Chinese cleft constructions: microparametric 'lateral' grammaticalization[*]

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Abstract

Historical-comparative analysis of Chinese cleft constructions shows that although all Chinese dialects use the copula to select and assign focus to its clausal complement headed by the nominal particle (*de* (的) in Mandarin, *ge* (個/嘅) in southern dialects), there are microvariations in that Mandarin *de* can either occur in sentence-final position (VOde) or as a verbal suffix (VdeO) whereas dialectal *ge* can only occur sentence-finally (VOge) and not elsewhere (*VgeO). All this suggests that Mandarin *de* and dialectal *ge* are not identical, and indeed their etymological roots indicate that while both are nominal elements, *de* and its original form *di* (底) do not have inherent deixis or quantificational force whereas *ge* being derived from the general classifier *ge* (個) does, which pre-empts its reanalysis as a clausal element. The dialectal distribution of Chinese clefts allows us to refine Simpson and Wu's 'lateral' grammaticalization.

Key words
Chinese, clefts, copulas, nominalizers, syntax

1. Introduction

Chinese cleft structures consist of the copula selecting a clausal complement headed by the nominal particle *de* in Mandarin or its dialectal equivalent *ge* in which there is a cleft bipartition of focus and presupposition, as schematized below (Lee 2005:133, Paul and Whitman 2008:430, Hole 2011:1710):

(1)   Subject   COPULA focus   presupposition   DE/GE[1]

There are dialectal microvariations here, since in northern varieties of Mandarin *de* can be affixed onto the verb in the embedded clause when it denotes past tense (2a-b), whereas *ge* is always sentence-final (2c-d):

(2a)   我 是   昨天   買   票   的
         wo shi   zuotian   mai   piao   de
         I COP   yesterday buy   ticket DE

(2b)   我 是   昨天   買-的   票
         wo shi   zuotian   mai-de   piao
         I COP   yesterday buy-DE   ticket
         'It was yesterday that I bought a ticket.'(Mandarin) (Simpson &Wu 2002:169)

(2c)   佢 係   琴日   買   書   嘅
         kui hai   kamyat   maai   sue   ge
         he COP   yesterday buy   book   GE

(2d)   *佢 係   琴日   買-嘅   書
         kui hai   kamyat   maai-ge   sue
         he COP   yesterday buy-GE   book
         'It was yesterday that he bought a book.' (Cantonese)[2] (Lee and Yiu 1998:11)

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[1] The main difference between Chinese clefts and *it*-clefts is that although both involve the copula assigning focus to the relative clause, Chinese has prenominal relative clauses which leads to cleft bipartition within the relative clause as opposed to between the relativized noun and the relative clause as in *it*-clefts (Long 2013:436-440).

[2] The sentence-final nature of *ge* is widely attested in Chinese dialects (i-ii), despite some rare exceptions (iii):

i)   伊 是   昨日   去 日本   個
    i   si   zonie   qi Zeben   ge
    he COP   yesterday   go Japan   GE
    'It was yesterday that he went to Japan.' (Shanghainese) (Wu 2004:131)

ii) 伊 是   昨日   去 日本   個
    i   si   chahng   khi jitpun   e
    he COP   yesterday   go Japan   GE
    'It was yesterday that he went to Japan.' (Taiwanese) (Wu 2004:131)

iii) 我 是   前年   到-個   北京
    o   zi   dzieie   to-ke   peqin
    I COP   two.years.ago   arrive-GE Beijing
    'It was two years ago that I arrived at Beijing.' (Xinhua dialect) (Wu 2005:279)

