

Proceedings of the 42nd Australian Linguistic Society Conference 2011

edited by

Maïa Ponsonnet Loan Dao Margit Bowler

Papers available online: http://hdl.handle.net/1885/9404 Australian Linguistic Society website: http://www.als.asn.au/

Editorial note

The 2011 Conference of the Australian Linguistic Society was held at The Australian National University in Canberra between the 1st and the 4th December 2011, hosted jointly by the School of Language Studies and the School of Culture, History and Language. The Conference convenors were Jane Simpson and Nicholas Evans.

Twenty of the papers presented at the conference were submitted for these proceedings, of which seventeen were accepted for publication after an anonymous peer review by at least two academic referees each. Sixteen articles were revised for publication. Cynthia Allen, Margit Bowler, Loan Dao, David Nash, Maïa Ponsonnet and Jane Simpson jointly took care of the peer review and editorial process. The review process for the proceedings was separate from and in addition to that of the conference abstracts. We are grateful to all referees for their meticulous work and their constructive comments.

We recommend that references to the papers in these proceedings follow the format below:

<Author(s)> 2012 <Title> in Ponsonnet M, L Dao & M Bowler (eds) Proceedings of the 42nd Australian Linguistic Society Conference – 2011 (Canberra, 1-4 Dec 2011) Canberra: ANU Research Repository https://digitalcollections.anu.edu.au – Access: https://hdl.handle.net/1885/[article code]

Published in Canberra in October 2012.

The copyright of each article remains with its author(s).

ISBN: 978-0-9802815-4-5

Table of contents

8	
A strategy for language revival	
Rob Amery	http://hdl.handle.net/1885/9280
Sad Stories	
A preliminary study of NAPLAN practice texts	s analysing students'
second language linguistic resources and the ef	fects of these on their written narratives
Denise Angelo	http://hdl.handle.net/1885/9313
	58
and the Natural Semantic Metalanguage (1	
Loan Dao	http://hdl.handle.net/1885/9327
Grammar rules, OK?	75
What works when teaching a higly endangered	
Aboriginal language versus a strong language	
Mary-Anne Gale	//http://hdl.handle.net/1885/9397
I can haz language play:	
The construction of language and identity in L	
Lauren Gawne and Jill Vaughan	http://hdl.handle.net/1885/9398
Case marking (accounts) in collapse:	123
Evidence from Early Modern Dutch egodocum	
Jennifer Hendriks	http://hdl.handle.net/1885/9399
The linguistic anatomy of individual different	ences in Japanese monologues:
Focusing on particles and interjections	
Shunichi Ishihara	http://hdl.handle.net/1885/9400

The morphosyntax of a created language of the Philippines: .	
Folk linguistic effects and the limits of relexification	
Piers Kelly	http://hdl.handle.net/1885/9401
Simplifying a system:	223
A story of language change in Lelepa, Vanuatu	
Sébastien Lacrampe	http://hdl.handle.net/1885/9402
The semantics of the Cantonese utterance particle <i>laa1</i>	245
Helen Leung	http://hdl.handle.net/1885/9403
On conversational valence and the definition of interjections.	281
Alan Libert	http://hdl.handle.net/1885/9418
Non-referential actor indexing in Nehan	
John Olstad	http://hdl.handle.net/1885/9419
Non-finite complementation in French L2:	315
A learner corpus approach	
Hugues Peters	http://hdl.handle.net/1885/9420
Body-parts in Dalabon and Barunga Kriol:	351
Matches and mismatches	
Maïa Ponsonnet	http://hdl.handle.net/1885/9421
The expression of potential event modality	388
in the Papuan language of Koromu	
Carol Priestley	http://hdl.handle.net/1885/9422
Musicolinguistic artistry of <i>niraval</i> in Carnatic vocal music	422
Mahesh Radhakrishnan	http://hdl.handle.net/1885/9423

Taking to the airwaves A strategy for language revival

Rob Amery University of Adelaide and Kaurna Warra Pintyandi rob.amery@adelaide.edu.au

Abstract. The re-introduction of an Indigenous language into an English-speaking community presents an enormous challenge. School programs, workshops and songwriting projects have typically been the starting point for language reclamation with small numbers of participants involved. Increasingly, reclaimed languages are being used in public to give speeches of "Welcome to Country" or by choirs in the singing of songs. At the same time, reclaimed languages are appearing in signage and works of art. However, the opportunity to hear reclaimed languages spoken is rare. Radio and associated podcasts and downloads offer a means of reaching a wider audience. This paper will discuss a project to develop and broadcast two-hour-long radio programs in and about the Kaurna language, the original language of the Adelaide Plains, which is being reclaimed on the basis of 19th century written records (see Amery, 2000). Strategies have been developed to engage with an Englishspeaking audience in a way that makes the Kaurna language interesting and accessible. This may serve as a model for other languages in similar situations to follow.

Keywords. Kaurna, language revival, radio, media, codeswitching

1. Introduction¹

Indigenous peoples in many different parts of the world have produced their own radio and television programs, and set up their own media organisations and radio and television stations. Not surprisingly, they have broadcast programs in Indigenous languages to inform and to entertain in the first language of communities of listeners. Perhaps less well-known is the fact that many programs have been produced and many radio and television stations have been established for the prime purpose of maintaining, promoting and reviving languages. In some cases funding has been allocated specifically to support language revival by means of radio and television.

1.1 Radio and television for maintaining, promoting and reviving Indigenous languages

Raidió na Gaeltachta, broadcasting in Irish, was established in 1972, explicitly to "support revival of the language" (Cotter, 2001:305). Cotter goes on to claim that it was "the only station in the world broadcasting to ethnic minorities at the time". This claim is somewhat overstated, as broadcasting in Māori language dates back to the 1930s and a 15-minute weekly news bulletin in Māori was aired during World War II on the activities of the Māori battalion. However, it is true that it was not until 1978 that Te Reo O Aotearoa, Radio New Zealand's Māori and Pacific Islands' Broadcasting Unit was established (te Ua, n.d.).

Māori radio and television are quite explicit in their primary purpose being to revitalise the Māori language. The Māori TV Homepage begins:

The Māori language is the cornerstone of Māori culture. It provides a platform for Māori cultural development and supports a unique New Zealand identity within a global society. It is a *taonga* (treasure), at the

_

¹ Thanks to participants in the Kaurna radio shows: Jack Kanya Buckskin, Jamie Ngungana Goldsmith, Stave Gadlabarti Goldsmith, Kauwanu Lewis O'Brien, Katrina Karlapina Power, Taylor Power-Smith and Ngarrpadla Alitya Rigney for the use of their material. Thanks also to Christine Brown, producer of the *Kaurna Warra Ngayirda Wingkurila* "Kaurna language on the airwaves" radio shows. Work underpinning this paper has been supported through the Indigenous Languages Support (ILS) program funded through the Office of the Arts, Department of Regional Australia, Local Government, Arts & Sport. I thank the two anonymous reviewers for their helpful comments.

very heart of Māori culture and identity, and for that reason alone it must be preserved and fostered.

New Zealand's national indigenous broadcaster, Māori Television, has been established as one of a number of important initiatives to promote and revitalise the Māori language. The aim of our channel is to play a major role in revitalising language and culture that is the birthright of every Māori and the heritage of every New Zealander.²

In 1993 the New Zealand government established Te Māngai Pāho under the Broadcasting Amendment Act to allocate funds specifically to promote radio and television broadcasts in Māori. According to the Statement of Intent 2011–2016, the agency currently manages over \$52 million³ in funding contracts (Te Māngai Pāho, 2011:7) with 21 *imi* (tribal) radio stations to deliver eight hours of Māori language content each day; the Māori Television Service for in-house productions; and independent Māori language productions for radio, television and music CDs.⁴

Hoopa Valley Radio was reportedly established in 1980 with the express aim of promoting the Hupa language. Joseph Orozco, Station Manager and founder of KIDE 91.3 FM broadcasting in the Hoopa Valley in northern California said: "we started looking into it as part of the Hoopa Tribal Education committee, as a way to promote the Hupa language" (Walters, 2005:1). A weekly program was broadcast including bingo games, Hoopa cultural history and reviews and previews of vocabulary in the community language class (Bennett, 2003:66).

Media has been used in various ways within language revival. In Israel radio was used to promote purist pronunciation norms for Israeli, including the alveolar trill /r/ and pharyngeal consonants which are not pronounced by most Israelis

 \sim 7 \sim

² http://www.maoritelevision.com/Default.aspx?tabid=227.

³ This compares with funding allocated by the Commonwealth Government of Australia in the last round of grants of \$15.4 million to the Indigenous Broadcasting Program (IBP), \$15.2 million to National Indigenous Television (NITV), \$3.3 million to the Indigenous Remote Radio Replacement Program (IRRRP) and \$9.6 million to the Indigenous Languages Support (ILS) program, from which the Kaurna radio shows are funded. However, much of the funding to support Indigenous broadcasting in Australia supports programs produced in English, whilst only a small fraction of ILS funds are allocated to the production of radio and television in Indigenous languages

⁽http://www.arts.gov.au/indigenous; http://www.dbcde.gov.au/radio/indigenous)

⁴ http://www.tmp.govt.nz/about.html

(Ghil'ad Zuckermann, pers. comm., June 2012) and to promote neologisms (see Zuckermann, 2003:85; 2008:146). Israeli was already well-established before the introduction of radio and television, so it was not necessary to use radio and television to give exposure to the language *per se*.

Though there is no established standard Navajo, radio broadcasts have promoted conservative prestige forms of the language and, as a result, have been criticised for being unappealing to youth (Peterson, 1997:216).

By contrast, in the Māori case the main thrust has been to increase exposure to the Māori language by presenting a full range of high quality programming from sports coverage, news, soap operas, fitness shows, game shows, children's programs etc. in direct competition with mainstream radio and TV (personal observations, 2009). This is in addition of course to programming with Māorispecific cultural content. Shows, such as *Haa*, described as "a high-energy infotainment magazine programme for young teenagers brought to you by our funky presenters Poutama Paki and Te Uira Paki" are designed specifically for youth. The government funding body provides the following rationale for their support of broadcasting:

One way to strengthen te reo Māori and tikanga Māori is by enabling it to be seen and heard in more homes and places in New Zealand. Radio and television broadcasting, and increasingly the Internet, provide cost effective ways of taking te reo Māori to all New Zealanders. (Te Māngai Pāho, 2011:23)

The Irish language movement used broadcast media to build up an archive of recordings of interviews, stories, and traditional music and to expand the vocabulary to accommodate contemporary topics such as AIDS and technological advances (Cotter, 2001:305).

The use of radio programs in the language classroom increases the amount and quality of language used by students. Radio programs "generate an increase in

⁵ http://nz.entertainment.yahoo.com/tv-guide/search/Haa/

language and promote the use of quality language in propelling students to be aware of an audience of listeners" (Bennett, 2003:60).

The Kaurna initiative described in this paper is miniscule by comparison with the use of media to support the revival of Hebrew, Māori, Hawai'ian, Navajo, Hupa, Irish, Manx and other minority languages of Europe. The Kaurna are a very small group and the Kaurna language is in a much more compromised state by comparison with the aforementioned languages which, with the exception of Manx, all have numbers of native speakers remaining. Even Manx has numbers of fluent speakers, some of whom were learning Manx before Ned Madrell, the "last" native speaker died in 1974. A new generation of first language Manx speakers is now emerging from Manx homes aided by the Bunscoill Ghaelgagh language immersion school in the town of St Johns on the Isle of Man (personal observations and conversations with Adrian Cain, Manx Language Officer, Isle of Man Nov. 2010). However, the Kaurna case is interesting because it illustrates some novel strategies for working with a severely attenuated language, known only from historical sources, that is associated with a small disenfranchised minority living in a large urban city.

1.2 Radio and television in Aboriginal Australia

Radio has been a part of the Aboriginal languages landscape, since not long after the first Aboriginal broadcasts in Adelaide and Townsville in 1972. The Central Australian Aboriginal Media Association (CAAMA) was established in Alice Springs in 1980 and began broadcasting in local Central Australian languages. Yolngu Radio, operating out of Nhulunbuy, is an effective medium of communication broadcasting to communities throughout northeast Arnhemland, Darwin and beyond via the Internet⁶. Nganampa Wangka, hosted by Karina Lester from the Mobile Language Team at the University of Adelaide, has been broadcast on a weekly basis through Radio Adelaide 5UV since 2010 and has included an on-air Yankunytjatjara lesson between Karina and her daughter Jesse. In mid-2011 Paper Tracker went on the air at Radio Adelaide in a weekly show hosted by Rose Lester, Jonathan Nichols and Peter McDonald. This show is

⁶ See www.ards.com.au/radio.htm.

broadcast in Yankunytjatjara and English "making it easier for Anangu to understand what governments are saying and doing in their communities".

TV has also been introduced to Aboriginal communities since the establishment of the Warlpiri Media Association in 1985⁸ and EVTV (which subsequently became PY Media) at Ernabella around the same time. These were preceded by local video productions since 1979. The Broadcasting in Remote Aboriginal Communities Scheme (BRACS) was established in 1987, enabling remote Aboriginal communities to broadcast their own local television productions within their own communities. By 2008 there were 29 BRACS units operating in the Northern Territory⁹.

Certainly media has an important role to play in maintaining Aboriginal languages. Almost invariably it has been the stronger, more viable languages that have appeared in the media. One exception to this is *Waabiny Time*, a thirteen-episode TV series launched on the 5 April 2011 in Perth. This show introduces Nyungar language to young children. There are also developments afoot to produce Nyungar radio programs with language capsules and lessons currently being recorded ready for broadcast in 2012. One hundred 30–40 sec. capsules are planned. These will be assembled into language lessons with sentences, statements and possibly a conversation¹⁰. Nyungar is a language undergoing revival, but it is in a very different state to Kaurna, the topic of this paper. Much more of the Nyungar language is still remembered within the community, has a higher level of diversity of language forms, and Nyungar people are spread across a wider area, though like Kaurna, this includes a major capital city, Perth.

Another exception is Gary Williams' Gumbaynggir language learning segment in a breakfast show each Wednesday morning. He teaches a series of useful phrases and expressions through conversation with radio presenter Fiona Poole, including

⁷ http://www.papertracker.com.au/index.php?option=com_content&task=view&id=269&Itemid=88

⁸ See http://www.pawmedia.com.au/about-us/history.

⁹ Refer to the Indigenous Community Television Limited webpages for a brief history (http://www.ictv.net.au/10-the-ictv-history.html accessed 24/11/2011).

¹⁰ e-mail Wayne Bynder, Station Manager, Noongar Radio, 17 Nov. 2011.

a good laugh over "See you later alligator" (which Williams encodes as "toothy type")¹¹.

A case most similar to Kaurna is that of Awabakal, from the Lake Macquarie and Newcastle area of New South Wales. In the mid-1980s, Perce Haslam, Convocation Research Fellow at the University of Newcastle, broadcast weekly language lessons in a program called *Awabakal Voices* on Newcastle community radio station 2NURFM, ¹² prior to his untimely death in 1987.

The Kaurna language has featured on television only in a minimal way to date with a song performed by Ngarrpadla Alitya Rigney on *The Bookplace* program on Channel 7 in 1992 (Amery, 2000:188) and Jack Kanya Buckskin appearing in a Reconciliation Week promo on Channel 10 in May 2009. The Kaurna Warra Ngayirda Wingkurila radio shows described here are exploring new territory, not only for Kaurna but for "sleeping" languages undergoing revival in general.

1.3 Kaurna language revival

Like many other Aboriginal languages, Kaurna is an awakening language. Being the language of the Adelaide Plains, it was the first South Australian language to bear the brunt of colonisation and declined exceedingly fast. It was probably last spoken on an everyday basis in the early 1860s, less than 30 years after colonisation in 1836. Fortunately, Kaurna was reasonably well documented by German missionaries and others when it was still a vibrant language in the mid-19th century.

The revival of the Kaurna language began in 1989-1990, in the wake of previous work on Ngarrindjeri and Narungga (see Amery, 2000). Kaurna language reclamation efforts commenced with the writing and recording of Kaurna songs (Ngarrindjeri, Narrunga and Kaurna Languages Project, 1990). The following year in a workshop specifically for early childhood education workers, we translated various nursery rhymes including *Hickory Dickory Dock*, *Baa Baa Black Sheep*, *Twinkle Twinkle Little Star*, A Sailor Went to Sea and Open Shut Them. These were

¹² See http://www.newcastle.edu.au/school/hss/research/publications/awaba/people/percy-haslam.html

¹¹ The mp3 files are downloadable from the web at http://www.abc.net.au/local/stories/2010/07/02/2943206.htm

subsequently recorded and eventually published in *Kaurna Paltinna – A Kaurna Songbook* (Schultz *et al.*, 1999). Songs are a great stand-alone resource for learning and re-introducing a language.

Kaurna was introduced as a subject to Kaurna Plains School in 1992 and has been taught there ever since. It has been introduced to a number of other schools at kindergarten, primary and secondary levels and in adult programs through the School of Languages. The School of Languages¹³ is an initiative of the Department of Education and Child Development (DECD) to provide a range of languages, including minority languages such as Dinka, in after hours programs to increase accessibility of languages education. Indigenous languages programs (Pitjantjatjara and Kaurna) are open to community members as well as students enrolled within the South Australian Certificate of Education (SACE).

From a position of total obscurity some 30 years ago, the Kaurna language has now gained a significant public profile. It is being used to name places, buildings, organisations, programs, people, pets and other entities (including a tram, a solar bus, a wheat variety, a frost chamber, a range of chocolates, an allele¹⁴ and an emergency beacon). One of the main functions of the language today is in the giving of "Welcome to Country" and "Recognition of Country" speeches. Examples of these can be found on the Kaurna Warra Pintyandi (KWP) webpages¹⁵, Adelaide City Council website and elsewhere. Apart from speeches of "Welcome to Kaurna Country" at many public events (including high profile events such as the Festival of Adelaide) and the use made of Kaurna language by three Kaurna cultural performance troupes (*Paitya* "deadly", *Taikurtinna* "family" and *Kuma Kaaru* "one blood"), there are few opportunities to hear the Kaurna language spoken. And there are probably more opportunities for the most proficient Kaurna users to write Kaurna than to speak it thanks to e-mail and SMS messaging.

To support the learning of Kaurna, various audio resources have been produced to accompany other language resources. Songs were originally made available on a cassette tape to accompany the first songbook (Ngarrindjeri, Narrunga & Kaurna

¹³ See http://www.schooloflanguages.sa.edu.au/.

¹⁴ Alleles are alternative forms of a gene located at identical loci of homologous chromosomes.

¹⁵ See www.adelaide.edu.au/kwp.

Songs, 1990). With advances in technology, for the next project Kaurna songs were produced on a CD (Schultz et al., 1999). A PowerPoint show with embedded sound files was also included on a CD with the Kaurna Alphabet Book (Watkins & Gale, 2006) and a CD of audio recordings with the Kaurna Funeral Protocols book (Amery & Rigney, 2006). The audio resource contains hymns plus prayers, liturgy and salient vocabulary as it appears in the accompanying book. Similarly for the forthcoming Kaurna Learner's Guide (Amery et al., forthcoming) a series of 16 PowerPoints with embedded sound files have been prepared.

In 2007, a Kaurna Placenames website was launched. A sound file for each Kaurna placename was recorded and posted on the web. For the last few years, whenever anyone makes a request for a Kaurna name or translation a sound file is recorded and e-mailed to the one making the request so they can listen to it, post it on their website or circulate it amongst their staff. These requests are being compiled in a database together with other Kaurna names and texts being used in the public domain and are being mapped on GoogleEarth in a similar fashion to the Kaurna placenames website (see Amery, 2010). Sound files are included in this database.

In 2011 KWP obtained Commonwealth funding to produce a Kaurna Dictionary and we intend to include a sound file with each and every dictionary entry. Some of this recording work has already been done. In 2008, James McElvenny and Aidan Wilson worked on a Kaurna phonology project at the direction of Jane Simpson, in consultation with myself and KWP. Jack Kanya Buckskin recorded a number of sound files for this project, though many are yet to be recorded. McElvenny and Wilson developed an application for mobile phones (McElvenny, 2008). So for some entries one can hear the associated sound file on the phone dictionary, as recorded by Buckskin, giving the recommended pronunciation of the word.

Despite all these sound resources that had been produced over the years, there is still little by way of recordings of everyday conversations or casual speech to listen to and there is little opportunity to hear Kaurna language spoken casually. At this stage in the development of the Kaurna language, it is vital that more of these kinds of resources are produced.

2. Kaurna radio and download project

In 2010 we embarked on a project to record two-hour-long Kaurna radio shows in order to begin to address the need for more conversational audio resources. Timing seemed to be right, with several young Kaurna men and others willing to be involved. Workshops were held to devise the script.

2.1 Show #1: Kaurna land, language and identity

Issues around land, language and identity became a central theme for the first radio show. The show explores early linguistic evidence for Kaurna occupation of the Fleurieu Peninsula, south of Adelaide, presented in the context of a kitchen table chat between Kaurna people of varying ages. Younger Kaurna voices enquire about the extent of Kaurna country. Their questions are answered through the recounting of stories by Kaurna Elders about Sally and Harry, the source(s) of the earliest known Kaurna wordlist recorded by Gaimard in 1826 and published in 1833 (see also Amery, 1998); the Kaurna speakers contracted by Colonel Light at Rapid Bay in 1836 (Jacob, 1837; see also Amery, 1998); and of Kalloongoo, the source of Robinson's (n.d.) Kaurna wordlist collected in 1837. Kalloongoo was abducted from the Yankalilla/Rapid Bay area in the early 1820s (Plomley, 1987:445-447; see also Amery, 1996).

The theme of Kaurna placenames is also addressed in the first show. A number of placenames have always been in use across the Adelaide Plains and Fleurieu Peninsula. Prominent examples include Noarlunga, Aldinga, Yankalilla, Willunga, Onkaparinga, Myponga and Waitpinga. These are all names with which every Adelaidean can identify, though many listeners may never have thought about their Kaurna origins or have any idea of their meanings. Another important subtheme was addressing the difference between a welcome or greeting to Kaurna land, appropriately delivered by a Kaurna person, and an acknowledgement of Kaurna land which is deemed appropriate for a non-Kaurna person to deliver in the Kaurna language (see also Gale, 2012:34).

Framing the first show in this manner indicates a strong desire to educate members of the Kaurna community and to raise awareness within the community at large about Kaurna country and Kaurna protocols. Few people in the Kaurna community, let alone the community at large, have much knowledge of the

Kaurna language, so there was no point in producing radio shows that were 100% in the Kaurna language, even though this would be possible. Of course the production of an hour-long radio show entirely in Kaurna language would take much, much longer to produce, with additional rehearsal time required. Rather, we identified segments where the use of the Kaurna language was able to be introduced naturally and appropriately for an English-speaking audience.

We devised an introductory Kaurna language lesson with Jack Kanya Buckskin as the teacher, as he is in real life. We tried to re-create the atmosphere of a real-life Kaurna language class beginning with the Kaurna Plains School song sung in Kaurna by students from the school. Jack calls the class to order and then interacts with students in the class teaching them greetings and expressions for where the students are from and where they are living. This entire segment is initially in Kaurna and only Kaurna. After a first run through, Jack goes through the lesson for a second time with short segments replayed from the original lesson followed by Jack's explanations of what people said. Here is the script of the second run-through with explanations:

- JB Now let's go through it again, looking at some of the phrases and expressions we just heard.
- JB Niina marni? Kauwanu?
- LO'B Marni'ai.
- JB Niina marni is a greeting "are you good?". And I addressed Uncle Lewis as Kauwanu, "Uncle". He replied Marni'ai "I'm good". Another way of saying this would be Ngai marni, but with Marni'ai, a short form of ngai "I" is tacked on to the end of marni "good". Then I ask Steve the same thing, but this time I address him as **Yunga** "older brother".
- JB Niina marni? Yunga?
- S Nii! Marni.
- JB And he answers *Nii! Marni* "yes, good". I ask other students in turn, addressing them with the appropriate kin term that expresses the relationship I have with each. And they respond in various ways; *Yaku*

marni "not good" etc. Then I started asking students for their names, starting with Katrina, my *Yakana* "older sister":

- JB Ngana niina nari? (fast) Yakana?
- KP Muinmu wangka!
- JB And she replied *Muinmu wangka!* "say again". So I repeated it and gave her the example *Ngai nari Jack Kanya Buckskin*, "my name is Jack Kanya Buckskin". Then she caught on:
- KP Ku! Ngai nari Katrina Karlapina Kartanya.
- JB Which means "OK. My name is *Katrina Karlapina* (inclined to fire) *Kartanya* (first born and female). I asked the others in turn for their names. Then I asked students where they were from:
- JB Wathangku niina? Kauwanu?
- L.O'B Ngaintya?
- JB Wathangku niina? Ngai Wamanangku. Wathangku niina?
- L.O'B Ngai Yartapuulti-anangku.
- I just asked Uncle Lewis where he was from and he pretended to not understand saying *Ngaintya?* "What?" So I asked him again and gave him the example *Ngai Wamanangku* "I come from **Womma** (which means "plain")". Then he said *Ngai Yartapuultinangku* "I'm from Port Adelaide". *Yartapuulti* is the Kaurna name for Port Adelaide. It means "land of sleep or death".

I asked the others where they were from. Steve said he was from the Adelaide Plains (*Wama Tarntanyanangku*) so I asked him where he lived. (*Waa niina tikanthi?*) and he replied *Kauwantila* which means "at Cowandilla". It also means "in the north". *Kauwanta* is the Kaurna word for "north".

So that's basically what the lesson was about: greetings, what's your name?, where are you from? With a few other very useful words like *Pidna* "hang on!" *Muinmu wangka!* "say it again" *Warrarti!* "be quiet!" etc., thrown in.

We also scripted banter and jokes between Jack Buckskin and his mate Jamie Goldsmith. The script for this banter was devised in a workshop in which Buckskin and Goldsmith participated. It mirrors to some extent the ways in which they do actually use Kaurna amongst themselves. To make this banter and joking intelligible to the listening audience we scripted Buckskin talking in Kaurna with Katrina Power and later Kauwanu Lewis O'Brien, with Goldsmith in the scenario having some knowledge of Kaurna, enough to partially understand and misunderstand what is said. His lack of knowledge and understanding leads him to seek clarification in English. This forces Buckskin to explain to Goldsmith in English about the double meanings in some Kaurna expressions. Consider this segment of the script:

- IB Madlala! Waa Madlala?
- K Yuritina pa!
- JG What? You saying he's got no ears?
- JB Yeh, *yuritina* literally means "no ears" but it also means "deaf".
- JG What?
- JB **Yuritina** does mean "no ears" but it also means "deaf".

[Pappa comes in.]

- L *Madlantarla*, you're finally here.
- IB Nii! Niina marni?
- JG What? You saying he's fat?
- JB Well, *marni* means "fat", but it also means "good". It's our greeting. *Niina marni*? 'Are you good?'
- JG What did you just call us?
- L *Madlantarla*.
- IG What's that? Our name?
- L No! That's your relationship. You are my *madlanta*, my son's son. I'm your *madlala*, your father's father.

Consider the following excerpt where Goldsmith and Buckskin are discussing the validity of learning Kaurna, where they are willing to have a laugh at themselves.

This time Taylor Power-Smith plays the role of being able to partially follow the conversation but responding in English. Code-switching is used as a deliberate strategy in the script to make the conversation intelligible to an English-speaking audience. In this conversation Goldsmith and Buckskin are making a joke at the expense of non-Aboriginal people, but are also laughing at themselves at the same time. The translation of the Kaurna appears in brackets following the utterance. This Kaurna translation is not broadcast, though it will appear in print in the language learning resources to accompany the recordings:

- JB Pinti miyurna wangkanthi "Kaurna warra tirrkanthi yama. Kaurna warra mapa warra. Pinti miyurnarlu Kaurna Warra pintyathi.
 Nganaitya kuma Warra yaku tirrkanthi?
 - (These white fullas say that re-learning Kaurna language is a waste of time. That it's a fabricated language. Why not learn another language?)
- T What? Those whitefellas are saying that re-learning Kaurna is stupid? That Kaurna's a rubbish language? and that whitefullas created it. Why should we learn a foreign language?
- JG Nii! Kuk'ai. Parna pardirna manta wangkanthi. Parna yailtyanthi purrutyi pulyuna miyurna namutanaintyanthi. Parna purrutyi ngathaitya namutanaintyanthi. Tiyati?
 - (Yeh! I am sick of these white maggots talking crap they think all blackfellas are the same. They [whitefellas] all look the same to me anyway!)
- T Yeh! Those white fellas are talking crap. They all look the same to me too.
- JB Wai! Ninthu pinti miyurna muiyu kapanthi.
 (Hey you're racist)
- JG Ngai pintimiyurnapina. Ngathu pinti miyurla ngaityu wardlingka.(I am not racist. I had two whitefellas in my house.)
- T What? Just because you had two whitefellas in your house, doesn't mean you're not racist.
- JB *Purla tulyarla. Purla piipa kaitya.*(Those two were police. They had a search warrant.)
- T Yeh. You had no choice. They had a search warrant.
- JG Puru ngaityu wardli!

(But it's still my house!)

T Oh, you two are stupid. [Laughter.]

2.2 Show #2: Intergenerational transmission

The second radio show proceeded with a similar format: introductions in Kaurna, conversations in Kaurna made accessible by means of code-switching into English, interviews, a language learning segment interspersed with Kaurna songs and announcements.

For the second show the theme of intergenerational transmission came to the fore. Back in 2000 we held a workshop to devise Kaurna expressions for talking with babies and young children. We workshopped and developed a range of expressions for interacting with young children in a range of situations and for a range of purposes (see Amery & Gale, 2000). However no sound recordings were made at that time. The theme of intergenerational transmission was continued for one of the chapters in the learner's guide (Amery & Simpson with KWP, 2007). This time a PowerPoint presentation with embedded sound files was produced. This PowerPoint show contains a range of useful expressions (there are 92 embedded sound files in all), but there are no conversations. It is this gap that we are trying to address through the radio show.

There are now a number of young Kaurna parents who are giving their children Kaurna names and attempting to use Kaurna language with their children. In August-September 2010 when we began working on the radio shows Katrina Power persuaded her daughter, Taylor Power-Smith to get involved. At the time, Taylor had a young baby daughter, Tiyana-Kaye, so it was a perfect opportunity to feature conversation in Kaurna across three generations. For the *Ngartuityangka Wangkanthi* "talking with babies" segment, a conversation was scripted for Taylor, Katrina and Ngarrpadla Alitya (see §1.2) interacting with Taylor's baby Tiyana-Kaye. Here it was possible to naturally introduce a range of very useful expressions for talking with babies. Consider the following:

A Munara parni katinthu! Munara Taapathu!

(Give her here before she goes. I want a kiss first.)

K Munara martathu!

(And I want a cuddle first.)

T Give her a kiss then.

A Ngathu niina mutatha, miitungartu.

(I could eat you up, sleepyhead.)

T You're not eating my little sleepyhead.

A Miitu wanti! Ngathu niina muiyu mankunthi.

(Go to sleep. I love you.)

T Yeh! Goodnight Nanna. We love you too.

[Chatter.]

K Nauwi pikirna?

(How many months?)

T Yarapurla. She's 4 months now.

K Puru ngamingka? Mai mutanthi?

(Is she still on the titty? Is she eating vegetables?)

T Yeh, I'm still feeding her, but she's started solids.

A Tiya pudni?

([Have her] teeth come through yet?)

- T Not yet. But we've got Bonjela on hand.
- K Yeh! Watch out when her teeth do come through.

A Arturtu! Pinyatalya!

(Baby [babytalk]! Dear sweetie!)

Recordings were also made of other young Kaurna parents interacting with their children. These include Jack Kanya Buckskin and his young daughter Mahleah (Kudlyu Kartanya), Jamie Ngungana Goldsmith and his children, and others.

The "talking with babies" segment was further reinforced with interviews with a number of Kaurna parents and grandmothers on the topic of raising their children speaking in Kaurna, and the importance of intergenerational transmission. The language learning segment stressed the use of birth-order names, kinship relationships and naming practices in Kaurna. In this way it was able to follow on naturally from the language learning segment in the previous show, whilst at the same time complement the other segments on intergenerational transmission and talking with babies. Consider the following short segment taken from when Jack Kanya Buckskin unpacks the lesson he has just introduced:

- JB Then I asked Katrina about her relationship to Taylor and her daughter Tiyana-Kaye:
- JB Karlapina. Ngaintya Taylor ninku? Karlapina. What is Taylor to you?
- JB She replied:
- KP *Pa ngaityu tukuparrka.* She's my daughter. *Padlu ngayi ngaityayi tarrkanthi.* She calls me *ngaityayi*.
- JB Waamina Tiyana-Kaye? What about Tiyana-Kaye?
- JB Katrina replied:
- KP *Pa ngaityu kamilya.* She's my granddaughter. *Pa ngaityu tukuparrkaku tukuparrka*. She's my daughter's daughter. *Tiyana Kayerlu ngai kamami tarrkanthi.* Tiyana Kaye calls me *kamami. Taylor ngaityayi tarrkanthi.* Taylor calls me **ngaityayi**
- JB After that I asked Katrina why she was called Karlapina:
- IB Karlapina. Nganaitya niina Karlapina tarrkanthi?
- JB And she replied:
- KP **Ngai karla muyu mankunthi.** I love the fire. **Tudnu karlampi.** I always want fire.

2.3 Aims and outcomes

As mentioned earlier, the main motivation in producing Kaurna radio shows has been to make available audio resources of conversational Kaurna to a wide audience. The intended audience is first and foremost members of the Kaurna community, but we also have within our sights the broader Adelaide population—anyone living in Kaurna country. As a result, a major secondary concern has been to raise awareness in the population at large of the existence of the Kaurna language and its relationship to the people of the Adelaide Plains (who do still exist!) and the land upon which Adelaide became established. The first show therefore delves into history and placenames in the hope of connecting with the audience and the little knowledge they may possess, unbeknown to most, of the Kaurna language.

The language learning segments assume no prior knowledge whatsoever. Listeners are exposed to useful expressions and together with accompanying notes and downloads, are exposed to the writing system and spelling conventions. The downloads and booklet are intended as a resource for Kaurna teaching programs in schools and elsewhere. Likewise, the Gumbaynggir breakfast show presented by Gary Williams and the Noongah language capsules similarly introduce useful expressions in a context which assumes no prior knowledge. Manx Radio airs similar introductory lessons. No doubt there are similar language learning segments aired in numerous minority languages being revived throughout the world.

Whilst propagating a standard form of a language is often a primary concern for broadcasting revived languages (e.g. Hebrew), presenting a good model of pronunciation of Kaurna words is a secondary concern after making the language more readily available. At this stage in the development of the Kaurna language, pronunciation is not always perfect. At times, r-sounds should be rolled when they are not, stress may not always be placed on the first syllable as it should etc. Whilst we strive to present a good model of pronunciation, being overly obsessive and overbearing about it at this stage can interfere with fluency and interrupt the flow and engagement with the material. And it is especially difficult to correct pronunciations in the middle of an interview or monologue that is primarily in English. However, we have, I believe, produced a version of the Kaurna language

which is very close to what it should be and at this point in time, does serve as a model and a point of reference for correct pronunciation. We have also taken some pains to present the original forms of Kaurna placenames which in some cases are very different to the forms that were adopted into English in the nineteenth centruy. Take for example Ngangkiparingga vs Onkaparinga, Ngaltingga vs Aldinga or Maitpangga vs Myponga.

In designing the Kaurna radio shows we appeal to all age groups. The shows themselves involve Kaurna Elders, middle-aged people, youth, children and even babies. Unlike Navajo radio, as reported by Peterson (1997:216), segments were created that talk directly to youth in ways in which they regularly communicate with each other (somewhat similar to the *Haa* program, referred to earlier, broadcast on Māori TV). A range of different song styles are incorporated, including songs sung by children at Kaurna Plains School, recreated "traditional"-style music (*Ngadluko Palti*) and songs about place (*Karrawirraparri* River Torrens).

The process of producing the Kaurna radio shows in and of itself serves to increase knowledge of and proficiency in the Kaurna language. It creates one of the few contexts for use of Kaurna in conversation by bringing some of the most fluent Kaurna speakers together. An unintended and unanticipated positive outcome was the recruitment of a young Kaurna woman and mother, Taylor Power-Smith, to the Kaurna language movement. As Taylor says:

I first got involved when I was tricked into being part of the Kaurna radio shows. I was told I would be needed for a few hours and that was it. I quickly learned that it was a much bigger project than mum explained! [...] After the radio shows, I started doing part-time work for KWP, working with Rob and I love it! Each day I am slowly learning more but I have a long way to go. [...] To hear the language being spoken and to read it is just so cool! I want to learn Language, I want to teach Language, I want my daughter to grow up familiar, if not speaking Kaurna. I want to give other kids the chance to understand and speak their own language. (Taylor Power-Smith in Amery & Simpson, forthcoming: xxviii).

3. Conclusion

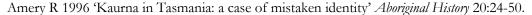
Radio is a valuable and important medium whereby a "sleeping"/"awakening" or "reclaimed" language can be introduced to an English-speaking audience. Radio has the potential to reach a wide audience, and is especially useful, as in the case of Kaurna, where people and learners are dispersed across a wide area and have few opportunities to hear the language spoken. Podcasting via the Internet serves to further increase availability. When accompanied by a CD and print and Internet-based resources, this will further enhance its utility to support programs in schools and elsewhere, and serious learners of Kaurna at home.

One of the main innovations in the design of the Kaurna radio shows is the use of code-switching with English as a deliberate strategy to engage with an English-speaking audience, in contrast to the Navajo case where English borrowing and code-switching is an unintended and perhaps unwanted consequence of speaking Navajo within the medium of radio. The Kaurna shows have also deliberately exploited ambiguity in the Kaurna language to create humour and, as a result, make words and expressions and their meanings memorable.

The radio shows have also been an attractive medium through which to directly engage Kaurna youth in the Kaurna language movement. Being an oral-aural medium which does not depend on literacy skills, some members of the community who have had limited education opportunities are more willing to engage with this medium. Certainly, radio taps into an entirely different set of skills to those needed in the classroom or language workshop.

With more than 130 Aboriginal radio stations around the nation, including a number in urban areas and "settled" Australia, combined with the ready availability of the web, radio offers a powerful medium for increasing public exposure of languages under revival right across the country. KWP has just received additional Commonwealth funding to continue producing Kaurna radio and Youtube clips over the next triennium.

References



- ——— 2000 Warrabarna Kaurna! Reclaiming an Australian Language Lisse: Swets & Zeitlinger.
- & A Rigney with N Varcoe, C Schultz and Kaurna Warra Pintyandi 2006 Kaurna Palti Wonga Kaurna Funeral Protocols (book, CD & sympathy cards) Adelaide: Kaurna Warra Pintyandi.
- & J Simpson with T Wanganeen, V Buckskin, J Goldsmith & Kaurna Warra Pintyandi 2007 Kulluru Marni Ngattaitya Sounds Good to Me. A Kaurna Learner's Guide. Draft Prototype Version (book, CD of PowerPoint presentations with embedded sound files) Adelaide: Kaurna Warra Pintyandi.
- & J Simpson with T Wanganeen, V Buckskin, J Goldsmith & Kaurna Warra Pintyandi forthcoming *Kulluru Marni Ngattaitya Sounds Good to Me. A Kaurna Learner's Guide* (book, CD of PowerPoint presentations with embedded sound files) Kent Town: Wakefield Press
- Bennett R 2003 'Saving a language with computers, tape recorders, and radio' in J Reyhner, O Trujillo, RL Carrasco & L Lockard (eds) *Nurturing Native Languages* Flagstaff: Northern Arizona University. Pp. 59-77.
- Cotter C 2001 'Continuity and vitality: Expanding domains through Irish-language radio' in L Hinton & K Hale (eds) *The Green Book of Language Revitalization in Practice* San Diego: Academic Press. Pp. 301-311.
- Gaimard M 1833 'Vocabulaire de la langue des habitans du Golfe Saint-Vincent' in MJ Dumont D'Urville *Voyage de découvertes de L'Astrolabe 1826-1827-1828-1829: Philologie* Paris: Ministère de la marine.
- Gale M 2012 Summary. TAFE Certificate III Learning an Endangered Aboriginal Language. Kaurna language. University of Adelaide 10–14 April & 25 April 2012.
- Jacob W 1837 Journal entry of 17th January 1837 Unpublished manuscript Adelaide: Mortlock Library. Referred to in Amery (1998).
- McElvenny J 2008 Mobile phone dictionaries, blogpost, Endangered Languages and Cultures blog, posted 17 July 2008. http://www.paradisec.org.au/blog/2008/07/mobile-phone-dictionaries/
- Ngarrindjeri, Narrunga and Kaurna Languages Project 1990 Narrunga, Kaurna & Ngarrindjeri Songs (Songbook and tape) Collaborative production by K Gale, J Agius, R Amery, C Schultz, L Newton, NG Varcoe & C Crothers.
- Ninno A 1999 Radios in the classroom: Curriculum integration and communication skills. Report # EDO-IR-99-03. Access #ED 426693. Washington, DC: ERCI Digest. Pp. 1-4.
- Peterson LC 1997 'Tuning in to Navajo: The role of radio in native language maintenance' in J Reyner (ed) *Teaching Indigenous Languages* Flagstaff: Centre for Excellence in Education. Pp. 214-221.

- Plomley NJB 1987 Weep in Silence: A History of the Flinders Island Aboriginal Settlement Hobart: Blubber Head Press.
- Robinson GA n.d. Papers held in Mitchell Library, Sydney. A7085(6). Rpt. Amery (1996).
- Schultz C, NG Varcoe & R Amery 1999 *Kaurna Paltinna: A Kaurna Songbook* (with accompanying CD). Elizabeth: Kaurna Plains School. (Reprinted 2004.)
- Te Māngai Pāho, 2011 Te Māngai Pāho Statement of Intent 2011–2016 Tauākī Whakamaunga Atu. Te Māngai Pāho Māori Broadcasting Funding Agency. Download from http://www.tmp.govt.nz/about.html
- te Ua, HR n.d. A brief history of Māori radio broadcasting. http://www.irirangi.net/rooputautoko/history/whakaaro-ake.aspx
- Walters H 2005 11 questions for Joseph Orozco *North Coast Journal* 15 Dec. 2005. http://www.northcoastjournal.com/121505/QA1215.html
- Watkins C & M Gale 2006 Kaurna Alphabet Book with an Introduction to the Kaurna Language (with accompanying CD Elizabeth: Kaurna Plains School.
- Zuckermann G 2003 Language Contact and Lexical Enrichment in Israeli Hebrew London-New York: Palgrave Macmillan.

Sad stories

A preliminary study of NAPLAN practice texts analysing students' second language linguistic resources and the effects of these on their written narratives

Denise Angelo

Language Perspectives
Far North Queensland Indigenous Schooling Support Unit
Indigenous Education and Training Futures
Department of Education and Training, Queensland
denise.angelo@dete.qld.gov.au

Abstract. This paper analyses practice texts produced by Indigenous students who are first language (L1) speakers of the local variety of Torres Strait Creole, and second language (L2) learners of Standard Australian English (SAE). Writing such texts served as preparation for the writing component of the National Assessment Program - Literacy and Numeracy (NAPLAN). These students had been exposed to classroom instruction on the schematic discourse organisation of the preannounced test genre, a narrative, and had been given repeated practice of writing this genre under NAPLAN-like conditions. Analysis of their texts reveals that they attempt to implement this classroom instruction, but their levels of L2 proficiency impact greatly on the texts they generate. Their writing displays a wide range of non-target language features, which suggest that teaching approaches would need to include explicit instruction of SAE. This preliminary study raises issues for further investigation around the narrowed or even hidden curriculum for L2 learners of SAE in a high stakes testing environment.

Keywords. NAPLAN, ESL, Indigenous, writing, assessment

ANU Research Repository – http://hdl.handle.net/1885/9404

Proceedings of the 42nd Australian Linguistic Society Conference – 2011

1. Introduction¹

1.1 Overview

This paper presents the findings from a preliminary study of a class-set of practice narratives produced by Indigenous second language (L2) learners of Standard Australian English (SAE) in a remote school setting. Students wrote these texts under conditions similar to those imposed during National Assessment Program – Literacy and Numeracy (NAPLAN) tests, as part of ongoing in-class practice sessions preparing students for the writing component in the actual test. Students had been taught the schematic discourse organisation of the narrative genre, the text-type all students were to attempt in the NAPLAN writing task. Classroom instruction was not informed by a curriculum which explicitly includes English as a Foreign Language or as a Second Language (EFL/ESL) methodology.

The analysis that follows shows that students are displaying many and overt non-target language features in their writing. Students' practice narratives reveal that they have internalised aspects of their exposure to the schematic discourse organisation of narratives from their classroom learning, but that their written language production is limited—to varying degrees—by their L2 proficiency. These students' written narratives could not reasonably be expected to improve easily or greatly through repeated practice of the test genre, but they would benefit from targeted language teaching.

1.2 Background to NAPLAN and Indigenous EFL/ESL learners

NAPLAN is the annual national standardised testing regime in which year 3, 5, 7 and 9 school students across all Australian states and territories, in all regions (urban, rural and remote) and from all education sectors (state, catholic and independent) have participated since 2008. Student performance is assessed in separate reading, writing and numeracy papers in English. Students can be exempted from sitting NAPLAN tests, and for EFL/ESL learners this exemption

¹ This paper is based on a section of a presentation co-delivered with my colleague Renae O'Hanlon, at the 2011 ALS Conference. The section drew on a protocol for analysing syntactic features of sentential complexity developed by the author, a resource also utilised in an unpublished 2009 research report co-authored with my then colleague, Nina Carter, and produced for the Far North Queensland Indigenous Schooling Support Unit. The author would also like to thank Dr David P. Wilkins for his comments on earlier drafts of this paper. Any errors, omissions or other failings are, of course, exclusively attributable to the author.

is couched in terms of length of residence in Australia: "Students with a language background other than English who arrived from overseas less than a year before the tests should have the opportunity to be treated as exempt from testing" (Queensland Studies Authority, 2010a:10; bolded text in original). Indigenous EFL/ESL learners are thus excluded from such an exemption and participate in NAPLAN tests regardless of their level of L2 proficiency in SAE.

The only opportunity for registering that an Indigenous student *might* be an L2 learner of SAE is via the Language Background Other Than English (LBOTE) category on the NAPLAN test booklet cover. LBOTE is, at best, only an indirect indication of the possibility that a student may be an L2 learner of SAE, as the category is defined for NAPLAN purposes as "if the student or father/guardian1 or mother/guardian2 speaks a language other than English at home" (Masters *et al.* 2008:24). Students who are fluent bilinguals, proficient SAE speakers and even L1 speakers could be categorised as LBOTE. This renders disaggregating reliable NAPLAN data about Indigenous EFL/ESL learners problematic.

Indigenous students' NAPLAN performances have caused considerable media comment and government attention, as well as extensive reactions on the part of education authorities. For instance, Simpson, Caffery & McConvell (2009) provide extensive documentation about the contribution of the first NAPLAN result report to the stance taken against bilingual education in the Northern Territory (2009:26-34). McIntosh, O'Hanlon & Angelo (2012) describe how broad educational discourses such as literacy have largely obscured the role of language in education documentation. They note how no outputs of the National Indigenous Reform Agenda (or Closing the Gap) for halving the gap between Indigenous and non-Indigenous students' literacy and numeracy scores on NAPLAN refer to English language proficiencies or ESL learning needs (2012:454). It is argued that this *language invisibility* is doubly disadvantageous for Indigenous ESL learners who have a contact language variety as their L1, as their LBOTE may go unrecognised and their ESL status and L2 learning needs may be hidden. The need for more accurate language data (i.e. LBOTE and ESL proficiency) is emphasised, so that Indigenous students' performance data can be better understood. (2012:462)

To date, however, little academic research has been published specifically on Indigenous EFL/ESL learners from remote contexts and their performance in NAPLAN, with the exception of Wigglesworth, Simpson & Loakes (2011). These authors evaluate the reading comprehension and language conventions components of NAPLAN practice test papers for their impact on Aboriginal students in remote communities who speak Kriol/Aboriginal English as their L1 and are learning SAE in EFL contexts. Their close analysis of practice test papers provides evidence of cultural bias in NAPLAN reading comprehension passages, as well as some unwarranted conflation of literacy knowledge (e.g. spelling patterns) with L1-like language competence (e.g. inflectional morphemes) in NAPLAN language conventions sections. A number of recommendations are made, including the need for a curriculum "for teaching Indigenous students using EFL/ESL methods" (2011:341).

In this paper, the focus is on student-generated responses (in practice contexts) to the writing component of NAPLAN. Student texts are examined for what they reveal both about students' uptake of classroom instruction on the narrative genre as well as about the effect of students' L2 proficiency on their narrative writing. As such, it provides preliminary evidence supporting the need for targeted language teaching, such as a curriculum with EFL/ESL methodology. It also gives initial findings demonstrating how better L2 proficiency data would be useful for identifying teaching approaches suited to students with different levels of L2 proficiency. This paper also introduces speakers of another contact language variety, Torres Strait Creole, into the foregoing discussions of Indigenous EFL/ESL students and NAPLAN performance data.

2. Data

The study is based on a sample of 13 practice texts which were collected by a classroom teacher for the purpose of seeking assistance to improve student performance in the writing component of the upcoming NAPLAN test. The teacher considered them as typical examples of students' attempts at narratives at that time. The sample was produced by all the students present in a composite year 4-5 class under NAPLAN-like conditions. Students were allotted 5 minutes for planning, 30 minutes for writing and a further 5 minutes for editing (QSA 2010b). The teacher had been following common advice to give students repeated

opportunities to practise writing narratives to improve student performance in NAPLAN.

The students all share a common language background. They are all first language speakers of the local variety of Torres Strait Creole, also known as Broken (Shnukal 1988) and Yumplatok (Ober 1999), different dialects of which have been described for the Torres Strait and northern Cape York area (e.g. Crowley & Rigsby 1979; Sandefur 1990; Turner 1997).

Students are all L2 learners of (Standard Australian) English (SAE) which is used as the language of instruction in the classroom. Students' texts display varying degrees of written proficiency in this language, but this observation cannot be correlated to school-based L2 proficiency data, as this was not being assessed or regularly monitored. The language learning context of these students would be best categorised as English as a Foreign Language (EFL): they live in a remote location where they would generally not use SAE outside of the classroom. They would probably not use SAE much in class either, given that they all speak their common L1 fully fluently, whilst their English proficiency levels appear to vary widely, with most none too advanced.

3. Method

Students' texts were typed and thoroughly de-identified, by removing not only the writers' own names, but also any character names and place references. Texts were assigned an identification code, consisting of the prefix B (boy) or G (girl) to indicate gender of student where known and then a numeral. One text was unnamed and was assigned an X.

In the typing process, student errors and their own edits (such as crossing out) were retained. Original letters or words that had been erased, crossed out or overwritten were included, as long as this information could be resuscitated. A series of typing conventions was used to annotate the typed texts to maintain features of the students' writing, indicating for instance illegible, ambiguous, overwritten or erased items.

The typed texts were first subjected to a close reading process, and initial observations were recorded on features that seemed of general interest. The texts

were also assessed in terms of whether they could score above zero on none, just some, or on a reasonable number of the NAPLAN assessable criteria for narrative writing. This information was correlated with text length.

The typed texts were organised according to their length (i.e. word count). The planning section was not included in this word count. In all but one case, it was easy to distinguish students' planning from their main text as they employed the component structuring elements of narratives (i.e. introduction, problem, solution, conclusion) to structure their plans. In addition, many plans were also separated spatially from the main text, often by a line.

Next, an in-depth analysis of non-target features was conducted on one text (X) for the purposes of description and categorisation. Once descriptions of each non-target feature had been undertaken, these were organised into the macrocategory of either "language" or "literacy", and then further distributed amongst subtypes. In the case of features in the language macro-category, they were also grouped according to whether they operated at the word level, clause internally or across clauses. All texts were then analysed according to these categories.

Finally, an analysis of syntactic features associated with sentential complexity was conducted on the two longest texts (G3 and X), using a protocol adapted and developed from Craig & Washington (2006) by the author in Angelo & Carter (2009). The texts were coded and scored for instances of the syntactic features on the protocol, which created a profile of syntactic features for the two texts so these could be compared and correlated with other L2 features examined.

4. Initial observations of texts

4.1 Planning

All the students except for one completed a recognisable "plan" for their writing (see Table 1 below for a summary of features), thereby demonstrating at the very least their recognition of this stage in a NAPLAN writing test. Their plans were usually placed separately from the main text, sometimes divided off via a line. 4 students indicated that it was a 5 minute plan via a heading, "Plan 5 minutes" or

"5 min Plan:", again identifying planning as a separate element of the writing assessment with its own time allocation of a specific duration.

Of the 12 students who wrote plans, all bar one labelled the components of their plan with the words: "introduction", "problem", "solution", "conclusion", or with abbreviations such as "Introd", "Prob" etc., or the initials I, P, S, C. None of this "labelling" was exactly the same across the cohort. It included various spellings: "concussion" and "Conclution", and different punctuation choices between the label and the following writing: C), c, C, C | etc. The variation across the cohort indicates that students were not copying from one source, such as a plan written on the whiteboard by the teacher. Rather, they had been taught to use the schematic structure of a narrative during their planning time (under NAPLAN-like conditions) and they were reproducing this instruction to the best of their abilities.

Student ID	G3	X	G2	B6	B1	B7	B5	G1	B4	В3	В9	B8	B2
Written plan	yes	-	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes
Note of time	Plan 5 minutes		5 Min Plan:				5 Min Plan	5 min Plan					
Labels used in planning	Introduction: -Problem: Solution: concussion:	-	Intro: Problem: Solution: Conclution:	P S C		i a s c	Intro- Prom Solution conclusion	Intro - Pro - solution - conclusion	l) P) S C)	-		Introd P S	l P
Links to main text	2 out of 4 points	-	3 out of 4 points	yes	no	yes	just 1 name (of many)	yes	no (or 1 of 4?)	no	yes	no text at all	no text at all

Table 1. Summary of features in students' plans.

As shown in Table 1 above, about half the practice texts which contained both a plan and a main text had few or no links between these two text elements. They displayed little or no connection in terms of content, or in terms of the generally accepted relationship between a plan (i.e. a brief summary) and the text (i.e. an elaborated version of the plan). So characters and settings, plot devices and conclusions mentioned by students at the planning stage were often not reflected in their main texts. Instead, a couple of the main texts functioned as a

continuation of (some of) the story elements outlined in the plan, a couple diverged in a number of the details and a couple bore little or no resemblance. In those cases where their plans did operate as a summary or overview, students were displaying, at the very least, an understanding of the relationship of a plan to its main text. Those students whose plans did not reflect this relationship between plan and text were, at the very least, demonstrating an understanding that a separate text was required at this juncture in the NAPLAN test practice.

4.2 Main text

As can be seen in Table 2 below, no text was assigned a title, although two texts had a kind of heading. One, G3, referred to the theme and included this word in the heading: "Theme: Adventure", whilst the other, G2, referred to the task and a period of time: "25 min write story:". (The allotted time is actually 30 minutes.) The author was surprised by the absence of titles on these texts, as they are—in the author's experience as a classroom teacher and ESL advisor—a feature of classroom narrative texts ("stories") which students commonly replicate even in early stages of literacy learning or at beginning ESL levels.

2 of the 13 practice texts did not contain a recognisable main text. One student had only written a plan; the other student's plan morphed into the main text. Most texts only consisted of several sentences. In 5 pieces of writing the word count of the planning exceeded the main body of text, as if the students had expended all their effort on the planning, or as if the contained nature of the planning scaffolded it to become more "do-able" than the prospect of writing the main text. Thus, over half the practice texts raise the question of whether students did understand that the purpose of a plan was a short overview to organise their thoughts for writings the ensuing main text, or whether they were more generally unable to fill up a main text structure.

Most of the main texts have no paragraphs and are composed of a block of text (see Table 2). Only 2 students organised their texts into paragraphs: B5 with 2 paragraphs (comprising a single introductory sentence, written separately from the remaining text), G3 with 4. The layout of the main texts did not correspond to the planning, even in terms of visible organisation: The planned "introduction" item did not become an opening paragraph; the planned "conclusion" did not form the closing paragraph. The schematic structure that had been taught to students and

had been reproduced by most students in their planning does not appear to have greatly assisted students to organise their main writing efforts.

Student ID	G3	X	G2	В6	B1	B7	B5	G1	B4	В3	В9	B8	B2
Title or Heading	Theme: Adventure		25 min write story										
Plan word count	37	-	22	21	29	41	30	25	52	31	24	39	60
Text word count	353	147	80	78	75	60	58	53	42	28	18	-	-
Para- graphs	4	0	0	0	0	0	2	0	0	0	0		-
Problem	caught trespassing in jungle	ship wreck	(in plan) very cold house	lost with bad guy	?	lost man?	(in plan) problem at school	bored & sick	sniper	-	bug can't fly	(in plan) giant snowball	?
Solution &/or ending	set free	mend boat	(in plan) get wood & make fire	ran to a house	?	caught & cooked fish for lady	(in plan) went for ride	went over mountains	safe place	-	butterfly teaches it	(in plan) city struck	(in plan) speared & died
Topic	jungle adventure	Capt. Cook	cold house	lost boy & dog	the day	lost man	fishing & home	adventure	sniper	play	bug	disaster	Capt. Cook
Oversize formulae			That's The END OF The StORY Bye-Bye				4 Ever and 4 Life Bye-	The End That all Fokes Good Bye					

Table 2. Summary of features in students' main texts.

Mostly students' use of the schematic labels "introduction", "problem", "solution" and "conclusion" in their planning failed to be worked into their main text layout. In addition, students' main texts often do not represent the kind of content associated with these generic narrative stages (apart from G3). For example, at the start of their texts, characters and setting are not really introduced. The notion of a "problem"—where it is discernible—is understood mostly in the everyday sense of "problem", not as the narrative element which drives the plot. For example, G2's stated problem "He lived in the Coldest house", is followed by the planned solution "with putting sticks to make some fire". A cold house is admittedly a problem of significant proportions for a child used to a tropical climate, but this is a concrete problem, not typical of the kind of complication required by schematic structure to motivate a narrative. Similarly, B5 states overtly "We had problem at school with NAME2 and NAME3", for which the solution was: "we ride with the car and bus". Students' texts demonstrate that they had learned the metalanguage for schematic structure and also applied these to the

best of their abilities, but most do not have the conceptual understandings underpinning them.

The themes of students' texts covered a broad range of topics. 4 students wrote about an adventure set in environs markedly dissimilar from their own, with a couple of these focusing on lost people. 3 students wrote about everyday life (what I did on Friday, playing with friends, going home after a trip out to the reef). 2 students wrote texts with a character called Captain Cook and an event adapted from the life of the historical figure: a shipwreck in one, his murder in the other. 2 seemed to be related to disaster-movies (or perhaps video-games): a snowball hitting a city and a sniper attack. Finally, in categories of their own, there was a text about a bug going for a walk (perhaps cartoon- or movie-inspired), and another text about living in a very cold house.

In the context of Indigenous education in Australia, schemas (representations of experience) and genres (communicative purposes) associated with the cultural and social inheritance of Aboriginal students in southern Western Australia have been identified (e.g. Sharifian, Rouchecouste & Malcolm 2004; Malcolm 2001). No similar studies of Torres Strait Islander students' spoken and/or written texts have been undertaken. Whilst it is not inconceivable that the texts analysed here are influenced by students' socio-cultural background in some way, there is little evidence in this preliminary study of their following any particular culturally specific "frames", including that of topic selection. Indeed, it could be argued that most of the students from this class appear to have drawn for their writing topics on contemporary material beyond what might be termed their socio-cultural "inheritance", from sources in their lived and shared experiences of modern culture, including popular culture or "classroom culture". Thus, Captain Cook was a recently studied topic in the classroom, and elements of the historical figure's life such as adventure, ship-wreck and murder on the high seas were appropriated by the 2 different students in very different manners. Many topic elements included in the other "stories" also seem to be precisely not representative of typical (ie. community-based) culture and life. Of the 3 texts that do refer to everyday life, 2 do so in a way that is not culturally specific (see B1 and B3 below). A single text is to some extent regional (i.e. coastal) as it refers to reeffishing and local (i.e. place-based) in that it includes a local term. In summary, then, it seems reasonable to assume that students' classroom learning experiences

of narratives for the purposes of NAPLAN practice tests could perhaps have driven out home culture schemas and genres, as these are not clearly evident in this sample.

In this study, the practice narratives are analysed from the point of view of revealing how students' less than fluent L2 is reflected in their attempts at the taught target genre. Just as their low L2 proficiency is a dominant factor in their written expression of their practice NAPLAN narratives, this "L2 language factor" would just as surely permeate any underlying, socio-cultural narrative "frames" attempted through written SAE. This is a significant point of difference from the Western Australian work cited above which is based exclusively on L1 texts—mostly oral—of L1 speakers of Aboriginal English, "an ethnolect of English" (Sharifian *et al.*, 2004:204). In contrast, the current study examines written L2 output, in the form of a taught school genre in SAE, produced by L1 speakers of Torres Strait Creole. The lens of early L2 proficiency is thus clearly pertinent here.

Returning to the relationship between students' L2 proficiency and their practice NAPLAN texts, some of the topics of these students' texts are reminiscent of the simple, formulaic texts about aspects of everyday life (friends, home, recreational activities etc.) produced in classroom contexts by many ESL students, including Aboriginal and Torres Strait Islander children, with lower levels of English proficiency. Hence, written L2 output of early ESL learners characteristically contains "personally significant events and people" (Education Queensland, 2008:7 and see similar descriptions in other ESL scales such as McKay et al. 1994, 2007; National Association for Language Development in the Curriculum 2009; Ministry of Education, Ontario 2012). To the extent that such texts draw on students' everyday lives, such topics may be said to reflect students' socio-cultural backgrounds, but they are arguably equally as much an expression of students' language and literacy limits in their L2.

4.3 Oversize formulae

4 students added oversize formulae below the main text of their story (see Table 2 above). These are somewhat reminiscent in style of popular graffiti, and some include "love-hearts" and "kisses". Some also have references to popular culture. For example, G2 wrote in very large print, the following expressions, one under

the other: "The End", "That all Fokes" and "Good Bye". B5 filled the remainder of his page with "The End", "4 Ever and 4 Life", "Bye-Bye-Bye X" (X indicating a kiss). The use of these formulae in this writing context is interesting on several fronts. 3 of the 4 uses of oversize formulae appear on relatively short texts, so the brevity of these students' narratives is probably therefore not due solely to a lack of time. Their use with the shorter texts could also function to fill blank space, especially if students had thought there was an ideal size for the text, such as a page's worth.

These oversize formulae also reflect students' experience of written texts or narratives in "popular culture". For Aboriginal and Torres Strait Islander students in remote contexts, writing in the fashion of the classroom is not at all common outside school. However, one kind of writing generated by children or teenagers in the community takes the form of formulaic graffiti. Phrases such as "4 Ever and 4 Life" recall community graffiti that include selected family members, friends or true-loves, as do the "love-hearts" and "kisses". "The End" could double as a reference to students' own marking of the finish of a narrative (perhaps derived from local cultural or peer usage) and to endings of narratives in the media: "Thats all Fokes" is clearly derived from the closing remarks of Porky Pig and Bugs Bunny in their cartoon shows.

5. Analyses and discussion

5.1 Word count and NAPLAN features

There is a large variation in length across these practice NAPLAN texts. The longest text, G3, consists of 353 words or about 1.5 pages of handwriting. All the other texts are relatively short. The next longest text, by X, is less than half the length of G3's and makes up just 0.5 page of handwriting. The shortest main text, B9, has just 18 words. The texts with 0 word count (B8, B2) have plans of some length, but as students indicate through various devices that these are plans, they are excluded as main texts, following NAPLAN protocols: during the NAPLAN writing test, students do their planning on a separate sheet of paper and are not allowed to write in their test booklets, so their planning cannot contribute to the

main narrative text. Students are allowed up to 3 pages in a lined, A4 test booklet for their narrative writing (QSA 2010b:14).

Student ID	G3	X	G2	В6	B1	B7	B5	G1	B4	В3	B9	B8	B2
planning word count	37	0	22	21	29	41	30	25	52	31	24	39	60
main text word count	353	147	80	78	75	60	58	53	42	28	18	0	0
NAPLAN narrative elements	reasonable number	some						no	ne				

Table 3. Word counts of plans and main texts and estimate NAPLAN narrative elements with a score.

The shorter texts give the distinct impression that their young writers have limited English language resources to bring to the task (see, for example, the full text of B3 with a total of 28 words, and B1 with 75 words below). This observation is based on the many L2 learner features evident in these texts, such as limited and repeated vocabulary, difficulties structuring simple sentences, numerous non-target features and a pronounced lack of fluency: B3 wrote at an average rate of about 1 word a minute. In some texts, there is a sense that students "peter out" after producing their plan, as suggested by how B8 and B2 produced extended plans but no main text. As the main texts become longer, the comparative length of the planning tends to decrease. With the exception of G3, however, all the texts lack fluency and convey a sense that students struggled to write them.

