โครงสร้างนามวลีในภาษาจ้วงถิ่นเทียนเติ่ง

นายฟรองซัว ลองเชลล่า

วิทยานิพนธ์นี้เป็นส่วนหนึ่งของการศึกษาตามหลักสูตรปริญญาอักษรศาสตรมหาบัณฑิต สาขาวิชาภาษาศาสตร์ ภาควิชาภาษาศาสตร์ คณะอักษรศาสตร์ จุฬาลงกรณ์มหาวิทยาลัย ปีการศึกษา 2555 ลิขสิทธิ์ของจุฬาลงกรณ์มหาวิทยาลัย

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THE NOUN PHRASE STRUCTURE IN THE ZHUANG DIALECT OF TIAN DENG

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A Thesis Submitted in Partial Fulfillment of the Requirements for the Degree of Master of Arts Program in Linguistics Department of Linguistics Faculty of Arts Chulalongkorn University Academic Year 2012 Copyright of Chulalongkorn University

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วิทยานิพนธ์ฉบับนี้ มีวัตถุประสงค์เพื่อศึกษาโครงสร้างของนามวลีในภาษาจ้วงใต้ถิ่นเทียนเติ่ง งานวิจัยชิ้นนี้ มุ่งวิเคราะห์คุณสมบัติทางวากยสัมพันธ์และอรรถศาสตร์และลำคับการปรากฏของหน่วย ต่างๆ ที่สามารถปรากฏในนามวลี นอกจากนี้ ยังมุ่งวิเคราะห์คำลักษณนามของภาษาจ้วงใต้ ในเชิงลึก เพิ่มเติมในสองประเด็น ได้แก่ ก) ประเด็นเรื่องสถานะทางวากยสัมพันธ์ของคำลักษณนามประกอบนามว่า สามารถแยกอิสระจากคำลักษณนามประเภทจำนวนนับได้หรือไม่และ ข) ประเด็นเรื่องการแสดง ความหมายชี้เฉพาะของคำลักษณนามทั้งสองประเภทนี้ข้อมูลที่นำมาวิเคราะห์เป็นข้อมูลที่ได้จากการออก ภากสนามที่หมู่บ้านตี้โจวเมืองเทียนเติ่งมณฑลกวางสีประเทศสาธารณรัฐประชาชนจีน

ผลการวิเคราะห์แสดงให้เห็นว่านอกจากคำนามแล้วยังมีหน่วยต่างๆอีก3ประเภทที่สามารถ ปรากฏในนามวลีได้ได้แก่ หน่วยขยายแสดงปริมาณ หน่วยขยายแสดงศูนย์กลางการอ้างอิง และ หน่วยขยายแสดงคุณสมบัติโดยมีตำแหน่งการปรากฏดังนี้หน่วยขยายแสดงปริมาณมักจะปรากฏใน ตำแหน่งหน้านามคล้ายกับภาษาตระกูลซินิติก หน่วยขยายแสดงศูนย์กลางการอ้างอิงและหน่วย ขยายแสดงคุณสมบัติจะปรากฏในตำแหน่งหลังนามคล้ายกับภาษาตระกูลไตนอกจากนี้ ยังพบว่าภาษา จ้วงใต้มีการใช้หน่วยขยายแสดงคุณสมบัติที่ปรากฏในตำแหน่งหน้านามโดยจะมีกำเชื่อม*แป*รากฏ

ผลการวิเคราะห์ในเรื่องคำลักษณนามแสดงให้เห็นว่า ถึงแม้ว่า คำลักษณนามประกอบนาม จะสามารถปรากฏเป็นหน่วยขยายเดี่ยวในนามวลีโดยปราศจากหน่วยขยายประเภทอื่นๆ ได้ อย่างไรก็ตาม ระบบ การใช้คำลักษณนามประกอบนามนั้นก็ยังไม่เป็นอิสระอย่าง ชัดเจนจากระบบการใช้คำลักษณนาม ประเภทจำนวนนับ ทั้งนี้เนื่องจากยังมีผลิตภาวะในระดับที่ไม่สูงเพราะพบคำลักษณะนามประกอบ นามเพียงคำเดียวคือ tu4 ที่มีความถี่ใน การปรากฏสูง นอกจากนี้ คำลักษณนามประกอบนาม และ คำลักษณนามประเภทหน่วยนับในภาษาจ้วงใต้ไม่ได้บ่งชี้ความหมายชี้เฉพาะถึงแม้ว่าจะสามารถแสดง ความหมายเฉพาะเจาะจงได้กีตาม

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The purpose of this study is to describe and analyze the structure of noun phrase in the Zhuang dialect of Tian Deng. This study further aims at providing an in-depth study of the classifier system of Southern Zhuang, in order to establish whether noun classifiers can be regarded a distinct category from numeral classifiers, and whether they are involved in encoding definiteness. In order to meet these objectives, the analysis is based on naturalistic data collected during two months of fieldwork in the Dizhou village, Tiandeng County, Guangxi Zhuang Autonomous Region.

The findings are as follows. Modifiers come in three sub-types: quantifying modifiers, deictic modifiers, and attributive modifiers. Quantifiers primarily occur in prenominal position, as in Sinitic languages, and deictic and attributive modifiers in postnominal position, as in Tai languages.

Although a classifier can occur with a noun in absence of any modifier, doubts remain as to the existence of a fully productive noun classifier system. Indeed, only the classifier *tu4* 'CLF:NON-HUMAN' was found to routinely co-occur with a noun, both in citation form and in conversational data. At any rate, it can be established that it is not involved in encoding definiteness, though there is evidence supporting a correlation with specificity.

Department : Linguistics Field of Study : Linguistics Academic Year : 2012 Student's Signature Advisor's Signature

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LIST OF ABBREVIATIONS

1	first person
2	second person
3	third person
ASSOC	associative marker
CLF	classifier
СТ	class term
COMPL	complementizer
СОР	copula
DEM	demonstrative
DIST	distal
NEG	negation marker
ORD	ordinal
PART	particle
PFV	perfective aspect
PL	plural
POL.Q	polar question marker
PROX	proximal
REDUP	reduplication
SG	singular
ТОР	topic marker

CHAPTER 1

INTRODUCTION

1.1 Preliminaries

1.1.1 Rationale

This thesis deals with noun phrases in Southern Zhuang, a Central Tai dialect group spoken in the Guangxi Zhuang Autonomous Region, Southern China. Two main reasons motivate the choice of this topic.

First, dialects of Southern Zhuang have received relatively little attention in comparison to dialects of Northern Zhuang, at least in the English literature (see Section 1.3).

Second, the review of the few available sources on Southern Zhuang reveals some interesting phenomena at the level of the noun phrase, such as the putative variability in ordering between the numeral classifier phrase and the head noun, and the use of classifiers in combination with a noun, independently of the occurrence of any modifier.

1.1.2 Methodology

I first became acquainted to Southern Zhuang in Bangkok, through elicitation sessions with Lu Meigui, then a Master student in Chulalongkorn University, who had been living in Bangkok for two years and spoke excellent Thai. Although our first working sessions provided some interesting insights into the language, it soon became evident that my research would only be conclusive if the language was studied in its original setting. First, material elicited with Lu Meigui contained several structures that I suspected to result from prolonged exposure to Thai, as in (1) below, a transparent calque from Thai that was unanimously rejected by the speakers I asked while doing fieldwork.¹ Second, Bangkok-based data collection would have involved elicited data only, which would have seriously undermined my analysis of discourse-related phenomenon such as the hypothesized correlation between classifier use and definiteness.²

(1) *ma4 tu4 luŋ4 tu4 dam1
 dog CLF:NON-H big CLF:NON-H black
 Intended meaning: 'a big black dog'

The data informing my study were collected during fieldwork conducted in the Dizhou village in November and December 2010. With the help of my main informant, 25 years old Zhao Caizhun, I proceeded to collect data as follows. The first fifteen days were dedicated to lexical elicitation. I had prepared a word list arranged by themes, as preconized in Dixon 2010 (Dixon 2010: 126). Prompts were provided in Mandarin Chinese. The main purpose was to have a clear enough idea of the phonological system, and also to learn enough basic vocabulary to be able to efficiently work with my informant when glossing simple recorded texts. I then moved on to record speech sequences, and transcribe them with my informant. Besides my informant, all recordings feature elderly women, who for the most part had

¹ Thai examples were checked with my Thai colleagues of the Department of Linguistics, Chulalongkorn Univiersity. All of them are native speakers of Standard Thai.

² Lu Meigui indeed reckoned that she would not be able to provide narratives such as folktales. Furthermore, I could not have obtained conversational data since she was the sole native speaker of Southern Zhuang who would have been available to work with me.

at best only rudimentary knowledge of Mandarin Chinese.³ My corpus is about 6000 words long and mostly consists of conversations between my informant and elderly woman, on topics such as gardening, traditional Zhuang cuisine, daily life in the village, as well as a lengthy text in which the local traditions and festivals were explained to me.

Further elicitation was conducted on the basis of the transcribed texts, for example to test whether a classifier could be omitted or added in a given environment, or if a modifier occurring in prenominal position in the original sentence could be postposed to the noun. This method turned out to be highly preferable that direct elicitation of constructed examples. My informant was indeed inclined to consider Mandarin Chinese as the standard to assess the correctness of a sentence in Southern Zhuang, which often lead to over-correction, such as in example (2a), which my informant subsequently corrected to (2b), which matches word for word its translational equivalent in Mandarin Chinese, as in (2c). (2b) was later on infirmed by other speakers.

- (2) a. no2 khjrm4-thu4 hrn4 lej1
 1sG hair-head very long
 'Me, [my] hair is very long.'
 - b. *ŋo2 ti1 khjxm4-thu4 hxn4 lej1
 1sG ASSOC hair-head very long
 Intended meaning: 'My hair is very long.'
 - c. *wŏ de tóufă hĕn shăng* 1sg Assoc hair very long

³ Although I intended that a substantial part of my data came from monolingual speakers, the choice of elderly speakers was not entirely deliberate. Indeed, elderly women were the only villagers with idle time in their hands, the rest of the village being busy working in the fields.

'My hair is very long.'

1.1.3 Objectives

This thesis aims:

- 1. To provide an analysis of the noun phrase structure in the Zhuang dialect of Tiandeng, covering the types of elements occurring in the noun phrase and their relative ordering
- 2. To address two selected theoretical issues: the use of noun classifiers and the expression of definiteness in the Zhuang dialect of Tiandeng

1.1.4 Hypothesis

A set of four hypotheses forms the starting point of my analysis.

- 1. A noun phrase in the Zhuang dialect of Tiandeng consists of one head noun and six modifying elements: a quantifier, a classifier, an adjective, a demonstrative, a possessor phrase and a relative clause.
- 2. Among the six modifying elements, only the quantifier and the classifier occur on either side of the head noun.
- 3. Noun classifiers form a distinct category from numeral classifiers in this language.
- 4. Classifiers are one of the devices used in this language to indicate definiteness.

1.1.5 Significance and usefulness of the research

It is hoped that this thesis will be useful in the following ways.

- 1. To provide a model in describing the noun phrase structure in other dialects of Zhuang
- 2. To provide descriptive materials essential in the typological study of languages
- 3. To contribute to a better understanding of the diversity of the Tai languages

1.2 Background Information about the Language

1.2.1 The Zhuang people

The Zhuang people make up the most populous of the 55 ethnic minorities officially recognized by the government of the People's Republic of China, on top of the Han ethnic group. The Zhuang language is mostly spoken in Guangxi Zhuang Autonomous Region, Southern China, with additional Zhuang speaking areas in neighboring areas such as Guangdong, Hunan, Guizhou and Yunnan provinces (Luo, 2008). The Zhuang language is traditionally divided into two major dialect areas classified under different Tai groups (Edmondson, 1993; Luo, 2008): Southern Zhuang (Central Tai) and Northern Zhuang (Northern Tai).

Estimates of the total numbers of speakers vary. A 1990 government census made count of 15.5 million Zhuang people, close to Edmonson's estimate (Edmonson, 1994). Based on a projection from the 1990 census, Luo (2008) proposes the approximate figure of 18 million speakers, with about two thirds of the speakers living in the Northern Zhuang speaking area. Aside from the lack of reliable statistics, estimates about the number of speakers may sound all the more hazardous since the term Zhuang itself refers more to an administrative than a linguistic reality. Edmonson thus reports that the "Zhuang people do not have a unified way of referring to themselves", and that more than twenty "autonyms" can be listed (Edmonson, 1994).⁴ The term Zhuang itself was indeed coined by the Chinese central authorities to refer to what was regarded as a single ethnic group (Palmer, 2000). Ethnically and linguistically, the term "Zhuang" can therefore be regarded as vague since, on the one hand, several non-Zhuang people such as the E and Laji fall under the "Zhuang" header in the official Chinese classification (Edmondson, 1994), while on the other hand speakers of Bouyei, a dialect closely related to Northern Zhuang, are classified as a distinct ethnic minority for they mainly reside in Guizhou province.

To conclude this section, a note on the language contact situation is in order. Sio and Sybesma (2008) note that "the vast majority of Zhuang people who do speak Zhuang is bilingual, some variety of Chinese being the other language". One reason to explain the high level of bilingualism might be the lack of mutual intelligibility between the Southern and the Northern varieties, as well as the high degree of variations within the two dialect areas, resulting on the widespread use of Sinitic vernacular languages (such as Southwestern Chinese or Cantonese) as *lingua franca*. Another, more obvious, reason is the pervasiveness of Mandarin Chinese, a consequence of the successive waves of migration of Han people, which resulted in intermarriages, economic and political dominance of the Han and the use of Mandarin Chinese in media, official occasions and as the medium of instruction (Huang, 2007).

⁴ The speakers of the dialect I studied refer to their language and to themselves as *tho6*, which as an adjective means 'local', e.g. *va2 tho6* 'local language', *kxn1 tho6* 'local people', *fxŋ1su1 tho6* 'local tradition', *cw4-man2 tho6* 'locally produced chilly/chilly paste'.

1.2.2 The Southern Zhuang dialect of Tiandeng

This study is based on a dialect of Southern Zhuang spoken in Tiandeng County, which approximate location lays halfway between the city of Nanning and the international border with Vietnam. Field location was Dizhou village, a rural village of approximately 1,000 inhabitants. Nearly all speakers under 60 had received at least primary education, and therefore were proficient in Mandarin Chinese.

As noted in the preceding section, Zhuang languages are characterized by a high degree of dialectal variations. A particularly salient example of variation at the phonological level involve reflexes of the PT cluster *pl-. Proto-Tai *pl- is reflected as /pj-/ in most Southern Zhuang dialects (Pittayaporn, 2009: 147). Whereas this applies to the villages surrounding Dizhou village, the Dizhou dialect differs, e.g. pla:^A > kja4 'fish'. Pronominal forms also vary from a village to the other, e.g. no2 '1sG' and ni2 '2sG' (Dizhou village) vs. kaw4 '1sg' and maw1 '2' (Daoxiang village, located 200 meters away from Dizhou village). Dialectal variations may also possibly affect noun phrase structure, though I do not have data about this. I indeed collected data from speakers who were born and grew up in Dizhou village only, in order to build up a corpus that would be as homogeneous as possible. Therefore, the label 'Southern Zhuang' (which will be used in the remaining of this thesis to refer to the dialect spoken in Dizhou village) does not imply that this dialect should be regarded as particularly representative of Southern Zhuang dialects as a whole.

1.3 Literature Review

1.3.1 Previous studies addressing noun phrase structure in Zhuang languages

As noted in Section 1.1.1, the English literature on Southern Zhuang languages is relatively scarce in comparison with that on other Zhuang languages. With regards to Northern Zhuang, a recent paper by Sio and Sybesma proposes a descriptive examination of the dialect spoken in Wuming county, based on an extensive review of previous works published in Mandarin Chinese and complemented by their own data (Sio and Sybesma, 2008). Closer to Southern Zhuang, Nung, a Central Tai language spoken in Vietnam, has been the topic of several publications, including one dealing specifically with classifiers (Saul, 1965). To the best of my knowledge, no such detailed description exists for a dialect of Southern Zhuang, although various aspects of Southern Zhuang dialects have been studied by Thai scholars (Kullavanijaya, 1986; Chumnirokasant, 1995; Burusphat and Zhou, 2008). These studies provide useful lexical surveys of classifiers, by far the most complete and systematic being the comparison of classifiers in Tai-Kadai languages by Burusphat and Zhou (2008). Besides lexical studies of classifiers, of particular interest are remarks on constituent ordering within the numeral noun phrase.

In his typology of classifier languages in Southeast Asia, Jones (1970) distinguishes between the "Chinese type" and the "Southeast Asian type", the former following the [Numeral + Classifier + Noun] pattern while in the latter the head noun occurs in initial position: [Noun + Numeral + Classifier]. Southwestern Tai languages such as Standard Thai, Lao and Shan fall under the Southeast Asian type, whereas members of the Northern branch such as Wuming Zhuang mostly pattern with Chinese. Central Tai languages hardly

fit into either category as a whole, with languages such as Nung (Saul, 1965) exhibiting the Chinese type while other languages such as the Southern Zhuang dialects of Jingxi, Debao, Wutang (Chumnirokasant, 1995) are reported to allow both orders. However, Chumnirokasant's account, which primarily focuses on the lexical inventory of classifiers in these languages, does not provide details about the context of occurrence of the two constituent orders. Furthermore, her account conflicts with previous studies on Debao Zhuang. Luangthongkham and Kullavanijaya (1986: 21-22) indeed report for Debao Zhuang only one possible order (Chinese type) in quantification context, as in (3a), although the Southeast Asian type is preferred in presence of nominal modifiers, as in (3b). Although the two orders are attested in Dizhou Southern Zhuang, I show that they correspond to two different constructions, and that the noun-final variant can be regarded the unmarked, basic order (see Section 3.3.1).

- (3) Debao Zhuang; Luangthongkham and Kullavanijaya 1986: 21-22
 - a. *{oŋ22 tu52 kaj44* two CLF chicken 'two chickens'
 - b. *kaj44 ke44 {oŋ22 tu52 tan31* chicken old two CLF DEM 'these two old chickens'

1.3.2 Key concepts

1.3.2.1 Noun phrase

Following Dryer (2007: 151) and Dixon (2010: 106), a noun phrase is defined as a phrase that can fill an argument slot in clausal structure.

