

## **A Study on Formulaic Expressions in L2 Development**

**Si-Ho Yang**

Jeju National University

**Yang, Si-Ho. (2011). A study on formulaic expressions in L2 development. *Modern English Education*, 12(4), 23-42.**

This study examines one child's second language (L2) writing development in social learning contexts over a six-month period from the age of seven years and five months. It describes L2 development during the first months of the child's schooling and interprets it in terms of a socio-semantic approach to language learning. The study, which adopts a qualitative approach in an interpretivist/constructionist research paradigm, entailed the collection and interpretation of data through multiple sources: observation, interviews, and written texts. The analytical framework for the overall interpretation is provided by systemic functional linguistics. A metafunctional analysis of the child's written texts shows that, widening social and cultural experience and developing the L2, the child has expanded the meanings she could make with the language in the culture. The analysis also shows that a distinguishing feature of the child's writing is the use of formulaic expressions. The study argues that from a socio-semantic perspective formulaic expressions are meaningful and worthy of analysis in language and mental development, since they were an important resource for the child's L2 development and mental processes of repeating and memorizing the same forms are thought-stimulating. Therefore, it suggests that language teachers need to teach functionally relevant expressions for situations to early L2 learners.

**[second language learning/ second language development/ formulaic expressions/ESL learning/제2언어 학습/제2언어 발달/형식적 표현/ESL 학습]**

### **I. INTRODUCTION**

Learning a second/foreign language is many people's concern. In fact, however, learning a new language is not a simple matter. It involves not simply learning the lexico-grammar of the target language but also learning how to use the lexico-grammar appropriately in the target-language culture. Many people may have a practical understanding of second language (L2) learning processes from their learning

experiences, successful or unsuccessful.

However, practical experience and knowledge are not sufficient to enable them to understand fully how L2 learning takes place. As Mitchell and Myles (2003) noted, we need to understand L2 learning better than we do, for at least two reasons. First, increased knowledge in this area can contribute to more sound understanding about the nature of L2 learning and the properties of cross-cultural communication. Second, informed views will stimulate pedagogical improvements in second/foreign language education, as well as explain success and failure in L2 learning, as a result.

Traditionally, much L2 research, in which “most SLA researchers view the object of inquiry as in large part an internal, mental process” (Long, 1997, p. 319), seeks to describe and explain how second language acquisition (SLA) is possible. This approach probably reflects their belief that L2 learning is essentially a mental phenomenon. Yet, although it is generally accepted that language learning occurs in the human mind, apparently it is not solely internal factors that bring about language learning, which, in reality, happens within and in relation to the surrounding environment. If this is so, we need to extend the goals of L2 research outside the networks that define language learning as a psycholinguistic enterprise, in order to identify both the external and internal factors that account for why learners acquire a second language in the way they do (Ellis, 1997).

Taking this view, I saw that Vygotsky’s and Halliday’s theories had the potential to account for much of L2 learning from a sociocultural perspective; that is, both these researchers’ theories are broadly relevant to L2 learning research and of particular interest to my own research. As the parent of a child who would learn English as a second language (ESL) in a foreign, English-speaking country, and as an ESL researcher, I naturally had a great interest in my daughter’s L2 learning in a new culture, and as a result studied my daughter’s exploration of L2 learning and her language development over a period of time following her immediate arrival in Australia. I carried out this longitudinal case study, building on existing sociocultural theories of language and language learning (notably Halliday’s (1978) functional theory of language development and Vygotsky’s (1978) sociocultural theory of mental development). The research questions for the study are as follow:

1. In what ways does the child’s L2 development take place?
2. Is there any salient feature in the child’s L2 development, and, if so, what is it and what differences does it make for the child’s L2 development?

## II. LITERATURE REVIEW

### 1. Language Learning in the Head

L2 research has been mostly concerned with the nature of learner language, first language (L1) transfer, and cognitive issues based on an input-output system. The bulk of research has been carried out within the generative linguistic framework, although by the mid-1980s there appeared a new research tendency in some quarters to approach L2 learning from a social and sociocultural perspective (Swain & Deters, 2007).

Researchers who see SLA essentially as a mental process tend to believe that language acquisition takes place in the mind. This research perspective is closely associated with Chomsky's theory of L1 acquisition, which emphasizes the basic principles, or rules, underlying all human languages which in his view are inherently built in children's brain and allow them to acquire the grammar of their mother tongue. Within the Chomskian framework, Dulay, Burt, and Krashen (1982) claimed that SLA is a creative construction as "the subconscious process by which language learners gradually organize the language they hear, according to the rules they construct to understand and generate sentences" (p. 276). Krashen (1985) conceptualized the creative construction theory as hypotheses, in which he argued that, like L1 learners, L2 learners acquire grammatical structures of the target language in a natural order. This hypothesis was based on studies which examined language learners' development of grammatical morphemes and Krashen did not distinguish between L1 and L2 learning. Cognitive researchers, working from an information processing perspective, identified different general learning mechanisms to account for human learning and performance (Anderson, 1983; McLaughlin, 1987). Comparing the cognitive processing of the human brain to the mechanism of the computer that receives and processes information, cognitive psychologists tend to explain language learning in terms of language reception and language production processes located in the mind.

Negotiation of meaning in the context of L2 interaction has also been examined from a psycholinguistic point of view by SLA researchers (Gass, 1997; Long, 1996; Pica, Lincoln-Porter, Panino & Linell, 1996). Long (1996) claimed that longitudinal data of negotiation in interaction provide adequate evidence of language learning in learners' utterances over consecutive negotiation cycles. So negotiation of meaning in interaction provides good learning opportunities for learners because during negotiation they get to know what they didn't know before. As a result of such interaction, mutual understanding and therefore learning can occur through the transfer of knowledge from one speaker (native speaker) to the other (L2 learner). From an interactionist perspective, Ellis's (1994) broader perspective accommodates elements of the linguistic and social context of language use.

