these factors in low- and high-path-salient languages, together with illustrative examples.²

3.2 Dialectal variation

An issue hardly touched on in the literature on motion events is the study of dialectal variation. For methodological reasons, researchers in this area usually take for granted differences among language varieties; these seem to be not significant enough to be taken into account. Although it is true that the differences that arise in dialects are not so striking as when genetically different languages are compared, we argue that these cannot be neglected. We illustrate this statement with

^{2.} We include references only for those languages or studies that have not been mentioned before in Table 1.

^{© 2012.} John Benjamins Publishing Company All rights reserved

		+
Factors	Low-path salience	High-path salience
Lexicon	Few resources	Many resources
	Saisiyat	Arrernte
	One locative particle kan/ray	Associated motion category (Wilkins 2004)
Word order	Verb-initial	Verb-final
	West Greenlandic, Saisiyat, Tsou	Basque, Chantyal, Turkish
Verb omission	Not allowed	Very permissible
	Thai, West Greenlandic	Danish
		I morgen skal jeg på universitet (lit.) 'tomorrow shall I to the university'
Dummy verbs	None	Few
		Muothatal (Swiss German)
		Sein 'be' + accusative
Redundancy	Rare	Common
		Basque (see e.g. (13)) Amondawa (Sampaio et al. 2009) <i>Kurumin ga ojupin ga aiapykawa re</i> (lit.) 'boy he ascends he bench up onto'
Conceptual orality	Conceptually written	Conceptually oral
	Standardised languages Spanish	Non- (or recently) standardised languages Muothatal, Amondawa (Sampaio et al. 2009)
Culture	Neutral	Important
		Australian Central Desert aboriginal communities (Bavin 2004; Wilkins 2004)

Table 2. Distribution of factors in low- and high-salient languages

examples from Spanish and Aragonese and their respective dialectal varieties. These two languages belong to the Romance family and as such, they are classified as verb-framed languages (Hijazo-Gascón and Ibarretxe-Antuñano 2010, Talmy 1985; Slobin 1996).

According to Sebastián and Slobin (1994), Spanish is a language with few and semantically general lexical resources to codify motion events. Based on data from the Frog Stories, these authors show that speakers of all ages use a short list of general motion verbs, mainly those of inherent directionality (e.g. salir 'exit'), and only three general spatial prepositions (a 'goal', de 'source', and en 'locative'). As a consequence, they conclude that Spanish "speakers of all ages rely primarily on verbs of motion to encode trajectories, with limited encoding of source or goal, and very little attention to manner of movement" (1994: 284).

In order to test these results and check out whether there are differences within Spanish, we look at the Frog Stories in five varieties: three Peninsular (Basque Country, Aragón, Madrid) and two American (Argentina, Chile). We have a total of thirty stories, six per language. All narrators were adult Spanish native speakers of their corresponding varieties.³

In general terms, our analysis shows that Sebastian and Slobin's results are consistent with the motion descriptions in these dialects. Manner is not mentioned that often unless it is discursively necessary. For instance, the number of Manner verbs is relatively low – although there is a gradation within dialects (see Table 3); and in the owl scene – it depicts an owl flying out of a tree hole – none of the speakers who describe this scene actually employ a Manner verb such as *volar* 'fly', but mainly the Path verb *salir* 'go out' (seventeen tokens), and to a lesser extent, *aparecer* 'appear, turn up' (seven tokens), *ir* 'go' (one token), and *asomarse* 'lean out' (one token) (see Slobin 2006: 64–66).

Table 3.	Manner	verbs	in	Spanish	varieties
----------	--------	-------	----	---------	-----------

	Argentina		Chile		Madrid		Aragón		Basque C.	
	#	%	#	%	#	%	#	%	#	%
Manner verb types ^b	16	43%	17	39.5%	9	31%	13	29%	10	23%
Total motion verb types	37		43		29		45		43	

^b In this category we include all the verbs with the Manner component in their semantic content, i.e. verbs such as *correr* 'run' (Manner) and also verbs such as *trepar(se)* 'climb up' (Manner + Path).

However, if we have a closer look at the data, there are a few details related to the lexical resources available in these varieties that are worth mentioning. Some verbs only occur in one of the varieties. This is the case of the Manner verb *encorrer* 'run after sb., chase sb.' in Aragonese Spanish as illustrated in (1).

(1) Al perro se le cae mientras tanto el panal de abejas que le empiezan a encorrer to.the dog he.pron he.dat falls meanwhile the beehive of bees that he.dat start to run.after

'Meanwhile the dog unintentionally drops the beehive and the bees start chasing him'

^{3.} We collected data from Basque Spanish and Aragonese Spanish. For the other three varieties, we use Sebastián and Slobin's original adult narratives. We would like to thank Dan Slobin for having kindly shared these data with us.

