

- MAYER, MERCER. 1969. *Frog, where are you?* New York: Dial Press.
- , and MARIANNA MAYER. 1971. *A boy, a dog, a frog, and a friend: A new book by Mercer and Marianna Mayer.* New York: Dial Press.
- PAVONE, JAMES. 1980. *Implicational scales and English dialectology.* Bloomington, IN: Indiana University dissertation.
- RICKFORD, JOHN R. 1991. Variation theory: Implicational scaling and critical age limits in models of linguistic variation, acquisition, and change. In Huebner and Ferguson, 225-46.
- ROBERTS, JULIE. 1997. Acquisition of variable rules: A study of (-t,d) deletion in preschool children. *Journal of Child Language* 24.351-72.
- ROBISON, RICHARD E. 1990. The primacy of aspect: Aspectual marking in English interlanguage. *Studies in Second Language Acquisition* 12.315-30.
- . 1995. The aspect hypothesis revisited: A cross-sectional study of tense and aspect marking in interlanguage. *Applied Linguistics* 16.344-70.
- SEBASTIÁN, EUGENIA, and DAN I. SLOBIN. 1994. Development of linguistic forms: Spanish. In Berman and Slobin, 239-84.
- SCHecter, SANDRA R., and ROBERT BAYLEY. 1997. Language socialization practices and cultural identity: Case studies of Mexican-descent families in California and Texas. *TESOL Quarterly* 31.513-41.
- SHIRAI, YASUHIRO. 1993. Inherent aspect and the acquisition of tense/aspect morphology in Japanese. *Argument structure: Its syntax and acquisition*, ed. by Heizo Nakajima and Yukio Otsu, 185-211. Tokyo: Kaitakusha.
- , and ROGER W. ANDERSEN. 1995. The acquisition of tense-aspect morphology: A prototype account. *Language* 71.743-62.
- , and ATSUKO KURONO. 1998. The acquisition of tense-aspect marking in Japanese as a second language. *Language Learning* 48.245-79.
- SILVA-CORVALÁN, CARMEN. 1994. *Language contact and change: Spanish in Los Angeles.* Oxford: Oxford University Press.
- SMITH, CARLOTA. 1983. A theory of aspectual choice. *Language* 59.479-501.
- TARONE, ELAINE, SUSAN GASS, and ANDREW COHEN (eds.) 1994. *Research methodology in second-language acquisition.* Hillsdale, NJ: Lawrence Erlbaum.
- VENDLER, ZENO. 1967. *Linguistics in philosophy.* Ithaca, NY: Cornell University Press.
- WEIST, RICHARD M., HANNA WYSOCKA, KATARZYNA WITKOWSKA-STADNIK, EWA BUCZOWSKA, and EMILIA KONIECZNA. 1984. The defective tense hypothesis: On the emergence of tense and aspect in child Polish. *Journal of Child Language* 11.347-74.
- WONG FILLMORE, LILY. 1991. When learning a second language means losing the first. *Early Childhood Research Quarterly* 6.323-47.
- YOUNG, RICHARD. 1991. *Variation in interlanguage morphology.* New York: Peter Lang.

ON 'BECOMING' IN SPANISH: A CORPUS ANALYSIS OF VERBS EXPRESSING CHANGE OF STATE

DAVID EDDINGTON
Mississippi State University

ABSTRACT. This study focuses on the verbs *llegar a ser*, *ponerse*, *volverse*, *quedarse*, *convertirse*, *transformarse*, and *hacerse*. The purpose was to extract and analyze instances of these verbs from two large corpora, and to find specific patterns of semantic and syntactic factors that would aid in distinguishing between their uses. Previous research suggests four factors that distinguish the uses of these verbs: 1) whether the verb's predicate is nominal or adjectival, 2) whether the change is gradual or abrupt, 3) whether the change occurs passively or actively, and 4) whether the noun or adjective of the predicate is expressed with *ser* or *estar*. These factors were applied to all 1,283 instances in the corpora. In general, the choice of verb is not dependent on the specific noun or adjective of the predicate. Moreover, there is a great deal of overlap between the uses of each verb. Apparently, Spanish speakers are free to choose between two or three related verbs when expressing a change of state in a given context.*