With regard to the quantity of text produced, there is little evidence that students' writing has benefited either from prior practice or from teaching strategies applied. Most texts produced by this cohort are not long. The NAPLAN test provides 3 sheets of A3 paper, but apart from G3 (over 1 page), and X (half a page), all students produced under half a page of writing, most well under. Classroom teaching of the narrative genre instructed students in how to order specific kinds of information in order to produce a narrative structure, as in the "introduction", "problem", "solution" and "conclusion" referred to in students' plans (§4.1 above). Such instruction has apparently not supported most students in this cohort to produce any considerable amount of writing, presumably because it is a strategy aimed at shaping pre-existing language resources. Similarly, practice

writing would hopefully provide students with opportunities to learn how best to apply their pre-existing language and literacy resources to writing a narrative within a given time limit. Practice, as a teaching strategy, does not add to students' L2 resources, although it would aim to increase the efficiency of students' accessing their existing language resources under the pressure of a test situation.

As shown in Table 3 above, students' main texts fall into 3 groupings according to their length: (relatively) long (353 words), medium (42 to 147 words) and short (0 to 28 words). Other characteristics of students' writing are associated with these groupings, such as their ability to narrate (in English) and their likelihood to score on NAPLAN assessment criteria, reproduced below in Table 4. An example of a long (G3), medium (B1) and short (B3) text is reproduced below, with the following typing and transcription conventions:

- Generic terms 'NAME1' and 'PLACE1' replace names of people and places respectively. Mentions of the same person or place use the same number. Additional people and places are assigned different and higher numbers.
- Superscript indicates letters or words which were overwritten by the student.
- Struck-through items 'xxxx' were crossed out by the student (but still visible).
- A bracketed question mark '(?)' attached to a preceding word indicates the transcriber's uncertainty about that item.
- A question mark standing alone '?' indicates uncertainty so great that a form could not be even tentatively assigned.
- Material inside square brackets '[xx]' was inserted in smaller writing by the student, perhaps as an afterthought or as part of the later editing process.
- Asterisk '*' indicates a fresh line started but spacing does not indicate a new paragraph.
- Bolded text indicates dramatically oversized writing by the student.

The longest text (G3) is grouped separately from all the others (appears below, p.42). Not only is G3's text much longer, it differs significantly in terms of its structure and its "expressiveness". It attempts the taught schematic structure, is organised into 4 distinct paragraphs, and contains elaborated ideas. Unlike the other student-generated texts in this data set, G3's text does not require the

transcriber to formulate an interpretation. There is sufficient target-like linguistic material rendered through reasonably accurate literacy for English speaking readers to comprehend—for the most part—this student's intended meaning (transcript on follwing page).

Unlike the other students, G3 wrote a jaunty commentary about accomplishing her test strategy, followed by a remark about her consequent tiredness. Such playful self-congratulation smacks of a student who experiences a degree of success with test practice narratives, or written tasks more generally. This self-talk was not counted in the word count.

The texts of medium length all consist of a single block of text, apart from B5 with a single, separate introductory sentence. The ideas in these texts are sequenced, but not elaborated upon. Their plots are recounted simply, as a series of events. Occasional use of expanded noun groups is evident, although not in all the texts in this grouping. The example text from B1 here falls in the middle of the medium length texts.

Student text B1	Transcriber interpretation
my samig and lent lench I it samig. and I play with NAME1 I play and. play and play for a lota and I went. house dinner for dinner aBert I have my. Berth and chaj and I it. in and in the monig I went to play with. NAME1 I went to my Mam and. Wier went to pncence with smol.	Friday I go to school. Big lunch I eat My sandwich and little(?) lunch I eat sandwich And I play with NAME1, I play and play and play for a lot and I went house for dinner but (?) I have my bath and change and I eat. And in the morning I went to play with NAME1. I went to my Mum and We went to (?) with small PLACE and we went to homes.

Student text G3

Theme: Adventure

One [one] day two beautiful girls were borned, one was NAME1 and the other was NAME2. There father was a explorer and had a Record for climbing the biggest mountain. at As NAME1 and NAME2 grew up they were als always interested in there fathers work and how he had moved from places to places.

* One day NAME2 said to NAME1 each other "why don't we go on an Adventure to... uh uh a jungle, were there are all kinds of animals lives?" NAME2 looked worried she su argreed with NAME1 and they smiled happylier than ever.

So on a Sunny day they took there camping gear and set off leavi leaving there home behind. While NAME2 walked to a bus to hire, NAME1 looked at the jungle way beyond the Roads ahead thinking what might happen. As the journey began they looked out the window and stop the car. NAME2 got out and said "This is the place let go". They started walking in deep into the jungle. [After] they go caught in the middle of some quick sand and started screaming. As the looked around the saw some people walking toward them...... they knock NAME2 and NAME1 and hanged them by there hands and waited for them to get up!

After a hour the two girls got up and looked around they saw there camping things in a corner and there was a man, he introduce himself and the girls said "hey you guys we don't know whats going on here": they said "you two are trespassing through our land and we don't like it,." NAME1 said okay we will leave and the people let go of the girls and took there stuff and went back Ran back to there car and headed back to there home.

When they got Back home they looked Relief they got out of that mess. They walk Back home put there things back to the Room and went to a shop for something to eat and talk about what happened.

THE END!

I did my plan
I finished my story
And I just conqued my editing.

I Tired now!

The shortest main texts (B9, B3) both contain just 2-3 (putative) sentences. The sentence count is based entirely on syntactic criteria for B9, as the student did not indicate sentence boundaries with standard punctuation marking. Both texts contain too little written material to allow for the expression of elaborated or sequenced ideas. B3 is provided as a sample of these short texts here.

Student text B3	Transcriber interpretation		
my and NAME1 is playing at my house with my dog. And NAME1 want to house.thmrdaymaning my and NAME1 SURNAME1 want to play with the dog	me and NAME1 is playing at my house with my dog. And NAME1 went to house. thursday(?) morning me and NAME1 SURNAME1 went to play with the dog		

The length of these texts is associated with the ability to score on assessable NAPLAN criteria (Table 4). This is an unsurprising observation, given that the texts consisting of very little material have correspondingly little or no opportunity of representing the narrative elements on which the criteria are based.

Range of score points
0-6
0-4
0-5
0-4
0-5
0-4
0-2
0-6
0-5
0-6

Table 4. NAPLAN assessable criteria for narrative writing with available score points source NAPLAN (QSA 2010a:4).

In a similar vein, the texts of medium length contain enough written matter to stand some chance of gaining recognition for scoring on some of the assessable criteria. The longest text, however, includes material beyond the simple recounting of events which characterises the medium length texts: some character development, connected events and extended ideas—not just the bare events—so there is a much greater likelihood of the text scoring on a reasonable number of the narrative criteria. For example, the student attempted to motivate her characters' adventure by introducing information about their explorer father and their longstanding interest in the places he had lived (G3, §1). With this "extra" material, G3's text could score points in various assessable criteria, such as audience engagement, text structure, ideas, character and setting, vocabulary and cohesion.

Although a correlation between the length of these narratives, their impact and their ability to meet assessable NAPLAN criteria might appear "commonsense", it is at best a superficial analysis. The length of these texts, their ability to engage and communicate and their possible test scores are obviously symptomatic of an underlying cause: these students lack proficiency in SAE. They are L2 learners of SAE in an EFL context, who are still in the process of learning SAE. The following analyses of non-target language features and of syntactic features indicative of sentential complexity provide evidence of their L2 learner status.

5.2 Non-target language features

An initial description captured each of the non-target features, or "errors", and described them. It was found that these features belonged to two macrocategories: "literacy" and "language". Non-target features were categorised as "literacy" if they would normally be addressed through general classroom literacy lessons, such as spelling, punctuation and (optional) stylistic choices. Other features, consisting of various obligatory morpho-syntactic and lexico-semantic elements, were categorised as "language". Non-target language features are indicative of the L2 learning status of these students, as they would not be expected of L1—or highly proficient—speakers of SAE. Language "errors" could be addressed through explicit (e.g. EFL/ESL-informed) "language teaching", but would not be in the scope of generalist "literacy teaching".

After thoroughly categorising all non-target features, the non-target language features were tallied for all texts. Rates of occurrence were calculated as a percentage of the total word count. The results in Table 5 below clearly show that students are producing non-target language features typical of L2 learners, at rates of between 7% to 37%.

lang	non-target uage features	G3	X	G2	B6	B1	B7	B5	G1	B4	B3	B9
level	Verb inflection	8	12	0	4	2	3	2	0	0	0	2
2	Noun inflection	1	7	1	0	1	0	2	1	1	0	0
internal el wo	Meaning of word	0	9	0	2	2	1	2	0	2	0	0
	Verb group	2	5	4	0	0	2	0	1	3	1	0
clause vord lev	Noun group	5	9	2	2	2	3	0	0	0	0	0
above w	Adverbials	3	3	0	1	5	1	5	0	1	0	0
ap	Meaning of clause	2	2	2	2	0	1	0	1	1	0	1
across	Pronouns/ cohesion	1	3	1	0	0	1	4	1	2	3	0
acr	Clause connection	2	5	2	1	1	3	1	0	1	0	0
fe	Total eatures/words	24/353	55/147	12/80	12/78	13/75	15/60	16/58	4/53	11/42	4/28	3/18
	Rate:	7%	37%	15%	15%	17%	25%	28%	8%	26%	14%	17%

Table 5. Non-target language features across all main texts produced.

Further comparison of these non-target language features and/or rates was not pursued with all texts for a number of reasons: a) Some of the shorter and clearly less fluent texts consist of relatively correct, but formulaic language, skewing the analysis; b) some of the texts have passages of (severely) disrupted meaning which are very difficult to analyse in this manner, due to uncertainty around word meanings, phrases, clause boundaries etc.; c) some non-target language features cause more significant problems for readers than others, but this analysis was not able to represent this factor.

With these caveats in mind, the 2 longest texts (G3, X) are examined here (Table 6 below), to highlight some of their obvious L2 features as well as to compare and contrast linguistic differences between the writing of each student (other than word count). These texts have been selected because they contain by far the most

language and in that sense are the most successful. They also might be reasonably expected to exhibit the most uptake from their classroom learning and be useful for illustrative purposes.

G3 has fewer non-target language features overall, and displays a lower rate of 7%; X writes with more non-target language features, and a rate of 37%, many times higher. The production of non-target language shows that both students encountered linguistic difficulties as they wrote their narratives in their L2.

Mac	ro	Non-target features	G3	X
cate	egory		Tally	Tally
	<u> </u>	Verb inflections	8	12
	word	Noun inflections	1	7
		Meaning (single lexical item)	-	9
<u>e</u>	_	Verb group formation	2	5
Jac	clause internal	Noun group formation	5	9
Language	용글	Adverbials (i.e. time, manner, purpose)	3	3
Ē		Meaning (of clause)	2	2
	across clauses	Pronouns (& lexical cohesion)	1	3
	Pronouns (& lexical cohesion) Clause connection (i.e. logic & sequence)		2	5
		Total language features/Total words	24/355: 7%	55/147: 37%
	"Style" (optional)		6	6
33	Spelling (including "correct" homonyms)		16	20
e	Spelling (including "correct" homonyms) Punctuation Total literacy features/Total words		25	12
=======================================		Total literacy features/Total words	47/355: 13%	38/147: 26%

Table 6. Breakdown and tally of non-target language and literacy features for G3 & X.

In these two texts, language proficiency—as evidenced so far through analysis of word count and non-target language—contributes more to comprehensibility and communicative success than do basic literacy skills: G3 makes double the literacy "errors" to language "errors", yet that text is by far the most successful and is able to score on a reasonable number of NAPLAN assessable criteria due to greater language proficiency. X makes fewer literacy to language "errors" (although double the rate of G3's literacy "errors"), but to no particular benefit in the text. Basic literacy interventions around spelling and punctuation would not greatly improve these narratives in terms of quality or quantity. In terms of NAPLAN also, spelling (maximum of 6 score points) and punctuation (maximum of 5) total just 11 out of the available 47 points.

Within each of the macro-categories of "language" and "literacy", non-target language features have been grouped into subtypes. The language subtypes are arranged according to whether they relate to word level features or to other clause-internal structures, or whether they pertain to cross-clause phenomena. For both students, their non-target language features are predominately clause-internal in nature (including at word level): G3, 88%; X, 85%. Non-target features within a clause include, for instance, zero-marking of past tense, lack of plural inflections, compound tense formation, composition of quantifying expressions, use of prepositions, word order etc. These are typical approximations by L2 learners of target language features. L1—or other highly proficient—speakers of SAE do not make morpho-syntactic errors of this nature, because they produce the morphosyntax of SAE "automatically".

G3 and X have a different non-target language profile. 51% of the non-target language features produced by X are at the word level compared to 37% by G3. From a language teaching perspective, English word level inflectional morphology is ranked developmentally easier than syntactically more complex formations within and across clauses. This kind of material is highly amenable to explicit instruction, in the experience of the author. In the case of G3, all except one of the errors at word level are verb inflections, so G3, despite being a more advanced L2 learner, would benefit from this teaching too.

A final consideration is that analyses of non-target language features do not value what students have attempted. This is particularly problematic when L2 learners are attempting a task which demands language beyond their level of proficiency. If they attempt to express their own ideas in independently constructed language, they will be likely to make more errors on account of employing language that they do not yet control.

5.3 Syntactic features to identify greater sentential complexity

A profile of sentential complexity in student texts augments the previous analyses, by capturing patterns of the language attempted by students. The tool employed here is a protocol developed by the author and utilised in a report by Angelo & Carter (2009) on spoken and written language of high school aged students, in which they compared outputs across a range of English proficiencies, from beginner L2 learner through to native L1 speaker. It was adapted and developed

from the complex syntax features used by Craig & Washington (2006:138-141) in their study of oral language structures used by school-aged speakers of African American Vernacular English.

Appendix 1 lists all 20 syntactic features from the protocol used for coding texts in this analysis, along with definitions for scoring purposes and examples. A comparison of this protocol with the "original" Craig & Washington categories shows that a number of features have been added:

- features 1-6: unchanged from "original";
- features 7-8, 9-11, 12-13: "original" category split into 2 or 3, to assist with accurate scoring and coding;
- features 14-15: major categories of analysis used elsewhere in the "original" study;
- feature 16-20: additional categories to differentiate between students' language output.

Features added to the "original" were required to capture extra linguistic features characteristic of written language, or to distinguish between outputs characteristic of different students. Broadly speaking, "preposed sentence elements" (feature 16) and "elaborated noun phrases" (feature 17) proved useful for describing more salient aspects of students' written expression. Again, generally, it was noted that additional syntactic elements in the verb phrase were utilised more frequently by many SAE-speaking students. Those selected for coding were "modality in the verb phrase" (feature 18), "adverbial elements" (feature 19) and "aspect in the verb phrase" (feature 20). The adaptation and development of Craig & Washington's protocol employed in the analysis here has been utilised in a number of L2 classroom research and application contexts (e.g. Holzberger 2011).

In the present study, the texts of G3 and X were coded for any of these syntactic features of sentential complexity to reveal a profile of their language use (Table 7 below). For ease of display, this table does not include features that were not actually observed in G3's and X's texts.

From the data presented in Table 7, it can be seen that G3 displays more syntactic features associated with complexity in sentences, as measured both by the range of types in evidence as well as total number and frequency of features throughout the text. Complex language is required for expressing complex ideas, and G3 is

demonstrably using some complex language features. Although L2 learner features are still obvious in G3's writing, as shown by her non-target language features (Table 6), it is her use of some complex language that supports her self-expression in her narrative.

It is also the use of more complex language which enables G3 to score (more) points on (more of) the NAPLAN assessable writing criteria (Table 4). Engaging an audience, expressing ideas, depicting characters and settings, utilising vocabulary effectively, shaping a cohesive narrative and structuring correct and apt sentences all require—or greatly benefit from—writers controlling the syntactic features for expressing them.

Features of sentential complexity	Stude	ent ID	
Features found	G3	X	
Simple infinitive (same subject)	1	1	
Infinitive (different subject)	1	-	
Unmarked infinitive	1	-	
Noun phrase complement	5	-	
Participles as adjectives	11	-	
Preposed sentence elements	7	3	
Ellipsis	8	5	
Modal verb	2	-	
Wh-clause	3	-	
Relative clause	-	3	
Passive	?	-	
Subordinate clause (other)	6	-	
Adverb (in verb group)	1	-	
Aspect (in verb group)	3	-	
Participial phrases	6	1	
Total	55	13	
Rate: Total features/Total words	55/355: 15%	13/147: 9%	

Table 7. Syntactic features of sentential complexity found.

X, on the other hand, displays a lesser degree of language complexity, in relation to range, number and rate of syntactic features found. The syntactic profile presented in X's text is associated with its ability to meet fewer NAPLAN assessment criteria. Less syntactic complexity is emblematic of the student's level of L2 proficiency. At a text level, this student's developing L2 reveals itself not just through lower word counts, less elaboration and more non-target language, but also as fewer syntactic features indicative of sentential complexity.

X produces the second longest, and, arguably, the second best text. Yet clearly X requires considerably "more" target language to produce a more successful

narrative. Teaching and/or practice at the level of schematic text structure will not fulfil the language learning needs of X or the rest of the student cohort. Instruction which does not include explicit teaching of the target language, SAE, effectively withholds the vital ingredient: These texts are not written in students' L1, Torres Strait Creole, but in their L2, SAE. If students are only taught how to organise their existing SAE proficiencies (no matter how low) into a narrative structure for NAPLAN purposes, the target curriculum is hidden from them by a barrier of untaught but requisite (SAE) language.

G3 alone has both used and "filled up" the taught schematic structures. The syntactic profile of G3's text strongly suggests that this student has already acquired sufficient language both to be able to understand and to implement the concepts associated with the overtly taught generic stages (i.e. introduction, problem, solution and conclusion), at least to some extent. From this point of view it could be argued that this student alone has benefited from instruction focusing on schematic structures: this curriculum is accessed (partially) by G3 due to sufficient L2 proficiency, but hidden from X (and the other students apart from G3) due to their lower levels of L2 proficiency. Teaching schematic structures of a narrative has further possible negative ramifications for student performance, in as much as it occupies school time that could be spent targeting the required language teaching. Even G3, the student with the most successful narrative, would show improvements from explicit language teaching, as evidenced by the range of her non-target language features

6. Areas for further investigation

The students in this study display a range of L2 proficiencies. The analysis and discussion in this paper suggest that one student is in a better position to take up and apply classroom instruction centring around schematic discourse organisation to a much greater extent than the others. This suggests useful lines of investigation that could map students' L2 development onto their outcomes arising from different pedagogies. A measure of students' respective L2 levels, for example on an ESL proficiency scale, would assist with clarifying who would benefit most from which pedagogy.

In this class, students have been taught to write a narrative largely through its schematic discourse structure. In the author's experience, this is a common approach to teaching "genres" for a complex variety of reasons, including teaching resources and teacher training. If this is in fact a widespread practice, this would be a concern if it were not accompanied by language teaching for students with L2 learning needs. The nature and extent of classroom actualisation of genre pedagogy is important to ascertain, as it might be excluding many EFL/ESL students from the curriculum and preventing them from reaching their academic potential.

A further issue is the high stakes testing context surrounding the production of these practice texts. NAPLAN itself is just a point-in-time snapshot of student performance in numeracy and literacy (via written English), which could provide some useful diagnostic information. However, there are extreme pressures surrounding the use of NAPLAN data which create an ethos of high stakes, so that the performance of systems, schools, teachers and students is judged by this single data source. The perceived importance of NAPLAN results seems, from this author's perspective, to drive curriculum and pedagogy responses, as in the case of practising for the NAPLAN writing assessment in this study. It would be important to understand the extent to which NAPLAN preparation is undertaken in schools and whether the curriculum is consequently being narrowed. If so, then how and by how much?

Further study is required to understand how schools are addressing EFL/ESL learners' needs whilst also responding to the current high stakes performance ethos for all students. Apart from exempt L2 learners of SAE who arrived from overseas in the last 12 months, all other EFL/ESL learners sit NAPLAN tests. In a high stakes testing context, other sources of information relevant to teaching students can be undervalued or silenced. As the dominant source of student performance data, NAPLAN purportedly reports on students' levels of achievement in macro-skills such as reading and writing. However, this testing is undertaken in English, and therefore logically has to interact with students' proficiency in this language. It would be a matter of interest to determine to what extent the discourse of high stakes is acknowledging L2 learners and their levels of L2 proficiency, or how their "literacy" performance in these standardised tests is positioned.

There is an apparent absence of guidance for teachers of Indigenous students in EFL contexts. By very definition, students learning English as a Foreign Language only have access to the target language in the classroom, so curriculum, resources and training would be vital for optimal L2 learning. It is therefore important to investigate what manner of guidance is available for classroom teachers working in EFL contexts and whether teachers feel supported in implementing such approaches.

Finally, these suggestions are dependent on the accurate identification of Indigenous EFL/ESL learners and the ability to assess their levels of L2 proficiency. It appears that the LBOTE category might bear only a weak relationship to students' actual EFL/ESL status. Furthermore, Indigenous students with complex language backgrounds arising from language contact and shift might not even be acknowledged as speakers of LBOTE. It would be of interest, then, to learn to what extent student performance data from NAPLAN, state education department sources or local school level records could be disaggregated for EFL/ESL status and level of L2 proficiency in SAE.

7. Conclusion

The practice texts examined in this preliminary study provide evidence that students are learning and applying the schematic structures about narratives which have been taught and practised, but only to the extent allowed by their various levels of L2 language proficiency. For most of these students their L2 proficiency in SAE is not high, so their application of their classroom instruction about narrative structure was as minimal as using labels for planning in some instances. The underlying cause of students' lack of success in these narratives is due to their available L2 linguistic resources. The analyses of student texts provides evidence about the limits of their L2 proficiency in SAE in terms of length of text, general expressiveness, non-target language features and greater sentential complexity.

This study provides evidence that the classroom curriculum (narrative writing) was hidden from students on account of what was not taught. All students display many overt L2 learner features which would not be readily addressed through teaching and practising the structure of a targeted output, the test genre. Indeed, it

could be deleterious in terms of unproductive classroom time and students' sense of self-confidence, through on-going lack of success. All texts analysed in this study, even the most successful narrative, show a need for language-focussed teaching. These preliminary findings point to several lines of enquiry with significant ramifications for teaching and assessing Indigenous EFL/ESL learners effectively.

References

- Angelo D & N Carter 2009 'An investigation into the interface between language and literacy at Bundamba State Secondary College'. Unpublished manuscript.
 - http://www.learningplace.com.au/deliver/content.asp?pid=51300 (accessed 12th May 2012)
- Australian Education Union 2010 'Submission 231 to the Senate Education Employment and Workplace Relations Committee into the Administration and Reporting of NAPLAN Testing June 2010'.
 - http://www.aph.gov.au/Parliamentary_Business/Committees/Senate_Committees?url=eet_ctte/naplan/submissions.htm (accessed 12th May 2012)
- Australian Primary Principals Association 2010 'Submission 228 to the Senate Education, Employment and Workplace Relations Committee Inquiry into the administration and reporting of NAPLAN testing'.
 - http://www.aph.gov.au/Parliamentary_Business/Committees/Senate_Committees?url=eet_ctte/naplan/submissions.htm (accessed 12th May, 2012)
- Christie F 2010 "The "Grammar Wars" in Australia' in T. Locke (ed) Beyond the Grammar Wars: A resource for teachers and students on developing language knowledge in the English/literacy classroom Oxon: Routledge. Pp. 55-72.
- COAG Reform Council 2011 'National Indigenous Reform Agreement: Supplement on literacy and numeracy achievement 2010' COAG Reform Council Sydney.
 - http://www.coagreformcouncil.gov.au/reports/docs/nira_09-10/nira_09-10_supplement.doc (accessed 12th May 2012)
- Council of Australian Governments 2008 'National Partnership Agreement on Low Socio-Economic Status School Communities'.
 - http://www.smarterschools.gov.au/nationalpartnerships/Documents/SSNatPartnerAgr eem.pdf (accessed 12th May 2012)
- Craig H & J Washington 2006 Malik Goes to School: Examining the language skills of African-American students from preschool 5th grade New Jersey: Lawrence Erlbaum.
- Crowley T & B Rigsby 1979 'Cape York Creole' in T Shopen (ed) *Languages and their Status* Philadelphia: University of Pennsylvania Press. Pp. 153-207.
- Education Queensland 2008 'Bandscales for English as a Second Language (ESL) Learners' Brisbane: Education Queensland.
 - http://www.learningplace.com.au/deliver/content.asp?pid=51396 (accessed 15th May, 2012)

- Holzberger N 2011 'Before and after: The assessment of spoken and written language samples to inform teaching' *Practically Primary* 6(1):24-28.
- Malcolm I 2001 'Learning genres, learning about genres and learning through genres: educating Indigenous learners' Paper presented to international Conference on genres and discourses in education, work and cultural life: Encounters of academic disciplines on theories and practices Oslo College, 13th May, 2001.

 http://www.cdu.edu.au/walking_talking_texts/documents/LearningTogether4Oslopap

erGenresandIndigenouslearners.doc (accessed 12th May, 2012)

- Masters G et al. 2008 'Reporting and comparing school performances' Paper prepared for the MCEETYA Expert Working Group to provide advice on national schools data collection and reporting for school evaluation, accountability and resource allocation Canberra: Department of Education, Employment and Workplace Relations. http://www.mceecdya.edu.au/verve/_resources/ACER_Report_on_Reporting_and_comparing_school_performances.pdf (accessed 12th May 2012)
- McIntosh S, R O'Hanlon & D Angelo 2012 'The (In)visibility of "language" within Australian educational documentation: Differentiating language from literacy and exploring particular ramifications for a group of "hidden" ESL/D learners' in C Gitsaki & R Baldauf (eds) Future Directions in Applied Linguistics: Local and global perspectives Newcastle upon Tyne: Cambridge Scholars Publishing. Pp. 448-468.
- McKay P, C Hudson, M Newton & J Guse 2007 'The Middle Years ESL Bandscales Version 2' in P McKay (ed) Assessing, monitoring and understanding English as a second language in schools: The NLLIA ESL Bandscales Version 2 Brisbane: Queensland University of Technology & Independent Schools Queensland.
- McKay P, C Hudson & M Sapuppo 1994 'ESL Bandscales' in NLLIA, NLLIA ESL Development: Language and Literacy in Schools Vol 1 Canberra: National Languages and Literacy Institute of Australia. Pp. B1-D52.
- Ministry of Education, 'Ontario 2012 English as a Second Language—ESL Observable Language Behaviour Criteria Writing (Grades 4-6)'. http://www.edugains.ca/newsite/ell2/step/observablelanguagebehaviour.html (accessed 30th May, 2012)
- National Assessment Program 2011 'National Reports, NAPLAN' Australian Curriculum, Assessment and Reporting Authority.

 http://www.nap.edu.au/Test_Results/National_reports/index.html (accessed 12th May 2012)
- National Assessment Program Literacy and Numeracy 2008 'Writing: Narrative marking guide' Australian Curriculum, Assessment and Reporting Authority. http://www.decd.sa.gov.au/accountability/files/links/2010_NarrativeMarkingGuide.pd f (accessed 15th May 2012)
- National Association for Language Development in the Curriculum 2009 'EAL Formative Assessment Descriptors: Key Stage 2'.

 http://www.naldic.org.uk/Resources/NALDIC/Teaching%20and%20Learning/NALDIC/DICdescriptorsKS2final.pdf (accessed 30th May 2012)
- Ober D 1999 'Yumplatok' in T Balzer et al.. (eds) Pidgin Phrasebook Hawthorn, Victoria: Lonely Planet. Pp. 140-147.
- Queensland Studies Authority 2010a 'Test Preparation Handbook' 2010 National Assessment Program Literacy and Numeracy.

- http://www.qsa.qld.edu.au/downloads/early_middle/naplan_yr5_test_admin_hb.pdf (accessed 12th May 2012)
- Queensland Studies Authority 2010b 'Year 5 Test Administration Handbook' 2010 National Assessment Program Literacy and Numeracy.
 - http://www.qsa.qld.edu.au/downloads/early_middle/naplan_yr5_test_admin_guide_10. pdf (accessed 12th May, 2012)
- Sandefur J 1990 'Kriol and Torres Strait Creole: Where do they meet?' *The Occasional Bulletin* 4:1-13.
- Senate Education, Employment and Workplace Relations References Committee 2010 'Administration and reporting of NAPLAN testing' Commonwealth of Australia. http://www.aph.gov.au/Parliamentary_Business/Committees/Senate_Committees?url= eet_ctte/naplan/report/report.pdf (accessed 15th May, 2012)
- Sharifian F, J Rochecouste & I Malcolm 2004 "But it was all a bit confusing...": Comprehending Aboriginal English texts' *Language, Culture and Curriculum* 17(3):203-228.
- Shnukal A 1988 Broken: An Introduction to the Creole Language of Torres Strait Canberra: Pacific Linguistics C-107.
- Simpson J, J Caffery & P McConvell 2009 'Gaps in Australia's indigenous language policy' AIATSIS Research Discussion Paper No. 24. http://www.aiatsis.gov.au/ntru/documents/DP242009Simpson.pdf (accessed 12th May, 2012)
- Turner C 1997 'The Injinoo Home Language Program: A positive community response to marginalisation and institutional racism' *Australian Journal of Indigenous Education* 25(1):1-9.
- Wigglesworth G, J Simpson & D Loakes 2011 'NAPLAN language assessments for Indigenous children in remote communities: issues and problems' *Australian Review of Applied Linguistics* 34(3): 320-343.

 www.nla.gov.au/openpublish/index.php/aral/article/view/2280/2741 (accessed 12th May 2012)

Appendix 1. Syntactic features of sentential complexity

1. Simple infinitive with same subject

Infinitive with same subject as main verb, e.g. the teacher sometimes stops to ask questions.

2. Noun phrase complement

Full, finite clause instead of a possible noun phrase (usually object); relativiser *that* can be omitted, e.g. *I think (that) science is an important subject*.

3. Wh-infinitive

Main clause linked by wh-pronoun to following infinitive, e.g. they know where to skate.

4. Simple non-infinitive wh-clause

Wh-word is followed by a subject plus verb, not infinitive, e.g. that's the counter where you borrow books.

5. Relative clause

Noun phrase or pronoun modified by another full clause; relative pronoun may be omitted, e.g. *I* like the work (that) we're doing this term.

6. Unmarked infinitive

Infinitives dependent on main verbs subcategorising for unmarked infinitives (let, make, watch, help...), e.g. they watched us <u>do</u> the test.

7. Infinitive with a different subject

Infinitive with a subject different to the main verb, e.g. she told us to finish our assignment.

8. Impersonal infinitives

Infinitives in impersonal or passive structures, e.g. it is important to study history.

9. Participles as adjectives

Adjectives formed from present or past verb participles in noun-groups or after copula verb be, e.g. an <u>interesting</u> story or the story is <u>interesting</u>; a <u>broken</u> projector or the projector is <u>broken</u>.

10. Participial phrases

Non-finite verbal phrases headed by -ing or -ed/-en participles e.g. we're in the middle of writing our assignments.

11. Gerunds

Present participles used as nouns, e.g. spelling is my favourite subject.

12. Subordinate clause

Dependent clause to main clause (other than relative), e.g. be quiet <u>because/as/while/when/if they are doing an exam</u>.

13. Ellipsis

Required or highly preferred omission of same category to avoid repetition e.g. *I sat down and* ____ *started my essay*.

14. Embedded clause

Fully embedded clause inside a discontinuous clause, e.g. I think the reason ^(that) the teacher gave us that topic is she is interested in politics.

15. Passives

Clause with passive verb construction using be or get as auxiliaries and "undergoer" as subject, e.g. *they were given good marks*.

16. Pre-posed sentence elements

Pre-posed elements (such as adverb, prepositional phrase or clause) optionally inserted before canonical subject-verb-object word order; e.g. *in science we have been studying forces*.

17. Elaborated noun phrases

Post nominal modification, using syntactic devices such as prepositional phrases, but not including relative clauses, e.g. the performance with the highest marks received an award.

18. Modality in verb phrase

Use of modal verb in verb group (not invariant adverb) to express modality, e.g. *students should study history*.

19. Adverbial elements

Adverbial and particles inside verb phrase, e.g. we can <u>probably/always/still/just</u> do more maths problems.

20. Aspect in verb phrase

Continuous, perfect or habitual overtly marked in verb phrase, but not through invariant adverbs, e.g. we <u>have been learning</u> about narratives.

The Vietnamese classifiers 'CON', 'CÁP' and the Natural Semantic Metalanguage (NSM) approach: A preliminary study

Loan Dao
The Australian National University, Canberra
loan.dao@anu.edu.au

Abstract. This preliminary study is the first-ever attempt to analyse the lexical semantics of the two most commonly used classifiers in the Vietnamese language, 'con' and 'cái', using the Natural Semantic Metalanguage (NSM) approach (Wierzbicka 1996; Goddard & Wierzbicka 2002; Goddard 2009). The study originates from an experience in teaching Vietnamese as a foreign language in Australia, where students' difficulty in learning/acquiring the usage of the Vietnamese classifiers and the classifier noun phrases was observed. The ultimate aim of this pilot study is to use the semantic analysis of the classifiers achieved through NSM to enhance teaching and learning Vietnamese as a foreign language, and to advance the understanding of one of the world's most extensive and elaborate classifier systems. If this aim is achieved then the study will further support the claim that NSM is an effective tool in the of lexical semantics and language-specific explanation grammatical categories and constructions (Goddard 2011:336).

Keywords. classifiers, semantics, Vietnamese, Natural Semantic Metalanguage, foreign language acquisition

1. The Vietnamese language: an overview¹

Vietnamese is the official language of Vietnam. It is spoken by almost 90 million people within the country (including many ethnic minorities of Vietnam), and by approximately 3 million people in over 100 countries outside Vietnam². Vietnamese is among the top twenty most spoken languages in the world. In Australia, Vietnamese is one of the top ten foreign languages studied by students in schools (Liddicoat, Scarino, Curnow, Kohler, Scrimgeour & Morgan 2007).

Genealogically, Vietnamese is a Mon-Khmer language of the Austroasiatic language family. It is a tonal, isolating, non-inflectional language, and has subject-verb-object (SVO) word order. There are four main mutually intelligible dialectal regions with the following respective main cities: Northern (Hanoi), North Central (Vinh, Nghệ An Province), Central (Huế, Thừa Thiên Province) and Southern (Hồ Chí Minh City or Saigon).

Vietnamese has six lexical tones, outlined in Table 1; however, in the Southern dialect, the high-broken $(ng\tilde{a})$ and low-rising $(h\delta i)$ tones are pronounced the same as the low-rising tone $(h\delta i)$. Despite this pronunciation difference, the southern and northern dialects are still mutually intelligible.

Tone name	Description	Tone diacritic	Examples
Ngang	Mid-level	(no mark)	ma (ghost)
Sắc	High-rising	,	má (cheek)
Huyền	Low-falling	,	mà (but)
Ngã	High-broken	~	mã (horse)
Hỏi	Low-rising	,	må (grave)
Nặng	Low-broken		ma (rice seedling)

Table 1. Vietnamese tones (adapted from Phan 1996).

For most of its history, the Vietnamese writing system used classical Chinese characters. In the 13th century, the *Chūt Nôm* system was invented based on Chinese characters. The current alphabet system, called *Quốc Ngữ* (national

¹ My gratitude goes to Professors Anna Wierzbicka and Cliff Goddard for their encouragement and input into this pilot work, and to two anonymous reviewers for their constructive, valuable comments. All shortcomings and errors in this work are entirely mine.

² http://www.nationsencyclopedia.com/Asia-and-Oceania/Vietnam.html (retrieved 12 Feb 2012).

language/script) has been romanised, and has replaced *Chū* Nôm, under French colonialism.

Other distinctive characteristics of Vietnamese include serial verb constructions and an extensive classifier system. The latter will be discussed next.

2. The Vietnamese classifier system

A classifier system is defined as "a grammatical system of noun categorisation device(s) in a particular language" (Aikhenvald 2003:vii). Classifiers are also described as "grammatical devices which, in certain contexts, oblige speakers to categorise a referent along specific semantic dimensions" (Goddard 2011:346). Classifier systems exist in many languages in all parts of the world (see Allen 1977). Apart from its size, a classifier system is, according to Goddard (2011:347-348), "always predominantly, if not exclusively, semantic", and is "not normally involved in grammatical agreement processes". Classifiers are closely attached or related to the head nouns that they refer to. The Vietnamese noun phrase and its structure will therefore be examined next.

2.1 The Vietnamese Noun Phrase (NP)

The Vietnamese noun phrase (NP) has the same word order type as that in Bengali, Chinese, and Semitic and Amerindian languages. This word order is Q C N, where Q stands for 'quantifier', C 'classifier' and N 'noun' (Allan 1977:288). Furthermore, as seen in table 2 below, the head of a Vietnamese NP also has post-nominal modifying components:

Quantifier	(Focus marker?)	Classifier (CL)	Head noun	Adjective	Demons- trative
		con	dao (knife)		
		cái	<i>bàn</i> (table)		
		cuốn	sách (book)		
		trái	táo (apple)		
<i>một</i> (one)	**cái	*xe	đạp/		này (this)
. ,		chiếc / cái	*xe đạp (bicycle)		
			*xe xích-lô (cycle)		
hai (two)	**cái	*máy	vi-tính /		ấy (that)
, ,		cái	* <i>máy vi-tính</i> (computer)		
			*máy bay (aeroplane)		
		Ø	lơ phả (la phở)		
			(nonsense syllable +		
			real word)		
những (some of)	**cái	con	ngựa (horse)	đen (black)	đó (those)

Table 2. The Vietnamese classifiers and noun phrases (adapted from Nguyen HT 2004).

Note that the demonstrative is always in the final position of the Vietnamese NP. In this table, * denotes an unclear situation where the words involved ('xe', 'máy') need further in-depth study to determine if they are classifiers or part of compound nouns. For instance, apart from the two listed examples of 'cycle' and 'bicycle', 'xe' goes with many other transport means: 'xe đờ' (coach), 'xe búyt' (bus), 'xe hon-đa' (Honda), etc. Similarly, the word 'máy' goes with automated or electronic devices, big or small, ranging from 'aeroplane' to 'computer'. This confusion is well-documented in Vietnamese linguistics, as noted by Thompson (1965:127), "In Vietnamese, it is notoriously difficult to distinguish between phrases and compounds, as word order is identical in both cases, namely, 'head-modifier': Compounds are perhaps the least understood elements of Vietnamese grammar".

The "second" element of the Vietnamese NP (Nguyen VU 2008:8) 'cái', marked with a double asterisk ** in column two of the above table, presents an interesting structure. This structure looks like "a double classifier construction", which is "unique and apparently least understood in the Vietnamese classifier structure" (Tran 2011:41).

Nguyen TC (1975) and Nguyen HT (2004) posit that this second 'cái', which precedes the classifiers 'con' in example (1) and 'cuốn' in example (2), marks definiteness or acts as the focus marker of the NP, along with the conditional

presence of the demonstratives 'đô' and 'này'. This second 'cái' does not form a double classifier structure, as the sequence of *CL-CL is ungrammatical in Vietnamese.

- (1) những cái con ngựa đen đó some.of cái CL horse black those 'Some of THOSE black horses'
- (2) cái cuốn sách này
 cái CL book this
 'THIS book'

2.2 The number of classifiers in the Vietnamese language

There has been no definite answer to the question of exactly how many classifiers there are in the Vietnamese language. This number has been estimated to be as little as 40 (Ly 1998), up to as many as 221 (Truong 1883). Tran (2011:52) posits that the reason for this high number is because linguists who work particularly on numeral classifiers consider any element that comes between the numeral and the noun to be a classifier. These linguists (such as Tran, Bui & Pham 1960; Le 1972; Nguyen KT 1963; Li & Thompson 1981) take into account words that occupy this position as both "true" classifiers and measure nouns. The latter is used to denote "units of measurement or 'contents'" (Nguyen DH 1957:128), similar to the English phrases used before mass nouns such as 'three glasses of water', 'five kilos of meat', etc. Tran (2011:21) defined "true classifiers" as those that "qualify the noun based on some intrinsic features and inherent properties of the noun's referent (shape, animacy, function, etc.)." The two examples below illustrate this distinction:

- (3) ba cái bát three CL bowl 'three bowls'
- (4) ba bát com
 three bowl [noun (measure)] rice
 'three bowls of rice' (after Nguyen DH 1957)

Based on the different lists of classifiers and measure nouns provided by the above-mentioned linguists, Tran (2011) has put together a list of 160 "true" classifiers (see table 3), of which 'con' and 'cái' are two of the most commonly used. From this point on, the term "classifier" or "classifiers" is used to refer to the "true" classifiers.

2.3 Conventional semantic categorisation of Vietnamese classifiers

Most studies on classifiers to date are generally concerned with the description of the entire classifier system of a particular language, or with a general analysis of the semantic organisation of classifier systems (Goddard 2011:353). For example, based on his observation of more than fifty classifier languages, Allan (1977:297) identified seven categories of classification, of which "the first five occur only in classifier languages". These categories are: (a) material, (b) shape, (c) consistency, (d) size, (e) location, (f) arrangement, and (g) quanta.

The following examples show some of the semantic categorisations in a selection of classifier systems discussed in Goddard (2011:348-355):

- Jacaltec, a language spoken in Guatemala (Craig 1986), has 24 classifiers and they are classified into two distinct groups: social world (people, spiritual beings), and inanimate world (natural and manufactured things):
- a. Xil naj Pel hune7 hin no7 txitam tu7.
 saw CL:MAN Pedro one my CL:ANIMAL pig that 'Pedro saw that one pig of mine.'
- b. Xil naj no7.
 saw CL:MAN CL:ANIMAL
 'He saw it (an animal).'
- Matthews & Yip (1994) studied Cantonese and grouped the classifiers according to the physical properties (shape, orientation, size, etc.) of the nouns:
 - lãp for round, small things
 - $\tilde{\mu}k$ for thin, flat things
 - ga for vehicles, or large machines with moving parts

This universal prominence in the semantic organisation of the world classifier systems has also been applied to the Vietnamese classifier system, in which animacy and shape are also the two major semantic categories that most Vietnamese scholars have observed (Tran 2011:57). These two semantic categories have been identified according to the four major groups of nouns that denote (a) humans, (b) animals, (c) plants and (d) objects, things, natural phenomena and abstract notions (Tran 2011:53). This method of categorisation is widely accepted among Vietnamese linguists such as Hoang (1996), Le N (2008), Le VL (1972), and Nguyen TC (1975). Table 3 below is adapted from Tran (2011) and lists 160 classifiers and their semantic categorisation. Tran (2011) derives this composite list from various descriptions of the semantic categorisation of the Vietnamese classifiers by such authors as Bisang (1999), Emeneau (1951), Hoang (1996), Hui (2003), Le N (2008), Ly (1998 2005), Nguyen DH (1957), Nguyen PP (2002), Nguyen HT (2004), and Thompson (1965).

Semantic	Primary	Secondary	Classifiers		
category	features	features			
Animacy			cái, con, chiếc		
	(Parts) 1-D(imensional)	long	cây, sợi/cọng, tia, làn, hượn, dợn, đẫn, đoạn, khúc, thẻo, rẻo		
		flat, square + width	bức, tấm, tờ, lá, manh		
	(Parts) 2-D	flat, square + length	thanh, thỏi, thẻo		
		flat, round	khoanh, vầng		
		flat, even	månh, thửa, mång, lát, khoảng/khoảnh, khoanh		
Shape	(Parts) 3-D	round, cubic, cylindrical	hòn, viên, cục, hạt/hột, quả/trái, giọt tảng, khối, phiến, súc, khẩu		
onape		cone shape	nấm, ngọn, đỉnh		
		mall size/bite	miếng, mầu		
		forming rectangular shape, vertical direction	månh/thếp, tập/tệp, xấp/xếp/đệp, chồng		
	(Collectives) 3-D	forming pyramid shape	đụn, đống		
		forming cylindrical or round shape	vác, bối/búi/lọn, bó, nắm/vắt		
	(Collectives) 1-D	dynamic	dòng, luồng, đoàn, tốp		
		stationary	chân, dãy, hàng, rặng, d ả i		
	(Collectives) gather	ed + clustered	nải, quày, buồng, cụm, khóm, chùm, chòm, đám, đàn, bầy		
	(Collectives) shapel	ess	bộ, mớ, múi, mẻ, nhả, trà, xâu, tràng, xóc, thang		

	Transportation	land, air, water	chiếc
	Cultural, social,	oral	bài, vở
	literary/artistic	written	quyển/cuốn, cuộn, bản, bài, pho, thiên,
Function	works		áng, đạo
	Buildings		túp, c ă n/gian, ngôi, tòa
	Events		đám
Arrangement	Single		chiếc
	Paired		đôi, cặp
Limited use			cỗ, kiện, đống/nẹn/trự, quân, vì
Miscellaneous			bãi, bàn, bậc/bực, bụi, cánh, ngón, mái,
			điếu, phong, món, mũi, ổ
'Event'	Action, state,		chuyến, cơn, cú, cuộc, giấc, khoa, kỳ,
	process		lần, lời, lươt, mẻ, mối, nét, nền, nguồn,
			nhát, niềm, nổi, nước, sự, trận, ván, vẻ,
			vu

Table 3. Semantic categorisation of Vietnamese classifiers (adapted from Tran 2011:452).

Tran (2011:47) argues that on one hand, "the meaning of a classifier can not be specified if it stands alone" (example 5), but on the other hand "classifiers are not completely meaningless" either. This is because, firstly, many specific classifiers bear the meaning of the nouns that they relate to (example 6), and secondly, many specific nouns can be used with different classifiers (example 7).

- (5) Tôi gặp một cái Ø giữa đường.

 I meet one CL Ø in.the.middle street
 - I encountered a CL Ø in the middle of the street.' (after Hoang 1996:25)
- (6) Classifiers Noun Categorisation lá leaf for leaf-like objects tree, plant for trees and 1-D, long, rigid objects cây fruit for fruits and 3-D big, round objects trái lump, clot, piece for 3-D lumpy objects cuc(after Tran 2011:48)
- (7) con dao

 CL knife ([+animate], active knife)

 câi dao

 CL knife ([-animate], usually big knife)

 cây dao

 CL knife ([±animate], long, tapered/slender, small knife)

 (after Le N 2008:79)

There exists no comprehensive and systematic semantic analysis of the Vietnamese classifier system. The semantic and cognitive foundations of classifier systems, which allow speakers or researchers to categorise them, are "rather subtle, complicated and have fuzzy boundaries even for native speakers" (Ly 1998:71); at the same time, like "so many semantic phenomena, the key to developing a clear picture [of the exhaustive uses of classifiers] is to work patiently through the language-specific facts" (Goddard 2011:353). Therefore, this preliminary study attempts to find whether the meaning of a classifier can be specified through NSM. The results of this study, if confirmed, will encourage further studies of classifier systems cross-linguistically.

3. The present study

3.1 The NSM approach

Founded by Wierzbicka in 1972, the NSM has since been refined and the number of universal semantic primes has grown through a large body of work on at least 20 languages (see Goddard 2009). The NSM approach is convinced that "meaning is the key to insightful and explanatory descriptions of most linguistic phenomena, phonetics and phonology excepted", and "... is also the bridge between language and cognition, and between language and culture." (Goddard 2009:459)

The NSM approach utilises "semantic explication" or "reductive paraphrase" to represent meaning of words or utterances "in the simplest possible terms". These terms form the set of "semantically minimal 'cores" or "semantic primitives" (Goddard 2011:65), which in turn cannot be defined any further. Wierzbicka (1972) originally proposed only 14 items, but has been persistently expanding the set of semantic primitives to 63. This set of semantic primitives is seen as a "minilanguage with the same expressive power as a full natural language" (Goddard 2011:69).

NSM researchers also identify a set of non-primitive words which are often seen in semantic explications, but, like the semantic primitives, are equally difficult to define. These are called semantic molecules, labeled in explication as [m].

With various schemes of categorising classifiers (as mentioned in section 2.3), and the body of semantic analysis of the non-primitive terms by NSM, it is suggested that although "classifiers are often presented in the secondary literature as exotic and mystifying, there is no reason to think that they are any less amenable to reductive paraphrase analysis than words of other kinds" (Goddard 2011:355).

3.2 Data sources for the Vietnamese classifiers 'con' and 'cái'

This study uses data from the Corpora of Vietnamese Texts (CVT) by Pham, Kohnert & Carney (2008), the first language corpus in Vietnamese available electronically. The CVT consists of over one million Vietnamese words from newspaper articles and children's literature, published between 1981 and 2006 (including some with unknown publication dates). A wide range of topics/genres are covered.

The entire corpus has 1,055,617 total words. 'Con' and 'cái' are among the 150 most frequent words in the entire CVT: 17th (4,857 occurrences) and 118th (1,627 occurrences), respectively. The present study only examines the occurrence and use of the two classifiers as "true" classifiers. As a result, the proportion of examples with 'con' used as a "true" classifier is 36.52% (1,774 out of 4857 total occurrences), or 0.17% of the entire corpus; and that of 'cái' is 81% (1,381 out of 1,627 total occurrences), or 0.13% of the entire corpus.

3.3 'CON': examples and semantic analysis

According to Nguyen VU (2008:3), both 'con' and 'cán' "have a range of kin words from various constituent languages, or neighbouring languages." The classifier 'con' is said to originally have an "identical phoneme in [kon] of the Thai language, meaning 'person' or 'human being' ..., and kinword [kon] in the Mon-Khmer languages, customarily denoting 'child' or 'children'" (Nguyen VU 2008:1). As discussed earlier in section 2.3, 'con' can appear with multiple nouns. Below are examples of the possible occurrences of 'con' and its semantic analysis.

People:

- (8) con người
 - CL human

Living things:

- (9) con kiến
 - CL ant
- (10) con voi
 - CL elephant

Someone (derogatory):

- (11) con ma
 - CL ghost
- (12) con quái/qui
 - CL monster
- (13) con điểm
 - CL prostitute
- (14) con buôn
 - CL trafficker
- (15) con bạc
 - CL gambler
- (16) con ăn mày
 - CL beggar

Small parts of someone's body:

- (17) con mắt
 - CL eyes
- (18) con ng**ươ**i
 - CL pupil (of the eye)
- (19) con tim
 - CL heart

Places:

- (20) con sông
 - CL river
- (21) con đường
 - CL road

Things (small):

- (22) con thuyền
 - CL boat
- (23) con tem
 - CL stamp
- (24) con diều
 - CL kite
- (25) con $c\grave{o}$
 - CL chess piece
- (26) con dao
 - CL knife

Explication: In this step, the draft paraphrase is used "to find the optimal set of semantic components and to frame them in terms of correct NSM." (Goddard 2011:95). Below is the proposed explication for 'con':

'CON: This word says something of many kinds:

COM: People

CON2: Living things

CON3: Someone

this someone does something bad (to someone else)

CON4: Small parts of someone's body

these parts move

CON5: Long [m] places

CON6: Something of one kind

things of this kind are small

people can do something with things of this kind with their

hands [m]

3.4 'CÁI': examples and semantic analysis

'Cái' is said to originally bear "strong resemblance to [Camay] in the Chamic language, ... used to denote 'Mother', 'Sister' or 'Female' in general" (Nguyen VU (2008:6). It can also appear with multiple nouns. Below are examples of the possible occurrences of 'cái' and its semantic analysis.

Things (big or small, that people can see and do something with):

- (27) cái ly/ cốc
 - CL glass
- (28) cái bàn/ghể
 - CL table/chair
- (29) cái bằng (cấp)
 - CL (certificate)
- (30) cái quán (ăn)
 - CL restaurant
- (31) cái gói
 - CL parcel
- (32) cái Tivi
 - CL television
- (33) cái balô
 - CL backpack

Things (that people can't see or touch):

- (34) cái quyền
 - CL right
- (35) cái chết
 - CL death
- (36) cái đẹp
 - CL beauty
- (37) cái tinh thần
 - CL spirit
- (38) cái đới
 - CL hunger
- (39) cái quan trọng
 - CL important
- (40) cái sợ
 - CL fear

Parts of someone's body:

- (41) cái chân/tay
 - CL leg(s)/hand(s)
- (42) cái bụng
 - CL abdomen

Explication:

'CÁI: This word says something of other kinds:

CÁT: Something of one kind

things of this kind are not living things

things of this kind can be big

things of this kind can be small

people can see things of this kind

people can touch things of this kind people can do something with things of this kind

CÁD: Something of another kind

things of this kind are not living things
people can't see things of this kind
people can't touch things of this kind
people can think of things of this kind

CÁI3: Other parts of someone's body

Note that, in these explications, the differences between *CON6* and *CÁI*1 rest on the semantic molecules for sizes and on the notion of 'handling' (Goddard 2011:355).

3.5 Referents which can occur with either 'con' or 'cái'

Either of these two classifiers can occur with a number of nouns, to denote slightly different meanings or connotations depending on the circumstances that affect the speakers' choice of referents. The below examples illustrate this point:

(43)dao # cái dao con knife CLCLknife (a knife being used) (usually a big knife) mắt mắt (44)con # cái CLCLeye[s] eye[s] (having animacy connotation) (in general)

The ability to have a choice of classifiers for the same noun is, as Goddard (2011:347) explained, because "classifiers ... do not classify nouns but the referents of nouns—the actual things in the world which the speaker 'picks out' to say something about on a particular occasion." This explanation is confirmed by other researchers such as Ly (2005:219), whose definition of the meaning of classifiers helps bring the universal grammar concept and the NSM approach to

the present study: "Classifiers have a meaning in the preconceptual sense, a meaning that stops at the level of perceptive 'representation' or 'image', that is, 'thought through feeling' about the object."

4. Concluding remarks

This preliminary study attempts to respond to the idea by Goddard (2011:355) that it is possible to apply the reductive paraphrase analysis or NSM approach to explicate the meanings of classifiers. With further resources, the preliminary proposed explications can certainly be expanded comprehensively if (a) an exhaustive study of all occurrences of the classifiers under examination is achieved; (b) more semantic molecules are used to improve the well-formedness, coherence and substitutability; and (c) the explications are tested with native speakers to satisfy their intuitions about the meanings in context.

References

- Aikhenvald A 2003 Classifiers: A Typology of Noun Categorisation Devices New York: Oxford University Press.
- Allan K 1977 'Classifiers' Language 53:285-311.
- Bisang W 1999 'Classifiers in East and Southeast Asian languages: Counting and beyond' in Gvozdanovi'c (ed) *Numeral Types and Changes Worldwide* Berlin: Mouton de Gruyter. Pp 113-185.
- Craig C 1986 Jalcatec noun classifiers' in Craig (ed) Noun Classes and Categorisation Amsterdam: Benjamins. Pp 263-293.
- Emeneau MB 1951 Studies in Vietnamese (Annamese) Grammar Berkeley: University of California Publications in Linguistics 8.
- Encyclopedia of the Nations
 - http://www.nationsencyclopedia.com/Asia-and-Oceania/Vietnam.html Accessed 12 Feb 2012.
- Goddard C 2009 'The Natural Semantic Metalanguage approach to linguistic analysis' in B Heine & H Narrog (eds) Oxford Handbook of Linguistic Analysis New York: Oxford University Press.
- _____ 2011 Semantic Analysis: A Practical Introduction (second edition) New York: Oxford University Press.
- Goddard C & A Wierzbicka (eds) 2002 Meaning and Universal Grammar: Theory and Empirical Findings Amsterdam: Benjamins.

- Hoang TT 1996 Loại từ tiếng Việt và sự hoạt động của nó trong các phong cách ngôn ngữ [Vietnamese Classifiers and their Activities in Linguistic Stylistics] Unpublished PhD Thesis, Hà Nội: Đại học Khoa học xã hội và Nhân văn [University of Social Sciences and Humanities].
- Hui SS 2003 The Semantics and Grammar of Vietnamese Classifiers Unpublished MA Thesis, National University of Singapore.
- Le N 2008 Về loại từ tiếng Việt [About Vietnamese classifiers] Unpublished MA Thesis, Ho Chi Minh City: Bộ Giáo Dục và Đào tạo Trường đại học sư phạm TP. HCM [Ministry of Education and Training of the Pedagogical University of Ho Chi Minh City].
- Le VL 1972 Sơ Thảo Ngữ Pháp Tiếng Việt [Rough Draft of Vietnamese Grammar] Hà Nội: Trung Tâm Học Liệu BGD.
- Li CN & SA Thompson 1981 Mandarin Chinese: A Functional Reference Grammar Berkeley: University of California Press.
- Liddicoat A, A Scarino, T Curnow, M Kohler, A Scrimgeour, & AM Morgan 2007 An Investigation of the State and Nature of Languages in Australian Schools Department of Education, Employment and Workplace Relations.
- Ly TT 1998 'Representation of space in Vietnamese classifiers' *The Mon-Khmer Studies Journal* 29:71-80.
- _____ 2005 Ngôn ngữ học tri nhận: Từ lí thuyết đại cương đến thực tiễn tiếng Việt [Cognitive Linguistics: From Theoretical Prerequisites to Vietnamese Evidence] Hà Nội: Nhà Xuất Bản Khoa học xã hội.
- Matthews S & V Yip 1994 Cantonese: A Comprehensive Grammar London: Routledge.
- Nguyen DH 1957 Classifiers in Vietnamese Word 13:124-52.
- Nguyen HT 2004 The Structure of the Vietnamese Noun Phrase Unpublished PhD Dissertation, Boston University.
- Nguyen KT 1963 Nghiên Cứu Về Ngữ Pháp Tiếng Việt [Research on Vietnamese Grammar] Hà Nội: Nhà Xuất bản Khoa học Xã hội.
- Nguyen PP 2002 Những vấn đề ngữ pháp tiếng Việt: loại từ và chỉ thị từ [The Grammatical Problems of Vietnamese: Classifiers and instruction words] Hà Nội: Nhà Xuất bản Đại học Quốc gia Hà Nôi.
- Nguyen TC 1975 Từ Loại Danh Từ trong Tiếng Việt Hiện Đại [The Word Class of Nouns in Modern Vietnamese] Hà Nội: Nhà Xuất bản Khoa học Xã hội.
- Nguyen VU 2008 Admixture aspects of Vietnamese classifiers (Manuscript—retrieved 23/12/2010).
- Pham G, K Kohnert & E Carney 2008 'Corpora of Vietnamese texts: Lexical effects of intended audience and publication place' *Behavior Research Methods* 40:154-163.
- Phan VG 1996 Functional Vietnamese /Tiếng Việt Thực Dụng/ Nhà Xuất bản Đồng Nai.
- Thompson LC 1965 *A Vietnamese Grammar* (Mon-Khmer Studies XIII-XIV) Honolulu: University of Hawai'i Press.
- Tran TK, K Bui & DK Pham 1960 Việt Nam văn phạm [Vietnamese Grammar] Hà Nội: Nhà Xuất bản Tân Việt.
- Tran J 2011 The Acquisition of Vietnamese Classifiers Unpublished PhD Thesis University of Hawai'i at Mànoa.
- Truong VK 1883 Grammaire de la langue annamite Saigon: Guilland & Martinon.
- Wierzbicka A 1972 Semantic Primitives Frankfurt: Athenaum.
- ______ 1996 Semantics, Primes and Universals New York: Oxford University Press.

Grammar rules, OK?

What works when teaching a highly endangered Aboriginal language versus a stronger language?

Mary-Anne Gale

Mobile Language Team, University of Adelaide

maryanne.gale@adelaide.edu.au

Abstract. This paper examines the pedagogy of teaching an Aboriginal language under revival such as Ngarrindjeri, versus a stronger language, such as Pitjantjatjara—both languages of South Australia. It challenges the current recommended methodologies based on theory inspired by teaching European and Asian languages, which are invariably spoken fluently by language teachers. These communicative and/or functional approaches are often not possible for the revival situation, particularly if there are no fluent speakers or teachers, and the main source of language texts are written. For this reason, the use of the traditional Grammar Translation Method, once used successfully to teach text-based languages such as Latin and Classical Greek, is arguably a very useful approach for the revival situation. The paper explores the different approaches to teaching languages, and challenges teachers' fears of criticism from advisers driven by theory that sees 'eclectic' as a dirty word.

Keywords. language revival, grammar translation method, Ngarrindjeri, Pitjantjatjara, language teaching methodology, language pedagogy Anthropological linguistics, no less than anthropology itself, is "a child of Western imperialism". [...] In effect, anthropology and anthropological linguistics became disciplines in which Westerners studied, published, and built teaching and research careers around the cultural and linguistic wealth of non-Western peoples.

(Ken Hale, 1972)

How do we recognize the shackles that tradition has placed upon us? For if we can recognize them, we are also able to break them.

(Franz Boas, 1938)

1. Introduction

Since 2003 I have been working in South Australia with the Ngarrindjeri community, of the Lower Lakes and Coorong region, in reviving their language. Due to community demand, we began teaching TAFE language classes in 2007, and with the best of intentions have tried to adopt sound language teaching pedagogy—but with mixed success. How do you "make natural texts" and "create dialogues" when there are no fluent speakers, and the Elders only remember 400 words and a couple of sentences? And how do you develop fluency when the old written source documents are lacking, and contain few complex sentences? Since 2010 I have also been attending Pitjantjatjara language classes, taught by a master teacher, Paul Eckert. Pitjantjatjara, spoken in the remote north-west of the state, is the only language in South Australia that is still being acquired as a first language by children.¹ It has been fascinating to compare the various teaching methodologies that do and don't work for these contrasting language situations.

In this paper I will discuss the challenges of teaching adults a language which is being revived and has no fluent speakers, compared to the possible pedagogical practices of teaching a strong language which has fluent speakers, and a fluent teacher. My focus will be the teaching of adult classes, although there are implications for the teaching of languages to children. When I began planning this

¹ The close dialect Yankunytjatjara is being replaced by Pitjantjatjara, with the younger generation not learning the slight lexical and phonological differences between the two dialects.

paper my intention was to concentrate on the differing **pedagogical** aspects of teaching a strong language versus a language under revival. But as I unpacked the differences it became increasingly evident that it is important to discuss the relevant **linguistic** and **social** aspects of the two contrasting language situations, particularly because they influence the pedagogical choices made.

I also understand that the circumstances of every language program in Aboriginal Australia is different, and each brings its own sets of challenges and rewards, so the conclusions I draw may not apply to every situation. But for the purposes of this paper, I will be drawing from my experiences in South Australia in teaching the newly accredited course, TAFE Certificate III in Learning an Endangered Aboriginal Language, to adult Ngarrindjeri students in 2010-2011. I will contrast this with the Pitjantjatjara adult classes I attended in a Summer School in 2010, offered by the University of South Australia, and the weekly night classes offered by the School of Languages, both taught by Paul Eckert, often alongside Pitjantjatjara/Yankunytjatjara tutors.

2. Reflections on language teaching theory

I will begin by first reflecting on two conference presentations I have attended in the last couple of years, each given by experienced and specialist language teachers. Both presentations made observations about the nature of language teaching textbooks in use in schools, and the pedagogical approaches they espoused (see Morgan *et al.* 2011; and Mickan, 2010). They both observed a clear chronological progression in the adopted teaching approaches used over the years in language classrooms, with the assumption that the later approaches were a clear improvement on previous approaches.

Morgan *et al.* (2011), speaking at the Australian Federation of Modern Language Teachers Association (AFMLTA) conference, listed the following progression:

1900s to 1950s: Grammar Translation Method (GTM)

- with a focus on points of grammar with passages for translation;
- and an emphasis on reading and writing.

1950s and 1960s: Audio Lingual Method

- with a focus on listening and speaking tasks;
- and a use of language laboratories.

1960s and 1970s: Notional-Functional Method

- with a focus on notions or ideas, concepts and topics;
- and an emphasis on functions served by the language being learned.

1980s onwards: Communicative Language Learning

- organised around topics, with exercises to promote meaningful understanding for communication.

Present: Intercultural Language Teaching and Learning

- with a focus on language as part of a social and cultural system;
- uses a range of modern approaches.

The first, supposedly archaic, method listed above is the Grammar Translation Method (GTM). Of this method, Morgan *et al.* stated in their presentation: the GTM approach was used up to the 1960s, and had "little consideration of applicability to 'use' in real, lived contexts", and "no consideration of suitable method" for the Australian learner's context. This may be so for the modern language² situations about which these scholars are concerned, namely the teaching of Indonesian to school students, and for Mickan, the teaching of German in schools. But, for the situations I am concerned with, I want to declare up-front that I unashamedly use the so-called out-dated Grammar Translation Method (GTM) when teaching the Ngarrindjeri language to people whose language hasn't been used in full grammatical sentences for nearly fifty years. Furthermore, elements of this approach are also used regularly by Paul Eckert, as

² The term "modern language" is used throughout this paper in the same sense as used by the AFMLTA (Australian Federation of Modern Language Teachers Associations), which sees languages as either "modern" or "Classical". This usage, however, is contestable and does not adequately recognise the current situation of languages under revival in Australia.

he formally teaches aspects of the Pitjantjatjara language to inquiring adult minds. His translation exercises and grammar explanations greatly assist his adult class as we struggle to understand the (very regular) grammar rules of the strongest Aboriginal language in the state, and the complexity of its grammar, particularly at the discourse level.

