Book Review

Nan Jiang: *Second language processing: An introduction*. New York: Routledge, 2018, ISBN 978 0 415 70804 3, pp. 336.

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Considering the vast volume of research output on second language processing (SLP) in the past several decades, it is a challenging undertaking for anyone who attempts to comb the relevant literature and provide a comparatively thorough introduction to this field. However, Professor Jiang from University of Maryland fulfilled this challenge with astounding clarity and completeness. As a worldleading scholar in language processing, especially SLP, Professor Jiang has over 20 years' research experience in a wide range of topics related to language processing, such as bilingual language processing, the cognitive and psycholinguistic processes and mechanisms involved in adult SLP, and lexical representation and development in second language. And this book, Second language processing: An introduction, to my knowledge, is the first comprehensive textbook to date that offers a thorough review of the field of SLP. While current literature tends to focus on one topic or area of research, this textbook aims to bring these different research strands together in a single volume, illuminating their differences while also establishing the relationships between them. As a newcomer researcher and also a PhD candidate in SLP, I used to feel discouraged when faced with the daunting task of untangling the complexities embedded in the seemingly disparate while closely intertwining SLP-related research strands. The interdisciplinary nature of this field also brought about a sizable body of literature. The intricate relations among the connected disciplines made it even harder to track its status quo. I was thrilled to find such an encompassing and also quite selective textbook and couldn't wait to recommend it to its potential readers.

The book consists of seven chapters. The first chapter provides a general introduction to SLP research. It is followed by six chapters, two corresponding to each of the three sub-areas of SLP respectively: phonological processing, lexical processing, and sentence processing. There may be two reasons that every sub-area spans two chapters instead of one. First, it takes too many pages to cover one sub-area in one chapter. Second, each chapter adopts different perspectives regarding the same topic. Sufficient background information about a topic is provided in the

preceding chapter before a deeper discussion of research questions and empirical findings in the ensuing chapter. For example, Chapter 2 provides an introduction to concepts, methods, and theoretical models related to L2 phonological processing while Chapter 3 reviews current research that has examined how such factors as L1, age, L2 experiences, segment-related factors, and training affect phonological processing and development. Readers of diverse research backgrounds will greatly appreciate the friendly content arrangements. They can easily locate the relevant information in which they plan to invest more time.

The study of SLP can be traced back to James McKeen Catell's (1887) research. It is "concerned with the mental processes involved in the receptive and productive use of a second language" (p. 2). The aim of SLP research manifests its natural bounds to second language learning and acquisition. The readers will be reminded repeatedly of this aim throughout the textbook. Chapter 1, "Introducing Second Language Processing," is especially useful for newcomer researchers in SLP because it provides a broad and highly evaluative introduction to the core issues in SLP. Reading this chapter gradually cleared up for me some misconceptions regarding SLP and helped me form a clear picture of the common concerns of SLP research such as the shared characteristics of its three areas, the recurrent themes in SLP research. The discussions of these issues are accompanied by abundant literature citations and boxed sentence examples. Although most of the topics and discussions in Chapter 1 are revisited in greater depth in succeeding chapters, it is no doubt that the introductions in Chapter 1 offer a much higherlevel summary. Therefore, the readers could refer back to the introduction part whenever they intend to draw conclusions or obtain more generalized information.

Understanding speech as intended and producing it in an intelligible way are the most challenging aspects of language learning for many L2 speakers (p. 33). That may be the reason that research in L2 phonological processing has made huge progress "in the amount of research output accumulated, in the breadth of topics covered, in the scope of non-native phonological phenomena revealed, and in the methodological advances made" (p. 73). Basically, Chapter 2 provides the background knowledge for understanding L2 phonological processing research. Important issues such as the processes of speech production, the acoustic cues, how languages differ in phonology, and the theoretical models related to L2 phonological processing have been addressed in great detail. However, because of the interdisciplinary nature of SLP research, researchers outside the scope of phonological study may not be familiar with the technical terms in phonology such as phonotactics (how sound segments are sequenced in a language). That does not mean that they can skip the two chapters regarding phonological development, which

is an important aspect of second language development. In fact, almost all L2 phonological processing topics are related to the acquisition issues of second languages. Therefore, I still strongly suggest that everyone who intends to do research on SLP read the two chapters and reflect on how research on L2 phonological processing sheds lights on other areas of SLP.

Research on L2 lexical processing is probably the broadest in scope and the richest in the topics among the three main L2 processing areas (p. 183). Chapter 4 reviews research on word recognition in L2 in general, while Chapter 5 deals with the processing of complex words and multi-word units and semantic processing in L2. While reading the two chapters, I was deeply impressed by Professor Jiang's clear presentations of his summaries and discussions concerning the core issues in L2 lexical processing such as the five characteristics of lexical representation, the four methods, and the six effects of lexical processing research, to name just a few. This is especially useful for novice researchers on SLP because they will enjoy the step-by-step guide and quickly form a full picture of the intended research strands. One of the most interesting parts in Chapter 4 is the discussion of the similarities and differences in lexical processing between L2 and L1. Readers of different L1 backgrounds can gain an insight into how the two languages may inform each other in lexical processing strategies. Professor Jiang also warns that all the findings in L2 lexical processing "have yet to be further explored" (p. 183). In Chapter 5, Professor Jiang makes a rare distinction among the different types of multi-word units: formulaic sequences, lexical bundles, collocations, and idioms, and explores the psycholinguistic and cognitive mechanisms in the processing of these L2 complex lexical units. A common question that has been repeatedly raised is: "Are the L2 complex lexical units represented holistically or in a decomposed way?" In my opinion, the search for the answer to this question has driven most of the empirical studies in this strand in the past few decades. And the answer is still in the air.

The last two chapters (6 and 7) address SLP at the sentence level. Chapter 6 focuses on parsing, the process whereby a syntactic structure is built on the activated lexical information, while Chapter 7 deals with the acquirability topic, a new line of sentence processing research since the 2000s. In my view, although a majority of sentence processing studies explore the parsing issue, irrespective of L1 and L2, the L2 acquirability issue has caught more attention in the past decade for its close connection to second language acquisition and its huge potential for feedback on language teaching. According to Coughlin and Tremblay (2013), whether adult non-native speakers are able to develop nativelike competence stands as the core of the acquirability issue and is still an ongoing debate. A lot of

comparative sentence examples are used to help readers understand the difficulties in sentence processing, such as sentence ambiguities, garden-path effects, etc.

A number of obvious strengths should be identified. First of all, as an introductory textbook on SLP, it has indeed covered all the important topics and provided full-scale summaries. Readers don't have to worry that they may miss any seminal studies that helped shape the development of a topic. However, no attempt is made to offer an exhaustive review of all the published studies on a topic. Readers may not feel overwhelmed by the abundant literature citations as well. It has achieved a delicate balance between comprehensiveness and typicality. Second, in terms of readability, Professor Jiang arranges his topic in a logical manner and presents the contents with precise and concise academic language. All his finely crafted summaries are presented in a clearly structured mode. Third, although SLP is a very complex research area involving the knowledge of a variety of disciplines, readers of different research backgrounds can locate their interest chapters or topics quickly, get familiar with the status quo of a research topic, and push the research boundaries. Beginner researchers will benefit more from this logical development of ideas in all chapters. However, due to space constrains, bilingual processing, another important topic in SLP, is not addressed in this book. This book is undoubtedly of value to its intended target audiences. Graduate students and scholars who are interested in SLP or those in the field of psycholinguistics, second language acquisition, applied linguistics, will find this book useful, even indispensable. It deserves my wholehearted recommendation.

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