INTRODUCTION. Spanish is a language rich in verbs that express changes of state. One would assume that such diversity would have made these verbs a hotbed for discussion and analysis, in much the same way that distinguishing between the copulatives *ser* and *estar* or the prepositions *por* and *para* have been. Yet they have been the subject of few studies from either a pedagogical or a linguistic standpoint. For example, Fente (1970:157-158) searched a wide variety of standard Spanish reference grammars and found either no mention of the different change of state verbs, or brief allusions with little substantive value. Therefore, the goal of the present study is to remedy this situation, and spark an interest in further inquiry into the topic. The purpose of this study is twofold: 1) to investigate the

* This study was carried out with the support of a Humanities and Arts Research Grant from Mississippi State University.

different uses of the change of state verbs in Spanish within a corpus-based framework, and 2) to provide a corpus of utterances containing these verbs to aid researchers in conducting further investigation into the topic. From two large corpora 1,283 specific instances of change of state verbs were extracted, and each instance was analyzed according to four factors that have been cited in the literature as important in distinguishing between the uses of each verb. It was hoped that the corpus analysis would reveal unique combinations of the four factors considered. In this way, the different uses associated with each verb would become apparent. However, the reader should be warned that the relationship between the change of state verbs is extremely complex and does not lend itself to the formulation of simplistic rules.

The investigation concentrates on the seven change of state verbs that seem to be the most commonly used: *llegar a ser*, *ponerse*, *volverse*, *quedarse*¹, *convertirse*, *transformarse*, and *hacerse*. These verbs generally express the meaning 'to become' in English. Other change of state verbs were eliminated from consideration a priori. For example, the verbs *trocarse*, *tornarse*, and *pasar a ser* are much less frequent and have an antiquated feel to them. Verbs that express both the change and result of the change are also excluded (e.g. *engordarse* 'to become fat', *aburrirse* 'to become bored').

The remainder of the paper is structured as follows. The first section contains a review of the literature and the relevant factors that have been applied to the issue at hand. This is followed by a description of the corpora that were used in the study, and the factors that were applied to the change of state verbs found therein. The results are discussed in the final section, and the instances extracted from one of the corpora are found in Appendix B.

1. PREVIOUS STUDIES. A number of researchers have studied change of state verbs in Spanish from a synchronic point of view (Coste and Redondo 1965; Crespo 1949; Eberenz 1985; Fente 1970). More recent Spanish grammars merely cite the findings of these authors (e.g. Butt and Benjamin 1994). The historical development of these verbs has also been explored (Pountain 1984). Nevertheless, several of the authors who have studied the synchronic aspects of these verbs express the sentiment that their treatments of the topic are exploratory or preliminary in nature, and in no way represent a thorough analysis. The main thrust of each study is to propose criteria that are helpful in distinguishing between the various change of state verbs, and then to exemplify the utility of the proposed criteria by demonstrating how they differentiate between two or more verbs. The primary drawback of these studies is that they do not consistently apply all of the criteria to all of the verbs they analyze, nor do they each analyze the same verbs. Rather than review

¹It should be noted that another use of *quedarse* is to denote, not the inception of a new state, but the continuation of a state previously entered into: *Se quedó con hambre*, 'He was still hungry'.

how each of these researchers approached the subject, the focus will be on the criteria they applied that are more relevant to the purposes of the present study.

One factor that appears to partially govern the use of change of state verbs is whether the sentence contains a predicate noun or adjective (Coste and Redondo 1965; Crespo 1949; Eberenz 1985; Fente 1970). Certain verbs are almost exclusively followed by a predicate noun, sometimes modified by an adjective, others by predicate adjectives, and others by either, as in 1.

- (1) a. Noun: *Se convirtió en un hombre incapaz de amar*
'He became a man incapable of loving'
- b. Adjective: *Se pusieron tristes*
'They became sad'

The speed at which the change occurs is also cited as a factor (Coste and Redondo 1965; Crespo 1949; Eberenz 1985; Fente 1970). Some verbs are thought to imply rapid changes while others describe changes that take place over an extended period of time as in 2.

