An Introduction to Ryukyuan Languages

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出版情報：2010. 東京外国語大学アジア・アフリカ言語文化研究所
バージョン：
権利関係：

Hateruma (Yaeyama Ryukyuan)

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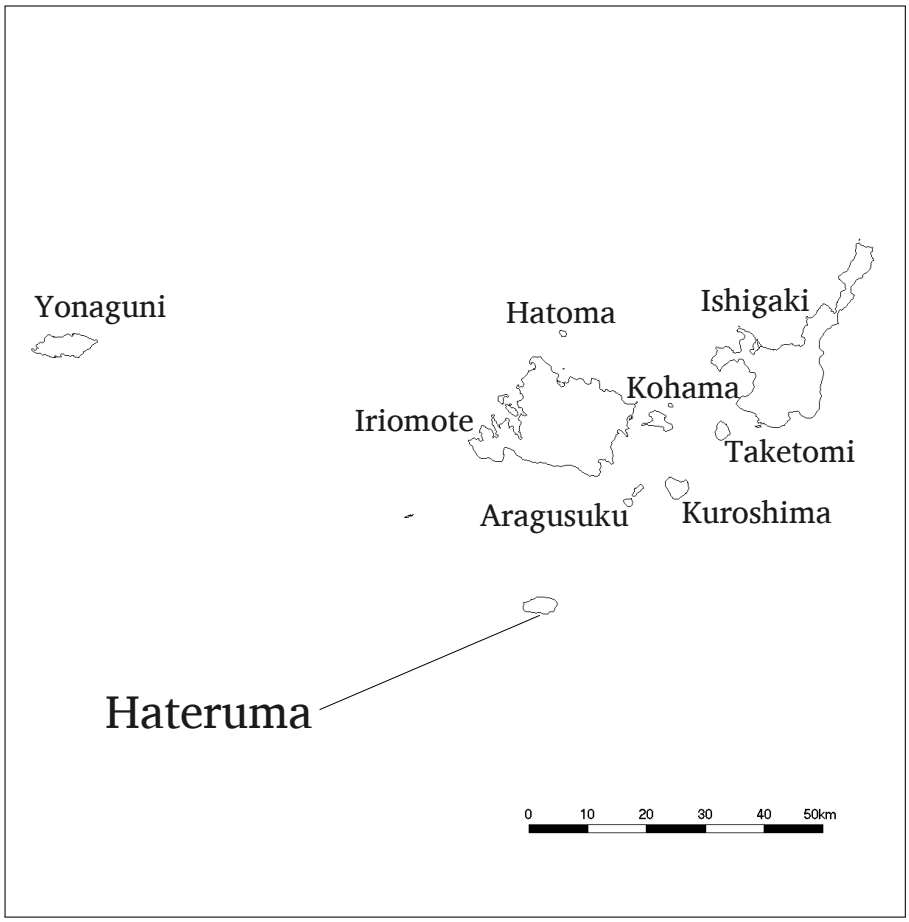

Figure 1: Yaeyama Islands

Introduction

Hateruma Ryukyuan has the basic characteristics of a typical Japonic language: verb-final with the modifier-head constituent order, agglutinative and suffixal morphology, and dependent-marking.

However, there are two striking features in Hateruma: strong aspiration and a neutral case system. A strong aspiration, which is not phonologically

distinctive, is observed with voiceless obstruents in word initial position. This strong aspiration devoices the vowels following them, and even subsequent sonorants (§ 2.1.2). Neutral case systems[1] are rare in the Ryukyuan languages, which typically have a nominative-accusative case system. Core arguments are marked by the case marker =Ø in Hateruma (§ 4.3).

1 The language and its speakers

1.1 Geography

Hateruma island (jpn. *Hateruma-jima*, vernac. *be-sïma*), which is the southernmost in Ryukyu archipelago, has a population of about 580 and belongs to the Yaeyama islands (figure 1). It is said that 'Hateruma' means 'far coral'. Hateruma Ryukuan (*Hateruma hōgen* in Japanese) is mainly spoken by people living on the Hateruma island or in the Shiraho district of Ishigaki, where hundreds of people from Hateruma immigrated in the 18th century.[2]

1.2 Affiliation

Hateruma Ryukyuan belongs to the Yaeyama branch of Southern Ryukyuan, which also includes Yonaguni and Miyako Ryukyuan. According to Lawrence (2000), Lawrence (2008) and Pellard (2009b), both Yaeyama and Yonaguni belong to the Macro-Yaeyama sub-branch.

1.3 Sociolinguistic overview

1.3.1 The number of speakers

It is difficult to estimate the number of speakers, but my field work observation indicates that people who are over seventy years old can speak Hateruma Ryukyuan fluently. According to the 2005 census, the number of people over seventy is 190 for Hateruma and about 290 for Shiraho.

People who are around forty or sixty can understand Hateruma, but have difficulties speaking it. It seems that people under forty almost cannot understand the language and are monolingual in Standard Japanese.

1.3.2 Dialects

There are two major dialects: Hateruma and Shiraho. It seems that people in Shiraho used to visit their relatives or friends in Hateruma until some decades ago.

[1] See Comrie (1978)
[2] See Karimata (2008)

Hateruma island is divided into five areas, from West to East: Fuka, Naishi, Mae, Minami, Kita. Speakers report lexical differences between the different areas, but the different sub-dialects remain mutually intelligible. This work is based on the variety spoken on Hateruma.

1.4 Previous works

There is no reference grammar of Hateruma yet. Previous works have generally focused on individual topics in a comparative perspective with other Ryukyuan varieties, and have not given a detailed account of Hateruma Ryukyuan.

Among previous works, Shibata (1972) and Kuno (1992) focus on the phonology, while Hirayama (1988), Kajiku (1996) and Kajiku (1998) give a basic treatment of both the phonology and morphology. These previous works are criticized in detail in Aso (2009), which contains a description of the phonology and morphology of Hateruma Ryukyuan.

2 Phonology

2.1 Phoneme inventory

2.1.1 Vowels

Hateruma has the following seven vowels (table 1).

Table 1: Vowels

	Front	Central	Back
Closed	i	ï [ɨ ~ ɨ̟]	u
Closed-mid	e		o
Open(-mid)	(ɛ)	a	

Only speakers over 90 distinguish the front open-mid vowel /ɛ/ from the front close-mid vowel /e/, for which only a few minimal pairs are found.

(1) /mɛ/ [mɛː] ‘rice’
/me/ [meː] ‘front’

The central closed vowel /ï/ has two allophonic variants: the advanced front closed vowel variant [ɨ̟] appears after the voiceless bilabial plosive /p/, while the central closed vowel [ɨ] appears in all other environments.

(2) /pïsïmari/ [pˢɨ̟sɨmari] ‘noon’

I consider there to be no distinction between long and short vowels. A monosyllabic CV word is always lengthened (CV: unless followed by an affix or a

clitic. For example, the vowel of *me* [meː] 'front' (1) is short when the locative case marker is attached: *me=na* [mena] 'in front'.

However, there are some problematic cases which cannot be above, especially concerning the central open vowel /a/. Some words exhibit free variation between short and long vowels:

(3) /nari/ [naɾi] ~ [naːɾi] 'fruit'

However, some words consistently appear with a long vowel, like *pii* 'coral reef', *maagi* 'big' or *mii-cï* 'three pieces'. Further research is needed to elucidate the environments where long vowels appear, and the relation with accent patterns.

2.1.2 Consonants and glides

Hateruma has the following sixteen consonants (table 2).

Table 2: Consonants and glides

		Bilabial	Dental	Alveolar	Velar / Glottal
Stop	voiceless	p [p ~pˢ]	t		k
	voiced	b	d		g
Fricative	voiceless	f	s [s ~ɕ]	c [ʦ~ʨ]	h [h ~ç]
	voiced			z [z~ʑ~ʣ~ʤ]	
Nasal		m	n [n~ŋ ~ɴ~m]		
Flap				r [ɾ ~r]	
Approximant		w			j

Main allophonic realizations include the following:

- [pˢ] appears only before the central closed vowel /ï/ (2);
- Palatal or palato-alveolar allophones appear before the front closed vowel /i/;
- /n/ is usually a dental nasal [n] but is realized as [ɴ] in final position, [ŋ] before velars (/k, g/) and as [m] before bilabials.
- /r/ is sometimes trilled when the preceding vowel is devoiced: /garasï/ [gʰḁrasɨ] ~ [gʰḁɾasɨ].

One of the striking features of Hateruma is the strong aspiration of the word-initial consonants /p, t, d, k, g, f, s/. All voiceless obstruents except /c/ and /h/ can devoice a following vowel when they are aspirated; in addition, this devoicing can also spread to a subsequent sonorant.[3]

[3]There is only one example of aspirated /n/: /nn.cï/ [n̥ʰntsɨ] 'six pieces'.

