University of Alberta

The Oral Comprehension of Clitics by L2 Learners of French

by

Valerie Ann Wust   ©

A thesis submitted to the Faculty of Graduate Studies and Research
in partial fulfillment of the requirements for the degree of

Doctor of Philosophy

in

French Language, Literatures and Linguistics

Department of Modern Languages and Cultural Studies

Edmonton, Alberta
Fall 2006

NOTICE:
The author has granted a non-exclusive license allowing Library and Archives Canada to reproduce, publish, archive, preserve, conserve, communicate to the public by telecommunication or on the Internet, loan, distribute and sell theses worldwide, for commercial or non-commercial purposes, in microform, paper, electronic and/or any other formats.

AVIS:
L'auteur a accordé une licence non exclusive permettant à la Bibliothèque et Archives Canada de reproduire, publier, archiver, sauvegarder, conserver, transmettre au public par télécommunication ou par l'Internet, prêter, distribuer et vendre des thèses partout dans le monde, à des fins commerciales ou autres, sur support microforme, papier, électronique et/ou autres formats.

The author retains copyright ownership and moral rights in this thesis. Neither the thesis nor substantial extracts from it may be printed or otherwise reproduced without the author's permission.

L'auteur conserve la propriété du droit d'auteur et des droits moraux qui protège cette thèse. Ni la thèse ni des extraits substantiels de celle-ci ne doivent être imprimés ou autrement reproduits sans son autorisation.

In compliance with the Canadian Privacy Act some supporting forms may have been removed from this thesis.

Conformément à la loi canadienne sur la protection de la vie privée, quelques formulaires secondaires ont été enlevés de cette thèse.

While these forms may be included in the document page count, their removal does not represent any loss of content from the thesis.

Bien que ces formulaires aient inclus dans la pagination, il n'y aura aucun contenu manquant.

Canada

ABSTRACT

This dissertation presents empirical data from a classroom-based study designed to investigate the extent to which second language (L2) learners of French are able to process clitics during listening comprehension tasks. The learners were post-secondary students registered in a first-year, intermediate-level French language course in Canada.

This dissertation is comprised of three papers. The first paper addresses how the French pronominal system is acquired by monolingual, bilingual, specifically-language impaired, and L2 learners. In this paper, I present the similarities and differences in how learners from varied backgrounds acquire pronominalization, identifying both universal difficulties and those that pertain only to specific learner populations.

The second paper reports on a quantitative examination of university-level L2 French learners' ability to process and replicate the meaning of object clitics on a L2-L1 translation. Performance varied according to the inherent characteristics of object clitics (i.e., grammatical function, gender and animacy), L2 proficiency level, and total amount of exposure to French.

The study described in the third paper made use of a dictogloss task to determine whether an observed paucity of object clitics in L2 production means that these forms go unnoticed in the input. Data from the reconstructed texts was analyzed for the presence or absence of verbs which acted as 'triggers' for the clitics *y* and *en* in the original text. A qualitative analysis of the data revealed interlanguage forms that were in competition in obligatory pronominalization contexts in addition to specific auditory perception difficulties. Deleted objects, strong (i.e. free-standing) pronouns, and lexical noun

phrases were used with greater frequency than object clitics and students' primary source of nontargetlike form usage was attributable to argument structure/case assignment.

Based on the research findings it is suggested that teachers might do well to explore interpretation-based instruction (Ellis, 1995) as a means of focusing students' attention on object clitics in the input and sensitizing students to their phonological form in order to help these learners comprehend and acquire clitics.

ACKNOWLEDGEMENTS

I am indebted to many people who have supported me throughout my doctoral studies and in the writing of this dissertation. First and foremost, I would like to thank my advisor and mentor Leila Ranta for the wisdom she imparted to me. Words cannot express my appreciation for the guidance and encouragement she provided to me throughout this process and for the thoughtful and timely feedback she eagerly offered. As an advisor who repeatedly received a draft of a dissertation chapter and was willing to put her own work aside to make time to read it and provide feedback that very same day, Leila is the prototype of an advisor who goes above and beyond the call of duty. I have always been impressed by the quality of Leila's research and by her vast knowledge of second language acquisition and pedagogy. Of all of the professors I have worked with, she has contributed most to my professional formation and my growth as a researcher.

I am also grateful to the members of my core supervisory committee, Jennifer Dailey-O'Cain and Johanne Paradis, for their interest, encouragement, feedback, and support throughout my studies and my job search. In addition to having strong research programs, both are excellent teachers whose graduate seminars inspire my current teaching. I would also like to thank William Dunn, Gabriela Zapata and Larry Vandergrift for their thoughtful comments on this dissertation.

This research would not have been possible without the cooperation and participation of the students and instructors of French 150 at the University of Alberta. A sincere thanks goes out to the following instructors: Jean-Jacques Defert, Andrea Hayes, Christina Keppie, Amy Nye, Eileen Picco, Nathalie Ramière, Ravi Ramdhony, and Régine Toal.

I thank my fellow graduate students for their friendship, support and laughter over the years, in particular my dear friend Sabine Sievern. Sabine: it has never mattered that we worked with different languages or that we had different fields of specialization. From the beginning of the M.A. to the end of the Ph.D., we have always done it together: course work, candidacy exams, dissertation writing, going on the job market and starting tenure-track positions. Thank you for always being there, for understanding exactly what I was going through, and for keeping me sane.

I am deeply grateful to my family for their loving and unwavering support throughout my studies, especially my husband and best friend Markus. Markus has stood by my through all of the ups and downs of graduate school and the stress of finishing a dissertation while already working as a professor. Thank you so much.

TABLE OF CONTENTS

LIST OF TABLES

CHAPTER I.

Introduction

Although researchers have an incomplete understanding of the highly complex

phenomenon of second language (L2) acquisition, it is widely acknowledged that L2

comprehension exceeds production (Lightbown, 2000). Even when they are not able to

parse each individual component of an utterance, L2 listeners are still able to understand

what they hear by relying upon context and prior knowledge (Rubin, 1994). Lightbown

(2000) has suggested that this is one of the factors that has contributed to the

effectiveness of communicative, and content-based, language teaching. In content-based

language teaching programs, L2 learners receive abundant input in the target-language

(TL), the driving force behind acquisition according to most theories of SLA (see Cook,

1988 for Universal Grammar; see Gass, 1997 for an Interactionist perspective; see

Krashen, 1985 for the Input Hypothesis; see McLaughlin, 1987 for an Information

Processing perspective). However, an extensive body of research conducted in Canadian

French immersion (FI) classrooms indicates that massive amounts of comprehensible

input, in the absence of form-focused instruction, does not lead to high levels of accuracy

in production on the very grammatical forms which these learners seem to understand

(Rebuffot, 1993; Lyster, 2004). In fact, even some grammatical forms that are extremely

frequent in the input are not necessarily mastered by these students for productive

purposes. For example, despite the fact that nouns are almost categorically used in

conjunction with an article, and that sentences often contain other gender-inflected forms

in addition to articles, L2 learners of French continuously struggle with the notion of

grammatical gender (Bartning, 2000; Harley, 1998; Lyster, 2004). Clearly, mere exposure to such grammatical forms is not enough. According to Schmidt (1990), among others, L2 learners must not only be exposed to TL forms, they must also *notice* them. This leads to the question of whether the lack of productive mastery of highly frequent grammatical forms such as gender by L2 learners of French might indicate that these forms are not noticed in the input. Such a question is particularly important in content-based instructional settings where emphasis is placed on global comprehension (i.e., getting the meaning of contextualized discourse), rather than on the learning of grammatical forms.

The notion of global versus more localized listening comprehension is a relevant one because researchers agree that French immersion students have near-native-like or even native-like comprehension skills (Swain & Lapkin, 1982; Rebuffot, 1993). Genesee (1978), however, expressed some reservations about the listening comprehension test scores of these students, pointing out a disparity of performance on integrative type instruments (i.e., ones involving contextual information) and those assessing discrete-point skills. He asserted that "immersion students are relatively more proficient in language tasks which are characterized by redundancy that can be used to compensate for gaps in their knowledge or understanding of specific linguistic rules" (p. 46). Genesee was clearly acknowledging a role for compensatory strategies in FI listening comprehension that helped the students to achieve what appeared to be native-like performance.

Given L2 listeners' reliance upon context, it is important to understand how they process grammatical forms in the input. In order to investigate this empirically, it is

useful to select a target grammatical form that, even in cohesive discourse, cannot be understood solely through contextual clues. The chosen grammatical focus in this dissertation are clitics, which are grammatical features that function as free forms on a syntactic level but are, at the same time, bound on a phonetic level in that they cannot stand on their own in an utterance (Kayne, 1975). Although French has more than one type of clitics (e.g. determiners, subjects, etc.), the current work only examines the oral comprehension of the French object clitics (*me, te, le/la, lui, nous, vous, les, leur*), as well as the clitics *y* and *en*. The object clitics, as well as locative *y* and indirect *en*, are also known as anaphoric clitics because they are bound morphemes that refer to previously mentioned constituents of a discourse. An example of these forms is given in Example 1):

1) *Pierre regarde le film* →*Pierre le regarde*. 'Pierre watches/is watching the film. → Pierre watches/is watching it'.

These target forms are ideal candidates given that they are ubiquitous in both spoken and written French, carry a high communicative load, and "require coordination of morphosyntax with discourse pragmatics[1]" (Paradis, Crago & Genesee, 2003, p. 640). Moreover, clitics have been shown to pose acquisitional difficulties regardless of learner context or age, particularly because they are in competition with strong pronoun forms and lexical objects; they appear in non-salient, non-canonical position; and their use necessitates morphosemantic distinctions (person, gender, number), as well as knowledge of verb argument structure (Chillier et al., 2003; Erlam, 2003; Paradis, 2004). Moreover, researchers have reported a paucity of object clitics in L2 production (Harley, 1986; Herschensohn, 2004; White, 1996). For example, in White's (1996) longitudinal study of two young boys learning French, direct object clitics were rarely found in the oral data

until the eleventh month for both children and indirect object clitics barely occurred over the three year period of the study. Given the inherent difficulty of object clitics and their low-usage rates in L2 production, the question arises as to whether object clitics will also pose difficulties for L2 learners of French during oral comprehension or whether their comprehension exceeds their productive abilities (Lightbown, 2000).

This chapter begins with an outline of the specific objectives of the dissertation as a whole. The three papers that comprise the dissertation, all dealing with the acquisition and processing of clitics by learners of French, are framed within a discussion of models of listening comprehension, information-processing and input processing.

<u>Outline of the Dissertation</u>

This dissertation presents empirical data from a classroom-based study designed to investigate whether second language (L2) learners of French are able to process and comprehend object clitics in the input. The learners were post-secondary students registered in a first-year, intermediate-level French language course in Canada. In this dissertation, noticing is a conscious registration of form, either with or without meaning attached to it. Noticing is distinguishable from perception, which refers to mere acoustic signal registration. Comprehension is defined as a learner-controlled process which leads to the identification of the intended meaning of the spoken communication (Richards & Schmidt, 2002). Information processing refers to "the processes by which information and meaning are stored, organized, and retrieved from memory, and the different kinds of decoding which take place during...listening" (Richards, Platt & Platt, 1992, p. 180). Input processing here refers to the framework proposed by VanPatten (e.g., 1996, 2002,

2004), which is concerned with the formation of (partial or complete) form-meaning connections during on-line listening comprehension. As VanPatten (2004) points out, if a form has been processed, perception and noticing have necessarily occurred. The inverse however, is not necessarily true: that is to say that perception and noticing do not guarantee that a form will be processed.

The dissertation consists of three papers: the first paper (Chapter II) provides a theoretical framework for the dissertation and reviews the voluminous literature on the acquisition of pronominalization in French, while the second and third papers involve quantitative and qualitative analyses of the object clitic oral comprehension data. The first paper addresses the acquisition of the French pronominal system by monolingual, bilingual, specifically-language impaired (SLI), and L2 learners[2]. Chapter II synthesizes the similarities and differences in how learners from varied backgrounds acquire pronominalization, identifying both universal difficulties and those that pertain only to specific learner populations. A detailed account of the stages through which learners of French pass before they are able to consistently use object clitics in a target-like fashion is provided.

Chapter III reports on a quantitative examination of university-level L2 French learners' ability to process object clitics on a L2-L1 translation task. Data from this task is used to determine whether performance varies 1) as a function of inherent characteristics of object clitics (i.e., grammatical function, gender and animacy); 2) as a function of L2 proficiency level; and 3) as a function of total amount of exposure to French.

The study described in Chapter IV made use of a dictogloss task to determine whether an observed low rate of object clitics in L2 production, as has been attested to in the acquisition literature (e.g., White, 1996), means that these non-salient, medially-placed forms are not noticed in the input. The dictogloss is a type of task in which learners are read a short passage twice and asked to work in pairs to recreate the text from memory. This paper presents the results of an interlanguage (IL) analysis of student text reconstructions focusing on the object clitics *y* and *en* in the original text. Based on previous research on the acquisition of French pronouns, it was hypothesized that students would make greater use of deleted objects, strong (i.e., free-standing) pronouns, and lexical noun phrases (NPs) than object clitics. The findings of the data analysis generally confirm these predictions.

As a cohesive body of work, these three papers have the following objectives:

1) to synthesize the body of research on the acquisition of the French pronominal system across the L1, L2 and SLI learner populations;

2) to determine whether difficulties in processing during listening comprehension tasks parallels problems in the production of these forms (Harley, 1986; Herschensohn, 2004; White, 1996); and

3) to explore how language-internal and learner-related factors play a role in the oral comprehension of object clitics.

The two empirical papers are grounded in the literature on L2 listening and on information processing models in SLA (e.g., McLaughlin, 1987, 1990; VanPatten 1996, 2002, 2004). To this end, listening comprehension models proposed by Anderson (1995)

and Nagle and Sanders (1986) are discussed and linked to concepts from information-processing models of skill learning.

<div align="center">Listening Comprehension Models</div>

Successful listeners make use of two types of processing simultaneously: top-down and bottom-up (Buck, 2001; Rost, 1990, 2002). Top-down processing occurs when listeners access their pre-existing knowledge to understand the meaning of a message. This prior knowledge typically takes the form of knowledge of the topic, of the listening context, of the text type or of the culture in which the text was created. In top-down processing, listeners rely upon content words and contextual clues to formulate and refine hypotheses. Bottom-up processing occurs when listeners rely upon linguistic knowledge to understand the meaning of a message. Moving from individual words to grammatical relationships to lexical meanings, the listener constructs the meaning of the message. Listening is a highly interactive process that necessitates parallel use of top-down and bottom-up processing, in which the listener makes complementary use of prior knowledge and linguistic knowledge to construct meaning. In fact, as incoming speech can only be completely parsed in the case of 'slow speech' (Rost, 1990), top-down processing serves to compensate for deficiencies in bottom-up processing (Chaudron & Richards, 1986). Although L2 listening instruction typically focuses on top-down processing (Wilson, 2003), if L2 learners are to fully understand oral discourse, they must use bottom-up processing as well so as to obtain a fairly complete parsing of the incoming speech stream, including the assignment of words to grammatical categories and the assignment of the structural and semantic relations between them (Cook, 1988).

In order to be successful on listening tasks that require accurate parsing of the input listeners need to know the argument structures of verbs (i.e., whether they take a direct or indirect object in the given context) and which elements are playing the roles of agent and patient in the sentence, for example. When listeners rely upon top-down processing to make up for gaps in bottom-up processing, it is likely that they will arrive at an incomplete or inaccurate interpretation of the utterances they have heard.

Listening is also described in terms of a linear process. Anderson's (1995) three-phase L1 listening comprehension model involves perception, parsing and utilization. During the 'perceptual processing' phase, listeners' attention is focused on the sounds of language, which are stored in echoic memory (i.e., pre-perceptual sensory register where auditory information is temporarily held). Given the limitations of echoic memory the processing of sound for meaning begins almost instantaneously. During the parsing phase, meaningful representations are constructed from words and phrases. These meaningful units of information are available for storage in short-term memory. Factors such as language knowledge, topic knowledge and signal quality determine how much information listeners are able to retain from the input. During the utilization phase, long-term memory comes into play as connections are made between what is being heard and previous knowledge. Information in long-term memory is stored in the following forms: schemata, script, and interrelated concepts. It is during the utilization phase that the listener is able to use the mental representation of the meaning of an utterance. If the utterance is an assertion, for example, the listener may store its meaning in memory. In the case of a question, the listener may respond to it. If the given utterance is an order, the listener may obey. The three stages of listening (perception, parsing and utilization) occur

in a linear sequence to a certain extent, but they are also subject to some overlap in that a listener can be in the process of making inferences from the initial part of a sentence while already in the process of perceiving its second part, for example.

Building upon the work of Nagle and Sanders (1986), Buck (2001) further elaborates the stages of the listening process as follows:

> The acoustic input is held briefly in echoic memory, which captures the sound and passes this to working memory. At this stage affective factors, such as interest or motivation may strengthen the input, or weaken it due to the lack of attention. This input is processed in working memory by an executive processor, by means of controlled processes or automatic processes or any degree of combination between the two, and the result is passed along to long-term memory. There the input is compared to and synthesized with other knowledge- linguistic, contextual or relevant general knowledge and a feedback loop relates the results back to the executive processor where it may be reprocessed or recycled as necessary (p. 26-27)[3].

This model of L2 listening comprehension raises a number of very important issues in the process: the role of processing and the role of attention, in particular, as well as the concepts of short-term, long-term, and working memory. These are important components of information-processing models of SLA.

<u>Information-Processing Models in SLA</u>

Cognitive psychologists conceptualize the human mind as a processor of information (Anderson 1983; 1995). A recent metaphor for the human mind has been that of the super computer which receives input via the eyes, the ears and other sensory organs. Johnson (2003) points out that "the metaphors of input, output, short-term memory, long-term memory, storage of information, intake, container, and computer are frequently evoked" (p. 12-13). A primary assumption of the cognitive tradition is that mental processes are rule-governed and that these rules require implementation via some sort of mechanism. "Thus, the rule-governed mental processes require a hardware system – the human brain – and a software program – the human mind – where these rules are assimilated, processed, and stored" (Johnson, 2003, p. 13). One particular information processing model that has been developed within a second language context comes from McLaughlin and his colleagues (e.g., McLaughlin, 1987; McLaughlin & Heredia, 1996; McLaughlin, Rossman & McLeod). McLaughlin (1987) asserts that "learning is a *cognitive* process, because it is thought to involve internal representations that regulate and guide performance...These representations are based on the language system and include procedures for selecting appropriate vocabulary, grammatical rules, and pragmatic conventions governing language use". As the learner becomes more fluent, there is a continuous restructuring process (p. 134-135).

According to McLaughlin (1987), there are two important dimensions of L2 processing: automatic processing and controlled processing. In automatic processing, particular nodes in memory are activated "every time the appropriate inputs are present. This activation is a learned response that has been built up through the consistent

mapping of the same input to the same pattern of activation over many trials"
(McLaughlin, 1987, p. 134). The associative connections used in automatic processing
are held in long-term memory and, as such, only develop after significant amounts of
practice. "Once learned, an automatic process occurs rapidly and is difficult to suppress
or alter" (McLaughlin, 1987, p. 134). Conversely, controlled processing only occurs
when nodes are activated in a specific sequence. This activation requires the attention of
the learner and typically only one sequence can be activated at any time given the limited
nature of human processing capacity. As such, it takes longer to activate controlled
processes than automatic ones. "But controlled processes have the advantage of being
relatively easy to set up, alter, and apply to novel situations" (McLaughlin, 1987, p. 135).

By repeatedly performing a procedure, the L2 learner can move from controlled to
automatic processing. A procedure becomes 'routinized' so that it is available as a pre-
fabricated procedure in long-term memory. This is referred to as automaticity. As the
procedure is stored in long-term memory, using it no longer monopolizes attentional
resources and each of its individual components executes automatically so that attention
can be allocated elsewhere. For the L2 learner, this means that a task that once required a
significant amount of control and carried a high processing load, after repeated trials,
becomes automatized in the sense that little attention needs to be directed towards
performing the task which now carries a negligible processing load. In production, for
example, this could mean that speakers have a greater capacity to plan what they are
going to say as a result of automatic information processing (i.e., L2 learners have more
formulae accessible for productive use). Learning a second language ultimately entails
the transfer of information to long-term memory, which is a controlled process. However,

once the learner has automatized a skill, controlled processes are freed up which means they can be used for higher levels of processing (McLaughlin, 1990).

Second language fluency requires different types of knowledge. Declarative knowledge involves knowledge about languages, such as word definitions and rules, but also includes memory of images and sequences of events which are saved in the form of propositions or schemata (Anderson, 1983). A parallel could be drawn between how declarative knowledge is encoded in memory and how information is encoded in a set of instructions (Anderson, 1983). Conversely, procedural knowledge is knowing how to do things, including the application of rules to problem solving or to the very comprehension and production of language. Language use is governed by procedural knowledge. While gains in declarative knowledge can be made quickly, gains in procedural knowledge are made over longer periods of time as a result of practice and feedback during which declarative knowledge becomes automatized. In the beginning, declarative knowledge always serves as a foundation for procedural knowledge. As a result of learning, knowledge may be transformed from declarative to procedural. While controlled processing can operate on both types of knowledge, automatic processing only draws upon procedural knowledge.

In an information-processing account of second language acquisition, such as the one advanced by McLaughlin and his colleagues, as learners are exposed to L2 input their attention is focused on those components of the input that have not been automatized. From an information-processing perspective, L2 input helps to automatize controlled knowledge and furnishes the information needed for IL restructuring.

While the McLaughlin information-processing model accounts for processing in a general way, VanPatten provides more specific predictions about how grammatical features are processed for acquisition to occur.

VanPatten's Processing Instruction and Input Processing

The classroom studies on the processing of clitics in this dissertation are framed within the Input Processing (IP) model proposed by VanPatten (e.g., 1996, 2002, 2004). This model is based upon a series of principles and corollaries that describe what happens in a learner's working memory when s/he is engaged in input processing. VanPatten's model of input processing differs from the previously discussed work of McLaughlin and his colleagues in that VanPatten does not believe that second language acquisition initially occurs through the use of controlled processes that "lay down the 'stepping stones' for automatic processing as the learner moves to more and more difficult levels" (McLaughlin, Rossman & McLeod, 1983, p. 140). Automatization and the proceduralization of declarative knowledge are not components of IP, instead VanPatten's model describes how intake is derived from input. Moreover, "accommodation of intake and restructuring are seen as processes separate from IP" (VanPatten, 2002, p. 762). Like McLaughlin, however, VanPatten's starting point is the widely-acknowledged assertion that L2 learners have a limited capacity for processing the input to which they are exposed (e.g., Clahsen & Felser, 2006; McLaughlin & Heredia, 1996; McLaughlin, Rossman, & McLeod, 1983; Skehan, 1998; Towell, 2000). According to Shook (1999), L2 learners:

only take in some and not all of the language to which they are exposed,

due to the task demands with which the learner is faced (e.g., searching

the input for vocabulary items on a listening comprehension test) and the

language learning experience of the learner (e.g., the similarity of new

verb forms in the input to those already learned), as well as the content,

grammatical complexity and pragmatic information surrounding the

language input (p. 40).

Given that this limited processing capacity necessitates a careful allocation of attention,

VanPatten posits that learners will preferentially derive meaning from the lexis rather

than from grammatical form. For this reason, Robinson (2001) has referred to

VanPatten's model as a limited-capacity, single-resource model of attention. The fact that

L2 listeners privilege meaning over form goes hand in hand with the communicative

value construct (VanPatten, 1985), whereby the value attributed to any given form is a

function of how much it contributes to the overall meaning of a sentence. Both the

'meaning is processed before form' principle and the communicative value construct

have important implications for the aural comprehension of clitics in the current research.

Object clitics have a high communicative index given their semantic value and lack of

redundancy. The high communicative value of certain object clitics should facilitate the

processing these forms in the type of listening tasks under examination in this

dissertation.

In VanPatten's IP model, the placement of a form within an utterance contributes to

its overall processability. Forms in sentence initial position are more salient than those in

final position, which in turn are more salient than those in medial position. The object

clitics in the current study appear in SOV word order as was previously illustrated in Example 1), that is to say sentence medially. According to VanPatten's IP model, they are not good candidates for being noticed by the learners. Using VanPatten's IP model, other specific predictions can be made about whether or not L2 learners of French in the current study will indeed attend to object clitics during listening comprehension measures. While the high communicative value of certain clitic target forms would appear to enhance their processability, their lack of acoustic saliency and medial position would appear to decrease their processability.

Conclusion

The preceding review of the L2 listening process (Anderson, 1995; Nagle & Sanders, 1986) and the application of information processing models in SLA (e.g., McLaughlin, 1987; VanPatten, 1996, 2002, 2004) to listening has laid the theoretical foundation for the empirical studies in this dissertation. This discussion has been particularly important in highlighting the role of processing and attention in the listening process. VanPatten's Input Processing principles were used to make predictions about whether or not clitic forms would likely be attended to in the input. In fact, the central concern in the current dissertation is the question posed by VanPatten as to "how learners get form from input and how they parse sentences during the act of comprehension when their primary attention is on meaning" (2002, p. 757). The results of the quantitative and qualitative studies in this dissertation indicate that despite frequent and prolonged exposure to clitics in the input that many of the learners of French in this study still experienced difficulty in processing clitics for both meaning and form during listening

comprehension tasks. In Chapter V, the pedagogical implications of the research on the

comprehension of clitics are explored and alternatives to the typical output-based

approach to clitic instruction are presented.

Endnotes

1. Not all clitic forms have an equally high communicative load. Clearly, the object clitics forms *me, te, le, la, lui, nous, vous, les, leur* have a greater semantic value and contribute more to the overall meaning of a sentence than indirect *y*, indirect *en* and locative *y*.

2. For the purposes of this paper, a bilingual is a child who grows up learning two languages simultaneously before the age of three. SLI is a developmental language disorder. According to Paradis (2004), children affected by SLI "acquire their native language in a more protracted fashion than their unaffected peers and present with pernicious difficulties in the lexical and morphosyntactic domains of language. Children with SLI develop normally otherwise in that they have nonverbal IQs within the normal limits, no severe social-emotional problems, no frank neurological damage, no hearing loss, and no oral-motor impairments" (p. 68).

3. The executive processor coordinates the auditory and visual-spatial elements of working memory.

References

Anderson, J.R. (1983). *The architecture of cognition*. Cambridge, MA: Harvard

University Press.

Anderson, J.R. (1995). *Cognitive psychology and its implications*. (4th edition). New

York: Freeman.

Bartning, I. (2000). Gender agreement in L2 French: Pre-advanced vs advanced learners.

Studia Linguistica, 54, 225-237.

Buck, G. (2001). *Assessing listening*. Cambridge, England: Cambridge University Press.

Chaudron, C., & Richards, J.C. (1986). The effect of discourse markers on the

comprehension of lectures. *Applied Linguistics, 7*, 113-127.

Chillier, L., Arabatzi, M., Baranzini, L., Cronel-Ohayon, S., Deonna, T., Dubé, S.,

Franck, J., Frauenfelder, U., Hamann, C., Rizzi, L., Starke, M., & Zesiger, P.

(2001). The acquisition of French pronouns in normal children and in children with

specific language impairment. In *Proceedings of Early Lexicon Acquisition* [CD-

ROM], Lyon, France.

Clahsen, H., & Felser, C. (2006). Grammatical processing in language learners. *Applied

Psycholinguistics, 27*, 3-42.

Cook, V. (1988). *Chomsky's Universal Grammar*. Oxford: Basil Blackwell.

Erlam, R. (2003). Evaluating the relative effectiveness of structured-input and output-

based instruction in foreign language learning. *Studies in Second Language

Acquisition, 25*, 559-582.

Genesee, F. (1978). A longitudinal evaluation of an early immersion school program.

Canadian Journal of Education, 3, 31-50.

Harley, B. (1986). *Age in second language acquisition.* Clevedon, England: Multilingual

   Matters Ltd.

Harley, B. (1998). The role of focus-on-form tasks in promoting child L2 acquisition. In

   C. Doughty and J. Williams (Eds.), *Focus on form in classroom second language*

   acquisition (pp. 156-174). New York: Cambridge University Press.

Herschensohn, J. (2004). Functional categories and the acquisition of object clitics in L2

   French. In P. Prévost and J. Paradis (Eds.), *The acquisition of French in different*

   contexts: Focus on functional categories (pp. 207-242). Philadelphia, PA: John

   Benjamins Publishing Company.

Hulstijn, J. (1990). A comparison between the information-processing and the

   analysis/control approaches to language learning. *Applied Linguistics, 11*, 30-45.

Johnson, M. (2003). *A philosophy of second language acquisition.* New Haven: Yale

   University Press.

Kayne, R. (1975). *French syntax: The transformational cycle.* Cambridge, MA: The MIT

   Press.

Krashen, S. (1985). *The input hypothesis: Issues and implications.* London: Longman.

Lightbown, P.M. (2000). Classroom SLA research and second language teaching.

   Applied Linguistics, 21, 431-462.

Lyster, R. (2004). Differential effects of prompts and recasts in form-focused instruction.

   Studies in Second Language Acquisition, 26, 399-432.

Lyster, R. (2004). Research on form-focused instruction in immersion classrooms:

   Implications for theory and practice. *French Language Studies, 14,* 321-341.

McLaughlin, B. (1987). *Theories of second language learning.* London: Edward Arnold.

McLaughlin, B. (1990). Restructuring. *Applied Linguistics, 11*, 113-128.

McLaughlin, B., & Heredia, R. (1996). Information-processing approaches research on

second language acquisition and use. In W. Ritchie and T. Bhatia (Eds.),

Handbook of research on second language acquisition (pp. 213-228). New York:

Academic Press.

McLaughlin, B., Rossman, T., & McLeod, B. (1983). Second language learning: An

information-processing perspective. *Language Learning, 33*, 135-158.

Nagle, S.J., & Sanders, S.L. (1986). Comprehension theory and second language

pedagogy. *TESOL Quarterly, 20*, 9-26.

Paradis, J. (2004). The relevance of specific language impairment in understanding the

role of transfer in second language acquisition. *Applied Psycholinguistics, 24*, 67-

82.

Paradis, J., Crago, M., & Genesee, F. (2003) Object clitics as a clinical marker of SLI in

French: Evidence from French-English bilingual children. In B. Beachley et al.

(Eds.), *Proceedings of the 27th Boston University Conference on Language*

Development (pp. 638-649). Somerville, MA: Cascadilla Press.

Rebuffot, J. (1993). *Le point sur l'immersion au Canada*. Montreal, Canada: Éditions

CEC.

Richards, J.C. (2005). Second thoughts on teaching listening. *RELC Journal, 36*, 85-92.

Richards, J.C., Platt, J., & Platt, H. (1992). *Longman dictionary of language teaching and*

applied linguistics. Harlow, UK: Longman.

Richards, J.C., & Schmidt, R. (2002). *Longman dictionary of language teaching and*

*applied linguistic (3*rd ed). Harlow, UK: Pearson.

Robinson, P. (2001). Task complexity, cognitive resources, and syllabus design: A triadic

framework for examining task influences in SLA. In P. Robinson (Ed.), *Cognition

and second language instruction* (pp. 287-318). Cambridge, England: Cambridge

University Press.

Rost, M. (1990). *Listening in language learning.* London: Longman.

Rost, M. (2002). *Teaching and researching listening.* London: Longman.

Rubin, J. (1994). A review of second language listening comprehension research. *Modern

Language Journal, 78,* 199-221.

Schmidt, R. (1990). The role of consciousness in second language learning. *Applied

Linguistics, 11,* 129-158.

Shook, D. (1999). What foreign language recalls about the input-to-intake phenomenon.

Applied Language Learning, 10, 39-76.

Skehan, P. (1998). *A cognitive approach to language learning.* New York: Oxford

University Press.

Swain, M., & Lapkin, S. (1982). *Evaluating bilingual education: A Canadian case study.*

Clevedon, England: Multilingual Matters.

Towell, R. (2000). Second language acquisition: Holes in the parts and parts of a whole.

Studia Linguistica, 54, 109-122.

VanPatten, B. (1985). Communicative value and information processing in second

language acquisition. In E. Judd, P. Nelson and D. Messerschmitt (Eds.), *On

TESOL '84: A brave new world* (pp. 88-99). Washington, DC: TESOL.

VanPatten, B. (1991). Attending to form and content in the input: An experiment in

consciousness. *Studies in Second Language Acquisition, 12,* 287-301.

VanPatten, B. (1996). *Input processing and grammar instruction: Theory and research.* Norwood, NJ: Ablex.

VanPatten, B. (2002). Processing instruction: An update. *Language Learning, 52,* 755-803.

VanPatten, B. (2004). Input processing in SLA. In B. VanPatten (Ed.), *Processing Instruction: Theory, research and commentary* (pp. 5-32). Mahwah, NJ: Lawrence Erlbaum Associates, Inc.

White, L (1996). Clitics in L2 French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 335-368). Philadelphia, PA: John Benjamins Publishing.

Wilson, M. (2003). Discovery listening – Improving perceptual processing. *ELT Journal, 57,* 335-343.

CHAPTER II.

The Acquisition of Pronominalization by Learners of French

French clitics have received a considerable amount of attention in the literature dealing with various acquisitional contexts, namely first language (L1) acquisition, second language (L2) acquisition, bilingual first language acquisition and specifically-language impaired (SLI) acquisition. Although researchers working with these different learner populations are all interested in how learners acquire French pronominalization, in the past they have tended to disseminate research within their specific acquisition domain and to focus on single-learner context studies. In recent years, researchers seem more inclined to make comparisons between their own research and that carried out by others using different learner populations[1]. The goal of this article is to illustrate the similarities and differences in how the French pronominal system is mastered across acquisition contexts and to offer a synthesis of our current understanding of this complex process. This synthesis is two-fold: what is believed to be relevant to object clitic acquisition in specific populations and what is held as universal, regardless of the acquisitional context. This literature review aims to identify the stumbling blocks that learners encounter as they master the two competing pronoun systems in French and the stages through which learners pass before they are able to consistently use object clitics in a target-like fashion.

The review begins with an overview of the French pronominal system and a discussion of the various research methodologies that have been used to study French object clitic acquisition by monolingual L1 learners, bilingual L1 learners, specific-

language impaired (SLI) learners, and L2 learners. This is followed by a discussion of the relevant features of object pronoun acquisition that have been identified across various learner contexts. Markedness is proposed as a viable explanation of the stages of development through which learners necessarily pass during the acquisition of the French pronominal system. The paper ends with a summary of the current body of research, pointing out its limitations and suggesting directions for future research.

Overview of the French Pronominal System

Each French object pronoun has two corresponding forms: a strong one and a weak one, as can be seen in Table 1. While strong pronouns occur postverbally, typically occupying the same slots as full determiner phrases (DPs) (Kayne, 1975), clitic pronouns, are verbal affixes.

Table 2-1. Object Clitics and Strong Object Pronouns in French

Person	Clitic – direct object	Clitic – indirect object	Strong pronouns
I	*me*	*me*	*moi*
II	*te*	*te*	*toi*
III	*le/la*	*lui*	*lui/elle*
IV	*nous*	*nous*	*nous*
V	*vous*	*vous*	*vous*
VI	*les*	*leur*	*eux/elles*

In some languages, like German, nouns or noun phrases are marked for case, which ultimately shows their function in the sentence (e.g., subject, direct object, indirect object

or possessive). Noun phrases are inflected to denote their linguistic functions as can be seen in *Mein Mann* (subject) *ist nett* '*My husband is nice*' vs. *Ich sehe meinen Mann* (direct object) *jeden Tag* 'I see my husband every day'. French and German differ greatly in terms of the extent to which case is marked: while case is marked in clitic pronouns in French, it is also marked in articles, nouns and adjectives in German. The lack of unique forms in Table 2 attests to the fact that the French case system is not a highly inflected one.

Table 2-2. French Case System

	Subject	Direct Object	Indirect Object
1st person singular	*je*	*me*	*me*
2nd person singular	*tu*	*te*	*te*
3rd person singular	*il, elle, on*	*le, la*	*lui*
1st person plural	*nous, on*	*nous*	*nous*
2nd person plural	*vous*	*vous*	*vous*
3rd person plural	*ils, elles*	*les*	*leur*

In French, subject, direct object and indirect object forms are only truly distinguishable in the third person. First and second person markings only differentiate singular subjects and objects, while plural forms remain identical. In fact, the only clear distinction is made through the use of the colloquial first person plural form *on* (literally meaning 'one').

Research Methods in Research on Clitics

Since 1974 there have been a number of studies dealing with the acquisition of the French pronominal system by L2 learners. Researchers have examined pronouns in the oral production of L2 learners as is evidenced in conversations, interviews, spontaneously-produced data, as well as picture- and film-based narration tasks. Oral production has also been studied by means of elicited imitation tasks where the learners are asked by the experimenter to repeat a series of utterances that are presented to them orally. Oral comprehension of pronouns has been assessed using picture-identification tasks where the learners are shown a picture and after having heard a series of sentences must identify the one which most accurately describes the picture.