- (2) a. Slow: *Llegó a ser capitán*
'He became a captain'
- b. Fast: *Se puso colorada de vergüenza*
'She became red with shame'

Another factor in distinguishing between verbs involves the degree to which the change comes about as a result of intentional effort, or whether the change occurs passively or unexpectedly (Coste and Redondo 1965; Crespo 1949; Eberenz 1985; Fente 1970), as shown in 3.

- (3) a. Passive: *Los que lo ven se quedan asombrados*
'Those who see it become surprised'
- b. Active: *Asistió al seminario y se hizo cura*
'He attended seminary and became a priest'

Certain verbs appear to involve permanent changes in the fundamental essence or nature of the thing undergoing the change, while others involve temporary changes in non-essential characteristics (Coste and Redondo 1965; Crespo 1949; Eberenz 1985; Fente 1970) as shown in 4.

- (4) a. Permanent/Essential: *Después de la guerra, la gente se volvió muy pesimista*
'After the war, people became very pessimistic'
- b. Temporary/Non-essential: *Al oír eso, se puso pensativa*
'When she heard that, she became pensive'

The use of adjectives that typically occur with the copulative *ser*, in contrast to those that typically occur with *estar*, is given as a factor that helps distinguish between

some change of state verbs (Coste and Redondo 1965; Eberenz 1985; Fente 1970), as shown in 5.

- (5) a. *Ser: Mi disgusto con él llegó a ser grande. Era grande*
 'My displeasure with him became great' 'It was (*ser*) great'
 b. *Estar: Nos pusimos enfermos Estábamos enfermos*
 'We became sick' 'We were (*estar*) sick'

The following sections describe how these factors were applied in the analysis of the corpora.

2. THE STUDY.

2.1. THE CORPORA. It is fairly common in contemporary linguistic analyses to devise an account of some linguistic phenomenon that is based on a mere handful of examples. The danger with this approach is that one is often predisposed to find examples that coincide with one's particular preconceived assumptions, and to overlook those that run counter to those assumptions. Morin's study (1999) of Spanish word markers clearly exposes the weaknesses of such an investigative strategy. She demonstrates that the criteria proposed to distinguish between words that end in word markers, and those that do not, do not hold up when a much larger number of examples is considered. In a similar vein, Eddington (1996) found that the relationship between certain derivational suffixes and diphthongization in Spanish word stems is far from binary, as previous investigation had considered it to be. This becomes apparent only when a large number of examples are taken into consideration.

Moreover, the advent of quantitative analytical tools has greatly increased the feasibility of corpus-based studies, an approach that previously had been labor intensive and thus restricted in its appeal. Up until the late 1980s, the ability of researchers to study linguistic phenomena via large corpora was extremely limited; this is why analyses often included only limited amounts of data. However, recent advances in computer technology, coupled with the growing availability of linguistic corpora have reversed the situation. As a result, current linguistic theories must be able to hold up against a much wider base of evidence.

Therefore, in order to avoid the difficulties that arise when linguistic accounts are founded on a small number of examples, a corpus-based analysis was performed that involved a large number of instances of change of state verbs. The verbs were extracted from two sources. The first is a collection of 1.1 million words of spoken Peninsular Spanish (Marcos Marín). All references to this corpus in the present paper are given according to the guidelines adopted by the compilers of the corpus. The second contains 1.3 million words of text from 15 contemporary novels written by authors from several different countries.² The surname of the author is used to cite references to this corpus (see Appendix A).

²This corpus was compiled by the Humanities Research Center at Brigham Young University. See Appendix A for a list of novels it contains.

These corpora were chosen for three reasons. First, a comprehensive account of the issue should include data that represent both written and spoken registers. Second, since there might be minor dialectal variations, it is important to include data from a variety of dialect areas. Third, the number of readily available Spanish corpora is presently not large, and the two corpora considered were simply the most accessible.