^{© 2012.} John Benjamins Publishing Company All rights reserved

This verb encorrer, a loan from the Aragonese language (Arnal and Lagüéns, in press), is pervasively used by speakers in this variety, probably because the closest alternative in Standard Spanish, the verb perseguir 'chase', lacks the 'running' semantic component, and, therefore, is less expressive and vivid. Apart from this verb, Aragonese Spanish also has a wide range of expressive and manner-of-motion words that are not present in other varieties. Verbs such as esbarizar 'slide', estozolarse or ir a tozolones 'stumble', and even ideophones such as china(o)chana(o) are lexical items used in everyday situations and by speakers of all ages in this variety.

Another element that we have to take into account is the verb construction. There are some verbs that are common to all Spanish dialects, but sometimes the construction in which they appear is only typical in some of them. This is the case of the verb trepar 'climb up'. A sentence such as Juan trepa al árbol (lit. 'John climbs up to the tree') is typical in Standard Spanish, but the pronominal use of the verb trepar as illustrated in (2) seems to be fine only in Argentinean and Chilean Spanish, since it is quite alien to the Peninsular varieties.

- (2) a. Pedro se trepa a los árboles (Argentina) peter he.PRON climbs.up to the trees 'Peter climbs up the trees'
 - b. Ven un tronco viejo y ahí se trepan (Chile) see.3PL one log old and there he.PRON climb.up.3PL 'They see an old log and they climb up there'

We also find some differences with respect to the Path component. It has been argued in the literature that Spanish speakers preferably use the verb alone or with one piece of Path information. It is very rare to find cases with more than one. In fact, Sebastián and Slobin (1994: 264-265) report that they have only two such cases in a total of 216 Spanish narratives (156 from South America, 60 from Spain). However, our data reveal some interesting differences. Let us have a look at Table 4.

Table	4.	Path	description	in	Spanish	n varieties
-------	----	------	-------------	----	---------	-------------

Spanish variety	Verbs and Info	rmation	Pieces of Path information		
	V-info	V+info	One	+One	
Chile	40% (9 cases)	60% (14 cases)	13 cases	1 cases	
Argentina	30% (6 cases)	70% (14 cases)	14 cases	0 cases	
Madrid	27% (6 cases)	73% (16 cases)	15 cases	1 case	
Aragón	26% (6 cases)	74% (17 cases)	15 cases	2 cases	
Basque Country	26% (7 cases)	74% (20 cases)	17 cases	3 cases	

In the Verbs and Information column, we have percentages for those cases where the verb is alone (V-info) and those where the verb has some extra information (V+info). If we compare those with the figures presented in previous studies, i.e. 37% vs 63% (see Table 1), we already see some differences among dialects, some gradation; but perhaps the most interesting data come from the third column, Pieces of Path information. Here we only count the number of accompanying pieces of information per verb, one or more than one. Due to the quite small number of informants (we have only six per variety), the results might not be statistically significant, but we think it really promising to have already found, in such a reduced sample, five cases of more than one piece of information in Aragonese Spanish and Basque Spanish speakers. We have to bear in mind that Sebastián and Slobin only found two cases in over two hundred narratives, whereas we have already doubled that number in only twelve narratives. Future research in this area with more informants will shed some light on this issue.

The other example that we would like to briefly discuss in this chapter comes from Aragonese, a minority language spoken in the northern part of Aragón, as shown in Figure 1 (cf. Alvar 1953, 1996; Castañer 1999; Hijazo-Gascón and Ibarretxe-Antuñano 2010; Martín Zorraquino and Enguita Utrilla 2000), and its deictic verbs ir/dir 'go', venir 'come' and their corresponding causatives trayer 'bring' and portar/levar 'carry'. The deictic system in Romance languages differs from one language to another in relation to the choice of deictic centre (Fillmore 1966; Gathercole 1977, 1978). Spanish and Portuguese only allow the speaker to be the deictic centre in a speech act, whereas this requirement is not necessary in other languages such as French, Italian, or Catalan. That is to say, if we ask the question Are you coming for a coffee?, Catalan speakers would reply Yes, I'm coming (as in English), whereas Spanish speakers would say Yes, I'm going.

Aragonese is a very special case because both systems are possible; it all depends on the Aragonese variety. Eastern varieties prefer the coming way and Western varieties the going way as illustrated in Example (3), which means 'I'll come to your house tomorrow in the afternoon.

- (3) a. Vendré ta casa tuya mañana de tardes come.FUT to house Poss.2.sG tomorrow of afternoon
 - b. Iré ta casa tuya mañana tardi go.FUT to house Poss.2.sG tomorrow afternoon

The geolinguistic situation of Aragonese (see Figure 1), in a diglossic situation with Spanish and in relative contact with Catalan in the East and Gascon in the North (cf. Enguita-Utrilla 2008), might be responsible for this perfect dialectal continuum in the deictic system of Aragonese.