He notes that interaction between speakers draws on the linguistic environment that surrounds a particular grammatical feature. Both types of context, according to Ellis, influence the choice of language forms. These points of view, which consider L2 learning according to both learners' internal (mental) background and their external (linguistic) environment, are prominent in psycholinguistic perspectives on SLA.

## 2. Language Learning in Context

However, while social interactionists working within the framework of psycholinguistics view interaction as an effective trigger of the learner's innate linguistic knowledge, sociocultural researchers perceive social interaction as more than a contribution to the fine-tuning of language input in the mind, i.e., an essential prerequisite for general mental and language development. A sociocultural perspective acknowledges that language is a social system employed to make meaning and that the language learner is an active constructor of meaning with others. Learning a language, in this broad sense, takes place in the social and cultural contexts in which learners operate. Sociocultural theory (Cole, 1996; Rogoff, 1990; Vygotsky, 1978, 1987; Wertsch, 1991) assumes that the human mind is socially constructed, that is, mediated by semiotic systems, notably language, and that it is inseparable from the context in which it is used. Vygotsky (1978) argues that through social activity lower mental functioning (i.e., biologically given dispositions) develops into higher mental functioning (i.e., cognitive abilities), wherein language is the most powerful tool for thinking. L2 learning researchers in this paradigm seek to capture interaction between more and less expert users in order to analyze the trajectory of language development in use. For example, these researchers may focus on learning guidance, which is called "scaffolding" (Bruner, 1985; Vygotsky, 1978), and its contribution to language development as a whole (Donato, 2000; Lantolf, 2000; Lantolf & Appel, 1994; Lantolf & Thorne, 2006; Ohta, 2000; Swain, 2006).

Functional-linguistic studies also relate not only to language use and language learning but general human development as well. Systemic function linguistics, developed by Halliday (1978), characterize language as socially semiotic and functionally semantic. That is, people make linguistic choices to make meaning in social contexts of use. For example, the language development of a child can be addressed in terms of how the child realizes meaning potential through language in interaction with caregivers, as in mother tongue development demonstrated in a case study of Halliday's son up to the age of two (Halliday, 1975). According to Halliday, the words and structures (i.e., wordings) of language, the ways in which a child, for example, uses language to express meaning, develop from the uses to which the language is put, and the child learns meaning through learning to use language for communication. Halliday's pioneering work in L1 development has been

supplemented by subsequent studies (Painter, 1984; Walsh, 2002; William, 1994). These studies show that in L1 development there is a transition from the infant protolanguage to the adult language system of meanings, wordings and sounds, and that the transition of a child's language to more adultlike language arises from social interaction and adult guidance in a shared social and cultural context of shared experience and understanding.

The Vygotskian and the Hallidayan sociocultural approaches to language, as already argued, differ markedly from the traditional psycholinguistic view that language acquisition occurs in the mind and therefore is mental. Instead, Vygotsky's and Halliday's theories offer a new perspective on human and language development and thereby broaden our understanding of human language. This study is a socio-semantic approach to one child's L2 development in social learning contexts, based on sociocultural theories of language and language learning, notably Halliday's (1978) functional theory of language and Vygotsky's (1978) sociocultural theory of learning. I believe that together the theories offer rich and sophisticated perspectives from which to understand cross-cultural language learning and development.

### III. METHOD

#### 1. The Participant and Settings

The participant of the study, Genie (a pseudonym), is a native Korean speaker of Korean origin who had experience of four years of formal early childhood education (three years of kindergarten education and one year of school education) in Korea. English is not included in the first year of Korea's primary school education. However, Genie had some experience of learning the English alphabet and words in a private after-school academy. When coming to Australia, she was found to have no grammatical knowledge of English but a certain measure of lexical knowledge; for example, an ability to recognize almost all the letters of the English alphabet and produce single-word utterances such as *shoor* (for *school*), *cumputol* (for *computer*) and *coord* (for *cold*). She appeared to have hardly any English language receptive abilities (i.e., listening and reading) or expressive abilities (i.e., speaking and writing). Six days after she arrived at Australia, she began to go to an Australian school. She was seven years and four months old when she enrolled in school in Australia and began to learn ESL.

Genie attended West Primary School (a pseudonym) in Adelaide, the capital city of South Australia, from January to December 2007. The school was closest to her home, where she lived with her father and mother who spoke the Korean language as their home language (see the next section for more details). It had enrollments of approximately 300

students from Reception to Year 7 and had a New Arrivals Program (NAP) unit attached. The NAP provides an intensive English program for newly arrived, non-English-speaking students. It is available for students within their first 12 months after arriving in Australia and is designed to help them to adapt successfully to the new language and culture before joining mainstream classes (Department of Education and Children's Services, 2008). It provides small classes composed of 10 to 15 students, as compared to mainstream classes of 25 to 30 students. Students can be enrolled in the NAP for up to one year (four school terms) and are taught by ESL teachers.

## 2. Data Collection

This study addressed the research question, "In what ways does the participant child's L2 development take place?" in social learning contexts. The basic question was developed to enable "triangulation" through multiple perceptions to clarify meaning (Stake, 2003) which linked to the desired outcomes. The data-collection techniques comprised observation, interviews, and the subject's L2 samples. Data collection began at the point when Genie began to go to school in Australia and ended approximately six months (28 weeks) later when she was seven years and ten months old, ranging from the beginning of Term 1 of 2007 to early Term 3 of the same year at West Primary School.