Using a text retrieval and indexing program called Word Cruncher, all cases of the seven change of state verbs in question were extracted, along with the paragraph in which they appeared. Other uses of the verbs that do not entail changes of state were eliminated. This search yielded a total of 1,283 change of state verbs. Table 1 indicates the frequency of occurrence of each verb.

VERB	WRITTEN		SPOKEN	
	#	per million	#	per million
<i>convertirse</i>	242	186	43	39
<i>quedarse</i>	205	158	102	93
<i>hacerse</i>	178	137	34	31
<i>ponerse</i>	130	100	69	63
<i>volverse</i>	122	94	14	13
<i>transformarse</i>	72	55	7	6
<i>llegar a ser</i>	53	41	12	11
TOTALS	1002	771	281	255

TABLE 1. *Frequency of the Change of State Verbs in the Corpora*

The major difference between the uses of the change of state verbs is that in the written language they are roughly three times as frequent as in the spoken language. The relative frequency of each verb differs somewhat in each corpus. For example, *convertirse* is the most common change of state verb in the written corpus, while *quedarse* is the most frequently used in the spoken corpus. However, a Spearman rank order correlation indicates that there is a significant degree of similarity in terms of the frequency ranking of each verb in the two corpora ($\rho = .786$ (5), $p < .05$, two-tailed). This means that the apparent differences in rank order between the two corpora are not significant.

2.2. SYNTACTIC AND SEMANTIC FACTORS. As discussed in Section 1, a number of researchers have suggested criteria that are relevant to change of state verbs. Four of these criteria were applied to each of the change of state verbs in the corpora. These criteria were chosen from among those mentioned in the literature because they could be applied equally to all seven verbs considered. Of course, other criteria have been proposed, but they are often quite subjective and difficult to apply. For example, Crespo (1949) and Fente (1970) note that *volverse* is used with adjectives that describe physical, mental, and emotional states, as well as colors. While this might be true, it is not a helpful criterion; it is difficult to con-

ceive of an adjective that describes something other than a physical, mental, or emotional state, or a color. In the same vein, Fente (1970) cites the abnormality or unexpectedness of a change as a factor in selecting *ponerse*. Coste and Redondo (1965) and Crespo (1949) feel that *volverse* is used to express radical, strange, or unexpected changes. When judging a change of state verb in the context of a complete paragraph, it is extremely difficult to determine whether a change should be classified as normal or abnormal, or expected or unexpected. For this reason, these criteria were eliminated from consideration.

The four remaining factors were applied to each instance in the corpus, and each instance was judged within the paragraph in which it appeared. The first factor considered was whether the verb had a noun or adjective predicate as in 1. In a small handful of examples, as in 6, neither a noun nor an adjective was involved.

- (6) a. *Es lo que voy a llegar a ser* (Viñas)
 'It's what I'm going to become'
 b. *La madre se ha quedado como una escupidera vieja* (Cortázar)
 'The mother has become like an old spittoon'

In these instances, the noun/adjective variable was left blank.

The second factor is the amount of time required for the change to reach completion (see 2). Previous studies indicate that some verbs occur with slow, gradual changes and others with fast changes. In order to be more precise, a fast change was defined in the current study as one that could occur within a single day, and a slow one as taking more than a day.

The third factor has to do with the degree to which the thing that changes plays an active or passive role in the change (see 3). An active role is played by an animate object that willfully, consentingly, and voluntarily participates in bringing about the change. Changes involving inanimate objects were also considered active if a third party played a consenting, voluntary role in bringing about the change. Passive changes, on the other hand, occur as the result of the expected, natural progression of time and circumstance.

Some of the factors mentioned in the literature and cited in Section 1 are related, and might be subsumed under the same heading. The factors essential/non-essential and permanent/temporary can both be subsumed under the distinction between the verbs *ser* and *estar*. *Estar* expresses conditions at a given moment in time, and thus, incorporates the idea of a change in a non-essential trait, or a deviation from a putative norm. *Ser*, on the other hand, is used with characteristics that are viewed as essential and represent a normative state of affairs. Not only does the *ser/estar* distinction entail the other two, but it is also easier to determine whether the state resulting from the change would be expressed with *ser* or *estar*. Although previous studies make use of distinctions such as permanent versus temporary and essential properties versus non-essential properties, these factors proved too semantically slippery to be applied to the instances in the database with any

consistency. For this reason, they were not considered. The formula shown in 7 was used to determine whether *ser* or *estar* was the norm.