The ability of L2 learners of French to produce pronouns has been investigated using two types of written production tasks: essays and tests where they are asked to replace lexical noun phrases (NPs) with the appropriate object clitic pronouns. Their interpretations of these forms have also been assessed through reading comprehension and L1-L2 translation tasks.

Not only do the L2 studies of the acquisition of French pronominalization vary greatly in terms of data types, the learner populations are also far from being homogeneous. Data to be discussed in the current paper is drawn from the following learner populations: L2 children enrolled in Francophone schools, children and adolescents enrolled in Canadian French immersion programs, instructed L2 adolescents, instructed L2 adults and L2 adults learning French in natural settings. While the diversity of L2 learner populations and study designs used in the research that follows do not always facilitate direct comparisons of findings, together they paint a clear picture that

mastering the pronominal system may be one of the most difficult tasks faced by L2

learners of French[2].

A number of researchers have conducted experiments examining the acquisition of

the French pronominal system by monolingual, bilingual and SLI child learners. They

have studied pronoun usage in both spontaneous and elicited production. Oral

comprehension of pronouns has also been assessed through picture-matching tasks and

act-outs. Finally, researchers have examined these learners' ability to interpret pronouns

through reading comprehension measures and Truth-Value judgment tasks.

Paradis (2004) points out that although, to date, researchers have rarely compared

L2 learners and children with SLI, that this could be a very informative pairing. In fact,

such a comparison can actually prove to be more useful than one that compares L2

learners with normally-developing L1 children. In Paradis' words, "The advantage is that

children with SLI can be as cognitively mature and the same age as L2 children, and yet

they have incomplete target language abilities like L2 children" (p. 68).

Having introduced the methods that researchers have used to examine how learners

of French acquire clitic pronouns and having shown the utility of comparing different

learner populations, the relevant factors to this process will now be discussed.

The following patterns have been observed in the acquisition of French clitics:

subject/object asymmetry; overgeneralization of subject clitics; overgeneralization of

masculine gender; person acquired before number before gender; animate acquired before

inanimate; direct object clitics acquired before indirect object clitics; postverbal

placement acquired before preverbal placement; and strong object forms preferred to

weak object forms. One possible explanation for the stages of development that are observed in the acquisition of French clitics, markedness, is also discussed.

Observed Patterns in the Acquisition of French Clitics

Subject / Object Asymmetry

The current examination of the extant literature indicates that there are important differences between the acquisition of pronominalization by monolingual, bilingual, language-impaired, and L2 learners of French, both at the onset of this process and throughout the development of the pronominal system. One area, however, where the research reveals a common pattern for all of the learner populations relates to the notion of a subject-object asymmetry: that is to say the delayed appearance of object pronouns in relation to subject pronouns[3].

The discussion begins with evidence presented in the L1 longitudinal data. Augustin, perhaps the most widely discussed learner in the literature, showed a major delay in the acquisition of object clitics as opposed to subject clitics. At the age of 2;0.2, 33.3% of Augustin's finite verbal utterances contained subject clitics, which starkly contrasted with the total absence of object clitics. The absence of object clitics was documented until the age of 2;4.22, when 5% of Augustin's utterances contained these forms (Hamann, 2004). It was at the age of 2;9.30 that Augustin's quantitative use of object clitics became comparable to his use of subject clitics at the age of 2;0.

The monolingual L1 cross-sectional data involving elicited production measures patterns similarly to Augustin's longitudinal data, showing a clear subject-object asymmetry for both normally-developing (ND) and SLI learners (Jakubowicz, Nash,

Rigaut & Gérard, 1998). In certain studies, this difference is shown to be statistically significant ($p < .01$), in clear favor of subject clitics (Jakubowicz, Müller, Kang, Riemer & Rigaut, 1996). Researchers have also documented this delay in the productive use of object pronouns in oral discourse among monolingual French-speaking children with SLI (Hamann et al., 2003).

With reference to the monolingual L1 data, for both SLI and ND populations, Hamann and her colleagues allude to the problematic nature of the object clitic system. They compare object: subject clitic ratios documented in their various child language data sets to the adult ratios present in the speech of those interacting with Augustin during the recordings. While the adult ratio was almost 1:3, Augustin's object: subject clitic ratio was a low 1:9 (Hamann, Rizzi & Frauenfelder, 1996, p. 327). The object: subject clitic ratio for SLI children between the ages of 5;7-13;1 was "much lower than that of a normal 3-year-old child and ... very far from the adult ratio" (Hamann et al., 2003, p. 156). These results clearly attest to the asynchronous development of subject and direct/indirect object clitics.

The asynchronous development of the French clitic system is also supported by data from bilingual learners, such as in Kaiser's (1994) research based on recorded speech samples from the German-French speaking children Pascal and Ivar. Pascal's first object clitic emerged nearly 3 months after his first non-imitated, non-formulaic subject clitic (2;4 and 2;1, respectively). Ivar only began to use object clitics with some regularity at the age of 3;0 (nearly 10 months after subject clitics). Belletti and Hamann (2004) also document the delay of acquisition of objects by two bilingual children with different source languages: Italian and German. Elisa (German-French) used both subject and

object clitics from the beginning of the recordings, but with greatly varied frequencies (96% subject clitics in finite utterances, compared to 40% object clitics in Recording 2). Lorenzo (Italian-French) also patterned similarly to French monolingual children, using fewer object clitics in comparison with subject clitics. Granfelt and Schlyter's (2004) study also exemplifies the late acquisition of object clitics by three children simultaneously learning French and Swedish. While Mimi was already using subject pronouns at the beginning of the observation period (age 2;0), Jean first began to use them at 2;0 and Anne at the age of 2;5. Object pronouns, in contrast, were not used by the children until around the age of 2;6. Hulk's (2000) data on a French-Dutch bilingual child partially supports the notion of subject-object asymmetry. As opposed to other monolingual and bilingual learners, Anouk showed a particularly slow development of the French pronominal system that was characterized by the synchronous appearance of subject and object clitics at the age of 2;07.5. However, from that moment on, Anouk made much greater use of subject clitics than object clitics, a pattern that closely resembles the asymmetry in other studies.

The L2 data also patterns similarly to the L1 data in terms of quantitative differences in the number of tokens of subject and object clitics. In the L2 data, since both subject and object clitics are often present in the learner speech samples from the beginning of the study, it can be argued that this is not so much a delay in the acquisition of object pronouns, but rather evidence of subject-object asymmetry. Adiv's (1984) research on the oral production of 1st, 2nd and 3rd graders enrolled in French immersion and French/Hebrew immersion programs ranked grammatical classes according to increasing percentage of erroneous target feature usage. The children made a

substantially lower percentage of errors involving subject clitics in obligatory contexts as opposed to object clitics. A comparison between the two contexts revealed that object clitics posed the greatest acquisitional difficulties for learners in the French/Hebrew program. Trévisse, Perdue and Deulofeu (1991) presented a summary of the acquisition of French word order by Hispanic and Arabic learners, which was generated from oral data. The data indicated that direct object pronouns are late-acquired features, becoming productive only after animate subject and indirect pronouns. White (1996) studied two child L2 learners of French over a three-year period. After two months of exposure in a French-language kindergarten program, both Kenny and Greg used subject clitics. However, they made sporadic use of object clitics until the eleven month mark[4]. Grondin and White (1996) asserted that Kenny and Greg did not use object clitics productively until the 25th month of their acquisition of French. Herschensohn's (2004) two adolescent L2 learners demonstrated a productive mastery of subject clitics at the time of their first interview. However, even in the final recording that occurred six months later, Emma and Chloe did not exhibit a mastery of object clitics.

The delay in the productive use of object clitics is often attributed to the inherent nature of clitic pronouns. Kayne's (1975) seminal work on French clitic pronouns illustrated how clitics cannot be used in isolation. Nor can they be conjoined, modified, or receive focal stress. In most cases, they are inseparable from the verb and may not occur in argument position (i.e., may not be used postverbally, except in imperative constructions such as *Donne-le-moi!*). In stark contrast to their nominal and pronominal counterparts, the distribution of clitics is highly limited. The inherent difficulty of using the clitic system is further compounded by the presence of the strong counterparts.

Researchers have proposed a variety of explanations to account for a widely-documented subject-object asymmetry in French. Researchers differ from each other both in terms of their linguistic analysis of the pronominal system and their hypotheses regarding the acquisition of these elements. From Hamann's (2003) point of view, the fact that subject clitics are acquired before and used more frequently than object clitics serves as a confirmation that these two categories of clitics are distinct morphosyntactic entities. Jakubowicz, Müller, Kang, Riemer and Rigaut (1996), attribute the delay in the acquisition of object clitics to discursive factors, namely the linguistic expression of old information versus new information. In a later article, Jakubowicz and Rigaut (2000) argue that neither of the two aforementioned explanations is able to provide a reasonable account for the observed delay.

Jakubowicz and Nash (2001) propose that the acquisition order of functional categories is a function of the complexity of their syntactic calculation. According to Jakubowicz and Nash, "the syntactic computation in a given language is **LESS COMPLEX** when a merged functional category must be present in **EVERY** sentence....The syntactic computation is **MORE COMPLEX** if a merged functional category is present in SOME sentences" (p. 324). For French, this proposal obviously predicts an asymmetry in the production of diverse clitic forms, in favor of subject clitics.

Overgeneralization of Subject Clitics

Research has shown that both L1 and L2 learners overgeneralize as they work towards mastery of a complex linguistic system. When overgeneralization occurs, learners apply a grammatical rule or a linguistic form beyond accepted target-like usages.

Overgeneralization results in rules or forms that follow more 'regular' patterns. With reference to the acquisition of French pronominalization, learners have been shown to extend subject clitics to contexts that necessitate the use of object clitics.

Although, to the best of my knowledge, bilingual L1 studies do not address the issue of overgeneralization, two studies dealing with monolingual learners do. Jakubowicz's (1991) research with learners aged 3;0-7;5 years indicated that, on one hand, the children were able to correctly interpret sentences with anaphors. On the other hand, however, the children committed errors in sentences containing clitics, sometimes choosing the wrong picture as a result of having reversed the subject-object relationship in the stimulus sentence. According to Lima and Bianco (2002), very little is known about how school-aged monolinguals interpret direct object pronouns. Children found it more difficult to understand object clitics than subject clitics (Erhlich & Remond, 1997) and clitics continued to pose problems until the end of primary school (Lima & Bianco, 1999). Lima & Bianco's (2002) research indicated that "*lui* is primarily interpreted in reference to the syntactic subject of the sentence in which the pronoun appears" (p. 53). They postulated a treatment effect of the clitic *il* when it precedes *lui* in a single sentence, leading to either a lesser availability of cognitive resources or in an increased accessibility to the referent *il*. It was concluded that students interpreted *lui* in conjunction with the most accessible referent in their locus of attention.

The L2 data on clitic pronouns hilights specific cases of over-extension of grammatical forms, more specifically ones where subject clitics are used to replace object clitics in oral production. Naiman (1974) examined Grade 1 and 2 French immersion students, using elicited imitation, picture identification, and spontaneous production

measures to tap into their IL representations of object pronouns. The FI students used the alternative forms *il(s)/elle(s)* instead of the expected third person indirect object clitics *lui* and *leur*. Moreover, these incorrect clitic forms were primarily present at the end of sentences following the preposition *à*, a pattern that was likely attributable to L1 influence. The following error types with *à* + subject clitic sequences and postverbal subject clitics were documented in both the imitation and production tasks: *elle lance une pomme à il* and *il a montré elle le manteau* (examples from Naiman 1974, p. 20). It is noteworthy that Selinker, Swain and Dumas (1975) documented the exact same types of errors in the oral production of young FI learners. Naiman offered two possible explanations for why these FI children substituted subject clitics for indirect object clitics. According to his communicative strategy explanation, the children realized that it was incorrect to use a subject clitic, but since the appropriate object clitic was not part of their productive repertoire they substituted an incorrect form to make themselves understood. According to a second explanation, case errors were due to the overgeneralization of linguistic material. Subject clitics (*il, elle, ils, elles*) were used in the place of the indirect object clitics (*lui, leur*) because the students has not yet reached the stage in the acquisition of the French pronominal system where it became apparent that subject forms were not appropriate for all arguments (i.e., also direct and indirect ones).

Whether this phenomenon of subject clitics in lieu of object clitics manifests itself in monolingual children who have difficulty interpreting pronominal references during comprehension-based tasks or L2 learners who have a tendency to overextend certain

clitics forms, it is clear that overgeneralization is one strategy used by learners in differing contexts as they attempt to master a highly complex pronominal system.

Gender

An introduction to the body of research on the role of grammatical gender in the acquisition of pronominalization by learners of French would not be complete without making reference to a particularly lucid explanation offered by Chillier et al. (2001). Elevated rates of gender errors, as well as an asymmetrical distribution of gender errors (with a clear preference for masculine object clitics over their feminine counterparts) may be attributed to the distributional properties of gender in French. Chillier et al. provide clear examples taken from the French language that support the notion of masculine as dominating the language: "The masculine is required in constructions with expletive subjects (e.g., *il est tard*, [it is late]), conjunctions (e.g., *le garçon et la fille sont heureux* [the boy and the girl are happy-M]) and in generic nouns (e.g., professions) and therefore can be considered as a default form" (p. 15). I would also add that masculine dominates, or acts as a default in French, regardless of overall numbers. L2 learners of French often laugh when their teachers point out that even in a scenario with one million women and a single man, this population would be referred to using the third person plural masculine subject clitic *ils* because, in French, that which is masculine is privileged over that which is feminine.

A second issue that presents a major difficulty in the acquisition of the French pronominal system is ambiguous forms, particularly the third person indirect object clitic *lui*. For language learners, the idea of a single form with multiple functions can lead to

confusion, and even avoidance. *Lui* is used as a third person singular indirect object clitic, replacing both masculine and feminine indirect referents. That is to say that both *Je parle à Julie* (I speak to Julie) and *Je parle à Pierre* (I speak to Pierre) can be replaced with *Je lui parle*. As such, *Je lui parle* can only be interpreted within the context of a coherent discourse. Without this contextualization, one would be unable to confidently decode *lui* as either 'to him' or 'to her'. It is not surprising that learners of French prefer to interpret *lui* as referring to a masculine entity rather than to a feminine one given that outside its usage as an indirect object clitic, *lui* is exclusively used to designate masculine entities. *Lui*, for example, is used as a third person singular masculine tonic or disjunctive pronoun in six primary instances:

1. To place emphasis on the subject: *Lui, il aime chanter.* 'As for him, he likes to sing';

2. As the subject of a sentence, in and of its own right: *Lui n'est pas d'attaque.* 'He's not up for it';

3. In compound subjects: *Lui et moi, nous sommes d'accord.* 'He and I, we're in agreement';

4. As the object of a preposition (including negative contexts, such as "*ni*" or "*ne...que*"): *Sa petite-amie va venir chez lui.* 'His girlfriend is coming to his place';

5. With *-même*, indicating oneself: *Il préférerait le faire lui-même.* 'He would prefer to do it himself';

6. After certain expressions that do not allow the use of a weak clitic pronoun, but that necessitate a strong, post-posed pronoun: *Elle pense à lui.* 'She thinks of him.'

Perhaps the key factor, which was briefly alluded to earlier, is the very duality of the French pronominal system. French has two contrasting pronominal systems: a weak system of pre-verbal clitic pronouns and a strong system of post-posed pronouns. The clitic forms include *me, te, l', le, les, y, en, lui,* and *leur.* They are called clitics because they stand in for nouns that have been recently mentioned in a stretch of discourse. Strong pronouns, on the other hand can stand alone; that is to say that they do not necessarily have to be used in combination with a verb. The strong forms that correspond to the clitics mentioned above are: *à moi, à toi, à ça, là, de ça, à lui/à elle, à eux,* and *à elles.* Clitic proforms, on the other hand, must work together with a verb in order to convey meaning. The point to be made here is that the clitic *lui* can be replaced by either *à lui* or *à elle* depending on the gender of the referent. While it is often argued that the clitic *lui* is preferable to its alternatives *à lui/à elle,* the reality is that both strong and weak pronouns exist in the French language and that they are documented in the spontaneous oral discourse of adult L1 speakers (Auger, 1995; Nadasdi, 1995). Furthermore, as there are fewer constraints governing the use of the strong pronouns *à lui/à elle,* which are notably less ambiguous in terms of their referent than *lui,* it would seem natural for these forms to appear in early L1 and L2 production in French.

The monolingual data appears to support the notion of the masculine singular object clitic *le* functioning as a sort of default form, and of the clitic *lui* as a highly ambiguous form that causes great confusion for learners. In Connors and Nuckle (1986), for example, Canadian children distinguished the masculine singular indirect referents from feminine ones by using a post-posed strong pronoun *à elle* in place of a pre-posed *lui,* which resulted in *Je dis à elle* for *Je lui dis.* It is important to underline the fact, however,

that both of these forms are characteristic of adult colloquial speech in the communities in which these children were living.

Weissenborn, Kail, and Friederici's (1990) research on children aged 4;10-6;0 relied on a picture-matching task to assess comprehension of the third person indirect clitic *lui*[5]. The results showed that regardless of age, all children performed better on the non-clitic *à lui* than on the clitic *lui*. As age increased, so did the correct interpretation of feminine *lui*. These results appear to indicate that age is a factor in overcoming the masculine as default factor, which is often mentioned in the literature. Jakubowicz's (1991) elicited production data from children aged 3;0-7;5 years contained a number of ungrammatical sentences with gender errors in the object clitic: *le* or *la* instead of *la* or *le*, and showed similar age effects to Weissenborn, Kail and Friederici (1990). Gender error rates as high as 36.6% were documented, primarily occurring in the condition where the question/image implied two people of the opposite sex. While these children had acquired the trait of gender for production, they none-the-less experienced difficulties when two adjacent clitics – subject and direct/indirect object – had different genders. Similar results were found in Chillier et al. (2001), who examined the production and comprehension of pronominal clitics by 4-to-6-year-old ND and SLI children, using an elicited production measure and a truth-value judgment task. The production results for ND children showed significant effects for clitic type. The accuracy rankings by clitic type in descending order, reflexive *se* > *les* > *le* > *la*, revealed a significant difference between the masculine and feminine object pronouns. For third person singular direct object pronouns, the main error type involved wrong gender: children replaced a feminine direct object by the masculine one (19.4%) much more often than they replaced

the masculine direct object by a feminine one (6.5%). Interestingly, the SLI children exhibited a similar rate of gender errors on singular object pronouns to that of their ND counterparts, but their production did not evidence an asymmetry between masculine and feminine. The SLI and ND children's comprehension of the gender markings in object clitics was more comparable than their production of these forms. Just like the ND children, SLI children experienced major problems with gender mismatches, only detecting them in 26.1% of cases.

Gender, particularly in adjacent clitics, also posed difficulties for monolingual learners in reading comprehension tasks. In Ehrlich and Remond (1997), the children often appeared to be processing gender markings when they resolved anaphors, both in cases where they answered correctly and in cases where their incorrect answers matched the correct antecedent in terms of this feature[6]. Lima and Bianco's 2002 reading comprehension study of the indirect object clitic *lui* produced similar results. They concluded that it was the presence of the subject clitic *il* and indirect *lui* in the same sentence that triggered incorrect interpretations of *lui*.

While the question of expressing the gender of referents in the acquisition of pronominalization is less widely discussed in among L2 researchers, this theme does surface in the literature. For example, Bautier-Castaing (1977) examined the acquisition of French syntax by child L2 learners, with direct object usage in speech being one of the primary TL features under study. She concluded that object pronouns had not yet been acquired and were primarily used in a non target-like fashion, for reasons of difficulty with gender (among others). Paradis (2004) also reported gender errors in the oral production of English-L1/French-L2 learners. In a 1986 pilot study of Danish learners of

L2 French in their first, second, and third years of high school French, Andersen addressed the question of gender in object clitic usage in free written production and in Danish-French translation tasks. The students appeared to have IL systems that would allow them to be classified into four distinct groups. Group 1 students only used *le* and *la* in the direct object position and their choices were target-like in relation to the gender of the antecedent. Group 2, which was comprised of a small number of students, only used *le* as a direct object clitic. Group 3 showed the greatest variability in terms of their direct object pronoun usage. Masculine antecedents in the direct condition were replaced with *le/lui/il* and feminine antecedents were replaced with *la/le/elle/lui/sa*. Students in Group 4 systematically and invariably employed the pronoun *lui* whenever there was a +human masculine antecedent and *la/le* for –human feminine antecedents. Andersen postulated that learners in this group operated on a semantic trait distinction of +/-human. On the basis of this data, Andersen concluded that the acquisition of the +/-human distinction preceded the masculine/feminine distinction in this specific learner population.

Research indicates that grammatical gender is a factor in the acquisition of object pronominalization: gender errors distribute asymmetrically, with the masculine clearly serving as the preferred, default form.

Person

One of the semantic errors that learners of French commit in the acquisition of pronominalization involves person-related errors. Felix and Hahn (1985) suggested that in the acquisition of pronominalization, learners often begin with a single distinction, most often that of person. Referring to the English subject pronoun system, it was

suggested that the learner might initially distinguish first person 'I' or 'me', while using another pronoun such as 'you', to refer to all other persons. Subsequently, number distinctions in pronouns are added. This is followed by a phase where third person pronouns are introduced, although without gender differentiation. Finally, the learners are able to correctly mark gender in pronouns. Although the study referred to here deals with the acquisition of subject pronouns in English, the question arises as to whether or not the French data on direct object forms patterns similarly (i.e., if learners of French might behave similarly to learners of English and categorically use a single object clitic, like *te* or *vous* for example, to refer to all persons other than themselves before they learn to make the necessary number distinctions).

The acquisition of person as a component of object clitic mastery is not widely discussed in the literature, perhaps because person distinctions generally tend to precede number and gender distinctions in language development and are perceived as being less problematic. Drawing upon sources of evidence from early diary studies, detailed notes from broader studies as well as results from studies involving comprehension, production and imitation on monolingual learners of French, Clark (1985) concluded that first and second person pronouns are used before their third person counterparts, hypothesizing that third person pronouns are more difficult to acquire because they necessitate gender agreement marking. Contrasting findings were reported in Jakubowicz and Rigaut (2000), where monolingual children aged 2;0-2;7 used more third person object clitics than first and second person clitics in both spontaneous and elicited production. Meisel (1986) conducted a longitudinal study of the spontaneous oral production of bilingual French-German children (aged 1;0-4;0). He also documented third person object clitics being

productively used before first- and second-person object clitics and argued that this finding could not be explained on the basis of a prototypical communicative situation whereby third person forms designate the topic of the conversation. The delayed appearance of *me* and *te* was attributed to the functional ambiguity of these forms. To support this interpretation of the data, he referred to early productive usage of functional unambiguous forms (like the subject clitics *je*, *on* and *tu*). In Paradis (2004) both English-L1/French-L2 learners and monolingual French-speaking children made person errors when using object clitics[7]. Herschensohn examined the acquisition of object clitic pronouns by two adolescent, Anglophone learners of French, attempting to better understand their IL representation of this complex system. She (2004) concluded that "Emma and Chloe accurately distinguish between strong and clitic pronouns and seem to have a correct conception of the morphological forms of the six persons" (p. 229).

The limited corpus of research that comments on person usage in the development of object pronominalization seems to support the notion that person is not a particularly problematic construct for learners. Experimental data tentatively suggests that the third person object clitics become productive before their first and second person counterparts.

Number

While learners appear to have minimal difficulty in correctly interpreting and expressing person when using pronouns in French, the acquisition of number appears to be only slightly more problematic[8]. Looking at the number distinction through a linguistic optic, it becomes apparent that third person singular direct object pronouns carry more information than their plural direct object counterparts as they are marked for

both gender and number (*le* = masculine, singular; *la* = feminine, singular; *les* = plural)[9]. This is not the case, however, for the third person indirect object pronouns where gender is neutralized in both the singular (*lui* = masculine/feminine) and the plural (*leur* = masculine/feminine). One might wonder whether learners of French use plural direct object clitics more accurately than singular object clitics. Unfortunately, number agreement in object clitics is not widely discussed in the literature.

Monolingual child learners, such as those in Jakubowicz (1991), (aged 3;0-7;5 years) experienced some difficulty with number, although accurate number distinctions increased as a function of age. Chillier et al. (2001) reported similar findings in monolingual production among ND children (number errors <5%). In Weissenborn et al. (1990), the monolingual children aged 4;10 wavered at times as to whether *lui* and *à lui* forms in a picture-matching task were singular or plural. Ehrlich and Remond's (1997) research on the processing of anaphors by monolingual children during reading tasks showed that in non-productive contexts skilled comprehenders were often able to process gender and number markings when resolving anaphors, as was apparent in cases where their incorrect answers matched the correct antecedent in terms of these two features. The authors put forth the idea that children classified as less skilled comprehenders may have had a specific deficit in processing anaphors. These children made errors linked to specific features of the French language (such as number markings) as well as errors that could occur regardless of the language (devoting greater attention to the main characters of the story and referring to a wide range of referents).

Data from L2 learners also indicates a lack of mastery of object clitic pronouns as is evidenced in non target-like usages, for reasons of difficulty with number agreement.

Bautier-Castaing (1977) anecdotally reported problems with number agreement. Véronique (1984) provided illustrative examples of errors with number markings in the written production of Arabic speakers learning French in both formal and informal settings. Based on her research on productive pronoun usage of French Immersion students in the Canadian context, Harley (1986) concluded that age plays a role in number agreement (and other syntactic operations necessitated by clitic usage), with older students having a clear advantage over younger ones.

From the limited research on the topic, it would be appear that the number distinction is not particularly problematic in the acquisition of French object clitics. One particularly interesting finding, however, was reported in Weissenborn et al. (1990) where monolingual children hesitated in identifying *lui* and *à lui* forms as singular or plural. Why is it that number would be problematic in one gender neutralized form (*lui*), but not in another (*les*)? I would suggest that indirect *lui* is difficult for learners because it functions as both an object clitic and as a strong pronoun. Furthermore, its indirect argument structure necessitates a more complex syntactic computation than the use of a direct object clitic such as *les*, for example. In this scenario, there is clearly an interplay between morphosemantic distinctions (gender, number and person) and argument structure in the acquisition of French pronominalization.

Animacy

Using an extremely broad definition of animacy, object cans be divided into two categories: those that are capable of self-determination (humans, dogs) and those which are not (chairs, pencils). Animacy has not been documented as playing a role in the

acquisition of French pronominalization by monolingual and bilingual child L1 learners. However, whether or not referents are living or non-living appears to contribute to difficulties experienced by certain L2 learner populations.

To the best of my knowledge, the most in-depth study on the role of animacy in the acquisition of pronominalization carried out to date is Andersen's 1986 pilot study of high-school aged Danish learners of L2 French. Andersen examined their pronoun usage in elicitation, free written production and Danish-French translation tasks. Andersen questioned whether or not the semantic trait of +human or –human plays any role in L2 learners' clitic pronoun choice. The results of the analysis permitted students to be divided into four distinct groups based on characteristics of their IL systems and it was concluded that learners were operating on a semantic trait distinction of +/-human.

Andersen claimed that impressionistic classroom observations lent support to her analyses of the learners' written production: when the referent did not refer to a person, pronominalization was avoided. Instead, anaphoric nouns were employed, making their oral production both 'heavy' and textually incoherent. It was noted that this avoidance strategy was not apparent when the learners are referring to humans. Based on this data, Andersen proposed an implicational scale for pronoun acquisition by Danish learners of French: subject pronouns preceded non-subject pronouns; the +/-human distinction preceded the masculine/feminine distinction; and finally, +human was acquired before -human and the deictic use precedes the anaphoric use. Granfeldt and Schlyter's (2004) data from adult Swedish L2 learners of French was also reminiscent of Andersen's findings in terms of a distribution of forms according to humanness.

In another study, although one which only briefly touched on the notion of animacy, Trévisse, Perdue and Deulofeu (1991) presented a summary of the acquisition of French word order by Hispanic and Arabic learners, as evidence in oral production data. Direct object pronouns were late-acquired features, becoming productive only after animate subject and indirect object pronouns. Inanimate subject and direct object pronouns appeared last in the acquisition sequence. This finding is in line with Andersen's (1986) research, supporting the notion that animate object clitics become productive before their inanimate counterparts.

The role of animacy in the acquisition of cliticization is an interesting one which can perhaps be enlightened by a researcher working in variationist sociolinguistics. In her doctoral dissertation, Thibault (1983) proposed a noun continuum (*un continuum de substantivité*) whereby clitics would be most frequently used to replace referents towards the left-side of the continuum:

animate entity > inanimate, concrete entity > inanimate, abstract entity > verb

Suner (1988) asserted that personal clitic proforms are [+animate], which would support the L2 data showing that learners use object clitics most often in conjunction with animate NPs.

Argument Structure: Direct Object Clitics Before Indirect Object Clitics

In the earlier overview of the French pronominal system, it was pointed out that 1) French has two competing pronominal systems: a strong one and a weak one; and 2) although French is not a highly inflectional language, that case is marked in clitic pronouns. The fact that French object clitics are marked for case opens the door to the

possibility of learners making case choice errors. Object clitic case errors will be defined

as using a different case form where a direct object (*me, te, le, la, nous, vous, les*) or

indirect object (*me, te, lui, nous vous, leur*) is required on the basis of the surface

syntactic structure of the utterance. In order to select object clitics judiciously, the learner

needs to be familiar with the argument structure of the verb in question. In other words,

the learner needs to know whether the verb in question takes a direct and/or indirect

object. In the case of indirect arguments in French, the problem of clitic choice is further

compounded by the need to know whether the correct argument associated with the verb

is *à* or *de*.

Chillier et al.'s (2001) normally-developing monolingual learners produced <5%

case errors in their oral production data. According to the researchers, the ND children

were making minimal across category substitutions of complement clitics, supporting the

conclusion that "the referential properties and the different locality constraints on

reflexives and direct complement clitics were well distinguished" (p. 14). The younger

group of SLI children experienced difficulty with argument assignment in their oral

production, using reflexive *se* in the place of the object clitics *le, la,* and *les.* Jakubowicz,

Nash, Rigaut and Gérard (1998) elicited clitic pronouns from monolingual SLI children

from 5;7-13 years of age and from ND children ranging from 5;6-5;11 years of age. The

results revealed that the SLI group was considerably less accurate than the ND children in

terms of their ability to use clitic pronouns and that they produced significantly fewer

clitic pronouns. The SLI children used significantly less direct object pronouns than

reflexive ones, and significantly less direct object clitics than subject clitics. As such,

their production differed greatly from that of the ND children. The authors concluded that

the production data showed two dissociations: one between subject and direct object

clitics and another between reflexive and direct object pronouns. They explained the

differences in performance on reflexives and direct object pronouns in the following

manner:

> *SE* has no phi-features (gender, number) and case, whereas *LE* PRO is
>
> specified for them; therefore, *SE* can function as a more underspecified
>
> pronominal item. This factor concerning the morphological
>
> underspecification of *SE* may explain why it is occasionally used instead of
>
> LE in answering the question, *What is X doing to Y?* (p. 151).

Despite the dissociations in the production data, on a comprehension task the SLI

children were able to understand sentences with pronominalized objects because they

recognized transitive verbs and knew their selectional properties. Jakubowicz (1991)

gathered data from 104 monolingual children, dividing them into 4 age groups: 3-3;5,

3;6-4, 5-6, and 6;1-7;5. On the elicited production task, ungrammatical sentences

contained two main error types relating to case choice and argument structure: (i)

expression errors where the child used *se* instead of *le* or *la* (34.4%, 21.3%, 4.9%, 0%,

from youngest to oldest age group respectively); and (ii) case errors where the child used

lui instead of *se*, *le*, or *la* and vice versa (25.0%, 31.9%, 36.6%, 0%, from youngest to

oldest age group respectively).

To the best of my knowledge, there is only one bilingual study that specifically

addresses the role of case choice and argument structure in the acquisition of the French

pronominal system. Meisel (1986) conducted two case studies of children (aged 1;0 to

4;0) acquiring French and German simultaneously. He noted the emergence of direct and

indirect object clitics at a single point in time in the acquisition process, noting however that the latter were much less frequent than the former[10]. Moreover, indirect forms were sometimes used in direct contexts, whereas the inverse was not true. Meisel addressed the question of why direct objects and subjects were used more frequently than indirect objects by saying that the children began by verbalizing prototypical events and actions (i.e., transitive actions) where an inanimate agent willfully brought about a physical change of state or location in a patient through some sort of direct body contact. It was noted that the agent is equivalent to the subject, while the goal is equivalent to the direct object. According to Meisel, this is the very reason why the subject-direct object opposition was so visibly present in child oral data, while indirect objects were rare.

Naiman (1974) used elicited imitation, picture identification and spontaneous production measures to tap into the IL representations of direct and indirect object pronouns of young FI students. The results from both the imitation and comprehension tasks showed the student were better able to process direct object clitics than indirect object clitics. In Andersen (1986) Danish learners used indirect object clitics in contexts that necessitated the use of direct clitics. Harley (1986) examined the oral production of early and late FI students, asserting that the late FI students were aware of the argument structure of the verbs that they were using, but contended that because of a less developed TL vocabulary, they had access to fewer lexical items to serve as direct objects. She noted the presence of hesitation phenomenon in the interviews, indicating that students were aware that the argument structure of the verb in question necessitated the use of a direct object, but that they were nevertheless unable to supply an appropriate noun. Kenemer's (1982) documentation of the written production of university FSL learners

addressed the issue of general confusion regarding the categorization of transitive and intransitive verbs. Some verbs were used interchangeably as transitive or intransitive from one sentence to the next, resulting in confusion with direct- and indirect-object pronouns (38):

a) *Elle l'apprend à mal faire.

b) *Elle lui a empêché de sortir.

Kenemer noted that the students' frequent inability to distinguish transitive verbs from intransitive ones was likely due to L1 interference (the equivalent verb in the L1 had a different argument structure than in the L2). Making a similar argument to Meisel (1986), Kenemer pointed out that mistakes in pronoun choice could also be attributed, in part, to the fact that third person direct- and indirect-object pronouns in French have distinct forms (in contrast to the identical first- and second-person object pronouns).

Research indicates that there is a fairly clear contrast between the behavior of the monolingual learners and the bilingual/L2 learners. Among the ND monolingual population argument structure are not problematic, while SLI monolingual children experience some problems with argument assignment. However, the substitution of se for le or la is very different from the errors made by the bilingual/L2 learners for whom direct object clitics seem to be more salient or 'easier' to use than indirect object clitics.

Word Order: Postverbal Before Preverbal

The acquisition of French pronoun placement is perhaps the area in which L2 learners behave most differently from monolingual and bilingual learners. Researchers working with monolingual, and even bilingual learners, appear to have reached a general

consensus that object clitic placement is not problematic in the acquisition process (Chillier et al., 2001; Jakubowicz et al., 1998; Jakubowicz & Rigaut, 2000). Both strong and weak object pronouns are correctly placed (post-verbally and pre-verbally, respectively). Research that contradicts this general consensus is minimal. One such study, by Haverkort & Weissenborn (1991), reported on clitic placement errors in positive imperatives, where clitics that should be used postverbally were mistakenly used preverbally. However, this word order problem only manifested itself in a highly specific context. Word order problems have also been documented in double-clitic constructions, particularly those including third-person clitic forms, where the learners sometimes reversed clitic order (Nuckle, 1981).

There are two case studies conducted with bilingual child learners that do show word order acquisition as being similar to that of L2 learners. Meisel (1986) followed the linguistic development of one boy and one girl (aged 1;0 to 4;0) acquiring two first languages simultaneously (French and German). His word order analysis results showed that from the start bilinguals, unlike monolinguals, strongly preferred SVO order. Throughout the three year period, Meisel noted an overwhelming preference for SVO patterns. In French, SVO utterances accounted for 80% or more of the utterances that comprised the recordings, in most recordings even 100% of utterances. Two constructions diverged from the rule: right subject dislocation and adverbials in sentence-initial position. Hulk's (2000) case study of the spontaneous oral discourse of a French-Dutch bilingual girl, from the ages of 2;03,13 to 3;10,07, also evidenced confusion about object clitic placement. Anouk used her first preverbal clitic in conjunction with a finite verb at the age of 3;03,17. A week later Hulk documented the first placement error of an

object clitic with a finite verb, an occurrence that continued until the end of the study. However, object clitics were only incorrectly placed in 10% of utterances. Anouk's mother anecdotally reported that she was still making placement errors even after the study (as was noted at the age of 4;06).

While many monolingual and bilingual learners of French easily pick up on the SOV word order that is necessitated by the use of pronominal clitics, this is not necessarily the case for L2 learners, particularly those whose L1 only has strong, postposed object pronouns. One study of L2 learners that goes against the grain is White's (1996) examination of a corpus of 3 years worth of spontaneous longitudinal production data from 2 children learning French in Montreal. White hypothesized that child L2 learners of French would correctly analyze weak pronouns as clitics and indeed show evidence of the associated projections in their grammars. According to White, both boys were categorically able to correctly place direct object clitics in front of the finite verb.

