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## On the Locative Existential Construction in Taiwanese Hakka: Interface between Construction and Lexical Semantics<sup>\*\*</sup>

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## Abstract

This paper examines the locative existential construction in Taiwanese Hakka in terms of Construction Grammar. This construction pairs the form 'NP<sub>1LOC</sub> V NP<sub>2</sub>' with the meaning 'Y<sub>2</sub> BE IN X<sub>1</sub>.' It is argued that the distributional characteristics of verbs in this construction can be accounted for by the interaction between construction and lexical semantics. For a given locative existential sentence to be grammatical, a change of the existential state of NP<sub>2</sub> as a result of the verbal subevent must be involved. The interaction between the verbal subevent and the constructional subevent can be seen in two aspects. First, the construction has a coercion effect in forcing a dynamic verb to have a stative reading. Second, the argument realization of this construction is the result of the fusion of the

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argument(s) of the verb and the arguments of the construction and the construction wins in conflicts between the two types of arguments. According to the relationship between the verbal subevent and the constructional subevent, this construction is divided into three verb-class-specific subconstructions. Under the constructional analysis, verbs can retain their intrinsic semantics and implausible senses of verbs can be avoided.

Keywords: Taiwanese Hakka, locative existential construction, Construction Grammar, lexical semantics, coercion

## 1. Introduction

Since the introduction of the Unaccusative Hypothesis (Perlmutter 1978), a wide range of linguistic phenomena in various languages have been studied in order to establish the syntactic and/or semantic aspects of unaccusativity. Various diagnostics from different theoretical perspectives have been proposed to discriminate between the two classes (e.g., Burzio 1986, Bresnan and Zaenen 1991, van Valin 1990, Levin and Rappaport Hovay 1995, Washio 2006). Three different kinds of approaches to unaccusativity are adopted: the syntactic approach, which argues that unaccusativity is not fully semantically determined (Rosen 1984), the semantic approach, which denies that unaccusativity is syntactically encoded (van Valin 1990), and the mixed approach, which suggests that unaccusativity is both syntactically encoded and semantically predictable (Levin and Rappaport Hovay 1995). A number of syntactic criteria for unaccusativity have also been identified, including (a) auxiliary selection in German, (b) the attributive use of past participle in German and English, (c) impersonal passives in Dutch, and (d) ne-cliticization in Italian. In semantic terms, unaccusative verbs are argued to be sensitive to such notions as telicity and protagonist control in Dutch (Zaenen 1993) or as internal versus external causation in English (Levin and Rappaport Hovav 1995). However, the existence of 'unaccusative mismatches,' which describes "the situation in which different unaccusative diagnostics single out different classes of intransitive verbs within and across languages" (Levin and Rappaport Hovav 1992: 248), poses a serious problem for both the syntactic and semantic accounts. This phenomenon leads to Levin and Rappaport Hovav's (1995) suggestion of the mixed approach, which states that unaccusativity in English is syntactically represented but semantically determined.<sup>1</sup> These diagnostics, however, are still open to dispute and are hence not very reliable. In this paper, intransitive verbs are divided into two categories in terms of argument structures and semantic roles. In argument structure terms, an unaccusative verb selects an internal argument but no external argument, whereas an unergative verb has an external argument but no internal argument (Levin and Rappaport Hovav 1995: 3). An unaccusative verb, whose sole argument is a theme, involves a non-volitional act; nevertheless, an unergative verb, whose sole argument is an Agent, denotes a volitional act (cf. Huang 2007).

Even though many important insights have been gained through various discussions, the division of intransitive verbs into unaccusatives and unergatives deserves careful consideration in such an analytic language as Hakka. In Mandarin Chinese, certain types of locative existential sentences (Huang 1987, Li 1990), weather sentences (Li 1990, Yang 1999), inverted versus non-inverted sentences headed by intransitive verbs (Xu 1999) and causative-inchoative alternation (Gu 1996, Yang, Huang 2007) have been argued to be the unaccusative diagnostics. However, no clear consensus has been reached. We maintain that this is the case in that too much attention has been paid to the verbs in most of the previous studies. The effect that syntactic configurations, viz., constructions, may have on verbs has been significantly neglected. In this paper, we focus specifically on the locative existential construction (the LE construction) in Taiwanese Hakka (hereafter Hakka) and suggest that this construction is not an unaccusative diagnostic.<sup>2</sup> Verbs

<sup>1</sup> For reasons of space, we will not go into further detail. The reader is referred to the references cited here.

<sup>2</sup> In this paper, we use the term 'the locative existential construction' in that we are neutral to the question of whether the operation of inversion is involved in the derivation. It should, however, be noted that we will use 'locative inversion' and 'locative existential'

allowed in this construction must be compatible with the constructional meaning that a theme comes into or goes out of existence at the place as a result of the action. It is the interaction between lexical semantics of the verb and the meaning of the construction that plays a role here.

This paper is organized as follows. Section 2 outlines the basic facts of the LE construction in Hakka. Section 3 reviews previous research on locative inversion and points out the questions that deserve a closer look. Evidence that the LE construction is indeed required in Hakka is adduced in Section 4. The distributional characteristics of verbs in this construction are explored in Section 5, which is followed by a constructional analysis of the Hakka LE construction in Section 6. Section 7 concludes the study by summarizing the major findings and pointing out issues for future studies.

## 2. Characteristics of the LE construction

According to the data gleaned from the corpus, it is found that most of the verbs that enter the Hakka LE construction belong to the prototypical members of the unaccusative class, including verbs of appearance (1), verbs of existence (2), and verbs of inherently directed motion (3).<sup>3</sup>

(1)……石段仔都生溜苔哩……(HD: 1074)<sup>4</sup>

interchangeably since both terms are common in the literature.

<sup>3</sup> The Proposal of Taiwan Hakka Romanization System (臺灣客家語拼音方案) promulgated by the National Languages Committee in 2012 is used to render the data.

<sup>4</sup> The examples are predominantly culled from Xu Zhaoquan (徐兆泉), Hakka Dictionary of Taiwan 臺灣四縣腔 / 海陸腔客家話辭典 (Taipei: Nantian Shuju Youxian Gongsi, 2009, hereafter HD). When the relevant examples are not attested in HD, we use other sources to supplement, including the Hakka dictionary compiled by the Hakka e-Learning Center, Hakka Affairs Council (HK), Touqianxi de gushi (TQX), Dongshizhen keyu gushiji 7 (DS7). Part of the data were collected and transcribed by teachers and research assistants from related departments/institutes in various universities in Taiwan, whose efforts and kindness in sharing the data are highly appreciated. To illustrate some points, constructed examples are also used and these examples are left unmarked. Note that some of the examples have been slightly adapted to be consistent with the format in this paper. Since certain types of

Sag8don3-e2 do3 sang1 liu1toi5 le2 stone stair-SUF<sup>5</sup> already SFP grow moss 'Moss has grown on the stone stairs.' (2)這屋後背有一窟泉仔……(HD: 187) Lia2 vug4 heu3boi3 iu1 id4-fud4 gien5-e2 this house back have one-CL spring-SUF 'There's a spring behind this house.' (3)落禍雨,天頂出天弓……(HD:231) Log8-go3 i2, tien1dang2 cud4 tien1giung1 fall-ASP rain skv appear rainbow

'After the rain, there appeared a rainbow in the sky.'