(4) /saki/ [sʰa̰ki] ‘alcohol’
/turi/ [tʰu̥ɾ̥i] ‘bird’

Other Yaeyama Ryukyuan dialects are reported to have a similar aspiration process, like Kohama, Taketomi, Iriomote or Ishigaki, but it is the strongest in Hateruma according to Uemura (1992).

2.2 Syllable structure and phonotactics

2.2.1 The syllable structure of the root word

The syllable in Hateruma contains an obligatory nucleus (N), which can be filled by vowels or /n/ (6a), as well as optional onset (O), glide (G), and coda (C) slots. The approximants /w, j/ can fill the G slot, and the onset and coda positions can be occupied by other consonants. The longest monosyllabic root word is /ssjan/ ‘wore’ (OOGNC). A sequence of different consonants cannot occur as an onset, while geminates can fill the O slot.

(5) ((O)O)(G)N(N)(C)

A root word consists of sequences of syllable of the type described above. There are however some restrictions: /r/ cannot appear word-initially, double onsets (OO) are restricted to /ss, mm/ (6b).

(6) a. /n.ta/ [nta] ‘dirt’
b. /mman/ [mːaɴ] ‘horse’

2.2.2 Mora

The mora is a useful unit for the description of pitch patterns (see §2.3), and it must be recognized as a meaningful unit besides the syllable. A geminate onset, a nucleus and a coda each carry one mora, as μ shows below.

(7) ((O) O) (G) N (N) (C)
μ μ μ μ

Monosyllabic CV words are automatically lengthened when they constitute a phonological word on their own, but not when they are followed by a clitic, as mentioned in §2.1.1. This can be interpreted as the result of a minimal size constraint on phonological words: a phonological word must be at least two-mora long.

2.3 Prosody

There are two distinctive pitch patterns, but only two minimal pairs are found.

(8) /pa.na/ HH ‘flower’ vs. /pa.na/ HL ‘nose’
/ma.ju/ HL ‘cat’ vs. /ma.ju/ LH ‘eye-brow’

I analyze that there are *number of mora* $+2$ pitch patterns for nominals (table 3).[4] Underlyingly monomoraic words surface as two-mora long as the result of a minimal size constraint on phonological words, see §2.2.2.

Table 3: Pitch patterns

Pattern	1μ	2μ	3μ
Level	HH	HH	HHH
Falling	HL	HL	HHL
			HLL
Rising	LH	LH	LLH
Concave		FH	HLH

There are many two or three morae words in Hateruma. Further work is needed in determining accent patterns of words containing four or more morae.

3 Descriptive preliminaries

3.1 Basic clause structure and phrase structure

3.1.1 Basic clause structure

A clause in Hateruma can be of the following two types: (a) containing a predicate, or (b) consisting of an interjection only. A clause of type (a) can contain:

i. Predicate

   a) Verbal predicate

   b) Nominal predicate

ii. Arguments

iii. Adjuncts

[4] F means falling from high to low within a mora.

3.1.2 Nominal phrase

A nominal phrase (NP) can be an argument of a predicate or the head of a nominal predicate. The NP in Hateruma has a '(Modifier +) head noun' structure. The head noun can be modified by an NP with a genitive case marker, an adnominal (clause).

(9) [*du=nu* <*bjooki*>]$_{NP}$
REFL=GEN sickness
'My own sickness'[5] (modified by NP with genitive case marker =*nu*)

3.1.3 Predicate phrase

3.1.3.1 Verbal predicate

A verbal predicate consists of a verbal phrase (VP), and I consider the two to be equivalent. A verbal phrase has the structure 'verb (+auxiliary verb)'.

(10) *isa-sïma=ci* [*ng-u-Ø-n*]$_{VP}$
Ishigaki-island=ALL go-NPRF-NPST-RLS
'(I) will go to Ishigaki island.'

(11) *sigami=Ø* [*hak-i* *bir-ja-Ø=roo*]$_{VP}$
letter=CORE write-MED PROG-PRF-NPST=DSC
'(I) am writing a letter.' (with auxiliary verb)

3.1.3.2 Nominal predicate

A nominal predicate minimally consists of an NP and has a structure 'NP (+copula verb)'. The copula verb inflects for tense, aspect and mood, as other verbs in Hateruma, but it does not occur in simple non-past tense.

(12) *ba=Ø* [*sinsin*]
1sg=CORE teacher
'I am a teacher.'

In cases other than 'simple non-past', a copula verb is required.

(13) *ba=Ø* [*sinsin ja-ta-n*]
1sg=CORE teacher COP-PAST-RLS
'I was a teacher.'

(14) *ba=Ø* [*sinsin ar-an-u-Ø*]
1sg=CORE teacher COP-NEG-NPRF-NPST
'I am not a teacher.'

[5]Angle brackets <…> indicate a loan word from Standard Japanese.

3.2 Word, clitic and affix

3.2.1 Word

A word is a free form and has the structure 'stem(-affix)'. One stem consists of one or more roots.

3.2.2 Affix vs clitic

Both an affix and a clitic are bound forms, but they differ on several points from each other. The main difference between them are that (a) an affix is morphologically attached to a bound stem, while (b) a clitic is syntactically attached to a phrase (Bickel and Nichols 2007). In general they have different distributions: an affix is located inside a word ([Stem-affix]$_{\text{Word}}$), whereas a clitic appears outside a phrase ([Phrase]=clitic). For example, both *katafuk-* and *bir-* are bound stems in (15), and become words through the addition of suffixes: *katafuk-i* and *bir-ja-ta*. On the other hand, the clitic *=roo* is attached to a VP.

(15) [*katafuk-i bir-ja-ta*]$_{VP}$*=roo*
lie-MED PROG-PRF-PAST=DSC
'(I) was lying (in the room).'

3.3 Word classes

Hateruma Ryukyuan distinguishes between six word classes: nominals, verbs, adnominals, interjections and adverbs. The criteria defining the different classes are as follows:

(A) It can be the head of an NP (see §3.1.2);

(B) It inflects;

(C) It can fill in NP modifier slot directly, i.e., without a genitive clitic *=nu*;

(D) It can form a clause by itself.

3.3.1 Nominals

A nominal is a word which can head an NP, which can serve as an argument or a nominal predicate. There are three subclasses of nominals: nouns, pronouns and numerals (§4.2.1).

Table 4: Word classes

	NP	Infl	Modif	Clause
Nominals	+	-	-	-
Verbs	-	+	-	-
Adnominals	-	-	+	-
Interjections	-	-	-	+
Adverbs	-	-	-	-

3.3.2 Verbs

A verb is a word that can inflect for tense, aspect and mood, and that can be the head of a verbal predicate. Inflection is marked on verbs by suffixes (§5).

3.3.3 Adnominals

An adnominal is a word that can directly fill the modifier slot of an NP. There are few adnominals, and the most common are *unu* 'this' and *kunu* 'that'. The word *maagi* is uncommon since it behaves both like an adnominal and like nominal. I treat it as an exceptional nominal in the present analysis.

(16) i. [*maagi pïtu*]$_{NP}$
big person
'A great person (lit. big person)' (adnominal-like)

ii. [*unu pïtu*]$_{NP}$ = *Ø* *maagi*
this person = CORE big
'This person is big.' (nominal-like)

3.3.4 Interjections

An interjection is a word that can form a clause by itself, like *oo* 'yes', *ai* 'no', *aga* 'oh', *sje* 'hey', etc.

3.3.5 Adverbs

An adverb is a word for which none of the above criteria applies and that serves as an adjunct to a verbal predicate. Adverbs include words like *unsïku* 'very', *goobi* 'much', *jaccin* 'surely', *kissa* 'already', *izanda* 'steadily'.

(17) *bebi* = *ndu* *h-o-Ø*
little = FOC eat-NPRF-NPST
'(I) eat a little.'

4 Nominals and nominal phrases

4.1 Modifier

The modifier slot of an NP can be filled by another NP bearing a genitive case marker or by an adnominal (clause).

4.1.1 Modifier filled by NP

The genitive case marker *=nu* is attached to an NP when it fills the modifier slot of another NP.

(18) [[NP] = GEN Head]$_{NP}$

(19) [[*aboa*]$_{NP}$ = *nu munu*]$_{NP}$
mother = GEN thing
'Mother's thing'

The noun *aboa* 'mother' in (19) is a modifier and *munu* 'thing' is a head of the NP.

4.1.2 Modifier filled by adnominal (clause)

Contrary to NPs, adnominals and adnominal clauses can fill a modifier slot of an NP directly.

(20) [[adnominal (clause)] Head]$_{NP}$

(21) [[*kunu*] *ki*]$_{NP}$
this tree
'This tree' (adnominal)

(22) [[*ba* = *Ø* = *ndu* *sikur-ja-ru*] *munu*]$_{NP}$
1SG = CORE = FOC make-PRF-NPST thing
'The meal I cooked. (lit. the thing which I made.)' (adnominal clause)

In (22), *ba* = *Ø* = *ndu sikur-ja-ru* '(which) I made' is an adnominal clause, see also §10.4.2.

