

PREFACE

THE impetus for this book came about on February 22, 2001, during a plane flight to the West Coast Conference on Formal Linguistics (WCCFL) conference in Los Angeles, where Michelle Moosally and I were presenting a paper on subject/verb agreement in Ndebele. Inside the trade catalog in the seat pocket in front of me, I found an ad for an Accelerated Learning (AL) foreign language program based on a set of principles called *suggestopedia*. AL methods have their origins in the work of a 1960s era Bulgarian psychic named Georgi Lozanov. I remembered Lozanov from my grad school days back in the 1980s, though I had assumed that the world had long given up on his bizarre instructional methods, which had once laid claim to some comically exaggerated successes in foreign language learning. Wenger (1983), for instance, had insisted that AL was “several hundred times” as efficient as traditional methods.

Lozanov himself was more modest, suggesting that his special teaching techniques would allow you to learn foreign languages at only 25 times the normal rate. He also insisted that those same techniques can be used to treat allergies, skin diseases, ulcers, and myopia. A smattering of academic institutions briefly flirted with AL methodology in the 1980s and 1990s. Only a few ever adopted AL on a wide scale, and most of those that did abandoned it for something else before long. This meager interest in AL among mainstream foreign language specialists was not surprising; anyone who has struggled with a foreign language in adulthood would have a hard time taking AL seriously.

AL was, on the other hand, warmly embraced in the private sector. To this day there are dozens of private language training centers worldwide that use one variant or another of AL methodology. Almost all of them still cite Lozanov as a guru on matters concerning the psychology of adult second language acquisition and still boast of successes far beyond what anyone can hope for in a traditional academic setting (although the magnitude of the claims has been scaled back from the hundreds to just two or three times as effective as other methods). One other thing all these companies have in common is the disparity of evidence they present in support of their products. The old saw in rational inquiry is that extraordinary claims demand extraordinary evidence. By the same token, the things we call compelling claims are supposed to be supported by compelling evidence. Promising claims can get away with promising evidence, interesting claims with interesting evidence, and so on for any number of adjectives you can think of. In the case of the two mainstream theories that play a prominent role in this book—evolution and generative grammar—the evidence ranges,

depending on whom you ask, from consistent to overwhelming. In the case of AL, it hovers around non-existence.

What is even more galling is that Lozanov's (1978) masterwork *Suggestology and Outlines of Suggestopedya* comes with all the superficial trappings of real scholarship; his credentials as a medical doctor, the copious footnotes, the research center established and funded by the Bulgarian government, the innumerable references to studies conducted at that center, and so forth. One can easily imagine how consumers might end up thinking that AL teaching methods, whose advocates had been none too kind to the standard methods used in universities, actually bore the stamp of academic legitimacy. That illusion of legitimacy dissipates rather quickly when one tries to track down the studies Lozanov mentions in his book. Evidence, in the world of suggestopedia, is that rare mythical beast like Bigfoot that vanishes the minute you start looking for it. There is something profoundly unjust about a situation in which mainstream researchers and graduate students labor away at some problem concerning language acquisition, design the best studies they can, and publish their results for all to see—even when those results are not what they might have hoped for—while a small minority outside the mainstream either pays lip services to the research process or skips it altogether, and then goes on to make the most outrageous claims imaginable. They often find a way to do so for remuneration well beyond what most academics can expect.

It was all more than I could bear, so not long after the WCCFL conference I decided to write an exposé of suggestology for *Skeptic* magazine. That marked the beginning of a very rewarding five-year diversion from my research on second language acquisition into the world of the paranormal and extraordinary claims in general. At the time *Skeptic* was deeply involved in the American quarrels over creationism and the teaching of evolution in public schools. Creationism, I learned, had somehow managed to surpass suggestopedia in outlandishness. Darwinian natural selection has grown into a theory that is astonishingly vast in scope, rich in detail, and has been independently and consistently confirmed by evidence from virtually every discipline it affects. Creationism, on the other hand, can be reduced to a single syllogism with exactly one premise—that is, a number of fundamentalist theologians have agreed upon a peculiar interpretation of the Bible, and therefore the universe was created, as is, about six thousand years ago. The intellectual shallowness of the creationist enterprise has done little to impede its expansion, however. Once limited to quarrels with the natural sciences, it has branched out into the humanities and social sciences as well, a topic that will be addressed in Chapter 4 of this work. The Institute for Creation Research and Answers in Genesis have research archives that include papers on topics as diverse as history, anthropology, educational psychology and, yes, linguistics. Even more dismaying is the fact that this new interdisciplinary

approach to creationism has received the blessing of presidential candidates, high-ranking school administrators, and even the ACLU. One worries that the humanities and social sciences are now destined to become the junkyard of junk sciences that other disciplines have already rejected contemptuously.