One important feature of the LE sentences is that the preverbal position must be an NP, though this NP may be optionally preceded by a preposition like di3  $\cong$ 'from/at.' In this study, we focus only on the nominal type, schematized as 'NP<sub>1Loc</sub> V NP<sub>2</sub>,' and omit discussion of the prepositional type. Semantic and syntactic evidence are provided below to demonstrate that the nominal type is not derived from, though closely related to, the prepositional type. Semantically, the two types of sentences have different readings, as is evident from the meaning contrasts between (4a) and (4b). The former is open to two readings, but such an ambiguity disappears in the latter, as reflected in the English translations.

(4)a. 厥屋家死忒當多人

the LE sentences are rare and hard to find, we use a broad spectrum of texts, with special attention to structural characteristics rather than to issues such as genre or style.

<sup>5</sup> Abbreviations used in this paper are listed below: 1/2/3SG = first/second/third-person singular; ASP = aspect marker; CL = classifier; DUR = durative marker; MEA = measure word; NEG = negation marker; PHA, phase marker; REF = referential; PERF = perfective marker; PL = plural marker; POSS = possessive marker; PRF = perfective aspect; PRT = sentence-final mood particle; SFP = sentence-final particle; SUF = suffix. The following are used in Hakka only: BUN = passive/causative marker; LAU = disposal marker; DO = locative/result/extent marker; GE = possessive/genitive/adjective marker. It should, however, be noted that glosses of some quoted examples will be slightly modified for reasons of consistency.

Gia1 vug4ha1 si2-ted4 dong1to1 ngin5 3SG.POSS house die-PHA many people

'Many people died in his house.' or 'Many of his family died.' <sup>6</sup>

b. 對厥屋家死忒當多人

Di gia1 vug4ha1 si2-ted4 dong1to1 ngin5

in 3SG.POSS house die-PHA many people

'Many people died in his house.'

Syntactically, only the nominal type, but not the prepositional type, can undergo subject-to-subject raising, as suggested by Li (1990: 136-139). Consider the grammaticality contrasts in (5a) and (5b).<sup>7</sup>

(5)a. 厥屋下可能來當多人

kia1vug4ha1ko2neng5loi5dong1to1 ngin53SG.POSShouselikelycomemanypeople'It is likely that many people same from/to his house'

'It is likely that many people came from/to his house.'

b.\*對厥屋下可能來當多人

di3	gia1	vug4ha1	ko2neng5	loi5	dong1to1	ngin5
from	3SG.POSS	house	likely	come	many	people

- 6 According to Chappell (1999), the second reading is termed the double unaccusative construction. There are substantial differences between the LE construction and the double unaccusative construction though they bear some superficial resemblances. For reasons of space, we will not review the literature on this subject here, but will refer the reader to, say, Chappell (1999), Shen (2006), and references therein for more details.
- 7 The reader is also referred to Huang's (1987) study of existential sentences in Mandarin Chinese. He maintains that, in the type of sentences shown in (i), headed by a locative verb, the preverbal subject position must be filled by an NP. More importantly, the subject NP cannot be preceded by the preposition zai 'at,' as exemplified in (ii). Given that only subjects, but not topics or adjuncts, must be filled by NPs, the ungrammaticality of (ii) is a clear indication that "the locative phrase must not only occur in preverbal position but also occupy the subject position" (p. 229).
  - (i)Chuang-shang tang-zhe yige bingren (Huang 1987, ex. 11a) bed-top lie-Dur one patient

'In the bed lies a patient.'

(ii)?\*Zai chuang-shang tang-zhe yige bingren (Huang 1987, ex. 16a) at bed-top lie-Dur one patient In brief, neither of the two types of sentences can be readily subsumed under the other. We hence maintain that they represent two distinct constructions, whose similarities and differences are a subject beyond the scope of this paper. Within the framework of Construction Grammar, the principle of no synonymy is operating, which states that "If two constructions are syntactically distinct, they must be semantically or pragmatically distinct" (Goldberg 1995: 67).

Returning to our main theme, observe that not all unaccusative verbs are permitted in the LE construction. When the verb in question is a verb of change of state, the sentence is usually ruled ungrammatical, as shown in (6).

(6)a. \*竹篙頂高燥當多衫

Zug4go1dang2go1zau1dong1do1sam1bamboo poleabovedryverymanyclothes'(Intended) A lot of clothes hung dry on the bamboo pole.'

b. \*菜園綿當多菜

Coi3ien5mien5dong1do1coi3vegetable gardenrotverymanyvegetables

'(Intended) A lot of vegetables had rotted in the vegetable garden.'

However, the same set of verbs becomes felicitous when followed by the phase marker *ted4*  $\overrightarrow{EV}$ , as illustrated in (7). Such a contrast in grammaticality constitutes a surprise and therefore demands an explanation.

(7)a. 鑊頭燥忒一鑊湯

Vog8teu5 zau1-ted4 id4-vog8 tong1

wok dry-PHA one-CL soup

'(Lit.) In the wok dried a pot of soup.'

'The soup in the wok was dry.'

b. 緊落雨,菜園綿忒當多菜

Gin2 log8i2, coi3ien5 mien5-ted4 dong1 do1 coi3 continue rain vegetable garden rot-PHA very many vegetable '(It) kept raining. A lot of vegetables had rotted in the vegetable garden.'

Before going any further, some brief words on the grammaticality judgments are necessary. We found that informants' judgments are liable to be inconsistent. Some accept these examples, but some reject them outright. Looking ahead to the discussion that follows, we found judgments of (8a) also vary. These contrasts seem to reflect informants' abilities to imagine an appropriate context on the one hand and their different conceptualizations of the same event on the other. These issues will be further explored in Section 5.2.

A further problem concerning the occurrence of verbs of change of state in the LE construction arises in cases like those in (8), headed by another unaccusative verb of change of state *lan3* / 'to break.' In sharp contrast to (7), the phase marker *ted4*  $\gtrsim$  in (8a) does not rescue this sentence from infelicity. However, the same verb is acceptable in its bare form in an example like (8b). <sup>8</sup> The challenge is thus to explain why.

(8)a. \*地泥頂爛忒幾垤玻璃

Ti3nai5-dang2 lan3-ted4 gia1 de3 bo1li5

ground-above break-PHA several CL glass

b. 該婦人家褲襠底爛一孔啦 (DS 7:130)

ge3fu3ngin5ga1fu3nong3dai2lan3id4kung1la5thatwomanpant crotchbreakoneholeSFP'There is a hole in the woman's pant crotch.'

Verbs of disappearance are usually prohibited in locative inversion, as can be seen in an English example like (9). However, this class of verbs is not uncommon in the LE construction in Hakka, shown in (10). The existence of such an example presents challenges for most of the extant accounts of the sets of verbs that may occur in the locative inversion construction.

