ERRATA

p.97, line 9:  insert + before 'Marg:ClDep' in the formula.

p.97, line 12:  insert 'by' after 'filled'.

p.110, last line:  For 'list' read 'choice'.

p.119, line 2:  Join Cn:cn' and Jc:Jcfeat' with the following:

---------------- + ----------------

p.130, line 7:  For 'completes' read 'complete'.

p.174, last line:  For 'plus' read 'with'.

p.203, fn.7:  After '8.3.6.1.' delete the rest of the footnote.

p.209, line 19:  Delete 'in both cases'.

First line of fn.21: 'As can be seen in the third example,...'

p.242, last line:  'DescriAdjPhr' should be 'Descr:AdjPhr'

p.252, fn.34, line 4:  For 'itno' read 'into'.

p.260, line 8:  For 'gey3day1' read 'gey3dag1'.

p.292, line 16:  For 'predicate' read 'predicative'.

p.349, line 18:  For 'the hyphen' read 'a dash'.

p.358, line 8:  For 'these levels to the level of the word' read
'the clause to the level of the phrase'.

p.358, line 16:  For 'recognize' read 'recognized'.
THE GRAMMATICAL HIERARCHY OF MALAYAN CANTONESE

A thesis submitted in partial fulfilment of the requirements
for the degree of Doctor of Philosophy in the University of London

by

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School of Oriental and African Studies, University of London,
March 1972
Abstract

The present study attempts an over-all investigation into the grammar of Malayan Cantonese, using an adapted tagmemic model, taking the sentence as the highest unit and the morpheme as the lowest unit.

Chapter 1 discusses the tagmemic model and its adaptations for the present study.

The language described in the thesis is defined and its scope delimited in Chapter 2.

A phonological statement is given in Chapter 3 as the basis of the romanization formulated by the author and used in the present study. The phonological statement does not attempt to be more than a justification for the romanization and much more work can be done on the sound system of the language, especially on tone and intonation.

In Chapter 4, the levels of analysis are discussed.

Chapter 5 deals with the sentence level.

Chapters 6, 7 and 8 are concerned with the clause level. In Chapter 6, all the emic clause types except the passive clause types are presented and dealt with. In Chapter 7, the emic passive clause types are dealt with. Chapter 8 is concerned with the etic variants of emic clause types through the optional expansion of
clause types and the change in the order of tags within clause types.

Chapters 9 and 10 are concerned with the phrase and word levels respectively.

Chapter 11 consists of lists of affixes and particles with examples of their usage.

Chapter 12 consists of a text (a narrative) and a textual analysis of part of the text.

Malayan Cantonese, in becoming a language of Malaya, has absorbed certain Malay loan-words and loan translations through contact between Cantonese and Malay speakers. There are no Tamil loan-words (except for names of food), because Tamil speakers speaking to monolingual Cantonese speakers would use some form of Bazaar Malay. A short list of Malay loan-words is appended to the present work; this list is not meant to be exhaustive as it is probably increasing all the time.

---

1 See Chapter 2.

2 Bazaar Malay is a pidgin language used as a lingua franca when interlocutors have no other common language, e.g., a monolingual Chinese speaking to a monolingual Indian.
0.1. Preface

To date, there has been no linguistic description of Malayan Cantonese, the language defined in Chapter 2. There exist, however, two pedagogical works on Cantonese:

1) Cantonese lessons for Malayan students by R. Bruce, and
2) Cantonese for beginners with a vocabulary (word-for-word method) by K.C. Chiang.

The former was written mainly for the British policeman in Malaya, and is therefore drawing on a different register from the one presented in the present study. The second work is closer to the register described in the following chapters but it is too small a work to cover much of the Cantonese language. It is, however, laudable as a piece of pioneer work on Cantonese at a time when most literate Chinese people in Malaya and Singapore thought of Mandarin as the most important Chinese language to study.

In addition to the two pedagogical works mentioned above, there exists


Works on Cantonese elsewhere are included in the bibliography.

The aims of the present study are twofold:

1) to present an acceptable grammar of Malayan Cantonese, and
2) to demonstrate the adaptability of the tagmemic model to a Chinese language.

1 See Chapter 2.
Acknowledgements

During the preparation of this work, I have benefited from many quarters. Individual names are too numerous for me to list exhaustively but I would like to single out a few for special mention.

To my teacher and supervisor, Professor R.H. Robins, I am entirely indebted for his excellent guidance and patience while I was his pupil. I have benefited immeasurably from the tutelage of a scholar both distinguished and modest, who, in spite of heavy commitments, gave most generously of his time and energies in order to guide me in my work. Imperfections that remain in this analysis are, of course, my own.

At the beginning of my course of studies at the School of Oriental and African Studies, I was supervised by Professor E.J.A. Henderson. To her I am indebted for her help in arriving at a phonological statement of Cantonese.

The completion of this thesis was made possible through the award of the James G.R. Ferling Scholarship; I wish to express my gratitude to the Governing Body of the School in this connection.

Among the many others who gave me invaluable assistance, I would like to thank my former teachers, Dr. E. Dunstan and Mrs. N. Waterson, for reading and criticizing parts of the thesis. To both of them I am deeply indebted for their unfailing encouragement and kindness.

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During the past two years, I have been able to obtain essential reading materials through the inter-library loan section of the Library, University of Newcastle upon Tyne; I wish to thank the staff of the University Library who gave me their kind assistance.

Grateful acknowledgements are due to Mrs. E. A. Ainslie for her help in typing the larger part of this thesis and to Miss S. Cosham for her kind assistance in checking the manuscript.

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CHAPTER 1: The tagmemic model and its adaptations for the present study

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1.4. The tagmemic model

The theory on which this grammar is based is expounded by Kenneth Pike in his monumental work *Language in relation to a unified theory of human behaviour*. In that work, Pike presents his view that all behavioural units (whether drawn from non-linguistic or linguistic experience) is 'trimodally structured'¹ into the FEATURE mode, the MANIFESTATION mode and the DISTRIBUTION mode².

The feature mode includes 'identificational-contrastive components', for which Pike gives as one example: 'the morpheme *cat* has the sound sequence as one contrastive component, and its meaning 'feline' as another'³.

The manifestation mode deals with the physical properties of the unit and the actual variants of these properties which may be observed through sight or hearing. Pike gives a phonological example to explain this mode: 'the /t/ at the beginning of *tatter* is followed by a characteristic puff of breath, whereas the one in the middle, for American English, has a light flip of the tongue'³.

The distribution mode of a unit includes its 'relational components, including its class membership and its function in a slot of a hierarchically-ordered larger construction (its external distribution), and its internal segmentation (its internal distribution)'³: Pike illustrates this mode with the morpheme *boy*, which 'is a member of a class of animate nouns; may occur in subject, object, and other positions in the clause, and internally is made up of a characteristic sequence of sounds comprising a syllable'⁴.

¹ Waterhouse, (1962), 0.4.
² Pike presents his argument in Pike (1967), pp.84-91. Only his linguistic examples are referred to here; his exemplifications of these modes using parts of a church service can be found in the pages cited.
³ Ibid, p.85.
⁴ Ibid, p.86.
The concept of the tagmeme as a unit of grammar is the same as the unit labelled 'grameme' which Pike was trying to work on as early as 1948. In Pike (1958) this term was changed to 'tagmeme' and the term is used in the latest edition of Pike (1967); the term 'grameme', however, was still used in the 1954 edition. The reasons for this change were etymological and discussions on the change in terminology are given in Pike (1958) and in Pike (1967) p. 6 and 11.

Although the theory used in the present analysis stems from Pike, I have learnt more heavily on later tagmemicists who were less concerned with non-linguistic phenomena especially those phenomena related to church services (like hymn singing), football games and other aspects of American life, like 'the breakfast unit'. These other tagmemicists, viz. Longacre, Pickett, Elson, Waterhouse and Cook, through their works on theory as well as on language analysis, have been successful in developing the theory from a behavioural one with its heterogeneous mass of material into an almost completely linguistic theory.

The works cited below are not meant to be an exhaustive bibliography of the works by the authors mentioned which I have consulted; a fuller bibliography of their works is given at the end of this study.

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5 Ibid, p. 5.
6 Ibid, p. 122.
7 Longacre, (1964).
8 Pickett (1960) and Elson and Pickett, (1965).
10 Cook, (1967); (1969).
1.2. **Emic and etic**

The principle of emic and etic units as used in this study can be briefly summarised as follows: emic units contrast in both form and function while etic units do not. Form relates to the differences in the order of elements and the differences of manifesting classes while function relates to the grammatical meanings of slots, e.g., whether a tagmeme at clause level functions as a subject slot or as a predicate slot.

Etic units are variants of emic units. For example, in the English clause *John hit Mary*, *John* and *hit* are two emic units. *John* is a noun phrase filler of the subject slot while *hit* is a verb phrase filler of the predicate slot. *John* and *hit*, therefore, contrast both in form (order in the clause as well as difference in manifesting class) and function (subject slot versus predicate slot).

*John* and *Mary*, although manifested by the same class of words, also belong to different emic units since *John* fills a subject slot while *Mary* fills an object slot.

In the expanded clause, *John and his brother hit Mary and her dog*, *John and his brother*, an expanded noun phrase, is an etic variant of *John* in the first clause cited while *Mary and her dog* is an etic variant of *Mary* in the first clause cited. They are different fillers of the same tagmemes, viz., subject and object tagmemes respectively. The two clauses themselves are etic variants of the same emic clause type, viz., an active declarative clause type.

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11 Terms coined by Pike (1954); see 1.6. for a different interpretation of these terms in the present study.
1.3. Adaptations of the tagmemic model

In 1.1. it was seen that the tagmemic model as expounded by Pike upheld a trimodal structuring of units into the feature mode, the manifestation mode and the distribution mode. Waterhouse explains the analogy these modes have when applied to language: 'For a language, the feature mode is the lexical hierarchy, of which the morpheme is the basic unit; the manifestation mode is the phonological hierarchy, of which the phoneme is the basic unit; and the distribution mode is the grammatical hierarchy, of which the tagmeme is the basic unit.'

Indeed, not only did Pike uphold a trimodal structuring of units, he upheld a multiple trimodal structuring of units in that each of the basic units mentioned above by Waterhouse, viz., the morpheme, the phoneme and the tagmeme, has its own modes. These modes within modes are described briefly here.

The feature mode of the morpheme includes allomorphic variation as well as empty morphemes, i.e. those morphemes where 'no lexically-meaningful component can be detected'.

The manifestation mode of the morpheme includes the total sum of separate repetitions or occurrences of that morpheme.

The distribution mode of the morpheme is concerned with the activeness of morphemes or whether they have ceased to be active. An illustration given by Pike compares the two words brooklet and hamlet; Pike suggests that brook and -let are still active in brooklet, but hamlet 'constitutes a single etically-complex morpheme in which the first part is now certainly not active.'

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12 Waterhouse, (1962), 0.4.
13 A full explanation of the modes of the basic units of each hierarchy is given in Pike (1967), pp.158 ff (on the morpheme), pp 294 ff (on the phoneme) and pp 196 ff (on the tagmeme).
14 Ibid., p. 160.
15 Ibid., p. 170.
The feature mode of the phoneme for Pike includes simultaneous, sequential and contrastive-identificational features. An example of the first set of features is the set of simultaneous articulatory movements which produce the phoneme /l/; an example of sequential features is given by Pike in Spanish 'ch' in the word *chamaco* 'boy', where 'ch' represents the single phoneme /ç/ but which is composed of the two phonetic segments [t] and [s] in sequence; as an example of contrastive-identificational features, Pike cites the different movements and positioning of the tongue tip to produce English /s/ and /l/.

The manifestation mode of the phoneme is the physiological movement of those parts of the body involved in the production of a phoneme.

Pike's view of the phoneme within the tagmemic theory 'is viewed primarily as an emic unit of behavior - not as primarily a unit of acoustics'. This is very different from the view of the phoneme presented in the present study in Chapter 3.

The distribution mode of the phoneme includes its 'potential for occurrence' in places within larger units like the syllable, which Pike calls 'a small hyperphoneme': Pike cites the case of the majority of English vowels filling the peak slot of the syllable and the case of /a/ as the only filler of the consonant slot at the beginning of a three-consonant pre-peak sequence in the syllable to illustrate this mode.

---

16 Ibid., pp 294-295.
17 Ibid., p.306.
18 Ibid., p.318.
The feature mode of the tagmeme is illustrated by Pike with the sentences *I don't care but you ran off with mine* and *I was hit by the ball*, where he asserts that the two cases of 'I' do not belong to the same tagmeme. In the case of the first 'I', the feature mode of the subject tagmeme includes the structural meaning of 'actor-as-subject'\(^{19}\), whereas in the case of the second 'I', (in Pikean terms), the feature mode of the subject tagmeme would include a different structural meaning 'recipient-of-action-as-subject-of-the sentence'\(^{20}\). This particular aspect of the theory is also dealt with in Pike (1959), p. 40, where it is argued that in English a distinction must be made between 'subject-as-actor' John in *John came home* and 'subject-as-person-affected' John in *John was hit by Bill*.

This kind of differentiation, followed by quite a few tagmemicists, is rejected in the present study. While adhering to Pike's definition of the tagmeme as a grammatical unit exhibiting a slot-class relationship, and while recognising that there is a difference in the two kinds of clause structure in the example given by Pike, viz., active clause versus passive clause, I fail to see any justification for not recognising the two subject tagmemes as one and the same subject tagmeme. Pike's differentiation of such tagmemes would lead to double-listing or multiple-listing of fillers for different sorts of subject tagmeme, object tagmeme, etc., which would prove redundant.

The manifestation mode of the tagmeme for Pike includes all the fillers of a possible slot, e.g., *we, he, you, John and Mary*, are part of the total manifestations of the manifestation mode of the subject tagmeme.

\(^{19}\) Ibid., p. 196.

\(^{20}\) Ibid., p. 219.
Finally, the distribution mode of the tagmeme includes its actual occurrence as a slot:filler correlative in a certain place in a structure (say, a clause tagmeme in a sentence), its potential occurrence in different places (exemplified by the positions of 'I' in *I don't care* and *why should I care?*)\(^{21}\) and the 'tying' of variants of tagmemes to each other. This last is illustrated by the presence of concord which demands the occurrence of 'I' with 'do' in *I don't care* and 'he' with 'does' in *he doesn't care*\(^ {22}\).

The present study is only concerned with the distribution mode of the language described, i.e. with the grammatical hierarchy of Malayan Cantonese. In other words, the lexical and phonological hierarchies, representing the feature and manifestation modes, are not entered into.

A note must be added that no attempt is made to describe in detail the interlocking of hierarchies which Pike deals with as a vital part of his total system of language and behaviour. Such interlocking of hierarchies, is, however, recognised.

Indeed, the interlocking of the phonological and grammatical hierarchies can be seen in Chapter 5 where intonation and juncture tagmemes are treated as properties of the sentence. In Chapters 6 and 7 intonation is treated as a property of the conditional clause. In Chapter 10 (10.9) tone modification is treated as the manifestation of a suprath.

---

\(^{21}\) For Pike, the two tagmemes must be identical in structural meaning, as explained above. The 'I' in a passive clause would not be considered by Pike in this context. It would, however, be considered in the present study.

As an example of the interlocking between the lexical and phonological hierarchies, Pike cites the case of English, which uses as a criterion for determining word boundaries the discovery of where stress groups can end; for example, the word ticket is not normally stressed on the second syllable whereas the phrase Jack it! may consist of two stress groups with heavy stress on the second group for effect.²³

Elsewhere,²⁴ Pike relates the interlocking of hierarchies to analyses in which there are 'analytical residues which are not convenient to assign specifically to morphology or to syntax'. An example is a phrase word such as Jack-in-the-Pulpit.

1.4. Influence of transformational grammar on tagmemics

Since the publication of Chomsky's Syntactic Structures, tagmemicists have been unable to ignore the rise of transformational grammar and tagmemics has, to a certain extent, been influenced and enlightened by transformational grammar, though not to as great an extent as Cook²⁵ asserts.

²³ Ibid., p.567.
²⁵ Cook, (1969), p.3, asserts that in Longacre (1964), 'Longacre specifically points the way to a tagmemic-transformational model' by accepting certain features of transformational grammar. It appears to me, however, that Longacre (1964), p.10, draws attention strongly to the fact that the tagmemic approach is 'frankly analytic and taxonomic' but points out that although generative grammar does not stick to a corpus it is by no means uninterested in linguistic analysis. Saying that the two theories have certain interests in common is not the same as saying that the two can be subsumed under one name.
It is true, however, that Longacre as well as other tagmemicists nowadays do regard transform potential as a structural difference between different grammatical units. Longacre uses the term 'transform potential' interchangeably with 'derivation', which is not Cook's practice. Longacre (1964), p.134, asserts that '... the transform potential (or derivation) of one sentence versus another may be a very direct witness to differing structures.'

I have followed Longacre's acceptance of transform potential as an additional criterion in 6.3. in deciding between the different clause nuclei, viz., transitive clause types have a passive transform potential whereas intransitive types do not. In Chapter 7, the passive clauses described are said to be 'derived' from the corresponding transitive (active) clauses. A further precedent for this particular practice is found in Brend, (1968), Chapter 2, where her 'secondary' (i.e., passive, impersonal and descriptive) clause types are said to be 'derived' from the 'primary' (transitive, intransitive and equative) clause types.

Tagmemics, therefore, does to a certain extent show relationships between what would be regarded as 'transformationally related' structures in transformational grammar, but it does not always do this. For instance, no attempt is made in this study to introduce 'kernel' and 'derived' sentences, a practice strongly advocated by Cook (1969), p.42, and tentatively suggested by Pike (1967), p.473. 26

26 This point is further discussed in 5.2.2.
1.5. Differences in terminology

In earlier tagmemics literature, the term hypertagmeme was used to designate a high-level construction, such as a clause. This term was changed by Longacre. Typically, syntagmemes of one structural level manifest tagmemes of the next higher level: e.g., words manifest phrase level tagmemes. But a syntagmeme may manifest a tagmeme of another syntagmeme on the same level; e.g., one phrase may occur imbedded within another phrase. In the present study, however, both these terms are replaced by the names of the different levels above the word, i.e., phrase, clause and sentence. A phrase, for example, consists of a string of phrase level tagmemes typically filled by words.

The tagmeme retains its traditional meaning of a slot: class correlative in the grammatical hierarchy. The exclusion of the term syntagmeme aims at economy of terms, and this practice is commented on by Pike: 'In many recent publications on tagmemics, the term hypertagmeme has been dropped (under Longacre's influence) and authors are referring to "tagmemes on various levels". This seems to leave no deep-seated confusion.'

27 Longacre, (1964), p.15, fn 10: 'In my article "String Constituent Analysis" I use HYPERTAGMENE rather than SYNTAGMENE. While the latter term seems to be preferable to the former, the change in terminology reflects no change in the underlying theory.'

28 Ibid., p.17.

1.5.1. Note on the matrix numbering system

A note has to be made about the numbering system in the matrices presented in the chapters dealing with each grammatical level. Unlike some works on tagmemic grammar, the numbering system serves only as a reference to related constructions and each construction is not given a unique number. For example, in Chapter 10, fig. 9, there are adjective word 11, noun word 11 and verb word 11. Their common point of reference is that they are all made up of a single free root. Within each class of word, however, numbering is unique: i.e., there are no two adjective word-types with the matrix number 11, for example.

I have adopted this non-unique numbering system because the scope of the study is too wide for it to be possible to memorize unique numbers for each construction throughout the whole work. This means that the names of constructions (such as an adjective word or phrase) have to be repeated for each number anyway; such being the case, it does not seem necessary to formulate a unique numbering system.

1.6. The native speaker as analyst

A final point has to be made: hitherto, all tagmemic grammars have been written by non-native speakers of the language described.

30 For example, E. Matteison (1967).
In most cases, the language has been a hitherto unknown or little-known language, such as South and Central Americal languages.

Part of the theory of tagmemic analysis assumes an etic initial approach on the part of the analyst, an outsider, leading to an emic analysis, when he gains insight into the language described as if he were a native speaker. In this case, however, the analyst is a native speaker of the language described, but it was still necessary to sort out what was linguistically etic and classify the material into emic units. This indicates quite strongly that the native speaker does not necessarily have an emic insight into his own language, as far as linguistic analysis is concerned, though he knows what he may or may not say in the language. At best, therefore, the native speaker can only act as his own informant, which is what I have tried to do; at worst, the native speaker can distort an analysis by imposing false categories on the grammar of his language, either consciously to make his work easier, or unconsciously through gross mis-analysis. It is hoped that the present analysis has not suffered in these ways.

1.7. List of abbreviations and symbols

Notes

For slots above the word level and fillers greater than the word, abbreviations beginning with capital letters are used; for slots on the word level and for fillers representing words or
morphemes only, small letters are used.

In order to make just one listing for all possibilities, abbreviations beginning with capital letters are used to represent slots and fillers which are either larger or smaller than the word. These are differentiated in the text, e.g., one entry 'N' is given for 'noun phrase' (NPfr) and 'noun' in 'noun word' (nwd,n).

If the filler of a word slot is a phrase or clause (as in the case of a clause downgraded to fill a nuclear slot in a relative word: *maay4 haay5 -ga yan5* '(the man) who sells shoes'), then the slot is written with a small letter while the filler is written with abbreviations beginning with capital letters.31

Certain symbols are explained again in the text just before or after being used and are more readily understood in context. This is certainly so in the case of combinations of + and _ signs. Where the same symbol is used for more than one abbreviated item, the context explains it, e.g., 'Mod' stands for 'modifier' and 'modified'.

+ obligatory

± optional

− a dash, not a minus sign: 1) obligatory suprasegmental tagmeme added, e.g. intonation tagmeme or 2) unordered obligatory segmental tagmeme added. An example of the latter case is seen in 5.5.1. where the obligatory dependent clause may appear before, after, or in the middle of the base tagmeme.

Adj adjective

Adv adverb

af  affix
Ag  agent
Asp  aspectual, aspected
anat  pertaining to parts of the anatomy (human or non-human)
ani  animate
App  appositive
ax  axis
b  bound
c  core
Ca  causative
card  cardinal
Cl  clause
clas  classifier
col  colour
Comp  complement
Compl  complex
Cond  conditional
Cn  connective
Dc  deictic
Dep  dependent
Descr  descriptive
dir  directional
dmpr  down-graded
Db1Func  double function
Emph  emphatic
eq  equative
f  free
freq  frequentative
H  head
Hort  hortatory
<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hu</td>
<td>Human body or parts of human body</td>
</tr>
<tr>
<td>i</td>
<td>intransitive</td>
</tr>
<tr>
<td>ICF</td>
<td>final intonation contour</td>
</tr>
<tr>
<td>IGN</td>
<td>nonfinal intonation contour</td>
</tr>
<tr>
<td>Ig</td>
<td>interrogative</td>
</tr>
<tr>
<td>Imp</td>
<td>imperative</td>
</tr>
<tr>
<td>Impers</td>
<td>impersonal</td>
</tr>
<tr>
<td>Ind</td>
<td>independent</td>
</tr>
<tr>
<td>inf</td>
<td>infix</td>
</tr>
<tr>
<td>intens</td>
<td>intensifier</td>
</tr>
<tr>
<td>Inton</td>
<td>intonation</td>
</tr>
<tr>
<td>Instr</td>
<td>instrumental</td>
</tr>
<tr>
<td>It</td>
<td>item</td>
</tr>
<tr>
<td>Jc</td>
<td>juncture</td>
</tr>
<tr>
<td>Jcfeat</td>
<td>juncture features</td>
</tr>
<tr>
<td>LF</td>
<td>low-falling</td>
</tr>
<tr>
<td>LFR</td>
<td>low-fall-rise</td>
</tr>
<tr>
<td>Lim</td>
<td>limiting, limiter</td>
</tr>
<tr>
<td>Loc</td>
<td>locative, location</td>
</tr>
<tr>
<td>M</td>
<td>marked</td>
</tr>
<tr>
<td>Ma</td>
<td>manner</td>
</tr>
<tr>
<td>Marg</td>
<td>margin, marginal</td>
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<td>mark</td>
<td>marker</td>
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<tr>
<td>modl</td>
<td>modal</td>
</tr>
<tr>
<td>Mod</td>
<td>modifier, modified</td>
</tr>
<tr>
<td>monosyll</td>
<td>monosyllabic</td>
</tr>
<tr>
<td>morph</td>
<td>morpheme</td>
</tr>
<tr>
<td>N</td>
<td>noun</td>
</tr>
<tr>
<td>natph</td>
<td>pertaining to natural phenomena</td>
</tr>
<tr>
<td>-----------------------</td>
<td>---------------------------------</td>
</tr>
<tr>
<td>Neg</td>
<td>negative</td>
</tr>
<tr>
<td>nom</td>
<td>nominalising</td>
</tr>
<tr>
<td>nu</td>
<td>nucleus, nuclear</td>
</tr>
<tr>
<td>num</td>
<td>numeral</td>
</tr>
<tr>
<td>o</td>
<td>object</td>
</tr>
<tr>
<td>ord</td>
<td>ordinal</td>
</tr>
<tr>
<td>P</td>
<td>predicate</td>
</tr>
<tr>
<td>Para</td>
<td>paratactic</td>
</tr>
<tr>
<td>part</td>
<td>particle</td>
</tr>
<tr>
<td>pd</td>
<td>paired</td>
</tr>
<tr>
<td>Per</td>
<td>personal</td>
</tr>
<tr>
<td>Person</td>
<td>personified</td>
</tr>
<tr>
<td>Phr</td>
<td>phrase</td>
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<tr>
<td>pl</td>
<td>plural</td>
</tr>
<tr>
<td>Pn</td>
<td>pronoun</td>
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<tr>
<td>Pos</td>
<td>positive</td>
</tr>
<tr>
<td>Poss</td>
<td>possessive</td>
</tr>
<tr>
<td>prep</td>
<td>preposition</td>
</tr>
<tr>
<td>prop</td>
<td>proper</td>
</tr>
<tr>
<td>Purp</td>
<td>purpose</td>
</tr>
<tr>
<td>R</td>
<td>rising</td>
</tr>
<tr>
<td>r</td>
<td>root</td>
</tr>
<tr>
<td>RA</td>
<td>relater-axis</td>
</tr>
<tr>
<td>Red</td>
<td>reduplicated, reduplication</td>
</tr>
<tr>
<td>Rel</td>
<td>relater, relative</td>
</tr>
<tr>
<td>s</td>
<td>satellite</td>
</tr>
<tr>
<td>seman</td>
<td>semantically linked</td>
</tr>
</tbody>
</table>
Sent  sentence
Seq  sequence
sf  suffix
st  stem
supr  sufix
syll  syllable
T  temporal (optional) clause tagmeme
 t  transitive
Temp  temporal (obligatory) clause tagmeme and filler
temp  temporal phrase and word tagmeme and filler
TempSpec  temporal specifier
Unasp  unsuspected
V  verb
wd  word
Wh-wd  Wh-word: interrogative words beginning with
       bin1- or gev2- not requiring yes/no answers
[ ]  Except where otherwise stated, denotes context
Combinations of + and _ signs as used in this study are summarised here. These combinations are presented in Elson and Pickett, (1965), p.60. For ease of reference, they are numbered below as in Elson and Pickett.

2) + ..........................♦ one tagmeme is obligatory and one is optional

3) + ( ..........................♦ ) or + ..........................♦ each tagmeme is optional, and either or both may occur, but one must occur

4) ± ..........................♦ or ± ..........................♦ each tagmeme is optional, one or the other must occur but not both

6) ± ( ± ..........................♦ ) or ± ..........................♦ both tagmemes are optional, but only one or the other may occur

7) ± ( + ..........................♦ ) or + ..........................♦ both tagmemes are optional, but the two must occur together

8) ± ( + ..........................♦ ) or ± ..........................♦ both tagmemes are optional, but the second does not occur without the first
In addition, the following combination of + and _ signs (not found in Elson and Pickett, (1965)), is used:

\[+ ( \pm \ldots \ldots \pm )\]

or

\[\pm \ldots \ldots \pm\]

Each tagmeme is obligatory, but the two must not occur together.
CHAPTER 2: Definition and limitations of the language to be described

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2.2. Definition of the idiolect described ......................................................... p.45
2.3. Limitations of the language described ...................................................... p.46
2.4. Summary of different types of open-endedness in the present study ............... p.47

2.1. Definition of the language described

The language described in this study is derived from the language which the Cantonese immigrants from South China brought with them when they came to Malaya in the late nineteenth and early twentieth centuries¹.

The present Cantonese language which exists and is used in Malaya by the descendants of those immigrants, who were indentured labourers, is said to be derived from the language of the original settlers because of two considerations:

1) the language has changed in the course of time, especially in the field of lexis, creating in its lexicon on the one hand words which are combinations of existing Cantonese morphemes to refer to things Malayan, such as 'jungle', 'rubber', and on the other, adopting

loan words and loan translations from Malay and Chinese languages other than Cantonese.2

2) The language described is different from the original language of the early settlers because those settlers sent their children, whenever possible, to Chinese universities where their language became more literary and less like the language of labourers. These speakers, therefore, had a passive register which they could understand but would avoid using, and an active register which was both practised at home as well as taught in the Chinese schools which this generation of speakers helped to set up in Malaya.

A third consideration has to be taken into account: with the threat of Communism in the mid-twentieth century, Malays of all races were forbidden to visit China, so that the language then developed in isolation from the parent language of the Cantonese in South China and Hong Kong.3 This has resulted in archaic forms being retained in Malayan Cantonese, such as wong5gaa1 for 'government', literally 'the King's household' side by side with the more modern jing3fu2, literally 'central government', which is used by non-Malayan Cantonese speakers.

There are various phonological differences between the speakers of Malayan Cantonese and the speakers of Hong Kong Cantonese4 which are

---

2 A list of loan words and loan translations is given in the appendix. The word 'language' is used here instead of the more traditional 'dialect' on the basis of mutual unintelligibility between monolingual Chinese speakers.

3 Although it was possible to go to Hong Kong the general feeling then was one of caution, since Hong Kong was just a step away from Communist China.

4 Although Canton is the original home of Cantonese it is difficult to find speakers of Cantonese from the Mainland. The nearest substitute for Mainland Cantonese is Hong Kong Cantonese, and therefore comparisons are made with Hong Kong Cantonese whenever it is felt that comparison is necessary. A further factor which makes such comparison valid is that there is increasing social and business contact between Hong Kong and Malaya in the present day.
mentioned in chapter 3, and which are not repeated here. From a
phonological point of view, these differences are comparable to the
differences between R.P. and Standard American. Sociologically, however,
the position is different. The attitudes of Cantonese speakers towards
their different accents and dialects vary. Some would consider such
differences unimportant and would not feel either inferior or superior
in being 'different'. Others might not even notice such differences in
pronunciation as long as the content of a conversation was clear. Yet
others, however, would regard speakers with different pronunciations
from their own (whether they be Malayan or Hong Kong Cantonese), as
having a 'funny' or, in some cases, a 'provincial' pronunciation.

2.2. Definition of the idiolect described

The idiolect of Cantonese presented in this study is my own idiolect
of Cantonese. Cantonese was my language from birth, and although I had
heard Hakka and other Chinese languages by the age of six, these were
not important enough in the home to have any influence on my Cantonese.

From the age of six onwards, I started to become part of the English-
speaking community of Malaya when I started primary schooling. Cantonese,
however, continued to be learnt and used separately as a home language
until I was about sixteen or seventeen. Before Independence (August 1957),
English was taught rigorously at my school and the pupils were strongly
discouraged from using any vernacular language at school. My own family,
being almost entirely monolingual\(^5\), felt very strongly throughout most

\(^5\) Here I use the term 'monolingual' in a very restricted sense of the
word. They were monolingual in so far as they only knew Cantonese and
other Chinese languages (Mandarin, Hakka, Hokkien etc.) but little or
no English and no other European language. They also knew a little Bazaar
Malay (pidgin Malay) but only in order to speak to non-Chinese gardeners,
hawkers and the like.
of this period that Cantonese should be spoken at home.

Thus, although by adulthood I was part of the English-speaking community of Malaya, in many ways socially distinct from those brought up in Chinese schools, I was linguistically still a part of the Chinese-speaking community.

Since my Cantonese was learnt from a family of almost entirely monolingual Chinese speakers, most of whom at one time or another had been teachers in Chinese schools, my idiolect can be said to represent the speech of educated Cantonese speakers in Malaya.

2.3. Limitations of the language described

It has been decided to limit the present discussion of Cantonese to one register\(^6\) of Cantonese, viz., an unmarked polite register. It was mentioned in 2.1. that the children of the early settlers who received their education in China were aware of registers of the language which would be considered by them rude or illiterate. The term 'passive register' was used in 2.1. to refer to a register of the language which the speaker was aware of but which he would avoid using. A qualifying statement must be made here: in a number of cases, such people with an active register of a polite, educated idiolect, would switch to a less polite or even a rude register in giving orders to a servant.\(^7\)

6 A norm which the speaker attempts to adhere to in his use of the language. The term 'register' as used here is a wider term than that found in Halliday, McIntosh and Strevens (1964), p.87: "The name given to a variety of a language distinguished according to use is 'register'. " Rather, 'register' as used here includes language distinctions taking into account the user as well. The user who wishes to be identified with a certain group chooses a certain register within which there is possible differentiation according to use. For instance, an unmarked polite register can present a choice of different kinship terms according to one's social status vis-à-vis that of one's interlocutor.

7 It must be pointed out that using a less elevated term of address to a servant is not considered departing from the polite register. On the contrary, using an elevated term of address to a servant would remove a speaker like the author to a rude register, as this could be a form of mockery.
This has never been my own practice and so I have kept the description of my idiolect confined to an unmarked polite register throughout.

The register described is said to be 'unmarked polite' because there is an even more formal register which can be described as a 'marked polite' register. This register has a very limited usage and is not suitable for home use as it is only used towards people with whom one is not familiar. It is also felt by people who are used to the unmarked polite register as being too flowery and rather ridiculous. A speaker using such a register could even be regarded as being affected. An example of this is seen in the response to 'what's your name?' in some teaching books, which calls for the answer (literally) 'my miserable name is Wong'.

Besides polite versus extra polite versus impolite register there are others, such as the register used when speaking to children. This register would involve, for instance, reduplications of a verb root not used in speaking to adults. Because of the complexity of registers, in itself a subject worthy of study, it has been decided to limit the present description to only one register.

2.4. Summary of different types of open-endedness in the present study

At various points in this thesis, e.g., 5.4., references are made to structures which are 'theoretically open-ended'. Although these structures are open-ended, the degree of acceptability of such structures varies from speaker to speaker and from hearer to hearer.

For example, in English, 'he takes in cats, dogs, monkeys, chimpanzees, gorillas, camels, donkeys, zebras, elephants, lions....' is a sentence with an open-ended noun phrase structure. It is impossible to say in such a case, whether all speakers and hearers of English would agree to the same number of noun phrases as being an acceptable number. In English, long lists are more readily tolerated in writing than in speech. Since Cantonese
is primarily a spoken language a parallel observation cannot be usefully made.

A systematic study of the degrees of acceptability present in speakers and hearers of English would rightly entail a statistical count. The same would be true of Cantonese, but as the present study does not purport to account for actual occurrences of structures statistically, impressionistic statements are made when possible as to how open-ended a structure can be in order to be acceptable; if it is impossible to make such a statement, no statement is made.

Although the present work purports to be a study of a specific register, i.e., the unmarked polite register (see 2.3.), it is not a study of a specific style. Taking the English example just quoted, from the point of view of register as defined in this study, the example could be included in an unmarked polite register, as it is a neutral kind of statement. Whether a speaker lists three, four, five or ten noun phrases after the verb would affect his style, but it is not the same as whether he says 'could I ask you not to make so much noise?' or 'shut up!' The first would belong to an unmarked polite register while the second would belong to a rude register.

Not only do the different kinds of open-endedness depend on speaker and hearer, they depend also on what is practicable in actual usage. Difficulties are imposed by actual usage on structures which are theoretically open-ended: in the English example cited above: 'he takes in cats,....', it is theoretically possible to go on adding noun phrases indefinitely, although it will sound tedious after a certain point. This kind of open-endedness, however, is different from another sort of open-endedness: the kind found in the embedding of clauses in 'the house that Jack built'. In the kind of clause-embedding just mentioned, the feasibility of adding more and more clauses introduced by 'that' must be supported by the ability of keeping count, not only of a list, but of a set of relative clauses which must be terminated at some point with '.....that Jack built'.
The position is not identical in Cantonese, but it is similar. A higher degree of tolerance would be shown towards open-endedness in lists of the kind found in noun phrase 25 (9.8.5.) than in noun phrase 12 (9.8.2., e.g. (3)). Noun phrase 25 can be described as having more straightforward conjoining, e.g., yi1 ting2 fung1 'this kind of wind' tung5maay5 'and' go2 didi yue3 'that kind of rain'; noun phrase 12 involves the cumulative buildup of relative phrases as modifiers to a noun head, and it is less practicable to tolerate open-endedness in the latter than in the former.
CHAPTER 3: Phonological statement

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3.1. General

The phonological statement in this chapter is a broad summary of the sound system of Malayan Cantonese. It was arrived at chiefly in order to enable the author to devise a convenient system of romanization (see 3.6.) to represent most economically the distinctive sound units in the language. In other words, this solution was arrived at chiefly for reasons of economy and transcription.

Since the author is primarily concerned with a grammatical study of the language, and not a phonological one, there has been no attempt to go deeply into the problem of phonology. Indeed, it is felt that if this study were primarily a phonological one, the method adopted in this analysis - a strictly phonemic analysis, would be clearly inadequate; as the matter stands, the phonological statement is adequate for its limited purpose.

A note must be made here that although the segmental phonemes are dealt with before the so-called 'suprasegmental' phonemes of tone, it is in no wise felt that the one is more important than the other. It is for ease of description that segmental phonemes are described before the tone phonemes.

It is proposed to set up phonological syllables for the language in terms of Consonant and Vowel (abbreviated C and V).

There are two main syllable structures in Malayan Cantonese (hereinafter referred to as 'Cantonese' unless contrasted with another kind of Cantonese): CV and CVC. A third possibility, C, only occurs with
syllable /m/ and /ŋ/ in words like m5how2/ 'don't' and /ŋ3/ 'five'. Words with this kind of syllable structure are rare, though the words themselves are common in occurrence.

Final C can only be either a stop, a nasal or a semivowel.

The glottal stop appears in syllable initial before all vowels and is notated in this chapter but not written in the romanization. In the body of the text, therefore, whenever a syllable is written beginning with a vowel, the glottal stop is assumed to be present. Thus, /?ɔ m1/ 'peace', a CVC syllable, would be written on1 in the orthography.

An alternative solution would be to consider the glottal stop as a phonetic feature of vowel onset, but this would mean setting up another syllable structure V. Instead of doing that, it has been decided to include the glottal stop as a phoneme.

It has also been decided to analyse all phonetic diphthongs on the phonological level as V plus C where C is a semivowel. For example, the syllable (and word) /?ɔ j2/ 'short' is phonetically contoid-vocoid-vocoid but it is phonologically rendered CVC. Similarly, the syllable (and word) /?ɔ m2/ 'vomit' is phonetically contoid-vocoid-vocoid but is phonologically rendered CVC. This simplifies the statement since /j/ and /w/ are syllable initials and it is more economical to treat them as syllable finals as well instead of positing diphthongs ending in /j/ and /u/. Furthermore, there is already an opposition between /j/ and /n/ in final position with the vowel /ŋ/. It would be clearly uneconomical to use /j/ as a final only for that vowel and not for the others; it would be even less desirable to regard only /m/ as a final in this case and posit an additional

---

1 For the terms vocoid and contoid, see Pike, (1947), pp 235, 244, 253.

2 In the speech of some Cantonese speakers (both Hong Kong and Malayan), /j/ is not used initially. In fact /u/: /m/ im, /jig1/ 'rancid'. In my own speech, it is.
diphthong /di/, while its corresponding monophthong only occurs in one position. For the purposes of symmetry and economy, therefore, it has been decided not to set up any diphthongs on the phonological level.

3.2. Segmental phonemes

3.2.1. Vowel phonemes

There are eight vowel phonemes. They are listed below with their allophonic variations\(^3\) whose distribution in terms of syllable final is described:

<table>
<thead>
<tr>
<th>Phonemes</th>
<th>Allophones: description and distribution in terms of syllable final</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. /i/</td>
<td>[ɪ], [i]</td>
</tr>
</tbody>
</table>

[ɪ] is a close high front unrounded vowel somewhere between Cardinal i and Cardinal e. It occurs before the following finals: /g/ and /j/.

[i] is a close high front unrounded vowel somewhere between [ɪ] above and Cardinal i; i.e., it is closer to Cardinal i. It occurs before the following finals: /b/\(^4\), /d/\(^4\), /m/, /n/, /w/, and as syllable final.

\(^3\) Symbols used in this chapter, unless otherwise stated, are those of the IPA. Oblique slashes // enclose phonemes; square brackets [ ] enclose allophones. /g/ is used instead of /j/ for convenience of typing.

\(^4\) Final stops are unreleased. See 3.2.2.1.
2. /æ/ [æ] [e]  

[æ] is a half-close front unrounded vowel between Cardinal £ and Cardinal a but closer to £ than a. It occurs before the finals /g/ and /j/ and as syllable final.

[e] is a half-close front unrounded vowel between Cardinal e and Cardinal £ but closer to Cardinal e than £. It only occurs before the final /j/.

3. /a/ [a]  

[a] is a close front unrounded vowel between Cardinal vowel £ and a but closer to Cardinal a than to Cardinal £. It occurs before all the possible finals: /b/, /d/, /g/, /m/, /n/, /ŋ/, /j/, /w/. It also occurs as syllable final.

4. /ʌ/ [ʌ], [ɔ]  

[ʌ] is a half-close back unrounded vowel between Cardinal Y and

---

5 Phonetically /æj/ is a glide of two vocoids [æ], [i], but for the reasons given in 3.1. they are phonologically rendered as V + C, i.e., /æ + /j/ in this case. /æ/ is used to represent the phoneme although the letter 'e' is used in the romanization. This is because [æ] is the commoner allophone.

6 In the speech of most Malayan Cantonese speakers these two sounds are distinct but some Hong Kong Cantonese speakers only use /a/ for both these sounds. For instance, the following pairs of words, which, in my speech, are quite distinct from each other, are pronounced exactly alike in the speech of such speakers:

<table>
<thead>
<tr>
<th>Malayan Cantonese</th>
<th>Hong Kong Cantonese</th>
</tr>
</thead>
<tbody>
<tr>
<td>/jærn5/ 'pollen'</td>
<td>/jæn5/ 'grind'</td>
</tr>
<tr>
<td>/san5/ 'god'</td>
<td>/san5/ 'slime'</td>
</tr>
<tr>
<td>/hæŋ4/ 'long for'</td>
<td>/han4/ 'limit'</td>
</tr>
<tr>
<td>/saŋ3/ 'small'</td>
<td>/saŋ3/ 'to sun'</td>
</tr>
</tbody>
</table>

In Malaya, Wontonese speakers who do not distinguish between these two vowels give the impression of having a foreign accent, i.e., they could belong to another Chinese language group (e.g., Khek, Hokkien) or they could be from abroad.
Cardinal Cardinal but nearer to Cardinal Cardinal. It occurs before all the possible finals, i.e., /a/, /u/, /g/, /m/, /n/, /ŋ/, /j/ and /w/.

It cannot, however, occur as syllable final.

[ɔ] is a neutral central vowel which occurs before /n/ and as syllable final in unstressed syllables. In syllable final [ɔ] has the concomitant feature of 'tonelessness' or 'tone neutrality', i.e., syllables which have [ɔ] as syllable final take on the tonal quality of the adjacent syllables, assuming a similar pitch or contour to that of the adjacent syllables.

5. /y/  [y]

[y] is a close front rounded vowel between Cardinal y and Cardinal ø but closer to Cardinal y than Cardinal ø. [y] only occurs before two finals: /m/ and /a/.

6. /ø/  [ø], [iɔ]8

7 See 3.4.3.

8 It has been decided to treat [iɔ], which is phonetically a diphthong, as an allophone of /ø/ in order to fit in with this particular phonemic analysis. In Malayan Cantonese it occurs in complementary distribution with [œ] and it would be uneconomical to set it up either as a diphthong or another vowel phoneme of the language. It would be especially asymmetrical to treat it as a diphthong because phonetically all diphthongs (which in this analysis are treated as V plus C) are a sequence of vowels ending in [i] or [u]. This particular diphthong would be outside this system as it can be followed by either /e/ or /ŋ/. A further note should be made: in Hong Kong Cantonese, all those words which in Malayan Cantonese are pronounced with [iɔ] are pronounced with [œ] as in [hoe] 'fragrant' and [goeg] 'leg'. An alternative solution would be to assign the allophone [iɔ] to the phonemes /i/ and /ŋ/ but this would be positing a third syllable structure CVVC for syllables like /giŋ3/ 'leg'. This appears unjustifiable when the phonetic sequence [giŋ3] can be accommodated into the phonological syllable CV, treating the glide [iŋ] as one vocalic unit.
[Ø] is a half-close front rounded vowel between Cardinal Ø and Cardinal ø but closer to Ø than to ø. It occurs before the finals /j/ and /n/.

[iœ] is a diphthong that moves from Cantonese [i] (described in 1 above) to a half-open back vowel (more open than the [œ] to be described in 7 below). It occurs before the finals /g/ and /j/.

7. /œ/ [œ], [o]9

[œ] is a half-open rounded vowel between Cardinal ø and Cardinal œ but closer to Cardinal œ than to Cardinal ø. It occurs before the finals /g/, /n/, /j/ and as syllable final.

[o] is a half-close back rounded vowel between Cardinal o and Cardinal u. It is very close to Cardinal o. It only occurs before the final /w/.

8. /u/ [u], [u]

[u] is a close back rounded vowel quite close to Cardinal u. It occurs before the finals /t/, /n/, /j/ and as syllable final.

[w] is a central vowel somewhere between Cardinal vowels u and ø. It occurs before the finals /g/ and /j/.

---

9 Phonetically, /ow/ is a glide of two vocoids [o], [u], but for the reasons given in 3.1. it is phonologically rendered as V plus C, i.e., /œ/ + /w/ in this case. See also /œ/ above. /œ/ is used to represent the phoneme although the letter 'o' is used in the romanization. This is because [œ] is the commoner allophone.
3.2.2. Consonant phonemes

There are twenty consonant phonemes arranged in six series: nine stops, three nasals, three fricatives, two affricates, one lateral and two semivowels. They are described below in phonemic and phonetic terms and in terms of syllable initial and syllable final:

3.2.2.1. Stops

There are four pairs of stops and a glottal stop; each pair of stops shares the same point of articulation but is contrasted by manner of articulation, being either unaspirated or aspirated. In the case of the velar stops there is the additional contrast of labialisation. The glottal stop only appears in syllable initial. 10

The stops are phonetically voiceless, but since voice and voicelessness do not function as a phonemic contrast in this series, voicelessness as a part of the phonemic description of each stop is unnecessary and is omitted.

In the case of /b/, /d/, /g/, each phoneme has two allophones occurring in complementary distribution. In initial position, /b/, /d/, /g/ are realised as plosives while in final position they are realised as unreleased stops; at the same time, the back of the tongue is on the velum but unreleased, resulting in a constricted quality of the sound.

Syllables ending in /b/, /d/, /g/ do not occur with tone 5, the lowest possible tone. 11

---

10 The glottal stop is represented by zero in the romanization used in this study. Whenever a syllable is written beginning with a vowel, it is assumed to begin with a glottal stop. See also 3.1.

11 See 3.4.1.
1. Bilabial unaspirated stop /b/
   /b/ occurs in syllable initial and syllable final:
   /ba3/ 'to reserve something in an unruly manner'
   /dab3/ 'to board (a train, etc.)'

2. Bilabial aspirated stop /p/
   /p/ only occurs in syllable initial:
   /pa3/ 'afraid'

3. Dental unaspirated stop /d/
   /d/ occurs in syllable initial and syllable final:
   /dan2/ 'egg'
   /lidʒ/ 'cracked'

4. Dental aspirated stop /t/
   /t/ only occurs in syllable initial:
   /tan3/ 'relaxed'

5. Velar unaspirated stop /g/
   /g/ occurs in syllable initial and syllable final:
   /gug1/¹² 'grain'

6. Velar aspirated stop /k/
   /k/ only occurs in syllable initial:
   /kug1/ 'crooked'

¹² The tone mark ¹ is on the line. Unfortunately, this makes the phonemic transcription awkward to read as the tone mark ¹ looks like an /l/. However, since final /l/ never occurs in Cantonese, no theoretical problem is raised.
7. Velar unaspirated labialized stop /gw/\(^13\)

8. Velar aspirated labialized stop /kw/\(^13\)

Both /gw/ and /kw/ occur only in syllable initial. They can only occur before the vowels /a/ and /\(^14\):

/gwa\j/ 'good'

/kwa\j/ 'naughty'

9. Glottal stop /?/\(^15\)

/\(^15\)/ only occurs in syllable initial:

/?ug\l/ 'house'

3.2.2.2. Nasals

The three nasals are contrasted by their place of articulation: labial, alveolar and velar. All the nasals are phonetically voiced, but since voice is not a point of phonemic contrast, it is not mentioned in the phonemic description of each nasal.

10. Bilabial nasal /m/

/m/ occurs in both syllable initial and syllable final:

/mam/ 'hold on to'

/mam/ 'south'

/m/ is one of the two consonants which can be a syllabic, when it occurs as the negative prefix /m5-/ or the interrogative infix /-m5-/\(^16\), e.g., in /m5how2/ 'don't' and /how2m5how2/ 'shall (I, etc.).'

\(^13\) It is simpler to treat these sounds, which are phonetically a sequence of two sounds, as single phonemes. If /gw/ and /kw/ were treated phonologically as consonant clusters, it would complicate the phonological statement of the syllable.

\(^14\) In Hong Kong Cantonese, /gw/ and /kw/ also occur before /\(\) and /u/.

\(^15\) In the speech of some Cantonese speakers (both Hong Kong and Malayan), /\(^15\)/ is used instead of initial /\(\). In Malaya, this is regarded as a foreign pronunciation. See also fn. 10.

\(^16\) See 3.1.
11. Alveolar nasal /n/\(^{17}\)

/n/ occurs in both syllable initial and syllable final:

/man5/ 'difficult'

12. Velar nasal /ŋ/

/ŋ/ occurs in both syllable initial\(^{18}\) and syllable final:

/ŋɔ3/ 'I, me'

/ŋɔ1/ 'pull'

/ŋ/ can also occur as a syllabic in /ŋ/ 'five' (see 3.1.)

3.2.2.3. Fricatives

The three fricatives are contrasted by their place of articulation: labiodental, dental and glottal. Of these, labiodental /f/ and dental /s/ are phonetically voiceless. Glottal /h/ can be either phonetically voiceless or voiced, depending on the style of speech or possibly the sex of the speaker\(^{19}\). For the purposes of symmetry, it is proposed to regard /h/ as being phonologically voiceless to fit in with the other two members of the fricative series.

\(^{17}\) In the speech of many Cantonese speakers, (both Hong Kong and Malayan), [l] and [n] are allophones of one phoneme occurring in free variation, although [l] never occurs in final position. In my own speech, they should be regarded as distinct phonemes. I pronounce the following words with /l/ and /n/ respectively:

/mln5/ 'year' /lin5/ 'including'

/mln2/ 'squeeze' /lin2/ 'necklace'

/mnow3/ 'brain' /now3/ 'old'

Many speakers do not make a constant distinction between the initials in the above words, using [l] and [n] in free variation.

\(^{18}\) In the speech of some Cantonese speakers (both Hong Kong and Malayan), initial /ŋ/ is not used. See fn. 15.

\(^{19}\) This is similar to the case of intervocalic /h/ in English: some people say [bi'haind] (with voiceless [h]) while others say [bi'haind] (with voiced [h]) for the same word behind. This is sometimes related to the sex of the speaker, sometimes to the style of speech of the speaker.
13. Labiodental fricative /f/
   /f/ occurs only in syllable initial:
   /fa1/ 'flower'

14. Dental fricative /z/
   /z/ occurs only in syllable initial:
   /sa1/ 'sand'

15. Glottal fricative /h/
   /h/ only occurs in syllable initial:
   /han1/ 'thrifty'

3.2.2.4. Affricates

The two dental affricates are contrasted by their manner of articulation:
/dz/ is unaspirated while /ts/ is aspirated. This contrast is a parallel
to that seen in the pairs of stops discussed in 3.2.2.1. Again, as in
the case of the stops, the affricates are phonetically voiceless, but
since voice and voicelessness do not function as a phonemic contrast in
this series, voicelessness is not part of the phonemic description of
the affricates.

16. Dental unaspirated affricate /dz/
17. Dental aspirated affricate /ts/
   Both /dz/ and /ts/ occur only in syllable initial:
   /dzsa1/ 'hold'
   /tsa1/ 'fork'
3.2.2.5. Lateral

18. Alveolar lateral /l/

/l/ only occurs in syllable initial:

/lam3/ 'lazy'

3.2.2.6. Semivowels

The semivowels are contrasted by their place of articulation: labial and palatal. Both the semivowels are phonetically voiced, but since voice is not phonemically opposed to voicelessness within this series, it is not mentioned in the phonemic description of each semivowel.

19. Bilabial semivowel */w/*

*/w/* occurs in both syllable initial and syllable final:

/wun2/ 'bowl'

/dow2/ 'gamble'

20. Palatal semivowel */j/*

*/j/* occurs in both syllable initial and syllable final:

/jyn3/ 'far'

/maj3/ 'buy'

3.3. Summary

There are eight vowel phonemes and twenty consonant phonemes in Cantonese. Of the vowel phonemes, three are front unrounded vowels:

---

See fn. 17.
/i/, /æ/ and /a/; one is back unrounded: /ʌ/; two are front rounded: /y/ and /ø/, and two are back rounded: /ɔ/ and /u/. They can be diagrammatically represented as follows:

**Fig. 1:**

<table>
<thead>
<tr>
<th>Front</th>
<th>Back</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rounded</td>
<td>Unrounded</td>
</tr>
<tr>
<td>Close</td>
<td>y</td>
</tr>
<tr>
<td>Half-open</td>
<td>æ</td>
</tr>
<tr>
<td>Half-close</td>
<td>ø</td>
</tr>
<tr>
<td>Close</td>
<td></td>
</tr>
</tbody>
</table>

Of the twenty consonant phonemes, nine are stops: /b/, /p/, /t/, /d/, /k/, /g/, /kw/, /gw/ and /ʔ/; three are nasals: /m/ /n/ and /ŋ/; three are fricatives: /f/, /s/ and /h/; two are affricates: /ds/ and /ts/; one is a lateral: /l/ and two are semivowels: /j/ and /w/.

Of these consonant phonemes, only the unaspirated stops, the three nasals and the two semivowels can occur in syllable final. All the consonant phonemes occur in syllable initial.

There are no consonant clusters\(^{21}\) in the phonological syllable.