Two kinds of observations account for how the researcher worked to understand which activities helped Genie learn her second language. One kind was non-participant observation (Swann, 2003). Using this technique, I was able to capture features of Genie's school and classroom life. Participant observation, which was used in Genie's out-of-school setting, was another procedure. Since she is my daughter, I as the researcher was in an inside position of a special kind. I was actively engaged in daily events and activities in which her learning of second language and learning through languages (L1 and L2) took place. The special relationship between the researcher and the subject, between parent and daughter, provided opportunities not only for keeping a close watch on *etic*—externally observable—aspects of her learning situations but also for having an *emic*—internally knowable—perspective of them (Freeman, 1998).

I also conducted interview sessions with her class teacher at the school. In total I conducted six interviews with the teacher. The teacher interviews were conducted once every three or four weeks during the research period. The interview questions related to the curriculum content being taught, teaching strategies and practices, and the teacher's perception and assessment of Genie's learning activities in terms of her performance and attitude. Each interview which was audio-recorded lasted 30 to 60 minutes and was in the form of semi-formal guided interview.

Samples of Genie's L2 output were obtained from one source: writing. As a researcher I

asked her to keep a diary in the target language for two reasons: everyday writing would facilitate her L2 development and it would be an important data source of data for investigating her L2 writing progress. She wrote in her electronic diary from the first school day forward. She wrote by herself, but, after finishing writing, she received feedback on form and meaning on each entry from me, her father as researcher, at first in Korean only and later in Korean and English. The feedback was copious and explicit involving acknowledgement, requests for clarification and corrections in punctuation, spacing, spelling, and the structure of sentence and of text. It was offered in the form of “scaffolding” (Bruner, 1985; Vygotsky, 1978), that is, a support system that assisted the child to develop the second language. Her school writing was also produced while being taught English as a curriculum subject at school. However, I chose to focus the analysis on her home writing since some of her school writing was not produced completely on her own; her school work was used as a secondary research source. As a result, Genie’s diary entries became primary texts for analysis of her L2 writing development. Genie produced a large amount of language in written mode. I had to decide to reduce the corpus for analysis to a more reasonable size by selective and purposive sampling (Krathwohl, 1998), selecting one entry per week based on the likelihood of texts yielding new instances of language use and consequently richer and more interesting analysis. I also decided that four entries over a four-week period would compose one text for analysis. Four weeks seemed the optimum interval to track significant changes in Genie’s written language development because young children tend to learn language relatively rapidly. As a result, 28 samples finally were selected to make up seven texts for analysis.

### 3. Data Analysis

#### 1) The Major Analytic Tool

Genie’s L2 writing development was analyzed metafunctionally within the systemic functional linguistics (SFL) framework. SFL describes language as a semiotic system systemically made up of three strata (see also II Literature review of this research). That is, semantics (meanings) get realized through lexico-grammar (wordings) which is in turn realized by the phonology (sounds) or graphology (letters). Halliday and Matthiessen (2004) describe the semantic function of language in terms of a rank scale. According to Halliday and Matthiessen (2004), a text which is an extended stretch of language is made up of several different units. These units form the core of what he calls the rank scale, the compositional hierarchy of grammatical constituents. At the heart of the rank scale, however, are clauses. This is because speech is encoded not in sentences but in messages, which are realized grammatically in clauses and clause complexes. For this reason, in

systemic functional grammar a clause is viewed as the basic unit of meaning at which a grammatical analysis begins (Butt, Fahey, Feez, Spinks & Yallop, 2001).

## 2) The Analytic Processes and Terms

Accordingly, the texts were first analyzed as clauses or clause complexes, according to the rank scale principle (Halliday & Matthiessen, 2004). Each text was then analyzed for transitivity. The transitivity system construes the world of experience (Halliday & Matthiessen, 2004), which is usually represented as unfolding events involving participants and circumstances of time, space, cause, or manner. In this research, the transitivity analysis examined the process type, participants and circumstances for experiential meanings, that is, how Genie's experiences in the world are represented in language.

Table 1 summarizes the key terms used in the processes of text analysis. The use of these research processes and analytic terms is based on Halliday's own work (Halliday & Matthiessen, 2004) and other books that explore and introduce Halliday's functional grammar (e.g., Butt et al., 2001; Droga & Humphrey, 2002; Eggins, 2004).

Table 1  
*Definitions of Terms of Transitivity Analysis*

Process types and their functions	Participant roles
Material: to construe the material world of doing and happening	Actor: participant responsible for doing Goal: object of the action Range: domain over the action takes place Beneficiary: participant benefiting from the process
Mental: to construe the inner world of sensing and thinking	Senser: participant performing the process Phenomenon: thing known and perceived
Relational Attributive: to construe relationships of description Relational Identifying: to construe relationships of identification	Carrier: thing described Attribute: description Token: what gives value or identification Value: what is being identified
Behavioral: to construe physiological and psychological behavior	Behavior: conscious being performing the process Behavior/Range: restatement of the process
Verbal: to construe saying	Sayer: participant responsible for the process Verbiage: nominalized statement of the process Receiver: beneficiary of a verbal message
Existential: to construe existence	Existent: the only obligatory participant

A grammatical analysis such as this highlighted different aspects of Genie's language use in English and revealed specific semantic patterns in her texts (Si-Ho Yang, 2010). Finally, all the results of the lexio-grammatical and semantic analyses were aggregated and tabulated from a quantitative perspective.



## IV. RESULTS

### 1. Transitivity Analysis for Experiential Meanings

Each of the texts can be considered as an event, which is the activity unfolding in a particular situation and is crystallized by verbal groups, or processes, in the clauses which make up a text (Butt et al., 2001). Table 2 summarizes the process types identified in each of the seven texts Genie produced during the research period.