(9) \*From our sight disappeared the black bunny. (Nakajima 2001, ex. 8a)

(10)海地發生大地動,死忒幾下十萬人(HK)<sup>9</sup>

Hoi2ti3 fad4sen1 ta3 ti3tung1, si2-ted4 gi2ha1 siib8van3 ngin5

<sup>8</sup> Note that, in terms of argument structure, the sentence type represented in (8b) does not pattern strictly with the LE sentences discussed above, an issue that will be further explored in Section 5.2. I would like to thank one of the reviewers for pointing this out.

<sup>9</sup> Available at: http://wiki.hakka.gov.tw/search-detail.aspx?param=88225 [accessed 4<sup>th</sup> May 2015].

Haiti happen big earthquake die-PHA several 100 thousand people 'A powerful earthquake struck Haiti and several hundred thousand people died.'

In addition to unaccusative verbs, certain unergative verbs are also allowed in the Hakka LE construction, as in (11). Note, however, that even though an unergative verb may be found in this construction, a directional complement following the verb is mandatory (cf. Yang 1999: 39). Omission of this complement will render the sentence ungrammatical, a constraint that begs for an explanation.

(11)最驚係石縫肚趖\*(出)龜殼花……(TQX:3)

Ti2 giang1 he3 sag8-pung3-du2 so5-cud4 gui1hog4fa1 most scary be stone-gap-inside crawl-exit pointed-scaled pit viper 'The most frightening thing is that pointed-scaled pit vipers had crawled out

from crevices between the stones.'

Transitive and ditransitive verbs also figure prominently in the Hakka LE construction (cf. Pan 1996), as shown in (12) and (13), respectively.<sup>10</sup> Given that Hakka is morphologically impoverished, these verbs are indistinguishable from those occurring in their non-inverted counterparts. That is, it is the non-passivized forms that appear in the LE construction. A question that comes into mind immediately is why the omission of the agents in (12) and (13) does not lead to ungrammaticality.

(12)茶桶頂高寫等「奉茶」兩隻字(HD: 385)

Ca5tung2 dang2go1 xia2-den2 fung3ca5 liong2-zag4 sii3 tea dispenser on write-DUR free tea two-CL character 'On the tea dispenser were written the two characters *Free Tea*.' (13)衫櫥衹肚放多兜仔臭丸……(HD: 216)

Sam1cu5di1du2biong5do1deu1e2cu3ien5closetinsideputmanymothball'Inside the closet were put more mothballs.'

<sup>10</sup> The two types of verbs differ mainly in what licenses NP1.

In view of these problems, an explanation is needed to account for the distributional characteristics of the verbs in the LE construction in Hakka. Adopting the constructional approach, this paper will explicate the distributional properties in terms of the interaction between construction and lexical semantics. It will be shown that construction wins in conflicts between them. That is, the LE construction has a coercion effect in forcing dynamic verbs to have stative readings and, due to low discourse prominence, certain verbal argument is deprofiled when the verbal argument and the constructional argument compete for the same syntactic slot.

## 3. Literature review

In this section, we will review some representative studies on locative inversion. Specifically, we focus on the account of informational lightness proposed by Levin and Rappaport Hovav (henceforth L&RH) (1995) in Section 3.1 and the lexical functional grammar analysis adopted by Huang and Her (1998), Her (2003, 2009), and Huang (2010) in Section 3.2.

#### 3.1 Informational lightness

As has been pointed out in Section 1, the problematic characteristics of the distribution of the locative inversion construction stem from the fact that, in addition to unaccusative verbs, both unergative and (non-)passivized transitive verbs are permitted to occur in this construction as well. To explicate the distributional facts, L&RH (1995) suggest a discourse explanation. They propose that the postverbal NP has to be less familiar than the NP in the preverbal PP (ibid: 242, 253), and that the verb in the locative inversion construction must be informationally light in context (ibid: 228-232). By "informationally light in context" they mean that the verb does not contribute discourse-new information. That is, the verb will not add information to that provided by the preverbal PP, which, by setting a scene, suggests that something will exist on the scene. For example, the verb *came* in (14) can be described as a verb of causing something to exist. On such a view, *dry* in (15) is not eligible for locative inversion in that it

contributes discourse-new information by predicating an externally caused, and therefore unpredictable, change of state of its theme argument.

(14)Back to the village came the tax collector. (Bresnan 1994, ex. 3b)

(15)\*On backyard clothes lines dried the weekly washing. (L&RH 1995: 224, ex. 18c)

In other words, it is not the syntactic or semantic properties of the verbs involved but the discourse function of this construction that restricts the set of verbs attested in it. For a verb to be found in the locative inversion construction, the informational lightness requirement must be fulfilled. On this account, unergative verbs are not a priori ruled out from occurring in the construction and unaccusative verbs are not always compatible with this construction. The differences in acceptability of examples (16) and (15) can hence be explained. L&RH's discussion leads to the conclusion that this construction is not an unaccusative diagnostic in English.

(16)On the third floor worked two young women called Maryanne Thomson and Ava Brent, who ran the audio library and print room. (L&RH 1995: 224, ex. 19b)

Nevertheless, the existence of examples like (7) and (10) poses problems for an account based on the informational lightness of the verb. Each of the two verbs, i.e.,  $zau1 \not \boxplus$  'to dry' and  $si2 \not \equiv$  'to die,' contributes discourse new information by predicating an unpredictable change of state of its theme argument. Within the present framework, these examples are predicted to be ruled out, which is contrary to the fact. Therefore, an explanation is called for. We propose that the answer to the question lies in the change of the existential state of the theme as a result of the action designated by the verbal subevent, an issue that will be further explored in Section 5.2.

#### 3.2 The lexical functional grammar analysis

It is generally assumed in the literature that verbs in the LE construction in Mandarin Chinese exhibit unaccusativity (Huang 1987, Li 1990, Gu 1992, among others) in the sense that their unique argument must be represented in the argument structure as an internal argument. This assumption, however, raises questions of why certain unergative verbs are allowed and why certain unaccusative verbs are not. To avoid these questions, Huang and Her (1998), Her (2003, 2009), and Huang (2010) suggest an account in terms of a simplified lexical mapping theory of Lexical-Functional Grammar, viz., LFG. They hold that verbs compatible with this construction must have the argument structure, or a-structure, <theme, location> (Bresnan and Kanerva 1989, Bresnan 1994, among others).<sup>11</sup> Inversion is induced by the language-specific locative inversion morphosyntactic operation in (17), which affects only the syntactic assignment of argument roles to grammatical functions. According to this rule, in an a-structure with theme and location, "the two roles are assigned [+o] and [-r] respectively; the only additional role allowed is an optional  $\hat{\theta}$ , which however must be suppressed (by passivization)" (Her 2003: 10).<sup>12</sup> Example (18) demonstrates how the rule operates for Mandarin locative inversions.