Conversely, a large body of research attests to the difficulties experienced by L2 learners as they master SOV word order in French. Selinker, Swain and Dumas (1975) discussed examples taken from the oral production of FI students where syntactic properties had been transferred from English to French, with the learners using pronouns in the postverbal position where one normally finds strong pronouns, rather than the preverbal position necessitated by weak pronouns:

a) *Le chien a mangé les.*

b) *Il veut les encore.*

Adult L2 learner data attests to similar patterns. Working on the premise that that many L2 French pronominal structures are transfer-based, Kenemer (1982) carried out an anecdotal study of one hundred compositions written by intermediate-level learners of French in an American university. Her analysis revealed that their written production closely resembled *le français populaire* in its simplified grammar and morphology, noting a preference for SVO word order, which resulted in the following types of sentences (p. 31):

c) *J'ai pensé à ça.*

d) *On donne rien à moi.*

e) **J'avais vous envoyé.*

f) *J'avais envoyé à vous.*

Other documented word order difficulties pertained more specifically to double-argument constructions, where there was a tendency to place the indirect object before the direct object (p. 31):

g) **donne-moi le*

h) **pour lui la prendre*

Although students who produced double-argument constructions often experienced difficulty with word order, sentences of this type with both direct- and indirect-object pronouns were rare in the written corpus. Furthermore, object pronouns in postverbal position abounded. The following examples of misplaced pronouns were categorized as being indicative of simplification processes and interference (pp. 31-32):

i) **il a payé me très bon*

j) **ils ont invité moi*

k) *je ne veux pas donner la satisfaction à eux

l) *je ne veux pas ça arriver à lui

She also offered examples of simplification, where object clitics binded to the past

participle (p. 32):

m) *mes amis a m'aidé

n)*Kouane a lui dit

What is interesting is that the anecdotal examples documented in Kenemer's (1982)

research, as well as in the case in that of Selinker, Swain and Dumas (1975), is that these

same patterns appear in quantitative research.

Various studies on the acquisition of a target-like SOV word order in conjunction

with object clitic forms by L2 learners have led to clearly articulated proposals of a multi-

phase process. Gundel and Tarone (1981) were the first to propose a stepwise process,

through which English speakers learning French pass, for acquiring word order in object

pronoun constructions. The following three stages were evidenced in their data from

French immersion students (p. 98):

I: S-V-pro   il ne pas prend le

II: S-V-O   je n'ai pas voir

III: S-pro-V   mais je l'aime

More recent empirical research suggests that English-speaking adult learners of

French do, in fact, move through a series of four stages as they acquire object clitics: 1)

Postverbal position; 2) Omission of the object; 3) Intermediate position; and 4) Pre-finite

position, target-like (Towell & Hawkins, 1994; Herschensohn, 2004). The same sequence

of acquisition was also documented amongst Swedish-speaking learners (Schlyter 1997;

Granfeldt & Schlyter, 2004). With regards to the minimum amount of time required to

move from stage 1 to stage 4, Granfeldt & Schlyter (2004) suggested that "there is clear

evidence of cliticization only after at least one year of frequent French input" (p. 360).

Towell and Hawkins (1994) provided the following series of sentences to illustrate the

acquisition sequence, with each sentence differing only in terms of pronoun placement or

the absence of pronominalization (p. 133):

Stage 1 J'ai reconnu *le*

Stage 2 J'ai reconnu *Ø*

Stage 3 J'ai *le* reconnu

Stage 4 Je *l'*ai reconnu

Towell & Hawkins (1994) addressed the question of why, after initially using object

pronouns postverbally in Stage 1, learners moved to a stage exemplified by total absence

of pronominalization. Subsequently, they hypothesized that clitic pronouns attach to the

first element of the verbal complex (such as the participle *reconnu* shown in the Stage 3

example), before adopting the appropriate TL rule whereby clitic pronouns attach to the

tense-marked element in the verbal complex (in this case, the auxiliary verb *avoir*).

If L2 learners have difficulty with object clitic placement regardless of their L1, are

there other learner internal factors that influence word order acquisition? One large-scale

study experimental study, conducted with early and late FI students, indicated that age

was a factor in the acquisition of pronominalization (Harley, 1986). In fact, the area in

which the oral production of the early and late immersion students most clearly differed

was in their ability to use clitic pronouns in SOV word order. Late immersion students

were significantly more accurate in clitic pronoun usage than were the early immersion

students, both in terms of total and percentage scores. It is important to note, however, that both immersion groups differed significantly from the elementary and secondary NS students from Quebec. Although neither the early nor the late immersion students showed native-like control of object pronouns, Harley concluded that the younger French L2 learners were clearly less advanced than the older ones.

So the question arises as to exactly how preponderant object clitic placement errors are among L2 learner populations? Adiv (1984) documented a 13% object clitic misplacement rate for Canadian students enrolled in French immersion and French-Hebrew immersion programs. Naiman (1974) reported a meager 3.5% usage of direct object pronouns in production data, with 18% of the tokens being inappropriately placed in post-verbal position. It is noteworthy that 69% of the students who placed clitics postverbally on the imitation task also did so in their spontaneous oral production. From interview data with two adolescent learners of French, Herschensohn (2004) reported 15% of object clitics attaching to past participles (a clearly inappropriate verbal host).

While monolingual and bilingual learners appear to experience little difficulty with respect to the SOV and SVO word orders necessitated by the competing weak and strong pronominal systems in French, L2 learners do not fare as well. Research indicates two learner internal factors that may come into play in the acquisition of French word order: age and the presence of object clitics in the L1.

Strong Object Forms Preferred to Weak Counterparts

Given the inherent linguistic complexity of the weak (clitic) pronominal system in French, it is not surprising that learners often use forms other than object clitics in clitic

permissible contexts (often ones where a clitic would be most felicitous). In order to

identify the range of forms produced by learners of French, some experimental studies

have examined transcripts of spontaneous or elicited oral discourse, identifying each

context where object pronominalization would be permissible. Possible target-deviant

forms in these contexts include object omissions, lexical NPs and the strong object

pronouns (such as *ça, à ça* and the locative *là*).

Possible target-deviant forms are illustrated in the following series of examples.

Example 1a shows incorrect postverbal placement of a direct object clitic, the same

position where one would typically see a strong pronoun in SVO languages like English.

Example 1b illustrates a strong subject pronoun being used postverbally, as a direct

object pronominal. Example 1c shows the deictic pronominal *ça* ('it') being used in a

context where one might expect a direct object clitic.

1a) **Julie touche le*. 'Julie touches him/it'.

1b) **Julie touche il*. 'Julie touches him/it'.

1c) *Julie touche ça*. 'Julie touches him/it'.

Another typical target-deviant structure found in object clitic contexts is object

omission. This phenomenon is also often referred to in the literature as null objects, zero-

objects, or object drop. In this case, learners omit the direct and/or indirect object in

conjunction with transitive verbs, as can be seen in Example 2[11].

2) *Je Ø vais*. 'I go.'

Learners also have a tendency to produce nonclitic forms, such as lexical NPs, in

object pronominalization contexts, resulting in what has been referred to by Paradis

(2004) as 'redundant lexical objects', as can be seen in Example 3.

3) Q: *Que fait Nounours à <u>Kiki</u>?* 'What is Teddy-bear doing to Kiki?'

A: *i brosse <u>Kiki</u>.* 'He is brushing Kiki.' (Jakubowicz et al., 1998)

All of the target-deviant structures types given in the previous examples have been amply documented in the data. The use of strong pronouns and *ça*, as is shown in Example 1a and 1c has been documented among monolingual children (Clark, 1985; Hamann, Rizzi & Frauenfelder, 1996; Hamann et al., 2003; Jakubowicz et al, 1998; Jakubowicz & Rigaut, 2000). Similar usage has been recorded in the oral production of bilingual children (Hulk, 2000; Meisel, 1986; Müller, Hulk & Jakubowicz, 1999; Paradis, 2004) and in L2 learners (Adiv, 1984; Granfeldt & Schlyer, 2004; Herschensohn, 2004; Kenemer, 1982; Schlyter, 1997; Selinker et al, 1975; White, 1996).

Null objects, as is shown in Example 2, are abundant in the monolingual French data (Bautier-Castaing, 1977; Chillier et al, 2001; Jakubowicz et al., 1996; Jakubowicz et al., 1998; Paradis, 2004), as well as in bilingual data (Hulk, 1997; Hulk, 2000; Jakubowicz & Rigaut, 2000; Müller et al., 1999; Paradis, Crago & Genesee, 2003; Paradis, 2004). Null objects have also been observed in numerous L2 studies (Adiv, 1984; Bautier-Castaing, 1977; Grondin & White, 1996; Gundel, Stenson & Tarone, 1984; Gundel & Tarone, 1981; Gundel & Tarone, 1992; Towell & Hawkins, 1994).

Lexical objects, as is shown in Example 3, are widely used in clitic permissible contexts by monolingual children (Chillier et al, 2001; Connors & Nuckle, 1986; Hamann, 2004; Hamann et al., 2002; Hamann et al., 2003; Jakobowicz, 1991; Jakubowicz & Rigaut, 2000; Jakubowicz et al., 1996; Jakubowicz et al, 1998; Jakubowicz, Tuller, & Rigaut, 2000; Paradis, 2004). Lexical objects are documented to a somewhat lesser extent in the oral production of bilingual children (Hulk, 2000; Kaiser,

1994; Paradis, 2004) and L2 learners (Gundel, Stenson & Tarone, 1984; Naiman, 1974; Schlyter, 1997).

Although it would be very informative to provide a detailed account of usage rates of target-deviant forms in clitic permissible contexts in various acquisition contexts, this is almost impossible to do because of flawed research methodology. As Paradis (2004) so aptly pointed out:

> although the relative frequency of different nontarget object types is
>
> reported by some, none of this research systematically examines
>
> frequency as a function of pronominalization contexts. Without such
>
> contextual information, it is not possible to determine the full range of
>
> clitics and nontarget objects used instead of clitics (p. 70).

She continued to illustrate her point using an example from L2 research where object omissions in conjunction with transitive verbs was discussed. The problem was that these instances were coded as object omissions, without undertaking a "systematic and thorough examination of contexts where pronominalization would be expected" (pp. 70-1). This obviously skewed the data and comparing studies where the variable was not adequately defined would be an exercise in futility.

That said, to give the reader some sense of the distribution of the targetlike and nontargetlike variants in pronominalization contexts, a small number of studies will be referred to in detail for illustrative purposes.

In an elicited production measure, which controlled for pronominalization contexts, Chillier et al. (2001) examined the production of pronominal clitics by monolingual, 4-to-6-year-old ND children. The production results for the children showed significant effects

for clitic type. Six-year-olds were 82.1% accurate on their clitic usage while the 4-year-olds averaged 55.3% accuracy. Pronoun deletions decreased with age, averaging 21% in the youngest group compared to 2.5% in the oldest group. As for cases where the direct object was lexicalized, these occurrences only represented 8.8% of total productions in clitic permissible contexts. A decrease in incorrect lexicalizations was documented as a function of age.

In a case study of a bilingual learner, Hulk (2000) noted that at the age of 2;07,5, the subject, Anouk, used very few transitive verbs, 55% of which were not used with an object. From the age of 2;11,13 onwards there were very few ungrammatical utterances with a strong pronoun other than *ça*. These rare examples only appeared in conjunction with the verb *écouter*, the last example of which occurred at the age of 3;03,28. It is noteworthy that until the age of 3;03,7 Anouk only produced 7 utterances with an object clitic, all in conjunction with an infinitive. At the age of 3;03,17 she used her first sentence with a preverbal object clitic and a finite verb. At this point in time, 11.4% of objects of transitive verbs were clitics.

In an experimental study involving various learner populations, Paradis (2004) investigated the use of direct object clitics by English-L1/French-L2 learners and monolingual French-speaking children with SLI. Oral production was scored in terms of percentage of object clitics used in possible object pronominalization contexts. The L2 and SLI children made significantly lower use of object clitics than did the two groups of normally-developing monolingual children (41.48%, 47.2%, 97.63% and 85.56% respectively). Moreover, the rate of suppliance for the L2 and SLI was not significantly different, nor did the rate of suppliance of two ND monolingual groups differ

significantly. Paradis documented the usage of a number of nontargetlike forms in object pronominalization contexts: null objects, strong pronominals/*ça*, and lexical objects. Null objects were the most common nonclitic object type in all of the subject groups. Paradis noted that although all three learner populations most frequently resorted to object deletion when they did not use clitic pronouns in relevant contexts, that they showed variation in terms of the second most common nonclitic type. Lexical objects ranked second for the ND children while strong pronouns/*ça* filled this position for the L2 learners. In contrast, the SLI children made minimal use of either lexical objects or strong pronouns/*ça*, primarily using null objects in the absence of the required clitic forms.

Adiv's (1984) study on English L1-French L2 children involved object pronoun elicitation, thus avoiding the flawed methodology referred to in Paradis (2004). The learners made greater use of null objects than of strong pronouns and the deictic pronominal *ça*. Object clitics had a 6%-65% suppliance rate, depending on the grade level of the student.

It is somewhat difficult to draw definitive conclusions in terms of the actual usage rates of various forms that have been documented in object pronominalization contexts. What is clear, however, is that object clitics are not necessarily favored in these linguistic environments. It appears that certain factors, such as age or years of exposure to French, play a role in determining the ratio between object clitics, strong pronouns/*ça*, lexicalized objects and null objects in a learner's oral (and sometimes written) production. One thing is for certain, the results of from this large body of research underline the difficulty of acquiring the French pronominal system, regardless of the learner context.

Explanation of the Stages of Development in the Acquisition of French Clitics

Markedness

The notion of markedness makes reference to the fact that some linguistic elements of any given language may be more 'basic', 'natural' or 'frequent' than others; the former are said to be unmarked, while the latter are said to be marked (Richards, Platt & Platt, 1992). The concept of markedness is of particular interest to L2 acquisition researchers because it can be used to account for interlanguage (IL) forms produced by the learners they study. In the current paper, markedness will be used to account for the stages of development documented in the acquisition of French clitics, with special reference being made to the L2 learner populations.

While L2 researchers are not in total agreement as to the role that markedness plays in determining which L1 features will transfer to the TL, they address two general questions in their research: (1) whether or not learners transfer unmarked forms from their L1 when the L2 counterpart is also unmarked; and (2) whether or not learners choose not to transfer marked L1 forms when the TL counterpart is unmarked. According to Hyltenstam (1984):

> Unmarked categories from the native language are substituted for
>
> corresponding marked categories in the target language...Marked
>
> structures are seldom transferred, and if they are transferred, they are much
>
> more easily eradicated from the target language (p. 43).

Of particular interest is Eckman's (1977) Markedness Differential Hypothesis (MDH), which uses the notion of markedness to account for the transfer of certain L1 forms and the lack of transfer in the case of others. In general, L1 features that are less

marked than those in the TL (L2) should be susceptible to transfer, whereas those that are

more marked should not. According to Eckman:

> The areas of difficulty that a language learner will have can be predicted
>
> such that (a) Those areas of the target language that differ from the native
>
> language and are more marked than the native language will be difficult;
>
> (b) The relative degree of difficulty of the areas of difference of the target
>
> language which are more marked than the native language will correspond
>
> to the relative degree of markedness; (c) Those areas of the target language
>
> which are different from the native language, but are not more marked than
>
> the native language will not be difficult (1977, p. 312).

It is precisely because of the incorporation of the markedness construct that the

MDH differs from its predecessor, the Contrastive Analysis Hypothesis (CAH). While

the CAH explains difficulties experienced by L2 learners in terms of L1-L2 differences,

the MDH advances that when there are L1-L2 differences, marked structures will be

more difficult than unmarked ones. Hence, from the MDH it is clear that the degree of

difficulty of any form is predicted to be in direct relation to its relative degree of

markedness.

Another important definition of markedness is found in language typology.

Typological universals have been used to characterize language features as either marked

or unmarked. Features that are universal or part of most languages are unmarked, while

those that are specific to a particular language or a small sub-set of languages are marked.

Drawing on Zobl's (1984) work on typological universals, his definition of markedness

becomes particularly important in relation to the acquisition of pronominalization. As an

illustrative example, English is a SVO language, whereas French allows for both SVO and SOV (depending on whether clitic or strong pronouns are being used in argument realization). As such, French word order is marked in comparison to English word order. Therefore, it seems reasonable that English learners of French would pass through a phase in the acquisition of the TL with post-posed pronouns, a word order that is characteristic of their L1. There is, in fact, a four-stage process through which L2 learners of varying L1 backgrounds progress in the acquisition of object clitic placement in French, one which includes postverbal placement before target-like preverbal placement (Granfeldt & Schlyter, 2004; Herschensohn, 2004; Towell & Hawkins, 1994; Schlyter, 1997). For L2 learner populations, it appears that the notion of markedness helps to explain a documented preference for SVO word order over SOV up to a certain point in their linguistic development.

In addition to helping to account for word order preferences in the acquisition of pronominalization, markedness is also a viable explanation for the subject: object asymmetries documented in all of the learner populations examined in the current paper. If we compare the two categories for markedness based on a frequency criteria, it is clear that subjects are both more frequent in adult caretaker discourse (Hamann, 2004) and supposedly in any type of input given that every sentence requires a subject by its very definition. Thus, the delayed appearance of object clitics in relation to subject clitics in the production of monolingual, bilingual and SLI learners and the subject: object asymmetries documented in the production of L2 learners can also be explained by the extent to which the two categories are marked.

In a similar way, markedness can enhance our understanding of the direct object: indirect object asymmetry that has only been minimally discussed in the pronominalization acquisition literature. The L2 literature indicated that 1) direct object clitics were produced more frequently and interpreted more accurately than indirect object clitics; and 2) that when errors were made that direct object clitics tended to be substituted for indirect object clitics but that, conversely, indirect object clitics were not necessarily substituted for direct object clitics. On the basis of how 'basic' the two categories of object clitics are in relation to one another, one need only compare argument structure. With indirect object clitics, it is necessary to know which argument is associated with the verb (most often *à* or *de*), resulting in the indirect argument being clearly more marked than the direct one. Using markedness as an explanation, the L2 findings are hardly surprising.

Markedness can also be used to explain stages of development in the acquisition of clitics in terms of their features that require learners to make morphosemantic distinctions, namely gender and number. In French, all that is masculine could be considered more 'basic', more 'natural', and more 'frequent' than that which is feminine. That feminine direct and indirect objects are more marked than their masculine counterparts could easily explain research findings of high rates of gender errors that were asymmetrically distributed with a clear preference for masculine forms over feminine ones. Number has not been widely discussed in the literature, but does appear to pose some problems for L2 learners. The extent to which object clitic forms are marked could be determined as a function of the amount of information they carry. In the case of direct object third person singular clitics, they convey more information than their plural

counterparts as they are marked for both gender and number (i.e., *le* = masculine, singular; *la* = feminine, singular; *les* = plural). The L2 acquisition data reported non target-like usages, for reasons of difficulty with number agreement without providing specific examples. But it could be postulated that, based on a markedness explanation, plural direct object clitics would be less problematic in acquisition than singular direct object clitics.

In summary, the notion of markedness and of typological universals has been offered as a possible explanation for clitic acquisition patterns in French. According to the MDH, the degree of difficulty of any form should be in direct relation to its relative degree of markedness. Markedness, as a function of form frequency in the language, was proposed as underlying the subject: object clitic asymmetry or the delay of object clitics that is widely documented in the literature. Indirect object clitic forms (which require the use of an associated argument, primarily *à* or *de*) are clearly more marked than direct object clitic forms. As such, relative degree of markedness was offered as a possible explanation of the more frequent use and more accurate interpretation of direct object clitics (than their indirect counterparts), as well as a tendency to replace more marked forms (indirect object clitics) with less marked ones (indirect object clitics). It was also postulated that markedness underlies the acquisition of the morphosemantic distinction of gender, for example, as it relates to object clitic usage. Research findings of high rates of gender errors that were asymmetrically distributed with a clear preference for masculine forms over feminine ones was explained because feminine object clitics are more marked than their masculine counterparts.

Discussion and Conclusion

There is currently a rapidly growing body of research on the acquisition of pronominalization, which is transforming itself into an animated, ongoing dialogue. A number of common characteristics of the acquisition of object clitics, independent of learner type have been identified as a product of this dialogue: 1) a delay in the appearance of object clitics, possibility as a function of the complexity of their syntactic calculation; 2) a tendency to overgeneralize subject clitics to object clitic contexts; 3) expression errors relating to person, number and gender; 4) a preference for object clitics in conjunction with animate NP referents; 5) a direct-indirect object clitic asymmetry in favor of the former; 6) a lack of knowledge of verb argument structure; and 7) a usage of nontargetlike forms such as null pronouns, strong pronouns/*ça* and lexical objects in pronominalization contexts. Research would appear to indicate that the preceding seven characteristics could almost be considered as universal, regardless of the acquisitional context. Only in one area does there appear to be acquisition difficulties that only pertain to certain learner populations: word order. Monolingual and bilingual learners of French make virtually no object placement errors in both SOV and SVO word order contexts. SOV word order, however, is particularly challenging for L2 learners of varying L1 backgrounds who often go through a phase of nontargetlike, post-posed object clitic usage.

As some of the extant research on the acquisition of pronominalization by learners of French exhibits serious design flaws, future research should take these shortcomings into account. This means bearing in mind the need to work towards the ideal of systematic examination of all possible pronominalization contexts in order to accurately

describe and quantify the range of targetlike and nontargetlike forms being used by learners. It would also be very useful for researchers to familiarize themselves with the body of published research on clitic acquisition, not only that which relates to the particular acquisitional context which they are studying. Particularly as pertains to the L2 research, there is a need to move beyond anecdotal data to experimental studies with more rigorous statistical analyses.

One area that has received little attention in the L2 object clitic acquisition research is that of oral comprehension, or more precisely how clitics in contextualized discourse are processed. One learner population which has been the object of a limited number of empirical studies is instructed adult L2 learners. Given the inherent difficulty of mastering the French pronominal system, future research might examine whether or not adult learners of French actually notice object clitics in the input using a variety of pedagogical tasks used to assess oral comprehension. This type of research might lead to a better understanding of the paucity of object clitic usage in spontaneous L2 oral production, while at the same time it would serving as a response to Ellis' (2001) lament that grammar tends to be tested using oral production measures despite the fact that there is no theoretical reason why this should be the case.

It is hoped that this review of current scholarship will provide some direction for teaching (by having identified the problematic aspects of acquiring pronominalization and the four stages through which L2 learners pass in learning appropriate placement in SOV word order) and facilitate future inquiry through the identification of gaps in the research and methodological weaknesses.

<u>Endnotes</u>

1. I was able to draw this parallel after having read Paradis and Prévost's introduction to their 2004 edited volume entitled *The Acquisition of French in Different Contexts: Focus on Functional Categories.*

2. The research dealing with the acquisition of pronominalization by L2 learners of French discussed in this literature review encompasses learners from very different learning backgrounds. This research furthered my understanding of the subject population of my own work who came from two very different instructional programs (French immersion versus core French).

3. Weissenborn refuted this claim in 1988, providing evidence of the object clitics *en*, *le*, *te*, *la*, and *les* in the oral discourse of three monolingual French children aged 2;0-2;4 (pp. 6-7).

4. Imperatives are not included in this object clitic usage.

5. The division between feminine *lui* and masculine *lui* in the pictures used for the picture-matching task is 50-50.

6. This research involves the processing of anaphors by 9-year-old monolingual children from France, who are classified as either skilled or less skilled comprehenders.

7. Paradis (2004) attributed form choice errors to problems of person, number and clitic. However, the counts for these three groups of errors were combined. Form choice errors accounted for 29.5% of errors for the monolingual SLI children, 3.1% of errors for the two age groups of normally-developing monolingual children and 22.2% errors for the L2 children.

8. Clark (1985) points out that number marking tends to be mastered before gender agreement marking.

9. Gender is not marked in the direct/indirect object clitics *me*, *te*, *nous* and *vous*. Nor is it marked in the indirect object clitics *lui* and *leur*.

10. Meisel (1986) also pointed out that indirect object clitics are less frequent than direct object clitics in adult speech.

11. I have chosen to illustrate object omission using a sentence where one would expect use of the locative clitic *y* ('there'), as in *J'y vais*. 'I go there.'

References

Adiv, E. (1984). Language learning strategies: The relationship between L1 operating

principles and language transfer in L2 development. In R. Andersen (Ed.), *Second*

languages: A cross-linguistic perspective (pp. 125-141). Rowley, MA: Newbury

House.

Andersen, H. (1986). L'acquisition et l'emploi des pronoms français par des apprenants

danois. In D. Véronique and A. Giacomi (Eds.), *Acquisition d'une language*

étrangère: Perspectives et recherches - Actes du 5e colloque international (pp. 25-

45). Aix-en-Provence: Université de Provence.

Auger, J. (1995). Les clitiques pronominaux en français parlé informel: Une approche

morphologique. *Revue québécoise de linguistique 24* (1), 21-60.

Bautier-Castaing, E. (1977). Acquisition comparée de la syntaxe du français par des

enfants francophones et non-francophones. *Études de linguistique appliquée, 27,*

19-41.

Belletti, A., & Hamann, C. (2004). On the L2/bilingual acquisition of two young children

with different source languages. In P. Prévost and J. Paradis (Eds.), *The acquisition*

of French in different contexts: Focus on functional categories (pp. 147-174).

Philadelphia, PA: John Benjamins Publishing.

Chillier, L., Arabatzi, M., Baranzini, L., Cronel-Ohayon, S., Deonna, T., Dubé, S.,

Franck, J., Frauenfelder, U., Hamann, C., Rizzi, L., Starke, M., & Zesiger, P.

(2001). The acquisition of French pronouns in normal children and in children with

specific language impairment. In *Proceedings of Early Lexicon Acquisition* [CD-

ROM], Lyon, France.

Clark, E. (1985). The acquisition of Romance, with special reference to French. In D.

Slobin (Ed.), *The crosslinguistic study of language acquisition volume 1: The data*

(pp. 687-782). Hillsdale, NJ: Erlbaum.

Conners, K., & Nuckle, L. (1986). The morphosyntax of French personal pronouns and

the acquisition/learning dichotomy. In O. Jaeggli and C. Silva-Corvalan (Eds.),

Studies in Romance linguistics (pp. 225-242). Dordrecht: Foris.

Eckman, F. (1977). Markedness and the contrastive analysis hypothesis. *Language

Learning 27,* 315-330.

Ehrlich, M.F., & Remond, M. (1997). Skilled and less skilled comprehenders: French

children's processing of anaphoric devices in written texts. *British Journal of

Developmental Psychology, 15,* 291-309.

Ellis, R. (2001). Some thoughts on testing grammar: An SLA perspective. In C. Elder, A.

Brown, N. Iwashita, E. Grove, K. Hill, T. Lumley, T. McNamara & K. O'Laughlin

(Eds.), *Experimenting with uncertainty: Essays in honour of Alan Davies* (pp. 251-

263). Cambridge, England: Cambridge University Press.

Felix, S., & Hahn, A. (1985). Natural processes in classroom second language learning.

Applied Linguistics, 6, 223-238.

Gass, S. (1997). *Input, interaction, and the second language learner.* Mahwah, NJ:

Lawrence Erlbaum.

Gundel, J., Stenson, N., & Tarone, E. (1984). Acquiring pronouns in a second language.

Studies in Second Language Acquisition, 6, 215-225.

Gundel, J., & Tarone, E. (1992). Language transfer and the acquisition of pronominal

   anaphora. In S. Gass and L. Selinker (Eds.), *Language transfer in language*

   learning revised edition (pp. 87-100). Amsterdam: John Benjamins Publishing.

Granfeldt, J., & Schlyter, S. (2004). Cliticisation in the acquisition of French as L1 and

   L2. In J. Paradis & P. Prévost (Eds.), *The acquisition of French across learner*

   contexts: Focus on functional categories (pp. 333-370). Amsterdam: Benjamins.

Grondin, N., & White, L. (1996). Functional categories in Child L2 acquisition of French.

   Language Acquisition, 5, 1-34.

Hamann, C. (2003). Phenomena in French normal and impaired language acquisition and

   their implications for hypotheses on language development. *Probus 15* (1), 91-122.

Hamann, C. (2004). Comparing the development of the nominal and the verbal functional

   domain in French Language Impairment. In P. Prévost and J. Paradis (Eds.), *The*

   acquisition of French in different contexts: Focus on functional categories (pp. 109-

   144). Philadelphia, PA: John Benjamins Publishing.

Hamann, C., Arabatzi, M., Baranzini, L., Conel-Ohayon, S., Chillier, L., Dubé, S.,

   Franck, J., Frauenfelder, U., Rizzi, L., Starke, S., & Zesiger, P. (2002). On the

   dissociation of the nominal and verbal functional domains in French language

   impairment. In B. Skarabela et al. (Eds.), *Proceedings of the 26th Annual Boston*

   University Conference on Language Development (pp. 267-277). Sommerville,

   MA: Cascadilla Press.

Hamann, C., Ohayon, S., Dubé, S., Frauenfelder, U., Rizzi, L., Starke, M. & Zesiger, P.

   (2003). Aspects of grammatical development in young French children with SLI.

   Developmental Science, 6, 151-158.

Hamann, C., Rizzi, L., & Frauenfelder, U. (1996). On the acquisition of subject and object clitics in French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 309-334). Philadelphia, PA: John Benjamins Publishing.

Harley, B. (1986). *Age in second language acquisition.* Clevedon, England: Multilingual Matters Ltd.

Herschensohn, J. (2004). Functional categories and the acquisition of object clitics in L2 French. In P. Prévost and J. Paradis (Eds.), *The acquisition of French in different contexts: Focus on functional categories* (pp. 207-242). Philadelphia, PA: John Benjamins Publishing.

Hulk, A. (1997). The acquisition of French object pronouns by a Dutch/French bilingual child. In A. Sorace, C. Heycock & R. Shillcock (Eds.), *Proceedings of GALA 1997: Language Acquisition: Knowledge Representation and Processing* (pp. 521-527). Edinburgh : University of Edinburgh Press.

Hulk, A. (2000). L'acquisition des pronoms clitiques français par un enfant bilingue français-néerlandais. *Canadian Journal of Linguistics, 45,* 97-117.

Hyltenstam, K. (1984). The use of typological markedness conditions as predictors in second language acquisition: The case of pronominal copies in relative clauses. In R. Andersen (Ed.), *Second languages: A cross-linguistic perspective* (pp. 39-58). Rowley, MA: Newbury House.

Jakubowicz, C. (1991). L'acquisition des anaphores et des pronoms lexicaux en français. In J. Guéron and J.-Y. Pollock (Eds.), *Grammaire générative et syntaxe comparé* (pp. 229-253). Paris: Éditions du Centre National de la Recherche Scientifique.

Jakubowicz, C., Müller, N., Kang, O.-K., Riemer, B., & Rigaut, C. (1996). On the acquisition of the pronominal system in French and German. In A. Stringfellow et al. (Eds.), *Proceedings of the 20th Annual Boston University Conference on Language Development* (pp. 374-385). Sommerville, MA: Cascadilla Press.

Jakubowicz, C., & Nash, L. (2001). Functional categories and syntactic operations in (ab)normal language acquisition. *Brain and Language, 77,* 321-339.

Jakubowicz, C., Nash, L., Rigaut, C., & Gérard, C.-L. (1998). Determiners and clitic pronouns in French-speaking children with SLI. *Language Acquisition, 7,* 113-160.

Jakubowicz, C., & Rigaut, C. (2000). L'acquisition des clitiques nominatifs et des clitiques objets en français. *Canadian Journal of Linguistics, 45,* 119-157.

Jakubowicz, C., Tuller, L., & Rigaut, C. (2000). Phonologically weak items in abnormal acquisition of French. In S. C. Howell et al. (Eds.), *Proceedings of the 24th Annual Boston University Conference on Language Development* (pp. 450-461). Sommerville, MA: Cascadilla Press.

Kaiser, G. (1994). More about INFL-ection and agreement: The acquisition of clitic pronouns in French. In J. Meisel (Ed.), *Bilingual first language acquisition: French and German grammatical development* (pp. 131-159). Amsterdam: John Benjamins Publishing.

Kayne, R. (1975). *French syntax: The transformational cycle.* Cambridge, MA: The MIT Press.

Kenemer, V. (1982). *Le français populaire and French as a second language: A comparative study of language simplification.* Québec: CIRB.

Lima, L., & Bianco., M. (1999). Le problèmes des références dans la compréhension des textes à l'écoles primaire: Le cas de «il» et de «lui». *Revue Française de Pédagogie, 126*, 83-95.

Lima, L., & Bianco, M. (2002). Difficultés des compréhension de l'écrit à l'école primaire: l'exemple de l'interprétation du pronom «lui» au CE2. *Les Sciences de l'éducation, 2*, 49-69.

Meisel, J. (1986). Word order and case marking in early child language: Evidence from simultaneous acquisition of two first languages: French and German. *Linguistics, 24*, 123-183.

Müller, N., Hulk, A., & Jakubowicz, C. (1999) Object omissions in bilingual children: Evidence for crosslinguistic influence. In A. Greenhill, H. Littlefield, & C. Tano (Eds.), *Proceedings of the 23rd Annual Boston University Conference on Language Development* (pp. 482-494). Sommerville, MA: Cascadilla Press.

Nadasdi, T. (1995). Restriction linguistique et cliticisation des pronoms indirects inanimés en franco-ontarien. *Revue québécoise de linguistique théorique et appliquée, 12*, 165-180.

Naiman, N. (1974). The use of elicited imitation in second language acquisition research. *Working Papers in Bilingualism, 2*, 1-37. Toronto, Canada: OISE.

Paradis, J. (2004). The relevance of specific language impairment in understanding the role of transfer in second language acquisition. *Applied Psycholinguistics, 24*, 67-82.

Paradis, J., Crago, M., & Genesee, F. (2003) Object clitics as a clinical marker of SLI in French: Evidence from French-English bilingual children. In B. Beachley et al.

(Eds.), *Proceedings of the 27th Boston University Conference on Language Development* (pp. 638-649). Somerville, MA: Cascadilla Press.

Richards, J.C., Platt, J., & Platt, H. (1992). *Longman Dictionary of Language Teaching and Applied Linguistics*. Essex: Longman.

Schlyter, S. (1997). Formes verbales et pronoms objets chez les apprenants adultes de français en milieu naturel. In C. Martinot (Ed.), *Actes du colloque international sur l'acquisition de la syntaxe en langue maternelle et en langue étrangère* (pp. 273-293). Paris, France : Les Belles Lettres.

Selinker, L., Swain, M., & Dumas, G. (1975). The interlanguage hypothesis extended to children. *Language Learning, 25*, 139-152.

Suner, M. (1988). The role of agreement in clitic doubled constructions. *Natural Language and Linguistic Theory, 6*, 391-434.

Thibault, P. (1983). *Équivalence et grammaticalisation*. Unpublished Doctoral Dissertation, Université de Montréal.

Towell, R., & Hawkins, R. (1994). *Approaches to second language acquisition*. Clevedon, England: Multilingual Matters.

Trévisse, A., Perdue, C., & Deulofeu, J. (1991). Word order and discursive coherence in L2. In G. Appel and H. Dechert (Eds.), *A case for psycholinguistic cases* (pp. 163-176). Amsterdam: John Benjamins Publishing.

Véronique, D. (1984). The acquisition and use of aspects of French morphosyntax by native speakers of Arabic dialects (North Africa). In R. Andersen (Ed.), *Second languages: A cross-linguistic perspective* (pp. 191-213). Rowley, MA: Newbury House.

Weissenborn, J., Kail, M., & Friederici, A. (1990). Language-particular or language-independent factors in acquisition? Children's comprehension of object pronouns in Dutch, French and German. *First Language, 2*, 141-166.

White, L (1996). Clitics in L2 French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 335-368). Philadelphia, PA: John Benjamins Publishing.

Zobl, H. (1984). Aspects of reference and the pronominal syntax preference in the speech of young L2 child learners. In R. Andersen (Ed.), Second languages: A cross-linguistic perspective (pp. 219-242). Rowley, MA: Newbury House.

CHAPTER III.