The complex pedagogical topic, of when and why there have been changes in approaches over the years for the teaching of languages, is beyond the scope of this paper, but I will digress just briefly here to define and discuss some of the methods mentioned above. I will also indulge by making the general observation that the movement away from the explicit teaching of grammar over the years has been made in the context of teaching modern languages. But the situation we often find ourselves in today in Australia, when we are teaching languages that are being revived, demands that we reassess our chosen methodology. This is because we often find ourselves reviving languages invariably from written sources, and often with no fluent speakers from whom the language can be learnt.

Much of the following explanation of language teaching methods is drawn from Tim Bowen, the much published Slavic language teacher and English-as-a-Foreign Language (EFL) specialist. Like me, Bowen still sees value in the Grammar Translation Method for teaching languages today, but in association with other methods, such as the Communicative Approach. He explains GTM as follows:

The basic approach is to analyze and study the grammatical rules of the language, usually in an order roughly matching the traditional order of the grammar of Latin, and then to practise manipulating grammatical structures through the means of translation both into and from the mother tongue. The method is very much based on the written word and texts are widely in evidence.

Bowen argues that the principle features of GTM "have been central to language teaching throughout the ages and are still valid today".³ But the shift away from a focus on grammar in language teaching came in 1972, according to Bowen, with the British linguist D.A. Wilkins's publication that analysed languages in terms of

³ See Bowen's article "Teaching approaches: the grammar-translation method" at: http://www.onestopenglish.com/support/methodology/teaching-approaches/teaching-approaches-the-grammar-translation-method/146493.article. [See "One Stop English" site, Macmillan Publishers 2000-2012, accessed 11 May 2012.]

"the communicative meanings that learners would need in order to express themselves and to understand effectively". This was followed in 1976 with his "Notional Syllabuses" with a focus on "how language could be categorized on the basis of notions such as quantity, location and time, and functions such as making requests, making offers and apologizing".⁴

This new approach to describing languages, for language learners, has influenced language teaching methodology ever since. It is methodologies that I believe need to be challenged in the modern context of language revival. Bowen suggests most teachers today would also use aspects of the Communicative Approach, but in the "broader sense", whereby "tasks are completed by means of interaction with other learners", with an emphasis on "completing the task successfully through communication with others rather than on the accurate use of form". Bowen goes on to say the adoption of the Communicative Approach was a progressive development in language teaching as the "emphasis switched from the mechanical practice of language patterns associated with the [earlier] Audiolingual Method" to tasks and activities that "engaged the learner in more meaningful and authentic language use".⁵

Bowen seems to be promoting an integrated approach when teaching modern languages today, advocating a methodology that he calls Task-based Learning (TBL). The Notional Functional philosophy was a precursor to this methodology. With TBL, Bowen explains: "The primary focus of classroom activity is the task [...] an activity in which students use language to achieve a specific outcome. The activity reflects real life and learners focus on meaning." ⁶

In advocating an integrated approach to language teaching, which I myself wholeheartedly endorse, Bowen writes:

⁴ See Bowen's article "Teaching approaches: functional approaches in EFL/ ESL" at:

http://www.onestopenglish.com/support/methodology/teaching-approaches/teaching-approaches-functional-approaches-in-efl/-esl/146492.article

⁵ See Bowen's article "Teaching Approaches: the communicative classroom" at:

http://www.onestopenglish.com/support/methodology/teaching-approaches/teaching-appro

⁶ See Bowen's article "Teaching Approaches: task-based learning" at:

http://www.onestopenglish.com/support/methodology/teaching-approaches/teaching-approaches-task-based-learning/146502.article

Learners who are used to a more traditional approach based on a grammatical syllabus may find it difficult to come to terms with the apparent randomness of TBL, but if TBL is integrated with a systematic approach to grammar and lexis, the outcome can be a comprehensive, all-round approach that can be adapted to meet the needs of all learners.⁷

Bowen also writes, from the context of teaching modern languages on the other side of the world, that:

Without a sound knowledge of the grammatical basis of the language it can be argued that the learner is in possession of nothing more than a selection of communicative phrases which are perfectly adequate for basic communication but which will be found wanting when the learner is required to perform any kind of sophisticated linguistic task.⁸

I argue in this paper that the Grammar Translation Method, and variations on this rather traditional method of language teaching, has very special relevance for the learner of Aboriginal languages today, and in a variety of language situations. It is actually very applicable to real life contexts and purposes for Aboriginal people who are reclaiming their languages from old grammars that can only be found in written sources (see Amery 2000:166). One of the main functions being served by Ngarrindjeri (and many of its neighbouring languages that are also being revived) is to name rooms, buildings, streets, parks and organisations, and this can only be done through the Grammar Translation Method. It never ceases to amaze me how much language can be learnt through this process.

3. Some real life teaching examples

I want to make the point up-front here, that much of what I discuss in this paper draws from my experiences of teaching languages to adults. What I imply may not be the most effective way of teaching Aboriginal languages to children. But I am

⁷ See Bowen's article "Teaching Approaches: task-based learning" at:

http://www.onestopenglish.com/support/methodology/teaching-approaches/teaching-appro

⁸ See Bowen's article "Teaching Approaches: the grammar-translation method" at: http://www.onestopenglish.com/support/methodology/teaching-approaches/teaching-approaches-the-grammar-translation-method/146493.article

advocating an integrated or eclectic approach, and I am sure there are elements of the grammar of Aboriginal languages that could be explicitly explained to students within secondary schools, in an understandable way, within the context of taskbased learning.

Recently, our Ngarrindjeri adult class was asked to give a Ngarrindjeri name for the new Nursing and Community Health Centre in Murray Bridge. The students came up with five alternatives, then did a back-translation⁹ of each one to see which phrase best encapsulated the true function of the centre. They finally chose the phrase:

Nanaw-amaldar-il palak tumbi-warr-ur-ambi
caring-doers-ERGATIVE people alive-make-NOMINALISER-for
'[Place for] carers making people well'

The actual process of coming up with the alternative phrases was led by the more advanced students in the class, and was a very practical exercise, as well as a huge learning exercise about Ngarrindjeri grammar.

Another key function being served by languages under revival is "public performance", particularly in dance and song. The Ngarrindjeri people with whom I have been working over the years have formed a couple of singing groups or choirs. One of the very first songs the initial choir performed in public was the popular and very old and familiar hymn *The Old Rugged Cross*. We often perform this song at public events, particularly at funerals, and we get constant requests for recordings of our songs in language. The way we translated each of the verses of this much loved hymn was by the Grammar Translation Method. The process was slow, but was a very effective tool for learning the language, and through the constant performance of this song the adult students have cemented

we have done an adequate job.

⁹ The process of doing a "back translation" is now a key element of our translation activities. We try to look at the text we have translated from English into Ngarrindjeri with fresh eyes, and translate it back into English. If the back translation conveys the original meaning and concept across, we know

in their brains the many words and phrases they came up with in the translation exercise. The hymn begins:

War-itji-war ngurli-war high-it-high.on hill-high.on 'On a hill far away'

Thanggalun rawul yapi

stands old wood/cross

'Stood an old rugged cross'

Many a time, when we need expressions for other translation exercises, we will find ourselves recalling the Ngarrindjeri lines of this now very familiar hymn, and adapting them for a new purpose.¹⁰

Yet another request received by our TAFE class recently was to provide a translation of the Ngurunderi Dreaming narrative, which is the creation story of the Murray River and Coorong region, and the many fish that swim its waters. In 2011, the Murray Bridge Council commissioned an artist to produce nine mosaic scenes for an installation which tells the Ngurunderi story. Our class was asked to produce the nine accompanying plaques that were to tell the entire story in the Ngarrindjeri language. So we approached the task by giving each one of our students a plaque each, to be translated from the English version provided.

This taxing exercise demanded that each student work out how to translate many tricky phrases and complex sentences in the language. It required that they grasp constructions such as relative clauses with transitive and intransitive verbs, and the use of nominalised verbs, plus the formation of complex predicates with

¹⁰ The first line of this hymn was taken in part from one of the many example sentences provided in the quality sketch grammar produced by H. A. E. Meyer in 1843. This resource, which includes a large vocabulary, has proved invaluable for the Ngarrindjeri language revival process. More information on the Ngarrindjeri revival, told from the perspective of the Ngarrindjeri women, can be seen on the website address of the AIATSIS conference in 2009 where the women concluded their presentation by singing *The Old Rugged Cross.* See the paper presentation by M-A. Gale, E. McHughes, P. Williams & V. Koolmatrie called: "Lakun Ngarrindjeri Thunggari: weaving the Ngarrindjeri language back to health", at: http://www.aiatsis.gov.au/research/conf2009/papers/LRE1.html#gale

causative or inchoative verb suffixes. Although the exercise was at times overwhelming, it became an extremely rewarding learning experience. ¹¹ Interestingly, the entire process demonstrated to the students the fact that the Ngarrindjeri language, and its complex grammar, actually lends itself to the grammar constructions required in Dreaming stories. Many of the plaques included constructions demanding the inchoative form, such as: "His canoe became the Milky Way", or "They two became the Pages Island" or "It became a callop fish" etc.

Plaques 5 and 8 below demonstrate the types of challenges the class was faced with:

Plaque 5.

One night Ngurunderi smelt bony bream cooking. This fish was forbidden to women. He was angry and he knew it was from the camp of his two wives who had run away. His two huts became two hills and he stood on them and placed his canoe into the night sky where it became the Milky Way.

Yamalaitji ngendi Ngurunderil pendur thukerar, namurmil. Yikai ma:mi tarnau mi:minar-ambi. Ngurunderi elembi nhraldi, kitji nglelur-itji pulgi-nendi kinawi nginbulur nap-engk-ald. Kinawi tjerang-engk ngurlengk-walembi wunyitji thanggalur kengkun-angk wunyil pinpur kinawi yu:ki ngendi wayirri-ungai kiyau kitji Wayirri Yu:ki-walembi.

Plaque 8.

Ngurunderi heard his wives splashing and laughing near Kings Point. Near Cape Jervis Ngurunderi called out in a voice of thunder for the sea to rise up. His two wives fought the water until they could swim no more and drowned. Their bodies became the Pages Islands.

Ngurunderil kungur kinawi nap-engk plawalun, ka:rnkun-engk mungau Walderineind. Mungau Parrewar-angk Ngurunderi yakai thunggar mantal-luk yarl-ambi 'Pingkelar-engun-ungai ba:rekar!' Kinawi nap-engkul mendhun ba:rekar kengk wrukur tarnalo wuny-engk mirpur. Maralangk-walembi-engk.

¹¹ Note, this exercise was part of a Certificate III level course for adults, and I acknowledge it could be off-putting for some students, and for those who find grammar overwhelming, but I argue that a knowledge of grammar is necessary for those Aboriginal people leading the revival process. Yes, the presence of a linguist is necessary in the first instance, but I have found there are students up to the challenge, and they are the teachers of the future.

4. The sociolinguistics of the revival situation

I will now outline, in general terms, the contrasting sociolinguistic situations that inevitably influence the approaches adopted when teaching a language in a revival situation, such as Ngarrindjeri, compared to teaching a language still spoken fluently, such as Pitjantjatjara. But I would like to emphasise that there are some approaches that can be used effectively for both situations; in fact some features of Aboriginal languages demand certain common approaches be used when teaching adults. These will be discussed later in this paper. But in discussing the inevitable differences below, some of the points made may seem fairly obvious, for the two contrasting contexts, but I think they are still worth articulating, particularly because the revival situation is relatively new in Australia, and does present considerable challenges for teachers and students alike.

4.1 Teacher not fluent in revival situation

The most obvious pedagogical difference between teaching a language under revival versus a strong language such as Pitjantjatjara, is that the teacher is (usually) a fluent speaker for the strong language. In South Australia, there are only a few languages under revival that potentially have fluent teachers, such as Adnyamathanha, Wirangu and possibly Arabana and Dieri, and these speakers are often not available or well enough to teach. Generally in South Australia, the teacher of a language under revival is not a fluent speaker. This has the obvious implication of students not having the regular opportunity of hearing the language being spoken or modelled by a fluent speaker. The students learning a language under revival cannot ask the teacher how to say or construct certain expressions. The teacher of a revival language is often only one or two steps ahead of the students, and the construction of new and complex sentences have to be worked out together in class with the assistance of written sources.¹²

¹² The reason why revival programs in South Australia have been able to proceed with some success is largely because of the linguistic legacy of missionaries (particularly the German missionaries from the Evangelical Lutheran Society of Dresden). Teichelmann and Schürmann compiled a quality sketch grammar and vocabulary for the Kaurna language of the Adelaide Plains in 1840, while H.A.E. Meyer compiled the 1843 Ngarrindjeri materials.

4.2 The clientele or student body is very different

Those studying a language under revival are generally descendants of that language, and feel a strong sense of "righting a wrong" in having their language repatriated with its people. So successes in class tend to improve students sense of identity and well-being, therefore it is important for students to get a sense of success early on, and to always feel in control of the revival process. This contrasts with adult classes in Pitjantjatjara being offered to people often working as teachers or in government service industries to "Close the Gap" (which is an initiative of the government of South Australia). Others study strong languages to halt Alzheimer disease or just because they like learning languages. When the federal government asked for submissions for an "Inquiry into language learning in Indigenous communities" in 2011, the TAFE class in Murray Bridge was happy to participate. The strong feelings that they hold about learning and reclaiming their language was beautifully articulated by our youngest student Michael Lindsay, who was 20 years old at the time:

The Ngarrindjeri language TAFE course classes means a lot to me because we get to learn our true language. We have a great class on Friday with extraordinary people to work with. It is also extremely rewarding when we get to sing songs that we have so bravely translated. I am honoured to be a part of this intriguing and rewarding Ngarrindjeri language TAFE course classes. When I read the words in the dictionary it is like my sister says—that it is our old people who gave the words for us to carry it forward, and it is their voices that are speaking through with the words that they provided. I am happy to be working in my own language with a good lot of people who make it an enjoyable and interesting environment to work in. I hope that more people appreciate our language and would want to get involved. I am so pleased to be a part of this and I hope that it continues now and for generations to come. Because it is a sacred (thing) and it needs to be heard. When people hear us sing or speak they will be rocked by the sheer beauty and strength of this language. 13

¹³ See further TAFE student responses in submission 18 at: http://www.aph.gov.au/house/committee/atsia/languages/submissions.htm

4.3 Few recordings of conversations or discourse level texts in revival languages

In revival contexts there is usually no opportunity for students to immerse themselves in the language, as generally no one knows how to speak longer texts or dialogues, and teachers can't model the language for students. This means it is hard to develop an "ear" for the language, and to get some sense of how the language may have sounded when spoken fluently. It is rare to have any recordings of more than words or brief phrases for languages under revival, despite the admirable efforts of linguists in the past, such as Luise Hercus. He

4.4 Elders retain the authority in revival situation

For revival languages, whose future survival is a tenuous process, the issue of who has authority to teach and work on the language is not straightforward. In the case of Ngarrindjeri, the language never "went to sleep" (as in the case of the Kaurna language of the Adelaide Plains), so the authority in the Ngarrindjeri language always remained with the Elders. The retrieval of the language and its revival back to health, plus the production of contemporary resources, has been done in close consultation with the Elders. The development of new terms and the construction of dialogues and complex sentences only has credibility if it has the stamp of approval of the Elders. This tends to be the case in South Australia even for languages that were sleeping. This contrasts with Pitjantjatjara classes which are often taught, with approval, by Walypala tjuta (white people), often in the absence of Anangu tjuta (Pitjantjatjara/Yankunytjatjara people). They are actually pleased that people unbeknown to them are interested in learning their

¹⁴ There are few recordings of whole phrases and sentences in Ngarrindjeri within the many recordings made by Catherine Ellis and Luise Hercus in the 1960s. These are held at AIATSIS and many have been made available to the community. However, there are considerable recordings made of songs in Ngarrindjeri by Norman Tindale held in the South Australian Museum, which are yet to be accessed and used within the language revival context.

language; and the possibility of their language falling asleep and lying dormant in books for years is not conceivable, at this stage.

4.5 The function of the languages under revival is often performance-based rather than conversational

The current function of the Ngarrindjeri language, and other languages such as Kaurna, tend to be public performances, such as: giving welcome speeches, performing songs and dances at events, and singing hymns at funerals. These activities are generally not spontaneous, with the required texts being produced as group activities after much considered conscious thought. The production of spontaneous dialogues and conversations are often limited to greetings, farewells and some practised formulaic sentences which have been constructed during classes. Other functions often served in the revival situation are politically motivated, such as putting up signs or posters in the local language, and the naming of places and things in the public domain. This is not to say that other more spontaneous functions won't emerge for revival languages in the future, as it is hoped they will, but this all takes time and patience.

5. Personal teaching reflections

Despite the differing circumstances discussed above, in my attempts at teaching Ngarrindjeri at TAFE, alongside two Elders each week, I have tried to adopt a lot of the techniques used and demonstrated by Paul Eckert, who is a true master teacher of Pitjantjatjara. He knows that all good teachers aim towards running a student-centred classroom that tries to meet the needs of students. Good teachers also start where the students are at in their language abilities and understandings, and build on them. But good teachers also know and seek to teach the elements of the language that are necessary and can't be learnt intuitively in the classroom setting (for example by giving formal lessons and explanations on the sound system, and by systematically teaching elements of the grammar of the language).

In my opinion, a good teacher is **eclectic** in their approach and uses any effective method or tools that aid student learning. It is impractical and inefficient to be a purist and follow any one method, just because that may be the latest approach

espoused by the department advisers—whether it be scaffolding, genre-based teaching, accelerated literacy or some other trend that will come and go.¹⁵

For me, using the Grammar Translation Method (GTM) is just one approach within an eclectic approach to teaching languages, and is particularly appropriate for teaching Aboriginal languages, whether they be strong languages or revival languages. I argue that the GTM approach is appropriate for these languages for the following reasons:

- 1. Just as the phonemic spelling and writing system of Aboriginal languages is regular and predictable, so is their grammar. Relative to English, the grammar of Aboriginal languages (whether they be suffixing languages or complex prefixing languages) is predictable and beautifully regular, with few exceptions.
- 2. The grammar of Aboriginal languages is complex, and very different to English, so for adult learners it can be much more efficient to explain this complexity in English through formal grammar lessons, rather than students trying to work it out for themselves in their own time.
- 3. By making the grammatical understandings of a language explicit, rather than implicit, the students are empowered to then teach them to others. Note this is one reason why the many Anangu who live in Adelaide are so reluctant to teach their language formally in class to others. They implicitly know their language and the way the grammar works, but when asked to explain it to others they find it difficult.¹⁶
- 4. By formally teaching grammar you also empower students with a metalanguage to talk about their language in an explicit way, and thus enabling them to teach

elements out of a number of contrasting methodologies for the benefit of their students.

¹⁵ One would be surprised at the number of theorists (often working in universities or as department advisors) who think "eclectic" is a "dirty word", and espouse single philosophies and approaches to teaching languages and literacy. I have witnessed this in two universities. I advocate that a good classroom teacher can strike a balance between a student-centred program versus a teacher-centred program. I also believe that a good classroom practitioner is quite capable of picking the best

¹⁶ One could argue that the communicative approach may be the better methodology for A<u>n</u>angu to teach their language, but the situation always arises in adult classes whereby someone inevitably asks a grammar question. Case endings and suffixes are a very important part of the grammar of Australian languages, and I argue that it can be an empowering thing for fluent speakers to explicitly understand the grammatical system of their own language.

their language formally to others. For me, explicitly teaching the grammar and the metalanguage to talk about it, to the owners of that language, is akin to repatriating the "the cultural and linguistic wealth of non-Western peoples" back to whom it belongs (see Hale (1972), quoted at the beginning of this paper).

6. What methods work for revival situations

So my philosophy for teaching Aboriginal languages under revival is to be eclectic, and to use what methods work, as long as they get the students using the language for meaningful and practical purposes. By adopting a variety of approaches, including the Grammar Translation Method, each student will hopefully get the taste of success, and be encouraged to keep going, and to experience that sense of empowerment that knowledge of one's language brings. The aim is to get students speaking, reading, writing, translating, constructing, creating and performing language. If I were to give names to the very many different approaches we draw from I would include the following methods: GTM, Communicative, Formulaic, Total Physical Response, Task-based, Functional, Genre-based, Audio-Lingual and Computer Assisted Learning.¹⁷

For the sake of efficiency, I am going to summarise, in list form, what has brought success to the Ngarrindjeri language classrooms in which I have been involved. The classes for the Certificate III, in Learning an Endangered Aboriginal Language, ran for 15 months over 5 terms. We had lessons for 2 full days a week for 2 terms and then 1 day a week for 3 terms. By the end of 2011, we had 8 successful Ngarrindjeri graduates. As you will see, we take every opportunity we can to use the language together in practical ways:

_

¹⁷ For an explanation of the Formulaic Method see Amery (2000:209-12). He espouses the learning of formulaic utterances such as greetings, farewells etc. Total Physical Response is more an activity used in the classroom, particularly to get children to listen to commands and instructions in the language. All these approaches are discussed in the TAFE Certificate IV Teaching an Endangered Aboriginal Language, which I developed for training Aboriginal language teachers, and is yet to be trialled or taught. It is available to any registered training organisation. See www.training.gov.au

- 1. Brainstorming about the meaningful purposes and genres for the language.
- 2. Collaboratively writing group texts that model the different genres of chosen texts.
- 3. Individuals giving self introductory speeches to any visitors to our class.
- 4. Translating old hymns and favourite songs together as a group.
- 5. Singing songs in language in every lesson.
- 6. Writing speeches collaboratively.
- 7. Sharing time when we share with each other any opportunities we have had over the week to use or talk about language.
- 8. Yunti Yanun time ("talking together time") at each lesson, with language-only sessions of 5 to 10 minutes, with no English.
- 9. Using morning tea and lunch time as an opportunity to use formulaic language.
- 10. Having regular spelling tests run by the Elders or other class members.
- 11. Having transcription exercises, again run by Elders.
- 12. Using electronic Toolbox dictionary for all searches for translation exercises.
- 13. Formal lessons that explain the sound system and spelling rules.
- 14. Formal grammar lessons on each of the parts of speech: verbs, nouns, pronouns etc.
- 15. Formal grammar lessons on constructing simple and complex sentences.
- 16. Playing CDs containing Elders pronouncing all the words remembered.
- 17. Using the language at every opportunity, such as in emails, text messaging, on Facebook.
- 18. Setting up class rules that encourage class members to have a go at using language in a supportive and non-threatening environment.

- 19. Using formal requests for Ngarrindjeri names and translation exercises as a group learning activity.
- 20. Performing in public using the language at every opportunity offered.

For further insight into the methods used, and the successes achieved in other language revival situations in Australia, I recommend the reader to the recently published and very valuable resource Re-awakening Languages: theory and practice in the revitalisation of Australia's Indigenous languages (Hobson et al. 2010). Another recent paper worth reading on reviving languages is Zuckermann & Walsh (2011), which refers to the revival of Israeli, and makes some reference to the Kaurna language.

7. What methods work for strong languages?

In contrast to the revival situation, the following language teaching methods can be used in teaching stronger languages such as Pitjantjatjara: Immersion, Master-Apprentice and, with more potential or chances of success, the Communicative approach, Audio-Lingual, Computer Assisted and the Accelerated Second Language Acquisition approach (ASLA).¹⁸

The following list outlines just some of the sound teaching methods and techniques that are possible when teaching strong languages:

- 1. Being an active listener, constantly listening to the language at home on pre-recorded CDs of narratives and language drills.
- 2. Constructing long texts in class with all the discourse markers and styles of a healthy language that is still spoken fluently.
- 3. Looking, thinking and listening to the teachers as he/she models natural dialogues.

¹⁸ The Master-Apprentice approach was developed by the linguist Leanne Hinton for the Indigenous languages of California, and involves a fluent speaker (the "master") regularly spending intense periods of time with the language learner (the "apprentice"). The aim is to teach the language to the apprentice through immersion, whereby only the target language is spoken (see Hinton 1994). Hinton came to Australia in April 2012 to teach this approach to Aboriginal language teachers and learners. Within the trainee group were Karina Lester and her mother Lucy Lester, both fluent Pitjantjatjara/Yankunytjatjara speakers, who are now training others in the method.

- 4. Mimicking the teacher as he/she models natural sentences with fluent speech, using the intonation and pragmatics of the language.
- 5. Getting the teacher to record long sentences onto student iPhones.
- 6. Consulting the many sentence examples in the contemporary dictionary which outlines the different senses and uses of words in natural sentences.
- 7. Putting away the books and pens, on a regular basis, and having longer and more sustained oral language sessions in just the target language, with no English.
- 8. Seeking out speakers in an effort to develop an ear for the language and gaining a good passive knowledge of the different genres of the language.
- 9. Being prepared to go outside student comfort zones, and practise regularly speaking the language with fluent speakers, and making mistakes in front of others in an effort to learn the correct usage of the language.
- 10. Trying to learn idiomatic usage of the language and practise using idioms in one's speech.

8. The necessary ingredients for all language classes

Despite the inevitable differences in the possible approaches and activities that can be undertaken when teaching a language that is being revived, versus teaching a stronger language such as Pitjantjatjara, there are some common and core ingredients that are necessary for success. I have written in detail about these in another paper (Gale forthcoming), but would like to briefly mention them here before concluding. Experience tells me that these core ingredients aid success in the adult classroom in particular, in a range of language situations, and whether one is teaching a strong language or a language undergoing revival.

These core ingredients include: quality language resources, especially a dictionary that includes a finder list from English to the target Aboriginal language; a learners' guide which explains the grammar simply for the lay person with lots of sentence examples; a pronunciation guide which includes oral sound files of

example words; regular classes which offer a qualification at the end, to ensure dedication; a teaching team that includes recognised community members plus teachers with language teaching experience and linguistic understandings; and finally, systemic financial support to sustain the running of the language classes. Without these essentials, teaching any language is an up-hill battle, but particularly difficult for languages which cannot be learnt by sitting under a tree with a fluent master teacher.

9. Conclusion

In conclusion, I would like to return to the main argument of this paper, and that is, for the language revival situation in Australia, we should not be frightened to teach grammar. Grammar rules, OK? I argue that teachers should not shy away from teaching Aboriginal languages using the old tried and tested methodologies, such as the Grammar Translation Method (GTM), even if they are no longer popular or espoused by the language teaching specialists. The theoretical developments over the years among academics, working in the field of language pedagogy, have been largely based on the teaching of modern languages to children. They have also based their theory on the teaching of languages that are spoken fluently, especially by the teacher. The situation of language revival, whereby the language teacher may not even be fluent in the language, is not even on their radar.

It is for this reason that we need to challenge the theory, and acknowledge that learning a language in a revival situation calls for open-minded and selective approaches. Hence one of the approaches I recommend is the tried and tested, and very traditional approach of GTM. This approach worked for teaching the classical, text-based languages of Latin and Biblical Greek, so it should be no surprise that the case marking system of Latin in particular is not so different to that of Australian languages. As in teaching Latin in the modern context, GTM necessitates a dependency on written texts and the learning of grammar, and particularly the teaching of grammar through the learning tool of group translation exercises, from English to the target language, and vice versa.

But this is not to say, of course, that teachers should only use the traditional method of GTM. A good teacher, in my opinion, is an eclectic teacher. There are many skills and understandings to be learnt by students in an eclectic classroom. Teachers need to draw from the many methodologies available, and strategically select from those that have something to offer their own language situation and their own students' needs. If students desire developing a certain degree of communicative competence in their language, then the communicative approach has much to offer. But teachers should definitely not be blinded in their choices by the bias shown for the latest popular teaching methodology, which is often based on the modern language context for the teaching of European or Asian languages. These are the "shackles" that we need to shake off in the language revival classroom, to use Boas's expression, as quoted at the beginning of this paper.

References

Amery R 2000 Warrabarna Kaurnal: reclaiming an Australian language Lisse: Swetz & Zeitlinger.

Boas F 1938 'An anthropologist's credo' The Nation 147:201-204.

Bowen T 2000–2012 One Stop English Macmillan.

http://www.onestopenglish.com/support/methodology/teaching-approaches/ [On-line teaching resources on various Teaching Approaches. Accessed 27 May 2012.]

Gale MA Forthcoming 'We just want to learn our own language: The Ngarrindjeri and other language revival experiences in South Australia' Language Documentation and Conservation.

Gale MA, E McHughes, P Williams & V Koolmatrie 2009 Lakun Ngarrindjeri Thunggari: Weaving the Ngarrindjeri language back to health Conference presentation, AIATSIS, Canberra September 2000

http://www.aiatsis.gov.au/research/conf2009/papers/LRE1.html#gale (accessed 27 May 2012)

Hale K 1972 'Some questions about anthropological linguistics: the role of native knowledge' in D Hymes (ed) *Reinventing Anthropology* New York: Pantheon Books. Pp. 382-397.

Hinton L 1994 Flutes of Fire: Essays on Californian Indian languages Berkeley: Heyday Books.

Hobson J, K Lowe, S Poetsch, M Walsh 2010 Re-awakening Languages: Theory and practice in the revitalisation of Australia's Indigenous languages Sydney: University of Sydney Press.

Meyer HAE 1843 Vocabulary of the Language Spoken by the Aborigines of the Southern and Eastern Portions of the Settled Districts of South Australia, preceded by a Grammar Adelaide: James Allen.

Mickan P 2010 So Einfach! Making sense of German and Germans in school textbooks Conference presentation, German-Australian Connections: transnational and transcultural links between German-speaking countries and Australia, Adelaide September 2010.

- Morgan AM, M Kohler & L Harbon 2011 'Theorising, conceptualising, and reflecting on developing intercultural language teaching and learning resources: A personal journey' Conference presentation, Australian Federation of Modern Language Teachers Association, Darwin July 2011.
- Teichelmann CG & CW Schürmann 1840 Outlines of a Grammar, Vocabulary, and Phraseology, of the Aboriginal Language of South Australia, Spoken by the Natives in and for some Distance around Adelaide Adelaide: published by authors.
- Zuckermann GA & M Walsh 2011 'Stop, revive, survive: Lessons from the Hebrew revival applicable to the reclamation, maintenance and empowerment of Aboriginal languages and cultures' *Australian Journal of Linguistics* 31(1):111-128.

I can haz language play: The construction of language and identity in LOLspeak

Lauren Gawne and Jill Vaughan
University of Melbourne
l.gawne@pgrad.unimelb.edu.au
j.vaughan@unimelb.edu.au

Abstract. LOLspeak is a complex and systematic reimagining of the English language. It is most often associated with the popular, productive and long-lasting Internet meme 'LOLcats'. This style of English is characterised by the simultaneous playful manipulation of multiple levels of language.

Using community-generated web content as a corpus, we analyse some of the common language play strategies (Sherzer 2002) used in LOLspeak, which include morphological reanalysis, atypical sentence structure and lexical playfulness. The linguistic variety that emerges from these manipulations displays collaboratively constructed norms and tendencies providing a standard which may be meaningfully adhered to or subverted by users.

We conclude with a discussion of why people may choose to participate in such language play, and suggest that the language play strategies used by participants allow for the construction of complex identity.

Keywords. language play, computer-mediated communication, English grammar, LOLcats, Internet memes

ANU Research Repository – http://hdl.handle.net/1885/9404

Proceedings of the 42nd Australian Linguistic Society Conference – 2011

1. Introduction:

oh hai!

In the last decade, the Internet has been established as a fertile domain of language use. While some electronic communication like text and instant messaging have attracted academic study, there is a rich world of linguistic diversity on the Internet that has received scant attention from linguistic researchers. In this paper we provide an initial discussion of LOLspeak, the language style closely associated with the popular, productive and long-lasting Internet meme "LOLcats". LOLspeak is a playful variety of English that shows complex and multi-faceted manipulation of Standard English for entertaining ends. In this paper we explore some of the main linguistic features of LOLspeak.

First we briefly outline the origins of LOLspeak (§2). We then turn our attention to what LOLspeak is, by first looking at what LOLspeak isn't (§3.1) and by situating it in terms of "language play" (§3.2). We then give a summary of previous research on LOLcats and LOLspeak (§4) before turning to our own analysis. In §5 we present a "sketch grammar" of LOLspeak, where we examine the phenomenon from a number of structural perspectives. These include orthography and phonetics (§5.1), lexicon (§5.2), morphology (§5.3), syntax (§5.4) and the clausal level (§5.5). We conclude (§6) with a discussion of what might be motivating this language play and look at future applications of our analysis.

2. The origins of LOLspeak and LOLcats:

how teh LOLkittehs waz maded

The history of LOLspeak is inseparable from the LOLcats Internet meme that has captured the popular imagination. LOLcats¹ are images of cats with funny captions in non-Standard English, often referred to simply as "LOLcats" and at other times referred to as "image macros". As discussed in Braswell, Garay, Saggese & Schiffman (2008), Brillman, Gander & Guillen (2008) and Anderson, House, Locke & Schirmann (2008), LOLcats are one of the cuter tropes to have

¹ "LOL" is an acronym for "laugh out loud" that originated on-line but is now also commonly used in face-to-face interactions.

evolved from the primordial soup of short-lived fads that is the 4chan website². 4chan is an anonymous messaging board with a high turnover of posts, and it is here, on the "Random" ("/b/") message board³, that "Caturday" began sometime in 2006 or 2007. Caturday (Saturday) was an opportunity to share silly images of cats, a human tendency that existed well before LOLcats. In January 2007, Eric Nakagawa created the *I can has cheezburger* website⁴ (ICHC) to share the most entertaining images with his girlfriend. Below is the first image that appeared on the site and also gave it its name:



Figure 1. "I can has cheezburger?" cat⁵.

The popularity of the site exploded and in September 2007 Ben Huh purchased the website (Wang 2009) and has expanded it into an Internet empire of similar image macros, including *I has a hotdog* for images of dogs, *Totally looks like* which compares images of celebrities to people, animals or things they look like, and *FAIL blog* which has images of blatant stupidity or incompetence. Although many

² http://www.4chan.org/ There is ongoing discussion that we have observed in the 4chan community as to whether LOLcats and many of the other tropes we observe really did originate from 4chan, or from other usenet boards on the Internet. An in-depth study of origins of LOLcat tropes is beyond the scope of this paper, but would certainly be an interesting line of enquiry.

³ http://boards.4chan.org/b/

⁴ www.icanhascheezburger.com

⁵ The humour of this macro initially seems to derive from the unexpected, anthropomorphic and clumsily articulated desire of the cat for a cheeseburger, as well as the cat's comical expression. The humour has been compounded over time due to repetition and recontextualisations using the image and the phrasal template as tropes.

of these sites involve similar tropes to those found on the LOLcats site, they also have their own variations on the theme.

LOLspeak found its popularity in a narrow domain, but has since broadened in its appeal. The spread from 4chan to the ICHC blog and its growing stable of subsidiaries was matched by an uptake in other corners of the Internet. Subcultures took the trope and made it their own, and as such the Internet is peppered with collections like LOLlibrarians, LOLpresidents and even LOLlinguists.

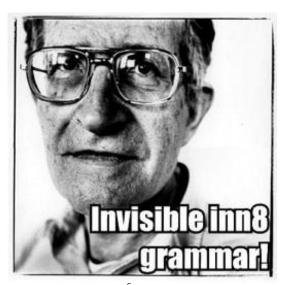


Figure 2. LOLlinguist⁶.

LOLspeak has moved beyond the image-caption limits of image macros and has spread even further. To give a very crude statistic that captures the spread of LOLspeak, an Internet search for the iconic LOLspeak string "I can haz" without mention of "cheezburger" still throws up over 18 million hits. One of the most popular and enduring homes that LOLspeak has found outside of the domain of Cheezburgers is the LOLcat Bible⁷. The LOLcat Bible project was established back in July 2007 by Martin Grondin as LOLcats were enjoying their first wave of fame, with the aim of rewriting the Bible in LOLspeak. While Grondin was responsible for kicking off the LOLcats Bible project, many have contributed to its growth through its wiki-format collaborative structure. Large sections of the Bible,

⁶ Photo: Trisha Weir (http://www.flickr.com/photos/97491454@N00/483236285)

⁷ www.lolcatbible.com

both Old and New Testaments, have now been 'translated' and a book of the collaborative work has been published (Grondin 2010).

3. So what is LOLspeak?: what teh kittehs sedz?

Having established the origins and spread of the LOLcat community, we now address the nature of LOLspeak. Many people have attempted to define LOLspeak and its relationship to English by comparing it to other existing phenomena—some with more success than others. Calka (2011b:9) asserts that "the closest approximation would be to imagine English put through an automatic translator into another language and then translated back and spelled phonetically"—an appealing description, but one that ignores the many regularities and patterns of LOLspeak. Others are more dismissive, one web scholar describing it as "the stupidest possible creative act" (Shirky 2010, quoted in Miltner 2011:9). Here we introduce LOLspeak as a phenomenon by first looking at what it is *not* (§3.1) and then turning our attention to what it is (§3.2) (see §5 for a more in-depth linguistic analysis).

As something that originated in a written medium, LOLspeak reflects the asynchronous style used in the local discourse context of LOL-based Internet sites. The original image macros and the LOLcat Bible are both non-dyadic communicative styles—along with the asynchronous nature, this meant that people had time to compose their utterances. As Calka (2011b) notes, people now frequently use LOLspeak for extended asynchronous message-board postings within the ICHC domain. This is more dyadic in its communicative structure. We have also observed that people within our social domain are using LOLspeak in synchronous instant messaging and chat situations as well. It would be interesting to see how LOLspeak varies across all these media, but this is unfortunately beyond the scope of this paper. Instead, we will be focusing on the asynchronous non-dyadic language found in the images and the LOLcat Bible, which can hopefully be of use for anyone with future plans to expand the domains of this research.

As all of the image-based uses of LOLspeak involve short examples, we will look at some extended prose from the LOLcat Bible project instead, to illustrate the coherent co-construction present across multiple utterances. Below are the first five verses of Genesis, a paragraph of text that should be familiar to many people:

- (1) a. Oh hai. In teh beginnin Ceiling Cat maded teh skiez An da Urfs, but he did not eated dem
 - b. Da Urfs no had shapez An haded dark face, An Ceiling Cat rode invisible bike over teh waterz
 - c. At start, no has lyte. An Ceiling Cat sayz, i can haz lite? An lite wuz
 - d. An Ceiling Cat sawed teh lite, to seez stuffs, An splitted teh lite from dark but taht wuz ok cuz kittehs can see in teh dark An not tripz over nethin
 - e. An Ceiling Cat sayed light Day An dark no Day. It were FURST!!!1

The first thing to note is that it is, even to the non-initiated, identifiable as English. Certainly, there are many non-standard forms and constructions, and possibly some unfamiliar lexical items, but on the whole it is not impossible to figure out what this text is.

3.1 What LOLspeak isn't

It is apparent that this style of language takes its inspiration from many sources. The capitalisation and exclamation marks show the language's gaming background, and are also found in "leet" speak, while some shortenings are more reminiscent of text speech. Some sections read like L1 or L2 acquisition errors, or even a creolised English. Although LOLspeak shares features with these and many other linguistic phenomena, none of them quite explain the LOLspeak phenomenon or account for all discernable stylistic choices.

Leet uses numbers and symbols to replace letters, such as L0Lsp33k ("LOLspeak") or L337 ("leet"), and "text speak" more frequently uses rebus-like substitutes, such as R ("are") and 4 ("for"). Although LOLspeak certainly borrows some of these features, it does not use them as frequently as leet does.

Some features such as over/under-application of plurals and over regularisation of verb paradigms ("eated" for "ate") do look like language acquisition errors, however the language used in LOLspeak is too complex in all other respects to

assume that users of LOLspeak are only trying to mimic first/second language learners.

It has been put forward (e.g. Dash 2007) that perhaps LOLspeak is a type of pidgin language. This may at first be an appealing proposition (not only because we could then refer to "kitty pidgin"). We can very easily imagine English to be our superstrate lexifying language, but there is clearly no "cat substrate" in this situation. Instead we see LOLspeak emerging purely from a manipulation of English and therefore not appropriately a creole or a pidgin.

Although it is a manipulation of English, it doesn't fall easily into the category of "play language" that typically involves some kind of manipulation of a linguistic system. In a discussion of play languages, Sherzer (2002:26) notes that systems like Verlan and Pig Latin are "linguistic codes derived by a small set of rules from a language in use in a particular speech community". The rules required to create successful LOLspeak are more than just a "small set" and are distinct from something like Pig Latin in that they occur at every linguistic level, not just the phonological level. If we want to call LOLspeak a play language we would need to broaden our understanding of what a play language is.

Although LOLspeak displays a range of similarities to other phenomena, what is ultimately so interesting about it is that we see a wide range of underlying norms and tendencies instead of a single defining feature or process.

3.2 What LOLspeak is: language play

Now that we have looked at some of the things that we can say LOLspeak *is not*, we can turn our attention to frameworks that account for what it is. In this section we will look at LOLspeak as a type of language play. While "play languages" discussed above involve small sets of rules, "language play" is a broader term encompassing a wide variety of ways people can creatively manipulate language for playful ends.

LOLspeak is above all playful in nature. LOLspeakers do not use grammatically incorrect English because they can't use Standard English; they are doing it because they are playing with the rules of English. Play is central to our understanding of ourselves as human. As Huizinga discussed in *Homo Ludens*

(1955), play gives us an opportunity to voluntarily step out of real life into a demarcated place and engage in an entertaining activity with its own, often unwritten, rules. This idea of play sounds to us exactly what many who read LOLcats and use LOLspeak do, including the voluntary nature and high levels of metalinguistic awareness, and is central to our understanding of what triggers people's engagement with LOLspeak. The playful manipulation of language has been explored in two recent monographs which both take slightly different angles on this kind of behaviour.

The first is Cook's Language Play, Language Learning (2000). Cook looks at language play as a vital component of cognitive development, intersecting with the development of imagination and ideas. The first half of the book looks at how manipulating and playing with language through rhyme, chant, song and other language games helps first language acquisition. Later, he discusses how the manipulation of language has potential for "bringing people together and forcing them apart, distinguishing between those who are in and those who are out" (63). The ability to be simultaneously inclusive and exclusive is fundamental to LOLspeak; those who are "out" may not understand that the joke comes from this manipulation.

The second recent text to address this area is Sherzer's *Speech play* (2002). Although Sherzer gives the phenomenon a slightly different name, he is also interested in the way people playfully manipulate language. Sherzer discusses the way speech play is a metacommentary, both implicit and explicit, on the linguistic systems that are being manipulated, and on the society, culture and interactions those manipulations are indexing (2002:1). Most of the volume focuses on different types of linguistic manipulation, and looks at how these contribute to the poetics of speech.

While both Sherzer (2002:26) and Cook (2002:123) look at language play on multiple levels, they only tend to focus on phenomena that manipulate one level at a time. LOLspeak involves the manipulation of every linguistic level, and for this reason we believe that an understanding of the processes in LOLspeak is an important contribution to an understanding of language play.

Whether calling it speech or language play, both authors are looking at the same phenomenon: the manipulation of the linguistic system for play. They also both acknowledge, in their own focus of study, that although many dismiss language play as frivolous, it has much to tell us about how people use and manipulate language. Indeed, Crystal (1998:222) goes so far as to ask, "Might it be that language play is actually what makes us human?" We have decided to use the term "language play" instead of "speech play" because while we agree with many of Sherzer's ideas and insights, his work is more focused on the domain of the oral performance of language play, whereas LOLspeak is fundamentally not about "speech" at all, but about language more generally.

4. Work on LOLcats:

hoomanz what studiez teh kittehs

Although LOLcats is, by the standards of the Internet, a long-lived and well-established phenomenon, it has received relatively little scholarly attention, and next to no linguistic analyses. As early as April 2007, Anil Dash noted that LOLcats display some kind of linguistic standard and that it is possible to get LOLspeak "wrong". This was picked up by Mark Liberman at Language Log (Liberman 2007). In 2008, a group of students worked with Bambi Schieffelin at New York University to look at the origins of LOLcats and their cultural import (Braswell, Garay, Saggese & Schiffman 2008; Brillman, Gander & Guillen 2008; Anderson, House, Locke & Schirmann 2008). These papers track the nascent growth of the LOLspeak phenomenon, some major tropes and the reaction of Internet users to LOLspeak.

LOLcats have also been examined for the on-line community that they foster. Calka has done extensive work looking at a community of people who frequent the ICHC website, called "Cheezland" by community members (Calka 2011a). Calka acknowledges that the use of LOLspeak is one important factor in the maintenance of the on-line community, but does not analyse this language, only exploring when it is used. Miltner's (2011) recently completed MA thesis explores LOLcats in terms of genre and appreciation. Her work is an analysis of LOLcat-reading focus groups, and, like Calka, explores the community that has evolved

around LOLcats. She touches on LOLspeak, but mainly from the perspective of participants' enjoyment and performance of LOLspeak, and its role in defining who is part of the LOLcat-reading community in-group (Miltner 2011:30-32). Not all of the work has been focused on the community practices that have evolved around LOLcats—Brubaker (2008) looks at the use of captioned text in LOLcats, in comparison to the intertitles in silent film, and how both are used to expand the visual narrative.

Although it was early in the existence of LOLcats that Dash noticed their linguistic sophistication, there has been very little work published that looks indepth at the linguistic structures present in LOLspeak. One paper that does attempt to understand the linguistic features of LOLspeak is Rosen (2010). Rosen shows that users of LOLspeak have intuitions about what constitutes a valid sentence and points to the diverse range of influences on LOLspeak, including leet and other Internet forms, focusing mainly on matters of orthography and pronunciation. We are also aware of a currently unpublished honours thesis that discusses the grammatical properties of LOLSpeak (Hill 2010) and we believe it likely that there are a number of similar unpublished works across the world.

5. A "sketch grammar" of LOLspeak: grammarz, how we makes it

Now that we have situated the LOLspeak phenomenon in both popular culture and linguistic theory, we will examine exactly what LOLspeak involves. In this section we will look at different linguistic features of LOLspeak: in turn phonetics and orthography, lexicon, morphology, syntax and the clause. Of course it is impossible to fully describe LOLspeak in a short outline, so instead, in each section we will concentrate on what we perceive to be some of the most salient or interesting features. Although we have structured this section like the kind of introductory sketch grammar you will find on many languages, we do of course acknowledge that LOLspeak is a different species altogether. All languages are group-validated norms and tendencies, but these are not as robust for LOLspeak as they are for natural languages. Having said that, there is certainly a feeling

among users that some examples of LOLspeak are "better" than others, as illustrated in the interview extract below:

(2) JT: Yeah, you can spot the n00bs.

Interviewer: Yeah, the nOObs. So, how can you spot a nOOb?

JT: Wrong font, wrong syntax. Just wrong.

AB: Shouting.

(JT, 38, MemeGeek, female; AB, 72, Cheezfrend, female)

(from Miltner 2011:27)

And the rules, or norms, that prompt these kinds of reactions can also be meaningfully subverted for comic ends, such as in the image below where the cat speaks in an extremely formal register in sharp contrast to the inherent formality of LOLspeak:

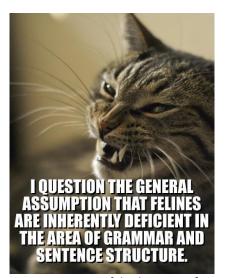


Figure 3. Meaningful subversion of LOLspeak grammar.

It is therefore the nebulous rules and norms that govern "grammaticality" judgements and allow for deliberate subversion that we attempt to capture here. Of course, for every feature of LOLspeak we discuss, it is likely that you will find numerous of counter examples, as such is the nature of language play. LOLspeak is nothing if not creative. There is certainly potential for a quantitative corpus interrogation of LOLspeak, but for this study we have taken a more qualitative approach.

We use the LOLcat Bible as our main reference. There are several reasons for this. As mentioned above, we are interested in this initial stage in focusing on the asynchronous non-dyadic uses of LOLspeak, as this is where the style originated. LOLcat images have only a small amount of text whose constructions are more limited than those found in the Bible. Also, the Bible is a wiki-based collaborative effort. Individual images on ICHC are rated by viewers, and an argument could be made that a higher rating correlates with better examples of LOLspeak. However, there are too many other factors at play in these ratings (e.g. cuteness of the kitty, font choice, reference to other memes), and this is not a useful measure. In contrast, the LOLcat Bible was created collaboratively, with passages being changed multiple times until consensus was reached. Thus the LOLcat Bible represents the most agreed-upon example of what LOLspeak is. We focus on the early chapters of Genesis, partly for their familiarity, and because, being at the start of the wiki project, they have received the most critical re-editing from contributors.

5.1 Phonetics and orthography

Because LOLspeak started in a written medium, it is difficult to separate out features that we would normally divide into the domains of orthography and phonetics in other phenomena. Indeed, what becomes quite apparent about LOLspeak is that what we might consider to be "phonetic" is often motivated by the orthographic conventions. That the orthography has helped shape this example of language play indicates just how central the written form is to LOLspeak. One obvious set of orthographic-based features of LOLspeak is the deliberate incorporation of fast-typing errors. We see two of the most common in the first verse of Genesis:

(3) Genesis 01:02 In **teh** beginnin Ceiling Cat maded teh skiez An **da** Urfs, but he did not eated dem.

The inversion of the letters in *the* to give *teh* is a common typing mistake, but the mistake has been appropriated as the standard form in LOLspeak. This adds to the joke—what looks non-standard to the outsider is the standard for the group. This orthographic joke has interestingly bled into pronunciation—when people read LOLcats aloud they don't say "the" [ðə] but instead say [tə]. It should be noted that within one sentence we have two uses of "teh" and one use of "da", another common replacement for 'the'—a simplification of the interdental

fricative. This exemplifies the fact that LOLspeak's "rules" are not as rigid as those of natural languages. The "da" form is not as common as "teh" in LOLspeak—in the first chapter of Genesis alone we have 23 uses of "teh" and only 2 of "da". So common is this trope that it has moved beyond the determiner "teh" and we find it in other strings of "teh" as well, such as in Genesis 01:24 "otehr" for "other" or Genesis 01:30 "tehre" for "there".

Another error that has been accepted as a standard form in LOLSpeak is the interspersion of exclamation marks with the numeral one.

(4) Genesis 01:03 *It were FURST!!!1*

This is a common error: while typing fast, the finger lifts from the shift key. However, here it is not done as an error, but as a joke to show the person is typing fast, and this joke has turned into the accepted form. Both "teh" and "!!!1" are adopted from leetspeak, originating on Internet gaming chat rooms. The lack of focus on standardised English and fast pace of typing while gaming meant that many errors were eventually codified into the in-group language.

We also find another common leet-origin typing joke in LOLspeak, although it doesn't occur as frequently. The word "pwn" ("own" or "pown") is common in leet, in which it is a verb originating from the English "own", used to show your dominance over another, originally in a gaming domain ("I pwned you in that round"). It started as a common typing error but then was taken up as a standard form. We see some examples in LOLspeak, for example Genesis 01:28 *An p0wn teh waterz* however it has not made its way to LOLspeak with the same level of popularity as the other forms, probably owning to the fact that it is not particularly thematically appropriate in the LOLcat worldview (see §5.2. below on the LOLcat lexicon).

We also see other typographical errors that are common in leet, such as the use of the numerical character "0" for the letter "o" as in "p0wn" above or "w00t" (Genesis 01:19)—these are not necessarily typographical jokes but have become quite standardised in LOLspeak. We also see rebus-like uses of letters and numbers "4" instead "for" (Genesis 01:08), or "ur" for "your" (Genesis 01:06).

As well as the use of non-standard characters that draws from the leet tradition, there is also a tendency towards non-standard capitalisation. These are most commonly nouns, and we find things like "Urfs" ("earth", Genesis 01:01) and "Day" ("day", Genesis 01:05) but we find words of other word classes such as "Beholdt" ("behold", Genesis 01:29). An interesting case is the capitalisation of "An" (and)—a conjunction that is liberally interspersed into the text to give a breathless running feel to the narrative, the capitalisation here emphasising this function:

- (5) a. Genesis 01:01 Oh hai. In teh beginnin Ceiling Cat maded teh skiez **An** da Urfs, but he did not eated dem
 - b. Genesis 01:02 Da Urfs no had shapez **An** haded dark face, An Ceiling Cat rode invisible bike over teh waterz
 - c. Genesis 01:05 **An** Ceiling Cat sayed light Day **An** dark no Day. It were FURST!!!1

We also see in the last example that "FURST" is entirely capitalised. This is also a common strategy in LOLspeak. Most LOLcat images use an all-capitalised font, but in the Bible the majority of the text is presented in lower case. This gives the opportunity to use caps to add emphasis to a word or phrase, a common strategy in computer-mediated communication. As we see in the examples below, this adds to the humorous portrayal of the over-excitable and erratic personality of a stereotypical cat:

- (6) a. Genesis 01:09 An Ceiling Cat hadz dry placez cuz kittehs **DO NOT WANT** get wet
 - b. Genesis 01:24 An Ceiling Cat sayed, i can has **MOAR** living stuff

While we've seen above with "teh" that the orthography of LOLspeak can influence the way that people pronounce it, we also find that some of the orthography is based on the phonetics of English. We see this with the use of "z" (e.g. to denote plurals, 3rd person singular morphemes) where the voiced form is expected but the orthography of Standard English uses "s":

- (7) a. Genesis 01:02 teh waterz
 - b. Genesis 01:03 An lite wuz
 - c. Genesis 01:12 so, letz there be weedz

But, of course, being LOLspeak, this tendency can be over-used for playful effect, and thus we find at other points in the data the use of the grapheme usually associated with the voiced fricative extended to the voiceless fricative, as in "shapez" (Genesis 01:02) and "tripz" (Genesis 01:04).

We find other features of non-standard orthography in LOLspeak, which echo the varieties of English we find used in non-Standard domains. For example, we find some features stereotypical of child language acquisition, such as the metathesis in the rendering of "animal" as "aminal" (Genesis 01:24). We also find that often the English velar nasal "ng" is written as "n" so we get "beginnin", (Genesis 01:01), "nethin" (Genesis 01:04), and "makin" (Genesis 01:06). Along with the over-use of the "s" to "z" transposition discussed above, this is reminiscent of AAVE and other non-standard varieties of English.

This leads to an interesting feature of LOLspeak. For something that started as a written joke, the orthography tends to indicate a strong link to a particular style of speaking. In our interactions with people who engage with LOLcats and LOLspeak, they frequently have a voice in their head as to how a LOLcat speaks. These tend to be high pitched, with strong vowel distinctions and child-like intonation, but not exclusively. In Miltner (2011) we find that several LOLcat fans make mention of the LOLcat accent, for example "I could immediately hear a cat's voice" (58), but there is no discussion of exactly what that accent might sound like. Given the very evocative nature of the LOLspeak orthography we think it would be an interesting avenue of research to discover just how people realise the LOLcat accent.

5.2 Lexicon

LOLspeak also has its own playful lexicon. In this section we will look at three main aspects of the lexicon: words borrowed from leet and other computer-mediated genres, words specific to "cat world" and lexical choices specific to the LOLcat Bible.

Many common lexical items in the LOLspeak vocabulary also have a home in other Internet genres. Items like "p0wn" (Genesis 01:28), "kthxbai" (Genesis 01:31) and "teh" all have their origins in leet and other gaming and chat board groups. Other items are not necessarily from an established genre but have their

place in general Internet humour, such as the comical use of "jazzhands" here, which is humorous due to the juxtaposition of earnest biblical narrative with an evocation of an energetic, slightly outdated and camp outburst:

(8) Genesis 01:13 An so teh threeth day jazzhands

Another rich source of lexical items in the LOLcat Bible are from the ICHC universe. Some of these are the kinds of lexical items that cats in the real world might be drawn to, but here they take on a mythical status. For example:

(9) Genesis 01:26 An let min p0wnz0r becuz tehy has can openers "And let men rule (because they have can openers)"

Here the can opener is a sign of power. We also find items like sofas taking on mythical status (as the Bible guidelines note, "a typical domestic cat probably hasn't seen a desert tent, but they have probably seen a sofa"8) and dogs becoming the ultimate enemy.

The ICHC world also contributes items that are not necessarily what we would expect of real world cats, but have taken on special status in this domain. Thus we see an obsession with "invisible" items ("invisible bike", Genesis 01:02), "cheezburgers" (cheeseburgers), and "kittehs" (kitties, Genesis 01:09). These items are usually common, everyday items that have taken on specific salience for the language community through repeated use.

Also observable in the LOLcat Bible are lexical items that are specific to this domain. Some of these are items that originate from ICHC but have taken on special meanings within the Bible. Examples of this include "Ceiling Cat"—originally an image macro but subsequently taken up by the LOLcat Bible community as their analogy for God (e.g. Genesis 01:01). Extending from this we have Basement Cat (Satan) and Happy Cat (Jesus)—both are characters from ICHC that have been taken up in the LOLcat Bible. Cheezburgers also take on a specific meaning analogous to "blessings" in the original text.

In some cases we find the maintenance of lexical items found in the original biblical text—but often with orthographic or morphological manipulation. Such uses are often isolated and do not extend across the text. For example in chapter

⁸ http://www.lolcatbible.com/index.php?title=Guidelines

one of Genesis we find "firmmint" (firmament (01:08)) and "Beholdt" (01:29). Such uses, although they are generally one-offs, show that speakers are able to manipulate their lexical use to make timely and amusing references to established genres.

5.3 Morphology

In this section we will look briefly at both nominal and verbal morphology. For nominal morphology we will focus on the use of plural marking, and for verbal morphology we will look at tense marking and person agreement. We will also look at the regularisation of ordinal numbers before looking briefly at what we will call "Biblical" morphology. Similar tendencies can be observed in the manipulation of established English morphology regardless of whether it is nominal or verbal.

The use of plural morphology in LOLspeak is conspicuous in its irregularity. We find examples of pluralising mass nouns, such as "stuffs" (Genesis 01:04), "waterz" (Genesis 01:09) and "fuudz" (Genesis 01:30), however we have yet to come across an example of the absence of plural marking where we would expect it in Standard English. Thus there appears to be more of a tendency for pluralising non-plurals than the other way around. We even find within the one short section of text that the same noun alternates between being marked for plurality and not. The word "earth" is always singular in the original biblical text, however this is inconsistently pluralised in the LOLcat version (not to mention inconsistently capitalised and inconsistently spelt; the plural suffix itself is also inconsistently spelt):

- (10) a. Genesis 01:01 Oh hai. In teh beginnin Ceiling Cat maded teh skiez An da Urfs
 - b. Genesis 01:02 Da Urfs no had shapez
 - c. Genesis 01:10 An Ceiling Cat called no waterz urth and waters oshun
 - d. Genesis 01:17 An Ceiling Cat screw tehm on skiez, with big nails An stuff, to lite teh **Urfs**
 - e. Genesis 01:29 An Ceiling Cat sayed, Beholdt, the Urfs, I has it

Some of these are possibly showing a tendency to pluralise in the proximity of other pluralised nouns, but the use of the plural cannot be said to be completely motivated by environment.

In verbal morphology the first feature we will look at is tense marking. The LOLcat Bible is a text that uses a lot of past tense narrative structure, which makes it a fertile corpus for examining common past tense strategies in LOLspeak. What we find is that there is a tendency to over-extend the regular past tense suffix "-ed" in lexical verbs (but not copulas). We thus find that some irregular verb forms are regularised in the past tense:

- (11) a. Genesis 01:01 but he did not eated dem
 - b. Genesis 01:07 An Ceiling Cat sayed, i can has teh firmmint wich iz funny bibel naim 4 ceiling
 - c. Genesis 01:08 An Ceiling Cat doed teh skiez with waterz down An waterz up

The verb phrase *did not eated dem* above also shows double-marking of past tense. This mirrors the common double-marking of past tense observable below, where the irregular past tense forms are used with a standard past tense marker:

- (12) a. Genesis 01:01 Oh hai. In teh beginnin Ceiling Cat **maded** teh skiez An da Urfs
 - b. Genesis 01:02 Da Urfs no had shapez An haded dark face
 - c. Genesis 01:04 An Ceiling Cat sawed teh lite, to seez stuffs
 - d. Genesis 01:09 An Ceiling Cat gotted all teh waterz in ur base

Like many of the phenomena we describe here, there are forms that don't follow these tendencies. Below are two irregular verbs that remain so. Interestingly the second one is "sed", which we frequently see modified, as discussed in the example from Genesis 07:07 above where it is regularised, as well as frequent other examples:

- (13) a. Genesis 01:02 An Ceiling Cat **rode** invisible bike over teh waterz
 - b. Genesis 01:28 An Ceiling Cat **sed** them O hai maek bebehs kthx

That we have the same verb with a different past tense form speaks to the flexibility of these tendencies in LOLspeak, and the motivation for choosing one form over the other is something we can only speculate about. Perhaps it was because the authors felt there was too much repetition and desired novelty and innovation, which is a major motivation for LOLspeak.

Finally, just to capture the variety of playful language manipulation that we see present in LOLspeak, we have a double marked regular past tense verb:

(14) Genesis 01:27 So Ceiling Cat createded teh peeps taht waz like him

Another common feature of the verbal morphology is that we see a strong tendency for irregular person agreement between nouns and verbs in the present tense. Here we find that the verb suffix "-s" that co-occurs with 3rd person singular nouns is often extended to use with other persons. Of course many of these irregular forms of this style come in the form of the common phrasal template "I can has X" but we see others as well. In the section of the LOLcat Bible we have looked at, the examples are limited to 1st person singular and 3rd person plural:

- (15) a. Genesis 01:03. An Ceiling Cat i can haz lite? An lite wuz
 - b. Genesis 01:12 An Ceiling Cat sawed that weedz ish good, so, letz there be weedz
 - c. Genesis 01:18 An tehy rulez
 - e. Genesis 01:26 An let min p0wnz0r becuz tehy has can openers
 - f. Genesis 01:27 So Ceiling Cat createded teh peeps taht waz like him
 - g. Genesis 01:29 An Ceiling Cat sayed, Beholdt, the Urfs, I has it, An I has not eated it.

We also find 3rd person singular nouns with verbs that are not marked with the "-s" suffix:

- (16) a. Genesis 01:05 *It were FURST!!!1*
 - b. Genesis 01:15 It happen, lights everwear, like christmass, srsly
 - c. Genesis 01:23 Ceiling Cat taek a wile 2 cawnt

The above examples demonstrate that both copula verbs and lexical verbs have manipulated person agreement. Recall that the extension and manipulation of past tense forms applied only to lexical verbs, and not to copulas.

The ordinal numbers counting the days of creation in the first chapter of Genesis are regularised so they all take the "-th" suffix:

- (17) a. Genesis 01:08 so wuz teh twoth day
 - b. Genesis 01:13 An so teh threeth day jazzhands

- c. Genesis 01:19 An so teh furth day w00t
- d. Genesis 01:23 An so teh... fith day

Regularisations such as these in LOLspeak are a playful way for speakers of English to show their metalinguistic awareness of irregular forms by regularising them.

One morphological phenomenon that seems relatively exclusive to the LOLcat Bible is what we term "biblical morphology" (e.g. "doeth"). In Genesis 01:16 (example 18) we find a very non-standard verb form:

(18) Genesis 01:16 An Ceiling Cat doeth two grate lightz

This is an archaic 3rd person present tense form, and in this context a "hyperarchaism" (e.g. Janda *et al.* 1994:87). Its use here is a nod to the rather stuffy register of the traditional biblical translations. The ability to utilise domain-specific archaic morphological forms like the example above is a nice illustration of the playful and creative nature of LOLspeak, as well as of the high levels of linguistic awareness and mastery among users.

A final general characteristic of LOLspeak is the preference for analytic morphology—part of what gives rise to those ideas discussed in §3.1 that LOLspeaking–LOLcats are English second-language or "kitty pidgin" speakers (Dash 2007). We see this preference especially in comparative and superlative structures (e.g. "teh most big" (Genesis 01:16)).

5.4 Syntax

As well as the number of orthographic, lexical and morphological processes observable, we also find that there is manipulation at the syntactic level. There are perhaps fewer common syntactic variations, however, and some of these interact with the morphological level. In this section we look at the syntax of question structures, negation strategies and the ellipsis of syntactic items.

One of the most common and easily observable syntactic manipulations of LOLspeak is the structure of questions. Unlike Standard English, there is rarely any subject—auxiliary inversion in the sentence structure for question forms in LOLspeak:

(19) Genesis 01:03 An Ceiling Cat sayz, i can haz lite?

In the creation of negative structures, auxiliaries often disappear completely, and "not" is typically replaced by the simpler "no"—another behaviour stereotypical of anecdotal accounts of first and second language acquisition.

- (20) a. Genesis 01:02 Da Urfs no had shapez
 - b. Genesis 01:03 At start, no has lyte
 - c. Genesis 01:21 An see monstrs, which wuz like big cows, except they no mood

Double negatives such as *not tripz over nethin* (Genesis 01: 04) are common, these tapping into classic features of non-standard dialects like AAVE.