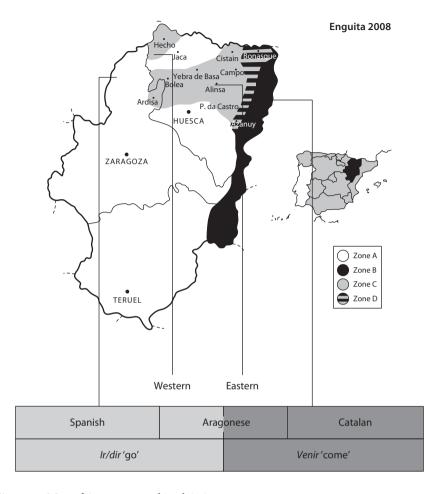


Figure 1. Map of Aragonese and its deictic system

4. Applying variation within typological patterns: Second language acquisition

The findings on intratypological differences reported above could be interesting for a wide variety of research areas in applied linguistics, such as translation, forensic linguistics, bi- or multilingualism, and second language teaching. In this last section we focus on one of them: the study of second language acquisition.

When dealing with two closely related languages, the risk of cross-linguistic influence and transfer is higher than in genetically different languages, since the assumptions made by the speakers about the similarities between their L1 and L2 might not be always right (Jarvis and Pavlenko 2008). In what follows we discuss some cases in the motion domain by Romance learners of Spanish as an L2 and by Spanish learners of Basque as an L2.4

One of the most important issues when studying languages from the same genetic group is the avoidance of "false friends". These cognates are similar in form but different in meaning and this often causes formal transfers resulting in embarrassing situations for the non-native speaker. False friends are also found in motion event descriptions. One well-known example is the case of Italian salire and Spanish salir. The formal resemblance is obvious but it causes important misunderstandings, since the Italian verb means 'go up' but the meaning of the Spanish verb is 'go out'.

Another interesting issue in Romance languages is that they do not have exactly the same linguistic resources for expressing motion events. One of the most remarkable differences is related to the auxiliary verb system. French and Italian use the auxiliary verb 'be' (Fr. être as in (4a), It. essere as in (4b)) for the past compound tense in certain motion verbs, mainly in the reflexive and in most of the unaccusative verbs, instead of the general auxiliary 'have' (Fr. avoir, It. avere), whereas Spanish only uses the auxiliary verb haber 'have' for all motion verbs as in (4c):

- (4) a. La fille est venue ce matin the.F.SG girl is come.PTCP.F.SG this morning
 - b. La bambina è venuta oggi mattina the.F.SG girl is come.PTCP.F.SG this morning
 - c. La chica ha venido esta mañana the.F.SG girl has come.PTCP this morning 'The girl has come this morning'

In addition to the auxiliary choice difference, it is important to notice that the past participle in French and Italian in (4a, b) agrees in gender and number with the subject but it does not in Spanish, as in (4c). This difference in agreement can lead to transfer mistakes in the L2 as one can see in (5):

(5) Bueno, parece alegrarse mucho de haberla encontrada (L2 Spanish, L1 French) well seems be glad much of have she ACC find PTCP.F.SG 'Well, he seems to be very glad to have found her'

^{4.} Data are elicited using several tools - well-known in the field - such as the Frog stories (Berman and Slobin 1994), the Canary Row cartoon (McNeill 2000), and the MPI put/take video stimuli (Bowerman et al. 2004).

^{© 2012.} John Benjamins Publishing Company All rights reserved

Another difference in linguistic resources is the use of adverbial pronouns to express Path sources and goals as illustrated in Examples (6) and (7) respectively:

French: *I'en suis venu hier (de Toulouse)*

I ADV.PRO am come.PTCP yesterday of Toulouse 'I came yesterday "from there" (from Toulouse)'

Marta se ne va oggi (di quì) Italian:

> marta she.PRON ADV.PRO goes today of here 'Marta is going "from here" today (from here)'

Catalan: Jordi s'en va content (d'aquí)

jordi he.PRON ADV.PRO goes happy of here 'Jordi is going "from here" happy (from here)'

Camille est y allée (à la plage) (7) a. French:

> camille is ADV.PRO go.PTCP.F.SG to the beach 'Camille has gone "there" (to the beach)'

Sì. Valeria ci viene (al cinema) Italian:

> yes valeria ADV.PRO comes to.the cinema 'Yes, Valeria is coming "there" (to the cinema)'

Catalan: Com hi vaig per carretera? (a Cambrils)

how ADV.PRO go by road to cambrils 'How do I go "there" by road? (to Cambrils)'

These adverbial pronouns, etymologically derived from the Latin adverbs IBI and INDE, remain in most of the Romance languages but they are lost in present-day Spanish.

In the same way, Latin-derived (verbal) prefixes are not equally productive or frequent across Romance languages. Kopecka (2006) points out that some French prefixes such as $r\acute{e}$ (re-, r(a)-) 'back, backwards' and em-/en- (< Lat. INDE) 'away, off' are still vital and transparent in this language nowadays. However, this is not the case in Spanish. Some of these prefixes are also found with a similar meaning in Spanish but their productivity is far from that reported in Kopecka's study for French. In Spanish, periphrases are preferred instead. These differences can have consequences for French learners of Spanish as an L2:

(8) El peso recae sobre la cabeza de Silvestre the weight refalls on the head of silvester 'The weight re-falls on Silvester's head'

The French learner follows the same strategy as in her native language and combines the Spanish equivalent prefix re- with caer 'fall'. In Spanish, however, its use is not the same. Although the prefix re- does exist in Spanish with the same iterative meaning as in French, its use is much more restricted. The verb recaer exists and it means 'to fall again' but only in a metaphorical way (e.g. recaer en las drogas 'relapse into drug addiction'), not in the physical sense as in (8).