- (7) a. *Se hizo soldado, por lo tanto, era soldado*
 'He became a soldier, therefore, he was (*ser*) a soldier'
 b. *Se pusieron rígidos, por lo tanto, estaban rígidos*
 They became rigid, therefore, they were (*estar*) rigid'

The application of the four factors is exemplified in 8.

- (8) *Se hizo tarde*
 'It became late'
 Factors: Adjective, Fast, Passive, Ser

Tarde is an adjective. The change takes less than a day to complete. The change is the passive result of circumstance. *Se hizo tarde, por lo tanto, era tarde* 'It was (*ser*) late'. Of course, these factors are not completely independent of each other since *ser* allows either nominal or adjectival predicates, while *estar* permits only adjectival predicates.

It should be noted that in many cases it was impossible to determine how to classify a sentence for a given factor. This is especially true in sentences with a figurative, counterfactual, or metaphorical sense. Consider the difficulty in assigning the speed or degree of active participation in a sentence such as 9.

- (9) *Sus planes se fueron enredando en una maraña de pretextos, contratiempos y evasivas, hasta convertirse en pura y simple ilusión* (García Márquez)
 'His plans were getting tangled up in a web of pretexts, setbacks, and avoidances, until they became pure and simple illusion'

In cases such as these, the factors that were impossible to determine, such as the speed of the change or degree of activity were left blank.

2.3. LEXICALLY DETERMINED VERBS. To this point, it has been assumed that the four factors discussed above are the most relevant factors in determining which change of state verb will be utilized in a given context. Another possibility is that the choice is based on the lexical item that is involved in the change. For example, it might be that the verb *volverse* is used to express 'going crazy', not because of any semantic or syntactic factor, but because the adjective *loco* 'crazy' calls for it. If this is the case, the same change of state verb should almost exclusively occur with a given set of nouns or adjectives. This appears to be true as far as *volverse loco* is concerned; the corpus contains 27 instances of 'going crazy', and all but one occurs with *volverse*. (There was one case of *quedarse loco*.)

In order to determine the extent to which a particular lexical item determines the verb, all cases in which the same noun or adjective appeared following a change of state verb were extracted. All inflectional variants were considered instances of

the same word (i.e. *loco*, *loca*, *locos*, *locas*, *loquísimo*, etc.). There were 163 cases in which the same noun or adjective appeared as the predicate of change of state verbs at least twice. Of these, 76 occurred with the same verb, while 87 occurred with different verbs. The adjective *viejo* 'old', for example, appeared after *volverse*, *quedarse*, *ponerse*, and *hacerse*. In like manner, *triste* 'sad' occurred following *ponerse*, *quedarse*, *volverse*, *quedarse*, and *hacerse*. Although this is poor evidence that the all verbal choices are lexically determined, there are a handful of words that co-occur with a certain verb frequently enough that they could be considered to be lexically determined (see Table 2). Apart from these cases, there appears to be a great deal of variability as to which verb occurs with a particular noun or adjective.

WORD	GLOSS	NUMBER	VERB	% USED
<i>amigo</i>	friend	14	<i>hacerse</i>	100
<i>callado</i>	quiet	8	<i>quedarse</i>	100
<i>de moda</i>	in style	7	<i>ponerse</i>	100
<i>dormido</i>	asleep	28	<i>quedarse</i>	100
<i>inmóvil</i>	motionless	18	<i>quedarse</i>	100
<i>loco</i>	crazy	27	<i>volverse</i>	96
<i>nervioso</i>	nervous	19	<i>ponerse</i>	100
<i>pálido</i>	white	8	<i>ponerse</i>	88
<i>quieto</i>	still	17	<i>quedarse</i>	94
<i>solo</i>	alone	34	<i>quedarse</i>	97
<i>sorprendido</i>	surprised	7	<i>quedarse</i>	100
<i>tranquilo</i>	calm	17	<i>quedarse</i>	94