4.2 Head

4.2.1 Subclasses of nominals

Nominals can be classified into nouns, pronouns and numerals. Nouns include common nouns, proper nouns and temporal nouns (e.g., *mana* 'now', *acca* 'tomorrow'). Pronouns can further divided into five lower classes: personal, demonstrative, locative, interrogative, and manner (table 5). Both demonstrative and locative pronouns depend on the distance from the speakers.

Numerals always appear with classifier suffixes. There are at least 27 different classifier suffixes according to Ōno (1990). When speakers count from one to ten, the following cardinal numbers are used: *pïtu-cï* 'one', *futa-cï* 'two', *mii-cï* 'three', *juu-cï* 'four', *issï* 'five', *nn-cï* 'six', *nana-cï* 'seven', *jaa-cï* 'eight', *hakona-cï* 'nine', *tu* 'ten'. Numerals and time nouns behave like adverbs and can be used without a case marker clitic, as in (T.4).

Table 5: Pronouns

		singular	plural
Personal	first person	*ba, banu*	*ba-ima, be(-ma)*
	second person	*da*	*da-ima*
	third person	*usita*	*usita-nda*
	reflexive	*ha*	
Demonstrative	proximal	*kuri*	
	distal	*uri*	
Locative	proximal	*mo*	
	mesial	*na*	
	distal	*ha*	
Interrogative	what	*nu*	
	where	*za*	
	when	*icï*	
	why ~ how	*ne*	
	who	*ta*	
Manner	this way	*e*	
	that way	*ke*	

4.2.2 Derivational morphology of nominals

There are two classes of derivational suffixes that attach to nominals: (a) the diminutive suffix *-(n)tama* and (b) the plural suffixes *-nda*, *-nzi* or *-(i)ma*. These suffixes attach to a stem which is already a free form, i.e., a word. According to the definition of clitics given in section § 3.2.2, these suffixes look like clitics. However, since a clitic attaches to a phrase, 'clitics can exhibit a low degree of selection with respect to their hosts, while affixes exhibit a high degree of selection with respect to their stems' (Zwicky and Pullum 1983). From this point of view, these are classified as suffixes as they can only attach to a noun.

The diminutive suffix *-(n)tama* is attached to a noun refering to an infant, human or animal.

(23) *bidumu-ntama, otta-ntama, mman-tama*
man-DIM frog-DIM horse-DIM
'A boy, a tadpole, a foal'

The plural suffixes *-nda*, *-nzi* or *-(i)ma* are less frequent than the diminutive and can only be used with nouns refering to humans.

(24) *pïtu-nda, pa-ima, utama-nzi*
person-PL grandmother-PL child-PL
'people, grandmothers, children'

4.3 Case

Case in Hateruma is indicated by case marker clitics following an NP. There are eleven case markers: core, genitive, dative, allative, locative, instrumental, comitative, comparative, ablative and terminative (table 6).

A core case marker =Ø is attached to core arguments: the only argument of an intransitive clause (S), the most agent-like argument of a transitive clause (A), the most patient-like argument of a transitive clause (P), and the extended core argument (E).[6] Hateruma has thus a neutral case system in the sense of Comrie (1978).

(25) *pïtu=Ø budur-ja-ta-n*
person=CORE dance-PRF-PAST-RLS
'People danced.' (S)

(26) *aboa=Ø ija=Ø mir-i bir-ja-ta-n*
mother=CORE father=CORE look-MED PROG-PRF-PAST-RLS
'(My) mother was looking at (my) father.'(A/P)

The grammatical relations of the core arguments *aboa* and *ija* in (26) are identified by constituent order, cf. (27) which has the opposite meaning.

(27) *ija=Ø aboa=Ø mir-i bir-ja-ta-n*
father=CORE mother=CORE look-MED PROG-PRF-PAST-RLS
'(My) father was looking at (my) mother.'

Further research is needed about the possibility of omission or fusion of =Ø and other clitics.

[6]The extended core argument is an argument required by a verb like *nar-* 'become', see Shimoji (2008a).

Table 6: Case clitics

	clitics	Functions
Core	=*Ø*	S/A/P/E
Genitive	=*nu*	possessor, existent, S/A in subordinate clause
Dative1	=*mu*	beneficiary
Dative2	=*ga*, =*naga*	beneficiary, destination, causative agent, (E)
Allative	=*ci*	destination
Locative	=*na*, =*nagi*	location, partition, time
Instrumental	=*si*	instrument, material, time
Comitative	=*tu*	companion
Comparative	=*juri*	standard of comparison
Ablative	=*gara*	a point of depature, passive agent, standard of comparison
Terminative	=*bagi*	a point of arrival

5 Verb morphology

5.1 The structure of the verb word

5.1.1 Stem

Hateruma has the following basic verbal structure.

(28) [[Root (-verbalizer) (-deriv. suffix) (-stem extender)]$_{\text{stem}}$ -infl. suffix]$_{\text{word}}$

There are five verbal stem classes. The different verb classes are distinguished by the form certain suffixes take when they attach to a stem. There are four suffixes that define the different verb classes: (a) negative, which belongs to derivational suffixes, aspectual (b-1) perfect and (b-2) non-perfect, and (c) stem extender (SE)[7] (table 7 and table 8).

Property concept stems,[8] which express an attribution of people, objects or human feelings, combine with a verbalizer (§7.2) to form verbal stems. These verbal stems all and only belong to class 5. Such verbal stems have been usually classified as adjectives, not verbs, in previous research. However, they inflect as ordinary verbs, and I thus classify them as a subclass of verbs.

[7]Stem extender is a suffix lexically conditioned and that carries no meaning, see Bickel and Nichols (2007).

[8]See Thompson (1988) and Shimoji (2008a)

Table 7: Verbal stem classes

		Class 1	Class 2	Class 3	Class 4	Class 5
(a) Negative		*-an*	*-an*	*-an*	*-un*	*-en*
(b) Aspect	(b-1) Perfect	*-ja*	*-ja*	*-ja*	*-a*	*-a*
	(b-2) Non-perfect	*-u*	*-u*	*-o*	*-u, -i*	—
(c) SE		*-i*	*-e*	*-e*	*-a*	*-ari*

Table 8: Examples of verbal stems

	Stems
Class 1	*hak-* 'write', *jum-* 'read', *ng-* 'go', *mu-* 'think'
Class 2	*aras-, arah-* 'wash', *utas-, utah-* 'drop', *nas-, nah-* 'bear'
Class 3	*k-* 'buy', *h-* 'eat'
Class 4	*ur-, urir-* 'go down', *m-, mir-* 'see', *ug-, ugir-* 'get up'
Class 5	*taka-ha-* 'high', *go-ha-* 'scary', *sani-sja-ha-* 'happy'

5.1.2 Inflection

An inflectional operation is done by inflectional suffixes in Hateruma. It differs from derivational suffixes or other suffixes in that they terminate a verbal stem and "are required by the syntactic environment in which a root appears" (Payne 1997).

There are two types of inflection: (a) finite and (b) non-finite. The difference between them is whether they include TAM (tense, aspect and mood) information or not. If an inflected verb includes TAM information, it is finite. Otherwise it is non-finite.

A finite verb has the following structure:

(29) [Stem -aspectual suffix -tense suffix -modal suffix]$_{word}$

Finite verbs need to be marked for at least one of these three TAM categories. For example, if the conjugational category is 'finite realis', all three inflectional suffixes are needed.

(30) *h-ja-ta-n*
eat-PRF-PAST-RLS
'(I had) eaten.'

A non-finite verb has the following structure:

(31) [Stem (-stem extender) -non-finite suffix]$_{verb}$

(32) *h-e,*
eat-MED
'(I) eat, (and…)'

5.2 Inflectional morphology

5.2.1 Finite inflection

A finite inflected verb can terminate a sentence. Finite inflectional suffixes include (a) aspectual suffixes (perfect or non-perfect), (b) tense suffixes (past or non-past), and (c) modal suffixes (realis or irrealis; imperative, intentional or prohibition).[9] A verb also can include no modal suffix, in which case I call it an *unmarked form* here, see table 9.

A realis form is marked for all TAM categories, while an unmarked form lacks mood information and an irrealis form lacks both aspectual and tense information.