Finally, we see in LOLspeak a tendency towards the ellipsis of grammatical elements that are syntactically obligatory in Standard English. The ellipsis can involve a component of a noun phrase or verb phrase that is obligatory in Standard English: in the examples below we see that nouns we would expect to have a determiner in Standard English do not require one in LOLspeak:

- (21) a. Genesis 01:02 An Ceiling Cat rode invisible bike over teh waterz
 - b. Genesis 01:08 i can has teh firmmint wich iz funny bibel naim 4 ceiling

We also see the omission of even more basic elements in a sentence, in the first two examples the omission of a dummy subject and in the third example of the verbal element:

- (22) a. Genesis 01:03 At start, no has lyte
 - b. Genesis 01:10 Iz good
 - c. Genesis 01:15 It happen, lights everwear, like christmass, srsly

These omissions are not frequent enough to demonstrate a strong dispreference of subjects or other elements of syntax in LOLspeak, but they do indicate that it is certainly more flexible in these matters than Standard English.

5.5 Clause

Unlike most of the LOLcat images, which consist of only one or two sentences, the LOLcat Bible gives us extended text where we can observe more clausal phenomena. In this section we will start by looking at phrasal templates, a phenomenon we find in both in ICHC captioned images and the LOLcat Bible. We will then go on to look at appropriation and manipulation of other narrative genres.

One of the most salient features of the LOLspeak clause is the reliance on phrasal templates. These work at all syntactic levels, which is why we have chosen to put them in this discussion of the clause. A phrasal template is where all the elements are consistent except for a slot where people can chose to put their own element. These are a common trope across the Internet and indeed in human language. They have also been referred to as "snowclones" (originally on website Language Log, in a discussion of "the some-assembly-required adaptable cliché frames for lazy journalists").

The most well known phrasal template in the LOLcat universe is 'I can has X', where 'X' can be any inserted element, and has been made famous in the name of the website 'I can has cheezburgers'. We see frequent uses of this phrasal template in the text of Genesis:

- (23) a. Genesis 01:03 An Ceiling Cat sayz, i can haz lite?
 - b. Genesis 01:14 i can has lightz in the skiez for splittin day An no day
 - c. Genesis 01:24 i can has MOAR living stuff

On ICHC we often find that a phrasal template will enjoy a brief flare of popularity before fading in the general consciousness. There are, however, a number of major phrasal templates in the LOLspeak inventory that have found a place in the norms of the LOLcat Bible. Some of these, like "I am in your X, Ying your Zs" have their origins in leetspeek, but others, like "I can has X" above, appear to be indigenous to the LOLspeak world. Here are three of them, their usages and—unsurprisingly—the ways they are manipulated.

(24) $\underline{Do\ not\ want\ X}$

- a. Genesis 01:09 An Ceiling Cat hadz dry placez cuz kittehs DO NOT WANT get wet
- b. Genesis 01:11 An Ceiling Cat sayed, DO WANT grass

⁹ http://itre.cis.upenn.edu/~myl/languagelog/archives/000350.html

(25) X has not/did not eated Y

- a. Genesis 01:01 but he did not eated dem
- b. Genesis 01:20 But Ceiling Cat no eated dem
- c. Genesis 01:25 An Ceiling Cat doed moar living stuff, mooes, An creepies, An otehr animuls, An did not eated tehm
- d. Genesis 01:27 he maed tehm, min An womin wuz maeded, but he did not eated tehm
- e. Genesis 01:29 An Ceiling Cat sayed, Beholdt, the Urfs, I has it, An I has not eated it

(26) I am in your X, Ying your Zs

Genesis 01:06 im in ur waterz makin a ceiling

In analysing clausal features, it is also worth paying attention to the way the narrative is constructed and unified. We see throughout the text the use of the capitalised "An" form, discussed briefly in §5.1 above. This form is sometimes used as a clause-internal conjunction, as seen in this example from verse 1 but it is more often used at the start of the clause:

(27) Genesis 01:01 Ceiling Cat maded teh skiez An da Urfs, but he did not eated dem

While many verses of the original Biblical text do start with "and", the LOLcat Bible has extended this to the start of almost every clause. This creates a more coherent feel to the text as each clause runs into the next and, with the reduction of the consonant cluster to a single consonant, also captures a child-like enthusiasm in its narrative style.

Finally, we wish to briefly discuss the ability to mimic and manipulate other linguistic genres in LOLspeak. While so much of what we have discussed above has been about how LOLspeak differs in comparison to Standard English, it is worth reflecting briefly on what features of the original text the authors of the LOLcat Bible have maintained. With so much manipulation the text is still recognisable as the first verse of Genesis, and the use of some key elements assists in this.

Below we see that key elements of the original text have been captured, although with a slight LOLcat slant:

- (28) a. Genesis 01:01 Oh hai. **In teh beginnin** Ceiling Cat maded teh skiez An da Urfs, but he did not eated dem
 - b. Genesis 01:03 An Ceiling Cat sayz, i can haz lite? An lite wuz
 - c. Genesis 01:22 An Ceiling Cat sed O hai, make bebehs kthx
 - d. Genesis 01:24 An Ceiling Cat sayed, i can has MOAR living stuff

It is interesting to note that while the authors of the LOLcat Bible are aware of the conventions of other genres, it is not a wholesale appropriation of these conventions but a light-hearted nod that stays true to the norms and tendencies of LOLspeak, such as those that we have discussed in this section.

6. Conclusion:

kthxbai! Srsly

We have discussed the ways in which in-group members of the on-line LOLcats community creatively manipulate English in a variety of ways in the creation and production of LOLspeak. LOLspeakers show high levels of competence at simultaneously playing with multiple linguistic processes (implicating orthography and phonetics, morphology, syntax, clauses) and we believe that an examination of these processes will provide an important contribution to our understanding of language play, and of creative linguistic endeavours more generally.

An understanding of the role of LOLspeak and of other attendant phenomena practiced by LOLcats community members provides a new contribution to research on the establishment and on-going maintenance of communities and ingroups, particularly in on-line contexts. LOLspeak is also perhaps unusual in the ready availability of eager metacommentary from community members themselves, as we discovered when we posted the conference talk that this paper is based on (Gawne & Vaughan 2011) on vimeo.com¹⁰. The talk has had over 47,000 views and eventually even found its way to ICHC¹¹ (receiving a rating of 4.5 out of 5 cheezburgers), where the comments themselves provide a rich corpus ripe for analysis, as suggested by AngelPlume:

1

¹⁰ http://vimeo.com/33318759

¹¹ http://icanhascheezburger.com/2011/12/09/funny-pictures-videos-linguistics-lolspeak/

(29) Aifinks dey shud luuk nawt onleh at capshunz adn publishd wurks lyke teh lolcat biblol, but awlso at teh commints, cuz dats wayr we showz teh mostest creatibity and individulollity in owr innerakshunz. Srsly.

"I think they should not only look at captions and published works like the LOLcat Bible, but also at the comments, because that's where we show the most creativity and individuality in our interactions."

(AngelPlume 9/11/11¹²)

As a future direction for LOLspeak research, we would suggest that using a framework of identity to account for the motivations behind the phenomena observable in LOLspeak is a fruitful avenue of investigation. The process of how LOLspeak contributes to in-group cohesion, while simultaneously constructing a "cat" identity and the identity of a savvy Internet user could be analysed using a framework of indexicality (e.g. Ochs 1992, Bucholtz & Hall 2008) to explore the obvious semiotic links between the micro-linguistic behaviours observable in LOLspeak, particular stances and styles, and broader social categories and identities. Such an approach would allow for a more complete picture of how language play within a community of practice (i.e. the LOLcats community) can contribute to identity construction and in-group cohesion.

References

teh readinz

Anderson E, S House, E Locke & K Schirmann 2008 *Lolcats, a survey* Unpublished manuscript, New York University.

Braswell M, C Garay, G Saggese & B Schiffman 2008 LOLcats: The history, language, and culture of an Internet meme Unpublished manuscript, New York University.

Brillman R, R Gander & A Guillen 2008 Lolspeech: Lexicons, registers, translators and more Unpublished manuscript, New York University.

Brubaker J R 2008 'Wants moar: Visual media's use of text in LOLcats and silent film' *Gnovis Journal* 8(2):117-124

Bucholtz M & K Hall 2008 'Finding identity: theory and data' Multilingua 27(1-2):151-163.

Calka M 2011a "T can has community?": A case study and reflection on norms and social support in a lolcat fan group Unpublished manuscript, Ohio University.

Calka M 2011b Language and ritual in Cheezland: The creation and maintenance of community in I Can Has Cheezburger Unpublished manuscript, Ohio University.

Cook G 2000 Language Play, Language Learning Oxford: Oxford University Press.

4-

¹² ibid.

- Crystal D 1998 Language Play London: Penguin.
- Dash A 2007 Cats can has grammar April 2007. http://dashes.com/anil/2007/04/cats-can-has-gr.html (accessed 26 May 2012)
- Gawne L & J Vaughan *I can has language play: The construction of language and identity in LOLspeak* Conference presentation, Australian Linguistics Society Conference, Australian National University, Canberra 2nd December 2011.
- Grondin M 2010 LOLcat Bible: In teh beginnin Ceiling Cat maded teh skiez An da Urfs n stuffs Berkeley, CA: Ulysses Press.
- Hill A 2010 LOLspeak: a deskripshun Unpublished manuscript, Monash University.
- Huizinga J 1955 Homo Ludens: a Study of the Play-Element in Culture Boston: Beacon Press.
- Janda R, B Joseph & N Jacobs 1994 'Systematic hyperforeignisms as maximally external evidence for linguistic rules' In S Lima, R Corrigan & G Iverson (eds) The Reality of Linguistic Rules Amsterdam, Philadelphia: Benjamins. Pp. 67-92.
- Liberman M 2007 'Kitty Pidgin and Asymmetrical Tail-wags' April 25 2007. http://itre.cis.upenn.edu/~myl/languagelog/archives/004442.html (accessed 26th May 2012)
- Miltner, K 2011 Srsly phenomenal: an investigation into the appeal of LOLcats Unpublished manuscript, London School of Economics and Political Science.
- Ochs E 1992 'Indexing gender' in A Duranti and C Goodwin (eds) Rethinking Context: Language as an Interactive Phenomenon Cambridge: CUP. Pp. 335-358.
- Rosen A 2010 'Iz in ur meme / aminalizin teh langwich: A linguistic study of LOLcats' goucher.edu/documents/verge/papers7/LING001fin.pdf (accessed 26 May 2012).
- Sherzer J 2002 Speech Play and Verbal Art Austin: University of Texas Press.
- Shirky C 2010 'Clay Shirky: How cognitive surplus will change the world' http://www.ted.com/talks/clay_shirky_how_cognitive_surplus_will_change_the_world. html (accessed 26 May 2012)
- Wang J 2009 'The man behind the memes' Entrepreneur August 2009:22-25.

Case marking (accounts) in collapse: Evidence from Early Modern Dutch egodocuments (1572-1573)

Jennifer Hendriks
The Australian National University
jennifer.hendriks@anu.edu.au

Abstract. In this study, I examine the intermediate stages of case marking systems essential for testing hypotheses about the loss of case and its syntactic effects in Dutch. Past accounts typically compare earlier Middle Dutch (1200-1350), when a transparent case system was still in use, with Modern Dutch, which has lost morphological case. Scholars have made claims about the order in which the cases disappeared in Middle Dutch and generally view the end of the 15th century as the point by which the case system had broken down. With a several hundred year gap between the Middle and Modern Dutch periods and no detailed studies chronicling the deflexion process, however, these claims remain largely untested. Using a corpus of 42,000 words comprised mainly of unpublished archival manuscriptseyewitness accounts chronicling the terror and destruction at the start of the Eighty Years War—I consider the questions of when, how quickly and where the case system collapsed, while situating the discussion in the context of the intense dialect contact situations that prevailed over the period of many centuries in Middle and Early Modern Dutch urban centres.

Keywords. case, deflexion, dialect contact, Middle Dutch, Early Modern Dutch

ANU Research Repository – http://hdl.handle.net/1885/9404

Proceedings of the 42nd Australian Linguistic Society Conference – 2011

1. Introduction¹

Much has been written about the effects of deflexion in the history of Dutch. With respect to the loss of case, studies compare earlier Middle Dutch (roughly 1200-1350), when it is generally accepted that a transparent case system was still in use, with Modern Dutch, which has lost morphological case. Scholars have made claims about the order in which the cases disappeared in Middle Dutch (cf. De Wit 1997; Weerman & De Wit 1998, 1999) as well as the syntactic effects that the loss of morphological case had in Dutch. It has been hypothesized, for example, that only languages which have morphological case allow scrambling across arguments or the extraposition of DP arguments (cf. Neeleman and Weerman 2009). One reason that discussions of case marking focus on the two distinct periods of Middle Dutch and Modern Dutch is that it is widely believed that the case marking system had collapsed by the Early Modern period (the 16th and 17th centuries), and that the case marking observable in the texts at this time cannot be taken as evidence that case categories still existed. Such forms are treated instead as evidence of "language nurturing", which had lingered on in use due to the partially successful attempts by Renaissance grammarians to resurrect a respectable case marking system for the language.

The earliest Middle Dutch texts already attest to considerable syncretism in the case forms; nevertheless we still lack the fine details of the intermediate stages between the fairly robust case marking of the early Middle Dutch period and practically no case marking in the modern language. We are left, then, with a gap of several hundred years in our understanding of the loss of morphological case and this raises several interesting questions. How can we know, for example, what the order of case loss is in Dutch if we have no detailed studies chronicling this process? Can we assume that case loss took place at the same time and at the same pace in the different dialects areas? If loss of morphological case has syntactic effects, and if the generalizations about scrambling and VO leakages are correct, how degenerate can a case marking system be and still allow for syntactic features that languages with much more robust case systems possess?

¹ I would like to express my thanks here to two anonymous reviewers of an earlier version of this paper. Their comments and suggestions were extremely helpful to me in the revising process.

In this study, I examine the intermediate stages of case marking systems in Dutch by analyzing case marking in the egodocuments of three individuals from the northern province of Holland in the late 16th century—that is, the period by which time the traditional linguistic histories and handbooks of Dutch say that the case marking system had broken down. Since previous work on case loss in Middle Dutch draws upon data from the southern urban centres of Bruges, Ghent and Antwerp, it remains to be determined whether the findings of these studies are applicable to regions much further away such as those in the north. I focus in particular on the question of whether the breakdown of the case marking system took place at the same time and at the same pace in different parts of the Low Countries since establishing whether we can talk in terms of "case marking in Middle Dutch" (ie, treating texts, dialects and periods of Middle Dutch as representing a single grammar), or any other period in the history of Dutch, is essential to charting the breakdown or intermediate stages of the case marking system in the language. By contributing data on the state of case marking systems from individuals living in the Early Modern Period, prior to the publication of the first grammar of Dutch, we can also begin to shed some light on the question of to what degree Early Modern grammarians and language mavens were engaging in the artificial embellishment of the Dutch language by proposing the case systems they did—a question that can only be resolved by reference to what individuals *not* engaged in language refinement activities were actually doing.

In what follows, I first offer a brief overview of the claims that have been made about the loss of case in Dutch as well as make explicit the empirical basis for these claims (section 2). Against this background, in section 3 I present the findings of my analysis of case marking by three individuals who kept eyewitness accounts of turbulent events in the cities of Amsterdam and Haarlem in the early years of the Eighty Years War. In section 4 I compare the case marking systems from the eyewitness accounts to the case marking paradigms proposed by Renaissance grammarians to show that with respect to case marking, instead of creating artificial systems that bore no relation to the forms individuals were using, the early grammarians were engaged in more of a descriptive, rather than prescriptive, activity. In section 5, I return to the question of whether the breakdown of the case system occurred at the same time and pace in different parts of the Low Countries. In addition to the linguistic data discussed in sections

2 and 3, I introduce data from demographic, social and economic historians which underscores the point that where we take our evidence for case loss in Dutch can have a substantial impact on our understanding of the intermediate stages of case loss in the language. Section 6 offers a summary of the study.

2. The loss of morphological case in the history of Dutch

Before surveying the claims that have been made about the loss of case in Dutch and the empirical basis for these claims, it is important to offer a brief account of the early Middle Dutch case marking system. Table 1 provides an overview of the determiner system for Middle Dutch commonly found in grammatical sketches. The system distinguishes four cases (nominative, accusative, genitive and dative) as well as three genders (masculine, feminine and neuter) and makes a distinction between singular and plural. A further distinction is made between full forms and reduced forms (in brackets) of the definite articles with the full forms being the same as the demonstrative pronouns. A quick glance at the table shows that already by the Middle Dutch period, the case marking system has undergone considerable syncretism in the forms.

		Masculine	Feminine	Neuter
Singular	N	die (de)	die (de)	dat ('t)
	Α	dien (den)	die (de)	dat ('t)
	G	dies (des/'s)	dier (der)	dies (des)
	D	dien (den)	dier (der)	dien (den)
Plural	N		die (de)	
	Α		die (de)	
	G		dier (der)	
	D		dien (den)	

Table 1. Determiners in early Middle Dutch (Burridge 1993:241).

As mentioned above, when the case system is discussed in the linguistic histories and handbooks of Dutch, the observation generally made is that (early) Middle Dutch still maintained a case system while Modern Dutch has lost morphological case. Furthermore, when case marking is noted in texts from the periods between Middle Dutch and Modern Dutch, particularly if the use of case marking can be shown to be inconsistent, it is often discussed using terms such as "archaic" or

"artificial". While it is beyond the scope of this paper to review in detail the statements made about case marking in the history of Dutch, a few references to the claims that have been made are important for establishing a context for this study, particularly as they pertain to the timing of the loss of case marking.

Starting with what could be described as the most radical claim regarding case loss, Hermkens (1985:537-538) asserts that by the early Middle Dutch period, the case system had already disappeared from the Middle Dutch dialects and that what we find in the texts from this period is part of a "written standard" employed by the learned few which bore no relation to how people actually spoke. This is a significant revising backwards in time of previous statements he had made that "in the 17th century, not a single Dutch dialect had a case system" (Hermkens 1973:46; 1981:70). In the context of "the decline of the case system during the Middle Dutch period" Van der Wal (1993) writes: "By the end of the fifteenth century Dutch case endings had almost completely eroded." Far less radical, but also less specific in terms of time references, are the more recent statements by Van der Wal & Van Bree (2008) that at the end of the middle ages, the case system had seriously deteriorated and in the 16th century, there were only vestiges of a case system left. Finally, in terms of the order of the loss of cases in Dutch, De Wit (1997:49) states "[i]n the 15th century, the inflectional genitive was completely replaced by the vanPP" adding that the use of the prenominal genitive in later stages of Middle Dutch "gradually fade[s] and seem[s] unattested". Weerman & De Wit (1998:18) assert further: "With respect to the 'true' (postnominal) genitive, we will argue that the change was completed in the 14th century, when the dative and the accusative were still present."

A summary of these claims (excluding that of Hermkens (1985)) is presented in Table 2. It shows that when we chart out the statements made about the collapse of the case system in Dutch, we are left with century (or more) of "silence" concerning this topic. The 16th century is a period that does not feature in discussions of case marking in Dutch, except when they address the efforts of the Renaissance grammarians towards the end of this century and continuing on into the 17th century often in the context of addressing the (inconsistent) use of case marking in texts from this period.

Middle Dutch	1.400-	4500-	Early Modern Dutch	Modern Dutch
Middle Dutch has a morphological case system End 14th c. = loss of the genitive	1400s →	1500s	1600s 1700s	1800s
End of 15th c. = 6 case-marking sys	collapse of			
		l€	Early Modern Dutch case system = artificial/part of written standard	
			← None of the Early Modern Dutch dialects have a case system	
				Modern Dutch has no morphological case system

Table 2. Overview of claims regarding the loss of morphological case in Dutch.

If we turn our attention to the empirical basis for the claims noted above we find that there is one important feature they have in common: either data has been used, or insights have been gained, from dialects that lie in the southern provinces of the Low Countries, in what is now Belgium. De Wit (1997) and Weerman & De Wit (1998, 1999) analyze texts from the southern cities of Bruges and Ghent spanning the 13th-15th centuries; Van der Wal (1993) and Van der Wal & Van Bree (2008) cite a reference to the lack of distinction between the nominative and accusative masculine singular noted in a Dutch translation of a Latin manual (Exercitium Puerorum), which was published in Antwerp in 1485; Hermkens (1973, 1981, 1985) relies on the writings of the prominent 17th-century author and political figure, Constantijn Huygens, whose parents were from the southern

Netherlands. Huygens uses the dialect of Antwerp in one of the farces he wrote (*Trijntje Cornelis*) set in that city and Hermkens uses these sorts of writings, as well as others from the 17th century, to inform his views about case loss in Dutch.

This very brief overview of claims made about the loss of case marking in the history of Dutch and the empirical basis for these assertions is crucial to the main goal of this study, which is to establish whether the breakdown of the case marking system took place at the same time and at the same pace in all the Dutch dialects and whether we can find evidence attesting to the order of case loss. In the absence of large-scale, systematic studies examining the loss of case in Dutch, a logical time and place to start looking for answers would be late in the 16th century in the northern part of the Low Countries. In adopting such an approach, the sample selected would be far removed from the work that has previously been done in terms of time and space. According to the statements summarized in Table 2, a sampling of texts from the late 16th century written prior to the first printed grammar of Dutch would yield little if anything that could be called a case marking system. For the purposes of this study, however, such a result would still be useful in terms of documenting the absence of case marking in a region far removed from the southern varieties which have, until now, been used in research into and discussions of this topic. To test how generalizable the statements found in Table 2 are, we turn our attention to the analysis of data from the province of Holland in the early 1570s.

3. Case marking systems in late 16th century northern Dutch egodocuments

For the purpose of this study, I analyzed the case marking systems of three individuals from the province of Holland taken from their own eyewitness accounts of the daily horrors they experienced in the early years of the Eighty Years War (1572-1573). Two of the individuals from the city of Haarlem—Cornelis Bartholomeeszn (CB) and Nicolaes van Rooswijk (NvR)—give brief

clues in their journals that they are from this town.² The third individual is a prior from the city of Gouda, Brother Wouter (BW), who was forced in 1572 to flee from Gouda to Amsterdam to escape religious persecution.³ The journals these individuals kept differ considerably in terms of their length and style, yet all of them make regular use of local Holland dialect features. A diplomatic transcription of Brother Wouter's 800-plus page handwritten journal was published by Van Eeghen in 1959 and for the purpose of this study, approximately 10,000 words (which equates to 25 pages) were analyzed. The two Haarlem journals chronicling the gruesome siege of that town in 1572-1573 are unpublished handwritten accounts. For the analysis presented below, I have used my own transcriptions of the original manuscripts totaling approximately 32,000 words (CB: 18,000 words, NvR: 14,000 words).

The findings presented in this section are based on the analysis of case forms for determiners presented in Table 1.4 The reason for this is first and foremost to look for evidence of case category retention where it will be most visible. Possessive pronouns in Middle Dutch and Early Modern Dutch, for example, did not always inflect, which is unsurprising given that they originated from the genitive forms of the personal pronouns. But we also find inflected possessive adjective forms in use in a variety of texts alongside the invariant possessive

_

² Cornelis Bartholomeeszn actually tells "the reader" that having been "out of the land" for a period of several years, he happened to have returned to Haarlem just prior to the siege of the city. Moreover, he had purposely remained in the city because he had three brothers still living there and he wanted to be with them, their children and with the other members of the town during that horrific event. He maintained his account, admitting that he had "no sense of style" and "no idea how to write a proper history", for a more accomplished writer to use to record these events for the history of the Netherlands. As for Nicolaes van Rooswijk, the only bit of information noted in his journal about himself is a comment to having witnessed an event he was reporting on "at his father's table".

³ We know considerably more about Brother Wouter Jacobsz. He was born and raised in Gouda and at the age of 28 or 29, had assumed the role of the Prior of Steen. This monastery was located just outside Gouda, but had been relocated inside the town in 1549, the year before Wouter was made prior. See Van Eeghen (1959) for further details of his life.

⁴ One form, which appears in the texts but not in Table 1, is the neuter nominative and accusative singular *het*. As shown in Table 1, the unstressed form of *dat* was 't, which is the same form as the unstressed neuter 3rd person singular pronoun *het*. Eventually *het* became the full form of the neuter singular definite determiner, replacing *dat*. *Dat* is still the neuter singular demonstrative pronoun (cf. Van Loey 1970:145-146).

pronouns and this, for obvious reasons, would serve to obscure rather than clarify the extent to which case categories still existed in the late 16th century.

To set manageable boundaries for this study, I limited the analysis of case marking to four categories. They are the forms of the determiners in subject, direct object, and indirect object positions where the main cases used to mark arguments in these positions are the nominative, accusative and the dative respectively. To get a sense of whether the genitive case was still in use, I also analyzed determiners in possessive constructions. Table 3 provides a summary of the number of tokens found in each of the texts according to the four categories for analysis.

	Subject position	Direct Object position	Indirect Object position	Possessives	Total
BW	99	73	28	61	261
NvR	282	137	26	158	603
СВ	213	71	8	83	375
Total	594	281	62	302	1239

Table 3. Number of tokens analyzed per category and per individual.

One final point needs to be raised concerning the grammatical gender system. This is crucial to any study of case loss, however due to constraints of space and, more importantly, to the under-researched nature of the topic (cf. Audring 2009:34), it can only be dealt with here in passing. The grammatical gender system in Dutch was already in a state of flux in the early Middle Dutch period. A common way to present the determiner system of Middle Dutch is to give a three-way gender system that distinguishes singular masculine from singular feminine from singular neuter nouns as in Table 1. In reality, however, many nouns had more than one gender. The historically feminine noun *stadt* "city", for example, is listed in the Middle Dutch dictionary (CDRMLS 1998) as a noun that is feminine, masculine and sometimes also neuter. It is important to mention this

here because there is a tendency by some to view the shifting genders of nouns as evidence that the case system had completely collapsed in Dutch. Van Loey (1970:119), for example, cites the use of both *des* or *der* as genitive singular forms for a singular feminine noun to claim that these genitive forms were no longer part of the living language in Holland from the 15th century. There is, however, another way to view the use of these two genders for one noun, and that is to say that in a situation where a three-way gender system is becoming a two-way gender system (with masculine and feminine collapsing to form a common gender), certain nouns will appear at times to be unspecified for gender. This does not *necessarily* mean, however, that these nouns are not marked for case. Using *des* (genitive masculine singular) in a possessive construction involving a (historically) feminine noun shows the noun *is* being marked for case; what it does not show is that the noun belongs solely to the category "feminine".

In the remainder of this section, I present my findings for the analysis of case marking in determiners in subject position (3.1), direct object position (3.2), indirect object position (3.3) and in possessive constructions (3.4). Section 3.5 provides a summary of the findings.

3.1 Case marking of determiners in subject position

It comes as no surprise to find that instances of determiners in subject position were far and away the most numerous in the corpus of texts analyzed for this study. Of the four categories distinguished in the analysis, the first two of nominative singular *die* and nominative plural *die* comprised the majority of tokens and there is little more of interest to comment on here. That leaves one more "non-nominative" category of forms that were found in subject position, which identifies the use of the "oblique" *den* in both the singular and the plural. Of the four categories distinguished in Table 4, only those involving oblique *den*, set off by grey shading, are of interest to a study of the breakdown of the case marking system. In terms of accounting for these forms in subject position, it should be noted that it is not uncommon to find the use of what some refer to as "accusative subjects"—that is, a phenomenon involving masculine singular nouns that is observed with increasing frequency in texts from the late Middle Dutch period up to the 18th century (cf. Van der Horst 2008:357, 580-581, 803, 1083). Although the instances of singular *den* in subject position account for the vast

majority of tokens below, there were still a few instances of plural *den* found in subject position, suggesting that a more appropriate label for these *den* forms would be "oblique subjects".

While an extensive discussion of oblique subjects would take us too far afield, a few brief observations can be made about those encountered in the texts used for this study. Of the 28 oblique *den* forms found in subject position, 21 appear in sentences low in transitivity—that is, sentences involving stative predicates (5), intransitives (8), reflexives (2) and passives (5) (cf. Burridge 1993:152-160). That leaves seven *den* forms, all of which occur as the subject of transitive verbs. For a further three of these forms, the non-etymological *-n* could be a hiatus filler inserted between a final schwa and a word-initial vowel. Howell & Olson (2011) have documented this, for example, in other informal writings from this period. We are then left with five instances of oblique *den* in subject position, and these could simply be due to a confusion of forms.

	Nominative singular die	Nominative plural <i>die</i>	singular den	plural <i>den</i>	Total
BW	47	52	0	0	99
NvR	78	179	21	4	282
СВ	60	150	2	1	213
Total	185	381	23	5	594

Table 4. Case marking of determiners in subject position.

3.2 Case marking of determiners in direct object position

About half as many tokens were collected in the analysis of determiners in direct object position when compared to those in subject position, and again this comes as little surprise. Here, too, we have the division between the expected accusative forms, which are used to mark direct objects, and forms that are not expected.

With respect to the latter, there were a few instances of plural *den* found which were similar to those recorded for plural determiners in subject position in section 3.1. Furthermore, one token each from BW and NvR could be accounted for in terms of a hiatus -n, leaving just two "unexpected" forms that cannot be accounted for in this way. Again, the "non-accusative" forms are shaded in grey in Table 5 representing those which are not expected based on the (idealized) case marking system presented in Table 1.

	Accusative singular		ar Accusative plural		plural <i>den</i>	
	den	die	het	die		Total
BW	22	14	15	20	2	73
NvR	58	25	26	26	2	137
СВ	8	30	12	21	0	71
Total	88	69	53	67	4	281

Table 5. Case marking of determiners in direct object position.

3.3 Case marking of determiners in indirect object position

Searching for large numbers of tokens in indirect object position is a difficult quest at the best of times. Prepositional phrases are a frequent substitute for bare objects in this position, which is underscored by the fact that my corpus of 42,000 words contained only 62 tokens of determiners in indirect object position. There are two points to note about the data presented in Table 6. The first is that no tokens of the dative feminine singular *der* in the position of an indirect object were found in the corpus. The reason for this gap in the data is likely due primarily to the topics discussed in the journals. For the two journals chronicling the siege of Haarlem, for example, most of the indirect objects in the singular were masculine nouns such as *den coninck* "the king", *den hertogh* "the duke", *den prinche* "the prince", *den secretar* "the secretary", etc. The second point to note is that there was

clear evidence attesting to the use of the unmarked or nominative *die* in this position, although these unmarked forms still comprised less than a third of total number of tokens in indirect object position.

	Dative singular			Dative plural		
	den	der	die	den	die	Total
BW	8	0	4	14	2	28
NvR	10	0	0	11	5	26
СВ	1	0	2	2	3	8
Total	19	0	6	27	10	62

Table 6. Case marking of determiners in indirect object position.

3.4 Case marking of determiners in possessive constructions

The final context to be examined in this study—that of possessive constructions⁵—is complicated by the fact that already in the early Middle Dutch period, the morphological genitive could be substituted with a prepositional phrase involving the dative preposition *van* "of". In fact, Weerman & De Wit (1998, 1999) have shown that for the southern cities of Ghent and Bruges, the use of one option over the other is unremarkable for the 13th century. In the 14th and 15th centuries in Bruges, however, their data shows that the use of the "*van*-construction" increases dramatically as shown in Table 7. This leads them to conclude that the switch from use of the morphological genitive to that of the periphrastic *van*-construction was completed in the 14th century, at a time when the dative and the accusative cases were still present.

⁵ The label "possessives" is used here as a cover term for constructions that would have used the genitive in early Middle Dutch. Thus, in addition to recording the relation of possession between two nouns, the data includes instances of other semantic relationships, such as partitives.

	morphological	periphrastic van- construction
Thirteenth century (Ghent)	genitive 47%	53%
Thirteenth century (Bruges)	46%	54%
Fourteenth century (Bruges)	16%	84%
Fifteenth century (Bruges)	4%	96%

Table 7. Possessive constructions: Ghent, 13th century and Bruges, 13th-15th century. (Weerman & De Wit 1999:1158, ex. 6 and ex. 7).

Given the findings of Weerman & De Wit for the southern city of Bruges in the Middle Dutch period, the analysis of possessive constructions carried out for this study using data from individuals from two northern towns (Haarlem and Gouda) is all the more intriguing.

Firstly, it must be noted that a simple division between the morphological genitive and the *van*- constructions that Weerman & De Wit employed was not possible for the analysis of the 16th-century egodocuments; it is clear that at this time in the northern Dutch varieties of our "informants", a prenominal genitive could appear following the dative preposition *van* (1a) or to express part/whole relationships (2a) or that the genitive plural *der* could follow *van* when we would expect to find the dative plural *den* (3a). Examples (1b), (2b), and (3b) provide the corresponding dative options—that is, the case marking one would expect to find in 'van- constructions' and presumably the only options that Weerman & De Wit encountered in their analysis of Middle Dutch texts from the southern cities of Ghent and Bruges.

van den prinssen
of the.DAT.M.SG prince

'in the field of the prince's people'

(2)a. een deel des *Ruter* (CB, p. 12) van prinssen the.GEN.M.SG prince knights a part of b. een deel van den Ruter van den the.DAT.M.PL knights of the.DAT.M.SG a part of prinssen prinssen prince

'a part (group) of the prince's knights'

(3) a. van der vyanden (CB, p. 36)
of the.GEN.PL enemies
b. van den vyanden
of the.DAT.PL enemies

'of the enemies'

Secondly, the prenominal genitive expressions, which De Wit (1997:49) states "gradually fade out and seem unattested" in later stages of Middle Dutch, are well-attested in the corpus of texts analyzed for this study well over a century later. They account, in fact, for just over half of the tokens. Thirdly, the postnominal genitive appears to be relatively healthy, being used in nearly a third of the possessive constructions containing a morphological genitive as shown in Table 8.

	pre-nominal Genitive	post-nominal Genitive	van + pre-nominal Genitive (des)	<i>van</i> + pre-nominal Genitive (<i>der</i>)	Total
BW	24	12	4	1	41
NvR	42	10	9	1	62
СВ	10	19	5	11	45
Total	76	41	18	13	148

Table 8. The use of the morphological genitive by individuals from Haarlem and Gouda.

Turning to the use of *van*- in periphrastic possessive constructions (other than those discussed above in the context of the morphological genitive), in the 16th-century northern Dutch egodocuments analyzed for this study, the most interesting finding pertains to the number of tokens following *van* (53) that appear neither in the genitive nor in the dative case. Given that the number of tokens in indirect object position was so small, these results give us another glimpse into the use of the dative case with a preposition that historically governed this case, and here we see numerous examples of the feminine singular *der* in use. As with the other tables above, the data that can be used to shed light on the breakdown of the case marking system is shaded in grey in Tables 9a and 9b.

The data involving possessives requires one further comment, which has to do with the distorting effects of counting the ambiguous genitive/dative feminine singular der forms as datives only as shown in Table 9a. Treating feminine singular der as dative only, when in fact it is also the genitive form, gives the impression that the loss of the genitive case is greater, in fact, than it may have been. For example, treating the feminine singular der as dative only—particularly since its occurrence in the corpus is so high for NvR—results in the ratio of morphological genitive use to that of the dative possessive van- construction of 49% to 51%. Removing the unambiguous genitive/dative feminine singular forms from the overall calculations, as in Table 9b, results in a ratio of 60% use of the morphological genitive to 40% use of the periphrastic possessive dative van-

constructions. It is for this reason that the "snapshot of health" summary in Table 10 is calculated based on the numbers of tokens given in Table 8 and Table 9b.

	van + den	van + der	van + die	van + het	Total
BW	11	0	8	1	20
NvR	21	50	19	6	96
СВ	15	4	14	5	38
Total	47	54	41	12	154

Table 9a. The use of the periphrastic van-constructions by individuals from Haarlem and Gouda.

	van + den	van + die	van + het	Total
BW	11	8	1	20
NvR	21	19	6	46
СВ	15	14	5	34
Total	47	41	12	100

Table 9b. The use of the periphrastic van-constructions by individuals from Haarlem and Gouda excluding ambiguous feminine dative/genitive singular der tokens.

3.5 Summary of case marking in the definite determiner systems in late 16th century Holland

In summarizing the findings presented in sections 3.1-3.4, we can present the overall results in terms of the "health" of the case marking system as is done in Table 10, or in terms of its "decay" as in Table 11. Immediately apparent from a glance at the snapshots presented in these tables is the fact that case marking in the determiner systems of three individuals from small northern Dutch towns in the late 16th century appears to be still relatively intact. Crucially, there is no evidence to show that any one of the cases has fallen out of use.

Subject position (Nominative case)	Direct Object position (Accusative case)	Indirect Object position (Dative case)	Possessive constructions (Genitive case)
95.3%	98.6%	74.2%	60%
(566/594)	(277/281)	(46/62)	(148/248)

Table 10. Snapshot of "health": percentages of expected case forms (with #s of tokens in brackets below).

	Subject position	Direct Object position	Indirect Object position	("periphrastic -van" substitut	
	singular <i>den</i> plural <i>den</i>	plural <i>den</i>	non-Dative <i>die</i>	van + die	van + het
BW		0.7%	9.6%	8%	1%
NvR	4.2%	0.7%	8.1%	19%	6%
СВ	0.5%		8.1%	14%	5%
Total %					
of "decay":	4.7%	1.4%	25.8%	41%	12%

Table 11. Snapshot of "decay": percentages of unexpected case forms 6 .

The results presented in section 3 would seem difficult to reconcile with the statements that have been made about the loss of case in Dutch surveyed in Section 2. However before considering the reasons for why this may be, and whether or not we can reconcile the seemingly disparate findings that have emerged from the analysis of texts from very different parts of the Dutch-speaking area as well as from different time periods, I will comment briefly on the

⁶ The percentages for this table were calculated as follows: For "Subject position", 25 of the 594 tokens (= 4.2%) in subject position for NvR were not in the expected nominative case and for CB, 3 of the total 594 tokens (= .5%) in subject position were not in the expected nominative case. The raw numbers for "Direct Object position" are: 2 tokens out of 281 or 0.7% for both BW and NvR. For "Indirect Object position", the raw numbers are: 6 out of 62 (= 9.6%) for BW, 5 out of 62 (= 8.1%) for both NvR and CB. Making sense of the data for the possessive constructions is not as simple a task. The snapshot of decay in Table 11 concerns the periphrastic van- constructions involving van + die or van + het—in other words, those instances where we would expect the dative case used given that van- governs the dative case. The uninflected forms account for 53% of the (unambiguously) dative forms involving van- constructions.

issue of the "artificiality" of case marking in texts from the Early Modern period. In doing so, I offer an alternative view of the task that the early Renaissance grammarians were engaged in with respect to the state of the case marking system in Dutch.

4. Renaissance grammarians: resurrecting an artificial case marking system or capturing and ordering variants in use?

The frequency with which references to the artificiality of case marking in texts from the Early Modern period are made raises intriguing questions about the power of a few to control the linguistic choices of the many—especially at a point in linguistic history when the emergence of a standard language ideology was still a good century or two away. There is a substantial body of literature devoted to chronicling the work of the Early Modern grammarians and language "experts" (cf. Van der Sijs 2004 for a recent overview of this work) and in the linguistic histories of Dutch, this topic features prominently from the Early Modern period onward (for recent examples, see Janssens & Marynissen 2005, Van der Wal & Van Bree 2008). In fact, there is a sharp division between how Middle Dutch is treated in these works compared to Early Modern Dutch; for the earlier period, dialectal differences are the main focus while for the later period, the emerging (written) standard language takes centre stage. The actual language use (as opposed to contemporary parodies of it) of non-grammarians, non-published authors, non-academics, non-politicians and others who were not considered to be linguistically astute or "socially prestigious" receive little if any attention from this period onward. Two immediate questions are: What were ordinary people actually doing in terms of language use in the Early Modern period? And how does their language use square with that which was, as the traditional linguistic histories suggest, promulgated by the so-called language experts?

In terms of case marking, section 3 offers an account of what ordinary people were actually doing. We can use this data to compare it with the paradigms that the early Dutch grammarians were said to be prescribing. First, however, it is important to get a sense of what the systems looked like. In Table 12, the earliest two case marking paradigms published in grammars of the 16th/17th century are

provided for comparison. Immediately apparent when comparing the two systems is that they are different in a way that reflects another change going on in the language at the time—that is, the collapse of the three-way gender system to a two-way system that has common gender/neuter distinction. Spiegel's case system is an attempt to capture the collapse in the gender system, while Van Heule's case system does not take this change into account. This, in turn, accounts for the only differences (see bolded forms) between their paradigms, since the other apparent differences can be more accurately described as an increase in options.

	Spiegel (1584) De Twe-spraack			Van Heule (1625, 1633) Nederduytsche Grammatic ofte Spraec- konst		
	masc.	fem.	neuter	masc.	fem.	neuter
Sg						
N	de	de	het	de	de	het
Α	de(n)	de(n)	het	den	de	het
G	des	des	des	des	der	des
D	den	den	den	den	de(r)	het/den
Abl.	vande(n)	vande(n)	van het/ vant	vanden	vande(r)	van het/ van den
Pl						
N	de	de	de	de	de	de
Α	de(n)	de(n)	de(n)	de	de	de
G	der	der	der	der	der	der
D	den	den	den	den	den	den
Abl.	vande(n)	vande(n)	vande(n)	vande(n)	vande(n)	vande(n)

Table 12. Case marking systems 'prescribed' by early Dutch grammarians (Source: Hermkens 1973).

Turning now to the comparison of Spiegel's case system with that used by individuals just a bit over a decade prior to the appearance of this first printed grammar of Dutch, there are 12 differences (see bolded forms) to be noted in Table 13, eight of which represent options rather than completely different forms. When comparing the case systems used in the late 16th-century egodocuments with Van Heule's case marking system that appeared in the second printed grammar of Dutch over four decades after Spiegel's *De Twe-spraack* (Table 14), there are only five differences to be noted, all of which represent options rather than different forms.

		Spiegel (1584)		Egodocuments (1572-1573)			
	De Twe-spraack						
	masc.	fem.	neuter	masc.	fem.	neuter	
Sg							
N	de	de	het	de(n)	de	het	
Α	de(n)	de(n)	het	den	de	het	
G	des	des	des	des	der	des	
D	den	den	den	de(n)	de(r)	het /den	
Abl.	vande(n)	vande(n)	van het/	vanden	vande(r)	van het/	
			vant			van den	
Pl							
N	de	de	de	de(n)	de	de	
Α	de(n)	de(n)	de(n)	de(n)	de	de(n)	
G	der	der	der	der	der	der	
D	den	den	den	den	den	den	
Abl.	vande(n)	vande(n)	vande(n)	vande(n)	vande(n)	vande(n)	

Table 13. Comparison of case marking forms: Spiegel vs egodocuments.

	Van Heule (1625, 1633) Nederduytsche Grammatic ofte Spraec-konst			Egodocuments (1572-1573)			
	masc.	fem.	neuter	masc.	fem.	neuter	
Sg							
N	de	de	het	de(n)	de	het	
Α	den	de	het	den	de	het	
G	des	der	des	des	der	des	
D	den	de(r)	het/den	de(n)	de(r)	het/den	
Abl.	vanden	vande(r)	van het/	vanden	vande(r)	van het/	
			van den			van den	
Pl							
N	de	de	de	de(n)	de	de	
Α	de	de	de	de(n)	de	de(n)	
G	der	der	der	der	der	der	
D	den	den	den	den	den	den	
Abl.	vande(n)	vande(n)	vande(n)	vande(n)	vande(n)	vande(n)	

Table 14. Comparison of case marking forms: Van Heule vs egodocuments.

To sum up the discussion to this point, when we compare the case marking systems which appeared in the first two printed grammars of Dutch (Table 12) with the case systems that emerged from the analysis of the late 16th-century

egodocuments from individuals from two small towns in the province of Holland (Tables 13-14), it is difficult to come away with the impression that the grammarians were promulgating completely artificial case systems that could not have been in use in the late 16th century. Much has been made of the fact that these early grammarians had created systems involving six cases (cf. Van der Wal & Van Bree 2008:191-192) and how this shows that these case systems were indeed artificial. What is important to recognize here is that they had introduced two *labels* (ablative and vocative) that had not traditionally been used in previous discussions of case systems for Dutch. These two new labels, crucially, did not introduce new forms into the language or new distinctions that were not already there in the language. Thus while it may appear to us to be unnecessary to have introduced a "vocative" category into a case paradigm which is just the bare form of the noun such as "man" or "woman", it does not mean that the other case categories that were traditionally used to mark the major participants in a sentence or to mark the relations between nominals were therefore artificial.

Instead of focusing exclusive attention on this idea of artificiality of case marking from the 16th century onward, a more productive line of enquiry, if we seek to understand the relationship between the linguistic beliefs and attitudes of the early grammarians and their effects (if any) on contemporary language use, is to try to bring into focus how ordinary people were using the language at this time. We know that if we are to witness change in the language—and with respect to this study, that would be change in the case marking system or the breakdown of case marking system—there must be a period of variation that precedes such a change. It is difficult to conceive of a situation of linguistic change that does not involve older forms varying in use with newer forms. An interesting point to note in terms of Spiegel's and Van Heule's case paradigms is that they are clearly allowing for variation. These are not paradigms that represent the most conservative 13th century Middle Dutch case marking system possible, which allows for no change and no variation. For this reason, I would argue that the task that the early grammarians were engaged in was more akin to capturing and ordering the variants in use at the time rather than resurrecting case marking forms that are alleged to have—as much as a century or two earlier—fallen out of use.

One final point to make about the relationship between Early Modern grammarians' efforts at language prescription/proscription and the actual language use of ordinary people, concerns the question of how ordinary people received this work or how the grammarians themselves may have felt about their work. Interestingly, given the amount of attention that the work of the early grammarians has attracted in the traditional linguistic histories of Dutch to date, we know very little about the reception of their work by the wider population. That topic remains to be investigated. Hermkens (1973:19), however, provides us with a few intriguing details about the concerns of a few early grammarians themselves regarding the reception of their work by others. He explains that these early Dutch grammarians were actually apprehensive about the linguistic work they were undertaking. They were fearful of how their work might be misunderstood and criticized by others, and how they might be the subject of complaints or be slandered or maligned because of their work. In fact, several of the early grammarians sought the protection of more powerful men around them; Spiegel, for example, sought the protection of the mayors and the councilors of the city of Amsterdam. Crucially, though, these fears were not ones that those of us living in standard language cultures would be familiar with. Thus, instead of fearing, for example, that their work (ie, grammars) may be perceived as too lenient, allowing for too much variation, and therefore being too descriptive, it appears that they were fearful that their efforts might be construed as being too directive. As Hermkens (1973:19) notes, the activity of "arranging the language" (taalordening), at least in the beginning, generated a fair amount of resistance. Information such as this is a gentle reminder that it is important to consider not only what purportedly influential people say about themselves and others engaged in the same activities they are; it is equally important to examine, where possible, their actions as they are perceived by others and the response of others to their endeavours.

_

⁷ Some might argue that this is a topic that cannot be investigated because we cannot know how the broader population received the work of these early grammarians in the late 16th/17th century—that that sort of data is not recoverable from the sources at our disposal. If it is found that this indeed turns out to be the case, then it is all the more important to undertake studies which aim to compare how people *not* engaged in language matters are behaving linguistically, and to compare these results with how a minute, select, sub-section of the population (the grammarians) would like such people to be behaving.

5. Putting claims of case loss in Dutch in their socio-historical context

The final topic for consideration is one that has already been foreshadowed, and concerns the question of whether we can reconcile the results obtained in this study with earlier findings or observations made about case marking and case loss in Dutch. This study has shown that individuals from small towns in late 16th-century Holland still made use of a case marking system although evidence of breakdown is clearly visible. Previous work on case marking, or assumptions about case marking, suggest that the case system was lost in Dutch after the 15th century and that whatever case marking we can observe from the 16th century onward has more to do with the work of the early Dutch grammarians rather than any reflection of actual language use. While it may seem impossible to draw these differing accounts together in a way that shows that each is potentially on the right track, I believe it is possible if we place these findings in their sociohistorical context. What we would be looking for is any historical information that might be conducive to rapid language change in different parts of the Low Countries at different points in time.

Such information about rapid change in the history of the Low Countries is, in fact, readily available in the work of demographic historians. In Table 15 we have population estimates for several southern and northern Dutch cities spanning three and a half centuries. The first difference to note is that the cities in the south were substantially larger than those in the north. What these figures do not do, however, is give us a sense of how dynamic this situation was. Ieper in the 13th century, for example, experienced the fastest growth of anywhere in northwestern Europe (Stabel 1997:33), and the province of Flanders (where the cities of Bruges and Ghent are located) had the densest population in medieval Europe. This density was estimated at 78 inhabitants per square kilometer with the greatest concentration around Bruges (Stabel 1997:26). The peak period for migration to the city of Bruges occurred in the decade of 1440-1449 after which point the city witnessed a steady decline in population (Stabel 1997:32). For the city of Antwerp in the province of Brabant to the north of Flanders, it is the 15th and 16th centuries that are the key periods for migration and population explosion. For cities further north in the province of Holland such as Amsterdam and Leiden, it

is not until the late 16th century (for Amsterdam) and the early 17th century (for Leiden) that these towns began to witness a doubling and tripling of their populations.

Sta	bel (1997), E	Blockmans	(2003)*	De Vries (1984)				
	beg	mid	late	1500	1550	1600	1650	
	14th	14th	15th					
Ghent	64*	64	45	40	50	31	46	
Bruges	46*	45	42	30	35	27	34	
leper	30	40	severe decline	10	10	unknown	13	
			Antwerp	40	90	47	70	
			Amsterdam	14	30	65	175	
			Leiden	14	12	25	67	
			Haarlem	14	14	30	38	
			Gouda	11	11	13	15	

Table 15. The growth of southern and northern Dutch cities, 1300-1650 in thousands.

When we consider the fact that "urban living even in the best of times was a deadly proposition" (Murray 2005:97), for cities to grow at all they needed a substantial number of people moving into them (this is known as the "urban graveyard effect"). Furthermore, historical demographers have been able to determine that while smaller cities drew their new citizens from the immediate surrounding countryside, larger cities drew most of their immigrants from far away. If we combine the urban graveyard effect with these findings of historical demographers we may have an answer to the question of how a fairly substantial change, such as the breakdown of a case system, could have taken place at considerably different points in time and in geographically distant parts of the Low Countries. Given what is known about the potential of larger cities to attract immigrants from much further away than the smaller cities and towns, simply considering the question of dialect diversity, the smaller cities would tend to

reflect a more local, relatively linguistically homogenous population, while the larger cities would be, by comparison, linguistically much more heterogeneous. This has been demonstrated to be the case for the urban centres in medieval Flanders (cf. Thoen 1993) and such a scenario could favour the rapid and relatively early erosion of case distinctions and thus the collapse of the case marking system in that region.

Returning to the question posed at the beginning of this section, if we consider the claims that have been made in the past about the breakdown of the case marking system in Dutch, and we consider where in the Low Countries the data for these claims has been taken, and for what time periods, we find that the evidence has been taken from *precisely those urban centres* which were witnessing rapid growth in their populations and therefore precisely those urban centres which would have been linguistically much more heterogeneous and where case loss might have been an outcome of such an intensive period of dialect contact.

6. Summary

In this study I considered the breakdown of the case marking system in Dutch by adopting an approach which focuses on the intermediate stages of this change. Given that the bulk of the work chronicling the collapse of case marking in Dutch still remains to be done, one question I sought to shed light on is whether we can assume that case loss took place at the same time and at the same pace in different parts of the Dutch-speaking area. My findings, based on an analysis of case marking of determiners from of a corpus of 42,000 words, and representing the language use of individuals from the late 16th century, showed that the state of case marking was still relatively healthy at a time when the case marking system in Dutch is believed to have long since collapsed.

To address what might appear at first glance to be irreconcilable differences between past claims made about case loss in Dutch and about when case marking became "artificial" in the language, and the findings of this study showing case marking still very much in use, I drew upon the research of demographic historians to underscore the importance of placing our linguistic analyses and

insights into their socio-historical context. While our understanding of the linguistic effects of rapid demographic, social and economic change is still in its infancy, I hope to have made a solid case for treating changes like case loss as one that we must assume occurred at different times, at different rates and in different places in the history of the language. As such, where we look for evidence of case loss in the history of Dutch—both in terms of chronology and geography as well as in terms of text types—will matter to the answers we seek about this substantial change that took place in the Dutch linguistic territory over the course of several centuries.

Given the prominent place accorded to it in the linguistic histories and handbooks of Dutch, there is one final point to make concerning the efforts of the early grammarians and how to make sense of their contributions. Although many of us are primarily interested in understanding people's actual language use in earlier points in time and why and how their linguistic repertoires may have changed, there is nevertheless a real need for a discussion of how to view the work of these purported language experts. In considering this topic, what strikes me is that there seems to be a blurring of distinctions between determining what was part of an artificial written language at a given point in time and what became artificial over time. With respect to case marking and case loss, when, and importantly for whom, did the descriptions of early Dutch grammarians become prescriptions and at what point did they also become artificial? The demographic data presented in Table 15 is important to consider in relation to this question. The grammarians and cultivators of the Dutch language that works like Hermkens (1973) or Van der Sijs (2004) survey began precisely at a place (the urban centres of Holland) and time (the late 16th/early 17th century) that coincided with demographic, social, economic and political changes on a scale previously unknown in the history of the Low Countries. It is crucial, therefore, to situate the findings of this study as they pertain to the case marking systems of three individuals from the northern Dutch towns of Haarlem and Gouda, in this historical context. The same sort of study carried out in Amsterdam in the early decades of the 17th century, and possibly even in the final decades of the 16th century, is likely to yield dramatically different results in terms of the degree to which case is still found to be marked. It is entirely conceivable that there were individuals in Amsterdam at this time whose writings show no evidence of a case

marking system, just as it is conceivable that there would have been individuals in 14th/15th century Bruges or 15th/16th century Antwerp whose writings no longer show evidence of a case marking system. There are, as discussed in this study, good reasons to assume that the breakdown of the case system in Dutch was not a change that took place "in the language" by a certain point in time. It goes without saying, however, that more research is needed if we are to understand the finer details how just how this major change unfolded.

References

Archival manuscripts

Bartholomeeszn C 1572 Het journaal van Cornelis Bartholomeeszn Stadsbibliotheek Haarlem. (Approx 18,000 words)

Rooswyk N van 1572 Het belech van haerlem 1572 Handschrift 4: N.N Gemeentearchief Haarlem. (Approx. 14,000 words)

Printed primary sources

Eeghen I H van 1959 Dagboek van Broeder Wouter Jacobsz Prior van Stein Amsterdam 1572-1578 en Montfoort 1578-1579 Groningen J.B. Wolters. (Approx 10,000 words)

Secondary sources

Audring J 2009 Reinventing Pronoun Gender Utrecht: LOT.

Blockmans W 2003 'De vorming van een politieke unie (veertiende-zestiende eeuw)' in JCH Blom & E Lamberts (eds) *Geschiedenis van de Nederlanden* Baarn: H B Uitgevers. Pp. 46-116.

Burridge K 1993 Syntactic Change in Germanic: Aspects of Language Change in Germanic with Particular Reference to Middle Dutch Amsterdam: John Benjamins.

CDRMNLS 1998 CD-ROM *Middelnederlands. Woordenboek en Teksten* Den Haag/ Antwerpen: SduUitgevers.

Hermkens H M 1973 Inleiding tot het zeventiende-eeuws 's-Hertogenbosch: L.C.G. Malmberg.

Hermkens H M 1981 'Het genus in het Hollands van de zeventiende eeuw' in G.R.W. Dibbets (ed) *Studies voor Damsteegt* Leiden: Publikaties van de Vakgroep Nederlandse Taal- en Letterkunde. Pp. 65-77.

Hermkens H M 1985 'Van casus-n naar genus-n' De nieuwe taalgids 78(6): 537-538.

Horst JM van der 2008 Geschiedenis van de Nederlandse Syntaxis (2 volumes) Leuven: Universitaire Pers Leuven.

Howell R B & M Olson 2011 'On the question of morphological conditioning: Schwa- Apocope and Final -n Apocope in 17th century Dutch' *GLAC-17*, University of Texas at Austin, 15-16 April.

- Janssens G & A Marynissen 2005 Het Nederlands vroeger en nu Leuven/Voorburg: Acco.
- Loey A van 1970 Schönfelds Historische Grammatica van het Nederlands Zutphen: N.V. W. J. Thieme & Cie. (8th edition.)
- Murray J M 2005 Bruges, Cradle of Capitalism, 1280-1390 Cambridge: CUP.
- Neeleman A & F Weerman 2009 'Syntactic effects of morphological case' in A Malchukov & A Spencer (eds) *The Oxford Handbook of Case* Oxford: OUP. Pp. 276-289.
- Sijs N van der 2004 Taal als mensenwerk. Het ontstaan van het ABN Den Haag: Sdu Uitgevers.
- Stabel P 1997 Dwarf among giants. The Flemish urban network in the Late Middle Ages Leuven-Apeldoorn: Garant.
- Thoen E 1993 'Verhuizen naar Brugge in de late Middeleeuwen' in H Soly & R Vermeir (eds) Beleid en bestuur in de oude Nederlanden Ghent: Vakgroep Nieuwe Geschiedenis. Pp. 329-349.
- Vries J de 1984 European urbanization, 1500-1800 Harvard, MA: Harvard University Press.
- Wal MJ van der 1993 'Teaching Latin and Observing the Dutch Vernacular: Exercitium Puerorum (1485)' in J Noordegraaf & F Vonk (eds) Five hundred years of foreign language teaching in the Netherlands 1450-1950 Amsterdam: Stichting Neerlandistiek VU. Pp. 1-9.
- Wal MJ van der & C van Bree 2008 Geschiedenis van het Nederlands (5th revised edition) Houten: Spectrum.
- Weerman F & P de Wit 1998 'De ondergang van de genitief' Nederlandse Taalkunde 3(1):18-46.
- Weerman F & P de Wit 1999 'The decline of the genitive in Dutch' Linguistics 37(6):1155-1192.
- Wit P de 1997 Genitive case and genitive constructions Utrecht: UiL OTS Dissertation series.

The linguistic anatomy of individual differences in Japanese monologues: Focusing on particles and interjections

Dr. Shunichi Ishihara
The Australian National University, Canberra
shunichi.ishihara@anu.edu.au

Abstract. This is a linguistic study on idiosyncrasy manifested through language use in Japanese monologues. For this purpose, we use speaker classification techniques as analytical tools. Focusing on Japanese particles, the subcategories of these particles, and interjections, we aim to find out to what extent Japanese speakers are idiosyncratic in selecting certain words above others in monologues. We are interested in how differently or similarly the individualising information of speakers is manifested between the subcategories of these particles, and also between particles and interjections. The genres of the monologues in this study vary from conference presentations on various topics covering humanities, social sciences, natural sciences and engineering to mock public speeches on a variety of general topics, such as "most pleasant memory," "about your community," etc. We demonstrate in this study that Japanese particles and interjections carry different degrees of individualising information. We also discuss what contributes to the identified differences between them.

Keywords. individual differences, particles, interjections, Japanese, speaker classification

1. Introduction¹

We intuitively know that different people talk and write differently, even when they try to convey the same message. We also know that people tend to use their individually selected preferred words despite the fact that, in principle, they can use any word at any time from the vocabulary built up over the course of their lives—given that their word choice falls within the constraints arising from their topic, the register, the audience, etc. Every speaker of a given language has their own distinctive and individual version of language, which is often referred to as their *idiolect* (Halliday *et al.* 1964, Coulthard & Johnson 2007). This idiolect manifests itself in various aspects of communication, such as the choice of words and expressions, grammar, morphology, semantics and discourse structure. The focus of the current study is idiosyncratic word choice, by means of particle and interjection usage in spoken Japanese monologues.

In the domain of written language, in contrast to spoken language, linguistic idiosyncrasy has been mainly studied as authorship attribution. A large number of studies have been conducted on this topic (Burrows 1987, Baayen *et al.* 1996, Fung 2003). Authorship attribution concerns the task of identifying the author of a text. Studies in authorship attribution first emerged as stylometric studies², with many of the pioneering studies based on literary texts (Mendenhall 1887, Thisted & Efron 1987, Mosteller & Wallace 1984, Holmes 1992).

Various techniques have been proposed to model authorship attribution, such as those based on syntactic or grammatical features (Baayen *et al.* 1996, Stamatatos *et al.* 2001) and on probabilistic language models (Keselj *et al.* 2003, Peng *et al.* 2003). Many of them are based on the unique lexical usage of authors (Holmes *et al.* 2001, Juola & Baayen 2005), assuming that the selection of words is unique to each author and that their preferred selection is consistent over time (Mendenhall 1887, Holmes 1992). Indeed, it has been demonstrated that word category usage is very stable across time and writing topics (Pennebaker & King 1999).

¹ This study was financially supported by the ANU Research School of Asia and the Pacific. The author thanks anonymous reviewers for their valuable comments.

² Stylometry is the science of measuring literary style.

In particular, function words are often used as an individualising feature to quantify the unique lexical usage of individual authors, which has been attested in many previous studies (Burrows 1987, Holmes 1992, Holmes *et al.* 2001, Binongo 2003, García & Martín 2007). Function words are closed class words, therefore having little contextual meaning. As such, the selection of function words is considered to be less influenced by the content of a text than by that of lexical words. Mosteller & Wallace (1964) were the first to demonstrate the effectiveness of frequently occurring function words (e.g. *the*, *if*, *to*) in addressing the issues of the so-called *Federalist Papers*. Burrows (1987) also successfully used 30-50 function words for his authorship analysis work. Previous studies have inferred that the use of function words has large variation between authors, but little variation within a single author, which is ideal for authorship classification (Baayen *et al.* 1996, Burrows 1987, Mosteller & Wallace 1964).

In contrast to written language, studies on the idiosyncratic choice of words in spoken language are relatively few. However, the concept of idiolect in the selection of function words has been incorporated into automatic speaker recognition systems in order to enhance their performance (Doddington 2001, Weber et al. 2002). In addition to function words, fillers (such as English um, you know, like), which are unique to spoken language, have also been reported to carry idiosyncratic speaker information. Weber et al. (2002) reported that the inclusion of fillers, as well as functions words, as a speaker individualising feature in automatic speaker recognition systems improves their performance. In Japanese, Ishihara (2010) and Ishihara & Kinoshita (2010) demonstrated that Japanese fillers bear speaker idiosyncratic information to the extent that the accuracy of speaker classification based solely on fillers can be as high as 85% for male speakers. For these studies, speech samples collected from Japanese monologues across various genres were used.

Previous studies on idiosyncratic word choice have centred on English as the target language, and, as mentioned earlier, have mainly concerned the written domain. Thus, in the current study, we look into the idiosyncratic selection of particles and interjections in spoken Japanese, as found in spoken monologues. More precisely, the current study investigates:

- To what extent Japanese speakers are idiosyncratic in selecting certain particles or interjections over others;
- How many particles and interjections need to be included for the most accurate speaker classification results;
- Whether there are any differences between particles and interjections in the degree of idiosyncrasy; and,
- Whether there are any differences between the subcategories of particles in the characteristics of individual differences.

In this study, we focus on particles and interjections. Particles are function words, while interjections are content words. As such, there are distinctive differences in the type of information they provide, as is explained in §2. As a result of these differences, the idiosyncratic information that they carry about speakers may also be different.

In order to answer the aforementioned research questions, we conducted a series of speaker classification tests based solely on particles or interjections. The hypothesis is that the more consistent the individual speaker's selection and use of these words is, and the more strongly the selection and use by one speaker differs from that of another, the more accurate the speaker classifications. We would like to emphasise here that the purpose of the current study is not to improve the accuracy of the speaker classification system, but to investigate the nature of idiosyncrasy in word selections, and to what extent and how the idiosyncrasy of speakers is manifested in word selection for the case of particular particles and interjections.

The current study aims to contribute not only to a better understanding of speaker idiosyncrasy in language use, but also to the advancement of language and speech technologies such as automatic speaker recognition systems (Doddington 2001), plagiarism detection systems (Woolls 2003), and automatic authorship identification systems (Burrows 1987, Baayen *et al.* 1996, Fung 2003). The current study is also relevant to the forensic investigation of linguistic data (Ishihara 2010, Ishihara & Kinoshita 2010).

2. Particles and interjections in Japanese

In this section, the linguistic nature and functions of particles (*jyoshi*) and interjections (*kantanshi*) in Japanese is explained.

There are many different ways of classifying Japanese particles, jyoshi, into subcategories, with Japanese linguists forever arguing about what words need to be considered as particles. As a consequence, in Japanese, the term 'particle' is used in a variety of contexts, though generally referring to small, uninflected grammatical words that follow items such as nouns, verbs, adjectives or sentences (Backhouse 1993). In the database we use for this study (cf. §3.1), particles are classified into the subcategories of case particles (kaku-jyoshi), focus particles (kakari-jyoshi), adverbial particles (fuku-jyoshi), conjunctive particles (setsuzoku-jyoshi), final particles (shu-jyoshi) and nominal particles (jyuntai-jyoshi). However, in the current study, we combine case and focus particles as case-focus particles because only one item (-wa) is subcategorised as a focus particle in the database, and the location in which the focus particle (-wa) appears is the same as that of case particles. We do not consider nominal particles, often called nominalisers, in this study because there is only one item (-no) classified in this subcategory and there is no other category into which nominal particles can be sensibly included. Thus, as shown in Table 1, we investigate case-focus, adverbial, conjunctive and final particles.