L2 Learners' Oral Comprehension of Clitics in French

Researchers studying the acquisition of French agree that mastering the French

pronominal system for productive purposes is one of the more difficult tasks faced by

learners in a variety of acquisitional contexts. The literature on the acquisition of object

clitics, in particular, documents a number of challenges learners face on the path towards

target-like production of these forms. Object clitics pose problems for learners because

they 1) compete with strong pronoun forms and lexical objects; 2) appear in non-salient,

non-canonical position; 3) necessitate morphosemantic distinctions (person, gender,

number); 4) necessitate knowledge of verb argument structure; and 5) "require

coordination of morphosyntax with discourse pragmatics"[1] (Chillier et al., 2003; Erlam,

2003a; Paradis, 2004). One might wonder if these same features pose difficulties for

learners during the oral comprehension of object clitics? After all, it is widely believed

that L2 comprehension is always greater than L2 production (Lightbown, 2000). And

French immersion students are reported to be near-native or native-like in their global

oral comprehension abilities (Swain & Lapkin, 1982). As such, the question arises as to

how the comprehension of grammatical forms can best be measured, especially since in

the past researchers have tended to use production to assess grammatical competence

(Ellis, 2001). This question takes on even more importance given the following: if the

oral comprehension tasks and the individual items they contain are not carefully

constructed, it is likely that learners will be able to rely upon top-down processing to

achieve success without having to focus on form. For the current study, in addition to

finding a valid and reliable listening comprehension measure it was also important that it allow the researcher to discriminate between learners of varying proficiency levels with different amounts of total exposure to the L2. To this end, a L2-L1 translation task was used to determine the degree to which post-French Immersion and post-core French students enrolled in an intermediate-level course in a post-secondary setting were able to process and reproduce the meaning of clitics.

This paper begins with an overview of the French pronominal system and a summary of research findings on the acquisition of pronominalization by a variety of learner populations, and a discussion of the issues relating to the measurement of oral comprehension of grammatical forms. A quantitative analysis of the data reveals how individual features of object pronouns (such as grammatical function, gender, and animacy), learners' instructional background and learners' L2 proficiency level factor into the processing of object clitics during an oral comprehension measure. The paper ends with a discussion of the implications this research has for both teachers and learners and suggests directions for future research.

Overview of the French Pronominal System

The French pronominal system has often been identified as posing great difficulties for L2 learners and, as a result, tends to fossilize (Hawkins & Towell, 1992; Zobl, 1980). Each French pronoun has two corresponding forms: a strong one and a weak one, as can be seen in Table 1. In addition to these forms, there are also indirect *y/à ça*; locative *y/là* and the genitive *en/de ça*. Strong pronouns occur postverbally, typically occupying the same slots as full DPs (determiner phrases) (Kayne, 1975). Clitic pronouns, on the other

hand, are verbal affixes. That is to say, they are bound forms that are unable to stand apart from their verbal host. French object clitics can neither be separated from their verbal host, nor can they be modified, conjoined or stressed. They are, however, subject to liaison/elision and are in competition with their stressed counterparts, i.e., strong object pronouns (Kayne, 1975).

Table 3-1. Object Clitics and Strong Object Pronouns in French

Person	Clitic – direct object	Clitic – indirect object	Strong pronouns
I	*me*	*me*	*moi*
II	*te*	*te*	*toi*
III	*le/la*	*lui*	*lui/elle*
IV	*nous*	*nous*	*nous*
V	*vous*	*vous*	*vous*
VI	*les*	*leur*	*eux/elles*

Table 1 shows that case is only marked on object clitics, not on their strong counterparts. Moreover, there are a number of ambiguous forms that show morphological syncretism, that is to say carry out a number of linguistic functions. Forms such as *me*, *te*, *nous*, *vous* and *elle(s)* have multiple functions. *Elle(s)* functions as both a subject clitic and as a strong pronoun. *Me* and *te* are both direct and indirect object clitics. *Nous* and *vous* function as subject, object and indirect clitics, as well as strong pronouns[2].

In English, direct and indirect object pronouns *(to) me, (to) you, (to) him/her, (to) it, (to) us, (to) them* appear in postverbal position, just like their lexical counterparts. French direct and indirect object clitics are morphemes that bind to a verbal host. The canonical

word order in French is SVO, although object clitics are placed preverbally in both affirmative statements and in negative imperatives. In contrast, they are placed postverbally in affirmative imperative utterances. French also has a second pronominal system of *pronoms toniques/disjoints* which are commonly referred to as 'strong' or 'stressed' pronouns (*moi, toi, lui/elle, nous, vous, eux*). These strong pronouns behave like lexical NPs (noun phrases) and may be used as objects of prepositions, in coordinated structures, in dislocated/doubled structures and in isolation. For these reasons, the strong pronouns in French distribute similarly to English object pronouns.

The Acquisition of Clitics

Researchers have studied how learners of differing acquisitional backgrounds master the complementary strong and weak pronoun systems in French, namely first language (L1) learners, second language (L2) learners, bilingual first language learners and specifically-language impaired (SLI) learners. Emerging from this diverse body of research are a number of common characteristics in the acquisition of object clitics, independent of learner type: 1) a lag in the productive use of object clitics (Hamann, Rizzi & Frauenfelder, 1996; Herschensohn, 2004; Kaiser, 1994); 2) a tendency to overgeneralize subject clitics to object clitic contexts (Jakubowicz, 1991; Naiman, 1974; Selinker, Swain & Dumas, 1975); 3) the commission of expression errors involving person, number and gender (Bautier-Castaing, 1977; Chillier et al., 2001; Jakubowicz, 1991; Paradis, 2004); 4) preferential usage of object clitics to replace animate NP referents, as opposed to inanimate referents (Andersen, 1986; Granfeldt & Schlyter, 2004; Trévisse, Perdue & Deulofeu, 1991); 5) a greater usage of direct object clitics than

indirect object clitics (Harley, 1986; Jakubowicz, Nash, Rigaut & Gérard, 1998;

Kenemer, 1982; Meisel, 1986); 6) a lack of knowledge of verb argument structure and

minimal use of double object clitic constructions (Kenemer, 1982; Connors, Nuckle &

Greene, 1981); and 7) usage of nontargetlike forms such as null pronouns, strong

pronouns/*ça* and lexical objects in pronominalization contexts (Chillier et al, 2001; Hulk,

2000; Paradis, 2004; Schlyter, 1997). It would seem that the preceding seven

characteristics could almost be considered as universal, regardless of the acquisitional

context. Word order, on the other hand, is not problematic across acquisitional contexts.

Monolingual and bilingual learners of French rarely commit object placement errors in

both SOV and SVO word order contexts (Chillier et al, 2001; Jakubowicz, Nash, Rigaut

& Gérard, 1998; Jakubowicz & Rigaut, 2000). SOV word order, however, is particularly

problematic for L2 learners (regardless of L1 background) who often go through a phase

of nontargetlike, postposed object clitic usage (Granfeldt & Schlyter, 2004;

Herschensohn, 2004; Schlyter 1997; Towell & Hawkins, 1994).

One area that has been ignored in the L2 object clitic acquisition research is that of

oral comprehension, or more precisely how clitics in contextualized discourse are

processed. To the best of my knowledge, the only studies that directly tested oral

comprehension of object clitics by L2 learners were Naiman (1974) and Erlam (2003a,

2003b). Naiman's (1974) grade 1 and 2 French Immersion (FI) students were more

successful in identifying direct and indirect object nouns than their clitic counterparts on

a comprehension task, indicating a lighter processing load for NPs than weak pronouns.

Erlam's (2003a; 2003b) carried out a study involving input processing instruction

whereby L2 learners were helped to better process the direct object clitics *le, la* and *les*

through structured input activities that discouraged the use of the ineffective strategies learners typically use when making form-meaning connections. The picture matching task results indicated that while both the structured-input and output-based instruction groups outperformed the controls on the comprehension measure, structured-input instruction did not result in better comprehension of these direct object forms than meaning-oriented, output-based instruction.

L2 learners' oral comprehension of object pronouns has also been investigated more indirectly through two elicited imitation (EI) studies. Grade 1 and 2 FI students were better at repeating direct object NPs than indirect object NPs, with the same pattern holding for direct and indirect object forms (Naiman, 1974). Even when these students correctly imitated direct object clitics, they almost categorically placed them postverbally. On EI measures, adult L2 learners did not use lexical NPs, but did make frequent use of null objects, that is to say, they deleted the object clitic (Gundel, Stenson & Tarone 1984). Learners with study-abroad experience showed the highest rates of targetlike object clitic usage and the lowest deletion rates (29%), compared to a 45% deletion rate for those who had never lived in a French-speaking country. In light of the paucity of research that has examined object clitics and listening comprehension in L2, it is possible that instructed L2 learners of French are far from native-like in their oral comprehension of object clitics. However, more research on the aural comprehension of object clitics is clearly needed before any firm conclusions can be drawn.

Input and Input Processing in Second Language Acquisition

The role of input is one of the central issues in second language research. Input, in its broadest sense, consists of all of the oral and written language to which a learner is exposed. According to Gass (1997):

> The concept of input is perhaps the single most important concept of
>
> second language acquisition. It is trivial to point out that no individual
>
> can learn a second language without input of some sort. In fact, no model
>
> of second language acquisition does not avail itself of input in trying to
>
> explain how learners create second language grammars (p. 1).

Sharwood Smith (1986) addressed the *dual relevance* of linguistic input. He suggested that there are two ways of processing input: "*comprehension* (involving the decoding of particular messages which have been encoded in linguistic form) and *acquisition* (the creation of new mental structures which we call grammatical competence" (p. 239). He continued by saying that "the interpretation of input will, then, take two distinct forms: that which specifically involves extracting meaning from all relevant information perceived by the language user, and that which involves the mechanisms responsible for creating (or restructuring) grammatical competence" (p. 239). He asserted that a theory of language input necessitates two components: a linguistic component accounting for the use of grammatical relationships in real-time processing and an 'interface' component, accounting for the interaction between grammar and other competence systems.

Listening for Comprehension

In order to successfully complete listening tasks, such as the one in the current study, two types of processing need to occur simultaneously: top-down and bottom-up. (Buck, 2001; Field, 1999; Rost, 1990, 2002). When listeners access their pre-existing knowledge to understand the meaning of a message they are using top-down processing. This pre-existing knowledge typically consists of knowledge of the topic, of the listening context, of the text type or of the culture in which the text was created. In top-down processing, listeners rely upon content words and contextual clues to formulate and refine hypotheses. When listeners rely upon linguistic knowledge to understand the meaning of a message they are using bottom-up processing. The listener builds the meaning of the message by moving from individual words to grammatical relationships to lexical meanings. Listening is a highly interactive process that necessitates parallel use of top-down and bottom-up processing, in which the listener makes complementary use of prior knowledge and linguistic knowledge to construct meaning. It is believed that there is a highly complex interaction between top-down and bottom-up processing because language processing is by nature massively parallel. It is likely that top-down processing can make up for deficiencies in bottom-up processing, particularly with L2 learners, because top-down processing enables listeners to forego some aspects of bottom-up processing (Chaudron & Richards, 1986). However, bottom-up processing is extremely important with respect to grammar processing, as is the case in the current study. In order to process speech, it has to be 'mapped' onto a grammatical model of the language. As the communicative process is naturally a redundant one, comprehension occurs even in the face of incomplete mapping. Due to processing limitations, L2 learners will focus

primarily on meaning and form will be of secondary importance (VanPatten, 1996). Rost

(1990) asserts that incoming speech can be completely parsed, but only in the case of

slow speech. Under these conditions the listener would "assign all recognised units

(words) into grammatical constituents and compute a precise relationship between these

constituents" (p. 26). He notes, however, that when faced with normal speech, listeners

use grammatical cues to draw form-function mappings, relying upon "word order,

subject-verb agreement, pro-form agreement and case inflections" (Rost, 1990, p. 26).

According to Rost:

> Selective use of these syntactic and morphological cues, along with the
>
> use of semantic cues, such as animacy (i.e., the logical viability of a
>
> given subject acting upon a given verb) and pragmatic cues, such as
>
> topic-comment relationship and contrastive stress, allow the listener to
>
> draw upon grammatical knowledge of the language while listening (1990,
>
> p. 26).

Vandergrift (2003) proposed a tentative model of the less skilled L2 listener. Less

skilled listeners 1) have a tendency to translate (process from the bottom-up); 2) engage

in on-line translation, interfering with new input and impacting negatively on what is

actually retained; 3) tie up attentional resources that could be allocated to building and

refining conceptual frameworks to be used in interpreting input; 4) lack a strong

conceptual framework which disfavors the suppression of unimportant information and

leads to the forgetting of what was previously heard; and 5) fail to use monitoring and

planning strategies. According to Vandergrift, this results in "sparse and disjointed

summarization" (p. 486).

In a similar vein, Vandergrift (2003) proposed a tentative model of the more skilled listener. More skilled listeners 1) are dynamic, approaching tasks with flexibility and in a purposeful manner; 2) make complimentary uses of both top-down and bottom-up processing during listening comprehension tasks; 3) question their elaboration of conceptual frameworks and allocate attentional resources to framework development; 4) make inferences when they do not understand; and 5) monitor new input and use this information to select an appropriate conceptual framework. According to Vandergrift, this "results in richer, more coherent and more complete summations that those produced by the less skilled learner" (p. 487).

L2 listening comprehension is a highly complex, interactive process. There is no fixed sequence in processing language and various types of processing can co-occur, interacting and influencing each other. As Buck (2001) points out, "syntactic knowledge might be used to help identify a word, ideas about the topic of conversation might influence processing of the syntax, or knowledge of the content will help interpret the meaning" (p. 2). Given the inherent complexity of this process, it is important to address specific difficulties that learners experience when listening to L2 speech in context. One key component to understanding learner difficulties relates to the allocation of attentional resources in real-time processing.

Listening for Acquisition

Cognitive theorists like Skehan (1998) and Robinson (2001) look to information processing models to account for the actual performance demands of any given task and how this affects the allocation of learner attention. From a cognitive perspective, humans

are burdened with a limited processing capacity that necessitates a careful allocation of attention during task performance. If attention is allotted to content, it will inversely have to be taken away from the language forms. While this would not be particularly problematic for native speakers or near-native speakers making automatic use of proceduralised knowledge without having to divert away precious attentional resources (Anderson, 1983), this has detrimental consequences for less proficient L2 learners.

In a similar vein, VanPatten and colleagues' large body of work on input processing (IP) has been helpful in identifying a number of issues that are relevant to how L2 learners process grammar in oral texts. IP is comprised of a set of principles and corollaries that interact in a learner's working memory. Inherent to these principles is the notion that limited processing capacity means that, out of necessity, learners will abandon information being held in their working memory in order to make way for new information. According to the Primacy of Meaning Principle, when the same meaning is encoded by both a lexical item and a grammatical form in a single utterance, learners will preferentially derive meaning from the lexis rather than from a grammatical form. The communicative value construct (VanPatten, 1985) indicates how much meaning a given form adds to the global meaning of a sentence. Both the Primacy of Meaning Principle and the communicative value construct have important implications for the target structure of the current study. The meaning of the object clitics on the listening task is not replicated on the lexical level. Moreover, French object clitics have high communicative value in that they have semantic value and are not redundant. For this reason, the very high communicative value of object clitics should play a role when it comes to processing these forms in listening tasks.

VanPatten's IP model also allocates an important place to the order of constituents within a sentence, which is known as the Sentence Location Principle. Items in sentence initial position are more salient than those in final position, which in turn are more salient than those in medial position. Since the object clitics in the current study appear in SOV word order, sentence medially, following VanPatten's IP model, they would not appear to be prime candidates for being noticed by the learners. Drawing upon VanPatten's IP model, one could attempt to predict whether or not L2 learners of French in the current study would indeed attend to object pronouns during a listening comprehension task. On one hand, the high communicative value of these forms would appear to favor their processing. On the other hand, the fact that they are not acoustically salient and appear in medial position would appear to disfavor their processing.

Rationale and Research Questions

From previous empirical research, it has been concluded that both L1 and L2 child learners know the syntax and distribution of French object clitics from the time they begin to use them productively. This contrasts starkly with older L2 learners who use a number of types of nontargetlike forms, including strong and null pronouns in pronominalization contexts.

While there has been ample research conducted on the production and comprehension of object clitics by child learners (particularly monolingual and bilingual ones), L2 learners (particularly adults) have been studied to a much lesser extent. With regards to L2, much of the early research focused on anecdotal reports of object pronoun

usage and focused on the overgeneralization of forms (i.e., subject clitics in lieu of object clitics), transfer and word order/object placement.

One area that has been particularly underrepresented in the L2 object clitic acquisition research is that of oral comprehension, or more precisely how clitics in contextualized discourse are processed. The current study proposes to fill a clear gap in the research on oral comprehension of clitics by L2 learners, while at the same time responding to Ellis' (2001) complaint that grammatical knowledge tends to be tested using oral production measures. This study entails a quantitative examination of how successfully university-level learners of French process object clitics on a measure of listening comprehension. The following research questions address L2 French learners' ability to process and reproduce a variety of clitic forms:

1. Does a learner's ability to comprehend clitics contained in an oral text vary depending on the grammatical function, gender or animacy of clitics?

2. Does a learner's ability to comprehend clitics contained in an oral text vary depending on L2 proficiency level (low vs. intermediate vs. high)?

3. Does a learner's ability to comprehend clitics contained in an oral text vary depending on the learner's total amount of exposure to French (French immersion vs. core French)?

Research Hypotheses

Research Question 1

The first research question can be broken down into five hypotheses.

Hypothesis 1a.

Learners will be more accurate on direct object clitics than on indirect object clitics. Previous research on the acquisition of French has shown an asymmetry in direct:

indirect object clitic usage in spontaneous oral production in favor of the former (Meisel, 1986). Research on language processing by L2 learners of French has also shown that students were better able to process direct object clitics than indirect object clitics (Naiman, 1974).

Hypothesis 1b.

Learners will be more accurate on locative *y* than on indirect *y*. Since very little research has even commented upon the acquisition of locative *y* and indirect *y*, the prediction will be primarily based on verb frequency. Locative *y* typically collocates with one of the most frequent forms in the French language: the verb *aller* 'to go'. Furthermore, on a conceptual level locative *y* would appear to be easier for learners to grasp than indirect *y*, which typically collocates with highly abstract verbs such as *penser* 'to think', *réfléchir* 'to reflect' and *songer* 'to dream'.

Hypothesis 1c.

Learners will be more accurate on partitive *en* than on indirect *en*. Hamann, Rizzi and Frauenfelder (1996) found that indirect object clitic *en* is very late acquired. Partitive *en*, on the other hand, is interesting because there is not an equivalent, translatable concept in English[3]. For this reason, it is not possible to hypothesize greater success on partitive *en* on the basis of transfer phenomenon. There are, however, two possible reasons for such a hypothesis. Firstly, partitive *en* is not conceptually complex (in that an uncountable quantity is nonetheless a concrete concept), as opposed to the highly abstract indirect *en*. Secondly, the conceptual simplicity of partitive *en* is further enhanced by the fact that it tends to be introduced at a much earlier point in the French L2 curriculum than does the indirect clitic *en*.

Hypothesis 1d.

Learners will be more accurate on masculine direct object clitics than their feminine

counterparts. The first argument is attributed to the greater frequency of masculine forms

in French (Chillier et al. 2001). Further support for the hypothesis comes from actual

research on monolingual, bilingual and L2 learners of French that provides evidence for

an asymmetrical distribution of gender errors, with the masculine clearly serving as the

preferred, default form (Connors & Nuckle, 1986; Jakubowicz, 1991; Paradis, 2004).

Hypothesis 1e.

Learners will be more accurate on animate object clitics greater than on inanimate

object clitics. Animacy has not been documented as playing a role in the acquisition of

French pronominalization by monolingual and bilingual child L1 learners. However,

whether or not referents are living or non-living appears to contribute to difficulties

experienced by L2 learners (Andersen, 1986; Trévisse, Perdue & Deulofeu, 1991).

Research Question 2

Advanced-level learners will be more accurate in their performance than

intermediate-level learners who will be more accurate than the low-level learners.

Previous research on the acquisition of pronominalization indicated that object clitics are

a difficult point of grammar to master in both monolingual and bilingual child acquisition

and that these forms are late acquired.

Research Question 3

Learners who have had more total exposure to French will be more accurate than those with less exposure. Given that input is the driving force behind language acquisition, learners who have had a greater amount of contact hours in French would have likely been exposed to a larger number of clitic forms, thus increasing the probability that these forms would have been noticed by the learners, processed and made available for integration into their IL systems prior to their participation in the current study.

Method

Participants

The 152 participants in this study came from nine intact classes selected from an original pool of 11 classes of a 1st-year French course (for intermediate-level learners) at the University of Alberta[4]. In total, 53 post-immersion students and 99 post-core French, who had received the equivalent of between 3-13 years of French instruction in school, were recruited for participation in the study. Nine classes volunteered to participate in the current study: 3 low-, 3 intermediate-, and 3 advanced-level sections, for a total of 44 low-, 51 intermediate- and 57 advanced-level students[5]. It is important to note that both post-immersion and post-core students could be found in all three levels.

The French-as-a-Second-Language Program at the University of Alberta

At the time this research was carried out, the French program at the University of Alberta included 6 semesters of language courses prior to entry into third- and fourth-year content courses. At the first year level, two different 6-credit courses were offered

over an 8-month period: French 100 (for beginners) and French 150 (for intermediate-level learners)[6]. At the second year level, there were two different 3-credit, 4-month courses (French 251 and French 252) for more advanced learners, many of whom placed into these sections directly from early French immersion or International baccalaureate programs. Of all of the French courses at this institution, French 150 consistently had the largest number of enrollments, typically 9-11 sections per year. Students enrolled in the course had a minimum of 3 years of secondary FSL or French 100 (or its equivalent from another post-secondary institution).

The general aim of French 150 was to enable students to communicate at an intermediate-level of proficiency in oral and written French in most informal, and some formal, situations with respect to topics of personal and public interest. Students reviewed and expanded their grammatical and lexical knowledge, as well as their understanding of the Francophone world. By the end of French 150, students developed the ability to communicate in predictable and some unpredictable situations with few grammatical and vocabulary errors that impeded the flow of communication. The syllabus was organized by grammatical structures.

The French pronominal system, focusing on clitic forms, was introduced as part of the first unit covered in French 150, which served as a review. From the very beginning of the academic year, instructors taught verbs in conjunction with their argument structure: *parler de quelqu'un*, *parler de quelque chose*, *parler à quelqu'un* and *parler de quelque chose à quelqu'un*, for example. Students were also graded on their individual *cahier de vocabulaire* in which all new verbs were presented in the same fashion. In a whole-class setting, students took part in a planned focus-on-form activity in which they

'discovered' the French pronominal system via a dialogue in which all the object clitic forms were typographically-enhanced and for which they were required to find the antecedents (see Appendix A, #1). Following this deductive introduction to object pronouns, students completed written exercises on text coherence where they eliminated repetitions through the use of object clitics (see Appendix A, #2). Finally, students worked on highly contextualized exercises where they were required to make judicious object clitic choices and be able to defend them using their declarative knowledge of the French pronominal system (see Appendix A, #3).

Due to the heterogeneous nature of the population of students enrolled in the course, all of the participants in the current study wrote a placement test during the first class of the Fall term (see Appendix B). The placement test consisted of seven distinct parts that were intended to assess student performance on the primary grammatical structures to be covered in the course. The specific grammatical structures targeted in the test were: agreements, indicative mood (past, present and future tenses), subjunctive mood, personal pronouns, tonic pronouns, relative pronouns, possessive pronouns and if-clause constructions. There was also a general measure of knowledge of French syntax where the students were required to use a series of items to construct complete and meaningful sentences. Finally, students responded to an essay question eliciting both past-tense indicative forms, as well as present and past conditional forms. The placement test was prepared by the language program coordinator who did not officially assess the reliability or the content and construct validity of the measure. However, during the three years which it was used prior to this study the coordinator felt that the placement test

adequately assessed basic French language skills and helped to placed students in appropriate coursework levels at the beginning of their university careers.

The placement tests for each time-block of courses were marked by the instructors, who then prepared frequency charts of student performance. In consultation with the language program coordinator the distribution of marks was analyzed and students were assigned to low-, intermediate-, and advanced-level sections in order to maximize their progress in French 150, although cut-off points were not empirically established as is the case in norm-referenced tests[7]. For each time-block of courses, assignment was done in such a way that the weak-level sections had the lowest number of enrollments, followed by the intermediate sections and finally the advanced sections with the highest number of enrollments. As such, it was not possible to have an equal number of participants from each of the section levels.

Regardless of the classification of the section in which they were enrolled, everyone was required to follow the same program (with some minor adjustments to grammatical and cultural content) and to write equally difficult midterm and final exams.

Procedure

Testing was carried out during regular class time and took approximately 50 minutes to complete. After signing a consent form and completing a contact questionnaire, the participants in each class received an activity packet containing the necessary materials for the translation task[8]. Participants were instructed that once they had completed the task they were not permitted to return to it at any time.

<u>Instruments</u>

<u>Contact Questionnaire</u>

The contact questionnaire (Appendix C) was designed to gather information about a variety of factors including: sex; age; home language; number of years of formal French study; French program type (i.e., core French, French Immersion etc.); and amount/type of contact with French outside of the classroom. Contact with French outside of the classroom was measured through frequency of exposure to written and oral materials in French, as well as through the amount of time spent in francophone environments and students' frequency of French-language usage during these periods of time.

The only variable from the contact questionnaire examined in the current study is whether learner performance varies depending on the total amount of exposure to French (French immersion vs. core French). For the purpose of the current study, participants having been enrolled in a French immersion program for any length of time, even if they subsequently changed to a core French program, were labeled as French immersion. In the same vein, students having never been enrolled in French immersion, but rather in French-as-a-Second Language, core French or beginner-level French at a post-secondary institution were classified as core French[9]. The justification for this division comes from inherent differences in the two programs for teaching French as a second language in the Canadian context. In French immersion, a variety of content-matter courses are taught through the medium of the French language and students have a large number of contact hours in French: approximately 6000-7000 for students in early FI programs and 3500 for late FI students. In core French, on the other hand, the French language is the object of study and even students who are enrolled in the program from Grade 4 to Grade 12

receive a meager 1000 hours of instruction. From the staggering differences in the potential number of instructional hours received in French prior to arrival at the University of Alberta, it is clear that the post-immersion group has a clear advantage over the post-core one in terms of the vast amount of comprehensible input to which they have been exposed, input which would have been rich with exemplars of the target-feature of the current study given the frequency of clitics in natural discourse. However, it is important to note some important similarities between the post-immersion and post-core groups despite the quantitative differences reported in total exposure. Firstly, both groups of students reported a lack of naturalistic exposure to French. Secondly, despite the greater number of instructional hours, the very nature of instruction in French immersion programs means that these students are unlikely to have had much more form-focused instruction on clitics that core students. For example, Lyster and Fazio (1998) found that only 25% of class time in Grade 4 immersion French language arts classes was dedicated to form-focused instruction, whereas a core French study by Calman and Daniel (1998) estimated that 77% of instructional time was allotted to formal language study. The results will reveal if more exposure to French will results in greater comprehension of clitics.

<u>Listening Task</u>

The participants were required to translate nine groups of contextualized sentences, containing a total of 15 object clitics, from French into English (see Appendix D). Each group of sentences was read three times by the researcher. The items were based on the characters from the students' textbooks and had been previously used as part of a pilot study, at which time the effectiveness of individual items was statistically determined by

calculating their item facility and item discrimination. According to Brown and Hudson (2002), items with an item facility value of between 0.40 and 0.70 and a fairly high positive discrimination index (0.40 and above) were retained for the current study. Participants, who were read each group of sentences at a normal rate of speech, were instructed not to dwell on any vocabulary items they did not know, but rather to keep the original French word in the translated sentence if necessary[10]. The scores for the translation task were based on the number of correctly translated object clitics: as represented by a pronoun or a NP. This resulted in a maximum score of 15.

<u>Analysis</u>

Once the French-English translation was hand-scored, as detailed above and for each individual item, a score of 1 (correct) or 0 (incorrect) was recorded[11]. In addition to receiving an overall object clitic score, scores were also assigned for the forms being compared in hypotheses 1a)-1e) (see research question 1). As the number of tokens was not identical for all categories of object clitics, scores were converted to percentages to facilitate cross-category comparisons. For research question 1, a series of paired-samples *t*-test were carried out to determine if there was an effect of grammatical function, gender and animacy. In research question two the means of the low-, intermediate-, and high-proficiency learners were compared using the Bonferroni correction to determine if their performance differed significantly from one another. Finally, for research question three, a one-way ANOVA was used to compare post-FI and post-core French students' performance on the translation task.

<u>Results</u>

<u>The Contact Questionnaire</u>

The participants primarily came from monolingual Anglophone backgrounds

(78.9%). Of these homes where other languages were spoken, 13.2% included Romance

languages. The sample was composed of more females than males (76.3% and 23.7%

respectively) and the participants ranged in age from 18-45 years, although more than

90% of the participants fell into the 18-24 year-old category. The majority of the student

sample never used or rarely used the spoken French media outside of the classroom. The

36.9% of students who reported having stayed with a Francophone family or French-

speaking friends and the 13.1% who reported having lived with a host family indicated,

for the most part, making frequent use of French in their interactions. Finally, 51.3% of

students acknowledged that they were trying to improve their French outside of the

classroom.

Table 2 provides descriptive statistics for the individual variables that address the

first research question.

Table 3-2. Descriptive Statistics

Variable	# of Items	Mean (%)	SD
1. Direct objects	7	4.046 (57.80)	33.46
2. Indirect objects	8	3.4541 (43.17)	27.18
3. Locative y	2	1.2236 (61.18)	40.36
4. Indirect y	1	0.4079 (40.79)	49.31
5. Partitive en	1	0.7105 (71.05)	45.50
6. Indirect en	1	0.1842 (18.42)	38.89

7. Masculine direct objects	1	0.6908 (69.08)	46.37
8. Feminine direct objects	5	2.6450 (52.90)	35.61
9. Animate objects	10	5.5790 (55.79)	32.91
10. Inanimate objects	5	2.5265 (50.53)	31.39

The Effect of Grammatical Function, Gender and Animacy

In response to the question of whether there is a difference in learner performance on an aural L2-L1 translation measure depending on grammatical function, gender or animacy, there is strong evidence that this is indeed the case. A paired-samples t-test was conducted for the individual comparisons, revealing in each and every case that the difference in means was significant. As was predicted, the following clear-cut asymmetries according to the grammatical function of a given form bore out in the data: direct objects were better processed than indirect objects ($t = 9.273$, $p < 0.001$), locative y was better processed than indirect y ($t = 5.447$, $p < 0.001$) and partitive en was better processed than indirect en ($t = 12.319$, $p < 0.001$). Also, in the same direction hypothesized, masculine direct objects were better processed than their feminine counterparts ($t = 3.486$, $p < 0.001$). The prediction that animate objects would be better understood by the L2 learners than inanimate ones also held true ($t = 2.908$, $p < 0.01$).

The Impact of Proficiency Level

The second research question addressed the issue of whether there would be a difference in learner performance depending on L2 proficiency level, as was measured at the beginning of the academic year. It was hypothesized that object clitic processing

capacity would increase as a function of language proficiency. Table 3 provides

descriptive statistics for performance on the aural reception measure as a function of the

students' L2 proficiency level. The means were compared using the Bonferroni

correction for multiple comparisons; on the L2-L1 translation the weak group was

significantly different from both the intermediate and advanced groups, and the

intermediate group was significantly different from the advanced group ($p < 0.01$).

Table 3-3. Performance on the Translation Task as a Function of Students' L2

Proficiency Level (in Percent)

	Mean (SD) Low (n = 44)	Mean (SD) Intermediate (n = 51)	Mean (SD) Advanced (n = 57)
L2-L1 Translation	32.580 (25.520)	54.641 (29.992)	70.056 (24.624)

The L2 learners' level of proficiency related to their ability to process specific

grammatical forms in the current study (see hypotheses 1a-1e). The weak group was

significantly different from both the intermediate and advanced groups, and the

intermediate group was significantly different from the advanced group in terms of their

ability to process direct object clitics ($p < 0.001$) and indirect object clitics ($p < 0.001$).

The weak and intermediate groups differed significantly on partitive *en* ($p < 0.001$), on

masculine direct objects ($p < 0.001$), on animate objects ($p < 0.001$) and on inanimate

objects ($p < 0.05$). The weak group was significantly different from the advanced group

on locative *y* ($p < 0.001$), on indirect *y* ($p < 0.01$), on partitive *en* ($p < 0.001$), on indirect

en ($p < 0.001$), on masculine direct objects ($p < 0.01$), on animate objects ($p < 0.001$) and

on inanimate objects ($p < 0.001$). Finally, the intermediate group was significantly

different from the advanced group on locative y ($p < 0.05$), on indirect *en* ($p < 0.001$), on

masculine direct objects ($p < 0.05$), on animate objects ($p < 0.05$) and on inanimate

objects ($p < 0.001$).

The Impact of Exposure

   The third research question posited that there would difference in learner

performance depending on the type of educational background (French immersion vs.

core French). It was predicted that due to the great disparity in the number of hours of

classroom-based instruction in French they had received that post-FI students would

perform significantly better than their post-CF counterparts on the translation task. Table

4 provides descriptive statistics for performance on the aural reception measure as a

function of the students' French language background. As can be seen from Table 4, the

prediction bore out and there was a significant difference between the performance of

students who had studied in FI or CF programs prior to arriving at the University of

Alberta, in favor of the post-Immersion students ($F = 37.466, p < 0.001$).

Table 3-4. Performance on the Translation Task as a Function of French Language

Background (in Percent)

	Post French Immersion (n = 53) Mean (SD)	Post Core French (n = 99) Mean (SD)
L2-L1 Translation	72.700 (23.652)	44.043 (29.348)

Discussion

In the current study, a translation task was used as a data gathering instrument that permitted the researcher to investigate to what degree these university learners of French were able to process clitic forms in contextualized oral discourse. The decision was made to examine comprehension, rather than production, because this modality has been underrepresented in previous research on the acquisition of pronominalization by L2 learners of French. A quantitative analysis of the data revealed that both language-internal and learner factors play a role in how object clitics are processed during listening comprehension. Similar factors have been previously documented in the research literature relating to clitics.

Language-internal factors affect the extent to which university-level L2 learners of French are able to process and reproduce clitic forms during oral comprehension. Learner performance differs as a function of the grammatical role, gender, and animacy of the target forms. An easy interpretation would be to simply attribute findings in the current study such as the direct: indirect object and partitive *en*: indirect *en* asymmetries to instructional sequences, given that in both cases the former are introduced well before the latter in the French L2 curriculum. However, there is ample evidence to suggest that instruction does not predict the sequence of acquisition in L2. In fact, a rather fixed order of acquisition for both grammatical morphemes and syntactic structures has been documented, particularly for L2 English and German, although also for L2 French to a much lesser extent. It is important to acknowledge, however, that research indicates that form-focused instruction increases the acquisition rate for grammatical morphemes and syntactic structures and can enhance their accurate usage (Hulstijn & Hulstijn, 1984;

Klapper & Rees, 2003; Norris & Ortega, 2000; Spada, 1997). Each of these possible explanations is discussed below.

The locative *y:* indirect *y* asymmetry might stem from overall processability as a function of verb frequency. Overall processability of forms is related to frequency because not all input is equal and more frequent forms are more susceptible to noticing (Schmidt, 1990). As was previously mentioned, locative *y* typically collocates with one of the most frequent forms in the French language: the verb *aller*. With L2 learners such as the ones in this study, it would seem normal for these two items to be learned as a chunk: *y aller* 'to go there.' Indirect y typically collocates with a less frequent verb, *penser*[12]. Therefore, as a function of frequency, locative *y* should be more easily processed than indirect *y*. A second processability-related issue that could explain student performance has to do with the conceptual complexity of the verbs with which locative *y* and indirect *y* typically collocate. Imagine a continuum of concreteness versus abstraction. Near one end there would be the concrete action *y aller*, and near the other end there would be the abstract concept of *y penser*. In addition to being more frequent in the input, *y aller* is also a semantically simpler concept for the learner to grasp. Given that locative *y* and indirect *y* are acoustically identical, it is not surprising that the less conceptually complex of the two should be more easily processed in oral discourse.

Form-related explanations for the current findings can also be offered, although they are related to different attributes of the forms under examination. One such form attribute is inherent linguistic complexity. In French, one feature of object clitics that must be factored into their complexity is their associated argument structure. According to a form-related linguistic complexity explanation, direct objects would be less difficult

than their indirect counterparts because they do not involve knowing indirect argument structure and subsequently selecting the correct argument (typically *à* or *de*). Direct objects, in essence, require learners to make a less complex syntactic computation (both in production and in comprehension).

A similar linguistic complexity argument could be made in the case of the partitive *en*: indirect *en* asymmetry. Both functions of *en* are on equal footing in that they must be placed pre-verbally. There are, however, other aspects that make the usage of one form more complex than the other. Even though partitive *en*, which serves to designate part of a whole, does not have an equivalent structure in English, the notion of uncountable quantity is not complex in that this particular form is not marked for gender or number. Indirect *en*, however, as is the case with all indirect arguments requires knowledge of verb argument structure (indirect argument *de*). The situation is further complicated by the fact that many high frequency verbs in the current task, such as *parler* 'to talk' and *penser* 'to think', can be used with either *à* or *de* depending on the intended meaning, which forces learners to choose between competing forms available in their IL.