1.3.2.2 Modifiers

A modifier can optionally occur in a noun phrase to specify the referent of the noun in different ways. Three types of modifiers can be distinguished: quantifying modifiers (numerals and other quantifiers), deictic modifiers (demonstratives), and attributive modifiers (adjectives, possessives and relative clauses). Each of these three types, as well as the sub-types they comprise, are reviewed in details in Chapter 2.

1.3.2.3 Classifiers

Following functional-typological approach, classifiers constitute one of the systems of nominal classification found across languages, at par with for example gender systems found in Indo-European languages. The functionaltypological approach to classifier systems is presented at the beginning of Chapter 3 in Section 3.1.1, along with a review of classifier systems in Southeast Asian languages in Section 3.1.2.

CHAPTER 2

MODIFIERS

Modifiers come in three different types: quantifying modifiers (Section 2.1), deictic modifiers (Section 2.2), and attributive modifiers (Section 2.3).

2.1 Quantifying Modifiers

2.1.1 Numerals

The cardinal numbers from one to ten are listed in (4). Ordinal constructions use the same forms as in (4), preceded by the form *taj3* 'ORD'. The ordinal complex may either precede or follow the noun, as shown in (5)

- (4) *?et1, ŋxj2, θa:m4, θej5, ha6, lok4, cet4, pet5, ka:w6, θip4* one two three four five six seven eight nine ten 'one, two, three, four, five, six, seven, eight, nine, ten'
- (5) a. pik2 khaw6 taj3 ha6 θip4 ŋxj2 jip2 paj4
 flick open ORD five ten two page go
 'Open (the book) page 52.'
 - b. pik2 khaw6 taj3 jip2 ha6 θip4 nxj2 paj4
 flick open ORD page five ten two go
 'Open (the book) page 52.'

Southern Zhuang uses two other forms to express the numerals 'one' and 'two', the enclitic = o1 'one' and $\theta o: \eta 4$ 'two'. They differ in their distribution, as summarized in Table 1.

Environment	?et1	лхј2	=01	Өо:ŋ4	Example
	'one'	'two'	'one'	'two'	
as a final unit	yes	yes	no	no	(6)
as ordinal numbers	yes	yes	no	no	(7)
with powers of ten	no	no*	yes**	yes	(8)
with a classifier	no	no	yes	yes	(9)

Table 1Distribution of the different numerals for 'one' and 'two'

* in reduced form only: *μi2 θip4* [two ten] 'twenty'

** with *pak5* 'hundred' and higher powers of ten only

(6)	lok4	Өір4	?et1/ɲej2	*=01/*00:ŋ4
	six	ten	one/two	=one/two
	'sixty	one/tv		

(7)	ksn1	taj3	?et1/ɲej2	*=o1/*0o:ŋ4			
	person	ORD	one/two	=one/two			
	'the first/second person'						

(8)	a.	*?et1	pak5	pak5=01
		one	hundred	hundred = one
				'one hundred'

b.	*nej2	pak5	<i>Өо:ŋ4</i>	pak5
	two	hundred	two	hundred

'two hundred'

(9)	a.	*?et1	kja4	se4	kja4		se4 = 6	01
		one	CLF:VEHICLE	car	CLF:VE	HICLE	car=	one
					'one c	ar'		
	b.	*nej2	kja4	se4	Өо:ŋ4	kja4		se4
		two	CLF:VEHICLE	car	two	CLF:VE	EHICLE	car
					'two cars'			

Complex figures are formed analytically. Powers of ten are expressed with $\theta ip4$ 'ten', pak5 'hundred', sin4 'thousand', fan2 'ten thousand' and a combination of these: $\theta ip4$ fan2 'one hundred thousand', pak5 fan2 'one million'. $\theta ip4$ 'ten' can be ellipsed when followed by a final unit, or by the quantifier ki1 'several'. ki1 can also occur before powers of ten in place of a multiplier, as shown in (14).

- (10) ha6 (θip2) cet4
 five ten seven
 'fifty seven'
- (11) θej5 pak5 lok4 (θip4) ka:w6
 four hundred six ten nine
 'four hundred sixty nine'
- (12) ha6 sin4 θa:m4 pak5 pet5 (θip4) ?et1
 five thousand three hundred eight ten one
 'five thousand three hundred eighty one'

- (13) mej1 θa:m4 (θip4) ki1 2an1 lun1
 exist three ten several CLF:RESIDUE house
 'There are thirty-odd houses.'
- (14)mej1ki1pak5?an1hun1existseveralhundredCLF:RESIDUEhouse'There are several hundred houses.'

Importantly, a numeral and, for that matter, any quantifier, cannot occur on its own as a minimal instantiation of a noun phrase. For instance, a quantifier could not be used alone when answering a question, and must at least combine with a classifier, as shown in (15).

(15)	Speaker A	kha:j4	ka3laıy2	tu4	pet4	ja5
		sell	how.many	CLF:NON-H	duck	PFV
	Speaker B	<i>Өа:т4</i>	*(tu4)			
		three	CLF:NON-H			
	'- How many ducks have (you) already sold?					
	- Three.'					

Powers of ten (hundred and above) are somehow exceptional with regards to the preceding comment insofar as the classifier can be omitted, provided that i. the noun is left unexpressed ii. the numeral = o1 'one' is expressed. Thus, in answer to (15), we have:

(16) a. * *pak5* hundred

b. pak5 = o1hundred = one 'one hundred'

b. pak5 tu4 = o1hundred CLF:NON-H = one 'one hundred'

c. * pak5 kaj5 = o1hundred chicken = one

Note that in this respect Southern Zhuang differs from Nung, which Aikhenvald cites as one of the many languages in which classifiers "are obligatory with small numbers, and optional with larger ones" (Aikhenvald, 2000: 100; Saul and Wilson, 1980: 27).

2.1.2 Non-numeral quantifiers

2.1.2.1 Universal quantifiers: 'all', 'each', 'every'

Different strategies are available to express universal quantification. The two most frequently used expressions feature loanwords from Sinitic languages. The first of these, exemplified in (17) involves classifier reduplication in (17a) or the quantifier *moj2* 'every, each' (cf. Mandarin Chinese *měi* 'every') in (17b) and the preverbal operator *tu1* 'ALL; ALSO' (cf. Mandarin Chinese *dōu* 'all'). In both cases the noun can be omitted. (18) provides an example of a similar construction in Cantonese.

(17) a. 2an1-2an1 (lun1)tu1 jog2 din1 het4
CLF:RESIDUE-REDUP house ALL use earth make exhaust-lew3-lew3
exhaust-REDUP
'All the houses are completely made of earth.'

- b. *moj2 phyn4* (*pha6*) *tu1 khat5 lew3* every CLF:SOFT blanket ALL torn completely 'All the blankets are completely torn down.'
- (18) Cantonese; Matthews and Yip, 2011: 96 *mhaih jek-jek* (gúpiu) dōu wúih sing ge
 not.be CLF-REDUP share ALL will rise PART
 'Not all (shares) are going to rise.'

Alternatively, the expression $\theta ow4mej1$ 'all', a transparent loan from Chinese (cf. Mandarin Chinese *suŏyŏu (de))*, occurs in a prenominal modifier construction, in which case the classifier is left out. The latter usually occurs in presence of modifiers restricting the set of entities the noun phrase refers to, as in (19).

(19) lok2-?eŋ1, θow4mej1 ti1 lok2-?eŋ1 ?rj5 ne1, paj4
child all ASSOC child small PART go
'The children, all the young children that is, they go.'

Less frequently attested is a 'echo'-type construction, in which universal quantification is expressed at the sentential level, as shown in (20). (20) mej1 ka3laul tu4 pet4, kha6 ka3laul
exist how.many CLF:NON-H duck slaughter how.many
tu4 pet4
CLF:NON-H duck
'(We) slaughter as many ducks as we have.'

The quantifier *moj2* is semantically similar to 'each' and every' in English, insofar as it implies a distributive interpretation that the constructions surveyed above do not. Accordingly, whereas the latter constructions do not usually occur in negative sentences, as shown in (22), a noun phrase featuring the quantifier *moj2* 'each, every' can function as a clausal subject in a negative sentence such as in (21).

- (21) moj2 kvn1 naw5 pi1kan4 ne1
 each CLF:HUMAN NEG be.same PART
 'Each person is different you see.'
 Literally: 'Each person is not the same you see.'
- (22) **kyn1-kyn1 tu1 naw5 pi1kan4 ne1* CLF:HUMAN-REDUP ALL NEG be.same PART Intended reading: 'Each person is different you see.'

The same distributive interpretation can be obtained using the quantifier *taŋ5* 'each', which in combination with the preverbal operator *ka3* 'only' further stresses that different entities of a set are affected differently by the property predicated upon them, as in (23).

(23) *taŋ5 kwn1 ka3 nap4 kin4 naw5 pi6kan4* each CLF:HUMAN only like eat NEG be.same 'Not everybody likes to eat the same.' Literally: 'Each person likes to eat not the same.'

Finally, the modifier $ta\eta 1$ 'all of, whole' differs from other quantifiers insofar as it may occur in a different slot, as shown in example (24) in which it precedes the numeral $\theta o: \eta 4$ 'two'. In combination with a mensural classifier, it selects all the referents classified by the classifier, thus meaning 'all of' in (25). With a sortal classifier, it designates the whole of the classified entity, as in (26).

- (24) taŋ1 θo:ŋ4 ?an1 tu1 het4 mauj5
 all.of two CLF:RESIDUE ALL make new
 'The two of [these houses], [we] built anew.'
- (25) taŋ1 θuŋ6 tu1 cru2 pha6 kaw5-kaw5
 all.of CLF:CHEST ALL COP blanket old-REDUP
 'All the blankets in the chest are really old.'
 Literally: 'The whole of the chest of blankets is old blankets.'
- (26) taŋ1 kwn1 jow5 thaw6-thaw6
 whole CLF:HUMAN be.at warm-REDUP
 'The whole body feels warm.'

2.1.2.2 Indeterminate and approximate quantities

(27) illustrates the use of the quantifiers *ljaŋ1* 'some' and *ki1* 'several'.

(27) *lun1 ljaŋ1 kwn1 ni1, mej1 ki1 ?a:w5*household some CLF:HUMAN TOP exist several CLF:MAN *lok2-ba:w5*child-male
'[In] some people's households, there are several sons.'

As already seen in Section 2.1.1, *ki1* 'several' can also combine with numerals to express approximate number, in place of a final unit or of a multiplier before powers of ten. Additionally, it can follow classifiers denoting a unit of measure such as *kwn4* 'CLF:¹/₂.KILO' in (28), indicating that the total quantity exceeds the unit denoted by the mensural classifier.

(28) ti4 ma1 hau/6 pho1 kxn4 ki1
3 come give grandma CLF:¹/₂.KILO several
'He came to give grandma a bit more than half a kilo [of fish].'

It is unclear whether the quantifier ki1 'several' relates in some way to the plural classifier *gij* found in Northern Zhuang (Miliken, 1998; Sio and Sybesma, 2008), which use is illustrated in (29). At any rate, the form ki1 in Southern Zhuang, similarly to ki 'several' in Nung (Saul, 1965: 281), cannot fill the classifier slot in a numeral classifier construction, as shown in (30).

(29) Wuming Zhuang; Sio and Sybesma, 2008: 7
sou naengh gij daengq neix
2PL sit CLF:PL chair this
'You guys sit on these chairs.'

(30) **ni2 naŋ2 ki1 taŋ6 kin3* 2sg sit several chair DEM:PROX Intended meaning: 'You guys sit on these chairs.'

In affirmative sentences, *trk4* 'about' expresses approximation as to the quantity denoted by the quantifying phrase, which it precedes, as in (31). In negative and interrogative sentences, *trk4* 'any' fills out the quantifier slot, in direct combination with the classifier, as shown in (32) and (33).

- (31) ba:j6-kaj5 ni1, kxn4=o1 ni1, txk4 θa:m4
 CT:MEAT-chicken TOP CLF:¹/₂.KILO=one TOP about three man4 ŋxn1
 CLF:CURRENCY money
 'Chicken, a half-kilo, some three yuans.'
- (32)sek5 θγш4 kin3 ki1 mej1 txk4 sek5 book DEM:PROX several CLF:BOOK exist any CLF:BOOK le1 thin4 naw5 understand POL.Q look 'These books, is there any that you understand?'
- (33) naw5 mej1 trk4 krn1 paj4
 NEG exist any CLF:HUMAN go
 'Nobody went.'
 Literally: 'There wasn't any person that went.'

Numerals from one to ten may occur together as compounds to indicate an approximated small quantity of something, as in (34). The compound form $\theta o: \eta 4$ - $\eta e j 2$, comprising of the two numerals for 'two', can refer to any quantity below ten in (35).

- (34) mak5-ka:m4 ni1, ti4 mej1 ha6-lok4 ko4
 orange TOP 3 have five-six CLF:TREE
 'He has five or six orange trees.'
- (35) van1 ŋwa1 ɲaŋ1 mej1 θo:ŋ4-ɲxj2 tu4
 day before still exist two-two CLF:NON-H
 'The other day, there were still a few [worms].'

2.1.2.3 Post-nominal quantifiers

As observed in Section 2.1.1, the numeral = o1 'one' differs from other numerals insofar as it occurs after the noun. As such it is part of a small set of post-nominal quantifiers that fill out the same slot in the noun phrase and are therefore mutually exclusive. The two other members of this set are: =m1'more', as in 'one more', 'two more' etc. and *tok5* 'one.only'. In presence of an adjectival modifier, post-nominal quantifiers do not occur contiguous to the noun, but after the adjective, as shown in (36).¹

(36) CLF NOUN ADJ QUANTIFIER tu4 mow4 lug1 = o1/=m1/tok5CLF:NON-H pig big = one/more/one.only 'one big pig/one more big pig/only one big pig'

Unlike = o1 'one' and *tok5* 'one.only', = m1 'more' may co-occur with other numerals (except one), as in (37). Additionally, it may have scope over a whole clause, as shown in (38). In such cases, a classifier need not precede the noun, since = m1 does not function as a quantifier in a noun phrase.

¹ Note that the clitics = o1 'one' and = m1 'more' attach to the word that they follow, whether it is a noun, a classifier or an adjective as in (37).

- (37) a. *naŋ1 mej1 ?an1 cit1=m1*still exist CLF:RESIDUE festival=more
 'There is still one more festival.'
 - b. **naŋ1 mej1 ?an1* cit1=o1=m1
 still exist CLF:RESIDUE festival=one=more
 'There is still one more festival.'
 - b. $ti4 \quad paj4 \quad \theta x u 3 \quad \theta o: \eta 4 \quad taj2 = m1$ 3 go buy two CLF:BAG = more 'He went to buy two more bags [of oranges].'

2.2 <u>Deictic Modifiers</u>

Taking their morphosyntactic locus of coding as the primary basis for the typology, Dixon recognizes three types of demonstratives: "nominal demonstratives", "local adverbial demonstratives" and "verbal demonstratives". Their respective properties are described below (from Dixon, 2010: 224-230).

i. Nominal demonstratives occur in noun phrases, pointing to an entity, either with a noun or a pronoun (e.g. 'This pen is expensive') or making up a NP on their own (e.g. 'This is expensive')

- ii. Local adverbial demonstratives point to a place, occurring either alone(e.g. 'Put it there') or "with a noun taking local marking" (e.g. 'Put it(on the table) there')
- iii. Verbal demonstratives "involve deictic reference to an action", e.g. 'do it like this', and may occur alone as verbs or as adverbial modifier.

All three types are attested in Southern Zhuang. However, whereas in Dixon's typology different syntactic types correlate to different types of deixis (nominal demonstratives point to an object or a person, local adverbial demonstratives point to a place, verbal demonstratives point to an action), semantics and syntax crosscut in Southern Zhuang, as this section will show. Therefore, it will be useful to sketch out the different types of deixis Southern Zhuang demonstratives define, independently morphosyntactic of considerations. First, spatial deixis involves reference to an object, a person or a place. Second, manner deixis refers to some way of doing things (e.g. 'doing like this') or some attribute of an entity (e.g. 'be like this'). This is similar to the type of deixis involved by Dixon's "verbal demonstratives". Third quantity deixis, refers to a quantity, e.g. 'that much', 'that many'.

2.2.1 Spatial deixis

Three forms are used to encode spatial deixis: neutral demonstrative *ni1* 'DEM', proximal demonstrative *kin3* 'DEM:PROX' and distal demonstrative *lan3* 'DEM:DIST'. *ni1* is a semantically general demonstrative that does not make specification in terms of distance or location, and can be used to refer to entities that are out of sight. In (39), the speaker explains that the outbound bus to Ninggan city had already passed by, while the inbound bus to Tiandeng city has not come down yet. Standing by an empty road, he first

pointed his finger in direction of Ninggan, then in direction of Tiandeng, while saying:

(39) ni1 khyn6 ni1 kja5 paj4 ja5, kja5 ascend CLF:VEHICLE DEM go PFV CLF:VEHICLE DEM caŋ1 $lo\eta 1$ ma1 descend NOT.YET come 'This one (=the outbound bus) already drove up, that one (=the inbound bus) hasn't come down yet.'

(40) shows that ni1 can also be used to establish reference to some visible entity. (41) shows that kin3 and lan3 could not be used in place of ni1 in (39), indicating that both demonstratives can only make reference to visible entities.²

- (40) cok5 ni1 θa:w6 ja5-caŋ1
 glass DEM wash PFV-NOT.YET
 'Have these glasses been washed yet?'
- (41) *kja5 kin3 khyn6 paj4 ja5, kja5 DEM:PROX ascend CLF:VEHICLE go PFV **CLF:VEHICLE** lan3 caŋ1 $lo\eta 1$ ma1 descend DEM:DIST NOT.YET come

Note that although the labels 'distal' and 'proximal' conveniently capture the difference between *kin3* 'DEM:PROX' and *lan3* 'DEM:DIST', concurrent uses of the two demonstratives do not necessarily reflect that one

 $^{^{2}}$ kin3 could be used in place of ni1 in (40), although it remains unclear how it would contrast with ni1 in this example.
entity is farther than the other. For example in (42), the two buses were parked approximately at the same distance from the speaker and addressee. Here the contrastive use of *kin3* and *lan3* appears not to be spatially but rather rhetorically grounded.