Conceptual transfer, i.e. the influence of the language-mediated conceptual categories of one language on verbal performance in another language, is another interesting area in second language acquisition (Odlin 1989; Jarvis and Pavlenko 2007). An illustrative case is the confusion over the verb valence of similar verbs in Romance languages. Take, for example, the Spanish verb salir and the French verb sortir. Whereas salir is only used intransitively, sortir can be monovalent as in (9a) and bivalent as in (9b).

- (9) a. Elle sort de l'ecole she goes.out of the school 'She goes out of the school'
 - b. Elle sort sa main de l'arbre she takes out her hand of the tree 'She takes her hand out of the tree'

The different use of the verbs sortir and salir in these languages drives French learners to transfer their native pattern into Spanish and to employ the wrong verb salir 'go out' instead of the correct choice sacar 'take out' as illustrated in (10).

(10) No logra salir [la cabeza] del bote no achieves go.out the head of.the jar 'He cannot "go" [the head] out of the jar'

Another case of conceptual transfer within Romance languages is related to deictic verbs. As explained above, Spanish and Portuguese differ from the other Romance languages in the use of venir 'come', which is only used when motion is towards the speaker or towards a place where the speaker can be identified. The phonetic resemblance that the verb venir bears to their respective L1 counterparts (Fr., Cat. venir, It. venire) leads L2 speakers to assume a similarity in the use of the verb (Hijazo-Gascón and Ibarretxe-Antuñano 2009):

(11) No podré asistir a la conferencia de esta tarde por motivos de trabajo. Espero poder *venir a la siguiente charla.

no be able Fut. LsG attend to the talk of this afternoon for reasons of work hope.1.sg be.able come to the next talk

'Due to work, I won't be able to attend this afternoon's talk. I hope I'll be able to come to the next talk'

In the previous example, the L1 Catalan speaker uses the verb *venir* as in Catalan, but the correct verb choice in this deictic context should have been ir 'go'. The same situation occurs in their causative deictic counterparts. In (12), the French native speaker uses the verb *traer* 'bring' instead of the correct *llevar* 'carry'.

(12) El ciervo lo *trae colgado de los cuernos hasta un precipicio the deer he.ACC brings hang.PTCP of the antlers up.to one cliff (lit.) 'The deer brings him hanging from the antlers up to the cliff'

Intratypological differences are also shown in problems related to idiomaticity, that is, the production of non-target-like expressions. Some of these idiomaticity mistakes involve the choice of wrong lexical items; for example, instead of poner la mesa 'to lay the table' to say *colocar la mesa in Spanish. Poner and colocar 'place, put' are synonyms in some contexts but only the former can be used in this idiomatic expression. On some other occasions, however, idiomaticity mistakes need not be ungrammatical, but just different from the native rhetorical tendency, that is, different from the usual expression and rhetorical style that native speakers would employ in a given context. Let us illustrate this with an example from L2 Basque speakers, whose first language is Spanish.

One of the main characteristics of Basque is that, despite being a verb-framed language, speakers frequently describe Path in great detail. Instead of mentioning just the verb or the verb with one piece of information, it has been shown that Basque speakers prefer more complex path predicates such as the Complete Path (CP) construction (Ibarretxe-Antuñano 2004a, b). This construction comprises a structure in which "both source and goal of the same motion event are linguistically expressed in the same sentence, even if one of them - usually the goal - is semantically redundant" (Ibarretxe-Antuñano 2004b: 329) as illustrated in (13):

(13) Danak amildegitikan behera erori zian ibai batera all ABS cliff ABL LOC below ALL fall PERF AUX river one ALL 'All of them fell from the cliff down into the river'

Amildegitik behera is an example of the CP construction. The source is instantiated by a lexical item (amildegi 'cliff') and the goal by a spatial noun (behe 'below, ground part'). The important issue is that the semantic information provided by the spatial noun - downward movement - is already encoded in the verb erori 'fall'. What is more, it can be inferred by the other ground descriptions in this sentence (ibai batera 'to a river') and the world knowledge that we have about their spatial configuration, i.e. rivers are located underneath cliffs.

What is interesting about the CP construction is that it is not a grammatical requirement of Basque. Sometimes speakers use them, sometimes they do not. If a speaker chooses not to employ a CP construction, the sentence would be still grammatically correct. That is, they could also say amildegitik erori (cliff.ABL fall) 'fall from the cliff' and ibaira erori (river.ALL fall) 'fall to the river'. However, all Basque native speakers use this construction; it seems to be a typical feature of motion event descriptions in this language, part of their 'thinking-for-speaking'. A previous study⁵ on Basque as a second language (Ibarretxe-Antuñano 2004c) demonstrates that second language learners do not use this construction. Out of twelve subjects, there are only two instances of this construction. Despite being proficient learners, whose linguistic competence is near native, these L2 speakers lack the pragmatic competence required by native speakers for the description of motion events.