Table2  
*Frequency of Process Types*

Process type	Text (week)						
	1(1-4)	2(5-8)	3(9-12)	4(13-16)	5(17-20)	6(21-24)	7(25-28)
Material	40%(4)	14%(5)	13%(7)	28%(17)	27%(17)	33%(23)	28%(13)
Mental	—	14%(5)	9%(5)	9%(6)	11%(7)	29%(20)	26%(12)
Affect	—	14%(5)	6%(3)	1%(1)	3%(2)	21%(15)	4%(2)
Inclination	—	—	—	—	2%(1)	—	—
Perception	—	—	2%(1)	6%(4)	—	1%(1)	2%(1)
Cognition	—	—	2%(1)	1%(1)	6%(4)	6%(4)	20%(9)
Verbal	—	—	—	5%(3)	3%(2)	4%(3)	—
Behavioral	20%(2)	—	2%(1)	—	3%(2)	—	—
Existential	—	—	—	—	—	—	2%(1)
Relational	—	61%(22)	69%(38)	55%(39)	48%(30)	24%(17)	33%(15)
Identifying	—	42%(15)	44%(24)	37%(26)	32%(20)	—	7%(3)
Attributive	—	19%(7)	25%(14)	18%(13)	16%(10)	24%(17)	26%(12)
Word count	28	142	249	406	369	335	304
Clause count	10	36	55	71	63	70	46
Process rate	60%(6)	89%(32)	93%(51)	92%(65)	92%(58)	90%(63)	89%(41)

Note: Out-of-bracket number = frequency percentage (calculated against the total number of clauses in a text); bracketed number = frequency number (the number of times occurring in a text)

The main features of the written texts are that relational, material and mental processes dominate over verbal, behavioral and existential processes, and that relational processes are used most of all. This means that Genie was very much concerned with describing and identifying things. More specifically, identifying processes, which initially predominate (Texts 2, 3, 4, and 5), give way to attributive processes in Texts 6 and 7. That is to say that her concern shifted from relating things to their identity or function (e.g., “*To day is thursday.*” in Text 2, “*Today is first day of the autumn break.*” in Text 3, “*Weather name is rain stormy, foggy, burning hot, cloudy, windy and snow.*” in Text 4, “*My favourite story is Lomeao and Juliat.*” in Text 5) to describing how things relate to persons, places or objects (e.g., “*It is beautiful and sad story.*” in Text 5, “*It was magnificent.*” in Text 6, “*Sometimes she gets angry.*” in Text 6, “*She is a teacher who help me to do the ABC work.*” in Text 7). This seems a significant change, one that shows the expanding breadth and depth of

Genie's mental functioning in association with English language use. That is, in the initial stages of learning the second language her main interest was in identifying things or their function, mainly using formulaic language patterns. In these stages she was using a lower level of mental and verbal expressions. As her L2 resources for making sense of the world grew, however, she was able to explore through the language the attributes of that world, thus functioning at a higher level of mentation than previously in that language. This development could be interpreted as the progressive accessing of more abstract verbal thinking from concrete things and facts, and also great access to the intrapersonal domain of language.

A second overall feature is that the texts have relatively high proportions of material and mental processes. In particular, material processes are most frequently used in Text 1 and remain fairly frequent in the later texts (e.g., "*and, home go*" in Text 1, "*At the playground I played skipping rope.*" in Text 3, "*I read a book in the house.*" in Text 5, "*I will get a prize maybe tomorrow.*" in Text 7). This suggests that Genie was also interested in actions, events and their participants. As a result her texts are characterized by physical actions. In other words, she continued to respond to what was going on around her. This is natural in that the human mind primarily focuses on the physical world from which human activity and thought derive.

Mental processes do not appear at all in Text 1 but increasingly occur in the later texts, simultaneously becoming differentiated by sub-type (see Table 2). It is important to note that while the mental process, affect, is used in all the six subsequent texts (e.g., "*I don't like pepper.*" in Text 2, "*I like the skipping rope.*" in Text 3, "*I like all seasons.*" in Text 4, "*I enjoyed reading the email.*" in Text 6, "*I missed her.*" in Text 6), the mental process, cognition, features only in later texts (e.g., "*I forgot*" in Text 5, "*I think daddy want to read this book.*" in Text 6, "*I thought daddy was also not pleased*" in Text 6, "*but I don't know how to start.*" in Text 7). In addition, behavioral processes are relatively numerous in Text 1 (e.g., "*dvdlook.*" [watched DVD], "*and, sllep.*" [and slept]) but after that are little used (e.g., "*My mum is third slept.*" [My mom slept three times] in Text 3, "*Before that I watched Little Red Riding Hood and Three Billy Goats Gruff.*" in Text 5). This distribution may mean that physiological phenomena overall were of less interest to Genie. These findings indicate a change in Genie's mental functioning when using English if affective sensations and sensorimotor behaviors can be said to constitute the lower mental functions, and conscious thinking and deliberate memory the higher mental functions. Genie's changing pattern of language use allowed her to be less focused on external actions and tangible objects and more focused on mental representation, a sign of her developing meaning making potential in English. As Table 2 indicates, in the course of her language development, Genie, as is demonstrated by the increasing variety of process types she was able to use, became able to express more and finer meanings. The analysis illustrates that

Genie was mastering her own meaning making activity through her increasing control of language as a symbolic tool for thinking.