(42) kin3 naw5 thry4, ni2 jiŋ1kaj1 khyn6 kja5 reach 2sg should ascend CLF:VEHICLE DEM:PROX NEG kja5 lan3 paj4 CLF:VEHICLE DEM:DIST go

'This one doesn't reach [Tiandeng], you should get on this one.'

Turning now to syntax, *ni1*, *kin3* and *lan3* primarily function as adnominal demonstratives, appearing in phrase final position as modifiers, as illustrated in (43).

(43) θa:m4 tu4 mow4 luŋ4-luŋ4 ni1
 three CLF:NON-H pig big-REDUP DEM
 'these three big pigs'

As Dixon points out, an important parameter of cross-linguistic variation in demonstrative systems involves the possibility for nominal demonstratives to make a noun phrase by themselves (Dixon, 2010: 230), or, in Diessel's terminology, to function as "pronominal demonstratives" (Diessel, 2011). Southern Zhuang demonstratives do not exhibit such properties when pointing to an object, as shown in (44) and (45).

(44) a. *lvt1 ?an1 kin3 ?ok5 ma1* pull CLF:RESIDUE DEM:PROX exit come 'Pull this one (=table) out.' b. *lvt1 kin3 20k5 ma1
pull DEM:PROX exit come
Intended meaning: 'Pull this one (=table) out.'

(45) a. ka3 ?an1 lun1 lan3 naw5 mej1
only CLF:RESIDUE house DEM:DIST NEG exist
kxn1 jow5
person be.at
'Only (in) that house, there is nobody living.'

b. ?ka3 lan3 naw5 mej1 kvn1 jow5
only DEM:DIST NEG exist person be.at
Intended meaning: 'Only (in) that house, there is nobody living.'

Possible meaning: 'Only there is there nobody living.'

However, *kin3* and *lan3* occasionally occur alone if they can be interpreted as pointing to the location of an object rather than to the object itself. Accordingly, (45b) is acceptable as long it is not taken to refer to the house itself, but rather the area where it stands. Note that no such interpretation is available in (44), in which the noun phrase *?an1 kin3* 'this one' is an undergoer noun phrase. In (46), *kin3* appears alone, in pre-verbal position and marked with strong stress, as the speaker is holding a book out in direction of the addressee. Enfield describes similar instances of the demonstrative *nii4* in Lao, in which it has an "attention-drawing function" (Enfield, 2007: 99), as in (47).

(46)kin3cvu2 sek5ŋo2ha3ni2DEM:PROXCOPCLF:BOOK1sgtell2sg

'This here is the book I told you about.'

(47) Lao; Enfield, 2007: 99 *nii4 mèèn1 namø-ja:3 qoo3lalit1*DEM COP CT:LIQUID-medecive oralite

'This here is Oralite medicine.'

There is no distinct form used as local adverbial demonstrative. The demonstrative expressions *kaj1-kin3* 'here' and *kaj1-lan3* 'there' are best analyzed as nominals consisting of the form *kaj1* 'place' modified by the adnominal demonstratives *kin3* and *lan3*, respectively.³ The resulting complex forms can function as clausal arguments, as in (48), and as modifiers to a noun, possibly occurring in pre-nominal position as in (49). As adverbials, *kin3* and *lan3* may occur by themselves, as shown in (50). More frequently, *kin3* combines with the general demonstrative *ni1* in shortened and unstressed form, *kin3-ne?0*, as in (51). Alternatively, *kaj1* is sometimes used alone meaning 'here', as in (52). Finally, (53) illustrates an idiomatic use of *kin3*, in which it modifies the first person pronoun *law1*, the speaker thereby referring to the place where he lives, in this example his house. Note that there is no corresponding form **law4-lan3* [3-DEM:DIST].

(48) kaj1-kin3 cru2 naw5 da:ŋ6 ka3lau,1, kaj1-lan3
place-DEM:PROX COP NEG cold much place-DEM:DIST da:ŋ6 la:j4
cold a.lot
'Here (=Guangxi) it is not very cold, there (=Beijing) it is very cold.'

³ The meaning of *kaj1* is not entirely clear, though it clearly relates to the notion of location. Aside from demonstrative forms, in also occur with *hauµ4* 'what, which': *kaj1 hauµ4* 'where'.

- (49) kaj1-kin3 ti1 mak5-ka:m4 daj1-kin4 jxj2
 PLACE-DEM:PROX ASSOC orange good-eat PART
 'Oranges from here are good, you know.'
- (50) nak2 kwa5 ti4 cry2 log1 kin3 ma1, heavy pass 3 descend COP DEM:PROX come baw1 cry2 bin1 ?ok5 lan3 paj4 light COP exit fly DEM:DIST go 'Heavier, it (=the grain) will come down here, lighter it (=the chaff) will fly away over there.'
- (51) ma1 naŋ2 taŋ6 kin3-ne?0
 come sit chair DEM:PROX-DEM
 'Come sit down here.'
- (52) ma1 thrŋ4 kaj1 daj6 kin4 boŋ6-mek5 trk4 ton5 naw5
 come reach place obtain eat rice.porridge any time POL.Q
 'Since [you] arrived here, did you get to eat rice porridge once?'
- (53) naw5 cruµ2 ma1 law1-kin3 caŋ6 kin4 now3-ne1
 NEG COP come 1-DEM:PROX then eat PART
 'Hey! Don't think that (I brought the plant back) here in my place and then it got eaten (by worms)!'
 Literally: 'It's not that [it] came here in my place and then [the worms] ate [it].'

2.2.2 Non-spatial deixis: manner and quantity demonstratives

The form *pin6*, elsewhere a verbal form predicating a relation of similarity between two referents, as in (56) and (57), can function as a nominal demonstrative pointing to an attribute of the referent it modifies, in (54) having rough leaves, in (55) being small.

- (54) khjak4 pin6, no:n4 khop4 kin4
 vegetable DEM:MANNER worm bite eat
 'Vegetables like this (=cabbage), worms bite and eat.'
- (55) mak5 kin3, coŋ2 ?i1 pin6 daj1-kin4
 fruit DEM:PROX type small DEM:MANNER good-eat
 'These fruits, the small ones like this (=tangerines), they are good.'
- (56) hiŋ4 ti4 ka:ŋ6 pin6 hiŋ4 hu4-law1 la:j4
 accent 3 speak be.as accent PL-1 a.lot
 'His accent is a lot similar to our accent.'
- (57) naw5 mej1 kja4 la:j4 pin6 mvuj3
 NEG exist fish a.lot be.as before
 'There are not as many fish as before.'

Unlike in (56) and (57) in which the standard of comparison is expressed as a complement to *pin6*, in (58) it belongs to the extra-linguistic context, referring to the movement the speaker makes as he is turning the handle of an old-style, manual rotary winnowing machine. *pin6-ne?0* in (58) can thus be analyzed here as a verbal demonstrative as defined by Dixon, since it "involve[s] deictic reference to an action" (Dixon, 2010: 226). Note that the verbal demonstrative *pin6-ne?0* formally resembles the local adverbial demonstrative *kin3-ne?0* in (51). Both indeed consist of a combination of two nominal demonstratives, the second of which is a reduced form of the nominal demonstrative *ni1*.

(58) joŋ2 mvul kot4 pin6-ne?0
use hand turn DEM:MANNER-DEM
'You use your hands to turn (the handle) like this.'

The other type of non-spatial deixis involves reference to a measure or a quantity. As an accompanying gesture to (59), the speaker raised two fingers, meaning 'two years'. As for (60), the speaker placed her hand at waist level, palm facing down, thus showing how tall her plants would grow.

- (59) ti4 het4 noŋ3 kaj1-ne?0
 3 make younger.sibling DEM:QTT-DEM
 'She is two years younger [than you]'
- (60) *cγuµ2 θo:ŋ4 kaj1-ne?0*COP tall DEM:QTT-DEM
 '[It] will grow this tall'

The demonstrative expression *kaj1* 'DEM:QTT' mostly functions as an adverb, as in (61. It can also be used as a pronominal demonstrative, making up a noun phrase by itself as in (63), but not as an adnominal demonstrative modifying a noun, as shown in (62).

(61) *khjak4 set5 kaj1 daj1 ja5* vegetable chop DEM:QTT good PFV 'Vegetables, you chopped that much, it is fine'

- (62) *khjak4 kaj1, daj1 ja5
 vegetable DEM:QTT good PFV
 Intended meaning: 'That much vegetable is fine.'
- (63) naw5 sej6 het4 bon6 la:j4 now1, make cooked.rice a.lot PART NEG have.to kaj1 kaw5 kin4 ja5 DEM:qtt be.enough eat PFV '[You] don't have to cook a lot of rice, that much is enough.'
- 2.2.3 Discursive uses of demonstratives
 - 2.2.3.1 *ni1* 'TOP' as a topic marker

Whereas instances of *ni1* as a spatial demonstrative are actually quite rare, it very frequently appears as a topic marker occurring in a distinct slot from the demonstrative slot, as in (64) in which the demonstrative *kin3* 'DEM:PROX' and the topic marker *ni1* 'TOP' occur one after the other.

(64) mak5 kin3 ni1, va:n4
fruit DEM:PROX TOP sweet
'As for these fruits, [they] are sweet.'

(65) further illustrates the typical 'scene-setting' use of *ni1*. A series of noun phrases occur in sentence-initial, extra-clausal position, each marked off by *ni1* and set off by a pause. They successively establish the location, the

time and the participants involved in the scene, thus backgrounding the information conveyed by the main clause.

(65) ba:n6 law1-kin3 θip4-ha6 ni1, kyn1-ke5 ni1, van1 village 1-DEM:PROX TOP person-old day ten-five TOP pin6 pho1 cry2 lon6 trk4 ni1, θyj4 be.as grandma folk.song gather hit TOP COP 'In our village here, on the fifteenth, old people like me, [we] would gather to sing folk songs.'

2.2.3.2 Anaphoric uses of demonstratives

Demonstratives can be used anaphorically when combining with the third person pronoun *ti4*, as in (66) and (68), which can otherwise occur alone to mark anaphora, as illustrated in (67). Note the formal similarity between *kin3-ti4* and (66) and *pin6-ti4* in (68), which further attests to the fact that *pin6* is here functioning as a demonstrative form.

- (66) θa:m4 van1 kin3-ti4, tu1 kha6 pet4
 three day DEM:PROX-3 also slaughter duck
 'On these three days (i.e. the three days of celebration for the Zhuang New Year, which I was explaining you about), we also slaughter ducks.'
- (67) *no2 daj6 paj4 ja5*, *?an1 miw2 ti4*1sg obtain go PFV CLF:RESIDUE shrine 3
 'I've been there, to this shrine (i.e. that we were talking about).'

(68) kwn1 pin6-ti4 ni1, ti4 naw5 hau6 law1
person DEM:MANNER-3 TOP 3 NEG give 1
'People like that (i.e. men coming to live at their wife's house after getting married), they don't give us (money as dowry).'

When functioning anaphorically, *kaj1* 'DEM:QTT' does not combine with *ti4* but with the general demonstrative *ni1*, as in (69) and (70).

- (69) ba:n6 law1-kin3 mej1 kaj1-ni1 coŋ2 cit5
 village 1-DEM:PROX exist DEM:QTT-DEM type festival
 'Our village here, there are that many festivals.' (after explaining the different types of village festivals)
- (70) lok2-?eŋ1 naw5 naŋ2 jow5 thvŋ4 kaj1-ni1 tim6 kid NEG sit be.at reach DEM:QTT-DEM hour
 'Kids don't stay up that late.'
 Literally: 'Kids don't sit around until that many hours', after explaining that ceremonies usually go on until 10 or 11pm.

2.3 Attributive Modifiers

As Gil puts it, "languages vary with respect to the degree to which grammatical encoding distinguishes between different semantic types of attribution" (Gil, 2011). Thus English is classified as a language with strong differentiation, since it possesses dedicated constructions for each of the semantic types of attribution considered by Gil in his typology. A relation of possession is coded by a preposed nominal modifier marked by the enclitic 's in a genitive construction in (71a), a preposed adjective attributes a color property to a noun in an adjective construction in (71b), and a relative clause marked by the complementizer *that* denotes an action specifying the provenance of the head noun *apple* in (71c).

- (71) a. $[John's]_{GENITIVE}$ apple
 - b. [*red*]_{ADJECTIVE} apple
 - c. *apple* [that John bought]_{RELATIVE CLAUSE}

In Gil's typology, languages of Southeast Asia stand out for their lack of differentiation in coding attributive expressions. As such, Southern Zhuang is a fairly typical Southeast Asian language, since in all three types of attribution, the attributive expression occurs as a bare postnominal modifier, without any formal marking. As suggested in the following examples, I will refer to the three semantic types of attributive expressions as adjectives in (72), possessives in (73), and relative clauses in (74).

- (72) *ca:w3* [*luŋ4*]_{ADJECTIVE}
 rice.basket big
 'a big rice basket'
- (73) ca:w3 [ŋo2]_{POSSESSIVE}
 rice.basket 1sG
 'my rice basket'
- (74) ca:w3 [ni2 θa:n4]_{RELATIVE CLAUSE}
 rice.basket 2sg weave
 'the basket you wove'

Despite uniformity at the constructional level, attributive expressions differ as to their internal structure and their combinatory properties.

2.3.1 Adjectives

As Dryer points out, the term 'adjective' is used in two senses, either in a syntactic sense to denote a word class defined by syntactic properties of its own, or in a semantic sense as "a label for words that are descriptive words that denote [...] 'properties', such as size and color" (Dryer, 2007: 169). My use of the term 'adjective' refers to the latter sense, for which Dryer coins the term "semantic adjective". Such descriptive words denoting properties also include words that otherwise function as nouns, typically denoting material substance such as *maj3* 'wood' in (75) or *kim4* 'gold' in (76), or a city name as in (77).

- (75) *lun1 maj3*house wood'wooden house'
- (76) θοj6-ho6 kim4
 necklace gold
 'golden necklace'
- (77) kwn1 nan4niŋ4 personNanning 'Nanning people'

Whether a separate word class 'adjective' should be recognized in Southern Zhuang falls beyond the scope of this thesis. With respects to the ongoing discussion, suffice it to say that Southern Zhuang adjectives such as lug1 'big' in (72) clearly exhibit verbal properties, since they can function as predicates in a clause, e.g. $[ca:w3 kin3]_{NP}$ $[lug4]_{PREDICATE}$ 'This rice basket is big'. For languages in which adjectives display such characteristics, Dryer argues that "when semantic adjectives modify nouns, they are really relative clauses, albeit simple relative clauses consisting of a single word" (Dryer, 2007: 169). (78) and (79) look indeed superficially similar, and along Dryer's line would both be analyzed as relative clauses taking the noun they modify as subjects.

- (78) mej1 no:n4 $[[\emptyset_{worm}]_{SUBJECT}$ $[?ej1-?ej1]_{PREDICATE}]_{RELATIVE CLAUSE}$ exist worm small-REDUP 'There are small worms.'
- (79) mej1 no:n4 $[[\emptyset_{worm}]_{SUBJECT}$ $[ma1 kin4]_{PREDICATE}]_{RELATIVE CLAUSE}$ exist worm comeeat 'There are worms that come and eat [the cabbage leaves].'

However, patterns of insertion of the numeral = o1 'one' show that adjectives and relative clauses are better kept distinct in Southern Zhuang, since the former always occur immediately after the noun, as in (80), while the latter occurs after the numeral, as in (81). Similarly, when both types co-occur, the adjective appears closer to the noun, as shown in (82).

(80) [CLF N ADJECTIVE = ONE] mej1 [tu4 no:n4 ?ej1-?ej1 = o1] exist CLF:NON-H worm small-REDUP = one 'There is one small worm.'

(81)		[CLF	N = ONE	RELATIVE CLAUSE]	
	mej1	[tu4	no:n4=o1	ma1	kin4]
	exist	CLF:NON-H	worm = one	come	eat
	'There is one worm that come and ate [the cabbage leaves].'				

(82) [CLF N ADJECTIVE = ONE RELATIVE CLAUSE] mej1 [tu4 no:n4 ?ej1-?ej1 = o1 ma1 kin4] exist CLF:NON-H worm small-REDUP = one come eat 'There is one small worm that came and ate [the cabbage leaves].'

Finally, several adjectives cannot occur in a string, unless in reduplicated form, as illustrated in (83).

(83)	a.	ma4	luŋ4-luŋ4	dam1-dam1
		dog	big-redup	black-redup
	د	'a big	black dog'	

- b. *ma4 luŋ4 dam1 dog big black
- 2.3.2 Possessives

With regards to internal structure, possessives differ from adjectives and relative clauses since they are themselves noun phrases embedded in a larger noun phrase, as exemplified below. The possessive modifier is a pronoun in (84), a kinship term in (85), a noun taking a possessive modifier in (86).

- (84) *kja5 kin3 cruµ2 kja5 se4 ŋo2* CLF:VEHICLE DEM:PROX COP CLF:VEHICLE car 1sG 'This one is my car.'
- (85) *lun1 pho1 jow5 kaj1-hauµ4*house grandma be.at place-which
 'Where is Grandma's house?'
- (86) *lun1* lok2-θa:w5 ŋo2, mej1 ha6 kγn1
 household child-female 1sG exist five person
 '[At] my daughter's house, there are five persons [living]'

Possessive modifiers occur after adjectives, as shown in (87), and do not occur with relative clauses, as shown in (88). Additionally, a possessive modifier cannot co-occur with the numeral 'one', as shown in (89), but can combine with an adnominal demonstrative, as shown in (90).

- (87) [N ADJ POSS]
 [mow4 ?i1 no2] pu1 can6 kjan6
 pig small 1sG NEG then oink
 'My small pigs won't stop oinking.'
- (88) [N RELATIVE CLAUSE] POSS [mow4 ηo2 ni2 nam5 Өхщ3]pu1 caŋ6 kjaŋ6 pig 1sg 2sg want buy NEG then oink Intended meaning: 'The pigs of mine that you want to buy won't stop oinking.'