The consonant phonemes are diagrammatically represented below:

\(^{21}\) See fn. 13.
### Fig. 2:

<table>
<thead>
<tr>
<th></th>
<th>Labial</th>
<th>Labiodental</th>
<th>Dental</th>
<th>Alveolar</th>
<th>Palatal</th>
<th>Velar</th>
<th>(non-labialized)</th>
<th>(labialized)</th>
<th>Glottal</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>STOPS</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Unaspirated</td>
<td>b</td>
<td>d</td>
<td>g</td>
<td>g</td>
<td>w</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Aspirated</td>
<td>p</td>
<td>t</td>
<td>k</td>
<td>kw</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>NASALS</strong></td>
<td>m</td>
<td>m</td>
<td></td>
<td>j</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>FRICATIVES</strong></td>
<td>f</td>
<td>s</td>
<td></td>
<td></td>
<td>h</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>AFFRICATES</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Unaspirated</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Aspirated</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>LATERAL</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>l</td>
</tr>
<tr>
<td><strong>SEMIVOWELS</strong></td>
<td>w</td>
<td></td>
<td></td>
<td></td>
<td>j</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
3.4. Tones and allotones

The word tone is used to designate the contrastive units of pitch within the sound system of Cantonese. Tone in Cantonese is the property of the phonological syllable (which in most cases is also a morpheme and/or a word.) Tone in Cantonese functions as a unit of lexical contrast, and on the basis of minimal pairs it has been found that Malayan Cantonese has five such distinctive tones (or tone phonemes or tonemes).

They are numbered in this study from 1 to 5 in descending order of pitch. There are four level tones and one rising tone. They are described below with examples of lexical items which have these contrastive tones:

<table>
<thead>
<tr>
<th>Tone</th>
<th>Description</th>
<th>Example</th>
<th>Meaning of example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tone 1</td>
<td>High level</td>
<td>/j11/</td>
<td>to cure, to heal</td>
</tr>
<tr>
<td>Tone 2</td>
<td>Mid-rising</td>
<td>/j12/</td>
<td>chair (usually made of rattan)</td>
</tr>
<tr>
<td>Tone 3</td>
<td>Mid-level</td>
<td>/j13/</td>
<td>ear</td>
</tr>
<tr>
<td>Tone 4</td>
<td>Low level</td>
<td>/j14/</td>
<td>two (used in counting)</td>
</tr>
<tr>
<td>Tone 5</td>
<td>Very low level</td>
<td>/j15/</td>
<td>easy</td>
</tr>
</tbody>
</table>

Of the above five tones, tone 1 has two allotones. Allotones of a tone are like allophones of a phoneme. They are units of pitch

---

Tone functions very marginally in Cantonese as a unit of grammatical contrast as well as a means to differentiate between words which are semantically linked. As a unit of grammatical contrast, in this case between nouns and verbs, it can be seen to function in the following pairs of words: /fən1/ 'a share'; /fən1/ 'to share'

/kim2/ 'pincers'; /kim5/ 'to pick up something as with pincers'.

As a means to differentiate between semantically linked words: /maj3/ 'to buy'; /maj4/ 'to sell'; /jəw5/ generic term for oil; /jəw2/ 'petrol'. This last should not be confused with the bound form /-jəw2/, which occurs in compounds to mean all kinds of oil products. In the bound form the tone is to be considered as a modified tone (see 3.4.2.).

In Mainland and Hong Kong Cantonese there are six, according to Jones and Woo, (1913). They posit two rising tones where I posit only one. See fig.3.

Term used by Pike, (1948).
which sound different from each other but which do not result in
differences of lexical meaning when applied to a lexical item. For
example, a word with tone 1 can be said with a high level allotone (after
which it has been decided to number the tone) or it can be said with a
high falling allotone: /jì/ or /jìʼ/ 'to cure, to heal'. Speakers of Cantonese
would not think that each of the two utterances meant a different word.
Tone 1 can thus be said to have two allotones occurring in free variation:
1) a high level allotone

and

2) a high falling allotone.

Since in isolation, absolute pitch is not relevant in a tone language,
the significant contrasts in pitch being determined by the relative pitch
of the tones, a distinction must be made between allotones proper (in this
case the high level allotone and the high falling allotone described above),
and the personal ranges of difference within each tone. These depend on
how high-pitched or low-pitched the speaker's voice happens to be at a
certain time (within the range of possibilities open to him). Within
the range that a speaker has chosen to speak, it does not matter, for
instance, if a word with tone 2 rises just a little or very much; the
two distances covered by the two rising contours are not regarded as
allotones of tone 2, but as the products of personal idiosyncracies or

25
This is better than numbering the tone after the falling allotone
as then there would be three different kinds of tones: level, falling, and rising. As it stands, there are only two kinds of phonological tone:
level and rising.
state of health. That is to say, a person who has a tendency towards covering longer intervals in pronouncing tone 2, or a boy whose voice is breaking, or a person who has a sore throat, cannot be said to be systematically producing allotones of tone 2.

Failure to recognize allotones proper as well as failure to recognize personal idiosyncrasies of the sort described above have misled scholars into overlisting tones. For instance, Eital in Eital (1910), p.xii, posits eleven Cantonese tones:

- High falling
- High level
- High clipped
- Middle rising
- Middle level
- Middle clipped
- Low rising
- Low level
- Low clipped
- Very low falling
- Very low clipped

The system of tones (with allotones) of Malayan Cantonese as based on my own pronunciation, is represented on the musical stave below in the treble clef. Tone 1 can be seen to have one of its falling allotones starting from a tone and a half (using the word 'tone' here in the musical sense of the word) above the other level allotone.

Daniel Jones' notation of Cantonese tones is included for comparison with my own.26

---

26 Transposed into the treble from the bass of the original for ease of comparison.
The following tentatively lists observable correspondences between the two tonal systems:

<table>
<thead>
<tr>
<th>Mainland Cantonese</th>
<th>Malayan Cantonese</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tone 1</td>
<td>Tone 1</td>
</tr>
<tr>
<td>Tone 2</td>
<td>Tone 2</td>
</tr>
<tr>
<td>Tone 5</td>
<td>Tone 3</td>
</tr>
<tr>
<td>Tone 3</td>
<td>Tone 3</td>
</tr>
<tr>
<td>Tone 6</td>
<td>Tone 4</td>
</tr>
<tr>
<td>Tone 4</td>
<td>Tone 5</td>
</tr>
</tbody>
</table>
**3.4.1. Tone restriction**

Tone 5 does not occur in syllables ending in /-b/, /-d/ and /-g/.\(^{27}\)

\(^{27}\) See 3.2.2.1.

**3.4.2. Tone modification\(^{28}\)**

The term 'tone modification' is an arbitrary term which is used here to account for the fact that certain tones 'change' their significant

\(^{28}\) Also called 'tone perturbations' by Pike in Pike (1948), p.25.
pitch within the range adopted by the speaker in such a way that the new
pitch put on the utterance can be readily identified with another tone.
The question arises as to whether it is correct to talk about a 'tone
change'. Would it not be better to assume that the tone which had 'changed'
had always had the 'modified tone'? This is not a problem which I propose
to go into, nor, indeed, is it proposed to make a thorough study of tone
modification. The procedure adopted in this study is to recognize that
there is tone modification and to identify the modified tones with
the existing tone phonemes.

3.4.2.1. Brief summary of types of tone modification:

Two kinds of tone modification have been observed in Malayan Cantonese:
1) obligatory tone modification

and

2) optional tone modification.

1) Obligatory tone modification

There are two kinds of obligatory tone modification:

i) that which involves a change in the status of morphemes, viz., from
free morpheme to bound morpheme.

ii) That which involves reduplications.

In the first kind, tone modification always occurs on the last
syllable; in the second kind, this is not predictable. These two kinds
of obligatory tone modification are discussed below.

i) When a free root morpheme (with inherent tone), combines with

---

29 For a thorough study of tone modification, see Whitaker, (1955). This
problem, together with that of 'neutral' tones (3.4.3.), comes
under the general problem of tonal sandhi which is dealt with fully in
Pike, (1947).
another morpheme (either bound or free also with inherent tone), to form a new lexical item, it can become a bound morpheme in the new structure and receive a modified tone.

For example, the free form /mu;j2/ 'younger sister' has an inherent high rising tone but in combination with the bound form /dxi2-/ 'children' to form the new lexical item /dxi2mu;j4/ 'brothers and sisters' it assumes a modified tone which can be assigned to tone 4, a lower tone than the inherent tone 2. Further examples of this type of tone modification relating bound forms to free forms are set out below:

<table>
<thead>
<tr>
<th>Free form with inherent tone</th>
<th>Bound form with modified tone</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. /haj5/ 'shoes'</td>
<td>/haj2/ in /tʃhaj2/ 'slippers'</td>
</tr>
<tr>
<td>2. /nŋj2/ 'daughter'</td>
<td>/nŋj3/ in /j15nŋj3/ 'children'</td>
</tr>
<tr>
<td>3. /jAw5/ generic term for oil</td>
<td>/jAw2/30 in /din4jAw2/ 'petrol',</td>
</tr>
<tr>
<td>4. /wa;4/ 'say'</td>
<td>/wa;/ in /din4wa;/ 'telephone'</td>
</tr>
</tbody>
</table>

ii) In the kinds of reduplication which involve kinship terms or which involve a supposedly 'child-like' style of speech used by mothers to their children, obligatory tone modification also takes place. In the case of reduplicated kinship terms, both the morphemes with the inherent tone and the morpheme with the modified tone are bound. In the case of 'child-like' speech, the morpheme with the inherent tone is free but the

30 See fn. 22.
morpheme with the modified tone is bound. In both cases, the tone of
the first morpheme of the reduplicated form may or may not be modified.

For example, from the bound form /-ma1/ in /ʔa3ma1/ 'mother' is derived
the reduplicated form /ma5ma1/ 'Mummy', in which both morphemes of the
reduplicated form are modified in tone. In the word /fən3gaw3/ 'go
to sleep', /gaw3/ has an inherent tone 3. In 'child-like' speech, it
becomes /fən3gaw5gaw2/, the reduplicated form assuming a different modified
tone on each morpheme. Further examples of this kind of tone modification
are given below:

<table>
<thead>
<tr>
<th>Form with inherent tone</th>
<th>Derived reduplicated form with one or two modified tones</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. /ʔa3pɔ5/ 'maternal grandmother'</td>
<td>/pɔ5pɔ2/ 'Grannie'</td>
</tr>
<tr>
<td>2. /ʔa3dɔ1/ 'elder sister'</td>
<td>/dɔ1dɔ2/ 'a term of respect for a servant by the name of /dɔ1/</td>
</tr>
<tr>
<td>3. /ʔɔ1 niwɔ/ 'pass urine'</td>
<td>/ʔɔ1 niwɔniw2/ 'the same thing said indulgently to a child. Said especially to a baby. (said to a child without being indulgent)</td>
</tr>
</tbody>
</table>

2) Optional tone modification

Certain words have an inherent tone which must be used in certain contexts but which can be optionally replaced by a modified tone in
other contexts. An example will illustrate this point. The word /nim5/ 'year' has an inherent tone 5 which must be used in the
following contexts: /nim5 ya4gaw2/ 'the twenty-ninth day in the month
before the New Year' - literally, 'year twenty-nine'; /gey2əb4 min5/
'a few decades' . In other contexts, e.g., /gəm1nim5/ or /gəm1nim2/ 'this
year', it is optional to use either inherent tone 5 or modified tone 2\textsuperscript{31}.

The following are further examples of optional tone modification:

<table>
<thead>
<tr>
<th>Form with inherent tone</th>
<th>Derived form with optional inherent tone or modified tone</th>
</tr>
</thead>
<tbody>
<tr>
<td>/\jy2/ 'fish'</td>
<td>/g\Nam\jy2/ or /g\Nam\jy5/ 'goldfish'</td>
</tr>
<tr>
<td></td>
<td>/s\a\jy2/ or /s\a\jy5/ 'shark'</td>
</tr>
<tr>
<td></td>
<td>/\ley3\jy2/ or /\ley3\jy5/ a kind of fish</td>
</tr>
<tr>
<td>/f\dash4/ a Buddha</td>
<td>/\jy5l\j5f\dash4/ or /\jy5l\j5f\dash2/ 'the Tath\texti{Ag}atha\textpp{\texti{Buddha}}' (literally, 'therefore-coming-Buddha')</td>
</tr>
</tbody>
</table>

\textbf{3.4.3. Neutral tones}\textsuperscript{32}

Certain unstressed syllables in Cantonese at word, phrase, clause and sentence level do not possess phonological tones and are said to have 'neutral' tones.\textsuperscript{33} A neutral tone still has a definite pitch, but unlike the pitch of a tone phoneme it depends on the pitches of the adjacent syllables. This is a slightly different viewpoint from that held by Robins in Robins (1964), p.143, in which he says that the pitch on which a syllable with a neutral tone is said 'is wholly determined by the nature of the tone on the preceding syllable.'

It has already been mentioned in 3.2.1., no.4, that [\texti{\texta}], an allophone

\textsuperscript{31} But it is obligatory to use a modified tone 2 in /g\Nam\w4 n\in5/ 'last year', perhaps to distinguish sharply between this meaning and /g\Nam\w4 n\in5/ 'old year', as in the following context: /k\Nam5\j\dash4 h\j4 g\Nam\w4 n\in5; g\Nam1\j\dash4 h\j4 s\Nam n\in5/ 'yesterday was the old year; today is the new year'.

\textsuperscript{32} See fn. 29.

\textsuperscript{33} In Mandarin, this phenomenon has also been described as phonological tonelessness in Robins, (1964), p.143. See also Pike, (1948), p.25. In this study, neutral tones are left unmarked in the text.
of /a/, has the concomitant feature of 'tonelessness' or 'tone neutrality'.
This vowel, it is emphasized, only appears in unstressed syllables.

3.4.3.1. Distribution of neutral tones

Neutral tones occur in syllables which are never stressed and which
are inherently 'toneless'. Such a syllable has a citation form which
can be said with a full tone. Such syllables fall into three subdivisions:
1) weak forms
2) the relative affix /-ga/

and

3) clause particles.

3.4.3.1.1. Weak forms

As in English, Cantonese has strong and weak forms. In English,
the word for is pronounced in its strong form /fɔ:/ in the phrase
*what for?* but can be pronounced in its weak form /fɔ/ in *it's for you.*
In Cantonese, the classifier /gɔ3/ is pronounced in its strong form with
the vowel /ɔ/ and an inherent tone 3 in the limiting phrase [jɪt ɡɔ3]
'this one', but in the larger noun phrase [jɪt ɡɔ ʒən5] 'this person',
the weak form [ɡɔ] is usually used since it occurs in unstressed position.
An exception is when the classifier is stressed, as in teaching somebody
to use that particular classifier as opposed to another classifier.

In this study, for the sake of transcriptional uniformity, this
word is always written as a strong form. This practice is further justified
by the fact that other classifiers do not behave in this way. By writing
strong and weak forms in the same way, their common identity is retained.

33a There is thus a phoneme change from /ɔ/ to /a/.
3.4.3.1.2. The relative affix /-g\ʌ/

The relative affix /-g\ʌ/ (phonetically [-g\ʌ]), is an allomorph of /-g\ʌ3/, which has a different vowel and an inherent tone 3. These allomorphs are further discussed in 9.7.1. as part of the relative phrase.

A brief introduction is given here:

/-g\ʌ3/ occurs in final position while /-g\ʌ/ occurs in non-final position. For example, /lam5 -g\ʌ3/ 'that which is blue' but /lam5-g\ʌ dib4/ 'the plate which is blue'. Since the allomorph /-g\ʌ/, whenever it occurs in non-final position, is never stressed and is always toneless, it is written in the rest of this study as -g\ʌ, while the stressed allomorph /-g\ʌ3/, which occurs in final position, is written as -g\ʌ3, so that the difference in pronunciation is evident in the orthography. This is a different practice from writing the two strong and weak forms of the classifier /g\ʌ3/ identically. In the case of /g\ʌ3/, the classifier can be stressed if it is necessary to do so.34

A few examples of the fluctuations in pitch of /-g\ʌ/ at phrase level is given below:

<table>
<thead>
<tr>
<th>Noun phrase in which /-g\ʌ/ appears</th>
<th>Pitch features of /-g\ʌ/</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. /maj4 haj5 -g\ʌ lam5/</td>
<td>between low and very low</td>
</tr>
<tr>
<td>2. /maj4 haj5 -g\ʌ dag3/</td>
<td>between low and mid</td>
</tr>
<tr>
<td>3. /maj4 haj5 -g\ʌ sin1 sag1/</td>
<td>low-rising</td>
</tr>
</tbody>
</table>

34 See 3.4.3.2.3.
3.4.3.2. **Clause particles**

Clause particles are the property of the clause and are dealt with in Chapter 6 and Chapter 8 (8.3.6.1–8.3.6.4). They are mentioned here because they are also phonologically toneless, but in such a way that they are not influenced by the pitches of the adjacent syllables. Rather, they interact with the intonation contour of the sentence of which the clause is the base. Neutral tones are left unmarked in this study.

3.5. **Intonation contours**

Intonation contours are the property of the sentence and will be dealt with in Chapter 5. An intonation contour is an obligatory component of the sentence; it is the obligatory factor which turns a base (such as a word, a phrase or a clause), into a sentence. In this I follow Elson and Pickett, who say that 'intonation morphemes must accompany the segmental morphemes in order to form a sentence.'

Intonation is mentioned here because a tune with which a sentence is said can cause two kinds of tonal change in lexical items:

1) Individual tones may change allophonically, i.e., they are still identifiable with their inherent tones. For example, in a declarative sentence, the tune of an intonation contour roughly follows the phonemic

---

35 See, for example, 6.6.1.3–6.6.1.5.
36 See 3.5, and 5.2.4.
37 Elson and Pickett, (1965), p.122. They use the terms 'intonation morpheme' and 'intonation contour' interchangeably.
tones of the words in the sentence.

2) Individual tones may change phonemically, i.e., they are no longer identifiable with their own inherent tone but with another tone. For example, the word /ley5/ 'come' can be the base of an interrogative sentence with an appropriate rising intonation contour so that the resulting sentence /ley5/ + rising intonation is homophonous with the word /ley2/ 'a pear'. In such cases, the context of situation would resolve the ambiguity. In the text, in order to avoid confusion with other words with the same segmental phonemes but with different tone phonemes, words with displaced inherent tone phonemes because of an intonation contour are written with their inherent phonemic tone numbers.

3.6. The romanization

It has been decided to represent the examples from Cantonese in the present study in romanization and not in phonemic transcription for ease of typing.

As in the phonemic transcription, tone marks are in numbers on the line and neutral tones are left unmarked. The phonological system as presented above is reflected in this romanization, which is almost completely a phonemic spelling; phonetic details are omitted except in the case of the spelling io, which represents the [io] allophone of /ʊ/ before /ŋ/ and /ŋ/. This allophone is brought into the spelling system to avoid confusing the Malayan pronunciation with the Hong Kong one, which does not have the [io] allophone. (See fn.8). The following is a list of the Malayan Cantonese vowel and consonant phonemes in phonemic transcription and romanisation:
### Phonemes in phonemic transcription

<table>
<thead>
<tr>
<th>Vowels</th>
<th>Romanization</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. /i/</td>
<td>i</td>
</tr>
<tr>
<td>2. /æ/</td>
<td>e</td>
</tr>
<tr>
<td>3. /a/</td>
<td>aa</td>
</tr>
<tr>
<td>4. /ʌ/</td>
<td>a</td>
</tr>
<tr>
<td>5. /y/</td>
<td>ue</td>
</tr>
<tr>
<td>6. /ø/</td>
<td>oo</td>
</tr>
<tr>
<td></td>
<td>{ io (before /g/ and /ŋ/) }</td>
</tr>
<tr>
<td>7. /ɔ/</td>
<td>o</td>
</tr>
<tr>
<td>8. /u/</td>
<td>u</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Consonants</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1. /b/</td>
<td>b</td>
</tr>
<tr>
<td>2. /p/</td>
<td>p</td>
</tr>
<tr>
<td>3. /d/</td>
<td>d</td>
</tr>
<tr>
<td>4. /t/</td>
<td>t</td>
</tr>
<tr>
<td>5. /ɡ/</td>
<td>g</td>
</tr>
<tr>
<td>6. /k/</td>
<td>k</td>
</tr>
<tr>
<td>7. /ɡw/</td>
<td>gw</td>
</tr>
<tr>
<td>8. /kw/</td>
<td>kw</td>
</tr>
<tr>
<td>9. /dʒ/</td>
<td>j</td>
</tr>
<tr>
<td>10. /tʃ/</td>
<td>c</td>
</tr>
<tr>
<td>11. /m/</td>
<td>n</td>
</tr>
<tr>
<td>12. /n/</td>
<td>ng</td>
</tr>
<tr>
<td>13. /ŋ/</td>
<td>f</td>
</tr>
<tr>
<td>14. /s/</td>
<td>s</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td>16. /h/</td>
<td>h</td>
</tr>
<tr>
<td>17. /l/</td>
<td>l</td>
</tr>
<tr>
<td>18. /w/</td>
<td>w</td>
</tr>
<tr>
<td>19. /j/</td>
<td>y</td>
</tr>
<tr>
<td>20. /r/</td>
<td>sore</td>
</tr>
</tbody>
</table>
CHAPTER 4: Levels of analysis

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4.2. The four levels ............................................. p. 79

4.1. Scope of the grammar

The scope of this grammar embraces the sentence as the highest unit and the morpheme as the lowest unit.

The definitions and the criteria for each level of analysis are given at the beginning of the chapter which deals with that particular level; these definitions and criteria are therefore not given in the present chapter.

The fact that the present analysis does not go above the level of sentence does not mean that the analyst does not recognize higher units in the grammatical hierarchy, such as discourse. An interrogative sentence, such as *may3 hoey3 bin1 sue3? 'where are you going?' implies at least two interlocutors and can be analysed as being part of a larger linguistic unit, in this case, discourse or conversation. Such a high-level unit, however, is outside the scope of this thesis.

4.2. The four levels

The word level, with its fillers, morphemes, is the lowest level of analysis. The morpheme is said to be the lowest unit of this analysis
as it is not possible within tagmemics to go further than the morpheme in the grammatical hierarchy. The morpheme, therefore, has no grammatical structure.

The present study deals with the following levels of analysis:

- sentence level
- clause level
- phrase level
- and
- word level

These levels are set out in the diagram below:

```
Sentence level
   ↑
Clause level
   ↑
Phrase level
   ↑
Word level
```

The straight upward arrows denote that typically and potentially, each higher-level unit is composed of one or more units of the next lower level. A sentence, for example, is typically manifested by a clause.

1In addition, a short chapter (Chapter 11) is included listing the affixes of words and the particles of clauses and sentences. Word affixes are dealt with in Chapter 10 'The word level' while the interrogative clause particles are dealt with in Chapter 8; sentence particles, however, being outside the scope of this thesis, are merely listed in 11.4. with examples of their usage but are not dealt with in the main body of the work.
filler of the base\(^2\) tagmemes and an appropriate intonation tagmemes. However, a sentence base need not always be manifested by a clause filler; any phrase or word, provided it has the appropriate intonation tagmemes, can fill the base slot of a sentence.

The opposite side of the picture will now be discussed: a clause may fill a slot on the phrase level by being down-graded by the relative affix \(-ga\) or \(-ge\) so that the clause is down-graded to a relative phrase modifying a noun head\(^3\), such as maa\(4\) gan\(2\) haav\(5\) \(-ga\) (selling shoes - relative affix) yan\(5\) (person) 'the man who is selling shoes'.

Similarly, in the case of the conjunct verb 24a1 mentioned in 10.10.5.2. and described in 10.10.5.2.2., the limiting phrase is down-graded to fill a limiter tagmemes within the word. Here then, the phrase is down-graded to become a part of a word and the conjunct verb concerned should be regarded as a special case of word. This particular kind of down-grading, however, is unique.

The phenomenon described so far, viz., the instability of the levels in the grammatical hierarchy, are known as instances of

\(^2\)The term 'base' is used in Elson and Pickett, (1965), p.83: 'sentence constructions include one or more nuclear tagmemes (manifested by clauses, phrases, or words) which we will label base tagmemes'.

\(^3\)See Ch.6, fn.1; see also 9.8.1.
level-skipping\(^4\). The traditional tagmemic term used to describe the downgrading of levels is \textit{loopbacks}\(^5\). Curved arrows indicate level-skipping on p. 80.

It must be emphasized, however, that whenever there is minimal occurrence of a unit, e.g., a word occurring as a minimal phrase, no level-skipping occurs. Level-skipping occurs only if one or more levels is passed over. An example of this would be the case mentioned earlier—that of a phrase or word filling the base slot of a sentence: the level immediately below the sentence, viz., the clause, is thus passed over.

\(^4\) Elson and Pickett, (1965), p. 83: 'A level may be skipped in a given language. Siemra Popoluca appears to have no phonological words, but in this case phonological phrases are built directly out of syllables'. Here Elson and Pickett are talking about skipping a level when proceeding from a lower level (syllable) to a higher level (phonological phrase). Cook, (1969), p.31, appears, therefore, to deviate from traditional terminology when he defines level skips as 'omissions of a level in proceeding from higher to lower'.

CHAPTER 5: The sentence level

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5.5.3.1. Sentence 330x ............................................. 128
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5.8.3.1. Sentence 530x ............................................. 137
5.8.3.2. Sentence 530y ............................................. 138
5.1. Definition of the sentence

The sentence is the level immediately above the clause and is the highest level of the present analysis, though the possibility of a higher level than sentence, say, discourse, is not precluded from further examination by other analysts. Sentence particles,¹ which imply a higher level than sentence, are listed in Chapter 11 and included in a few examples in the text in Chapter 12. They are not, however, included in the present analysis as they belong to a higher level than the sentence.

The definition of a sentence includes the following features:

1) A sentence must consist of one or more base tagmemes manifested by clause, phrase, word or morpheme.²

2) A sentence must have an obligatory intonation tagmeme manifested by an intonation contour.³

¹ See 11.4. Sentences not organised into a higher level, e.g., a narrative, do not sound natural ending in these particles. Sentences organised into a higher level, however, do need them for smooth reading and style.

² For sentence with morpheme filler, see 5.7.1.

³ This definition is meant to cover all instances of sentence, whether independent or dependent. It differs from the one given by Elson and Pickett, (1965), p.122, 18.2., in that Elson and Pickett only consider the independent sentence (base slot filled by independent clause alone) as having a final intonation contour. They consider dependent sentences as having non-final intonation contours. I differ from them in that I consider non-final intonation contours on the sentence level only as properties of the sentence-level tagmeme of clause. In this I follow Cook. See 5.2.4. as well as Cook, (1969), p.47.
For example, koev3 maay3 saang1go2 'he buys fruit' consists of a base (in this case an independent clause\(^4\)) plus an obligatory intonation tagmeme manifested by a final intonation contour:

\[ \text{Sent} = + \text{Base:ClInd} - \text{Inton:ICF} \]

Since the intonation tagmeme is a suprasegmental tagmeme in that it occurs simultaneously with the base, the dash is used instead of the plus or plus/minus signs used in other tagmemic formulae where the tagmemes are ordered. In that intonation is a phonological feature which is relevant to the grammatical treatment of the language, it is noted that at this point may be seen an interlocking of two hierarchies, viz., the phonological and grammatical hierarchies.\(^5\)

It must be pointed out that the sentence is a very different entity from either clause or phrase. First of all, a final intonation contour is obligatory for sentence but not for phrase or clause.

Secondly, the sentence is the one level which can be regarded as a realizable unit; this is by virtue of the obligatory intonation tagmeme. That is to say, a clause, for instance, may have exactly the same segmental morphemes as a sentence but it cannot be realised in the way that a sentence can because it does not have the obligatory intonation tagmeme. Any level below the sentence, therefore, is a more abstract entity than the sentence.

---

\(^4\) See 6.2. for the definition of independent clause.

\(^5\) See 1.3. on the interlocking of hierarchies and 5.2.4. on intonation.
5.2. General discussion

5.2.1. Note on the examples used in the following chapters and their translation

The examples in this and the following chapters up to (and including) Chapter 9 are set out in the following manner:

The grammatical structure being illustrated (in this chapter the sentence), is set out in abstract form in a full tagmemic formula which consists of the tagmemic and typical fillers of the particular grammatical structure being demonstrated. In this chapter, for example, such a formula displays sentence level tagmemic typically filled by clauses.

Immediately below this formula, each component of the grammatical structure in question is supplied in Cantonese, in units which are relevant to the structure being demonstrated. That is to say, in this chapter, the components being typically clauses, the Cantonese data are given in the first instance in strings of clauses. Exceptions to this rule are when the filler of the sentence is not a clause but a phrase or word which has level-skipped to fill a sentence-level slot. These components, which are supplied in Cantonese, are kept separate in the citations by the use of + or - signs to reflect the grammatical abstraction shown in the foregoing grammatical formula.

In the line immediately below the Cantonese citation in units relevant to the structure being demonstrated (in this chapter, clauses), is a word-by-word translation of the citations, arranged in such a way that each translation is immediately under the Cantonese word being translated and is separated from the next translation by the sign —. This sign is needed in order to indicate the boundaries of the Cantonese words, in cases where the English translation consists of more than one word. Where necessary, Cantonese words are explained instead of translated.
Word-by-word translations are enclosed within single inverted commas.

The reason why a morpheme-by-morpheme translation is not given until Chapter 10 is that up to Chapter 10, the morphemic structure of words is not being examined. Chapter 5 (the present chapter), examines the sentence in terms of clauses, chapters 6-8 are concerned with the examination of the clause in terms of phrases and Chapter 9 is concerned with the examination of the phrase in terms of words.

The purpose of including a literal translation is to give some idea of how the language works throughout all the chapters. The degree of literalness of a translation may be expressed in terms of the unit being translated; that is to say, a phrase-by-phrase translation is more literal than a clause-by-clause one, and a word-by-word translation is more literal than a phrase-by-phrase one. Chapter 12 presents a Cantonese text accompanied by a series of translations, of increasing literalness, of the same Cantonese text.

It has been decided not to take the degree of literalness beyond a word-by-word translation before Chapter 10. This is because, whereas in most cases, a Cantonese word can be translated into English by a word or a phrase without reference to the grammatical structure of Cantonese, the meaning of a morpheme can in many cases only be explained in terms of the grammatical structure of the Cantonese word. Such an explanation would be impossible without anticipating the analysis given in Chapter 10, and prematurely using terminology which has not yet been explained.

In Chapter 10 (and in the relevant part of Chapter 12), citations of words are given in morphemes. In the next line, within single inverted commas, each morpheme is translated or (where translation is not possible), explained; the translation or explanation of each morpheme is separated from the next by the sign — •.
In chapters 5-10, a free translation of each example is given below the literal translation, enclosed within round brackets. Except where it would be inconsistent with acceptable English, this free translation attempts to reflect the grammatical unit being demonstrated. Where this is not possible, the fact is stated.

Where it is necessary to do so, a suitable context is supplied within square brackets. The use of square brackets to denote context should be distinguished from the use of square brackets in Chapter 8. The second use of square brackets is explained in Chapter 8.

5.2.2. Terminology

It is proposed to retain on the whole the more traditional tagmemic terminology⁶ as used by Waterhouse⁷ and Elson and Pickett⁸ rather than to employ the terminology of Cook⁹, as it is felt that the former writers use terminology which has become established in the field of tagmemics while Cook attempts to introduce terminology into the field of tagmemics which rightly belongs to the field of transformational grammar.

Cook contends that although traditional tagmemic grammars gave a complete description, they 'often failed to show the relationships between similar sentences.'¹⁰ This he proposes to correct by the introduction of the concept of 'kernel' and 'derived' sentences.¹¹ Cook's contention

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⁶ See 1.3.
⁸ Elson and Pickett, (1965), 18.1.
⁹ Cook, (1969), Ch.2.
¹⁰ Cook, (1969), p.42. See also 1.4. for a discussion of the influence of transformational grammar on tagmemics.
¹¹ The term derived is used in 7.1. to show the relationship between the passive and the active clause. See also 1.4.
is unjustified because traditional tagmemists do show the relationships between similar structures by matrix displays and numbering systems (e.g., independent and dependent transitive clauses share the same series of numbers, in this thesis the 10 series). They do not, however, necessarily show the same relationships as would be shown in a transformational treatment of the language, but this is in effect saying that tagmemies is not transformational grammar, which admittedly it is not. When Cook uses the terms 'kernel' and 'derived, therefore, he is thinking of transformational grammar, not of tagmemics, and his criticism of traditional tagmemies as not showing that interrogative is derived from declarative is perhaps just as arbitrary as if one were to complain that some transformational grammars did just that.

It must be pointed out that Pike himself had been tempted to adopt the concept of 'kernel' and 'derived' sentences as a more satisfactory way of showing relationships in structures which had hitherto been treated in traditional tagmemic terms. In Pike (1967), p.473, he says: 'In tagmemic terms it might be possible to treat as the 'kernel' of the grammar those structures which make up the nucleus of the grammar system as a whole. Items which could be derived from these would then be treated as marginal sentence types.'

He did not appear, however, ready to use the term 'kernel' as yet, for he ended the discussion by saying that this particular approach must await further study. He then added in footnote 9 (p.473) that 'techniques for handling derivation from 'kernel' (nuclear) matrices have been developed', thus showing some readiness to adopt the term 'kernel', but still thinking in a tagmemic mould. The technique used for derivation is the multiplication of a 'kernel matrix' by a constant, e.g., by an interrogative component.
Both Pike and Cook appear to have a different concept of kernel and derived sentences from the transformationalist in that they suggest a straight derivation of non-kernel from kernel structures. Lyons, however, in Lyons, (1970), p.76, says: 'It should be emphasized..... that non-kernel sentences,......are not derived from kernel sentences.... but from a common underlying string. That is to say, there are no sentences generated without the application of at least a small number of obligatory transformations,.....' These would include rules like:

\[
\text{Present} \rightarrow S/\text{NP sing} \\
\emptyset/\text{elsewhere}
\]

\[
\begin{align*}
\{\text{Tense} \} & \quad + \quad \{\text{M} \} \\
\{\text{en} \} & \quad + \quad \{\text{have} \} \\
\{\text{ing} \} & \quad + \quad \{\text{be} \} \\
\{\text{V} \} & \quad + \quad \{\text{V} \} \\
\{\text{Tense} \} & \quad + \quad \{\text{en} \} \\
\{\text{ing} \} & \quad + \quad \{\text{be} \} \\
\{\text{V} \} & \quad + \quad \{\text{V} \}
\end{align*}
\]

It is difficult to see how an approach such as the one suggested by Cook would accommodate this part of the operation necessary in a transformational approach.

The present writer, therefore, does not wish to combine transformational grammar with tagmemics and proposes to adhere to more traditional tagmemic methods and terminology for the sake of uniformity in the established field of study.
5.2.3. **Independent and dependent sentences**

The term 'independent' applied to sentence is comparable to the term 'independent' applied to clause in Chapter 6. An independent clause is potentially an independent sentence for it forms the base of the independent sentence. Given a final intonation contour, the independent clause is an independent sentence. An independent sentence can be defined as a sentence 'which can occur as a complete utterance without ambiguity, or which can initiate discourse without necessity for some type of defining context'.

Waterhouse makes a distinction between 'Independent complete' (English NP + VP types) and 'Independent incomplete' (e.g., omission of the subject pronoun and aphorisms like 'the more the merrier'). In Cantonese, it is felt that this distinction is unnecessary, as the subject tagmeme is optional in the clause and its absence does not render a sentence in any way 'incomplete'.

Aphorisms belong to the coordinate type of sentence and are made up of two or more equative clauses. The independent sentence in Cantonese, therefore, is always 'complete' in that it has a clause, except when it comprises an exclamation, which Waterhouse would treat as an example of independent sentence. Cantonese exclamations are nonclause-type sentences and are 'incomplete' in the sense that they have no predicate-like tagmeme, but are independent sentences in that they do not depend on any defining context and in that they can initiate discourse. This would hold true.

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for greetings and the like. The term 'dependent' applied to sentence refers to those sentences 'which cannot occur as a complete utterance or initiate discourse without some defining context, and which are marked for dependence.

Dependency in the dependent sentence is manifested in three ways:

1) the filler of the base slot is a dependent clause, for example,

\[ \text{ngo3 bowl soey2} \quad \text{tung5 ney3} \quad \text{say2 saam1} \]
\[ [\text{I boil water}] \quad \text{for the purpose of} \quad -- \quad \text{wash—clothes'} \]
\[ \text{(and) for you} \]
\[ ([\text{I boil water}] \text{in order to wash clothes for you}). \]

where the sentence base is filled by a dependent personal purpose clause (see 6.8.1.2.1).

2) In the case of the dependent sequential sentence (see 5.2.5.1. and 5.8.), there is an obligatory sequence tagmeme manifested by a sequence word or connective, an obligatory juncture tagmeme manifested by pause, and an obligatory base tagmeme manifested by an independent clause. It is the sequence tagmeme and the juncture tagmeme that mark the dependency of the sequential sentence, as otherwise, the independent clause alone with its final intonation contour would constitute an independent sentence.

The definition of dependent sequential sentences, therefore, has all the features mentioned in the definition of sentence in 5.1. as well

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14 Cook, (1969), treats such sentences as minor sentence types with incomplete base. His division of sentences into major type with complete base and minor type with incomplete base is by and large similar to Waterhouse's independent and dependent sentences, except that she would not classify exclamations and the like with the other minor types, (sequential, marginal and elliptical types), but with the major sentences (incomplete).


16 See 6.2. and 6.7.

17 Elson and Pickett, (1965),18.1.
as these additional considerations: there must be present an obligatory sequence tagmeme followed by juncture tagmeme in addition to the independent clause base filler. The sequence tagmeme and the juncture tagmeme relate the sentence to its linguistic context by linking it to a sentence which has gone on before. An example of this is 'gam2 yiong2, koey3 jaan4 dow2 how2 dot cin2' 'and so, he earned a lot of money.' The sentence just before this could have been 'koey3 how2 kan5 lig4' 'he was very hard-working'.

3) The dependent sentence may be made in reply to some other sentence that has gone on before. For instance, 'kam5 yad4' 'yesterday' could be a reply to 'koey3 gey2 si5 ley5' 'when did he come?' This last kind of sentence would be regarded as an elliptical sentence, i.e., a sentence which could form part of a larger 'complete' sentence. The sentence in its 'complete' form would have the form 'kam5 yad4 koey3 ley5' 'he came yesterday'. In the context of the conversation, 'koey3 ley5' 'he came' is not necessary.

This study excludes those sentences which are considered 'dependent' by Pickett in that they are totally 'dependent on some nonverbal behavior'; i.e., they are 'dependent' for their meaning on a non-linguistic

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18 Conversation could be regarded as one of the larger units in which sentences occur. Such larger units (i.e., conversation, narrative) are not considered within the scope of this thesis but are mentioned as possible contexts for dependent sentences. See Waterhouse, (1962), 1.5.

19 See Pickett, (1960), p.80, 2.4.3. and p.81, 2.4.3.3. Her example of this kind of dependent sentence is 'tu l1i2i i who you' ('Who's there?') (dependent on nonverbal behavior of a knock, call, or noise outside the house or in another room).
context. An example of such sentences may be seen in the card game 'snap' where the players each present a card until two like cards (e.g., two Knaves) appear on top of each other and the players say 'snap' in order to win. In the meantime, a more meaningful conversation could be going on in which independent and dependent sentences of the sort described above appear. In such a case, the frequent occurrences of 'snap' would be regarded in my analysis as an extraneous feature of the conversation and would either be treated as independent sentences outside the conversation or else as mere interruptions without real linguistic significance. This can be justified by the fact that instead of the word 'snap', any other word or non-word (provided it be pronounceable within the speaker's system), or even a non-linguistic signal, like the knocking of a piece of wood which each player can be provided with, would be acceptable to the functioning of the game as long as the players are agreed beforehand what signal shall signify a 'snap'. Clearly, it would be uneconomical to set up a dependent system for such utterances and relate them to a non-linguistic whole.

Further examples of sentences dependent on non-linguistic contexts are the following:

1) gwan2 soey2 'hot water' in a Chinese tea-shop or restaurant where this is called out by the tea-bearer or soup-bearer. In such a situation, nobody is expected to reply but merely to look out in case he gets in the way of the waiter.

I wish also to leave out of my analysis those sentences which are interrupted either because the speaker is interrupted by somebody else or because he changes his mind halfway through a sentence. Such 'sentence fragments' are mentioned by Elson and Pickett, (1965), p.126.
2) *dim. ge3 laam2 leg4lev5* 'throw down the basket' in a department store where the person serving customers calls this out to somebody in the left to throw down a basket tied to a rope in which the shop assistant can put orders from customers. The man in the loft then hoists up the basket and fills it up with goods before he lowers it again. There need be no further verbal communication. This sort of sentence, as stated above, is outside the scope of the present study.

Another sort of sentence, however, the elliptical sentence, which is introduced in 5.2.5.1. and developed in 5.7.1., i.e., a nonclause sentence which may be relatable to larger simple sentences of one clause, can be linguistically or non-linguistically context-bound. Such an example in English is the red one which may be relatable to a linguistic context: I want the apple. The red one, or it may be relatable to a non-linguistic context, such as pointing to the apple to indicate wanting it and saying the red one. In each case, the elliptical sentence is treated as an actual realization of a simple sentence I want the red one. (See 5.7.1.)

5.2.4. Intonation

Intonation is treated in this study as a property of the sentence and it is the obligatory addition of intonation which turns a structure such as a word, a phrase, or a clause into a sentence. All sentences, whether independent or dependent, have an intonation tagmeme manifested by a final intonation contour.

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21 See fn.3 for a different viewpoint from that of Elson and Pickett. See also 3.5.
In Elson and Pickett, (1965), p.122, the terms 'intonation morpheme' and 'intonation contour' are used interchangeably. In this study only the term 'intonation contour' is used.
In coordinate and complex sentences, it is sometimes necessary to record more than one intonation contour. An example may be seen in the complex sentence *ney3 ley5, nge3 jaw4 hœy3* 'if you come, I shall go'\(^{22}\). Since there is no dependent word in the dependent clause *ney3 ley5* 'you come', there must be an obligatory intonation tagmeme manifested by a rising intonation contour. This intonation contour can be described on the sentence level as a non-final intonation contour\(^{23}\). The sentence can be analysed as follows:

\[
\text{ComplSent} = \text{Marg:ClDep} - \text{Inton:ICN} + \text{Base:ClInd} - \text{Inton:ICF}
\]

i.e., a complex sentence consists of an obligatory margin slot filled by a dependent clause and an intonation slot filled by a non-final intonation contour; an obligatory base slot filled an independent clause and an intonation slot filled by a final intonation contour.

It was seen in 5.2.3. that juncture tagmemes formed an obligatory component of the sentence. It is seen also that intonation contours are an obligatory component of the sentence. The juncture features manifesting the juncture tagmemes and the intonation contours manifesting the intonation tagmemes are suprasegmental components which can be said to function as phonemes in the manifestation mode (or the phonological hierarchy), of Cantonese.

More explicitly, as phonemes, these components can be seen to manifest the distribution mode of the phoneme, *viz.*, its 'potential for occurrence' (Pike, (1967), p.318.), in places within larger units (in this case, the sentence).

At the same time, juncture features and intonation contours are

\(^{22}\) See 6.2. for a similar discussion on the clause level.

\(^{23}\) See Cook, (1969), Ch.2, p.47.
a part of the distribution mode of Cantonese, i.e., the grammatical hierarchy.

The relationship between juncture features, intonation contours and the segmental morphemes of the sentence illustrates the interlocking of the phonological and grammatical hierarchies at this point. This fact was mentioned earlier in 5.1. It is not, however, described or developed in great detail as a full treatment of this complex subject is beyond the scope of the present study.

5.2.4.1. Unmarked and marked intonation

It was stated in 5.2.4. that all sentences, whether independent or dependent, had an obligatory intonation tagmeme manifested by a final intonation contour. This ‘final intonation contour’ can be unmarked or marked.

A final intonation contour is unmarked when it is the property of a sentence which is unambiguously of one and only one grammatical structure. For example, a sentence which has as the filler of its base slot an interrogative clause of the type whose predicate slot is filled by an interrogative verb phrase, can only be interpreted as an interrogative sentence. Therefore, its obligatory intonation tagmeme can be manifested by a final intonation contour which is unmarked. An unmarked intonation contour follows roughly the individual pitches of the lexical tones and there is no very noticeable displacement of the pitches of each lexical tone within the sentence.

24 See 8.3.6.2.
However, in the case of a sentence which has as the filler of its base a declarative clause, there are two possible grammatical interpretations: either, the sentence base plus unmarked intonation is a declarative sentence, or, the sentence base plus a marked intonation is an interrogative sentence. In the latter case, the intonation contour can be described as a low-fall-rise. If the sentence is a one-word sentence, the complete burden of this marked intonation is borne by the one word, thus displacing the lexical pitch of that word. In a sentence of more than one word, the fall in pitch is distributed along the clause or phrase in the sentence, as is the subsequent rise in pitch. Displacement of lexical pitch again occurs.

Brief mention is made here of unmarked and marked intonation on a non-grammatical level. This topic is taken up more fully in 5.3.3.1. An intonation contour, besides being marked to denote a certain grammatical status, e.g., marked for interrogation, can also, within the interrogative sentence, be unmarked or marked, depending on the choice of the interrogative particle that is selected (at clause level) to fill the interrogative slot of a particular interrogative clause.

This latter case of 'unmarked' and 'marked' intonation is not a grammatical matter but indicates whether the question asked is one of pure interrogation or one which provides additional information besides pure interrogation. For instance, the choice of maa as filler of the

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25 Another way in which intonation can be said to be 'marked' is when it is employed as a register or emphasis device. It is not proposed to deal with this aspect of intonation in the present study beyond the following brief illustration: in the imperative sentence, the intonation contour can be marked for register (i.e., whether polite, impolite, familiar or the like.) If it is unmarked (as presented in the main body of this chapter), then the speaker's attitude is neutral and polite, though not 'marked' polite. A 'marked' polite intonation contour would end with a slight rise on the last syllable whereas a marked impolite (or angry) intonation would be a sharply falling one.
interrogative slot would result in the choice of an unmarked intonation contour, whereas the choice of \textit{aa} as filler of the interrogative slot would result in the choice of a marked intonation contour.\footnote{See 5.3.3. - 5.3.3.2. for the treatment of intonation in interrogative sentences; a brief introduction to these particles is made in 5.3.3.1. See also 8.3.6. for a fuller development of the argument concerning choice of interrogative clause particles at clause level.}

This choice of \textit{maa/aa} is not a sentence level consideration but a clause level one. Whenever this choice is mentioned in Chapter 5 it is mentioned in relation to the interrogative clause. As mentioned in 5.3.3.1., the choice of unmarked or marked interrogative clause as filler of the sentence base in an interrogative sentence affects the choice of the actual sentence intonation contour, which is the phonetic exponent of the grammatically unmarked final intonation contour of the interrogative sentence described in that section (sentence 130x). This choice of \textit{maa/aa}, although a clause level consideration, is therefore mentioned and discussed in the present chapter.

5.2.5. Extent of analysis on the sentence level

5.2.5.1. Proposed parameters of the sentence level matrix\footnote{For examples of discussions and applications of matrix theory in grammar, see Brand (1968), Cox (1957), Longacre (1964),(1965), Pickett(1960) and Pike (1962),(1963),(1964),(1967).}

It is proposed to set up independent sentences and dependent sentences on the sentence level. Independent and dependent sentences shall be referred to as the two \textit{classes} of sentence paralleled by the division into independent and dependent clause classes on the clause level.\footnote{See 6.2. The actual differences in meaning between 'class' when applied to sentence and when applied to clause should be kept in mind. A member of a dependent clause class, for instance, always has a predicate (the defining part of a clause) but a member of a dependent sentence class may be less than a clause and have no predicate.}
Within the independent sentence class further distinctions are set up: viz., simple, coordinate and complex sentence on the one hand and declarative, imperative and interrogative sentence on the other. A simple sentence is defined as a one-clause sentence, a coordinate sentence is defined as a sentence made up of two or more conjoined independent clauses and a complex sentence is made up of one independent clause and one or more dependent clauses. The declarative, imperative and interrogative distinctions operate at clause and sentence levels.

Within the independent sentence class there are sentence types (paralleled by clause types on the clause level) such as simple declarative, coordinate interrogative and the like. Within the independent sentence class two possible parameters are left out as these will be handled at the clause level. One parameter is that which displays clause type, viz., transitivity, intransitivity and equation of the clause, while the other parameter is that which displays polarity, viz., affirmation and negation.

Within the dependent sentence class, distinctions are set up along one parameter to display the difference between the elliptical, the sequential and the marginal sentence.

The elliptical sentence is a nonclause structure which is part of a larger simple sentence of one clause. It thus stands in a one-to-one relationship with the simple sentence. The filler of the base tagmeme in an elliptical sentence is either a phrase, a word or even a morpheme. The elliptical sentence in Cantonese, being a nonclause structure, is different from the elliptical sentence described by Cook (1969) and Pickett (1960), which has an incomplete clause as base.

29 See 6.3.
30 Loc.cit.
31 See 6.5.
32 In Cook's terminology, it is 'derived' from the simple sentence. See Cook (1969), p.55.
Sequential sentences are those which contain an independent clause but which also contain a sequence-marking tagmeme, such as besides, moreover, followed by a juncture tagmeme manifested by pause. These sentences are related to the independent coordinate sentence in that they contain an independent clause.

The marginal sentence has as its base a dependent clause and an obligatory intonation tagmeme filled by a final intonation contour. If the intonation tagmeme were filled by a non-final intonation contour the whole structure (dependent clause plus intonation contour) would fill a margin slot on the sentence level and would be part of a complex sentence. In this sense, the marginal sentence is related to the complex sentence.

Within the dependent sentence class there are declarative, imperative and interrogative sentence types, depending on the intonation tagmeme of each dependent sentence.

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33 Elson and Pickett (1965), 18.4.3. See 5.8.1. of present chapter.
34 The definition of sentence given in 5.1. was 'a base tagmeme manifested by clause, phrase or word plus an obligatory tagmeme manifested by a final intonation contour'. Cook gives a different definition of the marginal sentence from the present one in Cook (1969), p.55: 'the marginal sentence has a margin slot filled by a dependent clause and a final intonation contour'. My definition of the marginal sentence as having a base, not a margin slot, does not violate my own definition of sentence in general given in 5.1.
35 My treatment excludes from the dependent class Waterhouse's 'referential dependent' sentences which are marked by third person pronouns, e.g., 'he looks something like a nearsighted skipper'. In the present analysis these sentences are treated as independent sentences since they are structurally independent in that they have complete clause structure and a final intonation contour. Waterhouse discusses such sentences in Waterhouse (1963), 2.2. See Pickett (1960), p.82, 2.4.3.5., for a viewpoint similar to mine. On the other hand, I agree with Waterhouse that exclamations are independent sentences (Waterhouse (1963), 2.0.), but would prefer to leave them out of the analysis as they are outside the system, having no underlying clause structure (see Cook (1969), p.57). Greetings and the like are also left out of this analysis.
The foregoing section covers some of the ground covered in 6.4 concerning the clause level. At the risk of being repetitive, certain points common to both sentence and clause are repeated in both sections as a reminder that these facts hold for sentence and clause.

Further, although there are parallels between sentence and clause, such parallelism does not demand a once-for-all treatment, as the actual facts of the case differ:

1) the parallelism in terminology, viz., sentence class vs. clause class, sentence type vs. clause type, is qualified by the individual meanings of these terms when used for sentence and when used for clause (see fn. 28.).

2) The declarative, imperative and interrogative distinctions at sentence level, although paralleled by an identical set of distinctions at clause level, intersect with a different set of contrasts in the sentence level matrix. That is, unlike the clause distinctions which intersect with transitivity, intransitivity and equation at clause level, the parallel set of sentence distinctions intersects with whether the sentence is simple, coordinate or complex.

The sentence level matrix is presented overleaf.
<table>
<thead>
<tr>
<th>Dependent</th>
<th>Independent</th>
<th>Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marginal 600</td>
<td>Seqential</td>
<td>Complex 500</td>
</tr>
<tr>
<td>610</td>
<td>Elliptical 400</td>
<td>310</td>
</tr>
<tr>
<td>610</td>
<td>Simple</td>
<td>215</td>
</tr>
<tr>
<td>610</td>
<td>Coordinated200</td>
<td>101</td>
</tr>
<tr>
<td>610</td>
<td>Simple</td>
<td>110</td>
</tr>
<tr>
<td>610</td>
<td>Declarative</td>
<td>10</td>
</tr>
<tr>
<td>610</td>
<td>Imperative</td>
<td>20</td>
</tr>
<tr>
<td>610</td>
<td>Interrogative</td>
<td>30</td>
</tr>
</tbody>
</table>
5.3. **Simple Independent sentence types 100**

5.3.1. **Simple declarative 110**

Since, as stated in 5.2.5.1., polarity is not dealt with at the sentence level, the sentence level tagmemes of clause are not referred to as 'clause 11a' and 'clause 11b' or 'clause 12a' and 'clause 12b' etc., but are referred to merely as 'clause 11' and 'clause 12'. These clauses, which in this chapter are sentence level tagmemes, are those clauses which are dealt with in chapters 6 and 7.

It must be kept in mind, though, that if a sentence is to be a positive one, then the filler of the sentence base slot is an 'a' clause, for example, clause 11a. On the other hand, if a sentence is to be a negative one, then the filler of the sentence base is a 'b' clause, for example, clause 11b.

However, since polarity is not a consideration of this chapter, no further allusion is made to it. If positive and negative sentences were to be set out in full, then much of the material of chapters 6 and 7 would be reduplicated to no purpose. Similarly, no reference is made to the difference in intransitive and equative E and F clause types which are handled in Chapter 6. (See 6.3. and 6.6.2.ff).

\[\text{Sent 110 = + Base:CLInd 11/21/31/41/51 - Inton: ICF}\]

The above five possible fillers of the sentence base are illustrated in full for the first time but hereafter only one or two base fillers will

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36 See 5.2.5.1.

37 Where it is not otherwise specified, the filler of the intonation tagmem is an unmarked intonation contour. See 5.2.4.1. for a discussion of unmarked and marked intonation.
be illustrated. The filler of the base can be either an active transitive clause (11), an intransitive clause (21), an equative clause (31) or a passive clause (41 and 51). Again, since these are considerations of the clause level, they are only alluded to here and are not hereafter taken up in this chapter.

Citations of sentence 110:
1) with clause 11 as sentence base filler:
   + maa3 sig4 gug1 - ICF
   'horse -- eat -- grain -- ICF' (the horse eats grain)

2) with clause 21 as sentence base filler:
   a) + yan5 sey2 - ICF
      'man -- die -- ICF' (men die)

   b) When clause 21 is selected as the base filler of the sentence it may result not only in a non-quotative sentence (as demonstrated in e.g. (a) above) but it may result in a quotative sentence.

   The quotative sentence is made up of a sentence base which is filled by clause 21 when the complement tagmeme of clause 21 is filled by a downgraded quotative clause.

   The special subclass of verbs which fills the predicate tagmeme of clause 21 in such a case is restricted to the quotative verbs, a subdivision of subclass intransitive verb words 13b. (See 10.10.5.1.3.).

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38 See 5.2.5.1.
As the quotative verbs are intransitive verbs which can optionally be followed by nominal complements not permitting a reordering of the complement tagmeme at clause level, they are regarded as a subclass of subclass intransitive verb 13b. They are a subclass because they are verbs which can be followed by a quotation. These verbs are called intransitive verbs 13b1 (see 10.10.5.1.3.1.).

In the quotative sentence, between the quotative verb and its downgraded clausal complement there is an optional juncture tagmeme manifested by juncture features. This is a non-significant phenomenon which may or may not appear depending on the speed of utterance. Elsewhere (for example, in 5.4.), the juncture tagmeme is of grammatical significance.