Something similar happens with French and Italian speakers of Spanish. In this case they often reproduce a causative construction which is typical in Italian and French but not used in Spanish:

(14) El ciervo hace caer al niño en el lago the deer makes fall to the boy in the lake (lit.) 'The deer make fall the boy in the lake'

This construction corresponds to the sentences Le cerf fait tomber le garçon and Il cervo fa cadere il bambino in L1 French and L1 Italian, respectively. It is not the case that the causative construction in Spanish is ungrammatical or difficult to understand, but it is not idiomatic; it is a cross-linguistic influence from the rhetorical style they use in their L1 narratives. For more information on caused motion constructions in Spanish see Lewandowski (this volume) and on caused motion acquisition in French and English monolinguals, bilinguals and L2 adult speakers see Engemann et al. (this volume).

Conclusions

In this chapter, our main goal has been to highlight the importance of studying intratypological and dialectal variation in motion events. We argue that this type of analysis is enriching for typological research for two reasons. On the one hand, intratypological differences such as the Path salience cline demonstrate that binary classifications such as Talmy's lexicalisation pattern theory cannot capture all the characteristic ways in which speakers talk about motion in their corresponding languages. This finding confirms that, as Filipović and Jaszczolt

^{5.} The study is conducted on twelve Spanish native speakers. All received formal teaching for the general Basque language examination EGA (C1 level/ALTE Level 5). Data are elicited following the standard procedure for the frog stories (Berman and Slobin 1994).

^{© 2012.} John Benjamins Publishing Company All rights reserved

point out in the introductory chapter, any cross-cultural contrastive study needs to address "not only the systematic differences pertaining to language as a code [...] but also the so-called 'pragmatic competence'". All the languages on the Path salience cline belong to a typological group - verb-, satellite-, or equipolentlyframed - because they codify semantic components such as Path on different parts of the sentence - the main verb, the satellite, or both - but the details that speakers of these languages provide in their motion descriptions vary in different degrees. Mapuche and Squliq speakers, for instance, offer few details outside the verb, while Chantyal and Basque speakers just follow the opposite tendency. These differences are crucial since they point out to possibly different ways of conceptualising motion events. On the other hand, dialectal differences clearly make evident the need for closer contrastive analyses within one language; dialects not only differ in the number and expressiveness of linguistic resources (e.g. Manner and Path in Spanish varieties) but also in the type of linguistic items (e.g. deictic system in Aragonese). This diatopic variation confirms that there is linguistic variation at different levels in the lexicalisation and conceptualisation of motion events. Motion is possibly a universal concept, but the way it is codified and conceptualised varies across cultures and languages. In sum, this part adds new data to the debate on universal vs. language specific features for spatial description. We have also shown that intratypological and dialectal differences in the description of motion events can also be successfully applied to the study of second language acquisition. We argue that these intratypological differences are worth examining since they would help us shed some light on how second language phenomena such as transfer and cross-linguistic influence work. Therefore, research on second language acquisition means a solid empirical basis for investigating motion events from a cross-linguistic and cross-culture perspective – an investigation that fulfils all the "rigorous and regimented" requirements of any scientific research methodology (see comments in Filipović and Jaszczolt's introduction). Furthermore, this research will allow us to characterise and differ between universal and languagespecific factors underlying speakers' motion utterances in both language acquisition and the conceptualisation of motion events.

Despite these results, we have only started to unveil the nuances of intratypological and dialectal variation. The data set in this chapter is somewhat limited; this research would benefit from more informants, more languages, and more dialects. It is nevertheless the first step, and future work will have to investigate and expand the research lines opened in this study.