Simpson and Wu (S&W) argue influentially that the formation of Mandarin clefts is a case of 'lateral' grammaticalization (LG) where *de* is reanalyzed from being a sentence-final nominalizer (VOde) to a clausal particle (VdeO) which represents a 'lateral' reanalysis of *de* from the nominal (DP) to the clausal domain (TP). However, the general ban on the clause-medial positioning of *ge* (see footnote 2) belies the null hypothesis that *de* and *ge* are identical across Chinese dialects. This paper proposes to investigate the diachronic and synchronic relationship between *de* and *ge* in Chinese clefts: section 2 provides an empirical analysis and formal representation of Chinese clefts which are argued to be essentially copular constructions where the matrix copula verb assigns focus to its clausal complement headed by *de* or *ge*; section 3 examines the historical formation of Chinese clefts which are shown to be derived from nominalized clausal complements of the copula (Yap et al 2010) and the different etymologies of *de* and *ge* seem to account for their different distributions in Chinese clefts; section 4 discusses the theoretical implications of Chinese clefts for LG which seems to be parameterisable.

2. Chinese clefts (VOde/VdeO, VOge/*VgeO)
It is well known that the two types of cleft structures have different empirical properties (Paul and Whitman 2008, Hole 2011), since in addition to the fact that verbal suffix *de* (VdeO) obligatorily marks past tense (2a-d), VOde and VOge permit a range of tense, aspect and mood (TAM) values (3a-b, d-e) and negation (3g-h), all of which are prohibited in VdeO (3c, f, i):

(3a) 他 是　　明天　　才　　　會　　去 北京　　　的
　　　ta shi　　mingtian cai　　hui　　qu Beijing　　de
　　　he SHI　　tomorrow only.then　will　go Beijing　　DE
　　　'It will be tomorrow that he will go to Beijing.' (Mandarin) (S&W 2002:189)

(3b) 我　　係　　要　　去　　美國　　　嘅
　　　ngoh　hai　yiu　hui　　meigwok　ge
　　　I　　COP　will　go　　America　GE
　　　'It is the case that I will go to America.' (Cantonese) (Fung 2000:149)

(3c) *他　是　　明天　　才　　　會　　去-的　　北京
　　　ta　shi　　mingtian cai　　hui　　qu-de　　Beijing
　　　he　SHI　　tomorrow only.then will　go-DE　　Beijing
　　　'It is only tomorrow that he will go to Beijing.' (Mandarin) (S&W 2002:177)

(3d) 張三　　是　　上　　個 星期　去-了/過 北京　　　的
　　　Zhangsan shi　　shang ge xingqi qu-le/guo Beijing　　de
　　　Zhangsan COP　　last　CL week　go-ASP　Beijing　　DE
　　　'It was last week that he went to Beijing.' (Mandarin) (Hole 2011:1713)

(3e) 佢　　係　　打-緊　　字　　嘅
　　　kui　hai　daa-gan　ji　　ge
　　　he　　COP　hit-ASP　word　GE
　　　'He *is* typing words.' (Cantonese) (Fung 2000:151)

(3f)　　是　　　他　　打破(*-了/過)　　的 杯子
　　　　shi　　ta　　dapo(-le/-guo)　　de beizi
　　　　COP　　he　　smash-ASP　　　DE cup
　　　　'It was he who smashed the cup.' (Mandarin) (Paul and Whitman 2008:430)

(3g)　　我　　是　　從來　　　不　　　抽煙　　　的
　　　　wo　　shi　　conglai　　bu　　　chouyan　de
　　　　I　　　COP　　ever　　　NEG　　smoke　　　DE
　　　　'I have never smoked.' (Mandarin) (Paul and Whitman 2008:422)

(3h)　　係　　唔　　關　　　　你　　事　　　嘅
　　　　hai　　ng　　gwaan　　nei　　si　　　ge
　　　　COP　NEG　concern　　you　　matter　GE
　　　　'It does *not* concern you.' (Cantonese) (Fung 2000:151)

(3i)　　*他　是　　上　　　個 星期　不/沒 去-的 學校
　　　　 ta　　shi　　shang　ge xingqi bu/mei qu-de　xuexiao
　　　　 he　　COP　last　　CL week　NEG　go-DE school
　　　　 'It was last week that he did not go to school.' (Mandarin) (Paul and Whitman 2008:430)