Process, realized by a verbal group, is the pivotal element of a clause, as it represents the experience of an event taking place in a situation (Butt et al., 2001). However, processes are found only in six out of the ten clauses in Text 1, which indicates that Genie failed to express what was happening around her accurately using English verbs in the very early stages of learning the second language. Considering, however, that each text has a title (a minor clause), and that the other texts contain a relatively high number of processes, Genie can be said to have increased her range of linguistic processes and hence her control over English, the target language.

Processes, as already noted, express human events—acting, sensing, thinking, being, etc.—through verbal groups. Further, human experiences take place in specific circumstances of time, place and manner, which also need to be expressed to make communication more meaningful. Therefore, I examined another experiential resource, circumstance, as part of measuring Genie’s writing development. Table 3 presents the frequency distribution of circumstantial elements—the whens, wheres, hows, whys of an event—identified in each text. These elements are realized by adverbial groups, prepositional phrases and sometimes by nominal groups.

Table 3

*Frequency of Circumstance Types*

Circumstance type	Text (week)						
	1(1-4)	2(5-8)	3(9-12)	4(13-16)	5(17-20)	6(21-24)	7(25-28)
Location	40%(4)	8%(3)	35%(19)	39%(28)	22%(14)	14%(10)	30%(14)
Time	–	(2)	(14)	(18)	(8)	(2)	(6)
Space	(4)	(1)	(5)	(10)	(6)	(8)	(8)
Extent	–	3%(1)	–	–	–	3%(2)	2%(1)
Manner	–	–	–	1%(1)	–	3%(2)	2%(1)
Means	–	–	–	(1)	–	–	(1)
Quality	–	–	–	–	–	(2)	–
Cause	–	–	–	–	2%(1)	3%(2)	–
Accompaniment	–	–	–	7%(5)	2%(1)	6%(4)	2%(1)
Angle	–	–	–	–	2%(1)	–	–
Matter	–	–	–	–	3%(2)	–	–
Word count	28	142	249	406	369	335	304
Clause count	10	36	55	71	63	70	46

*Note:* Out-of-bracket number = frequency percentage (calculated against the total number of clauses in a text); bracketed number = frequency number (the number of times occurring in a text)

Table 3 shows that circumstantial elements were used in all the texts. Circumstances function to enrich the experiential content of the text, as they add specificity to the information given and thus complement other strategies which make the text more

'written' in style. Circumstantial elements function to make human experience more explicit to others.

The dominant circumstance type in the texts is location. This means that often Genie used English to situate things and events in time and space. In other words, she was concerned primarily with when and where events occurred (e.g., <time+space>“Today I went to the library.” in Text 2, <time+space+accompaniment>“Today I went to the zoo with daddy and mum.” in Text 4, <space+time>“I will mit the friend in the library pm 1:00.” in Text 4, <accompaniment+space+time>“I danced with my classmates in the hall today.” in Text 7). A variety of circumstantial elements, however, are used, and these increase over the seven texts (e.g., <space+manner(means)+accompaniment>“In the library I played with dolls with the friend and the friend's friend.” in Text 4, <space+matter>“In the school I studied about brain.” in Text 4, <accompaniment+location>“My daddy had a interview with Mrs Wallis at school.” in Text 4, <time+purpose>“then people comes to helps for the wolf away.” in Text 4, <manner(quality)>“My mum can writes very good.” in Text 5, <angle>“She is kind and nice to me and Danny.” in Text 7). This is to say that, widening her experience with language, she expanded the meanings she could make with it.

A grammatical—transitivity—analysis for experiential meanings in Genie's L2 written texts illustrated that her ability to encode meaning became increasingly rich over the period of research. As demonstrated above, her meaning making potential expanded and her thinking became conscious as her second language, writing, developed. I think that her language development supported and reflected her learning development and mental development.

## 2. Feature of Genie's Writing: The Use of Formulaic Expressions

What is observed as a salient feature in Genie's L2 writing is the systematic use of formulas, unanalyzed chunks and patterns (Ellis, 1985, 1994). She relied heavily on formulaic expressions in her writing. This dependence had a long sweep, lasting from Research Week 5 to 17. The following are the recurring patterns and routines of Genie's writing:

### <Patterns>

- ( i ) *Today is....(or It is...today.)*
- ( ii ) *Yesterday was....(or It was...yesterday.)*
- ( iii ) *Today date is....(or It is....)*
- ( iv ) *Today weather is....(or It is...today.)*
- ( v ) *Today I went to....*

(vi) *I like..../I don't like....*

(vii) *Tomorrow will be....(or It will be...tomorrow.)*

<Routines>

(viii) *Tomorrow will be a happy day. (or It will be a happy and fun day.)*

Genie continued to employ these two types of formulas systematically for approximately three months (13 weeks). Thus, those expressions played such a large, formulaic part in her writing that they cannot be dismissed in her L2 writing development. But formulas are a moot point whether they are unanalyzed or not. I was interested in all the texts that Genie as an L2 learner produced in the process of L2 development. In my view, so long as the text had been used with social intention in a particular context, the text, although formulaic, was suitable for my semantic analysis because every utterance in a social context has a particular function or meaning, which is realized by a speaker's or writer's specific linguistic choices on the occasion of use. So I'd like to discuss this matter in more detail in the next section.

## V. DISCUSSION

Genie's L2 use depended in good part on formulaic expressions. Formulas (Ellis, 1985, 1994; Lyons, 1968) include routines or units that are learned, totally unanalyzed, as wholes (e.g., "*I don't know*"), and patterns which refer to unanalyzed units with one or more open slots (e.g., "*Can I have a ...?*"). Genie continued to use these kinds of formulas systematically in the process of her L2 writing development, and after around Research Week 17, she put them to less or no use.