(17)Locative Inversion (LI) (Mandarin, English, Chichewa ...):

y > x = th, y = loc (Her 2003, ex. 17)  $<(\theta)$ x Ø 1 [+o] [-r] (18)a. 約翰寫了字存牆上<sup>13</sup> (Her 2003, ex. 19a) Yuehan xie le zi zai qiang-shang John write ASP character at wall-top 'John wrote a character on the wall.' xie 'write' < x z > x = ag, v = th, z = locV

<sup>11</sup> In her study of the locative existential construction in Chinese, Gu (1992) holds a similar view. She suggests that verbs in this construction are three place predicates, i.e., "they take an outer location, which is the subject locative NP, a Theme, and an inner location, which is the postverbal locative PP" (p. 186).

<sup>12</sup> The notation  $\hat{\theta}$  designates the most prominent role of a predicator. Note also that an agentoriented adverb like *guyi* 'intentionally' is used to argue the fact that a suppression rule is indeed applied in the locative inversion construction. The reader is referred to Huang (2010) for details.

<sup>13</sup> The Chinese translations in (18) are mine.

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 $SC^{-14}$ [-r] DM · 15 [+r]  $S/O/O_{\theta}/OBL_{\theta}$  S/O  $OBL_{\theta}/OBJ_{\theta}$ UMP: 16 SUBJ OBJ **OBL**<sub>o</sub> b. 牆上(被) 寫了字 (Her 2003, ex. 19c) Qiang-shang (bei) xie le zi 'On the wall was written a character.' xie 'write' < xV Z > SC: [-r] y = th, z = locPassive: Ø LI: [+0] [-r] DM: \_\_\_\_\_ \_\_\_\_\_ OBJ O/S UMP: OBJ **SUBJ** 

Even though the suppressionist approach provides an explanation as to why verbs occurring in locative inversion must have the a-structure <theme, location>, most fatal to this proposal, as pointed out by Lin (2008: 20-21), is probably the fact that it is conceptually difficult to imagine that a verb like *xie* 寫 'to write' bears a locative argument (cf. Shen 2000, Pan and Han 2005). The verb *xie* 寫 'to write' does not typically require a locative argument, as shown in (19).

(19)他寫了三本書

Ta xie-le san-ben shu

- 15 DM refers to the default morphosyntactic operation, which assigns the default feature [+r] to all roles in an a-structure other than the logical subject,  $\hat{\theta}$  (Her 2003: 8-9).
- 16 UMP refers to the unified mapping principle, which states "each argument role in an a-structure with no higher role available is mapped onto to the highest compatible function available. A role is available iff it is not linked to a function, and conversely." (Her 2003: 9)

<sup>14</sup> SC refers to the (simplified) semantic classification of a-structure roles for function. Only asymmetrical object parameter languages specify a secondary patient/theme in an a-structure as [+o]; in symmetrical object languages, all patient/theme roles are [-r] (Her 2003: 7).

### 3SG write-ASP hree-CL book 'He wrote three books.'

To account for (18b), one would need to postulate that there exists a special sense of *xie* 寫 'to write' that has three arguments: an agent, a theme, and a location. This theory would not only need to stipulate the existence of the additional threeargument sense for *xie* 寫 'to write,' but would have to further stipulate that the new verb sense can only occur in the locative inversion construction. Since the proposed sense occurs only in this particular syntactic configuration, associating this interpretation directly to the construction is more parsimonious. That is, we have to recognize that the construction itself can add a locative argument, which is not necessarily an argument of the verb. Put differently, even though we concur that the semantics of the full expressions are different whenever a verb occurs in a different construction, these differences need not be attributed to different verb senses. Instead, they are more parsimoniously attributed to the constructions themselves (Goldberg 1995: 7-23). Under the constructional approach, implausible verb senses can be avoided.

Another problem with such an account is that it does not specify what kinds of verbs may include a locative argument in their a-structure. It remains unknown why, say, *xie* 寫 'to write' is privileged to take an additional locative argument, but *ti* 踢 'to kick,' which is also a transitive verb, is not, as in (20). More problems may thus arise if we allow rampant specifications of lexical items in this way. In fact, the existence of a locative argument of the verb in locative inversion should not be taken for granted and should be accompanied by sufficient justification. (20)\*操場上踢了一顆足球

Caochang shang ti-le yi-ke zuqiu playground on kick-ASP one-CL football

'(Intended) On the playground was kicked a football.'

In view of these problems that previous studies encountered, we will provide an alternative account in terms of Construction Grammar.

## 4. The existence of the LE construction

In this section, we will adduce evidence to show that the LE construction is required in the grammar of Hakka. To do this, we need to show that the existence of the construction is independent of the verbs which instantiate it and that implausible verb senses can be avoided. We will take the two issues in turn in what follows.

#### 4.1 Non-compositionality

In this section, we will demonstrate that some aspect(s) of the LE construction is/are not compositionally derived from the lexical items which instantiate it. We focus specifically on the relationship between the semantics of this construction and the inherent semantics of the verb.

The basic semantics of the LE construction is that the postverbal NP referent comes into existence in the location denoted by the preverbal NP by means of the action designated by the verb. That is, the locative NP signals the location of a theme as a result of the action. More relevant to the present discussion is that this construction codes change of the existential state of a theme in the location, a meaning that is not necessarily coded by the verb in isolation. To see this more clearly, compare (21a) and (21b). The same verb is used actively to describe the subject's action in (a) but is used statively to indicate the existence of a theme in (b). The stative nature of the (b) sentences can be confirmed by their incompatibility with a manner adverb, such as *man3man3-e2* 慢慢仔 'slowly,' as in (22). The semantic contrasts show that the verbs in question do not take on a stative reading independently of the LE construction. Therefore, attempts to attribute the meaning of the entire expression to the meanings of individual lexical items will fall short of accounting for the data in a natural way.<sup>17</sup>

<sup>17</sup> For example, in Gu's (1992) discussion of the locative existential construction in Chinese, the verb *fang* 放 'to put' in Mandarin Chinese is treated as an unaccusative verb. Such an account, however, leaves us without an explanation as to why the verb in question may

(21)a. 桌仔搖來搖去, 拿東西屧分佢平 (HD: 1118)

Zog4-e2 ieu5-loi5-ieu5-hi3, na1 dung1xi1 siab4 bun1 gi5 piang5 table-SUF wobble-come-wobble-go take thing tuck BUN 3SG even 'The table wobbles. Tuck something (under the leg(s) of the table) to make the table steady.'

b. 頭擺棺材肚履磚仔、石頭…… (HD: 981)

Teu5bai2 gon1coi5 du2 siab4 zon1-e2 sag8teu5 in the past coffin inside tuck brick-SUF stone

'In the past, inside a coffin were tucked bricks (and) stones.'

(22)\*頭擺棺材肚慢慢仔屧磚仔、石頭<sup>18</sup>

Teu5bai2gon1coi5du2man3man3-e2siab4zon1-e2sag8teu5in the pastcoffininsideslowly-SUFtuckbrick-SUFstone

To recapitulate, since the proposed locative existential sense is only available in this particular syntactic configuration, positing additional verb senses is less parsimonious than associating the semantic interpretation directly to the construction. We, hence, argue for the existence of the LE construction independently of the verbs which instantiate it.