And yet, the humanities and social sciences in general and linguistics in particular are by no means under siege. Evolutionary studies have been branching out, even as creationism has, into areas like psychology, ethics, and linguistics. These studies have brought with them some truly exciting new insights into the way humans interact with their environments and with each other. Jackendoff (2002, p. 231) has gone so far as to say that nowadays “evolutionary talk is rampant” in language studies. So far, those studies have been limited to the history of language, **neurolinguistics**, and first languages acquisition; bilingualism and adult second language acquisition (SLA) have not yet been even superficially investigated from the evolutionary perspective. This book is an attempt to fill that void and to carve out a niche in the evolutionary landscape for SLA. Like many contemporary studies of evolutionary theory, the present work is an interdisciplinary approach. It draws heavily from theoretical linguistics (in Chapter 1), in **neurolinguistics** (Chapter 2), from anthropology and paleontology (Chapter 3), from old-fashioned rational inquiry (Chapter 4) and, finally, from SLA proper (in Chapter 5).

Obviously, then, this book would not have been possible without the groundbreaking work of many others. To those individuals I owe both acknowledgments and gratitude. Those who have had the most profound influence on what I have written here are people I have never met, but whose works I have read over and over again, each time with a new understanding of language and human nature. Foremost among them are Noam Chomsky, Gerald Gazdar, Ewan Klein, Geoffrey Pullum, Ivan Sag, Carl Pollard, Steven Pinker, Eric Lenneberg, Philip Lieberman, E. O. Wilson, Matt Ridley, Robert Wright and, of course, Charles Darwin. My acknowledgment of their contributions to linguistics and evolutionary studies does not, of course, amount to an endorsement on their part of anything I have written. I alone am responsible for the errors and shortcomings in this book.

I would be remiss if I did not also acknowledge the contributions of my own professors, especially Georgia Green, Jerry Morgan, Alice Hadley, Molly Mack, Federico Carrillo, Sandra Savignon, and Lyle Bachman. In my twenty-plus years in the profession, I have never met their standards of excellence in teaching.

I am especially indebted to Michael Shermer, Kim Ziel Shermer, and Pat Linse at *Skeptic* who provided me with a forum for many of the themes that turn up in the chapters that follow, and who edited some initial versions of this work. They were, moreover, gracious enough to agree to a reprinting of parts of some of my articles from *Skeptic* in this volume. For example, the section on suggestopedia and AL in Chapter 5 appeared in shorter form as “Pseudoscience at 30,000 feet”

(Hagen, 2002), and parts of my review of creationist linguistics in Chapter 4 first appeared as “Creationism’s expanding universe” (Hagen, 2003). I must at the same time thank the many readers of *Skeptic* for hearing me out. I should also point out that parts of my discussion in Chapter 3 come from a paper titled “The Evolutionary Foundations of the Adult Second Language Acquisition,” which was presented at the 2007 Annual Conference of the American Association of Applied Linguistics. That paper, in turn, subsequently appeared as “The bilingual brain: Human evolution and second language acquisition” in *Journal of Evolutionary Psychology* (Hagen, 2008). I am grateful to Ted Shackelford, Steven Platek, and Jaime Thomson at the JEP for their insightful editorial assistance. Acknowledgments and thanks are also owed to Lisa Morano, Michelle Moosally, Yvonne Kendall, and Terry Kidd at the University of Houston–Downtown for helping me flesh out many of the ideas I present in this work. Anita Garza and Alice Lewis, also of UH–Downtown, assisted by securing much of the research material on which this book depends. The librarians at the University of Texas–Austin were equally helpful, as librarians invariably are. Kelly Sippell at the University of Michigan Press and Brenda Myers also helped immeasurably by critiquing, proofreading, and editing the manuscript.

Finally, let me thank the students at the University of Houston–Downtown, too numerous to mention individually, who for the past decade have read and critiqued many preliminary versions of the chapters in this book. Their candor and attentiveness to detail have been helpful beyond measure. I hope they have benefited from this book as much as I have benefited from their input.