Citation:

+ koey3 gong2 (first part of clause 21) + jckeat + ngo3 gam1yad4
  'he -- say -- jckeat-- I -- today --
maay3 haay4 (downgraded clause as complement to the verb gong2)
buy --shoe'
(He said 'I'm buying shoes today') or (he said that I was buying shoes today).

It can be seen, therefore, that any sentence with an embedded pronoun in the quoted clause is systematically ambiguous, as in the case of English 'he said he was going'. The two instances of the pronoun 'he' may or may not refer to the same person. In a transformational analysis this kind of sentence would have two underlying structures.

3) with clause 31 as sentence base filler:

+ koey3 fey5 -- ICF
  'he -- fat -- ICF'
(he's fat).
4) with clause 41 as sentence base filler:

+ maaw1 bey2 gaw2 ngaaw3 - ICF

'cat -- by -- dog -- bite' --ICF'

(the cat is bitten by the dog)

5) with clause 51 as sentence base filler:

+ maaw1 ngaaw3 dow2 - ICF

'cat -- bitten -- ICF'

(the cat is bitten)

5.3.2. Simple imperative 120

Sent 120 = + Base:ClInd 12/22/32 - Inton:ICF

It should be noted that the possible fillers of the sentence base of sentence 120 cannot be a passive clause, which is not the case in sentence 121 dealt with in the next section (5.3.2.a.).

Citation sentence 120:

+ sig4 laa - ICF

'eat -- imperative particle -- ICF' (do eat!)

Since laa, the imperative particle, has a neutral tone, the intonation contour ends approximately near the pitch of sig4 in the sentence.

38a Although there is a coordinate imperative sentence 222 with a marked imperative sentence intonation (see 5.4.2.), there is no corresponding simple imperative with marked imperative intonation in this study. Such a sentence-type does exist in Cantonese as a language but it would belong to an impolite register and is therefore excluded in the present work.

39 See 3.4.3.-3.4.3.2.
5.3.2.a. Simple imperative 121

Sent 121 = + Hort: HortPhr 39a + Base: C1Ind 11/21/31/41a - Inton: ICF

The clause fillers of sentence 120 were all imperative clauses but the fillers of sentence 121 can be any independent declarative clause, including personal declarative passive clause 44a. Thus, although there is no imperative clause (see matrix in 7.5.), there is an imperative passive sentence.

The subject tagmeme in the clause base must be obligatorily absent.

Citation sentence 121:
1) with clause 11 as sentence base filler:
+ yaw5dag1 koey3 + sig4 - ICF
' let -- him -- eat = ICF' (Let him eat!)

2) with clause 44a as sentence base filler:
+ dang2 koey3 + bey2 yan5 daa2 - ICF
' let --him -- by--person--beat = ICF' (Let him be beaten by somebody!)

39a The hortatory phrase is made up of one of the three hortatory words bey2, dang2 and yaw5dag1 plus a noun or personal pronoun. In the imperative sentence, where, if the clause filler is passive, it is always a personal passive, the hortatory phrase with bey2 is not used, as bey2 is homophonous with the agent marker of the personal passive clause. An alternative analysis would be to treat these hortatory words as a special kind of intransitive verb, but this is not really desirable as intransitive verbs have already been divided into those with no nominal complements and those with optional nominal complements; to set up a third, viz., those with obligatory complements for only three examples, would be uneconomical. Furthermore, the hortatory phrase (as it is called in this study), can in no way be regarded as an independent clause (since it cannot exist independently) and neither can it be regarded as a dependent clause (since it has no dependent marker); hence it is regarded as a phrase in the present analysis.
5.3.3. Simple interrogative

There are two kinds of simple interrogative sentence: sentence 130x and sentence 130y. In sentence 130x, the base tagmeme is filled by an interrogative clause while the intonation tagmeme is filled by a grammatically unmarked final intonation contour. In sentence 130y, the base tagmeme is filled by a declarative clause while the intonation tagmeme is filled by a grammatically marked interrogative intonation contour.

In other words, the grammatical status of the intonation contour of sentence 130x is that of unmarkedness (on account of the interrogative clause base). The grammatical status of the intonation contour of sentence 130y, however, is that of markedness. The actual phonetic exponents of these intonation contours, however, vary. This is described in 5.3.3.1.

The criterion of a grammatical difference arising out of different grammatical intonations where the segmental morphemes are the same is used also by Brend (1968), p.45, where her Interrogative A clauses 'differ internally from their declarative counterparts only by the inclusion of an interrogative intonation contour' and 'have the same segmental structures as their declarative counterparts.'

In the case of sentence 130x, the answer must take the form of a positive verb/adjective phrase (in agreement) or a negative verb/adjective phrase (in disagreement), using the very verb/adjective which has occurred in the interrogative sentence. Alternatively, if the clause base includes a double function interrogative tagmeme (see 8.3.1.), the answer includes the non-interrogative counterpart of the double function tagmeme. For instance, a question with an interrogative-locative tagmeme will result in an answer containing a non-interrogative locative tagmeme.

In the case of 130y, which has the additional feature of incredulity on top of interrogation, the speaker expects confirmation or refutation using the answer 'hayk 'yes' or 'm5hayk 'no'.

---

40 See 5.2.4.1.
5.3.3.1. Sent 130x = + Base: ClInd 13/23/33/43/53 - Inton:ICP.

In 8.3.6. ff, there is a discussion of 'unmarked and marked interrogative clauses as etic variants of emic interrogative clauses'. These unmarked and marked clauses denote different attitudes on the part of the speaker. These differences are divided into two categories:

1) pure interrogation and
2) additional interest (such as curiosity) besides interrogation.\[^{41}\]

The choice of unmarked or marked clause as the filler of the sentence base affects the choice of the actual intonation contour which is the phonetic exponent of the unmarked final intonation contour\[^{42}\] in sentence 130x. When the interrogative clause in question is filled by an interrogative verb phrase without an interrogative clause particle, then the final intonation contour follows roughly the lexical pitches of the individual words in the sentence, but when the interrogative clause in question is filled by a non-interrogative verb or adjective phrase followed by an interrogative particle, then the final intonation contour can differ according to the choice of clause particle.

It is necessary to anticipate a section which rightly belongs to a discussion of clause-level considerations. This list of interrogative clause

\[^{41}\] See 5.2.4.1. for introductory remarks on this problem.

\[^{42}\] It must be borne in mind that the final intonation contour in this case is grammatically unmarked because it is a concomitant feature of a sentence with an interrogative clause as its base. The fact that the interrogative clause in question may be marked or unmarked (as explained in 8.3.6. ff.), does not affect the grammatical unmarkedness of the sentence intonation (as defined in 5.2.4.2.). It must be pointed out that not all 'concomitant features' are necessarily unmarked. For instance, if a grammatically marked interrogative contour in the sentence is a concomitant feature of the choice of declarative clause as filler of the sentence base, then the 'concomitant' feature, viz., the interrogative intonation contour, is marked. The meaning of the term 'concomitant' as used in this thesis denotes a feature or features that automatically go with some other feature: e.g., 'x is a concomitant feature of y' means that whenever y occurs, x automatically occurs. The term 'concomitant' is used in Waterhouse (1962), p.6, in a different sense.
particle made at clause level affects the choice of the phonetic exponent of the final intonation contour made at sentence level.

Using the chart (fig. 7 in 8.3.6.1.) of the unmarked and marked clause particles, a list of exponents of the final intonation contour for sentence 130x is given below:

1) with maa the intonation levels off
2) with mow the intonation ends on a rise
3) with aa the intonation drops
4) with gaa the intonation levels off
5) with le and the intonation undergoes a sharp rise
6) with me
7) with waa the intonation ends on a low level pitch

Citation sentence 130x:

ney3 sig4 gig1 maa ICF

'you -- eat --cake --interrogative particle -- ICF' (do you eat cake?)

5.3.3.2. Sent 130y = + Base:ClInd 11/21/31/41/51 - Inton:MiG

As explained in 5.3.3. the intonation tagmeme is manifested by a marked interrogative intonation contour, which, in this case, is a low-fall-rise.

Citation sentence 130y:

gam1 yad4 yi1 pad1 maa3 sig4 - gug1 - MiG

'today --this --classi-fier --horse -- eat -- grain -- MiG'

(toddy does this horse eat grain?)
5.4. **Coordinate independent sentence types 200 and sentence connectives**

Coordinate sentences are made up of two or more independent clauses conjoined either 1) by sentence connectives which may or may not be accompanied by juncture tagmemes or 2) by juncture tagmemes alone.

Sentence connectives are divided into the following classes of connectives; the individual members are exhaustively listed:

1) **Class 1:** those occurring in sentence 210:

- `so2yi3` 'therefore'
- `yi5ce2` 'besides'
- `dong1yuen5` 'a fortiori'
- `waag4je2` 'perhaps'
- `gam2viong2` 'therefore'
- `bad1yi3` 'might as well'
- `daan4haay4` 'but'

2) **Class 2:** those which occur in sentence 213 as paired connectives:

- `waang5dim4.....bad1yi5` 'since.....therefore'
- `soeyiyuen5.....daan4hay4` 'although.....but'

3) **Class 3:** that which occurs in sentence 214: there is only one member:

- `vawl` 'also'

4) **Class 4:** that which occurs in sentence 214a: there is only one member:

- `ywash` this connective cannot be translated by a word
in English; it has the general meaning of 'more' or 'more so'.

5) Class 5: those which occur in sentence 215: there are only two members:

\( \text{yad1hay4} \) 'either (or)'
\( \text{yad1haa3} \) 'on the one hand (on the other)'

Connectives from Class 1-5 in sentences 210-215 can occur after the optional subject tagmeme of an independent clause in the sentence.

6) Class 6: that which occurs in both sentence 220 and 221:

\( \text{bad1yi5} \) 'might as well'

\( \text{bad1yi5} \) also occurs in sentence 210 and as the second of the paired connectives in sentence 213.

7) Class 7: those which occur in sentence 222: there are only two members:

\( \text{yaw4} \) 'also, and'
\( \text{tung5maay5} \) 'and'

Note that \( \text{yaw4} \) has overlapping class membership as it also occurs in sentence 214 as connective class 3.

\[43\] Also occurs in AdvPhr 22 (9.14.2.) with the meaning 'and'.

\[44\] Distinguish from \( \text{tung5maay5} \) 'and' which occurs as a connective in NPhr 25 (9.8.5.). When it occurs in that phrase it has an allomorph \( \text{tung5} \). \( \text{tung5} \) cannot occur in sentence 222.
8) Class 8: those which occur in sentence 230x: there are only two members:

\[\text{jawh} \quad 'or' \]

\[\text{vigiaaach} \quad 'or' \]

Juncture tagmemes are manifested by juncture features: juncture features include

i) a prolongation of the last syllable, with or without pause.

ii) a non-final intonation contour.

These features are subsumed under the term 'juncture features'.

Coordinate sentences may have a limited number of clauses or they may be theoretically open-ended in structure.\(^ 45 \)

In all coordinate declarative and interrogative clause types the subject tagmeme in the second clause may be the same as the subject tagmeme in the first clause, in which case it may be optionally omitted in the second clause. It may also be different from the subject in the first clause, in which case it must be included in the second clause.

5.4.1. Coordinate declarative 210-215

Coordinate declarative sentences are made up of two or more independent clauses (with or without dependent clauses) conjoined in six different ways. They are divided into sub-groups (numbered 210-215) according to the ways in which the sentences are conjoined.

Sentences 210-213 have a limited number of clauses which can occur in the sentence. Sentences 214-215, however, are open-ended structures which

\(^{45}\) See 2.4.
theoretically have no limit to the number of independent clauses which can occur in the sentence (see 2.4.).

These sentences are described below and presented with their tagmemic formulae; examples of each sentence type are given in the citations:

5.4.1.1. Sentence 210 is made up of two or more independent clauses conjoined by obligatory juncture tagmemes and connective tagmemes manifested by class 1 connectives. The juncture tagmeme in this and in other cases is manifested by a prolongation of the last syllable of the independent clause, optional pause and a concomitant non-final intonation contour. The tagmeme will be represented in the following tagmemic formulae by 'Jc:Jcfeat' (i.e., 'juncture tagmeme manifested by juncture features').

\[
\text{Sent 210} = +\text{Base}_1:\text{ClInd 11/21/31/41/51} + \text{Jc:Jcfeat} + \text{Cn:cm1} \\
+\text{Base}_2:\text{ClInd 11/21/31/41/51} - \text{Inton:ICF}
\]

This is not an open-ended structure; up to four independent clauses may be conjoined in this way.

Citations of sentence 210:
1) two-clause sentence:
\[
+\text{ClInd 21} + \text{Jcfeat} + \text{cm1} + \text{ClInd 31} -\text{ICF} \\
+\text{low3mow2} \quad \text{sey2} + \text{Jcfeat} + \text{so2yi3} \quad \text{ngo3} \quad \text{saw3} - \text{ICF} \\
\text{ 'mother} -- \text{ die} -- \text{Jcfeat} --\text{therefore} -- \text{I} --\text{thin} -- \text{ICF}
\]
(My mother died therefore I got thin).
2) three-clause sentence:

+ Base₁ : ClInd 21 + Jc: Jcfeat + Cn: cm1 + Base₂ : ClInd 21 + Jc: Jcfeat
+ Cn: cm1 + Base₃ : ClInd 31 - Inton: ICF
+ ngo3 yaw3 jay2 noey2 + Jcfeat * yi5 ce2 yaw3 fu4 mow3 + Jcfeat

'I -- have -- children -- Jcfeat -- besides -- have -- parents -- Jcfeat
+ so2 yi3 + ying1 goy1 kan5 lig4 - ICF

therefore -- should -- diligent -- ICF'

(I have children and parents (to support); I should work hard).

5.4.1.2. Sentence 211 is a sentence made up of only two independent clauses which are conjoined by an obligatory juncture tagmeme:

+ Base₁ : ClInd 11/21/31/41/51 + Jc: Jcfeat + Base₂ : ClInd 11/21/31/41/51 - Inton: ICF

Citation sentence 211:

+ koey3 ley5 + Jcfeat + ngo3 hoey3 - ICF

'he -- come -- Jcfeat -- I -- go -- ICF'

(He comes; I go).

5.4.1.3. Sentence 212 is made up of only two independent clauses which are conjoined by mere juxtaposition alone, without either connective or juncture tagmemes. The filler of the first base is either a transitive or intransitive clause:

Sent 212 = + Base₁ : ClInd 11/21 + Base₂ : ClInd 11/21/31/41/51 - Inton: ICF
Citation sentence 212:
+ ngo3 hoey3 yiong5fo3pow2 + ney3 maay3 saam1 - ICF
'I -- go -- department store-- you --buy --clothes -- ICF'
(I go to the department store; you buy clothes).

5.4.1.4. Sentence 213 is made up of only two independent clauses con-
joined by class 2 connectives which are paired together with juncture
tagmemes:

Sent 213 = + Cn:cn2 + Base1:ClInd 11/24/31/41/51 + Jc:Jofeat + Cn:cn2 +
Base2: ClInd 11/21/31/41/51 - Inton: ICF

Citation sentence 213:
+ waang5dim4 + ngo3 faam1 ug1key2 + Jofeat + bad1yi5 + ngo3 ce1maay5 ney3-ICF
'since -- I --return--house -- Jofeat-- why not -- I --drive -- you--ICF'
(I'm going home; I might as well give you a lift).

5.4.1.5. Sentence 214: as mentioned in 5.4.1., above, sentence 214 is an
dopen-ended structure which theoretically has no limit to the number of
independent clauses which can occur in it. Sentence 214 has independent
clauses which are conjoined either by repeated connective tagmemes manifested
by class 3 connective yaw4 'also' or juncture tagmemes, or both.

Whereas all independent clause types can be conjoined in sentence 214,
a subdivision of sentence 214, viz., sentence 214a, has only equative clause
types conjoined by the class 4 connective yu6di4 'more' or 'more so'.
Sentence 214 is symbolized below:

\[
\text{Sent } 214 = \frac{+ \text{Cn:cn3 + Base}_1 : \text{CLInd 11/21/31/41/51 + Jc:Jcfeat} +}{+ \text{Cn:cn3 + Base}_2 : \text{CLInd 11/21/31/41/51 + Jc:Jcfeat} + \text{Inton:ICF}}
\]

There is no restriction on the kind of clause type that can be conjoined in this kind of sentence.

In the citation below, as the formula is slightly complicated, the grammatical label of each structure cited is supplied below the appropriate citation and a word-by-word translation below that in order to make it clearer. This is done also in the case of sentence 214a.

Citation sentence 214:

\[
\begin{align*}
&\text{[koey] } + yaw4 + jow4 saaml + Jcfeat \quad \text{[ngo3]} + yaw4 + jow4 fu3 + Jcfeat \\
&\quad \text{(cn3)} \quad \text{(CLInd 11)} \quad \text{(cn3)} \quad \text{(CLInd 11)} \\
&[\text{he}] \quad \text{also make dress} \quad [\text{I}] \quad \text{also make trousers} \\
&\text{[ney3]} + yaw4 + wan2sig4 + Jcfeat \quad [\text{ngo3}dey4] + yaw4 + fay3log4 + Jcfeat \\
&\quad \text{(cn3)} \quad \text{(CLInd 21)} \quad \text{(cn3)} \quad \text{(CLInd 31)} \\
&[\text{you}] \quad \text{also seek a living} \quad [\text{we}] \quad \text{also happy} \\
&([\text{he} \text{ makes dresses, [I] make trousers, [you] seek a living, [we] are happy}]).
\end{align*}
\]

\[46\] This symbolization is given in Elson and Pickett, (1965), p.60, e.g. (3). This means that each tagme is optional and that either or both may occur but one must occur.
Sentence 214a = $\pm \text{Cn:cn} + \text{Base}_1: \text{ClInd 31} + \text{Jc:Jcfeat}$

5.4.1.5.1. Sentence 214a = $\pm \text{Cn:cn} + \text{Base}_1: \text{ClInd 31} + \text{Jc:Jcfeat}$

\[\pm \text{Cn:cn} + \text{Base}_2: \text{ClInd 31} + \text{Jc:Jcfeat}...\text{Inton:ICF}\]

Citation sentence 214a:

\[[\text{kocy3}] + \text{yued4} + \text{fey5} + \text{Jcfeat} + \text{yued4} + \text{laan3} + \text{Jcfeat}\]

\[(\text{cn4}) (\text{ClInd 31}) (\text{cn4}) (\text{ClInd 31})\]

more fat more lazy

\[\pm \text{yued4} + \text{kwaay5} + \text{Jcfeat} + \text{yued4} + \text{gaan1} + \text{Jcfeat} + \text{yued4} + \text{nam1-sam1}\]

\[(\text{cn4}) (\text{ClInd 31}) (\text{cn4}) (\text{ClInd 31}) (\text{cn4})(\text{ClInd 31})\]

more naughty more crafty more covetous

\[\ldots\ldots\ldots\text{ICF}\]

(He's getting] fatter, lazier, naughtier, craftier and more covetous).

5.4.1.6. Sentence 215: Like sentence 214, sentence 215 is also made up of recurrent independent clauses which are conjoined by repeated class 5 connectives and juncture tagmemes, but in this case both these tagmemes are obligatorily present. Like sentence 214, the clauses to be conjoined need not be of the same type.

Sent 215 = $\pm \text{Cn:cn} + \text{Base}_1: \text{ClInd 11/21/31/41/51} + \text{Jc:Jcfeat} + \text{Cn:cn} + \text{Base}_2: \text{ClInd 11/21/31/41/51} + \text{Jc:Jcfeat}...\text{ICF}.$
Citation sentence 215:

+ yad1hay + say2 saam1 + Jofeat + yad1hay + cung1 liong5 ....ICF

'(I etc.) either—wash—dress — Jofeat — either — bath ............ICF'

( (I etc.) either wash clothes or have a bath).

5.3.2. Coordinate imperative 220-222

Coordinate imperative sentences are made up of two or more independent clauses (with or without dependent clauses), conjoined in any of the ways described from 5.4.1. = 5.4.1.6. The last clause in sentence 220 must be either imperative clause 12, 22 or 32 but the last clause in sentence 221 need not be an imperative clause; it can be any independent declarative clause, including personal declarative passive clause 41a. In the second clause to be conjoined, the subject tagmeme must be obligatorily absent. The last clause in sentence 221, therefore, is the same as the clause base of sentence 121 (see 5.3.2.a.) The hortatory phrase,47 let him, let her, etc., precedes the final clause in sentence 221.

47 See fn. 39a.
The difference between imperative sentences 220 and 221, therefore, lies in the different fillers of the final base tagmeme in the sentence: in the case of 220, an imperative clause, in the case of 221, independent clauses 11-41a(active and passive declarative clauses). The hortatory tagmeme in sentence 221 is obligatory, thus making it unnecessary to have an imperative clause type in the sentence. Both sentences 220 and 221 have an unmarked intonation contour.

Sentence 222 is made up of two or more independent declarative clauses conjoined by juncture tagmemes and/or connectives *tung5maay*, 'and' and *yaw4* 'and'. The intonation tagmeme, however, unlike in sentences 220-221, is filled by a marked imperative intonation contour. The three tagmemic formulae are set up below for contrast:

5.4.2.1. Sent 220 = + Base1: ClInd 11/21/31/41 + Jc:Jcfeat
+ (Cn:bad1yi5 + Hort:HortPhr) + Base2: ClInd 12/22/32 - Inton:ICF

5.4.2.2. Sent 221 = + Base1: ClInd 11/21/31/41 + Jc:Jcfeat + Cn:bad1yi5 + Hort:HortPhr + Base2 : ClInd 11/21/31/41a- Inton:ICF

5.4.2.3. Sent 222 = + Base1 : ClInd 11/21/31/41 + (+ Jc:Jcfeat + Cn:yaw4/tung5maay5) + Base2: ClInd 11/21/31/41....Inton:Imp

A further difference between the sentences 220 and 221, apart from the different fillers of the second base tagmeme, can be seen: in sentence

48

This symbolization is the same as that explained in fn. 38. The different layout is because the tagmemes are adjacent and do not need to be 'tied'.

220, either of the two tagmemes within brackets, viz., the connective and hortatory tagmemes, is obligatory and both may (but need not) occur; in sentence 221, both these tagmemes are obligatory.

Citation sentence 220:

+ClInd 11 + ClInd 21 + Jofeat + ( + bad1yi5 + bey2 ngo3 ) + ClInd 22 - ICF
+ ney3 jow4 saam1 + wan2sig4 + Jofeat + bad1yi5 + bey2 ngo3 + bong1saw2
'you -- make -- clothes-- seek a living -- Jofeat-- might as well -- let me -- help'

imperative clause -- ICF
particle
(You make clothes to earn a living; do let me help!)

Citation sentence 221:

1) using an active declarative clause as filler of the second base tagmeme:
+ ClInd 31 + Jofeat + bad1yi5 + HortPhr + ClInd 11 - ICF
+koe3 gam3 kwaay5 + Jofeat + bad1yi5 + dang2 baa5baa1 + daa2 koe3 - ICF
'he -- so -- naughty -- Jofeat-- might as well -- let -- Daddy -- beat--him -- ICF'
(He's so naughty; let Daddy beat him!)

2) using a passive clause as the filler of the second base tagmeme:
+ ClInd 31 + Jofeat + bad1yi5 + HortPhr + ClInd 41a
+koe3 gam3 kwaay5 + Jofeat + bad1yi5 + dang2 koe3 + bey2 yan5 daa2 - ICF
'he -- so -- naughty-- Jofeat-- might as well -- let-- him -- by -per- beat--ICF'
(He's so naughty, let him be beaten by somebody!)
Citation sentence 222:

+ ClInd 11 + Jofeat + ClInd 11 + Cn + ClInd 11 - MImp

+ maay3 did1 yug4 + Jofeat + maay3 did1 ccy3 + tung5maay5 + maay3 did1

'buy --some--meat -- Jofeat-- buy-- some--vegetable and -- buy --some--

haat -- MImp

prawn = MImp'

(Buy some meat, buy some vegetables and buy some prawns!)

5.4.3. Coordinate interrogative 230-231 (x and y):

In 5.3.3. it was seen that the simple interrogative sentence was
divided into 130x (with unmarked intonation) and sentence 130y (with marked
intonation). The same applies to the coordinate interrogative sentence 230
which has an unmarked intonation (sentence 230x) and a marked interrogative
intonation (sentence 230y).

Sentence 230x is made up of independent declarative clauses which are
conjoined by juncture tagmemes and the connectives jawlw 'or' and vig1waag4
'or', resulting in an either/or sentence. There is no theoretical limit
to the number of clauses, though again, stylistically there must be a limit.

The intonation tagmeme of the sentence is filled by an unmarked intonation
contour since the presence of the connectives jawlw or vig1waag4 makes
the sentence unambiguously interrogative. Sentence 230y, however, is made
up of two independent declarative clauses which are conjoined only by
juxtaposition, and the intonation tagmeme is filled by a marked interrogative
intonation contour which also gives the sentence the additional meaning of
surprise on the part of the speaker.
Sentence 230x is made up of independent clauses conjoined in the ways described in 5.4.1. - 5.4.1.6. except that the final clause is an interrogative clause. This sentence is therefore unambiguously interrogative and it has an unmarked intonation contour.

5.4.3.1. Sent 230x = + Base₁: ClInd 11/21/31/41/51 + Jo:Jofeat + Cn:on8 + Base₂: ClInd 11/21/31/41/51 + Jo:Jofeat + Cn:on8 + Base₃: ClInd 11/21/31/41/51
...... - Inton:ICF

Citations of sentence 230x:
1) + ney3 siong2 sig4 min4 + Jofeat + jaw4 + siong2 haang5gaay1 - ICF
   'you -- wish -- eat -- noodles -- Jofeat -- or -- wish -- take a walk -- ICF'
   (Would you like to eat noodles or take a walk?)

2) + ney3 ceng2 maa3laay1yan5 + Jofeat + yig1waag4 + ceng2 yan3dow4yan5 - ICF
   'you -- employ -- Malay -- Jofeat -- or -- employ -- Indian -- ICF'
   (Do you employ a Malay or an Indian?)

5.4.3.2. Sent 230y = + Base₁: ClInd 11/21/31 + Base₂: ClInd 11/21/31/41/51 - Inton:MIg

It should be noted that the passive clause, if it occurs, occurs as the final clause in this sentence.

Citations of sentence 230y:
1) + ClInd 11 + ClInd 11 = MIg
   + ney3 hoey3 yiong5fo3pow3 + maay3 faa1 = MIg
   'you -- go -- department store -- buy -- flowers -- marked interrogation'
   (Don't tell me you went to the department store and bought flowers?)
2) + CInd 21 + CInd 41 = Mig
   + koe3 l3e3h3aag5 + bey2 ging2caad3 gon1sib3 = Mig
   ' he—travel for — by — police — intercept — Marked interrogation'
   (Don't tell me that he was intercepted by the police while on holiday?)

5.5. Complex independent sentence types 300

5.5.1. Complex declarative 310

The complex sentence has one independent clause as filler of the base
tagmemes and at least one dependent clause filling the marginal tagmeme(s)
of the sentence. The internal relationships between the two or more clauses
can be stated in terms of subordination of the obligatory dependent clause
to the independent one and the further subordination of other optional
dependent clauses to the whole. The general tagmemic formula for sentence
300-310 is set out below:


Citation sentence 310:
   + CIndCond 14 + CInd 21 + CInd 31 = ICF
+ hay4 koe3 yi1dow2 ney3 + ngo3 baay3 koe3 yan1way4 mow3yan5
   'if — he — able to — you — I — pray to — he — because — nobody —
cure
yi1go3 yi1 jung2 beng4 = ICF
has cured—this—kind—illness—ICF'
of
(If he cures you successfully I shall have to deify him since nobody has ever
cured anybody of this illness before).

49 The margin tagmemes filled by a dependent clause can come before the base
tagmemes or after the base tags, so a dash is used instead of a plus
sign before the margin tagmemes. For the dependent clause matrix displaying
clauses 14-38 see Ch.6, fig.5, and for the dependent clause matrix
displaying clauses 44-58, see Ch.7, fig.6.
5.5.2. Complex imperative 320-321:

Like the coordinate imperative sentences 220-221, complex imperative sentences are divided into two types, 320 and 321, according to whether the base tagmeme is filled by an independent imperative clause or an independent declarative clause.

In the case of sentence 320 the base tagmeme is filled by an imperative clause and at least one margin tagmeme filled by a dependent clause. Before the imperative clause there is an optional hortatory tagmeme.

In the case of sentence 321, however, the base tagmeme is filled by an independent declarative clause (active or personal passive) and an obligatory hortatory tagmeme filled by a hortatory phrase. Sentence 321, therefore, like sentence 221 mentioned above, can be a passive imperative sentence although there is no passive imperative clause.

The two formulae are presented below:

5.5.2.1. Sent 320 = + Hort:HortPhr + Base:ClInd 12/22/32 - Marg:ClDep 14-58
- Inton:ICF

5.5.2.2. Sent 321 = + Hort:HortPhr + Base:ClInd 11/21/31/41 - Marg:ClDep 14-58
- Inton:ICF

50 See 5.4.2.

The hortatory phrase in sentence 320 can be any of the three mentioned in fn. 33 but in sentence 321, when the personal passive clause with its agent marker bey2 occurs as filler of the base slot, then the hortatory phrase cannot begin with bey2 but only with one of the others.
Citation sentence 320:
+ ClCond 14 + HortPhr + ClInd 12 - ICF
+ hay4 koey3 ngaag1 ney3 ± dang2 ngo3 + paa3 jay3 koey3 laa - ICF
 'if-- he -- cheat--you-- let--me-- deal with--him--impers--ICF' (If he cheats you, let me deal with him!)

Citation sentence 321:
+ ClCond 14 + HortPhr + ClInd 41 - ICF
+ hay4 koey3 ngaag1 ney3 + dang2 koey3 + bey2 yan5 ngaag1faan1
 'if-- he -- cheat--you-- let--him--by--people--cheat-- (reciprocal)

koey3 - ICF
--him-- ICF' (If he cheats you, let him be cheated by others!)

5.5.3. **Complex interrogative 330x - 330y**: 

In 5.3.3. and in 5.4.3. it was seen that the simple and coordinate sentences were divided into types x (with unmarked intonation) and y (with marked intonation). The same holds true for the complex interrogative sentence which is divided into sentence types 330x and 330y.

The base tagmeme of sentence 330x is filled by an independent interrogative clause but the base tagmeme of sentence 330y is filled by an independent declarative clause. Since the structure of the independent clause in sentence 330x is an interrogative one, the sentence is unambiguously interrogative and the intonation tagmeme is filled by an unmarked intonation contour.
In the case of sentence 330y, since the independent clause which fills the base tagmeme of the sentence is a declarative one, the intonation tagmeme is obligatorily filled by a marked intonation contour.

An alternative treatment of sentence 330y is to treat it as essentially sentence 310 with an intonation which is marked for interrogation. In this case sentence 130y (5.3.3.2.) would be regarded as essentially sentence 110 (5.3.1.) with a marked interrogative intonation contour. This question is also linked to the treatment of Clause 11 and 13 (see 6.6.1. ff) as different clause types; the last question will be discussed fully in the relevant section.

There are certain disadvantages which make the alternative treatments of sentence 330y and 130y undesirable. It is true that sentence 330 and sentence 310 have essentially the same clause base fillers, viz., any independent declarative clause plus any dependent clause. However, it is very strongly upheld in the present study that intonation is a sentence level tagmeme of utmost grammatical importance. It is part of the aim of this work to demonstrate that what appears in an abstract form as identical structures (in this case, the clause bases of sentences 330 and 310), through the obligatory occurrence of the right intonation tagmeme, result in grammatically distinct structures.

5.5.3.1. Sentence 330x = Base:ClInd 13/23/33/43/53 - Marg:ClDep 14-58
- Inton:ICF
Citations of sentence 330x:

1) + CInd 23 + ClDep 25 - ICF
   + koey3 kued3m5kued3'ing4 + tung5 ney3 gid3'ant - ICF
   'he -- does he decide -- with -- you-- marry -- ICF'
   (Has he decided to marry you?)

2) + ClDep 44 + CInd 13 - ICF
   + hay4 ney3 bey2 cag4'low2 daa2 + ney3 giw3m5giw3 maa3daa1 - ICF
   'if -- you -- by -- robbers--beat -- you--do you call-- police -- ICF'
   (If you're beaten by robbers do you call the police?)

5.5.3.2. Sentence 330y = + Base:CInd 11/21/31/41/51 - Marg:ClDep 14-58
   - Inton:Mig

Citations of sentence 330y:

1) + CInd 11 + ClDep 56 - Mig
   + koey3 m5ley5 yildow4 + yantway4 sung3 sig4'saay3 - Mig
   'he --not come--here -- because --food -- eaten -- Mig'
   (Don't tell me he won't come here because all the food is eaten up?)

2) + ClDep 27 + CInd 41 - Mig
   + sin1'saang1 taaw1laan3 go2jan4si3 + koey3 bey2 hog4'saang1
   'teacher -- becomes lazy--at that time --he -- by-- pupil --
   daa2 - Mig
   beat -- Mig'
   (Don't tell me that when the teacher is lazy he is beaten by his pupil?)
5.6. Dependent sentence types

Dependent sentence types are situationally divisible into completive (additive) and response types. In other words, a dependent sentence may add some further information to a statement previously made, in which case it can be said to be of the completive type; or, it may be said in response to a question, in which case it is a response type dependent sentence.

Cook (1969), pp. 56-57, treats completives (addition) sentences and response sentences as two structural types. This practice is not followed in the present study, because the distinction between the two kinds of dependent sentence (completive versus response) is a situational one; linguistically they are one and the same structure. Instead, the parameter set up for the independent sentences, viz., that displaying declarative, imperative and interrogative sentence types, is retained for the dependent sentences. A note is made here that there is no dependent marginal imperative sentence.

5.7. Elliptical independent sentence types 400

5.7.1. Elliptical declarative 410:

It was stated in 5.2.5.1. that the elliptical sentence in Cantonese was a nonclause structure which was part of a larger simple sentence of one clause, and that the filler of the base tagmeme was either a phrase, a word or a morpheme. The elliptical sentence either adds some further information in a nonclause form to a previous sentence already made or it is relatable to a complete sentence with a clause. In examples given below
of elliptical sentences, examples of sentences to which they are relatable are also given. This is in order to show the context of the dependent sentences.

Sent 410 = + Base:Phr/wd/morph - Inton: ICF

Citations of sentence 440

1) with phrase filler:

\[
[ngo3 siong2 sig4 ping5go2] + go2 go3 hung5 -ge3 - ICF
\]

[I'd like to eat an apple] 'that--classi--relative-- affix -- ICF'

([I'd like to eat] the red one).

2) with word filler:

\[
[koey3 jing4hay4 jung1yi3 yad1 yiong4 ye3] + din4oe1 - ICF
\]

[He only likes one thing:] 'car -- ICF'

([He only likes] cars).

3) with morpheme filler:

A free morpheme is also a word. Since the above example has used a word filler, the following example is one with a bound morpheme as filler of the elliptical sentence base. This usage is comparatively rare as it occurs only in talking about language, but it appears to the author that it is less rare than a comparable situation in English as the Chinese like talking about characters in order to resolve ambiguities regarding homophones and near-homophones:

---

52 This example uses an independent word. In rarer cases of citation, a dependent word could be used, analogous to the case of e.g. (3) with a morpheme filler.
[yi1 go3 ji4 hay4 'yi5noey3' -ga 'yi5-' ] + 'yi5-' - ICF

[This character is 'yi5-' as in 'yi5noey3'] 'yi5-- ICFA

([This character is] 'yi5-').

In the above example, 'yi5-' is a bound form in yi5noey3, a literary form for 'children'.

5.7.2. Elliptical imperative 420:

Sent 420 = + Base:Phr/wd/morph + ( + Imp:imppartleea - Inton:ICF) + Inton:MImp53

i.e., sentence 420 is filled by a base slot manifested by a phrase, word or morpheme and either an imperative slot filled by the imperative particle lea and a final (unmarked) intonation contour, or an intonation tagmeme manifested by a marked imperative intonation contour (falling).

Citation of sentence 420:

with imperative particle and final (unmarked) intonation:

[Pick apples] 'One hundred-classi-imperative -- ICF'

([Pick] a hundred [apples!])

53 Elson and Pickett (1965), p.60, e.g. (4): 'each tagmeme is optional, one or the other must occur but not both.'
5.7.3. Elliptical interrogative 430

As in the case of the independent interrogative sentences 5.3.3. - 5.3.3.2. dependent interrogative sentences are divided into x- types (with unmarked intonation) and y- types (with marked interrogative intonation).

In the x- types, there is an interrogative slot filled by a marked interrogative particle 3-7 viz., aa, gaa, le, me, and waa, and an unmarked final intonation contour; in the y- types there is no interrogative particle and the intonation contour is marked for interrogation.

This division also holds true for sentences 530 and 630 described in 5.8.3-5.8.3.2. and in 5.9.2. - 5.9.2.2. respectively.

5.7.3.1. Elliptical interrogative 430x

Sent 430x = + BasePhr/wd/morph + Ig:igpart - Inton:ICF

Citation sent 430x:

[ney3 siong2 jaag4 ping5go2] + go2 go3 + le - ICF

' [You want to pick apples] that--classi-- interro-- ICF'

fier gative

([Do you want to pick] that [apple?]).

54 See 5.3.3.1., 8.3.6.1. and Ch.8, fig.7.
55 It is possible to run these two types together as one type in the formula: Sent 430 = + Base:Phr/wd/morph + (Ig:igpart 3-7 - Inton:ICF) Inton:Mig

i.e., either the interrogative tagmeme manifested by interrogative particles 3-7 occurs together with the unmarked final intonation contour or the intonation tagmeme manifested by a marked interrogative intonation contour occurs (but not both). However, this analysis is not followed as the division into x- and y-types is in line with the same division in the independent interrogative sentence types.
5.7.3.2. **Elliptical interrogative 430y:**

Sent 430y = + Base:Phr/wd/morph - Inton:Mig

**Citation sent 430y:**

[ney3 siong2 jaag3 ping5go2] + go2 go3 - Mig

[you want to pick apples] 'that-classifier -- Mig'

(Do you mean) that one?)

(Do you want to pick that apple?)

5.8. **Sequential dependent sentence types 500**

5.8.1. **Sequential declarative 510:**

The sequential sentence, as stated in 5.2.5.1., is related to the independent coordinate sentence in that it contains an independent clause as filler of the base tagmeme of the sentence. The sequential sentence, however, is a context-bound sentence. The presence of the sequence tagmeme manifested by a sequence-marking connective makes it a context-bound sentence.

Sequence-marking connectives overlap in membership with some of the sentence connectives set up in 5.4. They include all the class 1 connectives (which occur in sentence 210). As these connectives are listed in 5.4., they are not re-listed here.

In addition to the connectives mentioned immediately above, the following are also sequence-marking connectives:
Sequence connectives, because they include ordinals, have open-ended membership.

Between the sequence tagmeme and the base tagmeme is a juncture tagmeme manifested by pause. Note that the phonetic exponent of the juncture tagmeme in this case (i.e., pause) is different from the phonetic exponent of the juncture tagmeme of the coordinate sentences discussed in 5.4.

The sequence tagmeme appears to be restricted to simple structures. In English, it is possible for the sequence tagmeme to appear in a complex sentence, for example, *in actual fact, if he comes, I'll go*. In Cantonese, this is most readily translated by:

'key5sad4, koey3 mow3 ley5. hay4 koey3 ley5, ngo3 hoey3'

'in fact -- he -- not -- come. If -- he -- come -- I -- go'

(In fact, he hasn't come. If he comes, I'll go).

That is to say, rather than precede the conditional clause with a sequence tagmeme, it is more natural to say the sequence tagmeme before an independent clause 'he hasn't come'. This independent clause is then linguistically related to a context in which somebody may have asked 'has he come?'

A new sentence can then begin with a new clause base and a new intonation contour.

Sentence 510 = + Seq: Seqmark/cn + Jc:pause + Base:ClInd 11/21/31/41/51 - Inton:ICF
i.e., sentence 510 is filled by a sequence slot manifested by an obligatory sequence marker (word or phrase) or a connective word, an obligatory juncture tagmeme manifested by pause, and an obligatory base slot filled by any independent declarative clause and an intonation slot filled by a final intonation contour. In citations below, the sequence tagmeme is underlined:

Citation sentence 510:

+ key5sad4 + pause + ngo3 jung1yi3 say2man1jay2 - ICF

'in actual fact— pause — I — like — children — ICF'

(In actual fact, I like children).

5.8.2. Sequential imperative 520:

Sent 520 = + Seq:Seqmark/cn + Jo:pause + Base:ClInd 12/22/32

- (+Hort:HortPhr + Base:ClInd 11/21/31/41/51) - Inton:ICF

i.e., sentence 520 is filled by a sequence tagmeme manifested by a sequence marker or connective and either a base tagmeme manifested by an independent imperative clause or a hortatory tagmeme manifested by a hortatory phrase and a base tagmeme manifested by an independent declarative clause. Finally there is an obligatory intonation tagmeme manifested by a final intonation contour.
Citations of sentence 520:

1) with imperative clause as filler of the base tagmeme:

[ney3 mow3 joey3] + gam2yiong2 + pause + ney3 hoey3 laa - ICF
(you're not guilty) 'so -- pause -- you-- go -- imperative -- ICF'
([you're not guilty] 'So, you may go!)

2) with declarative clause as filler of the base tagmeme:

+ gam2yiong2 + pause + yaw5dag1 koey3+ hoey3 - ICF
'so -- pause -- let -- him -- go -- ICF'

5.8.3. **Sequential interrogative 530:**

As in the case of elliptical interrogative sentences 430x and 430y, sequential interrogative sentences are divided into 530x (with an interrogative clause as filler of the base and unmarked intonation) and 530y (with a declarative clause as filler of the base and marked intonation).

5.8.3.1. Sentence 530x = + Seq:Seqmark/con + Jo:pause + Base:C1Ind 13/23/33/43/53
- Inton:ICF

Citation sentence 530x:

[ngo3dey4 loey3haang5] + so2yi3 + pause + ney3 gaw3m5gaw3 cin2 - ICF
[We're going on holiday] therefore-- pause-- you--have enough or--money-- ICF'
not ([We're going on holiday] Therefore, have you enough money?)
5.8.3.2. Sent 530y + Seq:Seqmark/cn + Jc:pause + Base: ClInd 11/21/31/41/51 – Inton:MIg

Citation sentence 530y:

[ngo3 ming5baa4] + key5sad4 + pause + koe3 kwaay5 – MIg
[I understand] 'in actual fact— pause — he — naughty — MIg'
([I understand] In actual fact (don't tell me) he was naughty?

5.9. Marginal dependent sentence types 600

5.9.1. Marginal declarative 610

Sent 610 = + Base: ClDep 14-38 – Inton:ICF

i.e., sentence 610 is made up of an obligatory base tagmeme filled by any dependent clause and an intonation tagmeme filled by a final intonation contour.

Citation sentence 610:

[ngo3 maa5 yi1 gey2 gaai1 ug1] + ley5 hay2 yi1 fug4 gung1 si1 – ICF
[I buy these houses] 'in order—build—clothes—company — ICF'
([I buy these houses] In order to start a clothing business).

As stated in 5.6., there is no dependent marginal imperative sentence.
5.9.2. **Marginal interrogative sentence 630:**

As in the cases of elliptical interrogative sentences (§ 5.7.3. - 5.7.3.2.) and sequential interrogative sentences (§ 5.8.3. - 5.8.3.2.), the marginal interrogative sentence 630 is divided into an x-type (with unmarked intonation) and a y-type (with marked intonation).

In the case of the x-type sentence, there is an interrogative slot filled by any interrogative particle from 3-7. There is no interrogative particle in the y-type sentence, so the intonation is marked for interrogation.

5.9.2.1. Sent 630x = + Base:ClDep 14-38 + Ig:igpart 3-7 - Inton:ICF

Citation sentence 630x: the accompanying question to which the dependent (temporal) clause is relatable is included:

\[
[\text{ney3 gey2si5 ley5}] + \text{ney3 yaw3cin2 go2jan4si2} + \text{aa} - \text{ICF}
\]

[When will you come?] *you-- rich-- at that time -- interrogative--ICF*

particle

(When will you come? When you're rich?)

5.9.2.2. Sent 630y = + Base:ClDep 14-38 - Inton:MIg

Citation sentence 630y: the accompanying question to which the dependent (relative) clause is relatable is included:

\[
[\text{bin1 did1 cin2?}] + \text{ney3 wan2dow2 -ge3} - \text{MIg}
\]

[Which money?] you-- earned-- relative -- MIg' affix

(Which money? Do you mean that which you earned?)
CHAPTER 6: The clause level

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6.1. **Definition of clause**

The clause is the level immediately below the sentence and immediately above the phrase. The definition of a clause includes the following features:

1) a clause is composed of a string of phrase tagmemes (which may include one or more clause particles); this string of tagmemes includes as an obligatory member one and only one predicate tagmeme.

2) Clauses typically, but not always, fill slots on the sentence level.

6.2. **Clause classes**

There are two classes of clauses: independent and dependent. Independent clauses can be defined as single clauses which do not contain a subordinating tagmeme among their constituent tagmemes. An independent clause is potentially an independent sentence given an intonation tagmeme filled by a final intonation contour. An independent clause can also fill the base slot(s) of an independent coordinate sentence (5.4.1. ff), the base slot of a complex sentence (5.5. ff), and the base slot of a sequential sentence (5.8. ff).

A dependent clause can be defined as a clause which has a dependent marker in the form of a subordinating tagmeme. The subordinating tagmeme may be manifested by a word, a phrase or an intonation contour.

---

\[1\] A clause may fill, say, a slot on the phrase level by having the relative level-skipping affix -ge or -ge following it. Such a clause can be said to have undergone a 'loopback'. See Elson and Pickett, (1965), pp. 84-85.

\[2\] See Ch.5, fn 28 for a different use of these terms when applied to sentence.


\[4\] See 5.2.3.
In the case of the relative clause, the subordinating tagmeme is manifested by the relative affix -go3 or -ga. The relative clause with -go3 occurs in absolute position as filler of the base tagmeme of the dependent marginal sentence (5.9.2.2.) or it occurs in included position as filler of a relative slot in non-immediate attributive position in endocentric NPhr 11 (9.8.1.). The relative clause ending in -ga occurs in included position as filler of a descriptive slot in immediate attributive position in endocentric NPhr 11 (9.8.1.).

The following are examples of independent and dependent clauses:

Independent

ney3 ley5 'you come'

Dependent

hay4 ney3 ley5, koey3 jaw4 jaw2 'if you come, he will go'

Here, the dependent (conditional) clause is underlined and the dependent word has a double underline. The subordinating tagmeme is the slot filled by the dependent conditional word hay4 'if'. In the following example, the dependent tagmeme is manifested by a rising intonation contour:

ney3 ley5 + rising intonation, koey3 jaw4 jaw2 'if you come, he will go.'

6.3. Independent minimal clause types and clause nuclei

There are three independent minimal clause types: transitive, intransitive and equative. These three clause types contrast with each other through
the tagmemic structure of their nuclei.

A tagmeme is considered nuclear if it is obligatory to the independent minimal clause type in which it occurs, though not all nuclear tagmemes are obligatory. (See Longacre, (1964), p.84). The nucleus of a clause type consists of the obligatory minimum tagmemes of the clause type plus such optional tagmemes which are still available as terms of reference from the wider verbal context if they are left out of an immediate utterance. In other words, these elements which are left out in a certain utterance, but which are still known to the interlocutors, must have occurred earlier in the verbal context in order to be optional in the clause. It is thought best to treat such elements as being nuclear to the clause.

An example will illustrate this point: in the transitive clause, both subject and object tagmemes are optional because a transitive clause may consist of just a predicate tagmeme manifested by a transitive verb phrase, such as *sig4gan2 'he is eating (something)*. Such a clause would be accepted in a wider verbal context in which the subject as well as the object had been identified and this clause could be related to something which had gone on before. For instance, it could be a response to 'has (the aforementioned subject) finished eating?' This answer would then mean that the subject was still in the process of eating. Out of the verbal context, taken in isolation, the clause would not be accepted as being complete but would need both subject and object tagmemes. In that it is grammatically possible to exclude these tagmemes in a relatable clause (as in the example just cited), these tagmemes are regarded as being optional, but in that they are obligatory to the clause in isolation, they are regarded as being nuclear to the clause. In the case of the transitive clause, there is a further criterion for regarding these tagmemes as being nuclear, viz. they are affected by transformations, in this case from active to passive.
Non-nuclear tagmemes are peripheral tagmemes and are always optional to the independent clause type in its minimum form. By definition, therefore, all dependent tagmemes are peripheral on the following counts:

1) they do not occur in independent clause types

2) they are not, therefore, part of the minimum obligatory tagmemes of the independent clause type.

In actual clause type selection, however, peripheral tagmemes may be obligatory. For instance, an independent interrogative clause type (see 6.6.1.5.) selects an obligatory interrogative tagmeme, but the interrogative tagmeme is not, by being an obligatory selection, part of the clause nucleus of either the transitive, intransitive or equative clause type.

In actual clause type selection we are dealing with clause types which are necessarily non-minimal, thus requiring obligatory (but peripheral) tagmemes. These peripheral tagmemes are not required for the independent minimal clause types which include only nuclear tagmemes.

An alternative treatment of the transitive and intransitive clauses and verbs would be to consider the transitive verb capable of functioning in an intransitive clause. That is to say, a transitive verb has the potentiality of occurring in a clause which has an object, whereas an intransitive verb never does occur with an object.

There is, however, no advantage to this kind of treatment. With the present analysis, the criteria of transitivity and intransitivity are clearly diagnostic:

a transitive verb at clause level may or may not have an object tagmeme;

an intransitive verb at clause level may not have an object tagmeme.

The statement about the transitive verb is a better one than one which says that when the object tagmeme does not occur the transitive verb occurs in an intransitive clause.
In the present analysis, the clause in which the transitive verb occurs (optionally minus object tagmeme) is still considered transitive because of the expansion potential at clause level to include an object tagmeme. Having the object tagmeme as a wider term of reference in the transitive clause, it is possible to include passive transform potential in the transitive clause. This distinguishes further transitive clause (with optional object tagmeme) from intransitive clause (without object tagmeme but with optional nominal complement tagmeme) in that the intransitive clause does not have this passive transform potential.

In this analysis, therefore, clause types and predicate fillers are kept parallel:

- transitive clause with transitive predicate filler
- intransitive clause with intransitive predicate filler
- equative clause with equative predicate filler

The three clause nuclei are set out below:

1) Cltr Nu = + S:NPhr + Pt:VtPhr ± 0:NPhr
2) Cl i Nu = + S:NPhr + Pi:ViPhr ± Comp:NPhr
3) C eq = + S:NPhr + Peq:AdjPhr ± Comp:NPhr

These three clause types, as said earlier, contrast with each other in the tagmemic structure of their nuclei. The main item of contrast appears to lie in the manifestation of the predicates, being transitive and intransitive verb phrases and an equative phrase respectively.

---

5 A discussion of an emic subdivision of these two emic intransitive clause types follows shortly (on p. 148).
Further, in the case of the transitive and intransitive clauses there is the inclusion of an object tagmeme in the former (with passive transform potential)⁶ and obligatory absence of an object in the latter (with no passive transform potential).

Within the intransitive clause type there is an emic subdivision of clause types into two clause types which contrast with each other in the filler of the intransitive predicate tagmeme. The first emic intransitive clause type has an intransitive predicate tagmeme which is minimally filled by intransitive verb word 12, a verb which does not allow a complement tagmeme to follow it in the clause.⁷ This emic intransitive clause type can be called the E-type. The second emic intransitive clause type has an intransitive predicate tagmeme which is minimally filled by intransitive verb words 13a and 13b, which allow an optional complement tagmeme to follow them in the clause. This emic intransitive clause type can be called the F-type.

A further subdivision of the F emic intransitive clause type is discussed in 8.3.4. This sub-division is mentioned here but not gone into fully as it is an etic, not an emic division. Those F-type intransitive predicates which are minimally filled by intransitive verb word 13a can permit a re-ordering of the optional complement tagmeme so that it occurs before the predicate tagmeme; those F-type intransitive predicates which are minimally filled by intransitive verb word 13b do not permit this re-ordering.⁷

The two emic intransitive types are named E and F types (See 6.6.2. ff).

A note on intransitive clause type F should be made here. This kind of clause at first glance appears to be a transitive clause because it seems

⁶ See 1.3 for a brief discussion of adaptations in tagmemics in the light of transformational theory.
⁷ See 10.10.5.1 where this is discussed at word level.
to have a transitive predicate followed by a direct object, as in *ngo3 hoo3 jib3 cei³ 'I'm going to meet the train'. But the noun phrase cei³ 'train', which in English would be a direct object, is here treated as a nominal complement to an intransitive verb phrase. The reason for doing so is that such a clause, unlike a true transitive clause, cannot be transformed into a passive clause. In English it is possible to say, 'the train is going to be met by me' but it is not possible to say it in Cantonese.

Similarly, the equative clause type is also subdivided into emic clause types partly paralleled by the subdivision of the intransitive clause type. The two subdivisions of the equative clause type are also named E and F types (see 6.6.2.).

Equative clause type E is minimally filled by any adjective word except the comparative adjective word 4i (10.10.1.2.). No complement tagmeme may follow the equative predicate in the E clause type.

Equative clause type F is minimally filled by the comparative adjective word 4i and may be optionally followed by a complement tagmeme; this complement may not be reordered at clause level.

6.4. Extent of analysis on the clause level

In Chapter 6, emic independent and dependent clause classes and clause types are presented. In Chapter 7, the emic passive clause classes and clause types (which are derived from the transitive active clause classes and types) will be presented. In Chapter 8, etic variants of emic clause classes and clause types will be presented and discussed.

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8 Not to be confused with jib3 meaning 'receive (a letter, etc.,)' which is treated as a transitive verb - a different verb altogether, since it occurs in clauses with transform potential.

8a In the formulae in 6.6.3.1.-6.6.3.12., fillers of the equative predicate slot in the E clause type is notated 'AdjPhr'. This means that any adjective word except adjective word 4i may minimally fill the equative predicate slot.
6.5. Clause level matrix

The main division on the clause level, vis., independent clause class versus dependent clause class (6.2.) is shown in the clause level matrix.

Within the independent clause class, two parameters are displayed: vis., transitivity, intransitivity and equation versus declarativity, imperativity and interrogation.

Within the intransitive and equative clause types the emic division into E and F clause types (discussed in 6.3.) is incorporated and displayed in the matrix.

Further emic (in so far as they constitute obligatory choice at clause level) subdivisions are displayed: declarative, imperative and interrogative clause types exhibit polarity (see 5.2.5.1.), i.e., affirmation and negation.

Within the dependent clause class, the parameter displaying transitivity, intransitivity and equation is retained, but the other parameter of the independent clause is replaced by one which displays both polarity and whether the clause is conditional, purposive, causative, temporal or relative.

Two kinds of purpose clause are shown: personal purpose and impersonal purpose (numbered a1, b1). There are four lacunae since there are no equative purpose clauses.

The personal purpose clause is called 'personal' because a person is involved for whom some action is performed. An alternative analysis would be to label such a clause a benefactive clause. However, since this kind of clause is clearly related to the impersonal purpose clause (which cannot be viewed as being benefactive in function), the present term 'personal purpose' has been chosen.
### Independent and dependent clause matrix, fig.5.