　　　Moreover, while VOde and VOge allow for narrow focus on the subject (4a-b) and the adjunct constituent (4d-e) closest to the copula as well as broad focus on the entire embedded clause with or without an overt subject (4g-h, j-k), VdeO only permits narrow focus (4c, f, i, l):

(4a)　　是　　　張三　　　寫　　詩　　　的
　　　　shi　　Zhangsan xie　　shi　　de
　　　　COP　　Zhangsan write　poetry DE
　　　　'It is Zhangsan who writes poems.' (Mandarin) (Hole 2011:1711)

(4b)　　係　　　我　　叫　　佢　　哗-吓　　先　　嘅
　　　　hai　　ngoh　giu　kui　tau-ha　　sin　　ge
　　　　COP　　I　　call　him　rest-ASP　first　GE
　　　　'It was I who told him to take a rest first.' (Cantonese) (Fung 2000:151)

(4c)　　是　　　張三　　　寫-的　　詩
　　　　shi　　Zhangsan xie-de　　shi
　　　　COP　　Zhangsan write-DE　poetry
　　　　'It was Zhangsan who wrote poetry.' (Mandarin) (Hole 2011:1710)

(4d)　　張三　　是　　用　　毛筆　寫　　詩　　的
　　　　Zhangsan shi　　yong　maobi xie　　shi　　de
　　　　Zhangsan COP　　use　　brush　write　poetry DE
　　　　'It is with a brush that Zhangsan writes poetry.' (Mandarin) (Hole 2011:1711)

(4e) 張三　　　係　　琴日　　打　　電報　　　嘅
　　　Zoengsaam　hai　kamyat　daa　dinbou　ge
　　　Zhangsan　COP　yesterday　hit　telegram　GE
　　　It was yesterday that Zhangsan sent a telegram.' (Cantonese) (Lee and Yiu 1998:9)

(4f) 張三　　　是　　用　　毛筆　　寫-的　　詩
　　　Zhangsan shi　yong　maobi　xie-de　shi
　　　Zhangsan SHI　use　brush　write-DE　poetry
　　　'It was with a brush that Zhangsan wrote poetry.' (Mandarin) (Hole 2011:1710)

(4g) 張三　　　是　　看到　王　　小姐　的
　　　Zhangsan shi　kandao Wang　xiaojie de
　　　Zhangsan SHI　see　Wang　miss　DE
　　　'It is the case that Zhang saw Miss Wang.' (Mandarin) (Hole 2011:1711)

(4h) 我　　係　　踢　　足球　　　嘅
　　　ngoh　hai　tek　jukkau　ge
　　　I　COP　play　football　GE
　　　'It is the case that I play football.' (Cantonese) (Fung 2000:145)

(4i) *張三　　是　　寫-的　　詩
　　　Zhangsan shi　xie-de　shi
　　　Zhangsan COP　write-DE　poem
　　　'It is the case that Zhangsan wrote poems.' (Mandarin) (Hole 2011:1711)

(4j) 是　　　希臘人　最　　先　　開始　釀　　酒　　的
　　　shi　Xilaren　zui　xian　kaishi niang　jiu　de
　　　COP　Greek　most　first　start　brew　wine　DE
　　　'It is the case that the Greeks were the first to brew wine.' (Mandarin) (Cheng 2008:253)

(4k) 係　咁　　都　　得　　　嘅
　　　hai　gam　dou　dak　ge
　　　COP　thus　also　possible　GE
　　　'It is the case that this is also possible.' (Cantonese) (Fung 2000:162)

(4l) *是　張三　　寫-的　　詩
　　　shi　Zhangsan xie-de　shi
　　　COP　Zhangsan write-DE　poetry
　　　'It is the case that Zhangsan wrote poems.' (Mandarin) (Hole 2011:1711)