	Database subcategories	Target subcategories		
Particles in Japanese	 case particles focus particles adverbial particles conjunctive particles final particles nominal particles 	 case-focus particles adverbial particles conjunctive particles final particles 		

Table 1. The particle subcategories used in the database and the target subcategories for the current study.

According to Ameka (1992:101), interjections are well recognised by people, but are a neglected part of speech in theoretical linguistics. Ameka (1992:113-114) classifies interjections into three categories: expressive, conative and phatic interjections. Expressive interjections are vocal gestures that indicate the speaker's mental state, for example, *Yuk!* 'I feel disgust' and *Aha!* 'I now know this'. Conative interjections are those expressions that are uttered at an auditor, such as

Sh! I want silence here'. Phatic interjections are those expressions that are used to establish and maintain communicative contact, including backchanneling and fillers.

In the following subsections, we provide more detailed information about the target subcategories of particles and interjections.

2.1 Case particles

Case particles (*kaku-jyoshi*) provide the grammatical relationship between the predicate of a sentence and the noun phrases appearing in the sentence. In (1), the case particles, *-ga*, *-de* and *-o* indicate that the immediately preceding noun phrases serve as the subject, instrument and direct object of the predicate of the sentence, respectively.

(1) ani -ga boo -de watashi -o tataita elder.brother-SUBJECT stick-INSTRUMENT I -DIRECT.OBJECT hit.PAST 'My elder brother hit me with a stick.'

2.2 Focus particles

Focus particles focus on, or emphasise, the noun to which they are attached. In (2), the noun that is followed by the focus particle -wa serves as the topic of this sentence. Note that the location in which the focus particle appears is the same as that of case particles, though the function is significantly different. Another difference between the focus particle, -wa and case particles, is that -wa follows some of the case particles.

(2) watashi-wa sore-o tabenakatta

I -FOCUS it -DIRECT.OBJECT eat.NEGATIVE.PAST

'As for me, I did not eat it.'

As explained earlier, case and focus particles in this study are treated as one group of case-focus particles.

2.3 Conjunctive particles

As the name indicates, conjunctive particles are used to join clauses in a variety of contexts. In sentences (3) and (4), the two verbs are joined with the conjunctive

particles -kedo and -nagara, which provide the meanings of but and while in English, respectively.

- (3) ringo -o katta **-kedo** tabenakatta
 apple-DIRECT.OBJECT buy.PAST**-but** eat.NEGATIVE.PAST
 'I bought an apple, but I did not eat it.'
- (4) ringo -o aruki -nagara tabeta apple-DIRECT.OBJECT walk -while eat.PAST 'I ate an apple while walking.'

2.4 Adverbial particles

Adverbial particles are attached to clauses, and modify the predicate of a sentence, as can be seen in (5). They are adverbial in behaviour (Matsumura 1969). As illustrated in (6), some adverbial particles can be attached to nouns (also adjectives and adverbs) (Kaiser *et al.* 2001).

- (5) watashi-wa ringo -o tabeta -dake -da

 I -TOPIC apple-DIRECT.OBJECT eat.PAST -only -COPULA

 'I ate only an apple.'
- (6) watashi -dake ringo -o tabeta

 I -only apple-DIRECT.OBJECT eat.PAST

 'Only I ate an apple.'

2.5 Final particles

Final particles appear in sentence-final position. These particles show in various ways how the speaker appeals to the listener, and with what sort of interactional attitude (Kaiser *et al.* 2001). The example sentences given in (7), (8) and (9) are of the same construction, except for the final particles *-ka*, *-yo* and *-ne*, respectively. The final particle *-ka* is a question particle. The final particle *-yo* is used to indicate that the sentence expresses what the speaker knows or believes, while the final particle *-ne* is used to indicate that the sentence expresses what the speaker believes that the hearer knows or believes (Katagiri 2007:1315). However, as Katagiri (2007) argues, amongst other things, intonation plays an important role in the interpretation of the meaning of the final particle (Davis 2011, Venditti 1995).

- (7) kaigi -wa rokuji -kara desu -ka meeting-TOPIC 6.oclock-from COPULA-KA 'Is the meeting from 6 o'clock?'
- (8) kaigi -wa rokuji -kara desu **-yo** meeting-TOPIC 6.oclock-from COPULA**-YO** 'The meeting is from 6 o'clock (I believe).'
- (9) kaigi -wa rokuji -kara desu -ne meeting-TOPIC 6.oclock-from COPULA-NE

 'The meeting is from 6 o'clock, isn't it (I believe that you believe so).'

There are well-reported gender differences in the use of final particles (Martin 2004, Kinsui 2007). For example, -ze and -zo are fairly crude expressions, and thus are exclusively used by (young) males while -wa tends to be used by females to express femininity (Martin 2004, Matsumura 1969).

2.6 Interjections

According to Martin (2004:1041), interjections function to A) express the speaker's emotional reactions, such as pleasure, relief, surprise, hesitation, or disgust; B) call attention; C) respond to a question, a command, or a social transaction; and D) hold the floor when fluency fails and the speaker is searching for a desired expression (e.g. fillers).

Since the target utterances in the current study are monologues, the majority of tokens categorised as interjections are in fact fillers, which belong to group D. However, there are some occurrences that belong to A, such as *ara* 'oh', *ee* 'eh' and *yoisho* 'oof' and to C, such as *hai* 'yes' and *un* 'yep'.

2.7 Differences between particles and interjections, and also between the subcategories of particles

As explained in §2.1 to §2.5, particles are non-conjugated function words. They follow items such as nouns, verbs, adjectives or sentences, and they prosodically merge into the preceding material (Backhouse 1993). On the other hand, interjections can be used by themselves as independent free-standing units, grammatically like sentences (Tokieda 1950). Like the four functions of

interjections summarised in §2.6, interjections are more related to higher level information (e.g. para-/extra-linguistic information, such as emotions) than particles, which mainly serve to carry linguistic information such as syntactic relationships and minor modifications of meaning. It is interesting to see if there is any difference in the manifestation of speaker idiosyncrasies between particles and interjections. Furthermore, the nature and function of the subcategories of particles are also very different. For example, final particles provide the speaker's attitude towards the listener, which is beyond simple syntactic information. Thus, it is also of interest how the idiosyncratic information of speakers is carried by the different categories of particles.

3. Methodology

This is a linguistic study on idiosyncrasy using speaker classification techniques as analytical tools. The more consistent the individual speaker's selection of certain words is, and the more significantly those words selected by the speaker vary from those selected by another, the more accurately the speaker classification is performed.

Two kinds of comparisons are involved in speaker classification tests. The first is called *Same Speaker Comparison* (SS comparison) in which two speech samples produced by the same speaker need to be correctly identified as the same speaker. The other is, *mutatis mutandis*, *Different Speaker Comparison* (DS comparison).

The series of speaker classification tests that we conducted can be categorised into two experiments: Experiment 1 investigates how well we can classify speakers based on each of the different subcategories of the particles (cf. §5.1). Experiment 2 investigates the overall performance of all particles and interjections in speaker classification (cf. §5.2). Although the target words for Experiments 1 and 2 are different, the experimental methodology is identical for both of them.

3.1 Database and speakers

For speech data, we used the Corpus of Spontaneous Japanese (CSJ) (Maekawa et al. 2000), which contains recordings of various speaking styles such as sentence

reading, monologue, and conversation. For this study, we used only the monologues, categorised as either Academic Presentation Speech (APS) or Simulated Public Speech (SPS). APS was mainly live-recorded academic presentations, between 12-25 minutes long. For SPS, 10-12 minute mock speeches on everyday topics were recorded. We selected our speakers from this corpus based on three criteria: availability of multiple and non-contemporaneous recordings, spontaneity (e.g. not reading) of the speech, and standard modern Japanese speech. The spontaneity of the language and the extent to which it conforms to standard modern Japanese were assessed on the basis of the rating the CSJ provided. Thus, only those speech samples which were high in spontaneity and uttered entirely in Standard Japanese were selected for this study. This gave us 416 speech samples for inclusion (= 208 speakers: 132 male and 76 female speakers x 2 sessions).

3.2 Basic statistics

Table 2 provides the basic statistics of the target particles and interjections. In this study, we decided to use those particle types that appeared three times or more in the selected speech samples for the speaker classification experiments. As seen in Table 2, 50% of all particle types belong to case-focus particles. Final particle types account for only 10% of all particle types.

	Occurrences	N ≥ 3
	(% in all particle types)	(% in all particle types)
Case-focus particles	88 (49%)	64 (50%)
Conjunctive	29 (16%)	20 (15%)
Particles		
Adverbial particles	39 (22%)	31 (24%)
Final particles	21 (11%)	13 (10%)
All particles	177	128
Interjections	123	70

Table 2. Basic statistics of the target particle and interjection types.

70 different interjections are used in this study. The number of different types of interjections is very similar to the number of different types of case-focus particles, 64.

Table 3 contains the ten most frequently used particle types listed in descending order, separately for the subcategories and all together for all particle types.

-	C-F	N	Conj	N	Adverb	N	Final	N	All	N	Type
1	-no	49,206	-te	19,344	-mo	16,327	-ne	8,289	-no	49,206	Case
2	-wa	30,823	-keredo	8,541	-toka	4,566	-ka	6,350	-wa	30,823	Focus
3	-ga	30,646	-ga	5,303	-tte	4,156	-na	2,005	-ga	30,646	Case
4	-0	30,623	-to	5,255	-kurai	2,860	-yo	1,211	-0	30,623	Case
5	-ni	29,603	-node	3,701	-made	1,737	-no	56	-ni	29,603	Case
6	-to	20,033	-ba	1,541	-tari	1,580	-20	38	-to	20,033	Case
7	-toiu	19,438	-kara	1,464	-dake	1,567	-wa	29	-toiu	19,438	Case
8	-de	16,167	-shi	912	-уа	1,248	-ke	23	-te	19,344	Conj
9	-kara	4,711	-demo	906	-nado	916	-уа	21	-mo	16,327	Adverb
10	-toshite	2,233	-nagara	535	-hodo	906	-kashira	13	-de	16,167	Case

Table 3. The ten most frequently used particle types for each subcategory of the particles. C-F = case-focus particles; Conj = conjunctive particles; Adverb = adverbial particles; Final = final particles; All = all particles; N = occurrences; Type = type of particles appearing in all particles.

Table 3 is also referred to when we discuss the results of the speaker classification experiments in §5.

Mirroring the fact that case-focus particle types account for 50% of all particle types, the occurrences of the ten most frequently used case-focus particles are significantly greater than those of the other particles. Consequently, eight of the ten most frequently used particles are case-focus particles, as can be seen in the rightmost column of Table 3. Note that the -no particle presents as the most frequently used particle. This is the case despite the fact that the genitive particle as the nominaliser particle -no is excluded in this study.

The different types of interjections listed in Table 4 are all fillers.

	Interjections	N
1	<i>e</i> -	27776
2	е	12046
3	ma	8816
4	ano-	7213
5	ano	6988
6	ma-	5990
7	sono	2533
8	e-to	2479
9	а	2364
10	n	1924

Table 4.
The ten most frequently observed interjection types. N = occurrence. '-' indicates long vowel length.

3.3 Vector space model

In this study, we compare many sets of paired speech samples. Using the occurrences of the identified words, each speech sample is modelled as a real-valued vector³. If n different words are used to represent a given speech sample S, the dimensionality of the vector is n. That is, S is represented as a vector of n dimensions ($\vec{S} = (F_1, F_2 ... F_n)$), in which F_n represents the nth component of \vec{S} and F_n is the frequency of the nth word). For example, if 5 words (e.g. ah, like, OK, yes, $all \ right$) are used to represent a speech sample (x), and the frequency counts of these words in the speech sample are 3, 10, 4, 18 and 1, respectively, the speech sample x is represented as given in (1).

(1)
$$\vec{x} = (3,10,4,18,1)$$

The speech samples in this study are modelled using different vector dimensions (e.g. using the first 20 most frequently used fillers). This is to see how the performance of the speaker classification system is influenced by the number of dimensions.

3.4 Term frequency-inverse document frequency weighting

The usefulness of particular words for the purposes of speaker classification is determined by their uniqueness. This is based on the number of different speech samples in which they occur, as well as how frequently they are used in a particular speech sample. For instance, if a given word is used by many speakers many times, this particular word is not as useful as a word which is used by a smaller number of people in many instances. Different weights are therefore given to different words depending on their uniqueness in the pooled data. The *tf-idf* (term frequency-inverse document frequency) weight (cf. Formula (2)) is used to evaluate how unique a given word is in the population. A corresponding weight is given to that word to reflect its importance in speaker classification (Manning & Schütze 2000).

³ Readers with little background in mathematics and statistics are advised to read chapter five of (Manning & Schütze 2000), in which they explain the statistics that are available and how they can be used for the analysis of word usages.

$$(2) w_{i,j} = t f_{i,j} * log(\frac{N}{df_i})$$

In Formula (2), term frequency $(tf_{i,j})$ is the number of occurrences of word i (w_i) in the document (or speech sample) j (d_j). Document frequency (df_i) is the number of documents (or speech samples) in the collection in which that word i (w_i) occurs. N is the total number of documents (or speech samples).

3.5 Cosine similarity measure

The similarity between two speech samples, which are represented as vectors (\vec{x}, \vec{y}) , is calculated based on the cosine similarity measure. This is indicated in (3) (Manning & Schütze 2000). This particular method was selected in order to normalise the different durations of the speech samples. The cosine similarity measure is based on the assumption that the direction of a vector should be constant if the speech sample is long enough.

(3)
$$similarity(\vec{x}, \vec{y}) = cos(\vec{x}, \vec{y}) = \frac{\vec{x} \cdot \vec{y}}{|\vec{x}||\vec{y}|} = \frac{\sum_{i=1}^{n} x_i * y_i}{\sqrt{\sum_{i=1}^{n} x_i^2 * \sum_{i=1}^{n} y_i^2}}$$

The range of difference between the two vectors (similarity(\vec{x} , \vec{y})) is between 1.0 (= $cos(0^\circ)$) for two vectors pointing in the same direction—e.g. speech samples which are identical—and 0.0 (= $cos(90^\circ)$) for two orthogonal vectors—two speech samples which are completely different, because weights are by their definition not negative⁴. Note that in the experiments of this study, the length (number of dimensions) of the vectors was standardised by only looking at the X most frequent particles and interjections ($X = (5, 10, 15, 20, 25, 30, 35, 40 \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$); $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$; $N = (5, 10, 15, 20, 25, 30, 35, 40, \dots N)$

⁴ Note that the range of cosine similarity measure, which is between 0 for two orthogonal vectors and between 1 for two vectors pointing in the same direction, is counter-intuitive. Readers need to be reminded that 0 stands for two speech samples being completely different and 1 for those being identical.

4. Method for speaker classification

The performance of speaker classification is assessed on the basis of the probability distribution functions (PDFs) of the difference between two contrastive hypotheses. One is the hypothesis that two speech samples were uttered by the same speaker (the same speaker (SS) hypothesis) and the other is that two speech samples were uttered by different speakers (the different speaker (DS) hypothesis). These probabilities can be formulated as $P(E/H_{ss})$ and $P(E/H_{ds})$ respectively, where E is the difference, H_{ss} is the SS hypothesis and H_{ds} is the DS hypothesis. In this study, the PDF of the difference assuming the SS hypothesis is true is called the SS PDF (PDF_{ss}), and the PDF assuming the DS hypothesis is true is the DS PDF (PDF_{ds}). Specific to this study, the difference between two speech samples refers to the cosine difference between the two vectors representing the two speech samples. Each PDF was modelled using the kernel density function (KernSmooth library of R statistical package). Examples of PDF_{ss} and PDF_{ds} are given in Figure 1. In Figure 1, the PDF_{ss} and PDF_{ds} do not conform to a normal distribution, which is the motivation for the use of the kernel density function in this study.

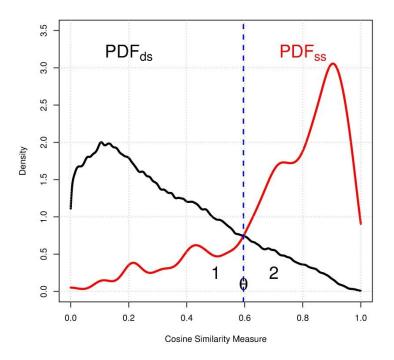


Figure 1. An example of PDF_{ss} (red curve) and PDF_{ds} (black curve). The x-axis is the cosine similarity measure (c) and the y-axis is the probability density (d). The blue vertical dotted line (θ) is the crossing point between PDF_{ss} and PDF_{ds} . Area 1 is the area surrounded by the red curve (PDF_{ss}), d=0 and $c=\theta$. Area 2 is the area surrounded by the black curve (PDF_{ds}), d=0 and $c=\theta$.

As can be seen from Figure 1, PDF_{ss} and PDF_{ds} are not always monotonic. This may result in more than one crossing point (which is not shown in Figure 1, particularly when the dimension of a vector is less than 5. Thus, the performance of the system with the dimension of a vector less than 5 is not given. These two PDF_{s} also show the accuracy of this particular speaker classification system. If the crossing point (θ) of the PDF_{ss} and the PDF_{ds} is set as the threshold, we can estimate the performance of this particular speaker classification system from these PDF_{s} . Area 1 in Figure 1—the area surrounded by the red line (PDF_{ss}), the vertical dotted line of $c = \theta$ and the line of d = 0—is the predicted error for the SS comparisons. Area 2 of Figure 1—the area which is surrounded by the black line (PDF_{ds}), the vertical dotted line of $c = \theta$ and the line of d = 0—is the predicted error for the DS comparisons. Therefore, the accuracy (%) of the SS ($ACCURACY_{ss}$) and DS ($ACCURACY_{ds}$) comparisons can be calculated by (4) and (5), respectively.

(4)
$$accuracy_{ss}(\%) = \left(\frac{\int_0^\theta PDF_{ss}(x)dx}{\int_0^1 PDF_{ss}(x)dx}\right) * 100$$

(5)
$$accuracy_{ds}(\%) = \left(\frac{\int_{\theta}^{1} PDF_{ds}(x)dx}{\int_{0}^{1} PDF_{ds}(x)dx}\right) * 100$$

The accuracy of a speaker classification system (both in SS and DS comparisons) was estimated in this way.

For the selected 416 speech samples obtained from 208 speakers, 208 SS and 86,112 DS comparisons are possible. In the speaker classification tests, spatial vectors of different dimensions (5, 10, 15, 20 ... N, where N is the maximum number of dimensions) are used to see how the number of vector dimensions affects the performance of speaker classification. That is, for the adverbial particles, which include 31 different kinds, we applied the vector sizes (number of dimensions) of 5, 10, 15, 20, 25, 30 and 31.

5. Test results and discussions

In this section, the classification performance of the different subcategories of the particles is closely investigated in §5.1, followed by comparison between the

performance of all particles and that of interjections in §5.2. In §5.3, the speaker-individualising characteristics of the particles belonging to the different subcategories will be scrutinised in terms of between- and within-speaker differences.

5.1 Experiment 1: subcategories of particles

The respective speaker classification performances of the different particle subcategories (case-focus, adverbial, conjunctive, and final particles) are presented first. The differences between them in terms of performance are described before discussing possible reasons for the identified differences.

In Figure 2, the average speaker classification accuracy between the same speaker (SS) and different speaker (DS) comparisons is plotted separately for the different subcategories of the particles as a function of the number of vector dimensions.

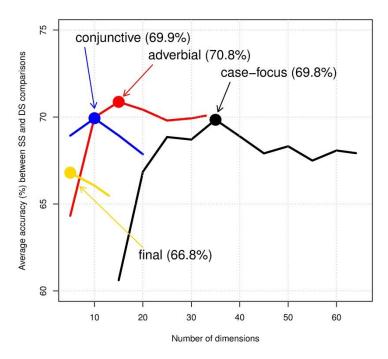


Figure 2. The average accuracy (y-axis) between the SS and DS comparisons is plotted separately for case-focus particle, conjunctive particle, adverbial particle and final particle as a function of the number of dimensions (x-axis) used in the speaker classification tests. The circles indicate the best accuracy for each type.

As can be seen from Figure 1, the speaker classification accuracy reaches as high as approximately 70% for case-focus, adverbial and conjunctive particles. Adverbial and conjunctive particles reach their highest accuracy points with a fewer number of dimensions (15 and 10 dimensions, respectively) than case-focus particles (35 dimensions). The reader is reminded that, for example, 15

dimensions indicates that the speaker classification test was conducted using the 15 most frequently used particles in the subcategory. For case-focus particles, the speaker classification accuracy considerably improves from 15 dimensions (60.6%) to 25 dimensions (68.8%). A similar jump in accuracy can be observed with fewer dimensions (from 5 dimensions: 64.3% to 15 dimensions: 69.9%) for adverbial particles. The classification accuracy of conjunctive particles is as high as 69.9% with as few as only 5 dimensions.

The observation that more dimensions (or particle types) need to be included for case-focus particles to reach the same level of accuracy (approximately 70%) as adverbial and conjunctive particles is probably because the first 15-20 most frequently used case-focus particles are so ubiquitous. Hence, there is not much room for them to bear the individualising information of the speakers. This frequent occurrence of case-focus particles can be seen from Table 3, in which the occurrence of the top ten case-core particles is substantially higher than those of the other particles. Please also note that the curve of the case-focus particles in Figure 2 starts with 15 dimensions because the PDF_{ss} and the PDF_{ds} with less than 15 dimensions become non-monotonic, having multiple crossing points between them⁵. Sensible results therefore cannot be obtained with less than 15 dimensions.

Case particles (in particular, those which are frequently used) are the backbone of the syntactic structure of Japanese utterances. It would be impossible for the speaker to accurately convey the intended message were it not for case particles. Since case particles serve as the dominant carrier of information, which is directly connected to the propositions of the messages, it is likely that less idiosyncratic individual speaker information is encoded in case particle usage. Consequently, more case-focus particles need to be included to get the same level of accuracy as adverbial and conjunctive particles.

After case-focus particles reach their highest accuracy of 69.8% with 35 dimensions, the classification accuracy continues to marginally decrease with some minor ups and downs as the number of dimensions increases. However, this trend is not surprising. The feature vectors are based on the frequency of a

⁵ In Figure 1, for example, the PDF_{ss} and the PDF_{ds} have only one crossing point which is aligned with c = Θ . However, with fewer than 15 dimensions, the PDF_{ss} and the PDF_{ds} start having two or more crossing points.

given particle word; we picked those with a higher frequency first to be included in the feature. As such, vectors in the later orders have low frequencies. This means that the latter part of longer vectors tends to include very similar low numbers across speakers, introducing noise into the assessment of between-speaker difference and thereby making them look more similar. The same trend cannot be clearly observed for adverbial and conjunctive particles; this is most likely due to the fact that the number of dimensions of the feature vectors for adverbial and conjunctive particles is not as high as that of the case-focus particles.

The speaker classification accuracy is notably lower for final particles in comparison to the other particles. This is contrary to our conjecture that the gender difference in the use of final particles would work in favour of speaker classification. Two possible reasons can be noted for the poor performance of final particles. One is due to the speech style of the monologue samples (conference presentation and mock speech), both of which are fairly formal. Gender and speaker differences in the use of final particles may be more salient in informal colloquial speech, as many final particles are related to interaction rather than monologue-style speech. Another reason may be due to the fact that the length of the feature vector is far shorter (only 13) for final particles than for the other particles.

5.2 Experiment 2: particles and interjections

The following section compares the classification performance with all particles together versus that of interjections. In Figure 3, the average speaker classification accuracy between the same speaker (SS) and different speaker (DS) comparisons is plotted as a function of the number of vector dimensions. These functions are shown separately for all of the particles and interjections. Figure 3 (next page) also includes the results presented in Figure 2.

There is a notable sudden improvement in accuracy in both all particles and interjections: a substantial improvement can be observed between 15 dimensions (74.8%) and 25 dimensions (79.4%) for all particles, and between 5 dimensions (75.6%) and 15 dimensions (81.5%) for interjections. As for the highest accuracy, it is 80.5% for all particles with 45 dimensions, while it is 82.7% for interjections

with 25 dimensions. The observation that all particles need more dimensions than interjections to reach the highest accuracy point can be attributed to the fact that, as can be seen from Table 2, the earlier order vectors of all particles contain many of the frequently occurring case-focus particles. It was previously discussed in §5.1 that these case-focus particles do not have much individualising information.

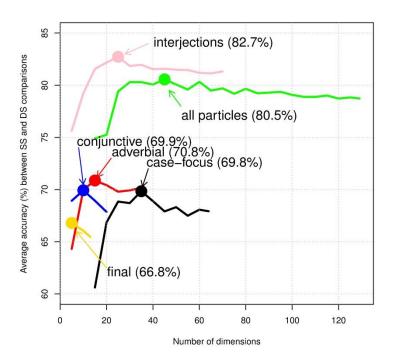


Figure 3. The average accuracy (y-axis) between the SS and DS comparisons is plotted separately for all particles and interjections as a function of the number of dimensions (x-axis) used in the speaker classification tests (top half). The circles indicate the best accuracy. The results presented in Figure 2 are also included as a reference (bottom half).

It is evident from Figure 3 that the performance of speaker classification is consistently better for interjections than for all particles, indicating that interjections carry more individually identifying information than particles do. As explained earlier, an interjection is a word used to express an emotion or a sentiment on the part of the speaker. Communication has been traditionally viewed as an intentional act of transferring information. However, independent of the mode of communication (spoken or written), paralinguistic or extralinguistic information is also conveyed along with the symbolic content of the intended message. Paralinguistic information is information about the speaker or writer, such as their age, gender, social background, psychological state, or health. This latter sort of information is often called paralinguistic or extralinguistic information (Abercrombie 1967, Nolan 1983, Rose 2002).

A large portion of the words classified as interjections in the database are fillers. It has been argued based on empirical data that fillers manifest the cognitive process that the speaker is undergoing (Sadanobu & Takubo 1995), and also reflect the speaker's difficulty in conceptual planning and linguistic encoding (Watanabe et al. 2008). The cognitive process is a well-known source of individual differences (Cooper 2002). Fillers therefore transfer more than linguistic information encoded in written messages; fillers do not appear in written texts. On the other hand, particles (except for final particles) are directly involved in transmitting linguistic information such as the syntactic relationship between a noun phrase of a sentence and the predicate of the sentence, or the logical relationship between two clauses. These usages of case particles show that they are more directly relevant for transferring the content information encoded in messages as accurately as possible than interjections are.

Despite the fact that each subcategory of particles has only approximately 66.5-71.0% accuracy (cf. §5.1), the speaker classification result drastically improves by approximately 10% when all particles are included in the tests. This indicates that the individualising information of the speakers is encoded differently in the uses of the different subcategories of particles. If the individual characteristics of the speakers had been encoded in the different subcategories of particles in the same manner, the inclusion of all particles would not have had any effect on the performance of the speaker classification. This point is explored in §5.3 in terms of the degree of between- and within-speaker differences.

5.3 Differences between particle subcategories

It was pointed out that individualising information of speakers is manifested differently in the uses of different subcategories of particles. That is, the different subcategories of particles carry different aspects of individual speaker idiosyncrasies. In this subsection, we investigate how differently different types of particles possess speaker individualising information.

The performance of speaker classification is mainly determined by two factors: 1) the degree of between-speaker differences, and 2) that of within-speaker differences. We explained earlier that the more consistent the individual speaker's selection of words is, and the more significantly the selected words of one speaker differ from those selected by another, the more accurately the speaker classification can be performed. In other words, the greater the between-speaker

differences are, and concurrently, the smaller the within-speaker differences are in terms of the selection of words, the more accurately speakers can be classified.

Having said that, with the degree of within-speaker differences being constant, the performance of speaker classification will improve as the degree of between-speaker differences becomes greater. Equally, with the degree of between-speaker differences being constant, the performance will also improve as the degree of within-speaker differences becomes smaller. Although the speaker classification accuracy appears to be comparable between the case-focus, adverbial and conjunctive particles, the results presented in §5.2 show that their configurations in terms of the degree of between- and within-speaker differences are distinct from one another.

The degree of between-speaker differences and that of within-speaker differences are manifested as the shape of the PDF_{ds} and PDF_{ss} , respectively. How they are derived is explained using Figure 4, a modified version of Figure 1.

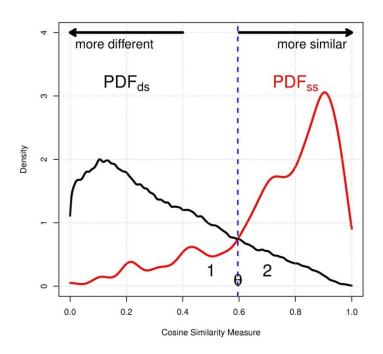


Figure 4. A modified Figure 1 is given to demonstrate that the degree of between-speaker differences and that of within-speaker differences are manifested as the shape of the PDF_{ds} and PDF_{ss} , respectively. The x-axis is the cosine similarity measure (c) and the y-axis is the probability density (d). The blue vertical dotted line (Θ) is the crossing point of PDF_{ss} and PDF_{ds} . Area 1 is the area surrounded by the red curve (PDF_{ss}), d = 0 and $c = \Theta$. Area 2 is the area surrounded by the black curve (PDF_{ds}), d = 0 and $c = \Theta$.

The PDF_{ds} becomes more skewed towards the cosine similarity measure c = 0 as the degree of between-speaker differences increases (i.e. the particles used by different speakers are more different), but towards c = 1 as the degree of between-speaker differences decreases (i.e. the particles used by different people are more

similar). Likewise, the PDF_{ss} becomes more skewed towards c = 0 as the degree of within-speaker differences increases (i.e. the particles used by the same speaker vary more), but towards c = 1 as the degree of within-speaker differences decreases (i.e. the particles used by the same speaker are more consistent). In order to quantify the shape of the PDF_{ss} , two measurements were taken: one is the mean value of the cosine similarity values which constitute each of the PDF_{ds} and PDF_{ss} , and the other is the skewness⁶ of the PDF_{ds} and PDF_{ss} . These two measurements were made for each of the different subcategories of particles: case-focus, adverbial, conjunctive and final particles, and also for all particles and interjections, as they are plotted in Figure 5 (next page).

Figure 5 clearly demonstrates that the different subcategories of particles have different characteristics with respect to the degree of between- and within-speaker differences. The characteristics that can be viewed from the two panels (mean and skew) of Figure 5 are essentially the same. Thus, the differences between the different subcategories of particles are described by reference to the mean values (the top panel of Figure 5).

As can be seen in Figure 5, case-focus particles (3) have greater between- and within-speaker differences, with their mean values located closer to cosine similarity measure c = 0 than the other subcategories of particles. Final particles (4), however, exhibit less between- and within-speaker differences, with their mean values located closer to c = 1. That is, in comparison to the other subcategories of particles, the selection of different case-focus particles is highly idiosyncratic across speakers, yet the selection of case-focus particles is not consistent within the same speaker. The behaviour of final particles is completely opposite to that of case-focus particles. The same speaker uses the same type(s) of final particles more consistently than the other subcategories of particles, while the selection of different types of final particles is less variable than that of the other types of particles across different speakers. Conjunctive particles (2) are similar to final particles. Adverbial particles (1) occupy an intermediate position compared to the other subcategories.

⁶ Skewness was quantified by cubing the deviations from the mean, and dividing the average cubed distance by the cube of the standard deviation.

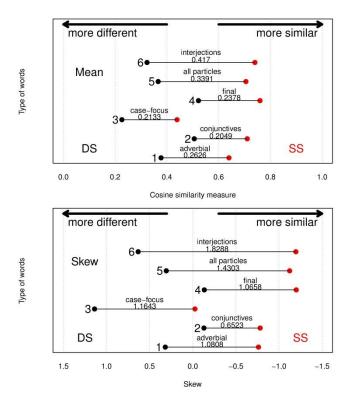


Figure 5. The mean (top panel) and skew (bottom panel) values of the cosine similarity measures of the PDF_{ds} (black circles) and PDF_{ss} (red circles), plotted separately for adverbial particles (1), conjunctive particles (2), case-focus particles (3), final particles (4), all particles (5) and interjections (6). The numerical values are the distances between the measurements for PDF_{ss} and PDF_{ds}.

As for all particles (5) and interjections (6), it can be seen from Figure 5 that interjections perform better than all particles because the former has greater between-speaker differences and smaller within-speaker differences than the latter.

6. Summary and conclusions

We investigated the following research questions in Japanese monologues:

- To what extent are Japanese speakers idiosyncratic in selecting certain particles and interjections rather than others;
- How many particles and interjections need to be included for the best speaker classification results;
- Whether there are any differences between particles and interjections in the degree of idiosyncrasy; and
- Whether there are any differences between the subcategories of particles in the characteristics of individual differences.

It has been demonstrated that particles and interjections carry idiosyncratic speaker information to the extent that the average speaker classification accuracy of the same and different speaker comparisons is about 80.5% and 82.7%, respectively. We suggested that interjections carry more idiosyncratic information about speakers than particles do because of the different levels of information that they denote. Namely, particles mainly handle a linguistically lower level of structural information, which is directly relevant to the content of messages, whereas interjections assume the task of conveying paralinguistic and extralinguistic information. These types of information have a stronger relevance to the speakers' cognitive processes and are highly diverse on an individual level. We also demonstrated that in comparison to interjections, particles require the inclusion of more dimensions in order to reach the highest accuracy point.

We showed that the different subcategories of particles (case-focus, adverbial, conjunctive and final particles) exhibit distinctive characteristics in terms of the degree of between-speaker and within-speaker differences. Due to these differences, although the speaker classification performance was only approximately 70% accurate for each subcategory of case-focus, adverbial and conjunctive particles, the classification performance substantially improved when all particles were combined together.

Particles and interjections account for merely a small part of our entire word usage. Despite this, we may say that they carry a substantial amount of speaker idiosyncratic information. If we are able to exploit all the word usage information as speaker classification features, it is likely that speaker classification can be performed with a high level of accuracy. This can lead to the interpretation that language usage is fairly individualised—even more so than we tend to think. Thus, linguistic studies on individual differences deserve more attention, perhaps as much as the more common studies which focus on the invariant aspects of language use.

References

- Abercrombie D 1967 Elements of General Phonetics Edinburgh: Edinburgh University Press.
- Ameka F 1992 'Interjections: the universal yet neglected part-of-speech' *Journal of Pragmatics* 18(2-3):101-118.
- Baayen H, H Van Halteren & F Tweedie 1996 'Outside the cave of shadows: using syntactic annotation to enhance authorship attribution' *Literary and Linguistic Computing* 11(3):121-132.
- Backhouse AE 1993 The Japanese Language: An introduction Oxford: University Press Oxford.
- Binongo JNG 2003 'Who wrote the 15th book of Oz? An application of multivariate analysis to authorship attribution' *Chance* 16(2):9-17.
- Burrows JF 1987 'Word-patterns and story-shapes: the statistical analysis of narrative style' Literary and Linguistic Computing 2(2):61-70.
- Cooper C 2002 *Individual Differences* 2nd ed. Arnold; New York; London: Oxford University Press.
- Coulthard M & A Johnson 2007 An Introduction to Forensic Linguistics: Language in Evidence London: Routledge.
- Davis CM 2011 Constraining Interpretation: Sentence Final Particles in Japanese Unpublished PhD thesis, University of Massachusetts.
- Doddington G 2001 'Speaker recognition based on idiolectal differences between speakers' *Proceedings of 2001 Eurospeech.* Pp. 2521-2524.
- Fung G 2003 'The disputed federalist papers: SVM feature selection via concave minimization' *Proceedings of the 2003 Conference on Diversity in Computing.* Pp. 42-46.
- García AM & JC Martín 2007 'Function words in authorship attribution studies' *Literary and Linguistic Computing* 22(1):49-66.
- Halliday MAK, A Macintosh & PD Strevens 1964 *The Linguistic Sciences and Language Teaching* London: Longmans.
- Holmes DI 1992 'A stylometric analysis of Mormon scripture and related texts' *Journal of the Royal Statistical Society Series a-Statistics in Society* 155:91-120.
- Holmes DI, M Robertson & R Paez 2001 'Stephen Crane and the New York Tribune: a case study in traditional and non-traditional authorship attribution' *Computers and the Humanities* 35(3):315-331.
- Ishihara S 2010 'Variability and consistency in the idiosyncratic selection of fillers in Japanese monologues: gender differences' *Proceedings of the Australasian Language Technology Association Workshop 2010.* Pp. 9-17.
- & Y Kinoshita 2010 'Filler words as a speaker classification feature' *Proceedings of the 13th Australasian International Conference on Speech Science and Technology.* Pp. 34-37.
- Juola P & RH Baayen 2005 'A controlled-corpus experiment in authorship identification by cross-entropy' *Literary and Linguistic Computing* 20(Suppl):59.
- Kaiser S, S Butler, N Kobayashi & H Yamamoto 2001 Japanese: A Comprehensive Grammar London: Routledge.
- Katagiri Y 2007 'Dialogue functions of Japanese sentence-final particles 'yo' and 'ne" *Journal of Pragmatics* 39(7):1313-1323.
- Keselj V, F Peng, N Cercone & C Thomas 2003 'Ed)' Computational Linguistics 3.

- Kinsui S 2007 'Kindai nihon manga no gengo [The language of modern Japanese manga]' in S Kinsui (ed) *Yakuwarigo kenkyuu no chihei* [The Horizon of Role Language Research] Kuroshio publisher Tokyo. Pp. 176-186.
- Maekawa K, H Koiso, S Furui & H Isahara 2000 'Spontaneous speech corpus of Japanese' Proceedings of the 2nd International Conference of Language Resources and Evaluation. Pp. 947-952.
- Manning CD & H Schütze 2000 Foundations of Statistical Natural Language Processing 2nd ed. Cambridge, Mass.: MIT Press.
- Martin SE 2004 A reference grammar of Japanese Honolulu: University of Hawai'i Press.
- Matsumura A (ed) 1969 Nihon bunpo daijiten [A Comprehensive Dictionary of Japanese Grammar] Tokyo: Meiji shoin.
- Mendenhall TC 1887 'The characteristic curves of composition' Science (214S):237-246.
- Mosteller F & DL Wallace 1964 Inference and Disputed Authorship, The Federalist Addison-Wesley series in behavioral science Quantitative methods Reading, Massachusets: Addison-Wesley.
- Nolan F 1983 The Phonetic Bases of Speaker Recognition Cambridge: Cambridge University Press.
- Peng F, D Schuurmans, S Wang & V Keselj 2003 'Language independent authorship attribution using character level language models' *Proceedings of the 10th Conference on European Chapter of the Association for Computational Linguistics* 1:267-274.
- Pennebaker JW & LA King 1999 'Linguistic styles: Language use as an individual difference' Journal of Personality and Social Psychology 77(6):1296-1312.
- Rose P 2002 Forensic Speaker Identification London: Taylor & Francis.
- Sadanobu T & Y Takubo 1995 'The monitoring devices of mental operations in discourse: a case of 'eeto' and 'ano (o)' Gengo kenkyu [Language Studies] (108):74-93.
- Stamatatos E, N Fakotakis & G Kokkinakis 2001 'Computer-based authorship attribution without lexical measures' *Computers and the Humanities* 35(2):193-214.
- Thisted R & B Efron 1987 'Did Shakespeare write a newly-discovered poem?' *Biometrika* 74(3):445-455.
- Tokieda M (ed) 1950 *Nihongo bunpoo koogohen [Spoken Japanese Grammar]* Nihongo bunpoo koogohen [Spoken Japanese Grammar] Tokyo: Iwanami Shoten.
- Venditti JJ 1995 Japanese ToBI Labelling Guidelines, Unpublished Manuscript, Ohio State University Watanabe M, K Hirose, Y Den & N Minematsu 2008 'Filled pauses as cues to the complexity of upcoming phrases for native and non-native listeners' Speech Communication 50(2):81-94.
- Weber F, L Manganaro, B Peskin & E Shriberg 2002 'Using prosodic and lexical information for speaker identification' *Proceedings of the 2002 IEEE International Conference on Acoustics, Speech, and Signal Processing (ICASSP)* 1:141-144.
- Woolls D 2003 'Better tools for the trade and how to use them' Forensic Linguistics the International Journal of Speech Language and the Law 10(1):102-112.

The morphosyntax of a created language of the Philippines: Folk linguistic effects and the limits of relexification

Piers Kelly
The Australian National University, Canberra
piers.kelly@anu.edu.au

Abstract. The Eskaya people of Bohol in the southern Philippines use the Eskayan language and script in specific domains: schooling, church, speechmaking and literary transcription. Both language and script are attributed to an ancestral creator known as Pinay. At first glance, Eskayan appears to be a simple relexification of the regional Visayan language of which Eskaya people are mother-tongue speakers, as translations of the traditional literature into Visayan have the appearance of word-for-word calques. However, the ostensibly straightforward relationship between the two lects becomes more problematic at the level of morphology. The 24 Visayan verbal affixes and their allomorphs are handled by just five Eskayan counterparts and traditional texts are replete with ambiguities that cannot always be resolved by Eskayan speakers. The review of Eskayan morphosyntax, and its relationships to Visayan structures, brings into focus the analytical categories that the putative creator Pinay brought to the task of constructing the language. More broadly, it draws attention to the scope for grammatical innovation in engineered languages, as well as the inherent constraints.

Keywords. morphosyntax, language engineering, contact lexicology, sociolinguistics, auxiliary languages

ANU Research Repository – http://hdl.handle.net/1885/9404

Proceedings of the 42nd Australian Linguistic Society Conference – 2011

Abbreviations

AV actor voice
COL collectiviser
CV conveyance voice

dative DAT distal DIST exclusive EX existential **EXIST** genitive **GEN** gerund **GER** inclusive ΙN **IPFV** imperfective irrealis IRR linker LK locative LOC

LV locative voice

MED medial

MED-PRX medio-proximal

NEG negative NOM nominaliser

NSPC non-specific marker

NUM number

NVOL non-volitional

PART particle
PFV perfective
PL plural
POSS possessive
POT potentive
PRX proximal
PV patient voice

RE realis SG singular

SPEC specific marker S.T. something UG undergoer

1. Introduction

The Philippine archipelago of the Visayas is home to about 20 million speakers of Visayan, a Western Austronesian language commonly known by the name of its prestige dialect, Cebuano. Although Visayans were among the earliest in the Philippines to submit to Christianisation and colonisation on the part of the Spanish, they have retained a vigorously independent culture and a reputation for rebelliousness. Nowhere is this more evident than in the Visayan island of Bohol, which as early as the 16th century became the site of organized revolts against Spanish rule, the most famous of which was the Dagohoy Rebellion of 1744 to 1829 (Romanillos 1997). When the 85-year insurrection was finally quelled, three generations of pacified rebels and their families were resettled in purpose-built towns. Throughout the remainder of the 19th century, Bohol remained relatively peaceful even when the Philippine Revolution reached its shores in 1898. While conflict was sweeping the north of the country, Bohol's Spanish colonists evacuated almost unscathed, and a junta of local elites quietly succeeded in forming an independent government (Luspo 2005). Styling itself the 'Gobierno de Canton de Bohol', the new government produced its own escutcheon (Scriven 1900) and from April 1899 was ruling over an island population of some 300,000 people. Though nominally answerable to the fledgling national government of Emiliano Aguinaldo in Luzon, Bohol operated as a de facto republic having been effectively cut off from the northern front of the Philippine–American War. The junta was disbanded on 17 March, 1900 when US forces reached the island; open hostilities broke out later in the year. The ensuing war and its effects were brutal. Already weakened by a cholera epidemic, the people of Bohol were subjected to a shock-and-awe assault: almost all coastal towns were razed to the ground and the livestock slaughtered en masse (Gibbens 1904). The Boholanos resisted until December 1901 when US forces threatened the total destruction of the provincial capital Tagbilaran (Tirol 1998; Luspo 2005).

A small community of people from the ruined town of Loon on Bohol's west coast escaped, probably by sea, to the southeast of the island. Heading inland they eventually settled on a defensible upland plateau at a place called Biabas. Shortly after the war ended with the surrender of Bohol's army, the Biabas community became radicalized under the leadership of Mariano Datahan, a former Boholano

soldier who devised a flag and codified an austere system of laws for the new settlement. In parallel with other small-scale militant movements that were emerging elsewhere in the Philippines at the time, Biabas flourished as a kind of micro-republic within a larger failed republic and its inhabitants articulated an elaborate utopian vision of localized nationalism. Observing that both Spain and America had their own flags, pagtulunan ('teachings') and languages, Datahan was to establish a school for teaching 'Bisayan Declarado' ('declared Visayan'), the 'lost' authentic language of Bohol which he claimed to have found carved on wooden tablets in a cave. Attributed to an ancestor known as Pinay, Bisayan Declarado is represented in a complex alphabetic-syllabic writing system that is said to be derived from the human body (see Figure 1). While over 1000 characters are attested in handwritten syllabaries, less than half of these are actually needed to represent all the available syllables in Eskayan or Visayan (or, indeed for other languages for which the script is sometimes employed such as English and Spanish).

Today Datahan's recuperated language is known as Iskaya' (or Eskayan in English) and schools for teaching it are sited in Biabas and the nearby villages of Taytay and Lundag. Some 500 people alive today exhibit reasonable spoken and written competence in the language and all acquired their knowledge through attendance at these schools. Beyond the schools, Eskayan is used in church, for formal speechmaking and for the transcription of a body of traditional literature exceeding 25,000 words. Writing is, in fact, the single most important domain of Eskayan language use. In addition to folkloric narratives, the literary corpus includes reference syllabaries for reading and reproducing the script and a series of Visayan-Eskayan and Eskayan-Visayan wordlists. Older wordlists include Spanish or English glosses. For Eskaya people, the written word is considered primary and no distinction is drawn between the Eskayan script itself and the language it represents. Thus the written form of the greeting abilaki (kumusta, 'hello') is not construed as a representative medium for its acoustic form /abilaki/, but quite the reverse: the utterance /abilaki/ is understood as an acoustic by-product of the 'real' written word & & F. A. Moreover, grammatical 'well-formedness' is judged by the extent to which an Eskayan utterance coincides with the written records. What I am calling the 'literality principle' is thus a corollary to grammatical intuition: the literary corpus is not only the arbiter of

'correct' Eskayan, it is Eskayan. As I have detailed in Kelly (2012, forthcoming), Eskayan is a language that effectively came into being in the process of its own documentation, and writing is central to its ontology.

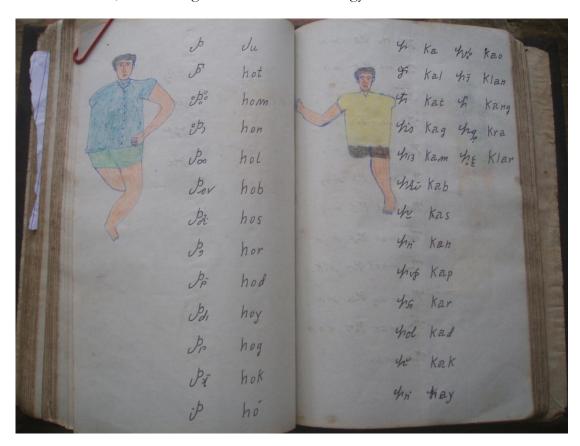


Figure 1. Pages from the **simplit** ('syllabary') of Alberta Galambao showing the relationship between character shapes of **hu**- and **ka**- syllables and body poses. Other characters are associated with specific body parts including internal organs.

Two prior researchers, Milan Torralba and Stella Consul have attempted partial descriptions of Eskayan (Torralba 1991, 1991, 1993; Consul 2005). Without ready access to the literary corpus, both approached Eskayan as if it were an undocumented spoken language and recorded their data via oral elicitation. When these researchers tried to elicit features that weren't attested in Eskayan records, the results were often uncertain and could not be reconciled between speakers, let alone the written record. My own attempts at oral elicitation have produced similarly unreliable results. In recognition of the primacy of written records for Eskayan speakers and the literality principle, my analysis is based entirely on the traditional Eskayan narratives with much interpretive assistance from my Eskaya consultants.

Aside from the florid script with its many redundant symbols, what is striking about Eskayan is that the language itself appears to have been created via a straightforward relexification of the Visayan language as it is spoken on Bohol. This impression is emphasized by the fact that Eskayan narratives are typically reproduced with an official Visayan translation on a facing page (see Figure 2). In reading these documents it quickly becomes evident that almost no line of Eskayan text exceeds or falls short of the number of words in its Visayan translation. Closer analysis shows that word and clause order across the two texts are also identical. All this points to the hypothesis that the putative creator Pinay simply grafted a new set of lexemes onto Visayan morphosyntax. These newly coined words follow the phonotactic rules of Visayan and a small proportion of them appear to be 'loanwords' from Visayan, Spanish or English. Most Eskayan words, however, cannot be decisively traced to a source even if their phonotactics are sometimes imitative of structures in colonial languages. The story of how Pinay carried out the task of relexification and the political circumstances that made the recuperation of Eskayan desirable is discussed in Kelly (2012, forthcoming). Here I am concerned specifically with the 'unexpected' effects of relexification. While on the face of it Pinay's procedure involved a direct encoding of one lexeme for another, it is often the case that a sentence translated from Visayan to Eskayan (or vice versa) cannot always be mechanistically backtranslated to the original. I argue that this apparent interference is a reflection of the relexification method as I have attempted to reconstruct it, and of the underlying folk-linguistic principles that guided the process. More generally, the analysis of Eskayan morphosyntax offers a minor case study for identifying ideological constraints on language engineering as a practice, as I intend to explain.

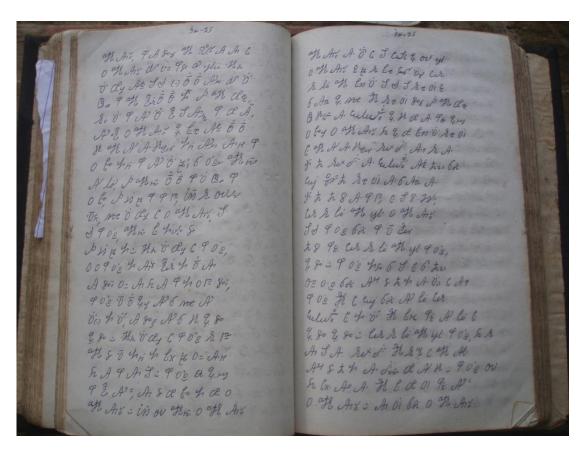


Figure 2. Eskaya literature from the notebook of Alberta Galambao. The right-hand page is in Eskayan and the left-hand page in Visayan.

Section 1 of this article provides an elementary introduction to Visayan while Section 2 compares Visayan morphosyntax with that of Eskayan drawing attention to the points divergence between the two systems. It will become clear that Eskayan structures are more reduced than their Visayan translations. A large proportion of Visayan words with bound and overt morphology do not exhibit the same morphological structure in their relexified Eskayan form. This suggests that the putative creator Pinay was focusing his relexification efforts on discrete words and that morphology was not his primary analytical concern. In Section 3, I introduce historical context to suggest that Pinay made use of existing Spanish–Visayan and Spanish–English–Visayan wordlists to assist in his relexification project. In so doing, Pinay was informed by folk-linguistic notions that writing is the authentic expression of language, that language is about words as opposed to grammar, and that words have inherent meaning and are substitutable between languages. These ideas are all reflected in the morphosyntax of Eskayan as it compares to its 'parent' language.

1. Basic Visayan morphosyntax

Eskayan has never been acquired as a native language; the mother tongue of all its speakers past and present is Visayan. An Austronesian language of some 20 million speakers, Visayan belongs to the Greater Central Philippine subgroup of Malayo-Polynesian and shares many typological characteristics with these languages (Adelaar & Himmelmann 2005). To avoid introducing a lengthy digression on Visayan morphosyntax, I have provided a condensed overview of its core features for the purposes of comparison with Eskayan. What follows is thus neither a sketch nor a condensed description of Visayan structures but an outline of those features that have the most significant comparative relevance. On the principle of minimal-description-for-maximal-comparison, my preference has been to compile morphological data in tables with accompanying example sentences. Areas that may be of more general or theoretical interest to grammarians but which hold less relevance to the relationship between the two lects are not treated here.

This section begins with a review of clauses and noun-phrase structure before moving on to clitics, verbal inflection and processes of nominalization. Terminologies for describing Visayan vary, particularly with regards to topicality and voice. For the most part I have chosen to follow the conventions preferred by Himmelmann (2005a; 2005b; 2006) and Payne (1994).

1.1 Clauses

In Visayan main clauses, predicates are in initial position, followed by the subject. Subjects are introduced with an article that may be specific (SPEC) or non-specific (NSPC). The specific article is of the form *si* when it occurs with personal names.

_

¹ The word *ang*, for example is variously defined as a topic marker, thematizer or specific article. Wolff (1972) does not use the specific terms 'focus' or 'voice' at all, but opts for 'active' and 'passive'. In fact, there is not yet any standard set of terms for describing these features in Western Austronesian languages generally.

² Many of the example sentences are adapted or taken directly from Wolff (1972) and I have consulted Maria Dano, a native speaker of Boholano-Visayan to ensure their grammaticality. I owe an enormous debt to Himmelmann's lucid and concise sketch of Tagalog (Himmelmann 2005a) which has inspired the structure of this overview and served as the model for some of my tables.

(1) Misumpa ang prisidinti.

AV:take.oath SPEC president

'The president took oath.'

(2) Mihulpa ug dahun.

AV:fall NSPC leaf

'A leaf fell.'

Existential clauses are preceded by the existential operators *anaa* and *aduna* (abbreviated as *naa* and *duna*), or the negative operator *wala'* (abbreviated as *wa'*).

<u>Naa</u>y (3) nalata' tangki. ilaga nga sa anaa-y ilaga nga na-lata' tangki sa tank MED-EXIST rat PV.RE.POT-rot LOC LK

'There's a dead rat that has rotted in the water tank.'

(4) <u>Dunay</u> libru sa lamisa.

aduna-y libru sa lamisa

MED-EXIST book LOC table

'There is a book on the table.'

(5) <u>Wala'</u> kuy barku.

Wala' ku-y barku

NEG 1s-exist boat

'I am poor.' (lit. 'I don't have a boat.')

Typical predicates for simple main clauses are voice-marked words as seen in the first two examples. Voice marking will be covered in §1.4 below, but it is worth pointing out here that voice constructions are either actor-oriented or undergoer-

oriented. The predicate is marked for voice and the subject expression relates to the actor or undergoer of the predicate event.

Basic argument and adjunct expressions in Visayan are indicated by means of the grammatical function markers *ang* ('the') and *sa* ('to', 'of'). Arguments introduced with *sa* are of two categories: possessive/genitive or locative/dative. When it occurs with personal names *sa* becomes *ni* in possessive/genitive position and *kang* in locative/dative position (see example (6) and Table 1 below).

The order of arguments and adjuncts is not fixed but there is a preference for genitives to come straight after the predicate and subjects to be in clause-final position with locative phrases after the subject, as seen in example (6) below.

Giabrihan (6)pulis ang subri ni Juan sa envelope ug:open GEN police SPEC GEN Juan Tagbilaran. sa Tagbilaran LOC

Juan's envelope was opened in Tagbilaran by the police.'

Table 1 lists the various ways for indicating *ang*-form and *sa*-form noun phrases, when they are introduced by common nouns, personal names, pronouns and demonstratives. The table is provided here as a basic reference for interpreting example sentences and will be returned to in §2.2 for comparison with Eskayan. (Note that all abbreviated forms are listed here in parenthesis; in example sentences, the non-abbreviated underlying forms are used in the interlinear layers that indicate morpheme breaks.)

	Ang-form	Sa-form1	Sa-form2
	(SPEC)	(POSS/GEN)	(LOC/DAT)
Noun phrase markers			
Common nouns	ang	sa	sa
Personal names	si	ni	kang
Pronouns			
1.sg	aku	naku (ku)	kanaku (naku)
2.sg	ikaw (ka)	nimu (mu)	kanimu (nimu)
3.sg	siya	niya	kaniya (niya)
1.PL.IN	kita	natu (tu)	kanatu (natu)
1.PL.EX	kami	namu (mu)	kanamu (namu)
2.pl	kamu	ninyu	kaninyu (ninyu)
3.PL	sila	nila	kanila (nila)
Pronominal deictics			
PRX ('this here')	kiri, kari, (ri)	niiri (iri, ri), niari (ari, ri)	diri, ngari
MED-PRX ('this over here')	kini, kani, (ni)	niini (ini), niani (ani)	dinhi, nganhi
MED ('that there')	kana' (na')	niana' (ana')	dinha' (diha'), nganha
DIST ('that over there')	kadtu (tu)	niadtu (adtu)	didtu, ngadtu
Locative deictics			
PRX ('right here')	adia (dia)	ari	diri, ngari
MED-PRX ('here')	ania (nia)	anhi	dinhi, nganhi
MED ('there')	anaa (naa)	anha'	dinha' (diha), nganha'
DIST ('over there')	aqua (tua)	adtu	didtu, ngadtu

Table 1. Noun-phrase markers, pronouns and deictics.

1.2 Noun-phrase structure and linkers

Noun phrases are introduced with a proclitic phrase marker (this is *ang* in the example below). In sentences that include genitive-marked possessors, these follow the head.

(7) ang subri ni Juan

SPEC envelope GEN Juan

'Juan's envelope'

Modifying constructions require the linker nga. Deletion of the final -a is optional when nga follows words ending in vowels, glottals, -y or -n:

- (8) daku <u>nga</u> barku
 big LK boat
 'big boat'
- (9) daku<u>ng</u> barku daku-nga barku big. LK boat 'big boat'

The linker *ka* is used exclusively for numerals. The number precedes the linker and is followed by the head of the noun phrase.

(10)Naay butilya Tanduay. upat ka sa ka butilya **Tanduay** anaa-y upat sa MED-EXIST four LK.NUM bottle GEN Tanduay

'There are four bottles of Tanduay.'

Possession is indicated with the use of the relevant possessive pronoun, as indicated in Table 1, and illustrated in the example below.

(11) ang libru naku

SPEC book 1.SG.POSS

'my book'

However, for a handful of Visayan pronouns and demonstratives, possession or attribution can also be indicated with *nga*. These are the 1.sG, 3.sG, 1.pl.IN pronouns and all demonstratives except those that are proximal. In this instance the pronoun or demonstrative goes before the head.

- (12) ang atung damgu
 ang aku-nga damgu
 spec 1.pl.in-lk dream
 'our dream'
- (13) sa nianing balay
 sa niani-nga balay
 GEN MED.PRX-LK house
 'belonging to that house'

The linker *nga* is also used for marking relative clauses.

'I can't eat food that has been cooked in fat.'

1.3 Function words

Of relevance to Visayan word classes is the distinction between content words and function words. Content words (see §1.4 below) comprise an open class of lexemes that may denote things, the properties of things, and their real or potential actions. Function words belong to a closed class of lexemes whose role is to indicate relations between content words, and between clauses.

Visayan function words include proclitics which appear before a content word on which they depend phonologically. The clitic mga, for example, is used for

pluralizing a noun phrase. It is obligatorily placed directly before the content word it applies to.

```
(15) ang mga gastus

SPEC PL expense

'the expenses'
```

Proclitics that are needed for introducing different kinds of Visayan clauses were discussed in §1.1 and are listed in Table 1 above. Other function words appear after the clause-initial word or constituent and directly before the subject. In sentence (16) below, the element *na* ('now') precedes a subject introduced by the proclitic *ang*.

```
(16) Mibukhad <u>na</u> ang buwak.

Av:open now spec flower

'The flower opened.'
```

These elements, shown in Table 2 below, have occasionally been called clitics (Billings 2005; Dryer 2007) but since they are not phonologically reduced or affix-like I avoid that the term here.

ba	interrogative (obligatory in polar questions)
diay	expresses realization, curiosity, or indicates speaker has received new information
lang, lamang	'only', 'just'
man	'even', 'even if', 'although'
na	'now', 'already', 'yet'
pa	'still', 'else', 'in addition', 'yet'
pud, sad	'too', 'also'
tingali	'probably', 'seems'
unta'	expresses an unrealized condition; used as a softener in requests

Table 2. Common function words that appear after the clause-initial word or constituent

1.4 Content words

What I am choosing to categorize as Visayan 'verbs' are content words that attract voice and aspect/mood morphology; better evidence for more specific Visayan word classes must be left for another study. There are four distinct voices in Visayan. These are actor voice (AV) and three kinds of undergoer voice (UG), namely patient voice (PV), locative voice (LV) and conveyance voice (CV). Verbs are further inflected for aspect/mood, and for tense. They are marked as realis (RE) or irrealis (IRR), as well as perfective (PFV), imperfective (IPFV) or potentive (POT). A single affix marks both voice and tense-aspect-mood in any given instance. (Realis and irrealis are, however, contrasted with *n*- and *m*- forms respectively when it comes to actor voice in imperfective or potentive aspect; see Table 3 below).

	AV	PV	LV	CV
REALIS/ PERFECTIVE	misuwat; ni-, ning-, ming-	gisuwat	gisuwat <u>an</u>	<u>gi</u> suwat
REALIS/ IMPERFECTIVE	<u>nag</u> suwat; naga-,	ginasuwat	ginasuwatan	<u>gina</u> suwat
IMI ERI ECTIVE	ga-	(formal)	(formal)	(formal)
REALIS/ POTENTIVE	<u>naka</u> suwat; ka-	<u>na</u> suwat	<u>na</u> suwat <u>an</u>	<u>na</u> suwat; gika-
IRREALIS/ PERFECTIVE	<u>mu</u> suwat	suwat <u>un</u>	suwat <u>an</u>	<u>i</u> suwat
IRREALIS/ IMPERFECTIVE	<u>mag</u> suwat; maga-	<u>paga</u> suwat <u>un</u>	<u>paga</u> suwa <u>tan</u>	<u>iga</u> suwat
IRREALIS/ POTENTIVE	<u>maka</u> suwat; ka-	<u>ma</u> suwat	<u>ma</u> suwat <u>an</u> ;	<u>ma</u> suwat; ika-
			ka-an	V1 30V

Table 3. Aspect/mood paradigm for suwat ('write'). Allomorphs are listed after the semicolon.

The following sentences exemplify a selection of forms in Table 3.

(17)	<u>Mu</u> suwat	ku	nimu	kun	<u>maka</u> higayun.
	mu-suwat	ku	nimu	kun	maka-higayun
	AV.IRR.PFV-write	1.sg	3.SG.DAT	if	AV.IRR.POT-opportunity

^{&#}x27;I'll write to you when I have the time.'

(18)Suwat<u>an</u> naku si Alma. рa suwat-an pa naku si Alma write-LV.IRR.PFV still 1.s_G Alma SPEC

'I still have to write to Alma.'

(19) <u>Naka</u>siklit ku sa iya-ng gisuwat.

naka-siklit ku sa iya-ng gi-suwat

AV.RE.POT-glimpse 1.SG GEN 3.SG-LK PV.RE.PFV-write

'I was able to get a glimpse of what he wrote.'

(20) Nagsuwat siyag sintas nga kawbuy.

nag-suwat siya-ug sintas nga kawbuy

AV.RE.PFV-write 3.SG-NSPC story LK cowboy

'He wrote a cowboy story.'

(21)Nganung bungbung? <u>gi</u>suwat<u>an</u> man nimu ang <gi->suwat<-an> bungbung nganu-ng nimu ang man <LV.RE.PFV>-write wall why-LK 2.s **SPEC** PART

'Why did you write on the wall?'

In addition to the inflectional morphology exemplified above, a set of non-aspect/mood prefixes may be added to verbal roots to emphasize volition or persuasion, or to signal more than one agent. Further, a small set of adverbial affixes can be added to basic verbal roots to mark reciprocal, intense, non-volitional or feigned actions. Since these forms are not attested in Eskaya literature, I have not described them here.

1.5 Nominals and nominalizing morphology

For the sake of simplicity, this overview has regarded any voice-marked formation as a 'verb'. In keeping with this convention, verb formations that are not voice-marked are here labelled 'nominal'. This section will also deal briefly with

nominals that are not derived from verbs, and their associated morphology (see §1.5.2).

1.5.1 Gerunds

Gerunds have no voice-marking, meaning that the action or state which they refer to is not oriented to a participant. A gerund is formed by adding *pag*- to a verbal root to create the meaning of 'the-action-of-doing s.t.', as in (22) and (23). These kinds of gerunds may also convey an imperative meaning, as in (24) below.

- (22) Ang paghurunda sa simbahan di na kinahanglan.

 SPEC GER-wear.veil LOC church NEG now necessary

 'It is no longer necessary to wear a veil to church.'
- (23) Misuliyaw ang mga tawu <u>pag</u>diskursu sa pulitiku.

 mi-suliyaw ang mga tawu pag-diskursu sa pulitiku

 AV.RE-roar SPEC PL person GER-orate GEN politician
 - "The people booed when the politician delivered a speech."
- (24) <u>Pag</u>likay anang bayhana kay ripurtir na'.

 pag-likay niana-nga babayi-na kay ripurtir kana'

 GER-avoid MED-LK woman-PART since gossip MED

'Keep away from that woman because she is a gossip.'