This being the case, other questions arise, such as "Are formulas unanalyzed or unanalyzable?" and "What difference do their use, or not, make for language development?" This study which understands L2 learning as a sociocultural action views the use of formulas as meaningful action and as analyzable in this respect. Researchers in the (psycho) linguistic tradition (Dulay, Burt & Krashen, 1982; Krashen, 1985) that originates in Universal Grammar (Chomsky, 1957) tend to hold the view that language is a complex set of grammatical rules and language learning entails acquiring the principles of the universal grammar. Such a view allows these researchers to accord primacy to the acquisition of rules when it comes to language acquisition. For those holding this view, then, formulas should be lexical rather than rule-based because they have been heard and memorized as unanalyzed wholes or prefabricated chunks (Mitchell & Myles, 2003) and accordingly should not be treated as a manifestation of a system of rules inherent in the child. Given the

individual's cognitive capacity, it would appear that memorization is a minimal cognitive activity—a mechanical form of literate activity devoid of creativity, so to speak—and, as a result, memorized patterns or routines are of little or no value for researchers whose overriding concerns are with the order in which morpho-syntactical features are acquired.

The general premise implicit in such a view is that the child is endowed with mental mechanisms for the self-direction of the language acquisition process, independent of the physical environment located in time and space. This view tends to disregard the role of world experience and knowledge, including linguistic experience and knowledge, that human societies have developed over many years to adapt to the changing environment. In this study, I have approached human language as a system of social semiotics, a system which operates in interpersonal contexts. This is Halliday's (1978) view of language, which also accords with Vygotsky's (1987) sociocultural perspective on learning. Although language learners reproduce utterances that they have heard and memorized before, they are using language with the express intent to meet their communicative needs in a particular social context. That is, they are consciously constructing meaning relevant to the real-life situation through the medium of language. So, for example, it would be impossible to deny the meaning potential in a child's one-word sentence. Taking this perspective, using language is always meaning-making activity. Meaning is realized in the form of text in context; as Halliday (1978) puts it, "a text is an instance of social meaning in a particular context of situation." In short, any text is constructed in an interpersonal context, which means that, so long as a text has a social purpose in the context in which it is used, it can be semantically analyzed. In fact, texts have multiple purposes depending on their context of use.

From this perspective, it is possible to analyze the meanings that Genie makes as a language user on different yet interrelated strata of semiotic organization. On the articulation level, the symbols of written language are instantiations of clusters of letters in structured forms. On the content level, they are lexicalized as words to form lexicogrammar as "organic configurations of functional roles" (Halliday, 1988, p. 14). When people communicate using language, they inevitably create words. And "[t]here are many social and cultural domains likely to motivate new words", which are generated "in the form of word-formations, word-meanings, collocations and idiomatic phrases" (Crystal, 2003, p. 146). So, when a community of people generates its own discourse, there will necessarily be a great deal of lexical creation (Crystal, 2003; Dako, 2001). Finally, as wordings (lexico-grammar) are stabilized, they become a very effective semiotic means for storing and generating meanings (semantics) for communicative purposes. In this view, even a lexical item establishes the link among semantics, lexico-grammar, and phonology and graphology. Understood from this perspective, language, which comprehends the network of human social meaning-making, all types of Genie's interlanguage included, can

be semantically analyzed and hence semiotically construed.

There appears to be agreement among the current psycholinguists concerning the relationship between lexical and grammatical knowledge (Chomsky, 1995; Cook, 1997; Gass, 1999), that, for example, the lexicon does not just store an item's semantic definitions and argument specification, but also derivational, inflectional and free grammatical morphemes (Chomsky, 1995). Similarly, many SLA studies (Collentine, 2004; Guntermann, 1992; Marriot, 1995; Regan, 1998; Siegal 1995) bolster the claim that there is a reciprocal relationship between lexical items, including formulaics, and grammatical knowledge during SLA, indicating that formulaic expressions are important tools in the grammatical repertoires that L2 learners develop. If this is so, then, it might be difficult for SLA research to claim the superiority of the acquisition of grammatical rules over other aspects of linguistic knowledge, such as semantics, lexis and phonology, without awareness of how it is that linguistic phenomena interact among themselves in the processes of L2 development (Hulstijn, 2002).

Also from a psychological perspective, deliberate attention and memory are constitutive parts of higher mental functions, as distinguished from reactive attention and spontaneous memory that fall within the domain of lower mental functions. Vygotsky (1981) built a strong argument for a "stratificational model" (p. 155), which assumes that in human development biologically specified (or lower order) mental functions, such as sensations, reactive attention, spontaneous memory and sensorimotor intelligence, are retained but develop into more complex socioculturally determined (or higher order) mental functions, such as mediated perception, deliberate attention and memory, and logical thinking. That is, fully-fledged mental functions are not simply the generation of natural maturation or the result of individual experience, they are also transformed by the "assimilation of the experience of humankind" (Vygotsky, 1981, p. 169) in social interaction mediated by semiotic tools, and particularly language. Deliberate memory is, according to Vygotsky's view, a higher mental form that develops in the progression of social activity. Moreover, a further argument of this kind which is also relevant to this study can be found in Olson's work on writing systems. Writing system brought verbal form and its meaning into our consciousness because it "provided a notion of saying the same thing" each time the same form was scanned, recited or repeated (Olson, 1994, p. 258). In addition, the importance of formulas in language use is recognized in corpus linguistics as well, in that, as instances of our everyday L1 utterances, they are a complex mix of creativity and prefabrication (Sinclair, 1991). In a similar vein, Thompson (2005) argues that through memorization and repetition of nursery rhymes, a cultural form of writing, rhymes are easily rooted in children's linguistic repertoire and cultural values inherent in the language are subsequently transmitted to children. It is evident enough, then, from what has been said that formulas are meaningful in language development and in that respect of analytic value.