In conformity with the typological characteristics of clefts which often consist of copulas assigning focus to relative clauses (see footnote 1), the Chinese copula may be argued to assign focus to its complement ([u-Foc]) in which there may be left-dislocation in the form of A'-movement which derives cleft focus (cf Kiss 1998), and VOde/VOge and VdeO can be argued to be CP and TP respectively (Paul and Whitman 2008:445-448) in which given Minimality the

closest constituent is attracted to the focus projection on the left-periphery of *de* and *ge*,[3] and since phrase-final *de* and *ge* have scope over the embedded clause, they allow for all TAM values and negation in the embedded clause as well as A'-movement for either individual constituents or the entire clause itself which constitute narrow and broad focus (5a) whereas verbal affix *de* bans all other TAM values and negation and only permits A'-movement for individual constituents (5b):
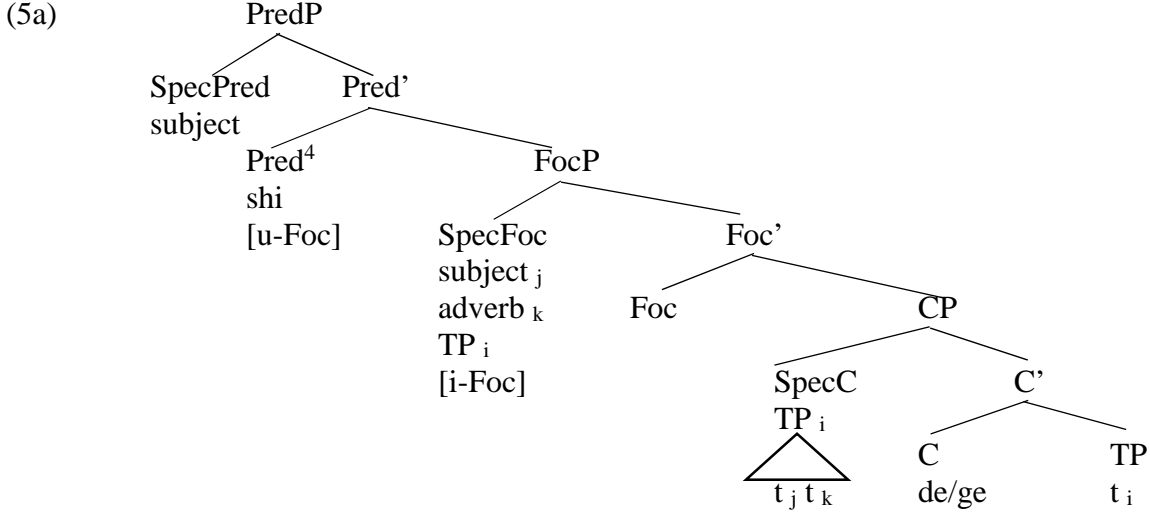
(5a)

Figure 1: VOde/VOge

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[3] This is supported by the fact that cleft bipartition only exists in the presence of the clausal particle (i) (*shi-de* proper (Paul and Whitman 2008:414), whereas its omission yields informational focus by association (ii) (bare *shi* (Paul and Whitman 2008:415), which suggests that *de* and by extension *ge* hold the landing-site for A'-movement:

(i)
他	是	在	北京	學	語言學	的,	不	是	在	上海	學	的
ta	shi	zai	Beijing	xue	yuyanxue	de	bu	shi	zai	Shanghai	xue	de
he	COP	at	Beijing	learn	linguistics	DE	NEG	COP	at	Shanghai	learn	DE

*不	是	在	北京	學	法文	的
bu	shi	zai	Beijing	xue	fawen	de
NEG	COP	at	Beijing	learn	French	DE

'It was in Beijing that he studied linguistics, not in Shanghai *(not French).' (Paul and Whitman 2008:415)

(ii)
他	是	在	北京	學	語言學	不	是	在	上海	學	語言學
ta	shi	zai	Beijing	xue	yuyanxue	bu	shi	zai	Shanghai	xue	yuyanxue
he	COP	at	Beijing	learn	linguistics	NEG	COP	at	Shanghai	learn	linguistics

也	不	是	在	北京	學	法文
ye	bu	shi	zai	Beijing	xue	fawen
also	NEG	COP	at	Beijing	learn	French

'He studies linguistics at Beijing, not in Shanghai, and not French either.' (Paul and Whitman 2008:414)

[4] In representing copula *shi*, I adopt Bowers' (1993) hypothesis that copulas instantiate unique functional heads (Pred) with the subject in its specifier, which is arguably superior to the raising verb analysis which entails problems for the adjacency in cleft-focus assignment (Paul and Whitman 2008:437-438).