TABLE 2. Verbs that Might Be Lexically Determined

2.4. RESULTS. Once all instances of change of state verbs had been judged according to the factors discussed in Section 2.2, the results were compiled. Tables 3 and 4 summarize the findings. The percentages in the tables indicate the mean number of cases that appeared with a specific factor. Those that were left blank, due to the difficulty of assigning some factors to some instances, were not included in the calculations. Capital letters are used to highlight major tendencies in which 66% or more of the instances in the corpora demonstrate a particular characteristic.

Certain relationships between the verbs are apparent. For example, Table 4 indicates that there is a great deal of contextual overlap between the verbs *ponerse* and *quedarse*, and to a lesser extent *volverse*. All three usually express passive changes that occur in the space of a day or less. *Volverse* sets itself off from the other two in that it allows more nominal predicates, as exemplified in 10.

- (10) a. *Ponerse: En los juicios me pongo muy serio* (Conversacional CCON035A:137)
 'In the trials I become very serious'

	NOUN/ADJECTIVE			SLOW/FAST			ACTIVE/PASSIVE			SER/ESTAR		
	% w	% s	# su	% w	% s	# su	% w	% s	# su	% w	% s	# su
LLEGAR A SER	a53	N70	2	S87	S100	6	a56	A73	5	S92	S92	4
PONERSE	A100	A10 0	5	F91	F79	18	P71	P75	16	E85	E92	1
VOLVERSE	a61	A92	0	F69	F71	45	P82	P91	33	S70	e62	1
QUEDARSE	A100	A97	1	F97	F88	16	p61	P85	24	E98	E95	3
CONVERTIRSE	N100	N98	7	F66	s55	107	p57	a59	51	S100	S100	2
TRANSFORMARSE	N98	N10 0	7	F69	F67	30	a60	a.p50	25	S99	S100	4
HACERSE	a60	n53	0	F67	s61	51	p53	A67	41	S84	S97	1

% w=Percentage of assignable instances from written corpus with particular feature.
 % s=Percentage of assignable instances from spoken corpus with particular feature.

wu=Number of unassignable instances from written corpus.

su=Number of unassignable instances from spoken corpus.

Boldface capital letters indicate a 66% or higher majority of cases with a particular feature, while lowercase, non-boldface indicates no clear majority.

TABLE 3. Individual Results from Each Corpus

NOUN/ADJ.	llegar a ser	ponerse	volverse	quedarse	convertirse	transformarse	hacerse
SLOW/FAST	n 51	A100	a 64	A99	N99	N99	a 58
ACTIVE/PASSIVE	S89	F88	F69	F94	F62	F69	f 62
SER/ESTAR	a 59	P72	P83	P68	p 55	a 59	a.p 50
	S92	E88	S67	E97	S100	S99	S86

Boldface capital letters indicate a 66% or higher majority of cases with a particular feature, while lowercase, non-boldface indicates no clear majority.

TABLE 4. Combined Results from Written and Spoken Corpora

- b. *Quedarse: Ahora me hace recordar, me quedo un poco nostálgico*
(Conversacional CCON004C:112)
'Now it makes me remember, I become a little nostalgic'
- c. *Volverse: Le dimos todos los panes duros de la despensa, esos que se han vuelto piedras* (Vargas Llosa)
'We gave him all the hard bread in the pantry, the ones that have turned into rocks'

This higher occurrence of nominal predicates explains why the predicates following *volverse* are more likely to be expressed by *ser* because *estar* disallows nominal predicates. It might be for this reason that *volverse* is sometimes considered to involve changes of an essential, normative, or permanent nature.

Convertirse and *transformarse* are closely related as well. Both take nominal predicates that are expressed with *ser*, and involve mainly fast changes, as shown in 11.