1.5.2 Locations, abstracts, collectives and instruments

A number of other affixes form locations, abstracts, collectives and instruments through productive nominalizing processes:

AFFIX	DERIVATIONAL PROCESS
-an	forms nominals which refer to a place where a thing is found or done habitually (25); or to a person possessing a supernatural power (26)
ka-	forms nominals meaning 'the state of being s.t.' (27), 'one's co- participant in s.t.' (28)
ka-an	forms words meaning 'the quality of s.t.' (29); forms words meaning 'a group of s.t.' (30)
paN-	forms words meaning 'instrument for [do]ing' (31), or 'sense of s.t.' (32)

Table 4. Locations, abstracts, collectives and instruments.

- (25) humayan rice-place 'rice field'
- (26) barangan insect.magic-person 'shaman with magic insects at his disposal'
- (27) ang <u>ka</u>tahum sa <u>ka</u>libut

 ang ka-tahum sa ka-libut

 SPEC NOM-beautiful GEN NOM-go.around

 'the beauty of the surroundings'
- (28) akung <u>ka</u>klasi

 SPEC co-class
 'my classmate'
- (29) <u>kalipayan</u>
 <nom>be.happy<nom>
 'happiness'

- (30) mga <u>ka</u>bata<u>an</u>

 PL <COL>child<COL>

 '(group of) children'
- (31) <u>panlaba</u>.

 NOM-wash.clothing

 'something to wash with'
- (32) <u>panimbut.</u>
 paN-simbut

 NOM-smell

 'sense of smell'

2. Comparison with Eskayan

The preceding sketch has endeavoured to introduce the core features of Visayan grammar so that its relationship to Eskayan is more easily discerned. As we have seen, Eskayan narratives are almost always reproduced with an accompanying Visayan translation, and this practice substantially facilitates systematic comparisons between the two languages. For clarity, examples from the bilingual literature (a page of which is shown in Figure 2) are romanized following a locally developed orthography and I have analysed both texts in parallel. All Eskayan words are rendered in bold while Visayan words are in italics. English glosses for both are in the Roman alphabet and are enclosed in inverted commas. Note too that the Eskayan phoneme /dʒ/ is orthographically represented by 'chd'.

Although Eskaya literature is extensive, a number of 'expected' grammatical forms are rarely or never attested in the corpus. For example, only a few Eskayan counterparts of the verbal affixes in Tables 3 and 4 are ever exemplified. In consideration of the literality principle (see Introduction) these 'limitations' are best viewed as a real lacuna in the language as it is found—for Eskayan speakers there is no intuitively accessible *langue* existing above and outside the material text.

2.1 Structural consonance and homophony

A cursory review of the Visayan–Eskayan bilingual literature suggests a broad structural uniformity between the two languages from the level of the literary discourse right down to the word. Indeed, the traditional translations have the distinct quality of word-for-word calques or of encoded text. Consider the following Eskayan sentences together with their Visayan counterparts.

(33)	Yi	Omanad	aripirna	huntun kur	ı Jomabad.
	SPEC	Omanad	soldier	under GEN	N Jomabad
	Si	Omanad	sundalu	ubus ni	Jomabad.
	SPEC	Omanad	soldier	under GEN	Jomabad

^{&#}x27;Omanad was a soldier under the command of Jomabad.'

(34)	Istu	dirisil	chdinchdiyumli	yi	Magellan	giyu.
	istu	dirisil	chdin-chdiyumli	yi	Magellan	giyu
	SPEC	sign	AV.RE.PFV-understan	d spec	Magellan	immediately
	Ang si	nyas	ningsabut	si	Magellan	dayun.
	ang s	inyas	ning-sabut	si	Magellan	dayun
	SPEC S	sign	AV.RE.PFV-understan	d spec	Magellan	immediately

^{&#}x27;Magellan understood the sign straight away.'

At no point do the Eskayan or Visayan interlinear layers diverge, suggesting that the relationship between them is one of text to cipher-text. Even reduplicated Eskayan lexemes mirror equivalent reduplicative forms in Visayan, e.g. araara (diyusdiyus, 'false god'). The structural equivalence is further reinforced by the fact that a pair of homophones in Visayan—acoustically identical but with different semantic values and etymologies—will have a corresponding set of homophones in Eskayan. This principle, which I am calling 'symmetrical homophony', is underpinned by a complementary asymmetrical principle whereby no Eskayan word is permitted to have the same acoustic value as a Visayan word. In other

words, Eskayan homophonic pairs mirror existing Visayan homophones, but no word in Eskayan is allowed to sound exactly the same as a word in Visayan. The effect is a kind of acoustic 'rebus principle' where the Eskayan homophonic pair cryptically references the Visayan sounds by drawing attention to their dual patterning. It is, of course, theoretically arguable that these are not symmetrical homophones at all but simply an instance of generalized semantics where multiple senses are collapsed into one word, as we will see in the case of **griyalu** in (36) and (37) below. However the fact that the homophones can have such wildly distinct senses or functions suggest otherwise. Consider example (35) below where the first instance of *ning* ('this (one) here') is an abbreviation of *kining*, formed by the binding of *kini* and *nga* (MED.PRX + LK) while the subsequent *ning*- is a bound verbal morpheme. Both, however, are translated with the homophonic pair **chdin** and **chdin**-:

(35)	<u>Chdin</u>	insil	Jomabad	<u>chdin</u> samkis ya	kulyar.
	chdin MED.PRX:LK ³	insil be:LK	Jomabad Jomabad	chdin-samkis ya AV.RE.PFV-get GEN	kulyar water
	<u>Ning</u>	maung	Jomabad	<u>ning</u> kuha sa	tubig.
	kini-nga	mau-nga	Jomabad	ning-kuha sa	tubig
	MED.PRX-LK	be-lk	Jomabad	AV.RE.PFV-get GEN	water

'Jomabad, of whom we have just spoken, took the water.' (lit: 'This here Jomabad took the water.')

Examples (33), (34) and (35) have all been excerpted from the literature in order to draw attention to the cipherlike relationship between Eskayan on Visayan, but this is not as straightforward as it first appears. As we have seen in (35), the first instance of **chdin**, and the word **insil**, are not analyzable in the same way as their Visayan counterparts (see also footnote ³). This subtle divergence in morphological systems challenges the outward perception that Eskayan is simply Visayan with a new set of sounds. As it happens, a careful reading of the literature

³ Those morphemes that are explicit in Visayan but implicit in Eskayan are separated in the Eskayan text with a colon (the corresponding break in Visayan is marked with a hyphen). This is in order to make Eskayan suppletion more visible and comparable.

reveals that Eskayan morphology is consistently more reduced than its corresponding Visayan text, as seen in these two sentences from the same story:

(36)	Griyalu	tisikdistimal	i	kubit.
	griyalu	tisikdistimal	i	kubit
	suitable	take.care:PV.IRR	and	prepare:PV.IRR
	Angay	atimahun	ug	hikayun.
	angay	atiman-un	ug	hikay-un
	suitable	take.care- pv.irr	and	prepare-PV.IRR

^{&#}x27;It is right to take care and be prepared.'

(37)	Aminahadu	istu	chdil	griyalu	ya bintud.
	aminihadu	istu	chdil	griyalu	ya bintud
	CV.NVOL:remain	SPEC	3.s.lk	NOM:PV.IRR:good	GEN place
	Nahibilin	ang	iyang	kamaayu	sa lungsud.
	na-hi-bilin	ang	siya-nga	ka-ma-ayu	sa lungsud
	CV-NVOL-remain	SPEC	3.s-lk	NOM-PV.IRR-good	GEN place

^{&#}x27;The greatness of that place endures.'

Again, in (36), the words **tisikdistimal** and **kubit** are not segmented into two morphological components like their respective Visayan counterparts *atimahun* and *hikayun*. I would argue that the patient-voice irrealis suffix *-un* is semantically implicit in the Eskayan words, even if it is not morphologically explicit, just as if the Eskayan form were exhibiting suppletion.⁴ The verbal composite *nahibilin* in (37) with its non-volitional affix *-hi-* is likewise semantically equivalent to **aminahadu** even though no corresponding affix can be detected. Indeed, Eskayan-speaking consultants with a sophisticated grasp of both Visayan and Eskayan morphology were unable to point to which part of the word is doing the

⁴ I use 'implicit' here to refer to any covert morphology that corresponds to two or morphemes in Visayan but which is not segmentable in Eskayan.

inflection, responding simply that the word is 'all in one'. Though speakers' impressions do not of themselves constitute grammatical evidence, I aim to demonstrate that Eskayan is effectively more isolating than Visayan and abounds with irregular portmanteau inflection, not just in verbs but also in linked pronouns and demonstratives such as **chdil** (*iyang*, 'its') in (37) and the aforementioned **chdin** (*ning*, 'this (one) here').

Note too that semantic reduction is found in certain Eskayan lexical items, with a few lexemes doing the denotative work of several Visayan synonyms. In example (36) **griyalu** corresponds to the word *angay* ('suitable', 'fitting', 'proper'), which is etymologically unrelated to the root *ayu* ('good') of *kamaayu* ('greatness') in (50); context alone determines the analysis of **griyalu** as *angay*, *kamaayu* or other attested synonyms like *maayu* (PV.IRR-good). The presence of the accompanying Visayan 'translation' in the traditional literature is thus indispensible for parsing reduced or irregular Eskayan forms and for resolving ambiguities. Further, the reductiveness in both morphology and semantics of the Eskayan layer points to the strong probability that the Visayan text was composed first before being shoehorned into a more rudimentary Eskayan mold. It is harder to explain a reverse trajectory whereby the Visayan text acquired more nuance in the process of its translation from Eskayan.

In the next sections basic features of Visayan for which comparable data are available in Eskayan are explored for the purposes of tracing the contours of Pinay's translational template.

2.2 Comparison of noun-phrase markers and pronouns

Table 5 compares Eskayan noun-phrase markers and pronouns with the Visayan forms described in §1.1 Synonyms are separated by a comma, abbreviated alternatives are in parentheses and a blank space indicates that the relevant form is not attested in Eskaya literature.

	Ang-form (SPEC)	Sa-form1 (POSS/GEN)	Sa-form2 (LOC/DAT)
Noun phrase	markers		
Common	istu	ya	ya
nouns	ang	sa	sa
Personal	yi	kun	puy, sam
names	si	ni	kang
Pronouns			
1.SG	narin	tumpuy (yu)	tumpuy
	aku	naku (ku)	kanaku (naku)
2.SG	samu (sam)	nistru	nistru
	ikaw (ka)	nimu (mu)	kanimu (nimu)
3.SG	atsil	mininus	mininus (ninus)
	siya	niya	kaniya (niya)
1.PL.IN	arhitika		guchdirin
	kita	natu (tu)	kanatu (natu)
1.PL.EX	kim		
	kami	namu (mu)	kanamu (namu)
2.PL	chdiktu		ridilyan
	kamu	ninyu	kaninyu (ninyu)
3.PL	chdan	pirsiyan	pirsiyan
	sila	nila	kanila (nila)

Table 5. Comparison of noun-phrase markers and pronouns.

Of interest is the fact that sa-form1 and sa-form2 pronouns are often expressed with the same word in Eskayan. My tentative explanation is that this pattern follows the principle of homophony explained earlier, but may also reflect semantic reduction described above with respect to **griyalu** and which is also a feature of other auxiliarly languages such as Australian mother-in-law registers. In Visayan the locative/dative is, more often than not, expressed in its abbreviated form, as shown above in parenthesis. Thus the 2.sg possessive/genitive nimu ('of you') is acoustically indistinct from the locative/dative nimu (from kanimu, 'for you', 'with you'), inviting a homophonous pairing in Eskayan. Instances where

abbreviated forms are also lexified in Eskayan are intriguing. On one occasion in the traditional literature, the 3.sG locative/dative pronoun **mininus** is abbreviated as **ninus** presumably following the analogy of *kaniya* to *niya* (though in all other instances the unabbreviated **mininus** is preferred in *sa*-form2). Likewise the 2.sG **samu** is abbreviated as **sam**, on the Visayan analogy of *ikaw* to *ka*. Meanwhile the abbreviated possessive/genitive 1.sG pronoun *ku* is rendered in Eskayan as **yu**, and this is not ostensibly a contraction of **tumpuy**.⁵

2.3 Deixis

Only fourteen of the twenty-four Visayan deictics have counterparts attested in Eskayan literature. Proximals are not shown as these are not attested in Eskayan. Again, those Visayan forms that appear to have shared formal elements do not appear to be etymologically related in their Eskayan translations. Consider the pronominal distal set *kadtu*, *niadtu* and *didtu* where the *-dt-* cluster has no correspondingly consistent pattern in the Eskayan equivalents **tuylup**, **tadlang** and **binil**. Meanwhile, the medio-proximal and medial locatives (a)nia and (a)naa are both lexified as **istalyi**, although the abbreviation naa is optionally represented as **istal**. It would appear, then, that while Eskayan lexemes consistently match homophonous Visayan pairs, this patterning does not necessarily extend to groups of Visayan words with shared etymologies. A review of the linked forms of Eskayan pronouns and demonstratives brings this trend into sharper relief.

⁵ The form **yu** is possibly a borrowing from Spanish *yo* ('I').

		Ang-form (SPEC)	Sa-form1 (POSS/GEN)	Sa-form2 (LOC/DAT)
Pronominal	MED-PRX ('this over here')	simri kini, kani, (ni)	niini (ini), niani (ani)	dil dinhi, nganhi
Locative	MED-PRX ('here')	istalyi ania (nia)	anhi	dil dinhi, nganhi
Pronominal	MED ('that there')	karku kana' (na')	dilyaki niana' (ana')	dinha' (diha'), nganha
Locative	MED ('there')	istalyi (istal) anaa (naa)	yardi anha'	dinha' (diha), nganha'
Pronominal	DIST ('that over there')	tuylup kadtu (tu)	tadlang niadtu (adtu)	binil didtu, ngadtu
Locative	DIST ('over there')	tugarira atua (tua)	agad adtu	binil didtu, ngadtu

Table 6. Deixis.

2.4 Linked forms

As described in §1.2 Visayan possession and attribution may be indicated with the use of the linker *nga* on 1.s, 3.s, 1.PL.IN pronouns and all non-proximal demonstratives. Attested Eskayan equivalents are tabulated below; note that **ri** is the Eskayan lexeme representing *nga*. Not enough data are available in the literature to compare locative/dative forms of linked demonstratives.

	Visayan		Eskayan	
1.sg	aku + nga	akung	narin + ri	damu
3.sg	siya + nga	iyang	atsil + ri	chdil
1.plin	kita + nga	atung	arhitika + ri	chdiyaru
MED.PRX	kini, kani + nga	kining, kaning (ning)	simri + ri	simri (chdin)
MED	kana' + nga	kanang	karku + ri	karku
DIST	kadtu + nga	kadtung	tuylup + ri	[unattested]

Table 7. Comparison of linked pronouns and demonstratives.

What is evident from the final column of the table is that the 'linked' Eskayan pronouns are not derived by means of the same process as their Visayan equivalents and appear, instead, to have been lexified independently. Thus $aku \rightarrow akung$ is represented as $narin \rightarrow damu$. For demonstratives, meanwhile, no distinction is made between linked and unlinked forms. Thus kana/kanang appear to be treated as if they were homophones and expressed as karku. Similarly, as we have seen, when kining is abbreviated to ning it is paired with the verbal affix ning- and expressed in both cases as chdin.

All this suggests that the putative creator Pinay was adhering to a general folk linguistic principle whereby the canonical unit of syntactic analysis was the word in isolation. (The extent to which this reflected a naive analysis of Visayan morphology cannot be known, but it is at least conceivable that Pinay did not recognize any etymological relationship between, for example *iyang* and its derivative components siya + nga.) Words in Visayan that look and sound notionally different from the perspective of Pinay were represented with different-looking Eskayan lexemes; while words that look and sound sufficiently

upat ka lungsud
four LK place
pan bintud
four.LK place
'four places'

⁶ This is also the case with the Visayan number linker ka which is elided altogether in Eskayan translations such that the morphology becomes covert. Thus:

similar are represented with a homophonous pair. In this scenario, 'difference' could be as little as a single morpheme as in the vase of $aku \rightarrow akung$. If it was relevant at all, actual morphological structure was secondary to the perceived distinctiveness between one word and another. That is not to say that the morphological structure of Visayan words has no bearing whatsoever on Pinay's language. As we have seen in (35) above, Eskayan has at least one morpheme (**chdin-**) that is attached to a verbal root in the manner of a typical Visayan inflectional prefix. The extent to which Pinay relexified these relatively 'conspicuous' inflectional affixes is reviewed below.

2.5 Explicit verbal morphology

The table below shows Eskayan inflectional affixes attested in the traditional literature and their Visayan equivalents.

	AV	PV	LV	CV
REALIS/ PERFECTIVE	chdin-	ri-	dil-, pur-, muy-	ri-
	mi-; ni-, ning-, ming-	gi-	gi-an	gi-
REALIS/ IMPERFECTIVE	muy- nag-; naga-, ga-	<i>gina-</i> (formal)	gina-an (formal)	gina- (formal)
REALIS/ POTENTIVE	dil- naka-; ka-	na-	na-an	na-; gika-
IRREALIS/ PERFECTIVE	muy-, pur-	-un	-an	muy- <i>i</i> -
IRREALIS/ IMPERFECTIVE	muy- mag-; maga-	muy- paga-un	paga-an	iga-
IRREALIS/ POTENTIVE	muy- maka-; ka-	muy- ma-	ma-an; ka-an	ma-; ika-

Table 8. Comparison of aspect/mood morphology.

The fact that many Visayan grammatical forms do not have Eskayan counterparts in the corpus means that it is difficult to identify the same sort of patterns witnessed in the pronoun paradigm. However, from the comparative data that are available it is clear that only five Eskayan affixes are doing the work of several Visayan morphemes on the reductive principle of many-to-one discussed in §2.1. Evidently the principle of symmetrical homophonic pairing does not extend to inflectional morphology. Thus **muy**- denotes forms that are as acoustically distinct as *maka*-, *paga-un* and *i*-, while the various Visayan allomorphs are not independently relexified with corresponding Eskayan forms; for example, the actor-voice realis allomorphs *ni*-, *ning*-, and *ming*- are all represented by **chdin**-. Conversely, Eskayan variants represent inflections that are not allomorphic in Visayan, as seen in the various realis/perfective forms in undergoer voice.

The choice of Eskayan variants does not appear to be conditioned by anything in their environment, however the corpus is not large enough to test this definitively. There is, for example, only one instantiation of the irrealis conveyance voice *i*-(muy-) in the literature. It is of course conceivable that Pinay was not relexifying directly from Visayan, but developing his own distinct verbal categories from the ground up. This possibility can be tested by briefly reviewing the distribution of the four Eskayan verbal affixes:

```
chdin- encodes AV.RE.PFV

dil- encodes LV.RE.PFV; AV.RE,POT

muy- encodes AV.RE,IPFV; AV.IRR,IPFV; AV.IRR.POT

pur- encodes AV.IRR.PFV; LV.RE.PFV
```

ri- encodes PV.RE.PFV; CV.RE.PFV

If the classes of Eskayan verbal inflections represent a home-grown innovation then the irrealis/realis distinction was not a defining feature (**muy-** and **pur-** can mark both), nor was actor/patient voice (**dil-** and **pur-** can do both), nor perfective/imperfective (**pur-** can do both), nor patient/conveyance voice (**ri-** can do both). In fact, the most that can be said is that Eskayan has two absolute inflectional categories: **chdin-** (AV.RE.PFV) and everything else. But the **chdin-**

/non-chdin- distinction, if descriptively relevant at all, has little to offer a student of Eskayan. When non-chdin- forms are encountered in a reading of Eskaya literature, they appear merely to signal a kind of unspecified 'verbiness' that is *not* actor-voice-realis-perfective. Nonetheless, it is arguable that the morphological simplication is not bulldozing a meaningful distinction but simply eliminating a redundancy since the non-chdin- undergoer voice forms (PV, LV, CV) can all be specified within a phrase by prepositions. But even this is unnecessary for actual comprehension amongst Eskaya readers—in practical terms, ambiguities are resolved either by consulting the Visayan translation, or by simply knowing the conventional meaning through an existing familiarity with the text.

2.6 Implict verbal morphology

What I have described above are 'regular' Eskayan verbs that follow a broadly consistent combinatorics, in that the relevant inflectional morpheme is overtly prefixed to a root. This cannot be generalized to all Eskayan verbs; the traditional literature includes a large number of irregular verbs with unanalysable covert morphology that appears to be 'implicit' in the whole word. These unanalysable or suppleted verbs have much in common with the kind of reduced or embodied morphology described above in §2.1 and are analogous to the way the English word 'went' encodes a past tense without recourse to a productive segment such as '-ed'. In the examples below, no part of the word bintaal (migamit, 'used') in (38) can isolated as the inflectional component, just as in (39) imprus (gipuslan, 'was taken on') is unsegmentable or 'all in one'. Once again, this invites the hypothesis that Pinay's analytical focus was on orthographically discrete words and that bound morphology was of secondary concern to his creative enterprise. Further, it raises the possibility that Pinay was purposefully including suppletion as a feature of his language.

(38)Yi Tumud Babaylan bintaal bidaryu ya Ara. va yi tumud babaylan bintaal bidaryu ya ya ara Tumud Shaman AV.RE.PFV:use GEN language GEN God SPEC

Si	Tumud Babaylan	<u>mi</u> gamit	sa pinulungan sa	Diyus.
si	tumud babaylan	mi-gamit	sa pinulungan sa	diyus
SPEC	Tumud Shaman	AV.RE.PFV-us	e GEN language GEN	God

^{&#}x27;Tumud the Shaman used the language of God'.

(39)	Imprus	ya	rimuy	v bultu	ı purg	gampi	pruk.
	imprus pv.re.pfv:take.on	ya DAT	rimuy PL		purg on hail.	ampi from	pruk neighbourhood
	<u>Gi</u> puslan	sa	mga	tawu	nga	tagi	bariu.
	gi-puslan	sa	mga	tawu	nga	tagi	bariu
	PV.RE.PFV-take.on	DAT	PL	person	nLK	hail.fr	om neighbourhood

^{&#}x27;It was taken on by the people of the neighbourhood.'

It is not clear if there is any categorical principle determining which kinds of verbal roots are analysable and which are not. However it is worth noting that unanalysable verbs are more frequently found in Eskayan wordlists than in the traditional narratives. In terms of the actual structure of Eskayan morphosyntax this fact may be considered peripheral, but it nonetheless sheds light on the circumstances in which the Eskayan language was devised, and the relexification method Pinay may have employed to achieve this. Eskayan wordlists, including older manuscripts belonging to deceased Eskayan speakers, provide crucial insights into how Eskayan words were assigned to Visayan equivalents.

2.7 Morphology in Visayan-Eskayan wordlists

Prototypical traditional wordlists run from Eskayan to Visayan and are written in the Eskayan script, as shown in Figure 3 below. Words are organized by the first syllable of the Visayan gloss, with one section devoted to *ka*- words, another to *ti*-, and so on. There is no consistent order within or between syllable groupings from wordlist to wordlist.

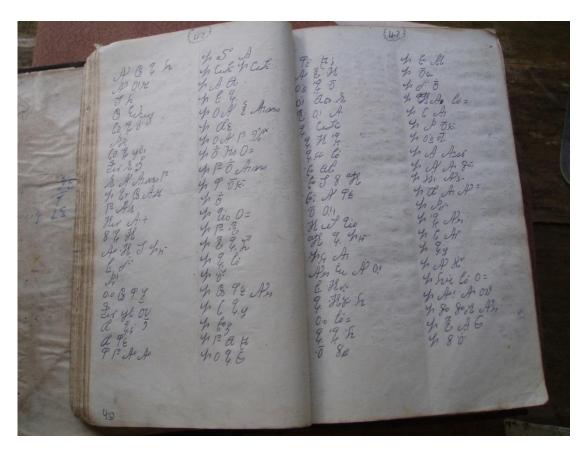


Figure 3. Pages from an Eskayan–Visayan wordlist, Alberta Galambao, Taytay.

Larger wordlists are comprised of almost 3000 lexical items, many of which are not attested in the traditional literature; likewise, the traditional literature includes items that are not attested in the wordlists. The juxtaposition of Visayan and Eskayan words draws attention to the different morphological structures in the two lexicons. Interestingly, inflected verbs listed as headwords in the wordlists do not always coincide with their *actual use* in Eskaya literature. Compare Table 8 above, which summarizes verbal inflection attested in the literature, with the set of headwords beginning with *gi*- from Sisinia Peligro's Visayan–Eskayan wordlist.

Visayan	Eskayan	Gloss	
gi-	yi-	marks realis, undergoer voice,	
		perfective	
gibabagan [balabag]	muyyupin	'laid across a path'	
gibasulan	riyablansu	'was blamed for'	
gibati	yitalim 'felt effects in the body'		
gibuhat	muyistawitis	'did work, 'made', 'created'	
gidakup	digu	'was caught, 'was arrested'	
gidamag	dililu	'caused to become sick by	
		ghosts'	
gidistinu	muytuyu	'was assigned for employment'	
gidulngan [dulung]	lakiri	'was approaching'	
gigaid	bahiw	'was tied'	
gigamit	bintaal	'used s.t.'	
gihandum	riihada	'was recalled and thought of	
		fondly'	
gihapun	rigani	'still', 'as before'	
gihay	guldami 'petal'		
gihimu	rinarilya 'was done', 'was made'		
gihukman [hukum]	sandiya	'was judged by'	
giihaw	yaduwal	'slaughtered (of an animal)'	
giila	iriyukisim	'was identified, recognized'	
giilu	gamyu	'lost a parent', 'became deprived'	
giilung [lilung]	yadinal	'was concealed'; 'was made	
		dizzy'	
giingun	risinglun	'was like', 'was similar to'	
gilibutan	ligarti	'was surrounded by'	
gilingkusan	dildawusdami	'was curled up or knotted by'	
giluiban	gruwirtiri	'was betrayed by'	
gilukdu	muruki	'was carried on the head'	
gilungguan [lunggu]	muybanal	'was beheaded by'	
gilungkat	riklus	'was pried open'	
giluwatan	yupir	'was accidentally let go'	
gimahayan	aymahan	'was subjected to feelings of	
		hurt by	
ginapus [gapus]	dilbi	'was continuously bound or tied	
		down'	

Table 9. gi- words in the Peligro wordlist. Visayan verbal roots are reproduced in square brackets where their underlying form is not easily discernible.

That a morphologically complex word can serve as a lemma is not surprising as this practice is still commonplace in Visayan dictionaries produced today. More interesting is the variability in how gi- is morphologically represented, or not represented. A scan of the list brings up a number of likely Eskayan affixes for expressing gi-, namely dil-, muy-, ri-, yi- and yu-. Of these, only ri- (gi-) is attested in the literary corpus despite the list's conspicuous specification of vi- as the Eskayan gloss of gi-. That vi- is sometimes doing the work of gi- in the wordlist is evident from the word yitalim (gibati 'felt effects in the body'), since the root talim (bati, 'feel s.t. in the body') is attested in the corpus. Likewise ri- in rinarilya (gihimu, 'was done') and risinglun (giingun, 'was similar to') is clearly expressing gidue to the availability in the corpus of the roots narilya (himu, 'do', 'make') and singlun (ingun, 'be like'). However, the segmentation of other words in this list cannot be made with confidence due to the absence of the relevant roots in the corpus. Adding even more complexity to the picture, the word bintaal is here glossed as gigamit ('was used' UG.RE.PFV) while in Eskaya literature it is analysed as migamit (AV.RE.PFV.use; see (38) above). Regularity in the selection of verbal inflection—be it implicit or explicit—and its associated function or meaning is evidently not a defining characteristic of Eskayan morphosyntax. Again, this serves to highlight the Eskayan use of affixation for signalling a more abstract 'verbiness', and allowing context (largely in the form of an available Visayan translation) to do the work of specifying a narrower meaning.

Certain non-verbal content words attract cranberry morphemes; that is to say, morphemes with a contrastive function but no actual semantic content, in the manner of 'cran-' in 'cranberry' (Carstairs-McCarthy 2002). Consider these lexical entries that have **bultu** (*tawu*, 'person'), **limur** (*away*, 'quarrel') or **luris** ('evil') as their root.

Visayan	Eskayan English		
tawu	bultu	'person'	
katawhan	bultulis	'people'	
pagkatawu	iklabultu	'birth', 'giving birth'	
natawu	ilkabultu	'born', 'newly born'	
away	limur	'quarrel'	
awaya	limurdil	'this specific fight'	
awayun	limursidi	'will fight'	
kaaway	anchdiyaasu	'enemy'	
kaawayan	nintiyasas	'group of enemies'	
dautan	luris	'bad in character or effect'; 'sorcery'	
himaya	lurisima	'glory', 'spiritual joy',	
kadautan	luriski	'wickedness', 'evil'	
mangilad	muyluri:s	'cheat', 'swindle'	

Table 10. Eskayan cranberry morphology.

Below is a hypothetical interlinear analysis of the derived words listed in Table 10 in which the 'root-like' portion is isolated for comparison with a segmented Visayan gloss. I have marked the Eskayan column with an asterisk to emphasize the fact that the segmentation is speculative and cannot be resolved with corpus evidence. The Eskayan analysis column is marked with an asterisk to indicate that the morphemic gloss itself is hypothetical, the only available evidence comes from the structure of the corresponding Visayan gloss: the putative morphemes -lis, ikla-, ilka-, -dil, -sidi, -ima and -ki do not feature elsewhere in any wordlist with the same function.

Visayan	Morphemic analysis	*Eskayan	*Morphemic analysis
ka-tawu-an	COL-person-COL	bultu-lis	person-COL
pagka-tawu	NOM-person	ikla-bultu	NOM-person
na-tawu	PV.RE-person	ilka-bultu	PV.RE-person
away-a	quarrel-spec	limur-dil	quarrel-spec
awayun	quarrel-pv.irr	limur-sidi	quarrel-pv.irr pv.irr
ka-away	NOM-quarrel	anchdiyaasu	NOM:quarrel
ka-away-an	COL-quarrel-COL	nintiyasas	COL:quarrel:COL
himaya	glory	luris-ima	glory
ka-daut-an	NOM-harm-NOM	luris-ki	harm-nom
mang-ilad	PL-cheat	muy-luris	PL-cheat

Table 11. Hypothetical segmentation of cranberry morphemes.

The affix -lis is plausibly a collectivizer in bultulis ('people') but it has a different function in the word **pirlis** (mangingisda, 'fisherman') which is included in the same wordlist and seems to be formed from the root pir (isda, 'fish'). Other professions in Eskayan are indicated with the productive suffix -ur as in sidur (sikritariyu, 'secretary'), ridur (supirintindinti, 'superintendent of public schools') and bidur (tinudlu 'appointee'). Ecclesiastic ranks take -iktur as a suffix, as seen in inmunsiktur (papa, 'pope'), insiktur (ubispu, 'bishop'), and witsiktur (arsubispu, 'archbishop'). The Eskayan suffixes **-dur** and **-tur** are reminiscent of the suffixes dor and -tor found in Spanish professional terms like contador ('accountant'), embajador ('ambassador'), doctor ('doctor') and agricultor ('farmer'). The influence of Spanish and other languages on Eskayan lexical roots will not be discussed here, but the association of the Hispanic-like suffix -ur with titles and professions introduced to the Philippines by Spanish administrators bears examination as it suggests that Pinay took inspiration from Spanish morphology when lexicalizing terms associated with Spanish colonial rule. This, however, is not generalisable to all Eskayan ranks and professions. The non-Hispanic morpheme bagan, which

appears to denote an individual of high office, is found in **baganhunda** (huwis, 'judge'), **baganiring** (kumandanti, 'commandant') and **sutbagani** (hari, 'king'). Thus the possibility that **-lis** is a productive affix for either collectivizing or denoting a profession cannot be definitively proven from the evidence and Eskayan has other ways to specify these meanings in particular semantic domains. Fascinatingly, **luris** ('bad') becomes its semantic obverse **lurisima** ('glory') with the addition of **-ima**, and both words feature frequently in Eskayan prayers. Cranberry morphology in Eskayan, with all its quirks, is consistent with the widespread suppletion in the verbal system. Just as there are a number of affixes for indicating 'verbiness', cranberry morphemes like those projected in Table 11 above signal a contrast only. The meanings must be learnt independently, or provided by the translational context.

3. Relexification as an historical practice

No sooner had the Boholano–American war ended than the US administration began constructing schools in Bohol for both adults and children; throughout the country, a popular propaganda slogan of the time was 'The Spaniards built churches but the Americans are building schools' (Luspo 2001). The language of instruction, at all levels, was English. Eskaya people today maintain that the first Eskaya school was constructed in Biabas in 1920 and there is evidence that Mariano Datahan wrote to President Manuel Quezon in October 1937, inviting him to observe classes.⁷ In his letter he used the American term 'night classes' perhaps in order to present his school as a normalized institution compatible with the national education system. But the parallels between the Biabas school and the American school system on Bohol run deeper.

In the early years of the 20th century, no textbooks were available for teaching English to speakers of Visayan. One strategy for overcoming this was to modify existing textbooks designed for teaching Spanish to Visayan speakers. As Lumin

⁷ The letter itself has not survived but a transcript of the reply from Quezon's secretary Jorge Vargas, dated 11 November, 1937, was carved onto wooden sign boards and where it remains on prominent public display in Biabas with duplicates in Taytay. The reply includes a brief description of the content of Datahan's letter and mentions an enclosed notebook with 'lessons in Boholano dialect'.

B Tirol has documented, these Spanish-era textbooks were repurposed with English glosses and republished for distribution in Bohol (1975). The reinscription of bilingual texts with an additional language provided a ready precedent for the method adopted by Datahan in his recuperation of 'Bisayan Declarado'. A document held by the Bohol Museum, attributed to a secretary of Mariano Datahan by the name of Domingo Castañares is a hand transcription of one such modified Spanish textbook. Embedded within it is a Spanish–English–Visayan wordlist of several thousand items, with accompanying example sentences and bilingual translations. What is unique about the Castañares document is that it includes a further modification: the Visayan layer is entirely supplanted by Eskayan words to produce a Spanish–English–Eskayan wordlist with example sentences. A page from this document is shown in Figure 4 below.

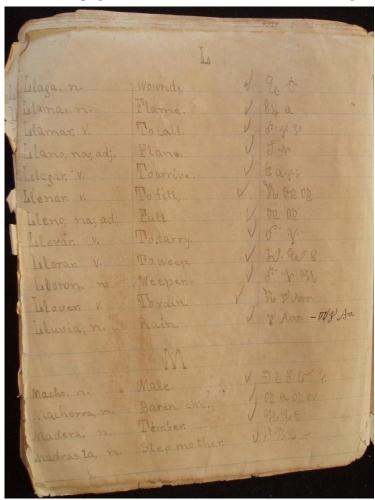


Figure 4. Section of a Spanish–English–Visayan wordlist, attributed to Domingo Castañares.

If Eskayan had been lexified using existing wordlists as a template it would explain many of the apparent irregularities in the morphology. Datahan, or his ancestral muse Pinay, would not necessarily feel compelled to consistently imitate Visayan morphological structures in his lexicon when equivalent morphology was not obvious in the Spanish and English glosses. Indeed, both Spanish and English exhibit conspicuous suppletion in such frequent verbs as 'go' (\rightarrow 'went'), 'be' (\rightarrow 'am', 'are', 'is'), poder ('be able to' - puedo, puedes etc), pensar ('think' - pienso, piensas etc). I have not come across any instances of verbal suppletion in Visayan. In essence, Pinay's utilization of irregularity in many Eskayan verbs has the effect of evoking a kind of linguistic otherness, with inspiration from Spanish and English as the archtypes of foreigness. Though superficially imitative of Spanish/English suppletion, Eskayan irregularity does not cluster around verbs of high frequency. This tendency runs contrary to the so called Nahbereich (German: 'vicinity') theory of suppletion which expects infrequently needed words to be more regular, and frequent words to be relatively irregular.8 A frequent word, it is argued, can afford to be suppleted on the basis that its continual use renders its meaning transparent. But such an observation, if relevant, is here trumped by the literality principle: in Eskayan there is no necessary relationship between frequency and intelligibility when 'meaning' is determined by the written record.

Mel'čuk has pointed out that suppletion appears to violate "an important linguistic (in fact semiotic principle): 'express the similar through the similar" (1994:342). As such, it appears to be semiotically 'unnatural' and that "[i]n a formal artificial language suppletion would hardly be tolerated" (392). Nevertheless, he was at pains to assert that suppletion is linguistically natural in so far as it appears "spontaneously to fill some needs of the language" and that "it is never imposed on a language, but develops in it, as it were from within" (392). What is intriguing about Eskayan is that Pinay appears to have deliberately imposed 'naturalistic' suppletion on his language from the outside in order to fill a paradoxical sociolinguistic need, namely to highlight both the essential otherness of Eskayan as well as its (typological) sameness to colonial languages.

⁸ The *Nahbereich* account was first proposed by Osthoff (1899). For a summary of how this idea was since developed and critiqued see (2003).

KELLY

Not all Eskayan irregularity can be attributed to Pinay. One cultural protocol, stemming from a belief that Eskayan words are in some ways equivalent to their referents, proscribes any crossing out of Eskayan text. As a result, transcription errors are a driver of language change and Eskaya people identify certain words in older manuscripts as archaic or even unintelligible. Thus further irregularities in wordlists might reasonably be expected to accrue through the intergenerational process of retranscription, reversals, and transliteration into Roman letters and back into Eskayan. Importantly too, Eskayan was lexified in an environment in which linguistic 'otherness' and unintelligibility was politically institutionalized. Relatively few Boholanos had access to Spanish, the language of administration, and even fewer were educated in Latin, the language of the church. Indeed, the opacity of Latin probably contributed to its unorthodox use in traditional shamanic ceremonies known as *urasiyun*. In

I have argued (2012, forthcoming) that Pinay-Datahan's lexification of Eskayan was part of a political reaction to the introduction of English to Bohol. His production of pedagogical materials and institutions that were imitative of the American model reflected a popular notion, widely circulated in the period, that language—especially language codified in a written form—was an index of nationhood and had the power to legitimize claims to territory. Springing from such a powerful assumption about the nature and potential of language, Pinay's creation reflected the political concerns of its creator.

⁻

⁹ Reversals are especially problematic. Conceivably, when a morphologically complex Visayan definition of a Spanish or English term is forced to function as a headword, the isolated lexical root automatically loses its prominence. Indeed, for many Visayan speakers the isolated lexical root is considered too abstract to act as a headword and in popular Visayan dictionaries verbs are usually preceded with the actor-voice irrealis perfective prefix *mu*- and are often listed again under the prefix *mag*-. Naturally this creates practical problems for dealing with the letter 'M' as *all* verbs would need to be listed (sometimes more than once) under this letter in the dictionary. John Wolff (p.c.) gave me an account of a Visayan dictionary that was serialized in a local magazine in Cebu. Having begun in the 1920s with 'A', by 1960 the compilers had got as far as words beginning with *mag-a* and ten years later were still at *mag-a*.

¹⁰ This widespread Philippine practice involves the use of garbled Latin—written or spoken—in rituals of power and healing, and in the production of charmed objects (Retana 1894; Pajo 1954; Demetrio 1969; Gaabucayan 1971; Aparece 2003; Cannell 2006; Kawada 2006).

Summary and conclusion

In many of its particulars, the unique morphosyntax of Eskayan indexes a complex of linguistic ideologies that underpin Pinay's essentialist vision of language. As we have seen, while Eskayan and Visayan coincide on a broad syntactic level this parallelism does not extend to bound morphology. When juxtaposed with Visayan as a 'standard' comparator, Eskayan morphology deviates to a surprising degree. Verbal inflection may be implicit and learnt by convention, or it may be overtly marked with one of several highly polysemous affixes. Wordlists display evidence of multiple 'one off' cranberry morphemes that cannot be resoved by derivational axioms. Nonetheless, the idiosyncrasies of Eskayan morphology are rarely a source of confusion or debate amongst Eskayan speakers. Traditional narratives and wordlists constitute that which is known without recourse to extrapolation from an abstract rule. Hence, 'language' for Eskaya people is not transmitted but transcribed; not what is known intuitively but what has been recorded beforehand. That language is material and exterior as opposed to abstract and intutive is witnessed in the conflation of language and script and in the traditional story of Eskayan's origins in the human body. Here Eskayan irregularity offers a useful analogy: like unsegmentable morphology Eskaya linguistic knowledge is ultimately embodied and not inferred.

The 'word', understand as an orthographically distinct unit, is core to the Eskaya understanding of language. It has analytical primacy and an inherent meaning independent of its context. The principle of symmetrical homophony suggests an unmediated and almost onomatopoeic or rebus-like relationship between the phonetic form of these word units and their referents. Further, the calquing of Visayan points to an assumption that words are ultimately substitutable between languages and the learning a new language involves a straightforward memorization of a lexicon as opposed to any grammatical analysis. In Pinay's world, dictionaries with descriptive definitions would be superfluous as a single gloss provides all the necessary and sufficient semantic information. Such lexical substitutability is witnessed in common transcription errors found in Eskaya literature where words from the Visayan layer are often accidentally transposed into the Eskayan text and vice versa.

Pinay's complex of linguistic ideologies is clearly not confined to the Eskaya community. The belief that writing confers political and empirical authority is widespread in literate and non-literature communities the world over, and this attitude is certainly in evidence in Bohol. To take one example, dissertations with an oral history component that are submitted to Bohol's two universities are typically accompanied by signed affidavits from the oral sources themselves. Likewise, the precedence given to discrete words, as opposed to structures, in popular ideas about what constitutes language, is in evidence in Visayan lexicographic practice (see footnote 9). Calquing too has any number of precedents in commonplace Visayan expressions, particularly greetings, formulas for telling the time and quantifying formulas. Thus the Eskayan phrase **Griyalu aga** ('good morning') is a literal translation of the Visayan *Maayung buntag* ('good morning'), which is itself a calque of the Spanish *Buenos días* ('good morning'; 'good day').

As a language engineering experiment, Pinay's creation of Eskayan was guided by his assumptions about the nature and potential of language. Though ostensibly produced through a process of encryption, Pinay's transformation of Visayan into Eskayan delivered surprising and variable results. When writing was granted precedence 'normal' language change and development was routed onto a new trajectory. And when native grammatical intuition was outsourced to the page, the relationship between linguistic competence and performance was fundamentally altered. In effect, Pinay's creation was forced to adapt to its specific uses by human agents.¹²

Pinay's conjuring of linguistic materiality from abstraction was analogous to the political project of his successor (or alter ego) in the person of Mariano Datahan.

_

Other Visayan calques include *Ginuu ku!* from Spanish *¡Dios mio!*; *Matag karun ug unya* from English 'Every now and then' (but in Visayan this means 'frequently' as opposed to 'sporadically'); *Mas...* [adj] *sa...* [adj] from Spanish *Más... que* ('More s.t. than s.t'.); *Daghang salamat* from Spanish *Muchas gracias*; and *Kumusta ka?* from Spanish ¿Como estás? or ¿Cómo está Usted?

¹² Although Eskayan is not used for every-day communication, there can be little doubt that the actual use of the language exposes it to new constraints, bringing about incremental changes unanticipated by its creator. For example, the cultural attitude to writing as inviolable has accelerated lexical replacement (see Section 3). In a similar vein it has been noted (Zuckermann & Walsh 2011) that constructed or revived languages exhibit the same kinds of hybridity, syncretism and interference as 'naturally' evolving languages. My thanks to an anonymous reviewer for pointing this out.

The ambitions that Datahan held for Biabas as the cultural epicentre for a revived Visayan nationalism were manifested in his recuperation of Pinay's language. That his folk linguistic conception of Visayan was linguistically naive and off-base is arguably beside the point. While other post-Revolutionary nativist communities in the Philippines quickly collapsed (Sturtevant 1976), Biabas has continued to survive and thrive. Indeed, in recent years its political ambitions have been carefully adapted to the discourses of NGO-led development and national legislation enacted to serve the interests of cultural minorities. In a similar manner, 'Bisayan Declarado', rebranded as 'Eskayan', has continued to be transmitted, spoken, sung in and prayed in. Eskayan teachers at the traditional schools use the standard rote-learning pedagogical techniques that were popular a century ago but some have adopted contemporary methods that encourage spontaneity. A salient and recent example of Eskayan adaptivity is the successful introduction of an Eskayan-language component into the publically funded elementary school in Taytay.

Natural languages do not simply change but *are changed* by their speakers who adapt them to their needs, hopes and ideologies. Created languages like Eskayan—be they auxiliary languages, anti-languages, cants or codes—offer a stark but enlightening perspective on how our ideas about language are powerful enough to refashion communication in our own image and to reify tacit aspirations as palpable realities.

Acknowledgments

Many thanks to the Eskayan teachers in Biabas, Taytay and Capdapdapan for their generous assistance. In Taytay I am particularly indebted to Hilario Galambao, Alberta Galambao, Marciana Galambao, Maura Galambao and the late Fabian Baja. In Biabas, to Juan Datahan, Rustica Palma and Sisinia Peligro; and in Cadapdapan to Nida Decena Salingay and Gaudencia Pizaña. Many other Eskaya, who are too numerous to mention, have patiently answered my questions over the years.

Marianito Luspo of Holy Name University in Tagbilaran has been a fund of historical information. Alma 'Kins' Aparece and Maria 'Weng' Dano helped me considerably in my analysis of Visayan. In Australia, I am grateful to Sébastien Lacrampe and Nick Evans for their invaluable editorial comments and guidance.

References

- Adelaar A & NP Himmelmann (eds) 2005 The Austronesian languages of Asia and Madagascar London; New York: Routledge.
- Aparece UB 2003 Sukdan curing practices in Anonang, Inabanga, Bohol: An ethnography of performance Unpublished PhD thesis. Graduate Faculty of the College of Arts and Sciences, University of San Carlos, Cebu City.
- Billings L 2005 'Ordering clitics and post-verbal R-expressions in Tagalog: A unified analysis?' in A Carnie, H Harley & SA Dooley (eds) *Verb first: On the syntax of verb-initial languages* Amsterdam & Philadelphia: John Benjamins. Pp. 303-340
- Cannell F 2006 'Reading as gift and writing as theft' in F Cannell (ed) *The Anthropology of Christianity* Durham & London: Duke University Press. Pp. 134-162.
- Carstairs-McCarthy A 2002 An Introduction to English Morphology: Words and their Structure Edinburgh: Edinburgh University Press.
- Consul SM 2005 *Iniskaya: A linear linguistic description* Unpublished thesis. Faculty of the Graduate School, Cebu Normal University, Cebu City.
- Demetrio F 1969 'Towards a classification of Bisayan folk beliefs and customs' *Asian Folklore Studies* 28:95-132.
- Dryer MS 2007 'Noun phrase structure' in T Shopen (ed) Language Typology and Syntactic description Vol II: Complex constructions Cambridge & New York: Cambridge University Press. Pp. 151-205
- Gaabucayan S 1971 'The medicine men of Agusan in Mindanao, Philippines' *Asian Folklore Studies* 30:39-54.
- Gibbens LT 1904 'Division of Bohol' in Fourth Annual Report of the Philippine Commission: 1903 Washington: Government Printing Office.
- Himmelmann NP 2005 'The Austronesian languages of Asia and Madagascar: Typological characteristics' in KA Adelaar & N Himmelmann (eds) *The Austronesian Languages of Asia and Madagascar* London & New York: Routledge. Pp. 110-181

- Kawada M 2006 Review: [untitled] Asian Folklore Studies 65:116-118.
- Kelly P 2012 'Your word against mine: How a rebel language and script of the Philippines was created, suppressed, recovered and contested (in press) *The Australian Journal of Anthropology*.

- Luspo M 2001 'The Boholano–American war: A case study in collective amnesia' *Graduate School Journal* Divine Word College Tagbilaran 12:56-62.
- ——— 2005 Bohol and the Boholanos Unpublished manuscript.
- Mel'čuk I 1994 Suppletion: toward a logical analysis of the concept *Studies in Language* 18:339-410. Osthoff H 1899 *Vom Suppletivwesen der indogermanischen Sprachen Heidelberg: I Hörning.*
- Pajo MC 1954 Bohol folklore Unpublished MA thesis Faculty of the Graduate School, University of San Carlos, Cebu City.
- Payne TE 1994 'The pragmatics of voice in a Philippine language' in T Givón (ed) Voice and Inversion Amsterdam & Philadelphia: John Benjamins.
- Retana WE 1894 Supersticiones de los Indios Filipinos: un Libro de Aniterías Madrid: Imprenta de la Viuda de M Minuesa de los Ríos.
- Romanillos ELA 1997 *The Dagohoy Rebellion Revisited* Quezon City: University of the Philippines-Diliman.
- Scriven GP 1900 An American in Bohol, The Philippines, 1899-1901 http://library.duke.edu/rubenstein/scriptorium/scriven/diary9.html Accessed 21 December 2011.
- Sturtevant DR 1976 Popular Uprisings in the Philippines, 1840–1940 New York: Cornell University Press.
- Tirol JB 1998 Bohol: From Spanish Yoke to American Harness Tagbilaran City: Universal Press.
- Tirol LB 1975 *History of Bohol: Pre-hispanic Up to 1972* Unpublished PhD thesis. University of Santo Tomas, Manila.
- Torralba MT 1991 Description of Preliminary and Future Data Elicitation for Linguistic Analysis of the Eskaya language of Bohol Unpublished manuscript. The Pontifical University of Santo Tomas, Manila.

- Veselinova L 2003 Suppletion in Verb Paradigms: Bits and Pieces of a Puzzle Unpublished PhD thesis. Linguistics, Stockholm University, Stockholm.
- Zuckermann G & M Walsh 2011 'Stop, Revive, Survive!: Lessons from the Hebrew revival applicable to the reclamation, maintenance and empowerment of Aboriginal languages and cultures' *Australian Journal of Linguistics* 31:111-127.

Simplifying a system:

A story of language change in Lelepa, Vanuatu

Sébastien Lacrampe
The Australian National University
sebastien.lacrampe@anu.edu.au

Abstract. This paper focuses on the problem posed by the vowel surfacing during two encliticization processes in Lelepa (Oceanic, Vanuatu), with the nominalizer =na 'NMLZ' and the pronominal =s 'OBL'. For instance, the verbs faam 'eat', mat 'dead' and fan 'go:IRR' are derived as nafaamina 'food', nmatena 'funeral' and nafanona 'departure'. While the base forms have the same vowel /a/, those vowels surfacing before =na seem unpredictable. This paper discusses several possible explanations for these vowels and shows that both historical and phonological approaches are needed to account for them. Still, there is variation in the nominalisation of certain native verbs such as raik 'fish with hand spear', which is derived as either naraikana or naraikina 'hand spear fishing'. It is shown that while naraikana is accounted for in diachrony, naraikina results from a reanalysis process indicated by intergenerational variation.

Keywords. Lelepa, Oceanic, borrowings, vowels, language change

1. Introduction¹

1.1 The Lelepa language and its speakers: a brief overview

Lelepa belongs to the Oceanic branch of the Austronesian family and is spoken in central Vanuatu. It is an SVO language which exhibits many typological features typical of Oceanic languages. It is mostly head-marking with right-aligned modifiers. Lelepa distinguishes direct from indirect possessive constructions (Lacrampe 2009), and 1st person pronouns distinguish inclusive and exclusive referents. Its number system marks singular, dual and plural; arguments are indexed on the verb. The language makes extensive use of serial verb constructions. Its phonology is also typical of Oceanic languages, with a small to medium-sized phonemic inventory consisting of 14 consonants, co-articulated labial-velars, and the 5 vowels /i e a o u/.

According to Lynch & Crowley (2001:108), Lelepa is part of a dialect chain running over the whole of central Vanuatu. This area includes the languages spoken on Efate and its satellite islands such as Lelepa, Moso, Nguna and Emao as well as those spoken in the Shepherds islands such as Tongoa and Makira. The Polynesian outliers Mele-Fila and Emae are excluded from this dialect chain.

The majority of Lelepa speakers are located on the island of Lelepa, while about a quarter are found on the recent settlement of Mangaliliu on mainland Efate. In addition, a few live in Port-Vila, the nearby capital of Vanuatu. Like many ni-Vanuatu, Lelepa speakers are multilingual and active speakers of several languages. In their case, this includes their own language; Bislama, the national language of Vanuatu; French or English, which are Vanuatu's languages of education; and either or both Nakanamanga and South Efate, which are closely related to and geographically contiguous with Lelepa. The latter two languages were also used as Christianisation languages at different times in Lelepa's history. During the first half of the 20th century, when Lelepa people had just been Christianised, South Efate was the language of the church. This language later

¹ I am grateful to Bethwyn Evans and two anonymous reviewers for comments on an earlier version of this paper, and to the audience of the ALS 2011 conference for questions and comments on my presentation which encouraged me to write the present paper. The research for this paper was supported by an Australian Postgraduate Award at the Australian National University. Finally, my gratitude goes to the Lelepa speakers without whom this research would not have been possible.

switched to Nakanamanga. Compared to these two languages, Lelepa is a "small" language with fewer speakers: it has about 400 hundred speakers, while there are around 6,000 South Efate speakers and 9,500 Nakanamanga speakers (Lynch & Crowley 2001:107). Although Lelepa speakers are fluent in these larger languages, the reverse is not true. Lelepa was never used as a vehicular language outside of its community of speakers, and is not taught in the two community schools. The transmission of the language is in the hands of parents of young children, and the language is indeed transmitted to the younger generations. However, this is not without exceptions, particularly in the Mangaliliu settlement and among speakers living in town. There is a strong exogamous tradition in Lelepa; in the past, women adopted in the community through marriage were expected to learn the language. Nowadays, however, many exogamous married couples use Bislama as their main language, and thus their children acquire Bislama or, less often, the mother's own vernacular as their first language. For these reasons, failure to transmit the language can be observed in families in which the mother does not originate from Lelepa. In addition, Bislama is more present in the speech of younger speakers than in the speech of the elderly. This can be seen when comparing texts from speakers of different age groups: younger speakers have not only imported more Bislama loans, but also tend to analyze these loans and native forms in similar ways, as shown in section 5.

1.2 The problem

This paper describes a phenomenon observed when two distinct enclitics, the nominalizer =na 'NMLZ' and the oblique marker =s 'OBL' are attached to the end of phrases². First, I will present the encliticization processes relevant to the discussion and the descriptive problem posed when these enclitics attach to consonant-final hosts. I will then look at possible ways to account for the Lelepa data, first by showing that while a phonological analysis is not tenable for the use of the enclitics with native Lelepa lexemes (section 3), this data can be explained from a diachronic perspective (section 4). I will then add borrowings to the equation, and show that a phonological explanation accounts for these (section 5). In section 6, I will present a case study showing that younger speakers reanalyze

² Abbreviations used in the glosses follow the Leipzig Glossing Rules wherever possible. Additions to the Leipzig Glossing Rules are R realis, REL relativizer.

those two encliticization processes, while older speakers do not. In section 7, I will summarize the findings of this paper and conclude that this reanalysis by younger speakers shows language change in progress.

1.3 A note on orthography

The orthography used to represent the Lelepa data is phonemic. The co-articulated labial velar stop $/k\bar{p}^w/$ is represented as $<\tilde{p}>$, the co-articulated bilabial velar nasal $/\eta\bar{m}^w/$ is represented as $<\tilde{m}>$ and the velar nasal $/\eta/$ as <g>.

2. The =na and =s enclitics

2.1 The nominalizing enclitic =na 'NMLZ'

In the nominalizing process, verb roots take the proclitic na= 'ART', a vestigial article, and the enclitic =na 'NMLZ', a nominalizer, to derive nouns. This is a productive process which applies to the main subclasses of verbs (intransitive, ambitransitive³ and transitive) in the language. The nominalizer =na is most often hosted by verbs, but it can also attach to nouns. When it is hosted by verbs, the verb is nominalised: e.g. fsa 'speak' derived as nafsana 'language'. It can also attach to nouns which function as objects. In such cases, the enclitic has scope over both the noun and the preceding verb; what is nominalised is a verb with its incorporated object, as seen in (1). In this example, the article na= occurs before the verb root fak 'go.to:IRR' which is then followed by its object maketi 'market'. The nominalizer =na attaches to the verb + object combination. The resulting deverbal noun nafak maketina 'going to the market produce. The object maketi is a loanword adapted from Bislama maket 'market':

(1) na= fak maketi =na

ART=go.to:IRR market =NMLZ

'going to the market'

³ Ambitransitive verbs are able to function underived with or without an object.

Table 1 shows intransitive, transitive and ambitransitive verb roots and their derived counterparts. This process is quite straightforward and it is largely possible to predict the nominalised form of a verb. However, we can see that the vowel of the proclitic *na*= is dropped with certain forms, such as *nfouna* 'weaving' and *nseiseina* 'meeting'. Phonological factors explain the deletion of this vowel: before fricatives followed by vowels, /a/ is deleted. Thus the vowel is deleted in *nfouna* and *nsalena* 'dance ceremony', but not in *nafsana*, as the fricative *f* is not followed by a vowel but forms a cluster with the following *s*.

	Verbs	Gloss	Deverbal nouns	Gloss
Intransitives	fou	'weave:IRR'	n=fou=na	'weaving'
	fsa	'speak:IRR'	na=fsa=na	'language'
mitransmives	maroa	'think'	na=maroa=na	'thought, idea'
	seisei	'meet'	n=seisei=na	'meeting'
Transitives	lop̃a	'see'	na=lop̃a=na	'view, opinion'
Transmics	suasua	'agree'	na=suasua=na	'agreement'
Ambitransitives	tae	'know'	na=tae=na	'knowledge'

Table 1. Examples of vowel-final verbs and their corresponding deverbal nouns.

All verbs in table 1 are vowel-final, and in the derivation process the enclitic simply follows the verb root. Lelepa is not a codaless language and many verbs end in consonants, thus it is necessary to see how the process applies with consonant-final verbs. This is shown in table 2 with verbs such as *mer* 'act' being nominalized as *namerina* 'action, way'. Nominalized forms are given in the third column. As expected, the enclitic =na occurs in these forms. Less expected, however, is a vowel (in bold letters in Table 2 and subsequent ones) which occurs between the last consonant of the verb and =na. Looking at all the examples, it can be seen that this vowel can surface as any of the five different vowels *i, e, a, o,* and *u*. It seems that this vowel is required as it is present in all given examples. In addition, this vowel is also always stressed, conforming to the Lelepa stress rule whereby penultimate morae are stressed. Thus in these examples, stress falls on the last vowel of the verbs roots, and in the nominalised forms, it falls on the penultimate vowel.

Verbs	Gloss	Deverbal nouns	Gloss
mer	'act'	namer i na	'action, way'
mat	'dead'	nmat e na	'funeral'
tin	'pregnant'	natin a na	'pregnancy'
sur	'defecate'	nasur a na	'need to defecate'
marmar	'rest'	marmar o na	'holidays'
fol	'lie:IRR'	nafol o na	'lie'
mun	'drink'	namun u na	'drinking'

Table 2. Examples of consonant-final verbs and their corresponding deverbal nouns.

Because this vowel only occurs during the process of encliticization, it must be accounted for. Is it predictable on phonological grounds or alternatively, is this vowel underlying and unpredictable? Furthermore, if it is predictable, what are the rules conditioning its occurrence? In contrast, if this vowel is lexically determined, is it part of the root or of the enclitic? These questions are answered in the following sections. The remainder of this section introduces the other encliticization process relevant to the present study, with the oblique marker =s 'OBL'.

2.2 The oblique enclitic =s 'OBL'

Being an enclitic, the oblique marker =s attaches to the end of phrases, and to a variety of word classes such as nouns, verbs, pronouns, and others. This enclitic is a pronominal which references 3rd person oblique arguments and adjuncts whose referents are known from preceding clauses or discourse context. Thus its function is completely different from that of the nominalizer =na, which is a derivational morpheme. Referents of the oblique enclitic typically include locations, instruments, and indirect or secondary objects of ditransitive verbs. In (2), the antecedent of =s is wara 'place', an argument of the first occurrence of the verb wuru with the role of location. The oblique =s attaches to the end of the relative clause introduced by the relativizer na 'REL'. This relative clause specifies the noun wara; the presence of =s is expected as relative clauses in Lelepa require that the relativized nominal be cross-referenced within the relative clause.

While in (2) = s attaches to a verb, in (3) it attaches to a noun. The noun *kapu* 'traditional pudding' hosts the enclitic = s. The referent of the enclitic is a previously mentioned bird which was shot and used as filling for the traditional pudding:

(3) E= pi nlakan a= to pat kapu =s.

3SG.SBJ:R=COP because 1SG.SBJ:R=stay:AUX make traditional.pudding =OBL

"This is why I was making traditional pudding with it."

Table 3 below gives further examples of the =s enclitic. It shows that it attaches to members of the major open word classes (nouns and verbs) as well as members of minor closed ones (pronouns, possessive pronominals, determiners and adverbials). Enclitics in Lelepa do not attach to prepositions, conjunctions and subordinators which typically occur at the left edge of phrases: this is expected from a left-headed language. These examples show that =s displays the behaviour of an enclitic, that is; the ability to attach to the right edge of phrases. For instance, when =s attaches to noun phrases, it may be hosted by the head noun or by the last optional modifier following the head.

	Hosts	Gloss	=s encliticised words	Gloss	Free translation
	to	'stay'	to=s	'stay=OBL'	'stay there'
Verbs	tum̃alua	'depart'	tum̃alua=s	'depart=OBL'	'depart from it'
	sralesko	'believe'	sralesko=s	'believe=OBL'	'believe in it'
Nouns	кари	'traditional puding'	kapu=s	'traditional.pudding=OBL'	'(make) traditional pudding with it'
	nsalena	'dance ceremony'	nsalena=s	'dance.ceremony=OBL'	'(organise a) dance ceremony there'
Pronouns	konou	'1sg'	konou=s	'1sg=obl'	'(tell) me about it'
Possessive pronominals	nae	'3sg:poss'	tai kik nae=s	'sibling small 3SG:POSS=OBL'	'(tell) his younger sibling about it'
Determiners	nge	'DEF'	nge=s	'DEF=OBL'	'(the place we killed) the (pig) at'
Adverbials	kusu	ʻtoo much'	kusu=s	'too.much=OBL'	'too much of it'

Table 3. Examples of vowel-final hosts and corresponding =s encliticized words.

Table 3 shows the oblique enclitic =s attached to a variety of vowel-final hosts. However, it can also be hosted by consonant-final hosts, as shown in table 4. Section 2.1 showed that the enclitic =na is preceded by a vowel when hosted by a consonant-final form, and that this vowel needs to be accounted for. As table 4 shows, a similar phenomenon happens when =s is hosted by a consonant-final form: a vowel occurs between the last consonant of the host and the =s enclitic. As observed with the encliticization of =na, this vowel can be any of the five i, e, a, o, u vowels.

Hosts	Gloss	=s encliticised words	Gloss	Free translation
pag	ʻclimb'	pag i s	'climb:OBL'	'climb on it'
sil	'enter'	sil i s	'enter:OBL'	'enter it'
sasak	'sit'	sasak e s	'sit:OBL'	'sit on it'
matmat	'happy'	matmat e s	'happy=OBL'	'happy about it'
nafnag	'food'	nafnag a s	'food:OBL'	'(make) food for it'
mutuam	'devil'	mutuam a s	'devil:OBL'	'(tell) the devil about it'
nag	'2sg:poss'	nag o s	'2sg:poss:obl'	'(tell) your (father) about it'
los	'wash'	los o s	wash:OBL	'wash there'
matur	'sleep'	matur u s	sleep:OBL	'sleep on it'
pten	'shellfish sp'	pten u s	shellfish.sp:OBL	'(spread) shellfish.sp on it'

Table 4. Examples of consonant-final hosts and corresponding =s encliticized words.

3. A phonological problem?

Section 2 has presented the =na and =s encliticization processes and shown that when these enclitics attach to a consonant-final host, a vowel occurs between the last consonant of the host and the following enclitic. This vowel, which can be either i, e, a, o or u, is not accounted for. The purpose of this section is to address this problem using phonological analysis.

At first sight, a morphophonological explanation, in which an epenthetic segment is added between two morpheme boundaries, seems a plausible hypothesis. While Lelepa has a (C)(C)(C)V(C)(C) syllable structure, meaning that consonant clusters are possible within and across syllable boundaries, the most common syllable still is CV, and the language prefers CV.CV.CV... structures. With this is in mind, it seems perfectly reasonable to assume that an epenthetic vowel is inserted between two consonants coming together at morpheme boundaries, to satisfy the preference for CV.CV.CV... structures. In addition, the variation in the form of the inserted vowel can be easily explained by a process of progressive assimilation, as the vowel under investigation can only assimilate with a preceding vowel of the host. It is now possible to formulate the following hypothesis and to test it against an expanded data set as given in table 5:

[&]quot;The vowel occurring between a consonant-final host and the enclitics =na 'NMLZ' or =s 'OBL' is epenthetic, and assimilates to the last vowel of the host."