The masculine direct object: feminine direct object asymmetry may be due to form-related issues tied to the distributional properties of gender in French. In French, distinctions are made between natural gender (assigned according to the biological sex or personal gender identity of a living being) and grammatical gender (assigned according to a set of conventions, which may have little or no relation to the natural gender of the referent). Gender representations are omnipresent in French given that an estimated 20-25% of phrasal constituents, such as pronouns, adjectives and articles, are marked for gender (Desrochers, 1986). The unequal distribution of masculine and feminine forms in

French manifests itself in a number of ways. In terms of the lexicon, there is a higher percentage of masculine nouns than feminine nouns: 58.4% versus 41.6%, respectively (Séguin, 1969). Borrowings from other languages tend to be almost exclusively assigned to the masculine gender. For example, 90% of inanimate words borrowed from English are masculine in French (Humbley, 1974: p. 67). According to Chillier et al., "The masculine is required in constructions with expletive subjects (e.g., *il est tard*, [it is late]), conjunctions (e.g., *le garçon et la fille sont heureux* [the boy and the girl are happy-M]) and in generic nouns (e.g., professions) and therefore can be considered as a default form" (p. 15). It is equally noteworthy that the masculine acts as a default in French, regardless of total numbers. In a scenario where even a single man is present, the group of people must be referred to using the third person plural masculine subject clitic *ils*. In the current study, the participants' more targetlike performance on masculine clitics than feminine clitics is hardly surprising given the clear bias towards masculine forms across a variety of constructions in French.

Finally, the observed animate object clitic: inanimate object clitic asymmetry can be explained by a saliency effect that is tied to the notion of natural gender versus grammatical gender. In French, animate object clitic form choice is based on the natural gender of the referent. For example, *Julie regarde Pierre* (masculine singular)→ *Julie le-*MS-*regarde* 'Julie looks at Pierre'. Conversely, inanimate object clitic form choice is based on the grammatical gender of the referent. For example, *Julie regarde le stylo* (masculine singular)→ *Julie le*-MS-*regarde* 'Julie looks at the pen'. While the natural gender of animates in French is a visible and perceptible attribute, the grammatical gender of inanimates in French is somewhat arbitrary. That is to say, although the gender

of French nouns can be predicted to a certain extent based on the final phone (i.e., nouns

ending in –*tion* are feminine or nouns that end in –*age* are masculine), there is no

categorical system for gender assignment. The oral comprehension of +human (animate)

object clitics should therefore be less problematic for L2 learners of French than that of -

human (inanimate) object clitics precisely because animate object clitics have perceptible

gender attributes. This is why, independent of acoustics, +human reference is clearly

more salient for the participants in the current study than –human reference and as a

result it is better processed and reproduced than –human reference.

In addition to language-internal factors, learner factors such as proficiency and

previous exposure also play a role in how object clitics are processed during listening

comprehension. Among the present sample of university students enrolled in an

intermediate-level French course, there is a positive relationship between L2 proficiency

and the ability to process clitic forms contained in the input during a listening

comprehension task. The higher the proficiency level of the student in French, the greater

the capacity for aurally processing object clitics. This finding aligns very well with

information processing models in SLA (e.g., McLaughlin, 1987; Skehan, 1998;

Robinson, 2001). It is clear that learners are not able to attend to all of the information in

the input. Attention is directed towards certain parts of the input, while other parts are

only attended to peripherally. According to various information processing models, more

proficient learners would be using automatic processing (because they have more

information chunks available to them), which would free up additional attentional

resources that could be directed towards individual forms – in this case object clitics.

Conversely, less proficient learners would be using controlled information processing

(due to a lesser availability of prefabricated chunks) which would necessitate a large amount of attention and tax the learners' short term memory, leaving little capacity for focus on individual forms.

The proficiency finding could also be explained using a 'more skilled listener' framework (Vandergrift, 2003). In oral comprehension, it is an unfortunate reality that listeners have a limited processing capacity that makes it necessary to abandon old information to make way for the new. This is where a combination of overall L2 proficiency, coupled with strategy use, comes in to play. The results of this study show that these more proficient L2 students are also more skilled listeners. Using Vandergrift's (2003) model of the more skilled listener, it is likely that while completing the translation task these students were successful because they were able to simultaneously use both top-down and bottom-up processing, while at the same time elaborating and continuously revising conceptual frameworks in light of new input. In contrast, using Vandergrift's (2003) model of the less proficient, less skilled listener, it is likely that the less proficient students in the current study relied almost exclusively upon bottom-up processing, in doing so impeding "the ... efficient construction of meaning" (p. 477). Their lower proficiency level, coupled with inferior strategies, resulted in them having less control of the listening process, which was ultimately reflected in their less target-like performance on object clitics.

Previous exposure to French through immersion experience in K-12 schooling among these university students results in an increased capacity for processing meaning of the object clitics in the experimental task. Numerous studies have indicated that FI students' global comprehension skills are comparable to those of same-age NS peers and

that they exceed those of same-age peers enrolled in CF programs (e.g., Genesee, 1987; Lapkin & Swain, 1984a, 1984b; Pawley, 1985). The evidence obtained in the current study indicates that graduates of FI programs also have better bottom-up comprehension skills than post-CF students. However, the performance of the post-FI students on the translation task (average of 72%) is perhaps not as impressive as one might expect. It confirms the claim that FI students rely heavily upon compensatory strategies, thus allowing them to appear to perform in a native-like fashion.

Before offering concluding comments on the present study, it is important to acknowledge certain limitations. The first limitation of the current study is that the pronominal representations in learners' ILs are explained using written data obtained via an aural reception measure. The translation task was not a 'pure' listening measure as the listeners were asked to encode meaning graphically in order to demonstrate their understanding. Moreover, both L1 ability and translation ability were also intervening factors as the listeners needed to reformulate the sentences from French into English. Given that the student translations were provided in written form, it would be advantageous, in future studies, to also have access to verbal data from a subset of participants as they completed the task. This data, which would allow a better understanding their real-time processing of the target-forms, could be easily obtained by having the participants narrate their thought process aloud, 'think aloud' style (Camps, 2003; Jourdenais, 2001).

The second limitation concerns the number of tokens for each targeted clitic form on the translation task. The number of tokens of each clitic type was limited and varied across each individual clitic form, making comparisons of percentages problematic in

some cases. This was the case with the locative y: indirect y contrast, for example, where there were two and one tokens respectively. The number of tokens varied since the aim was to create an authentic sounding text which contained the full range of clitics forms, but which would not overly fatigue the listeners. Statistical analyses and comparisons would have been greatly facilitated by having an equal number of items for all clitic types.

Implications

The results of the current study have important implications for educators and for L2 French material developers. Given the inherent complexity of the French pronominal system, teachers cannot leave students to their own devices in the hope that they will magically come to process object clitics simply through frequent exposure to these ubiquitous forms that have a high communicative value. This is particularly true because object clitics are not perceptually salient. This problem is further compounded by the fact that they are placed preverbally, resulting in SOV word order. Teachers of L2 French might do well to explore input-based approaches to object clitic instruction (Erlam, 2003a), thus finding ways to focus their students' attention on these difficult forms. It would be useful to begin with listening tasks that require the learners to pay attention to forms and process for meaning. One such possibility is using training tasks for automatic word recognition at the 'i minus one' level, as is advocated in Hulstijn (2001). The basic idea is to have beginning- and intermediate-level students revisit oral texts to which they had been previously exposed (in conjunction with their transcriptions) with the goal of

familiarizing themselves with the text until they are able to recognize all of the words.

Hulstijn (2001) suggests the following directions be given to guide the process:

> Pay attention to how the words sound in concatenated speech....Play the
>
> text, utterance by utterance, and check whether you recognized every
>
> word in it by consulting the printed text. A simple way of doing this is by
>
> whispering every word to yourself or by counting the number of words.
>
> If an utterance is too long to do this, cut it up into sections short enough
>
> for you to remember. Do this as long as is necessary. In the end, you
>
> should be able to understand *every* word without looking at the printed
>
> text (p. 283).

In addition to having students listen at the 'i minus one' level, it is equally important to 1) sensitize their students to the phonological forms of object clitics; and 2) train them to listen for them pre-verbally to facilitate auditory detection. One strategy that I found to work particularly well with beginning-level learners was using Xs to indicate points in sentences where there is typically 'intervening material' in French (i.e., object pronouns, negation etc). Using techniques like this, the morphophonology of French object clitics can be taught with a pedagogically sound focus on form. This is particularly important because although instruction may not alter the order of acquisition, it can speed up the acquisition process. For this reason, form-focused instruction, whether it be planned or incidental, is beneficial because it serves a consciousness-raising function (Schmidt, 1990). For acoustically non-salient, medially placed forms like French object clitics, helping students to notice these features is a crucial to successful acquisition. It has also been suggested that this noticing will translate into readiness when the learner

receives further input containing the TL feature. As such, form-focused instruction lays the groundwork to help learners reap the benefits of future naturalistic exposure, as has been shown to be the case during residence abroad (e.g., Klapper & Rees, 2003).

Future research on the reception of object clitics in L2 French might look at whether explicit, meaning-based focus on object clitic forms would lead to improved auditory detection and discrimination. It would also be interesting to know whether this type of morphophonetic training would result in gains that could be maintained and that would transfer to other modalities, like oral production and written production.

Both inside and outside the classroom, understanding object clitic pronominal reference is an integral part of communicative interactions in French. The results of the current study show that less proficient learners, who appear to be unable to use top-down and bottom-up processing in a complementary fashion, are playing a psycholinguistic guessing game when it comes to understanding what they hear, using top-down processing to compensate for their grammatical deficiencies. Furthermore, the current study makes an important contribution to our understanding of how object clitics are processed by L2 learners of French by showing that not all forms are equally difficult: factors such as grammatical function, gender, and animacy also play an important role. These findings shed light on how learners of French understand clitics during listening tasks and pedagogical tips are provided to help students better master this extremely complex system.

<u>Endnotes</u>

1. Point 5 is a direct quote taken from Paradis, Crago and Genesee (2003).

2. It has been argued that clitics are more deficient that their strong pronoun counterparts, as can be seen by their smaller trees (Granfeldt & Schlyter, 2004). *Me, te, nous, vous* and *elle(s)* have multiple functions. *Elle(s)* functions as both a subject clitic and as a strong pronoun. *Me* and *te* are both direct and indirect object clitics. *Nous* and *vous* function as subject, object and indirect clitics, as well as strong pronouns.

3. English does not make a difference between countable and non-countable quantities in the same way French does. Typically *en* will translate into English in conjunction with the quantity in question. For example, in the sentence *J'en veux un* 'I want one (of them)'. As *en* represents part of the whole, there is often an implied 'of it' or 'of them' depending on whether the quantity desired forms a whole in and of itself (like a cake, for example) or is in some sort of receptacle (like cherries in a bowl, for example).

4. In the Canadian context, two major types of L2 French instructional programs have predominated in the provincially-run school systems: core French and French immersion. Core French instruction typically begins in Grade 4 and consists of 30-40 minute classes, the number of which can vary per cycle. Netten and Germain (2004) reported that 85% of FSL learners are enrolled in Core French programs whereas 15% are enrolled in French immersion programs. French immersion programs (which are distinguished by early, middle and late options) teach a variety of content-matter courses through the medium of the French language. In immersion schools, French tends to be used exclusively in the classroom for between 50-100% of the school day, depending on the program type and the grade level. The two types of programs have very different learner outcomes in terms

of overall fluency and accuracy achieved in French. For the current study, the number of years of French instruction in school varied as a function of program type and start time. For instance, many core French learners only had 3 years of French instruction in Grades 10-12. Some early FI students studied French from Kindergarten through to Grade 12 for a total of 13 years of instruction. Other early FI students only spent part of their elementary schooling in a FI program, for a total of less than 7 years of French instruction. Other common combinations were 9 years of core French from Grades 4-12 or 6 years of core French from Grades 7-12. There were also some late FI students with 6 years of instruction in French from Grades 7-12.

5. A second and third task, a listening cloze and a dictogloss task, were also administered at the same time. The dictogloss task was completed in pairs and is presented in a separate paper.

6. Both French 100 and French 150 met 5 days per week and each session was 50 minutes.

7. Students' oral skills were informally assessed by instructors during the first week of classes in order to re-assign those with borderline scores (i.e., those who almost scored high enough to place into a higher-level section) with strong oral skills into more advanced sections of French 150 or in some cases into French 251.

8. The instructors of nine out of the eleven sections of French 150 agreed to have their classes participate in the study. One advanced-level section was unable to participate due to time constraints. The low-level section being taught by the principal investigator was also opted-out as participation in this study could have constituted a conflict of interest.

9. Eleven of the students participating in the study took French 100 (or an equivalent course at a post-secondary institution) prior to enrolling in French 150 at the University of Alberta. Of those eleven students, three also reported having been enrolled in core French and two having been enrolled in French immersion.

10. These instructions were given as the researcher was only interested in the translation of verbs and object pronouns, but not of lexical items in general.

11. The scoring of partitive *en* in #3 of the translation task (see Appendix D) was carefully considered as English and French do not distinguish countable and non-countable quantities in the same way. As such, translating partitive *en* into English in a 'natural' fashion can pose a challenge. For this reason, the following translations were scored as correct: *Océane montre sa bague de fiançailles à toutes ses amies en leur demandant si elles la trouve bien et si elles aimeraient en avoir une aussi.* 'Océane shows her engagement ring to all of her friends, asking them if they like it and if the would like to have one (of them) too'.

12. According to Gougenheim (1964) *aller* is ranked as the 34th most frequent word in the French language while *penser* is only ranked 154th.

References

Andersen, H. (1986). L'acquisition et l'emploi des pronoms français par des apprenants

danois. In D. Véronique and A. Giacomi (Eds.), *Acquisition d'une language*

étrangère: Perspectives et recherches – Actes du 5ᵉ colloque international (pp. 25-

45). Aix-en-Provence: Université de Provence.

Anderson, J.R. (1983). *The architecture of cognition*. Cambridge, MA: Harvard

University Press.

Anderson, J.R. (1985). *Cognitive psychology and its implications*. (2nd edition). New

York: Freeman.

Anderson, R.C. (1972). How to construct achievement tests to assess comprehension.

Review of Educational Research, 42, 145-170.

Bautier-Castaing, E. (1977). Acquisition comparée de la syntaxe du français par des

enfants francophones et non-francophones. *Études de linguistique appliquée, 27,*

19-41.

Brown, J., & Hudson, T. (2002). *Criterion-referenced language testing*. Cambridge,

England: Cambridge University Press.

Buck, G. (1992). Translation as a language testing procedure: Does it work? *Language*

Testing, 9, 123-148.

Buck, G. (2001). *Assessing listening*. Cambridge, England: Cambridge University Press.

Calman, R., & Daniel, I. (1998). A board's-eye view of core-French: The North York

Board of Education. In S. Lapkin (Ed.), *French second language education in*

Canada: Empirical studies (pp. 282-323). Toronto, Canada: University of Toronto

Press.

Camps, J. (2003). Concurrent and retrospective verbal reports as tools to better understand the role of attention in second language tasks. *International Journal of Applied Linguistics, 13,* 201-221.

Chaudron, C., & Richards, J.C. (1986). The effect of discourse markers on the comprehension of lectures. *Applied Linguistics, 7,* 113-127.

Chillier, L., Arabatzi, M., Baranzini, L., Cronel-Ohayon, S., Deonna, T., Dubé, S., Franck, J., Frauenfelder, U., Hamann, C., Rizzi, L., Starke, M., & Zesiger, P. (2001). The acquisition of French pronouns in normal children and in children with specific language impairment. In *Proceedings of Early Lexicon Acquisition* [CD-ROM], Lyon, France.

Conners, K., & Nuckle, L. (1986). The morphosyntax of French personal pronouns and the acquisition/learning dichotomy. In O. Jaeggli and C. Silva-Corvalan (Eds.), *Studies in Romance linguistics* (pp. 225-242). Dordrecht: Foris.

Connors, K., Nuckle, L., & Greene, W. (1981). The acquisition of pronoun complement structures in French and English. In J.E. Copeland and P.W. Davis (Eds.), *The Seventh LACUS Forum* (pp. 475-485). Columbia, SC: Hornbeam Press.

Cook, V. (1988). *Chomsky's Universal Grammar.* Oxford, England: Basil Blackwell.

Desrochers, A. (1986). Genre grammatical et classification nominale. *Canadian Journal of Psychology, 40,* 224-250.

Ellis, R. (2001). Some thoughts on testing grammar: An SLA perspective. In C. Elder, A. Brown, N. Iwashita, E. Grove, K. Hill, T. Lumley, T. McNamara & K. O'Laughlin (Eds.), *Experimenting with uncertainty: Essays in honour of Alan Davies* (pp. 251-263). Cambridge, England: Cambridge University Press.

Erlam, R. (2003a). Evaluating the relative effectiveness of structured-input and output-based instruction in foreign language learning. *Studies in Second Language Acquisition, 25,* 559-582.

Erlam, R. (2003b). The effects of deductive and inductive instruction on the acquisition of direct object pronouns in French as a Second Language. *The Modern Language Journal, 87,* 242-260.

Field, J. (1999). "Bottom-up" and "top-down". *ELT Journal, 53,* 338-339.

Gass, S. (1997). *Input, interaction, and the second language learner.* Mahwah, NJ: Lawrence Erlbaum.

Genesee, F. (1987). *Learning Through Two Languages: Studies of Immersion and Bilingual Education.* Cambridge, MA: Newbury House.

Gougenheim, G. (1964). *L'élaboration du français fondamental (1er degré) : Étude sur l'établissement d'un vocabulaire et d'une grammaire de base.* Philadelphia: Chilton Books.

Granfeldt, J., & Schlyter, S. (2004). Cliticisation in the acquisition of French as L1 and L2. In J. Paradis and P. Prévost (Eds.), *The acquisition of French across learner contexts: Focus on functional categories* (pp. 333-370). Amsterdam: Benjamins.

Hamann, C., Rizzi, L., & Frauenfelder, U. (1996). On the acquisition of subject and object clitics in French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 309-334). Philadelphia: John Benjamins Publishing.

Harley, B. (1986). *Age in second language acquisition.* Clevedon, England: Multilingual Matters.

Hawkins, R., & Towell, R. (1992). Second language acquisition research and the acquisition of French. *French Language Studies, 2*, 97-121.

Henning, G., Gary, N., & Gary, J. (1983). Listening recall – A listening comprehension test for low proficiency learners. *System, 11*, 287-293.

Herschensohn, J. (2004).Functional categories and the acquisition of object clitics in L2 French. In P. Prévost and J. Paradis (Eds.), *The acquisition of French in different contexts: Focus on functional categories* (pp. 207-242). Philadelphia: John Benjamins Publishing.

Hulk, A. (2000). L'acquisition des pronoms clitiques français par un enfant bilingue français-néerlandais. *Canadian Journal of Linguistics, 45*, 97-117.

Hulstijn, J. (2001).Intentional and incidental second language vocabulary learning: A reappraisal of elaboration, rehearsal and automaticity. In P. Robinson (Ed.), *Cognition and second language instruction* (pp. 258-286). Cambridge, England: Cambridge University Press.

Hulstijn, J., & Hulstijn, W. (1984). Grammatical errors as a function of processing constraints and explicit knowledge. *Language Learning, 34*, 23-43.

Humbley, J. (1974). Vers une typologie de l'emprunt linguistique. *Cahiers de lexicologie, 25*, 46-70.

Jakubowicz, C. (1991). L'acquisition des anaphores et des pronoms lexicaux en français. In J. Guéron & J.-Y. Pollock (Eds.), *Grammaire générative et syntaxe comparé* (pp. 229-253). Paris: Éditions du Centre National de la Recherche Scientifique.

Jakubowicz, C., Nash, L., Rigaut, C., & Gérard, C.-L. (1998). Determiners and clitic pronouns in French-speaking children with SLI. *Language Acquisition, 7*, 113-160.

Jakubowicz, C., & Rigaut, C. (2000). L'acquisition des clitiques nominatifs et des clitiques objets en français. *Canadian Journal of Linguistics, 45*, 119-157.

Jourdenais, R. (2001). Cognition, instruction and protocol analysis. In P. Robinson (Ed.), *Cognition and second language instruction* (pp. 354-375). Cambridge, England: Cambridge University Press.

Kaiser, G. (1994). More about INFL-ection and agreement: The acquisition of clitic pronouns in French. In J. Meisel (Ed.), *Bilingual first language acquisition: French and German grammatical development* (pp. 131-159). Amsterdam: John Benjamins Publishing.

Kayne, R. (1975). *French syntax: The transformational cycle.* Cambridge, MA: The MIT Press.

Kenemer, V. (1982). *Le français populaire and French as a second language: A comparative study of language simplification.* Québec: CIRB.

Klapper. J., & Rees, J. (2003). Reviewing the case for explicit grammar instruction in the university foreign language learning context. *Language Teaching Research 7* (3), 285-314.

Lapkin, S., & Swain, M. (1984a). *Final Report on the Evaluation of French Immersion Programs at Grades 2, 6 and 9 in New Brunswick.* Toronto, ON: Modern Language Centre, OISE.

Lapkin, S., & Swain, M. (1984b). *Second Languages Maintenance at the Secondary School Level: Final Report to the Carleton Board of Education.* Toronto, ON: Modern Language Centre, OISE.

Lightbown, P. (2000). Anniversary article: Classroom SLA research and second language

    teaching. *Applied Linguistics, 21*, 431-462.

Lyster, R., & Fazio, L. (1998). Immersion and submersion classrooms: A comparison of

    instructional practices in languages arts. *Journal of Multilingual and Multicultural*

    Development, 19, 303-317.

McLaughlin, B. (1987). *Theories of second language learning*. London: Edward Arnold.

Meisel, J. (1986). Word order and case marking in early child language: Evidence from

    simultaneous acquisition of two first languages: French and German. *Linguistics,*

    24, 123-183.

Naiman, N. (1974). The use of elicited imitation in second language acquisition research.

    Working Papers in Bilingualism, 2, 1-37. Toronto, Canada: OISE.

Netten, J., & Germain, C. (2004). Theoretical and research foundations of intensive

    French. *Canadian Modern Language Review, 60*, 275-294.

Norris, J.M., & Ortega. L. (2000). Effectiveness of L2 instruction: A research synthesis

    and quantitative meta-analysis. *Language Learning, 50*, 417-528.

Oller, J.W., Jr. (1979). *Language tests at school*. London: Longman.

Paradis, J. (2004). The relevance of specific language impairment in understanding the

    role of transfer in second language acquisition. *Applied Psycholinguistics, 24*, 67-

    82.

Paradis, J., Crago, M., & Genesee, F. (2003) Object clitics as a clinical marker of SLI in

    French: Evidence from French-English bilingual children. In B. Beachley et al.

    (Eds.), *Proceedings of the 27th Boston University Conference on Language*

    Development (pp. 638-649). Somerville, MA: Cascadilla Press.

Pawley, C. (1985). How bilingual are French immersion students? *The Canadian Modern Language Review,* 41, 865-876.

Peterson, P. (1991). A synthesis of methods for interactive listening: 2nd edition. In M. Celce-Murcia (Ed.), *Teaching English as a second or foreign language* (pp. 106-122). New York: Newbury House.

Robinson, P. (2001). Task complexity, cognitive resources, and syllabus design: a triadic framework for examining task influences on SLA. In P. Robinson (Ed.), *Cognition and second language instruction* (pp. 287-318). Cambridge, England: Cambridge University Press.

Rost, M. (1990). *Listening in language learning.* London: Longman.

Rost, M. (2002). *Teaching and researching listening.* London: Longman.

Schlyter, S. (1997). Formes verbales et pronoms objets chez les apprenants adultes de français en milieu naturel. In C. Martinot (Ed.), *Actes du colloque international sur l'acquisition de la syntaxe en langue maternelle et en langue étrangère* (pp. 273-293). Paris: Les Belles Lettres.

Schmidt, R. (1990). The role of consciousness in second language learning. *Applied Linguistics, 11,* 17-46.

Scott, M.L., Standsfield, C.W., & Kenyon, D. (1996). Examining validity in a performance test: The listening summary translation exam (LSTE) – Spanish version. *Language Testing, 13,* 83-109.

Séguin, H. (1969). *Les marques du genre dans le lexique français écrit contemporain: Compilation des cas et essai de classement.* Mémoire de DES, Département de Linguistique, Université de Montréal, Montréal, Québec.

Selinker, L., Swain, M., & Dumas, G. (1975). The interlanguage hypothesis extended to

   children. *Language Learning, 25*, 139-152.

Sharwood Smith, M. (1986). Comprehension vs. acquisition: Two ways of processing

   input. *Applied Linguistics, 7*, 239-256.

Skehan, P. (1998). *A cognitive approach to language learning.* Oxford, England: Oxford

   University Press.

Spada, N. (1997). Form-focused instruction and second language acquisition: A review of

   classroom and laboratory research. *Language Teaching, 30*, 73-87.

Swain, M., & Lapkin, S. (1982). *Evaluating bilingual education: A Canadian case study.*

   Clevedon, England: Multilingual Matters.

Towell, R., & Hawkins, R. (1994). *Approaches to second language acquisition.*

   Clevedon, England. England: Multilingual Matters.

Trévisse, A., Perdue, C., & Deulofeu, J. (1991). Word order and discursive coherence in

   L2. In Gabriela Appel and Hans Dechert (Eds.), *A case for psycholinguistic cases*

   (pp. 163-176). Amsterdam: John Benjamins Publishing.

Vandergrift, L. (2003). Orchestrating strategy use: Toward a model of the skilled second

   language listener. *Language Learning, 53*, 463-496.

VanPatten, B. (1985). Communicative value and information processing in second

   language acquisition. In E. Judd, P. Nelson and D. Messerschmitt (Eds.), *On*

   TESOL '84: A brave new world (pp. 88-99). Washington, DC: TESOL.

VanPatten, B. (2002). Processing instruction: An update. *Language Learning, 52*, 755-

   803.

Zobl, H. (1980). The formal and developmental selectivity of L1 influence on L2

acquisition. *Language Learning, 30*, 43-57.

Appendix A: The French Pronominal System

1) Planned focus-on-form activity to introduce the French pronominal system:

M. le commissaire: Séverine, je m'en vais. Si le directeur régional appelle, dites-lui que

je suis à la préfecture...Tenez, je vous laisse ces fiches.

Analysis: *dites-lui --> lui remplace le <u>directeur général</u>*

Construction: *dire au directeur général*

2) Text coherence activity :

<u>Redundant version:</u> *Julien a rencontré Arielle un dimanche après-midi au jardin du*

Luxembourg. Julien a parlé à Arielle. Julien a invité Arielle à prendre un café. Julien a

laissé son numéro de téléphone à Arielle.

<u>Rewritten with object clitics:</u> *Julien a rencontré Arielle un dimanche après-midi au*

jardin du Luxembourg. Julien lui a parlé. Julien l'a invitée à prendre un café. Julien lui

a laissé son numéro de téléphone.

3) Sample contextualized object clitc usage activity :

Chère Anne-Sophie,

Je t'écris pour _____ annoncer une grande nouvelle. Le mois dernier, dans une

soirée chez Michel, j'ai rencontré un garçon qui s'appelle Jean. Depuis notre rencontre,

nous avons souvent l'occasion de _____ voir. Il _____ invite au restaurant et_____ fait

des petits cadeaux. Hier soir, il _____ a dit qu'il voulait _____ épouser. Je ne _____ ai

pas encore répondu mais je crois que je vais _____ dire oui parce que je _____ aime à la

folie.

Bisous,

Magali

<u>Appendix B: French 150 Placement Test</u>

University of Alberta   **Modern Languages & Cultural Studies**

FRENCH 150 – Placement Test

<u>Results</u>   Parts 1-3:   Parts 4-6:   Total: Section:

Name: _____ I.D.: _____

Faculty: _____ Degree Code: _____

Which French program(s) have you taken?

-French 10, 20, 30   -French as a Second Language (4-12)
-Immersion   -Bilingual Program
-International Baccalaureate program   -French 100

Final mark in your last French course? _____

Important:

The goal of this test is to help us in placing you in the section that is most suitable to you so as to maximize your progress in this course. This test will not count in the calculation of your mark.

Part 1 - AGREEMENTS.
In the following text, make the agreement if necessary for all underlined words. Write the correct form in its entirety under the underlined word.

Marie a les cheveux bruns et <u>frisé</u>. Elle a un joli sourire et les yeux <u>bleu</u>. Elle porte de

<u>jolie</u> boucles d'oreille <u>doré</u> qui <u>doive</u> coûter cher. Marc, lui, a vingt-deux <u>an</u>. Il a les

<u>cheveu</u> <u>blond</u> et <u>court</u> et porte des lunettes <u>ronde</u> qui lui <u>va</u> bien. Marie et Marc <u>sorte</u>

ensemble depuis quatre ans et pensent se marier bientôt. <u>Il</u> inviteront tous <u>leur</u> amis et ce

sera une <u>grand</u> fête!

Part 2 – CONJUGATIONS.
Conjugate the following verbs at the person and time indicated.

-nous [**être**] _____ (**présent** de l'indicatif)
-ils [**avoir**] _____ (**présent** de l'indicatif)
-je [**faire**] _____ (**présent**)
-vous [**finir**] _____ (**présent** de l'indicatif)
-tu [**marcher**] _____ (**présent** de l'indicatif)

-elle [aller] _____ (passé-composé)
-je [choisir] _____ (passé-composé de l'indicatif)
-vous [aimer] _____ (passé-composé)
-il [regarder] _____ (imparfait de l'indicatif)
-je [lire] _____ (futur de l'indicatif)

Part 3 – SYNTAX.

For each of the following three lines, using all of the given words, make complete and meaningful sentences. You might need to add articles (le, la, les, un, une...) and/or prepositions. Conjugate the verbs if necessary (choose the tense that you think is most appropriate).

1. regarder / soleil / Marie / beau.

2. habiter / parents / mon / ne / frère / mes / pas.

3. qui / touristes / manger / ours [bears] / imprudents [careless] / pouvoir / être.

Part 4 – TENSES.

Conjugate the verbs at the appropriate tense (present, past, future).

Ludwig Berg (compositeur)

-Monsieur Berg, vous (habiter) _____ en France depuis plus de vingt ans, je crois?
-Oui, je (vivre) _____ ici depuis exactement vingt-deux ans.
-Vous (recevoir) _____ un Oscar pour la musique du film *Gun 999*, il y a deux ans, et vous (vendre) _____ trois millions de disques de votre album "Stellor" l'année dernière. Vos commentaires?
-Je (écrire) _____ "Gun Melody" en deux jours et "Stellor" en deux semaines. Je (gagner) _____ plus d'argent en trois ans que depuis que je suis né. Vive le cinéma!
-Quels sont vos projets?
-Quand mon nouvel album (sortir) _____, dans un mois, je (partir) _____ en vacances en Jamaïque pour un an.
-La musique est votre seule passion?
-Oui, à sept ans, je (arrêter) _____ de fumer et je (commencer) _____ le violoncelle.

Part 5 – PRONOUNS.

Complete the sentences with: "qui", "que", "le", "les", "lui", "leur", "en", "y".

Le Bulgare

Il y avait dans mon village un homme _____ vivait seul avec son chien. Cet homme _____ tout le monde appelait "Le Bulgare" dormait le jour et vivait la nuit. Il partait tout les soirs dans la campagne et il _____ passait la nuit. Le matin, quand

j'allais à l'école, je _____ rencontrais sur mon chemin. Il portait toujours un gros sac gris _____ semblait très lourd. Le Bulgare ramassait des racines, des plantes et des champignons et il _____ vendait au marché. Quand il trouvait des fraises des bois, il _____ donnait toujours une partie aux enfants du village. Il _____ distribuait aussi des noisettes et même des truffes. On aimait bien le Bulgare, on _____ suivait, on _____ posait des questions. C'était notre ami.

Part 6: *Complete the following sentences.*

1. Mon anniversaire est le seize novembre, et _____, Paul? Ah! tu es taureau comme _____ mari: il est né _____ dix-huit mai. Il _____ trente ans comme toi.

2. Le beaujolais de cette année est _____ celui de l'année dernière.

3. Bruna m'a montré le bijou _____ son mari _____ a offert pour son anniversaire: ce sont de petites boucles d'oreilles _____ lui vont très bien.

4. J'aimerais qu'il _____ un jardin près de chez moi pour que les enfants _____ jouer dehors.

5. Alain partira en vacances dès qu'il (finir) _____ ses examens.

6. Si _____ beau le week-end prochain, nous _____ à la campagne.

Part 7: In 100-150 words **in French**, tell us about your experiences learning French. What did you like? What did you not like? What would you have liked to do? What would you like to do?

<u>Appendix C: The Contact Questionnaire</u>

Your answers on this questionnaire will allow the researcher to better understand your

contact with and use of the French language. You are under no obligation to answer any

questions on this questionnaire with which you are uncomfortable. You will be assigned a

participant number for use in the reporting of research findings.

Name: _____

Participant number: _____

Please check (√) the appropriate response for the following items:
- ♦ Sex ___ Male ___Female
- ♦ Age _____
- ♦ I speak the following languages at home:
  ___English
  ___French
  ___Other (please specify): _____

Please check (√) the French program(s) in which you have participated:
___ French Immersion
___ French-as-a-Second-Language/Core French
___ French 100 (or beginner-level French at a post-secondary institution)
___ Exchange program to Quebec offered through my school (for ____ months)
___ Exchange program to another Francophone country (for ____ months)
___ Summer Language Bursary Program
___Other (please specify): _____

If you were enrolled in French Immersion, please answer the following questions:

- ♦ How many years were you enrolled in French Immersion?

- ♦ I was enrolled in French Immersion from grade ___ to grade ___

CONTACT WITH THE FRENCH LANGUAGE OUTSIDE OF THE CLASSROOM

*For scaled items, please draw an 'X' on the continuum to indicate how often you do the activity.

♦ How often do you read French newspapers, magazines, or literature that have not been assigned by your teacher?

|⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯|

0%   100%

♦ How often do you watch French movies, television programs, or news broadcasts that have not been assigned by your teacher?

|⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯|

0%   100%

♦ How often do you surf French-language websites that have not been given as part of an assignment by your teacher?

|⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯|

0%   100%

♦ How often do you visit French-language chat rooms?

|⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯⎯|

0%   100%

♦ How much time have you spent in a francophone environment in Canada or in another country?

____ 0 hours – 1 day ____ 1 day – 7 days
____ 8 days – 3 weeks   ____ More than 3 weeks

♦ How much time have you spent living with family and/or close friends who speak French?

____ 0 hours – 1 day ____ 1 day – 7 days
____ 8 days – 3 weeks   ____ More than 3 weeks

♦ If you spent time living with family and/or close friends who speak French, did you speak French with them?

|———————————————————————————————————————|

0%   100%

♦ How much time have you spent living with a host family (in a home-stay program or exchange) who speak French?

___ 0 hours – 1 day ___ 1 day – 7 days
___ 8 days – 3 weeks   ___ More than 3 weeks

♦ If you have spent time living with a host family, did you speak French with them?

|———————————————————————————————————————|

0%   100%

♦ Is there anything you specifically do to improve your French outside of the classroom?
___Yes   ___No

If yes, could you please describe this.

♦ Is there anything else you would like to share about your experiences learning French?

134

<u>Appendix D: The Translation Task</u>

You will hear the researcher read aloud a series of French sentences that deal with some

of Bruno and Marianne's friends and what is going on in their lives. Please provide a

written English translation of these sentences below. If you are unsure of how to translate

a vocabulary item, keep the original French word in the translated sentence.

1. Nathalie adore Paris. Elle **y** est allée pour sa lune de miel.

2. Pierre et sa mère sont très proches. Il **lui** parle au téléphone tous les jours et passe **la**

voir pendant le week-end.

3. Océane montre sa bague de fiançailles à toutes ses amies en **leur** demandant si elles **la**

trouve bien et si elles aimeraient **en** avoir une aussi.

4. Jean a eu une aventure avec son amie Anne-Sophie. Quand il **l'**a vue pour la 2e fois, il

était gêné.

5. Paul et Dominique sortent ensemble depuis un an et prévoient une vie en commun. Ils

y pensent tous les jours.

6. Pour la fête de la Saint-Valentin, les amis de Bruno et Marianne offrent les fleurs à

leurs bien-aimées. Elles **les** remercient en **leur** faisant un baiser.

7. L'amitié joue un très grand rôle dans la vie des amis de Bruno et Marianne. Ils **en**

parlent souvent.

8. Puisque son petit-ami habite en Belgique, Magali **y** va chaque été.

9. « Est-ce que tu **m'**aimes toujours », demande Josette à Philippe. Il répond: «Bien sûr

que je **t'**aime. C'est la raison pour laquelle je **te** fais de jolis cadeaux. »

CHAPTER IV.