Table 9: Verb inflection (finite)

Mood	Aspect	Tense	jum- 'read'
Realis	non-perfect	non-past	*jum-u-Ø-n*
		past	*jum-u-ta-n*
	perfect	non-past	*jum-ja-Ø-n*
		past	*jum-ja-ta-n*
Unmarked	non-perfect	non-past	*jum-u-Ø*
		past	*jum-u-ta*
	perfect	non-past	*jum-ja-Ø*
			jum-ja-ru
		past	*jum-ja-ta*
Imperative			*jum-i*
Intentional			*jum-a*
Prohibitive			*jum-una*

5.2.2 Non-finite inflection

A non-finite inflected verb cannot terminate a sentence. There are two kinds of non-finite inflectional suffixes: medial (sequential) and converb (simultaneous,

[9] Some prohibitive forms can be analyzed in two different ways, i.e. with a non-perfect or a non-past suffix (*jum-u-Ø-na or jum-Ø-u=na*).

resultative, conditional) suffixes (table 10). Though they don't have a clear-cut distribution, basically they are used in different clauses, i.e., a medial verb is used in medial clauses while a converb is used in adverbial subordinate clauses (§ 10).

Table 10: Verb inflection (non-finite)

	Meaning	*jum-* 'read'
Medial	medial (sequential) 1	*jum-i*
	medial (sequential) 2	*jum-i-sita*
Converb	simultaneous 1	*jum-i-ci*
	simultaneous 2	*jum-i-ncana*
	resultative	*jum-i-ki*
	conditional	*jum-i-ba*

5.2.3 Special inflection

There are some verbal stems which have a special inflection, i.e., those which do not suit the definition on stem classes (table 7). For example, *k-* 'come' is irregular since it would be classified into class 1 by criteria (b) and (c), but into class 4 by criterion (a).

Besides *k-* 'come', the existential verbs *a-* 'be (inanimate)' and *b-* 'be (animate)', the honorific verb *or-* 'come, go, be' and the copula *ja-* have special inflections.

5.3 Derivational morphology

5.3.1 Derivational affixes

There are three derivational suffixes in Hateruma: (a) causative, (b) passive, and (c) negative.

The causative suffix basically indicates someone makes (or has made) somebody do something, see also § 9.4.1.

(33) *utama=ga zi=Ø* *hak-ah-ja-Ø-n*
child=DAT letter=CORE write-CAUS-PRF-NPST-RLS
'(I) made a child write letters.'

A passive suffix has basically two uses. One is to reduce a core argument as in (34), see also § 9.4.2. The other is to express a possibility, as in (35).

(34) a. *ija=Ø=ja* *ba=Ø* *tatag-ja-ta-n*
father=CORE=TOP 1SG=CORE hit-PRF-PAST-RLS
'(My) father hit me.' (two core arguments)

b. *ba=Ø* *ija=gara* *tatag-ar-a-ta-n*
1sg=CORE father=ABL hit-PASS-PRF-PAST-RLS
'I was hit by (my) father.' (one core argument)

(35) *zi=Ø* *jum-a-i-ru-n*
letter=CORE read-PASS-NPRF-NPST-RLS
'(I) can read letters.'

A negative suffix expresses the negation of a verbal stem, see also §9.3.

(36) *jum-an-u-Ø*
read-NEG-NPRF-NPST
'(I) don't read.'

5.3.2 Compounding and serialization

Compounding and serialization are done through a non-finite medial form. There is no difference between compounding and serialization in respect of their forms. Both of them form one verbal stem from two (or more) stems. These combinations are of two kinds: (a) NP plus verb stem (compounding) or (b) verbal stem plus verbal stem (compounding or root serialization).

This is different from clause chaining (see § 10) since there is no pause between the two verbs. At the present the differences between compounding, serialization and verbal predicate constructions containing an auxiliary verb is still not clear.

(37) *sondan-s-u-Ø-n*
talk.with-do-NPRF-NPST-RLS
'(I) talk with (someone).' (compounding)

(38) *mir-i-bo-ha-Ø-n*
see-MED-want-VLZ-NPST-RLS
'(I) want to see (it).' (compounding or serialization)

6 Predicate phrase

6.1 The structure of the predicate phrase

There are two kinds of predicate phrases: verbal predicate phrase (39) and nominal predicate phrases (40).[10]

[10]See also §3.1.3.

(39) [lexical verb1 (+lexical verb2)]$_{verb}$ (+auxiliary verb)

(40) NP (+copula verb)

6.2 Lexical verbs and auxiliary verbs

If a verbal predicate includes an auxiliary verb, the main lexical verb is non-finite. On the other hand, an auxiliary verb is finite, but doesn't express the main lexical meaning of the predicate.

There are ten auxiliary verbs in Hateruma, listed in table 11.

Table 11: Auxiliary verbs

	Stem	Lexical meaning	Example
Progressive	*bir-*	'sit'	(T.18)
Perfect1	*n-en-*	'be not'	(T.24)
Perfect2	*ssir-*	(?)	(78)
Experiential	*m-, mir-*	'see'	(41)
Prospective	*sik-*	'put'	(80)
Inceptive	*k-*	'come'	(49)
Benefactive	*h-, hir-*	'give'	(T.27)
Potential	*ss-*	'know'	(42)
Honorific1	*o-, or-*	'be, come, go' (honorific)	(60)
Honorific2	*tabor-*	'give' (honorific)	(43)

(41) *mir-i* *mir-i=ba*
see-MED EXP-IMP=IMP
'Try to see.'

(42) *num-i* *ss-ja-Ø-n*
drinl-MED POT-PRF-NPST-RLS
'(I) can drink (alcohol).'

(43) *or-i* *tabor-i*
be.HON-MED HON-IMP
'Welcome here. (lit. Would you come (here)?)'

6.3 The nominal predicate

A copula *ja-* occurs when the predicate is overtly marked for inflection, i.e., past and/or negative (§ 3.1.3). A copula verb has thus the function to express TAM in a nominal predicate.

(44) *da=Ø sinsin ja-ta=naa ?*
2SG=CORE teacher COP-PAST=Q
'Were you a teacher?'

7 Class-changing derivations

7.1 Nominalization

Nominalization of a verb to an agent noun is done by the suffix *-dama*, e.g., *h-* 'eat' > *he-dama* 'good eater'. However, there are only a few examples of this formation, and more usually agents are expressed by an NP modified by an adnominal clause: *munu-ss-ja-ru pïtu* (thing-know-PRF-NPST person 'knowledgeable person').

The suffix *-i* derives agent nouns from verbs.

(45) *asi-hak-i*
sweat-scratch-NLZ
'sweater'

7.2 Verbalization

A property concept stem is always verbalized by *-ha, -sja* and inflects like other verbs.

(46) a. *taka-ha-Ø-n*
high-VLZ-NPST-RLS
'(It's) high.'

b. *mi-sja-Ø-n*
good-VLZ-NPST-RLS
'(It's) good.'

c. *h-e-bo-ha-Ø-n*
eat-MED-want-VLZ-NPST-RLS
'(I) want to eat.'

8 Clitics

8.1 Syntactic host and phonological host

The syntactic host and the phonological host of a clitic may not coincide. Syntactically, a clitic attaches to a phrase (§ 3.2.2), but phonologically it attaches to a word.

(47) [Host] = clitic

There are five subclasses of clitics:[11] (a) conjunction clitics, (b) modal clitics, (c) post-nominal modifier clitics, (d) focus/topic clitics, (e) discourse marker clitics.

8.2 Conjunction clitics

A conjunction clitic can follow either a verbal or a nominal predicate phrase (table 12). A verb in a predicate phrase appears in the unmarked form (§5.2.1) when a conjunction clitic follows. Basically, a copula verb will occur when a conjunction clitic is attached to a nominal predicate, though there are a few exceptions.

Table 12: Conjunction clitics

	Form
Conditional	=*cja(ra)*
Resultative1	=*(ga)ra*
Resultative2	=*ki*
Adversative	=*sika*
Sequential	=*te*
Quotative	=*ta*
Soliloquy	=*du*

Table 13: Modal clitics

	Form
Inferential1	=*kaja*
Inferential2	=*sa*
Inferential3	=*dore*
Inferential4	=*paci*
Hearsay1	=*cju*
Hearsay2	=*noa*
Question	=*naa*

8.3 Modal clitics

Modal clitics also basically attach to both verbal and nominal predicate phrases. They express inference, hearsay and interrogation (table 13).

(48) *ha=ja, ma, kir-ar-un-u-ta=cju*
REFL=TOP INTJ come-PASS-NEG-NPRF-PAST=HS
'(I) hear that he couldn't come.'

8.4 Post-nominal modifier clitics

A post-nominal modifier clitic attaches to an NP. These include two limitative clitics: =*n* and =*cja*.

(49) *suucu=Ø=n zjunbi-s-i k-ja-Ø-n=sika,*
suit=CORE=LIM prepare-MED come-PRF-NPST-RLS=but
'(I) prepared my suit and came but…'

[11] See Aso (2009) for their different meanings and uses.

(50) *ne=nu* *fuciri=ta* *muc-i* *k-i-ba=ru*
how=GEN medicine=QT bring-MED come-SE-CND=FOC
sinsin=Ø=cja *fuciri=Ø* *nd-as-u-Ø=do*
doctor=CORE=LIM medicine=CORE come.out-CAUS-NPRF-NPST=DSC
'If (he) brings the medicine and comes (here), then the doctor gives him the medicine.'