(5b)

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              PredP
             /      \
      SpecPred       Pred'
      subject       /     \
                 Pred       FocP
                 shi       /     \
                 [u-Foc]  SpecFoc      Foc'
                          subject j    /    \
                          adverb k   Foc      TP
                          [i-Foc]          /     \
                                       SpecT      T'
                                        t j      /    \
                                          T(past)      AspP
                                          (de)        /     \
                                                  SpecAsp     Asp'
                                                   t j       /     \
                                                        AdvP        Asp'
                                                         t k       /     \
                                                               Asp         vP
                                                               V i-de     /   \
                                                               [i-T:past] v     VP
                                                                          t i    |
                                                                                 V
                                                                                t i
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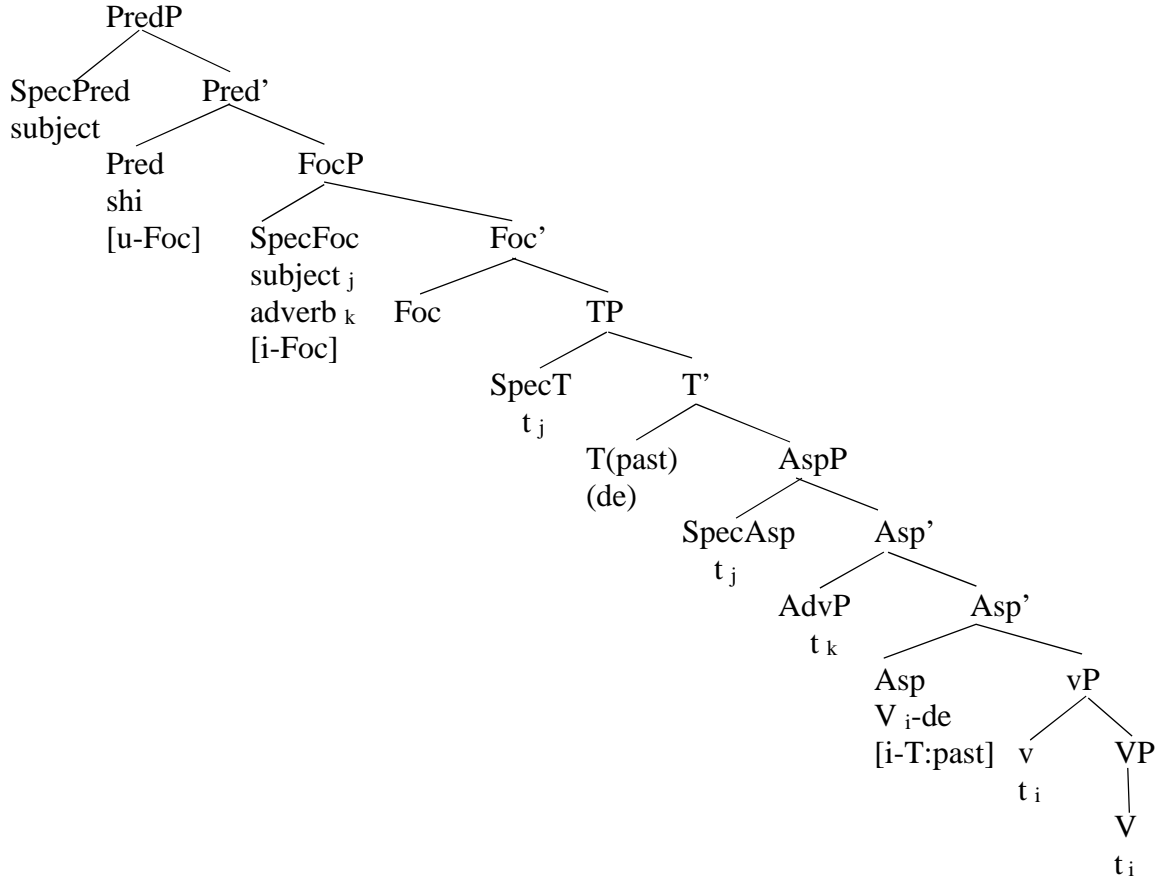
Figure 2: VdeO