(89) *tu4 mow4=o1 go1 / *tu4 mow4go1=o1 CLF:NON-H pig=one 1sG / CLF:NON-H pig 1sG=one Intended meaning: 'my one small pig'

(90) tu4 mow4 ŋo2 kin3
CLF:NON-H pig 1sG DEM:PROX
'this pig of mine'

2.3.3 Relative clauses

My corpus only contains instances of relative clauses in which the noun relativized upon acts as the subject argument of the modifying clause, such as in the following examples. (91) and (92) provide examples of "canonical relative clauses" (Dixon, 2010: 314), in which the noun phrase containing the relative clause (RC) functions as an argument in a main clause (MC), i.e. an object argument of the verb *pin6* 'be as' in (91) and a subject argument in a copula clause in (92).

[van1 nwa1 (91) tu4 ma4 cruj2 cunj3, [pin6 [tu4 CLF:NON-H dog COP raise be.as CLF:NON-H day before len1-len1 khyn6 $lun1 ma1_{RC} MP_{MC}$ run-redup ascend house come 'We also raise dogs, like the one that yesterday ran up into the house.'

(92) $[[k \times n1 hau 4 [naw5 mej1 lok2-?eŋ1]_{RC}]_{NP}$ cru2 daj6 person which NEG have child COP obtain 2an1 pin6]_{MC} CLF:RESIDUE DEM:MANNER 'Anybody that does not have children will get one (=amulet) like this [one].'

(93) corresponds to a different kind of relative clause in the typological literature, a "correlative clause", in which the relative clause "occurs outside the main clause and is connected anaphorically to a noun phrase in the main clause" (Dryer, 2011), here the third person pronoun *ti4*. Note that (93) could not be analyzed as a succession of two independent clauses, since bare classifiers such as *?a:w5* 'CLF:MAN' can not function as clausal arguments.

(93) van1 ŋwa1, [?a:w5[ma1 caj1 $ka:\eta 6ko4]_{\rm RC}]_{\rm NP}$ ni2 before, day come with 2sg chat CLF:MAN [ti4 krn1 daj1]_{MC} naw5 pen1 3 NEG COP person good

'Yesterday, the young man who came to chat with you, [he] is not a good person.'

Not: 'Yesterday, a young man came to chat with you, he is not a good person.'

Although not attested in my corpus, elicited data show that it is also possible to relativize upon object arguments and non-core arguments, as shown in (94) and (95), respectively. Note that when the relativized element is not a subject argument, a resumptive pronoun could be used in place of zero anaphora. (94) ma4 cry2 cun3, pin6 [van1 nwa1 tu4 [tu4 raise be.as CLF:NON-H before CLF:NON-H dog COP day ni2 dit5 $(\phi/ti4)]_{RC}]_{NP}$ 2sGkick ø/3 'We also raise dogs, like the one you kicked yesterday.'

(95) cry2 cun3, pin6 [van1 ŋwa1 tu4 ma4 [tu4 raise be.as CLF:NON-H before CLF:NON-H dog COP day ni2 haw $6 bon 6 (\phi/ti4)]_{RC}$ 2sg give rice ø/3 'We also raise dogs, like the one to whom you gave rice yesterday.'

2.3.4 The prenominal modifier construction

Besides the bare postnominal modifier strategy surveyed in the above sections, Southern Zhuang has acquired a prenominal modifier construction modeled after Sinitic languages, in which a modifier occurs preposed to the noun it modifies, marked by an "associative" marker (Li and Thompson, 1981), the morpheme *ti1* 'Assoc'. The prenominal modifier construction is not as fully productive as the postnominal modifier construction. For example, pronouns denoting a possessor do not occur as prenominal modifiers, as shown in (96), whereas possessive noun phrases can, as shown in (97). Adjectives, to the exception of some transparent loanwords that can occur in both pre- and postnominal positions, as in (99), do not occur in prenominal position, as shown in (98).

(96) *ŋo2 ti1 ma4
1sg Assoc dog
Intended meaning: 'my dog'

- (97) moj2 phaj4 ti1 frŋ4su1 tu1 pi6kan4
 each generation ASSOC customs ALL be.the.same
 'The customs of each generation are the same.'
- (98) *luŋ1 ti1 ma4
 big ASSOC dog
 Intended meaning: 'big dog'
- (99) a. law3θet4 ti1 kvn1
 honest ASSOC person
 'honest person'
 - b. kwn1 law30et4 person honest 'honest person'

Local adverbial demonstratives routinely occur in prenominal position, as do time expressions. In all cases the modifier can alternatively occur after the noun.

- (100) a. *kaj1-kin3 ti1 ŋow4 mej1 tu2 naw5* place-DEM:prox ASSOC snake exist venom POL.Q 'Do snakes from here have venom?'
 - b. *ŋow4 kaj1-kin3 mej1 tu2 naw5*snake place-DEM:prox exist venom POL.Q
 'Do snakes from here have venom?'

- (102) a. 2an1-mruq3 ti1 lun1 tu1 mej1 can1=o1 before ASSOC house ALL have terrace=one 'All houses from before had a terrace.'
 - b. *lun1 ?an1-mruj3 tu1 mej1 can1=o1*house before ALL have terrace=one
 'All houses from before had a terrace.'
- (103) a. *ŋa:j1 naŋ2 ka:w6 tim6 ti1 pan4se4* have.to sit nine hour Assoc bus 'You have to take the 9am car.'
 - b. *ŋa:j1 naŋ2 pan4se4 kaw6 tim6* have.to sit bus nine hour 'You must take the 9am car.'

Relative clauses also occur in prenominal position, as shown in (104) and (105).

(104) ni2 lan6 ti1 thaŋ6-vin1 naw5 mxn1 ka3lauµ1
2sg roll Assoc name.of.sweet NEG round much
'The thaŋ6-vin1 (traditional sweets) you rolled are not really round.'

(105) *cvu2 luk2 kja4 ?ok5 paj4 ti1 lok2-θa:w4*IRR invite leave.parents exit go ASSOC CT:child-female *ma1*come
'We invite our daughters that have left home (i.e. who have moved to

their husband's house after getting married).'

Finally, a noun may host both a prenominal and a postnominal modifier, such as in (106) in which a relative clause occurs in pre-nominal position and an adjective in postnominal position.

(106) *hun1 ŋo2, toj6-na6, mej1 caj4 khjak4 ti1 tej2* house 1sg side-front exist grow vegetables Assoc place *?rj6* small

'My house, in the front, there is a small space to grow vegetables.'

CHAPTER 3

CLASSIFIERS

This chapter describes the classifier system of Southern Zhuang. My analysis is couched in the functional-typological framework, which is introduced in Section 3.1, along with a review of the classifier systems of Mainland Southeast Asian languages. Section 3.2 presents the set of classifiers, and Section 3.3 the different environments in which classifiers appear. Section 3.4 analyzes the referential properties of classifiers.

3.1 <u>Theoretical Preliminaries</u>

3.1.1 The functional-typological approach to nominal classification

As set forth by Craig/Grinevald (Craig, 1986; Grinevald, 2000) and Aikhenvald (2000), the functional-typological approach to systems of nominal classification aims at establishing a typology of the "grammatical means for the linguistic categorization of nouns and nominals" (Aikhenvald, 2000: 1), which Aikhenvald collectively refers to as "noun categorization devices".

Although Aikhenvald's and Craig's proposals diverge as to the range of phenomena to be included in the typology and the number of types they identify, both share the same methodological and theoretical premises.

Methodology-wise, the different types of classifiers are established primarily on the basis of their morphosyntactic locus of coding, that is different types of classifiers are recognized depending on the constructions in which they occur, which description thus forms an integral part of the analysis of classifier systems. Grinevald spells out the methodological benefits of such approach over earlier, semantically based studies of classifier systems (e.g. Adams and Conklin, 1973; Allan, 1977; Denny, 1976) as follows:

Anchoring the typology at the morphosyntactic level is simply a strategy for grasping the phenomenon from its most easily accessible aspect – its formal properties.

(Grinevald, 2000: 62)

At the theoretical level, both proposals argue for a prototypecontinuum approach: the various noun categorization devices that can be distinguished within a single language and across languages do not form closed and discrete systems, but rather blend into one another. The types argued for "correspond to *prototypes*, or *focal instances*" on a continuum. This continuum, of a lexico-grammatical nature, spans in Craig's proposal from purely lexical systems such as class terms and measure terms to purely grammatical systems such as gender and noun class systems, as illustrated in Figure 1 (based on Grinevald, 2000: 61).¹

<lexical< th=""><th>•••••</th><th></th><th>Grammatical ></th></lexical<>	•••••		Grammatical >
measure terms		alaccifiana	noun classes
class terms		clussifiers	gender
	Figure 1	Systems of nominal classification	

¹ Aikhenvald's typology covers a more strictly delimited range, leaving out the lexical end of Craig's continuum, and thus running from "the lexical numeral classifiers of Southeast Asia" to the "highly grammaticalized gender agreement classes of Indo-European languages (Aikhenvald, 2002: 3). Noun classes are not relevant to the present study.

As noted above, Aikhenvald's and Grinevald's typologies do not perfectly coincide, though they do considerably overlap. Leaving aside the two extremes of the continuum, the two authors recognize four main types: noun classifiers, numeral classifiers, classifiers in possessive constructions ('genitive classifiers' in Grinevald's terminology), and verbal classifiers. ²

Noun classifiers co-occur with a bare noun, independently of any modifiers that may occur in a noun phrase. They are mostly found in Australian and Mesoamerican languages (Aikhenvald, 2000: 81). According to Grinevald's typology, prototypical noun classifiers are of the syntacticized type found in Mayan languages such as Jakaltek, in which they function as noun determiners as in (107a) and pronouns as in (107b) (Grinevald, 2000: 65).

(107) Jakaltek; Craig, 1986: 264, cited in Grinevald, 2000: 65

- a. xil naj xuwan noj lab'a saw CLF:MAN John CLF:ANIMAL snake 'John saw the snake.'
- b. xil naj noj saw CLF:MAN CLF:ANIMAL 'He (=man) saw it (=animal).'

Numeral classifiers occur in quantifying contexts, contiguous to the quantifier, and "constitute the most common and commonly recognized type" (Grinevald, 2000: 63). A prototypical numeral classifier system would be that

² Aikhenvald recognizes two additional classifier types with spatial semantics: locative classifiers, which occur "fused' with an adposition (preposition or postposition)" (Aikhenvald, 2002: 172), and deictic classifiers, which occur with articles and demonstratives (Aikhenvald, 2002: 176ff). Although locative and deictic classifiers occur within noun phrases, these are highly specific classifier types found in agglutinating American languages only, and are therefore not relevant to the present discussion.

of Southeast Asian languages, which typically feature a large inventory of classifiers that, in presence of repeaters, makes it an open lexical class. (Aikhenvald, 2000: 101). Numeral classifier systems thus exhibit a lesser degree of grammaticalization than prototypical noun classifier systems.

(108) Thai

maa5 sɔɔŋ5 tua1 dog two Clf:NON-н 'two dogs'

Classifiers in possessive constructions come in different guises, depending on whether their choice is determined by the possessed ('possessed classifier' or 'genitive classifier') or the possessor ('possessor classifier'), or by the type of possessive relation between the possessor and the possessee, e.g. alienable vs. inalienable possession ('relational classifier'). Possessed classifiers are mostly found in Northern American languages, as shown in (109), in which they attach to the possessor. Classifiers occurring in possessive constructions in languages of Southeast Asia, such as Hmong languages in (110), are also considered instances of possessed classifiers (Aikhenvald, 2000: 132). Possessor classifiers are extremely rare, and are indeed only found in a few languages of Northestern Amazonia, as shown in (111). Finally, relational classifiers are a typical feature of Micronesian languages, as shown in (112).

(109) Yawapai; Carlson and Payne, 1989, cited in Aikhenvald, 2000: 127 *qoleyaw* ?-ñ-hat
chicken 1sg-genitive-clf:PET
'my chicken' (chicken my-pet)

(110) Hmong; Bisang, 1993: 29-30

rws rab riam-ntaj he CLF:ARTIFACT sword 'his sword'

(111) Dâw; Martins, 1994: 138-41, cited in Aikhenvald, 2000: 139
yud dâw tôg-ej
clothing human daughter-CLF:ANIMATE.POSSESSOR
'The clothing is girl's; the girl's clothing'

(112) Boumaa Fijian; Dixon, 1988: 137, cited in Aikhenvald, 2000: 134

a. *a o-mu da'ai* ART CLF-2SG gun 'your gun' (which belongs to you)

b. *a 'e-mu da'ai* ART CLF-2SG gun 'your gun' (which will be used to shoot you)

Verbal classifiers differ from the preceding types insofar as they do not occur inside a noun phrase but on the verb, not classifying "the verb itself but rather one of the nominal arguments of the verb" (Grinevald, 2000: 67). As such, they are not relevant to the present study.

3.1.2 Classifier systems in Southeast Asian languages

Classifiers are a well-noted areal feature of the Mainland Southeast Asia (MSEA) linguistic area (Enfield, 2005: 189). Classifiers in MSEA languages typically make up large sets of independent lexemes, with some languages such as Thai having around 200 classifiers (Hundius and Kölver, 1983).

MSEA classifiers typically edge towards the lexical end of the continuum of nominal classification introduced in the above section (see Figure 1). The use of repeater constructions in some MSEA languages "makes the system of classifiers almost open-ended" (Aikhenvald, 2000: 104), and therefore makes it more akin to a lexical, rather than a grammatical, system of classification. Furthermore, the lexical origin of MSEA numeral classifiers systems can sometimes be demonstrated, as is the case for numeral classifiers in Tai languages, which according to DeLancey (1986) historically derived from class terms. Finally, the "fuzzy edge between measure terms and mensural classifiers" (Grinevald, 2000: 82) further attests to the "intermediate lexico-grammatical" nature of classifiers systems in general, and in particular of MSEA numeral classifier systems (Grinevald, 2000: 61).

Another notable feature of MSEA languages is the use of the same, or almost the same, set of classifiers in different morphosyntactic environments. MSEA languages vary as to the range of environments in which classifiers may occur, and as to the obligatoriness of the classifier in such environments. For instance, Mandarin Chinese classifiers must occur with numerals and demonstratives, but do not occur with other modifiers (Li and Thompson, 1981: 104), as shown in (113). In contrast, Thai classifiers are only compulsory with quantifiers, as in (114a), but may optionally combine with other noun modifiers, as for example a demonstrative in (114b) and an adjectival modifier in (114c).

(113) Mandarin Chinese; Li and Thompson, 1989: 104-5

a. *wŭ* *(*jià*) *fēijī* five CLF airplane 'five airplanes' b. nèi *(tiáo) niú that CLF cow 'that cow'

(114) Thai

a.	muut	5 haa3	*(tua1)
	pig	five	CLF
	'five		

b.	rot4	(khan1)	nii4
	car	CLF	DEM
	'this		

c.	dek2 (khon1)	too1
	child CLF	grown.up
	ʻgrown-up kid'	

Less frequently attested in MSEA languages are noun classifiers, i.e. classifiers occurring in a CLF+N construction, independently of other modifiers. Noun classifiers are mostly found in languages spoken in the Northern part of the MSEA linguistic area. These languages include Hmong (Bisang, 1993; Jaisser, 1987), as shown in (115), and Cantonese (Matthews and Yip, 2011), as shown in (116). CLF+N constructions are also attested in Central Tai languages such as Nung (Saul and Wilson, 1981) in (117) and Northern Tai languages such as Wuming Zhuang (Sio and Sybesma, 2008) in (118).

(115) Hmong; Jaisser, 1987: 171, cited in Aikhenvald, 2000: 216

tustsovtshaibplabCLFtigerbe.hungrybe.hungrystomach'The tiger was very hungry.'

(116) Cantonese; Matthews and Yip, 2011: 93 *jī bāt hóu-hóu sé*CLF pen good-REDUP write
'This/that pen is good to write with.'

(117) Nung; Saul and Wilson, 1981: 26 *mu'hn láo tú phi lái*he fear CLF spirit much
'He is very afraid of evil spirits.'

(118) Wuming Zhuang; Qín, 2005: 53, cited in Sio and Sybesma, 2008: 181 *ngoenzneix gou gip-ndaej diuz hanz*today 1sG pick-up CLF:LONG shoulder.pole
'I picked up a carrying pole today'

In such case when classifiers occur in different environments, the question arises as to whether the classifiers fulfill different roles in different environments. In quantification contexts, the numeral classifier must be obligatorily expressed most of the time, and it can thus be assumed to fulfill a structural role, which in the functional tradition has been correlated to the putative "transnumeral" character of nouns in Southeast Asian languages (Greenberg, 1972): nouns are "in essence concept nouns" (Grinevald, 2000: 74), in need of being "individualized by the numeral classifier as the most appropriate tool with which to make it countable" (Bisang, 1993: 3). Perhaps

much more interesting is the question of the semantic contribution a classifier makes in contexts where it is not compulsory, i.e with nonquantifying modifiers or as a noun classifier. The presence of a classifier seems to always affect the referential properties of the noun phrase, involving sometimes very subtle contrasts in terms of number, definiteness, or genericity. The presence of a classifier does not contribute to the referential properties of a noun phrase in uniform ways across languages, nor does it does so depending on the type of modifiers present in the noun phrase. Thus according to Bisang (forthcoming) and Hundius and Kölver (1983: 172-3), the presence of a classifier in a noun phrase containing a demonstrative triggers in Thai a singular interpretation, as shown in (119), while in combination with an adjective it implies a definite and/or non-generic reading, or is used to signal a contrastive value of the adjective, as shown in (120).

(119) Thai; Bisang, forthcoming

a.

rot4 nii4 car DEM 'this/these car(s)' (unmarked with regards to number)

b. rot4 khan1 nii4 car CLF DEM 'this car' (singular)

(120) a. rot4 sii5-dɛɛŋ1
car color-red
'the/a/ø red car(s)' (referentially neutral)

b. rot4 khan1 sii5-dɛɛŋ1
car CLF color-red
'the red car(s)' (definite or non-generic)
'the red car(s)' (contrastive, e.g. as opposed to the blue car)

The contribution of noun classifiers is more difficult to pin down. Wuming Zhuang provides a case in point. Sio and Sybesma report that there is no principled difference between a bare noun and a CLF + N sequence with regards to definiteness and genericity, despite the fact that by convention a generic reading is signaled by an hyphen in written Zhuang, as in (122) (Sio and Sybesma, 2008: 189).³ At any rate, Sio and Sybesma (2008: 207) conclude that "in (Wuming) Zhuang, bare nouns and [Cl-N] phrases can be definite, indefinite and generic".