8.5 Focus/topic clitics

Focus clitics are *=(n)du* and *=ru*, and topic clitics are *=ja* and *=ba*. Focus clitics attach to any phrase, but topic clitics attach to NPs only.

The differences between *=(n)du* and *=ru* are still unclear. See § 9.6 for details about the functions of focus/topic clitics.

8.6 Discourse marker clitics

A discourse marker clitic follows any kind of phrase or word. There are nine discourse markers:

- *=u* and *=ba*, which express emphasis;
- *=(r)oo*, *=jo* and *=juu*, which express politeness;
- *=(du)ra* and *=do*, which express certainty;
- *=sita* and *=(w)a*, which express surprise.

9 Simple sentence

9.1 Speech acts

9.1.1 Declarative clause

Declarative clauses differ from interrogative clauses in that they do not attach the modal clitic *=naa* nor include interrogative pronouns.

Generally, the verbal predicate of a declarative clause is inflected for realis or irrealis (51). Even when the verb is an unmarked form, it frequently attaches a discourse marker clitic or a modal clitic, except *=naa*, as in (52). This is also the case with the copula verb, see also (13) and (14).

(51) *ba=Ø* *sunu=Ø* *aras-u-Ø-n*
1SG=CORE clothes=CORE wash-NPRF-NPST-RLS
'I wash clothes.'

(52) *suno=ru* *k-ja-Ø=roo*
yesterday=FOC come-PRF-NPST=DSC
'(I) have come yesterday.'

9.1.2 Interrogative clause

Interrogative clauses fall into two types: Yes-No and Wh. Yes-No interrogative clauses include the modal clitic *=naa*.

(53) *acca-ha-Ø=naa ?*
hot-VLZ-NPST=Q
'(Are you) hot?' (verbal predicate phrase)

(54) *da=Ø* *sinsin=naa ?*
2SG=CORE teacher=Q
'Are you a teacher?' (nominal predicate phrase)

On the other hand, Wh interrogative clauses contain interrogative pronouns (see table 5, §4.2.1). The verb is most often in the unmarked form and followed by the discourse marker clitics *=ba* or *=ra*.

(55) *za=ga=ru* *or-ja-Ø=ba* *?*
where=DAT=FOC go.HON-PRF-NPST=EMP
'Where have you been?'

A copula verb occurs in interrogative clauses with a nominal predicate.

(56) *kuri=Ø=ja* *nu* *ja-Ø* *?*
this=CORE=TOP what COP-NPST
'What is this?'

9.1.3 Imperative clause

Imperative clauses usually consist of a verbal predicate phrase with a verb inflected for the imperative mood. The discourse marker clitic *=ba* is often attached to imperative clauses to soften the meaning.

(57) *ha=ga* *ng-i*
over.there=DAT go-IMP
'Get out of here. (lit. Go over there.)'

(58) *mo=ga* *k-u=ba*
here=DAT come-IMP=EMP
'Come here.'

In addition, the discourse marker *=jo* and the honorific auxiliary verbs (*o-, or-* or *tabor-*) are also often used to soften the meaning of imperative clauses.

(59) *ha=ga* *ng-i=jo*
over.there=DAT go-IMP=DSC
'Please go over there.'

(60) *ha=ga* *ng-i* *or-i*
over.there=DAT go-MED HON-IMP
'Would you please go over there?'

9.2 Equation, proper inclusion, location and possession

9.2.1 Equation and proper inclusion

Equation and proper inclusion are both expressed by nominal predicate phrases. The copula verb occurs according to the rule stated in §3.1.3.2.

(61) *kuri=Ø=ja* *boma*
this=CORE=TOP oldest.daughter
'This (girl) is the oldest daughter.' (equation)

(62) *ba-hi=nu* *sakosï=Ø=ja* *isjan* *ja-ta-n*
1SG-house=GEN oldest.son=CORE=TOP doctor COP-PAST-RLS
'My house's oldest son was a doctor.' (proper inclusion)

9.2.2 Location

Location is expressed by the locative case markers *=na, =nagi* attached to a locational NP. The locative case marker *=na* is used with existential verbs, while *=nagi* is used with other verbs.

(63) *da=Ø* *acca* *hi=na* *b-u-Ø=naa* *?*
2SG=CORE tomorrow house=LOC be-NPRF-NPST=Q
'Will you in the house tomorrow?' (existential verb)

(64) *utama=ga fuka=nagi* *kucu=Ø* *aras-imir-u-Ø-n*
child=DAT outside=LOC shoes=CORE wash-CAUS-NPRF-NPST-RLS
'(I) make my child wash his shoes outside.' (non-existential verb)

9.2.3 Possession

Possession is usually expressed by the genitive case marker, as in (9) and (19). However, when a possessor is a first or second person, possession is expressed by juxtaposition.

(65) *ba-aboa,* *da-gakku*
1SG-mother 2SG-school
'My mother, your school'

A phrase combining a locative case marker with an existential verb or *mucjag-* 'have' can also express possession.

(66) *ba-hi=na* *mina=Ø* *a-Ø-n*
1SG-house=LOC garden=CORE be-NPST-RLS
'There is a garden in my house.'

(67) *ba=Ø* *mari=Ø* *goobi mucjag-u-ta-n*
1SG=CORE bowl=CORE many have-NPRF-PAST-RLS
'I had many bowls.'

9.3 Negation

Negation is expressed by derivational operation, attaching negative suffixes to verb stems.[12] See also (36).

(68) *go-h-en-u-Ø*
scary-VLZ-NEG-NPRF-NPST
'(I am) not scared.'

The two existential verbs *a-, b-* and the copula *ja-* have special negative forms *n-, m-, ar-* respectively.

(69) *n-en-u-Ø=ra*
be-NEG-NPRF-NPST=DSC
'Nothing.'

9.4 Valency-changing operations

9.4.1 Causative

Causative increases a verb's valency by adding a core argument, marked by *=Ø*. The original subject core argument is demoted to an oblique argument marked with dative *=ga*.

(70) a. *utama=Ø* *maagi kui=si* *sumucï=Ø* *jum-ja-ta-n*
child=CORE big voice=INS book=CORE read-PRF-PAST-RLS
'(My) child read a book aloud.'

b. *ba=Ø* *utama=ga maagi kui=si* *sumucï=Ø*
1SG=CORE child=DAT big voice=INS book=CORE
jum-as-u-ta-n
read-CAUS-NPRF-PAST-RLS
'I made (my) child read a book aloud.'

[12]The negative suffix will be *-an, -en, -un* depending to the class of verbal stem.

(71) a. *utama=Ø par-ja-Ø-n*
child=CORE run-PRF-NPST-RLS
'(My) child run.'
b. *ba=Ø utama=ga par-ah-ja-Ø-n*
1SG=CORE child=DAT run-CAUS-PRF-NPST-RLS
'I made (my) child run.'

9.4.2 Passive

Passive suppresses one core argument and demotes the original agent to the role of oblique argument (marked with ablative *=gara*), see (34).

9.5 Tense, aspect and mood

9.5.1 Tense

Hateruma has a past/non-past tense system. Past is expressed by the tense suffix *-ta* and non-past by *-Ø* or *-ru*.[13]

(72) *e ja=ta m-u-ta-n*
so COP=QT think-NPRF-PAST-RLS
'(I) thought so.'

(73) *e ja=ta m-u-Ø-n*
so COP=QT think-NPRF-NPST-RLS
'(I) think so.'

Perfect aspect (§ 9.5.2.1) also expresses past as the meaning of completion of the action.

9.5.2 Aspect

9.5.2.1 Perfect

Perfect aspect expresses that some event has (or had) occured. Perfect is expressed by the suffix *-(j)a*. When the perfect suffix *-(j)a* does not appear on a verb, the suffixes *-u, -i, -o* attach, depending on the class of the verb. These suffixes are labeled *non-perfect*, but this does not mean they have a special imperfect value. They simply encode the absence of a perfect aspect and are thus unmarked. See also (T.14), (T.15) and (T.16).

(74) *ha-amasikuru=Ø noor-ja-Ø-n*
REF-head=CORE cure-PRF-NPST-RLS
'My head (headache) is cured.'

[13] *-ru* is not the regular suffix for non-past. It is found only in some examples with class 4 verbal stems, after the passive suffix as in (35), and in adnominal clauses as in (22).

(75) *asi=Ø=ndu goobi nd-a-ta-n*
sweat=CORE=FOC many come.out-PRF-PAST-RLS
'(I) had sweat a lot.'

One example of the differences between *perfect non-past* and *perfect past* is whether the action is lasting or not, as in (75) and (76).

(76) *asi=Ø=ndu goobi nd-a-Ø-n*
sweat=CORE=FOC many come.out-PRF-NPST-RLS
'(I) have sweat a lot (and am still sweating).'