#### 4.2 Implausible verb senses

Another piece of evidence for the constructional account comes from the fact that we can avoid the problem of positing implausible verb senses. Consider the contrasting pair in (23) and (24). The two sentences are headed by the same verb, but only the latter is acceptable.

(23)\*地泥頂爛忒幾垤玻璃

Ti3nai5-dang2	lan3-ted4	gia1	de3	bo1li5
ground-above	break-PHA	several	CL	glass

serve as an unaccusative verb only when it occurs in the locative existential construction.

18 Gu (1992: 185) also maintains that manner adverbs and action modifiers are not allowed in the locative existential construction in Chinese, as in (i).

(i)\*屋子裡慢慢的躺著一個人 (Gu 1992, ex. 11a)

wuzili	manmande	tang zhe	yige	ren
room-interior	slowly	lie-ASP	one-MEA	person

(24)該婦人家褲襠底爛一孔啦 (= (8b))

Ge3	fu3ngin5ga1	fu3nong3dai2	lan3	id4	kung1	la5	
that	woman	pant crotch	break	one	hole	SFP	
'There is a hole in that woman's pant crotch.'							

To account for the grammaticality contrast, it may be tempting to posit two different verb senses for each of the two uses, viz., the 'separate into parts' sense in (23) and the 'worn out' sense in (24). Nevertheless, such an intuitive solution does not alleviate the problem. Even if we can posit two distinct senses to account for the contrast in the two examples, we still need to explain why the 'worn out' sense is only available in this syntactic frame and, more importantly, why (24), but not (23), is assigned an existential reading, i.e., there exists a hole in the woman's pant crotch. In fact, the existential interpretation is associated not only with (24) but also with other LE sentences. Unless we associate the existential aspect of meaning directly to the construction, the regularity in patterning observed here cannot be satisfactorily accounted for. Under the constructional approach, a verb can retain its intrinsic semantic interpretation.

## 5. The distributional characteristics of the LE construction

Having argued for the existence of the LE construction, we proceed now to demonstrate that the problematic distributional characteristics of the LE construction mentioned in Section 2 can be naturally accounted for within the framework of Construction Grammar, which holds that a construction, a form-meaning pairing, is the basic unit of analysis and representation (Goldberg 1995: 4). It has been amply demonstrated that, in many cases, a certain sense occurs only in a particular syntactic configuration. The pattern congruity indicates that associating a specific semantic interpretation directly to the particular construction is more plausible than positing additional verb senses (Fillmore et al. 1988, Kay and Fillmore 1999, Goldberg 1995, 2006, among many others). In what follows, we will first discuss the semantic constraints of the LE construction and the

reasons why certain sets of verbs are more readily found in the LE construction in 5.1. Particular attention will be paid to unaccusative verbs of change of state in 5.2.

#### 5.1 Verbs attested in the LE construction

In this section, we argue that the LE construction is associated with a particular semantics, which in turn favors certain semantic classes of verbs. Only those verbs that are compatible with the constructional semantics may enter the LE construction.

The LE construction is posited as follows:

(25)The LE construction

Syntax:  $NP_{1LOC} V NP_2$ 

Semantics:  $NP_2$  comes into existence in the location denoted by  $NP_1$  by means of the action designated by V

Since the basic semantics of the LE construction denotes the coming into existence of someone or something, verbs of appearance (1) and verbs of existence (2), both of which are prototypical members of verbs of coming into existence, can be readily found in this construction. Other classes of verbs that figure quite prominently in this construction are somewhat unexpected and hence call for an explanation.

Let us begin with transitive verbs. When occurring in the LE construction, these verbs pattern with unaccusative verbs in leaving the external agent argument unexpressed. Typical examples include verbs of putting (13), verbs of putting in a spatial configuration (26), verbs of attachment (27), verbs of image impression (28), and verbs of creation (29).

(26)架頂吊等一條褲摎一條面帕(HD:1427)

Ga3dang2 diau3-den2 id4-tiau5 fu3 lau1 id4-tiau5 mien3pa3 on the rack hang-DUR one-CL pant and one-CL towel

'On the rack were hung a pair of pants and a towel.'

(27)電火橔頂貼等一張紙……(HD: 415)

Tien3fo2dun2	dang2	dab4-den2	id4-zong1	zii2
electricity post	top	paste-DUR	one-CL	paper

'On the electricity post was pasted a piece of paper.' (28)茶桶頂高寫等「奉茶」兩隻字 (HD: 385)

Ca5tung2dang2go1xia2-den2fung3ca5liong2-zag4sii3tea dispenser onwrite-DURfree teatwo-CLcharacter'On the tea dispenser were written the two characters *Free Tea*.'

(29)這山頂幾時起哩一間恁排場个宮廟? (HD: 470)

Lia2 san1 dang2 gid4sii5 hi2-le2 id4-gien1 an2 pai5cong5 ge3 this mountain top when build-ASP one-CL so majestic GE giung1meu3

temple

'When was this majestic temple built on the mountain top?'

As has been pointed out by Lin (2008: 20-21), it is conceptually difficult to imagine that a verb like xie 寫 'to write' in Mandarin Chinese bears a locative argument. In a similar vein, we do not think that the verbs in (26) to (29) involve a locative argument. Different from previous studies (e.g., Bresnan 1994, Huang and Her 1998, Her 2003, Huang 2010), we maintain that the locative argument may not be licensed directly by the verb involved, but by the construction itself. Under such an analysis, the verb retains its intrinsic semantic representation, while being integrated with the meaning directly associated with the construction. As indicated in (25), the LE construction has two constructional arguments, with the first being a location and the second, a theme. A transitive verb also has two arguments: prototypically, an agent and a patient. It is apparent that there is a mismatch between the event type denoted by the construction and the event type denoted by the verb. In such conflicts, coercion is triggered and constructions win. The agent argument of the verbal subevent is deprofiled due to low discourse prominence and thereby becomes syntactically implicit (Goldberg 2001). Take, for example, the verb xia2  $\equiv$  'to write.' The argument realization and sharing between the constructional subevent and the verbal subevent is illustrated in (30): (cf. Goldberg and Jackendoff 2004)

(30)茶桶頂高寫等「奉茶」兩隻字(=(28))

Constructional subevent: Location: ca5tung2 dang2go1;

```
Theme: fung3ca5 liong2-zag4 sii3
Agent: implicit;
Theme: fung3ca5 liong2-zag4 sii3
```

(31)\*教室罵兩個學生仔

Verbal subevent:

gau3siid4 ma3 liong2-ge3 hog8sang1-e2

classroom scold two-CL student-SUF

We suggest that the key lies in the constructional semantics of the LE construction, which codes that the theme comes into existence in the location as a result of the action. The incompatibility between the verb  $ma3 \equiv$  'to scold' and the LE construction can be accounted for by the fact that the existence of the two students in the classroom has nothing to do with the verbal subevent. The two students were already in the classroom before they were scolded. The teacher's scolding them does not change the existential state of the students. The LE construction favors verbs of putting, verbs of putting in a spatial configuration, verbs of attachment, verbs of image impression, and verbs of creation in that these verbs all involve the theme's coming into being in the location via the verbal subevent. Put differently, it is the construction that is at play.