(121) Wuming Zhuang; Sio and Sybesma, 2008: 189

goumizduzmou1sghaveCLF:ANIMALpig'I have a pig.'(non-generic)

(122) Wuming Zhuang; Qín, 1995: 4, cited in Sio and Sybesma, 2008: 190 *duz-bing miz song gyaenj*CLF:ANIMAL-leech have two head
'Leeches have two heads.' (generic)

If neutral with respects to definiteness and specificity, Sio and Sybesma suggest that the presence of a classifier however involves a singular

³ Note that it seems more reasonable to assume that the generic reading in (122) arises from the sentence-initial position of the noun phrase *duz-bing*, to which a general property is predicated upon.

reading. Thus in presence of a possessive modifier, the noun phrase is "necessarily interpreted as singular" when a classifier is present, as in (123b), whether (123a) is neutral with regards to number (Sio and Sybesma, 2008: 6).

- (123) Wuming Zhuang; Zhāng, 1979: 191, cited in Sio and Sybesma, 2008:182
 - a. saw gou youq gwnz daiz
 book 1sG be-at top table
 'My book/books is/are on the table.'
 - b. bouh saw gou youq gwnz daiz CLF:VOLUME book 1sG be-at top table 'My book is on the table.'

The authors further propose that the same effect is achieved in absence of any modifier, and indeed argue that in (121), the noun phrase *duz mou* 'pig' "must be interpreted as if *ndeu* 'one' is missing" (Sio and Sybesma, 2008: 189). This is hardly convincing though, since they contrast (121) with (124), in which a hyphenated noun phrase *duz-mou* is assigned a generic reading, and can therefore refer to more than one pig. It should be noted that their use of the term 'generic' is here rather confusing, since in (124) *duz-mou* can hardly be understood to refer to 'pigs' as a type of animal: one cannot own pigs as a species, but only as a specific set of individuals belonging to this species. In any case, if as they suggest *duz-mou* and *duz mou* cannot be phonologically distinguished (Sio and Sybesma, 2008: 189), it follows that a CLF + N sequence can be interpreted either as singular or plural, and therefore that the presence of a noun classifier may well be neutral with respects to number too.

(124) Wuming Zhuang; Sio and Sybesma, 2008: 189

gou miz duz-mou
1sg have CLF:ANIMAL-pig
'I have a pig/pigs.'

3.2 Classifiers in Southern Zhuang

3.2.1 Classifiers as a matter of constructional slot

This section aims to show that whereas in Southern Zhuang the word classes 'classifier' and 'noun' can be shown to be distinct on the basis of their distributional properties, nominal classification ultimately remains a matter of morphosyntactic construction. I show that when a noun occurs in a classifier slot, it exhibits the same grammatical properties as a classifier proper, i.e. a member of the word class classifier (Section 3.2.1.1). This echoes Grinevald's proposal that classifier systems in MSEA languages typically exhibit some level of "blending" with more lexical means of nominal classifier system and the class term system provides further illustration of the 'fuzzy edges' of the classifier system of Southern Zhuang (Section 3.2.1.2).

3.2.1.1 Classifiers as a matter of morphosyntactic construction

Consider the following examples, two instances of a numeral classifier construction, whose schema is first spelled out in (125).

(125) Basic pattern of a numeral classifier construction

Quantifier – Classifier Noun

(126) θo:η4 mak2 mit1
 two CLF:CUTTING knife
 'two knives'

(127) θo:ŋ4 cok5 nam3
two CLF:GLASS water
'two glasses of water'

The forms *mak2* 'CLF:CUTTING' and *cok5* 'CLF:GLASS' both occur as independent lexemes following the numeral $\theta o: \eta 4$ 'two', in the classifier slot. Both thus take up the same function, that of providing a counting unit for the nouns they occur with. However, they display different distributional properties beyond their similar use in classifier function. *cok5* 'glass' may function as a noun in a numeral classifier construction, as in (128), taking its own classifier, *?an1* 'CLF:RESIDUE'. As a lexical noun, *cok5* 'glass' can make up a full-fledged noun phrase by itself, and thus function as a clausal argument, as in (129).

- (128) θo:η4 ?an1 cok5
 two CLF:RESIDUE glass
 'two glasses'
- (129) cok5 po4glass broken'The glass is broken.'

In contrast, the form *mak2* 'CLF:CUTTING' does not share any of these nominal attributes: it cannot occur as a noun in a numeral classifier construction, as in (130), nor can it form a noun phrase on its own, as in (131).

- (130) *θο:ŋ4?an1/thew4/mak2/... mak2 two CLF:RESIDUE/CLF:LONG/CLF:CUTTING/... Intended meaning: 'two cutting implements'
- (131) *ni2 mej1 mak2 naw5
 2sg have POLAR.Q
 Intended meaning: 'Do you have a cutting implement?'

Conversely, the noun *cok5* 'glass' can not co-occur directly with a quantifier, nor can it be reduplicated to achieve universal quantification, whereas such uses are available to the classifier *mak2* 'CLF:CUTTING'.

(132) *θo:ŋ4cok5

two glasses Intended meaning: 'two glasses'

(133) *cok5-cok5 tu1 po4
glass-REDUP together broken
Intended meaning: 'All the glasses are broken.'

(134) θo:ŋ4 mak2
 two CLF:CUTTING
 'two [knives]'

(135) mak2-mak2 tu1 khrm4 ja5 CLF:CUTTING-REDUP ALL sharp PFV 'All the (knives) are sharp.'

As the preceding examples should have made clear by now, the lexemes that can fill out the classifier slot in a numeral classifier construction do not exhibit the same distributional properties, and accordingly can be analyzed as belonging to different word classes, the word class 'classifier', e.g. *mak2* 'CLF:CUTTING', and the word class 'noun', e.g. *cok5* 'CLF:GLASS'.

At this point, it remains to show that despite it does not belong to the word class 'classifier', the noun *cok5* 'CLF:GLASS' should however be analyzed as filling out a classifier slot in (127). First, the fact that the classifier *?an1* 'CLF:RESIDUE' cannot be inserted before *cok5* in (136) demonstrates that (126) and (127), reproduced below, are two instances of the same construction, in which the forms *mak2* and *cok5* fulfill the same classifier function.

- (136) *θo:ŋ4?an1 cok5 nam3
 two CLF:RESIDUE glass water
 Intended meaning: 'two glasses of water'
- (126) θo:ŋ4 cok5 nam3
 two CLF:GLASS water
 'two glasses of water'
- (127) θo:ŋ4 mak2 mit1
 two CLF:CUTTING knife
 'two knives'

The fact that the form *cok5* cannot take a classifier in (136) further indicates that it does not function as a lexical noun when occurring in the classifier slot. Indeed, the usual attributes of a lexical noun, such as taking a classifier or a modifier, are neutralized in such position. Example (137) shows that a noun functioning as a classifier cannot be modified.

(137) *θo:ŋ4cok5 luŋ4 nam3
 two CLF:GLASS big water
 Intended meaning: 'two big glasses of water'

Furthermore, when the form *cok5* functions as a classifier denoting a measuring unit, it can co-occur directly with a numeral, as in (138), and occur in reduplicated form, as in (139).

(138) *во:ŋ4 cok5*

two CLF:GLASS 'two glasses (of water)'

(139) *cok5-cok5 ti4 tu1 kin4 lew3* CLF:GLASS-REDUP 3 ALL ingest exhaust 'All the glasses, he drank [them] up.'

Finally, examples (140) and (141) show that irrespectively of their distributional properties, both classifiers and nouns functioning as classifiers can be used anaphorically to refer to the noun they classify. Note that accordingly in (141), *taj2* 'CLF:BAG' does not refer to the bags themselves, but to the rice contained in these bags.
(140) mak2 kin3 naw5 khym4 CLF:CUTTING DEM.PROX NEG sharp 'This [knife] is not sharp.'

(141) θο:η4 taj2 kin3 cruµ2 khaw6-nu4
two CLF:BAG DEM.PROX COP glutinous.rice
'It is glutinous rice in these two bags.'
Literally: 'These two bags are glutinous rice.'

Enfield's comment that in Lao "nominal classification is more a matter of syntactic construction than of form class membership" (Enfield, 2007: 119) thus also holds true in Southern Zhuang. Accordingly, I will be referring to nouns filling out a classifier slot in a numeral classifier construction as mensural classifiers, at par with classifiers of the QUANTA/ARRANGEMENT semantic type such as *poŋ1* 'CLF:S.GROUP, *khon5* 'CLF:LUMP or *mat1* 'CLF:BUNCH' (see Section 3.2.2.5).

3.3.1.2 Classifiers and class terms

Class terms and classifiers can first be set apart on semantic grounds. Although class terms and classifiers both involve a semantic relationship of the generic-specific type, class terms, unlike classifiers, "do not categorize the element to which they attach, but rather the whole compound of which they are a part" (Enfield, 2007: 146). Hence, whereas in the case of example (142) it can be said that *kja4* 'fish' is a kind of a *tu4* 'CLF:NON-H', in example (143) it is the whole compound *kja4-duk2* which is a kind of *kja4* 'CT:FISH'.

(142) tu4 kja4 CLF:NON-н fish 'fish'

(143) kja4-duk2

CT:FISH-catfish 'catfish'

Furthermore, whereas classifiers are involved in a syntactic process of noun phrase construction, class terms are a morphological device involved in word formation. Class terms and classifiers can thus be distinguished in terms of the constructional slot in which they occur. In languages such as Thai, this hardly raises any issue since they occur in different positions relatively to the noun they occur in construction with, as in Thai in (144).

(144) Thai

plaa1-muk2 sɔɔŋ5 tua1 cT:FISH-ink two cLF:animal 'two squids'

In Southern Zhuang, although both the class term and the classifier occur to the left of the noun they enter in construction with, it can in most cases be shown that they constitute different systems of nominal classification since they fill out two different slots, as shown in the examples below.

(145) θo:ŋ4 ?an1 mak5-ka:m4
 two CLF:FRUIT CT:FRUIT-orange
 'two oranges'

(146) θο:η4 kγn1 me2-lu1
 two CLF:HUMAN CT:WOMAN-marry
 'two daughters-in-law'

(147) θο:η4 ka:j5 ba:j6-kaj5
two CLF:PIECE CT:MEAT-chicken
'two pieces of chicken'

There are however cases when the categories class terms and classifiers coalesce, as is the case for lexical items belonging to the vegetal domain, e.g. *ko4* 'CT/CLF:plant', *bauµ1* 'CT/CLF:leaf', *ŋaŋ1* 'CT/CLF:branch', *puŋ1* 'flowering part of a plant', *ŋam5* 'CT/CLF:stalk', etc. They can occur as class terms, as in (148), or as classifiers as in (149a), but unlike in the above examples, they cannot be shown to occur in distinct slots, as illustrated in (149b). Note that as a classifier, *ko4* 'CLF:plant' is semantically similar to a mensural classifier, since it does not specify an inherent property of the noun (as sortal classifier do), but rather a specific arrangement in which the referent of the noun occurs (see Section 3.2.2).

- (148) a. *kjuj6* banana 'banana'
 - b. *ko4-kjuj6* CT:PLANT-banana 'banana tree'

(149) a. θa:m4 ko4 kjuj6 three CLF:PLANT banana 'three banana trees'

b. *θa:m4 ko4 ko4-kjuj6 three CLF:PLANT CT:PLANT-banana

3.2.2 The set of classifiers

Two semantic subtypes of classifiers are traditionally recognized: "sortal or true classifiers and mensural or quantitative classifiers" (Grinevald, 2000: 64). Sortal classifiers are "true" classifiers in the sense that they designate inherent properties of the entity they classify, thus dividing "the set of nouns of a certain language into disjunct classes" (Senft, 2000: 21). Mensural classifiers on the other hand "express some notion of quantity or type which is *extrinsic* to the lexical content of the head noun; they provide additional information" (Hundius and Kölver, 1983: 168; emphasis in original). Accordingly, sortal classifiers have scope over a more restricted set of referents, while mensural classifiers combine more freely with nouns. With respect to freedom in classifier assignment, the shift from the sortal type to the mensural type can be shown to be gradual rather than categorial, in correlation to the degree to which the classifier refers to an intrinsic property of the noun. Beyond the usual categorization in terms of the semantic parameters according to which classification is achieved (in SMALL CAPS in Figure 2, based on Aikhenvald, 2000: 272ff), classifiers can therefore be arranged on a continuum running along the dimension intrinsic-extrinsic.



3.2.2.1 UNIQUE classifiers

At the leftmost end of the continuum, UNIQUE classifiers exhibit very restricted combinatory properties, since they only classify one noun, e.g. *sek5* 'CLF:BOOK', *kek5* 'CLF:TILE', *lau1* 'CLF:PADDY.FIELD'.

3.2.2.2 ANIMATE classifiers

ANIMATE nouns are divided into human and non-human. The classifier tu4 'CLF:NON-H(UMAN)' applies to animals and spirits, such as in (150) and (151).

- (150) *00:ŋ4 tu4 va:j1* two clf:NoN-н buffalo 'two buffalos'
- (151) θa:m4 tu4 phej4
 three CLF:NON-H spirit
 'three spirits'

The general classifier for humans is $k \times n1$ 'CLF:HUMAN'. Humans are further classified according to sex and age. me2 'CLF:WOMAN' and ?a:w5 'CLF:MAN' designate adult females and adult males, respectively. te4'CLF:Y.WOMAN' is used for young women, and law3 'CLF:E.MAN' for elder men. Importantly, note that if the noun is neutral with respect to sex and age, it can only take the classifier $k \times n1$ 'CLF:HUMAN', as shown in (152). In other terms, HUMAN classifiers merely reflect semantic properties of the noun and cannot be used to provide further specification in terms of sex and/or age, as shown in (153).

(152) θa:m4 kγn1 thu4-ma5
three CLF:HUMAN head-grow
'three youngsters'

(153) *θο:ŋ4?a:w5 thu4-ma5
two CLF:MAN head-grow
Intended meaning: 'two young men'

3.2.2.3 FUNCTION classifiers

FUNCTION classifiers "refer to specific uses of objects, or kinds of action which are typically performed by them" (Aikhenvald, 2000: 273). There are four of them, listed in Table 2.

Table 2FUNCTION classifiers

Classifier	Gloss	Description
mak2	CLF:CUTTING	Tools used for cutting, prodding, piercing, e.g.
		knives, needles, a plough

lun1	CLE.CLOTHING	Dieces of clothing e.g. shirts pants					
uŋı	CEP.CEOTING	reces or crouning, e.g. sintis, pants					
kja4	CLF:VEHICLE	Means	of	transport	e.g.	cars,	bicycles,
		wheelbarrows					
kha5	CLF:BASKET	All types of baskets used for farming					

3.2.2.4 PHYSICAL classifiers

PHYSICAL classifiers refer to physical properties of the noun they classify. They are listed in Table 3. They primarily make distinction in terms of SHAPE/DIMENSIONALITY, and, for two-dimensional, flat things, in terms of CONSISTENCY, which "refers to the plasticity of the object under manipulation" (Aikhenvald 2000: 273).

Classifier	Gloss	Description
mat1	CLF:GRAIN	grain-, speck-like things, e.g. grains, buttons, stars,
		raindrops
thew4	CLF:LONG	elongated, string-like things, e.g. roads, necklaces,
		poles, candles, ropes
ci4	CLF:CYL	cylindrical things, e.g. pens, guns,
1 1		1
ращ Г	CLF:LEAF	leaves;
	CLF:SHEET	sheet-like things, e.g. a sheet of paper, a picture
<i>рш</i> ŋ5	CLF:STIFF	stiff flat things, e.g. a medicine tablet, a CD, a door
		leaf
phyn4	CLF:SOFT	soft flat things, e.g. bed sheets, mattresses,
		blankets
pha4	CLF:FLAT	three dimensional things characterized by having a

Table 3PHYSICAL classifiers

		flat surface, e.g. walls, soles of the feet, gums
hom2	CLF:BIG	any unusually big inanimate entity
?et4	CLF:SMALL	any unusually small inanimate entity
?an1	CLF:FRUIT	product of a plant or tree;
	CLF:ROUND	small, roundish entities;
	CLF:RESIDUE	"residue" classifier (Aikhenvald 2000: 335)

PHYSICAL classifiers occupy the middle ground of the classifier continuum represented in Figure 2, standing half way between sortal classifiers of more restricted combinatorial properties (ISOLATE, FUNCTION, ANIMATE classifiers) and mensural classifiers (ARRANGEMENT/QUANTA). Among classifiers for inanimate nouns, and if compared to FUNCTION classifiers, PHYSICAL classifiers typically classify over a larger and more disparate set of entities, a natural consequence of the fact that a large number of entities may more easily share the same shape/form than the same function.

Classification in terms of physical properties also allows more freedom in classifier assignment, i.e. different classifiers may be assigned to a noun depending on its physical characteristics. For instance, *ci1* designates one of the traditional sweets made from rice flour. It can be rolled into small roundish pieces, in which case it will be referred to as $2an1 \ ci1=o1$ [CLF:ROUND *ci1* = one], or shaped into a flat bun-like sweet, in which case it will be referred to as *pha6 ci1* = *o1* [CLF:FLAT *ci1* = one]. In a similar fashion, the noun $\theta oj6$ -low4 may refer to an ear stud or an earring depending on whether it combines with the classifier 2an1 'CLF:ROUND' or *thew4* 'CLF:LONG', respectively. Finally, the classifiers 2et4 'CLF:SMALL' and *hom2* 'CLF:BIG' substitute to the classifier a noun usually takes in order to emphasize the unusual size of the referent. In (154), 2et4 'CLF:SMALL' substitutes to 2an1 'CLF:FRUIT', and in (155) to the FUNCTION classifier lug1 'CLF:CLOTHING'. In (156), *hom2* classifies the noun $k\gamma n1$ 'person', which otherwise occurs as a self-classified noun.

(154) ?et1 mak5-ka:m4 ?i1-?i1 = o1
CLF:SMALL orange small-REDUP = one
'a really small orange'

(155) $log1 hom2 \theta u6 = o1$ wear CLF:BIG shirt = one '[He] wore a large shirt on.'