Auxiliaries *n-en-* and *ssir-* also express perfect aspect. They also sometimes convey the meaning that the event has (or had) happened against the speaker's wish.

(77) *ng-i n-en-u-Ø*
go-MED PRF-NEG-NPRF-NPST
'(He) has gone (though I didn't want him to).'

(78) *h-e ssir-o-Ø, ma*
eat-MED PRF-NPRF-NPST INTJ
'Oh, (he) has eaten (though I didn't want him to).'

9.5.2.2 Progressive

Progressive aspect express a continuance of an event and is expressed by the auxiliary *bir-*, see also § 6.2. The auxiliary *bir-* is often accompanied by the perfect suffix *-ja*.

(79) *aboa=Ø ija=Ø mir-i bir-ja-ta-n*
mother=CORE father=CORE look-MED PROG-PRF-PAST-RLS
'(My) mother was looking (my) father.'

9.5.2.3 Prospective

Prospective aspect expresses a preparation for a future event. Progressive aspect is marked by the auxiliary *sik-*.

(80) *benkjoo-s-i sik-i=ba*
study-do-MED PROS-IMP=EMP
'Put yourself in condition for study (for the future).'

9.5.2.4 Inceptive

Inceptive aspect is expressed by auxiliary *k-* and expresses the starting point of an action.

(81) *ee, mund-a k-ja-Ø-n*
INTJ remember-MED INC-PRF-NPST-RLS
'Oh, (I) began remembering.'

9.5.3 Mood

9.5.3.1 Realis

Realis mood expresses the speaker's assurance that something is true or certain. The inflectional mood suffix *-n* and the discourse marker *=(r)oo* mark realis mood.

(82) *f-u-Ø-n=dore*
rain-NPRF-NPST-RLS=INFER
'It must be rain.'

(83) *agan=Ø gaasi h-o-ta=roo*
potato=CORE only eat-NPRF-PAST=DSC
'(We) ate only potatoes (in the old days).'

9.5.3.2 Irrealis

On the other hand, irrealis expresses the speaker's uncertainty. Irrealis mood is expressed by the unmarked form of the verb.

(84) *otta=Ø za=ga=ru per-ja-Ø=kaja ?*
frog=CORE where=DAT=FOC jump-PRF-NPST=INFER
'Where has the frog jumped out?'

9.5.3.3 Imperative

Imperative mood expresses a command given to the hearer. It is marked by the mood suffix *-i* or *-e*, see more examples in §9.1.3.

(85) *gangan h-e=ba*
quickly eat-IMP=EMP
'Eat quickly.'

9.5.3.4 Intentional

Intentional mood expresses an invitation to the hearer or the intention of the speaker. It is expressed by intentional form suffixed by *-a*. It is often followed by the discourse marker clitic *=ra*.

(86) *sino=mu h-a=ra*
Shino=DAT give-INT=DSC

‘Let’s give (it) to Shino.’

(87) *sje, ma, ja=ci ng-a, sje*
INTJ INTJ house=ALL go-INT INTJ
‘Hey, let’s go home.’

9.5.3.5 Prohibitive

Prohibitive mood expresses prohibition for the hearer to do something. It is marked by the suffix *-una*, but in some (rare) cases it can be expressed by the negative suffix followed by the emphatic clitic *=ba*.

(88) *mir-una*
look-PROH
‘Don’t look.’

(89) *mir-an-u-Ø=ba*
look-NEG-NPRF-NPST=EMP
‘(You absolutely) don’t look.’

9.6 Information structure

9.6.1 Topicalization

Topicalization in Hateruma is done by attaching a topic marker clitic, *=ja* or *=ba*, to an argument. The marker *=ja* attaches to any argument, i.e., core and oblique arguments, see brackets 1 on line one in (90). There are a few examples that *=ba* attaches to object arguments, see brackets 2 on line two to three in (90).

(90) *[munu=Ø sis-ja-ru pïtu]$_1$=Ø=ja, kjuureki=<no>*
thing=CORE know-PRF-NPST person=CORE=TOP lunar.calendar=GEN
<san-gacu-san-nici>=na [ma-sa-munu]$_2$=Ø=ba sïkor-i,
three-month-three-day=LOC delicious-?-thing=CORE=TOP make-MED
zu-bagu=naga ir-a, ina=ci muc-i ng-i h-e-sita,
big-box=DAT put-MED sea=ALL have-MED go-MED eat-SE-MED
midumu=<o> pii=gara bunc-ah-e=ba=ta
woman=ACC coral.reef=ABL jump-CAUS-IMP=EMP=QT
en-u-ta=cju
say-NPRF-PAST=HS
‘It is said that a knowledgeable person said “Cook delicious food, put it in a big lunch box, bring it to the sea and eat it, then make your daughter jump over the coral reefs on March 3rd”.’

9.6.2 Focus construction

There are two focus marker clitics: *=(n)du*[14] and *=ru*. The difference between the two is still unclear, but *=(n)du* is more common and tends to mark subject arguments more frequently than *=ru*.

(91) *uwa=Ø=ndu me=Ø h-e bir-ja-Ø=roo*
pig=CORE=FOC rice=CORE eat-MED PROG-PRF-NPST=DSC
'Pigs are eating rice.'

(92) *uwa=Ø=ja agan=Ø=du h-o-Ø*
pig=CORE=TOP potato=CORE=FOC eat-NPRF-NPST
'(Usually) pigs eat potatoes.'

(93) *na=ru be-hi=nu pite=do*
here=FOC 1PL-house=GEN field=DSC
'Here is our field.'

The marker *=ru* can attach not only to arguments but also to adverbial subordinate clauses.

(94) *sooiu sizen=<no> munu=Ø sikec-i=ru h-e*
like.that nature=GEN thing=CORE make-MED=FOC eat-MED
bir-ja-Ø=gara
PROG-PRF-NPST=RES
'(Because we) plant natural (vegetables) like that and eat…'

10 The complex sentence

10.1 Overview of complex clause structures

Complex clause structures are classified into three types: (a) coordination, (b) clause-chaining and (c) subordination. These are marked respectively by independent clauses, medial clauses and dependent clauses. Subordination falls in turn into three subtypes: (c-1) adverbial, (c-2) adnominal, and (c-3) complementation.

An independent clause contains a fully inflected verb, i.e., a finite verb, while a medial clause contains a non-finite medial verb and a subordinate (or dependent) clause can contain both a finite or a non-finite verb depending on its subtypes.

[14] *=du* follows an NP ending with a consonant *n*, otherwise *=ndu* follows.

Table 14: Complex clause structures

Linkage type	Clause type
(a) Coordination	independent
(b) Clause chaining	medial
(c) Subordination	subordinate

10.2 Coordination

Coordinated clauses have an equal grammatical status, and both are independent clauses. The conjunction clitics *=sïka* 'but' or *=te* 'and' attach to the head of a preceding clause.

(95) [*ba=Ø ng-u-Ø*] *=sïka* [*da=Ø ng-u-Ø=naa*] *?*
1SG=CORE go-NPRF-NPST=but 2SG=CORE go-NPRF-NPST=Q
'I will go but will you go?'

(96) [*kacce=nu naka-sja=Ø=ndu kju*
Katsuren=GEN second-brother=CORE=FOC today
or-ja-ta] *=te=jo=ra,* [*ha=Ø=ja=jo, kju*
come.HON-PRF-PAST=and=DSC=DSC 1SG.REFL=CORE=TOP=DSC today
kunu fuciri=Ø num-an-u-Ø=cja, ha=<o>
this medicine=CORE drink-NEG-NPRF-NPST=CND 1SG.REFL=ACC
sïn-as-u-Ø-n] *=ta*
die-CAUS-NPRF-NPST-RLS=QT
'Katsuren's second son came here today, and he said "I will make myself die unless I take this medicine."'

10.3 Clause-chaining

Clause-chaining usually directly expresses temporal relations such as 'overlap' and 'succession' (Payne 1997). A clause chain consists of minimally a medial clause and an independent final clause in Hateruma. There are many cases where a clause chain has two or more medial clauses.

(97) [*sunu=Ø arah-e*], [*sïmucï=Ø jum-i*], *[nuf-ja-ta-n*]
clothes=CORE wash-MED book=CORE read-MED sleep-PRF-PAST-RLS
'(I) washed clothes, read a book and slept.'

10.4 Subordination

10.4.1 Adverbial subordination

In adverbial subordination, a dependent clause fills the role of adjunct of a predicate in an independent clause. The verb of a dependent clause is a non-

finite converb (simultaneous, resultative, conditional) or a finite verb followed by a conjunction clitic *=(ga)ra* 'because' or *=cja(ra)* 'if'.

(98) [*jum-i-ci*] [*arug-i* *bir-ja-Ø-n*]
read-SE-SIM walk-MED PROG-PRF-NPST-RLS
'Reading a book, (she) is walking.'