Constructional effects can also be observed in the interpretations of the verbs. The verbs in (26) to (29) are most saliently associated with an eventive reading when attested in non-inverted sentences. Nevertheless, these verbs are coerced into a stative reading when occurring in the LE construction. For example, consider the verb *xia2*  $\Xi$  'to write,' whose basic sense is to make letters or other symbols on a surface, especially with a pen or pencil. However, the dynamic aspect of the verb is deemphasized in the LE construction. That is, the emphasis of (28) is on the existence of the two characters *fung3ca5*  $\Xi$  'free tea' on the tea dispenser. A similar result also obtains with the verb *hi2*  $\Xi$  in (29), whose basic meaning is 'to build,' as illustrated in (32). It does not describe the actual process of building;

rather, it describes the existence of a majestic temple on the mountain top. (32)這柢平埔早都有人愛起屋哩…… (HD: 1016)

Lia2 did4 piang5pu1 zo2 du3 iu1 ngin5 oi3 hi2 vug4 le2 this some level land early already have person will build house SFP

'Someone has already (planned to) build a house on this level piece of land.' Evidence that these examples are stative in nature comes from the incompatibility between the LE construction and an agent-oriented adverb such as *tiau1sii3* 挑試 'intentionally.' For example, consider (33).

(33)\*電火橔頂挑試貼等一張紙 (revised from (27))

Tien3fo2dun2dang2tiau1sii3dab4-den2id4-zong1zii2electricity posttopintentionallypaste-DURone-CLpaper

'(Intended)On the electricity post was intentionally pasted a piece of paper.' Coercion is a topic that has attracted a lot of interest within the study of Construction Grammar (e.g., Goldberg 1995; Michaelis 2004, 2005). For example, Michaelis (2004: 25) proposes the override principle, as in (34), to account for cases of coercion.

(34)If a lexical item is semantically incompatible with its morphosyntactic context, the meaning of the lexical item conforms to the meaning of the structure in which it is embedded.

In the cases at hand, these transitive verbs denote verbal events and are hence incongruent with the stative nature of the LE construction. In accordance with the override principle, the relevant features of the verbs switch to those required by the construction. That is, these transitive verbs have a coerced stative reading when found in the LE construction.

We turn now to unergative verbs. Consider such agentive verbs of manner of motion as so5 趖 'to crawl' in (11) and *bui1* 飛 'to fly' in (35) (cf. Birner 1994 and L&RH 1995: 253).

(35) 盡多鄉下人家个屋脣山排會飛來歸百歸千隻个白鶴 (TQX:56)

cin3do1 hiong5ha3 ngin5ga1 ge3 vug4-sun5 san1pai5 voi3 bui1-loi5 many country people POSS house-beside hillside will fly-come gui1 bag4 gui1 qien1 zag4 ge3 pag8hog8 several hundred several thousand CL GE Chinese egret 'To many hillside houses in the countryside fly hundreds and thousands of

Chinese egrets.'

The existence of the unergative verbs in the LE construction renders further support to the constructional analyses proposed here. Given that unergative verbs are one-place predicates and do not inherently code a location, the locative argument must be contributed by the construction. However, another question that has not received due attention in previous analyses of locative inversion (see, among others, Birner 1994 and L&RH 1995: 253) is why unergative verbs, but not other sets of verbs, in the Hakka LE construction have to be followed by a directional complement, such as chud4 出 'to exit' in (11) or loi5 來 'to come' in (35). Under the constructional approach, this follows naturally. As has been pointed out above, the LE construction codes the existential state of NP2 in the location, a sense that is not denoted by an unergative verb in isolation. A directional complement is, therefore, added for the unergative verb to carry a change of state sense, which is crucial for the resulting verb-complement unit to be coerced into having an existential state interpretation by the LE construction (cf. Nakajima 2001, Lin 2009). Take, for example, the verb bui1 飛 'to fly' in (35), which specifies only the manner and has nothing to do with the existence of the Chinese egrets on the hillside houses in the countryside. To salvage this sentence from ungrammaticality, the complement *loi5* 來 'come' is added to trigger a change of state reading. Like the cases headed by transitive verbs, the dynamic aspect of the verb-complement unit is deprofiled. Here, buil loi5 飛來 'to fly here' encodes nothing more than that the Chinese egrets exist on the scene. In other words, (35) focuses on the beginning of a new state, instead of on the flying of the birds. Omission of the directional complement will cause a semantic conflict between the verb and the construction, therefore rendering the sentence unacceptable as shown in (36).

(36)\*禾埕走當多人

vo5tang5	zeu2	dong1	do1	ngin5
rice-drying ground	run	very	many	people

The same analysis applies to transitive verbs. Observe that a transitive verb in the LE construction can be coerced into a stative reading in that the start of a new state is brought about by the verbal subevent. For example, when a piece of paper was pasted on the electricity post, as described in (27), it implies the end of a previous state and the beginning of a new state, viz., the paper changes from the state of not being pasted to that of being pasted.

To summarize, for a given verb to be attested in the LE construction, it must be compatible with the constructional meaning that a theme exists at the place as a result of the verbal subevent. A given verb should be found in the LE construction as long as this verb can be coerced by the construction into having a stative existential reading.

#### 5.2 Verbs of change of state

In the previous section, we have suggested that the distributional characteristics of the LE construction can be accounted for in terms of the interaction between construction and lexical semantics of verbs. Having these in mind, we are now in a position to answer the question of why some verbs of change of state are not allowed in the LE construction.

We begin with an example like (37), which is headed by an unaccusative verb of change of state.

(37)\*竹篙頂高燥當多衫(=(6))

zug4go1	dang2go1	zau1	dong1	do1	sam1		
bamboo pole	above	dry	very	many	clothes		
'(Intended) A lot of clothes hung dry on the bamboo pole.'							

Despite of the fact that the verb zau1 k 'to dry' can be coerced by the construction into a stative reading, this example is ruled ungrammatical. This is the case in that the verb zau1 k 'to dry,' though coding a change of state, has nothing to do with the change of the existential state of the clothes on the bamboo pole. The clothes were already on the bamboo pole before they became dry,

violating the constructional requirement that the theme comes into existence on the scene as a result of the verbal subevent.

More puzzling to the present account is the fact that the infelicity of the same verb zau1 kg 'dry' in the LE construction can be rescued by adding a phase marker ted4 kd. For example, see (38), which is minimally distinct from (37). When the same verb is followed by the ted4 kd, the sentence becomes acceptable. Obviously, the key lies in the phase marker.

(38) 鑊頭燥忒一鑊湯 (=(7))

vog8teu5zau1-ted4id4-vog8tong1wokdry-PHAone-CLsoup'(Lit.) In the wok dried a pot of soup.'

'The soup in the wok was dry.'