A la Recherche des Clitiques Perdus: The Dictogloss as a Measure of the Comprehension of *Y* and *En* by L2 Learners of French

Both research and folk wisdom tell us that the acquisition of the French pronominal system may be one of the greatest challenges second language (L2) learners face. Object clitic pronouns, which occur pre-verbally, are particularly problematic. It may seem surprising that learners would have difficulties with clitics, particularly given that they are ubiquitous in both spoken and written language and have a high communicative value. In the case of classroom learners, clitic forms are both present in instructional materials and the focus of some type of pedagogical intervention. Despite this, I have observed that instructed L2 learners of varying ages and proficiency levels make limited use of object clitics in their oral and written production. When they do, these learners appear to struggle with morphosemantic distinctions (gender, number and person) and word order and verb argument structure. These difficulties are further compounded by competing weak/strong pronominal paradigms which offer an apparent choice between *J'y vais* and *Je vais là* 'I go there', for example. Finally, there is the question of how a single form, like *vous* can carry out multiple pronominal functions as a subject *(Vous allez au cinéma* 'You go to the movies'), a direct object (*Il vous a regardé d'un air méchant* 'He gave you a nasty look'), an indirect object (*Le film, vous a-t-il plu?* 'Did you like the film?'), a reflexive pronoun (*Vous vous êtes lavé le visage* 'You washed your face'), and a stressed/tonic pronoun (*Les enfants pensent à vous* 'The children think of you')? Given the inherent linguistic complexity of clitic forms and their low rates of

production by L2 learners of French, is it possible that clitics also pose difficulties in oral comprehension?

In the present study, a dictogloss task was used to determine to what degree intermediate-level L2 learners of French in a university-setting are able to process and reproduce clitics that they have heard in the input. The dictogloss, also known as grammar dictation, or reconstituted text or cooperative re-telling (Wajnryb, 1990), is a pedagogical task which can double as a research tool. In the dictogloss procedure, L2 learners attempt to reconstruct a written version of a text that has been delivered orally, a process which spurs reflection upon their own language use. Traditionally, researchers have used the dictogloss as a means of studying students' interactions as they work collaboratively in dyads on form-focused, language production tasks (for review, see Fortune, 2005). In this study, rather than using the dictogloss to analyze L2 learner interactions, it functions as a data gathering instrument that permits analysis of how university learners of French receptively process object clitics, with clitics being defined as grammatical features that function as free forms on a syntactic level but are, at the same time, bound on a phonetic level in that they cannot stand on their own in an utterance (Kayne, 1975). This study explores for the potential of the dictogloss to provide insight into learners' interlanguage (IL) representations of the French pronominal system.

The paper begins with a presentation of the distribution of object clitics in Standard French and a summary of research findings on the acquisition of the French pronominal system by a variety of learner populations. This is followed by a description of the participants and of the dictogloss task and the analysis of the dictogloss reconstructions. The analysis indicates that university-level learners of French are far from mastering

object clitic usage: not only in terms of production, but also in terms of comprehension. The paper ends with a discussion of the implications of this research for teachers, learners and other researchers.

Strong Object Pronouns and (Weak) Object Clitics

As can be seen in Table 1, each French pronoun has both a strong and a weak form. The pronominal system also includes indirect *y/à ça*; locative *y/là* and the genitive *en/de ça*. Strong pronouns are placed postverbally, typically placed into the same slots as full determiner phrases (DPs) (Kayne, 1975). In contrast, clitic pronouns are verbal affixes, that is they are bound forms that are unable to stand apart from their verbal host. French object clitics cannot be separated from their verbal host, modified, conjoined or stressed. These forms can undergo liaison/elision and compete with their stressed counterparts (i.e., strong object pronouns) (Kayne, 1975).

Table 4-1. Object Clitics and Strong Object Pronouns in French

Person	Clitic – direct object	Clitic – indirect object	Strong pronouns
I	*me*	*me*	*moi*
II	*te*	*te*	*toi*
III	*le/la*	*lui*	*lui/elle*
IV	*nous*	*nous*	*nous*
V	*vous*	*vous*	*vous*
VI	*les*	*leur*	*eux/elles*

The dictogloss sentences discussed in the current study contain the clitic forms illustrated in the pronoun pairs below. In all of these contexts, the use of an object clitic form in Standard French would is considered more appropriate and felicitous.

a) Indirect object clitics (e.g., *y* vs. *à ça*)

L'avenir...j'**y** pense tous les jours vs. L'avenir...je pense **à ça** tous les jours.

'The future...I think **about it** every day.'

b) Indirect object clitics (e.g., *en* vs. *de ça*)

L'amitié, nous **en** parlons beaucoup vs. nous parlons beaucoup **de ça**.

'Friendship...we talk **about it** a lot.'

c) Locatives (e.g., *y* vs. *là*)

En France, ma famille **y** est allée vs. ma famille est allée **là**.

'France...my family went **there**.'

Contrasting the French and English Pronominalization Systems

The great majority of participants in the current study were native-speakers of English. Given the nature of their linguistic environment, it is worthwhile to formally compare the object pronoun systems in English and French in order to predict possible target-deviant structures that might result from transfer. In English, direct and indirect object pronouns *(to) me, (to) you, (to) him/her, (to) it, (to) us, (to) them* appear in postverbal position, just like their lexical counterparts. French direct and indirect objects are morphemes that must be attached to a verbal host. While it is true that French is considered to be a SVO language, object clitics are placed preverbally in both affirmative utterances and in negative imperative utterances, resulting in an SOV word order. In

contrast, they are placed postverbally in affirmative imperative utterances. French also has a second pronominal system of *pronoms toniques/disjoints* which are commonly referred to as 'strong' or 'stressed' pronouns (*moi, toi, lui/elle, nous, vous, eux*). These strong pronouns behave like lexical noun phrases (NPs) and may be used as objects of prepositions, in coordinated structures, in dislocated/doubled structures and in isolation. For these reasons, the strong pronouns in French distribute similarly to English object pronouns.

As this study deals with L2 learners of French in a Canadian setting, the existence of two competing pronominal systems is particularly relevant. The object clitic system is considered as belonging to the 'Standard' and thus has a preferred status, particularly with regards to what is taught to L2 learners in the classroom setting. That said, however, in various varieties of Canadian French, the strong object pronoun system is frequent, particularly in oral production and informal registers (Thibault, 1983 for Quebec French; Nadasdi, 2000 for Ontario French). Moreover, the tendency on the part of native speakers to use postposed object pronouns is also apparent in '*le français populaire*' in France where Frei (1971, p. 165) notes:

> Le besoin d'invariabilité tend à remplacer petit à petit le type "je le vois"
>
> par un nouveau type dans lequel l'objet est exprimé après le verbe,
>
> conformément à la séquence de la phrase: je vois ça... '*The need for*
>
> *invariability tends to replace little by little the type "I it see" by a new*
>
> *type where the object is expressed after the verb, in accordance with the*
>
> *sequence of the sentence: I see it...*' (My translation).

As Nadasdi (2000) pointed out, the farther one moves away from Standard French, the more strong, postposed pronouns a speaker tends to use. Based upon data from '*le français populaire*', Canadian varieties of French and French-based creoles, he concludes that native speaker usage of strong pronouns is due to a natural, internal evolution. That is to say that there is a natural tendency on the part of speakers to simplify language through the elimination of grammatical complexities. In the case of French object pronominalization, this is achieved by replacing object clitics (which necessitate SOV word order) with strong pronouns which allow for phrasal constituents to be placed in canonical SVO word order.

Thus, despite the fact that object clitic pronouns are the preferred form, L2 learners in the Canadian context are likely exposed to the nonnormative strong object pronoun forms as well. This exposure may not be through explicit pedagogical intervention, but rather from the various sources of French input reported by the post-secondary students in the current study: written materials (newspapers, magazines, books and Internet); oral materials (radio, television and movies); and time spent living in and/or visiting Francophone environments. In addition to this, exposure may occur through forms present in teacher talk, whether it be from a native speaker or a highly-proficient non-native speaker.

There are a number of reasons that would appear to support a hypothesis that university-level L2 learners of French would use both preposed and postposed object pronouns. On one hand, it seems reasonable to predict that the learners would make some use of object clitics as they are likely to have received form-focused instruction and drill-type practice with this grammatical feature. On the other hand, it also seems reasonable to

predict that the learners would make use of strong object pronouns given their natural exposure to them both inside and outside the classroom and the overlap between the French and English pronoun systems, which would facilitate transfer. It is easy to imagine this congruence influencing English learners of French to hypothesize that French object pronouns distribute in a similar way to English object pronouns and to show a preference for these strong, postposed pronouns.

Research on the Acquisition of Pronominalization in French

French clitics have been studied by researchers working with learners in various acquisitional contexts, namely first language (L1) acquisition, L2 acquisition, bilingual first language acquisition and specifically-language impaired (SLI) acquisition. Researchers examining the acquisition of the French pronominal system by monolingual, bilingual and SLI child learners, as well as child and adult L2 learners have employed a wide-variety of methods. Emerging from this diverse body of research are a number of common characteristics in the acquisition of inanimate object clitics, independent of learner type: 1) a delay in the appearance of object clitics, possibility as a function of the complexity of their syntactic calculation (Hamann, Rizzi & Frauenfelder, 1996; Herschensohn, 2004; Kaiser, 1994); 2) a tendency to overgeneralize subject clitics to object clitic contexts (Jakubowicz, 1991; Naiman, 1974; Selinker, Swain & Dumas, 1975); 3) a lack of knowledge of verb argument structure and difficulty using double object clitic constructions productively (Kenemer, 1982; Connors, Nuckle & Greene, 1981); and 4) use of nontargetlike forms such as null pronouns (no pronominal representation), strong pronouns and lexical objects in pronominalization contexts

(Chillier et al, 2001; Hulk, 2000; Paradis, 2004; Schlyter, 1997). Research suggests that the preceding four characteristics could almost be considered as universal, regardless of the acquisitional context. Only in one area does there appear to be acquisition difficulties that only pertain to certain learner populations: word order. Monolingual and bilingual learners of French make virtually no object placement errors in both SOV and SVO word order contexts (Chillier et al, 2001; Jakubowicz, Nash, Rigaut & Gérard, 1998; Jakubowicz & Rigaut, 2000). SOV word order, however, is particularly challenging for L2 learners of varying L1 backgrounds who often go through a phase of nontargetlike, postposed object clitic usage (Herschensohn, 2004; Schlyter 1997; Towell & Hawkins, 1994).

Research into the acquisition of French object clitics has shown that both L1 and L2 child learners know the syntax and distribution of these forms from the time they begin to use them productively. This differs radically from the research findings on older L2 learners, who have been shown to produce a number of nontargetlike forms, often demonstrating a preference for strong pronouns in SVO word order. Although there has been ample research conducted on the production and comprehension of object clitics by child learners (particularly monolingual and bilingual ones), L2 learners (particularly adults) have been studied to a much lesser extent. With regards to L2, much of the early research focused on anecdotal reports of object pronoun usage and focused on the overgeneralization of forms (i.e., subject clitics in lieu of object clitics), transfer and word order/object placement.

One area that has been particularly underrepresented in the L2 object clitic acquisition research is that of oral comprehension or, more precisely, how clitics in

contextualized discourse are processed. Two studies tested the oral comprehension of object clitics by L2 learners using elicited imitation measures. Elicited imitation is a language sampling procedure in which a language learner is asked to repeat an utterance that is presented orally. The stimulus sentences tend to be delivered in a decontextualized manner and without regard for whether the learner actually understands the sentences to be imitated. Naiman's (1974) research involved grade 1 and 2 French Immersion students using elicited imitation. The results from the comprehension task indicated that both direct and indirect lexical objects were more easily processed than their clitic counterparts. Gundel, Stenson and Tarone (1984) used elicited imitation with adult L2 learners of French who made no use of lexical NPs, but frequently deleted objects. The learners who had studied abroad made the greatest target-like use of object clitics. Although admittedly limited in scope, these two studies would suggest that neither child nor adult L2 learners of French are particularly successful at comprehending and reproducing clitics.

The current study proposes to fill a clear gap in the research on the oral comprehension of clitics by L2 learners by examining what university-level learners of French do with object clitics on a dictogloss task and testing the following hypothesis:

(1) On the reconstructed texts of an aurally presented text, students will produce more null objects, strong (i.e., free-standing) pronouns, and lexical NPs than object clitics.

This hypothesis is motivated by the voluminous body of research documenting the types of target-deviant structures learners of French use in pronominalization contexts, regardless of acquisitional setting. Null objects are well-documented in the monolingual French data (Bautier-Castaing, 1977; Chillier et al, 2001; Jakubowicz et al., 1996;

Jakubowicz et al., 1998; Paradis, 2004), as well as in bilingual data (Hulk, 1997; Hulk,

2000; Jakubowicz & Rigaut, 2000; Müller et al., 1999; Paradis, Crago & Genesee, 2003;

Paradis, 2004). Null objects have also been noted in numerous L2 studies (Adiv, 1984;

Bautier-Castaing, 1977; Grondin & White, 1996; Gundel, Stenson & Tarone, 1984;

Gundel & Tarone, 1981; Gundel & Tarone, 1992; Towell & Hawkins, 1994).

Strong pronoun forms have appeared in the oral discourse of monolingual children

(Clark, 1985; Hamann, Rizzi & Frauenfelder, 1996; Hamann et al., 2003; Jakubowicz et

al, 1998; Jakubowicz & Rigaut, 2000). Similar usage has been recorded in the oral

production of bilingual children (Hulk, 2000; Meisel, 1986; Müller, Hulk & Jakubowicz,

1999; Paradis, 2004) and in L2 learners (Adiv, 1984; Granfeldt & Schlyer, 2004;

Herschensohn, 2004; Kenemer, 1982; Schlyter, 1997; Selinker et al, 1975; White, 1996).

Finally, monolingual children have been shown to use lexical objects to a great

extent in clitic permissible contexts (Chillier et al, 2001; Connors & Nuckle, 1986;

Hamann, 2004; Hamann et al., 2002; Hamann et al., 2003; Jakobowicz, 1991;

Jakubowicz & Rigaut, 2000; Jakubowicz et al., 1996; Jakubowicz et al, 1998;

Jakubowicz, Tuller, & Rigaut, 2000; Paradis, 2004). These forms have appeared to a

somewhat lesser extent in the oral production of bilingual children (Hulk, 2000; Kaiser,

1994; Paradis, 2004) and L2 learners (Gundel, Stenson & Tarone, 1984; Naiman, 1974;

Schlyter, 1997).

<div style="text-align:center">Method</div>

Participants

The participants in the current study were 106 students from the overall population enrolled in a 1st-year French course (for intermediate-level learners) at the University of Alberta[1]. Of these 22 were post-immersion students and 84 were post-core French, who had had anywhere from 3-13 years of French instruction in school[2]. Student responses to a background questionnaire revealed that the majority of the participants came from monolingual Anglophone backgrounds (77.4%). The other 22.6% of students came from homes where one or more other languages, in addition to English, were spoken to varying degrees. Of these homes where other languages were spoken, 10.4% included Romance languages. The dyads were composed of more females than males (71.7% and 28.3% respectively) and the participants ranged in age from 18-45 years, although nearly 90% of the participants fell into the 18-25 year-old category. Sixty-eight percent of the dyad members reported never or rarely using the spoken French media outside of the classroom. Of students having visited Francophone environments, 49.0% noted having stayed with a Francophone family or French-speaking friends and 19.6% having lived with a host family. The students who had resided with a French-speaking family indicated, for the most part, making frequent use of French in their interactions. Finally, 52.8% of students reported that they were making an effort outside of regularly scheduled class time to improve their French.

Throughout their schooling, French immersion students take a variety of content-matter courses through the medium of the French language, which accounts for anywhere from 50%-100% of total instruction time depending on the program type and grade level.

As such, the French language serves as a means of communication and the students learn subject matter via the French language. "Immersion education thus provides a clear example of an instructional context where focus on meaningful content leads to the development of overall communicative ability, but with linguistic gaps in terms of accuracy" (Lyster, 2004, p. 322). On the other hand, core French instruction typically consists of 30-40 minute classes, during which the majority of instruction focused on formal language study as opposed to the development of communicative ability. Due to the heterogeneous nature of the population of students enrolled in French 150 (post-core and post-FI students), all students wrote a placement test at the beginning of the academic year. Based on their performance, students were assigned to either weak-, intermediate-, or advanced-level sections of the course. Regardless of the classification of the section in which they were enrolled, all students were required to follow the same program (with some minor adjustments to grammatical and cultural content) and to write similar midterm and final exams. For each time-block of courses, assignment of students was done in such a way that the weak sections had the lowest number of enrollments, followed by the intermediate sections and finally the advanced sections with the highest number of enrollments. As such, it was not possible to have an equal number of participants from each of the section levels. A total of nine classes volunteered to participate in the current study: 3 weak-, 3 intermediate-, and 3 advanced-level sections, for a total of 32 weak-, 30 intermediate- and 44 advanced-level students.

Dictogloss as a Research Instrument

The dictogloss (Wajnryb, 1990) is a form-focused activity that allows students to reflect upon their own L2 written output. According to Fortune (2005), the dictogloss is likely the most highly researched collaborative written output task. Traditionally, researchers have used the dictogloss as a means of studying students' interactions (in dyads) as they work collaboratively on form-focused, language production tasks, in this case text reconstruction. After being exposed to the oral text, the dyads are recorded as they work together to reconstruct the passage. The data is transcribed and coded for language-related episodes, a process that facilitates the analysis of forms which are the focus of learners' attention and which are typically negotiated. According to Kowal and Swain (1994), research on the dictogloss appears to indicate that it enhances the L2 learning experience by 1) helping learners to notice the gap in their existing knowledge; 2) increasing learner awareness of the relationships between the form, function and meaning of lexical items; and 3) providing peer and teacher feedback on L2 production.

During a dictogloss, learners are initially read a short, dense text at a normal rate of speech. This original text is created with the goal of practicing specific grammatical constructions. During the first reading, there are usually pauses between each sentence to allow students adequate time to make jot-notes, which often include familiar words and phrases, and ultimately facilitate the text reconstruction process. Following a second reading of the text, learners work in pairs or small groups in order to recreate the original text from their shared resources. Learners are instructed to reconstruct the text in such a way that it reflects that information contained in the original text and follows the standard conventions of the French language to the best of their ability. The various reconstructed

versions of the text are analyzed and compared in the whole-class setting. According to

Wajnryb (1990) "Through active learner involvement students come to confront their

own strengths and weaknesses. In doing so, they find out what they need to know" (10).

In order to successfully complete a dictogloss, the L2 learner must be able to (1)

process the input; (2) hold the forms in memory; (3) generate, discuss, and negotiate the

utterances that will form the reconstructed text; and (4) create a written version of the

stimulus sentences. As the members of the dyad work to co-construct the text, there is a

tendency to focus upon forms and to negotiate them. Research has shown that learners'

use of metalanguage is essential to this process. This talking about language leads to a

continued scaffolding process until final agreement is reached regarding which forms to

use (Swain & Lapkin, 2000; 2001).

Procedure

The Marianne and Bruno Dictogloss Task.

A modified dictogloss technique was used in this study[3]. The stimulus text included

at least one token of each the five types of clitic pronouns and contained specific

vocabulary items that the participants had encountered during a unit on relationships. The

dictogloss was based upon Bruno and Marianne, the two main characters from Chapter

10 (*Elle et lui*) of the French 150 textbook: *Panorama 2*. At the beginning of the activity,

participants were told to focus on listening to the text so that they could eventually

reconstruct it with a partner in the most faithful way that their recollections permitted. In

fact, participants were told that an ideal reconstruction would involve the exact same

number of sentences as in the original. They were asked not to take any notes during the

readings of the text, which would be delivered in two parts due to its length[4]. The researcher then read the first part of the passage three times, in immediate succession, at a normal rate of speech. This initial passage consisted of six sentences which contained a total of 6 weak pronominal forms. Following the presentation of the first part of the listening passage, the pre-assigned dyads had approximately 10 minutes to create their own version. The exact same process was repeated for the second part of the passage which consisted of 5 sentences and contained a total of 8 weak pronominal forms.

It is important to understand that the modified dictogloss technique used in this research had very different goals than those of the typical dictogloss used by a classroom teacher as a pedagogical activity. In standard dictogloss, there is often some type of warm-up activity that anticipates or serves as preparation for the content of the dictogloss, a topic about which learners preferably have background knowledge and which is of interest to them. Moreover, vocabulary that is perceived to be 'difficult' or 'unfamiliar' to the learners tends to be pre-taught. According to Jacobs and Small (2003), the teacher may even go so far as to preface the dictogloss with a class discussion on the text type, "e.g. narrative, procedure, or explanation, and the purpose, organizational structure, and the language features of that text type" (p. 1). When using the dictogloss as a pedagogical tool, teachers do not want students to be able to record the text word-for-word. However, by using a 4-5 sentence or idea unit text it would appear that the goal is to avoid overloading the students' working memory. In fact, students are allowed to take notes, which tend to be in point form. As the groups reconstruct these point-form notes into complete sentences, it is important for students to retain the form and meaning of the original text, but the goal is by no means to re-create an exact copy of the original. In an

elaboration dictogloss, for example, students are even encouraged to improve upon the original text (Airey, 2002).

As the goal of this research was to examine L2 learners' of French ability to perceive, process, and re-produce some sort of direct and indirect object representation (whether this be in the form of clitic pronouns, strong pronouns/*ça* or lexical NPs), this necessitated the elimination of certain elements inherent to the standard dictogloss technique that actually facilitate the process. Although the number of times the text was delivered orally was increased (from two readings to three), the students were also prohibited from taking any notes. The rationale for doing this was that if the participants were able to take notes during the listening phase of the task that correct reproduction of the stimulus sentences during the collaborative phase would not necessarily indicate true comprehension of the target linguistic structure (object clitic pronouns). Without any notes for reference, however, correct reproduction of the target sentences would not only involve actual language processing, but would also tap into the participants' current IL systems. This necessitated the creation of stimulus sentences that were not so short that that correct written reproduction could be achieved through strict rote memorization without a need for processing the target morphosyntactic structures.

Another way in which the modified dictogloss technique used in this research differed from the standard dictogloss procedure was in the insistence upon an ideal recreation of the text with the same number of sentences as in the original. In fact, the task instructions read by the researcher explained that the dictogloss would be presented in two parts and the exact number of sentences in each part, six and five sentences respectively. The need for the students to use the exact same number of sentences in their

recreations of the dictogloss was not simply to facilitate analysis and comparison among dyads. It was rather based upon the inherent nature of object clitic pronouns which are, as has been previously shown, bound to a verbal host.

<u>Analysis</u>

The greatest shortcoming in the body of research on the acquisition of French pronominalization has to do with a lack of systematicity in delineating the contexts in which the variable could occur. In order to identify the range of forms produced by learners of French it is essential to examine learner-generated discourse and to identify each context where object pronominalization would be permissible. Rather than doing this, some researchers have simply reported on the relative frequencies of object clitic forms and null objects. The current study controlled for pronominalization contexts and thus identified all target-like object clitic forms and target-deviant forms used in conjunction with transitive verbs produced by the dyads. Target-deviant forms included clitic omissions, lexical NPs and the strong pronouns (such as *ça*, *à ça* and the locative *là*).

The re-written versions of the dictogloss texts produced by the students were arranged chronologically according to dyad numbers prior to completion of a manual analysis. For coding purposes, the re-written texts were divided into fourteen sentences or clauses, each of which contained one targeted clitic form. One sentence or clause was coded across all dyads before analysis of another one was undertaken. In examining the dictogloss data for each of the fourteen target contexts, the first stage of the analysis was to identify all occurrences of verbs (both tensed and untensed). The researcher then 'matched' each individual verb to its counterpart in the stimulus dictogloss text and

coded for the type of target-like (= 1) or target-deviant form used to represent the

argument (argument omission = 0, equivalent strong pronoun = 2, equivalent lexical NP

=3, wrong clitic = 4, wrong strong pronoun = 5, wrong lexical NP =6, wrong 'other' = 7,

no equivalent sentence = 8). Instances where there was no 'matching' verb in the

reconstructed text were coded as "No equivalent sentence in the student version of the

dictogloss." There were also a minimal number of occurrences where students used an

NP having similar meaning to the verb in the original text, as is shown in Example 3),

which were also quantified for illustrative purposes: 3) '...*et demander leur opinion de*

cet homme' '...and ask their opinion of this man' instead of the target sentence '... *et leur*

demander ce qu'elles en pensaient 'and ask what they thought of it.' One particular

sentence in the original text, "*Bruno en était ravi.*', also caused difficulties in terms of

students' ability to analyze it grammatically and to successfully segment the individual

constituents. The forms produced as the result of these auditory perception difficulties,

although diverse, were coded as a single category of 'other' nontargetlike forms.

Frequencies and percentages were subsequently calculated for the target-like, as well as

the variety of target-deviant, forms used in each of the fourteen pronominalization

contexts.

The coding system (0-8) representing the categories of forms used by the dyads in

pronominalization contexts in their own dictogloss texts was only a starting point for the

analysis of the data. A secondary analysis, also carried manually, involved identifying the

range of nontargetlike forms represented by coding categories 4, 5, 6 and 7 and

subsequently quantifying them. For example, in the case of the dictogloss sentence

[Bruno] n'a pas pu s'empêcher d'en parler, both *[Bruno] n'a pas pu s'empêcher de lui*

parler and **[Bruno] n'a pas pu s'empêcher de la parler* were assigned to coding category 4 (wrong clitic). The results of the secondary analysis are presented in the following section.

Results

Although the dictogloss text contains six distinct direct and indirect object forms (namely *le, l', lui, leur, y* and *en*), the discussion here focuses on *y* and *en*. The decision was made for a number of reasons. First and foremost, indirect object clitics (especially inanimate ones) have been almost categorically ignored in the previous L2 research. Secondly, *y* and *en* are syncretized forms (that is to say single forms which carry out multiple linguistic functions), which permits a decision as to whether a perceptually nonsalient form is difficult to process, regardless of function. For example, one might wonder if locative *y* and indirect *y*, or partitive *en* and indirect *en*, are equally difficult for L2 learners to understand and reproduce. A third justification for the target-form choice comes from previous research on the acquisition of object pronominalization by monolingual child learners in Switzerland. Hamann, Rizzi and Frauenfelder (1996) found that, beginning at the age of two and a half, object clitics began to appear little by little in the speech of the children: first *le, me*, and *y*, which were followed by *te, se, les* and *en*. If one were to interpret this data as indicating a potential acquisition order for object clitics, it would appear that *y* is early acquired while *en* is late acquired. For these reasons, *y* and *en* seem like ideal candidates for comparison.

The Clitic *Y*

The clitic *y* is interesting in the sense that its status is rather ambiguous in a cross-section of grammars. According to Sandfeld (1965), this clitic is a pronominal adverb. For Pinchon (1972), *y* is an adverbial pronoun. For the purpose of this study, I am of a similar mind to Dubois (1965) and will accordingly classify *y* as a neuter proform. According to Dubois (p. 137), the segments *en* and *y* are substitutes of the same type as other personal pronouns because they replace nominal clauses that are either the expansion of a verb or the expansion of a noun. There are two types of strong pronouns that alternate with *y* to carry out its indirect object function. Here are the clitic and the post-posed variants from the dictogloss stimulus text:

(4) *Bruno n'arrêtait pas d'y penser.* 'Bruno didn't stop thinking about it.' (clitic)

(5) *Bruno y allait tous les jours après le travail pour prendre une bière.* 'Bruno went there every day after work for a beer.' (clitic)

(6) *Bruno n'arrêtait pas de penser à ça.* 'Bruno didn't stop thinking about   it.' (strong)

(7) *Bruno allait là tous les jours après le travail pour prendre une bière.* 'Bruno went there every day after work for a beer.' (strong)

In these structures, *ça* and *là* alternate with *y* to indicate the indirect argument of the verb. But the question remains as to whether students learning French in the university setting use additional forms to fulfill the indirect object function in association with the verbs *aller* (to go) and *penser* (to think). In the following section, the stimulus sentences are not sequenced chronologically as they appear in the dictogloss, but rather the examples are

sequenced according to individual clitic form and function: locative *y*, indirect *y*, indirect

en and partitive *en*.

Dictogloss sentence: '*Bruno y allait tous les jours après le travail pour prendre une*

bière.'

This was the second sentence in the dictogloss text. Here are the types of sentences

most frequently produced by the dyads during the dictogloss reconstruction, which

account for 86.4% of total student responses:

(8) *Bruno y allait tous les jours...* (56.7%) 'Bruno went there every day...'

(9) *Bruno Ø allait tous les jours...* (14.6%) 'Bruno Ø went every day...'

(10) *Bruno allait au bar tous les jours...* (9.3%) 'Bruno went to the bar every

day...'

(11) *Bruno allait là tous les jours...* (5.8%) 'Bruno went there every day...'

The types of forms supplied by the students in the locative pronominalization context

showed the exact range of targetlike and non-targetlike forms that one would predict: the

targeted locative *y*, as in Example (8), object deletion, as in Example (9), a lexical NP, as

in Example (10) and the strong, postposed *là*, as in Example (11). The types of object

pronominalization used by the students directly contradicts Hypothesis 1 whereby

students would make greater use of null objects, strong (i.e., free-standing) pronouns, and

lexical NPs than object clitics on the reconstructed texts from the dictogloss activity. This

preference for the locative clitic form in conjunction with the verb *aller* 'to go' could

possibly be attributed to a frequency effect, which has contributed to the learning of a

specific sequence or chunk of language, in this case *J'y vais* 'I go there'. It seems that

certain students have made such a strong association between locative *y* and the verb

aller that they even succeed in using this form with other subject pronouns (like the third person singular) and in other tenses (like *l'imparfait*).

Dictogloss Sentence: *'Bruno n'arrêtait pas d'y penser.'*

The second token of *y* occurs in the ninth sentence of the dictogloss. This time indirect *y* alternates with a pronominal object of the type *à X*. The following examples illustrate the most commonly recorded sentences (representing 87.3% of responses) in the student version of the dictogloss text for the target sentence.

(12) No equivalent sentence in the student version of the dictogloss. (22.3%)

(13) Bruno n'arrêtait pas d'y penser (18.5%) 'Bruno didn't stop thinking about it.'

(14) *Bruno n'arrêtait pas de **lui** penser (15.3%) 'Bruno didn't stop thinking about him/her.'

(15) Bruno n'arrêtait pas de penser **à elle**. (7.6%) 'Bruno didn't stop thinking about her.'

(16) *Bruno n'arrêtait pas de penser **d'elle**. (6.4%) 'Bruno didn't stop thinking of her.'

(17) *Bruno n'arrêtait pas **de la** penser. (5.1%) 'Bruno didn't stop thinking about her – DO.'

(18) Bruno n'arrêtait pas de Ø penser. (5.1%) 'Bruno didn't stop thinking.'

(19) Bruno n'arrêtait pas de penser **à lui**. (3.8%) Bruno didn't stop thinking about him.'

(20) Bruno n'arrêtait pas de penser **de Marianne**. (3.2%) 'Bruno didn't stop thinking of Marianne.'

It is noteworthy that nearly one-quarter of the dyads either did not recall or did not attempt to reproduce the ninth sentence of the dictogloss. This may be a result of the placement of this particular sentence in the second portion of the dictogloss. Some students with lower L2 proficiency may not have been able to recall all sentences equally well. Based upon research on memory in L2, it is most likely that the beginning and concluding sentences would have been most salient for the learners, not the ones in the middle (Ervin-Tripp, 1974). That being said, the most commonly provided form in this particular context was the indirect clitic *y*, identical to what the students had heard in the original dictogloss passage but only 18.5% of the responses. In Examples (14) to (20), most of the groups misunderstood the referent *y*. For the students, Bruno was not thinking of the moment where Marianne waved goodbye to him. Rather, it appears that they interpreted the indirect clitic as meaning that Bruno was thinking of Marianne. Students portrayed this in their dictogloss as *lui penser, penser à elle, penser d'elle, la penser, penser à lui,* and *penser de Marianne*. Sometimes students even wrote of Bruno thinking without even using an indirect object complement. The types of incorrect forms supplied by the students in this specific pronominalization context exemplified the exact range of forms presented in the original hypothesis: object deletion, as in Example (18), lexical NPs, as in Example (20) and strong, postposted forms, as in Examples (15), (16) and (19).

From the student reconstructions, it is clear that the verb *penser à* used in combination with an indirect object referring to an abstract concept posed great difficulties. The question arises as to why the students were much more successful in representing locative *y* than indirect *y*. An initial explanation that comes to mind is that of

verb frequency. If *aller* were an extremely high frequency verb and *penser* were a low

frequency verb, the solution would appear to be simple: students should be able to

perform better on arguments associated with a higher frequency verb. However, both

aller and *penser* are classified as high frequency verbs, although *aller* is the much more

frequent of the two[5]. In fact, their frequencies are strikingly different. According to

Gougenheim (1964) *aller* is ranked as the 34th most frequent word in the French language

while *penser* is ranked 154th. Solely on the basis of a frequency effect, locative *y* should

be easier for L2 learners to process. In addition to frequency, another explanation based

on the multiplicity of arguments associated with each verb can be proposed. The verb

aller has two possible arguments: *aller à* + location (locative structure) and *aller à* +

person (indirect structure). The second construction has the meaning of 'to fit' or 'to suit'

and is used to describe a person's attire, as can been seen in Example (21):

> (21) *Cette robe vous va à la perfection.* 'This dress fits you perfectly.'

This particular structure is much less frequent than the locative *y aller* structure. More

importantly, it was not treated in the pedagogical materials in the course in which the

students in the current study were registered. It could be suggested that although the verb

aller takes two different types of arguments, that it may even be represented as a single

argument verb in the IL of some of the learners in the current study.

The verb *penser*, on the other hand, has a number of different types of arguments,

all of which were treated in the pedagogical materials to which the learners in this study

were exposed. Students were explicitly taught that this verb can be used in conjunction

with either the preposition *à* or with the preposition *de*. The structure *penser à* followed

by the name of an inanimate object must be replaced by the indirect object clitic *y*. But

penser à followed by an animate object necessitates the use a tonic pronoun. And in the case of *penser de*, there are still two more possibilities: the clitic *en* for non-human objects and the preposition *de* in combination with a tonic pronoun for human objects. So we can see that these learners had been exposed to more arguments (and associated object types) for the verb *penser* than for the verb *aller*. It is noteworthy that many of the forms used by the students in Examples (14) to (20) were, in fact, grammatically correct. That is to say that they were viable pronominal representations that could be used in conjunction with the verb *penser*. However, the majority of them did not represent the actual antecedent in the dictogloss text. Perhaps they were behaving like young monolingual French children have been shown to do on reading comprehension tasks, where they associate the argument of the verb to the most accessible referent (Ehrlich & Remond, 1997).

The types of forms supplied by the students in the two pronominalization contexts associated with locative *y* and indirect *y* showed the exact range of targetlike and non-targetlike forms hypothesized. As was predicted, the students made minimal use of indirect *y* in their recreation of the target sentence '*Bruno n'arrêtait pas d'y penser'*. However, students provided the locative clitic *y* in 56.7% of their recreations of the target sentence '*Bruno y allait tous les jours après le travail pour prendre une bière'*, thus directly contradicting the hypothesis whereby greater use of null objects, strong (i.e., free-standing) pronouns, and lexical NPs would be made in student versions of the dictogloss. Their targetlike clitic usage was attributed to verb frequency and chunk learning.

The Clitic *En*

En has a number of meanings and functions. It tends to replace a noun or a NP that

is preceded by the preposition *de*, regardless of the actual function of the noun or NP in

the sentence. The main functions of *en*, to which an L2 learner might have been exposed,

are as follows: a) partitive *en*, which serves to designate part of a whole as in *Voulez-vous*

un morceau de gâteau? Oui, j'en veux. 'Do you want a piece of cake? Yes, I want

some.'; b) *en* as a referential complement: *La vieille dame parle à tous ses amis de ses*

malheurs. → *La vieille dame en parle à tous ses amis*. 'The old woman talks to all of her

friends about her misfortunes. → The old woman talks about them to all of her friends.';

c) *en* as a determinative complement: *Les enfants voient le siège du vélo.* →*Les enfants*

en voient le siège. 'The children see the bicycle's seat. → The children see the seat of it;

d) *en* as a complement of place: *Elle revient de la France.* → *Elle en revient*. 'She comes

back from France. → She comes back from there.'; e) *en* as an idiomatic complement of

place in conjunction with reflexive verbs: *Il s'en va*. 'He goes away for good.'; f) *en* as a

causal complement: *Elle a fait une régime et elle en est redevenu mince*. 'She went on a

diet and she became slim again from it.'; and g) *en* as a Gallicism: *en vouloir à quelqu'un*

'to have a grudge against someone.' Despite the multiple uses of *en* in the French

language that have been illustrated above, the following study focuses on uses a) and b).