The data in table 5 are representative of the problem, in that they show all possible known environments in which each different instance of the vowel under study occurs. The first column shows consonant-final hosts, while the third column gives encliticized words. Note that the data presents both words encliticized with =na and =s, since both processes have similar outputs: (i) they both require that a vowel be inserted between consonant-final hosts and the enclitics, and (ii) whichever enclitic occurs on a particular host, the inserted vowel is the same, as shown with msak 'sick' giving the encliticized forms namsakina 'sickness' and msakis 'sick:OBL'. The data in table 5 are also organised to make the analysis process straightforward: individual data rows are grouped into larger rows according to the last vowel of the hosts, and these larger rows are in turn ordered according to the conventional i-e-a-o-u vowel order. Further, encliticized words are ordered according to the vowel under study and following the same order: within a larger row, words with i before the enclitic are ordered before those with e before the enclitic, and so on.

Host	Gloss	Encliticized word	Gloss
sil	'enter'	sil i s	'enter:OBL'
fsa pseik	'teach:IRR'	nafsa pseik i na	'education'
tin	'pregnant'	natin a na	'pregnancy'
mer	'act'	namer i na	'action, way'
agnem	'1sg:excl:poss'	agnem i s	'1sg:poss:obl'
maet	'angry'	namaet o na	ʻanger'
pten	'shellfish sp'	pten u s	shellfish.sp:OBL
msak	'sick'	namsak i na	'sickness'
msak	SICK	msak i s	'sick:OBL'
faam	'eat:IRR'	nafaam i na	'feast, food'
pag	'climb'	pag i s	'climb:OBL'
tkark	'last born'	tkark i s	'last.born:OBL'
mat	'dead'	nmat e n	'funeral'
sasak	'sit'	sasak e s	'sit:OBL'
matmat	'happy'	matmat e s	'happy=OBL'
suar	'walk'	nasuar a na	'walk'
nafnag	'food'	nafnag a s	'food:OBL'
mutuam	'devil'	mutuam a s	'devil:OBL'
marmar	'rest'	marmar o na	'holidays'
nag	'2sg:poss'	nag o s	'2SG:POSS:OBL'
fan	'go:IRR'	nafan o na	'departure'
nkap	'fire'	nkap u s	'fire:OBL'
р̃од	'night'	nap̃og i na	'night'
los	'wash'	losos	wash:OBL
fol	'lie:IRR'	nafol o na	'lie'
lot	'pray'	nalot u na	'Christianity'
suk	'tight'	nasuk i na	'union'
nagrun	'woman'	nagrun i s	'woman:OBL'
sur	'defecate'	nasur a na	'need to defecate'
mun	'drink'	namun u na	'drinking'
matur	'sleep'	matur u s	sleep:OBL

Table 5. Expanded data set.

The hypothesis proposing the insertion of an epenthetic vowel assimilating to the last vowel of the host is tested and rejected below. Table 6 summarises the co-occurrences of the pre-enclitic vowels with the last vowel of the hosts, and shows that there is no clear assimilation of the vowel under study towards the vowel of the host.

In particular, table 6 shows that when hosts have a as their last vowel, the vowel before the enclitic can be any of the five i, e, a, o, u vowels. The assimilation hypothesis seems fairly weak, since if it were verified it would entail that any vowel before the enclitic has assimilated to a, which is not shown by the data. It also shows that i occurs before the enclitic with any of the five vowels. Again, this

does not look like a process of assimilation at all, since any host vowel can trigger *i*, and at least another vowel with very different features.

		Host vowel				
		\boldsymbol{i}	e	a	0	u
	i	+	+	+	+	+
Vormal randon	e	-	-	+	-	-
Vowel under study	a	+	-	+	-	+
	0	-	+	+	+	-
	u	-	+	+	+	+

Table 6. Summary of vowel co-occurrences.

It is now clear that these pre-enclitic vowels are unpredictable and have to be regarded as underlying segments. The fact that these underlying vowels only ever occur in processes of encliticization has muddied the waters and led to a misleading analysis which posited consonant-final underlying forms for those hosts taking the =na and =s enclitics. Phonologically-motivated processes of medial and final vowel deletion have been shown to occur in certain Efate languages (Schütz 1969:17-18, Clark 1985:19-21, Thieberger 2006:68-70). This is also the case of Lelepa, particularly with final vowels. This was seen with the data in table 5 in which final vowels are deleted unless they are followed by enclitics, in which case they surface and carry stress.

This suggests that Lelepa children learn which vowel occurs with the encliticized forms of particular lexemes: this statement will be shown to be important later, in section 5. For the time being, this paper will strengthen the analysis that the vowels occurring before the enclitics are underlying; it will focus particularly on where those vowels come from. This is the purpose of the next section.

4. A diachronic problem?

Phonological analysis has shown that the pre-enclitic vowels are lexically determined. Forms presented in tables 2, 4 and 5 as consonant-final are in fact vowel-final, the final vowel being the vowel occurring just before the enclitics =na and =s. These forms are revised in table 7.

Hosts	Gloss	Encliticized word	Gloss
sili	'enter'	sili=s	'enter=OBL'
fsa pseiki	'teach:IRR'	na=fsa pseiki=na	'education'
tina	'pregnant'	na=tina=na	'pregnancy'
meri	'act'	na=meri=na	'action, way'
agnemi	'1sg:excl:poss'	agnemi=s	'1sg:excl:poss=obl'
maeto	'angry'	na=maeto=na	'anger'
ptenu	'shellfish sp'	ptenu=s	shellfish.sp=OBL
	£::_1_?	na=msaki=na	'sickness'
msaki	'sick'	msaki=s	'sick=OBL'
faami	'eat:IRR'	na=faami=na	'feast, food'
pagi	'climb'	pagi=s	'climb=OBL'
tkarki	'last born'	tkarki=s	'last.born=OBL'
mate	'dead'	n=mate=na	'funeral'
sasake	'sit'	sasake=s	'sit=OBL'
matmate	'happy'	matmate=s	'happy=OBL'
suara	'walk'	na=suara=na	'walk'
nafnaga	'food'	nafnaga=s	'food=OBL'
mutuama	'devil'	mutuama=s	'devil=OBL'
marmaro	'rest'	marmaro=na	'holidays'
nago	'2sg:poss'	nago=s	'2SG:POSS=OBL'
fano	'go:IRR'	na=fano=na	'departure'
пкари	'fire'	nkapu=s	'fire=OBL'
$ ilde{p}$ ogi	'night'	na=p̃ogi=na	'night'
loso	'wash'	loso = s	wash=OBL
folo	'lie:IRR'	na=folo=na	'lie'
lotu	'pray'	na=lotu=na	'Christianity'
suki	'tight'	na=suki=na	'union'
nagruni	'woman'	nagruni=s	'woman=OBL'
sura	'defecate'	na=sura=na	'need to defecate'
munu	'drink'	na=munu=na	'drinking'
maturu	'sleep'	maturu=s	sleep:OBL

Table 7. Revised phonemic forms.

Showing that these vowels are underlying allows for a synchronic description. However, a historical analysis provides a more detailed explanation of the data. If there is an underlying segment which only surfaces in certain circumstances, then there are good reasons to look at this problem from a diachronic perspective. If an underlying segment is present in synchrony, then it is likely that this segment was present at an earlier stage of the language. Thus, considering the problem at hand, it would be interesting to compare Lelepa modern forms with their reconstructed ancestral forms. This would show whether the final vowel of hosts, which occurs only in encliticized forms, is present historically. If this hypothesis is verified, then this would be additional evidence for positing these vowels as underlying. On the other hand, if these vowels are not present in reconstructed

forms, or if reconstructed forms show different vowels, then we would need to find another explanation.

This comparison is done in Table 8, which compares Lelepa forms with reconstructed forms from Proto Oceanic (POc) and Proto North Central Vanuatu (PNCV). POc is the reconstructed ancestor language of all Oceanic languages, while PNCV is the putative ancestor of Oceanic languages spoken in northern and central Vanuatu (Clark 2009:3) and thus may be seen as an intermediate stage between POc and modern northern and central Vanuatu languages⁴. Considerable lexical and grammatical reconstruction has been undertaken for Oceanic. Reconstructed forms used in table 8 are taken from Ross, Pawley & Osmond (2003, 2007, 2008, 2011), Clark (2009) and Evans (2003).

Table 8 shows that, for those forms with known etyma, the hypothesis is verified: Lelepa final vowels are reflexes of vowels found in POc and/or PNCV reconstructions. These reconstructions show neither the absence of this vowel nor a different vowel in the same place. Note that one form is analysed differently from the others, as it is not a Lelepa reflex of POc or PNCV: *lotu* 'pray' is likely a Polynesian borrowing⁵. Nevertheless, the final *u* of Polynesian *lotu* is present in Lelepa *lotu*, thus the origin of this final vowel is known.

_

⁴ POc and PNCV have different statuses. While POc is well established, there is some debate on whether PNCV is the ancestor of a single language or not. PNCV reconstructions are used in this paper because the Lelepa data reflect them. No argument is made to support PNCV as Lelepa's direct ancestor.

⁵ I am grateful to Chris Ballard, Bethwyn Evans, Alexandre François, Paul Geraghty, John Lynch, Meredith Osmond, Malcolm Ross and Nick Thieberger for their insights on the origins of *lotu*, which may have been introduced in Lelepa during Christianisation.

Lelepa forms	Gloss	POc etyma	Gloss	PNCV etyma	Gloss		
tina	'pregnant'	-	-	*tiana	'pregnant'		
agnemi	'1PL:EXCL:POSS'	*kam i	'1PL:EXCL'	*qama(m) i	1PL:EXCL'		
maeto	'angry'	$maqetoldsymbol{o}(m)$	'black'	*ma?et o	'black'		
msaki	'sick'	*masak i t	'sick'	*masak i -tV	'sick, fever'		
tkarki	'last born'	*rik. i (t,q)	'small'	*rik i	'small'		
mate	'dead'	$*matm{e}$	'dead'	$*matm{e}$	'die, dead'		
sasake	'sit'	*sak e	'embark, ride on a canoe'	*sak e	'sit on, be on a canoe'		
sale	'dance'	*sal e	'dance'	$*salm{e}$	'dance'		
nafnaga	'food'	*pa y a n	'feed'	*vag a -ni	'feed'		
marmaro	'rest, breathe'	-		*mar o	'breathe'		
nago	'2sg, 2sg:poss'	*ik o	'2sg'	*iq o	'2sg'		
fano	'go:IRR'	*pan o	ʻgoʻ	*van o	ʻgoʻ		
nkapu	'fire'	*(k,g)ab u	'burn, be on fire'	*kab u	'fire, firewood'		
p ̃ogi	ʻnight'	*boŋi	ʻnight'	*bog i	'night'		
loso	'wash'	-	-	*los o -vi	'bathe, wash'		
munu	'drink'	*un u m	'drink'	*in u /*un u	'drink'		
maturu	'sleep'	*[ma]tur u R	'sleep'	*matur u	'sleep'		
sili	'enter'	*sil i p-i-	'enter into somewhere'	-	-		
Lelepa loaned form	Gloss	Loanword (Polynesian)		Gloss			
lotu	ʻpray'	lot u	'pray', 'Christian religion', 'religion', 'church'				

Table 8. Comparison of POc and PNCV reconstructions and borrowings with Lelepa reflexes.

The vowel attested before the enclitics can be explained historically for nineteen out of thirty-one Lelepa forms given in table 8, either through the reconstruction of ancestral Oceanic forms or through borrowing. Twelve forms remain with their final vowel unexplained. These forms are as follows:

- suki 'tight'
- nagruni 'woman'
- sura 'defecate'
- fsa pseiki 'teach:IRR'
- meri 'act'
- ptenu 'shellfish sp'

- faami 'eat:IRR'
- pagi 'climb'
- matmate 'happy'
- suara 'walk'
- mutuama 'devil'
- folo 'lie:IRR'

The etymology for these forms is not currently known. This should not be considered problematic, since the hypothesis is verified in every case where a reconstruction is available. Reconstructing a proto-language is a huge task, and a

linguist working on a synchronic description should not expect that reconstructed etyma are available for every single modern form of the language under study. The lack of particular POc or PNCV etyma to compare with Lelepa forms can be explained by the fact that a particular modern form may indeed be a reflex of a particular etymon, but this etymon has not been reconstructed yet. It is also possible that the modern language may have innovated in certain ways and the current state of knowledge of the proto-language is not able to explain certain innovated forms. Yet another reason is that the modern language has borrowed a particular form from a neighbouring unrelated or distantly related language: this is what happened with *lotu*, which was borrowed from a Polynesian language.

5. What about borrowings from Bislama?

The preceding sections have explained that the final vowels occurring in processes of encliticization are underlying (section 3) and that their etymology is traceable (section 4). These encliticization processes involving the enclitics =na and =s also apply to Bislama borrowings which are found in Lelepa. Example (4) and (5) show the Bislama verb kuk taking the enclitics =na in (4) and =s in (5). These examples show that the same vowel u surfaces between the last consonant of the hosts and the enclitics:

```
(4) kuk >> na= kuku =na
cook ART= cook =NMLZ
'cooking'
```

(5)
$$kuk >> kuku = s$$

 $cook$ $cook = OBL$
' $cook$ it'

Is it possible to account for this vowel? Section 2 has shown that the pre-enclitic vowels in Lelepa forms are part of the hosts, which entails that the underlying forms of the enclitics are /na/ and /s/, with no initial vowel. Thus there are two possible hypotheses to explain the occurrence of this vowel with borrowings: it may either be underlying and part of the host, or epenthetic and phonologically conditioned. These hypotheses are testable on the data presented in table 9, which

presents Bislama loans encliticized with =na and =s. This data is grouped in two main rows: the first row has forms showing a u before the enclitic, while the second row has forms showing an i before the enclitic. Forms in the table are also representative of the Lelepa corpus, which does not contain encliticized loans showing any pre-enclitic vowel other than u and i. When looking at the distribution of these two vowels, the table shows two distinct environments:

- i. The forms with u before the enclitics have the vowel u in the preceding syllable,
- ii. The forms with i before the enclitics have any vowel in the preceding syllable except for w: that is, they have i, e, a, o.

Bislama	Gloss	Encliticized	Gloss
loans		loans	
kuk	'cook'	nakukuna	'cooking'
kuk	'cook'	kukus	'cook it'
skul	'school'	naskuluna	'education'
Franis	'France'	franisis	'France:OBL'
fak maket	'go to the market'	nafak maketina	'going to the market'
kasem	'reach'	kasemis	'reach it'
makem	'measure'	makemis	'measure it'
bes	' establish a base'	besis	'establish a base:OBL'
lasmet	ʻp.name'	lasmetis	'p.name:OBL'
Sebas	'Sébastien'	Sebasis	'Sebastien:OBL'
stat	'start'	statis	'start it'
Rom	'Rome'	romis	'Rome:OBL'

Table 9. Encliticized Bislama loans.

Therefore, these two vowels are epenthetic vowels in complementary distribution, and we can predict their occurrence with the following rule:

(6) If the last vowel of the host is *u*, the epenthetic vowel is *u*; If the last vowel of the host is any other vowel but *u*, the epenthetic vowel is *i*.

This section has shown that Bislama loans encliticized with =na and =s undergo adaptation in Lelepa: the morphophonological rule of epenthesis given in (6) accommodates consonant-final loanwords which host consonant-initial enclitics in order to avoid consonant clusters. The next section shows that this rule, which seemed to be originally restricted to loanwords, affects native words as well, and argues that this illustrates language change in progress.

6. The case of *naraikina*: language change in progress?

This section presents the case of the deverbal noun *naraikina* 'hand spear fishing', and its ramifications in terms of language change. It was shown that there is a two-way solution accounting for the vowels occurring before the enclitics =na and =s. With native forms, these vowels are underlying, and with loanwords, they are phonologically conditioned. Lelepa speakers thus learn that there are two ways of realising encliticized words, whether they deal with native forms or with borrowings.

Example (7) shows the morphemic analysis for *naraikina*, in which the host's underlying form is the verb *raiki* 'fish with hand spear':

This form was given by a Lelepa speaker in his early thirties, who is recognised in his community for being an expert at fishing with a hand spear. I asked him if I could record him talking about this activity and its techniques. In the course of the recording this speaker uttered the form *naraikina* a number of times. Once the recording was completed, I went on transcribing it with his assistance and that of other, older, Lelepa speakers. The first time they listened to the recording, these older speakers did not recognise *naraikina*. They judged it to be incorrect, and stated that the proper form of the word is *naraikana*, with an *a* before the enclitic instead of an *i*. In contrast to *raiki*, this gives the underlying form of the verb as being /raika/ and not *raiki. Similarly to verbs presented in table 2, 4 and 5, /raika/surfaces as [raik] with its last vowel dropped, except when it hosts an enclitic, in which case its last vowel surfaces before the enclitic. Is there an explanation for this variation?

The etymology of *raika* can be traced in a way similar to what was done in section 4, by using proto forms: Lelepa *raika* may partly reflect POc **ikan* 'fish' and PNCV **ika* 'fish'. Although *ra* is unaccounted for—being unattested as a morpheme in Lelepa or as a proto form in either POc or PNCV, the rest of the form, and particularly its final vowel *a*, may be explained by **ika* and **ikan*, as is

Lelepa *neika* 'fish'. However, the occurrence of *naraikina* poses a number of questions. Has the underlying form /raika/ not been learned by this speaker? Alternatively, could *naraikina* simply be a speech error? These questions are discussed below.

That *naraikina* is a speech error is unlikely, because this speaker uttered it several times in the one section of discourse. Rather, it looks like he has not learned the underlying form *raika*, with an a at the end—and there may be two reasons for that: either he has *raiki* as the underlying form of this verb, and simply adds the enclitics as would be done with any other vowel-final form, or he has stored the consonant-final *raik* and applies the epenthesis rule in (6): given that *raik* has i as its last syllable vowel, this rule predicts the occurrence of an epenthetic i between the root and the enclitic =na, giving the form naraikina.

Could *naraikina* be a witness of a change in progress in the language, and not just a form belonging to the idiolect of a speaker? To test these two hypotheses, both young and old speakers were given a set of forms and asked for the corresponding encliticized forms of these hosts. The reason for having young and old speakers doing the test is because *naraikina* was uttered by a reasonably young speaker and rejected by older speakers. All forms given to speakers are attested as encliticized words in the current Lelepa corpus. The results of this test are shown in Table 10. The first column shows the host forms given to the speakers, while the second one gives speaker's answers. These answers are divided in two columns according to the two possibilities speakers have when encliticizing a particular host: either the encliticized form is regularly derived and surfaces with the underlying final vowel of the host, or the speaker applies the epenthesis rule in (6). In addition, for both possibilities speakers are sorted by age category (Y=young speakers; O= old speakers) and numbers of produced forms are given for each token per age category.

Ten speakers (five young speakers and five old speakers) did the test. Young speakers were between 15 and 20 years old while all older speakers were above 50 years old. Speakers between 25 and 50 were not tested, in the hope that this would give clearer patterns between the two age groups. The first observation which can be made on the data in table 10 is that older speakers only produced expected forms; that is, forms in which the underlying final vowel of the host

surfaces. This shows that these speakers have the underlying forms stored in their mental lexicon, and only apply the epenthesis rule to loanwords. Regarding younger speakers' results, there are several interesting observations to be made. First, the epenthesis rule was applied to seven forms out of ten: this not only shows that *naraikina* isn't an isolated case or an exception, but it also shows that on a small sample, more than half of the tokens (seven out of ten) are derived with the rule in (6). However, these seven forms have not been produced by all five young speakers, and in each case it is a minority (one to two speakers out of five) producing those forms. Nevertheless, the fact that they have been produced shows that for those speakers, the underlying forms of the hosts are ending with consonants and are derived phonologically.

	Speaker's answers							
Underlying forms of the hosts	Expected encliticized form	Y	О	Forms applying the epenthesis rule	Y	О		
surki 'hide'	nasurkina 'secret' 4		5	nasurkuna	1	0		
suki 'tight'	sukina 'union'		5	sukuna	1	0		
sura 'defecate'	nasurana 'need to defecate'		5	nasuruna	2	0		
nagruni 'woman'	nagrunis 'woman:OBL'	3	5	nagrunus	2	0		
raika 'spear fish'	naraikana 'spearfishing'		5	naraikina	2	0		
maeto 'angry'	namaetona 'anger'	5	5	namaetina	0	0		
sale 'dance'	nsalena 'dance ceremony'	5	5	nsalina	0	0		
mate 'dead'	nmatena 'funeral'	5	5	nmatina	0	0		
fano 'go'	nafanona 'departure'	4	5	nafanina	1	0		
lotu 'pray'	nalotuna 'Christianity'	3	5	nalotina	2	0		

Table 10. Encliticization test.

This section has shown that younger speakers have reanalysed the process of encliticization which treats native forms and borrowings differently. For older speakers, encliticization of native forms is lexically determined and that of Bislama loanwords is phonologically determined. Younger speakers, however, are treating both encliticization of native forms and of Bislama loanwords as phonologically determined. This reanalysis can be seen as a simplification as well as a regularisation of the system. This section has also shown that this change is in progress and not well established, as even with a very small test such as the one summarised in table 10, the reanalysis is patchy and unpredictable. A much larger

test would clearly be needed to grasp the importance of this reanalysis, in terms of number of forms as well as number of speakers, with all age groups represented. In particular, this would help in weighing the possibility of this phenomenon being change in progress or stable variation (Labov 1994).

7. Conclusion

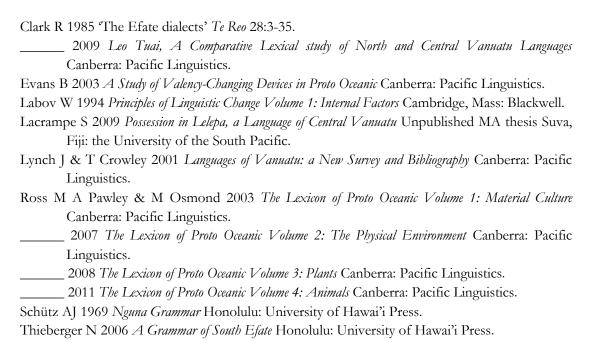
This paper has shown that Lelepa lexemes which seem to be consonant-final are in reality vowel-final. This can be proven when those lexemes host the enclitics =na 'NMLZ' and =s 'OBL'. When these forms are encliticized, a lexically conditioned vowel (section 3) which can be explained in diachrony (section 4) surfaces before the enclitics. This paper has also shown that encliticization of loanwords from Bislama is phonologically conditioned (section 5). Younger speakers are also reanalysing encliticization of native forms as being phonologically conditioned, by using the morphophonological rule of vowel epenthesis used with Bislama loanwords (section 6).

Thus, a rule originally dedicated to borrowings is now extended to native forms: those native forms are "regularised" by possibly becoming consonant-final in the mental lexicon of young speakers. A consequence of this is that the system is simplified, with encliticization becoming a phonologically determined process for all hosts, native and borrowed ones alike.

I realise that the test conducted to propose this idea is only a small one on the scale of a whole language, because only a few forms and a few speakers were tested. Still, this test shows that a trend is happening: a change in progress brought about by younger speakers who tend to use more Bislama in their Lelepa than older speakers. This is attested by my corpus in which texts by younger speakers contain a much higher rate of borrowings from Bislama than those of older speakers. This may explain why younger speakers apply the epenthesis rule to native forms, while older speakers apparently do not.

More generally, the phenomenon described in this paper shows that when surface forms exactly reflect underlying forms in a few environments, underlying forms can be lost and replaced, and language change can occur.

References



The semantics of the Cantonese utterance particle *laa1*

Helen Hue Lam Leung
Griffith University
h.leung@griffith.edu.au

Abstract. This paper will carry out an in-depth semantic analysis of one of the most salient and frequently used Cantonese utterance particles, *laa1* (high level tone). Cantonese utterance particles occur in continuous talk every 1.5 seconds on average, and play a very important role in Cantonese speakers' self-expression. There are approximately one hundred utterance particles in Cantonese, outnumbering those in Mandarin. However, it has been suggested that the particles have no meaning, and there has not been much comprehensive semantic analysis of individual particles. Where utterance particles have previously been described, the descriptions do not fully and accurately convey their meanings.

In this study, a range of naturally occurring examples of *laa1* from the Hong Kong Cantonese Corpus will be examined, and an invariant meaning of *laa1* proposed using the Natural Semantic Metalanguage (NSM). This approach offers advantages over previous descriptions of *laa1*, and will allow a simple, precise and translatable definition to be constructed. It is found that *laa1* indicates some shared knowledge between a speaker and an addressee. This study addresses the current gap in Cantonese linguistics, and contributes to the understanding of Cantonese utterance particles.

Keywords. Cantonese, semantics, Natural Semantic Metalanguage (NSM), utterance particle, sentence-final particle

ANU Research Repository – http://hdl.handle.net/1885/9404

Proceedings of the 42nd Australian Linguistic Society Conference – 2011

1. Introduction¹

Utterance particles are a distinctive hallmark of Cantonese. Although Cantonese utterance particles are not grammatically obligatory, they have important functions and are very noticeable in everyday conversation. Ordinary speech becomes unnatural when the particles are omitted. Despite their frequency and significance in conversation, there has not been much in-depth research focused on the meanings of individual utterance particles. This study aims to perform a comprehensive semantic analysis of one of the most recognisable Cantonese utterance particles, *laa1* (high level tone).

To begin with, an overview of Cantonese utterance particles and of prior work on *laa1* will be given. It will be shown that there are many problems with previous descriptions of *laa1*. Some problems with these analyses include being contradictory, vague, or inaccurate. One clear and testable explication will be proposed for *laa1* using the Natural Semantic Metalanguage (NSM), which will allow these problems to be overcome. Examples of *laa1* from ordinary conversation, taken from the Hong Kong Cantonese Corpus, will help in examining and justifying the proposed explication. It is expected that the explication will be able to account for all of the wide-ranging uses of *laa1*.

2. Cantonese utterance particles

It is necessary for people to understand what particles mean in order to achieve semantic and communicative competence (Goddard 2011:162; Wierzbicka 2003:341). Particles have a particularly high frequency in ordinary speech, and allow complex pragmatic meanings to be expressed easily. Utterance particles in Cantonese are bound morphemes that attach to the ends of utterances. They have no direct counterpart in English, but it has been argued that they belong to the 'complementiser' category. Their function has been compared to that of English

¹ I am indebted to Dr Zhengdao Ye for her valuable advice and encouragement. She also supervised my Honours thesis, upon part of which this paper is based. I am grateful to Pr Kang Kwong Luke for kindly helping me with the Hong Kong Cantonese Corpus. I also wish to thank Pr Cliff Goddard, as well as two anonymous reviewers.

question tags (Matthews & Yip 1994:65). Cantonese utterance particles have also been called 'sentence particles' or 'sentence-final particles', although they can occur at the end of syntactic units which are not sentences (Wakefield 2011:12; Luke 1990:6-10; Matthews & Yip 1994:338).

Though the regularity with which Cantonese utterance particles occur varies greatly depending on the mode of language use (i.e. less in formal situations), they have a very high frequency in ordinary conversation. An informal count revealed that on average, an utterance particle is found in continuous talk every 1.5 seconds (Luke 1990:11). Approximately thirty or more Cantonese utterance particles have been identified, but because they can be used together in combinations of more than one particle, the actual number of particles (simple and compound) currently in use in spoken Cantonese is approximately one hundred (Luke 1990:1; Kwok 1984:8-11; Wakefield 2011:13, 19; Yip & Matthews 2000:131). In terms of sheer numbers, Cantonese utterance particles far outnumber their Mandarin counterparts, or possibly any other language studied (Chan 1999:88; Luke 1990:1; Wakefield 2011:2). In the Hong Kong Cantonese Corpus (see Section 5), the most frequently used particle, *aa3*, is also, revealingly, the second most frequently used word in the entire Corpus. It comes second only to the word *hai6*, which means 'is', or 'yes'.

Many Cantonese speakers agree that a conversation without any utterance particles sounds unnatural (Luke 1990:14; Yip & Matthews 2000:130). Furthermore, James (2001), Ho (2003), and Wong (2009) have reported that Cantonese speakers use Cantonese utterance particles when communicating online, even if writing in English. The use of the particles in these cases suggests that there is something in their meanings that is unable to be easily translated into English. Moreover, this untranslatable meaning is so important for Cantonese speakers that it cannot be omitted.

Utterance particles are especially important for Cantonese speakers because they are a vital means for Cantonese speakers to express their emotions, feelings, moods, and attitudes. Much of the meaning conveyed by intonation in languages such as English is expressed via particles in Cantonese (Wakefield 2011; Yip & Matthews 2001:156; Chan 1999:88). Cantonese is a tonal language, with the rich tonal system severely restricting Cantonese speakers' ability to manipulate pitch.

Therefore, many speaker-oriented discourse meanings typically expressed with intonation in a language such as English are instead expressed in Cantonese using utterance particles (Wakefield 2011; Yip & Matthews 2001:156; Chan 1999:88). For example, some utterance particles perform one of the tasks of English intonation of changing a declarative sentence into a question. Given that Mandarin has fewer tones than Cantonese, perhaps it is of no surprise then that Mandarin has fewer utterance particles.

While most modern grammars of Chinese have mentioned Cantonese utterance particles, the particles have not been the focus of many studies. Language studies in the Chinese tradition have drawn the distinction between *shizi* 'full words' and *xuzi* 'empty words', and Cantonese utterance particles have been placed in the category of *xuzi* 'empty words' (Luke 1990:3-4). This signals that they do not have specifiable, truth-conditional meanings, instead serving grammatical functions. This general agreement that the particles have no semantic content has been listed by Luke (1990:3) as one of their distinctive features.

Contrary to this idea, I will argue and demonstrate here that Cantonese utterance particles do have meanings, and furthermore, that their meanings can be captured and stated. The idea that 'empty words' do not have meanings has already been challenged by Ye (2004), whose study of Mandarin 'emotional adverbs' (which in the Chinese linguistic tradition are 'empty words') used NSM to show that the 'empty words' are rich in semantic content. Recently, Wakefield (2011) also proposed that all Cantonese utterance particles have intrinsic meanings. Wakefield believes that descriptions of utterance particles are inadequate when they include meanings from the sentences the particles attach to, or the discourse contexts in which they appear. This would be similar to supposing that the plural morpheme 's' in 'cats' means 'more than one cat', which is undesirable because it includes the meaning of 'cat' in the meaning of 's' (Wakefield 2011:71-74). Wakefield believes this to be the reason many scholars have concluded that utterance particles have no meanings independent of context. This study will investigate the 'intrinsic' or 'core' meaning of only one particle, laa1; the explication proposed will aim to present an invariant definition which will hold in all contexts.

Laa1 is one of the most salient and frequently used utterance particles in Cantonese. In the Hong Kong Cantonese Corpus, laa1 is the 3rd most frequently

used particle (after aa3 and gaa3), and the 14th most frequently used word overall. It is the most highly used Cantonese utterance particle in Wong's (2009:102) data from MSN Messenger and ICQ chats. It has even been suggested that the source of the Singapore English la (sometimes spelt lab) lies in Cantonese (Kwan-Terry 1978; Gupta 1992). Non-Cantonese speakers often imitate Cantonese speakers by adding a laa sound to the ends of their sentences. This study will follow the precedent given in previous work on Cantonese utterance particles, including that of Yau (1965), Kwok (1984), and Luke (1990), by considering the Cantonese tones as lexical. In other words, the utterance particles laa3 and laa4 will be considered different to laa1, and will not be studied here.

3. Previous descriptions of *laa1*

It will be instructive to begin by looking at previous descriptions of *laa1*. First, some problems with Cantonese-English dictionary definitions of *laa1* will be discussed. Cantonese grammar books and textbooks will also be touched upon briefly. Following this, scholarly work on Cantonese utterance particles will be examined. Although each academic source has its own advantages, some limitations exist.

While dictionaries can be a good starting point, the definitions are problematic. Some ideas appear to be contradictory. For example, Huang's (1970:414) ideas of 'commanding' and 'requesting' do not correspond with each other. In fact, 'commanding' and 'requesting' can be thought of as opposing speech acts. Cowles' (1965:489) and Meyer & Wempe's (1947:287) descriptions of 'urgency' also do not correspond with their other descriptions of 'completion', as 'urgency' implies something has not yet been completed. In other cases, the definitions may simply not be very informative. For example, O'Melia's (1941:83) description of *laa1* as 'final, declarative, imperative' does not reveal much about the meaning of *laa1*. Furthermore, some of these labels are used for multiple particles which are not truly synonymous.

One of the main problems with previous descriptions of *laa1* has been the lack of focus on particles' 'core' or invariant meaning. As mentioned above, Wakefield

(2011) also identified this as a widespread problem in the literature. This can be seen clearly here. Meyer & Wempe (1947:287) provide two supporting examples for their definition of 'implying completion; certainty, or urgency'. The first is zou6 hou2 laa1, which they translate as 'it is finished'. The second is jat1-ding6 laa1, which they translate as 'certainly'. These two example sentences do imply 'completion' and 'certainty' respectively. However, it can be argued that this is due to the utterances themselves, and not the particle laa1. Zou6 hou2 laa1 means 'do complete/good laa1', or simply 'done'. This implies 'completion' with or without the particle laa1. Similarly, jat1-ding6 laa1 is 'definitely laa1', where the word 'definitely' implies 'certainty', with or without laa1. It seems Meyer & Wempe may not have differentiated between the particle's meaning and that of the utterance it is attached to.

More descriptions of *laa1* can be found in some Cantonese grammar books and textbooks. These can also be contradictory. Matthews and Yip (1994:351-352), for example, write that *laa1* can be used in 'polite requests' as well as in 'straightforward commands'. Elsewhere, *laa1* is reported as functioning 'purely to fill a pause' (Matthews & Yip 1994:341). This may be related to the idea of Cantonese utterance particles being 'empty words' with no semantic content. In Yip & Matthews (2001:146), it is stated that *laa1* is 'characteristic of imperatives'. This is not a very comprehensive explanation of its meaning. Other textbooks and grammar books admit that Cantonese utterance particles are pervasive in speech, important for communication, and one of the most challenging features of Cantonese for learners; however, they merely give advice such as 'using particles appropriately is best learnt from practice and experience' (Yip & Matthews 2001:156). Such statements also do not contribute to a reader's understanding of particles' meanings.

The first comprehensive and scholarly study of Cantonese utterance particles was that carried out by Yau (1965). Yau conducted two main 'tests', both encompassing the whole range of eighty-nine particles identified at the time. The 'S-Q test' was concerned with whether a statement with an utterance particle would be preserved as a statement, or be transformed into a question. In this test, laa1 was categorised as a 'Q-type' particle, or one 'demanding a verbal confirmation' (Yau 1965:39-68). However, because all eighty-nine particles were

assessed based on just one criterion, this S-Q test did not provide much description of meaning and is not particularly informative. Each particle appears to have the same property as many other particles, with individual particles' unique meanings being overlooked.

The second test conducted by Yau, the 'C-test' (Yau 1965:82-120), was used to determine which particles contain which of twelve 'connotation concepts'. The twelve connotation concepts were 'coaxing', 'surprised', 'hesitating', 'fault-finding', 'patient', 'persuading', 'dissatisfied', 'conceited', 'reluctant', 'reminding', 'doubting', and 'politely urging'. Yau found that *laa1* was associated with 'coaxing', 'persuading', 'reminding', and 'politely urging'. This is slightly more helpful than Yau's S-Q test in identifying meaning, but is still flawed in that eighty-nine particles were restricted to twelve pre-determined connotation concepts. Each concept was inevitably assigned to more than one particle, and particles were assigned to more than one concept. Again, the concepts may be contradictory—for example, in the case of *laa1*, 'coaxing' and 'reminding'. Moreover, the twelve labels represent fairly complex ideas, even in English (the language in which Yau was writing).

The second study of Cantonese utterance particles was carried out by Gibbons (1980). Gibbons differentiated between *laa* with a high level tone and *laa* with a high falling tone, although both are transcribed as *laa1* in the Jyutping system. He described both of these as 'mands', requiring a response in terms of action (Gibbons 1980:768). *Laa* with a high level tone was given a 'strength' (a 'degree of expectation of a response') of 2 on a scale with 1 being the weakest and 3 being the strongest. *Laa* with a high falling tone was given a 'strength' of 3.

Gibbons (1980) also investigated the whole inventory of Cantonese utterance particles. As with Yau's (1965) study, all particles were considered under uniform criteria. Individual particles were mentioned only briefly, being described mainly in relation to other particles. The descriptions given may be helpful where comparisons between particles are necessary, especially since most of Gibbons' data is tabulated. However, the meaning of each particle is lost as soon as it is considered in isolation.

Another large-scale study of Cantonese utterance particles was carried out by Kwok (1984). Similarly to this study, Kwok was interested in isolating the 'core meaning' of each particle. That is, the 'meaning shared by all occurrences of the particle in different contexts' (Kwok 1984:13-14). However, it will be shown here that Kwok's definition of *laa1* cannot be applied to all instances of *laa1* in varied contexts. Kwok writes that when suffixed to statements, *laa1* is similar in function to *la* in Putonghua, which is a particle of 'lively enumeration', and indicates 'a certain lack of definiteness, a lack of finality or completeness' (Kwok 1984:55). When used in imperative sentences, Kwok (1984:78) believes *laa1* to be the 'neutral form', being chosen as the suffix to commands and requests 'except when one wishes to express some special meaning'.

Kwok (1984) also looked at the whole range of Cantonese utterance particles. Her work was more descriptive than Yau's (1965) or Gibbons' (1980), but still did not consider individual particles in adequate depth, and contained some ambiguity. For example, the statement that *laa1* is the 'neutral form' for imperative sentences is somewhat perplexing given that Kwok also states that imperative sentences do not always take an utterance particle (Kwok 1984:78). Secondly, the idea of *laa1* being used 'except when one wishes to express some special meaning' is ambiguous because without knowing the meaning of *laa1*, it is equally impossible to know when one wishes to convey a meaning not expressed by *laa1*. Kwok's other description, 'lively enumeration', is also terminologically obscure. The idea of *laa1* conveying a lack of definiteness will be discussed further below.

Another concern is that Kwok (1984) had a tendency to link Cantonese utterance particles with a Mandarin counterpart. First of all, this is not helpful for people who do not speak Mandarin. The Mandarin counterparts were themselves not clearly defined by Kwok. The second problem with using Mandarin particles is that they are unlikely to be fully equivalent to particles in Cantonese. Particles are usually highly idiosyncratic, difficult to translate, and without exact equivalents in other languages (Wierzbicka 2003:341; Goddard 2011:163-164). As mentioned above, utterance particles in Cantonese outnumber those in Mandarin. Though Mandarin and Cantonese are related, they are very different and mutually unintelligible, especially in ordinary speech where Cantonese utterance particles are most abundant (Snow 2004:2, 46).

The next major work on Cantonese utterance particles was carried out by Luke (1990). Luke studied three particles, one of which was *laa1*. Importantly, Luke's study also aimed to include the full range of use of each particle. His work, though narrower in focus, was a significant improvement on previous studies. Luke's descriptions appear to be the most in-depth for any individual Cantonese utterance particles. Another noticeable development in Luke's (1990) work is that he appears to be the first to analyse real examples of utterance particles from naturally occurring, ordinary conversations. Luke gives a valid argument that invented examples are no substitute for spontaneous conversation (Luke 1990:2).

Luke summarised *laa1* as being 'sensitive to the establishment of common ground as an organisational issue' (Luke 1990:117). 'Seeking common ground' was also one of the functions of *laa1* identified by Matthews and Yip (1994:341). The kinds of sequences identified by Luke (1990) for *laa1* were 'reportings and storytellings', 'listings and instructions', 'understanding checks', 'suggestions', 'agreements', and 'pre-closings'. However, some of the sequences identified by Luke are themselves contradictory. For example, he identified both 'suggestions' and 'agreements' as possible sequences, but these imply that the same particle is used in very different ways. As mentioned, despite his in-depth analyses, Luke states clearly that Cantonese utterance particles have no semantic content (Luke 1990:3-4).

There is still a need for thorough and accurate semantic analyses of Cantonese utterance particles. Dictionaries, textbooks and grammar books were clearly not written as in-depth investigations into particles' meanings. Luke (1990) has a Conversation Analysis background, and his work was written from what he describes broadly as a sociolinguistic perspective. Other studies have been broader, and focused less on individual particles. Gibbons (1980:764) stated that one of his article's objectives was the stimulation of debate that would hopefully lead to more adequate description of the particles in Chinese languages. This study will address this gap which still exists in Cantonese linguistics. The next section will introduce the Natural Semantic Metalanguage approach to be used in this study.

4. Methodology: the Natural Semantic Metalanguage approach

The Natural Semantic Metalanguage (NSM) approach will be used in this study (see e.g. Wierzbicka 1992; 1996; 1997; Goddard & Wierzbicka (eds) 1994; 2002a; 2002b; Goddard (ed) 2008; Goddard 2011; Peeters (ed) 2006). The aim here is to capture the semantic invariant of the particle *laa1* and express it by means of a paraphrase. The language of the paraphrase is limited to a minimal 'core' of 'semantic primes'. These are commonly used, everyday words which represent the most basic meanings. It is important that these primes are semantically simple, in order to avoid circularity and terminological obscurity. A list of the semantic primes in English and Cantonese is available in the appendix.

Because semantic primes represent fundamental, shared human concepts, semantic equivalents are expected to exist in all natural languages. In fact, empirical studies have confirmed the existence of the primes in an array of geographically and typologically diverse languages (see e.g. Goddard & Wierzbicka (eds) 1994; 2002a; 2002b; Goddard (ed) 2008; Peeters (ed) 2006). The primes also share a universal syntax, and therefore any NSM explication can be translated into any other natural language to give an identical meaning. With the use of NSM, we can accurately describe meaning in any language, as if from inside, while using our own language. This is a great advantage, as ethnocentrism has been one of the main pitfalls in explaining meaning (Goddard 2002:8; Wierzbicka 1996:22; Wong 2004:752). Moreover, NSM explications using natural language are intelligible to native speakers, and can be tested by substitution in place of the words they represent (Goddard 2002:6; 2011:65; Besemeres & Wierzbicka 2003:9-11; Wong 2005:245). Explications may also have the potential to be adapted for language learners and non-linguists.

Another advantage of the NSM method, particularly in explaining particles, is that they can be written from the speaker's point of view. Cantonese utterance particles concern interaction between the speaker and addressee, and therefore references to 'I' and 'you', two semantic primes, are necessary (Wakefield 2011:75-76). The NSM approach has been applied to particles in various languages (e.g. Besemeres & Wierzbicka 2003; Chappell 1991; Goddard 1994; 2011; Travis 2005; Waters 2009; Wierzbicka 1986; Wong 2004; 2005). Recently, Wakefield (2011) used the NSM framework in the process of equating some Cantonese utterance

particles to specific English intonation patterns. However, Wakefield did not study the particle *laa1*.

The goal in this study is to find an NSM explication that can be applied to all instances of *laa1*. As Wakefield (2011:70) explains, explications of Cantonese utterance particles should be context-bound rather than context-specific. The NSM explication will be written from the speaker's point of view, and will allow substitution and testing, as well as maximum translatability.

5. Data

In this paper, 'Cantonese' refers only to the variety spoken in Hong Kong. This is the so-called 'Standard Cantonese' or 'Hong Kong Cantonese'. Cantonese is the primary spoken language of Hong Kong, and the most widely known and influential variety of Chinese besides Mandarin (Matthews & Yip 1994:2). In 2011 there were almost 6,100,000 people in Hong Kong (roughly 90% of the population) who were aged over five and spoke Cantonese as their main language (Census and Statistics Department 2012).

The data used in this study comes from the Hong Kong Cantonese Corpus, created by Luke and Nancarrow (see *Corpus of Hong Kong Cantonese*, http://www0.hku.hk/hkcancor/intro.html). The Corpus contains 180,000 words of naturally occurring Cantonese, recorded in the late 1990s. The data consists of spontaneous speech either in ordinary settings among family, friends and colleagues, or from radio talk shows. As mentioned, Luke (1990:18-27) argues that naturally occurring, 'raw', 'everyday' data is better than constructed or elicited data. Furthermore, linguists agree that Cantonese utterance particles are used primarily in informal or colloquial speech (Gibbons 1980; Luke 1990; Wakefield 2011). Therefore, it is best if the data and examples used in this study are from real, spontaneous, naturally occurring and informal conversation. Data from the Hong Kong Cantonese Corpus satisfies all these criteria.

A Cantonese romanisation system, 'Jyutping', has been used here to present all Cantonese words and data. Proposed by the Linguistic Society of Hong Kong in 1993, it is also known as 'The Linguistic Society of Hong Kong Cantonese

Romanisation Scheme' (Linguistic Society of Hong Kong 2011). For standardisation, examples from texts using different romanisation systems have been given here in Jyutping.

6. NSM explication of laa1 with examples and discussion

An NSM explication will now be proposed for the Cantonese utterance particle *laa1*. This explication was arrived at after looking at one hundred naturally occurring examples of *laa1* from the Hong Kong Cantonese Corpus. Some of these examples will be given below to test and demonstrate the explication's validity. It will be shown that the explication can be used to fully and clearly explain all instances of *laa1*, in a range of situations and contexts. It also has some links with previous descriptions of *laa1*. The NSM explication proposed for *laa1* is as follows:

laa1

- a. I say this because I want you to know what I think
- b. I think like this now: 'you know what I think about this'
- c. because I think like this now, I can not-say more

Several comments about the explication may be relevant here. Note that when *laa1* is used, the knowledge which is shared and understood by the speaker and addressee may be more than what is explicitly stated in the utterance *laa1* is attached to. In other words, what is known can go beyond what was said. It should also be noted that the last part of the explication is 'I can not say more', and not 'I cannot say more'. 'Not' and 'say' have been hyphenated above to highlight this. This is acceptable in NSM, and would also be acceptable in, for example, the Cantonese version of this explication. The three lines of the explication should be considered as part of the one definition. NSM explications may be long compared to 'traditional' definitions, but following this grammar allows maximum clarity and translatability. Let us now look at examples of *laa1* in use.

6.1 Example 1

(1)Gam2 zik1-hai6 pei3-jyu4 nei5 zau6 haan1-zo2 meaning for-example you then save-PFV SO cing4haan1-zo2 cing4 syun4 jau6 hou2 aa3, journeysave-PFV journey boat also good Prt fo2-ce1 jau6 hou2 *aa3*, whatsoever train also good Prt whatsoever gam2-joeng2 laa1. this-way laa1

'So that means for example you've saved money on a journey—perhaps saved on a boat journey, or a train, whatsoever, like that.'

In Example 1, the speaker is giving a lengthy explanation about cheap ways to travel. He/she is explaining that a British Airways promotional offer will allow a free flight from any European city to London, if boarding a direct flight from London to Hong Kong. We can test the proposed explication of laa1 with its use in Example 1. In Example 1, the speaker is (component (a) from the NSM explication) saying this now because he/she wants the other person to know that they will be able to save money from certain modes of transport. The speaker gives a few examples of modes of transport which the other person can save on, but ends the list with laa1 because (component (b)) the speaker thinks that the other person knows what he/she thinks about this. In other words, the other person will themselves be able to think of modes of transport that could be saved on. The speaker thus stops listing, because since it is assumed the other person can understand him/her and will be able to continue the list themselves (component (c)), there is no need to say any more. Related to Example 1 is part of Kwok's (1984:55) description that when suffixed to statements, laa1 indicates a 'lack of finality or completeness'. The list in Example 1 is indeed not exhaustive. However, as we shall see in other examples, not all cases of laa1 correspond with Kwok's idea that it conveys lack of finality.

To further justify the proposed explication, it will be revealing to substitute *laa1* in Example 1 with some other particles. For example, a particle that seems to contradict component (a) when substituted for *laa1* in Example 1 is the particle

aa4. This particular utterance, with particle aa4, becomes a question, as if the speaker is asking for confirmation. Particles contradicting component (b) include wo3 and lo1. Substitution for wo3 in this example gives the interpretation that the speaker is pointing out or explaining the offer to the addressee, where the addressee either does not know or understand something, or does not see the significance of something. There is a feeling that if the addressee understood what the speaker was saying, he/she might change their mind about something. Use of lo1 in Example 1 implies that the speaker thinks this is something the addressee does not, but should, know. A particle that contradicts components (b) and (c) is gaa3, which when substituted into Example 1 implies that the speaker does not expect the addressee to know about or understand this offer, and that the speaker might then explain. Wo3 also allows this opportunity to explain more. The particles chosen for substitution here do not cause the new utterance to sound unnatural, but do change the attitude or meaning conveyed.

6.2 Example 2

```
(2) A. Bat1-jyu4 gai3-zuk6 tau4-sin1 gong2
let's continue earlier speak
ge3 je5 laa1.

LP thing(s) laa1
```

'Let's continue the conversation from earlier.'

```
B. Hou2
             aa1
                    hou2
                                 hou2
                                        aa1.
                                               Gam2
                           aa1
                    good PRT
  good
             Prt
                                 good PRT
                                               SO
   hai6
             laa1,
                    gong2 faan1
                                 ngo5-dei6
   yes
             laa1
                    speak back
   gan6-fong3
                    aa1.
   recent-situation
                   Prt
```

'Good, good, good. So yes, going back to talk about our recent situation.'

Example 2 is the beginning of one of the recorded conversations in the Corpus. Let us first look at *laa1* as used by Person A. The proposed explication of *laa1* can be tested again here. Person A's use of *laa1* can be interpreted as (component (a))

Person A saying 'let's continue the conversation from earlier' because Person A wants Person B to know that he/she wants them to, or thinks that they should. Next, (component (b)) Person A thinks that Person B knows what he/she thinks about this. This may refer to, for example, which conversation/topic is meant, or why Person A wants to continue talking about it. The exact reasoning would not be necessary to detail in the explication, as it would then become too narrow and unable to cover the whole range of uses of *laa1*. Lastly, (component (c)) because Person A assumes that Person B knows what he/she thinks, Person A can not say more. Person A does not need to, for example, repeat the earlier conversation, or explain anything else.

This utterance by Person A in Example 2 could easily be described as 'persuasive' by a Cantonese speaker explaining the utterance to an English speaker. In fact, this is a commonly used description of *laa1*, with Matthews and Yip (1994:351-352) classifying *laa1* in the group of 'imperative and persuasive particles', and Yau (1965:82-120) attributing to it the 'connotation concepts' of 'persuading' and its synonym, 'coaxing'. In the English gloss for this sentence, there are remnants of this persuasiveness, although the English formula 'let us', used often by English speakers to sound less imposing, seems to have countered this feeling (Wierzbicka 2006:183-203).

To better explain the difference between Person A's use of *laa1* here and the English meaning of *persuade*, it would be useful to look at an explication of *persuade*, proposed by Wierzbicka (1987:62-64). It is necessary to point out here that Wierzbicka's explication uses older primes and syntax from an earlier version of the NSM. Words such as *cause*, *should*, and *different* are no longer used as semantic primes. Nonetheless, the general idea of the explication still holds true. Note that the explication of *persuade* given below is for the syntactic frame 'X persuaded Y to do Z', or in this case, 'Person A persuaded Person B to continue the earlier conversation'.

persuade

I think that you should do X

I know that you don't want to do it

I think I can say things which will cause you to think about it in a different way

I want you to come to think about it in a different way

I want to say why I think that you should do it

I say: (...)

I say this, in this way, because I want to cause you to come to think that you should do X, and do it (Wierzbicka 1987:62-64)

Parts of the meanings of *laa1* and of *persuade* are compatible, although other parts are not. Firstly, someone who *persuades* says something because they want the addressee to do something ('I say this... because I want to cause you to come to think that you should do X, and do it'). Similarly, Person A's use of *laa1* in Example 2 signals, according to component (a) of the explication, something like 'I want you to know that I think we should (/I want us to) continue the earlier conversation'. In this respect, the use of *laa1* and the use of *persuade* are compatible because the speaker wants the addressee to do something in both cases, and says something to try to make it happen. This can explain why Cantonese speakers sometimes describe *laa1* as being persuasive.

However, the word 'persuasive' implies that the other person is less willing than the speaker to do something. This is clearly not the case in Example 2, as we can see that Person B responds by stating his/her agreement more than once. The English speaker who persuades would anticipate resistance ('I know that you don't want to do it'), whereas the Cantonese speaker who uses laa1 would not. Furthermore, because of this resistance, to persuade, the English speaker has to say a number of things in the process of making the addressee change his/her mind about something ('I think I can say things which will cause you to think about it in a different way'). These aspects of persuade are incompatible with laa1. This can be seen by looking at components (b) and (c) of the explication for laa1. According to components (b) and (c), a Cantonese speaker using laa1 would assume the other person understands and knows what he/she thinks, and that there is no need to say more. In Example 2, Person B responds agreeably although there has been no process of Person A saying things to change his/her mind. Thus we can see that definitions like 'persuasive' are inadequate.

Let us now turn to Person B's use of *laa1* in Example 2. The proposed explication can be used to explain *laa1* here as well. Person B's use of *laa1* is clearly not persuasive, since Person A has already indicated that he/she would like to continue the conversation. Here, Person B is in agreement. 'Agreement', as mentioned above, has been offered as one of the attributes of *laa1*, for example in Huang (1970:414) and Lau (1977:480). However, the particle itself does not indicate agreement. As a response from 'let's continue the conversation from earlier', the utterance 'good, good, good... going back to talk about our recent situation' conveys agreement even when the three words 'so yes *laa1*' are omitted. *Laa1* can be used as part of an agreement, but to say that *laa1* means 'agreement' would be making the common mistake of considering the meaning of the whole utterance as the meaning of the particle.

It may be interesting to note that an earlier version of the explication for *laa1* included the semantic prime 'can' in component (b). This earlier component was 'I think you can know what I think'. However, 'can' was omitted from component (b) in the final explication due to instances of *laa1* like Person B's in Example 2. Since Person A has already expressed his/her opinion, and the two speakers are in agreement, it is unlikely that Person B did not simply assume Person A knew what he/she was thinking. A component including 'can' made the speaker seem too uncertain, and was rejected in favour of the current component in which the speaker is more confident in his/her assumption ('I think like this now: "you know what I think about this""). Many other examples from the Corpus also support this change. The related idea of 'certainty' will be looked at more closely further below, with reference to the use of *gang2-hai6* 'of course'.

One previous description more applicable to Person B's use of *laa1* in Example 2 is Luke's (1990) idea of 'common ground establishment'. Person B can be interpreted as signalling to Person A that there is mutual understanding or agreement, and that they are thinking the same thing. Luke's description will be discussed further with respect to Example 3.

6.3 Example 3

Example 3 is similar to Example 2 in that the speaker using *laa1* is referring back to some prior knowledge. The conversation stops temporarily as Person A

answers the phone, and upon resuming, *laa1* is used when referring to an earlier point in the original conversation. The proposed explication again sheds light on the use of *laa1* here. The interlinear gloss will only be provided immediately surrounding the use of *laa1*.

- (3) A. 'Ei, I have a call, let's pause for a while.'
 - A. 'Okay, we can continue.'
 - B. 'Mm.'

A. Gam2	tau4-sin1	gong2	dou3	ne1,	zau6	waa6
SO	previously	speak	to	Prt	then	say
tung4	di1 jan4	lyun4	1-lok3	<i>laa1</i> .	Gam2	zau6
with	CL people	e cont	act	laa1	SO	then
zik1-hai6	seng4-jat6	zeoi1	lo1	di1	je5.	
that-is	always	chase	Prt	CL	things	
Zik1-hai6	keoi5-dei6	m4	wui5	zi6-dur	1g6-zi6- _z	gok3
that-is	they	not	will	self/au	ıtomati	cally
bei2 nei5	gaa3.					
give you	PRT					

'So we were talking about contacting people before. I mean constantly chasing things up. That is, they don't automatically give you things.'

The utterance in Example 3 is not 'persuasive', 'commanding', or 'requesting', and does not imply 'urgency' or 'completion'. Furthermore, *laa1* here does not, however strongly or weakly, require a response in terms of action, or demand a verbal confirmation. This suggests that Gibbons' (1980) label of 'mand' and Yau's (1965) categorisation of *laa1* as a 'Q-type particle' are both unable to be applied to all cases of *laa1*. This highlights again the fact that most previous descriptions are inadequate, at least when considering the whole range of uses of *laa1*. The more relevant descriptions of *laa1* for Example 3 are Kwok's (1984:55) 'lack of finality or completeness', since the speaker is continuing something that was unable to be finished previously (although it is not a list like Example 1); Yau's (1965:82-120) 'reminding', and Luke's (1990) 'common ground establishment'.

According to Luke (1990:56), there can be organisational problems where speakers have to sustain mutual orientation as to what they are doing, where they

are in a conversation, and what to do next. Therefore, in reportings and story-tellings, *laa1* is sometimes 'used to segment an extended reporting into chunks'. Furthermore, a related use of *laa1* suggested by Luke (1990:63-64) is that *laa1* helps to announce a topic on which extended talk is about to be delivered. Through the use of *laa1*, the topic introducer displays his/her assumption that the addressee can know what the topic is. This allows the speaker to secure an extended slot for its delivery.

Luke's view can be seen in Example 3 as Person A using the utterance with *laa1* to provide 'orientation' as to what they were doing, where they are, and what to do next. When Person A restates the previous topic after having answered the phone, this may be interpreted as a kind of brief summary of their earlier conversation, or as a brief introduction as to what he/she will say next. Either way, it 'organises' the conversation and makes clear what was said before and what will be said next. Although Luke's 'segmenting' into 'chunks' is not particularly descriptive in itself, we can interpret the first 'chunk' of conversation in Example 3 as that which occurred before the phone was answered. The second 'chunk' would be the part of the conversation to take place after the phone has been answered.

The important point here is that this organisation and mutual understanding in Example 3 corresponds with the proposed explication for *laa1*. After the speaker states what he/she thinks (component (a)), the speaker then indicates the expectation that the addressee knows what he/she thinks about it (component (b)). Once speakers have mutually 'organised' their conversation, the speaker does not have to say more about the earlier part of the conversation (component (c)). Through this organisation, the use of *laa1* has helped Person A 'announce' (or in this case, re-announce) the topic he/she wants to talk about, i.e. contacting people.

The tendency identified by Luke (1990:56-59) for *laa1* to secure an extended slot for the speaker in this type of sequence does not seem to be true here. Although in Example 3 Person A does continue talking with a longer turn, the same sentence without *laa1* would still allow for an extended slot. Another indication can also be found in the rest of the conversation. Before answering the phone, Person A already had many extended turns where he/she was talking at length,

while Person B's responses were much shorter. Person B's responses included saying things like 'yes', or asking questions so that Person A could continue the narrative. When Person A says they can continue after having answered the phone, Person B merely says 'mm' instead of contributing anything more significant or informative. This seems likely to be because it has already been established in some other way that Person A has a lot more than Person B to say on the topic. This idea of *laa1* introducing something for a longer turn has not been included in the proposed explication for *laa1*.

Next, it will be beneficial to examine utterances conveying 'certainty', a description of *laa1* given by Cowles (1965:489) and Meyer & Wempe (1947:287). Utterances with *laa1* which convey 'certainty' occur very frequently in conversation and in the Corpus. As explained above, the proposed NSM explication aims to be general enough to cover all uses of *laa1*. The explication should be valid in all contexts, regardless of the content of the rest of the utterance. Since 'certainty' is not part of the proposed meaning of *laa1*, testing the explication with some utterances which convey certainty will help reveal whether or not it is applicable in such common situations. Consider Example 4, which is a response to someone talking about their sister's pet guinea pigs smelling very badly.

6.4 Example 4

(4)Nei5 cung1-loeng4 dou1 m4 tung4 keoi5 with shower it you even not gang2-hai6 *laa1*. of-course laa1

'Of course, since you don't even give it showers/washes.'

The *laa1* in Example 4 can be considered against the explication proposed. The speaker wants the addressee to know that he/she thinks it is obvious that guinea pigs that do not get washed become smelly (component (a)). Since this is a fairly natural, logical or 'common sense' conclusion to come to, the speaker assumes the addressee understands what he/she thinks (component (b)). Since this idea, and the link between washing (or dirtiness) and smell is so 'obvious' or logical, the speaker does not feel the need to explain further, and indeed does not say

anything more in this turn (component (c)). Thus the explication can be applied to this example.

It would not be surprising for Example 4 to be described in English by a Cantonese speaker as conveying 'certainty' or 'persuasiveness'. 'Persuasiveness' has been discussed above in relation to Example 2, and the same points are valid in this example. The idea of 'certainty' can be examined further. The use of gang2-hai6, or 'of course', needs to be highlighted. A more direct translation of the characters separately might be 'definitely-is'. It seems reasonable, then, to assign the feeling of 'certainty' to gang2-hai6, and not laa1. This sense of certainty is felt even in the free English translation of Example 4, and even without laa1. The word dou1, which is very roughly glossed as 'even', also contributes to the feeling of certainty here. It has a complex meaning that is not easily translatable into English, but seems to add some 'strength' to the speaker's position.

Gang2-hai6 'of course', as well as hou2 ming4-hin2 'very clear', and other similar phrases like jat1-ding6 'for certain'/'definitely', are often used in the same utterance as laa1. The frequent use of laa1 with phrases such as these can easily lead Cantonese speakers to say that laa1 conveys 'certainty'. There must be something in the meaning of laa1 that is highly compatible with such words and phrases, which leads speakers to choose the particle laa1. The proposed explication can help explain this too. Component (b) 'I think like this now: "you know what I think about this" and component (c) 'because I think like this now, I can not say more' correspond well with a sense of 'obviousness' or something being 'very clear'. From the speaker's point of view, what he/she is thinking must be in some way clear or obvious to the addressee, such that the addressee can understand without further explanation.

More substitutions of *laa1* for other Cantonese utterance particles can be revealing. If in Example 4 the use of *laa1* were substituted for a particle such as *ze1* or *lo1*, the utterance would not sound correct. Use of *ze1* in this utterance would minimise the situation or imply something like 'only' or 'just', which is incompatible with 'of course' or 'definitely'. Use of *lo1* in this utterance would imply that the addressee did not know that dirty guinea pigs would smell, and would again sound unnatural because the sentence is one where something is supposed to be very clear, obvious, or 'certain'.

6.5 Example 5

Example 5 also contains *gang2-hai6* 'of course'. In this scenario, one of two speakers announces that he/she would not go on vacation during summer holidays. Without *gang2-hai6* (and perhaps even *zau6*, glossed as 'then' but also not easily translatable), the utterance does not sound very strong or certain. This supports the idea that certainty is not part of the meaning of *laa1*. Again, the proposed explication is applicable here, and can shed light on the use of *laa1*.

(5)Ngo5 zau6 gang2-hai6 wui5 syu2-gaa3 then of-course will summer-holiday (go) me not *laa1*. Tung4 jan4-dei6 bik1. laa1 with other-people crowd 'I of course wouldn't go during summer holidays. Crowded with other people.'

The numerous examples of *laa1* with *gang2-hai6* 'of course' and its synonyms support the decision, mentioned earlier, to omit 'can' from component (b). The earlier component 'I think you can know what I think' makes the speaker seem somewhat tentative and unsure, although it seems from many examples that the speaker is confident in what is being said. The current component for (b) is more fitting with *gang2-hai6* 'of course' and its synonyms. At the same time, it can explain those utterances that do not contain a word like *gang2-hai6*. The speaker seems to always assume that the addressee knows what he/she thinks, and that there is no possibility that the addressee does not know.

However, the observation that *laa1* is used very often with words conveying certainty or obviousness does not correspond with Kwok's (1984) description. Kwok states that when suffixed onto statements, *laa1* has a 'lack of definiteness' (Kwok 1984:56), and may be reinforced by words like *dou2* meaning 'about' or 'approximately', or *waak6-ze2* meaning 'maybe' or 'perhaps'. An example used by Kwok is '*sei3 jyut3 dou2 laa1*', which she translates as 'around April'. She states that this 'shows the idea of something which is approximate and not definite' (Kwok 1984:56).

It seems, though, that Kwok (1984) has made the common mistake of confusing the meaning of *laa1* with the meaning of the utterance it is attached to. In a

sentence with don2 'about'/'approximately', or waak6-ze2 'maybe'/'perhaps', it seems logical and straightforward to say that the words 'don2' and 'waak6-ze2' convey indefiniteness and approximation. In Kwok's example 'sei3 jyut3 don2 laa1', which means 'four month about laa1', or 'around April', 'sei3 jyut3 don2' itself would still be translated into English as 'around April', without the presence of laa1. Kwok (1984:56) herself glosses 'don2' as 'about', 'approximately', and so any translation of 'sei3 jyut3 don2' would naturally be expected to include a meaning like that. Despite Kwok's intention to isolate a 'core' meaning for each particle, indefiniteness and approximation are not parts of the invariant meaning of laa1. This is supported by the real and naturally occurring examples above which convey certainty. Although sentences with 'about' or 'maybe' might seem different from previous examples where the speaker was very sure or certain about something, the proposed explication for laa1 is still valid, even for Kwok's example.

6.6 Example 6

Example 6 is similar to Examples 4 and 5, but uses *laa1* with *hou2 ming4-hin2* 'very clear'. This is a conversation between three people. One of these three people, Person A, owns a rabbit, which sharpened its teeth on a bicycle seat. Another speaker, Person B, believes that the rabbit is doing this because Person A is not taking care of it properly. This leads to a disagreement. Person C does not say much. The uses of *laa1* in this example can be explained using the proposed explication.