(156) mej1 θo:ŋ4 hom2 kxn1 luŋ4-luŋ4
exist two CLF:BIG person big-REDUP
'There were two really big guys.'

Before moving on to the rightmost end of the scale, a few comments about the classifier *?an1* are in order. Note that I lumped *?an1* together with PHYSICAL classifiers for ease of exposition only, since out of its three uses, spelled out in (157), only the second relates to the physical properties of the noun.

(157) Uses of the classifier ?an1

- i. as a classifier for the product of a tree or plant, irrespectively of its size and shape, to the exception of pods, glossed as 'CLF:FRUIT';
- ii. as a PHYSICAL classifier for small and roundish entities, glossed as 'CLF:ROUND';
- iii. as a RESIDUE classifier for otherwise unclassified items from both the tangible and the intangible domain, glossed as 'CLF:RESIDUE'.

Its first use, 'CLF:FRUIT', can be considered the primary use from which the other two extend. First, the vegetal domain provides a well-documented lexical source for classifiers in Tai-Kadai languages, as the classifier *bauµ1* 'CLF:LEAF; CLF:SHEET' also attests to. Second, the term *?an1* is also found as a lexical item in a specific verb-object construction, in which it contrasts with *phak4* 'pod', as in (158). Additionally, note that all fruits and vegetables (to the exception of pods) take the classifier *?an1*, irrespectively of their shape, e.g. *θa:m4 ?an1 kjuj6* 'three bananas'.

(158) *naw5 cruµ2 ?ok5 ?an1, ?ok5 phak4* NEG COP come.out fruit come.out pod '[Pea plants] do not bear fruits, [they] bear pods.'

Examples of its use as a PHYSICAL classifier, 'CLF:ROUND', were provided above, where it was shown that it may specify physical properties of the noun and thus contrast with other PHYSICAL classifiers *thew4* 'CLF:LONG', and *pha6* 'CLF:FLAT'.

The label 'RESIDUE' refers to a particular way in which a general classifier functions. Aikhenvald provides the following definition (Aikhenvald, 2000: 334): "A general classifier can be in a 'RESIDUE' [...] function if it is a remainder category for referents outside the domain covered by other classifiers". As such, *?an1* 'CLF:RESIDUE' applies to a very wide array of entities from both the tangible and intangible domains, as exemplified in Table 4.

Table 4Examples of noun taking the classifier ?an1 'CLF:RESIDUE'

Lexical domain	Examples
Body parts	pak5 'mouth', daŋ1 'nose', tap4 'liver'

Kitchenware and tools	tu1keŋ4 'spoon', thuj6 'cup', piŋ1 'bottle', thuj4
	'hammer',
Housing and furniture	lun1 'house', fuŋ1 'room', ban6 'village', taŋ5
	'chair', <i>tou4</i> 'door opening',
Natural bodies	khja4 'mountain', haj5taj5 'sun'
Intangible entities	θiaw4si1 'hours', li4paj3 'week', dan4θω1 'word',
	<i>ko1θaj2</i> 'story'

3.2.2.5 QUANTA/ARRANGEMENT classifiers

The classifiers standing at the rightmost end of the scale designate semantic properties of the noun described above as extrinsic and temporary. This typically involves the semantic dimensions QUANTA and ARRANGEMENT, which respectively refer to "number, or quantity of objects" and "to the configuration of objects" (Aikhenvald, 2000: 274), hence the umbrella term 'mensural classifiers'.

QUANTA classifiers typically include conventionalized units of measure such as *kxn4* 'half-kilo', *bat1* 'quantity of rice contained in a bamboo section, approximately half-kilo', *maw2* 'one sixth of an acre'. QUANTA and ARRANGEMENT most often combine together, e.g. *mat1* 'CLF:BUNCH' designates both a quantity and a specific arrangement the referent occurs in. Table 5 provides examples of the most common mensural classifiers.

Table 5QUANTA/ARRANGEMENT classifiers

Classifier	Gloss	Description
роŋ4	CLF:S.GROUP	a small group of people, animals
phyn5	CLF:L.GROUP	a large group of people, animals

ро2	CLF:PILE	a pile, e.g. sand, rocks, fruits,
khon5	CLF:LUMP	a lump, e.g. charcoal, fat,
ka:j5	CLF:PIECE	a piece, e.g. meat
mat1	CLF:BUNCH	a bunch, e.g. firewood
kow1	CLF:O.PAIR	one of a pair, e.g. a chopstick, a shoe, a glove,
kha5	CLF:PAIR	a pair, e.g. chopsticks, shoes, gloves,
tik4	CLF:DROP	a drop of any liquid
koŋ4	CLF:WASTE	used with bodily wastes, e.g. spit, urine, faeces

Mensural classifiers also include classifiers that only loosely correlate with QUANTA and ARRANGEMENT, e.g. *coŋ2* 'type, kind' in (159) and time-related terms in (160) and (161).

- (159) θο:η4 coŋ2ŋow4twoCLF:TYPEsnake'two types/two species of snake'
- (160) jow5 nan5niŋ5 tok5 θo:ŋ4 pej4 θνψ4
 be.at Nanning study two CLF:YEAR book
 '[She] studied in Nanning for two years.'

(161) dun1=o1 khaj4 θo:ŋ4 paj1 mow4
CLF:MONTH=one sell two CLF:TIME pig
'I sell pigs twice a month.'
Literally: 'I sell two rounds of pigs a month.'

Finally, the term 'mensural classifiers' also apply to nouns occurring in a classifier slot in a numeral classifier construction, as established in Section 3.2.1.1. The following provide further examples of such mensural classifiers.

- (162) a. θο:ŋ4 ?an1 hop2
 two CLF:RESIDUE box
 'two boxes'
 - b. θο:ŋ4 hop2 ja1
 two CLF:BOX medicine
 'two boxes of medecine'
- (163) a. θο:ŋ4 kja5 khi3lvn2
 two CLF:VEHICLE wheelbarrow
 'two wheelbarrows'
 - b. θo:ŋ4 khi3lvn2 fvn2
 two CLF:WHEELBARROW firewood
 'two wheelbarrows of firewood'
- (164) a. θo:ŋ4 ?an1 tu1keŋ1
 two CLF:RESIDUE spoon
 'two spoons'
 - b. θo:ŋ4 tu1keŋ1 khaw6
 two CLF:SPOON rice
 'two spoons of rice'

3.2.2.6 The DEFAULT classifier kaw2

The classifier *kaw2* crucially differs from the classifiers surveyed above in terms of its distribution. It indeed never occurs in numeral classifier constructions, as shown in (165), and is therefore only found in combination with a noun, as in (166) and/or with non-quantifying modifiers, as in (167).⁴

(165) *ti4 ma1 kha:j4 kaw2 tjaŋ3naw1*3 come sell CLF:DEFAULT computer
'He came to sell a computer.'

- (166) *θa:m4 kaw2 tjaŋ3naw1 three CLF:DEFAULT computer Intended meaning: 'three computers'
- (167) kin4 hau6 lew3, ja5 paj4 θνuβ kaw2 mau5
 eat GIVE exhaust then go buy CLF:DEFAULT new
 'Eat it all, then [we'll] go buy new ones (=buns).'

Semantically, *kaw2* 'CLF:DEFAULT' is a general classifier in the sense that it doesn't make reference to any particular semantic property of the noun it combine with. It is thus to same extent similar to the residue classifier *?an1*, which also exhibits very wide semantics. However, whereas it was seen that a residue classifier acts as a general classifier for otherwise unclassified nouns, a general classifier "is used in DEFAULT function if it can be substituted for other classifiers" (Aikhenvald, 2000: 335). So is the case for example in (167), in which a more specific classifier could have be used, for example *?an1* 'CLF:RESIDUE', which would have conjured up the idea of individual buns,

⁴ *kaw2* also combines with *laŋ4* 'what' to form the question word *kaw2-laŋ4* 'what'

or a mensural classifier such as *taj2* 'CLF:BAG', meaning 'a bag of new (i.e. freshly baked) buns'. Furthermore, another important difference with *?an1* 'CLF:RESIDUE' rests in the ability of *kaw2* to occur with unbounded abstract nouns such as *lwn1* 'stuff' in (168), and indeed mass nouns such as *nam3* 'water' in (169), whereas *?an1* 'CLF:RESIDUE' only classifies tangible objects or intangible entities which can be conceptualized as bounded entities, e.g. days, words, stories, etc.

- (168) *?an1/kaw2 lvn1 pin6, ŋo2 naw5 thin4 CLF:RESIDUE/CLF:DEFAULT stuff DEM:MANNER 1 NEG know 'Stuff like this, I don't know.'
- (169) ja5 ?aw1 *?an1/kaw2 nam3 ti4 ma1 nom3 then take CLF:RESIDUE/CLF:DEFAULT water 3 come dye khaw6-nu4 glutinous.rice 'And then [you] take the water from it (i.e. the water in which violas

3.3 <u>Classifier Constructions</u>

were boiled) to dye glutinous rice.'

As observed in Section 3.1.2, classifiers in MSEA languages typically occur in noun phrases with different types of modifiers. Parameters of variation across languages involve: i. the range of modifiers a classifier can co-occur with and whether it can combine with a noun independently of other modifiers; ii. which modifiers require the presence of the classifier, iii. how the presence of a classifier affects the referential properties of the noun phrase it occurs in. With regards to the requirement that the classifier be expressed, Southern Zhuang differs from Northern Zhuang languages such as Wuming Zhuang insofar as the classifier is only required in presence of a quantifier.⁵ Obligatoriness of the classifier, or lack thereof, provides a structural criterion to distinguish two types of classifier constructions, one occurring in the context of quantification, in which the classifier is obligatory, and one occurring in non-quantifying contexts, in which the classifier is optional.

3.3.1 Classifiers in quantifying contexts: the numeral classifier construction

At the core of a numeral classifier construction lays a tightly knit unit made up of a quantifier and a classifier, which I will be referring to as the quantifying phrase (Q). A quantifying phrase (Q) can combine with a noun (N) in two different ways. It may precede the noun, in which case Q and N behave as a single unit, [Q N]. Alternatively, it may follow the noun, in which case the noun and the quantifying phrase are in apposition, making up two distinct units, [N][Q].

Evidence that different constituent structures obtain depending on the relative ordering of Q and N rests in the requirement, or lack thereof, that the two units be contiguous. When the quantifying phrase is preposed to the noun, the sequence [Q N] cannot be interrupted, and any additional modifiers must occur after the noun, as shown in (170). This equally holds true if the numeral is one, as in (171).

(170) a. θο:η4 luŋ1 θu6 kaw5 two CLF:CLOTHING shirt old 'two old shirts'

⁵ Wuming Zhuang shares with Sinitic languages such as Mandarin Chinese and Cantonese the requirement that a classifier be expressed in presence of a demonstrative (Sio and Sybesma, 2008: 187).

b.	* <i>θ</i> о:ŋ	4 luŋ1	kaw5	Өшб
	two	CLF:CLOTHING old	shirt	

(171) a. lug1 $\theta u6$ kaw5 = o1CLF:CLOTHING shirt old = one 'one old shirt'

> b. *lun1 kaw5 $\theta ublace = o1$ CLF:CLOTHING old shirt = one

However, when the quantifying phrase is postposed, there is no such structural restriction on modifier placement, and an adjective can in principle be inserted either immediately after the noun or after the quantifying phrase, as shown in (172).

(172) a.	Өшб	kaw5	Өо:ŋ4	luŋ1
	shirt	old	two	CLF:CLOTHING
	'two o	ld shir	ts'	

b. θu6 θo:ŋ4 luŋ1 kaw5
 shirt two CLF:CLOTHING old
 'two old shirts'

The noun and the quantifying phrase that follows it thus need not occur next to each other. Very common occurrences of such discontinuous numeral classifier construction include "handling-despatch constructions" (Enfield, 2007: 368), in which the quantifying phrase typically occurs in sentence-final position.

(173) ?aw1 cok5 ma1 θo:ŋ4 ?an1
take glass come two CLF:RESIDUE
'Bring two glasses.'

The noun-final pattern can be regarded as the unmarked, primary pattern. Besides the fact that it constitutes the prime choice when speakers provide elicited numeral noun phrases, the pattern [N][Q] only occurs when the number of entities that are being referred to constitute focal information in the on-going stretch of speech. Enumeration provides a typical example of such contexts.

(174) *mej1* kaj5 ha6 θip4 tu4, pet3 θej4 $\theta i p 4$ have chicken five ten duck four CLF:NON-H ten ki1 tu4. mow4 cet4 tu4. several CLF:NON-H pig seven CLF:NON-H 'I have fifty chicken, more than forty ducks and seven pigs.'

In a similar fashion in (175), the speaker emphasizes that both the speaker and the addressee went together to the woman's house.

(175) *law1* θο:ŋ4 kyn1 paŋ1-koj2 paj4 lun1 ti4
1 two CLF:HUMAN then go house 3
'The two of us then went together to her house.'

Furthermore, uses of the classifier *?an1* may provide further evidence for establishing the noun-final pattern Q-N as primary. The residual function of Southern Zhuang *?an1* indeed sets it apart from its cognate forms in Southern Tai languages, in which the noun initial pattern N-Q is the primary, if not the only attested pattern. Enfield observes that Lao *?an3* "cannot be used, for example, in counting things which have no shape, such as *samnuan2* 'expression'" (Enfield, 2007: 123). Instead a repeater construction must be used, [expression two expression] 'two expressions', in which the first noun is likely to be omitted, [two expression] 'two expressions'. As Enfield comments, repeater constructions in Lao constitute "the closest thing to a 'residual' option in the numeral classifier system", and therefore provide a functional equivalent to the classifier *?an1* in Southern Zhuang: both options provide a means for counting unclassifiable nouns in the language, under the strong constraint that a noun cannot take direct quantification. It seems reasonable to correlate the emergence of either strategy to the dominant constituent order in the language. In N-Q languages such as Lao, the classifier slot and the noun slot are separated by the numeral, whereas in Q-N type languages, both slots are contiguous, a rather awkward set up for a repeater construction. As a matter of fact, repeater constructions are not attested in Southern Zhuang, even when the quantifying phrase occurs post-nominally. It can therefore be inferred that the emergence of the residual function of the classifier *?an1* must have been prompted by the basic constituent order [Q-N].

3.3.2 Classifiers in non-quantifying contexts

3.3.2.1 Environments licensing the use of a classifier

Southern Zhuang classifiers may occur with both deictic and attributive modifiers, as shown in examples (176) and (177), as well as with a noun alone, as in (178).

(176) Deictic modifiers

CLF	Ν	DEM
tu4	ma4	kin3
CLF:NON-H	dog	DEM:PROX
'this dog'		

(177) Attributive modifiers

- a. With an adjectival modifier CLF N ADJ *tu4 ma4 luŋ1* CLF:NON-H dog big 'a big dog'
- b. With a possessor

CLF	Ν	POSS
tu4	ma4	ŋ01
CLF:NON-H	dog	1
'my dog'		

c. With a relative clause

CLF	Ν	RC				
tu4	ma4	ni1	dit1			
CLF:NON-H	dog	2	kick			
'the dog you kicked'						

(178) With a noun alone

tu4 ma4 CLF:NON-H dog 'a dog'

3.3.2.2 With modifiers

In presence of a modifier, the noun need not be expressed if it is retrievable from context, as illustrated in (179).

(179)	?an1	Ø _{mak5ka:m4}	luŋ1,	ti4	схщ2	өхтб
	CLF:FRUIT	Ø _{orange}	big	3	cop	sour
	'The big ones	s (=oranges),	they a	re sour	•	

Note that the absence of a noun does not necessarily lend itself to an analysis in terms of noun ellipsis. Dryer argues that two conditions must be met in order for a construction to be considered elliptical (Dryer, 2004: 9): i. the ellipsed noun could have been provided by the speaker and is recoverable by the addressee, ii. the construction grammatically allows the addition of a noun. Although both conditions are met in (179), the noun phrase in (180) fails to meet the first criterion, since Southern Zhuang does not have any noun corresponding to the noun *animal* in English.

(180)	tu4	mej1	kha4	tu1	kin4
	CLF:NON-H	have	leg	ALL	eat
	'[Animals] th	nat hav	e legs,	we eat	[them] all.'

As seen in the above examples, the classifier generally occurs in phrase-initial position, before the noun. However, the classifier may occur after the noun to focus on the property indicated by the modifier, as in (181), typically to stress its contrastive value, as in (182).

- (181) *mej2 pha6 phyn4 nok2 thaw6 naw5* have blanket CLF:SHEET COMP warm NEG 'Do you have a warmer blanket?'
- (183) *cuu4-ma:n2* ?*an1 khjaw4 nok1 ma:n2 kwa5* ?*an1 deŋ1* chilli CLF:FRUIT green comp hot pass CLF:FRUIT red 'Green chillies are hotter than the red ones.'

3.3.2.3 CLF + N phrases

The vast majority of the few CLF + N constructions attested in my corpus of recorded speech sequences involve the classifier *tu4* 'CLF:NON-H', as for example in (184) and (185). The only other instance of a classifier occurring alone with a noun involves the classifier *kaw2* 'CLF:DEFAULT', as already seen in example (165), reproduced below.

- (184) tu4 no:n4 ma1 kin4 bau46 ti4
 CLF:NON-H worm come eat leaf 3
 'Worms came and ate its (= the cabbage) leaves.'
 (185) tu4 ma4 tu1 cun3
- CLF:NON-H dog also raise 'Dogs, [we] also raised.'
- (165) ti4 ma1 kha:j4 kaw2 tiaŋ3naw1
 3 come sell CLF:DEFAULT computer
 'He came to sell a computer.'

Doubts can be raised as to whether the examples considered above should be adduced as sufficient evidence in support of the existence of a productive noun classifier system in Southern Zhuang. Compare the above examples with (186) and (187). Although they share similar structures, and similarly involve referents mentioned for the first time, the nouns *mit2* 'knife' in (186a) and *thoj4* 'iron club' in (187a) occur in bare form. An appropriate classifier could however be added in both sentences, as shown in (186b) and (187b).⁶

⁶ Conversely, my informant confirmed that the classifier *tu4* could be omitted in examples (184), (185) and (165).

(186) a. *mit2 tu4 kha:j4* knife also sell 'Knives, [we] also sell.'