Chinese clefts, then, are copular constructions whose clausal complements have different empirical properties due to the structural differences between sentence-final particles (VOde/VOge) and verbal suffixes (VdeO), which leads us to their diachronic formation.

3. Historical formation of Chinese clefts

Recent philological analyses point out that Chinese cleft constructions are reanalyzed from copular constructions in which the copula selects nominalized relative clauses headed by *de* and *ge* (Zhan 2012, Long 2013). While both *de* and *ge* are used as adnominalisers in Chinese, *de* is widely held to stem from the Medieval Chinese phrase-final nominaliser (n) *di* (底) (Liu 2008, cf Aldridge 2008) and *ge* is commonly argued to be derived from the classifier (CL) *ge* (Cao 1995) which can stand as a phrase-initial determiner and assign specificity (del Gobbo 1999).[5] *De* and *ge*, therefore, form different types of relative clauses when used as complements to the copula. VOde and VOge are regularly found in equative copular constructions where the clausal complement is reanalysable as a cleft in contrastive contexts (7a) or when the nominal complement is omitted (7b-c), which weakens their nominal character:

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[5] The inherent specificity of *ge* may have to do with the fact that it is originally used as a quantifier for countable nouns in Classical Chinese and is hence inherently individualizing (Yap et al 2010, Bisang and Li 2012).

(7a)
非	是	菩萨	行藏,	此	是	俗门	作	底
fei	shi	pusa	xingcang	ci	shi	sumen	zuo	di
NEG	COP	divinity	behaviour	this	COP	laymen	do	DE

'This is not the behaviour of divinity; this is the doings of laymen (> 'it was laymen who did this).'(*Dunhuang bianwenji* 敦煌变文集)

(7b)
师	云: "	人人	尽	有	底	衣	即	是。"
shi	yun	renren	jin	you	di	yi	ji	shi
teacher	say	everyone	all	have	DE	clothes	then	SHI

僧	云: "	既	是	人人	尽	有	底,	用	被	作	什摩？"
seng	yun	ji	shi	renren	jin	you	di	yong	bi	zuo	shenme
monk	say	as	COP	everyone	all	have	DE	use	garment	do	what

'The teacher says, 'The clothes which everyone has it is then.' The monk said, 'If it is the clothes which everyone has (> if it is the case that everyone has it), what use is there for garments?' (*Zutangji* 祖堂集)

(7c)
师	指	面-前	狗子	云: "	明-明-个,	明-明-个。"
shi	zhi	mian-qian	gouzi	yun	ming-ming-ge	ming-ming-ge
teacher	point	face-LOC	dog	say	bright-bright-GE	bright-bright-GE

僧	便	问	师:	"	既	是	明-明-个,
seng	bian	wen	shi		ji	shi	ming-ming-ge
monk	then	ask	teacher		as	COP	bright-bright-GE

为	个	摩	头	在	里	许?"
wei	ge	mo	tou	zai	li	xu
for	GE	what	head	in	inside	within

'The teacher points at the dog in front and say, 'Fair-skinned, fair-skinned.' The monk then asks the teacher, 'If it is the one that is fair-skinned (> if it is the case that it is fair-skinned), why is its head inside?' (*Zutangji* 祖堂集)