References

- Aksu-Koç, A. 1994. Development of linguistic forms: Turkish. In Relating Events in Narrative, eds., R. Berman & D. I. Slobin, 329-388. Hillsdale, NJ: Lawrence Erlbaum.
- Alvar, M. 1953. El dialecto aragonés. Madrid: Gredos.
- Alvar, M, ed. 1996. Manual de dialectología hispánica: el español de España. Barcelona: Ariel.
- Ameka, F., and J. Essegbey. In press. Serialising languages: Satellite-framed, verb-framed, or neither. In African Comparative and Historical Linguistics: Proceedings of the 32th annual conference on African linguistics, eds., L. Hyman & I. Maddieson. Awrenceville, NJ: Africa
- Arnal, Ma L., and V. Lagüéns. In press. Léxico diferencial e historia: a propósito del Diccionario diferencial del español de Aragón (DDEAR). In Actas del VIII Congreso internacional de historia de la lengua española. Santiago de Compostela, 14-18 septiembre 2009.
- Bavin, E. L. 2004. Focusing on 'where'. An analysis of Warlpiri frog stories. In Relating Events in Narrative: Typological and Contextual Perspectives, eds., S. Strömqvist & L. Verhoeven 17-35. Hillsdale, NJ: Lawrence Erlbaum.
- Becerra-Parra, R. 2008. Viajar en Mapuche: ¿una lengua de marco equipolente? Unpublished MA research paper. Universidad de Concepción, Chile.
- Berman, R., and D. I. Slobin. 1994. Relating Events in Narrative. Hillsdale, NJ: Lawrence Erlbaum.
- Berthele, R. 2004. The typology of motion and posture verbs: A variationist account. In Dialectology Meets Typology, ed., B. Kortmann, 93–126. Berlin: Mouton de Gruyter.
- Berthele, R. 2006. Ort und Weg: Eine vergleichende Untersuchung der sprachlichen Raumreferenz in Varietäten des Deutschen, Rätoromanischen und Französischen. Berlin: Mouton de Gruyter.
- Bowerman, M., et al. 2004. Put project: The cross-linguistic encoding of placement events. In Field Manual Volume 9, ed., A. Majid, 10-24. Nijmegen: Max Planck Institute for Psycholinguistics.
- Cadierno, T. 2004. Expressing motion events in a second language: A cognitive typological approach. In Cognitive Linguistics, Second Language Acquisition and Foreign Language Pedagogy, eds., M. Achard & S. Neimeier, 13–49. Berlin: Mouton de Gruyter.
- Cadierno, T. 2008. Learning to talk about motion in a foreign language. In Handbook of Cognitive Linguistics and Second Language Acquisition, eds., P. Robinson & N. C. Ellis, 239-274. London: Routledge.
- Cadierno, T. 2010. Motion in Danish as a Second Language: Does the Learner's L1 Make a Difference? In Linguistic Relativity in SLA: Thinking for Speaking, eds., Zhao Hong Han & T. Cadierno, 1–33. Bristol: Multilingual Matters.
- Cadierno, T., and M. Robinson. 2009. Language typology, task complexity and the development of L2 lexicalization patterns for describing motion events. Annual Review of Cognitive *Linguistics* 7: 245–276.
- Cadierno, T., and L. Ruiz. 2006. Motion events in second language acquisition. Annual Review of Cognitive Linguistics 4: 183-216.
- Castañer Martín, R. M. 1999. Las hablas altoaragonesas. Estado actual de la cuestión. In Jornadas de Filología Aragonesa II. En el aniversario del AFA, ed., J. M. Enguita Utrilla, 265-317. Zaragoza: Institución "Fernando el Católico".

- Chen, L. 2005. The Acquisition and Use of Motion Event Expressions in Chinese. Unpublished Ph.D. dissertation, University of Louisiana, Lafavette.
- De Knop, S., and R. Dirven. 2008. Motion and location events in German, French and English: A typological, contrastive and pedagogical approach. In Cognitive Approaches to Pedagogical Grammar, eds., S. de Knop & T. de Rycker, 295-324. Berlin/New York: Mouton de Gruyter.
- Engberg-Pedersen, E., and F. Blytmann Trondhjem. 2004. Focus on action in motion descriptions. The case of West-Greenlandic. In Relating Events in Narrative: Typological and Contextual Perspectives, eds., S. Strömqvist & L. Verhoeven, 59-88. Hillsdale, NJ: Lawrence Erlbaum.
- Enguita-Utrilla, J. M. 2008. Spanish and historical dialect in Aragon. International Journal of the Sociology of Language 193/194: 79-89.
- Filipović, L. 2007. Talking About Motion: A Crosslinguistic Investigation of Lexicalisation Patterns. Amsterdam & Philadelphia: Benjamins.
- Filipović, L., and I. Vidaković. 2010. Typology in the L2 classroom: Acquisition from a typological perspective. In Inside the Learner's Mind: Cognitive Processing in Second Language Acquisition, eds., M. Pütz & L. Sicola, 269–291. Amsterdam & Philadelphia: Benjamins.
- Fillmore, C. 1966. Deictic categories in the semantics of come. Foundations of Language 2: 219-227.
- Gathercole, V. 1977. A study of the comings and goings of the speakers of four languages: Spanish, Japanese, English and Turkish. Kansas Working Papers in Linguistics 2: 61–94.
- Gathercole, V. 1978. Towards a universal for deictic verbs of motion. Kansas Working Papers in Linguistics 3: 72-88.
- Gullberg, M. 2009. How English speakers of L2 Dutch talk and gesture about placement. Annual Review of Cognitive Linguistics 7: 221–244.
- Guo, J., et al., eds. 2009. Crosslinguistic Approaches to the Psychology of Language: Research in the Tradition of Dan Isaac Slobin. New York: Psychology Press.
- Han, Z. H., and T. Cadierno, eds. 2010. Linguistic Relativiy in SLA: Thinking for Speaking. Bristol: Multilingual Matters.
- Harley, B. 1989. Transfer in the written compositions of French immersion students. In Transfer in Language Production, eds., H. W. Dechert & M. Raupach, 3–19. Norwood, NJ: Ablex.
- Harley, B., and M. Lou King. 1989. Verb lexis in the written compositions of young L2 learners. Studies in Second Language Acquisition 11: 415-439.
- Hasko, V. 2010. The Role of Thinking for Speaking in Adult L2 Speech: The Case of (Non)unidirectionality Encoding by American Learners of Russian. In Linguistic Relativity in SLA: Thinking for Speaking, eds., Zhao Hong Han & T. Cadierno, 34-58. Bristol: Multilingual Matters.
- Hijazo-Gascón, A. 2011. La expresión de eventos de movimiento y su adquisición en segundas lenguas. Unpublished PhD thesis. University of Zaragoza.
- Hijazo-Gascón, A., and I. Ibarretxe-Antuñano. 2009. Deictic verbs in second language acquisition. Paper presented at Frames and constructions: A conference in honor of Charles J. Fillmore. University of California, Berkeley, 31 July-2 August 2009.
- Hijazo-Gascón, A., and I. Ibarretxe-Antuñano. 2010. Tipología, lexicalización y dialectología aragonesa. Archivo de Filología Aragonesa 66: 181-215.
- Hohenstein, J. M., A. R. Eisenberg, and L. R. Naigles. 2006. Is he floating across or crossing afloat? Cross-influence of L1 and L2 Spanish-English bilingual adults. Bilingualism: Language and Cognition 9 (3): 249–261.
- © 2012. John Benjamins Publishing Company All rights reserved

