NECESSARY BIAS IN NATURAL LANGUAGE LEARNING

By

Lisa Sue Pearl

Dissertation submitted to the Faculty of the Graduate School of the
University of Maryland, College Park, in partial fulfillment
of the requirements for the degree of
Doctor of Philosophy
2007

Advisory Committee:
Professor Amy Weinberg, Chair
Professor Jeffrey Lidz
Professor William Idsardi
Professor Charles Yang
Professor James Reggia

Dedications

To Amy Weinberg, who put up with a ridiculous number of last minute questions and drafts of *everything*. With good humor, to boot.

To Norbert Hornstein, who was always exceptional at convincing me that my ideas were any good. He's really quite persuasive.

To Charles Yang, whose work inspired all of this. More than once.

To Jeff Lidz, who helped me figure out how to write things that were actually comprehensible and who was always full of even more ideas.

To Bill Idsardi, who was also always full of even more ideas and who made me think very carefully about all my mathematical work.

To Philip Resnik, whose boundless energy and enthusiasm and questions completely inspired me time and time again.

To David Lightfoot, who taught the first theoretical linguistics class I ever took and who I wanted to grow up to be.

To Michelle Hugue, who taught me how to make computation into a tool and about how there are so many different ways to measure success.

To Peggy Antonisse, whose thoroughly sensible advice and calming influence were welcome balm in times of great stress and panic.

Acknowledgements

This work would have been a long time in coming without the listening ears, unwavering support, and good advice of many, many people, among them: Amy Weinberg, Norbert Hornstein, Charles Yang, Jeff Lidz, Bill Idsardi, Philip Resnik, David Lightfoot, Michelle Hugue, Peggy Antonisse, Colin Phillips, Andrea Zukowski, Heather Taylor, Brian Dillon, and Ivano Caponigro. This work was additionally supported by a National Science Foundation Graduate Research Fellowship.

Table of Contents

List of Tables

List of Figures