

CHAPTER 1

INTRODUCTION

1.1 Preliminaries

This thesis addresses the pre- a_1 and $-a_2$ suffix tonal changes in Taiwan Southern Min employing an Optimality Theory (OT hereafter, Prince and Smolensky 1993, 2004) and a Harmonic Serialism approach (HS henceforth, Chen 2000, McCarthy 2000, 2008a,b,c), a derivational version of classic OT. There exist two distinctive $-a$'s (Hong 1985, Huang 1988, Xu 1990, Yang 1991, and Lien 1995, amongst others). $-a_1$ is either a suffix or an infix, and serves as a diminutive. $-a_2$, on the other hand, suffixes to kinship terms and first names to denote intimate interpretation.

$-a_1$ is also different from $-a_2$ in phonetic and phonological forms. Phonetically, $-a_1$ carries a high-falling (HM) tone in isolation, whereas $-a_2$ bears a neutral tone (Cheng 1973, Yip 1980, Hong 1985, 1995, Huang 1988, Xu 1990, Yang 1991, Lien 1995, Ou 1996, and Tsao 2006, among many others). In addition, $-a_1$ and $-a_2$ demonstrate different tonal behavior phonologically. In $-a_1$ suffixation, $-a_1$ retains its high falling tone, but the preceding syllable undergoes tone change. Cheng (1973) reasons that the pre- a_1 syllable undergoes an extra tone change to prevent two successive falling tones. Yip (1980) and Ou (1996) suggest that the extra tone change be leftward tone spreading. In $-a_2$ suffixation, on the other hand, Yang (1991) and Lien (1995) point out that $-a_2$ is toneless underlyingly. It surfaces with a neutral tone

and is unstressed accordingly. In $-a_2$ suffixation, the pre- a_2 syllable preserves the citation tone; while $-a_2$ surfaces with either a tone spread from the preceding syllable or a default low. In other words, $-a_2$ is subject to either rightward tone spreading or insertion of a default low tone.

1.2 Research Questions

As observed in the previous studies, the pre- a_1 tone change proceeds with two steps, which may require multiple steps of derivations and rule-ordering. This rule-based mechanism, nevertheless, has been criticized as undesirable for its machinery. The classic OT (Prince and Smolensky 1993, 2004), a non-derivational approach, has been proposed to remove the complex machinery of the multiple derivations, and operates the mapping from input to output within one step, known as parallelism. The question then is how parallel OT explains the serial tone change of the pre- a_1 syllable in one-step fashion. McCarthy (2000, 2008a,b,c) proposes a derivational variant of classic OT, referred to as Harmonic Serialism, which introduces the idea of gradual harmonic improvement. In this thesis, we will also examine this alternative analytical approach to examining what phonological steps are involved in the pre- a_1 tone change, and how register and contour spreading may play a role. At this point, we will also look at the relation between register and contour in terms of tonal geometry. The pre- a_1 syllable displays two tonal variants. We will look into the theory of cophonology (Orgun 1996, 1998, 1999, Anttila 1997, 2000, Inkelas 1998, Orgun and Inkelas 2002, and Inkelas and Zoll 2005, 2007, among others) and discuss how the constraint re-ranking may account for these variants.

In $-a_2$ suffixation, $-a_2$ also has two tonal variants derived by either tone spreading or default L insertion. Throughout this thesis, we will investigate how classic OT

accounts for the $-a_2$ suffix tone change, and what derivational steps are involved under the framework of HS. In addition, we will probe into how register and contour spreading operate in $-a_2$ suffixation. We will also examine how constraints are ranked to govern $-a_2$ suffix tonal change, and how constraint re-ranking may account for the tonal variants of $-a_2$.

1.3 Organization

This thesis consists of five chapters. The first chapter presents the motivation behind this current research, and lays down the research questions. Chapter 2 reviews relevant theoretic frameworks, including autosegmental phonology, tonal geometry, classic Optimality Theory, Correspondence Theory, Cophonology and Harmonic Serialism. Chapter 3 discusses the pre- a_1 tonal alternation. Chapter 4 addresses the hypocoristic $-a_2$ suffix tone change. Chapter 5 is the conclusion.