Dictogloss Sentence: '*... et leur demander ce qu'elles en pensaient.*'

The first target sentence involving the clitic *en* (sentence 10) is illustrated in its

indirect object function. When *en* is carrying out this function, it corresponds to a

prepositional clause of the *de* + *PC* type. According to Sanfeld (1965, p. 142) the clitic

en refers to an action or to a fact and corresponds to the strong form *de cela*. Examples of the expected uses of indirect *en* are presented Examples (22) and (23):

(22) ... *et leur demander ce qu'elles en pensaient*. 'And ask them what they thought about it.'

(23) ...*et leur demander ce qu'elles pensaient de cela*. 'And ask them what they thought about it.'

As has already been shown, the students only used the correct clitic in association with the verb *penser à* in 18.5% of the target contexts. Perhaps they were more successful at using the correct clitic with the prepositional verb *penser de*, which appears in the tenth and second-to-last sentence of the dictogloss. Examples (24) to (29) show the most common student responses, which represent 92.3% of overall responses.

(24) No equivalent sentence in the student version of the dictogloss. (46.5%)

(25) ...et demander ce qu'elles Ø pensaient. (26.8%) 'And ask what they Ø thought.'

(26) ...et demander **leur opinion de cet homme**. (7.6%) 'And ask their opinion of this man.'

(27) ...et demander ce qu'elles pensaient **de lui**. (5.1%) 'And ask what they thought about him.'

(28) ...et demander ce qu'elles **en** pensaient. (3.8%) 'And ask what they thought about it.'

(29) ...et demander ce qu'elles **y** pensaient. (2.5%) 'And ask what they thought of it.'

In Examples (24) to (29), the prepositional verb *penser de* is even more difficult for

students to master than is its counterpart *penser à*. Only 3.8% of the students used the

targeted form *en* in this context. What is particularly surprising is that there was no

equivalent sentence in almost half of the student dictoglosses. Given that it is the second-

to-last sentence, one might have predicted that its placement would make it more salient

than sentence 9 was, for example. A closer examination of the reconstructed texts shows

that the most common response exemplified a total absence of pronominalization (in

26.8% of cases), as can be seen in Example (25). Why would students delete this

particular argument in association with verb *penser*? One could imagine these students

having had frequent exposure to the questions *"Qu'est-ce que tu en penses?"* or *"Qu'est-*

ce que vous en pensez?" or even to their inverted forms *"Qu'en penses-tu?"* or *"Qu'en*

pensez-vous?" In contrast, however, there was likely frequent exposure to *penser que* +

indicative constructions in a variety of tenses, used without an indirect object. This is a

good example of a set of constructions used in conjunction with a single verb where there

is a partial mismatch between French and English. In English, neither of the two

aforementioned constructions requires overt object pronominalization. In English, both

"What do you think?" and *"What do you think about it/of it?"* are valid questions that

could be posed in reference to a specific event or situation. In French, however, this type

of question necessitates the use of overt indirect object pronoun forms. It is possible that

the high deletion rate for this target sentence, as is shown in Example (25), is more likely

attributable to L1 transfer.

Another observation about the students' re-creations of the tenth sentence of the

dictogloss is that although students did exhibit all four of the most common types of

targetlike and nontargetlike forms favored by L2 learners of French in obligatory

pronominalization contexts in free production, their form choice often did not refer to the

correct referent. While students did use lexical NPS and strong pronouns in their

reconstructions of the dictogloss, as can be seen in Examples (26) and (27), the

anticipated strong pronoun, *de cela* or *de ça*, was noticeably absent from the data. As was

hypothesized, some of the student-generated representations of this sentence show

difficulties with the argument structure associated with the verb *penser*, as can be seen in

the lexical NP in Example (26) and the *de* + tonic pronoun combination in Example (27).

Once again, animate objects are being used in inanimate object contexts. One possible

explanation is that the human actors in this cohesive text may simply be more salient

referents for the L2 learners than actions, facts or events. Another possible explanation

has to do with memory. The dictogloss task clearly carries a high cognitive load and

requires the listener to process a large amount of information at once. The text used in

this task was constructed for research purposes and is arguably not a typical real-world

listening text that is characterized by redundancies. In the case of this particular sentence,

the listeners may not have perceived *en* as adding a lot of meaning to the target-sentence

and, for this reason, may not have allocated precious attentional resources to processing it

and holding it in memory.

Dictogloss sentence: '*[Bruno] n'a pas pu s'empêcher d'en parler.*'

A second example of the usage of the clitic *en* occurs in the ninth sentence '*[Bruno]*

n'a pas pu s'empêcher d'en parler.' It is interesting to compare this example with the

previous one to determine if these L2 learners of French only had difficulty with the clitic

en when it was used in combination with the verb *penser* or if this form was difficult for these learners to use in general. The following examples account for 97.5% of student responses.

(30) No equivalent sentence in the student version of the dictogloss. (66.9%)

(31) [Bruno] n'a pas pu s'empêcher de **lui** parler. (12.1%) '[Bruno] could not stop himself from talking to him/to her.'

(32) [Bruno] n'a pas pu s'empêcher de parler **d'elle**. (4.5%) '[Bruno] could not stop himself from talking about her.'

(33) [Bruno] n'a pas pu s'empêcher d'**en** parler. (3.8%) '[Bruno] could not stop himself from talking about it.'

(34) *[Bruno] n'a pas pu s'empêcher de **la** parler (3.8%) '[Bruno] could not stop himself from talking her –DIRECT OBJECT- talking.'

(35) [Bruno] n'a pas pu s'empêcher de parler **de Marianne**. (2.5%) 'Bruno could not stop himself from talking about Marianne.'

(36) [Bruno] n'a pas pu s'empêcher de Ø parler. (1.3%) '[Bruno] could not stop himself from Ø talking.'

(37) *[Bruno] n'a pas pu s'empêcher d'**elle** parler. (1.3%) '[Bruno] could not stop himself from her –SUBJECT OR TONIC- talking.'

(38) [Bruno] n'a pas pu s'empêcher de parler **à elle**. (1.3%) '[Bruno] could not stop himself from talking to her.'

Perhaps what is most remarkable about the students' reproductions of the second clause of the ninth sentence, in addition to 66.9% of reconstructed texts having no such sentence, is the clear preference for animate indirect objects. Notice the usage of animate

female object forms in Examples (31), (32), (34), (35), (37) and (38). Such a strong

preference for feminine forms, appearing to refer to Marianne as the only named female

character in the dictogloss, is striking. This preference for feminine forms, combined with

the relative absence of this clause from the student versions of the dictogloss, leads to the

suggestion that very few of the students actively processed the clitic *en* in this instance

and were thus incapable of correctly matching it to its referent. In the context of this

particular sentence, it would appear that the listeners did not perceive *en* as having a

particularly high communicative value (i.e., as making an important contribution to its

overall meaning).

Dictogloss sentence: '*Bruno* **en** *était ravi.*'

A third example of *en* usage occurred in the eighth sentence of the dictogloss

'*Bruno* **en** *était ravi.*' Student-produced sentences, accounting for 97.4% of the data, are

shown in Examples (39) through (42).

(39) No equivalent sentence in the student version of the dictogloss (48.4%)

(40) Bruno Ø était ravi. (35.0%) 'Bruno Ø was delighted.'

(41) Bruno **en** était ravi. (7.6%) 'Bruno was delighted with it.'

(42) Bruno + wrong interpretation of '*en était ravi*'. (6.4%)

Once again, a very high percentage (almost half to be precise) of student versions of the

dictogloss had no equivalent sentence. There was a 35.0% object deletion rate, while

students used the correct target form in a mere 7.6% of their recreations. Most interesting,

however, are the 6.4% of instances where the dyads had trouble completing a

grammatical analysis of '*en était ravi*'. The representations of this utterance, as co-

constructed by the dyads, are extremely revealing in terms of perceptual difficulties L2

learners of French experience with object clitics. Examples of what students appeared to

have perceived are shown in (43) through (49).

(43) Bruno **on** était arrivée. 'Bruno one had arrived-FEM.'

(44) *Il était **renvie**. 'He was LI.'

(45)*Il était **enravie**. 'He was LI.'

(46) Bruno est rêvé. 'Bruno is dreamed of.'

(47) Bruno est à vie. 'Bruno is living/alive.'

(48) *Bruno était ravé. 'Bruno was LI.'

(49) Bruno se ravi. 'Bruno delights.'

In order to successfully complete a dictogloss, the L2 learner must be able to (1)

process the input (auditory-phonetic, phonemic, syllabic, lexical, syntactic, semantic,

propositional, pragmatic and interpretive levels (Field, 2003) ; (2) hold the forms in

memory; (3) generate the utterances that will form the reconstructed text; and (4) create a

written version of the stimulus sentences. For the target sentence "*Bruno* **en** *était ravi*"

there appears to be a communication breakdown at the phonemic level. The individual

examples indicate that this breakdown has occurred for a variety of reasons. In Example

(43), one dyad had trouble distinguishing between two of the nasalized vowels in French:

on [ɔ̃] open-mid, back and rounded and *en* [ɑ̃] open, front and unrounded. Perhaps the

fact that these vowels were nasalized made the difference in horizontal tongue position

and rounded/not-rounded lips less acoustically salient for these learners.

For Examples (44) to (49), note the presence of general errors that reveal auditory

perception difficulties indicating an inability to correctly segment the speech stream,

perhaps because the French expression '*être ravi de quelque chose*' was unfamiliar to some of these L2 learners. It is necessary to point out, however, that these dyads with auditory perception difficulties fall into two categories: those who heard the [$\tilde{\alpha}$] sound, as in Examples (44) and (45) and those who did not, as in Examples (46) through (49). Earlier reference was made to a tendency of people listening to French to use a syllabically-based segmentation strategy to parse the speech stream. A closer look at Examples (43) through (49) leads to the questioning of whether or not these learners were in fact using such a segmentation strategy. Notice that none of these examples have the same number of syllables as the target sentence. Moreover, the learners' actual segmentation tends to fall into nonsensical units.

It is noteworthy that some of these learners' IL systems seem to be closer to normative French than others. Example (49) '*Bruno se ravi*' is not as deviant as some of the other expressions provided by the students. There is actually an intransitive French verb *ravir* 'to delight'. It is not, however, reflexive (note its reflexive usage in this example). Nor is it correctly conjugated in the *imparfait*, to match the tense of the original dictogloss that was read by the researcher.

The target sentence '*Bruno en était ravi*' appeared to be particularly difficult for the listeners to process, with only 7.6% of the dyads successfully reproducing the clitic form in their versions of the dictogloss. Some of the hypothesized forms, such as lexical NPs and the strong, postposed pronouns *de ça* or *de cela* were notably absent from the reconstructed versions of the text. Given the problems many dyads had segmenting this expression, it is likely that it was unfamiliar to many of them (see Examples (43) to (49) for student interpretations). There is also the possibility that their ability to recall this

sentence was negatively impacted upon by the two highly cognitively demanding

sentences that followed in the original dictogloss text that they heard.

<u>Dictogloss sentence: '*En effet, il en buvait une quand elle a attiré son attention.*'</u>

A fourth occurrence of *en*, found in the third sentence of the dictogloss, will now be

examined. This time, students were exposed to partitive *en* in the sentence: '*En effet, il en*

buvait une quand elle a attiré son attention.' In this instance, the *en* does not function as

an indirect object, but rather as a quantified direct object. The clitic *en* corresponds to a

nominal clause preceded by the determinant partitive *de*. In devising the dictogloss, one

of the initial questions was whether or not students would have less difficulty with the

partitive *en* compared to *en* functioning as an indirect object because partitive *en* is

typically introduced at a much earlier point in the French L2 curriculum. The following

examples account for 95.8% of student responses.

(50) ...il buvait **une bière**... (41.0%) '...he was drinking a beer...'

(51) No equivalent sentence in the student version of the dictogloss (35.7%)

(52) ... il **en** buvait une... (14.0%) '...he was drinking one...'

(53) **Après une bière**... (3.8%) 'After a beer...'

(54) ...il Ø buvait... (1.3%) '...he Ø was drinking...'

In 41.0% of instances, the students preferred not to replace the quantified direct object

with *en*, using a lexical NP instead. In 35.7% of cases, there was no equivalent sentence

in the students' versions of the dictogloss. However, in a mere 14.0% of cases, the

students reproduced the clitic *en*, just as it had appeared in the passage to which they had

listened. In 1.3% of instances, the students used the verb *boire* (to drink) without a

complement. It is noteworthy, however, that the participants in the current study seemed to have a better mastery of *en* partitive than of indirect *en*. That more dyads were able to use partitive *en* than were able to use indirect *en* is obviously not attributable to L1 transfer. In fact, English does not make a difference between countable and non-countable quantities in the same way French does. For example, the French *Il y a du coca*, could be rendered in English as either '*There is cola*' or '*There is some cola.*' It it also interesting to compare how quantities in imperatives are used in English and French. In English you can say "Buy a loaf of bread! → Buy one! But in French, you cannot say *Achète un pain!* → **Achète un!* In French, it would be correct to use a partitive in conjunction with a precise quantity and say *Achètes-en-un!* Thus it appears that greater success in using partitive *en*, as opposed to indirect *en*, cannot be contributed to transfer phenomenon.

Perhaps greater usage of partitive *en* has to do with a combination of two factors: the inherent nature of the verb *boire* 'to drink' and referent accessibility. Firstly, *boire* is an extremely frequent word, ranked 423 out of the 1063 most frequently used words in the French language (Gougenheim, 1964). Secondly, and by nature, *boire* does not have a plethora of possible types of referents. *Boire* is used in conjunction with an inanimate, (quantifiable) object, for example *Le lait/Du lait? J'en bois.* '*Milk? I drink it/some.*' By the time the students heard the third sentence of the dictogloss, where reference was made to drinking a beer, they had not been exposed to very many referents. It would appear that the most salient referents up to this point in the text were Bruno, Marianne and beer. Even if they were not processing the text with the same ease that a native-speaker would, it seems reasonable to assume that the students would only consider

inanimate referents in association with this verb. This is completely different from other target sentences containing *en*, particularly the ones with *parler* and *penser*. Taking into account possible argument structures for *parler* (*parler de quelque chose*; *parler de quelqu'un*; *parler à quelqu'un*) and for *penser* (*penser de quelque chose*; *penser de quelqu'un*; *penser à quelque chose*; *penser à quelqu'un*) one can see how, for students who were not necessarily processing preverbal object pronouns, that the list of possible referents in the original dictogloss text would be quite large. And from this list of referents, more nontargetlike choices were attributed to choosing an animate object, as opposed to an animate one. This is somewhat reminiscent of Andersen's (1986) findings whereby Swedish learners of French used pronouns in conjunction with animate referent, but avoided pronominalization in conjunction with inanimate referents.

In summary, the dyads were able to process and more accurately reproduce the verb/complement combination of *penser à* (with *y* as its corresponding clitic form in 18.5% of contexts) than the verb/complement combination of *penser de* (with *en* as its corresponding clitic form in 3.8% of contexts). The processing and reproduction of the indirect clitic *en* was also highly problematic in the target sentences *Bruno n'a pas pu s'empêcher d'en parler*' and '*Bruno en était ravi*', where indirect *en* was used in a mere 3.8% and 7.6% of student versions of the dictogloss, respectively. The students primarily used feminine animate strong pronouns, clitics and lexical NPs to replace indirect *en* in their recreations of the dictogloss. The degree to which the dyads were able to process and reproduce the meaning of partitive *en* was strikingly different from that of indirect *en*. While partitive *en* was used in only 14.0% of the student recreations of the target sentence '*En effet, il en buvait une quand elle a attiré son attention*', the students

provided an equivalent lexical NP in an additional 41.0% of their versions of the dictogloss. Superior processing and replication of the meaning of partitive *en*, as opposed to indirect *en*, was attributed to verb frequency and referent accessibility.

The item-by-item analysis of intermediate-level learners' written reconstructions of *y* (locative and indirect) and *en* (partitive and indirect) on their dictogloss texts revealed the difficulties they experienced understanding clitics on an oral comprehension task. The most common errors relating to the target-forms were: total absence of pronominal representation, wrong referent, wrong argument structure or errors related to difficulties parsing the speech stream.

Discussion

The primary objective of this study was to investigate the extent to which university-level learners of French were able to process and reproduce clitic forms on a dictogloss task. I chose to examine comprehension, rather than production, because this modality had been grossly underrepresented in previous research on the acquisition of pronominalization by L2 learners of French. The use of indirect, inanimate object pronominals was selected for analysis because little is known about the acquisition of these two clitic forms, other than the fact that *y* may be earlier acquired while *en* may be late acquired (Hamann, Rizzi & Frauenfelder, 1996).

An analysis of the data revealed results that were consistent with previous research on the acquisition of pronominalization by learners of French in a variety of contexts. While these learners did use object clitics in object pronominalization contexts, these forms were not the preferred type of object representation (with the exception of locative

y in the second sentence of the dictogloss). As was predicted, students made overall greater use of null objects, strong (i.e., free-standing) pronouns, and lexical NPs than object clitics. This is not to say that the students shied away from using object clitic forms. The analysis of student reconstructions showed an attempt to use these forms, which were even, for the most part, correctly placed in preverbal position. Unfortunately, students made erroneous object clitic choices. 'Wrong clitic' forms most often involved the students using an animate object clitic to refer to an inanimate referent. The 'wrong clitic' forms indicated that students were not processing form to get meaning. Instead, they appeared to be choosing an object clitic that would refer to the most accessible referent: primarily Marianne, but sometimes Bruno (in instances where he was not the subject of the sentence).

The analysis of the target sentence *'Bruno en était ravi'* was particularly revealing of the types of auditory perception difficulties that were occurring when these learners tried to parse the speech stream. Difficulties processing objects clitics due to parsing problems have not been documented in monolingual or bilingual learner populations. Learners in the current study were often unable to correctly distinguish between the nasal vowels. It also appeared that certain learners had problems segmenting the text. Phonological competence in L2 is attributed to one's ability to use lexical segmentation strategies. In English, a metrical segmentation strategy is used whereby each strong syllable indicates the beginning of a new content word (Cutler, 1990). In French, syllable stress is generally even, but at the end of a phrase, word stress falls on a word's last non-schwa syllable. As such, researchers talk about people listening to French using a syllabically-based segmentation strategy (Segui, 1984; Dupoux & Mehler, 1990). In the

current research, unlike native speakers of French, certain learners were not using a syllabically-based segmentation strategy to identify word boundaries in the target text. As a result, student versions of this target sentence contained a number of lexical innovations. Dyads which experienced difficulties processing this particular sentence were divided into two categories: those who appeared to have heard the [ɑ̃] sound and those who appeared not to have. This division supports the notion that preverbal object clitic forms were not necessarily being processed by all of these learners.

It appears from these data analysis, that there is a multiplicity of forms effect whereby a verb like *aller*, with two arguments (locative and indirect) and a single pronominal form are easier for L2 learners to master than a verb like *penser* with two arguments (*à* or *de*), but four categories of pronominal forms once the animate/inanimate distinction is factored in. To further illustrate this point I refer readers to the minimal variation in types of student representation provided for the target sentence containing *aller* as opposed to the variety of answers provided in conjunction with the two occurrences of *penser*.

The interlanguage analysis of the student reconstructions suggests that there was a general lack of sensitivity to the clitics *y* and *en* during the parsing phase of this receptive task, perhaps because these two particular clitic forms were not perceived by the students as having a high communicative value. It is noteworthy that many dyads were able to reproduce the basic meaning of sentences, with the exception of the correct pronominal reference. The very fact that the inanimate object clitic forms *y* and *en* were so frequently represented by animate object forms (either pronominal or lexical NPs) appears to indicate that these learners were relying upon top-down processing to decode this aural

text. Since the love story was so clearly about Bruno and Marianne, the students may have been expecting these referents to continuously resurface and as a result focused their attention on any cues that were consistent with this pattern, instead of automatically processing the actual object clitic forms. When presented with eleven cognitively demanding sentences, these intermediate-level learners of French had to, by necessity, allocate their limited attentional resources. As L2 listeners have been shown to do, their primary focus was on meaning, rather than on form (VanPatten, 2002).

The results of this study reveal that these university-level L2 learners of French were not particularly successful at processing and reproducing object clitics during a task like the dictogloss, which tapped into both receptive and productive skills and required learner collaboration in the co-construction of meaning. Previous research on the acquisition of pronominalization indicated that clitics are a difficult point of grammar to master in both monolingual and bilingual child acquisition. However, the current study underlines that fact that in the case of L2 acquisition, clitics represent a major obstacle for learners. Given the inherent complexity of the French pronominal system, teachers cannot leave students to their own devices in the hope that they will magically come to process object pronouns simply through frequent exposure to these ubiquitous forms that have a high communicative value[6]. This is particularly true because object clitics are not perceptually salient. This problem is further compounded by the fact that they are placed preverbally, resulting in SOV word order. Anglophone students may be listening for object clitics in all the wrong places (i.e., postverbally). Or perhaps students are not even listening for object clitics at all, unless their teachers specifically ask them to do so, given the purposeful nature of listening. For these reasons, I would suggest that teachers of L2

French need to 1) sensitize their students to the phonological forms of object clitics; and 2) train them to listen for them pre-verbally to facilitate auditory detection. Interpretation-based tasks for object clitic instruction seem like a promising way to make L2 learners aware of the morphophonology of French object clitics while at the same time facilitating the detection of these forms in the speech stream. Ellis' (1995) interpretation-based approach to grammar teaching involves three steps: getting the learner to notice the target feature in the input, to understand its meaning and to subsequently compare the exemplars of the feature in the input with those s/he produces. As such, the emphasis is on "...input processing for comprehension rather than output processing for production..." (Ellis, 1995, p. 88). Ultimately, the acts of noticing and comparing lead to intake, which can be subsequently integrated into the IL. Clitics appear to be ideal candidates for interpretation-based approaches to grammar teaching as they meet Ellis' (1995) problematicity criteria (forms are used incorrectly by L2 learners) and learnability criteria (potential for integration into IL system). From a learnability standpoint, object clitics are particularly good candidates for interpretation tasks because many of these forms are already known to the learners given that they carry out multiple functions in French. Sequenced listening and reading tasks could be developed with the express goal of sensitizing learners to clitic forms and encouraging them to process object clitics for meaning. The accompanying interpretation activities would require students to provide a completely nonverbal response. Ellis suggests that activities "...can be sequenced to require first attention to meaning, then noticing the form and function of the grammatical structure, and finally error identification" (1995, p. 98). Interpretation-based teaching of

clitics, coupled with feedback, appears to have potential in terms of helping learners of French increase their accuracy on clitic forms.

Future research on the reception of *y* and *en* in L2 French might look at whether instruction that consists of explicit, meaning-based focus on object clitic forms does in fact lead to improved auditory detection and discrimination. It would also be interesting to know whether this type of morphophonetic training would result in gains that could be maintained and that would transfer to other modalities, like oral production and written production.

Although the dictogloss provides rich insights into the interlanguage of L2 learners, it also confounds the picture because students are engaged in many operations: listening to an oral text, collaborating with peers and creating an agreed upon written text. This is an inherent weakness of the dictogloss task in and of itself.

Both inside and outside the classroom, knowing how to use and to interpret object clitic is an integral part of communicative interactions in French. Learners who use strong forms rather than weak clitics produce language that is markedly non-Standard. But what is the best way of helping L2 learners of French increase their use of clitics? The solution must depend on a deeper understanding of the nature of learners' difficulties. The findings of the present study serve to shed some light on how learners of French understand clitics while listening to French, which is an essential foundation for the development of effective pedagogical interventions to facilitate mastery of this extremely complex system.

<u>Endnotes</u>

1. The instructors of nine out of the eleven sections of French 150 agreed to have their classes participate in the study. One advanced-level section was unable to participate due to time constraints. The weak-level section being taught by the principal investigator was also opted-out as participation in this study could have constituted a conflict of interest.

2. Although 162 students (or 81 dyads) participated in the original study, only a subset of the data is reported in this paper. Dyads that were not perfectly matched on the 'previous type of instruction' variable were excluded from the analysis (i.e. only dyads in which both partners were post-immersion or post-core French were retained). As such, only the data from 53 of the original 81 dyads is reported on in this paper.

3. The dictogloss text appears in Appendix A.

4. It is important to note that the research participants were not primed for the task in that there was no metalinguistic modeling (Swain, 1998).

5. For the purpose of this study, verb frequency was determined using Gougenheim's (1964) work *Le français fondamental*, a word frequency compilation based on corpora of oral and written French. According to this work, regardless of the circumstances in which French is being used, there are a core group of 1063 words. This group is composed of grammatical words, nouns, verbs, adjectives and a small number of words of diverse functions. In terms of frequency of usage, *aller* is ranked 34th and *penser* is ranked 154th.

6. The results of this study appear to indicate that not all clitic forms are of an equally high communicative value. According to VanPatten's (1985) communicative value construct, clitics have a high communicative index given their semantic value and lack of redundancy. However, it is also important to weigh how much any individual clitic form

contributes to the overall meaning of a sentence. It could be argued that locative *y*,

indirect *y*, and indirect *en* contribute less to the overall meaning of a sentence than the

animate clitics *me*, *te*, *le*, *la*, *lui*, *nous*, *vous*, *les*, *leur*, which serve as patients for

prototypical events and actions.

References

Adiv, E. (1984). Language learning strategies: The relationship between L1 operating principles and language transfer in L2 development. In R. Andersen (Ed.), *Second languages: A cross-linguistic perspective* (pp. 125-141). Rowley, MA: Newbury House.

Airey, J. (2002). The way we do it. *English Teaching Professional*, http://www.etprofessional.com/

Andersen, H. (1986). L'acquisition et l'emploi des pronoms français par des apprenants danois. In D. Véronique and A. Giacomi (Eds.), *Acquisition d'une language étrangère: Perspectives et recherches - Actes du 5ᵉ colloque international* (pp. 25-45). Aix-en-Provence: Université de Provence.

Bautier-Castaing, E. (1977). Acquisition comparée de la syntaxe du français par des enfants francophones et non-francophones. *Études de linguistique appliquée, 27*, 19-41.

Clark, E. (1985). The acquisition of Romance, with special reference to French. In D. Slobin (Ed.), *The crosslinguistic study of language acquisition volume 1: The data* (pp. 687-782). Hillsdale, NJ: Erlbaum.

Conners, K. & Nuckle, L. (1986). The morphosyntax of French personal pronouns and the acquisition/learning dichotomy. In O. Jaeggli and C. Silva-Corvalan (Eds.), *Studies in Romance linguistics* (pp. 225-242). Dordrecht: Foris.

Connors, K., Nuckle, L., & Greene, W. (1981). The acquisition of pronoun complement structures in French and English. In J.E. Copeland and P.W. Davis (Eds.), *The Seventh LACUS Forum* (pp. 475-485). Columbia, SC: Hornbeam Press.

Cutler, A. (1990). Exploiting prosodic possibilities in speech segmentation. In G.T.M. Altmann (Ed.), *Cognitive models of speech processing*. Cambridge, MA: The MIT Press.

Dubois, J. (1965). *Grammaire structurale du français: Nom et pronom*. Paris: Librairie Larousse.

Dupoux, E., & Mehler, J. (1990). Monitoring the lexicon with normal and compressed speech: Frequency effects and the prelexical code. *Journal of Memory and Language, 29,* 316-335.

Ehrlich, M.F., & Remond, M. (1997). Skilled and less skilled comprehenders: French children's processing of anaphoric devices in written texts. *British Journal of Developmental Psychology, 15,* 291-309.

Ellis, R. (1995). Interpretation tasks for grammar teaching. *TESOL Quarterly, 29,* 87-105.

Erlam, R. (2003a). Evaluating the relative effectiveness of structured-input and output-based instruction in foreign language learning. *Studies in Second Language Acquisition, 25,* 559-582.

Erlam, R. (2003b). The effects of deductive and inductive instruction on the acquisition of direct object pronouns in French as a Second Language. *The Modern Language Journal, 87,* 242-260.

Ervin-Tripp, S. (1974). Is second language learning like the first? *TESOL Quarterly 8,* 111-127.

Field, J. (2003). Promoting perception: Lexical segmentation in L2 listening. *ELT Journal, 57,* 325-334.

Fortune, A. (2005). Learners' use of metalanguage in collaborative form-focused L2

   output tasks. *Language Awareness, 14,* 21-38.

Frei, H. (1971). *La grammaire des fautes.* Geneva, Switzerland: Slatkine Reprints.

Girardet, J., & Cridlig, J.-M. (1996). *Panorama 2.* Paris: CLE International.

Gougenheim, G. (1964). *L'élaboration du français fondamental (1ᵉʳ degré): Étude sur*

   l'établissement d'un vocabulaire et d'une grammaire de base. Philadelphia, PA:

   Chilton Books.

Granfeldt, J., & Schlyter,S. (2004). Cliticisation in the acquisition of French as L1 and

   L2. In J. Paradis and P. Prévost (Eds.), *The acquisition of French across learner*

   contexts: Focus on functional categories (pp. 333-370). Amsterdam: Benjamins.

Grondin, N., & White, L. (1996). Functional categories in Child L2 acquisition of French.

   Language Acquisition, 5, 1-34.

Gundel, J., Stenson, N., & Tarone, E. (1984). Acquiring pronouns in a second language.

   Studies in Second Language Acquisition, 6, 215-225.

Gundel, J., & Tarone, E. (1992). Language transfer and the acquisition of pronominal

   anaphora. In S. Gass and L. Selinker (Eds.), *Language transfer in language*

   learning revised edition (pp. 87-100). Amsterdam: John Benjamins Publishing.

Hamann, C. (2004). Comparing the development of the nominal and the verbal functional

   domain in French Language Impairment. In P. Prévost and J. Paradis (Eds.), *The*

   acquisition of French in different contexts: Focus on functional categories (pp. 109-

   144). Philadelphia, PA: John Benjamins Publishing.

Hamann, C., Arabatzi, M., Baranzini, L., Conel-Ohayon, S., Chillier, L., Dubé, S.,

   Franck, J., Frauenfelder, U., Rizzi, L., Starke, S., & Zesiger, P. (2002). On the

dissociation of the nominal and verbal functional domains in French language impairment. In B. Skarabela et al. (Eds.), *Proceedings of the 26th Annual Boston University Conference on Language Development* (pp. 267-277). Sommerville, MA: Cascadilla Press.

Hamann, C., Ohayon, S., Dubé, S., Frauenfelder, U., Rizzi, L., Starke, M. & Zesiger, P. (2003). Aspects of grammatical development in young French children with SLI. *Developmental Science, 6,* 151-158.

Hamann, C., Rizzi, L., & Frauenfelder, U. (1996). On the acquisition of subject and object clitics in French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (309-334). Philadelphia, PA: John Benjamins Publishing Co.

Herschensohn, J. (2004). Functional categories and the acquisition of object clitics in L2 French. In P. Prévost and J. Paradis (Eds.), *The acquisition of French in different contexts: Focus on functional categories* (pp. 207-242). Philadelphia, PA: John Benjamins Publishing Company.

Hulk, A. (1997). The acquisition of French object pronouns by a Dutch/French bilingual child. In A. Sorace, C. Heycock & R. Shillcock (Eds.), *Proceedings of GALA 1997: Language Acquisition: Knowledge Representation and Processing* (pp. 521-527). Edinburgh : University of Edinburgh Press.

Hulk, A. (2000). L'acquisition des pronoms clitiques français par un enfant bilingue français-néerlandais. *Canadian Journal of Linguistics, 45,* 97-117.

Jakubowicz, C. (1991). L'acquisition des anaphores et des pronoms lexicaux en français.

In J. Guéron and J.-Y. Pollock (Eds.), *Grammaire générative et syntaxe comparé*

(pp. 229-253). Paris: Éditions du Centre National de la Recherche Scientifique.

Jakubowicz, C., Müller, N., Kang, O.-K., Riemer, B., & Rigaut, C. (1996). On the

acquisition of the pronominal system in French and German. In A. Stringfellow et

al. (Eds.), *Proceedings of the 20th Annual Boston University Conference on*

Language Development (pp. 374-385). Sommerville, MA: Cascadilla Press.

Jakubowicz, C., Nash, L., Rigaut, C., & Gérard, C.-L. (1998). Determiners and clitic

pronouns in French-speaking children with SLI. *Language Acquisition, 7*, 113-160.

Jakubowicz, C., & Rigaut, C. (2000). L'acquisition des clitiques nominatifs et des

clitiques objets en français. *Canadian Journal of Linguistics, 45*, 119-157.

Jakubowicz, C., Tuller, L., & Rigaut, C. (2000). Phonologically weak items in abnormal

acquisition of French. In S. C. Howell et al. (Eds.), *Proceedings of the 24th Annual*

Boston University Conference on Language Development (pp. 450-461).

Sommerville, MA: Cascadilla Press.

Jacobs, G., & Small, J. (2003). Combining dictogloss and cooperative learning to

promote language learning. *The Reading Matrix, 3*, 1-15.

Kaiser, G. (1994). More about INFL-ection and agreement: The acquisition of clitic

pronouns in French. In J. Meisel (Ed.), *Bilingual first language acquisition: French*

and German grammatical development (pp. 131-159). Amsterdam: John Benjamins

Publishing Company.

Kayne, R. (1975). *French syntax: The transformational cycle*. Cambridge, MA: The MIT

Press.

Kenemer, V. (1982). *Le français populaire and French as a second language: A comparative study of language simplification*. Québec: CIRB.

Kowal, M. (1998). Grade 8 immersion students' understanding of French: Insights and pedagogical implications. In S. Lapkin (Ed.), *French second language education in Canada: Empirical studies* (pp. 144-176). Toronto, Canada: University of Toronto Press.

Kowal, M., & Swain, M. (1994). Using collaborative language tasks to promote students' language awareness. *Language Awareness, 3*, 73-93.

Lyster, R. (2004). Research on form-focused instruction in immersion classrooms: Implications for theory and practice. *French Language Studies, 14*, 321-341.

Müller, N., Hulk, A, & Jakubowicz, C. (1999) Object omissions in bilingual children: Evidence for crosslinguistic influence. In A. Greenhill, H. Littlefield, & C. Tano (Eds.), *Proceedings of the 23rd Annual Boston University Conference on Language Development* (pp. 482-494). Sommerville, MA: Cascadilla Press.

Nadasdi, T. (2000). *Variation grammaticale et langue minoritaire: Le cas des pronoms clitiques en français ontarien*. München, Germany: Lincom Europa.

Naiman, N. (1974). The use of elicited imitation in second language acquisition research. *Working Papers in Bilingualism, 2*, 1-37. Toronto, Canada: OISE.

Paradis, J. (2004). The relevance of specific language impairment in understanding the role of transfer in second language acquisition. *Applied Psycholinguistics, 24*, 67-82.

Paradis, J. Crago, M. & Genesee, F. (2003) Object clitics as a clinical marker of SLI in French: Evidence from French-English bilingual children. In B. Beachley et al.

(Eds.), *Proceedings of the 27th Boston University Conference on Language Development* (pp. 638-649). Somerville, MA: Cascadilla Press.

Pinchon, J. (1972). *Les pronoms adverbiaux en et y: problèmes généraux de la représentation pronominale*. Geneva, Switzerland: Droz.

Sandfeld, K. (1965). *Syntaxe du français contemporain: les pronoms*. Paris: Champion.

Schlyter, S. (1997). Formes verbales et pronoms objets chez les apprenants adultes de français en milieu naturel. In C. Martinot (Ed.), *Actes du colloque international sur l'acquisition de la syntaxe en langue maternelle et en langue étrangère* (pp. 273-293). Paris: Les Belles Lettres.

Segui, J. (1984). The syllable: A basic perceptual unit in speech processing. In H. Bouma and D.G. Bouwhuis (Eds.), *Attention and performance*, Vol. 10 (pp. 165-181). Hillsdale, NJ: Erlbaum.

Selinker, L., Swain, M., & Dumas, G. (1975). The interlanguage hypothesis extended to children. *Language Learning 25*, 139-152.

Soares, C., & Grosjean, F. (1984). Bilingual in a monolingual and bilingual speech mode: The effect on lexical access. *Memory and Cognition, 12*, 380-386.

Swain, M., Brooks, L., & Tocalli-Beller, A. (2002). Peer-peer dialogue as a means of second language learning. *Annual Review of Applied Linguistics, 22*, 171-195.

Swain, M., & Lapkin, S. (2001). Focus on form through collaborative dialogue: Exploring task effects. In M. Bygate. P. Skehan and M. Swain (Eds.), *Researching pedagogic tasks: Second language learning, teaching and testing* (pp. 99-118). Harlow: Pearson Education.

Swain, M., & Lapkin, S. (2000). Task-based second language learning: The use of the first language. *Language Teaching Research, 4*, 253-276.

Thibault, P. (1983). *Équivalence et grammaticalisation.* Unpublished Doctoral Dissertation, Université de Montréal.

Towell, R., & Hawkins, R. (1994). *Approaches to second language acquisition.* Clevedon: Multilingual Matters.

VanPatten, B. (1985). Communicative value and information processing in second language acquisition. In E. Judd, P. Nelson and D. Messerschmitt (Eds.), *On TESOL '84: A brave new world* (pp. 88-99). Washington, DC: TESOL.