<table>
<thead>
<tr>
<th>Clause class</th>
<th>Clause type</th>
<th>Declarative O1</th>
<th>Imperative O2</th>
<th>Interrogative O2</th>
<th>Conditional O4</th>
<th>Per Purp O5</th>
<th>Imper Purp O5</th>
<th>Causative O6</th>
<th>Temporal O7</th>
<th>Relative O8</th>
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<tr>
<td></td>
<td>Trans 10</td>
<td>Intrans 20E</td>
<td>Intrans 20P</td>
<td>Eq 30E</td>
<td>Eq 30P</td>
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<td>21Fa</td>
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<td>21Fb</td>
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</tbody>
</table>
6.6. **Independent clause types**

Note: from this section onwards the clause nuclei of the transitive, intransitive and equative clause types are no longer the main topic of discussion. Hereafter, obligatory tagmemes include peripheral tagmemes which are obligatory to individual clause selection, and these are not considered nuclear to any of the three minimal clause types set up in 6.3.

6.6.1. **Transitive clause types**

6.6.1.1. Cl 11a = + S:NPhr + P:VtPhr ± 0:NPhr

Citation Cl 11a: `maa3 sig4 gug1'
'horse -- eat -- grain'
(The horse eats grain).

6.6.1.2. Cl 11b = + S:NPhr + Neg:NegPhr + P:VtPhr + 0:NPhr

Citation Cl 11b: `maa3 m5hang2 sig4 gug1'
'horse -- won't -- eat -- grain'
(The horse won't eat grain).

6.6.1.3. Cl 12a = + P:VtPhr ± 0:NPhr + Imp:imppart

Citation Cl 12a: `sig4 sung3 laa'
'eat -- meat/vegetables -- imperative'
(Do eat something else (besides rice)!)

6.6.1.4. Cl 12b = +Neg:NegPhr + P:VtPhr + 0:NPhr + Imp:imperat

Citation Cl 12b: m5how2 sig4 maaW1 aa
'don't -- eat -- cat -- imperative'

(Don't eat the cat!)

6.6.1.5. Cl 13a = + S:NPhr + P:VtPhr + 0:NPhr + Ig:igpart

Citation Cl 13a: maaW1 joey1 gaw2 aa
'cat -- chase -- dog -- interrogative'

(Does the cat chase the dog?)

6.6.1.6. Cl 13b = + S:NPhr + Neg:NegPhr + P:VtPhr + 0:NPhr + Ig:igpart

Citation Cl 13b: gaw2 m5hang2 joey1 maaW1 aa
'dog -- won't -- chase -- cat -- interrogative'

(Won't the dog chase the cat?)

6.6.1.7. Alternative treatment of the foregoing section

An alternative treatment of the foregoing section would be to merge Clause 11 and Clause 13 as one clause type, since the only overt difference between them is the interrogative particle in Clause 13. The difference between them can then be handled at sentence level, where interrogation is already established as a category.
This point ties up with the problem discussed in 5.5.3. in connection with whether Sentence 330y and Sentence 310 should not be treated as essentially the same sentence type differing only in intonation contour.

Merging the two clause types, viz., 11 and 13, together would have the disadvantage of contradicting the present treatment of grammatically unmarked and marked intonation contours in relation to the sentence (see 5.3.3 - 5.3.3.2; 5.4.3 - 5.4.3.2; 5.5.3 - 5.5.3.2).

At clause level Clause 11 is a declarative clause type; Clause 13 is an interrogative clause type. At sentence level, Clause 11 fills the base slot of either declarative sentence 310 (together with an unmarked final intonation contour) or interrogative sentence 330y (together with a marked interrogative intonation contour). This treatment results in two different sentence types, viz., declarative and interrogative respectively, being formed from the same Clause 11 as base filler.

Clause 13, however, fills the base slot of interrogative sentence 330x, together with an unmarked final intonation contour to form an interrogative sentence.

6.6.2. Exemplification of Intransitive clause types 20E and 20F and Equative clause types E and F

Since intransitive E and F clause types are different in the filler of the predicate slot in so far as it involves a different choice of verb class which then determines whether an optional complement tagmeme may follow or not (see 6.3.), it has been decided to illustrate both these clause types only in the declarative clause. Thereafter, only the E-type
clause is exemplified to avoid unnecessary repetition. It need only be borne in mind that the fillers of the predicate tagmemes in the E-type clause and the F-type clause involve a different kind of verb phrase in each case.

The same procedure is followed in the case of the equative E and F clause types for the same reasons stated for the intransitive clause types.

6.6.2.1. Cl 21Ea = + S:NPhr + P:Vi12Phr

Citation Cl 21Ea: yan5 sey2
'man -- die'
(men die).

6.6.2.2. Cl 21Fa = + S:NPhr + P:Vi13Phr + Comp:NPhr

Citation Cl 21Fa: koey3 wuy3 jib3 ce1
'he -- will--meet -- vehicle'
(He will meet the train).

6.6.2.3. Cl 21Eb = + S:NPhr + Neg:NegPhr + P4Vi12Phr

Citation Cl 21Eb: ngo3 m5ho2yi3 wan2sig4
'I -- cannot -- seek a living'
(I can't seek my living).
A note must be made here that the intransitive 13b verbs hay4 'is, etc.' yaw3 'has, etc.' and mow3 'doesn't have, etc.' do not occur in imperative clause types. Clauses like 'be a man!' and 'have it!' would employ different verbs from hay4 and yaw3 in Cantonese. Intransitive 13b verbs are discussed at word level in 10.10.5.1. and 10.10.5.1.3.
6.6.2.7. Cl 23\text{Eb} = \dagger \quad S:\text{NPhr} + P:\text{Vi12Phr} + Ig:\text{igpart}

Citation Cl 23\text{Eb}: \quad ngo3dey4 \quad yam2sing3 \quad le?

'We -- drink a toast -- interrogative'

(Shall we drink a toast?)

6.6.2.8. Cl 23\text{Eb} = \dagger \quad S:\text{NPhr} + \text{Neg:NegPhr} + P:\text{Vi12Phr} + Ig:\text{igpart}

Citation Cl 23\text{Eb}: \quad low3daw4 \quad m5hang2 \quad wan2sig4 \quad aa?

'father -- won't -- seek a living -- interrogative'

(Won't a father seek a living?)

6.6.3. \underline{Equative clause types} 30

6.6.3.1. Cl 31\text{Eb} = \dagger \quad S:\text{NPhr} + P:\text{AdjPhr}

Citation Cl 31\text{Eb}: \quad koe3y \quad fey5

'he -- fat'

(He's fat).

6.6.3.2. Cl 31\text{Eb} = \dagger \quad S:\text{NPhr} + \text{Neg:NegPhr} + P:\text{AdjPhr}

Citation Cl 31\text{Eb}: \quad koe3y \quad m5hang2 \quad fey5

'he -- won't -- fat'

(He won't get fat).
6.6.3.3. Cl 31Fa = + S:NPhr + P:Adj41Phr + Comp:NPhr

Citation Cl 31Fa: koey3 fey5go3 ngo3

'he -- fatter -- I'

(He's fatter than me).

6.6.3.4. Cl 31Fb = + S:NPhr + Neg:NegPhr + P:Adj41Phr + Comp:NPhr

Citation Cl 31Fb: koey3 m5bang2 fey5go3 ngo3

'he -- won't -- fatter -- I'

(He won't get fatter than me)

6.6.3.5. Cl 32Ea = + Ma:Adj43aPhr + P:AdjPhr + Imp:imppart

Citation Cl 32Ea: faay3did1 fey5 aa

'quicker -- fat -- imperative'

(Get fat quickly!)

Note that imperative clause 32a has an obligatory manner tagmeme. This manner tagmeme is optional in the negative clause described below:

6.6.3.6. Cl 32Eb = + Ma:Adj43aPhr + Neg:NegPhr + P:AdjPhr + Imp:imppart

Citation Cl 32Eb: faay3did1 m5how2 kwaay5 aa

'quicker -- don't -- naughty -- Imperative'

(Quickly stop being naughty).

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9 See Ch.10, fn 27.
6.6.3.7. Cl 32Fa = + Ma:Adj43aPhr + P:Adj41Phr Comp:NPhr + Imp:i mppart

Citation Cl 32Fa: faay3did1 gow1go3 koey3 aa
'quicker — taller — he — imperative'
(Quickly get taller than him!)

6.6.3.8. Cl 32Fb = + Ma:Adj43aPhr + Neg:NegPhr + P:Adj41Phr Comp:NPhr Imp:imppart

Citation Cl 32Fb: faay3did m5how2 gow1go3 koey3 aa
'quicker -- don't -- taller -- he -- imperative'
(Quickly stop getting taller than him!)

6.6.3.9. Cl 33Ea = + S:NPhr + P:AdjPhr + Ig:igpart

Citation Cl 33Ea: ney3 baaw2 maa?
'you — full — interrogative'
(Are you full?)

6.6.3.10. Cl 33Eb = + S:NPhr + Neg:NegPhr + P:AdjPhr + Ig:igpart

Citation Cl 33Eb: koey3 m5ho2nang5 baaw2 aa?
'he — can't — full — interrogative'
(Can't he get full?)
6.6.3.11. Cl 33Fa = + S:NPhr + P:Adj41Phr + Comp:NPhr + Ig:igpart

Citation Cl 33Fa: ney3 baaw2go3 koey3 aa

'you -- fuller -- he -- interrogative'

(Are you fuller than him?)

6.6.3.12. Cl 33Fb = + S:NPhr + Neg:NegPhr + P:Adj41Phr + Comp:NPhr + Ig:igpart

Citation Cl 33Fb: ney3 m5ho2nang5 baaw2go3 koey3 aa

'you -- can't -- fuller -- he -- interrogative'

(Can't you be fuller than him?)

6.7. Dependent clause types

In 6.2. a dependent clause was defined as a clause which had a dependent marker in the form of a subordinating tagmeme. Further, a dependent clause may 1) combine with an independent clause to form an independent complex sentence (5.2.5.1); 2) fill the base tagmeme of a dependent sequential or marginal sentence (5.2.5.1); and 3) fill a slot on the phrase level. The filler of a phrase level slot is always a relative clause downgraded to fill a relative slot in the endocentric noun phrase (9.8.1.).

6.7.1. The dependent marker

It has been seen (in 6.2.) that the dependent tagmeme in a dependent clause can be manifested by a dependent word or by a marked intonation contour,
but not both together. The marked intonation which acts as a subordinating
tagmeme is a rising intonation contour, and it only operates in the dependent
conditional clause.

In other dependent clauses, the dependent tagmeme is manifested either by
a dependent word alone, or, (in the case of the dependent relative clause),
by a dependent relative affix -ge3 or -ga (see 6.2.). In the dependent personal
purpose clause, the dependent tagmeme is manifested by a dependent phrase (see
6.7.1. e.g. (3) below).

An example of a marked intonation contour acting as the dependent marker
of a dependent conditional clause has already been given in the general
discussion of independent and dependent clauses in 6.2. and is not further
exemplified here, but the two kinds of segmental dependent tagmeme as
manifested by dependent word, relative affix and personal purpose phrase will
be further exemplified below:

6.7.1. Manifestation of the dependent tagmeme by a dependent word or phrase

The examples of dependent clause shown below are a dependent conditional
clause, a dependent temporal clause and a dependent personal purpose clause
respectively. The dependent word or phrase is underlined. The dependent clause
minus the dependent word or phrase is an independent clause.

1) hay4 ney3 ley5 [ngo3 jaw4 jaw2]
   *'if —you —come [ I will go]' ([If you come, I will go]).

2) baa5baa1 sey2 ge1jan4si2 [koey3day4 taw1 how2 do1 ye3]
   'Daddy — die — at that time[they stole many things]'
   (When Daddy died,[they stole many things]).

3) In the following example, the dependent marker is the personal purpose phrase
   bey2/tun5 plus noun phrase, noun or pronoun 'for the purpose of (doing something)
   for somebody' (see 9.16.)
   [ngo3 bowi sooey2] tun5 koey3
   'I boil water [in order to (and) for him
   wash — face'
   ([I boil water] in order to wash his face for him).
6.7.1.2. **Manifestation of the dependent tagmeme by the dependent relative affix** -ge3, -ga

1) [yi1 did1 hay4 ney3ga cin2] ney3 wan2faan1 ley5 -ge3.

[This is your money] *(It is) that which you've earned*.

2) [ngo3 tay2dow2] haang5jo2 hoey3 go2dow4 - ga [yan5]

*I saw the man* **who had walked away there.**

As in the case of the dependent clause subordinated by a dependent phrase or word, the dependent clauses become ordinary independent clauses if the dependent relative affix is removed.

6.8. **Format for the dependent clause types**

In the rest of this chapter, the tagmemic formulae for the dependent emic clause types are presented and illustrated with examples of each clause type.

As in the treatment of the independent clauses (6.6.2.), in the case of the intransitive clause types, both E and F types are presented and illustrated once (in the conditional clause type) but not throughout the matrix as it involves merely listing an additional optional complement tagmeme to the clause.

The independent clause which forms part of the larger construction of sentence with the dependent clause is included within square brackets in at least one of the citations for each clause type. The dependent tagmeme is underlined. If the 'independent clause is left out, its presence is denoted
by a dotted line preceding or following the dependent clause.
Both positive and negative clause types are collapsed into one clause
formula for purposes of economy wherever possible.

6.8.1. **Transitive clause types**

6.8.1.1. **Transitive conditional**

$$\text{Cl 14} = (\text{Cond:}on \text{ Inton:R})^{10} + \text{Nu:ClInd 11a-11b}$$

Citations of Cl 14:

1) hay4 koey3 maay3 coy3 [ ngo3 maay3 yug4]
   'if -- he -- buy --vege- [ I will buy meat]
   tables

2) koey3 maay3 coy3 - RInton [ ngo3 maay3 yug4 ]'
   he -- buy -- vegetable--RInton [I will buy meat ]'
   (If he buys vegetables [I will buy meat]).

6.8.1.2.1. **Cl 15a = + Purp:PurpPhr + Nu:ClInd 11a**

Citation Cl 15a: [gung1yan5 ley5] tung5 ney3 say2 saam1
   'The servant comes] for-- you-- wash--clothes'
   ([The servant comes] to wash clothes for you).

---

10 Elson and Pickett, (1965), p.60, e.g.(4). One of the tagmemes
within the brackets is optional; one of the tagmemes must occur,
but not both. See 6.7.1.
6.8.1.2.2. Cl 15b = + Neg:NegPhr + Nu:ClPurp 15a

Note that unlike the other dependent negative clauses, the nuclear tagmem of the negative purpose clause is not filled by an independent clause but by the positive purpose clause. This is why a separate formula is given for the negative purpose clause whereas the other dependent negative clauses are collapsed into a single formula with the positive clauses.

Citation Cl 15b: [ngo3 oeng2 gung1yan5] m5hay4 tung5 nev3 say saaml
'I engage a servant not--for--you--wash--clothes'
([I engage a servant not for the purpose of washing clothes for you.])

6.8.1.3. Transitive impersonal purpose 15:

6.8.1.3.1. Cl 15a1 = + Purp:on + Nu:ClInd 11a

Citation Cl 15a1 : [koey3 yung4 bow] ley5 bow faan4
'[He uses a pot] in order--boil--rice'
([He uses a pot in order to boil rice].)

In actually selecting the tagmemes of the clause nuclei of all the personal and impersonal purpose clauses, the subject tagmem is obligatorily absent in each case.
6.8.1.3.2. Cl 15b1 = + Neg:NegPhr + Nu:Cl15a1

Citation Cl 15b1: [ngo3 maay3 bow1] m5hay4 ley5 bow1 faan4

'[I buy a pot] not-- for--boil--rice'

([I buy a pot] not for the purpose of boiling rice).

6.8.1.4. Transitive causative 16:

Cl 16 = + Ca:cn + Nu:ClInd 11a-11b

Citation Cl 16: [ney3 gwuy4] yan1way4 ney3 yung4 co5taw5

'[you're tired] because-you--use--hoe'

([You're tired] because you use a hoe).

6.8.1.5. Transitive temporal 17:

Cl 17 = NuClInd 11a-11b + Temp:on

Citation Cl 17: sin1saang1 daa2gan2 hog4sang1 go2jan1si2 [daay4sin1saang1 ley5]

'teacher--beating--pupil--at that time[the headmaster arrived]

(When the teacher was beating the pupil

[the headmaster arrived])

6.8.1.6. Transitive relative 18:11

The relative clause with -ge3 is demonstrated once with the context in brackets, but thereafter is demonstrated with -ga only as the included clause is more easily shown related to a context.

11 See 6.2. for the occurrence of the relative affix -ge3 or -ga. See also 9.7.
Cl 18 = + Nu:ClInd 11a-11b + Rel:relaf -ge3/ga

Citations of Cl 18:

1) [koey3 jio3 saaml] ney3 coey5jo2 -ge3
   [He puts on some clothes] 'you --take off-- relative'
   [He puts on some clothes] (that which you'd taken off).

2) [koey3 say2] ney3 coey5jo2 -ga [saam1].
   '[he washes] you--taken off -- relative[clothes]'
   (He [washes the clothes] which you have taken off).

6.8.2. Intransitive clause types 20

6.8.2.1. Intransitive conditional 24:

6.8.2.1.1. Cl 24E = (+ Cond:on + Inton:R) + Nu:ClInd 21Es-21Eb

Citations of Cl 24E:

1) how2ci3 ney3 ley5 [nge3 hoey3]
   'if -- you-- come [I go ]'
   (If you come, [I'll go]).

2) ney3 ley5 - RInton........
   'you-- come -- RInton........'
   (If you come......)
6.8.2.1.2. \( \text{Cl} \, 24F = (+ \text{Cond}:en \quad + \text{Inton}:R) + \text{Nu}:\text{ClInd} \, 21\text{Fa} - 21\text{Fb} \)

Citations of \( \text{Cl} \, 24F \):

1) \text{how2ci} \text{3 ney3 jib3 ce1 [ngo3 m5daam1sam1]}
   'if -- you-- meet--vehicle [I won't worry]'
   (If you meet the train [I won't worry]).

2) \text{ney3 jib3 ce1 - RInton.}
   'you-- meet--vehicle-- RInton."
   (If you meet the train.....)

6.8.2.2. Intransitive personal purpose 25:

6.8.2.2.1. \( \text{Cl} \, 25a^{12} = +\text{Purp:RurpPhr} + \text{Nu}:\text{ClInd} \, 21a \)

Citation Cl 25a:

[ngo3 hey2 ting5] bey2 van5 taw2liong5
'I build pavilion] for -- people--rest in the shade'
([I build a pavilion] for people to rest in the shade).

6.8.2.2.2. \( \text{Cl} \, 25b = + \text{Neg:NegPhr} + \text{Nu}:\text{Cl} \, 25a \)

Citation Cl 25b:

[ngo3 hey2 ting5] m5hay4 bey2 van5 taw2liong5
'I build pavilion] not -- for --people--rest in the shade'
([I do not build a pavilion] for people to rest in the shade).

---

\(^{12}\) As stated in 6.8. this implies both E and F intransitive types.
6.8.2.3. Intransitive impersonal purpose 25:

6.8.2.3.1. Cl 25a1 = + Purp:cn + Nu:ClInd 21a

Citation Cl 25a1:

[ngo3 ley5 san1faw4] ley5 sig4fung1
'I come to Penang in order to--take a holiday'

6.8.2.3.2. Cl 25b1 = + Neg:NegPhr + Nu:Cl 25a1

Citation Cl 25b1:

[ngo3dey4 loey3haang5] m5hay4 ley5 sig4fung1
'we travel not -- in order to--take a holiday'
(We travel not for the purpose of taking a holiday).

6.8.2.4. Intransitive causative 26:

Cl 26 = + Ca:cn + Nu: ClInd 21a-21b

Citation Cl 26:

[ney3 yaw1saw5] yan1way4 koey3 sey2jo2
'You're worried because -- he -- died'
(You're worried because he died).
6.8.2.5. Intransitive temporal 27:

\[ \text{Cl} 27 = + \text{Nu:ClInd} 21a-21b + \text{Temp:en} \]

Citation Cl 27:

\[ \text{maa3 paaw2gan2 go2jan4si2} [\text{koe3g3 glog3 tuen3}] \]

'horse-- galloping-- at that time [his leg broke]'  
(When the horse was galloping [his leg broke]).

6.8.2.6. Intransitive relative 28:

\[ \text{Cl} 28 = +\text{Nu:ClInd} 21a-21b + \text{Rel:relaf - ge3/} \]

Citation Cl 28:

\[ [\text{ngo3 jung1yi3} \text{ney3 gong1 -ge3} [\text{sued3wa4}] \]

'[I like you -- speak -- relative [words]!  
([I like the advice] which you give).

6.8.3. Equative clause types 30

6.8.3.1. Equative conditional 34:

6.8.3.1.1. Cl 34E = (+ Cond:on + Inton:R) + Nu:ClInd 34Ea-34Eb

Citations of Cl 34E:

1) \[ \text{ney4 ney3 gwaay1} [\text{ngo3 m5daa2 ney3}] \]

'if -- you -- good [I won't smack you]'  
(If you're good, [I won't smack you]).
2) ney3 kwaay5 - Rinton.

'y you — naughty - Rinton.

(If you're naughty.)

6.8.3.1.2. Cl 34F = (+ Cond:cn + Inton:R) + Nu:Cl 31Fa - 31Fb

Citations of Cl 34F:

1) hay4 ney3 fey3go3 koey3 [m5how2 gaag3ngaam2 jio3 koey3ga saam1]

'if -- you-- fatter -- he [don't struggle into his clothes]

(If you're fatter than him, [don't struggle into his clothes]).

2) ney3 gow1go3 koey3 - Rinton [ney3 jaw4 jow4 daay4low2].

'y you -- taller -- he - Rinton [you can be his elder brother].

(If you're taller than him [you may be considered his elder brother]).

6.8.3.2. Equative causative 36:

Cl 36 = + Ca:cn + Nu:ClInd 31a-31b

Citation Cl 36:

[ngo3 bong1 ney3] van1way4 ney3 low3

'[I help you] because -- you -- old'.

([I help you] because you're old).
6.8.3.3. Equative temporal 37:

Cl 37 = + Nu: ClInd 31a-31b + Temp:on

Citation Cl 37:

ney3 fey5 go1jan4s12 [ney3 leng3]
'you -- fat -- at that time [you are beautiful]' (When you were fat [you were beautiful]).

6.8.3.4. Equative relative 38:

Cl 38 = + Nu: ClInd 31a-31b + Rel:relaf -ge3/-ga

Citation Cl 38:

[yan5dey4 maay3] fey5gan2 -ga [jue1]
'[Others buy ] getting fat --relative [pig ]'
([Some people buy pigs] that are getting fat).

13 Plumpness is considered a point of beauty by many Chinese.
CHAPTER 7: Emic passive clause types

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7.1. **Active and passive**

The transitive clause types dealt with in Chapter 6 were all active clauses. These transitive clauses have a passive transform potential (see 6.3.) in that they can either (a) undergo a change in the order of tagmemes or (b) undergo a change in the order of tagmemes with the addition of an agent marker bey2, to form two kinds of passive clause. The passive clauses, therefore, can be said to be derived from the active clause type; like the active clause types, passive clause types can be either independent or dependent.

7.2. **Personal and impersonal passive clause types**

In 7.1, it was seen that one kind of passive transformation undergone by the active clause was change in the order of tagmemes alone so that the object tagmeme of the active clause corresponded to the subject tagmeme of the passive clause (see fn 1). In this kind of passive clause, there is no tagmeme present which corresponds to the subject tagmeme of the active clause. This kind of passive clause is called an **impersonal clause type**. An example of such a clause type is sung3 sig4saay3 'the meat and vegetables were all eaten (by somebody)', which is derived from the active clause koey3 sig4saay3 sung3 'he ate all the meat and vegetables'. The verb is always aspected in the impersonal clause type.

In 7.1, it was also seen that an active clause could undergo a change in the order of tagmemes plus the addition of an agent marker bey2

---

1. The object tagmeme of the active clause corresponds to the subject tagmeme of the passive clause.
2. The object tagmeme of the active clause then corresponds to the subject tagmeme of the passive clause and the subject tagmeme of the active clause corresponds to the agent tagmeme of the passive clause.
3. See 7.2.
4. See 1.4. and 5.2.2. See also Ch.5, fn 11.
to form another kind of passive clause. In this kind of passive clause, the subject tagmeme of the active clause corresponds to the agent tagmeme of the passive clause. This kind of passive clause, which has an agent (which must occur together with the agent marker bey2), is called a personal clause type. An example of such a clause type is ngo3 bey2 gaw2 ngaaw3 'I am bitten by the dog.'

7.3. **Structural ambiguity in the impersonal clause**

A note must be made here to explain the structural ambiguity of certain impersonal passive clauses. In the example cited above in 7.2, sung3 sig4saaay3, there is no ambiguity, as sung3 'meat and vegetables' cannot but be eaten. In other words, sung3 cannot eat.

However, there are other cases where the impersonal passive clause is identical in occurrence to an active transitive clause which has as a filler of its predicate tagmeme a verb with a perfective aspect affix and whose object tagmeme is optionally absent because it is known in the wider verbal context. In such cases the criterion for deciding that there are two structures instead of one is the different expansion and transform potentials of the two kinds of clauses.

An example will clarify this section: the clause maaaw1 sig4saaay3 could mean either 1) 'the cat has eaten (it) all up' or 2) 'the cat has been eaten up' (since the Chinese do eat cats). In this case, if the clause has the first meaning then it has first of all the potential expansion of inclusion of an object tagmeme to become a clause like

---

^5 bey2 in this clause must be distinguished from bey2 (written with the same character and traditionally identical) meaning 'permit'. The second bey2 'permit' occurs in a similar-looking, though grammatically different context, viz., a sentence filled by two independent clauses: ngo3 bey2 gaw2 ngaaw3 yan5 'I allow(it); the dog bites people.' The first clause ngo3 bey2 is an intransitive clause and the second gaw2 ngaaw3 yan5 is a transitive active clause. This kind of sentence (coordinate sentence 212) is dealt with in 5.4.1.3.
The personal clause nucleus has among its nuclear tagmemes an optional subject tagmem e which can be left out if it is known to the interlocutors in the wider verbal context. It is still, however, considered
nuclear in spite of its being optional to the clause since it takes part in transformations from active to passive and vice versa.\textsuperscript{6} The personal clause nucleus is presented below in the formula:

\[
\text{PerCl} = \text{S:NPhr} + \text{Agmark:bev2} + \text{Ag:NPhr} + \text{P:VtPhr}
\]

i.e., the personal clause nucleus is filled by an optional subject slot manifested by a noun phrase, an obligatory agent marker tagmeme manifested by bev2, an obligatory agent tagmeme manifested by a noun phrase and an obligatory predicate tagmeme manifested by a transitive verb phrase.

7.5. **Independent and dependent passive clause matrix**

In 7.1 it was mentioned that passive clause types could be both independent and dependent. The matrix for the passive clause types is set out below. It must be noted that there are altogether eight lacunae in the matrix: there are no passive imperative clause types and there are no passive purpose clause types. (Impersonal and personal purpose clause types - see Ch.6, fig.5 - are subsumed in the following matrix under one heading: purpose).

It must be borne in mind that the passive clause types are derived only from the transitive (active) clause types 10 dealt with in Ch.6, although in numbering the personal passive clauses 40 and the impersonal passive clauses 50, I have followed on from the equative clause types 30.\textsuperscript{7}

---

\textsuperscript{6} See 6.3.

\textsuperscript{7} It has been decided not to include the passive clause types in the matrix (Ch.6, fig.5) dealing with the transitive (active) clause types 10, the intransitive clause types 20E and 20F and the equative clause types 30, because of the differences in dimensions between the passive clause types and the former set of clause types. Rather than confuse the picture, it has been decided to deal with the passive clauses separately even though it shows less clearly in this form the correspondence between the passive clause types (40 series & 50 series) and the active clause types (10 series).
### Independent and dependent passive clause matrix, fig. 6.

<table>
<thead>
<tr>
<th>Clause classes</th>
<th>Clause types</th>
<th>Personal 40</th>
<th>Impersonal 50</th>
</tr>
</thead>
<tbody>
<tr>
<td>Independent</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Declarative</td>
<td>Pos01a</td>
<td>41a</td>
<td>51a</td>
</tr>
<tr>
<td></td>
<td>Neg01b</td>
<td>41b</td>
<td>51b</td>
</tr>
<tr>
<td>Imperative</td>
<td>Pos02a</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Neg02b</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Interrogative</td>
<td>Pos03a</td>
<td>43a</td>
<td>53a</td>
</tr>
<tr>
<td></td>
<td>Neg03b</td>
<td>43b</td>
<td>53b</td>
</tr>
<tr>
<td>Conditional</td>
<td>Pos04a</td>
<td>44a</td>
<td>54a</td>
</tr>
<tr>
<td></td>
<td>Neg04b</td>
<td>44b</td>
<td>54b</td>
</tr>
<tr>
<td>Purpose</td>
<td>Pos05a</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Neg05b</td>
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</tr>
<tr>
<td>Dependent</td>
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<tr>
<td>Causative</td>
<td>Pos06a</td>
<td>46a</td>
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<td>Relative</td>
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<td>58a</td>
</tr>
<tr>
<td></td>
<td>Neg08b</td>
<td>48b</td>
<td>58b</td>
</tr>
</tbody>
</table>
7.6. Independent passive clause types

7.6.1. Personal clause types 40

7.6.1.1. Personal declarative 41:

7.6.1.1.1. Cl 41a = + S:NPhr + Agmark:bey2 + Ag:NPhr + P:VtPhr

Citation Cl 41a: maaaw1 bey2 gaw2 ngaaw3
'cat -- by -- dog -- bite'
(The cat is bitten by the dog).

7.6.1.1.2. Cl 41b = + S:NPhr + Neg:NegPhr + Agmark:bey2 + Ag:NPhr + P:VtPhr

Citation Cl 41b: maaaw1 mow3 bey2 gaw2 ngaaw3
'cat -- not -- by -- dog -- bite'
(The cat isn't bitten by the dog).

7.6.1.2. Personal interrogative 43:

7.6.1.2.1. Cl 43a = + S:NPhr + Agmark:bey2 + Ag:NPhr + P:VtPhr + Ig:igpart

Citation Cl 43a: maaaw1 bey2 gaw2 ngaaw3 me?
'cat -- by -- dog -- bite -- interrogative'
(Don't tell me that the cat was bitten by the dog?)
7.6.1.2.2. Cl 43b = + S:NPhr + Neg:NegPhr + Agmark:bey2 + Ag:NPhr + P:VtPhr

Citation Cl 43b: maw1 m5hay4 bey2 gaw2 ngaaw3 me?
'cat -- isn't -- by -- dog -- bite -- interrogative
(Don't tell me the cat wasn't bitten by the dog?)

7.6.2. Impersonal clause types 5

7.6.2.1. Impersonal declarative 51:

7.6.2.1.1. Cl 51a = + S:NPhr + P:VtPhr

Citation Cl 51a: maw1 ngaaw3dow2
'cat -- bitten'
(The cat is bitten). 8

7.6.2.1.2. Cl 51b = + S:NPhr + Neg:NegPhr + P:VtPhr

Citation Cl 51b: maw1 mow3 ngaaw3dow2
'cat -- not -- bitten'
(The cat isn't bitten).

---

8 See 7.3. on structural ambiguity in the impersonal clause.
7.6.2.2. **Impersonal interrogative 53:**

7.6.2.2.1. Cl 53a = + S:NPhr + P:VtPhr + Ig:igpart

Citation Cl 53a: maawl tong1jo2 me?

'cat -- slaughtered--interrogative'

(Has the cat been slaughtered?)

7.6.2.2.2. Cl 53b = + S:NPhr + Neg:NegPhr + P:VtPhr + Ig:igpart

Citation Cl 53b: maawl m5hay4 tong1jo2 me?

'cat -- not -- slaughtered--interrogative'

(Hasn't the cat been slaughtered?)

7.7. **Dependent passive clause types**

7.7.1. **Personal clause types 40**

7.7.1.1. Cl 44 = (Cond:con + Inton:R) + Nu:ClInd 41a-41b

Citation Cl 44: hay4 ney3 bey2 yan5 daa2 [aay3 ngo3]

'if -- you-- by --person--beat [call me]'

(If you're beaten by somebody [call me].)

ney3 bey2 yan5 daa2 - RInton......

'you-- by --person--beat -- RInton......'

(If you're beaten by somebody .............)

7.7.1.2. Cl 46 = + Ca:con + Nu:ClInd 41a-41b

Citation Cl 46: [m5how2 coed1mun2] yangay44 ney3 bey2 yan5 daa2'

'[Don't go out] because--you-- by--per--beat'

son

([Don't go out] because you've been beaten by somebody).
7.7.3. Cl 47 = + Nu:ClInd 41a-41b + Temp:on

Citation Cl 47: ney3 bey2 yan5 daa2 got jan4 si2 [maa3 dan1 ley5]
'you - by -- person -- beat -- at that time [the police came]'
(When you were being beaten by somebody [the police came].)

7.7.4. Cl 48 = + Nu:ClInd 41a-41b + Rel:relaf -ga

Citation Cl 48: ney3 bey2 yan5 daa2 -ga [cing5 ying5]
'you -- by -- person -- beat -- relative [circumstance]'
([The circumstances] under which you were beaten).

7.7.2. Impersonal clause types 50

7.7.2.1. Cl 54 = (Cond:on + Inton:R) + Nu:ClInd 51a-51b

Citation Cl 54: hay4 ney3 maw5 saad3 jo2 [koey3 yaw3 ney3 ga gam1 hey3]
'if -- you -- murdered -- [he has your jewellery]'
(If you are murdered [he gets your jewellery]).

7.7.2.2. Cl 56 = + Ca:con + Nu:ClInd 51a-51b

Citation Cl 56: [koey3 ga wan5 paag3 m5 gam1 yen4] yan1 way4 koey3 maw5 saad3 jo2
'[His spirit -- was -- dissatisfied] because -- he -- murdered'
([His spirit was dissatisfied] because he'd been murdered).

---

9 In this example and in example Cl 58, the dependent clause subordinated by -ga is filling a slot as modifier of a noun on the phrase level.
7.7.2.3.  Cl 57 = + Nu:ClInd 51-51b + Temp:on

Citation  Cl 57:  koey3 ma5saad3jo2 go2jan4si2 [koey3ga wan5paag3 faan1ley5]

'he -- murdered --at that time [his spirit came back]'

(When he had been murdered [his spirit came back].)

7.7.2.4.  Cl 58 = + Nu:ClInd 51a-51b + Rel:relaf -ga

Citation  Cl 58:   [ngo3 teng1dow2] yan5 ma5saad3jo2 - ga [si4gon3]

'[I heard ] person--murdered -- rela- [fact]'

([I heard] the fact that somebody had been murdered).

7.8.  Alternative treatment of the passive clause types

Since transformational-type statements are made in this chapter it may be argued that this practice should be carried a little further and a transformational-type statement made of the foregoing section on the passive clause types. This is suggested by Cook for the treatment of the passive sentence in Cook (1969), pp. 42-43: 'With the introduction of transformational rules or matrix devices to show the relationships between sentences, it is still necessary to describe both kernel and derived sentences in order to discover the differences between structures. However, the final grammar may be considerably simplified by employing some type of transformational rule or matrix display, together with an analysis of only kernel sentences.'

If Cook's suggestion were adopted, the resulting set of statements would be more unwieldy than the set of statements adopted in the present analysis. Not only would the active clauses (parallel to Cook's kernel
sentences) and the passive clauses (parallel to Cook’s derived passive sentences) have to be described, but they would have to be described in the same place; furthermore, a transformational rule would have to be written to derive one clause type from the other.

In the present analysis, the active clause types and the passive clause types are both described, but in different places, as it is recognized that, whereas the active and passive clause types are transformationally related, the active (transitive) clause types are an item of the set of clause types which are contrasted by their clause nuclei, viz., the transitive, intransitive and equative clause types. The active clause types are therefore described together with the intransitive and equative clause types. The relationship between the active and the passive clause types is shown in tagmemic terms by means of the change in the order of tagmemes in the active clause and the addition (for the personal passive clause) of the agent tagmem. This was discussed in 7.1.

At this point attention is drawn to the objection to using too much transformational terminology — an objection which was first raised in 5.2.2. It was explained in 5.2.2. that tagmemicists who used transformational terminology did not have the same ideas as transformationalists proper. As stated in 0.1., it is one of the two aims of the present study to test tagmemic as a model on Cantonese. In such an experiment it is obvious that at times a less redundant treatment can be achieved with a transformational type approach, but unless there is really no way in which a tagmemic statement may be made, it is not a fair test of the method to switch over to transformational theory. The last practice is
even less desirable when one remembers that transformational theory as
used by tagmemicists is not the same as transformational theory when
used by transformationalists.

A further objection to using transformational terminology where
tagmemics has the tools whereby to describe certain structures in the
language is that it then becomes difficult to know when to stop. A
legitimate question could arise, for instance, as to why the interroga-
tive clauses in the present study are not 'transformed' from the
declarative clauses.

In 1.4., it was explained why the term 'derived' was used in the
present chapter; this is partly because of the transform potential of
active clauses into passive clauses, partly because Brend (1968) had
set this precedent, although on the whole she is a traditional tagmemicist.
CHAPTER 8: Variants of clause types and clause classes

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Chapter 8: Variants of clause types and clause classes

8.1. Emic and etic

The principle of emic and etic units was discussed in 1.2. and is briefly resumed here for clause: emic units contrast in both form and function while etic units do not. Form relates to the differences in the order of elements and the differences of manifesting classes, while function relates to the meanings of slots involving grammatical meaning.

The purpose of this chapter is to present in tagmemic formulae and exemplify the etic variants of independent and dependent clause types. Etic variants of emic clause types arise from the occurrence of one or more of the following three possibilities:

1) Expansion of the emic clause by the optional addition of peripheral tagmemes.

2) Change in the order of tagmemes without a grammatical change. As a rule, such change occurs only among the non-nuclear (peripheral) tagmemes, as the order of nuclear tagmemes in Cantonese is usually fixed. However, in the transitive clause types, it has been found that the nuclear object tagmeme can undergo an etic reordering in relation to the predicate tagmeme. This is quite exceptional and notice is drawn to it whenever it occurs.

3) Differences in choice of the fillers of functional classes resulting in lexical distinctions: e.g., whether a proper noun (Mr. Wong) or a

---

1 See 8.3.4.
common noun (cat, mouse) acts as a noun phrase filler of a subject or object tagmemes does not arise in an emic change of clause type, although different fillers of other tagmemes may then have to be selected in order to fit in with the choice of filler of a particular tagmemes elsewhere.

An example of this can be seen in the choice of filler of the interrogative slot in the interrogative clause types, where the choice of a marked interrogative clause particle can only be made in conjunction with the appropriate filler of the predicate slot. The lexical differences between these interrogative clause particles are regarded as etic features since they reflect emphasis, surprise, etc., over and above the emic feature of interrogation shared by all the interrogative particles.²

8.2. Format

It is proposed to deal with each clause class (independent and dependent) in turn as their respective clause types differ. Within each clause class, each clause type (e.g., transitive, intransitive, equative) is dealt with, according to which share common features.

First of all, an over-all formula is given for as many clause types as possible which have the same tagmemes occurring in the same positions. Such a formula would include more than one emic type, e.g., a transitive clause type and an intransitive clause type. The emic distinctions for each clause type is listed (e.g., differences in predicate tagmeme for each clause type) and other special features pointed out once for all. This is to avoid redundant listing of tagmemes which occur in exactly the same position in say, four or five emic clause types.

² See 8.3.6. - 8.3.6.1.
One or two maximum citations of different clause types are given; thereafter, over-all tagmatic formulae, i.e., formulae denoting etic variation in the clause, are given for clause types which have identical variation in the positions of tagmemes. These over-all tagmatic formulae, which may or may not be maximal, are abbreviated so that the function, but not the filler, is given; both function and filler, however, are implied. One or two citations are made to illustrate these formulae, using dashes between each tagmeme.

Within each clause type again, whenever it is necessary so to do, etic variation (say, in the different fillers of the E and F intransitive clause types) is dealt with in a conflated over-all formula with citations to illustrate the variation demonstrated.

In a tagmatic formula such as the last described, where it is necessary to know which variant of a filler is involved, the formula follows the traditional pattern of listing both function and filler. Square brackets enclose alternative nuclear and non-nuclear obligatory tagmemes in the over-all maximum formulae involving more than one emic type.

For example, .......[ + P:VtPhr ][ + P:ViPhr ] ...... does not mean that both predicate tagmemes are obligatory in such a formula, but that the predicate tagmeme as manifested by the transitive verb phrase is the one selected for a transitive clause type and the predicate tagmeme manifested by the intransitive verb phrase is the one selected for the intransitive clause type.

---

3 In this I partly follow the method adopted by Brend, (1968), pp.37 ff, combining her practice with stating the over-all formula in an abbreviated form, and then citing the clause in the same way but using dashes instead of the plus or plus/minus signs of a traditional tagmemic formula.
Square brackets also enclose tagmemes in over-all tagmatic formulae which occur in different positions in a clause or clauses. Such tagmemes must be understood to occur only once in an instance of a clause. For example, in the case of 

\[ ...[ \pm \text{Object} ] \pm \text{Time} [ \pm \text{Object} ] ... \] 

it must be read that the object tagmeme can either occur before or after the temporal tagmeme.

The numbering of etic clause types follows the numbering of emic clause types in Ch.6. After each citation, a word-by-word translation is given in inverted commas and then a free translation is given in brackets.

8.3. **Independent clause type variants**

8.3.1. **Overall maximum formula for independent transitive, intransitive and equative clause types 11-33:**

\[ + \text{T:TempPhr} + \text{Loc:LocPhr} + \text{S:NPhr} + \text{Ma:AdvPhr} [ \pm \text{Neg:NegPhr} ] [ \pm \text{P:VtPhr} ] \\
[ \pm \text{P:ViPhr} ] [ \pm \text{P:AdvPhr} ] [ \pm \text{O:NPhr} ] [ \pm \text{Comp:NPhr} ] [ \pm \text{Imp:Impart} ] \\
[ \pm \text{Imp:Impart} ] \]

Two additional statements may be made at this point: 1) the first four tagmemes can occur in all the clause types which have them, in the order stated above; they are assumed, therefore, to occur potentially in all other clauses unless a statement is made to the contrary.

2) **Subject, object, complement, time, location and manner tagmemes have interrogative Double function (see 8.5.2.8 and 9.11.3-9.11.4.)** When these double function interrogative tagmemes are selected they occur in the order as stated here and the resulting interrogative clause type is regarded as an unmarked interrogative clause type (see 8.3.6.) At sentence level (see 5.3.3) such an interrogative clause type fills the base slot of sentence 130x.

Double function interrogative tagmemes can be re-ordered in the ways described in this chapter for double function tagmemes. They can only occur with an unexpected predicate filler (see 8.3.6.)
The advantage of conflating all these emic types into one overall maximum formula may not be immediately obvious as it may appear to do away with the already established differences between transitive, intransitive and equative clauses, for instance. It may therefore appear easier to another analyst to analyse the clause throughout this section as comprising a nucleus and a periphery. The periphery would then include temporal and locative tagmemes. The occurrence of these tagmemes before the subject tagmeme, etc., could then be described.

The alternative treatment proposed above does not have the advantage of the treatment adopted by the present analyst: in one formula (instead of in several) all the emic clause types are displayed. This gives a preview of all clause types. If the alternative treatment presented above were adopted, different emic clause types would have to be set up time and again and the same statement would be made about the re-ordering, say, of the object tagmeme, for each of the emic clause types. This would result in a much less economical statement. These emic clause types are now included in an over-all formula, for the economical statement of certain features and possibilities that apply equally to all the clause types included in the formula.

There is no very great fear of obscuring the emic status of the clause types in the collapsed formula as the point is now past where the emic distinctions of clause in terms of clause nuclei are examined.
Since this section is introduced with instructions on selection of tagmemes for each clause type there can be no confusion between clause types as such. For instance, there would be no instructions given to select the equative predicate tagmeme in an intransitive clause type, but instructions would be given to select the intransitive predicate tagmeme in an intransitive clause type.
A further objection is raised concerning the treatment of the clause at this point as comprising nucleus and periphery. At this point in the work we are no longer interested in nucleus and periphery as such but in the actual clause variants by means of expansion or re-ordering of tagmemes.

Citations of maximum clause types:

1) Maximum transitive declarative clause 11a:

\[ + \text{gam1yad4 (Time)} + \text{hey2 yidow4 (Location)}^{4} + \text{yi1 pad1} \]

'today -- at-- here -- this-- classifier

\[ \text{mea3 (Subject)} + \text{juen1dang1 (Manner)} + \text{sig4 (Transitive predicate)} \]

horse -- deliberately -- eat --

\[ + \text{gug1 (Object)} \]

grain'

(Today this horse deliberately eats grain here).

---

4 A distinction is made between the preposition word \text{hey2} as it occurs in the above locative phrase and the intransitive verb \text{hey2} as in the intransitive clause \text{ngo3 hey2 yidow4} 'I am here'. There are two criteria for making this distinction: 1) in the case of \text{hey2}, the preposition word, the locative phrase in which it appears occurs either before the subject tagmeme or, in an intransitive clause, after the predicate tagmeme, as in \text{ngo3 jue4 hey2 loen5doen1} 'I live in London'. 2) It cannot be modified by a negative prefix \text{m5-} or negative phrase to participate in a negative clause. In the case of \text{hey2}, the intransitive verb, however, the tagmemic order it occupies is different, for it comes after the subject tagmeme and must be treated as manifesting the predicate tagmeme of an intransitive clause type, as in \text{ngo3 hey2 yidow4} 'I am here'. Further, unlike \text{hey2}, the preposition word, it is possible to modify \text{hey2}, the intransitive verb, with the negative prefix \text{m5-} or a negative phrase to form a negative clause like \text{nko3 m5hey2 yidow4} 'I am not here'.
2) Maximum intransitive declarative clause 21b:

\[ \text{today -- at -- here --} \text{this -- classifier} \]

\[ \text{maa} \text{3 (Subject) + juen\text{dang}1 (Manner) + m5hang2 (Negation)} \]

\[ \text{horse -- deliberately -- won't --} \]

\[ + \text{jow4gung1 (Intransitive predicate)} \]

\[ \text{work'} \]

(Today this horse deliberately won't work here).

8.3.2. Selection of tagmemes in overall formulae for each clause type:

1) Transitive clause type: select transitive predicate and optional object tagmeme.

2) Intransitive clause type: select intransitive predicate with or without complement tagmeme.

3) Equative clause type: select equative predicate (with or without complement tagmeme; without object tagmeme).

4) Negative clause type: select negative tagmeme in addition to other tagmemes necessary for clause type in question.

5) See 8.3.6. - 8.3.6.4. for selection of the interrogative tagmeme.

6) The imperative clause type: select the imperative tagmeme.
8.3.3. **Over-all non-maximum tagmatic formula for all clause classes and clause types concerning the temporal tagmeme:**

\[
[ \uparrow \text{Time} ] + \text{Location} + [ \uparrow \text{Time} ] + \text{Subject} + [ \uparrow \text{Time} ] + \text{Manner}
\]

\[
[ \uparrow \text{Time} ] + \text{Negation} + \text{Predicate}
\]

**Citations:**

1) Temporal tagmeme before the locative tagmeme in Clause 11a:

- gan1yad4 (Time) — hey2 yi1dow4 (Location) — ngo3 (Subject)
  - 'today — at — here — I

- sig4 (Transitive predicate)
- eat'

  (I eat here today).

2) Temporal tagmeme before the negation tagmeme in Clause 31b:

- go2 go3 yan5 (Subject) — ganmin5 (Time) — m5ho2yi3 (Negation)
  - 'that classifier man — this year — unable

- fey5 (Equative predicate)
- fat'

  (This year that man can't get fat).
8.3.4. Over-all non-maximum tagmatic formula for all transitive and intransitive F clauses concerning the object and complement tagmemes with further accompanying reordering of the temporal tagmeme:

\[
[\pm \text{Time}] [\pm \text{Object}/\pm \text{Complement}] \pm \text{Subject} [\pm \text{Object}/\pm \text{Complement}]
\]

\[
[\pm \text{Time}] \pm \text{Negation} \pm \text{Predicate}
\]

Reordering of the object tagmeme in the transitive clause type and the complement tagmeme in the intransitive F clause type is exceptional as these are nuclear tagmemes. Note that there is a concomitant optional reordering in the position of the temporal tagmeme so that it appears after the reordered object or complement tagmemes, as the case might be.

Although nuclear tagmemes are involved, clauses in which these variations occur do not undergo an emic change. The question may arise as to whether this change in the order of a nuclear tagmeme may relate to some higher level phenomena, e.g., paragraph structure, or the introduction of new information. The answer to this question is negative, for the meaning of the clauses, whether the object or complement tagmemes are re-ordered or no is not affected. There is no way of justifying a reference to a previous paragraph; neither is there a way of justifying the introduction of new information, for such a re-ordered clause may appear in the first sentence of a new conversation.

In English, there is no emic change involved in the change in the order of 'today' in 'I went away today' and 'today I went away'. Here, however, no nuclear tagmeme is involved. The case in Cantonese involves nuclear tagmemes and is more like the case in Malayan English (See

\[\text{See 6.3.}\]
Killingley, (1965)) where the object can be topicalised in the same way without any change in meaning: 'these cheap goods this year I can buy', which means exactly the same as 'this year I can buy these cheap goods'. These two forms occur in free variation in Malayan English.

Although in theory it is possible for the maximum number of tagmemes to occur when the object or complement tagmemes are reordered in these ways, in actual practice, speakers tend to omit the locative tagmeme.

Furthermore, although the filler of the subject tagmeme can in theory be a common noun phrase, in actual practice it is more usual in these reordered clause types to use a proper noun phrase (Mr. Wong, etc.), a possessive noun phrase (my mother, etc.) or a personal pronoun (I, you, etc.).

Citations:

1) Object tagmeme before the subject tagmeme in Cl 11a:

yi1 did1 peng5 fo3 (Object) -- gamlnin5 (Time) --
'this classifier cheap goods -- this year --

ngo3 (Subject) -- maay3 (Transitive predicate)
I -- buy'
(This year I shall buy these cheap goods).
2) Complement tagmeme before the negative tagmeme in Cl 22Fb:

\[ \text{yi1 goey3 sued3wan4 (Complement)} \rightarrow \text{ney3 (Subject)} \rightarrow \] 
\[ \text{this classi-} \rightarrow \text{word} \rightarrow \text{you} \rightarrow \] 
\[ \text{m5hang2 (Negation)} \rightarrow \text{teng1 (Intransitive predicate)} \rightarrow \] 
\[ \text{won't} \rightarrow \text{listen to} \rightarrow \] 
\[ \text{aa (Interrogation)} \] 
interrogative clause
particle
(Won't you listen to this advice?)

8.3.5. Over-all non-maximum tagmatic formula for all negative imperative
clause types concerning the negative tagmeme:

\[ \text{ Subject} \rightarrow [ \text{ + Negation}] \rightarrow \text{ Manner} \rightarrow [ \text{ + Negation}] \rightarrow \text{ Predicate} \rightarrow \text{ Imperative} \] 
The negative tagmeme is reordered to occur before the manner tagmeme.

Citations:

1) using Cl 22Eb:

\[ \text{ney3 (Subject)} \rightarrow \text{m5how2 (Negation)} \rightarrow \text{juven1dang1 (Manner)} \rightarrow \] 
\[ \text{you} \rightarrow \text{don't} \rightarrow \text{deliberately} \rightarrow \] 
\[ \text{coed1seng1 (Intransitive predicate)} \rightarrow \text{aa (Imperative)} \] 
make a noise \rightarrow \text{imperative clause particle}' 
(Don't make a noise on purpose!)
2) Using Cl 32Eb:

m5how2(Negation) -- juen1dang1(Manner) -- fay5(Equative predicate)
'don't -- deliberately -- fat --

--aa(Imperative)
imperative clause particle'
(Don't get fat on purpose!)

8.3.6. Unmarked and marked interrogative clauses as etic variants of emic interrogative clauses

Within the emic unit of interrogation involving clause types 13, 23 and 32, there are the units of unmarkedness and markedness: an interrogative clause is said to be 'unmarked' if it only implies interrogation; it is said to be 'marked' if it also implies something else besides interrogation, such as surprise or emphasis.

In this analysis, it has been decided to consider unmarked and marked interrogative clauses one emic type for two reasons:

1) the common factor of interrogation which runs through both unmarked and marked clause types is regarded as being the decisive factor in assigning both kinds of clause to one emic unit; the additional differences in the marked interrogative clauses (surprise, etc.), are considered lexical differences between the clauses.

2) In the kind of positive interrogative clause construction which involves the addition of an interrogative clause particle, it is possible to choose between unmarkedness and markedness through the choice of filler of the interrogative slot: positive interrogative clause types
which have as filler of the predicate slot an unaspected verb phrase or adjective phrase (i.e., those verb or adjective phrases without aspectual affixes) can be unmarked or marked; those which have as filler of the predicate slot an aspected verb phrase (i.e., with aspectual affixes) are always marked.

In the positive clause types, when an interrogative clause particle is selected with a double function interrogative tagmeme, it must be a marked particle 3-5.

Negative interrogative clause types may be unmarked or marked depending on whether the double function interrogative tagmeme is selected (see p. 205 (3)).

The clause particles, if selected, must be marked clause particles 3-6.

Independent and dependent clause types are already divided into further emic units depending on their polarity; it is felt that this polar division is more evident than that of unmarkedness and markedness. A further emic division at this point may not be valid, especially when such a distinction will obscure the emic distinction between positive and negative clause types.

8.3.6.1. Interrogative particle matrix

Before going on to the discussion proper of unmarked interrogative clause types it is necessary to present the interrogative particle matrix for positive and negative clause types, showing the fact that those particles which occur in positive interrogative clause types can be both unmarked and marked, whereas those that occur in the negative clause types must always be marked. The interrogative clause particles are numbered 1-7: 1-2 are unmarked; 3-7 are marked. In the negative clause type, marked particle 7 may be used if the double function interrogative tagmeme is not selected (see p. 205 (3)).

As stated above, double function interrogative tagmemes can only occur with marked particles 3-5 in the positive clause type and with particles 3-6 in the negative clause type.

---

6 It is acknowledged that a case may still be made for considering the unmarked and marked interrogative clauses two emic types.
Fig. 7: Interrogative clause particle matrix:

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<th>Positive</th>
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<th>Negative</th>
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<tbody>
<tr>
<td></td>
<td>Unmarked</td>
<td>Marked</td>
<td>Unmarked</td>
<td>Marked</td>
</tr>
<tr>
<td>1. maa</td>
<td></td>
<td>x</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. mow</td>
<td></td>
<td>x</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. aa</td>
<td>x</td>
<td></td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>4. gaa</td>
<td>x</td>
<td></td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>5. le</td>
<td>x</td>
<td></td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>6. me</td>
<td>x</td>
<td></td>
<td>x</td>
<td></td>
</tr>
<tr>
<td>7. waa</td>
<td></td>
<td></td>
<td></td>
<td>x</td>
</tr>
</tbody>
</table>

A brief gloss of each marked particle follows:

- aa: surprise, emphasis
- gaa: incredulity
- le: enthusiasm, persuasion
- me: incredulity
- waa: mild disbelief
There are three ways of forming the unmarked positive interrogative clause in any clause type:

1) by filling the predicate slot with an interrogative verb or adjective phrase,
or
2) by the joint occurrence of an interrogative tagmeme manifested by an unmarked interrogative clause particle 1-2 and a predicate tagmeme manifested by a non-interrogative unsuspected verb phrase or adjective phrase, or
3) by the joint occurrence of a double function interrogative tagmeme manifested by interrogative phrase 13 or 34 (see 8.5.2.8. and 9.11.3-9.11.4), and a predicate tagmeme manifested by a non-interrogative unsuspected verb phrase or adjective phrase. The choice of the unmarked clause particle and the choice of the double function interrogative tagmeme are therefore mutually exclusive.