Genie continued to employ formulaic expressions in her writing systematically for thirteen weeks (Research Week 5 to 17). Formulaic expressions played such a large role in her L2 writing development, and thus they were a bridge for her into higher levels of proficiency in the target-language use. The development of her language and learning was also apparent in her school assessments and reports. Genie successfully completed the ESL education program of West Primary School in Australia in one year, having entered the NAP on 29 January 2007 and completing it by 14 December of the same year, during which she passed the three formal assessment tests of ESL Scales levels administered according to the South Australian Curriculum Standard and Accountability Framework. She was then recommended to join Year 3 of mainstream education in 2008, which was appropriate for her age.

## VI. SUMMARY AND IMPLICATIONS

The study has examined one child's L2 writing development in terms of lexico-grammar and semantics using the analytic framework of SFL. The metafunctional analysis of the child's written texts showed that, widening social and cultural experience and developing the L2 language, the child had expanded the meanings she could make with the language in the culture. The analysis also showed that a distinguishing feature of the child's writing was the use of formulaic expressions. The study argued that from a socio-semantic perspective formulaic expressions are meaningful and worthy of analysis in language and mental development, since they were instrumental in the child's developing the second language and mental processes of repeating and memorizing the same forms are thought-stimulating.

Therefore, as a case study the study supports the need for language teachers to teach functionally relevant expressions for situations to early L2 learners, especially newly arrived L2 learners who come from different cultural and language backgrounds. Functionally appropriate expressions for situations, for example, include saying hello, thank-you or good-bye; questioning; asking for permission, assistance or clarification; and expressing agreement or disagreement. Teachers themselves are also good English models in the classroom, and so their language use becomes an important resource for children's English language development. Thus, classroom teachers need to be conscious of their own language use and take the lead in using language patterns which were or are being learned.



## REFERENCES

- Anderson, J. (1983). *The architecture of cognition*. Cambridge, MA: Harvard University Press.
- Bruner, J. S. (1985). Vygotsky: A historical and conceptual perspective. In J. V. Wertsch (Ed.), *Culture, communication and cognition: Vygotskian perspectives* (pp. 21-34). Cambridge: Cambridge University Press.
- Butt, D., Fahey, R., Feez, S., Spinks, S., & Yallop, C. (2001). *Using functional grammar: An explorer's guide*. (2<sup>nd</sup> ed.). Sydney: National Centre for Language Teaching and Research Macquarie University.
- Chomsky, N. (1957). *Syntactic structure*. The Hague: Mouton & Co.
- Chomsky, N. (1995). *The Minimalist program*. Cambridge, MA: MIT Press.
- Cole, M. (1996). *Cultural psychology: A once and future discipline*. Cambridge, MA: Berknap Press.
- Collentine, J. (2004). The effects of learning contexts on morphosyntactic and lexical development. *Studies in Second Language Acquisition*, 26(2), 227–248.
- Cook, V. J. (1997). *Inside language*. London: Arnold.
- Crystal, D. (2003). *English as a global language*. Cambridge: Cambridge University Press.
- Dako, K. (2001). Ghanaisms: Towards a semantic and a formal classification. *English World-Wide*, 22(1), 23–53.
- Department of Education and Children's Services. (2008). *New arrivals program*. Retrieved November 11, 2008, from the World Wide Web: <http://www.decs.sa.gov.au/curric/pages/ESL/nap/>
- Donato, R. (2000). Sociocultural contributions to understanding the foreign and second language classroom. In J. P. Lantolf (Ed.), *Sociocultural theory and second language learning* (pp. 27-50). Oxford: Oxford University Press.
- Droga, L., & Humphrey, S. (2002). *Getting started with functional grammar*. Berry, S.W.: Target Texts.
- Dulay, H., Burt, M., & Krashen, S. (1982). *Language two*. New York: Oxford University Press.
- Eggins, S. (2004). *An introduction to systemic functional linguistics*. (2<sup>nd</sup> ed.). London: Continuum International Publishing Group.
- Ellis, R. (1985). *Understanding second language acquisition*. Oxford: Oxford University Press.
- Ellis, R. (1994). *The study of second language acquisition*. Oxford: Oxford University.
- Ellis, R. (1997). SLA and language pedagogy: An educational perspective. *Studies in Second Language Acquisition*, 19, 69–92.
- Freeman, D. (1998). *Doing teacher research: From inquiry to understanding*. Pacific

- Grove: Heinle and Heinle.
- Gass, S. M. (1997). *Input, interaction and the second language learner*. Mahwah, NJ: Lawrence Erlbaum Association Publishers.
- Gass, S. (1999). Discussion: Incidental vocabulary learning. *Studies in Second Language Acquisition*, 21, 319–333.
- Guntermann, G. (1992). An analysis of interlanguage development over time: Part I — por and pora. *Hispania*, 75, 177–187.
- Halliday, M. A. K. (1975). *Learning how to mean: Explorations in the development of language and meaning*. London: Arnold.
- Halliday, M. A. K. (1978). *Language as social semiotic: The social interpretation of language and meaning*. London: Edward Arnold.
- Halliday, M. A. K. (1988). Some basic concepts of educational linguistics. In V. Bickley, Courtenay & Institute of Language in Education (Eds.), *Languages in education in a bi-lingual or multi-lingual setting* (pp. 5-17). Hong Kong: Institute of Language in Education, Education Department.
- Halliday, M. A. K., & Matthiessen, C. M. I. M. (2004). *An introduction to functional grammar* (3<sup>rd</sup>ed.). London: Edward Arnold.
- Hulstijn, J. (2002). Towards a unified account of the representation, processing, and acquisition of second language knowledge. *Second Language Research*, 18, 193–223.
- Krashen, S. (1985). *The input hypothesis: Issues and implications*. Harlow: Longman.
- Krathwohl, D. R. (1998). *Methods of educational and social science research: An integrated approach*. New York: Longman.
- Lantolf, P. J. (2000). *Sociocultural theory and second language learning*. Oxford: Oxford University Press.
- Lantolf, J. P., & Appel, G. (1994). Theoretical framework: An introduction to Vygotskian approaches to second language research. In J. P. Lantolf & G. Appel (Eds.), *Vygotskian approaches to second language research* (pp. 1-32). Westport, CT: Ablex Publishing.
- Lantolf, J. P., & Thorne, S. L. (2006). *Sociocultural theory and the genesis of second language development*. New York: Oxford University Press.
- Long, M. H. (1996). The role of the linguistic environment in second language acquisition. In W. C. Ritchie & T. K. Bhatia (Eds.), *Handbook of second language acquisition* (pp. 413-468). San Diego, CA: Academic Press.
- Long, M. L. (1997). Construct validity in SLA research: A response to Firth and Wagner. *Modern Language Journal*, 81, 318–323.
- Lyons, J. (1968). *Introduction to theoretical linguistics*. Cambridge: Cambridge University.