According to Li and Lai (2011), the *ted4*  $\overrightarrow{RV}$  construction in Hakka, viz., V(R)*ted4* construction, encodes a change of state and, aspectually, this construction encodes telicity. Compare the meaning differences between the two examples in (39), cited from Li and Lai (2011, ex. 17).

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(39)a. 佢走了
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gi5 zeu2 le2
3SG run PRF
'He ran.'
b.佢走忒了
gi5 zeu2-ted4 le2
3SG run-TED PRF
'He ran away.'
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In (a), he ran, but he may not be out of the speaker's sight. In (b), he ran away and he was definitely out of the speaker's sight. A new start of a state is brought about by *ted4*. A state verb, such as *fai2*  $\frac{1}{3}$  'bad' in (40), will be coerced by *ted4*  $\frac{1}{3}$  into a telic situation with a final point in the V-*ted4* construction. *Ted4*  $\frac{1}{3}$  "triggers a change of state from a previous state into a new state denoted by the verb" (ibid: 111).

(40) 鑊仔壞忒了 (Li and Lai 2011, ex. 24a)

vog8-e2 fai2-ted4 le2 wok bad-TED PRF 'The wok was broken.'

Returning to (38), observe that the situation described here is that the soup in the wok has boiled dry, with the manner component being left unspecified. This example involves a change of state of the soup from an non-dry state to a dry state, which is triggered by ted4  $\overrightarrow{RL}$ . Here, tau1-ted4  $\not{RRL}$  'dry up' codes the disappearance of the soup in the wok, a meaning that will not be available in its ted4-less counterpart. The grammaticality of a sentence like (38) indicates that going out of existence is also acceptable in the LE construction in Hakka. That is, the LE construction may code existence or nonexistence, depending on the lexical meanings of the verbs involved. On such a view, verbs of change of state are not a priori ruled out from occurring in the LE construction. Rather, they are predicted to be found as long as they denote a change of the existential state of the theme.

Evidence in favor of our analysis can also be adduced in an example like (41), which is headed by another verb of change of state *lan3* 爛 'to break.' (41)該婦人家褲襠底爛一孔啦 (= (24))

ge3 fu3ngin5ga1 fu3nong3dai2 lan3 id4 kung1 la5 that woman pant crotch break one hole SFP 'There is a hole in the woman's pant crotch.'

Note that (41) is not a prototypical LE sentence. In a prototypical LE sentence, the theme argument of the verb occurs postverbally. Nonetheless, the theme argument of the verb *lan3* 爛 'break' in (41) appears preverbally. In addition, there is a part-whole relation between the postverbal NP *id4 kung1* — 孔 'a hole' and the locative NP *fu3nong3dai2* 褲襠底 'pant crotch.' It should, nonetheless, be noted that, despite these differences, this sentence, just like other LE examples, denotes the existence of a hole in the woman's pant crotch, a meaning that is not incongruent with the constructional meaning. Therefore, this example is included in our discussion and is deemed an LE sentence. We suggest this kind of sentences emerges by analogy, an issue subject to further investigation.

We turn now back to (41). This sentence is legitimate in that a change of the

existential state of NP<sub>2</sub>, i.e., *kung1*  $\not\in$  'hole,' is involved here. A hole was made and hence appeared in the woman's pant crotch, that is, there is a change from the state of nonexistence into that of existence. This account helps explain the ungrammaticality of (42), in which the verb *lan3*  $\noti$  'to break' is followed by *ted4*  $\vec{i}$ .

(42)\*地泥頂爛忒幾垤玻璃 (= (8a))

ti3nai5-dang2	lan3-ted4	gia1	de3	bo1li5
ground-above	break into piece-PHA	several	CL	glass
'(Intended)There	e were several broken pi	eces of gla	ass on	the ground.'

In view of (38), the unacceptability of this example may constitute a surprise. However, under the constructional analysis, (42) is ruled out in that the existence of the glass on the ground has nothing to do with the verbal subevent, violating the constructional requirement. The glass might fell onto the ground and became broken, or was hit broken and then be moved by someone to the ground. In either case, being broken is not the cause of the glass's being on the ground.

In brief, the discussion of (41) and (42) indicates that, for a given LE sentence to be acceptable, all the relevant information of the whole construction has to be taken into account, including not only the verb but also the objects and the relationship between the verb and the construction.

In addition to verbs of change of state, verbs of disappearance are also allowed in the LE construction, as in (10), revised here as (43). (43)海地死忒幾下十萬人

Hoi2ti3 si2-ted4 gi2ha1 siib8van3 ngin5

Haiti die-PHA several one hundred thousand people

'Several hundred thousand people died in Haiti.'

Along similar lines, (43) is acceptable in that a change of the existential state of the theme is involved here, namely, the nonexistence of many people as a consequence of the verbal event. This is a clear indication that verbs of disappearance may enter the Hakka LE construction as long as they do not conflict with the semantics of the construction.<sup>19</sup>

<sup>19</sup> Nakajima (2001) points out that unaccusative verbs of disappearance can occur in the

Before closing this section, a short note on the grammaticality judgments of examples like (37), (7b), (38) and (42) is necessary. Even though (37) is unanimously ruled unacceptable and (7b), grammatical, the latter two examples give rise to much less stable judgments. One possible explanation for the disagreements is that speakers have different conceptualizations of the same scenes. For those who accept (38), the disappearance of the liquid in the wok is all that counts. The verbal subevent, i.e., the vaporization of the liquid, encodes the result state of NP<sub>2</sub>'s becoming non-existent on the scene denoted by NP1. However, for those who reject (38), evaporization of the liquid only is not enough. In typical cases, there are still, say, vegetables or some meat in the wok, a fact that hinders speakers from thinking that the soup in the wok has completely disappeared. In other words, the existential state of NP<sub>2</sub> remains unchanged, which is in direct contradiction to the constructional meaning of the LE construction. Likewise, only those who view the broken pieces of glass as dysfunctional judge (42) to be grammatical. For them, these broken pieces can no longer be counted as a piece of glass that may be used as, for example, a wine glass or a window. That is, NP<sub>2</sub> goes out of existence. On the other hand, some may think that these broken pieces, no matter how small they are, are still glass in essence. Since no change of the existential state of NP<sub>2</sub> is involved, this sentence is ruled out.

To recapitulate, in order to be felicitous, a given LE sentence in Hakka must meet the constructional requirement that a change of the existential state of  $NP_2$ as a result of the verbal subevent be involved. Only verbs that have to do with the (non)existence of  $NP_2$  are attested in the LE construction and, when found in this construction, they are coerced into having a stative reading. The interaction between the LE construction and the lexical semantics of the verbs plays a major role in determining the grammaticality of a given LE sentence.

locative inversion construction if they denote a resulting state in which an entity is present at some place as a result of disappearance from sight, as in (i).

<sup>(</sup>i)Into the bushes disappeared the bunny I had been stalking for hours. (Nakajima 2001, ex. 8b)

## 6. A constructional analysis

In this section, we will demonstrate that the Hakka LE construction forms a sort of family of constructions, sharing important properties but differing in certain specifics (Goldberg and Jackendoff 2004).