In the following formula, and in subsequent formulae concerning the double function interrogative tagmeme, the double function tagmeme is not ordered. In each case the double function interrogative tagmeme occurs at clause level in the place occupied by its non-interrogative double function tagmeme. In this way it is very different from the case of the Wh-words 'why, when, etc' in English as these must come at the beginning of an English Wh-question.

When a general formula (such as the one below) contains a subject tagmeme and a double function interrogative tagmeme, in actual clause type selection, if the double function interrogative tagmeme is a subject tagmeme as well, no non-double function subject tagmeme may be selected.

---

7 See 8.3.6.1. Positive interrogative clauses can be unmarked or marked; Negative interrogative clauses are always marked.
8 As shown in 6.6.1.5.
9 Not all adjectives can be marked for aspect, but those that can would occur in an unsuspected form in the predicate tagmeme.
These three ways of forming the unmarked positive interrogative clause for all independent clause types are presented below:

For ease of formulation, both transitive and intransitive verb phrases are subsumed under one symbolisation VPhr.

Citations:
1) Using Cl 13a and selecting the interrogative verb phrase as predicate filler:

yi1 pad1 maa3 (Subject) — sig4m5sig4 (Interrogative transitive predicate)  
'this classifier horse -- does it eat'  
(Does this horse eat?)

2) Using Cl 33Ba and selecting the unasspected non-interrogative adjective phrase as predicate filler and clause particle 1 as interrogative filler:

yi1 pad1 maa3 (Subject) — fey5 (Equative predicate) — maa(unmarked interrogation)  
'this -- classifier horse -- fat -- unmarked interrogative clause particle'  
(Is this horse fat?)

3) Using Cl 13a and selecting the unasspected non-interrogative verb phrase as predicate filler and the double function temporal tagmeme filler:

yi1 pad1 maa3 (Subject) — gey2si5 (Double function interrogative)  
'this -- classifier horse -- when --  
sig4 (Transitive predicate)  
'eat'  
(When does this horse eat?)

8.3.6.3. Marked etic variants of all independent interrogative positive clause types

Marked etic variants of all independent interrogative positive clause types are formed in the following two ways:

1) Where the filler of the predicate tagmeme is an interrogative verb or adjective phrase, or when the double function interrogative tagmeme is selected together with an unasspected non-interrogative predicate filler, an optional interrogative tagmeme manifested by one
of the marked interrogative clause particles 3-5 (aa, gaa, le) occurs.

2) Where the filler of the predicate tagmeme is an unaspected non-interrogative verb or adjective phrase (and the double function interrogative tagmeme not selected), an obligatory interrogative tagmeme manifested by one of the marked interrogative clause particles 3-6 (aa, gaa, le, me) occurs.

3) In the case of the negative interrogative clause in all clause types, there are two alternatives in selecting the interrogative tagmeme.

Either a) marked interrogative clause particles 3-7 (aa, gaa, le, me, waa) must obligatorily manifest the interrogative tagmeme, resulting in a marked interrogative clause,

or b) a double function interrogative tagmeme obligatorily occurs with the optional occurrence of marked interrogative clause particles 3-6. Clause particle 7, waa, may not co-occur with a double function interrogative tagmeme.

In choosing (a), the clause becomes marked, but in choosing (b), the clause may be unmarked or marked depending on whether a clause particle is optionally selected as well.

8.3.6.4. Over-all non-maximum formulae for independent positive and negative interrogative clauses of all clause types:

1) \[ S:NPfr[ +P:IVVPfr/IVAdjFhr][P:UnaspVPhr/UnaspAdjFhr + DblFunvIg:IVPhr13/34] \]
   \[ + Ig:3-5 \]

2) \[ S:NPfr + P:UnaspVPhr/UnaspAdjFhr + Ig:igpart 3-6 \]

3) \[ S:NPfr + Neg:NegPhr + P:UnaspVPhr/UnaspAdjFhr ( + DblFunvIg:IVPhr13/34 \]
   \[ + Ig:igpart 3-6 ) + Ig:igpart3-7 \]
Citations:

1) Marked Cl 13a (using the first formula):

\[ yi1 \quad pad1 \quad maa3 \ (Subject) \quad \rightarrow \quad sig4m5sig4 \ (Interrogative \ transitive \ predicate) \]
'\( this --- \)classi- --- horse --- does it eat --- hier

\( gaa \ (Marked \ interrogation) \)
markcd interrogative clause particle'
(\textit{Does this horse really eat?})

2) Marked Cl 23Sa (using the second formula):

\[ yi1 \quad pad1 \quad maa3 \ (Subject) \quad \rightarrow \quad sey2 \ (Intransitive \ predicate) \]
'\( this --- \)classi- --- horse --- hier

\( me \ (Marked \ interrogation) \)
marked interrogative particle'
(\textit{Is this horse dying?})

3) Marked Cl 23Se (using the first formula):

\[ koey3 \ (Subject) \quad \rightarrow \quad hey2 \ bin1dow4 \ (Interrogative-locative) — sey2 \ (Intransitive \ predicate) \]
'\( he --- at --- where --- die --- \)

\( aa \ (Marked \ interrogation) \)
marked interrogative particle'
(\textit{Where did he die?})

4) Marked Cl 33Fb (using the third formula):

\[ yan5dey4 \ (Subject) \rightarrow m5hang2 \ (Negation) — fey5go3 \ (Equative — waa \ (Marked \ interrogation) \ predicate) \]
'\( Others --- won't --- fatter --- marked \ interrogative \ particle \)
(Surely others won't get fatter?)

5) Marked Cl 33Wb (using the third formula):

\[ ney3 \ (Subject) — dim2yiong2 \ (Interrogative-manner) — m5hang2 \ (Negation) \]
'\( you --- how --- won't --- \)

\( fey5 \ (Equative \ predicate) — le \ (Marked \ interrogation) \)
\( fat --- \)marked interrogative particle'
(\textit{How can you (possibly) avoid getting fat?})
8.3.7. **Summary: order of tagmemes in the independent clause types**:

In the etic variants of the three independent clause types (transitive, intransitive, and equative), a general statement can be made about the order of tagmemes in the clause:

\[\text{Time-Location-Subject-Manner-\{Negation\}-Predicate-\{Object/Complement\}}\]

\[\{\text{Interrogation/Imperative}\}\]

Variation in the order of tagmemes involves rearrangements of the temporal, manner, negative and object tagmemes. In the interrogative clause types, different selections of the fillers of the predicate tagmeme combine with the selection of the interrogative tagmeme manifested by interrogative clause particles and with the selection of the double function interrogative tagmemes.

8.4. **Dependent clause type variants: general remarks**

Throughout the section on dependent clause types that follows, similarities will be seen between it and the section on independent clause types (8.3.1. ff). However, in spite of their similarities these two sections are intrinsically different and should be treated separately even at the risk of being over-explicitly dealt with and resulting in some redundancy in certain statements.

Indeed, the notion of redundancy is exploited in tagmemics as a device for matrix displays, so that in tagmemics, brevity is not always the aim. The idea of 'controlled redundancy' is propounded in Pike (1963), p.216, where he discusses the idea of using the same constants in a paradigm,

\[9a\) Double function interrogative tagmemes are included in this general statement.\]
welcoming 'paradigmatic redundancy......when it serves to stimulate the reader's perception and to aid his understanding - rather than rejected by some esthetic criterion of rhetoric which proves irrelevant or harmful to the perception of the linguistic pattern.' Although Pike was not citing the same kind of example as we are dealing with here, his idea of controlled redundancy may well be applied to different spheres of the language.

In the section on independent clause types (8.3.1. ff); the optional expansion order of the independent clause types is dealt with. In the following section on dependent clauses an attempt is made not only to show which the optional tagmemes are and how they may be reordered, but an attempt is made to demonstrate the ways in which the obligatory tagmemes can be reordered. The reordering of these obligatory tagmemes, which are enclosed in square brackets, cannot be shown in relation to the optional tagmemes unless the optional tagmemes (which had appeared in the earlier section on independent clause types) are repeated yet again.

Since the present chapter deals with selection of clause types (and a dependent clause can only be a dependent clause if the dependent tagmeme is selected) great difficulties will be encountered if an attempt is made to describe the two sections dealing with independent and dependent clause types together.

Furthermore, since intonation is a component of the dependent conditional clause (See 8.4.2. (2)) and nowhere is intonation described as a component of an independent clause, it is imperative that the discussion of the two clause classes should be kept separate.
8.4.1. Over-all maximum formula for dependent transitive, intransitive and equative clause types 14-38:

\[ [+Ca:on] + T:TempPhr + Loc:LocPhr [+Cond:on] [+Purp: PurpPhr] \\
+ S:NPhr [+Purp:on] + Ma:AdvPhr [+Neg:NegPhr] [+ P:VtPhr] \\
[ + P:ViPhr] [ + P:AdjPhr] [ ± O:NPhr] [ + Comp:NPhr] [ + Temp:on] \\
[ Rel:relaf-ge3/-ge] [ + Condi:RInton] \\

8.4.2. Selection of tagmemes in over-all formula for each clause type:

1) Select appropriate dependent tagmeme for corresponding dependent clause, i.e., causative tagmeme for causative dependent clause, conditional tagmeme for conditional dependent clause, etc.

2) Conditional clause: select either the conditional tagmeme manifested by a connective or the conditional tagmeme manifested by a rising intonation, but not both. Whereas the connective occurs at the beginning of the clause, the rising intonation is spread throughout the clause, with a rise towards the end of the clause.

3) Purpose clause:

   (i) Select the first purpose tagmeme (before the subject tagmeme) for the personal purpose clause, i.e., clauses 15a, 15b, 25Fa, 25Eb, 25Fa, 25Fb and obligatory omission of the subject tagmeme in both cases.

   (ii) Select the second purpose tagmeme (before the manner tagmeme) for the impersonal purpose clause, i.e., clauses 15a1, 15b1, 25Fa1, 25Eb1, 25Fa1 and 25Fb1. The subject tagmeme is obligatorily absent.

---

10 See clause matrix in Ch.6, fig.5; see also 6.8.1.2. - 6.8.1.3.1.; 6.8.2.2. - 6.8.2.3.2.
The maximum form is much shorter as the only peripheral tagmeme that occurs is the manner tagmeme. For both the negative purpose clause types, the negative tagmeme occurs before the purpose tagmeme (see 6.8.1.2.2. and 6.8.1.3.2.) in each case.

4) Note the difference between the optional temporal tagmeme (notated T:TempPhr) and the obligatory temporal dependent tagmeme (notated Temp:cn); the latter is obligatorily selected for the temporal dependent clause.

5) In the temporal dependent clause the subject tagmeme occurs at the beginning of the clause before the optional temporal tagmeme.

Citations:

1) Maximum clause 266a (Positive intransitive causative clause):

yan1way4(Causative) -- gam1yad4(Time) -- hey2 yidow4(Location)
'because -- today -- here --

ney3(Subject) -- jing4hay4(Manner) -- dug4sue1(Intransitive predicate)
you -- only -- study........'
(Because today you're here for the sole purpose of studying......)
2) Maximum clause 15b1 (Negative transitive impersonal purpose clause):

\[ m^5 \text{hay}^4(\text{Negation}) \rightarrow \text{ley}^5(\text{Purpose}) \rightarrow \text{gam}^4 \text{yiong}^2(\text{Manner}) \]

'...not -- for the purpose of--in this way --

--bowl(Transitive predicate) -- faam\(\text{i}\)(Object)

boil -- rice'

(.....not for boiling rice in this way).

3) Maximum clause 37a (Positive equative temporal clause):

\[ y\text{i}^1 \text{go}^3 \text{yan}^5(\text{Subject}) \rightarrow \text{go}^2 \text{nin}^5(\text{Time}) \rightarrow \text{hey}^2 \]

'this--classifier--man--that--year--at--

saan\text{i}deng^2(Location) -- maan\text{a}^4maan^2(Manner) -- fey^5(\text{Equative predicate})

the top of the mountain--slowly -- fat --

go^2jan^4si^2(Temporal dependent)

at that time.......

(That year, while this man was slowly getting fat on the mountain....)

8.4.3. Over-all maximum formula for independent personal and impersonal passive clause types 41-52: 11

\[ +T:\text{TempPhr} + \text{Loc}:\text{LocPhr} + S:\text{NPhr} + \text{Ma}:\text{AdvPhr} [+\text{Neg}:\text{NegPhr}] \\
[ + \text{AgMark}:\text{hey}^2 + \text{Ag}:\text{NPhr} ] + \text{P}:\text{VtPhr} [+ \text{Ig}:\text{igpart} 3-7] \]

11 See 8.3.3. for variation in position of the temporal tagmeme.
8.4.4. Selection of tagmemes in overall formula for each clause type:

1) Select the agent marker and agent tagmemes for the personal passive clause type; do not select them for the impersonal passive clause type.

2) Note that the passive interrogative clause types are all marked through choice of interrogative clause particles. Select as filler of the interrogative slot interrogative clause particles 3-6 for positive clause types and interrogative clause particles 3-7 for negative clause types.

Citations:

1) Maximum clause 41a (Positive declarative personal passive):

```
  gam1yad4(Time) -- hey2 low4bin1(Location) -- yi1 tiw5
     'today -- by the road -- this--classifier

     -- maaw1(Subject) -- maan4maan2(Manner) -- bey2(Agent marker)
     cat -- slowly -- by --

     --yan5(Agent) -- jug1dow2(Transitive predicate)
     man -- caught'

  (Today, by the roadside, this cat was slowly caught by somebody).
```

12 See 8.3.6. - 8.3.6.1.
2) Non-maximum clause 53a (Positive interrogative impersonal passive):

\[ \text{hey2 go2dow4(Location)} -- \text{go2 tiw5 maa2(Location)} \]
\[ 'there -- that--classi--fier--cat -- \]
\[ --tong1jo2(Transitive predicate) -- me(Marked interrogation) \]
\[ \text{killed} -- \text{marked interrogation}' \]

(Was that cat really killed there?)

3) Non-maximum clause 53b (Negative interrogative impersonal passive); interrogative clause particle 7 is used as filler of the interrogative slot in this example:

\[ \text{go2 tiw5 maa2(Location)} -- \text{m5hay4(Negation)} \]
\[ 'that classi--cat -- not -- n) \]
\[ 'that classi--cat -- not -- \]
\[ --tong1jo2(Transitive predicate) -- waa(Marked interrogation) \]
\[ \text{killed} -- \text{marked interrogation}' \]

(Surely that cat wasn't killed?)

8.4.5. Over-all maximum formula for dependent personal and impersonal passive clause types 44-58:

\[ [\text{[+ Ca:cn]} \downarrow T:\text{TempPhr} \downarrow \text{Loc:LocPhr} \downarrow \text{[+ Cond:cn]} \downarrow \text{S:NPhr} \downarrow \text{Ma:AdvPhr} \]
\[ [+\text{Neg:NegPhr}] \downarrow \text{[+ AgMark:bey2} \downarrow \text{Ag:NPhr}] \downarrow \text{P:VtPhr} \downarrow \text{[+ Temp:cn]} \]
\[ [^\text{[+ Rel:relaf -ge3/-gea]}] \downarrow \text{[+ Cond:RInton]} \]
8.4.6. Selection of tagmemes in over-all formula for each clause type:

1) Note the absence of a dependent passive purpose clause type.

2) Select appropriate tagmemes for appropriate clause types: e.g., causative tagmeme for the dependent causative clause type.

Citations:

1) Maximum clause 46a (Positive causative personal passive):

yan1way4(Causative) -- taw5sin1(Time) -- hey2 go2dow4(Location)
'...because -- just now -- there --

koey3(Subject) -- jaang1did1(Manner) -- bey2(Agent marker)
he -- nearly -- by --

fey1jay2(Agent) -- liw5(Transitive predicate)
loafer -- tease'
(......because just now he was nearly bothered by loafer there).

2) Non-maximum clause 57b (Negative temporal impersonal passive):

m5hay4(Negation) -- daa2gan2(Transitive predicate) -- go2jan4si2(Temporal dependent)
'not -- beaten -- at the time....'
(While (somebody) was not being beaten......)
8.5. Clause variants by means of different fillers of clause-level tagmemes

8.5.1. Format

It is proposed to deal with the nuclear tagmemes first and then to deal with the peripheral tagmemes.

Whenever fillers of a tagmeme (whether nuclear or peripheral) are not differentiated by clause type they are listed as true for all occurrences of that particular tagmeme. For example, a noun phrase can always be a filler of the subject or object slot in any clause type where subject or object tagmeme occurs.

Restrictions on the kind of filler occurring in a certain slot will be written in at the time of stating the kind of filler for a slot, for example, the noun phrase that can fill a subject slot in an imperative clause must be a second person personal pronoun or a conjoined phrase involving the second person personal pronouns.

Where there is only one filler of a clause-level slot, say, bey2 as filler of the agent marker slot in the personal passive clause, it is not included in this section as there are then no clause variants by means of different fillers.

Unless otherwise stated, a word as clause-level filler is functioning as the minimal phrase.

Numbers of phrases refer to the corresponding phrase numbers in Ch.9. Since these phrases are dealt with in Ch.9, they are only listed here and not described.

8.5.2. Fillers of slots of nuclear tagmemes
8.5.2.1. Fillers of the subject slot

8.5.2.1.1. Noun phrases 11, 12, 13, 25, 26, 27 and 27a (9.8.1. - 9.8.7.1.).

Restriction on the noun filler of the subject slot:
In the imperative clause (for all clause types), the filler of the subject slot must be the second person singular or plural pronoun: ney3 'you-singular' and ney3dey4 'you-plural'. (See 8.5.1. above as well as 8.3.3.).

Alternatively, the filler can be a conjoined personal pronoun phrase involving the second person singular and plural, e.g., ney3 tung5masy5 neydey4 'you (singular) and you (plural)'.

8.5.2.1.2. Limiting phrases 11 and 22 (9.5.1. - 9.5.2.).

8.5.2.1.3. Relative phrases 31, 31a and 22 (9.7. - 9.7.2.).

8.5.2.2. Fillers of the (direct) object and complement slots

All the fillers of the subject slot listed from 8.5.2.1. - 8.5.2.1.3. are possible fillers of the object and complement slots. An exception is NPhr 13 which only fills a subject slot.

12a See 8.5.2.8. no.(3) for interrogative pronouns occurring in double function.

13 There appears to be no case for setting up an indirect object tagmeme in Cantonese, as what would be expressed in English by an intransitive verb and indirect object is most easily translated into Cantonese with a transitive verb and direct object (see pp 313-314).
8.5.2.3. **Filler of the transitive and intransitive predicate slots**

Verb phrase 11 (9.9.).

8.5.2.4. **Fillers of the equative predicate slot**

Adjective phrases 11, 12, 22 and 23 (9.6.1. - 9.6.4.).

8.5.2.5. **Fillers of the passive predicate slot**

8.5.2.5.1. **Fillers of the personal predicate slot**

Unaspected and aspected transitive verbs.

8.5.2.5.2. **Fillers of the impersonal predicate slot**

Aspected transitive verbs.\(^\text{14}\)

8.5.2.6. **Fillers of the negative slot in the non-passive and passive clause**

Negative phrase 11 (9.10.).

For the imperative clause types, the negative phrase is m\(^\text{5how2}\) 'don't', which does not occur in the passive clause.

\(^\text{14}\) It should be noted that the unaspected transitive verb is restricted from occurrence in this slot. This is probably to avoid ambiguity and confusion with the active clause. See 7.3.
8.5.2.7. Fillers of the imperative slot

Imperative clause particles (single and combined):

1) For positive clause types:
   laa
   laa + maa = lamaa (with added persuasion)

2) For negative clause types:
   aa

8.5.2.8. Fillers of the interrogative slot (simultaneous function, where it applies, is shown in parenthesis):

1) Unmarked clause particles 1-2

2) Marked clause particles 3-7

3) Interrogative pronouns:
   e.g. bin1go3 (subject, object, complement) 'who'
   mad1ye3 (subject, object, complement) 'what'
   gey2daw1 (subject, object, complement) 'how many'

---

15 Since these fillers and tagmemes are at the clause level, only clause-level tagmemes and fillers are dealt with. At sentence level, the imperative (and later, the interrogative) slot is filled by the appropriate intonation contour. At the clause level, only clause particles as fillers of the imperative and interrogative slots are dealt with.

16 This section implies the inclusion of the interrogative phrases; these are dealt with in 9.11. - 9.11.4.

17 See 8.3.6.1.
4) Interrogative adverbs:
   e.g., dim2gaay2 (manner) 'why'
   gey2noy4 (time) 'how long'
   dim2yiong2 (manner) 'how'
   bin1su3 (location) 'where'

   Interrogative adverbs have either manner, time or locative double function. They are distinguished from interrogative pronouns (see p.218) in that they do not have subject, object or complement double function.

5) Interrogative noun phrases:
   e.g., mad1ye3 gung1 (subject, object, complement) 'what kind of work?'
   gey2daw1 nin5 (time) 'how many years?'

   The fillers listed from (1) to (4) above also fill the interrogative slot in interrogative phrase 13 (9.11.3.); the fillers listed in (6) below also fill the interrogative slot as interrogative phrase 34 (9.11.4.) See also 8.3.6.2.-8.3.6.4. for the discussion of the double function interrogative tagmeme.

6) Interrogative prepositional phrases:
   e.g., hey2 bin1su3 (location) 'where'
   jow4 mad1ye3 (manner) 'why'

   These phrases are dealt with as interrogative phrase 34 in 9.11.4.

8.5.2.9. Fillers of the personal agent slot in the passive clause

   All the fillers of the subject (and object and complement) slot listed from 8.5.2.-8.5.2.2. are possible fillers of the personal agent slot.

8.5.2.10. Fillers of the conditional slot

1) Connectives:
   hay4 'if'
   how2o13 'if'
2) Rising intonation contour

8.5.2.11. Fillers of the purpose slot

1) personal purpose:  
   purpose phrase 31 (9.16.)

2) impersonal purpose:  
   ley5 'in order to'

8.5.2.12. Fillers of the relative slot

Relative clause affix -ge3 or -ga

8.5.2.13. Fillers of the (optional) temporal slot  

Temporal phrases 11, 12, 23 and 34 (9.12.-9.12.4.).

8.5.2.14. Fillers of the location slot  

Locative phrases 31, 32 and 33 (9.13.1.-9.13.3.).

8.5.2.15. Fillers of the manner slot  


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18 See 6.5.
19 See 8.5.2.8., no. (4) for interrogative adverbs occurring in double function.
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9.16. Purpose phrase 31 .................................................. p. 268
9.1. Definition of the phrase

The phrase is defined as a unit which is 'composed, potentially, of two or more words.' It is the level immediately below the level of clause and immediately above the level of word. Since the definition of phrase states that a phrase need only be 'potentially' composed of two words, this means that it is possible for a word (provided that it be potentially expandable, e.g., by the addition of modifiers) to be regarded as the minimum occurrence of a phrase and fill a slot on the clause level.

While a word, if potentially expandable, is a phrase, a phrase, however, need not be a word. A phrase of two words is clearly not a word. There is therefore no confusion in using the two terms 'word' and 'phrase' side by side with 'potentially expandable word' as minimum phrase. A two-word phrase may be downgraded to fill a slot on a phrase level. In the following chapter, only the internal structure of the phrase which consists of more than one word is discussed.

A phrase 'typically, but not always, fills slots on the clause level.' This is so because it is possible for a phrase to skip a level and fill a slot on the sentence level, provided it be given the appropriate intonation contour which turns the phrase base into a sentence, in this case an elliptical sentence of nonclause structure.

The phrase is a unit with its own internal unity, and although a verb or an adjective phrase may be a clause at the same time as a phrase in that it fills a predicate slot, it is still differentiated from a clause by virtue of having this internal unity. These are the only instances when a phrase may coincide with clause; at all other times (i.e., with word groups that do not fill predicate slots), phrases do not have the characteristics of a clause.

9.2. Fillers of the phrase level

Fillers of the phrase level are typically words, which belong to the level immediately below the phrase, but sometimes phrases can be the

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1 Elson and Pickett, (1965), 8.1.
2 Loc. cit.
3 See 5.2.5.1.
5 Whenever word fillers are numbered, they refer to the words numbered in Ch.10. When a word class is not numbered, any member of that class may occur.
fillers of phrases in cases of conjoining, for instance, or embedded relative clauses denoting possession analogous to English word embedding: *my uncle's friend's neighbour's dog's bone*.

In Cantonese, fillers of the phrase level can also be clauses downgraded to fill a tagmeme slot at phrase level, as in the case of the relative clause *hung5-ga* 'that which is red' filling a slot in the modified noun phrase *hung5-ga ping5go2* 'the apple which is red'.

9.3. Phrase classes and phrase types

Phrase classes are named according to the most important tagmeme in the string of morphemes in a particular phrase. For example, in a noun phrase, the head word, the noun, fills the head tagmeme in a modified noun phrase and that phrase would belong to the noun phrase class.

The head tagmeme however, is not always the tagmeme that gives the phrase its class name, as, in the case of the kind of interrogative phrase which involves an interrogative infix *-m5-* between two head verb words or two head adjective words, the interrogative tagmeme is the most important part of the phrase, which is therefore grouped under an interrogative phrase class.

Phrase types refer to the way in which a phrase is internally structured. There are two main phrase types: endocentric and exocentric.

Briefly, endocentric phrase types are phrases which can be replaced by one of its parts and which are centred constructions with at least one head.

---

6 See 9.11. - 9.11.2.2.

Exocentric phrases are non-centred constructions and the phrase is not replaceable by one of its parts. Exocentric phrases are relater-axis (RA) phrases such as English to (relater) the town (axis).

Endocentric phrases can be further subdivided into those with multiple heads and those with modifier head.

In the case of the endocentric phrases with multiple heads, there can be a further subdivision into coordinate phrases, comprising phrases with different structures, viz., conjoined phrases with different referents, such as John and the grocer, and item-appositive (IA) phrases, which are conjoined phrases with the same referent, such as John, the grocer. In this I partly follow Cook's suggested phrase level analysis.\(^8\)

However, since there is only one case in Cantonese of an item-appositive type phrase, viz., a phrase like John, the grocer, it is not proposed to have a separate column in the phrase level matrix for item-appositive type phrases. Such phrases are included in endocentric coordinate phrases with multiple heads.

The phrase level matrix is presented overleaf.

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\(^8\) Cook, (1969), chart facing p. 91.
Fig. 8: Phrase level matrix

<table>
<thead>
<tr>
<th>Phrase class</th>
<th>Endocentric (Modifier-head) 10</th>
<th>Endocentric (Coordinate) 20</th>
<th>Exocentric noncentred (Relater-axis or RA) 30</th>
</tr>
</thead>
<tbody>
<tr>
<td>LimPhr 01</td>
<td>11</td>
<td></td>
<td></td>
</tr>
<tr>
<td>LimPhr 02</td>
<td>22</td>
<td></td>
<td></td>
</tr>
<tr>
<td>AdjPhr 01</td>
<td>11</td>
<td></td>
<td></td>
</tr>
<tr>
<td>AdjPhr 02</td>
<td>12</td>
<td>22</td>
<td></td>
</tr>
<tr>
<td>AdjPhr 03</td>
<td></td>
<td>23</td>
<td></td>
</tr>
<tr>
<td>RelPhr 01</td>
<td></td>
<td></td>
<td>31</td>
</tr>
<tr>
<td>RelPhr 01a</td>
<td></td>
<td></td>
<td>31a</td>
</tr>
<tr>
<td>RelPhr 02</td>
<td>22</td>
<td></td>
<td>*</td>
</tr>
<tr>
<td>NPhr 01</td>
<td>11</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NPhr 02</td>
<td>12</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NPhr 03</td>
<td>13</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NPhr 04</td>
<td>14</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NPhr 05</td>
<td></td>
<td>25</td>
<td></td>
</tr>
<tr>
<td>NPhr 06</td>
<td></td>
<td>26</td>
<td></td>
</tr>
<tr>
<td>NPhr 07</td>
<td></td>
<td>27</td>
<td></td>
</tr>
<tr>
<td>NPhr 07a</td>
<td></td>
<td>27a</td>
<td></td>
</tr>
<tr>
<td>VPPhr 01</td>
<td>11</td>
<td></td>
<td></td>
</tr>
<tr>
<td>NegPhr 01</td>
<td>11</td>
<td></td>
<td></td>
</tr>
<tr>
<td>IgPhr 01</td>
<td></td>
<td>21</td>
<td></td>
</tr>
<tr>
<td>IgPhr 02</td>
<td></td>
<td>12</td>
<td></td>
</tr>
<tr>
<td>IgPhr 02a</td>
<td></td>
<td>12a</td>
<td></td>
</tr>
<tr>
<td>IgPhr 03</td>
<td></td>
<td>13</td>
<td></td>
</tr>
<tr>
<td>IgPhr 04</td>
<td></td>
<td></td>
<td>34</td>
</tr>
</tbody>
</table>
In the discussion below, it should be noted that all endocentric (modifier-head) phrase types are in the first decade of numbering (i.e., 11, 12, etc.), the endocentric coordinate phrase types are in the second decade of numbering (i.e., 22, 25 etc.), and that exocentric (RA) phrase types are in the third decade of numbering (i.e., 31, 32, etc.). Thus it is not necessary to refer to the full name of a phrase, e.g., 'endocentric coordinate limiting phrase 22', but merely 'endocentric limiting phrase 22'. It can be seen from the phrase level matrix in fig. 8 exactly which phrase is being described.
The first general formula of a particular phrase type and class is given in full tagmemic formula (i.e., with function and filler class) and then this phrase type is illustrated with citations in abbreviated formulae in which the function, not the filler, is entered, but both function and filler are implied.

Where the filler differs in cases of being one word or more than one word, notice is drawn to it by writing the first letter of the filler with a small or a capital letter as the case might be.  

9.5. Limiting phrases

9.5.1. Endocentric limiting phrase 11:

Formula LimPhr 11:

\[ + ( + \text{Dc:dc} + \text{Nu:Nu/nu}) + \text{Clas:clas} \]

Citations of formula LimPhr 11:

1) with all possible tagmemes:

\[ + ( + \text{yi1(deictic)} + \text{gey2(numeral)}) + \text{go3(classifier)} \] [yan5]

'this -- few -- classifier [person]'

---

9 See 8.2, where a similar presentation of etic clause variants is explained.

10 Elson and Pickett, (1965), p. 75: 'classes of fillers which are phrases (or clauses...), rather than single words, are symbolized by capital letters'. Small letters indicate fillers of one word. For the explanation of the symbolization within brackets, see Elson and Pickett, (1965), p. 60, e.g. (3): 'each tagmeme is optional, and either or both may occur, but one must occur.'
These limiting phrases are conjoined by the connective *tung5maay5* 'and'. In theory, these phrases are open-ended but style and usage impose a limit to the number of phrases that can be conjoined.

Formula LimPhr 22:

\[ + H_1:LimPhr + Cn:cn + H_2:LimPhr \pm ( + Cn:cn + H_3:LimPhr) \]

11 Elson and Pickett, (1965), p.60, e.g. (7): 'both tagmemes are optional, but the two must occur together'. After the second obligatory head tagmem in this type of phrase, further tagmemes including connective and head are optional, but each additional head must be accompanied by its own connective.
Citation formula LimPhr 22:

\[ + yi1 \text{ gey} 2 \text{ go} 3 (\text{head}_1) + \text{tung}_5\text{maay}_5 (\text{connective}) \]

'this—few—classifier — and —

\[ + go2 \text{ saam}_1 \text{ jeg}_3(\text{head}_2) \]

'that—three—classifier — and —

\[ + go2 \text{ gey} 2 \text{ faay}_3 (\text{head}_3) \]

'that—few—classifier for flat things —— [dib4]

(these, those three and these few [plates]).

9.6. Adjective phrases

9.6.1. Endocentric adjective phrase 11:

Formula AdjPhr 11:

\[ \pm \text{Mdl:mål} \pm \text{Mod:intens}^11 \pm \text{H} \text{adj} \text{wd} 11/12/13/23a/23b/23c/33 \mp \text{Mod:intens} 11 \]

Citation of formula AdjPhr 11:

with the first modifier tagmeme:

\[ [\text{sowlhaa}_1] \pm \text{ho2nang}(\text{modal}) \pm \text{gey}_2 (\text{modifier}) \pm \text{fey}_5 (\text{head}) \]

'[ baby] can — quite — fat'

([Babies] can be quite fat).

---

For this symbolization, see Elson and Pickett, (1965), p. 60, e.g. (6): 'both tagmemes are optional, but only one or the other may occur.'
with the second modifier tagmeme:

+ Fey5 (head) + go3taw5 (modifier)

'fat — too much'

(too fat)

9.6.2. Endocentric adjective phrase 12:

Formula AdjPhr 12:

+ Mdltmdl + H:adjwd 41/43a/43b/44/53

The difference between AdjPhr 12 and 11 is that AdjPhr 12 cannot be further modified at phrase level by an intensifier. The fillers of the head tagmeme are all either adjectives which have some kind of suffixation at word level (those in the 40 series) or, as in the case of adjwd 53, are reduplicated. Modification by an intensifier at phrase level is mutually excluded by suffixation or reduplication at word level.

These adjectives are discussed at word level in 10.10.1.5.1, 10.10.1.5.2, 10.10.1.6, and 10.10.1.7.

Citations of formula AdjPhr 12:

1) selecting adjwd 41 as filler of the head tagmeme:

[koey3] + ho2nang5 (modal) + fey5go3 (head)

'[ He] can — fatter'

([He] can be fatter).
When AdjPhr 12 containing adjwd 41 as head is the filler of the equative slot at clause level, the resultant equative clause, enic type F, is optionally followed by a complement. This is discussed towards the end of 6.3. (p.149).

2) selecting adjwd 53 as filler of the head tagmeme:

[koey3ga sam1] + wuy3 (modal) + luen4luen4 (head)

'His clothes] will — all disordered'

([His clothes] will become disordered).

3) selecting adjwd 43a as filler of the head tagmeme:

[ngo3dey4] + siong2 (modal) + fey5did1 (head)

' [We ] want — fat a little'

([We] want to get a little fatter).

9.6.3. Endocentric adjective phrase 22:

This is a coordinate phrase, which in theory is open-ended, but which in practice has an actual limit to the number of phrases that can be conjoined.

When the modal tagmeme is selected, the phrase occurs as filler of an equative predicate slot; otherwise it fills a modifying slot in the modified noun phrase.
In selecting the fillers of the modifier slot it is not necessary that intensifier word 11a be chosen in the second adjective phrase to be conjoined if intensifier word 11a has already been chosen to fill the modifier slot of the first phrase. In other words, there is free choice in such coordinated phrases which modifier of the head shall be selected in two or more phrases, as long as only one is selected for each phrase to be conjoined.

Citations of formula AdjPhr 22:

1) with the first modifier and modal in the first phrase and the second modifier without modal in the second phrase:

\[ \pm \text{ho2nang5 (modal)} \pm \text{gey2 (modifier)} + \text{leng3 (head)} + \text{daan4hay4 (connective)} \]

\[ \text{can} - \text{quite} - \text{beautiful} - \text{but} - \]

\[ + \text{saw3 (head2)} + \text{go3taw5 (modifier2)} \ldots \]

\[ \text{thin} - \text{too much} \ldots \]

(can be quite pretty but too thin).

9.6.4. Endocentric adjective phrase 23:

Formula AdjPhr 23:

\[ + H_1: \text{adjwd 53}^{13} + H_2: \text{adjwd 53} \]

\[ ^{13} \text{See 10.10.1.6. As stated in that section, certain adjectives denoting motion cannot be selected.} \]
Citations of formula AdjPhr 23:

1) \([\text{koe}y_{3}g_{a} \text{min}_{4}] \text{hung}_{5}\text{hung}_{5}(\text{head}_{1}) + \text{baa}_{4}\text{g}_{4}\text{baa}_{4}(\text{head}_{2})\)
   'Her face' red red — white white'
   (Her face is] rosy and fair).

2) + \text{suen}_{1}\text{suen}_{1}(\text{head}_{1}) + \text{sug}_{1}\text{sug}_{1}(\text{head}_{2})
   'sour sour -- smelly smelly'
   (smelly and sweaty)

9.7. Relative phrases

9.7.1. Exocentric (RA) relative phrases 31 and 31a:

The relative phrase consists of two obligatory tagmemes: a relater tagmem manifested by the relative affix \(-g_{e}_{3}\), and an axis tagmem manifested by a limiting phrase, an adjective phrase, a noun phrase, a verb phrase, a negative phrase, a temporal phrase, a locative phrase and an adverb phrase. It can be considered a hyperclass\(^{15}\) phrase in that its filler class includes many distribution classes\(^ {16}\) and in that they all occur with the suffix \(-g_{e}_{3}\).

The relative phrase has two variants according to whether it occurs by itself in absolute position\(^ {17}\) as a self-contained unit (which

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\(^{14}\) In relative phrase 31a only. See argument below concerning the possessive noun and pronoun phrases as well as 9.8.1 - 9.8.2.

\(^{15}\) For discussion of criteria for setting up a hyperclass, see Elson and Pickett, (1965), p.142.

\(^{16}\) Ibid., p.140.

\(^{17}\) Such a phrase could fill the base slot of an elliptical sentence. For an example of this see sentence 410 in 5.7.1.
is the kind described in this section) or whether it occurs in included position as part of a modified noun phrase in immediate attributive position, filling a descriptive slot as an alternative to an adjective phrase.

In the latter case, the relative phrase ends in the affix -ga, an allomorph of -ge3, the difference between them being that -ga is unstressed and has a neutral vowel and neutral tone while -ge3 occurs in non-attributive position, may be stressed, and has a full vowel with inherent tone 3.

The relative phrase in one sense includes the possessive noun and pronoun phrases in that they too are formed in the same way (with relater -ge3 or -ga as the case might be) but it is not completely satisfactory to include the said possessive phrases from the point of view of distribution. The possessive phrase comes at the beginning of a modified noun phrase and can be followed later on in the noun phrase by a relative phrase acting as filler of the descriptive slot, analogous to English John's (possessive phrase) hat which is there (noun phrase with relative phrase as modifier).

The solution, therefore, is to include the possessive noun and pronoun phrases in the relative phrase hyperclass as a subclass of the relative phrase and call it relative phrase 31a.

A note is made at this point that with the possessive first and second person singular pronoun phrases involving kinship terms, it is optional, not obligatory, to include -ga in non-final attributive position, such as nev3/nev3ga baa5baa1 'your Daddy', ngo3/ngo3ga maa5maa1 'my Mummy' and ngo3/ngo3ga jue2yan2 'my master'.

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18 See 9.8.1. and fn 25. See also 3.4.3.1.2.
19 See 3.4.3. - 3.4.3.1.2.
20 See 9.8.2. below.
21 As can be seen in the third example, 'my master', the meaning of 'kinship term' extends in some cases beyond the blood family.
9.7.1.1. Formula RelPhr 31:

+ Ax: LimPhr/AdjPhr/VPhr/NegPhr/TempPhr/LocPhr/AdvPhr + Rel: relaf-ge3

Citations of formula RelPhr 31:

1) with a limiting phrase as filler of the axis slot:

+ go2 saam1 sey3 faay3(axis) + -ge3(relater)

'that—three—four—classifier for—relative affix'
flat things
(that which belongs to those three or four flat things).

2) with adjective phrase as filler of the axis slot:

[yi1 did1 noey3jay2] + how2 leng3(axis) + -ge3(relater)

'[These girls] very—beautiful—relative affix'
([These girls (are)] those who are very beautiful).

3) with verb phrase as filler of the axis slot:

+ maay4 haay5(axis) + -ge3(relater)

'sell—shoes—relative affix'
(he who sells shoes; a place where shoes are sold).

22 In these cases, since both adjective and verb phrases can fill predicate slots in the clause, these phrases are coincident with clauses, a possibility that was pointed out in 9.1. See Cook (1969), p.92, where he points out that 'the same word group may be phrase, clause, and, with intonation, sentence'.

23 In such a case it must be admitted that this tagmemic formula does not show the transformational relationship between the two deep structures in maay4 haay5 ge3 which comes out in the translation.
9.7.1.2. Formula RelPhr 31a:

\[ + Ax:NP/PP + Rel:relaff-ge3 \]

Citations of formula RelPhr 31a:

1) with a noun phrase as filler of the axis slot:

\[[\text{axel hay4}] + \text{wong5 sin1 saang1 (axis)} + -ge3 (relater)\]

'Books are Wong — Mister — relative affix'

([These books are] Mr. Wong's).

2) with a pronoun as filler of the axis slot:

'\[ + \text{ngo3 (axis)} + ge3 (relater)\]

'I — relative affix'

(Mine; that which is mine).

9.7.2. Endocentric relative phrase 22:

Endocentric relative phrase 22 is a coordinate structure which is theoretically open-ended and which has as the fillers of its head slots exocentric (RA) phrases 31 and 31a described above in 9.7.1.1. - 9.7.1.2.

In practice the occurrence of about three heads is tolerated. Examples of both kinds of filler will be given in the citation formulae below.

It must be pointed out that the relative phrases 31 to be conjoined must be of the same type: i.e., locative relative with locative relative etc., but that the relative phrases 31a to be conjoined can be one of each.
9.5.1.5. Formula PelPhr 22:

\[ + H_1: RelPhr \ 31/31a + Cn: on + H_2: RelPhr \ 31/31a \pm (+ Cn: on + H_3: RelPhr \ 31/31a) \ldots \]

Citations of formula RelPhr 22:

1) with RelPhr 31 (in this case the temporal relative phrase) as filler of each of the head slots in the coordinate phrase:

\[ + gaw4 \ nin2 \ -ge3(\text{head}_1) + \text{tung5maay5(\text{connective})} \]
\[ \text{'last --year --relative -- and -- affix} \]

\[ + gaw4 \ nin5 \ -ge3(\text{head}_2) \pm (+ \text{tung5maay5(\text{connective})} \]
\[ \text{'this year --relative -- and -- affix} \]

\[ + \text{coed1nin2} \ -ge3(\text{head}_3) \ldots \ldots \ldots \ldots \ldots \]
\[ \text{'next year --relative -- affix} \]
\[ (\text{that which belongs to last year, this year and next year)}. \]

2) with RelPhr 31a as filler of each of the head slots in the coordinate phrase:

\[ [\text{cin2 hay4}] \ + \text{wong5 sin1saang1} \ -ge3(\text{head}_1) + \text{tung5maay5(\text{connective})} \]
\[ ['\text{money is }] \text{Wong -- Mister --relative -- and -- affix} \]

\[ + \text{jiong1 sin1saang1} \ -ge3(\text{head}_2) \pm (+ \text{tung5maay5(\text{connective})} \]
\[ \text{Chiang -- Mister --relative -- affix} \]
\[ \text{and --} \]
(That money is) that which belongs to Mr. Wong, that which belongs to Mr. Chiang and that which belongs to me.

9.8. Noun phrases

9.8.1. Endocentric noun phrase 11:

Formula NPhr 11:

\[
\begin{align*}
\text{Lim: LimPhr} & \quad + \text{Rel: RelCl/RelPhr}22/31^25 & \quad \text{Descr: AdjPhr/adj/RelFhr}22/31^26 & \quad \text{H:n} \\
\text{go2 } & \quad \text{sey3 } & \quad \text{jeg3( limiter)} & \quad \text{ji3waax4 } & \quad \text{maay3jo2 } & \quad \text{ge3( relative)} \\
\text{that--four--classifier--recently--bought--relative affix} \\
\text{daay4 } & \quad \text{yuen5( descriptive)} & \quad \text{+ dib4( head)} \\
\text{big--round--plate'}
\end{align*}
\]

(those four big round plates which have just been bought).

24 The individual tagmemes which make up the limiting phrase have already been discussed in 9.4. - 9.5.2. and are not repeated here.

25 See discussion in 9.7.1. as well as fn. 26 below. The relative affix of the relative phrase is \( -ge3 \), not \( -ge5 \), since it belongs to a relative phrase which does not fill the descriptive slot of the noun phrase and it is not in immediate attributive position to the head.

26 See discussion in 9.7.1. When the relative phrase occurs as part of the modified noun phrase in attributive position, it ends in the affix \( -ge5 \), the unstressed allomorph of the relative affix; the stressed allomorph \( -ge3 \) occurs in a self-contained relative phrase. See also fn. 16. If relative phrase 22 is used as filler of the descriptive slot, the tagmemes to be conjoined in relative phrase 22 must not be relative phrase 31a, which denotes possession. Relative phrase 31a in fact fills a possessive slot and not a descriptive one. See 9.8.2. - 9.6.1.3.
2) with relative phrase 31 as filler of the descriptive slot:

\[ + \text{go2 sey3 jeg3(limiter) + ji3wan4 maay3jo2 ge3(relative)} \]

'that -- four -- classifier -- recently -- bought -- relative affix

\[ + \text{laam5 sig1 -ga(descriptive) + dib4(head)} \]

blue -- colour -- relative affix -- plate'

(those four plates which are blue which have just been bought)

3) with relative phrase 22 as filler of the descriptive slot:

\[ + \text{go2 sey3 fug1(limiter) + gaw4 nin2 -ge3(relative)} \]

'that -- four -- classifier for -- last -- year -- relative affix --

\[ + \text{cuen1lung1 -ge3 tung5maay5 muy5 -ga28(descriptive)} \]

torn -- relative affix -- and -- tattered -- relative affix

\[ + \text{ciong1lim2(head)} \]

curtain'

(those four curtains from last year which are torn and tattered)

9.8.2. Endocentric noun phrase 12 (possessive noun/pronoun phrase):

Formula Endocentric NPhr 12:

\[ + ( + \text{Poss:NPhr/pn + Lim:LimPhr)/Poss:RelPhr 31a + Rel:RelCl/RelPhr} \]

\[ 22/31 \pm \text{DescriAdjPhr/adj/RelPhr} 22/31 \pm \text{H:n} \]

---

27 For stylistic reasons it is possible that a speaker may prefer not to use a relative phrase as filler of the descriptive slot if he has already chosen to fill the relative slot in the modified noun phrase. He may then prefer to fill the descriptive slot with an adjective phrase instead.

28 Here, the relative affix immediately before the head is tonally neutralised. In possessive function, this affix is always tonally neutralised except in final position.
It can be seen that after the possessive tagmeme, the rest of the tagmemes in the phrase are the same as those in noun phrase 11 discussed above, but the peculiar combination of limiting phrase with noun phrase or pronoun makes it too complicated to collapse the two phrases (11 and 12), into one formula.

The part of the formula above concerning the possessives can be explained in this way: the possessive tagmeme is an obligatory tagmeme which is manifested either by a noun phrase or pronoun obligatorily followed by a limiter tagmeme manifested by a limiting phrase. Alternatively, the possessive tagmeme is manifested by relative phrase 31, which is then not followed by a limiter tagmeme.

It is possible to treat the filler of the possessive slot which precedes the limiter tagmeme as a possessive noun or pronoun phrase with the optional occurrence of the relative (or possessive) affix -sg.30

Citations of formula NPhr 12:

1) with a noun phrase as filler of the possessive slot followed by an obligatory limiter tagmeme:

\[ + (+ \text{ngo3(possessive)} + \text{y1 gey2 fug1(limiter)}) \]

'I -- this -- few -- classifier for cloth --

\[ + \text{laam4jo2 ge3(relative)} + \text{laam5(descriptive)} + \text{ciong1lim2(head)} \]

torn -- relative affix -- blue -- curtain'

(These few blue curtains of mine which are torn)

---

29 See 9.7.1.

30 In this case with the unstressed and 'toneless' allomorph.
2) with relative phrase $1a$ as filler of the possessive slot
(obligatorily not followed by a limiter tagmemee):

+ ngo3 -ga(possessive) + laanjo2 -ge3(relative)

'I -- relative affix -- torn -- relative affix --

+ laam5(descriptive) + ciong1lim2(head)
blue -- curtain'

(my torn blue curtains)

This particular phrase is a recursive one, since the relative
affix can be added to the head of each noun phrase to turn the head
into a possesive in a theoretically endless process. In practice this
does not happen more than three or four times (See 2.4.). The second
example given above is treated in this way to turn the head 'curtain'
into a possesive tagmemee with a subsequent string of phrase tagmemees
which lead up to a new head. This third example is given below:

3) + ngo3 -ga(possessive$_1$) + laan4jo2 -ge3(relative)

'my -- torn -- relative affix

+ laam5(descriptive) + ciong1lim2 -ga(possessive$_2$)
blue -- curtain -- relative affix

+ muy5jo2 -ge3(relative) + taam3 laam5 sig1
tattered -- relative affix -- light -- blue --colour --

-ga(descriptive) + sin3(head)
relative affix -- thread'

(The tattered light blue thread of my torn blue curtains)
9.8.3. **Endocentric animate noun phrase 13:**

Noun phrase 13 is an animate noun or pronoun phrase consisting of three tagmemes. The first two are, an obligatory head tagmemes manifested by an animate noun phrase, pronoun, or a personified noun and an emphatic modifier tagmemes manifested by ji4gey1 'oneself'. The third tagmemes can be either an instrumental tagmemes manifested by an instrumental word or a paratactic modifier tagmemes manifested by NPhr 14, but not both together. At least one of the three optional tagmemes following the noun phrase must occur.

**Formula NPhr 13:**

\[
+ \text{H:NPhrani/mai/pn/PersonNPhr} + \text{EmphMod:ji4gey1} + (\text{Instr:instrwd} \downarrow \text{ParaMod:NPhr14})
\]

**Citation formula NPhr 13:**

1) selecting the emphatic modifier tagmemes:

\[ + yi1 \text{ go3 fey5 maawl(head) + ji4gey1 (emphatic modifier) \] 

'this—classifier—fat—cat—itself—'

[want2sig4]

[seek a living]'

(This fat cat itself [is seeking its living]).

2) selecting the instrumental tagmemes:

\[ + fey5 maawl (head) + can1bey4 (instrumental) \] 

[man5dow2 yue5seng1]

'fat—cat—own nose—[smelt a fishy smell]' 

(The fat cat, with its own nose, [smelt a fishy smell]).

---

30a

See 9.8.4.
3) selecting the emphatic modifier tagmeme and the paratactic modifier tagmeme:

+ yi1 go3 yan5 (head)  +(± ji4guy1 (emphatic modifier)
'this—classifier—person
himself —

+ saw2 jan3 jan3 (paratactic modifier)  [ daa2 cag4low2]
hand—shaky shaky —  [ beat the thieves]'
(This man himself, his hands all shaky (managed to) [beat the thieves]).

9.3.4. Endocentric noun phrase 14:

NPhr 14 occurs in NPhr 13 above as a paratactic modifier of the head of
the subject of a clause. It is not a filler of the subject slot by itself
though it may be included as part of the subject filler as a modifier. The
structure of NPhr 14 depends on the modification of a head tagmeme by a modifier
tagmeme. The head tagmeme is manifested by a noun phrase pertaining to an animate
body or parts of an animate body while the modifier tagmeme is manifested by
adjective word 53 (see 10.10.1.6.)

Formula NPhr 14:

+ H:NPhrani  + Mod:adjwd 53

Citation Formula NPhr 14:

[ y i go3 yan5], + min4 (head)  + ceng1ceng1 (modifier) [wan5jo2]
'[This man], face — green green — [fainted]'
([This man], his face all green, [fainted]).
9.8.5. **Endocentric noun phrase 25:**

Noun phrase 25 is a conjoined noun phrase with at least two head tagmemes filled by noun phrases or pronouns conjoined by a connective tagmeme manifested by *tung5maay5* 'and', 'with', or its allomorph *tung5* (see Ch.5, fn 44). In theory, this structure is open-ended but style and practical considerations impose a limit to the number of tagmemes that can be conjoined (see 2.4.). In theory, too, different types of noun phrase can be conjoined, but stylistically it is more acceptable to conjoin the same phrase type, e.g., 11 with 11, etc.:

**Formula NPhr 25:**

\[ + H_1:\text{NPhr 11/12/13/pn} + Cn: \text{tung5maay5/tung5} + H_2:\text{NPhr 11/12/13/pn} + ( + Cn: \text{tung5maay5/tung5} + H_2:\text{NPhr 11/12/13/pn}) \]

**Citations of formula NPhr 25:**

1) with NPhr 11 as filler of the head slot:

\[ + yi1 \text{ ting2 fung1(head}_1) + \text{tung5maay5(connective)} + \text{go2} \]

'this--classifier--wind -- and -- that--

did1 yue3 (head}_2)

classifier -- rain'

(this kind of wind and that kind of rain)
2) with a pronoun as filler of the head slot:

+ ngo3(head₁) + tung5(connective) + ney3(head₂)  
'I -- and -- you --

+ tung5maa5(connective) + koey3(head₃)...........

and -- he'.........

(he, you and I)

9.8.6. Endocentric noun phrase 26:

Noun phrase 26 is an item-appositive type in which the multiple heads in the construction have the same referent; besides noun phrases, fillers of the head tagmemes can be relative phrases. The connective tagmeme is manifested by juncture features:

Formula NPhr 26:

+ ItH:Nprop/NPhr 11/12/RelPhr 22/31/31a + Cn:Jcfeat + AppH:Nprop/³¹

NPhr 11/12/RelPhr 22/31/31a

i.e., NPhr 26 consists of an obligatory item head tagmeme manifested by one of the items listed and an obligatory appositive head manifested by one of the items listed.

A restriction on the occurrence of fillers of head slots is that two relative phrases would not occur as fillers of both head slots as

³¹ If a proper noun occurs as the second head, it is likely to be a nickname, like wong5 sim1 saang1, gowilow2 'Mr. Wong, the tall one', where gowilow2, 'the tall one' is also a proper noun, although this fact is obscured by the translation.
they would not have the same referent. Only one of the head tagmemes can be filled by a relative phrase in any one instance of this item-appositive phrase.

Citations of formula NPhr 26; the fillers are mentioned together with the function tagmemes in the citations below:

1) low3 wong2(Item:proper noun) + pause(Cn:Jcfeat) + ngo3-ga
   'old --Wong -- jcfeat -- my --
   coey2(appositive: NPhr 12)
   cook'
   (Old Wong, my cook)

2) go2 go3 hung5 -ge3(It:RelPhr 31) + pause(Cn:Jcfeat)
   'that--classi-fier --red -- relative affix -- Jcfeat --
   + ngo3-ga ping5go2(App:NPhr 12)
   my -- apple'
   (that red one, my apple)

9.8.7. Endocentric noun phrase 27:

Noun phrase 27 consists of two obligatory head tagmemes manifested by noun words which are semantically linked.
Formula NPhr 27:

\[ + H_1: \\text{Inseman} + H_2: \\text{Inseman} \]

Citation NPhr 27:

1) \( + \text{toy}_{2}(\text{head}_1) + \text{dang}_{3}(\text{head}_2) \) [maay_{4}saay_{3}]
   
   'table -- chair [sold out]' 
   
   (tables and chairs [(are) sold out]).