VanPatten, B. (2002). Processing instruction: An update. *Language Learning 52,* 755-803.

Wajnryb, R. (1990). *Grammar dictation.* Oxford: Oxford University Press.

White, L (1996). Clitics in L2 French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 335-368). Philadelphia, PA: John Benjamins Publishing.

Appendix A: The Dictogloss

You will hear the researcher read aloud a story about the first time that Bruno and Marianne met. The story consists of two parts. Each part will be read three times. No note-taking is permitted during the reading of the story. It is important that you listen attentively to the story so that you can re-create it in writing with your partner. For scoring purposes, it is important that your version of the story have the same number of sentences as in the original.

You will hear the first part of the story three times. It consists of 6 sentences. After hearing these 6 sentences, you will have 10 minutes to work with your pre-assigned partner to re-create these sentences to the best of your ability.

Once you have re-written the first part of the story, you will hear the second part of the story three times. It consists of 5 sentences. After hearing these 5 sentences, you will have 10 minutes to work with your pre-assigned partner to re-create these sentences to the best of your ability.

Part I

1   Bruno et Marianne se sont vus pour la première fois dans un bar.

2   Bruno y allait tous les jours après le travail pour prendre une bière.

3   En effet, il **en** buvait une quand elle a attiré son attention.

4   Marianne était tellement belle qu'il a eu un coup de foudre pour elle.

5   Il a eu envie de **le lui** dire et de l'embrasser sur-le-champ.

6   Mais Bruno n'avait pas le courage de **lui** parler ce soir-là.

Part II

7   Cependant, en sortant du bar, Marianne **lui** a fait au revoir de la main.

8   Bruno **en** était ravi.

9   Une fois rentré à la maison, Bruno n'arrêtait pas d'**y** penser et n'a pas pu

s'empêcher d'**en** parler.

10   Et Marianne, pour sa part, a appelé ses meilleures amies pour **leur** raconter son

histoire et **leur** demander ce qu'elles **en** pensaient.

11   Est-ce que cet homme du bar pourrait **l'**aimer ?

CHAPTER V.

General Discussion and Conclusions

The aim of this dissertation was to investigate the degree to which intermediate-level L2 learners of French in a university-setting were able to process and reproduce the meaning of clitics contained in the input provided during listening comprehension tasks. I endeavored to determine if the reasons for which object clitics have been shown to be problematic in production also pose difficulties for L2 learners during the oral comprehension of these same forms and if language-internal, task, and learner-related factors play a role in the oral comprehension of object clitics. The student reconstructions of the dictogloss text were used to gauge the extent to which intermediate-level L2 learners of French prefer to use null objects, strong (i.e., free-standing) pronouns, and lexical NPs over clitic forms in obligatory pronominalization contexts.

This chapter begins with a summary of main findings of the three papers that comprised this dissertation: a literature review on the acquisition of pronominalization in French, and two separate papers presenting a quantitative and qualitative analysis, respectively, of the object clitic oral comprehension data. My findings are interpreted in terms of their significance for L2 teachers of French and the implications are concomitantly related to practice. After addressing the limitations of the studies, suggestions for future research are offered.

The Acquisition of the French Pronominal System Across Learner Contexts

Chapter II of this dissertation provided a synthesis of the similarities and differences in how the French pronominal system is acquired by learners as a function of the learning context. This literature review drew out some acquisition trends that relate only to specific learner populations and others that appear to be universal, regardless of the setting in which French is being learned. Both anecdotal and empirical research indicated common difficulties that learners face in their attempt to master the two competing pronoun systems in French, as well as the stages through which L2 learners pass before they are able to consistently place object clitics preverbally. What is particularly striking about the data is the incredible continuity between, for example, how monolingual three-year olds and instructed adult L2 learners acquire the French pronominal system. Independent of learner type, the following statements characterize the acquisition of French clitics:

1. Object clitics are late acquired, possibility as a function of the complexity of their syntactic calculation (e.g., Hamann, Rizzi & Frauenfelder, 1996);

2. In the early stages of acquisition, subject clitics tend to be overgeneralized to object clitic contexts (e.g., Selinker, Swain & Dumas, 1975);

3. Errors are committed with respect to the person, number, and gender of object clitics (e.g., Jakubowicz, 1991);

4. Object clitics are given preferential usage in conjunction with animate NP referents (e.g., Andersen, 1986);

5. Direct object clitics are produced more frequently (or better comprehended) than indirect object clitics (e.g., Jakubowicz, Nash, Rigaut & Gérard, 1998);

6. Errors are committed with respect to verb argument structure (e.g., Kenemer, 1982);

7. In addition to clitics, nontargetlike forms such as null pronouns, strong pronouns/*ça* and lexical objects are also employed in pronominalization contexts (e.g., Paradis, 2004).

The striking similarities in the acquisition of object clitics across learner populations are clearly attributable to the highly complex nature of these forms. Object clitics are in competition with strong pronoun forms and lexical objects; they appear in non-salient, non-canonical position; and their usage necessitates morphosemantic distinctions (person, gender, number), as well as knowledge of verb argument structure. Object clitic usage also "requires coordination of morphosyntax with discourse pragmatics" (Paradis, Crago & Genesee, 2003, p. 640). Jakubowicz and Nash (2001) have also pointed out the complexity of the syntactic calculation associated with the usage of object clitic forms given that these forms are not obligatory in every sentence that is generated in French. Regardless of the context of learning, object clitics are difficult to acquire by their very nature.

While the preceding seven characteristics appear to be universal, word order is only problematic among certain learner populations. Monolingual and bilingual learners rarely make object placement errors (both in SOV and SVO word orders), but SOV word order is particularly difficult for L2 learners (Chillier et al., 2001; Jakubowicz, Nash, Rigaut & Gérard, 1998; Jakubowicz & Rigaut, 2000). L2 learners with a variety of L1s have been documented as having a phase of nontargetlike, post-posed object clitic usage (Granfeldt & Schlyter, 2004; Herschensohn, 2004; Schlyter, 1997; Towell & Hawkins, 1994). For these learners, it is clear that cliticisation is a process that is learned over an extended period of time.

L2 Learners' Oral Comprehension of Clitics in French

Chapter III described a quantitative study of university-level L2 French learners'

ability to process and replicate the meaning of object clitics on a L2-L1 translation task.

Learner performance varied as a function of the inherent characteristics of clitics. Many

of these very characteristics of clitics had already been identified as being problematic to

the acquisition of French pronominalization in Chapter II. Paired-samples t-tests revealed

significant differences in means and the following hypothesized asymmetries: direct

objects > indirect objects; locative y > indirect; partitive en > indirect en; masculine

direct objects > feminine direct objects; and animate objects > inanimate objects.

Performance differed as a function of L2 proficiency level. On the translation task

the weak group was significantly different from both the intermediate and advanced

groups, and the intermediate group was significantly different from the advanced group.

In addition, there was a direct effect for the total amount of exposure to French as was

operationalized by the students' previous educational background. Post-immersion

students performed significantly better than post-core French students. The findings from

this phase of the study indicated that both language-internal and learner factors played a

role in how object clitics were processed during listening comprehension. Language

internal factors influencing the processing of clitics were attributed to linguistic

complexity, overall processability, and instructional sequences. The fact that post-

immersion students were better able to process clitics than post-core French students was

explained as a result of significantly greater exposure to French in a classroom setting,

with core French students having received a maximum of 1000 hours of instruction prior

to commencement of their post-secondary studies and early immersion students having received as many as 7000 hours.

The positive relationship between L2 proficiency and overall success on aural reception measures was explained using an information processing model that has been applied to SLA (McLaughlin, 1987). More proficient learners were believed to be making greater use of automatic processing, ultimately freeing up additional attentional resources that could be directed towards individual forms – such as clitics. Conversely, less proficient learners were believed to be making greater use of controlled processing, thereby taxing their short term memory and depleting the attentional resources available to focus on individual forms. It was also suggested that more proficient students were likely exhibiting many of the characteristics presented in the model of the 'more skilled listener' by Vandergrift (2003) during the completion of the translation task, such as making complementary use of both top-down and bottom-up processing, while at the same time elaborating and continuously revising their conceptual frameworks during the delivery of the target sentences. Higher overall proficiency level, coupled with superior strategies and greater use of automatic processing, likely gave these students an advantage in terms of the degree to which they could reproduce the meaning of clitic forms on the listening task.

The Dictogloss as a Measure of the Comprehension of *Y* and *En* by L2 Learners of French

While the results of the translation task discussed in Chapter III revealed that both language-internal and learner factors played a role in the degree to which object clitics

were processed and reproduced during listening comprehension, the dictogloss task (Chapter IV) provided more specific information about the difficulties these same learners experienced decoding clitics in the speech stream. Although the dictogloss has traditionally been used to study students' interactions as they work collaboratively on form-focused, language production tasks, in the current study it served as a means of determining the degree to which university learners of French were able to receptively process clitics and replicate their meaning. Given that the dictogloss was delivered orally, students' comprehension of clitic forms was evaluated by their ability to reconstruct the target text using acceptable forms (in combination with their verbal hosts) in obligatory pronominalization contexts. Even though the dictogloss text contained six distinct clitic forms (namely *le, l', lui, leur, y* and *en*), this chapter focused on *y* and *en* for three main reasons: 1) their relative absence from previous research on the acquisition of pronominalization; 2) the fact that these forms are syncretized (i.e., a single form carries out multiple functions: locative *y* vs. indirect *y* and partitive *en* vs. indirect *en*); and 3) the possibility that *y* is early acquired and *en* is late acquired (Hamann, Rizzi, & Frauenfelder, 1996).

An item-by-item, qualitative analysis of the reconstructed texts produced by the dyads showed that they had difficulties understanding *y* and *en*. Moreover, clitics were not the preferred type of pronominal representation (with the exception of locative *y* in the second sentence of the dictogloss). It is noteworthy that when clitics were used they were, for the most part, correctly placed in preverbal position. Hypotheses were confirmed in that students made overall greater use of null objects, strong (i.e., free-standing) pronouns, and lexical NPs than clitics. Common errors committed in obligatory

pronominalization contexts included wrong referent, wrong argument structure or general errors related to difficulties parsing the speech stream. The 'wrong referent' finding was key in that it indicated that not all students were processing grammatical form to get meaning, as was clearly shown in their choice of animate clitics to refer to inanimate referents. It was postulated that some students were reconstructing their texts on a 'most accessible referent' basis: primarily Marianne, but sometimes Bruno (in instances where he was not the subject of the sentence). Student versions of the target sentence *'Bruno en était ravi'* served to identify auditory perception difficulties in parsing the speech stream. While some learners had difficulty distinguishing French nasal vowels, others failed to use a syllabically-based segmentation strategy to identify word boundaries which resulted in numerous lexical innovations. It was concluded that there was a general lack of sensitivity to object clitics during the parsing phase of the dictogloss. The frequent representation of *y* and *en* by animate object forms (either pronominal or lexical NPs) was interpreted as indicating over-reliance on top-down processing, which resulted in many students having to guess when it came time to represent clitics in their versions of the story.

<u>Implications for L2 French Educators</u>

The current research, particularly as it relates to the post-immersion students, shows that frequent and prolonged exposure to clitics in the input is not sufficient so as to allow the majority of learners to accurately process and reproduce these forms during oral comprehension tasks. This is clear from student reconstructions of target sentences from the dictogloss task where argument structure errors and referent choice errors were

committed. In reconstructing the target sentence '*Bruno n'arrêtait pas d'y penser*' 'Bruno

didn't stop thinking about it', for example, some dyads assigned incorrect argument

structure (*penser de*), as can be seen in Example 1):

1) **Bruno n'arrêtait pas de penser d'elle*. 'Bruno didn't stop thinking of her.'

Other dyads assigned the correct argument structure (*penser à*), although in conjunction

with the wrong referent (*elle* 'her'), as can be seen in Example 2):

2) *Bruno n'arrêtait pas de penser à elle*. 'Bruno didn't stop thinking of her.'

The recreations of other dyads, still, were exemplified by a total absence of

pronominalization, as can be seen in Example 3):

3) *Bruno n'arrêtait pas de Ø penser*. 'Bruno didn't stop thinking.'

While previous research indicates that L2 learners have difficulties using clitics

productively (Harley, 1986; Herschensohn, 2004; White, 1996), the studies that comprise

this dissertation suggest that these learners also have difficulty understanding and

reproducing clitics. The French pronominal system is extremely complex, given that it

has competing strong and weak paradigms. Moreover, clitic forms are problematic in that

they are not perceptually salient. The difficulty in both producing and understanding

clitics is strengthened by their pre-verbal placement, which results in SOV word order.

However, the findings from the L2-L1 translation task and the dictogloss task presented

in the current dissertation might be an indication that not all clitic forms are equally

difficult. The results from the translation task, in particular, allowed for the establishment

of the following tentative hierarchy of clitic forms based on the degree to which

intermediate-level classroom learners of French were able to process and replicate their

meanings: partitive *en* > masculine clitics > locative *y* > direct object clitics > animate

object clitics > feminine clitics > inanimate object clitics > indirect object clitics > indirect y > indirect *en*. Given that not all clitics forms were processed equally well during the listening measures examined, teachers might do well to present the French pronominal system to their students in segments, as opposed to treating the entire system at once. One might introduce partitive *en* and locative y, for example, fairly early on in the curriculum. Given their less complex syntactic calculation, direct object clitics could be introduced before indirect object clitics. Finally, the conceptually complex clitic forms that require more abstract thought on the part of the learners, indirect y and indirect *en*, could be added to complete the weak pronominal system. Once the weak French pronominal system has been presented in its entirety, it is recommended that clitics be revisited throughout the program of study in order to allow for consolidated knowledge to be incorporated into the learner's developing IL system.

Although the empirical studies presented in the current dissertation did not focus on a pedagogical intervention, the results suggest that a traditional production-oriented approach to teaching clitics is not necessarily the most effective way of helping L2 learners acquire these forms. Chapter III provided a detailed discussion of how clitics were taught in French 150 at the University of Alberta. After an initial deductive presentation of clitic forms in contextualized discourse, one that included typographical enhancement, the focus was placed on output-based activities where the learners produced sentences or filled in texts with the target structures. The assumption was that "having learners produce the structure correctly and repeatedly helps them learn it" (Ellis, 1995, p. 87). However, the learners examined in the research reported on here were still experiencing some difficulties when processing clitics in contextualized oral discourse,

perhaps because the amount of practice in using clitics was not sufficient for mastery. It is for this reason that teachers of L2 French might do well to try input-based approaches to object clitic instruction (see Erlam, 2003), exploring tasks that encourage students to focus their attention on these acoustically brief forms.

Erlam (2003) examined how structured-input instruction impacted upon high school students' ability to comprehend and reproduce the direct object clitics *le*, *la* and *les*. The structured input group received explicit instruction and rule-based explanations on direct object nouns and pronouns in French. This was followed by a number of input-based activities involving spoken and written input where the students were guided in the correct interpretation of meaning, while at the same time having their attention focused on the target forms. Throughout these activities, the students were never asked to produce the target-forms. Input-based activities were complemented by 'consciousness-raising' activities during which the students pointed out errors in the spoken and written input. However, even though the correct answers and explanations were provided for the students, as is the case with all structured-input activities, they were not asked to produce them at any time.

Erlam's (2003) results indicated that while both the structured-input and output-based instruction groups outperformed the control group students on the comprehension measure used in her study, structured-input instruction did not result in better comprehension of direct object forms than meaning-oriented, output-based instruction. Moreover, Erlam cautioned that neither instructional treatment was very effective given the limited gains made by students on the four tests. Despite Erlam's 2003 findings that the output-based instruction group outperformed the structured-input group on their

ability to comprehend and produce direct object clitics, Erlam (2005) admitted that the instructional treatment received by the structured-input group was only "loosely based on descriptions of input processing as outlined in VanPatten (1996) and VanPatten and Cadierno (1993a; 1993b)" (p. 155). Given that Erlam's instructional materials did not strictly follow the principles of VanPatten's Input Processing and that they were prepared prior to the publication of a series of scholarly writings on Processing Instruction (e.g., Wong, 2002, 2004), which go into great detail about designing instructional materials and implementing them in the classroom-setting, it seems unwarranted to discount input-based approaches to the teaching of the French pronominal system to L2 learners.

If one of our goals as teachers is to have our students focus on clitic forms in the input, it might be useful to begin with listening tasks that require learners to pay attention to forms and process for meaning. Hulstijn (2001), for example, suggests training tasks for automatic word recognition at the 'i minus one' level. Beginning- and intermediate-level students listen to familiar oral texts (e.g., ones to which they have been previously exposed in the classroom setting) until they are able to recognize all of the words. Students are encouraged to whisper the individual words to themselves or to count the exact number of words to facilitate the listening process. The ultimate goal of listening at the 'i minus one' level is that by the end of the process the student be able to understand each and every word.

In addition to using listening tasks at the 'i minus one' level to develop L2 segmentation skills and word recognition ability, I would argue that it is helpful to sensitize students to the phonological forms of object clitics and to train them to listen for these features pre-verbally to facilitate auditory detection (i.e., to make sure that students

are listening for object clitics before verbs and not after them). One strategy I have used

to great success with beginning-level learners was marking Xs to denote points in

sentences where there is typically 'intervening material' in French (i.e., object pronouns,

negation etc.). This can be done during a lesson when either a planned or unplanned

opportunity to focus on form arises. It is helpful to begin with a simple SV sentence, such

as *Je parle* 'I speak.' From there, Xs can be marked before the verb (*Je X parle*) and

examples of object clitics like *Je lui parle* and *J'en parle* can be modeled. The same

process can be followed for composed tenses, like the *passé composé*, where the X

precedes the auxiliary verb (*J' X ai parlé*), which subsequently results in *Je lui ai parlé*

and *J'en ai parlé*. From a processing point of view, this technique serves to make

students more aware of the placement of specific linguistic forms, like object clitics, in

sentences. It is this awareness that material can be inserted in certain non-salient points in

the sentence that prepares the way for the acquisition of the aforementioned forms.

Although many SLA researchers have argued that instruction does not influence the

order of acquisition, there is evidence that instruction increases the rate of acquisition (for

reviews, see e.g., Ellis, 1994; Mitchell and Myles, 2004). By their very nature, object

clitics are a candidate for form-focused instruction. For acoustically non-salient, medially

placed forms like French object clitics, students will never master these forms if they are

not brought to notice them in the input. By bringing students to notice object clitics, it is

likely they will be better prepared when faced with additional input containing these

forms (Klapper & Rees, 2003). This is supported by Gass' Selective Attention model

(1988, 1991) whereby explicit instruction about a particular L2 form acts as a selective

attention device that influences how the form is acquired. It is during the apperception

phase of this five phase model that the learner can draw upon explicit grammatical information, provided by the teacher, in order to selectively attend to a particular feature (in this case clitics) in the input. Even though the instructional effects are delayed, instruction and attention to form do play an important role in beginning a process that will ultimately lead to IL restructuring.

In addition to making students aware of the phonological forms of object clitics and training them to listen for clitic forms pre-verbally, it is also important to draw students' attention to clitic forms in the written input. This can be done through input enhancement, that is to say the deliberate act of making a specific feature in the input more salient for learners (Sharwood Smith, 1991). One particular type of input enhancement that could be used in conjunction with object clitics is textual enhancement through typographical modifications (e.g., font style, enlarged character size, underlining, bolding, italicizing, accentuating with color, etc.). In their correct application, tasks involving textual enhancement imply that: "1) learners are engaged in reading written input for propositional content and (2) particular features of the written input are enhanced via the use of typographical cues with the hope that the learners' attention is drawn to these" (Wong, 2003: p. 18). Specific tasks or activities could be designed around written texts that included textually enhanced object clitics, thus rendering these non-salient forms more salient and increasing the likelihood that L2 learners would pay attention to these forms. In a similar vein, another type of textual enhancement that may be an effective means of making object clitics more salient for L2 learners is input flooding. In input flooding, the learners are bombarded with an artificially augmented number of tokens of the target form. The goal of the input flood is to make object clitics more salient to

learners, that is to say to bring them to notice these forms, through increased input.

Textual enhancement and input flooding seem promising given the widespread belief that

attention to form in the input is a necessary condition for L2 learning (e.g., Robinson

1995, 1996; Schmidt, 1990, 1994, 2001; Tomlin & Villa, 1994) and the body of research

that indicates more learning as a function of increased attention on the part of L2 learners

(e.g., Leow, 1997, 1998; Rosa & O'Neill, 1999; Schmidt & Frota, 1986).

Hopefully, through the provision input containing enhanced object clitic forms in

increased numbers and training designed to increase student awareness of the

phonological forms of object clitics and their pre-verbal placement, L2 learners of French

would be more likely to notice these forms, which would result in more intake (the subset

of input available for further language processing).

Limitations

The primary limitation of the current research is one that was previously identified

by Chaudron (1985). Chaudron pointed out that potential constraints on language

perception and comprehension by L2 learners are of particular importance when choosing

research instruments to measure their input processing capacity. In fact, any individual

measure or testing procedure presumably "allow[s] different intervening factors to affect

learners' perception or processing" (p. 9). Chaudron clearly delineated a number of tasks

that are employed by researchers in order to determine learners' responses to oral input,

which differ along two dimensions of response measures: "(1) the amount of encoding or

recoding of the input into other forms, whether motor behavior or language, and (2) the

degree of comprehension required – that is the level of grammatical abstraction from the

input that is expected from the learner" (p. 9). A main weakness of the tasks selected for the current study is that they are not 'pure' listening measures in the sense that they require the listener to encode meaning graphically in order to demonstrate his/her understanding. It was from the written L1 translation of the sentences (Chapter III) or the reconstructed versions of the dictogloss (Chapter IV) that the researcher made inferences about the extent to which the students understood the target clitic forms presented in the two tasks.

Admittedly, these tasks were measuring more than listening comprehension. Memory was likely a confounding variable in both tasks, although particularly so in the dictogloss task where the listeners were given a series of highly cognitively demanding sentences and no note-taking was allowed. In the L2-L1 translation task, both L1 ability and translation ability were also factors as the input had to be reformulated from French into English. By my estimation of the process, the learners heard the sentence (linguistic input), accessed meanings (orthographic/phonological, lexical/semantic, syntactic/propositional), reformulated the input and produced a translated version of the sentence. In such a task where an individual is involved in on-line translation, it has been estimated that 80% of their effort is dedicated to listening to what is being said in the source language and 20% is dedicated to reproducing it in the target language (Bajo et al., 2001). Because of the very nature of the translation task, the learners' attention was clearly divided between the act of listening and the act of reproducing the meaning in English. And the learners' ability to translate from the L2 to the L1 was tested along with the ability to listen and understand. However, it is important to note that L2-L1

translation as listening measure has been shown to have a high level of validity on both theoretical and practical grounds (Buck, 1992; Scott et al., 1996).

A second limitation of the current research arises directly from the use of integrative instruments to measure how L2 learners process the grammar in oral texts. Although the two listening measures used in this study were piloted prior to the main study, one particular challenge in designing the measures involved the number of clitic tokens. The number of tokens on each of the measures used was limited, as was the number of tokens of each individual clitic form. The necessity of limiting the number of tokens, however, was dictated by the nature of the listening tasks. As the goal of this research was to discover how listeners processed grammar in contextualized oral discourse, participants were not able to take notes. If note-taking were allowed, the dictogloss would have become a simple transcription exercise (Buck, 2001). The translation task was designed so that the listeners would be able to chunk individual elements into segments in order to hold them in working memory and subsequently translate them[2]. The dictogloss, on the other hand, was intended to challenge the listeners, forcing them to rely upon their short-term memory in order to successfully reconstruct the text. As can be seen, the integrative listening tasks employed in this research allowed for an examination of language processing, but prohibited a large number of tokens because of the range of target forms being examined. In order to increase the quantity of clitic forms, it would have been necessary to use discrete-point items which would not have been compatible with the goals of the current research. It is also important to acknowledge a second limitation relating to the tokens: unequal numbers for different clitic forms. In an ideal situation, particularly were one using discrete-point items,

statistical analyses and comparisons would be facilitated by having equal N for all clitic types.

Another limitation of the current study is that the pronominal representations in learners' ILs were investigated using written data obtained via two listening comprehension tasks which varied as a function of the amount of encoding of the input and the degree of comprehension required for the listener to be successful on the tasks (Chaudron, 1985). As the researcher was not able to 'get inside' the listeners' heads, explanations for how the processing was unfolding are only tentative at best. It would have been helpful to also have had access to verbal reports from a subset of participants. This data, which would allowed a glimpse into the real-time processing of the target-forms, could have been obtained by having the participants narrate their thought process aloud, 'think aloud' style (Camps, 2003; Jourdenais, 2001). However, given that intact classes were used and that the research was carried out during regular class time, it would have been difficult to obtain concurrent verbal reports given the lack of an appropriate testing facility.

Research Directions

As a follow-up to the suggestions provided as to how clitics can be addressed in the L2 French classroom, future research on the oral comprehension of these target forms could examine whether explicit instruction that is input-based results in improved auditory detection, discrimination and overall comprehension on the part of listeners. It is also important to determine if this type of morphophonetic training would ultimately

translate into gains that could be maintained over time and that would be applicable to other modalities, like oral and written production.

An extension of the studies reported on in the current dissertation would address the role of explicit knowledge and noticing in the oral comprehension of clitics by L2 learners of French. To this end, it would be useful to have intermediate-level learners from the same institution perform the dictogloss task while narrating their thought process 'think-aloud' style. This data would be supplemented with additional tasks such as a sentence repetition task and a rule articulation task. The two new tasks would serve to provide detailed information regarding whether intermediate-level learners have explicit knowledge about clitics and their usage (rule articulation task) and whether they notice clitics in the input (sentence repetition task). The information provided by these two tasks would be extremely useful because if it could be shown that learners had explicit (i.e., reportable) knowledge about clitics and that they noticed these forms in the oral input, these learners' inability to process clitics and hold them in short-term memory would come into question. This would necessitate further investigation into the role of practice in learners' ability to use clitics.

Regardless of whether instructed L2 learners of French are using the language in the classroom or in real-life settings, being able to understand and to produce clitics is an essential component of successful communicative interactions in French. Learners who delete pronouns or use strong forms instead of weak clitics produce language that contains markedly non-Standard forms. How then can L2 learners of French be brought to notice clitics and to use them more frequently in production? The findings presented in the current dissertation have shed some light on how clitics are processed during listening

tasks. Drawing upon the foundation provided by this research, I would suggest that the answer to this question may lie in interpretation-based approaches to object clitic instruction (e.g., Ellis, 1995). Using Ellis' (1995) three-step interpretation-based approach to grammar teaching, learners can be led to notice clitics in the input, to understand their meaning and to subsequently compare examples of clitics in the input with those in their own L2 output. When combined with appropriate and timely feedback, interpretation-based teaching of clitics might be an alternative to output-based instruction that teachers could experiment with as a way of helping L2 learners of French increase their accuracy on clitic forms.

<u>Endnotes</u>

1. Paradis refers to the following studies: Herschensohn, 2004; Schlyter, 1997; White, 1996; Zobl, 1980.

2. According to Miller (1956), approximately seven units or chunks of information can be held in working memory.

References

Adjemian, C. (1976). On the nature of interlanguage systems. *Language Learning, 26,* 297-320.

Andersen, H. (1986). L'acquisition et l'emploi des pronoms français par des apprenants danois. In D. Véronique and A. Giacomi (Eds.), *Acquisition d'une language étrangère: Perspectives et recherches - Actes du 5ᵉ colloque international* (pp. 25-45). Aix-en-Provence, France: Université de Provence.

Bajo, T., Padilla, P., Munoz, R., Padilla, F., Gómez, C., Puerta, C., Gonzalvo, P., & Macizo, P. (2001). Comprehension and memory processes in translation and interpreting. *Quaderns, Revista de traducció, 6,* 27-31.

Buck, G. (1992). Translation as a language testing procedure: Does it work? *Language Testing, 9,* 123-148.

Buck, G. (2001). *Assessing listening.* Cambridge, England: Cambridge University Press.

Camps, J. (2003). Concurrent and retrospective verbal reports as tools to better understand the role of attention in second language tasks. *International Journal of Applied Linguistics, 13,* 201-221.

Chaudron, C. (1985). Intake: on models and methods for discovering learners' processing of input. *Studies in Second Language Acquisition, 7,* 1-14.

Chillier, L., Arabatzi, M., Baranzini, L., Cronel-Ohayon, S., Deonna, T., Dubé, S., Franck, J., Frauenfelder, U., Hamann, C., Rizzi, L., Starke, M., & Zesiger, P. (2001). The acquisition of French pronouns in normal children and in children with specific language impairment. In *Proceedings of Early Lexicon Acquisition* [CD-ROM], Lyon, France.

Ellis, R. (1994). *The study of second language acquisition.* Oxford, England, England: Oxford University Press.

Ellis, R. (1995). Interpretation tasks for grammar teaching. *TESOL Quarterly, 29*, 87-105.

Erlam, R. (2003). Evaluating the relative effectiveness of structured-input and output-based instruction in foreign language learning. *Studies in Second Language Acquisition, 25*, 559-582.

Erlam. R. (2005). Language aptitude and its relationship to instructional effectiveness in second language acquisition. *Language Teaching Research, 9*, 147-171.

Gass, S. (1988). Integrating research areas: A framework for second language studies. *Applied Linguistics, 9*, 198-217.

Gass, S. (1991). Grammar instruction, selective attention and learning processes. In R. Philipson, E. Kellerman, L. Selinker, M. Sharwood Smith and M. Swain (Eds.), *Foreign/Second language pedagogy research: A commemorative volume for Claus Færch* (pp. 134-141). Clevedon, England: Multilingual Matters.

Granfeldt, J., & Schlyter, S. (2004). Cliticisation in the acquisition of French as L1 and L2. In J. Paradis and P. Prévost (Eds.), *The acquisition of French across learner contexts: Focus on functional categories* (pp. 333-370). Amsterdam: Benjamins.

Hamann, C., Rizzi, L., & Frauenfelder, U. (1996). On the acquisition of subject and object clitics in French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 309-334). Philadelphia, PA: John Benjamins Publishing.

Harley, B. (1986). *Age in second language acquisition.* Clevedon, England: Multilingual Matters Ltd.

Herschensohn, J. (2004). Functional categories and the acquisition of object clitics in L2

   French. In P. Prévost and J. Paradis (Eds.), *The acquisition of French in different*

   contexts: Focus on functional categories (pp. 207-242). Philadelphia, PA: John

   Benjamins Publishing.

Hulstijn, J. (2001).Intentional and incidental second language vocabulary learning: A

   reappraisal of elaboration, rehearsal and automaticity. In P. Robinson (Ed.),

   Cognition and second language instruction (pp. 258-286). Cambridge, England:

   Cambridge University Press.

Jakubowicz, C. (1991). L'acquisition des anaphores et des pronoms lexicaux en français.

   In J. Guéron and J.-Y. Pollock (Eds.), *Grammaire générative et syntaxe comparé*

   (pp. 229-253). Paris: Éditions du Centre National de la Recherche Scientifique.

Jakubowicz, C., & Nash, L. (2001). Functional categories and syntactic operations in

   (ab)normal language acquisition. *Brain and Language, 77*, 321-339.

Jakubowicz, C., Nash, L., Rigaut, C., & Gérard, C.-L. (1998). Determiners and clitic

   pronouns in French-speaking children with SLI. *Language Acquisition, 7*, 113-160.

Jakubowicz, C., & Rigaut, C. (2000). L'acquisition des clitiques nominatifs et des

   clitiques objets en français. *Canadian Journal of Linguistics 45* (1/2), 119-157.

Jourdenais, R. (2001). Cognition, instruction and protocol analysis in P. Robinson (Ed.),

   Cognition and second language instruction (pp. 354-375). Cambridge, England:

   Cambridge University Press.

Kenemer, V. 1982. *Le français populaire and French as a second language: A*

   comparative study of language simplification. Québec: CIRB.

Klapper. J., & Rees, J. (2003). Reviewing the case for explicit grammar instruction in the university foreign language learning context. *Language Teaching Research, 7,* 285-314.

Leow, R. (1997). Attention, awareness, and foreign language behavior. *Language Learning, 47,* 467-505.

Leow, R. (1998). Towards operationalizing the process of attention in SLA: Evidence from Tomlin and Villa's (1994) fine-grained analysis of attention. *Applied Psycholinguistics, 19,* 133-189.

McLaughlin, B. (1987). *Theories of second language learning.* London: Edward Arnold.

Miller, G.A. (1956). The magical number seven plus or minus two: Some limitations on our capacity for processing information. *Psychological Review, 63,* 81-97.

Mitchell, R., & Myles, F. (2004). *Second language learning theories* (2nd edition). London: Arnold.

Paradis, J. (2004). The relevance of specific language impairment in understanding the role of transfer in second language acquisition. *Applied Psycholinguistics, 24,* 67-82.

Paradis, J., Crago, M., & Genesee, F. (2003) Object clitics as a clinical marker of SLI in French: Evidence from French-English bilingual children. In B. Beachley et al. (Eds.), *Proceedings of the 27th Boston University Conference on Language Development* (pp. 638-649). Somerville, MA: Cascadilla Press.

Robinson, P. (1995). Aptitude, awareness, and the fundamental similarity of implicit and explicit second language learning. In R. Schmidt (Ed.), Attention and awareness in foreign language learning (pp. 303-357). Hawaii: University of Hawaii Press.

Robinson, P. (1996). Learning simple and complex language rules under implicit, incidental, rule-search, and instructed conditions. *Studies in Second Language Acquisition, 18*, 27-67.

Rosa, E., & O'Neill, M. (1999). Explicitness, intake and the issue of awareness: Another piece of the puzzle. *Studies in Second Language Acquisition, 21*, 511-556.

Schlyter, S. (1997). Formes verbales et pronoms objets chez les apprenants adultes de français en milieu naturel. In C. Martinot (Ed.), *Actes du colloque international sur l'acquisition de la syntaxe en langue maternelle et en langue étrangère* (pp. 273-293). Paris: Les Belles Lettres.

Schmidt, R. (1990). The role of consciousness in L2 learning. *Applied Linguistics, 11*, 129-158.

Schmidt, R. (1994). Deconstructing consciousness in search of useful definitions for applied linguistics. *AILA Review, 11*, 11-26.

Schmidt, R. (2001). Attention. In P. Robinson (Ed.), *Cognition and second language instruction* (pp. 3-32). Cambridge: Cambridge UP.

Schmidt, R., & Frota, S. (1986). Developing basic conversational ability in a second language: A case study of an adult learner in Portuguese. In R. Day (Ed.), *Talking to learn: Conversation in second language acquisition*. Rowley, MA: Newbury House.

Scott, M.L., Standsfield, C.W., & Kenyon, D. (1996). Examining validity in a performance test: The listening summary translation exam (LSTE) – Spanish version. *Language Testing, 13*, 83-109.

Selinker, L., Swain, M., & Dumas, G. (1975). The interlanguage hypothesis extended to children. *Language Learning, 25*, 139-152.

Sharwood Smith, M. (1991). Speaking to many minds: On the relevance of different types of language information for the L2 learner. *Second Language Research, 7*, 118-132.

Tomlin, R., & Villa, H. (1994). Attention in cognitive science and second language acquisition. *Studies in Second Language Acquisition, 16*, 183-203.

Towell, R., & Hawkins, R. (1994). *Approaches to second language acquisition.* Clevedon, England: Multilingual Matters.

Vandergrift, L. (2003). Orchestrating strategy use: Toward a model of the skilled second language listener. *Language Learning, 53*, 463-496.

VanPatten, B. (1996). *Input processing and grammar instruction: Theory and research.* Norwood, N.J.: Ablex.

VanPatten, B., & Cadierno, T. (1993a). Explicit instruction and input processing. *Studies in Second Language Acquisition, 15*, 225-243.

VanPatten, B., & Cadierno, T. (1993b). Input processing and second language acquisition: A role for instruction. *Modern Language Journal, 77*, 45-57.

White, L (1996). Clitics in L2 French. In H. Clahsen (Ed.), *Generative perspectives on language acquisition: Empirical findings, theoretical considerations, and cross-linguistic comparisons* (pp. 335-368). Philadelphia, PA: John Benjamins Publishing.

Wong, W. (2002). Linking form and meaning: Processing Instruction. *The French Review, 76*, 236-264.

Wong, W. (2003). Textual enhancement and simplified input: Effects on L2

comprehension and acquisition of non-meaningful grammatical form. *Applied*

Language Learning, 13, 17-45.

Wong, W. (2004). The nature of processing instruction. In B. VanPatten (Ed.),

Processing Instruction: Theory, research and commentary (pp. 33-63). Mahwah,

NJ: Lawrence Erlbaum Associates, Inc.

Zobl, H. (1980). The formal and developmental selectivity of L1 influence on L2

acquisition. *Language Learning, 30*, 43-57.