The Hakka LE construction pairs a specific form ('NP<sub>1</sub> V NP<sub>2</sub>') with a specific meaning ('Y<sub>2</sub> BE IN X<sub>1</sub>').<sup>20</sup> The meaning of an LE sentence contains two separable subevents, viz., the verbal subevent, determined by the verb, and the constructional subevent, determined by the construction. The two subevents are related in different ways. The verbal subevent may be an instance, a means, or a result of the constructional subevent. According to the relationship between the two subevents, the construction is argued to be associated with three related senses, as posited in (44).

(44) The LE construction in Hakka

Syntax:  $NP_1 V NP_2$ 

Semantics: Y<sub>2</sub> BE IN X<sub>1</sub>

- i. INSTANCE: [VERBAL SUBEVENT]
- ii. MEANS: [VERBAL SUBEVENT]
- iii. RESULT: [VERBAL SUBEVENT]

Among the three senses, the most prototypical case is instance in which the verb codes an elaboration of the meaning of the construction. Correspondingly less prototypical are cases where the verb codes a force-dynamic relationship, including means and result (Goldberg 1995: 59-66, 1997). Each of the senses will be discussed in more detail in what follows.

The central sense of the LE construction is  $Y_2$  comes into existence in  $X_1$ .' Verbs such as verbs of existence and verbs of appearance are frequently found in this construction in that they lexically code the designated meaning. Put

<sup>20</sup> The subscripts here indicate the correspondences between the syntactic arguments and the corresponding semantic arguments.

differently, as an elaboration of the construction, the event type designated by the verb is an instance of the more general event type designated by the construction. Consider, for example, (45). The verb *sang1*  $\pm$  'grow' lexically denotes a type of appearance, the meaning that is associated with the LE construction.

(45)石段仔都生溜苔哩 (abridged from (1))

sag8don3e2 do3 sang1 liu1toi5 le2 stone stair already grow moss SFP 'Moss has grown on the stone stairs.'

On the second interpretation, the verb lexically codes the means by which  $Y_2$  becomes existent in  $X_1$ . Included in this class are verbs of putting, verbs of putting in a spatial configuration, verbs of attachment, verbs of image impression, and verbs of creation. For example, in (46), *dai3*  $\pm$  'to wear' is the means by which the motion of the hairpin is effected and the gold hairpin hence travels a path terminating at the person's head. As have been discussed above, the dynamic aspect of the meaning of the verb is deemphasized. Here, the predicate is used statively to describe the existence of the hairpin on the person's head. This is a direct result of the verb's being coerced into having a stative existential meaning by the construction in question.

(46)頭那頂戴金簪,頸根戴鈸鍊 (HD: 871)

teu5na5 dang2 dai3 gim1zam1, giang2gin1 dai3 pad8lien3 head top wear gold hairpin neck wear necklace '(The person) is wearing a gold hairpin in her hair and a necklace around her neck.'

On the third interpretation, the verb lexically encodes the result state of Y2 that comes into (non)existence in X1. This class includes verbs of disappearance and verbs of change of state. A case in point is illustrated in (47). Likewise, the dynamic aspect of the verb in this construction is deemphasized. What is focused on in this example is the result state of the nonexistence of many people in Haiti. (47)海地死忒幾下十萬人

Hoi2ti3	si2-ted4	gi2ha1	siib8van3	ngin5
Haiti	die-PHA	several	one hundred thousand	people

'Several hundred thousand people died in Haiti.'

The discussion above shows that there is a family resemblance in both form and meaning of the Hakka LE construction: the three subconstructions all involve the coming into (non)existence of NP<sub>2</sub> in NP<sub>1</sub> and all the verbs in them are coerced into having a stative meaning. However, each sense of the LE construction is closely tied to particular verbal semantic classes. The verb classes used for each sense are mutually exclusive and the modulation of the existence of NP<sub>2</sub> differs for each interpretation. Based on Croft (2003), the construction in question is not truly polysemous but should be associated with verb-class-specific constructions (cf. Goldberg 1995: 31-34).

## 7. Conclusion

In this paper, we have argued for the existence of the LE construction in Hakka. It has been shown that the problematic characteristics of the distribution of verbs in this construction can be better accounted for in terms of Construction Grammar. The LE construction pairs the form 'NP<sub>1</sub> V NP<sub>2</sub>' with the meaning 'Y<sub>2</sub> BE IN X<sub>1</sub>.' This constructional semantics plays a central role in determining the grammaticality of a given LE sentence. For such a sentence to be grammatical, a change of the existential state of NP<sub>2</sub> as a result of the verbal subevent must be involved. As long as this constructional requirement can be satisfied, unaccusative verbs, unergative verbs, and nonpassivized transitive verbs are permitted in this construction, a fact that supports our claim that the LE construction is not an unaccusative diagnostic in Hakka. When found in the LE construction, these verbs will be coerced into having a stative interpretation. According to the relationship that the verbal subevent can bear to the constructional subevent, the Hakka LE construction is divided into three verb-class-specific subconstructions. Each of the subconstructions is associated with a different but related sense, viz., the instance interpretation, the means interpretation, and the result interpretation. Since both subevents can take their own arguments, argument sharing is mandatory when the number of arguments in the two subevents is more than that of the syntactic positions. On the other hand, when the number of arguments in the verbal subevent is less than that of the constructional subevent, constructions can license additional arguments, as is the case of the locative NP in the LE sentences headed by intransitive verbs. By treating the LE construction in Hakka as an independently existing meaningful construction capable of contributing arguments, the problem of positing implausible verb senses can be avoided. A verb can retain its intrinsic semantic interpretation, while being fused with the constructional meaning. Issues worthy of further research include (a) the distinction between the LE construction and the double unaccusative construction, and (b) the interaction between aspect markers and the Hakka LE construction.

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# 構式和詞彙語意的互動

——以臺灣客家語處所存在構式爲例

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### 摘要

本文從構式語法的角度檢視臺灣客家語處所存在構式,此構式為一特定 的形式(NP<sub>1LOC</sub> V NP<sub>2</sub>)與意義(Y<sub>2</sub> BE IN X<sub>1</sub>)之配對,本文論證此構式的 動詞分布取決於構式和詞彙語意的互動,要成為一合法的處所存在句,該句 必須牽涉NP<sub>2</sub>存在狀態的改變,且此改變是由動詞次事件所導致的。構式次 事件和動詞次事件的互動表現在兩方面:首先,出現在此構式的動詞之動態 性會被構式強制轉換成狀態義;其次,此構式的論元體現是由動詞論元和構 式論元共同決定的,當兩種論元結構衝突時,構式論元會凌駕動詞論元之 上。根據動詞次事件和構式次事件之間的關係,此構式可進一步區分成三個 特定動詞類別的次類構式。構式語法的分析可維持動詞固有之語意,避免為 動詞設定不合理之語意。

關鍵詞:臺灣客家語、處所存在構式、構式語法、詞彙語意、強制轉換

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