2) \( + \text{saan}_{1}(\text{head}_1) + \text{scey}_{2}(\text{head}_2) \)
   
   'mountain -- water' 
   
   (rivers and lakes)

9.8.7.1. Endocentric noun phrase 27a:

Noun phrase 27a consists of two obligatory head tagmemes manifested by reduplicated noun phrases which are semantically linked. This phrase, therefore, is clearly related to NPhr 27 discussed above, but it is not possible to collapse the two phrases into one formula as not all the nouns which fill head slots in NPhr 27 can be reduplicated in this way.

Formula NPhr 27a:

\[ H_1: \text{RedNPhrase}_{\text{man}} + H_2: \text{RedNPhrase}_{\text{man}} \]

Citation formula NPhr 27a:

\[ + \text{toy}_{2} \text{toy}_{2}(\text{head}_1) + \text{dang}_{3} \text{dang}_{3}(\text{head}_2) \] [maay_{4}saay_{3}]

'table--table -- chair--chair' [sold out ]

(tables and chairs [are sold out]).
9.9. Endocentric verb phrase 11:

This verb phrase consists of two tagmemes: an optional tagmeme filled by a modal, and an obligatory head tagmeme filled by any transitive or intransitive verb.

Formula VPbr 11:

\[ + \text{Mdl:mdl} + \text{H:vt/vi} \]

Citations of formula VPbr 11:

1) \[ \text{ho2mang5 (modal)} + \text{haang5 (head)} \]
   'can — walk' (able to walk)

2) \[ [\text{ney3}] + \text{ho2yi3 (modal)} + \text{oeedimen2 (head)} \]
   '\[\text{You}\] can — go out'
   \[([\text{You}] \text{can go out.}) \]

---

32 See 9.1. and fn.22 for mention of verb phrase being coincident with clause.

33 See end of 10.7. (p.285) for the justification of setting up a class of modals as distinct from a class of verbs.
9.10. **Endocentric negative phrase 11:**

Formula NegPhr 11: \(^{34}\)

\[+(\text{Neg}_1:\text{negwd} 4^1\text{Neg}_2:\text{negwd} 4^1a)^{36}\]

Citations of formula NegPhr 11:

1) selecting the first negative tagmeme:

\([\text{nge}3]+\text{m5oy3(negative 1)[hoey3]}\).

\([\text{I} ] \text{ won't} \quad \text{[go]}. ([\text{I} ] \text{ won't [go]}].\)

Whenever the first negative tagmeme is selected alone, the phrase can fill the base slot of an elliptical sentence since it is relatable to a larger linguistic context where a verb is mentioned.

2) selecting both negative tagmemes; the second tagmeme is filled by negwd41a:

\([\text{hoey3}]+(\text{m5hang2(negative 1)+m5fey5(negative 2)})\)

\('[\text{He}] \text{ won't} \quad -- \not\text{ not fat}'\)

\(([\text{He}] \text{ won't avoid getting fat}).\)

\(^{34}\) It was considered at one point to describe negation and interrogation as properties of the verb phrase, but because negation and interrogation involve verbs as well as adjectives, it was decided that instead of collapsing them all into one complicated formula, it was better to treat them separately as verb phrases, adjective phrases, negative phrases and interrogative phrases.

\(^{35}\) Negwd 41 is a negative modal; (see 10.10.8. - 10.10.8.1).  

\(^{36}\) Negwd 41a is a negative adjective or verb. See 10.10.8. - 10.10.8.2.
When the second negative tagmeme is selected, then NegPhr 11 is a simultaneous filler of the negative and predicate slots at clause level (in the negative clause).

There is a restriction on the optional occurrence of the second negative tagmeme: if the first negative tagmeme is manifested by negwd 41 mow3, then the second optional tagmeme cannot occur.

A note is made here that there is also a negwd 41 a mow3, which, unlike the negwd 41 mow3, is capable of being aspected, e.g., mow3jo2 'died'.

9.11. Interrogative phrases

9.11.1. Endocentric interrogative phrase 21:

This phrase consists of three obligatory tagmemes: a head tagmeme manifested by an unaspected verb, unaspected adjective, or modal, an interrogative tagmeme manifested by an infix -m5-, and a reduplicated head tagmeme manifested by the same unaspected verb, adjective or modal (as the case may be) that began the phrase. (Aspected verbs are dealt with in 10.10.6.1, while aspected adjectives are dealt with in 10.10.1.5.1.)

Formula IgPhr 21:

\[ + H: \text{unaspv/adj/ml} + Ig: \text{inf-m5-} + \text{RedH:unaspv/adj/ml} \]

37 The modal is never aspected.
Citations of formula IgPhr 21:

1) with an unaspected verb as filler of the head and reduplicated head slots:

\[ + \text{ley5(head)} + \underline{-m5-} + \text{ley5(reduplicated head)} \]

'come -- interrogation -- come'

(are (you etc.,) coming?)

2) with unaspected adjective as filler of the head and reduplicated head slots:

\[ + \text{fey5(head)} + \underline{-m5-} (interrogation) + \text{fey5(reduplicated head)} \]

'fat -- interrogation -- fat'

(are (you etc.,) fat?)

3) with a modal as filler of the head and reduplicated head slots:

\[ + \text{hay4(head)} + \underline{-m5-} (interrogation) + \text{hay4(reduplicated head)} \]

'is -- interrogation -- is'

(is it?)

9.11.2. Endocentric interrogative phrases 12 and 12a:

Whereas in the case of interrogative phrase 21, there were two heads (hence the treatment of interrogative phrase 21 as a coordinate structure), in the case of interrogative phrase 12 and 12a, there is
only one head tagmeme and an interrogative tagmeme manifested by that occurrence of interrogative phrase 21 when a modal fills the head and reduplicated head slots of the phrase. The manifestation of the interrogative tagmeme of interrogative phrase 12 is referred to as the 'interrogative modal phrase' (IgMdlPhr). The head tagmeme of interrogative phrase 12 is filled by an unaspected verb or adjective but the head tagmeme of interrogative phrase 12a is filled by either an unaspected or aspected verb or adjective. In the case of interrogative phrase 12a, only the modal hay4 can occur as the modal in the interrogative modal phrase which is the filler of the interrogative slot.

9.11.2.1. Formula IgPhr 12:

+ Ig: IgMdlPhr + H: unaspv/adj

Citations of IgPhr 12:

1) + siong2 m5 siong2 (interrogation) + hoey3 (head)
   'do (you etc.) want to -- go'
   (do (you etc.) want to go?)

2) + hang2 m5 hang2 (interrogation) + wan2 sig4 (head)
   'are (you etc.) willing to -- seek a living?'
   (are (you etc.) willing to seek a living?)

9.11.2.2. Formula IgPhr 12a:

+ Ig: hay4 m5 hay4 + H: unasp/asp v/adj

See e.g. (3) above.
Citations of formula IgPhr 12a:

1) with aspected verb as filler of the head slot:

+ hay4m5hay4 (interrogation) + sig4gan2 (head)
  'are (you etc.) eating'
  (are (you etc.) eating?)

2) with unaspected verb as filler of the head slot:

+ hay4m5hay4 (interrogation) + taw2long5 (head)
  'have a rest'
  (are (you etc.) having a rest?)

3) with aspectual adjective as filler of the head slot:

+ hay4m5hay4 (interrogation) + saw3jo2 (head)
  'are (you etc.) got thin'
  (have (you etc.) got thin?)

9.11.3. Endocentric interrogative phrase 13:

This is an interrogative noun phrase which consists of two tagmemes: an obligatory interrogative modifier tagmemes manifested by an interrogative pronoun and an obligatory head tagmemes manifested

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39 The translation implies that the verb is continuative but this is not so.

40 Examples of these interrogative pronouns are given in 8.5.2.8., no. (3). Those which begin with gev2- and bin1 are still productive and are given full treatment on the word level as Wh-words (see 10.10.11.2.).
by a noun. This type of phrase is comparable to English Wh-phrases like
what sort of man? which one? Unlike the English Wh-phrases, however, IgPhr 13
has subject, object and complement double function at clause level (see §8.3.6.2.-
§8.3.6.4.) See also §8.5.2.8., no(5).

Formula IgPhr 13: + IgMod:igpn + H:n

1) + gey2daw1 (interrogation) + yan5 (head) [ley5]
   'how many -- people -- [come']
   (How many people [are coming?)

2) [ ney3 daa2 ] + bin1ge3 (interrogation) + say3man1jay2 (head)
   '[you beat] -- which one -- child'
   (Which child [do you beat?])

3) [ ney3 ying3caw5 ] + bin1way2 (interrogation) + sin$saang1 (head)
   '[you respectfully -- which respected -- teacher'
      receive] one
   (Which teacher [are you going to respectfully receive as a guest?])

9.11.4. Exocentric interrogative phrase 34:

This is a relater axis interrogative prepositional phrase consisting of two
obligatory tagmemes; a relater tagmeme manifested by a preposition and an
axis tagmeme manifested by an interrogative adverb or interrogative pronoun.
The interrogative adverbs are those which involve location, time and manner
in double function.41

Formula IgPhr 34:

+ Sel:prep + Ax:igadv/igpn

41 See, for instance, nos. (4) and (6) in §8.5.2.8.
Citations of formula IgPhr 34:

1) with locative double function:
+ hey2 (relater) + bin1sue3 (axis) [jow4,gung1]
'at — where — [work]' (Where [do you work?])

2) with manner double function:
+ jow4 (relater) + mad1ye3 (axis) [m5ley5]
'relater — what [not come]' (Why [won't (you) come?])

3) with temporal double function:
+ joy4 (relater) + bin1say3 (axis) [jow4, low3fu2]
'at — which incarnation [become tiger]' 
(In which incarnation [(did you) become a tiger?])

9.12. Temporal phrases

9.12.1. Endocentric temporal phrase 11:

This phrase has two obligatory tagmemes: a temporal specifier tagmeme manifested by cin5 'before this time' and a head tagmeme manifested by a temporal noun denoting time. In addition, there are optional deictic and numeral tagmemes manifested by a deictic and numeral word respectively.
As denoted in the formula below, the deictic and numeral tagmemes, if they do occur, must do so together:

Formula TempPhr 11:

\[ + Dc:de + Tempspec:cin5 + Nu:Num/num + H:tempn \]

This preposition is homophonous with the verb jow4 'make' and it should not be confused with that word, which can occur with mad1ye3 in the clause jow4 mad1ye3 'what are (you etc.) making?' As interrogative phrase 34, however, jow4 mad1ye3 means 'why?' 'in what manner?'
Citations of formula TempPhr 11:

1) with all possible tagmemes:

\[ \text{yi1( deixic) + cin5(temporal specifier) + ge\,y2(numeral) + nin5(head)} \]

'this -- before this time -- few -- year'
( these few years which have just passed)

2) with temporal specifier and head tagmemes only:

\[ \text{cin5(temporal specifier) + yad4(head)} \]

'before this time -- day'
(The day before yesterday [he came])

9.12.2. Endocentric temporal phrase 12:

This phrase has two obligatory tagmemes: one is the head tagmeme manifested by a temporal noun and the other is either a deixic or a numeral tagmeme (or optionally both). This is denoted in the formula below:

Formula TempPhr 12:

\[ \text{+ ( + Dc:dc + Nu:Nu/nu) + Hi:tempn} \]
Citations of formula TempPhr 12:

1) with all possible tagmemes:

+ (yi1(deictic) + saam1 semy3(Numeral)) + mean3(head)

'this — three — four — night'

(these three or four nights)

2) with the deictic tagmem only as one of the two possible modifier tagmemes:

[ngo3 gey3dagl] + go2(deictic) + yad4(head)

'[I can remember] that — day'

([I can remember] that day)

3) with the numeral tagmem only as one of the two possible modifier tagmemes:

+ gey2 sab4 (Numeral) + nin5(head)

'few — ten — year'

(a few decades)


This phrase is a theoretically open-ended structure (with stylistic and practical limits to the number of tagmemes that can occur) consisting of at least two obligatory head tagmemes: the first manifested by reduplicated temporal word 51 and the second manifested by another

43 For examples of reduplicated temporal words 51 see 10.10.9.3. The only reduplicated temporal word that cannot occur in this kind of phrase is taw5taw2. It may be because this word does not undergo a complete reduplication since there is tone modification on the second syllable, whereas in all other cases of reduplicated temporal words, each reduplicated morpheme has the same tone as the base morpheme.
reduplicated temporal word 51. After the first reduplication, it is in theory possible to have a third head tagmeme manifested by another reduplicated temporal word 51 which must then be obligatorily followed by a fourth head tagmeme manifested by yet another reduplicated temporal word 51, and so on.

However many pairs of head tagmemes occur in the phrase, it must be remembered that each head tagmeme must be manifested by different temporal words. One can construct a long phrase in this way for rhetorical effect until one runs out of possible reduplicated temporal words which will go together in the phrase.

Formula TempPhr 23:

\[ +H_1: \text{redtempwd 51} + H_2: \text{redtempwd 51} \pm ( +H_3: \text{redtempwd 51} + H_4: \text{redtempwd 51}) \pm ( +H_5: \text{redtempwd 51} + H_6: \text{redtempwd 51}) \]

Citations of TempPhr 23:

1) with only two head tagmemes:

\[ [\text{koey3}] + \text{yad4yad4(head 1)} + \text{ye4ye4(head 2)} \]

\[ \text{[dug4sue1]}\]

'[He ] every day -- every night -- [study]'

(every day and every night [he studies]).

2) up to six head tagmemes:

\[ + \text{jw1jw1(head 1)} + \text{maan3maan3(head 2)} \pm (+ \text{yad4yad4(head 3)}) \]

'every morning -- every night -- every day --
+ ye4ye4(head 4) + ( + nin5nin5(head 5) + say3say3(head 6) )
evpy every night -- every year -- every incarnation.....'
( every morning, every night, every day and every night, every
year, every incarnation).

9.12.4. Exocentric temporal phrase 34:

The present treatment of temporal phrase 34 as an exocentric
relater-axis (RA) type phrase differs from previous treatments of
relater-axis phrases in that hitherto it has been found in the litera-
ture on the subject (e.g. Cook, (1969), (1965) ), that relater-axis
type phrases have one relater and one axis. In this particular phrase,
however, it is necessary to posit two axes (since neither can be con-
sidered a head and therefore the phrase is not an endocentric type)
sharing one relater, the preposition dow3 'from - until'.

In English, such a situation does not arise since one would posit
two RA phrases: 'from x till y' whereas Cantonese has the one
relater in a phrase. A similar treatment is given of the locative
phrase in 9.13.3.

Formula TempPhr 34:

+ Ax1:TempPhr/temp + Rel:prepdown3 + Ax2:TempPhr/temp

44 This phrase would be a possible beginning to a typical Buddhistic
lament that no matter what one does one cannot avoid being reborn;
equally possibly it could be the beginning of a materialistic
lament that no matter how hard one works there are no rewards.
Citation formula TempPhr 34:

\[ + \text{sey}_2 \text{ dim2} \text{jung}_1 (\text{axis 1}) + \text{dow}_3 (\text{relater}) + \text{lug}_4 \text{ dim}_2 \]

'four o'clock -- from -- until -- six--o'clock

(axis 2) [yam2 caa5]

[drink tea].

(from four to six [have tea]).

9.13. **Locative phrases**

9.13.1. **Exocentric locative phrase 31:**

Locative phrases are all exocentric (EA) phrase types. Locative phrase 31 consists of two obligatory tagmemes: a relater tagmeme manifested by a locative preposition word and an axis tagmeme manifested by a locative phrase or word (which includes place names).

Formula LocPhr 31:

\[ + \text{Rel:locprep} + \text{Ax:LocPhr/loc} \]

Citations of LocPhr 31:

1) \[ + \text{hey}_2(\text{relater}) + \text{go}_2 \text{ dad}_3 \text{ deng}_4 \text{fong}_1(\text{axis}) [\text{yaw}_3 \text{ si}_4] \]

'at -- that--classi-- place [something happened]' fier

(at that place [something happened]).
2) + gan4 (relater) + yıldow4 (axis)
   'near — here' (near here)

9.13.2. Exocentric locative phrase 32:

Locative phrase 32 is a locative noun phrase and has two obligatory
tagmemes: an axis tagmeme filled by a noun phrase or noun and a relater
tagmeme filled by any locative phrase or word:

Formula LocPhr 32:

+ Ax:NPhr/n + Rel:LocPhr/loc

Citations of formula LocPhr 32:

1) + cet (axis) + yab4bin4 do2dow4 (relater)
   'car — inside — there'
   (in the car)

2) [koey3 jue4] + saan1deng2 (axis) + go2sue3 (relater)
   '[He lives] mountain top — there'
   ([He lives] at the top of the mountain).

3) [ngo3] + saan1baa1 (axis) + sue3sue3 (relater) [haang5go3]
   '[I] jungle — everywhere [walked]'
   ([I have walked] all over the jungle.)

9.13.3. Exocentric locative phrase 33:

This locative phrase is comparable in structure to exocentric
temporal phrase 34 in that there are two axis and one relater tagmemes.

See 9.12.4.
The axis tagmemes in this case are manifested by locative phrases or words, including place names.

Formula LocPhr 33:

\[ + A_x^1: \text{LocPhr/loc} + \text{Rel:prep} \text{dow}_3 + A_x^2: \text{LocPhr/loc} \]

Citations of formula LocPhr 33:

1) \[ + \text{loen5doen1 (axis 1)} + \text{dow}_3 (\text{relater}) + \text{baa}1\text{ley5 (axis 2)} \]
   'London -- from-until -- Paris'

   [\text{how2 yuen3}]
   [\text{very far }]
   (from London to Paris [(it is) very far]).

2) \[ + \text{yi1 daad3 dey4fong1 (axis 1)} + \text{dow}_3 (\text{relater}) + \text{go2sue}3 (\text{axis 2}) \]
   'this--classi--fier -- place -- from-until -- there'
   (from here to there).


9.14.1. Endocentric adverb phrase 21:

This phrase consists of two head tagmemes, one obligatory and one optional, manifested by adverb word 11 in each case. If only one head tagmeme is selected, the result is the minimal adverbial phrase.

Formula AdvPhr 21:

\[ + H_1: \text{adv1} \pm H_2: \text{adv11} \]
Citation formula AdvPhr 21:

\[ \text{[yiw2gwaay3]} + \text{juen1dang1 (head 1)} + \text{gaag3ngaam2 (head 2)} \]

\[ \text{\'ogre \quad deliberately \quad -- \quad by force} \]

\[ \text{[cow2 gung1jue2]} \]
\[ \text{[marry the princess]} \]
\[ \text{(The ogre deliberately by force [married the princess]).} \]

9.14.2. Endocentric adverb phrase 22:

This adverb phrase consists of at least two head tagmemes manifested by reduplicated adverb words 52b (See 10.10.12.4.2.), and connective tagmemes manifested by yaw4 'and'. This is theoretically an open-ended structure, the same restrictions on the actual number of occurring tagmemes being similar to those of endocentric temporal phrase 23 discussed in 9.12.3. except that in the present case, after the second head tagmeme, more head tagmemes do not need to occur in pairs as long as they are accompanied by the connective tagmemes.

Formula AdvPhr 22:

\[ + \text{Cn:yaw4} + H_1:\text{redadvwd 52b} + \text{Cn:yaw4} + H_2:\text{redadvwd 52b} + \]
\[ ( + \text{Cn:yaw4} + H_3:\text{redadvwd 52b}) \]

---

46 See Ch.5, fn. 44.
Citation formula AdvPhr 22:

\[ \text{[siw}2\text{je2]} + \text{yaw4 (connective) + si1si1man5man5 (head 1)} \]

'[lady] and -- elegantly --

\[ \text{+ yaw4 (connective) + haag3haag3hey3hey3 (head 2)} \]

and -- politely --

\[ \pm ( + \text{yaw4 + say3say3seng1seng1)} [\text{daab3ying3}] \]

and -- in a soft-spoken manner [reply]

([The lady], decorously, politely and gently [replied]).

9.15. Exocentric hortatory phrase 31:

The hortatory phrase is an RA phrase type consisting of two obligatory tagmemes: a relater tagmeme manifested by a hortatory word and an axis tagmeme manifested by a noun phrase, a noun or a pronoun. The hortatory phrase is not a filler of a clause-level tagmeme but of a sentence-level tagmeme.\(^47\)

Formula HortPhr 31:

\[ + \text{Rel:hort + Ax:NPhr/n/pn} \]

Citations of formula HortPhr 31:

1) \text{yaw5dag1 (relater) + koey3 (axis) [dow2oin2]} \]

'let -- him [gamble]'

(let him [gamble]).\(^48\)

\(^47\) See 5.4.2. and Ch. 5., fn. 47.

\(^48\) The translation makes it seem as if the hortatory word is a verb, but this is not so; it is merely a problem of translation.
9.16. Exocentric dependent purpose phrase 31:

The dependent purpose phrase is an RA phrase type consisting of two obligatory tagmemes: a relater tagmeme manifested by a purpose word tung5 or bey2 and an axis tagmeme manifested by a noun phrase, a noun or a pronoun. The dependent purpose phrase fills a slot in the dependent personal purpose clause (see 6.8.1.2.1.).

Formula PurpPhr 31:

+ Rel:tung5/bey2 + Ax:NPhr/n/pn

Citations of formula PurpPhr 31:

1) [ngo3 ley5 loen5doen1] +tung5 (relater)+ng03ga pang5yaw3(Axis) [bunlug1]
   'I come to London] for the purpose — my — friend — [move(his)house]
of (and) for
   ([I come to London] for the purpose of (helping) my friend [move house]).

2) [low3daw4 wan2 cin2]+bey (relater) + jay2 (axis) [hiong2fug1]
   'A father earns money]for the purpose—son — [becomes prosperous]' of (and) for
   (A father earns a living] for the purpose of (making)
   (his) son — [ become prosperous]).

3) [ngo3 bowl soey2]+tung5 (relater) + ney3 (axis) [saay2 saam1].
   'I boil water] for the purpose of—you — [wash clothes].
   ([I boil water] in order to[wash clothes]for you).
CHAPTER 10: The word level

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10.1. Definition of the word

The word in Cantonese includes those tagmemes below the phrase which typically fill phrase-level slots in the grammar. Such tagmemes are manifested by either roots, stems, root plus affix or stem plus affix. This definition differs from Bloomfield's 'minimal free form' which Elson and Pickett follow, in that it includes words like the deictic yi1 'this' which can only occur as a filler of the limiting phrase. My definition also differs from Longacre's definition of the word, in that it includes forms which are not capable of word-level expansion, such as the deictic and the numeral.

10.2. Root, stem, affix

Roots are either free or bound.

The free root (or simple stem) is a near-equivalent to Bloomfield's 'minimal free form' in that it can nearly always occur by itself. Free roots like the deictic and the classifier, as mentioned above, cannot do this but they are nevertheless regarded as words in that they fill slots on the phrase level. Bound roots can neither occur by themselves nor can they fill slots on the phrase level.

The stem can be simple, in which case it consists of one root, or it can be compound, i.e., consisting of more than one root, like the noun stem hag1yan5 'Negro'. In this example, the noun stem is made up of the adjective root hag1 'black' and the noun root yan5 'person'.

---

1 Elson and Pickett, (1965), 9.1.
2 See 9.5.1.
3 Longacre (1964) 9.1. Longacre rejects Bloomfield's 'minimal free form' criterion for word on different grounds from mine. He says that Bloomfield's definition would include as words 'simply roots (e.g. English of, the, there, rather}'. As Lyons points out, (Lyons 1968, 5.4.9.), Bloomfield's 'minimal free form criterion will not include such forms as 'the' and Bloomfield tried to circumvent the problem by introducing another criterion of 'parallelism' with forms which are classified as words by the 'minimal free form criterion. In the discussion of word level that follows, however, simple roots which are not potentially expandable are left out, because they are not constructions, but merely words of one root. They are however, accounted for in the word-level matrix and inventory (fig.9). In this I follow Elson and Pickett (1965) 9.2.
The principle of 'uninterruptibility' can be used here to support the word status of this example. If this example were a noun phrase instead, the first part would be readily separated from the second by the insertion of further adjectives, but this is not the case, and so we accept the word status of baglyan.

As stated on p. 273, roots can be free or bound: i.e., they can occur either by themselves, so that free root, simple stem and word are all coincident, or else they must combine with another root, either free or bound, to form a word; by itself the bound root is only part of a word. It is, however, a filler of a nuclear slot, not a satellite slot.

Bound roots are recognized partly by Cowles, who explains the use of the symbol + to indicate that certain syllables 'may be very common characters', but 'are not commonly used alone in speech. Such are usually understandable only when combined with other syllables'.

The affix is like a root in that it too, is a single morpheme, unlike a compound stem which has at least two, but the affix is always a bound form. It can fill slots on both word and phrase levels (the latter case can be seen in the relative and negative phrases), but unlike the root, the affix is a 'recurring partial' which gives repetitive information (e.g., negativity, relativity, verbal aspect). While roots (if they are expandable) and stems occupy nuclear positions in the word, affixes occupy satellite positions in the word.

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4 Lyons, (1968), 5.4.10.
5 Cowles (1965), p. xii. See also 10.10.1.4. (pp.295-296).
6 Longacre, (1964), 9.0.
10.3. Exclusion of semantic and lexical restraints in the order of roots in word compounds

The same kind of rules cannot always be made for lexis as can be made for syntax, although in the area of word formation, the two areas of study do have a meeting point. In studying word formation, statements may be made about:

1) the behaviour of words as institutionalized units

2) the expected development of words on the analogy of existing word forms.

In the following chapter, the aim is to make statements of the first type. Statements of the second type are not made in the body of the chapter but the topic will be briefly discussed in this section.

Up to a certain point, statements about the expected behaviour of words on the analogy of existing word forms resemble syntactic statements in that the generation of word forms (akin to sentence formation) is involved. Furthermore, it is not always possible to make a sharp division between statements of the first type and statements of the second type, but an attempt is made to concentrate on statements of the first type in the description proper. The difficulty involved is expressed in Strang (1962), p.299:

'We know, in a sense, by heart, such composites as blackbird, blackboard; we are perfectly well aware that we have met them before. But in a normal day's talk or reading we will encounter and use hundreds of forms about which we cannot be sure whether they are learned or new (generated); they are in this respect like sentences rather than words. They represent the area in which history and structure mingle most
inextricably. The properties in which it resembles syntax bind WF
[word formation] as process, like WF as structure, into the complex
whole which is given *état de langue*.

In considering the expected behaviour of words on the analogy of
existing word forms, the question of acceptability arises. That is to
say, if certain noun compounds, for instance, are made up of two noun
roots, no attempt is made in the following chapter to subclassify these
noun roots into those which can occur in first position and those which
can occur in second position, as certain speakers would accept noun
compounds that other speakers would reject on semantic and lexical
grounds. This topic in itself is worthy of study but is clearly outside
the scope of the present work. Marchand (1960) has dealt with part of
the problem for English by exhaustively listing existing word types
with different kinds of compounding and affixation, adopting a lexical-
grammatical approach.

Examples relating to acceptability may be given for English and
Cantonese:

In English, there are noun compounds like *boot-tree*, *birdhouse,*
*houselfly* and *housewife*. It does not seem a profitable study to attempt
to make grammatical rules in subclassifying noun roots which occur in
first position, second position or both positions in such noun compounds.
If a long enough list is compiled it is very probable that certain roots
will be seen to occur only in one or the other or both positions in the
compound. This is not due to grammatical constraints but rather to
semantic and lexical constraints. These latter constraints are further
related to the question of acceptability.

In Cantonese, noun word 21a (10.10.2.2.1.) is made up of two free
roots, the first of which may be an adjective root or noun root. An
eexample of such a word compound made up of two noun roots is *tijdliow4*.
'iron—road' giving the meaning 'railway'. There is no grammatical rule for Cantonese that says that tid³ 'iron' belongs to a subclass of noun roots which can only occur in first position in a compound; neither is there any grammatical rule which would subclassify low4 'road' as the kind of noun root which can only occur in second position in compounds. If a situation arose in which iron were used for roads, that kind of iron would most certainly be called low4tid³ 'road—iron'.

In Sierra Popoluca, however, there appears to be grammatical reasons why roots of the intransitive verb stem are subclassified according to the order in which they occur in the compound. It is stated in Elson and Pickett (1965), p. 96, that 'roots may be subclassified depending on whether they occur in compounds or not and if so, whether first or second'. Whereas Elson and Pickett subclassify some verb roots in this way, they do not subclassify all roots in this way. On p. 97 of the same work, the 'intransitive verb stem type 2' and the 'transitive verb stem type 2' consist of roots which are not subclassified in this way, suggesting that there are no grammatical reasons for such subclassification.

An analogy can be found in English where grammatical subclassification along the lines discussed in this section would be justified. Marchand (1960), p. 55 discusses compound verbs and lists verbs in English which are preceded by out-, over- and under-. Examples of these compounds are outlook, outgrow, outstay, overhear, oversee, overlook, overflow, understand, undertake and underwrite. Some overlapping does occur, as for instance, in the case of the terms undertake and overtake, so that take appears to combine with both under- and over-. Marchand, p. 57, comments that this is unexplained as 'it may originally have been used of a falcon or other bird of pray[sic] chasing a quarry and finally 'over-taking' it. Formatively then, the verb would belong to the type overshadow.'
By and large, in Marchand's lists, it is possible to separate verb roots which do or do not occur with each of the morphemes out-, under- and over-. When statements like this can be consistently and profitably made for a language, they should be made.

In Cantonese, however, such statements do not appear necessary as the language does not behave in a way to justify subclassification of roots according to the order in which they occur in word compounds. The only restriction which need be stated is that in the case of adjective word 23b (10.10.1.3.2.) an adjective compound consisting of a free intransitive verb root and a free noun root, intransitive verb root 12 (filler of intransitive verb word 12 (in 10.10.5.1.1.) cannot occur as filler of the first core slot. This is because, grammatically, intransitive verb root (and word) 13 cannot be followed by a noun as complement.

In all other cases of compounds, in principle all the forms can occur in all the places referred to, though semantic and lexical restraints rule out, for the time being, large numbers of possible compounds.

For example, in English, among the compounds which begin with boot the author has not yet come across the compound bootchair, but given a situation when a chair is manufactured for the express purpose of either 1) putting one's foot on while putting on a boot or 2) stacking boots on or 3) allowing somebody to sit in before 'being given the boot', such a term may be coined and used (with varying degrees of acceptability to different native speakers of English) within the language. As pointed out above, in Cantonese, factors such as change of motivation, as in the case of the (at present) non-existent compound low4tid3 'road iron' can incorporate such non-existent compounds into the language.
In general, within an endocentric compound, the modifier precedes the head.

10.4. Limitations of analysis

The main problem which arises in discussing the word in Cantonese is that a large proportion of words which are disyllabic or polysyllabic may have once been dimorphemic and polymorphemic but which have undergone a kind of semantic 'fossilization' so that native speakers do not nowadays identify the individual syllables with separate meanings but in fact identify the whole di- or poly-syllabic word with one meaning or area of meaning.

In addition to this kind of word, i.e., the sort which may have had more than one meaningful unit in the past, are those polysyllabic words which cannot have had any individual meanings to each syllable, but because of the peculiar writing system of Chinese, each character can be forced into a meaning mould if necessary although all that may be required from a syllable is its sound. Such an example is yi5ga1 'now' which is written with two characters and which 'mean' 'yet' (a literary form) and 'family' respectively. Such nonsense meanings, if taken into account, would give a false picture of the build-up of words.

Examples like the last one can be seen even more clearly in the transliteration of foreign names, such as the names of countries. The name for 'Ireland' is oy3villan5; if one were pressed for the 'meaning' of each syllable one would give the dictionary meanings of each syllable, resulting in 'love + you (archaic) + orchid', but native speakers do not
take these meanings into consideration when they refer to Ireland in Cantonese. The word exists solely by virtue of its nearness in sound to the foreign word.\(^7\)

In this analysis of the word, it is proposed to treat as one root (and one morpheme) words like those most recently discussed as well as those which may have had individual meanings to each syllable but which have now a 'fused' meaning. The reason for not analysing such words further than their present-day structure is that a further treatment of their structure along diachronic lines would be an etymological study which does not have its place in what is basically a synchronic treatment of the language.

Y.R. Chao\(^8\) observes that 'in the history of Chinese writing, two types of one-many and many-one relationships between character and word deserve special notice. These are the so-called loan characters and enlarged characters. Where an abstract idea was difficult to indicate by a pictograph or ideograph, a character for a homonymous word with a picturable meaning was 'borrowed'. Thus, the character for the word meaning 'burn' was used also for a homonymous word 'thus, so', resulting in a one-character-two-word relationship. Later, it was found convenient to differentiate the two by adding a part meaning 'fire' to the character for the word 'burn', thus producing an enlarged character'.\(^8\)

This situation, as Chao goes on to point out, was made worse by over-zealous schoolmasters who insisted on the more recent practice of overdifferentiation; in ancient texts it was quite usual for one simple

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7 Other things being equal, coiners of names for countries do attempt to produce flattering transliterations, such as a character meaning 'hero' for England and a character meaning 'virtue' for Germany.

8 Y.R. Chao (1946), p.11.
character to serve several extended meanings, but later scholars preferred characters which were difficult to write (in the sense that they had more strokes than the ancient ones) and this tendency was encouraged by schoolmasters. Chao observes that 'just as a schoolmaster would never permit the writing of the word /cek/ as cheque when used in the sense 'stop', so the word hui\(^3\) must be written differently according as it means 'destroy' or 'destroy by fire'. [ 毁 and 毀 respectively]. The only difference in the case of Chinese is that such cases are the rule and not the exception'.

Although Chao cites his examples mainly from Mandarin the same situation is true for Cantonese. Those words which are still recognizably polymorphemic, are, of course, analysed as such.

10.5. The word as a phrase-level tagmeme and the word as a construction in the grammatical hierarchy

The word as defined in 10.1. included 'those tagmemes below the phrase which fill phrase-level slots in the grammar' and included words like the deictic yi1 'this' and the numeral in that they were fillers of slots on the phrase level. These words, it must be observed, do not exhibit word-level constructions in that they are simple roots which are not capable of expansion on the word level by further compounding, either through the addition of other roots or through affixation.

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9 There is, admittedly, a certain element of arbitrariness about this decision.

10 Elson and Pickett, (1965), p.76.
In this study, only words which manifest a word-level construction in the grammatical hierarchy are discussed and given formulaic representation. All other words which are single morphemes (simple roots) cannot be further analysed as they are not constructions. Hence the word yi1 'this' cannot be analysed further into morphemes and therefore does not have a formulaic representation at word-level. At phrase level, however, it occurs as a filler of the limiting phrase and is discussed fully as taking part in phrase construction.

10.6. Syntactically independent words and syntactically dependent words

Words in Cantonese can be syntactically independent, i.e. they can occur alone (Bloomfield's minimal free forms), and with the appropriate intonation tagmeme 11 they are the base fillers of sentences.

Words in Cantonese can also be syntactically dependent, i.e. they typically occur as fillers of phrases and only very rarely as base fillers of a dependent elliptical sentence. (See 5.7.1.). Examples of such words are the deictic yi1 'this' and any classifier, as these words (except in the special case just mentioned) can never occur alone, only as fillers of the limiting phrase, as in yi1 go3 'this one', and yi1 geY2 go3 'these few'. Although these words do not exhibit word-level constructions (see 10.5. above), they are included in the word-level matrix and inventory below to provide a source of reference to the stock of word classes in the language.

It must be noted too, that since word order is a defining feature in deciding word classes, syntax has been taken into account in dividing words into categories. It will be noticed that adjectives, for instance,
are 1) classified under the general headings of root + root, etc., and 2) classified according to their external distribution in the phrase, e.g., whether they can occur both in attributive and predicative positions or in predicative position only.

Only words which exhibit word-level constructions are discussed in the rest of this chapter and given formulaic representation. Those which do not are included in the matrix, but as they are not potentially expandable at word-level, they are not discussed any further except to justify differences in numbering on syntactic grounds. They are dealt with on the phrase level in Chapter 9.

All the syntactically dependent words below (except for reduplicated classifier word 54 and reduplicated locative word 56) as well as the modal, which is a syntactically independent word, are therefore not discussed in this chapter as they are not potentially expandable at word-level.

10.7. Further criteria for setting up word classes

In 10.2. it was seen why the form hag1yan5 'Negro' was considered a noun word and not a noun phrase. In this case it was the criterion of uninterruptibility that decided hag1yan5 as being a word. This criterion of uninterruptibility can be applied too to noun words which are made up of two free noun roots to differentiate them from endocentric (coordinate) noun phrase 27, which is a noun phrase filled by two semantically linked nouns coordinated by juxtaposition. 12

An example of a noun word made up of two free noun roots is maawinaang1, literally, 'cat + 'eye', which means the dividing studs in the middle of

12 See 9.8.7.
the road which light up at night when carlamps shine on them. This word cannot be split by a conjunction tung5maay5 to form a conjoined noun phrase 25.13

It is possible of course, to have a phrase ngo3ga maaw1 tung5maay5 ngo3ga ngaan3 'my cat and my eyes' but that is when both maaw1 and ngaan3 are behaving independently of each other as two noun words. The word maawlngaan3 is therefore unlike the noun phrase saan1 soey3 'mountains and water' since the latter can be interrupted by a conjunction tung5maay5 'and' to become endocentric noun phrase 2513 saan1 tung5maay5 soey3 'mountains and water'. It can be further pointed out that maawlngaan3 cannot be a noun phrase 27 because the two noun roots are not semantically linked, as are saan1 'mountain' and soey3 'water'.

In the present study, a distinction is made between adjectives and verbs. The adjective, which is the filler of the predicate in the equative clause, includes those words which traditional sinologists call the 'stative verb'. The traditional classification can be supported on the grounds that both 'stative verbs' and verbs can be aspected but it would mask the very great differences between them.

The criterion for adjective used in this study is whether a word can be preceded by an intensifier word 11 like gev2 'quite' or followed by an intensifier word 11a like go3taaw5 'too'.14 A predicate filler which can be preceded or followed by the appropriate intensifier is regarded as an adjective15 whereas a predicate filler which cannot be preceded or followed by an intensifier is a verb. Thus, the predicate filler (of the equative clause), fev5 'fat' can be preceded by the intensifier gev2 'quite' or followed by the intensifier go3taaw5 'too', but the predicate filler ley5 'come' cannot be preceded or followed by an intensifier.

13 See 9.8.5.
14 See 9.6.1.
15 Loc. cit.
Furthermore, \textit{fey5} can fill a descriptive slot in a noun phrase,\footnote{See 9.8.1.} as in \textit{fey5 yan5 'fat person'}, but \textit{ley5} cannot fill the descriptive slot in a noun phrase.

A note must be made to justify setting up a class of modals and to distinguish between a modal and a true verb. First of all, a modal cannot be aspected, whereas all but a few\footnote{These are the intransitive verbs \textit{yaw3 'there is'} \textit{mow3 'there isn't'}, \textit{oy3 'want'} and \textit{yiw3 'want'}, all of which are not aspected. The first two must be differentiated from their semantically linked homophones \textit{yaw3 'have, conceive'} and \textit{mow3 'die'}, which can receive a completive aspect, as in \textit{koev3 yaw3:jo2 saw3maa1:ye2 'she has conceived (a child)'} and \textit{koev3 mow3:jo2 'he's dead'}. These latter are intransitive verbs.} true verbs can be aspected. In addition modals occur before both verbs and adjectives and form part of the predicate filler of the clause,\footnote{See 9.6.3. and 9.9.} as in \textit{ngo3 ho2nang5 buniug1 'I may move house'}. In this example, \textit{ho2nang5} is a modal. This kind of clause (i.e. predicate filled by modal + verb) must be differentiated from a two-clause sentence (coordinate 212)\footnote{See 5.4.1.3.} \textit{ngo3 hoey3 maay3 haay5 'I'm going (somewhere) to buy shoes'}, where there are two clause bases with the two predicate fillers \textit{hoey3 'go'} and \textit{maay3 'buy'}. Using the first criterion mentioned above, it is found that \textit{hoey3} can be aspected, while \textit{ho2nang5} cannot, as in \textit{ngo3 hoey3 gan2 go2dow4 maay3 haay5 'I'm going there to buy shoes'}. Using the second, it is found that \textit{ho2nang5} can occur with an adjective \textit{fey5} to fill a predicate slot: \textit{koev3 ho2nang5 fey5 'he might get fat'}, whereas \textit{hoey3} cannot.

\textbf{10.8. Size of word classes}

Word classes are either open-ended or they have closed membership. No statistical count has been made of the actual size of words found among
members of open-classes, but impressionistically, a statement may be made that adjectives, nouns and verbs have the greatest number of members in circulation with comparable numbers in each of these classes.

Where possible, the members of each closed class (unless fully listed elsewhere in the thesis), are exhaustively listed in the detailed sections that follow in this chapter. Some closed classes, however, have such large numbers that their members are not exhaustively listed. This is true, for instance of the classifier word class.

The following word classes are open-ended:

1) adjective words
2) noun words
3) verb words
4) negative word 41a
5) Wh-word
6) adverb word
7) numeral word; the class of numeral words is open-ended in a special way in that recursive use is made of a limited morpheme stock.

The following word classes have closed membership:

1) pronoun word (8 members)
2) modal word (41 members)
3) negative word 41 (11 members)
4) temporal word (indeterminate membership)
5) locative word (12 members)
6) intensifier word (6 members)
7) deictic word (2 members)
8) classifier word (indeterminate membership)
9) hortatory word (3 members)
10) dependent word (probably not more than 30)
11) personal agent marker word (1 member)
12) preposition word (4 members)
Fig. 9: Word-level matrix and inventory

<table>
<thead>
<tr>
<th>WORD CLASS</th>
<th>+ free root 10</th>
<th>+ free root (or stem)</th>
<th>+ bound root</th>
<th>+ simple/compound 20</th>
<th>reduplicated root + superfix (tone modification)50</th>
</tr>
</thead>
<tbody>
<tr>
<td>Syntactically</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
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<td>words</td>
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<td></td>
</tr>
<tr>
<td>adjwd 02</td>
<td>12</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>adjwd 03</td>
<td>13 23a 23b 23c</td>
<td>33</td>
<td>43a 43b</td>
<td>53</td>
<td></td>
</tr>
<tr>
<td>adjwd 04</td>
<td></td>
<td>44</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>nwd 01</td>
<td>11 21a</td>
<td>21b</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>nwd 02</td>
<td></td>
<td>21c</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
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<td></td>
<td>21d</td>
<td></td>
<td></td>
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<tr>
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</tr>
<tr>
<td>vtwd 01</td>
<td>11 21</td>
<td>31</td>
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<tr>
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<td>negwd 01</td>
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<td>Wh-wd 01</td>
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<td>31</td>
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<td></td>
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<tr>
<td>Wh-wd 02</td>
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<td>32</td>
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<td></td>
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</table>

The compound stem includes reduplications.
Fig. 9: Continued

<table>
<thead>
<tr>
<th>WORD CLASS</th>
<th>WORD TYPES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Syntactically independent</td>
<td>+ free root</td>
</tr>
<tr>
<td>words</td>
<td>10</td>
</tr>
<tr>
<td>+ free root (or stem)</td>
<td>20</td>
</tr>
<tr>
<td>+ bound root</td>
<td>+ free root</td>
</tr>
<tr>
<td>+ tone modification</td>
<td>+ simple/compound</td>
</tr>
<tr>
<td>+ stem - segmental affix</td>
<td>+ reduplicated root</td>
</tr>
<tr>
<td>+ prefix (tone modification)</td>
<td></td>
</tr>
<tr>
<td>intensified adwd 01</td>
<td>11</td>
</tr>
<tr>
<td>intensified adwd 02</td>
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</tr>
<tr>
<td>intensified adwd 03</td>
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</tr>
<tr>
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<tr>
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<td>11a</td>
</tr>
<tr>
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</tr>
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<td>intensified cardnumwd 03</td>
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<tr>
<td>intensified ordnumwd 03b</td>
<td>13b</td>
</tr>
<tr>
<td>intensified indefnumwd 03b</td>
<td>13b</td>
</tr>
<tr>
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</tr>
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<td>intensified redlocwd 06</td>
<td>56</td>
</tr>
<tr>
<td>intensified instrwd 07</td>
<td>37</td>
</tr>
</tbody>
</table>

20 The compound stem includes reduplications.
10.9. Format

In the word-level matrix above, and in the discussion below, it should be noted that words of one root are in the first decade of numbering, (i.e., 11, 12, etc.); words of more than one free root are in the second decade of numbering (i.e., 21, 22, etc.); words composed of a bound root and a free root, in some cases accompanied by a suprafixed manifested by tone modification, are in the third decade of numbering (i.e., 31, 32, etc.); words composed of a simple stem (root) plus a segmental affix are in the fourth decade of numbering (i.e., 41, 42, etc.).

Since the affix includes the prefix, the infix and the suffix, it is not ordered in the heading of such words in the matrix. It is denoted by a dash in the general heading, but in each specific formula below, it is given an ordered presentation.

The last column in the matrix, i.e., displaying words made up of reduplications of the root (possibly with a suprafixed), consists of word types which are given the fifth decade of numbering, (i.e., 51, 52, etc.).

As in the case of the discussions of the other levels in the grammar, the first general formula of a particular word type and class is given in full tagmemic formula (i.e., with function and filler class) and then the illustration of the word type is given with a citation in abbreviated formulaic representation, in which only the function, not the filler, is marked, but in which both function and filler are implied.

Both function and filler in the formulae are represented with small letters, whereas in the higher levels of the grammar, capital letters

---

21 Tone modification as a feature of a bound root is mentioned in 3.4.2.1.
are used to denote function and small letters are used to denote filler if it is less than a phrase.

In this chapter, morpheme divisions are shown through the use of hyphens where necessary.

10.10. Syntactically independent words
10.10.1. Adjective words

10.10.1.1. Adjective words 11, 12 and 13:

Since adjective words 11, 12 and 13 are different only in their external distribution in the phrase, and not internally through their composition, they are dealt with in the same tagmemic formula. Adjective word 11 can be used in both attributive and predicative positions; adjective word 12 can only be used in attributive position, and adjective word 13 can only be used in predicative position, except when it manifests the axis slot of relative phrase 31 (9.7.1.1.) when relative phrase 31, in turn fills the relative slot in endocentric noun phrase 11 (9.8.1.).

Formula adjective words 11, 12 and 13:

\[
\text{adjwd}_{11/12/13} = + c: fadjr
\]

i.e., adjective words 11, 12 and 13 consist of an obligatory core slot filled by a free adjective root.

Citation formula adjwd 11:

\[
\text{[koey3] + kwaay5 (core)}
\]

'[he ] naughty'

([He is] naughty).
Citation of formula adjwd 12:

+ dung1 (core) 'east' as in dung1 fung1 'east wind' (NPhr 11 in 9.8.1.)

Citation adjwd 13:

[sam]luen4
'[clothes] disordered'
([Clothes are] disordered).

10.10.1.2. Adjective word 41:

Formula adjwd 41:

adjwd 41 = + c:adjr/adjst + s:-go3

i.e., adjwd 41 consists of an obligatory core slot filled by any free adjective root or an adjective stem plus an obligatory satellite slot filled by the comparative affix -go3.

A restriction rule for this formula can be stated: the filler of the core slot can be any adjective stem except a stem consisting of a reduplicated adjective root.

Adjective word 41 occurs in predicate position only. It minimally fills a predicate slot in equative clause 33F (see p. 149 and pp. 158-160).
Citations of formula adjwd 41:

1) + fey5 (core) + -go3 (satellite)
   'fat -- comparative affix'
   as in '[ngo3] fey5go3 [ney3]' '[I am fatter than [you]]'

2) + seng2wan5 (core) + -go3 (satellite)
   'wakeful comparative affix'
   as in '[koey3] seng2wan5go3 [ngo3]' '[He] is more wakeful than [me]'.

10.10.1.3. Adjective words 23a, 23b and 23c:

These adjective words can only occur in predicative position (except as fillers of the core slot in a relative phrase) so they all share the same number 23. They are, however, subdivided into a, b, and c subtypes because of their internal composition: adjective word 23a is made up of two free adjective roots, adjective word 23b is made up of an intransitive verb root and a noun root while adjective word 23c is made up of a noun root and an adjective root.

10.10.1.3.1. Adjective word 23a:

Formula adjwd 23a = + c1:fadjr + c2:fadjr

Citations of formula adjwd 23a:

1) [koey3] + caw2 (core 1) + gwaay3 (core 2)
   '[he ] shameful -- strange'
   ('[He]is] ugly')

Adjective word 41 cannot be further modified by an intensifier word.
2) + klong5 (core 1) + jong3 (core 2)
   'strong -- healthy'
   (strong)

3) + cow1 (core 1) + low3 (core 2)
   'rough -- old'
   (ruffianly)

10.10.1.3.2. **Adjective word 23b:**

Formula adjwd 23b:

\[ \text{adjwd } 23b = + c_1 : \text{vir} + c_2 : \text{fnr} \]

Citations of formula adjwd 23b:

1) [taay3taay2] + yim5 (core 1) + hey3 (core 2)
   'wife] grumble at -- breath'
   ([A wife is] fussy).

2) + yaw3 (core 1) + saam1 (core 2)
   'have -- heart'
   (considerate)

**Restriction rule:** intransitive verb root 12 (10.10.5.1.1.) cannot fill the first core slot in this adjective word.

10.10.1.3.3. **Adjective word 23c:**

Formula adjwd 23c:

\[ \text{adjwd } 23c = + c_1 : \text{fmr} + c_2 : \text{adjr} \]
Citations of formula 23c:

1) \([\text{gung}1 \text{yan}5] + \text{ngaan}3 (\text{core}_1) + \text{hung}5 (\text{core}_2)\)

'\text{[servant]} \quad \text{eye} \quad -- \quad \text{red}'

([The servant is] envious).

2) + \text{yug}4 (\text{core}_1) + \text{suen}1 (\text{core}_2)

'\text{flesh} \quad -- \quad \text{sour}'

(ugly).

3) + \text{yug}4 (\text{core}_1) + \text{gan}2 (\text{core}_2)

'\text{flesh} \quad -- \quad \text{tigh}\text{t}'

(describes the feeling of wanting to bite and cuddle a child or baby).

4) + \text{pey}5 (\text{core}_1) + \text{han}5 (\text{core}_2)

'\text{skin} \quad -- \quad \text{itchy}'

(provocative - said of a child who is naughty and is asking for a whipping).

10.10.1.4. **Adjective word 33:**

Adjective word 33, a predicative adjective, like all the other words in the 30 series, consists of an obligatory core slot filled by a free root and an obligatory core slot filled by a bound root. The general formula for such words does not have ordered tagmemes as the bound and free roots do not have fixed positions in the word. In other words, a bound root can occur as filler of the second core slot.
The criterion for regarding a bound root as a separate morpheme rather than treating it as a syllable which has 'meaning' merely because it can be written with a character\(^{23}\) is whether it occurs elsewhere in a bound form with similar semantic features to form another compound word. Bound roots are not affixes in that they neither regularly change a word into a certain class by being added to it nor do they regularly maintain words in a certain class by being added to it. A bound root can occur in several lexical items,\(^{24}\) have a similar meaning in each item and yet remain unrelated grammatically.

Thus, example (1) given below hab\(_4\)faad\(_3\), has a free root hab\(_4\) 'to agree' and a bound root faad\(_3\) (general meaning: 'law'). The bound root faad\(_3\) is not written with a hyphen before it or after it to indicate its bondage because it can occur at the beginning of a word or at the end of a word in compounds, as in the conjunct verb faan\(_4\)faad\(_3\) 'violate the law' and in faad\(_3\)gun\(_1\) 'judge'.

In specific formulae of series 33 words, however, the free and bound roots are ordered where possible. Where it is not possible to account for ordering, the dash - is used.

Formula adjwd 33:

adjwd 33 = + c\(_1\):fvr - c\(_2\):br

---

\(^{23}\) See 10.4.

\(^{24}\) For this reason, bound roots are not given a class name, i.e., they are not labelled 'adjr', 'nr' etc.

\(^{25}\) See 10.10.5.2. - 10.10.5.2.3.
Citations of formula 33:

1) + hab4 (core 1) + faa’d3 (core 2)
   'agree -- law/legal'
   (legal)

2) [say2man1jay2] + seng2 (core 1) + wan5 (core 2)
   '[children] alert -- mind, soul'
   ([Children] feel awake; alert).

10.10.1.5. Adjective words 43a and 43b:

Adjective word 43 is subdivided into a and b subtypes because of differences in their internal structure. They both occur in predicative position only and they are both made up of stem plus affix, but adjective 43a consists of a root or stem plus the affix -did1 ('a little more'), while adjective word 43b is a word describing colour, consisting of a reduplicated root as stem plus the affix -dey2 'a little'. Moreover, adjective word 43a is the only adjective word in the 40 series which can be aspected (see 10.10.1.7).

10.10.1.5.1. Formula adjwd 43a: 27

adjwd 43a = + c:adjst + s: -did1

26 Other adjective roots not pertaining to colour can also be reduplicated and can be followed by the suffix -dey2, but such constructions fill a manner, not a predicate slot, and are to be considered adverb words.

27 Some adjectives formed in this way can fill both a predicate slot as well as a manner slot. Such words imply action or intention, e.g., faay3did1 fills a predicate slot in yi1 tong5 ce1 faay3did1 'this car is faster' but fills a manner slot in the equative imperative clause 32a (see 6.6.3.5). faay3did1 fey5 adad 'get fat quickly!' fey5did1, however, does not denote intention or action and cannot fill a manner slot, but only a predicate slot, as in koey3 fey5did1 'he is fatter'. 
Citation adjwd 43a:

\[ \text{[gam1nin5 koey3]} + \text{fey5 (core)} + \text{-did1 (satellite)} \]

'\[\text{[This year he]} \quad \text{fat -- a little more}\]

(\[\text{[This year he is]} \quad \text{fatter}\)).

10.10.1.5.2. Formula adjective word 43b:

\text{adjwd 43b = + c:redadjsol + s:-dey2}

d.e., adjective word 43b consists of an obligatory core slot filled by a reduplicated adjective stem denoting colour and an obligatory satellite slot filled by the suffix \text{-dey2}.

Citations of formula 43b:

1) \text{[haw2soen5] + hung5hung5 (core) + -dey2 (satellite)}

'\text{[lips] \quad red-red -- a little}'

(\text{[lips are] reddish}).

2) \text{+ ceng1ceng1 (core) + -dey2 (satellite)}

'\text{green-green -- a little}'

(greenish)

10.10.1.6. Adjective word 53:

Adjective word 53 consists of two cores, the first filled by an adjective root and the second filled by a reduplicated adjective root.
Such words fill the modifier slot of noun phrase 14 (9.8.4.). This can be seen in the example min4 ceng1ceeng1 'a face all green (with sickness); where the reduplicated adjective modifies the noun min4 which comes before it.

A note is made here; as in the case of adjective word 43b, certain adjectives which denote motion, such as mean4 'slow' are reduplicated to fill a manner slot, and are to be considered adverbs with reduplicated root, not adjectives. These words refer to nouns not denoting humans or parts of the human body.

In reduplications of the root to form adjective word 53, there is sometimes optional tone modification involving one of the roots, which is treated here as an optional satellite tagmeme manifested by a suprfix.

Formula adjwd 53:

\[ \text{adjwd 53} = + a_1:adjr + a_2:redadjr \pm s:supr \]

Citations of formula adjwd 53:

In the citations given below, the clausal context in which the reduplicated word occurs is supplied to make it clear that the reduplicated adjective word fills a modifier slot in the noun phrase and is not an adverb word filling a manner slot in a clause.