Clause-medial *de* and *ge*, on the other hand, are found in copular constructions where the subject and the complement are not co-referential (Long 2013:425) and the contrast in deixis entails that *de* is attested with abstract and generic nouns and is hence reanalysable as a cleft denoting past tense due to the fact that the object is the result of the verb (7d) whereas *ge* tends to select specific and referential ones and its nominal character is hence retained (7e):

(7d)
娘	原	是	氣惱-上	起	的	病
niang	yuan	shi	qinao-shang	qi	de	bing
mother	originally	SHI	angry-LOC	contract	DE	illness

'As for my mother, it was originally the illness that was contracted by getting angry (> it was by getting angry that my mother contracted illness).' (*Jinping meici hua* 金瓶梅詞話)

(7e)
則	是	茶坊-裡	見	個 粗-眉毛、	大-眼睛、 蹶鼻子、
ze	shi	chafang-li	jian	ge cu-meimao	da-yanjing jue-bizi
then	COP	tea.lounge-LOC	see	GE thick-brow	big-eye flat-nose

略绰-口　　的 官人
luechuo-kou　de　guanren
sharp-mouth　DE official
'Then it was the case that in the lounge he saw a thick-browed, big-eyed, flat-nosed, sharp-mouthed official.' (*Nansong Huaben Xuanji* 南宋話本選集)

The difference in deixis between *de* and *ge*, therefore, seems to account for the discrepancy between VdeO and *VgeO in Chinese clefts, which has important implications for S&W's LG.

4. 'Lateral' grammaticalization: microparametric view

The reanalysis of Chinese *de* and *ge* in Chinese clefts shows that while both seem to conform to S&W's LG hypothesis of a 'lateral' reanalysis from nominal to clausal, the inherent deixis of *ge* ([i-D]) pre-empts its reanalysis as a clausal element in clause-medial position as it selects definite and specific objects whereas *de* is reanalyzable in both clause-final and clause-medial positions due to its general lack of deixis, which shows structural correlations between the nominal and clausal domains (n/CL > C, De > T/Asp), which can be schematized thus:
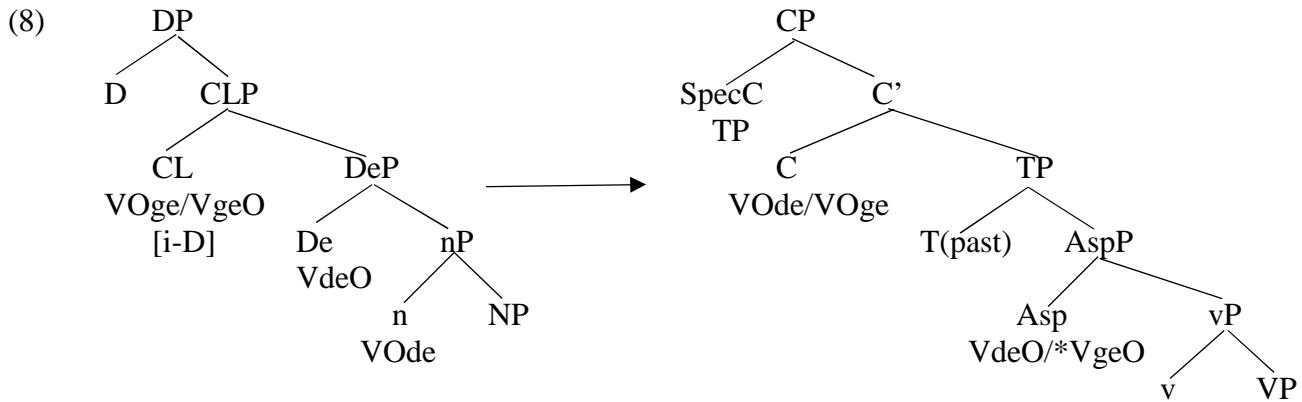
(8)

Figure 3: microparametric variation in 'lateral' grammaticalization

LG, therefore, can be parameterized according to the hierarchy of nominal elements, as higher elements (CL) cannot be as easily reanalyzed 'laterally' as lower ones (De/n).

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