> b. *mak2 mit2 tu4 kha:j4* CLF:CUTTING knife also sell 'Knives, [we] also sell.'

(187) a. *ti4 ma1 ?aw1 thoj4*3 come take iron.club
'He came to take an iron club.'

b. *ti4 ma1 ?aw1 thew4 thoj4*3 come take CLF:LONG iron.club
'He came to take an iron club.'

An alternative account that would explain the greater currency of the form *tu4* would involve analyzing constructions such as *tu4 ma4* as lexical compounds. Under this assumption, *tu4* would be analyzed as a class term when occurring with a noun, *tu4-ma4* [CT:NON-H-dog] 'dog', and as a classifier when occurring in a numeral classifier construction, as seen for the form *ko4* 'CT/CLF:plant' in Section 3.3.1.2.⁷ Such analysis echoes Luo's characterization of Fengshan (Northern) Zhuang classifiers occurring in absence of a quantifier, which "function is to categorize", e.g. *luk⁴ 2it*² 'grapes (fruit)', *ko¹ 2it*² 'grape plants', *kau¹ 2it*² 'grape vine' but also *tua⁴ kuk*² 'tiger', in which latter case the classifier may be omitted (Luo, 2008: 332). In a similar fashion, Sio and Sybesma, whose analysis of CLF + N phrases rests for the most

⁷ This would furthermore account for the fact that when eliciting word lists, animal names are systematically preceded by *tu4*, unlike other nouns which in citation form occur without a classifier.

part on examples involving the classifier *duz* 'CLF:ANIMAL', hypothesize that in Wunimg Zhuang CLF + N phrases may well be "just complex nouns", since their distribution is similar to bare nouns in that both can be "definite, indefinite and generic" (Sio and Sybesma, 2008: 207). The referential properties of CLF + N phrases are further discussed in Section 3.4.

A final comment can be made in connection with the putative use of classifiers as noun classifiers in Zhuang languages. As seen in Section 3.1.1, prototypical noun classifiers such as that found in Meso-American languages can be used as pronouns, in absence of a noun. Whereas such uses are attested in Northern Zhuang languages, as shown in (188), Southern Zhuang does not allow a classifier to occur on its own with a pronominal function, preferring zero anaphora or a third person pronoun, as shown in (189).

(188) Wuming Zhuang; Qín, 1995: 85, cited in Sio and Sybesma, 2008: 188 mwngzdawz duz та de daeuj hawj gou, gou 2sg take CLF:ANIMAL dog that come give 1sg 1sg cawz duz buy CLF:ANIMAL 'You bring that dog to me, I'll buy it.'

(189) ni2 ?aw1 tu4 ma4 ti4 hau₆ *ŋ*02, ma1 $\eta o 2$ 2 take clf:non-h dog 3 come give 1 1 $\theta x y 3 \phi/ti4/*tu4$ buy $\phi/3/CLF:ANIMAL$ 'You bring that dog to me, I'll buy it'

3.4 Referential Properties of Classifiers

3.4.1 Number

In presence of modifiers which cannot co-occur with the numeral = o1 'one', i.e. spatial demonstratives in (190) and possessive modifiers in (191), the addition of a classifier triggers a singular interpretation.

(190)	a.	ni2	joŋ2	pit1	kin3		tu1	daj6	
		2	use	pen	DEM:P	ROX	ALL	be.able	
		'You c	an use	this(/t	hese) j	pen(/s).	,	(unmarked)	
	b.	ni2	ion2	ci4	pit1	kin3		tu1	dai6
		2	use	CLF:CY	L pen	DEM:PF	ROX	ALL	be.able
		'You can use this pen.'						(singular)	
(101)	-				0:1				
(191)	a.	mow4	<i>ŋ</i> 01	naŋı	ΛI				
		pig	1	still	small				
		'My pig(/s) is(/are) still small.' (unmarked)						rked)	
	b.	tu4		mow4	ηo1	naŋ1	?i1		
		CLF:NO	N-H	nig	1	still	small		
				11 1 ⁻ 0	- 1 ,		Jinan	<i>.</i> .	1)
		My pig is still small.					(singu	iar)	

With respect with the discussion on CLF + N phrases in Section 3.3.2.3, note that this also holds true if the classifier is tu4 'CLF:NON-H', as in (191) above or ko4 'CLF:PLANT' in (192). This indicates that the forms tu4 and ko4 function as classifiers in presence of a possessive or a demonstrative.

(192) ko4 mak5-ka:m4 kin3 cru2 pa4 no2 caj4 CLF:PLANT CT:FRUIT-orange DEM:PROX COP F 1sG plant 'This orange tree was planted by my father.'

With adjectives, relative clauses and in absence of a modifier, the noun phrase remains neutral with regards to number whether a classifier is present or not. In both (193) and (194) a classifier is present and yet *thew4 kha6lo2* in (193) refers to the unique road that enters the village, while in (194) *tu4 no:n4* refers to more than one worms (the speaker subsequently said that she had killed a few of them some days ago). In the stretch of speech in which (195) occurs, the speaker refers at several points to the worms as *tu4 no:n4* [CLF:NON-H worm], and describe them as *tu4 no:n4 khjaw4-khjaw4* [CLF:NON-H worm green-REDUP]. This demonstrates that classifiers in such environments do not trigger in Southern Zhuang a singular interpretation. This is further exemplified in (195).

- (193) *mej1 thew4 kha6lo2 khaw6 ma1* exist CLF:LONG road enter come 'There is a road that comes in.'
- (194) naŋ1 mej1 tu4 no:n4 ma1 kin4
 still exist CLF:NON-H worm come eat
 'There are still worms that come to eat [the cabbage leaves]'

(195)	Speaker A:	tu4		luŋ4	kha:j4 paj4		ja5	
		CLF:NO	N-H	big	sell	go	PFV	
	Speaker B:	<i>ka3laщ1</i> how.many		tu4?				
				CLF:NC	DN-H			
	Speaker A:	Өеј5	tu4					
		four	CLF NC	N-H				

- '- The big one(s) (=pig(s)) [I] already sold them.
- How many?
- Four.'

3.4.2 Specificity

The notions of specificity and definiteness have been used in a number of ways in the literature, and it will thus be useful to first define my use of these terms. Both definiteness and specificity are understood here as particular cognitive statues of the referents of noun phrases in the universe of discourse.⁸ In that sense, Foley provides the following definition of a definite noun phrase:

A NP is definite when the speaker presupposes the addressee can uniquely identify its referent from the universe of discourse; otherwise, it is indefinite. (Foley, 2007: 411)

Whereas the referent of a definite noun phrase will be uniquely identifiable by both the speaker and the addressee, the referent of a specific noun phrase need not be known to the addressee, but must pick up reference to a particular entity in the world which the speaker has in mind (Lambrecht, 1994: 80-82; Foley, 2007: 411; Li and Thompson, 1981: 127). Thus in (196a) the noun phrase 'a book' is specific ("referential" in Foley's and Li and Thompson's terminology), whereas it is non-specific ("non-referential") in (196b). Another way in which a noun phrase can be considered non-specific, or non-referential, is when "it denotes a class of entities rather than any

⁸ In a stricter sense, definiteness is a language-specific grammatical category which can be analyzed in terms of the formal features used to encode it, such as definite and indefinite articles in European languages (cf. Lambrecht, 1994).

specific member(s) in that class" (Li and Thompson, 1981: 129), in which case we have a generic noun phrase, as in (197).

(196) From Lambrecht, 1994: 81

- a. *I am looking for a book*_{SPECIFIC}. *I found it.*
- b. *I am looking for a book*_{NON-SPECIFIC}. *I found one*.

(197) Books_{GENERIC} are expensive these days.

Before considering whether as I hypothesized the use of noun classifiers correlates with definiteness and/or specificity, some preliminary comments shall be made, to point out the caveats possibly undermining my analysis. Definiteness and specificity are grounded in the universe of discourse, and as such a realistic analysis of these phenomena could for the most part only be undertaken on the basis of naturalistic data. Yet, most textual occurrences of noun classifiers involve the classifier *tu4* 'CLF:NON-H', as noted in Section 3.3.2.3, which led me to consider whether *tu4* should rather be analyzed as a class term in such occurrences. Note that under the latter analysis, *tu4* does not obviously contribute to the meaning of the adjacent noun in the way class terms such as *ko4* do, cf. *kjuj6* 'banana' vs. *ko4-kjuj4* 'banana tree', but *ma4/tu4-ma4* 'dog'. As such, it is readily omissible in the way noun classifiers in Cantonese are (Matthews and Yip, 2011: 93), and therefore lends itself to the analysis of the hypothesized correlation between classifiers and definiteness/and specificity.

Let's first consider the case of generic noun phrases. Generic noun phrases typically occur in sentence-initial position, as sentential topics, followed by a comment predicating a property upon them. As shown in (198) and (199), generic noun phrases usually consist of a bare noun. (198) pet4 lok4 ho6
duck defeather hard
'Ducks are hard to defeather.'

(199) mo2 crup2 naw5 pin6 tej2 kin3-ti4
tomb COP NEG be.as place DEM:PROX-3
'Tombs, it's not as [in] this place (= Thailand, where the deceased are cremated).'

Non-generic, non-specific noun phrases often occur as object arguments. Similarly to generic noun phrases, they typically occur without classifier, as bare nouns, cf. *taj2* 'bag' in (200) and *lap2* 'candle in (201).

- (200) to4 taj2 ?aw1 paj4 hau46 ti4 put.in bag take go give 3 'We put [it=duck leg] in a bag and go give it to them (=our children).'
- (201) naw5 mej1 tin2, law1 cruµ2 joŋ1 lap2 NEG exist electricity, 1 COP use candle '[When] there is no electricity, we use candles.'

Whereas non-specific noun phrases typically occur without classifiers, specific noun phrases tend to comprise of a noun preceded by a noun classifier. The following examples are taken from a recorded conversation between my informant and an elderly woman showing us around her garden, commenting about worms eating her cabbage. This passage is of particular interest since the same speaker makes several references to worms, in both specific and non-specific ways. In (203), she mentions worms for the first time, as she stops in front of the cabbages and comments on the poor shape of their leaves, all eaten up by worms. All mentions refer to the worms that were in her garden until she recently got rid of them. All mentions of worms in (202) thus refer to specific referents, and all consist of a classifier plus a noun.

(202) tu4 no:n4. tu4 no:n4 ma1 baw1 kin4 ti4. CLF:NON-H worm. CLF:NON-H worm come eat leaf torn.out pyn2 naw5 mej1. nua1kon5 paŋ1 tu1 mej1 tu4 now NEG exist. before all still exist CLF:NON-H no:n4 khjaw4. worm green 'Worms. Worms came and ate its leaves. Now there are [no worms]. Before there were green worms.'

(203) follows (202) in the same stretch of speech. Unlike (202), which factually refers to past events (plants being eaten by worms), (203) comments on how to eradicate worms in general, not on how she proceeded to eradicate these particular green worms. The non-specific interpretation is prompted by the particular structure and marking of the two sentences in (203). Both consist of a first clause setting up the conditions under which the event in the second clause may or must arise, and involve consistent marking of the second clauses, either by the copula cxuq2, signaling here irrealis mood, or by the pre-verbal operator $ca\eta 6$ 'then'. In such environments, the noun phrases [*no:n4*] must be interpreted as non-specific, which correlates with the absence of a classifier.

(203) mej1 no:n4, cru2 na:j1 sa5 ja1. sa5 ja1, exist worm COP have.to spray pesticide. spray pesticide ti4 can6 naw5 mej1 no:n4. 3 have worm then NEG '[If] there are worms, [you] have to spray pesticides. [You] spray

pesticide, then it (=the cabbage] won't have worms.'

(204) is taken from another recorded text, involving a different speaker than in the examples above, who explains that she stopped raising dogs because she was afraid someone may get bitten. It features the same kind of contrast between a noun classifier construction referring to a set of specific referents, *tu4 ma4* 'dogs', and a bare noun *ma4* referring to non-specific referents. Interestingly, the specific noun phrase *tu4 ma4* occurs as a sentential topic, in the same position as the generic noun phrase *pet4* in (198) above.

(204) [*tu*4 *ma4*]_{SPECIFIC} tu1 cuŋ3, tu1kwa5 law1 сүщ2 CLF:NON-H dog ALL/ALSO raise but 1 COP cuŋ3 [ma4]_{NON-SPECIFIC} coŋ5 la:w4-hxj5 ha3 [*ma4*]_{NON-SPECIFIC} be.afraid COMPL raise dog end.up dog khop5 kvn1 bite person 'Dogs, [we] also raised, but we were afraid that raising dogs would end up in dogs biting someone.'

3.4.3 Definiteness

Whether on the basis of the foregoing discussion the presence of a classifier does seem to indicate a specific referent, it is doubtful that any correlation holds between classifier use and definiteness.

First, my initial hypothesis according to which the presence of a noun classifier indicates a definite noun phrase can be straightforwardly discarded. As noted in the previous section, the cabbage-eating worms were introduced for the first time using a CLF+N phrase, as shown in (203), whereas my hypothesis would have predicted a bare noun, since [*tu4 no:n4*] is here indefinite.

Second, the explicit marking of indefinite and definite referents involves post-nominal modifiers requiring the presence of a classifier, such as the numeral = o1 'one', or with which the classifier signals a singular meaning, such as the complex demonstrative form *kin3-ti4* 'DEM:PROX-3' used to mark anaphora (see Chapter 2, Section 2.2.3). Examples (205) and (206) illustrate such discursive use of post-nominal modifiers. In (205) a previously unmentioned referent, a cave, is introduced via a presentational construction, $mej1 + [\text{CLF N} = \text{one}]_{\text{INDEFINITE}}$. The speaker then goes on describing the cave (which subsequent references involve the pronoun *ti4* and zero anaphora). She concludes suggesting the addressee to go visit this cave, now using a full-fledged noun phrase figuring the modifier *kin3-ti4*, in (206).

```
(205) paj4 ta3\theta in4 ni1, khaw6 kjannin kja4 mej1 [2an1
go Daxin TOP, enter inside mountain exist CLF:RESIDUE
ton6 = o1]<sub>INDEFINITE</sub>
cave = one
```

'You go to Daxin, you enter inside a mountain, there is a cave.'

(206) ni2 jow5 da:j1, ni2 jiŋ1kaj1 paj4liw2 [?an1
2sg be.at idle 2sg should go take.a.trip CLF:RESIDUE
toŋ6 kin3-ti4]_{DEFINITE}
cave DEM:PROX-3
'You stay idle, you should go take a trip to this cave.'

Note that there is another indefinite noun phrase in (205), which occurs in bare form: *kja4* 'mountain'. As expected for a MSEA language, marking of (in)definiteness is not a syntactic feature of Southern Zhuang. Rather, an indefinite noun phrase will receive special marking only if it is to become a central participant in the discussion to follow.

CHAPTER 4

SUMMARY AND DISCUSSION

This chapter first summarizes the findings of this thesis (Section 4.1). Section 4.2 then discusses my initial hypotheses in connection with these findings.

4.1 <u>Summary</u>

This section first summarizes the different types of elements found in the noun phrase (Section 4.1.1), and then their relative ordering (Section 4.1.2).

4.1.1 Elements occurring in a noun phrase besides the noun

Besides the noun, it was seen that two types of elements may occur: modifiers, which were covered in Chapter 2 and classifiers, which were covered in Chapter 3.

Modifiers come in three different types: quantifying modifiers (Section 2.1), deictic modifiers (Section 2.2), and attributive modifiers (Section 2.3).

First, quantifying modifiers, which as their name indicates are involved in the operation of quantification, comprise of numerals (Section 2.1.1) and other non-numeral quantifying expressions (Section 2.1.2). The particularity of Southern Zhuang numerals rests in the presence of two different forms for each of the numbers 'one' and 'two', which contrast in their distribution: *qet1* 'one' and *pxj2* 'two' occur as final unit and as ordinal

constructions, whereas = o1 'one' and $\theta o: \eta 4$ 'two' are the ones used in the operation of quantification, preceding power of tens in complex numerals and occurring in quantifying phrases along with a classifier in numeral classifier constructions. Non-numeral quantifiers are used to express universal quantification and related notions ('all', 'every', each'), and approximation ('some', 'several', 'about'). 'all' is expressed most frequently by way of a Sinitic-influenced construction involving classifier reduplication and the preverbal operator tu1 'ALL/ALSO', or with the prenominal modifier $\theta ow4mej1$ 'every', presumably a calque of Mandarin Chinese suòyòu 'every'. Alternatively, the quantifiers moj2 'each, every' and tan5 'each' involve a distributive interpretation, in the sense that each of the entities within their scope are to be considered individually, whether they are all affected in the same way by the property or action predicated upon them (moj2), e.g. 'each person went to the shrine' or not (tan5), e.g. 'each person has its own tastes'. Contrarily to moj2 'each, every' and tan5 'each', tan1 'all of, the whole of' conjures up the idea that all the entities, or the whole of the entity within its scope behave as a coherent whole with regards to some property or action. The quantifiers used to express indeterminacy and approximation are ljan1 'some', ki1 'several' and txk4 'about, any'. Besides its use as a quantifier in a quantifying phrases, ki1 'several' may occur in place of a numeral as a final unit or a multiplier of powers of ten in complex numerals, and can follow a mensural classifier to denote that the total quantity exceeds that denoted by the classifier. In affirmative sentences, txk4 'about' can precede a numeral to signal that this numeral indicates an approximate quantity. As for their position within the noun phrase, quantifiers mostly occur in prenominal position, in combination with a classifier in a quantifying phrase and possibly preceding the quantifying phrase in the case of the quantifiers tan1 'all of, the whole of' and txk4 'about'. Alternatively, a small set of quantifiers occur in post-nominal position: the clitics = o1 'one' and = m1 'more', and tok5 'one only'. Irrespectively of their position in the phrase, an important property of quantifiers is that they can neither occur on their own nor directly quantify a noun, therefore requiring the presence of a classifier.