---

28 See 10.10.12.4.1.
29 See 3.4.2.-3.4.2.1.
1) [yi1 go3 yan5, sam1]+luen4(core 1) + luen4 (core 2) [ji4 saad3].

'This man, his heart] disordered — disordered [committed suicide].

([This man, his mind] all distracted, [committed suicide]).

2) In the following example, the occurrence of the optional satellite tagmemu manifested by a tone modification suprafixed is illustrated:

[yi1 go3 yan5, sam1]+luen (core 1) + tone 2 (satellite) + luen4 (core 2)

'This man, his heart] disordered — disordered — [ji4 saad3].

[committed suicide].

([This man, his mind] all disordered, [committed suicide]).

Since there is no difference in meaning between luen4luen4 and luen2luen4, the two forms are treated as one enitic unit.

3) [ go2 go3 say3 man1 jay2, sam1 ] + ye3 (core 1) + ye3 (core 2) [m5 fan3 gaw3]

'That child, his heart] wandering — wandering — [won't sleep].

([That child, his mind] all distracted, [won't sleep]).

10.10.1.7. Adjective word 44:

This section deals with the aspectual affixation of adjective words in general. Some of the adjectives listed in the following formula has only limited affixation for aspect. For example, adjective word 23a does not occur with the continuative aspectual affix -gan2. Adjective words 41 and 43b are not capable of being aspected.

Formula adjwd 44:

adjwd 44 = + e:adjwd 11/12/23a/23b/23a/33/43a + s:aspect
Citations:

1) [maaw1jay2] + kwaay5 (core) + -gan2 (satellite)
   'Kitten' naughty -- continuative
   ([The kitten is] being naughty).

2) + caw2gwaay3 (core) + -jo2 (satellite)
   'ugly' -- perfective
   (become ugly).

10.10.2. Noun words

10.10.2.1. Noun word 11:

Formula nwd 11:

nwd 11 = + cifnr

Citation formula nwd 11:

+ yan5 (core)
  'person'
  (person).

10.10.2.2. Noun words 21a, 21b, 21c, 21d

10.10.2.2.1. Noun word 21a:

Noun word 21a consists of two obligatory core slots; the first slot is filled by either a free adjective or noun root and the second is filled by a free noun root.
Formula nwd 21a:

\[ \text{nwd } 21a = + c_1: \text{fnr/fadjr} + c_2: \text{fnr} \]

Citations of formula nwd 21a:

1) with noun root as filler of the first core slot:

i) + saam1 (core 1) + doy2 (core 2)
   'dress/clothes -- pocket'
   (shirt/dress pocket).
ii) + tid3 (core 1) + low4 (core 2)
    'iron -- road'
    (railway).
iii) + din4 (core 1) + ae1 (core 2)
     'electricity -- vehicle'
     (car)

2) with adjective root as filler of the first core slot:

i) + daay4 (core 1) + saam1 (core 2)
   'big -- clothes'
   (jacket)
ii) + hung5 (core 1) + nay5 (core 2)
    'red -- earth'
    (laterite)
iii) + fay3 (core 1) + ae1 (core 2)
     'fast -- vehicle'
     (express train).
10.10.2.2.2. **Noun word 21b:**

Noun word 21b consists of two obligatory core slots; one filled by a noun stem and the other by a noun root.

Formula nwd 21b:

\[ \text{nwd} \text{ 21b} = c_1: \text{nst} + c_2: \text{fnr} \]

Citations of formula nwd 21b:

1) + fo2ce1 (core 1) + low4 (core 2)
   'train -- road'
   (railway).

2) + daay4saam1 (core 1) + doy2 (core 2)
   'jacket -- pocket'
   (jacket pocket)

3) + hung5sab4ji4 (core 1) + ce1 (core 2)
   'red cross -- vehicle'
   (ambulance)

10.10.2.2.3. **Noun word 21c:**

Noun word 21c consists of an obligatory core slot filled by conjunct verb 24a1 stem\(^{30}\) and an obligatory core slot filled by a free noun root.

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\(^{30}\) See 10.10.5.2.2.
Formula nwd 21c:
\[ nwd\ 21c = c_{1:vi24a1st} + c_{2:fnr} \]

Citations of formula nwd 21c:
1) + cung\1liong5 (core 1) + fong2 (core 2)
   'take a bath -- room'
   (bathroom)
2) + lug4yam1 (core 1) + gey1 (core 2)
   'record sound -- machine'
   (rape-recorder)
3) + sig4faan4 (core 1) + teng1 (core 2)
   'have dinner -- hall'
   (dining room)

10.10.2.2.4. Noun word 21d:
Formula nwd 21d:
\[ nwd\ 21d = c_{1:nst} + c_{2:nst} \]

Citations of formula nwd 21d:
1) + jing3ji4 (core 1) + fo1hog4 (core 2)
   'politics -- science'
   (political science)
2) + jing3ji4 (core1) + dey4ley3 (core 2)
   'politics -- geography'
   (political geography)
3) $\text{lig}4\text{si}2$ (core 1) + $\text{day}4\text{ley}3$ (core 2)

'history -- geography'

(historical geography)

Note that citations of noun word 21d are abstract nouns.

10.10.2.3. Noun word 42a-42e:

Noun words in the 02 series are divided into noun words 42a, 42b, 42c, 42d and 42e.

Noun word 42a consists of noun stem\(^{31}\) plus prefix $\text{daay}4$- with the meanings 'big, head of, auspicious'.

Noun word 42b consists of noun stem plus diminutive suffix $\text{-lay}2$.

Noun word 42c consists of noun stem plus a locative suffix such as $\text{-deng}2$ 'top of' and $\text{-gioz}3$ 'foot of'. Not every locative suffix is exemplified as the choice of affix in each case is a lexical, not a grammatical problem.

The same applies to the lexical choice of nominalizing affixes described below in connection with noun word 42d. Noun word 42d consists of noun stem (or downgraded verb phrase) plus a nominalizing affix, resulting in constructions which are 'restrictive derivations'\(^{32}\) in that the affix does not change the word class of the stem with which it combines. As stated above for the locative suffix, the nominalizing suffixes are not enumerated exhaustively as the choice of suffix depends on the lexical item in question. An exhaustive list of all the nominalizing affixes would therefore be out of place in a grammatical study of the language.

---

\(^{31}\) 'Noun stem' in this section also implies a simple noun stem (or noun root).

Finally, noun word 42e consists of a noun stem and the suffix -hog4, which can be translated in English as the suffix -ology in 'biology', 'zoology', etc.

10.10.2.3.1. Noun word 42a:

Formula nwd 42a:

\[ \text{nwd 42a} = + s:daay4- + c:nst \]

Citations of noun word 42a:

1) + daay4- (satellite) + haaw4jiong2 (core)
   'big' -- 'headmaster'
   (Vice-Chancellor)

2) + daay- (satellite) + hog4sang1 (core)
   'big' -- 'pupil'
   (undergraduate)

3) + daay4- (satellite) + yad4ji2 (core)
   'big' -- 'date'
   (festival)

10.10.2.3.2. Noun word 42b:

Formula nwd 42b:

\[ \text{nwd 42b} = + c:nst + s:-Jay2 \]
Citations of formula nwd 42b:

1) + maaw1 (core) + -jay2 (satellite)
   'cat -- diminutive suffix'
   (kitten)

2) + faw4 (core) + -jay2 (satellite)
   'town -- diminutive suffix'
   (a small town, usually with only one main street)

3) + gaw2 (core) + -jay2 (satellite)
   'dog -- diminutive suffix'
   (puppy)

10.10.2.3.3. Noun word 42c:

Formula nwd 42c:

nwd 42c = + c:nst + s:locsf

Citations of formula nwd 42c:

1) + taw5hog3 (core) + -deng2 (satellite)
   'head -- top of'
   (crown of the head)

2) + saant1 (core) + -deng2 (satellite)
   'mountain -- top of'
   (mountain top)
3) saan1 (core) + -giog3 (satellite)
  'mountain -- foot of'
  (foot of the mountain)

4) + waa2 (core) + -siong4 (satellite)
  'picture -- surface of'
  (face of a picture)

10.10.2.3.4. Noun word 42d:

Formula nwd 42d:

nwd 42d = + c:nst/dngrVPhr + s:nomsf

i.e., noun word 42d has an obligatory core slot filled either by a noun stem or a down-graded verb phrase and an obligatory satellite slot filled by a nominalizing suffix.

Citations of formula nwd 42d:

1) + fo1hog4 (core) + -si1 (satellite)
  'science -- nominalizing suffix'
  (scientist)
2) with a down-graded verb phrase as filler of the core slot:

\[ + \text{may4 coy3 (core) + -low2 (satellite)} \]

'sell-vegetables - nominizing suffix'

(vegetable seller (male))

3) \[ + \text{jue1yug4 (core) + -low2 (satellite)} \]

'pork - nominizing suffix'

(butcher)

4) \[ + \text{jing3ji4 (core) + -gaal (satellite)} \]

'politics - nominizing suffix'

(statesman/politician)

5) \[ + \text{gung4can2dong2 (core) + -yuen5 (satellite)} \]

'Communist Party - nominizing suffix'

(Communist Party member)

10.10.2.3.5. Noun word 42e:

Formula nwd 42e:

\[ \text{nwd 42e} = + \text{c:nst} + \text{s:-hog4} \]

33 The roots and full words low2 and po2, with approximate meanings 'lout' and 'slut' respectively, are related to the nominalizing suffixes -low2 and -po2. But whereas the former words are rude and insulting and therefore not included as lexical items in this study, which is restricted to a polite register, the latter suffixes are not in any way insulting; they are lexically appropriate as nominalizing suffixes to refer to people who are non-white-collar workers. It would be considered insulting by such workers to be addressed by a term using a suffix which they know to be too elevated for themselves as this would be tantamount to being mocked.
Citations of nwd 42e:

1) + yue5yam1 (core) + -hog4 (satellite)
   'phonetics -- study of'
   (phonetics)

2) + dung4mad4 (core) + -hog4 (satellite)
   'living things -- study of'
   (zoology)

3) + sow3 (core) + -hog4 (satellite)
   'sums -- study of'
   (mathematics)

10.10.3. Pronoun words

Any word which can be potentially given the plural suffix -dey4
is a pronoun word.

10.10.3.1. Pronoun word 11:

Formula pnwd 11:

pnwd 11 = + c:per/imperspnr

i.e., pronoun word 11 consists of an obligatory core slot filled by a
personal or impersonal pronoun root.
Citations of pronoun word 11:

1) personal pronoun word:
   + ngo3 (core)
     'I'     (I, me)

2) impersonal pronoun word:
   + yan5 (core)
     'person' (somebody, one)

The following complete the exhaustive list of pnwd 11:

3) ney3
   'you'

4) koey3
   'he, she, it, him, her'

10.10.3.2. Pronoun word 41:

Formula pnwd 41:

\[ pnwd\ 41 = +\ c:\ pnwd\ 11 + s:\ plaf-dey4 \]

Citations of pronoun word 41:

1) + ngo3 (core) + -dey4 (satellite)
   'I -- plural suffix'
   (we, us)
2) + yan5 (core) + -dey4 (satellite)
   'one  -- plural suffix'
   (others)

The following complete the exhaustive list of pnwd 41:

3) ney3dey4
   'you - plural'

4) koey3dey4
   'they, them'

10.10.4. Transitive verb words

10.10.4.1. Transitive verb word 11:

Formula vtwd 11 = + c:fvtr 11

Citations of vtwd 11:

1) + sig4 (core)
   'eat'      (eat)

2) + laag4sog3 (core) 34
   'extort'    (extort)

3) + si1yi5 (core) 35
   'suspect'   (suspect)

34 See 10.4. Cowles (1965) gives the meanings 'strangle' and 'extort' to each of these syllables but in this study the two syllables are treated as part of one root.

35 See fn. 34. Cowles (1965) gives the individual meanings of the syllables as 'think' and 'suspect' but they are treated in this study as part of one root.
4) + ung2 (core)
   'push' (push)

5) + teg3 (core)
   'kick' (kick)

6) + diw4 (core)
   'throw' (throw)

7) + haang5 (core)
   'walk' (walk)

8) + laan1 (core)
   'crawl' (crawl)

Examples 7 - 8 appear strange to English speakers as the English equivalents are intransitive verbs. The Cantonese verbs have potential objects at clause level which can be passivized. Such a verb plus object in Cantonese is most readily translated by a verb plus indirect object in English. Examples 7 - 8 are illustrated in possible passive clauses below:

Example 7: yi1 jo4 saan1 bey2 koey3 haang5saay3
           'this-- classifier--mountain--by--him--walked'

   (This mountain was walked on all over by him).

36 See 7.1. ff.
Example 8: yi1 tiw5 sing2 bey2 koey3 laan1dow2
'this--classi-- string-- by -- him -- crawled'

(this string was crawled up by it)

This translation looks awkward in English but reflects the Cantonese structure; a better translation would be the active clause 'it crawled up the string'.

10.10.4.2. Transitive verb word 21:

Formula vtwd 21:

vtwd 21 = \( c_1 : fvtr + c_2 : fvtr/fvtr \)

Citations of formula vtwd 21:

1) with transitive verb roots as fillers of both core slots:
   (i) + bong1 (core 1) + can3 (core 2)
       'help -- match'
       (patronize, be a customer)

   (ii) + fan1 (core 1) + hoy1 (core 2)
       'divide -- open'
       (divide)

10.10.4.3. Transitive verb word 31:

Transitive verb word 31 consists of two obligatory core slots, one filled by a bound verb root and the other filled by a free transitive verb root. This is a different case from the second and third examples of disyllabic transitive verb word 11 above in that one of the roots in
transitive verb word 31 is free, whereas in the case of transitive verb word 11 above, neither of the two syllables can be used by itself.

It is not always possible to give a precise meaning to a bound form. However, it is recognized that other analysts may not agree with the present treatment of these words as one-word constructions.

Formula vtwd 31:

\[ \text{vtwd } 31 = + c_1 : \text{bvr} - c_2 : \text{fvtr} \]

Since the bound verb root can take part in both transitive and intransitive verb words, it is not stated in the formula what sort of verb root it is.

Citations of formula vtwd 31:

1) + sog3 (core 1) + puy5 (core 2)
   'general meaning -- strangle' -- repay'
   (demand indemnity)

2) + gim2 (core 1) + caafj (core 2)
   'general meaning of 'inspect' -- check'
   (investigate)

3) + faanl (core 1) + yig4 (core 2)
   'general meaning of 'translate' -- translate'
   (translate)
10.10.5. **Intransitive verb words**

10.10.5.1. **Intransitive verb words 12, 13a, 13b**

Intransitive verb words 12, 13a and 13b have the same internal structure as each other in that they all consist of an obligatory core slot filled by a free intransitive verb root.

They are, however, differentiated from each other by external criteria in that when they fill the predicate slot of an intransitive clause as a minimum phrase, intransitive verb word 12 can never be followed by a complement tagmeme; intransitive verb words 13a and 13b can be optionally followed by a complement tagmeme but are further differentiated from each other in that intransitive verb word 13a can permit a re-ordering of the optional complement tagmeme so that it occurs before the predicate tagmeme, but intransitive verb word 13b will not permit a re-ordering of the optional complement tagmeme. If the complement tagmeme occurs when intransitive verb word 13b is the minimum filler of the predicate tagmeme, the complement tagmeme must follow, and not precede, the predicate tagmeme.\(^{37}\)

10.10.5.1.1. **Intransitive verb word 12:**

**Formula viwd 12:**

\[
\text{viwd } 12 = + \text{c:fvir } 12
\]

\(^{37}\) See 6.6.2. for a similar discussion at clause level.
Citations of formula viwd 12:

1) + ce2 (core)
   'leave'

2) + hiw2 (core)
   'know how to do something'

3) + hab4jog3 (core)
   'co-operate'

4) + yin5gaaw3 (core)
   'do research'

As stated in 10.10.1.3.2, viw 12 cannot occur in adjwd 23b.

10.10.5.1.2. Intransitive verb word 13a:

Formula viwd 13a:

viwd 13a = + c:fvir 13a

Citations of formula viwd 13a:

1) + coy2 (core)
   'take notice of'

2) soen3 (core)
   'believe'

3) bey2 (core)
   'give'
4) se₂ (core)

'write'

10.10.5.1.3. Intransitive verb word 13b:

Formula viwd 13b:

viwd 13b = + c:fvir 13b

Citations of viwd 13b:

1) + man₄h₄w₄ (core)

'ask after somebody's health'

2) + dang₂ (core)

'wait for'

3) + hay₄ (core)

'is, are, etc.'

10.10.5.1.3.1. Intransitive verb word 13b₁ (quotative verb word):

This is a subclass of intransitive verb word 13b which can be followed by a quotation, hence they are also called quotative verbs. Since the subclass of quotative verbs is very small the members can be listed. In the following list, all the members except waa₄ can be followed by a nominal complement as well as the downgraded quotation; in the case of waa₄ the complement can only be a quoted clause. A possible nominal complement is included within square brackets:
Formula viwd 13b1:

viwd 13b1 = + c:vir 13b1

1) gong2 [ye3]
   'say [things]'  
   (say [something])

2) siong2 [gay2jay2]
   'think [plot]'  
   (think [of a plot])

3) daab3ying3 [koey3]
   'answer [he]'  
   (answer [him])

4) man4 [low4]
   'ask [road]'  
   (ask [the way])

5) say3 [yan5]
   'shout [person]'  
   (shout [to somebody])

6) sam1nam2 [si4gon3]
   'think [affairs]'  
   (think of [affairs])

7) was4
   'say'
There are, of course, other verbs which refer to some speech or thought process, like giw4 'call' and king1 'chat', for example. These verbs, however, are not included as quotative verbs in that they cannot be followed by quotations in Cantonese. In English, the situation is different and they would be regarded as quotative verbs.

In English, the quotative verb list is much wider than in Cantonese. It includes, for example, say, shout, opine, think, reckon, ask, question, reply.

10.10.5.2. *Intransitive verb word 24, 24a1, 24a2 (conjunct verb words)*

Intransitive verb word 24 (a *conjunct verb*) appears at first glance to be indistinguishable from a phrase consisting of a transitive verb and its direct object. In fact, it behaves differently from such a phrase and has to be treated as a compound verb instead. The criterion applied here to differentiate this compound verb from a transitive verb phrase is that viwd 24 cannot undergo a passive transformation at the clause level which would make the 'object' (i.e., the noun root component in the verb) into the subject of the clause. As seen in 6.3., where the differences between clause nuclei were discussed, a true transitive verb has a passive transform potential at clause level.

Intransitive verb word 24 is different again from all other verbs (whether transitive or intransitive) in that whenever it combines with an aspectual affix, that affix has to occur as an infix between the verb root and the noun root in the word.

Intransitive verb word 24 has two subdivisions: viwd 24a1 and viwd 24a2. Both these *conjunct verbs* can tolerate interruption by a downgraded limiting phrase 11 which then behaves as a limiter tagmeme within

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38 See 4.2. and 9.4.
the conjunct verb word to form a special case of extended word. When the downgraded limiting phrase does occur within a conjunct verb, it occurs after the aspectual affix.

In addition, intransitive verb word 24a2 are those conjunct verbs which refer to natural phenomena. They therefore have a restricted range of nouns as filler of the subject tagmem at clause level. Such subjects are restricted to the different words for 'sky'. This subdivision of verbs, therefore, is made on semantic grounds and not on syntactic grounds.

For this reason, it is mentioned in this chapter and not mentioned at clause level.

10.10.5.2.1. Intransitive verb word 24:

Formula viwd 24:

\[ viwd 24 \ = \ e_1^{fvr/39}bvr \ + \ e_2^{fmr} \]

Citations of formula viwd 24:

1) \( yam2 \) (core 1) + sing3 (core 2)

'drink -- surname'

(drink merrily)\(^{40}\)

---

39 These transitive verb roots are considered free in that they occur elsewhere by themselves in clauses with passive transform potential. The alternative verb root fillers are not marked for transitivity or intransitivity as they are bound verb roots which only occur in conjunct verbs.

40 Note the difference between the conjunct verb \( yam2\)sing3 and the transitive class \( yam2\) oaa5 'drink tea'. The former cannot undergo the passive transformation at clause level: *go2 go3 sing3 bey2 ngo3 day4 yam2jo2, producing the nonsense sentence 'that surname was drunk by us', while the latter can undergo the passive transformation at clause level, resulting in the acceptable sentence: go2 buy1 oaa5 bey2 ngo3 yam2jo2 'that cup of tea was drunk by me.'
2) + coed1 (core 1) + saam1 (core 2)
   'go out -- mountain'
   (the dead goes on its funeral procession)

3) + saw4 (core 1) + fu2 (core 2)
   'sustain -- hardship'
   (suffer)

10.10.5.2.2. Intransitive verb word 24a1:

Formula viwd 24a1:

\[
\text{viwd 24a1} = + c_1:fvr/bvr + \text{lim:dngrLimPhr} + c_2:fnr
\]

In the above formula it can be seen that between the two core slots of conjunct verb 24a1 there is an optional limiter tagmeme filled by a down-graded limiting phrase.

Citations of formula viwd 24a1:

1) + saw4 (core 1) + yad1 did1 (limiter) + siong1 (core 2)
   'sustain -- a --little -- wound'
   (be a little wounded)

2) + dug4 (core 1) + gey2 nin5 (limiter) + sue1 (core 2)
   'read -- a few --years -- book'
   (study for a few years)\(^{42}\)

---

\(^{41}\) See 4.2.

\(^{42}\) This must be differentiated from the transitive verb phrase dug4 sue1 'read books' which refers to the literal act of reading, not the more abstract meaning of 'pursuing a course of study' which is the meaning of the example of viwd 24a1.
10.10.5.2.3. **Intransitive verb word 24a2:**

Formula viwd 24a2:

\[ \text{viwd 24a2} = + \text{fvrir} \uparrow \text{lim:dngrlimPhr} + \text{natphnr} \]

i.e., viwd 24a2 consists of an obligatory core slot filled by a free intransitive verb root, an optional limiter slot filled by a downgraded limiting phrase and an obligatory core slot filled by a noun root pertaining to natural phenomena.

Citations of formula viwd 24a2:

1) \( + \text{log4 (core 1)} \uparrow \text{saam1 yad4(limiter)} + \text{yue3 (core 2)} \)
   'fall — three— days — rain'
   (rain for three days)

2) \( + \text{sim2 (core 1)} \uparrow \text{gey2 baay2 (limiter)} + \text{din4 (core 2)} \)
   'flash — a few— times — electricity'
   (lightning flashed a few times)

3) \( + \text{hiong2 (core 1)} \uparrow \text{liong3 baay2 (limiter)} + \text{loey5 (core 2)} \)
   'to sound — twice — thunder'
   (thundered twice)

10.10.6. **General morphology of the transitive and intransitive verb words**

10.10.6.1. **Transitive and intransitive verb word 45**

This section deals with the general morphology of the verb word
regarding aspectual affixation. The aspectual affixation of adjectives has already been dealt with in 10.10.1.7. and is not further alluded to.

Formula vt/viwä 45:

\[ vt/viwä 45 = + c:vt/vist - s:aspad \]

A dash is used instead of a + sign as the aspectual affix takes the form of an infix in the case of the conjunct verbs (see 10.10.5.2.).

Citations of formula vt/viwä 45:

1) with a transitive verb stem as filler of the core slot:
   + sig4 (core) + -jo2 (satellite)
   'eat -- perfective'
   (completed eating)

2) with vi24a1 as filler of the core slot:
   + saw4(core 1 of vi24a1) + -jo2(satellite) + yad1 did1 siong1(optimal limiter slot and obligatory core 2 of vi24a1)
   'sustain -- perfective -- a --little--wound'
   (was a little wounded)

Notice that the downgraded limiting phrase, when it occurs, appears after the aspectual affix.

43 Not all verbs can be aspected. The intransitive verb hay4 'is, am, etc.', for example, cannot be aspected.
10.10.6.2. **Transitive and intransitive verb word**

This section deals with the general morphology of the verb word regarding directional affixation. Not all verb roots can combine with the directional suffixes (See 11.3.4.7.). There are two kinds of restriction on the occurrence of verb roots with these suffixes:

1) **formal grammatical restriction**: only verb roots (transitive and intransitive) which are monosyllabic can occur with these suffixes.

2) **semantic and collocational restrictions**: the verb root "fall" can only occur with the directional suffix -log 'down' but not with the directional suffix -siong. Grammatically, there is no reason why this combination is not possible but semantically this combination would be absurd. In addition there are monosyllabic verb roots which do not occur with any directional suffix but there are no formal criteria for their not doing so.

Further, there is no grammatical reason why "fall" should not occur with the directional suffix -yab 'in'. The fact that it does not do so is due to a collocational restraint, in the same way that there is no verb phrase 'speak in' in English with the opposite meaning of 'speak out'.

A discussion of the term 'collocation' is given in Bendor-Samuel (1961) p.118 where a similar problem is discussed for Jebero.

A profitable study can be made of the different kinds of restriction on the occurrence of verb roots with directional affixes but such a study is clearly beyond the scope of this thesis.
Naish (1966), p. 170, mentions restrictions on the occurrence of verb paradigms with the directional words she posits: she says that certain paradigms may occur with certain directional words, but not with others. For example, her imperfective 'future' paradigm can occur with most directional words but not with those that mean 'back', 'inside' or 'completion'. This is again a parallel situation to the one in Cantonese, though the facts of the case are different.

There are two classes of directional suffix which occur in mutually exclusive positions. They are called class 1 and class 2 directional suffixes. If the verb root is aspected the directional suffix(es) occur after the aspectual suffix. The two classes of directional suffixes are given below:

<table>
<thead>
<tr>
<th>Class 1</th>
<th>Class 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>-coed1 'out'</td>
<td>-ley5 'towards'</td>
</tr>
<tr>
<td>-yab4 'in'</td>
<td>-hoey3 'away from'</td>
</tr>
<tr>
<td>-siong3 'up'</td>
<td></td>
</tr>
<tr>
<td>-log4 'down'</td>
<td></td>
</tr>
</tbody>
</table>

All these directional suffixes have homophones which are semantically and historically related verbs. These homophonous verbs can be aspected. If a homophonous verb takes a directional suffix there are further restrictions.

1) None of the homophophonous verbs can occur with any class 1 directional suffix.
2) Verbs homophonous with class 2 directional suffixes may not occur with them.
3) Verbs which are homophonous with class 1 directional suffixes, however, may occur with either of the class 2 directional suffixes.

Formula vt/viwd 46:

\[ vt/viwd 46 = + c: \text{monosyll} \text{vtr/vir} + s: \text{aspsf} + (+ s: \text{dirsf1} + : \text{dirsf2}) \]

i.e., verb word 46 is filled by an obligatory core slot filled by a monosyllabic transitive or intransitive verb root, an optional satellite slot filled by an aspectual suffix and either one or two satellite slots filled by directional suffix class 1 or class 2, in that order.

Citations of vt/viwd 46:

1) With a transitive verb root as filler of the core slot:
   (i) + paa5 (core) + -gan2 (satellite) + (+ -log4 + -ley5)(satellite)
       'crawl -- continuative -- down --towards'
       (crawl down towards)

   (ii) + nam2 (core) + saay3 (satellite) + (+ -doed1 + -ley5)(satellite)
       'think -- completive -- out --towards'
       (finish thinking (something) out)

In this example, the occurrence of the directional suffix -ley5 appears to be a purely formal occurrence, with apparently no semantic component of direction. A parallel is found in Naish, (1966), p.138, where, in the future paradigm, her verb theme y-ši always occurs with the directional word ke 'up' without the semantic component of direction.
(iii) + lo2 (core) † -maey5 (satellite) + († -siong3 † hoey3) (satellites)
'take -- completive -- up --away from'
(finish taking (something) up and away)

2) With an intransitive verb root as filler of the core slot:

(i) + se2 (core) † -faan1 + († -log4 † -ley5) (satellites)
'write -- reciprocal -- down -- towards'
(write (something) down in return)

(ii) + sung3 (core) -jo2 (satellite) + († -yab4 † -ley5) (satellite)
'accompany --perfective -- in -- towards'
(shown (someone) in)

(iii) + haam3 (core) + (+ -coed1 † -ley5) (satellites)
'cry -- out -- towards'
(cry outwardly)

10.10.6.3. Transitive and intransitive frequentative verb word 47:

This section deals with the frequentative verb word formed by the reduplication of the verb root and the directional suffixes dealt with in the previous section. The frequentative verb word denotes repetition of some kind. The only aspectual affix which can occur (as an infix) in the frequentative verb word is -gan2 'continuative'.

Again, due to semantic and collocational restraints, certain verb roots do not participate in the frequentative form of the verb even if they do occur with a directional suffix in verb word 46.
Formula vt/viwd 47:

$$\text{vt/viwd } 47 = + c: \text{monosyllvtr/vir} \pm s:-\text{gan}2 + \text{freq:dirsf}1/2$$

$$+ \text{redo:monosyllvtr/vir} \pm s:-\text{gan}2 + \text{freq:dirsf}1/2$$

i.e., frequentative verb word 47 is filled by an obligatory core slot filled by a monosyllabic transitive or intransitive verb root, an optional satellite slot filled by the aspectual suffix -gan2, an obligatory frequentative slot filled by either directional suffix class 1 or 2, a reduplicated core slot filled by the same monosyllabic verb root as the previous core slot filler, an optional satellite slot filled by the aspectual affix -gan2 and an obligatory frequentative slot filled by a directional suffix class 1 or 2.

Restrictions on the fillers of the frequentative slots are stated here: if the filler of the first frequentative slot is a class 1 directional suffix it can only be either -coed1 'out' or -siong3 'up'. It cannot be either of the other two class 1 directional suffixes -yab4 or -log4 'in' and 'down' respectively. These latter suffixes can only occur as fillers of the second frequentative slot in the following distribution: -yab4 with -coed1 and -log4 with -siong3.

Likewise, if the filler of the first frequentative slot is a class 2 directional suffix it can only be -ley5 'towards'; the filler of the second frequentative slot can then only be the other class 2 directional suffix -hoy5 'away from'.

Thus it can be seen that the directional suffixes, when occurring as fillers of the frequentative slots, occur in pairs which are semantically opposed.
Citations of verb word 4.7:

1) with class 1 directional suffixes as fillers of the frequentative slots:

(i) [koey3 daam1sam1, so2yi3] + haang5 (core) ± -gan2 (satellite)

'[he -- worried -- so ] walk -- continuative --

+ siong3 (frequentative) + haang5 (reduplicated core)

up -- walk --

± -gan2 (satellite) + -log4 (frequentative)

continuative -- down repetitively'

([He's worried, so (he) is] walking up and down)

(ii) [yi1 did1 fo2juen3 koey3] + lo2 (core) ± -gan2 (satellite)

'[this -- classifier -- diamond -- he ] take -- continuative --

+ -coed1 (frequentative) + lo2 (reduplicated core)

out -- take --

± -gan2 (satellite) -yab4 (frequentative)

continuative -- in'

([He's] taking [these diamonds] in and out repetitively).
2) with class 2 directional suffixes as fillers of the frequentative slots:

(i) + lo2 (core)  + -gan2 (satellite)  + -ley5 (frequentative)
    'take -- continuative -- towards --

    + lo2 (reduplicated core)  + -gan2 (satellite)
    take -- continuative --

    + -hoey3 (frequentative)
    away from'
    (taking (something) to and fro repetitively)

(ii) + nam2 (core)  + -gan2 (satellite)  + -ley5 (frequentative)
    'think -- continuative -- towards --

    + nam2 (reduplicated core)  + -gan2 (satellite)
    think -- continuative --

    + hoey3 (frequentative)
    away from'
    (thinking (something) over and over).

In this last example, the occurrence of the directional suffixes appears to have no semantic occurrence of direction, the 'meaning' being concentrated on the frequentativeness of the construction.
10.10.7. Modal word 11:

The modal word consists of just one root and does not exhibit a word-level construction as such. It is, however, included in that part of the word level matrix which deals with syntactically independent words because it is syntactically independent.

The distinguishing criterion between modals and verbs proper is that modals never combine with an aspectual affix whereas most verbs do. The free modal root, however, does enter into a word-level construction with the negative affix to form one kind of negative word.

A complete list of modals is given below:

1) hay4  is
2) ho2hang5  can
3) ho2yi3  
4) oy3  
5) yiw3  want
6) siong2  
7) wuy3  will
8) hang2  
9) ying1goyl  should
10) how2  do
11) yaw3  

10.10.8. Negative words 41 and 41a:

The negative word consists of an obligatory negative slot filled by a negative affix m5- and an obligatory core slot filled by either

---

44 See fn. 17.
45 See 10.10.8.
46 In most cases this occurs as a prefix but it is not exclusively a prefix as it occurs with yaw3 'there is' to form the suppletive form mow3 'there isn't.' Therefore m5- is not called a prefix but more generally, an affix. See fn. 47.
a modal root, a transitive or intransitive verb root or an adjective root.

The negative word is further subdivided: when the core slot is filled by a modal root, the negative word is called negative word 41; when the core slot is filled by a verb or adjective root, the negative word is called negative word 41a. The reason for this subdivision is seen at phrase level (see 9.10.) where each negative word can fill a different phrase-level negative slot. Since negative word 41 has a core slot filled by a modal root it is a closed class of words. Negative word 41a, however, is an open class of words as its core slot is filled by a verb or adjective root.

10.10.8.1. Formula negwd 41:

\[ \text{negwd } 41 = \text{neg:negafm}_5 \text{-} 47 + \text{c:mdl}\]

Citations of formula negwd 41:

1) \( + m5- \) (negation) + siong2 (core)

'negative affix -- want to'

(doesn't want to)

---

The negative word mow3 'isn't' can be treated as a suppletive form in this series. It can be described as being a combination of m5- and yaw3 but the form m5yaw3 never occurs. The negative counterpart of yaw3 'there is' is mow3, so it seems justifiable to include mow3 as a suppletive form in the series described here instead of setting up a series with a membership of ones. As stated in 9.10., mow3 can be both negative word 41 and negative word 41a. If it is negwd 41 (i.e., a modal word), it cannot be aspected; if it is negwd 41a (in this case an intransitive verb word), it can be aspected.
2) + m5- (negation) + ho2nang5 (core)

'negative affix -- can'
(can't)

The complete list of members of negwd 41 is given below:

1) m5hay4  isn't
2) m5ho2nang5)  'can't'
3) m5ho2yi3
4) m5oy3
5) m5yiw3  'don't want'
6) m5siong2
7) m5wuy3  'won't'
8) m5hang2
9) m5ying1goy1  'shouldn't'
10) m5how2  'don't'
11) mow3

10.10.8.2. Formula negwd 41a:

negwd 41a = + neg:negafm5- + cifvtr/fvir/fadjr48

Citations of formula negwd 41a:

1) with a transitive verb root as filler of the core slot:

+ m5- (negation) + sig4 (core)

'negative affix -- eat'

(doesn't eat)

48 When the filler of the core slot is a verb or adjective root, the negative word is coincident with a clause (because it can fill a predicate slot.)
2) with an intransitive verb root as filler of the core slot:
   + m5- (negation) + yim5 (core)
   'negative affix -- feel discontented'
   (isn't discontented)

3) with an adjective root as filler of the core slot:
   + m5- (negation) + loen4joen4 (core)
   'negative affix -- clumsy'
   (isn't clumsy)

10.10.9. Temporal words

The members of the temporal word class are too numerous to be listed. Each subclass has roughly the same size of membership.

10.10.9.1. Temporal word 11:

Formula temporal word 11:

tempwd 11 = + c:ftempr

Citations of formula tempwd 11:

1) + yad4 (core)
   'day'

2) + maan3 (core)
   'night'
3) y15ga1tha3
'now' 49

10.10.9.2. Temporal word 31:

Formula tempwd 31:

tempwd 31 = + c1:tempspec:gam1-/kam5-/ting1- + c2:ftempr + s:supr

i.e., temporal word 31 consists of an obligatory core slot filled by a bound temporal specifier root 50 manifested by gam1-, kam5- or ting1- 
an obligatory core slot filled by a free temporal root, and an optional satellite slot manifested by a suprafixed (in this case, tone modification). This suprafixed is added to the second core slot.

Citations of formula tempwd 31:

1) + gam1- (core 1) + maan3 (core 2)
   'present -- night'
   (tonight)

2) + gam1- (core 1) + nin3 (core 2) + tone 2 (satellite)
   'present -- year'
   (this year)
   (i.e., gam1nin3 or gam1nin2)

---

49 This word is treated as comprising one root on account of the unsplitta- bility of its syllables although there are lexical entries for each syllable in Cowles (1965); these syllables would be symbolized by characters with 'meanings'. See 10.4. for a discussion of this problem.

50 See 9.12.1., where the temporal specifier word cin5 enters into phrase level construction. Whereas cin5 'before this time' can be separated from the temporal noun which it modifies, gam1-, kam5-, ting cannot be separated from the temporal root which follows them.
3) + kam5- (core 1) + yad4 (core 2)
   'yester- -- day'
   (yesterday)

4) + kam5- (core 1) + maan3 (core 2)
   'yester- -- night'
   (last night)

5) + ting1- (core 1) + yad4 (core 2)
   'future -- day'
   (tomorrow)

10.10.9.3. Temporal word 51 (reduplicated temporal word):

Formula tempwd 51:

\[
\text{tempwd 51} = + c^1 : f\text{tempr} + c^2 : \text{redftempr}
\]

Citations of tempwd 51:

1) + maan3 (core 1) + maan3 (core 2)
   'night -- night'
   (every night)

2) + nin5 (core 1) + nin5 (core 2)
   'year -- year'
   (every year)
3) + jiw1 (core 1) + jiw1 (core 2)

'morning -- morning'

(every morning)

10.10.10. Locative word 31:

Formula locwd 31:

Locwd 31 = + c1:fdcr^53/blocr c0ed1/-yabl4/-kna4- + c2:blocr-dow4/-sue3/-bin4

i.e., locwd 31 consists of an obligatory core slot filled by a free
deictic root or one of the bound locative roots listed in the formula
and an obligatory core slot filled by one of the bound locative roots
listed in the formula.

A restriction rule to this formula is as follows: the free deictic
roots can occur with all the three locative roots belonging to the
second core. The bound locative roots of the first core, however, can
only occur with the bound locative root -bin1 in the second core.

Citations of locwd 31:

1) + go2 (core 1) + -dow4 (core 2)

'here'

2) + yi1 (core 1) + -sue3 (core 2)

'here'

---

51 Although jiw1 never occurs by itself it is still considered to be a free
root and a word, but a syntactically dependent word. As a free root it
participates in compounds like gam1:jiw1 'this morning' jiw1:taw5:low2
'early morning'; as a word it fills a slot in the conjoined temporal
phrase jiw1 mean3 'day and night'.

52 For the reduplicated locative word, which is syntactically dependent
see 10.11.5.

53 The free deictic roots yi1 'this' and go2 'that' are also syntactically
dependent words which fill slots in the limiting phrase. See 9.5.1.
3) + go2 (core 1) + -bin4 (core 2)  
'there'

4) + coed1- (core 1) + -bin4 (core 2)  
'out' (outside)

5) + yab4- (core 1) + -bin4 (core 2)  
'in' (inside)

6) + haa4- (core 1) + -bin4 (core 2)  
'below' (below)

Three more members complete this list:

7) yi1dow4 'here'
8) go2sue3 'there'
9) yi1bin4 'here'

The bound locative roots of the first core slot are semantically related to the directional suffixes dealt with in 10.10.6.2, but are not to be confused with them.

10.10.11. Wh-words 31 and 32:

Wh-words are like the Wh-words in English which begin questions not requiring a 'yes/no' answer. In Cantonese they are divided into those which begin with binf- (Wh-words 31) and those which begin with gevk- (Wh-words 32). They are still freely productive.
Wh-words belong to the set of interrogative adverbs and pronouns mentioned in 8.5.2.8. and which fill the interrogative slot in interrogative phrase 13 (9.11.3.).

Wh-words have multiple function in that Wh-word 31 can fill subject, object, complement and location slots as the minimal phrase at clause level, while Wh-word 32 can fill subject, complement and temporal slots as the minimal phrase at clause level. (See 8.5.2.8.)

10.10.11.1. Wh-word 31 (with bin1-):

Formula Wh-wd 31:

\[
\text{Wh-wd 31} = + c_1: \text{bin1-} + c_2: f \text{clasr/ftempr/blocr}
\]

i.e., Wh-word 31 consists of an obligatory core slot filled by bin1- and an obligatory core slot filled by either a free classifier root, a free temporal root or a bound locative root.

Citations of formula Wh-wd 31:

1) with a free classifier root:

\[+ \text{bin1- (core 1)} + \text{go3 (core 2)}\]

'who -- general classifier'

(who?)

2) + bin1- (core 1) + jeg3 (core 2)

'what -- general classifier'

(which?)
3) with a free temporal root:

\[ + \text{bin1-} (\text{core 1}) + \text{say3} (\text{core 2}) \]

'which -- incarnation'

(which incarnation?)

4) with a bound locative root

\[ + \text{bin1-} (\text{core 1}) + \text{-sue3} (\text{core 2}) \]

'which -- locative root'

(where?)

10.10.11.2. Wh-word 32 (with gey2-):

Formula Wh-wd 32:

\[
\text{Wh-wd 32} = + c_1:gey2- + c_2:fadjr/btempr/ftempr
\]

i.e., Wh-word 32 consists of an obligatory core slot filled by gey2- and an obligatory core slot filled by either a free adjective root or a bound or free temporal root.

Citations of Wh-wd 32:

1) with a free adjective root:

\[ + \text{gey2-} (\text{core 1}) + \text{fey5} (\text{core 2}) \]

'how -- fat'

(how fat?)
2) with a bound temporal root:

+ gey2= (core 1) + si5= (core2)

'when — temporal root' (when?)

3) with a free temporal root:

+ gey2= (core 1) + noy4 (core 2)

'when — long time' (how long?)

10.10.12. Adverb words

10.10.12.1. Adverb word 11:

Formula adverb word 11:

\[ \text{advwd 11} = + \text{ifadvr} \]

Citations of formula advwd 11:

1) + yi3ging1 (core)

'already'

2) + lab4luen2 (core)

'unthinkingly'

3) + juen1mun2 (core)

'especialy'

4) + juen1dang1 (core)

'deliberately'
10.10.12.2. **Adverb word 42:**

**Formula advwd 42:**

\[
\text{advwd 42 = + c:redadjst}^{54} + s:-dey2
\]

i.e., adverb word 42 consists of an *obligatory* core slot filled by a reduplicated adjective stem (not pertaining to colour)\(^{54}\) and an obligatory satellite slot filled by the affix -dey2.

The following citations are put into a suitable context to demonstrate that they fill manner slots at clause level.

Citations of formula advwd 42:

1) \(+ gwaay1gwaay1\) (core) + -dey2 (satellite) [fan5gaaw3]
   'good-good -- a little -- [go to sleep]
   ([go to sleep] like a good child)

2) [koey3 yi5gaa1haa3] + how2how2 (core) + -dey2 (satellite) jow4 yan5
   '[he now ] good-good -- a little -- [be--a person]
   ([he's behaving] in a considerate manner now)

---

\(^{54}\) See 10.10.1.5. and fn. 26. The reduplicated adjective stems here do not refer to colour. Furthermore, not all adjective stems can in practice be reduplicated in this way to form an adverb word as the resulting forms may not be fully acceptable to speakers. For example, if fey5 'fat' and gow1 'tall' were used as fillers of the core slot in adverb word 42, the resulting forms fey5fey5dey2 and gow1gow1dey2 'in a fat manner', 'in a tall manner', may not be fully acceptable to all speakers as some people may not be much motivated to use these forms.
10.10.12.3. **Adverb word 43:**

Formula **advwd 43:**

\[ \text{advwd 43} = + c:fadjr + s:-\text{did1} \] 55

i.e., adverb word 43 consists of an obligatory core slot filled by a free adjective root and an obligatory satellite slot filled by an affix -did1. As in the case of adverb word 42 above, the adjective root filler does not refer to a colour. The citations below are given in context.

**Citations of adverb word 43:**

1) \(+ faay3 (\text{core}) + -\text{did1} (\text{satellite}) [ \text{daay4} ]\)
   
   'fast -- a little -- [big]'  
   
   ([grow] quickly)

2) \([\text{koey3}] + maan4 (\text{core}) + -\text{did1} (\text{satellite}) [ \text{haang5} ]\)
   
   '[he] slow -- a little [walk]'  
   
   ([he walks] slowly)

10.10.12.4. **Adverb word 52a and 52b:**

Adverb word 52a is also a result of reduplications of adjective roots, and in that way it is similar to adverb word 42. It is different from adverb word 42, however, in that the adjective root or stem fillers of the core slots are not the same as those fillers of adverb word 42. Furthermore, adverb word 52 cannot combine with the affixes -dey2 or -did1.

See fn. 54.
The filler of the core slots of adverb word 52a is an adjective root of one syllable and the reduplication is a straightforward reduplication of that one root, but the filler of the core slots of adverb word 52b is an adjective root of two syllables; the first core slot is filled by a reduplication of the first syllable of the adjective root and the second core slot is filled by a reduplication of the second syllable of the adjective root.

The formulae and citations below will make this point clearer.

Reduplication in the case of adverb word 52a may or may not be accompanied by tone modification on the second core slot.

10.10.12.4.1. Formula advwd 52a:

\[
\text{advwd } 52a = + c_1 : \text{fadjr} + c_2 : \text{redadjr} \pm s : \text{supr}
\]

Citations of formula advwd 52a:

1) \(+ \text{maan}_4 (\text{core 1}) + \text{maan}_4 (\text{core 2}) + \text{tone modification 4 to 2 [hang5]}
\]
\[\text{on the second core slot}\]

'slow -- slow --

('Walk slowly)

(i.e., \text{maan}_4 \text{maan}_4 \text{to maan}_4 \text{maan}_2)

In this particular example, the optional satellite tagmeme manifested by tone modification is obligatory. In the general formula above, it can be seen that this tagmeme may or may not be present as a part of the word.
This kind of reduplicated adverb word can only be formed from a restricted number of adjective roots. Not all adjective roots can be reduplicated in this way to form adverb word 52a. In addition, adjectives pertaining to colour cannot be reduplicated in this way to form an adverb word. See also fn. 54.

10.10.12.4.2. Formula advwd 52b:

advwd 52b = \( c_1 \text{redadjsyll}_1 + c_2 \text{redadjsyll}_2 \)

i.e., adverb word 52b consists of an obligatory core slot filled by the reduplicated first syllable of an adjective root and an obligatory core slot filled by the reduplicated second syllable of the adjective root.

Citations of formula advwd 52b:

1) \([\text{koe}y\, 3] + \text{sisisi} \, (\text{core 1}) + -\text{man5man5} \, (\text{core 2}) \, [\text{gong2 was4}]\)

'\([\text{She}] \, \text{elegantly} \quad -- \quad \text{politely} \quad [\text{talks}]\)'

(\([\text{She talks}] \text{ in an elegant and polite manner}\)).

2) \([\text{koe}y\, 3] + \text{haag3haag3} \, (\text{core 1}) + -\text{hey3hey3} \, (\text{core 2}) \, [\text{m5sig4 sung3}]\)

'\([\text{He}] \, \text{politely} \quad -- \quad \text{and with diffidence} \, [\text{won't eat the best food}]\)'

(\([\text{He}] \text{ politely, and with diffidence, [refused to eat the best food]}\)).
3) siw2siw2- (core 1) + -sam1sam1 (core 2) [go3 low4]
   'carefully' [cross the road]'
   ([cross the road] carefully).

10.11. Syntactically dependent words:

10.11.1. Intensifier words 11 and 11a:

Intensifier words consist of just one root and do not exhibit a
word-level construction. Intensifier word 11 occurs only before the
adjective it modifies on the phrase level. The following is a complete
list.

Citations of intenswd 11:

The adjective word is included in the citations:

1) sab4fan1 [kwaay5]
   'too [naughty]'  

2) gam3 [gway3]
   'so [expensive]'  

3) how2 [kwaay5]
   'very [naughty]'  

4) gey2 [kwaay5]
   'quite [naughty]'  

Intensifier word 11a occurs only after the adjective it modifies. There are only two intensifier 11a words: dag1javy as in fev5 dag1javy 'too fat' and go3tax5 as in fev5 go3tax5 'too fat'.

10.11.2. The deictic word 12 and the numeral word 13:

The deictic word 12 and the cardinal numeral word 13 are dealt with in 9.4 as fillers of the limiting phrase. The deictic word has only two members: yii 'this' and go2 'that'. It is not dealt with further here as it does not have potential word expansion.

A brief description of the morphemic context of cardinal, ordinal and indefinite numerals is given below. They are considered syntactically dependent as they are normally followed by a classifier except in the special case of counting. The cardinal numeral, the ordinal and the indefinite numeral are mutually exclusive in the numeral slot in which they occur in the limiting phrase (see 9.5.1.).

10.11.2.1. Formula cardnumwd 13:

\[ \text{cardnumwd } 13 = + c_1: \text{numst}^{57} \pm c_2: \text{numst} \pm c_3: \text{numst}^{58} \]

Citations of formula cardnumwd 13:

1) with one core slot filled (for numerals up to ten):

+ sab4 (ten)

---

56 See 9.6.1. - 9.6.3.
57 These numeral stems include simple stems (roots).
58 This structure is theoretically open-ended.
2) with more than one core slot filled (for numerals after ten):

\[ + \text{yad1 (core 1)} \pm \text{baag3 (core 2)} \pm \text{baad3sab4 (core 3)} \ldots \]

'one -- hundred -- eighty'

(one hundred and eighty)

10.11.2.2. Formula ordnumwd 13a:

\[ \text{ordmu 13a} = + s: \text{daay4} - + c: \text{cardnumwd 13} \]

Citations of ordnumwd 13a:

1) + daay4- (satellite) + sab4 (core)

'ordinal prefix -- ten'

(tenth)

2) + daay4- (satellite) + sab4sey3 (core)

'ordinal prefix -- fourteen'

(fourteenth)

10.11.2.3. The indefinite numeral word 13b:

The indefinite numeral word is filled by two core slots, one of which must be filled by the indefinite numeral \text{gey2} 'a few' and the other by a cardinal numeral word 13. As the core fillers are not ordered the hyphen is used in the formula below:

Formula indefnumwd 13b:

\[ \text{indefnumwd 13b} = + c_1: \text{gey2} - c_2: \text{cardnumwd 13} \]
Citations of indefnumwd 13b:

1) with gey2 as filler of the first core slot:
   + gey2 (core 1) + sab4 (core 2)
   'a few -- ten'
   (a few tens)

2) with gey2 as filler of the second core slot:
   + sab4 (core 1) + gey2 (core 2)
   'ten -- a few'
   (ten or so)

10.11.3. Classifier words

10.11.3.1. The classifier word 14:

Formula claswd 14:

claswd 14 = + c:clasr 14

Citations of classifier word 14 (in the limiting phrase):

1) [gey2] go3
   [some] classifier'
   (a few)

2) [sey3] faay3
   ' [four] classifier for flat things'
   ([four] flat things)
10.11.3.2. The classifier word 54 (reduplicated classifier word):

This syntactically dependent word also fills a slot in the limiting phrase. The free classifier root 14 occurs in classifier word 54 as filler of the two core slots. Classifier word 54 has the meaning 'every...'.

Formula claswd 54:

\[ \text{claswd } 54 = + c_1:\text{clasr }14 + c_2:\text{redclasr }14 \]

Citations of claswd 54:

1) + faay3 (core 1) + faay3 (core 2)

'classifier for -- classifier for
flat things -- flat things'

(every flat thing)

2) + tiw5 (core 1) + tiw5 (core 2)

'classifier for -- classifier for
long things -- long things'

(every long thing)

10.11.4. Hortatory word, dependent word, personal agent marker word, preposition word and emphatic modifier word 15:

These words are all given the same number 15. They have no expansion potential at word level.

---

59 The unique case of a reduplicated noun word yan5yan5 'everybody' is noted here as it resembles the reduplicated classifier word in structure and meaning. It does not enter into the structure of noun phrase 27a (9.8.7.1.) where the reduplicated noun, as in maaw1 maaw1 gaw2 gaw2 'cats and dogs', has the meaning 'plural'.

10.11.4.1. The hortatory word

The hortatory word is dealt with at phrase level in 9.15. There are three members in this word class:

\[
\begin{align*}
\text{bey2} & \quad \text{'let'} \\
\text{dang2} & \\
\text{yaw5dag1}
\end{align*}
\]

10.11.4.2. The dependent word

The dependent word is dealt with at sentence level in 5.4. and 5.8.1. (sentence connectives). Examples of sentence connectives are:

\[
\begin{align*}
\text{yi5ce2} & \quad \text{'besides'} \\
\text{so2yi3} & \quad \text{'therefore'} \\
\text{key5sad4} & \quad \text{'in fact'} \\
\text{ho2sig1} & \quad \text{'what a pity'}
\end{align*}
\]

The dependent word is dealt with at clause level in 6.7.1.1. It includes, for example, conditional words, purpose words and causative words (clause connectives):

\[
\begin{align*}
\text{how2ci3} & \quad \text{'if'} \\
\text{ley5} & \quad \text{'in order to'} \\
\text{yan1way4} & \quad \text{'because'}
\end{align*}
\]

The dependent word has two members which occur on the phrase level as phrase connectives:
tung5m5aay5 and tung5, allomorphs meaning 'and'. These occur in Noun Phrase 25 (9.8.5.).

yaw4 'and' which occurs in Adverb Phrase 22 (9.14.2.).

10.11.4.3. The personal agent marker word 15:

This word is dealt with in 7.6.1. - 7.6.1.2.2. It has only one member: bey2 'by'.

10.11.4.4. The preposition word 15:

The preposition word is dealt with as filler of the relater slot in temporal and locative RA phrases in 9.12.4. - 9.13.3. There are four members of this class:

- dow4 'from - until'
- hey2 'at'
- joy4 'near'
- gan4

10.11.4.5. The emphatic modifier word 15:

This word is dealt with as a filler of animate noun phrase 13 in 9.8.3. There is only one member:

ji4gey4 'oneself, itself, himself, etc.'
10.11.5. **Reduplicated locative word 56:**

Locative word 56 is unique in formation since it consists of two obligatory core slots filled by reduplications of a single bound locative root. The bound locative root is also the filler of the second core slot of locative word 31 dealt with in 10.10.10. Locative word 31 is a syntactically independent word but locative word 56 is a syntactically dependent word.

**Formula locwd 56:**

\[ \text{locwd} \, 56 = + \, c_1: \text{blocr} + c_2: \text{redblocr} \]

**Citations of formula locwd 56:**

1) \(-\text{sue}_3(\text{core } 1) + -\text{sue}_3(\text{core } 2)\)  
   'everywhere'

2) \(+ -\text{dow}_4(\text{core } 1) + -\text{dow}_4(\text{core } 2)\)  
   'everywhere'

3) \(+ -\text{bin}_4(\text{core } 1) + -\text{bin}_4(\text{core } 2)\)  
   'everywhere'

10.11.6. **Instrumental word 37:**

This word is dealt with as a filler of the instrumental slot in animate noun phrase 13 in 9.8.3.
It consists of two obligatory core slots, the first slot filled by the bound instrumental root can1- and the second by a free noun root pertaining to parts of the anatomy (human or non-human).