- (11) a. *Convertirse: Les ruego a los dos, por favor, para evitar que me convierta en un moderador grosero* (Debate ADEB007A:95)
'I beg both of you, please, to keep me from becoming a foul-mouthed moderator'
- b. *Transformarse: Eso se transforma luego en cajas de madera*
(Técnico ETEC004E:45)
'Later that becomes wooden boxes'

Hacerse is the most elusive verb to categorize since the only strong tendency it demonstrates is that it is normally followed by nominals expressed with *ser*. Its closest neighbor is *volverse* given their mutual tendency to appear with *ser* predicates and to express fast changes more often than slowly occurring ones, as shown in 12.

- (12) a. *Hacerse: Se están pasando, y están haciéndose verdaderamente cursis* (Técnico ETEC004E:45)
'They're going too far, and they're becoming truly tasteless'
- b. *Volverse: Me pareció que se había vuelto idiota de repente*
(Garmendia)
'It seemed to me that he had suddenly become an idiot'

Of the seven verbs considered, *llegar a ser* is the only one used to indicate a change that takes more than a 24-hour span to reach completion, as shown in 13.

- (13) *Llegar a ser: Tú te puedes poner a trabajar en un sitio y - Mira - - y ir subiendo, subiendo, y llegar a ser jefe de un departamento*
(Conversacional ACON006C:201)
'You can start working in a place and, well, work your way up, and become a department head'

A comparison of the written and spoken corpora (Table 3) reveals several differences in usage. Only two of these differences appear particularly significant. In the written language, *hacerse* and *convertirse* are more commonly employed with fast changes when compared with the spoken language. The other difference involves the use of *ser* or *estar* to express the result of the change with the verb *volverse*. In the spoken corpus, the predicate following *volverse* is usually expressed with *estar*. The copulative *ser* dominates in the written corpus. However, this might actually be due to another difference; in the spoken language *volverse* is normally followed by an adjectival predicate, while the written language contains many more instances of nominal predicates following *volverse*. As mentioned earlier, *estar* never takes a nominal predicate, while *ser* may be followed by either a noun or an adjective. This accounts for the higher incidence of predicates that are expressed with *ser* in the written language.

The differences between the two corpora might be due to a combination of several factors. First, the written language involves more careful and conscious decisions about which linguistic structures to use, in contrast to the more spontaneous selection that occurs during the production of spoken language. The written language is also more prone to take literary license with linguistic structures, and to use them in ways that the average speaker might not. Second, the differences might be due to dialectal variations; the spoken corpus is based on Peninsular Spanish, while the written corpus includes the works of authors from several different countries. Third, the fact that there are roughly three times as many instances from the written corpus could mean that the differences between the corpora might disappear if a similar number of spoken instances were considered. Further research into the subject should take these factors into consideration, and might shed light on how the use of change of state verbs differs in spoken and written registers.

3. CONCLUSIONS. At the outset, the corpus analysis of these seven verbs was undertaken in the hopes that a distinct combination of the four variables associated with the use of each verb would be found. However, as Table 4 demonstrates, these verbs do not lend themselves to unambiguous classification. Instead of belonging to mutually exclusive domains, there is a great deal of overlap and encroachment on the uses of each verb. This is not to say that a state of completely free variation exists. Tendencies for a specific verb to appear in a specific context do exist, but are not inviolable. Barring cases of lexical determination (Section 2.3), speakers are apparently free to choose between several verbs when expressing a change of state in a given context. Of course, given the close relationship between several pairs of verbs, one would expect variation to be limited to groups of similar verbs.

The adequacy of this analysis, as well as any other, is dependent to a great extent, on the data on which it is based. In the case of the present study, the limiting factors are the choice of corpora and the choice of semantic and syntactic factors. Further investigation into change of state verbs should, therefore, include a wider

range of data from other corpora, controlling for possible dialectal variation. In addition, factors besides the four utilized in the present study should be sought in order to distinguish more fully between the uses of these verbs.

The 281 instances of change of state verbs that were extracted from the spoken corpus are included in Appendix B. This database might prove helpful to other researchers investigating this topic. Details about the spoken corpus from which the instances were extracted are available on the Internet.³ The data from this corpus are included for several reasons. First, there are few enough instances that they all might be included as an appendix. Second, all of the data come from one dialect area (Peninsular Spanish); this reduces the possibility that some of the variability is due to dialectal differences. Lastly, spoken instances might better represent common usage when compared to exemplars from a written register.