(99) [*jam-i-ba*] *=ru* [*gokka=nu ke=Ø* *h-a-i-ta*] *=roo*
be.sick-SE-CND=FOC hen=GEN egg=CORE eat-PASS-NPRF-PAST=DSC
'If (we) were sick, (we) could eat eggs.'

(100) [*ba=Ø* *ng-u-Ø*] *=gara* [*da=Ø* *ng-una*]
1SG=CORE go-NPRF-NPST=RES 2SG=CORE go-PROH
'Don't go because I go.'

10.4.2 Adnominal subordination

In adnominal subordination, an adnominal dependent clause fills the role of an NP modifier, like the adnominals (§3.3.3 and §4.1.2). A verbal predicate in an adnominal clause is always finite.

(101) [[*en-ja-Ø*] *pïtu*]$_{NP}$ *=Ø=ja* *mo=ga* *k-u*
say-PRF-NPST person=CORE=TOP here=DAT come-IMP
'People who spoke, come here.'

There are a few examples where a special non-past suffix appears (see also §9.5.1).

(102) [[[*munu=Ø ss-ja-ru*] *pïtu*]$_{NP}$ *=nu* *ta*]$_{NP}$ *=ga* *ng-i,*
thing=CORE know-PRF-NPST person=GEN place=DAT go-MED
'(I) will go to where a knowledgeable person lives…'

10.4.3 Complementation

Complementation is the "syntactic situation that arises when a notional sentence or predicate is an argument of a predicate" (Noonan 2007). Predicates including *en-* 'say', *mu-* 'think', *eg-* 'do' take a complement clause as an argument. The conjunction clitic *=ta* (quotative) attaches to a complement clause.

(103) *da=Ø=ndu* [*b-u-Ø-n=ta*] *mu-Ø=cja*
2SG=CORE=FOC be-NPRF-NPST-RLS=QT think.NPRF-NPST=CND
mi-sja-Ø-n
good-VLZ-NPST-RLS
'If you think you can be (here), it is good.'

(104) *sitomuci=jo* [*sinrjoosjo=ga ng-u-Ø-n=ta*] *eg-i-ba, unsïku*
morning=DSC hospital=DAT go-NPRF-NPST-RLS=QT do-SE-CND very
kotekitai=Ø=ndu nar-u-Ø=te=jo=ra
band=CORE=FOC sound-NPRF-NPST=and=DSC=DSC
'When I was going to go to the hospital in the morning, a drum and fife band was playing the music, and'

There are some examples where the conjunction clitic *=du* attaches to a complement clause, meaning 'whether or not'.

(105) [*be-sïma=nu funi=Ø=ja mi-sja-Ø-n=du*]
1PL-island=GEN boad=CORE=TOP be.good-VLZ-NPST-RLS=or
[*mi-sjah-en-u-Ø=du*] *bagar-an-u-Ø*
good-VLZ-NEG-NPRF-NPST=or know-NEG-NPRF-NPST
'(I) don't know whether our boat is safe or not.' (Shibata 1972)

Sample text: the Pear story

(T.1) *jama=na maagi ki=nu a-ta=roo*
forest=LOC big tree=GEN be-PAST=DSC
'There is a tree in a forest.'

(T.2) *kunu ki=Ø=ja goobi nar-i bir-ja-ta=roo*
this tree=CORE=TOP many fruit-MED PROG-PRF-PAST=DSC
'This tree fruited a lot.'

(T.3) *za=nu ija=du bagar-an-u-Ø=sïka,*
where=GEN father=or know-NEG-NPRF-NPST=but
'One father, I don't know where he is from but,'

(T.4) *kagu=<o> mii-cï muc-i k-i, narab-a,*
basket=ACC three-piece bring-MED come-MED align-MED
'(he) brought three baskets and put them in line,'

(T.5) *meedarikaki=<o> hak-a-ci, ki=nu ui=naga nubur-i,*
apron=ACC put.on-SE-SIM tree=GEN up=DAT climb-MED
'(he) put on an apron and climbed on the tree,'

(T.6) *meedarikaki=naga mansin nari=<o> ir-a,*
apron=DAT full fruit=ACC put-MED
'(he) put fruits fully into the apron,'

(T.7) *sïta=naga ur-a k-i, kunu nari=<o> kagu=naga muru ir-a,*
down=DAT down-MED come-MED this fruit=ACC basket=DAT all put-MED
'(he) came down from the tree and put all the fruit in the basket,'

(T.8) *e-s-u-Ø kami=ja pïtu-sïn=Ø=ja ut-a-ta=sa=roo*
so-do-NPRF-NPST during=TOP one-piece=CORE=TOP fall-PRF-PAST=INFER=DSC
'Then one might fall down.'

(T.9) *ha-sacï=si keesi fuk-i-sita, kagu=naga mansin nar-ja-ta-n*
REFL-hadnkachief=INS cleanlily wipe-SE-MED basket=DAT full become-PRF-PAST-RLS
'He rubbed it clean with his handkerchief , the basket became full.'

(T.10) *e-s-u-Ø kami=ja pïtu-ri=nu bidumu=Ø=ndu pïmïza=<o> safuk-i k-u-ta=sïka,*
so-do-NPRF-NPST during=TOP one-people=GEN man=CORE=FOC goat=ACC pull-MED come-NPRF-PAST=but

'Then, one man came pulling a goat but,'

(T.11) *unu pïmïza=Ø=ja muttun arug-i-bo-s-an-u-Ø*
that goat=CORE=TOP at.all walk-SE-want-VLZ?-NEG-NPRF-NPST
'that goat doesn't want to walk at all.'

(T.12) *safuk-i=ba=n safuk-i=ba=n safuk-ar-un-u-Ø*
pull-IMP=EMP=LIM pull-IMP=EMP=LIM pull-PASS-NEG-NPRF-NPST
'(the goat) is never pulled no matter how much he pulled it.'

(T.13) *pïmïza=Ø=ja unu nari=<o> h-e-bo-ha-ta=kaja=ta*
goat=CORE=TOP that fruit=ACC eat-SE-WANT-VLZ-PAST=INFER=QT
mu-ta=roo
think.NPRF-PAST=DSC
'(I) thought the goat might want to eat fruits.'

(T.14) *e-s-u-Ø kami=ja, unu bidumu, pïmïza=Ø safuk-ja-ru*
so-do-NPRF-NPST during=TOP that man goat=CORE pull-PRF-NPST
bidumu=Ø=ja jatto=si unu pïmïza=<o> ha=ga
man=CORE=TOP finally=INS that goat=ACC over.there=DAT
safuk-i par-u-ta=roo
pull-MED go.away-NPRF-PAST=DSC
'Then, the man with the goat finally pulled the goat and went away.'

(T.15) *sipi=gara <zitensja>=nu nubur-ja-ru bidumu-ntama=nu*
back=ABL bicycle=GEN ride-PRF-NPST man-DIM=GEN
k-u-ta=sïka,
come-NPRF-PAST=but
'A boy riding a bicycle came but,'[15]

(T.16) *ai, na unsïku ma-ha-sja-ru nari=Ø=ndu*
INTJ here very delicious-VLZ-VLZ?-PRF-NPST fruit=CORE=FOC
a-Ø=kaja=ta mu-i, ui=Ø mir-i-ba,
be-NPST=INFER=QT think-MED above=CORE look-SE-CND
'(he thought) "oh no, how delicious these fruits are" and looked up to the tree then,'

(T.17) *ija=Ø=ndu nari=Ø tur-i bir-ja-ta=sïka,*
father=CORE=FOC fruit=CORE pick.up-MED PROG-PRF-PAST=but
'the father was picking up fruits but,'

(T.18) *ija=Ø=n nu=Ø=n bagar-an-u-Ø, nari=<o>*
father=CORE=LIM what=CORE=LIM know-NEG-NPRF-NPST fruit=ACC
tur-i bir-ja-ta=roo
pick.up-MED PROG-PRF-PAST=DSC
'the father didn't notice anything, and continued to pick them up.'

[15]Genitive *=nu* on this clause may be possibly an error of focus marker *=ru*.

(T.19) *bidumu-ntama=Ø=ja mana=nu du=si=ndu kunu*
man-DIM=CORE=TOP now=GEN place=INS=FOC this
nari=Ø=ja muc-i ng-air-u-Ø-n=ta mu-i,
fruit=CORE=TOP bring-MED go-PASS-NPRF-NPST-RLS=QT think-MED
<zitensja>=<o> toh-e-sita,
bicycle=ACC lay.down-SE-MED
'The boy thought he can bring out some fruits now, then he laid down his bicycle,'

(T.20) *mansin nar-ja-ru kagu=Ø muc-i, <zitensja>=nu*
full becomePRF-NPST basket=CORE bring-MED bicycle=GEN
katamuta=naga sik-i-sita,
beside=DAT put-SE-MED
'bringing the basket which is full of fruits, he put it beside his bicycle,'

(T.21) *bidumu-ntama=Ø=ja <zitensja>=naga matasangar-i, kagu=<o>*
man-DIM=CORE=TOP bicycle=DAT ride-MED basket=ACC
du=nu <zitensja>=nu me=naga jatto=si nubus-a, muc-i
REFL=GEN bicycle=GEN front=DAT finally=INS load-MED bring-MED
ng-u-ta=roo
go-NPRF-PAST=DSC
'the boy riding on his bicycle, loaded the basket in front of it and carried it away.'