- Huang, S., and M. Tanangkingsing. 2005. Reference to motion events in six Western Austronesian languages. Towards a semantic typology. Oceanic Linguistics 44 (2): 307-340.
- Ibarretxe-Antuñano, I. 2004a. Motion events in Basque narratives. In Relating Events in Narrative: Typological and Contextual Perspectives, eds., S. Strömqvist & L. Verhoeven, 89-111. Hillsdale, NJ: Lawrence Erlbaum.
- Ibarretxe-Antuñano, I. 2004b. Language typologies in our language use: The case of Basque motion events in adult oral narratives. Cognitive Linguistics 15 (3): 317-349.
- Ibarretxe-Antuñano, I. 2004c. Motion events in second language acquisition: Spanish and Basque. Paper presented at the EUROSLA Conference, University of the Basque Country, Donostia-San Sebastián, 8-11 September 2004.
- Ibarretxe-Antuñano, I. 2004d. Dicotomías frente a continuos en la lexicalización de los eventos de movimiento. Revista Española de Lingüística 34 (2): 481-510.
- Ibarretxe-Antuñano, I. 2009. Path salience in motion events. In Crosslinguistic Approaches to the Psychology of Language: Research in the Tradition of Dan Isaac Slobin, eds., Guo Jiansheng et al., 03-414. New York: Psychology Press.
- Ibarretxe-Antuñano, I. 2010. Cuestiones pendientes de la tipología semántica para el análisis de los eventos de movimiento. In La gramática del sentido: léxico y sintaxis en la encrucijada, eds., J. F. Val-Álvaro & M. del Carmen Horno-Chéliz. Zaragoza: PUZ.
- Jarvis, S., and A. Pavlenko. 2007. Crosslinguistic Influence in Language and Cognition. New York: Routledge.
- Kellerman, E., and A. Van Hoof. 2003. Manual accents. International Review of Applied Linguistics 41: 251-269.
- Koch, P., and W. Oesterreicher. 1985. Sprache der Nähe-Sprache der Distanz. Mündlichkeit und Schriftlichkeit im Spannungsfeld von Sprachtheorie. Romanistisches Jahrbuch 36: 15–34.
- Kopecka, A. 2006. The semantic structure of motion verbs in French: Typological perspectives. In Space in Languages: Linguistic Systems and Cognitive Categories, eds., M. Hickmann & S. Robert, 83-101. Amsterdam & Philadelphia: Benjamins.
- Martín Zorraquino, M. A., and J. María Enguita Utrilla. 2000. Las lenguas de Aragón. Zaragoza: Caja de Ahorros de la Inmaculada.
- McNeill, D. 2000. Analogic/Analytic representations and cross-linguistic differences in thinking for speaking. Cognitive Linguistics 11: 43-60.
- Navarro, S., and E. Nicoladis. 2005. Describing motion events in adult L2 Spanish narratives. In Selected Proceedings of the 6th Conference on the Acquisition of Spanish and Portuguese as First and Second Languages, ed., D. Eddington, 102-107. Somerville, MA: Cascadilla Proceedings Project.
- Negueruela, E., J. P. Lantolf, S. R. Jordan, and J. Gelabert. 2004. The "private function" of gesture in second language speaking activity: A study of motion verbs and gesturing in English and Spanish. International Journal of Applied Linguistics 14 (1): 113-147.
- Noonan, M. 2003. Motion events in Chantyal. In Motion, Direction, and Location in Languages. In Honor of Zygmunt Frajzyngier, eds., E. Shay & U. Seibert, 211-234. Amsterdam & Philadelphia: Benjamins.
- Odlin, T. 1989. Language Transfer: Cross-linguistic influence in language learning. Cambridge: Cambridge University Press.
- Oesterreicher, W. 2001. Historizität-Sprachvariation, Sprachverschiedenheit, Sprachwandel. In Language Typology and Language Universals: An International Handbook, eds., M. Haspelmath et al., 1554-1595. Berlin: Mouton de Gruyter.