REFERENCES

- BUTT, JOHN, and CARMEN BENJAMIN. 1994. A new reference grammar of modern Spanish. 2nd edn. London: Edward Arnold.
- COSTE, J., and A. REDONDO. 1965. *Syntaxe de l'espagnol moderne*. Paris: Société d'Édition d'Enseignement Supérieur.
- CRESPO, LUIS A. 1949. To become. *Hispania* 32.210-12.
- EDDINGTON, DAVID. 1996. Diphthongization in Spanish derivational morphology: An empirical investigation. *Hispanic Linguistics* 8.1-35.
- EBERENZ, ROLF. 1985. Aproximación estructural a los verbos de cambio en Iberorromance. *Linguistique comparée et typologie des langues romanes*, ed. by Jean-Claude Bouvier, 461-75. Aix en Provence: U de Provence.
- FENTE, R. 1970. Sobre los verbos de cambio o 'devenir'. *Filología Moderna* 38.157-72.
- MARCOS MARÍN, FRANCISCO (director). 1992. *Corpus oral de referencia del español contemporáneo*. Textual corpus, Universidad Autónoma de Madrid. Available on-line: http://elvira.111f.uam.es/docs_es/corpus/corpus.html.
- MORIN, REGINA. 1999. Spanish substantives: How many classes? *Advances in Hispanic Linguistics*, ed. by Javier Gutiérrez-Rexach and Fernando Martínez-Gil, 214-30. Somerville, MA: Cascadilla Press.
- POUNTAIN, CHRISTOPHER J. 1984. How 'become' became in Castilian. *Essays in honour of Robert Brian Tate from his colleagues and pupils*, ed. by Richard A. Cardwell, 101-11. Nottingham, UK: University of Nottingham.

APPENDIX A

NOVELS INCLUDED IN THE WRITTEN CORPUS

- ASTURIAS, MIGUEL ANGEL. 1989. *Maladrón: Epopeya de los Andes Verdes*. Madrid: Alianza.
- CORTÁZAR, JULIO. 1972. *Rayuela*. 14th edn. Buenos Aires: Sudamericana.
- DELIBES, MIGUEL. 1966. *El Camino*. 6th edn. Barcelona: Destino.
- DONOSO, JOSÉ. 1978. *Casa de campo*. 4th edn. Barcelona: Seix Barral.
- FUENTES, CARLOS. 1982. *La muerte de Artemio Cruz*. 2nd edn. Barcelona: Bruguera.
- GARCÍA MÁRQUEZ, GABRIEL. 1982. *Cien años de soledad*. 10th edn. Bogotá: Oveja Negra.
- GARMENDIA, SALVADOR. 1973. *Los pies de barro*. Caracas: Monte Avila.
- GOYTISOLO, JUAN. 1976. *La reivindicación del conde don Julián*. 3rd edn. México: Joaquín Martínez.
- MARTÍN-SANTOS, LUIS. 1976. *Tiempo de silencio*. 11th edn. Barcelona: Seix Barral.
- SARDUY, SEVERO. 1967. *De dónde son los cantantes*. 1st edn. México: J. Mortiz.
- SABATO, ERNESTO. 1970. *Sobre héroes y tumbas*. 11th edn. Buenos Aires: Argentina.
- SAINZ, GUSTAVO. 1975. *Gazapo*. 7th edn. México: J. Mortiz.
- SÁNCHEZ, LUIS RAFAEL. 1976. *La guaracha del macho Camacho*. Buenos Aires: De la Flor.
- VARGAS LLOSA, MARIO. 1983. *La tía Julia y el escribidor*. 1st edn. Barcelona: Seix Barral.
- VIÑAS, DAVID. 1967. *Los hombres de a caballo*. La Habana: Casa de las Américas.

³http://elvira.111f.uam.es/docs_es/corpus/corpus.html