(T.22) *e-s-u-Ø kami=ja, me=gara midumu-ntama=nu*
so-do-NPRF-NPST during=TOP front=ABL woman-DIM=GEN
<zitensja>=ru nubur-i k-u-ta=sika,
bicycle=FOC ride-MED come-NPRF-PAST=but
'Then, a girl riding a bicycle came from the front but,'

(T.23) *midumu-ntama=Ø=ja igebari-s-i, bidumu-ntama=ga hakar-i*
woman-DIM=CORE=TOP cross-do-MED man-DIM=DAT hang-MED
k-i, bidumu-ntama=Ø=ja kagu=Ø mabutah-e,
come-MED man-DIM=CORE=TOP basket=CORE roll.over-MED
<zitensja>=Ø=n mabutah-e,
bicycle=CORE=LIM roll.over-MED
'when they crossed, the boy snagged her bicycle and he rolled over the basket and his bicycle too.'

(T.24) *e-s-u-Ø kami=ja, muru nari=Ø=ja*
so-doNPRF-NPST during=TOP all fruit=CORE=TOP
kupur-a=sa n-en-u-Ø
spill.over-MED=INFER PRF-NEG-NPRF-NPST
'then he spilled all the fruits.'

(T.25) *utama=Ø=ja <zitensja>=Ø mabuta-ta=ra pan=Ø*
child=CORE=TOP bicycle=CORE roll.over-PAST=RES foot=CORE
kega-s-i sïccah-e bir-ja-ta=roo
injury-do-MED rub-MED PROG-PRF-PAST=DSC
'the boy was injured on his foot because he rolled over his bicycle, and he rubbed the wound.

(T.26) *e-s-u-Ø kami=ja, ha=ra mita-ri=nu*
so-doNPRF-NPST during=TOP over.there=ABL three-people=GEN
utama-nzi=nu k-u-ta=sïka,
child-PL=GEN come-NPRF-PAST=but
'Then three children came from over there but,'

(T.27) *unu utama-nzi=Ø=ndu kagu=naga nari=<o> muru pïs-i*
that child-PL=CORE=FOC basket=DAT fruit=ACC all pick.up-MED
ir-a h-a-ta=roo
put-MED give-PRF-PAST=DSC
'these children picked up all the fruit and put them into the basket for the boy.'

(T.28) *e-sita, <zitensja>=naga nubus-a, bidumu-ntama=Ø=ja*
do.so-MED bicycle=DAT load-MED man-DIM=CORE=TOP
zitensja=<o> safuk-i par-u-ta=roo
bicycle=ACC pull-MED go.away-NPRF-PAST=DSC
'Then, the boy loaded the basket on his bicycle and went away pulling his bicycle.'

(T.29) *mata utama-nzi=Ø=n mata ha=ga*
INTJ child-PL=CORE=LIM INTJ over.there=DAT
par-u-ta=sïka=ru, tocju=nagi mïcï=na maagi
go.away-NPRF-PAST=but=FOC halfway=LOC road=LOC big
isi=nu a-ta=ra,
stone=GEN be-PAST=RES
'The children went away too but, they found a big stone on the halfway then,'

(T.30) *utama-nzi=Ø=ja mita-ri=<no> utama-nzi=Ø=ja kunu*
child-PL=CORE=TOP three-people=GEN child-PL=CORE=TOP this
isi=<o> katazuk-a par-u-ta=roo
stone=ACC clear-MED go.away-NPRF-PAST=DSC
'the three children cleaned off the big stone and went away.'

(T.31) *e-s-u-Ø kami=ja, sipi=tu mari=Ø*
so-do-NPRF-NPST during=TOP back=COM around=CORE
mir-u-ta=ra, unu <zitensja>=nu utama=nu <boosi>=nu
look-NPRF-PAST=RES that bicycle=GEN child=GEN hat=GEN

ut-a *bir-ja-ta=ra,*
fall-MED PROG-PRF-PAST=RES

'Then looking around there, because there was a hat which the boy riding a bicycle dropped,'

(T.32) *utama=Ø=ja* *unu* *<boosi>=<o>* *tur-i,* *unu*
child=CORE=TOP that hat=ACC take-MED that
<zitensja>=nu *utama=ga* *kafuc-a-ta=roo*
bicycle=GEN child=DAT put.on-PRF-PAST=DSC

'one child picked up the hat and let the boy put it on.'

(T.33) *e-sita,* *bidumu-ntama-nzi=ga* *mita-ri=<no>* *bidumu-ntama=ga*
do.so-MED man-DIM-PL=DAT three-people=GEN man-DIM=DAT
pïtu-sïn=na *nari=<o>* *h-a-ta=roo*
one-piece=LOC fruit=ACC give-PRF-PAST=DSC

'Then, the boy gave one fruit to each of the three children .'

(T.34) *utama-nzi=Ø=ja,* *mita-ri=<no>* *utama-nzi=Ø=ja* *kunu*
child-PL=CORE=TOP three-people=GEN child-PL=CORE=TOP this
nari=<o> *muc-i-ci,* *unu* *kagu,* *ija=nu* *nari=nu*
fruit=ACC bring-SE-SIM that basket father=GEN fruit=GEN
katamuta=gara *ha=ga* *tuur-i* *ng-u-ta=roo*
beside=ABL over.there=DAT pass-MED go-NPRF-PAST=DSC

'Bringing the fruits, the three children went away passing beside the father's fruit.'

(T.35) *e-s-u-Ø* *kami=ja,* *ija=Ø=ja* *sïtari=gara*
so-do-NPRF-NPST during=TOP father=CORE=TOP down=ABL
ur-a *k-i* *kagu=<o>* *mir-i* *k-i-ba,*
come.down-MED come-MED basket=ACC look-MED come-SE-CND

'Then the father came down to see these baskets,'

(T.36) *mana-bi=ja* *mii-cï=Ø* *a-ta=sïka* *ne=ki=ru*
now-?=TOP three-piece=CORE be-PAST=but why=RES=FOC
ha-kagu=Ø=ja *futa-cï=Ø* *nar-ja-Ø=kaja,* *unu*
REFL-basket=CORE=TOP two-piece=CORE become-PRF-NPST=INFER that
kagu=Ø=ja *nu-s-u-ta=kaja=ta* *unsïku*
basket=CORE=TOP what-do-NPRF-PAST=INFER=QT very
amasïkuru=Ø *katafuk-i-ci* *kange-e* *bir-ja-ta=roo*
head=CORE decline-MED think-MED? PROG-PRF-PAST=DSC

'(he) was thinking "it seems there were three baskets just now, but why were there only two? What happened to my baskets?" tilting up his head.

(T.37) *utama-nzi=Ø=ja unu nari=<o> mama ma-ha-s-i-ci*
child-PL=CORE=TOP that fruit=ACC very delicious-VLZ-CAUS-SE-SIM
h-e-ncana, ha=ga kaer-i=sa
eat-SE-SIM over.there=DAT go.home-MED=INFER
n-en-u-ta=roo
PRF-NEG-NPRF-PAST=DSC
'These children went away home eating fruit very deliciously.'

(T.38) *panasï=Ø=ja obi=bagi=ndu panas-i ss-ja-Ø=roo*
story=CORE=TOP end=TER=FOC tell-MED POT-PRF-NPST=DSC
'That's all I can tell you.'

Abbreviations

<…>	loanword from Japanese	HON	honorific	POT	potential
1	first person	HS	hearsay	PRF	perfect
2	second person	IMP	imperative	PROG	progressive
ABL	ablative	INC	inceptive	PROH	prohibitive
ACC	accusative	INFER	inferential	PROS	prospective
ALL	allative	INS	instrumental	Q	question
CAUS	causative	INT	intentional	QT	quotative
CND	conditional	INTJ	interjection	REFL	reflexive
COM	comitative	LIM	limitative	RES	resultative
COP	copula	LOC	locative	RLS	realis
CORE	core argument	MED	medial	SE	stem extender
DAT	dative	NEG	negative	SG	singular
DIM	diminutive	NLZ	nominalizer	SIM	simultaneous
DSC	discourse marker	NPRF	non-perfect	TER	terminative
EMP	emphatic	NPST	non-past tense	TOP	topic
EXP	experiential	PASS	passive	VLZ	verbalizer
FOC	focus	PAST	past tense		
GEN	genitive	PL	plural		