- Ragnarsdóttir, H., and S. Strömqvist. 2004. Time, space and manner in Icelandic and Swedish. In Relating Events in Narrative: Typological and Contextual Perspectives, eds., S. Strömqvist & L. Verhoeven, 113-141. Hillsdale, NJ: Lawrence Erlbaum.
- Sampaio, W., C. Sinha, and V. da Silva. 2009. Mixing and Mapping: Motion, Path, and Manner in Amondawa. In Crosslinguistic Approaches to the Psychology of Language: Research in the Tradition of Dan Isaac Slobin, eds., Guo Jiansheng et al., 427–439. New York: Psychology Press.
- Schultze-Bernt, E. 2006. Sketch of a Jaminjung Grammar of Space. Grammars of Space. In Grammars of Space: Explorations in Cognitive Diversity, eds., S. C. Levinson & D. P. Wilkins, 63-113. Cambridge: Cambridge University Press.
- Schultze-Bernt, E. 2007. On manners and paths of refining Talmy's typology motion events via language documentation. In Proceedings of the Conference on Language Documentation and Linguistic Theory, eds., P. K. Austin et al., 223-233. London: SOAS.
- Schwarze, C. 1985. "Uscire" e "andari fuori": Struttura sintattica e semantica lessicale. In Sintassi e morfologia della lingua italiana d'uso. Teoria ed applicazioni, eds., A. F. de Bellis & L. M. Savola, 255-371. Roma: Bulzoni.
- Scsybelski-Zborowski, R. 2006. Las historias de la rana en polaco. Unpublished MA research paper. Universidad de Zaragoza.
- Sebastián, E., and D. I. Slobin. 1994. Development of linguistic forms: Spanish. In Relating Events in Narrative, eds., R. Berman & D. I. Slobin, 239-284. Hillsdale, NJ: Lawrence Erlbaum.
- Slobin, D. I. 1996. Two ways to travel: Verbs of motion in English and Spanish. In Grammatical Constructions: Their Form and Meaning, eds., M. Shibatani & S. A. Thompson, 195-220. Oxford: Oxford University Press.
- Slobin, D. I. 1997. Mind, code, and text. In Essays on Language Function and Language Type: Dedicated to T. Givón, eds., J. Bybee et al., 437-467. Amsterdam & Philadelphia: Benjamins.
- Slobin, D. I. 2004. The many ways to search for a frog: Linguistic typology and the expression of motion events. In Relating Events in Narrative: Typological and contextual perspectives, eds., S. Strömqvist & L. Verhoeven, 219–257. Hillsdale, NJ: Lawrence Erlbaum.
- Slobin, D. I. 2006. What makes manner of motion salient? Explorations in linguistic typology, discourse, and cognition. In Space in Languages: Linguistic Systems and Cognitive Categories, eds., M. Hickmann & S. Robert, 59–81. Amsterdam & Philadelphia: Benjamins.
- Stam, G. 2006. Thinking for speaking about motion: L1 and L2 speech and gesture. IRAL 44 (2): 145-171.
- Stam, G. 2010. Can an L2 speaker's patterns of thinking for speaking change? In Linguistic Relativity in SLA: Thinking for Speaking, eds., Zhao Hong Han & T. Cadierno, 59-83. Bristol: Multilingual Matters.
- Strömqvist, S., and L. Verhoeven, eds. 2004. Relating Events in Narrative: Typological and Contextual Perspectives. Hillsdale, NJ: Lawrence Erlbaum.
- Sugiyama, Y. 2005. Not all verb-framed languages are created equal: The case of Japanese. Proceedings of the thirty-first annual meeting of the Berkeley Linguistics Society 31: 299-310.

- Talmy, L. 1985. Lexicalization patterns: Semantic structure in lexical forms. In Language Typology and Syntactic Description. Vol. 3: Grammatical Categories and the Lexicon, ed., T. Shopen 36–149. Cambridge: Cambridge University Press.
- Talmy, L. 2000. Toward a Cognitive Semantics. Cambridge, MA: MIT Press.
- Wilkins, D. 2004. The verbalization of motion events in Arrernte. In Relating Events in Narrative: Typological and Contextual Perspectives, eds., S. Strömqvist & L. Verhoeven, 143-157. Hillsdale, NJ: Lawrence Erlbaum.
- Zlatev, J., and P. Yangklang. 2004. A third way to travel: The place of Thai in motion-event typology. In Relating Events in Narrative: Typological and Contextual Perspectives, eds., S.Strömqvist & L. Verhoeven, 159-190. Hillsdale, NJ: Lawrence Erlbaum.