- Marriot, H. (1995). Acquisition of politeness patterns by exchange students in Japan. In B. F. Freed (Ed.), *Second language acquisition in a study abroad context* (pp. 197-224). Amsterdam: Benjamins.
- McLaughlin, B. (1987). *Theories of second language learning*. London: Edward Arnold.
- Mitchell, R., & Myles, F. (2003). Second language learning: Key concepts and issues. In C. N. Candlin & N. Mercer (Eds.), *English language teaching in its social context* (pp. 11-27). London: Routledge.
- Ohta, A. S. (2000). Rethinking interaction in SLA: Developmentally appropriate assistance in the zone of proximal development and the acquisition of L2 grammar. In J. P. Lantolf (Ed.), *Sociocultural theory and second language learning* (pp. 51-78). Oxford: Oxford University Press.
- Olson, D. R. (1994). *The world on paper: The conceptual and cognitive implications on writing and reading*. Cambridge: Cambridge University Press.
- Painter, C. (1984). *Into the mother tongue: A case study in early language development*. London: Pinter.
- Pica, T., Lincoln-Porter, E., Panino, D., & Linell, J. (1996). Language learners' interaction: How does it address the input, output, and feedback needs of language learners? *TESOL Quarterly*, 30, 59-84.
- Regan, V. (1998). Sociolinguistics and language learning in a study abroad context. *Frontiers*, 4, 61-90.
- Rogoff, B. (1990). *Apprenticeship in thinking*. Oxford: Oxford University Press.
- Siegal, M. (1995). Individual differences and study abroad: Women learning Japanese in Japan. In B. F. Freed (Ed.), *Second language acquisition in a study abroad context* (pp. 225-244). Amsterdam: Benjamins.
- Sinclair, J. (1991). *Corpus, concordance, collocation*. Oxford: Oxford University Press.
- Stake, R. E. (2003). Case studies. In N. K. Denzin & Y. S. Lincoln (Eds.), *Strategies of qualitative inquiry* (2<sup>nd</sup> ed.) (pp. 134-164). Thousand Oaks, CA: Sage Publications.
- Swain, M. (2006). Languaging, agency and collaboration in advanced second language learning. In H. Byrnes, (Ed.), *Advanced language learning: The contribution of Halliday and Vygotsky* (pp. 95-108). London: Continuum.
- Swain, M., & Deters, P. (2007). "New" mainstream SLA theory: Expanded and enriched. *The Modern Language Journal*, 91, Focus Issue, 820-836.
- Swann, J. (2003). Recording and transcribing talk in educational settings. In C. N. Candlin & N. Mercer (Eds.), *English language teaching in its social context* (pp. 323-344). London: Routledge.
- Thompson, L. (2005). Learning language: Learning culture in Singapore. In J. A. Foley (Ed.), *Language, Education and Discourse* (pp. 76-96). New York: Continuum.
- Vygotsky, L. S. (1978). *Mind in society: The development of higher psychological*

- processes*. Cambridge, MA: Harvard University Press.
- Vygotsky, L. S. (1981). The genesis of higher mental functions. In J. V. Wertsch (Ed.), *The concept of activity in Soviet psychology* (pp. 144-188). Armonk, NY: Sharpe.
- Vygotsky, L. S. (1987). Thinking and speech. In R. W. Rieber & A. S. Carton (Eds.), *The collected works of L.S. Vygotsky* (N. Minick, Trans.) (pp. 39-288). New York: Plenum Press.
- Walsh, J. (2002). *Linguistic perspective on the development of identity: A child language study*. Unpublished doctoral dissertation, University of Technology, Sydney.
- Wertsch, J. (1991). *Voices of the mind: a socio-cultural approach to mediated action*. Cambridge, Mass: Harvard University Press.
- William, G. (1994). *Joint book-reading and literacy pedagogy: A socio-semantic examination*. Unpublished doctoral dissertation, Macquarie University, Sydney.
- Yang, Si-Ho. (2010). *Learning a second language: A case study of a Korean ESL child in Australia*. Unpublished doctoral dissertation, University of South Australia, Adelaide.

Si-Ho Yang  
Department of English Education  
Jeju National University  
1 Ara 1-dong, 102 Jejudaehakno, Jeju-si  
Jeju Special Self-Governing Province, 690-756, Korea  
C.P.: 010-2910-8960  
Email: show124@hanmail.net

Received 24 September 2011

Revised 27 November 2011

Accepted 13 December 2011