Formula instrwd 37:

$$\text{instrwd } 37 = + c_1: \text{can1-} + c_2: \text{nanat}$$

Citations:

1) [koey3] + can1- (core 1) + bey4 (core 2) [man4dow2 sung3]

'He [with his own -- nose [smelt food]

([He ], with his own nose, [smelt food]).

2) [low3fu2] + can1- (core 1) + saw2 (core 2) [wan2sig4]

'Tiger [with his own -- hand [seek a living]

([The tiger], with its own resources, [seeks a living]).
CHAPTER 11: List of affixes and particles

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11.1. **The terms 'affix', 'particle' and 'clitic'**

The difference between an *affix* and a *particle* as used in the present study is summed up as follows:

1) An affix fulfills the following conditions:
   
   (i) it fills a satellite slot in the word or the phrase;
   
   (ii) it has a full tone and is used with its full tone except in the case of the relative affix
        
        -ge3, where the toneless allomorph -ge is used in immediate attributive position.

A particle is the property of the clause and the sentence and is inherently toneless. When a particle appears to be the property of a single word or phrase that word or phrase is functioning as an elliptical sentence.

The term *clitic* is used by many tagmemicists. For example, Pickett, (1965), pp.101-102 describes clitics in the following words: 'They resemble affixes in that they are bound morphemes, never found in isolation, and which do not seem to be roots with other affixes attached to them. But they resemble words in that they fill slots on the phrase or clause level rather than on word level. Such forms have been called proclitics if they are preposed to the form to which they are phonologically attached and enclitics if they are in postposed position. Nida

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1 An exception is seen in the case of the level-skipping relative phrase affix -ge3 or -ge which can also occur at clause level. When it occurs at clause level the relative affix downgrades the clause of which it is a part to a lower unit in the grammatical hierarchy, i.e. from clause to phrase or word. The use of this affix can be seen in 6.7.1.2. (as clause level affix) and in 9.7. - 9.7.2. (as phrase level affix). Whenever this affix is used as a word affix, that word is functioning as a minimal phrase.

2 See 5.2.5.1.
(1949:97) has suggested the general term *clitics* to refer to both positions of the relative affix *-ge³* and the clause and sentence particles mentioned in this chapter and dealt with in the main body of the work.

The term *affix*, rather than *clitic* has been used for *-ge³* because of two considerations:

1) Although it is in theory the property of the clause or phrase, in de facto a word affix.

2) None of the other affixes are like clitics; it would clearly be uneconomical to set up a class of clitics with a membership of one.

The term *particle* is used instead of *clitic* because it is a well-known linguistic term used by Chinese and Western scholars. Whereas it is acknowledged that traditional terms are not necessarily adhered to in new approaches to a language, it is felt that widely known terms which previous scholars of a language recognize should not be ignored.

The term *particle* as used in this thesis excludes exclamations and greetings. Such forms were mentioned in Ch.5, fn.35 as independent sentences with nonclause base; they are independent sentences in that they have their own final intonation contours. They are outside the scope of this thesis. In this, therefore, a deviation from traditional sinological practice may be seen, as the traditional term *particle* embraced such forms. For instance, Kratochvil (1968), p.127, follows this tradition by saying: 'Initial sentence particles, usually divided from the rest of the utterance by a pause, resemble English interjections....'

Sentence particles are phonologically attached to the sentence in that they share the final intonation contour of a particular sentence.
Grammatically and semantically, however, they are part of a construction larger than the sentence, which may be a paragraph or a discourse. As such, the analysis of the sentence particle is outside the scope of this thesis, which does not extend beyond the sentence. The sentence particle is listed in this chapter and it is included in some of the examples in Chapter 12 because of its phonological dependence on the sentence.

Sentence particles can occur with all sentence types except those in which the clause base includes a clause particle.

11.2. Format

The following paragraphs list exhaustively, where possible, the affixes and particles of Malayan Cantonese. In cases where the list is open-ended, as in the case of the nominalizing affix for noun words 42a - 42c, the list does not attempt to be exhaustive. Since all the affixes mentioned in this chapter and some of the particles, have been dealt with as part of the grammatical exposition elsewhere in this study, no further discussion is gone into here. Cross references are made in each case to the places in the thesis where they have been dealt with. What is given in this chapter is a lexicon of affixes and particles, giving a meaning or gloss to each affix or particle listed, with one or two citations of their usage in a suitable context.

11.3. Affixes

Affixes are of four types: prefix, infix, suprafixed and suffix. The prefix only occurs with noun word 42a, the numeral and the negative

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3 See 10.10.2.3 - 10.10.2.3.5.
4 See 10.10.2.3.1.
words. The infix only occurs in conjunct verbs and in the interrogative phrase. The suprafixed takes the form of tone modification on one of the two roots of a two root construction and may occur in nouns, adjectives, adverbs or temporal words. It is comparatively rare. The most frequent kind of affix is the suffix.

11.3.1. The prefix

1) The nominal prefix for noun word 42a: \( \text{daay}_4 \) 'big', head of, auspicious.

Citation:

\( \text{daay}_4 - \text{haaw}_4 \text{jiong}_2 \) 'big--headmaster' (Vice-Chancellor)

2) The ordinal prefix for the numeral word: \( \text{daay}_4 \)

Citations:

1) \( \text{daay}_4 - \text{yad}_1 \) '-st--one' (first)
2) \( \text{daay}_4 - \text{saam}_1 \) '-rd--three' (third)

3) The negative prefix: \( \text{m}_5^- \) (10.10.8.).

Citation:

\( \text{m}_5^- \text{leng}_3 \) 'not beautiful'

---

5 See 10.10.5.2.
6 See 10.11.2.2. This merely happens to be homophonous with the nominal prefix just dealt with. It has a different meaning and is also written with another character: \( \text{不} \), not \( \text{大} \)
11.3.2. The infix

1) The aspectual infixes in the conjunct verb are the same as the aspectual affixes in non-conjunct verbs and adjectives they will be listed exhaustively under that section.7

A citation is given here to illustrate the infix:

cung1-gan2-liong5 'have a bath—infix (continuative)'

(having a bath)

2) The interrogative infix in the unaspected interrogative phrase:

-m5- (See 11.1.1.).

Citation:

ley5-m5-ley5 'come—interrogation—come' (is he (etc.) coming?)

11.3.3. The superfix

The superfix in the form of tone modification is dealt with fully in 3.4.2. Using the terminology in that section the superfix is divided into obligatory and optional categories:

Obligatory tone modification:

This feature is found, e.g., in noun compounds where a free root combines with another root. The free root undergoes the tone modification and becomes a bound root. (See 3.4.2.1.). The superfix appears on the last root in the compound.

7 See 11.3.4.5.
Citation:

to1haay2 'slipper' (-haay2, a bound form can be seen to be derived from haay5 'shoe', a free form with tone change from 5 to 2).

Optional tone modification:

Citations:

1) with adjectives: 'saam1uen4luen4' or 'saam1luen2luen4' 'clothes dishevelled' the suffix tone modification from 4 to 2 falls on one of the two roots, (see 10.10.6.).

2) with nouns: 'saayuej2' or 'saayuej5' 'shark' with optional tone modification from 2 to 5.

3) with a temporal word: 'gam1nin5' or 'gam1nin2' 'this year', with optional tone modification from 5 to 1.

11.3.4. The suffix

11.3.4.1. The adjectival suffixes

These are dealt with in 10.10.1.2., 10.10.1.5. - 10.10.1.5.2. They are the following:

1) -go2, a comparative affix as in 'fey5-go2 [ney3]' 'fat--more than [you]' (fatter [than you]).
2) -did1 'a little more' as in 'fey5-did1' 'fat--a little more'  
   (fatter)

3) -dey2 'a little' as in 'hung5hung5-dey2' 'red--red--a little'  
   (reddish)

11.3.4.2. The relative affix -ge3 or -ga8

Citations

1) 'ngo3-ge3' 'I--relative affix' (that which is mine)

2) 'ngo3-ga haay5' 'I--relative affix--shoe' (my shoe)

11.3.4.3. Pronominal plural suffix (see 10.10.3.1.).

This suffix -dey4 can be added to a personal pronoun ngo3 'I' or to an impersonal pronoun yan5 'somebody'. This is exemplified below:

1) 'ngo3-dey4' 'I--pronominal plural suffix' (we, us)

2) 'yan5-dey4' 'person/one--pronominal plural suffix' (others, people)

11.3.4.4. Nominal suffixes9

Examples are:

1) -jay2 diminutive suffix, as in 'maaw1-jay2' 'cat--diminutive suffix'  
   (kitten)

8 See fn. 1 of present chapter.
9 See noun words 42a - 42e (10.10.2.3. - 10.10.2.3.5.). Examples are given in this section, which has an open-ended membership.
2) -giog3, locative suffix, as in 'saan1-giog3' 'mountain—foot of' (foot of the mountain).

3) -gaal, a restrictive derivational nominalizing suffix,\(^{10}\) as in 'jing3ji4 -gaal' 'economics—specialist' (economist)

11.3.4.5. Aspectual suffixes

Aspectual suffixes are suffixes denoting aspect in the predicate filler (verb and adjective) and dealt with in 10.10.1.7. and in 10.10.6.1. They occur as infixes in the conjunct verb.\(^{11}\) They are listed below exhaustively:

1) -jue4 'durative' as in 'pow3-jue4' (carrying (a child) for some time).

This affix can only be used with transitive verbs, and then only in restricted usage. It appears to be a lexical restriction that this durative affix cannot occur with sig4 'eat', for instance. It cannot occur with adjectives either. Other examples with transitive verbs are: 'nam2-jue4', (keep on thinking), 'jug1-jue4' (keep on holding on to somebody), and 'tay2-jue4' (keep on looking).

'naay3maa1 pow3,jue3 say2man1 jay2 ley5 tam3 koey3' (The wet-nurse carries the child in order to coax him).  

2) -gan2 'continuative' as in 'tay2-gan2' (looking), 'sey2-gan2' (dying), 'yam2-gan2-sing3' (drinking a toast) and 'fey5-gan2' (getting fat).

'ngo3 m5dag1haan5. ngo3 dug3gan2sue1' (I'm busy. I'm studying).

3) -haa3: denoting participation for the first time or for a limited time.

\(^{10}\) See Cook,(1969), p.129.

\(^{11}\) See 11.3.2., (1).
Examples:
1) 'sigh4-\text{haa3} [\text{sue5jay2}]' (eat [potatoes] for a change). In other words this implies that usually potatoes are not eaten and the use of -haa3 marks the limited period when potatoes will be eaten.

2) 'suen3-\text{haa3}' (think awhile).

3) 'cung1-\text{haa3}-liong5' (have a bath (to pass the time, for a change, for once)).

4) 'seng5yad4 fey5. saw3\text{haa3} lamaa' (You're always fat. Try and be thin for a while).

4) 'd\text{ag}1: denoting ability

Examples:
1) 'sigh4-\text{ag}1' (able to eat)

2) 'sey2-\text{ag}1' (able to die)

3) 'daa2-\text{ag}1-din4waa2' (able to use the telephone)

4) 'haw4saang1-\text{ag}1' (able to stay young). This usage is more likely to be in questions: 'koey3 haw4saang1\text{ag}1 gey2noy4?' 'how long can she remain young?'

5) 'koey3 sigh\text{ag}1 how2 dot ye3.' (He can eat a lot).

5) 'dow2/dow3: denoting achievement of goal.

Examples:
1) 'daa2-\text{dow2}' (succeeded in shooting)

2) 'saang1-\text{dow2}' (succeeded in giving birth)

12 As in 'koey3 sey2\text{ag}1 ngaan3fay3' 'he's able to die contented'.


3) 'how2 do1 nin5 go3 jo2; wong5 day3 faan1 dow3 gog3 gaa1' (Many years passed; the king succeeded in returning to his country).

Among intransitive verbs (including conjunct verbs) only intransitive verbs 13a and 13b can occur with this affix. Adjectives cannot occur with this affix.

6) -go3: denoting experience

Examples:
1) 'yam2-g'o3' (to have drunk)
2) 'sey2-g'o3' (to have died); this implies that the person in question is still alive. This utterance is possible in a culture in which the idea of reincarnation plays a large part in religious and social life.
3) 'daa2-g'o3-jiong3' (to have gone to war)
4) 'so5-g'o3 [yad1 paay5]' (to have been foolish [once]).
5) 'ngo3 yam2-g'o3 ye5 soey2' (I have drunk coconut juice before).

Although this affix does appear with adjectives, there is a tendency to avoid using it with an adjective as it might be ambiguous, since the adjective already has a comparative affix which is homophonous with this aspectual affix (See 11.3.4.1. e.g. 3).

7) -jo2 'perfective'

Examples:
1) 'tong1-jo2' (killed (an animal))
2) 'faa3-jo2' (vapourized)

13 See 10.10.5.2. - 10.10.5.1.3. Intransitive verb 13a can be optionally followed by a nominal complement which can be reordered at clause level to come before the predicate tagmem; intransitive verb 13b is also optionally followed by a nominal complement but the complement cannot be reordered at clause level.
3) 'cung1-jo2-lio2ng5' (had a bath)
4) 'yi1 paay5 ney3 gow1 jo2' (Recently you have grown taller).

8) -maay5: 'completive'.

Examples:
1) 'saan1-maay5 [mun5]' (completed closing [the door])
2) 'hab4-maay5' (completely closed - said of clams, cockles, etc.)
3) 'cung1-maay5-lio2ng5' (finished having a bath)

Adjectives do not occur with this affix. It must be noted that -maay5 can precede -jo2 above (e.g. 7) to form a completive-perfective aspect: e.g. 'hab4-maay5-jo2 (completely closed).

4) 'ngo3 hab4 maay5 ngaan ney3 fanjgaw3' (I close my eyes completely so as to go to sleep).

9) -saay3: 'completive'

This affix is similar in meaning to -maay5 above except that it is used in a predicate which at clause level has a subject, object or complement tagmeme referring to more than one entity. For this reason the citations are in sentence form in order to supply a suitable context:

Examples:
1) 'ngo3dey4 sig4- saay3' ([we've all eaten].
2) 'koey3dey4 sey2- saay3' ([they're] all dead).
3) 'yan5yan5 cung1- saay3-lio2ng5' ([everybody] has had a bath).
4) 'koey3 leng3- saay3' ([she] alone is beautiful); slightly derogatory. Although not overtly stated, the sentence implies that there are others around who could be beautiful but the person in question strove to be the most beautiful in a rather 'pushy' way.

14 See discussion at the end of affix 9 in the next section.
It must be noted that -saay3 can be preceded by -maay5 above (e.g. 8) in all the three examples given above, e.g. 'saan1-maay5-saay3'. This combination gives the verb another form of the completive aspect.

10) -faan1: 'reciprocal'; sometimes it can mean reversion to a former state.

Examples:
1) 'ngeag1-faan1' (cheat in return)
2) 'wan2-faan1 (found); here the second meaning applies since the state before something is lost is the same as when it is found. Both examples 1) and 2) use transitive verbs.
3) 'teng1-faan1 [ngo3ga sued3waal]' (listen to [my advice] again).

Only intransitive verbs 13a and 13b can occur with this affix.
4) 'fey5-faan1' (be fat again).
5) 'koey3 wan2faan1 koey3 kam5yad4 m5gin3jo2 -ga cin2' (He has found the money which he lost yesterday).

11) -yuen5: 'completive'. This aspectual affix has the same meaning as -maay5, dealt with above (e.g. 8).

Examples:
1) 'sig4yuen5faan4 go1jan4si2, koey3 tay2sue1' (After having finished his dinner, he read).
2) Among the intransitive verbs only a few among intransitive verb 13a and the conjunct verbs can occur with this affix: 'se2-yuen5' (finished writing), 'daa2-yuen5-jiong3' (finished battling).

-yuen5 does not occur with adjectives.

A note is made here that -yuen5 can precede -jo2, the perfective affix dealt with in (7) to form a completive-perfective aspect:

e.g. 'sig4-yuen5-jo2' (completed eating).

The adjective does not occur with this aspectual affix.

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15 See fn. 13.
11.3.4.6. Adverbial suffixes

1) \(-\text{dey}2\) as in 'gwaay1gwaay1-\text{dey}2 [dug4sue1]' ([concentrate on your studies] like a good child).

2) \(-\text{did}1\) as in 'faay1-\text{did}1 [sig4]' ([e at] quickly).

The above is an exhaustive list.

11.3.4.7. Directional suffixes

These suffixes are dealt with in 10.10.6.2. They are exhaustively listed below:

1. \(-\text{coed}1\) 'out' as in 'paay5\text{coed}1' (crawl out), 'nam2\text{coed}1' (think out).
2. \(-\text{yab}4\) 'in' as in 'wan3\text{yab}4' (caged in), 'jaw2\text{yab}4' (run into).
3. \(-\text{siong}3\) 'up' as in 'tiiw3\text{siong}3' (jump up), 'tau2\text{siong}3' (look up).
4. \(-\text{log}4\) 'down' as in 'yaw5\text{log}4' (swim into), 'maan1\text{log}4' (pull down).
5. \(-\text{ley}5\) 'towards' as in 'haang5\text{ley}5' (walk towards), 'jaw2\text{ley}5' (run towards)
6. \(-\text{hoey}3\) 'away from' as in 'maaay1\text{hoey}3' (pull away from), 'pow3\text{hoey}3' (carry away from).

11.4. Sentence particles

Sentence (and clause) particles, in the special cases of citation, can be assigned tone marks. These tones, however, are not included in actual examples of use as the particles are in fact inherently toneless.

\[16\] See adverb word 42, (10.10.12.2. and Chapter 10, fn. 54). The adverbs which can combine with this suffix are reduplications of adjective roots not referring to colour.

\[17\] See 10.10.12.3. adverb word 43.
The following is an exhaustive list.

1. *ge*3: denoting reassurance:

Examples:
1) 'koey3 jung/yi3 ney3 ge' (He likes you, don't worry).
2) 'm5hay4 ge' (It's not so, don't worry).

2. *je*1 (with a free variant *jama*): denoting reassurance.

Examples:
1) 'man4wa2 je' (It's only an inquiry) i.e., no arrest is being made, for example.
2) 'man4wa2 jama' (same as the previous example).

3. *wo*3: asserting the truth of the foregoing statement.

Example:
'koey3 mow3 ley5 wo'3 (He hasn't come, I assure you).

4. *laag*3: denoting emphasis and/or finality.

Examples:
1) 'sig4jo2 laag!' (There! he's eaten).
2) 'gwaay1 laag!' (Good girl/boy!)

5. *galaag*3: denoting inevitability

Examples:
1) 'koey3 jaw4 sey2 galaag' (He's certainly about to die).
2) 'maay4 ug1 galaag' (We'll sell our house - there's no help for it).

6. laa1: denoting persuasion.

Examples:
1) 'co3 laa' (Do sit)
2) 'faay3did1 laa' (Do be quick)

7. aa3: denoting slight admonition

Examples:
1) 'maan4maan2 aa' (Be sure you (drive) slowly).
2) 'm5how2 sig4 aa' (Be sure you don't eat it).

11.5. Interrogative clause particles

11.5.1. Positive unmarked interrogative clause particles:

1. maa3: unmarked interrogation.

Example:

'ney3 ley5 maa?' (Are you coming?)

2. mow3: unmarked interrogation

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18 See 8.3.6.1. for the interrogative particle matrix and following paragraphs for a grammatical description of their function at clause level. For first mention of interrogative clause particles see 6.6.1.5.

19 'Positive' and 'negative' refer to the sort of clause in which these particles occur. See 8.3.6.1. ff.
2. mow: unmarked interrogation.

Example:
'ney5 ley5 mow?' (Are you coming?)

11.5.2. Positive and negative marked interrogative particles:

3. aa: interrogation + surprise, emphasis.

Example:
'ney5 ley5 aa?' (Don't tell me you're coming?)

4. gaa: interrogation + incredulity.

Example:
'ney5 ley5 gaa?' (Don't tell me you're coming?)

5. le: interrogation + enthusiasm, persuasion.

Examples:
1) 'koey3 hoey3 le?' (Shall we let him go?)
2) 'ngo3day4 baagung4 le?' (Shall we go on strike?)

6. me: interrogation + incredulity.

Examples:
1) 'maa5maa4 sig4faan4 me?' (Don't tell me Mummy's having her dinner?)
2) 'maa5maa1 m5sig4faan4 me?' (Don't tell me Mummy's not having dinner?)

7. waa2: interrogation + mild disbelief. This particle is used only in the negative clause.

Examples:
1) 'koey3 m5ley5 waa?' (Don't tell me he isn't coming?)
2) 'm5jungiyi3 waa?' (Don't tell me you don't like it?)

11.6. Imperative clause particles

1. laa1: imperative clause particle; 1a. laama3: (with added persuasion).

Examples:
1) 'ley5 laa!' (Come!)
2) 'ley5 laama!' (Come!)

2. aa3: imperative clause particle

Example:
'm5how2 ley5 aa!' (Don't come!)

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20 See 6.6.1.3. - 6.6.1.4.; 6.6.2.5. - 6.6.2.6. and 6.6.3.5. - 6.6.3.6.
CHAPTER 12: Text: a traditional story

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Chapter 12: Text: a traditional story

The following text is laid out sentence by sentence. Immediately below each word is a word-by-word translation. These Cantonese words are separated by a space. If a Cantonese word consists of more than one morpheme, the morpheme break is represented by a hyphen in the Cantonese word as well as in the translation of the morphemes. The hyphen, however, cannot be used in this way in the case of the word mow3, a suppletive form consisting of m2- + yew3 (see Chapter 10, fn. 45). A free translation is supplied immediately below the word-by-word and morpheme-by-morpheme translation to facilitate following the narrative.

1. gw4z15 yew3 yad1 go3 yan2, sing3 jiong1, gw3jow4 daay4ming5.

old days is one class person, surnamed Jiong, called Daayming.

In the old days there was a man, surnamed Jiong, called Daayming.
2. keey3 mew3 ge5ge1, yam4 mew3 say3-lou2.
he not-have elder brother and not-have younger brother.
He did not have any elder brothers and he did not have any younger brothers.

3. maa5maa1 baa5baa1 say2-je2 laag.
mother father die-perfective sentpart.
His mother and father were already dead.

4. hey2 ugikey2 jing4hay4 yam3 yad1 go3 yan2.
at home only is one class person.
At home there was only one person.

5. keey3 mew3 cin2.
he not-have money.
He had no money.

6. keey3 yi3ging1 gey2 daay4, daan4hay4 mew3 taay3taay2, deng1yuan5 jung4 mew3 say3man1jay2.
he already quite old but not-have wife a fortiori still not-have children.
He was already quite old, but he did not have a wife; a fortiori he did not have any children.
7. keey3 ydh4-ydh4 sso61-mum2 lay5 jeh4-gung1.
   he day-day go out-door in order to de-work.
   Everyday he went out in order to work.

8. maan3taw5 faam1 ugikey2.
   night return home.
   At night (he) returned home.

9. keey3 ga ugikey2 hey2 fam4 sso61-bin4.
   he-relat house is (at) city out-bloer.
   His house was outside the city.

10. keey3 jeh4-gung1-ga day4-fon4 dog3 ugikey2 m5-yosn3, ydh4-ydh4 hey2
    he de-work-relat place-square from-until house not-far day-day at
    sso61-bin4Tai2-haa3 saam1, yam4 taay2-haa scoy3, yam4 yam3ai5 cieo3-haa3 get.
    out-bloer look at-aspaf mountain and look at-aspaf water and sometimes sing-aspaf song.
    The place where he worked was not far from his house, so everyday, in the open air, (he would) look at the
    mountains, look at the lakes, and at times (he would) sing a song.

Note: Where the meaning of a morpheme is so long that it takes up too much space, as in the case of the aspectual
affix -haa3 in this example, only the morphemic label is given.
11. keey3 yaw3 him2 de1 pang5yaw3, pang5yaw3 yaw4 jung1yi3 keey3.

he has very many friend and like he.

He had a lot of friends, and his friends loved him.

12. keey3-dey4 jow4-gung1-ga si5haw4 jaw4 jow4-gung1, waan2-ga si5haw4 jaw4 waan2.

he-plaf de-work-relaf time thus do-work rest-relaf time thus rest.

During their working time, they worked; during their resting time, they rested.

13. maan3taw5 yan5-dey4 faan1 ug1key2 go2jan4si12, jieng1 daay4ming5 jaw4 faan1 ug1key2 laang.

night person-plaf return home at that time Jieng Daayming also return home sentpart.

At night, when others went home, Jieng Daayming also went home.

14. yan5-dey4-ga gas1ting5 yaw3 taay3taay2, yaw3 say3man1jay2.

person-plaf-relaf family has wife has child.

Other people's homes had wives; and (they) had children.

15. taay3taay2 jue2-faan4 go2jan4si12 keey3-dey4 tung5maay5 say3man1jay2 waan2.

wife cook-rice at that time he-plaf and/with child play.

While (their) wives cooked, they played with the children.
If Jiong Daayming arrives home, does his wife open the door in order to greet him?

17. meng3 gam3 fun1-hay2-ga si.4.  
not-have so happy-rise-relaf affair.  
There isn't such a joyful happening.

18. Jiong1 daaym1ng5 jil4gey1 can1-saw2 jue2-faan4, ug1key2-ga gung1 yaw4 jil4gey1 jow14-may5.  
Jiong Daayming himself own-hand cook-rice home-relaf work also himself do-completive aspaf.  
Jiong Daayming himself, with his own hands, cooked (the dinner) and the housework (he) himself completed.

19. daaym1ng5 noy4-bad1-noy2 siong2 gong2 waa4, daan4hay4 mew3 yan5 teng1, so2yi3 yaw3si5  
Daayming time-not-time want speak word but not-have person listen so sometimes  
keey3 jil4gey1 tung5 jil4gey1 gong2 waa4,  
he himself with himself speak word.  
From time to time, Daayming wanted to speak, but there was anybody to hear (him); therefore, at times he spoke to himself.
20. key3 yaw3 yad1 go5 pang5yaw3.
   he has one olas friend.
   He had a friend.

21. yad1 way2 low3 sin1saang1.
   one olas old gentleman.
   A certain old gentleman.

22. yi1 way2 low3 sin1saang1 sing3 gw1.
   this olas old gentleman surnamed Gow.
   This old gentleman was surnamed Gow.

23. gam2yiong2, key3 giw3jew4 gw1 low3 sin1saang1.
    so he called Gow old Mister.
    Se, he was called 'Old Mr. Gow'.

24. yantway4 key3 how2 low3.
    because he very old.
    Because he was very old.
25. lay5 gaaw2-siw3 go.
in order to play-laughter sentpart

(It was just) in order to make fun (of him).

26. y11 way2 low3 sin1saang1 wuy3 waag3 waas2, waag3-dag hew2 ci3.
this clas old gentleman can paint painting paint-as-aspaF denoting very like.
ability

This old gentleman could paint; he painted a very good likeness.

27. hew2 coad1-meng2.
very go out-name.
(He was) very famous.

28. gowl low3 sin1saang1 geg3-dag1 ji1ong1 daayi1ming5 ji14goy1 yad1 ge3 yan2 taay3 jing4,
Gow old Mister feel-as-aspaF denoting Ji1ong Daayi1ming himself one clas person too quiet,
ability

so2y13 keey3 waag4 yad1 ji1ong1 waas2 sung3bye2 daayi1ming5.
so he paint one clas painting present(to) Daayi1ming.

Old Mr. Gow felt that Ji1ong Daayi1ming was too lonely by himself, so he painted a picture to present to him.
29. row\(\text{1}^{-}\) low2 sin1 saang\(\text{1}^{-}\) waag\(\text{4}^{-}\)-je2 mad1 ye3 waa2 le?

Gow old Mister paint-perfective aspsf what painting igclpart?

What sort of picture did old Mr. Gow paint (do you think)?

30. keey3 waag\(\text{4}^{-}\)-je2 yad1 jiong1 how2 long3-ga mey3-yen5.

he paint-complete aspsf one olaas very beautiful-refl beautiful-person.

He painted a picture of a very beautiful lady.

31. row\(\text{1}^{-}\) sin1 saang\(\text{1}^{-}\) waag\(\text{4}^{-}\)-yuen5 waa2 ge2 jen4 si2, keey3 j14 gey1 sam1 nam2, "jiong daayming5

Gow\(\text{-}\) Mister paint-complete aspsf painting at that time he himself think "Jiong Daayming

yae3-je2 yin1 jiong1 waa2, keey3 jen4 wuy3 go3 dag1 gaiting5 yae3 yad1 ge3 yae5 galagi.

have-perfective this olaas painting he thus will feel-aspsf home has one olaas person sentence denoting ability

When Mr. Gow had finished painting the picture, he thought to himself, "If Jiong Daayming has this picture, he will feel that there is somebody at home."

32. row\(\text{1}^{-}\) low3 sin1 saang\(\text{1}^{-}\) ming1 yin1 jiong1 waa2 sung3 bey2 jiong1 daayming5

Gow old Mister take this olaas painting present(to) Jiong Daayming.

Old Mr. Gow took this picture and presented it to Jiong Daayming.
Jiong Daoyiming have-perfective this clas painting at that time he morning-morning face-durative aspaf

waa2-xiong4-ga  yan5  gong2 "jou2san5".
painting-surface- person speak "good morning."

After Jiong Daoyiming received this picture, every morning he faced the person in the painting and said "good morning".

34. deng1-nun2  go2jan4si2  jaw4  doey3 -jue4  keey3  gong2  "joy3  gin3".
go out-door at that time thus face-durative she speak "again meet".

When he went out (he) faced her and said "goodbye".

35. keey3  jou4-yuan5-gang1  ,  maan3tan5  faan1-ley5,  oo3  hey2  was2-giang3  go2-daw4.

he de-completive aspaf-work night return-towards sit at painting-foot there-bloom.

He finished work; (he) came back at night; (he) sat there at the foot of the picture.

36. ug1key2 -ga  al4 -cing5  m5-hang2  jou4  laaq.

home-relief affairs-condition not-willing do sentpart.

(He) would not do any housework.
37. gam2yieng2, yaw3si5 faan4 dui m5=jue2, yaw4 yaw3si5 m5=sigh=faan4.
se sometimes rice even do-not cook and sometimes do-not eat-rice.
In this way, at times (he) would not cook any dinner, and at times (he) would not eat any dinner.

38. yaw3 yad1 yad4, koe3 yaw4 mow3 jue2=faan4.
is one day he also do-not cook-rice.
One day, he once again did not cook any dinner.

39. mow3 sigh=faan4, koe3 jaw4 fan3=gaew3 laag.
do-not eat-rice he thus sleep-a sleep sentpart.
He did not eat; he went to sleep.

40. daan4hay4 mow3 sigh=faan4, dim2yieng2 fan3=gaew3?
but do-not eat-rice how sleep-a sleep?
But (he) had not eaten; how could he sleep?

41. koe3 mow3 faad3j12.
he do-not have method.
He had no alternative.
42. koe2 yey2-sam1 jow4 yad1 did1 dim2sam1.
   he get up-body make a olas dim2sam1 (a kind of food.)
   He got up; he made some dim2sam1.

43. sith-yuen5 ye3, yaw4 tay2-haa3 go2 jiong1 waa2.
   eat-complete thing and look at-aspsf 'a while' that olas painting.
   (He) finished eating, and he looked for a while at that picture.

44. koe2 tay2-jua4 waa2-siong4-ga mey3-yam5 gong2, "ting1-yad4 mey3 tung5 ng3
   He look-durative painting-surface-relax beautiful-person speak "future-day you for I

   jua2-tam4, how2 maa?
   cook-rice good igolpart?
   He looked at the beauty in the picture; and said"tomorrow you cook dinner for me, all right?"

45. daay4-y14 maan3 daay4-sing5 faan1-dow3 ug1-key2 ge2-jun4-si2, koe2 man4-dow2
   ordpref-tue night Daaymin (return-aspsf denoting achievement of goal)
   home at that time he smell-aspsf(denoting achievement of goal)
how2 hiong1-ga mey4.
very fragrant-relaf smell.
The next night, when Daayming arrived home, he smelt a very nice smell.

46. daayming5 samiamam2 "nge3-ga maan3-faan4 yue4-bey4-jo2?"
Daayming think "I-relaf night-rice ready-perfective aspf?"
Daayming thought, "don't tell me my dinner is ready?"

47. keey3 hoy1 wegh4-gay3.
he open pan-lid.
He lifted the pan-lid.

48. tay2-dow2 yahl4-bih4 yaw4 yaw3 baaw1, yaw4 yaw3 haa1gaa2w2, yaw4 yaw3 siw1maay2, see-aspf(denoting in-blocr also is baaw1 also is haa1gaa2w2 also is siw1maay2 achievement of goal)

yaw4 yaw3 maanktaaw5.
also is maanktaaw5. (The underlined items are names of food.)
(He) saw (in the pan that) there were baaw1, there were haa1gaa2w2, there were siw1maay2 (and) there were maanktaaw5.
Text analysis

The first twenty-five sentences are analysed into sentence level fillers. The first twelve sentences are analysed from the clause level down to the word level.

The sentence is analysed into one or more sentence level fillers (typically clauses); the clause is analysed into one or more clause level fillers (phrases); the phrase is analysed into one or more words and the word into one or more morphemes. Phrase and word and word and morpheme are often coincident.

The analysis is carried out in the following order: under each Cantonese citation is given a translation, which, as far as possible, reflects the grammatical unit being examined. That is to say, a sentence is cited in sets of clauses, and these clauses are freely translated into a comparable English clause. A clause is cited in sets of phrases; a phrase is cited in sets of words; (word and phrase may be coincident in the case of the minimal phrase); words are cited in sets of morphemes (again with a certain degree of word/morpheme coincidence). This format is adopted so as not to obscure the grammatical level being analysed.

The + sign is used to show the division point between two grammatical units other than the intonation. The - sign is used, as in the rest of the thesis, to signify the simultaneous addition of the intonation contour to a sentence.

In the sentence level analysis, the level above the sentence (in this case, the narrative), is implied but not analysed. This higher level is indicated by the presence of sentence level particles which occur in sentence final (see 11.4). These particles are included in the text but any attempt to analyse them is to reach beyond the sentence and is outside the scope of the present study.
I. Sentence level analysis

1. Sent 211 (5*4*1*2*)

+ gawâsi5 yaw3 yad1 go3 yan2 + jofeat + sing3 jie4 + jofeat + giw3 jow4 daeymg5 - ICF

+(In the) old days there was a man + jofeat + surname Jie4 + jofeat + called Daeymg - ICF

+ ClInd 21Fa (6*6*2*2*) + jofeat + ClInd 21Fa (6*6*2*2*) + jofeat + ClInd 51a (7*6*2*1*1*) - ICF

2. Sent 214 (5*4*1*5*)

+ kooy3 mow3 go5go1 + jofeat + yam4 + mow3 say3low2 - ICF

+ He had no older brothers + jofeat + and + (he) had no younger brothers - ICF

+ ClInd 21Fb (6*6*2*4*) + jofeat + on3 (5*4*) + ClInd 21Fb (6*6*2*4*) - ICF

3. Sent 110 (5*3*1*) + sentpart (11*4*)

+ ma5maa1 bas5baa1 say2jo2 + laag - ICF

+(His) mother and father were already dead + sentpart - ICF

+ ClInd 21Fa (6*6*2*1*) + sentpart (11*4*) - ICF

4. Sent 110 (5*3*1*)

+ hey2 ugikey2 jing4hay4 yaw3 yad1 go3 yan2 + sentpart - ICF

+ At home there was only one person + sentpart - ICF

+ ClInd 21Fa (6*6*2*2*) - ICF
5. Sent 110 (5.3.1.1)
+ key3 mow3 cin2
+ He had no money
+ C1Ind 21Fa (6.6.2.2)

6. Sent 210 (5.4.1.1)
+ key3 yi3ging1 gev2 daay4
+ He was already quite old
+ C1Ind 31Ba (6.6.3.1)
+ jung4 mow3 se3man1 jay2
+ still did not have children
+ C1Ind 21Fb (6.6.2.4)

7. Sent 310 (5.5.1.1)
+ key3 yad4yad4 ooed4mun2
+ He, everyday, went out
+ C1Ind 21Ba (6.6.2.1)

8. Sent 110 (5.3.1.1)
+ maan3te5 faan1 ug1key2
+ At night (he) returned home
+ C1Ind 21Fa (6.6.2.2)
+ keey3ga u1key2 hay2 faw4 ceed4bin4
+ His house was outside the city
+ ClInd 21Fa (6.6.2.2+)

10. Sent 214 (5.4.1.5+)
+ keey3 jow4gung1 -ga dey4feng1 dew3 u1key2 m5yuen3
+ The place where he worked was not far from his house
+ ClInd 31Eb (with dwngrClRel 28Fa as modifier of dey4feng1) (6.6.3.2) (6.8.2.6+)
+ yad4yad4 hay2 ceed4bin4 tay2haa3 saan1
+ everyday, in the open air, (he would) look at mountains
+ ClInd 11a (6.6.1.1+)

+ tay2haa3 seey2
+ look at lakes
+ ClInd 11a (6.6.1.1+)

+ yaw3si5 cieng3haa3 get1
+ sometimes (would) sing a song
+ ClInd 11a (6.6.1.1+)
12. Sent 211 (5.4.1.2.)
+ keey3 day4 jaw4ung1 =ga si5haw4 jaw4 jaw4ung1  + jofeat + waan2 =ga si5haw4 jaw4 waan2  - ICF
+ (During) their working time (they) worked  + jofeat + (during their) resting time (they) rested  - ICF
+ ClInd 21Ba (with dwngC1Rel 28Ea)  + jofeat + ClInd 21Ba (with dwngC1Rel 28Ea)  - ICF
(6.6.2.1.) (6.8.2.6.)  (6.6.2.1.) (6.8.2.6.)

13. Sent 310 (5.5.1.) + sentpart (11.4+)
+ maan3taw5 yan5day4 faan1 ug1key2 ge2jan4si2  + jiong1 daaybing5 jaw4 faan1 ug1key2 + laag  - ICF
+ At night, when others went home  + Jiong Daayming also went home  + sentpart  - ICF
+ ClTemp 17a (6.8.1.5.)  + ClInd 11a (6.6.1.1.)  + sentpart (11.4+) ICF
(6.8.1.5.)  (6.6.1.1.)

14. Sent 214 (5.4.1.5+)
+ yan5day4ga gaatting5 jaw3 taay3taay2  + jofeat + jaw4  + jaw3 say3man1jay2  - ICF
+ Other people's homes had wives  + jofeat + and  + (they) had children  - ICF
+ ClInd 21Fa (6.6.2.2.)  + jofeat + on3 (5.4+) + ClInd 21Fa (6.6.2.2.)  - ICF
15. Sent 310 (5.5.5.1)
+ tsay3taay2 jue2fean4 go2jan4si2 + keey3dey4 .tung5maay5 say3man1jay2 waan2 - ICF
+ While (their) wives cooked + they played with the children - ICF
+ Clistemp 278a (6.8.2.5.) + Clistem 218a (6.6.2.1.) - ICF

16. Sent 330y (5.5.3.2)
+ how2oi3 jiong4 daay4ming5 faan1dew3 ug1key2 + jofeat + keey3ga tsay3taay2 hay1 mun5 + lay5 jib3 keey3 - M1
+ If Jiong Daayming arrives home + jofeat + his wife opens the door + in order to greet him - M1
+ Clistend 14a (6.8.1.1.) + jofeat + Clistem 21Fa (6.6.2.2.) + Clistem 21Fa (6.6.2.2.)

In Sent 330y above (e.g. 16), the purpose clause is subordinated to the main Clistem 21Fa and Clistend 14a is
subordinated to the whole. The intonation is marked for interrogation.

17. Sent 110 (5.3.1.1)
+ mew3 gam3 fun1hey2 -ga ai4 - ICF
+ There isn't such a joyful event - ICF
+ Clistem 21Fb with dwngCRel 38a 'gam3 fun1hey2 -ga' modifying 'ai4'
(6.6.2.4.) (6.8.3.4.) - ICF
19. Sent 210 (5.4.1.1.)
  + Daaymimg5 noy4bad4noy2 sion2 gong2 waa4  + jofeat + daankhay4  + maw3 yan5  + teng1
  + From time to time Daayming wanted to speak  + jofeat + but  + there wasn't anybody  + to hear
  + CInd 11a (6.6.1.1.)  + jofeat + on1 (5.4.)  + CInd 21Fb (6.6.2.4.)  + CInd 11a(6.6.1.1.)
  + jofeat + on1 (5.4.)  + CInd 21Fa (6.6.2.2.)

20. Sent 110 (5.3.1.1.)
  + keey3 yaw3 yad1 ge3 pang5yaw3  - ICF
  + He had a friend  - ICF
  + CInd 21Fa (6.6.2.2.)  - ICF
22. Sent 110 (5.3.1.6)
   + yit way2 lew3 sin1saang1 sing3 gow1 - ICF
   + This old gentleman was surmamed Gew - ICF
   + ClInd 21Fa (6.6.2.2.6) - ICF

23. Sent 510 (5.8.1.6)
   + gam2yiong2 + jofeat + g1w3jow4 gow1 lew3 sin1saang1 - ICF
   + So + pause + he was called 'Old Mr. Gew' - ICF
   + segem (5.8.1.6) + pause(5.8.1.6) + ClInd 51a (7.6.2.1.1.1) - ICF

24. Sent 610 (5.9.1.6)
   + yantway4 keey3 haw2 lew3 - ICF
   + Because he was very old - ICF
   + ClDep 36a (6.8.3.2.6) - ICF
25. Sent 610 (5,9,1,6)
  + ley5 gase2wil3
  + In order to make fun (of him).
  + ClDep 25Ba1 (6,8,2,3,1e)
  + ge3 - ICF
  + sentpart -1 - ICF
  + sentpart (11,4) - ICF
II. Clause level analysis

In this level, the connective and the sentence particle are omitted.

Fillers of this level which are words are functioning as the minimal phrase.

From sentence 1:

1. + gaw4sin5 + yaw3 + yad1 ge3 yan2
   + (In the) old days + (there) was + a man
   + tempd 11(10.10.9.1) + viwd 13b(10.10.5.1.3) + NPhr 11(9.8.1)

2. + sing3 + Jiong1
   + surname d + Jiong
   + viwd 13b(10.10.5.1.3) + mwd 11(10.10.2.1)

3. + giw3jew4 + daaywming5
   + called + Daayming
   + viwd 13b(10.10.5.1.3) + mwd 11(10.10.2.1)

From sentence 2:

4. + kexy3 + mew3 + ge5ge1
   + He + didn't have + elder brother
   + pmwd 11(10.10.3.1) + negwd 41a(10.10.8.2) + mwd 11(10.10.2.1)
5. + mow3
   + didn't have
   + negwd 41a (10.10.8.2.)
   + say3low2
   + younger brother
   + mwd 21a (10.10.2.2.1.)

From sentence 3:

6. + maa5mad baas5baa1
   + mother (and) father
   + maa5mab baas5baa1
   + NEbr 27 (9.8.7.)
   + viwd 12 (10.10.5.1.1.)

From sentence 4:

7. + hey2 ugikey2 + jing4hay4 + yaw3
   + at home + only + (there) was
   + LocPhr 31 (9.13.1.) +advwd 11(10.10.12.1.) +viwd 13b(10.10.5.1.3.)
   + yad1 ge3 yan2
   + one person
   + NPhr 11 (9.8.1.)

From sentence 5:

8. + koey3 + mow3 + cin2
   + he + didn't have + money
   + pmwd 11 (10.10.3.1.) + negwd 41a (10.10.8.2.) + mwd 11 (10.10.2.1.)
From sentence 6:

9. + keey3 + yi3ging1 + goy2 daay4
   + He + already + quite old
   + pemd 11 (10.10.3.1.1) + advd 11 (10.10.12.1.) + AdjPhr 11 (9.6.1.)

10. + mow3
   + didn't have + taay3taay2
   + negwd 41a (10.10.3.2.) + wifd 11 (10.10.2.1.)

11. + jung4 + mow3
   + still + didn't have + othdren
   + advd 11 (10.10.12.1.) + negwd 41a (10.10.3.2.) + mwd 11 (10.10.2.1.)

From sentence 7:

12. + keey3
   + He
   + pemd 11 (10.10.3.1.)
   + cood4mun2
   + go out
   + viwd 24 (10.10.5.2.1.)

13. + ley5
   + in order to
   + depwd 15 (10.11.4.2.)
From sentence 8:

14. + maan3 taw5 + faan1 + ug1key2
   + (At) night + return + home
   + tempwd 11 (10.10.9.1.0) + vtwd 11 (10.10.4.1.0) + mwd 11 (10.10.2.1.0)

From sentence 9:

15. + keey3 ga ug1key2 + hey2 + faan4 coed1bin4
   + His house + is (at) + outside the city
   + NPhr 12 (9.8.2.0) + viwd 13b (10.10.5.1.3.0) + LooPhr 32 (9.13.2.0)

From sentence 10:

16. + keey3 jow4 jung1 = ga day4 fang1 dow3 ug1key2 + m5yuen3
    + The place where he worked + from-until (his) house + not far
    + LooPhr 33 (9.13.3.0) + negwd 41a (10.10.8.2.0)

17. + yad4 yad4 + hey2 coed1bin4 + tay2haa3
    + everyday + (at) outside + look at
    + tempwd 51 (10.10.9.3.0) + LooPhr 31 (9.13.1.0) + vtwd 11 (10.10.4.1.0)

+ saan1
+ mountains
+ mwd 11 (10.10.2.1.0)

18. + tay2haa3 + soey2
    + look at + lakes
    + vtwd 11 (10.10.4.1.0) + mwd 11 (10.10.2.1.0)
From sentence 11:

20. koeey3 + yaw3 + how2 do pang5yaw3
   + He + has + many friends
   + nwd 11 (10.10.2.1.1) + vtwd 11 (10.10.3.2.1) + NPhr 11 (9.8.2.2)

21. pang5yaw3 + jungyi3 + koeey3
   + friends + love + he
   + nwd 11 (10.10.2.1.1) + vtwd 11 (10.10.3.2.1) + nwd 11 (10.10.3.2.1)

From sentence 12:

22. koeey3dey4 jow4gung1 -ga si5ham4 + jaw4 + jow4gung1
   + (During) their working time + thus + work
   + NPhr 12 (9.8.2.2)
   + advwd 11 + viwd 24a1 (10.10.12.1.1) (10.10.5.1.1.1)

23. waan2 -ga si5ham4 + jaw4 + waan2
   + resting time + thus + play
   + NPhr 11 (9.8.1.1)
   + advwd 11 + viwd 12 (10.10.12.1.1) (10.10.5.1.1.1)
III. Phrase level analysis

Those words which are minimal phrases in the clause level analysis are not repeated in this section. Only those clause level fillers which are phrases of more than one word are analysed here.

From clause 1:

1. NPhr 11:

+ yad1 + go3 + yan2
+ one + ola + person
+ cardnumwd 13(10*11*2*1)+ ola 14 (10*11*3*1)+ nwd 11 (10*10*2*1)

From clause 6:

2. NPhr 27:

+ maa5maa1 + baa5baa1
+ mother + father
+ nwd 11 (10*10*2*1) + nwd 11 (10*10*2*1)

From clause 7:

3. LooPhr 31:

+ hey2 + ugtkey2
+ at + home
+ prepwd 15 (10*11*4*4) + nwd 11 (10*10*2*1)
4. NPhr 11 vadi go3 yan2 has already been analysed in the first clause in this section.

From clause 8:

5. AdjPphr 11:

+ gey2 + daay4
+ quite + old
+ intenswd 11 (10.11.1.) + adjwd 11 (10.10.1.1.)

From clause 15:

6. NPhr 12:

+ koe3ga + ug1key2
+ His + house
+ RelPphr 31a (9.7.1.2.) + nwd 11 (10.10.2.1.)
+ koe3 + -ge
+ pmwd 11 + relat
(10.10.2.1.) (9.7.1.)
7. **LooPhr 32:**

   + faw
   + city
   + mwd 11 (10*10*2*1*)

   From clause 16:

8. **LooPhr 33:**

   + kooey3
   + Ha
   + mwd 11(10*10*3*2*)

   From clause 17:

9. **LooPhr 31:**

   + hey2
   + mwd 11 (10*10*2*1*)
From clause 20:

10. NPhr 11:

+ how2       + do1       + pang5yaw3
+ very       + many       + friends
+ intenswd 11(10.11.1.) + adjwd 12(10.10.1.1.) + nwd 11 (10.10.2.1.)

From clause 22:

11. NPhr 12:

+ koey3day4  + jow4gumg1 + ga       + si5haw4
+ They       + for working + time
+ pnwd 41(10.10.5.2.) + RelPhr 31(9.7.1.1.) + tempwd 11(10.10.9.1.)
+ jow4gumg1 + ga
+ viwd 24a1 + relaf
              (10.10.5.2.2.) (9.7.1.)

From clause 23:

12. NPhr 11:

+ waan2 + ga       + si5haw4
+ for resting + time
+ RelPhr 31 (9.7.1.1.) + tempwd 11 (10.10.9.1.)
+ waan2 + ga
+ viwd 12 (10.10.5.1.1.) + relaf (9.7.1.)
IV. Word level analysis

Numbers in this section refer to sentence numbers. The full text up to sentence 12 is dealt with although some of the material has already been covered in the phrase level analysis. This procedure gives a morpheme-by-morpheme rendition of the text in sequence.

In order not to break up the analysis, reference to sections where the morphemes occur as word fillers in the thesis will not be made. Morpheme boundaries are indicated by a single hyphen within words. The plus sign marks word boundaries in the Cantonese examples and morpheme boundaries which are coincident with word boundaries in the grammatical analysis. The double hyphen — marks word boundaries in the translation.

1. + gaw4si5 + yaw3 + yad1 + go3 + yan2,
   Old days — is — one — olas — person —
   + ftempr + fvir 13b + numr + fclasr 14 + fnr

   + sing3 + jiongl + giw3jow4 + daay4ming5
   surname — Jiong — named — Daayming.
   + fvir 13b + fnr + fvir 13b + fnr
2. + koey3 +m5 - yaw3 (i.e. mow3) + go5ge1
   He — not-have —
   + fpmr +negaf-fvir 13b + fnr
   + yaw4 +m5 - yaw3 + say3 - low2
   and — not-have — small - fellow.
   + fpmr +negaf-fvir 13b + fadjr - fnr

3. + maa5maa1 + baa5baa1 + say2 - je2
   Mother — father — die - perfective
   + fnr + fnr + fvir 12 - aspaf
   + laag (sentpart).

4. + hey2 + ug1key2 + jing4hay4
   At — home — only
   + fprepr + fnr + fadvr
   + yaw3 + yad1 + go3 + yan2.
   is — one — clas person.
   + fvir 13b + fnmr + folasr + fnr

5. + koey3 +m5 - yaw3 + cin2.
   He — not - have — money.
   + fpmr + negaf-fvir 13b + fnr

6. + koey3 +yi3ging1 + goy2 + dasay4.
   He — already — quite — old.
   + fpmr + fadvr + fintensr 11 + fadjr
but not have
+four negaf-fvir 13b

a fortiori still not have child.
+fourn fadvr negaf-fvir 13b +fnr

He - day - day - go out - door -
+fpurpr ftemp=redftemp= +fvtr fnr

in order to do work -
+fpurpr +fvtr fnr

Night return -
+ftemp= +fvtr fnr

He -relaf - house - is at -
+fpnr +relaf +fnr +fvir

city - out - bleor -
+fnr +bleor = bleor
Me. — do — work — relaf —
+fptr — fnr — relaf

day — fong + daw — ug1key2 — m5 — yuen3,
earth — a square — from — until — house — not — far —
+fnr — fnr — fnr — relaf — negaf — fadjr

so — day — day — at — cut — bloor —
+fnr — ftempr — redf — ftemp — fnr — bloor — bloor

tay2 — haa3 — saan1,
look at — denoting participation — mountain — for a limited time
+fptr — aspaf — fnr

tay2 — haa3 — soey2,
look at — denoting participation for — water — for a limited time
+fptr — aspaf — fnr

yaw — yaw3si5 — cioung — haa3
and — sometimes — sing — denoting participation — for a limited time
+fnr — ftempr — fptr — aspaf

go1
song.
+fnr
11. + koey3  + yaw3  + how2  + dot
   + He  —  has  —  very  —  many  —
   + fpmr  + fvir 13b  + fntenar 11  + fadjr

   + pang5yaw3,  + pang5yaw3  + yaw4  + jung1yi3
   friend  —  friend  —  and  —  like
   + fnr  + fnr  + four  + fvtr

+ koey3.
   he.
   + fpmr

12. + koey3 = dey4  + jow4  —  gung1  —  ga  + si5haw4
    He  — plural  —  do  —  work  —  relaf  —
    + fpmr  —  plsf  + fvtr  —  fnr  —  relaf  + ftempr

    + jaw4  + jow4  —  gung1,
    thus  —  do  —  work,
    + four  + fvtr  —  fnr

    + si5haw4  + jaw4
    time  —  thus  —
    + ftempr  + fadvr

    + waan2
    rest  —  relaf—
    + fvir 12—relaf

    + waan2.
    rest.
    + fvir 12
Appendix: List of Malay loan-words and words influenced by Malay

The symbol < means 'is derived from'.

A. Loan-words

<table>
<thead>
<tr>
<th>Cantonese</th>
<th>Malay</th>
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<tbody>
<tr>
<td>1. aa3daab3ug1</td>
<td>'attap hut' &lt; attap 'attap', a kind of thatch</td>
</tr>
<tr>
<td>2. bag1sag1</td>
<td>'market' &lt; pasar 'market'</td>
</tr>
<tr>
<td>3. baan3nay1</td>
<td>'clever' &lt; pendai 'clever'</td>
</tr>
<tr>
<td>4. daa2haan4</td>
<td>'step' &lt; tahan 'step'</td>
</tr>
<tr>
<td>5. dab4bid1</td>
<td>'but' &lt; têtapí, têpi 'but'</td>
</tr>
<tr>
<td>6. sim4</td>
<td>'quiet' &lt; diam 'quiet'</td>
</tr>
<tr>
<td>7. gasm3bong1</td>
<td>'Malay village' &lt; kampong 'village'</td>
</tr>
<tr>
<td>8. laag3gu2</td>
<td>'popular, saleable' &lt; laku 'popular, saleable'</td>
</tr>
</tbody>
</table>
9. *law5lin2* < durian
   *law5lin5* < durian 'durban', a fruit with spikes on its shell

10. *leey1* < duit 'money'

11. *le5dit1* < reti 'bread'

12. *maa3das1* < mata-mata 'police'

13. *saay3yaang1* < sayang 'love'

14. *saay3yang1* < sayang 'regret'

15. *sin3maang1* < sinang 'easy'

16. *sem3mong1* < sombeng 'haughty'
   *song3mong1* < sombeng 'haughty'

17. *sulmaat* < suma 'all'

B. Lean-translations

18. *sighfung1* (literally 'eat wind'; metaphorically 'to have a holiday')
   < Malay *makan engin* with the same literal and
   metaphorical meanings

1 The Cantonese word *saay1* 'to waste' exists separately in the language.
19. teg3 daay4 giog3 (literally 'carry big leg'; metaphorically 'to flatter')
    < Malay mongankat-angkat 'flatter' (Malay angkat
    'to lift up').

C. Other cultural loan

20. ngoglyue5 (literally 'a crocodile'; metaphorically 'a oadge')
    < Malay buaya 'crocodile' is depicted in fables as
    a creature of guile.

21. ngog4 'to oadge'. Extension of meaning from example 20 above.2

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2 In Malayan English (see Killingley (1965)), te ooro means 'to oadge'.
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