Second, deictic modifiers or demonstratives are used to establish reference to an entity in the extra-linguistic or linguistic context. Three semantic types of deixis can be distinguished: spatial deixis, which involves reference at some entity with respects to its location in space; manner deixis, which involves reference to some way of doing or being; quantity deixis, which refers to the quantity some entity comes in. Furthermore, nominal demonstratives come in two different syntactic types, depending on whether they act as noun modifiers (adnominal demonstratives) or can make up a noun phrase by themselves (pronominal demonstratives). Spatial deixis involves a contrast between proximal kin3 and distal lan3, which must point at visible entities. The demonstrative nil is neutral with regards to this contrast, and can also pick reference to entities that are out of sight. All three only occur as adnominal demonstratives. The pronominal demonstratives are complex forms made up of the form kaj1 'place' modified by kin3 or lan3, kaj1-kin3 'here', kaj1-lan3 'there'. Manner deixis involves the verb pin6 'be as', which as an adnominal demonstrative can be used with pointing gesture to refer to some property of the entity that is pointed at. Finally, kaj1 is used as a pronominal demonstrative to points at some quantity, meaning 'that much/many'. Additionally, demonstratives can be shown to have discursive functions. nil very frequently functions as a topic marker, in which case it occurs in a distinct slot, possibly following another demonstrative. kin3 'DEM:PROX' and *pin6* 'DEM:MANNER' can combine with the third person pronoun ti4 to mark reference to a previously mentioned entity, e.g. kyn1 kin3-ti4 'that person I was telling you about', or to a previously mentioned way of being, e.g. kyn1 pin6-ti4 'people like that'. In a similar fashion, kaj1 'DEM:QTT' can combine with spatial demonstrative nil 'DEM' to refer back to some
previously mentioned quantity, thereby functioning as a quantifier, e.g. *kaj1-ni1 coŋ2* 'that many types'. Table 6 provides a synoptic view of Southern Zhuang nominal demonstratives, ordered by deictic and syntactic type.

	Space			Manner	Quantity
Adnominal	kin3	lan3	ni1	pin6	
demonstratives	'DEM:PROX'	'DEM:DIST'	'DEM'	'DEM:MANNER'	-
Pronominal demonstratives	<i>kaj1-kin3</i> 'here'	kaj1-lan3 'there'	-	-	kaj1 'dem:qtt'

Table 6Southern Zhuang nominal demonstratives

Third, attributive modifiers comprise of adjectives, possessive phrases and relative clauses. Following Gil's typology of attributive modifiers (Gil, 2011), Southern Zhuang can be regarded as a language with weak differentiation, in the sense that unlike in languages such as English, which has dedicated constructions for each of the three subtypes of attributive modifiers, in Southern Zhuang all three subtypes occur in postnominal position, simply adjoined to the noun and without any formal marking. Adjectives formally resemble relative clauses insofar as adjectives in Southern Zhuang exhibit clear verbal properties. It was however established that the two subtypes should not be merged, since adjectives always occur next to the noun, before post-nominal quantifiers and relative clauses. Adjectives further exhibit wide combinatorial properties, since they can co-occur with any other modifier types. Adjectives however cannot be strung together in simple form, but only in reduplicated form. Two subtypes of relative clauses can be distinguished: canonical relative clauses, in which the noun phrase containing the relative clause serves as an argument in a main clause, and correlative relative clauses, which appear in a noun phrase outside of the main clause, with subsequent reference to it in the main clause. Both core and non-core arguments can be relativized upon, and unless the relativized noun functions as the subject argument in the relative clause a resumptive pronoun can be used. Finally, Southern Zhuang has acquired a prenominal modifier construction in which a modifier occurs before the noun, connected to it by the marker *ti1* 'ASSOC'. Such construction is similar to that described for Mandarin Chinese as "associative phrases" (Li and Thompson, 1981), though it is not fully productive in Southern Zhuang. Hybrid structures featuring a prenominal and a postnominal modifier are attested, typically involving a preposed relative clause and a postposed adjective.

Beside modifiers, classifiers constitute a prominent feature of the Southern Zhuang noun phrase. Following Grinevald (2000), the classifier system of Southern Zhuang was characterized as a grammatical system tending towards the lexical edge of the classifier continuum. The classifier system is grammatical insofar as classifier constructions involve syntactic processes of phrase formation. However, it exhibits lexical properties since lexical nouns may take up a classifier function in a numeral classifier construction, at par with other mensural classifiers that cannot function elsewhere as nouns. Additionally, the (grammatical) classifier system blends to some extent with the (lexical) class term system, as is the case with words belonging to the vegetal domain.

Following Aikhenvald (2000), it was established that classifiers come in different semantic subtypes, as summarized below.

- i. UNIQUE classifiers, which classify only one noun.
- ii. ANIMATE classifiers, which divide the nouns they classify along the primary division HUMAN/NON-HUMAN, and make further distinctions in terms of sex and age, for HUMAN nouns.

- iii. FUNCTION classifiers, which make reference to the specific uses of objects.
- iv. PHYSICAL classifiers, which make distinctions in terms of the dimensions SHAPE/DIMENSIONALITY, and CONSISTENCY.
- v. QUANTA/ARRANGEMENT classifiers, which specify the quantity and/or arrangement an entity occurs in.

An important difference between the various semantic subtypes listed above rests in the degree to which they specify an inherent, or intrinsic property of the noun they modify. Accordingly, classifiers are traditionally divided in two semantic types: sortal classifiers (subtypes i. to iv.), which specify an intrinsic property, and mensural classifiers (subtype vi.), which specify an extrinsic property. With respects to Southern Zhuang classifiers, it was shown that the shift from sortal to mensural is better regarded as gradual, rather than categorial. The subtypes of classifiers can therefore be arranged on a continuum running along the dimension intrinsic/extrinsic, with subtype i. (UNIQUE classifiers) standing at the intrinsic end of the continuum, and subtype v. (QUANTA/ARRANGEMENT classifiers) at the extrinsic end of the continuum.

Turning to the different environments in which classifiers occur, it was shown that classifiers may occur with any modifier, as well as with a noun independently of the presence of a modifier. Classifiers are required only in presence of a quantifier, with which it makes up a quantifying phrase in a numeral classifier construction. In all other environments, the classifier is not submitted to such structural constraint. Furthermore, the occurrence of a classifier was shown to correlate with particular referential properties of the noun phrase. First, it was established that the presence of a classifier only entails a singular interpretation in presence of a demonstrative or a possessor. Second, it was shown that whether the use of noun classifiers appears to correlate with specificity, no such correlation could be established in the case of definiteness.

4.1.2 Order of elements within the noun phrase

Comments about constituent order within the noun phrase were made at several points in the preceding chapter. These can be summarized and further generalized as follows.

A noun phrase may minimally consist of a bare noun, possibly preceded by a classifier, as represented in (207). More complex noun phrases display the basic pattern illustrated in (208), in which the quantifier phrase, made up of a quantifier (QTF) followed by a classifier (CLF), occurs before the noun (N), and other modifiers after the noun (MOD). As such, Southern Zhuang differ from both Tai languages (in which modifiers consistently follow the noun) and Sinitic languages (in which modifiers consistently precede the noun).

(207) (CLF) N

(208) $[QTF-CLF N MOD]_{NP}$

Deviations from the basic pattern in (208) do occur. First, the quantifying phrase may be postposed to the noun to achieve particular pragmatic effects, typically when the speaker wants to focus on the quantity. In this case, the modifier can in principle occur either immediately after the noun, or after the quantifying phrase. In both cases an appositional structure obtains, with the second noun phrase being set off by a pause.

(209) a. $[N]_{NP1}$ [QTF-CLF MOD]_{NP2}

b. $[N MOD]_{NP1}$ $[QTF-CLF]_{NP2}$

On the other hand, modifiers may also occur before the noun, marked by the associative marker *ti1* 'ASSOC', as schematized in (210). A noun may take both a prenominal and a postnominal modifier, e.g a relative clause and an adjective, as shown in (211).

(210) MOD *ti1* N

(211) $MOD_1 til N MOD_2$

Post-nominal modifiers may co-occur together, although there are restrictions on the types of modifiers that can do so. The following generalizations can be made. First, the adjective always occurs immediately after the noun, and may co-occur with any other post-nominal modifiers, such as a postnominal quantifier (QTF_{POST}), a relative clause (RC), a demonstrative (DEM) and a possessive phrase (POSS), as illustrated in (212).

(212) CLF N ADJ QTF_{POST}/RC/POSS/DEM

Second, post-nominal quantifiers follow the adjective and precede the relative clause, and cannot co-occur with a possessive or a demonstrative, as shown in (213).

(213)	a.	CLF	Ν	ADJ	QTF _{POST}
	b.	CLF	Ν	QTF _{POS}	rRC
	c.	*CLF	Ν	QTF _{POS}	_T POSS/DEM
	d.	*CLF	Ν	POSS/I	DEM QTF _{POST}

Third, possessives precede demonstratives, as shown in (214).

(214) CLF N POSS DEM

Keeping in mind the above-mentioned restrictions and the obvious fact that a noun phrase cannot contain both a prenominal and a postnominal quantifier, the basic word order can be schematized as follows.

(215) QTF_{PRE}-CLF N ADJ QTF_{POST} RC POSS DEM

To conclude this section, it should be stressed that complex noun phrases consisting of several modifiers are generally disliked. If several modifiers have to occur together, speakers distinctively set them off from each other with a pause.

4.2 Discussion

Out of the four hypotheses I initially posited, only the first turned out to be generally confirmed. It was indeed established that besides the noun, six elements may occur in a noun phrase: a quantifier, a classifier, an adjective, a demonstrative, a possessive phrase and a relative clause.

My second hypothesis assumed that only the quantifying phrase could occur on both sides of the noun. Though the quantifying phrase, which primarily occurs in prenominal position, can indeed be postposed, modifiers were also found to occur on both sides of the noun. Though modifiers primarily follow the noun, they may appear in a prenominal modifier construction.

My third and fourth hypotheses related to the use of classifiers in CLF + N constructions, assuming that noun classifiers could be shown to form a distinct system from that of numeral classifiers (Hypothesis 3) and that they were involved in encoding definiteness (Hypothesis 4). As already mentioned in Section 4.1, the presence of a classifier does not correlate with definiteness, but with specificity. Hypothesis 3 was discussed in Section 3.3.2.3, in which doubts were raised as to whether Southern Zhuang should be counted as a language with a distinct noun classifier system. It was indeed reported that nearly all instances of putative noun classifiers involved the classifier tu4 'CLF:NON-H', which indicates that noun classifiers did not form a fully productive system. Following Luo (2008) on Fengshang Zhuang and Sio and Sybesma (2008), an alternative analysis was proposed. It involved treating the form *tu4* as a class term which would function as a classifier in presence of a modifier, thus providing yet another example of blending between the classifier system and the class term, as shown for the form ko4 'CT/CLF:plant' in Section 3.3.1.2.

A related question involves the use of classifiers in different environments. Aikhenvald (2000) suggests two ways in which a language can feature classifiers occurring in different morphosyntactic environments. First, in "multiple classifier languages", "the same, or almost the same, set of morphemes can be used in more than one classifier environment." (Aikhenvald, 2000: 205). Second, "different sets of morphemes [are] used in distinct classifier environments" (Aikhenvald, 2000: 184), in which case the language will be said to have different classifier types.

At first sight, Southern Zhuang closely matches the multiple classifier type, insofar the same set of classifiers seemingly occurs in different environment. The classifier *kaw2* 'CLF:DEFAULT' is however exceptional in this respect, since it cannot combine with a quantifier. The classifier *kaw2* is reminiscent of the classifier for people *phuø* 'person' in Lao, which is similarly restricted in his distribution, occurring with non-quantifying modifiers only (Enfield, 2007: 154). Interestingly, Enfield cites the classifier phuø as one piece of evidence to argue against the characterization of the Lao system of nominal classification as a multiple classifier system. Further evidence supporting the distinction of two different types (numeral classifiers and "modifier classifiers") involves the fact that "the very large number of semantic distinctions among numeral classifiers are often neutralized" in nonquantifying contexts (Enfield, 2007: 141). Indeed, although in principle any classifier can combine with a (non-quantifying) modifier, in practice only the classifiers too3 'body' and qan3 'person' are used. In such uses, they show more general semantics, inducing a basic contrast anime/inanimate. modifier classifiers Furthermore, (MC) characteristically occur in phonologically reduced form, toø 'MC.ANIM' and ganø 'MC.INAN' (Ibid.)

The fact that in theory any Southern Zhuang classifier can combine with a modifier should therefore not be taken as conclusive evidence in favor of a multiple classifier analysis. The example of Lao suggests that further research needs to be done, on the basis of a larger corpus of naturalistic data, in order to determine whether several classifier types should indeed be distinguished.

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APPENDIX

PHONOLOGY

Syllable Structure

Most, but not all, Southern Zhuang words are monosyllabic. Describing syllable structure thus generally amounts to describing word structure. The canonical word shape can be described in terms of an onset, either simple or complex, followed by a rime. The rime itself is made up of a vocalic nucleus, optionally followed by a coda.

onset	 nucleus	rime 	coda
C ₁ (C ₂)	V		(C ₃)
Figure 3	Segmental structure	of the ca	nonical word

Figure 3 shows that a Southern Zhuang word must minimally consist of a consonant (C_1) followed by a vowel (V). The segmental template $C_1(C_2)V(C_3)$ provides for the following segment strings.

(216)	a.	C_1V	e.g. ba6 'shoulder'
	b.	C_1VC_3	e.g. <i>kim4</i> 'gold'
	c.	$C_1 C_2 V$	e.g. kja4 'fish'
	d.	$C_1C_2VC_3$	e.g. <i>khjuk5</i> 'taro'

Consonants

Table 7 provides the set of initial consonants, which occur as C_1 . Only the palatal glide /j/ may occur as a second consonant, as C_2 .

		Labial	De	ntal	Palatal	Velar	Glottal
			Inter-	Apical			
Stops	Voiceless	р-		t-	C-	k-	2-
	Voiced	b-		d-			
	Aspirated	ph-		th-		kh-	
Fricatives		f-	θ-	S-			h-
Nasals		m-		n-	n-	ŋ-	
Lateral				<i>l</i> -			
Glides		<i>v</i> -			j-		

Table 7Initial consonants

Minimal and near-minimal pairs exemplify consonantal contrasts in initial consonant position in (217) through (223).

(217) Labial stops with different phonation type

Voiceless	Voiced	Aspirated
pa5	ba5	pha5
'elder aunt'	'mad'	'slit'

(218) Dental stops with different phonation type

Voiceless	Voiced	Aspirated
tap5		thap5
'answer'		'carry on shoulder pole'
toŋ6	doŋ6	

'cave' 'winnowing tray'

(219) Velar stops with different phonation type

Voiceless	Aspirated
kop4	khop4
'frog'	'bite'

(220) Fricatives at different place of articulation

Labial	Inter-dental	Apico-dental	Glottal
faщ2	<i>Өа</i> щ6	sawб	hau _l 6
'market'	'clean'	'stir-fry'	'give'

(221) Nasals at different place of articulation

Labial	Apico-dental	Palatal	Velar
ma1	na1		ŋa1
'come'	'wet field'		'dents'
	naw2	naw2	
	'rotten'	'urine'	

(222) Glides at different place of articulation

Labial	Palatal
van1	jaŋ1
'day'	'shoot'

(223) Glottal consonants of different manner of articulation

Stop	Fricative
?a6	ha6
'spread'	'five'

Final consonants are listed in Table 8.

Table 8	Final consonants			
	Labial Dental Palatal			Velar
		Apical		
Stops	-р	-t		-k
Nasals	<i>-m</i>	-n		-ŋ
Glides	-W		-j	-щ

Contrasts in final consonants are illustrated in (224), (225) and (226).

(224) Stops at different place of articulation

Labial	Apico-dental	Velar
lxp1	lrt1	
'fold'	'blood'	
	pat1	pak1
	'blow'	'tired'

(225) Nasals at different place of articulation

Labial	Apico-dental	Velar
kom6		koŋ6
'bend forward'		'shrimp'
kim4	kin4	
'gold'	'eat'	

(226) Glides at different place of articulation

Labial	Palatal	Velar
kaw5	kaj5	kaų5
ʻold'	'chicken'	'saw'

Vowels

Phonemic contrast involves seven different points of the vowel space, as Table 9 shows. In my transcription, long vowels are indicated by a colon only when potentially contrasting with short vowels, i.e. when preceding a glide or a nasal final consonant.

Table 9	Vowels		
	Front	Back	
		Unrounded	Rounded
High	i	ш	и
Mid	е	r	0 - 0:
Low		a – a	:

Vocalic contrasts are exemplified in (227) through (231).

(227) Front vowels at different height

ce4	ba:j1-ci4
'elder sister'	'pork'

(228) Back unrounded vowels at different height

thuŋ4	thxŋ4	
'sugar'	'reach'	

(229) Back rounded vowels at different height

thu4	tho4
'head'	'postpone'

(230) Low back vowels with different length

khaj4	kha:j4		
'open'	'sell'		

(231) Mid back rounded vowels with different length

Өоŋ4	Өо:ŋ4
'tall'	'two'

Tones

Six tones occur in non-checked syllables (which final segment is a sonorant, either a vowel or a sonorant consonant), four of which (tones 1, 2, 4, 5) are allowed in checked syllables (which final segment is a stop). The six tones of Southern Zhuang are given in Table 10.

Table 10 Tones

Tone number	Pitch range	Examples
Tone 1	Mid	ma1 'come'
Tone 2	Mid-Low	<i>me2</i> 'woman'
Tone 3	High-Mid	ma3 'horse'
Tone 4	Mid-High	ma4 'dog'
Tone 5	Low-Mid	ba5 'shoulder'
Tone 6	Low	таб 'grow'

Table 11 maps the tones of Southern Zhuang onto the traditionally accepted four Proto-Tai (PT) tone categories (Li, 1977; Pittayaporn, 2009, among others).

		*A	*B	*C	*DL	*DS
1	Aspirated	4			F	Л
2	Unaspirated	4	5	6	5	4
3	Glottalized	1			ŋ	1
4	Voiced	T	2	3	Z	1

Table 11Modern reflexes of the PT tone categories in Southern Zhuang

BIOGRAPHY

Mr. François Langella was born in La Seyne sur Mer, France, on the 23rd of January 1981.

After graduating from Lyon Business School (EM Lyon), France, he took off for Thailand where he worked for three years in the Cost Control Department of a French construction company. In 2008, he decided to change path and enrolled as a Master's student in the Department of Linguistics, Faculty of Arts, Chulalongkorn University.