- (6) A. 'It was grinding its teeth. Like a carrot.'
 - B. 'Grinding its teeth? Your rabbit?'
 - A. 'The rabbit.'
 - B. Laa4 ming4-hin2 hou2 ziu3-gu3 dak.1 nei5 **PRT** clear you take-care ADV very m4 keoi5 hou2 *laa1*. Tou5-ngo6 aa3 keoi5. Prt it not good *laa1* hungry it

'Look, clearly you didn't take good care of it. It was hungry.'

A. 'No. This is their nature, to sharpen their teeth.'

- B. 'Then you should give—then you should give it normal things to grind its teeth on.'
- C. Yes.'
- A. 'Yes. That was my bicycle.'

B. <i>Hou2</i>	ming4-hin2	nei5	ziu3-gu3	dak1	keoi5
very	clear	you	take-care	ADV	it
<i>m</i> 4	gau3	hou2	<i>laa1</i> .		
not	enough	good	laa1		

'Clearly you didn't take good enough care of it.'

A. 'No. Very good.'

As Example 6 shows, despite the speaker's assumption that the addressee will know what he/she thinks (component (b): I think like this now: "you know what I think about this""), the other person disagrees. However, this does not mean that the speaker thought the addressee would disagree, and so does not require the explication to be changed. Component (b) indicates that the speaker believed what he/she was saying to be something the addressee would understand, but the explication in itself gives no expectation of what the addressee's response will be. As can be seen in this example, as well as in Example 7, what the speaker anticipates does not exclude the possibility of the other person doing something different. The explication is therefore still valid.

In Example 6, it needs to be furthermore remembered that although Person C does not contribute much to the conversation, Person B is speaking not only to Person A but also to this other person. The 'you' in the explication could refer to Person C, and the explication would also still be valid. It seems Person C does indeed know what Person B thinks, since Person C states his/her agreement. As the Corpus is currently only available in text form, it is impossible to tell whom Person B is really speaking to.

It may be interesting to explain the rejection of another component here. Initially, a component such as 'I want you to think the same' was considered for the explication. It is feasible that in Example 6, Person B wanted Person A to think that he/she had not taken good care of the rabbit, as it was hungry. This would have been more 'persuasive'. However, this component is questionable when we

see that Person B responds to Person A's 'no' and explanation that this is the nature of rabbits by then saying that Person A should give his/her rabbit something normal to sharpen its teeth with. In other words, after being challenged or corrected, Person B quickly changed his/her stance from believing the rabbit was underfed, to suggesting the rabbit was not given something appropriate to grind its teeth on. It seems that if *laa1* included a component like 'I want you to think the same', the speaker would not have given up on the idea of the rabbit being hungry so quickly or easily. Example 7, from a conversation about holidays and leave from work, is similar, and also supports the rejection of such a component.

6.7 Example 7

(7)A. Jyu4-gwo2 heoi3 jing1-gwok3, ngo5 seng4-jat6 if England Ι always go gok3-dak1. Zik1-hai6 au1-zau1 nei5 nei5 heoi3 feel meaning you Europe you go gang2-hai6 heoi3 heoi3 jat1 go3 jyut6 of-course one CLmonth go dai2 laa1. cheap/good value laa1

'If going to England, I always feel. I mean if going to Europe of course going—going for one month is more worth it.'

B. 'No. The worst thing is you need to find someone to act in your position.'

A. 'Oh yeah.'

The explication proposed can be applied to Example 7. The current component of I think like this now: "you know what I think about this" in (b) fits more accurately than the rejected component I want you to think the same'. In Example 7, Person A says (again with gang2-hai6 'of course') that if going to Europe, it is more worth it to stay for a month. Person B disagrees, and gives a reason for this, perhaps because Person B knows that Person A expects him/her to know what he/she thinks. As in Example 6, Person A then changes his/her view and agrees with Person B. Thus we can see that it is not unusual for a

speaker to change his/her stance when corrected or questioned. This provides further evidence that English definitions like 'commanding' or 'persuading' are inaccurate, as these words imply some sort of rigidity whereby the speaker will not change his/her position.

6.8 Example 8

The proposed explication for *laa1* can also be tested with Example 8, in which two speakers agree with each other. Person A is telling Person B about his/her recent trip to Guilin as part of a tour group. In one place, Person A was being pushed to buy Chinese medicine, and there were lots of people heavily promoting the products. Person A and B agree that there was no need to buy Chinese medicine there as they could not be sure of their trustworthiness, and there are good doctors in Hong Kong. In all three uses of *laa1* in Example 8, the proposed explication can be substituted.

(8) A. 'Mm, there were these kinds of things to buy. We—we didn't buy any.'

```
B. M6.
         M6.
                    M6.
                                 M6.
                                              Gang2-hai6
                                              of-course
  mm
         mm
                    mm
                                 mm
  m4-hou2
                    maai5 laa1
                                        sing4-joek6.
                          laa1
                                        medicine
  not-good
                    buy
  M4
                    mat1-je5
                                 lai4
                                        ge2.
             zi1
             know what
                                 come PRT
  not
```

'Mm. Mm. Mm. Of course it's not good to buy medicine. Don't know what it is.'

```
A. Gang2-hai6 laa1.
                    Hoeng1-gong2 gam3 hou2 ji-sang1,
  of-course laa1
                    Hong-Kong such
                                        good doctor
  m4-sai2
             laa1,
                    sai2
                           sai2
                                  mat1
                                         heoi3
  not-need
             laa1
                    need need
                                  what
                                         go
                                         Ci1-sin3,
  heoi3
             heoi3
                    go2-dou6
                                  aa3?
                                                       hai6
  go
                    there
                                  Prt
                                         crazy
             go
                                                       1S
  m4-hai6
                           aa3?
             gam2
                    gong2
  not-is
             this
                           PRT
                    say
```

'Of course. There are such good doctors in Hong Kong, what's the need

to go there? Crazy, wouldn't you say?'

B. 'So how many days were you there for? At the time?'

A. 'Five days.'

The interesting part of this excerpt from their conversation is how quickly the speakers transition into the next topic. When Person A asks 'Crazy, wouldn't you say?' this appears to be for effect or emphasis and is not a question that Person A expects to be answered seriously. This is signalled by various things including Person B's previous turn in which he/she has already made clear his/her stance, or perhaps both speakers' use of gang2-hai6, but also, it would seem, their recurrent use of laa1. At least partly through their use of laa1, both speakers have indicated to each other that they think the same thing. Mutual understanding and 'common ground establishment' (Luke 1990) have occurred. This is proven by the quick way that the topic is brought back to that of holidaying in Guilin. Person B almost 'abruptly', as an English speaker might see it, asks how many days Person A was there for. This does not sound 'abrupt' in Cantonese and Person A simply moves on and answers this question, which suggests that it sounded natural to him/her as well.

6.9 Example 9

The proposed explication can also explain the use of *laa1* in Example 9. Two people, A and B, are having a conversation when somebody, C, enters. It appears that Person C is some sort of IT worker who has come to fix a machine. Person C asks if they can enter the network, and when Person A and Person B reply that they could in the morning, Person C concludes that this must mean that the machine works. After the brief exchange, Person A and Person B indicate that Person C can now leave by thanking him and saying goodbye, with Person B using 'hou2 laa1', which means 'good/done/complete laa1'. Unfortunately, the data does not indicate explicitly whether Person C then left, but as he does not appear any more in the conversation after that, it is most likely that he did. Native speaker intuition and the surrounding utterances such as thanking, which can also be used in English to indicate the end of a conversation, also suggest it would have been unnatural for him to stay after that. Component (c) ('because I think

like this now, I can not say more') is valid in all the examples above, but can be seen particularly clearly in Example 9.

```
(9)
       A. 'Come in!'
       B. 'Come in!'
       A. 'Yes.'
       B. 'Oh, Mr. Lee.'
       C. I came over to help Jane, um, fix the machine. Can you enter the
          network here?'
       B. 'We could earlier, in the morning.'
       A. 'Yes, could enter in the morning, yes.'
       C. 'Oh, that means it works. Yes.'
       B. 'Yes. Haven't tried this afternoon.'
       A. O5.
                     M4-goi1
                                    nei5.
         oh
                     thank-you
                                   you
         'Oh. Thank you.'
       B. Hou2
                     laa1, m4-goi1
                                           saai3.
                     laa1
         good
                            thank-you
                                           all
         'Good, thanks a lot.'
       A. Baai1-baai3!
          bye-bye
         'Bye bye!'
```

To link Example 9 back to some previous studies of *laa1*, we can see that this fits some, but not all, of the descriptions. It does convey a sense of 'completion', as suggested by Meyer & Wempe (1947:287) and Cowles (1965:489), but does not imply 'urgency', as they also suggest. It does not correspond with Yau's (1965:39-68, 82-120) suggestion that *laa1* demands a verbal confirmation; nor does it indicate 'coaxing', 'persuading', 'reminding', or 'politely urging'. It is also in clear contrast with Kwok's (1984:55) description of 'lack of finality or completeness'.

The existing description of *laa1* most relevant to Example 9 can be found in Luke's section on 'pre-closings'. According to Luke (1990:102), *laa1* has a 'pervasive presence in pre-closing sequences', or near the ends of conversations.

Indeed, *laa1* is very common even at the ends of telephone conversations. This makes sense if we consider the proposed explication, because *laa1* has the meaning component 'I can not say more'. Luke (1990:109-110) explains that when a 'pre-closing favourable environment' has been constructed, preparatory work can be made towards conversational disengagement. One of the main ways to achieve this environment is to produce a 'contentless' signal, like '*hou2 laa1*' in Example 9. This 'records the speaker's assumption that mutual understanding and agreement obtains, but adds nothing new to what has been said so far in the conversation, and, in so doing, proposes to yield the turn' (Luke 1990:110).

The three requirements identified by Luke as necessary for 'pre-closing initiators' can be related to Example 9, and also closely correspond with the explication proposed. The first requirement is to express the assumption that whatever needed to be dealt with in the conversation has been dealt with to the satisfaction of both parties (Luke 1990:110). This is consistent with components (a) and (b). The second requirement is to signal that there are no further matters to raise (Luke 1990:110). This is consistent with component (c). Lastly, with the first two requirements satisfied, the next activity is closing (Luke 1990:110). These three requirements have all been fulfilled in Example 9, and furthermore, have parallels with the NSM explication proposed for laa1. Since there is understanding that the matter of the machine has been settled and that there are no more matters to be raised, nothing more needs to be said and Person C leaves. It should be pointed out, however, that although Luke (1990:110) labels utterances such as 'hou2 laa1' as 'contentless' and 'adding nothing new to what has been said so far in the conversation', it has been demonstrated in this study that these utterances are far from contentless.

7. Concluding Remarks

Cantonese utterance particles are very important for Cantonese speakers. The particles are used extremely frequently in conversation, and contribute something about a speaker's emotions or attitudes. Without understanding utterance particles, one cannot fully acquire semantic or communicative competence in Cantonese. However, Cantonese utterance particles have not been the focus of

much study, and the existing literature does not seem to be sufficiently helpful or reliable. *Laa1* is one of the most salient and frequently used utterance particles in Cantonese, but many descriptions of *laa1* have been vague, contradictory, or inaccurate. It has even been questioned whether Cantonese utterance particles contain meaning.

This paper has proposed one NSM explication to represent the 'core' or invariant meaning of *laa1*. Analysis of data from the Hong Kong Cantonese Corpus has revealed that *laa1* asserts a particular relationship or expectation between a speaker and addressee. The utterance attached to *laa1* does not seem to directly determine whether or not *laa1* is used. Rather, use of *laa1* indicates the speaker's assumption that the addressee knows what the speaker is thinking. Because of this, *laa1* often appears to be able to attach to any utterance, or to change meaning depending on context. This may help to explain why utterance particles like *laa1* are sometimes perceived as having no meaning.

The NSM method used in this study allows common pitfalls in defining terms to be avoided, while also providing useful advantages. It allows the proposed explication of *laa1* to be accessible to speakers of all languages, including Cantonese. The explication has been presented from the point of view of the speaker, and is able to be substituted for testing. It can be expected to encompass the particle's wide range of uses as found in the Corpus, and challenges perceptions that Cantonese utterance particles are 'empty words' with no meaning. It has also been demonstrated that it is more accurate and more descriptive than previous definitions of *laa1*.

There are still many questions we can ask about the semantics of Cantonese utterance particles. Semantic analyses will allow and encourage many future research opportunities. These analyses could be useful not only for linguists, but with some adaptation, potentially for Cantonese learners or non-Cantonese speakers in general. Unsurprisingly, most potential research areas will first require systematic investigation of individual particles. Once the meanings of individual utterance particles have been identified, many more questions can begin to be answered.

For example, particle 'clusters' and 'contractions' of more than one particle have often been claimed to have the combined meaning of the separate particles of which they are made up (Yau 1965:120; Kwok 1984:8-15; Wakefield 2011:13; Yip & Matthews 2000:131-132). However, this does not seem to have been rigorously tested. Moreover, this would be a futile exercise if the meanings of the particles which make up the clusters and contractions were not first accurately identified. Similarly, the question of whether there are 'families' of particles semantically related by common smaller meaningful units (such as the same initial or same tone) has been asked by Law (1990), Fung (2000), and Sybesma and Li (2007). However, their findings seem to contradict each other, and at least in some aspects, are ambiguous or even inaccurate. With more precise definitions for more particles, studies in these areas can be better carried out. Such studies may also reveal, for example, why not every combination of utterance particles is possible.

In addition, semantic analyses of *laa1* and of other utterance particles may eventually help to reveal clues about the culture or mindset of Cantonese speakers. Empirical evidence consistently confirms that lexical variation between languages, and key expressions like particles, reveal cultural differences between speech communities (e.g. Wierzbicka 1992; 1997; 2003). For example, it has been claimed that meanings contained in Singapore English particles (including Singapore English *la*) reveal information about the culture of Singapore English speakers (Besemeres & Wierzbicka 2003; Wong 2004; 2005). NSM is particularly useful in this regard as it allows ethnocentrism and cultural bias to be overcome.

An appreciation of differences in ways of thinking and interactional style can always improve understanding across cultures. It can help to reveal why Cantonese speakers talk the way they do. For example, it could suggest reasons why *laa1* is used so frequently by Cantonese speakers in ordinary conversation, when English speakers do not repeatedly express such meanings in ordinary English conversation. As mentioned, Cantonese speakers use Cantonese utterance particles even when communicating in English. The particles must therefore contain some meanings important to Cantonese speakers. Perhaps, as appears to be the case for Singapore English speakers (Besemeres & Wierzbicka 2003; Wong

2005), Cantonese speakers talk like part of a close-knit group, or 'insiders' in a close community.

It is beyond the scope of the present study, however, to include a comprehensive cultural analysis. Furthermore, in order to do so, it would be beneficial to look at more than one Cantonese utterance particle. Nonetheless, it should be acknowledged that differences are expected to exist between English speakers' and Cantonese speakers' culture and communicative styles, and that language-specific words such as Cantonese utterance particles may be particularly revealing in this respect.

References

- Besemeres M & A Wierzbicka 2003 'The meaning of the particle *lah* in Singapore English' *Pragmatics and Cognition* 11(1):3-38.
- Census and Statistics Department 2012 'Population aged 5 and over by usual language, 2001, 2006 and 2011 (A107)' viewed May 2012 http://www.census2011.gov.hk/en/main-table/A107.html Accessed May 2012.
- Census and Statistics Department 2012 'Proportion of population aged 5 and over able to speak selected languages/dialects, 2001, 2006 and 2011 (A111)' http://www.census2011.gov.hk/en/main-table/A111.html Accessed May 2012.
- Chan MKM 1999 'Sentence-final particles in Cantonese: a gender-linked survey and study' presented at Eleventh North American Conference on Chinese Linguistics, Harvard University.
- Chappell H 1991 'Strategies for the assertion of obviousness and disagreement in Mandarin: a semantic study of the modal particle me' Australian Journal of Linguistics 11(1):39-65.
- _____ 1994 'Mandarin semantic primitives' in C Goddard & A Wierzbicka (eds) Semantic and Lexical Universals: Theory and Empirical Findings Amsterdam/Philadelphia: John Benjamins. 109-147.
- ______ 2002 'The universal syntax of semantic primes in Mandarin Chinese' in C Goddard & A Wierzbicka (eds) *Meaning and Universal Grammar: Theory and Empirical Findings* Volume I Amsterdam/Philadelphia: John Benjamins. 243-322.
- Cowles RT 1965 The Cantonese Speaker's Dictionary Hong Kong: Hong Kong University Press.
- Fung RSY 2000 Final Particles in Standard Cantonese: Semantic Extension and Pragmatic Inference Unpublished PhD Thesis The Ohio State University.
- Gibbons J 1980 'A tentative framework for speech act description of the utterance particle in conversational Cantonese' *Linguistics* 18:763-775.
- Goddard C 1994 'The meaning of *lah*: understanding "emphasis" in Malay (Bahasa Melayu)' Oceanic Linguistics 33(1):145-164.

- 2002 'The search for the shared semantic core of all languages' in C Goddard & A Wierzbicka (eds) *Meaning and Universal Grammar: Theory and Empirical Findings* Volume I Amsterdam/Philadelphia: John Benjamins. 5-40.
- _____ (ed) 2008 Cross-Linguistic Semantics Amsterdam/Philadelphia: John Benjamins.
- _____ 2011 Semantic Analysis: A Practical Introduction Oxford: Oxford University Press.
- Goddard C & A Wierzbicka (eds) 1994 Semantic and Lexical Universals: Theory and Empirical Findings Amsterdam/Philadelphia: John Benjamins.
- _____ (eds) 2002a Meaning and Universal Grammar: Theory and Empirical Findings Volume I Amsterdam/Philadelphia: John Benjamins.
- _____ (eds) 2002b Meaning and Universal Grammar: Theory and Empirical Findings Volume II Amsterdam/Philadelphia: John Benjamins.
- Gupta AF 1992 'The pragmatic particles of Singapore colloquial English' *Journal of Pragmatics* 18:31-57.
- Ho WC 2003 The Use of Cantonese Sentence-Final Particles in ICQ Chats Unpublished Master of Arts Thesis The University of Hong Kong.
- Huang PP 1970 Cantonese Dictionary New Haven and London: Yale University Press.
- James G 2001 'Cantonese particles in Hong Kong students' English e-mails' English Today 17(03):9-16.
- Kwan-Terry A 1978 'The meaning and the source of the "la" and "what" particles in Singapore English' RELC Journal 9(2):22-36.
- Kwok H 1984 Sentence Particles in Cantonese Hong Kong: Centre of Asian Studies, University of Hong Kong.
- Lau S 1977 A Practical Cantonese-English Dictionary Hong Kong: The Government Printer.
- Law S 1990 The Syntax and Phonology of Cantonese Sentence-Final Particles Unpublished PhD Thesis Boston University.
- Linguistic Society of Hong Kong 2011 Cantonese Romanisation (*[Jut6 Ping3*, 1993) 粵拼 http://www.lshk.org/cantonese.php Accessed April 2011.
- Luke KK 1990 *Utterance Particles in Cantonese Conversation* Amsterdam/Philadelphia: John Benjamins.
- Matthews S & V Yip 1994 Cantonese: A Comprehensive Grammar London/New York: Routledge.
- Meyer BF & TF Wempe 1947 The Student's Cantonese-English Dictionary 3rd ed New York: Field Afar Press.
- O'Melia TA 1941 First Year Cantonese 2nd ed Hong Kong: Catholic Truth Society.
- Peeters B (ed) 2006 Semantic Primes and Universal Grammar: Empirical Evidence from the Romance Languages Amsterdam/Philadelphia: John Benjamins.
- Snow D 2004 Cantonese as Written Language: the Growth of a Written Chinese Vernacular Hong Kong: Hong Kong University Press.
- Sybesma R & B Li 2007 'The dissection and structural mapping of Cantonese sentence final particles' *Lingua* 117:1739-1783.
- Tong M, M Yell & C Goddard 1997 'Semantic primitives of time and space in Hong Kong Cantonese' Language Sciences 19(3):245-261.
- Travis CE 2005 Discourse Markers in Colombian Spanish: A Study in Polysemy Berlin/New York: Mouton de Gruyter.
- Wakefield JC 2011 The English Equivalents of Cantonese Sentence-Final Particles: A Contrastive Analysis Unpublished PhD Thesis The Hong Kong Polytechnic University.



Appendix

Table 1 below lists the semantic primes of English and Cantonese. The English exponents and the grouping of the primes have been taken from Goddard (2011:66). A full list of Cantonese exponents has never been published, although partial lists were given by Tong et al. (1997) and Wakefield (2011). A full list of Cantonese exponents has been proposed in Table 1 below. Those exponents marked with the symbol '* are the same as those in Wakefield (2011), while those marked with the symbol '† are the same as those in Tong et al. (1997). Cantonese exponents being newly proposed are unmarked. Note that exponents of semantic primes have been identified in Standard Mandarin (see Chappell 1994; 2002), although it should be remembered that Cantonese and Mandarin are mutually

unintelligible, differing not only in phonology but also in grammar and vocabulary.

English	Cantonese		
I	ngo5*	Substantives	
YOU	lei5*		
SOMEONE	jan4		
SOMETHING/THING	je5		
PEOPLE	jan4		
BODY	san1tai2		
KIND	zung2	Relational substantives	
PART	bou6fan6		
THIS	li1	Determiners	
THE SAME	tung4		
OTHER/ELSE	ling6ngoi6 ling6jat1		
ONE	jat1†	Quantifiers	
TWO	loeng5†		
MUCH/MANY	do1†		
SOME	di1		
ALL	dou1/cyun4bou6		
GOOD	hou2	Evaluators	
BAD	m4hou2		
BIG	daai6	Descriptors	
SMALL	sai3		
THINK	lam2*	Mental predicates	
KNOW	zi1dou3*		
WANT	soeng2		
FEEL	gok3dak1		
SEE	gin3dou2/tai2dou2		
HEAR	teng1dou2		
SAY	gong2/waa6*	Speech	
WORDS	zi6		
TRUE	zan1		
DO	zou6		
HAPPEN	faat3sang1*	movement, contact	
MOVE	juk1		
TOUCH	dim3		
BE (SOMEWHERE)	hai2	Location, existence,	
THERE IS	jau5†	possession,	
HAVE	jau5	specification	
BE	hai6		
LIVE	sang1 cyun4 / sang1 wut6	Life and death	
DIE	sei2		

WHEN/TIME	si4hau6†	Time
NOW	ji4gaa1†	
BEFORE	zi1cin4†	
AFTER	zi1hau6†	
A LONG TIME	noi6†	
A SHORT TIME	dyun2si4gaan3	
FOR SOME TIME	(jau5)jat1dyun6si4gaan3	
MOMENT	jat1zan6	
WHERE/PLACE	dou6†	Space
HERE	ni1dou6†	
ABOVE	seong6gou1†	
BELOW	haa6min6†	
FAR	jyun5†	
NEAR	kan6†	
SIDE	bin6†	
INSIDE	leoi5min6†	
NOT	<i>m</i> 4	Logical concepts
MAYBE	ho2lang4/waak6ze2	
CAN	ho2ji5	
BECAUSE	jan1wai6*	
IF	jyu4gwo2	
VERY	hou2	Intensifier,
MORE	do1	augmentor
LIKE~WAY	ci5/gam2joeng2*	Similarity

Table 1. Exponents of NSM semantic primes in English and Cantonese.

On conversational valence and the definition of interjections

Alan Reed Libert
University of Newcastle
alan.libert@newcastle.edu.au

Abstract. Interjections, like some other word classes, have proven difficult to define in a principled way, and therefore there has been disagreement about whether some words belong to this class. Lists of interjections in grammars sometimes include arguably disparate items, e.g. greeting terms, along with words such as oh and ah. There has also been dispute about the possibility or necessity for interjections to be in a syntactic relation to other components, that is, about their valence. In this paper I propose a definition of interjection which involves an extension of valence in the usual syntactic sense, introducing the notion of conversational valence to distinguish between interjections and words such as goodbye. The latter can only be felicitously used when there is an addressee present, as well as the speaker, thus having a conversational valence of 2, while interjections do not require an addressee, i.e. their conversational valence is 1. For example, if I stub my toe I can appropriately say ouch! in the absence of anyone else. Interjections are distinguished by being the only linguistic items with such a low conversational valence.

Keywords. interjections, word classes, pragmatics, valence, greetings

1. Introduction¹

In this paper I propose a notion of the word class of interjections based on a restrictive definition which removes many items often claimed to belong to this class. The difficulty in reaching a definition of *interjection* is shown by the title of a paper by Cuenca (2002), 'Defining the indefinable? Interjections'. Given this difficulty it is not surprising that, as Wharton (2000:176) says, 'There is [...] no general agreement on how interjections can be defined'.

We can see the challenges facing those who would characterize the set of interjections if we look at some (attempted) definitions:

interjection (*n*.) A term used in the traditional classification of parts of speech, referring to a class of words which are unproductive, do not enter into syntactic relationships with other classes, and whose function is purely emotive, e.g. *Yuk!*, *Strewth!*, *Blast!*, *Tut tut!* There is an unclear boundary between these items and other types of exclamation, where some referential meaning may be involved, and where there may be more than one word, e.g. *Excellent!*, *Lucky devil!*, *Cheers!*, *Well well!* Several alternative ways of analysing these items have been suggested, using such notions as minor sentence, formulaic language, etc. (Crystal 2003:239)

interjection Traditionally [used] of forms that express 'states of mind' and do not enter into specific syntactic relations with other words: e.g. *Wow, Yuk, Phew.* Some [...] are also idiophones, with phonetic features peculiar to them.

A part of speech in ancient Roman accounts of Latin. Extended by some recent writers to a larger and more indeterminate category of which the traditional interjections are only part. (Matthews 2007:198)

Interjection: A conventional lexical form which (commonly and) conventionally constitutes an utterance on its own, (typically) does not enter into construction with other word classes, is (usually) monomorphemic, and (generally) does not host inflectional or derivational morphemes. (Wilkins 1992:124)

¹ I thank two anonymous referees for their helpful comments.

By these criteria, exclamations such as *Good Lord!*, *Good heavens!*, *Christ!* or *Hell!* are not interjections, whereas those like *gee*, *wow*, *oops* or *ha* are. (Wierzbicka 2003:290)

One thing that may be noticed in most of these definitions is the fuzziness involved: Crystal speaks of an 'unclear boundary', Matthews of an 'indeterminate category' and Wilkins uses the words 'commonly', 'typically', etc. While the classification of words into parts of speech may sometimes present difficulties, ideally one would have a definition of a word class which at least in principle clearly delimits it. This problem arguably extends to Wierzbicka's definition as well, although less obviously: how do we know when something has 'a specifiable meaning' (what is 'a specifiable meaning'?), and what counts as a 'mental state or mental act'? Likewise, in Crystal's definition, how do we know whether something has a 'purely emotive' function? I am also dubious about Wierzbicka's requirement for the non-homophony of interjections, as homophony across other word classes is quite common in some languages, e.g. English run as a noun and a verb. Why should interjections be different in this respect? Such issues may lead one to think that there is a need for a substantially different conception of interjections.

Cuenca (2002) presents a well-stated discussion of interjections, and I shall now focus on it, although I disagree with aspects of it, as will be seen below. She provides a summary of thinking about this part of speech (p. 30):

There are four main hypotheses on the nature of interjections [...]:

- (i) They are not grammatical nor even linguistic items.
- (ii) They can be grouped together with other categories, namely adverbs or particles.
- (iii) They are sentences or sentence-equivalents.
- (iv) They constitute a separate grammatical category.

An optimal treatment of interjections should account for these hypotheses although they are apparently incompatible, and should also allow [one] to select one of them as the starting point for the analysis.

I would argue for her (iv), as I will attribute a distinct property to interjections, although this might depend on what she means by 'separate grammatical

category', and for (iii), and I do not think they are necessarily incompatible with each other. She seems to hold (iii), as shown by the following quotation (ibid.: 31):

Additionally, interjections and adverbs have a different distribution and syntactic behavior, given that interjections, unlike adverbs, are syntactically independent, that is, they can stand on their own as utterances. Therefore, they are not sentence constituents, but sentence equivalents.

Although being 'sentence-equivalents' may distinguish interjections from adverbs, if one uses this as the only criterion for interjections, one will end up with a class of words which contains a variety of dissimilar items, as e.g. both *hello* and *ouch* can 'stand on their own'. In fact, for many scholars interjections do include such a range of words, as we shall now see.

2. The 'heterogeneous' character of the class of interjections

With respect to word classes and interjections, Cuenca (2002:33) states:

We can conclude that the nature of interjections and their syntactic and discursive behavior is best understood if they are considered a peripheral class of the category 'sentence'. Their specific attributes (i.e., invariability, possibility of encoding subjective values and dependence on context) are shared with other word classes. Therefore they are too broad to imply the existence of a different word class. On the other hand, their overall behavior does not fit in any of the generally accepted word classes.

It is not clear to me what she means by 'broad', but if she means that they include a wide variety of members, that could be grounds for restricting the class (which I will advocate). We see this wide range mentioned in another quote from her (Cuenca 2002:34): 'Interjections are a heterogeneous class including onomatopoeic words, one word elements (ouch, oh, wow, oops ...), and phrasal elements (thank you, good heavens, for God's sake ...)'.

Other authors have also commented on the heterogeneous character of interjections, e.g. Wharton (2000:173):

According to various definitions in the literature, interjections are a fairly heterogeneous class of items. Examples in English *include wow, yuk, aha, ouch, oops, ah, oh, er, huh, eh, tut-tut (tsk-tsk), brrr, shh, ahem, psst,* and even, according to some, *bother, damn, (bloody) hell, shit* (etc.), *goodbye, yes, no, thanks, well.* I will assume for the sake of argument that many of the above items do form a class, but will end up suggesting interjections are very disparate and should not all be treated as contributing to communication in the same way.

Cruz (2009:242) says that the 'heterogeneity' of interjections 'prevents us from making generalisations over them'. In other words, interjections are such a varied set of items that one cannot say anything about the set as a whole. In such cases it might appear that such a group of items should not belong to a single class, as it is unlikely for there to be a natural class of items about which one cannot make any overall statements, i.e. when the items do not have anything significant in common.

One might consider some of the items cited in the quotations above not to be interjections; indeed Poggi (2009) excludes onomatopoeias from the class of interjections, as would I. As we shall see, I would not classify *thank you*, or *sorry* (which for Cuenca (p. 32) is also an interjection), as interjections; in my view they are quite different from e.g. *oh*. Cuenca (2002:34) quotes Givón (1984:84), who also asserts the lack of homogeneity of the set of interjections, 'It is not a unified category functionally, morphologically or syntactically and it is highly language specific'.

Cuenca (ibid.) states, 'These characteristics make it difficult to propose a unified and non-negative definition of interjections', but this is exactly what I shall do, by positing a narrow class of interjections, which might appear to be an obvious solution. There is no such heterogeneity with most other word classes, e.g. nouns. Adverbs seem to be heterogeneous as well, as some of them modify verbs, others adjectives and adverbs, and still others have scope over entire clauses; in fact Nilsen (1972:179) says, 'there seems to be a general consensus of opinion among grammarians [...] that the most heterogeneous, and the least understood of the traditional part-of-speech categories is, without question, the category of adverb'. I would disagree, since it seems to me that interjections, as often conceived of, are a more heterogeneous class (although it is difficult or impossible to measure this),

but nevertheless one certainly might wonder whether adverbs should be treated as a single part of speech. I am asking the same question about interjections.

3. A narrow notion of interjections

Consider the following remarks by Pinkster (1972/2006:38):

Adverbs are distinct from interjections. The latter do not only occur without a verb, but also do not need a verb (of emotion) to be understood. The expression of a particular emotion seems to be the very meaning of interjections [...] In this respect the Romans differed from Greek scholars, who did not recognize interjections as a class of their own. [...] We might say that adverbs have restricted sentence valence (that is, the ability to occur in a one-word-sentence), whereas interjections have sentence valence obligatorily.

Pinkster's main concern in this book was adverbs, not interjections, but, since the borderline between adverbs and interjections may not be entirely clear, he had to find some criterion which would separate interjections from adverbs, and that criterion involved 'sentence valence'. My conception of interjections was inspired by this passage, although I have taken up a different type of valence. The most common sense of (*syntactic*) valence (or valency) in linguistics has to do with the number of arguments that must occur with a particular item, e.g. a transitive verb has a valence of 2; Pinkster may not have been using it in this sense, but he made me think about valence in relation to interjections.

I would apply valence in a more general way, not only to the number of sentence components that must appear with an item, but also in a pragmatic/conversational sense to interlocutors, which I call *conversational valence*, defined as follows:

<u>Conversational Valence</u>: The conversational valence of a linguistic item (word, phrase or sentence) is the minimum number of participants who must be present in order for the utterance of it to be pragmatically well-formed.

This term has been used before, but in different senses, by Boisvert (1999), Hajek & Giles (2006) and Wirtz (2009).²

According to Trask (1993:144), an interjection is 'a lexical item or phrase which serves to express emotion and which typically fails to enter into any syntactic structures at all'. I would argue that it need not 'enter into any' conversational participant structure either (other than of course the person who utters it); hence it has a conversational valence of 1 (for the speaker). I base my definition of *interjection* on this point:

<u>Interjection</u>: A word is a member of the word class of interjections if and only if its conversational valence is 1 (with this single required participant being the speaker).

Given the fact that interjections then would have a single (and simple) defining property, which is unique to them, it seems plausible to consider them as members of one word class.

For example, I can stub my toe and then say *ouch!* without anyone else being present, or say *ah!* if I am impressed or surprised by something, again with no one else being there. This is not true of the vast majority of linguistic items, e.g. it is pragmatically odd to say *goodbye* if I am alone, or to utter most words, phrases, or sentences (unless I am talking to myself).

Boisvert (1999:72): 'I claim that the right generalization is one that makes use of a certain notion of privilege or importance of an utterance. Call such conversational privilege or importance "conversational valence".

Hajek & Giles (2006:81): 'For the "positive" and "negative" valence measures only, raters were instructed to regard the 0–6 scale in semantic differential terms, anchored by "very positive" and "very negative". These ratings were then combined to form a more reliable measure of conversational valence.'

Wirtz (2009:21-22): 'While there is significant evidence indicating that behavioral intention is a good predictor of behavior [...], it is not known whether the effect of conversation on perceived behavioral control would carry over to behavior. Finally, because the instructions included both positive and negative experiences associated with exercise, it is impossible to separate out the role that conversational valence may have played in the results. [...] future studies should consider valence of conversation. That is, are only positive conversations important or is the past information stored such that even negative conversations can have the unexpected effect of stronger perceived behavioral control?'

As can be seen, the senses of *conversational valence* in these authors are indeed quite unlike what I mean by it, as they have nothing whatsoever to do with the number of participants required to be present while something is being said.

² Below are quotations illustrating these other uses of *conversational valence*:

That is, with the exception of interjections, as I define them, all linguistic items have a conversational valence of at least 2, since they require a speaker (or writer) and a hearer (or reader). While some verbs have a syntactic valence of 3 (i.e. ditransitive verbs), it is unlikely that any items have a conversational valence of more than 2, with the possible exception of 2nd person plural words such as the German pronoun *ihr* 'you' (informal plural). One might say that it is pragmatically odd to use *ihr* when addressing one person (or to use its singular counterpart *du* when addressing more than one person) in somewhat the same way as it is odd to say *goodbye* when one is alone.

Given the fact that interjections can occur in the absence of other linguistic items, i.e. that they do not have to be syntactically connected to a word, phrase or sentence, their syntactic valence is 0. This syntactic valence is not a defining property of them, since there are other words which also have a syntactic valence of 0, e.g. greetings and arguably imperatives (depending on how one sees their covert subject, i.e. whether it should be counted when considering valence). While interjections have a syntactic valence of 0 and a conversational valence of 1, the latter is their crucial property. (It seems that the minimum possible conversational valence is 1, i.e. one will not find words with a conversational valence of 0, since words cannot arise without at least a speaker.)

Note that when I refer to *valence*, of either the syntactic or conversational type, I mean the number of items/participants that must be present, not those which can be present. Probably the majority of authors have thought that interjections cannot be syntactically linked to other items, a view strongly stated by Cooley (1845:70): 'The interjection being expressive of emotion only, is not confined to human language; and as it has nothing to do with the operations of the human intellect, is incapable of logical connection with other words in the construction of sentences.' However, Pinkster (1972/2006:141) says, 'what is less clear in Latin is whether interjections occur as constituents of larger expressions or not. Apparently, we find almost all case forms of noun phrases, notably accusative [...] and dative [...] in construction with interjections'. In any case, in my view what is important is that interjections do not have to be linked with other items (unlike e.g. conjunctions), not whether they can be so linked. From the conversational

point of view, interjections can be uttered when there is a second participant, but they do not have to be, and the latter fact is the more significant one.

My conception of interjections is admittedly a minority opinion, at least among modern linguists; for example, it is directly opposed to that of Elffers (2008:18), who says:

The traditional view of interjections, defended from Antiquity onwards, is that they express the speaker's feelings or emotions. It was incorporated in the earliest grammars of western European languages and continued in the grammars that followed.

As it turns out, however, this view adequately characterizes only a small subcategory of interjections. The main function of the majority of interjections is to make some appeal to the listener.

I would say that this 'small subcategory' makes up the only true interjections, and that the 'traditional view' is correct.

Let us now turn to some ideas that may go along with this narrow notion of interjections. There are various linguists for whom interjections are not (completely) linguistic items (e.g. Goffman (1981), whose term for 'exclamatory interjections' (p. 99) is 'response cries'). Possibly this is true of interjections in the narrow sense in which I define the class, but for a different reason than that/those which is/are sometimes given³—perhaps language must involve communication, and communication involves at least two participants.

In my definition of *interjection*, I disagree strongly with e.g. Elffers (2008:18), who says, 'In most cases interjections fulfil a variety of functions in which appeal to the listener is the central element', since for me the listener need not be present; interjections as I define them may be the only speaker-centred part of speech or type of utterance; admittedly this takes most putative interjections out of this class

³ Cram (2008:61) gives two grounds which have been behind the view of interjections as non-linguistic items: 'The first is that the interjection is inarticulate in the same way as animal calls are. The second is that the utterance of an interjection, in its paradigmatic form, is taken to be an involuntary act, in contrast to the conventionalised and arbitrary nature of language proper.'

and one might therefore argue that it would be better to take the words with a conversational valence of 1 out of the class of interjections and posit a new class for them, rather than positing a new class (or several new classes) for those supposed interjections that do necessarily involve a second participant. I would reject this move, since it seems to me that words such as *oh* and *ouch* are prototypical interjections, however one defines the class, while e.g. *goodbye*, if it is an interjection, is not a prototypical one.

This speaker-centered notion is anticipated by Jakobson (1960:354), as quoted by Elffers (ibid.:25): "The so-called EMOTIVE or "expressive" function, focused in the ADDRESSER, aims at a direct expression of the speaker's attitude toward what he is speaking about [...] The purely emotive stratum in language is presented by the interjections."

One might also say that the distinction between 'expressing' and 'communicating', as described by Poggi (2009:182), given below, may be getting at this notion of speaker-centered utterances, though Poggi would disagree with my definition of *interjection*:

an interjection differs from a sentence due to its, so to speak, 'communicative status'. If we take an interjection and the corresponding sentence—for instance 'ouch!' as against 'I am feeling pain'—both convey the same internal mental state, but the former simply 'expresses' it, while the latter 'describes' it, it 'communicates' it.

Her further (p. 183) remarks are along the same lines:

Noncommunicative expression, or more simply expression, as defined according to the etymological sense (Latin *ex-premere* = to push out), occurs when an Agent (not yet a Sender, strictly speaking!) feels some mental state and in order to give vent to it, but not in order to share it with someone else, produces a physical perceivable stimulus, which for an external observer can work as a signal in that it provides information, but which is produced by the Agent only to obtain relief from his internal state. If I smash a glass in anger, this is not necessarily aimed to communicate my anger to someone else; I may simply want to give vent to my emotion, to discharge the physiological arousal I feel. This is a case of expression but not communication, in that it is not aimed to have some Addressee know something, it is not even a social action, it may, even, not take another into account.

She says further (ibid.), now mentioning interjections: 'Interjections may, very rarely, be non-communicative at all, but more typically they are communicative in the weak sense.' This weak sense is when 'the Sender of the signal is not aware of his own goal of communicating' (ibid.). I am not certain what this means, but I would disagree that it is 'very rarely' that interjections are 'non-communicative'—it is not very rare for someone to curse when they are alone and something bad happens.

My notion of interjections being words with a conversational valence of 1 was arrived at independently, but Ameka (1992:109) puts forth a similar idea, saying, 'primary interjections do not have addressees, but formulae [e.g. *thank you*] have addressees.' However, he then (ibid.) makes things less clear (in my view) by stating, 'Interjections such as the conative and phatic ones may be directed at people, but they are not addressed to people'. I do not know what the difference is between being 'directed at' and being 'addressed to'. Ameka continues (::110):

Formulae on the other hand are addressed to specific people [...] Related to this difference is the observation made by Goffman (1981:97, 104) that linguistic activities involving interjections are not conversational encounters although they may be socially situated. Formulae, I think, are both socially and conversationally situated.

In any case, what is new in my approach, as far as I know, is the use of the same structural notion, valence, at both a syntactic and pragmatic level, i.e. stating a parallelism between syntactic requirements and pragmatic requirements, and then positing the lowest possible valence at both levels for interjections—a syntactic valence of 0 (no subject, arguments or complements need be connected with an interjection) and a conversational valence of 1 (no hearer need be present).

Another feature of interjections is the kind of meaning that they (do not) have; Wharton (2000:183) states that 'interjections do not contribute to the truth conditions of the utterances that contain them'. There are other linguistic items which have non-truth-conditional meaning, e.g. *but*, but we can say that interjections have only non-truth-conditional meaning, and unlike e.g. *good-bye*, which also has only non-truth-conditional meaning, they have a conversational valence of 1. Since they are the only kind of word which has this valence, characterizing interjections in terms of having only non-truth-conditional meaning

is not necessary. It does, however, lead to an interesting implicational statement: if an item has truth-conditional meaning, it must have a conversational valence of at least 2.

There is then the question that if words such as *goodbye* are not interjections, what are they? Jovanović (2004:19) says:

Certain authors in more recent books as Gramley & Pätzold (1992:125), for example, contend that interjections should include phrases and sentence[s] like *Good morning!* However, we are prone to believe here that utterances like these should form another segment of language which involves language formulae and stock phrases, which are themselves very close to interjections in the sense that they too can be exclaimed, but not necessarily so and should be considered as a different field in the domain of language use.

I would assert a somewhat similar view, that we need to posit a new part of speech, which should perhaps be called *formulae* (following Ameka 1992); its members will have no truth-conditional meaning but will have a conversational valence of 2 (making them different from most parts of speech, such as nouns and even conjunctions, which have truth-conditional meaning and a conversational valence of 2, and from interjections, which have no truth-conditional meaning and have a conversational valence of 1). This will accurately reflect the fact that greetings and words such as *please* are quite different in function and in nature from *ouch* and *oh*.

4. Conclusion

I shall conclude by again looking at the 'heterogeneous' character of interjections as this word class is often conceived of. If one examines definitions of *interjection* in grammars of various languages and dictionaries of linguistics, a dichotomy is sometimes evident—interjections do (at least) two quite different things. See, for example, (1), from a grammar of Latin, (2), from a grammar of Ottoman Turkish, and (3), from a Turkish dictionary of linguistics and grammar:

(1) Harkness (1864:141):

'Interjections are certain particles used as expressions of feeling or as mere marks of address.'

(2) Deny (1921:702):

'Nous distinguerons deux sortes de particules exclamatives ou interjections:

- 1° Les interjections interpellatives qui servent à attirer l'attention de l'interlocuteur pour l'appeler, l'interpeller, l'inciter à agir ou lui montrer un objet;
- 2° Les interjections affectives, de caractère subjectif, qui expriment les affections de l'âme (sensations ou sentiments).

Cette distinction n'est pas absolument rigoureuse: une interjection interpellative peut se nuancer d'une acception affective.'

('We shall distinguish two types of exclamatory particles or interjections:

- 1. Interpellative interjections, which serve to attract the attention of the interlocutor, to call him, question him, incite him to act, or to show him an object;
- 2. Affective interjections, of a subjective character, which express the feelings (sensations or sentiments) of the soul.

This distinction is not absolutely strict: an interpellative interjection can be nuanced with an affective sense.')

(3) Hengirmen (1999:378), definition of *ünlem* 'interjection':

'Sevinme, üzülme, kızma, korku, şaşkınlık gibi duyguları belirten, doğa seslerini yansıtan ve bir kimseyi çagırmak için kullanılan sözcük. Ünlemler genellikle şu bölümlere ayrılır:

A) Ünlem Olan Sözcükler (Ünlem Soylu Sözcükler)

Bu ünlemler anlamlarına göre ikiye ayrılır.

a) Bir kimseye seslenmeye, onu çağırmaya yarayan ünlemler:

Oradan çekilsene be! [...]

b) Sevinç, üzüntü, kızgınlık, korku, şaşkınlık gibi duyguları belirten ünlemler:

A, ne kadar güzel bir manzara! [...]

Ay, başım çok ağrıyor!'

('Word expressing feelings such as joy, worry, anger, fear, bewilderment, echoing natural sounds and being used to call someone. Interjections are generally divided into the following types:

A) Words Which Are [Originally] Interjections

These interjections are divided into two types according to their meanings.

a) Interjections serving to call out to someone, to call him:

Hey, get out of there! [...]

b) Interjections expressing feelings such as joy, distress, anger, fear, bewilderment:

Ah, what a beautiful view! [...]

Ouch, my head is hurting a lot!')

When we see this sort of dichotomy of functions, we might think that more than one part of speech is involved, one for each function. Interjections, as I have redefined them, have only one function (as 'expressions of feeling'); the function of 'marks of address' is undertaken by another class. Interjections are a homogeneous word class, clearly delimited by a sole criterion, possession of a conversational valence of 1. If we have this criterion we need not be concerned with difficulties in determining the function of a word; the function of interjections is connected with their conversational valence, but is not a criterion for defining them.

References

Ameka F 1992 'Interjections: the universal yet neglected part of speech' *Journal of Pragmatics* 18(2-3):101-118.

Boisvert DR 1999 Pragmatics and Semantics of Mixed Sentential Mood Sentences MA thesis, University of Florida.

Cooley A J 1845 The Pharmaceutical Latin Grammar London: R Groombridge & Sons.

Cram D 2008 'The exceptional interest of the interjection' Henry Sweet Society Bulletin 50:57-65.

Cruz MP 2009 'Might interjections encode concepts? More questions than answers' Lodz Papers in Pragmatics 5(2):241-270.

Crystal D 2003 A Dictionary of Linguistics and Phonetics (5th edition) Malden, MA & Oxford: Blackwell.

Cuenca MJ 2002 'Defining the indefinable? Interjections' Syntaxis 3:29-44.

Deny J 1921 Grammaire de la langue turque Paris: Éditions Ernest Leroux.

Elffers E 2008 'Interjections and the language functions debate' *Henry Sweet Society Bulletin* 50:17-29.

Givón T 1984 *Syntax: A Functional-Typological Introduction* Vol. 1 Amsterdam & Philadelphia: John Benjamins.

Goffman E 1981 Forms of Talk Oxford: Blackwell.

Gramley S & K Patzold 1992 A Survey of Modern English London & New York: Routledge.

Hajek C & H Giles 2006 'On communicating pride, crying in movies, and recruiting innocent bystanders' *Communication Research Reports* 23(2):77-84.

Harkness A 1864 A Latin Grammar for Schools and Colleges New York: D Appleton and Company.

Hengirmen M 1999 Dilbigisi ve Dilbilim Termileri Sözlüğü Ankara: Engin.

Jakobson R 1960 'Linguistics and poetics' in TA Sebeok (ed) *Style in Language* Cambridge, MA: MIT Press. Pp. 350-377.

Jovanović V.Ż 2004 'The form, position, and meaning of interjections in English' Facta Universitatis: Series Language and Literature 3(1):17-28.

Matthews PH 2007 The Concise Oxford Dictionary of Linguistics (2nd edition) Oxford: Oxford University Press.

Nilsen DLF 1972 English Adverbials The Hague: Mouton.

Pinkster H 1972/2006 On Latin Adverbs Amsterdam: Amsterdam University Press.

Poggi I 2009 'The language of interjections' in A Esposito *et al.* (eds) *Multimodal Signals* Berlin: Springer. Pp. 170-186.

Trask RL 1993 A Dictionary of Grammatical Terms in Linguistics London: Routledge.

Wharton T 2000 'Interjections, language and the "showing"/"saying" continuum' University College London Working Papers in Linguistics 12:173-215. Available at http://www.phon.ucl.ac.uk/home/PUB/WPL/00papers/wharton.pdf Accessed 28 July 2012.

Wierzbicka A 2003 Cross-Cultural Pragmatics (2nd edition) Berlin: Walter de Gruyter.

Wilkins DP 1992 'Interjections as deictics' Journal of Pragmatics 18:119-158.

Wirtz JG 2009 'Talking then walking: how premessage exposure conversation changes relations among theory of planned behavior variables' Paper presented at the annual meeting of the International Communication Association, Marriott, Chicago, IL. Available at http://citation.allacademic.com/meta/p_mla_apa_research_citation/3/0/0/9/7/pages300973/p300973-1.php Accessed 28 July 2012.

Non-referential actor indexing in Nehan

John Olstad University of Newcastle jtolstad@gmail.com

Abstract. Non-referential actor indexing is found in many languages in the form of 3PL impersonal constructions. In the sentence, "They don't drink root beer in Australia.", the actor they does not refer to any specific entity. In addition to 3PL impersonals, the Nehan language of northern Bougainville uses non-referential actor indexing for middle voice-like constructions, undergoer promotion, and—perhaps uniquely expands impersonal constructions using 3SG agreement to indicate that the actor of the verb either lacks sentience or has accidentally carried out an action. This paper describes the semantics of non-referential actor indexing constructions and their role in argument structure.

Keywords. impersonals, non-referential indexing, argument structure, Oceanic, semantics

1. Introduction

The Nehan [nehan] language (Oceanic; Northwest Solomonic) of northern Bougainville is spoken by approximately 6,500 speakers on Nissan island, an atoll 50km north of the mainland. There are two main dialects on the atoll, called Hape [hape] and Hapa [hapa] after their respective varying pronunciations of "how?". Another dialect of the language is spoken on the island immediately north-northwest of Nissan called Pinapir. Like virtually all languages of Bougainville, Nehan speakers can also be found living in Buka, the erstwhile provincial capital, and they also make up a transient community there.

Nehan is essentially a verb initial language, but it has been characterized as having TVX word order (Ross 1988) [Topic Verb X – verb dependents]. This non-canonical characterization is necessary in the first place because Nehan is a language for which, structurally speaking, the terms subject and object are not useful¹. That is to say, the order of constituents is in some cases determined only by pragmatic principles, and roles of constituents are understood via real world plausibility (further discussion in the next section). Actors and undergoers occur in NPs after the verb, but actors are coreferenced by number/exclusivity on a preverbal clitic, and undergoers are attached post-verbally in certain sentence types (discussed below). It is head-marking in the noun phrase for genitives and possessives (see Palmer & Brown 2007), but marks dependents of the verb.

In this paper I will describe non-referential actor indexing (henceforth NRAI) in Nehan as a rhetorical device used to derive various non-compositional meanings. In doing so, I will briefly describe Nehan argument structure and discourse as they relate to NRAI.

¹ This makes passivization difficult to talk about as well. I will refer to passives assuming that backgrounding of the logical verbal actor is akin to passivization. Traditional definitions of passive of course make use of transitivity, a notion which may not be useful in Nehan. In this sense, I use passive as a term of convenience throughout, but I also consider to what extent a passive-like construction might be in use in Nehan.

2. Argument structure

2.1 Nehan argument structure preliminaries

In order to understand NRAI, it is first necessary to introduce Nehan argument structure and syntax. Setting aside verbless clauses, virtually all clauses in Nehan contain a grammaticalized topic clause initially², and a verbal complex including a portmanteau verbal proclitic housing: a TAM morpheme and a person/number agreement morpheme. The verbal participants are expressed verb finally. The marking of grammatical roles on the verbal participants, and whether or not the verb contains an agreement enclitic, is dependent on clause type, discussed further in the next section. The structure of a basic clause is as follows:

(TOP) TAM-PERS/NUM.Agr=V X

The 'X' from the schema above can be any number of configurations including sentences with omitted logical objects and various combinations of verbal participants. In the next section, I will discuss two clause types that are differentiated by the form of post-verbal participants.

(1)
$$(ing-0)$$
 $k-u=$ $hiliu$ $ta-r$ $tinih$ (TOP-1SG) PST-1SG= discard CM-R canoe 'I left the canoe.'

It is possible to repeat the topic after the verb or to omit it entirely (indicated by parentheses in (2a)), but it is more common to find a topic either clause initial or verb final and not in both positions. Repeats of full NPs are likely to be pronouns as in (2b). In any case, pronominal topics have two forms corresponding to the two positions and NPs are marked differently as well.

² Although topic is a grammatical category in Nehan, clause initial pronouns and NPs may be and often are omitted.

- (2) a. (ing-o) k-u= hiliu (i-o) ta-r tinih (TOP-1SG) PST-1SG= discard (LCL-1SG) CM-R canoe 'I left the canoe.'
 - b. a kuah k-e= hiliu (i-on) ta-r tinih the woman PST-3SG= discard (LCL-3SG) CM-R canoe "The woman left the canoe."
 - c. k-e= hiliu i-r kuah ta-r tinih

 PST-3SG= discard LCL-R woman CM-R canoe

 "The woman left the canoe."

Grammatical roles are marked for what I refer to as local (LCL) and common (CM) argumenthood. This distinction has been identified by Ross (2007:232-233) for the lexicon of Proto-Oceanic, and I suspect it has been largely grammaticalized in Nehan items as primary and secondary in importance respectively in the spirit of POc. In Nehan, the markers *i*- (LCL) and *ta*- (CM) are used in marking the grammatical roles of verbal participants and in locative classes to denote this primary/secondary distinction. Nehan classifies locative nouns into culturally significant local entities and common entities.

- (3) a. t-i= la \underline{i} du!

 IRR-1PLI= go LCL.PREP lagoon

 'Let's go to the lagoon!'
 - b. t-i= la tar kuri!
 IRR-1PLI= go CM.PREP PN
 'Let's go to Kuri (restaurant/guesthouse in Buka)!'

c.
$$k-u=$$
 $wa-ate$ $i=o$ tan $John$ i du PST-1SG= CS-know LCL=1SG CM PN LCL.PREP lagoon 'I was the one who showed John to the lagoon.'

In (3a-b) above, i is the locative marker for motion towards a local entity, and ta is the marker for motion towards a common entity. (3c) demonstrates that it is possible to have i appear both as a verbal participant marker and a locative marker. It is possible that Nehan retained the LCL/CM categorical distinction in locative nouns, and that this was later extended to marking grammatical roles.

b.
$$i\eta g$$
- o k - a = $haluhu$ \underline{i} - o

TOP-1SG PST-3PL= hit LCL=1SG

'I was hit.'

The examples (4a-c) demonstrate that *i*- can mark either an actor or undergoer of a verb and *ta*- can mark either an undergoer or an oblique argument. It is for this reason that we cannot consider LCL/CM to be marking subjects and objects.

Ta-marking has been discussed previously in Ross (1988) as marking a topic/non-topic distinction. The following examples support this analysis³.

³ I am maintaining Ross's terminology in these examples: TOP=topic; NT=non-topic

(5) a. ing-o
$$k$$
- u = en i-o ta- r lo TOP-1SG PST-1SG= eat TOP-1SG NT-R dog 'I bit the dog.'

b.
$$ing-o$$
 $k-e=$ en $i-o$ $ta-r$ lo TOP-1SG pst-3SG= eat TOP-1SG NT-R dog 'The dog bit me.'

c.
$$a$$
 lo k - e = en $to \sim toguo$ the dog PST-3SG= eat NT.1SG 'The dog bit me.'

d. *
$$a$$
 lo k - e = en i - o
the dog PST-3SG= eat TOP-1SG
(intended: 'The dog bit me.')

My own analysis after collecting further field data differs from Ross only in that I have found *i*- to mark arguments in the same fashion as *ta*-, as opposed to marking the verb as transitive or a verbal argument as object, as *i* does so frequently in the Oceanic languages (Lynch *et al.*, 2002). And crucially, sentences may sometimes contain more than one i-marked argument:

In addition, as I discuss in the next section, the status of arguments marked by tais differentiated by the type of clause they appear in. For these reasons, I consider i-/ta- to be a distinction of primary and secondary arguments and call them local/common to reflect their hypothesized roots in POc.

2.2 Clause types

For clauses with at least two participants, the form that argument structure takes on is dependent on the choice of clause type. Clauses in Nehan can take on two types, the choice of which is determined by discourse appropriateness, which I call Type A and Type B. Type A clauses are used for referring to an event immediately after witnessing it. Morphological marking does not distinguish between logical objects and oblique phrases in Type A clauses. In Type B clauses, the main distinguishing structural characteristic is undergoer number agreement marking on the verb. This number agreement also distinguishes animacy in plurals. Type B clauses are used more restrictively than Type A clauses being reserved for situations that require more propositional specificity. (7a-b) below are examples of Type A clauses and (7c-d) are examples of Type B clauses.

- (7) a. k-u= bay totomua tar Kute PST-1SG= see CM.2SG PREP PN 'I saw you at Kute.'
 - b. gisin k-a= longor totoguoTOP.3PL PST-1SG= hear CM.1SG

 'They heard me.'
 - c. k-u= baya ia tar KutePST-1SG= see LCL.2SG PREP PN

 'I saw you at Kute.'
 - d. iŋg-o k-a= longoro=inTOP-1SG PST-1SG= see=SG.Agr'I was heard.'

In (7a, c), only the form of the undergoer changes. In (7b, d), the alternation is between a sentence with a ta-marked undergoer, and one where the undergoer is

indexed on the verb but otherwise omitted, which is characteristic of Type B clauses.

Type A

Type A clauses take the following basic structure:

Verbal participants in Type A clauses are divided between *i* and *ta* as indicated below:

LCL	СМ
i = [TOP]	ta = [Obj, Obl]

Table 1.LCL/CM alignment in Type A clauses.

In addition to use in depicting the immediate past, Type A clauses are found in hypothetical descriptions and descriptions of ongoing and future events. As mentioned above, there is no morphological differentiation between logical objects and obliques.

- (8) a. k-e= haluh i-r kuah ta-r lo ta-r walih

 PST-3SG= hit LCL-R woman CM-R dog CM-R paddle

 'The woman hit the dog with the paddle.'
 - b. k-iŋ= her ta-r buk tasir keketik

 PST-1PLE= give CM-R book CM.PLANIM child

 'We gave the kids a book.'

In (8b), what could be expressed as a three-place predicate in some languages is not in Nehan. Taking the illustration one step further, the *ta*-marked participants in (9) can be rearranged while retaining the same propositional truth conditions. Plausibility determines the propositional content and intonational prosody is used where further clarification is necessary.

(9) k-e= haluh i-r kuah ta-r ball ta-r box ta-r walih

PST-3SG= hit LCL-R woman CM-R ball CM-R box CM-R paddle

'The woman hit the ball into the box with the paddle.'

Type B clauses differentiate undergoers and obliques by indexing the undergoer by number agreement on a verbal enclitic. In (10a), 'a bot' is the topic and undergoer but not the actor, which is, in this case, an anonymous 3PL. (10b) shows that the boat can appear post-verbally as well. The actor of the verb *break* is not expressed apart from 3PL actor agreement on the proclitic.

(10) a. a bot k-a= tapolak=in ta=non the boat PST-3PL= break=3SG CM.3SG 'The boat was broken because of him.'

b. *k-a*= *tapolak*=*in a bot ta*=*non*PST-3PL= break=3SG the boat CM.3SG

"The boat was broken because of him."

A further dimension of animacy is indicated by two forms for plurals. Obliques are *ta*-marked. This information is displayed again in the tables below:

Type B

Type B clauses take on the following structure:

(TOPIC) TAM-ACT.Agr=V=UND.Agr LCL

LCL	СМ
i = [ACT, UND]	ta = [Obl]

Table 2. LCL/CM alignment in Type B clauses.

sg	=in
pl.anim	=is
pl.inam	=ig

Table 3. Undergoer agreement forms.

Type B clauses are only found in reporting the specifics of past events, particularly where establishing actor and undergoer is important or where there is an unexpected or vague relationship between referents⁴. As such, middle voice expressions employ Type B clauses as well.

Middle voice constructions represent a situation where semantic roles and transitivity become less than straightforward. In the English sentence, "I failed.", it is unclear as to the semantic role of the subject; the actor of the verb *fail* is in fact not specified. In Nehan, the solution to this sort of vagueness is to demote the actor to an unspecified 3rd person. The range of meanings produced via this strategy is the topic of the next section.

⁴ Politeness may also be a factor, but that is not clear to me yet.

It is perhaps useful to refer to Type A clauses as unmarked, whereas Type B clauses are marked in that Type A clauses are used under default pragmatic circumstances.

3. Semantics of NRAI constructions

Number/person indexing on the proclitic is used rhetorically to derive various meanings by indexing non-referential 3SG and 3PL actors. I call these non-referrers (N-Rs). Person/number marking usually agrees with the LCL verbal argument and always with the logical actor. In the case of N-Rs, there is no agreement with LCL and this is used to derive a number of meanings. In (12a), the topic and undergoer of hitting is expressed as a preverbal topic pronoun *ingon*, "he/she/it", and indexed postverbally as a 3SG enclitic. The 3PL on the proclitic is non-referring, which would usually express undergoer promotion. Additionally, a 3PL N-R indicates that the actor is a sentient being capable of purposefully committing the action.

In (12b), the sentence is the same except for the N-R being indexed with 3SG to denote that the action was not carried out on purpose, and that there may be no actor, implied or otherwise, because the undergoer may, for example, have been struck by a fresh falling coconut. As shown in (12a-b) N-Rs are always would-be

3rd person indexes, 3SG and 3PL are used to derive different specific meanings as discussed further below for 3PL and 3SG N-Rs.

3.1 3SG N-Rs

3SG N-Rs always convey that an action was committed unintentionally. This could either be because there is no logical actor to refer to other than the forces of gravity as implied by (13a), or because the actor accidentally committed the action as in (13b).

Sentences that contain volitionless verbs whose actors and undergoers are one in the same are always expressed using 3SG N-Rs, which fits the analysis that 3SG N-Rs are used to express unintetionality. Verbs of non-transitive sinking, losing one's way, going adrift and others are thus expressed this way.

(14) a.
$$k$$
- e = $bele$ = is iem

PST-3SG= float=UND.PLANIM 1PLE

'We went adrift.'

In English, verbs like *shave* and *wash* usually appear without the undergoer of the action when the action is performed by the speaker on the speaker him/herself. In sentences like "I shaved" or "I bathed", the logical is object is recovered by pragmatic convention. So unlike examples in 14 above, verbs of shaving one's self contain a clear actor. Nehan uses a reflexive marker to express this:

A common connotation here is that the action taken place was caused by carelessness of the LCL argument as in (14b) above. It is also possible to find coordinating clauses with the same topic having different types of N-Rs as in (16).

(16) ing-o k-<u>e</u>= wa-labir katongo io, kar <u>a</u> tupara io

TOP-1SG PST-3SG= CS-be.careless myself 1SG, CNJ RL.3PL catch1SG

'I got careless on myself and was caught.'

In this example, the speaker expresses a sort of get-passive using 3SG index and then an impersonal passive using 3PL in the conjunct clause. 3PL N-Rs will be discussed in the next section.

3.2 3PL N-Rs

NRAI constructions using 3PL N-Rs appear much more frequently cross-linguistically compared to 3SG N-Rs as impersonal constructions, which may only occur in Nehan. In Nehan, 3PL N-Rs usually refer to a vaguely defined 3rd person entity, the actual referent of which could easily be singular or plural. The reading is usually impersonal passive (17a-b) but impersonals (17c) and passives of a sort (17d) are also possible.

- (17) a. ing-on k-a= longoro=in

 TOP-3SG PST-3PL= hear=3SG

 'He was heard.' (Lit. He, They heard him.)
 - b. ing-o k-a= pohas nar 1982

 TOP-1SG PST-3PL= born/birth PREP 1982

 'I was born in 1982.' (Lit. Me, they birthed in 1982.)
 - c. ahik mat-a= la kep tar bot manas not NEG-3PL= go with CM-R boat now 'They don't go by boat now (these days).'
 - d. ing-o k-e= haluh=in i-o i-r palau

 TOP-1SG PST-3SG= hit=UND.SG LCL-1SG LCL-R stone
 'I got hit by a stone.'

4. Non-referential actor indexing and similar constructions in other languages

Non-referential indexing is perhaps most common in other languages in impersonal constructions. The anonymous 3PL index is quite common in impersonals as in the English and Polish sentences below.

- (18) English
 - 'They don't know who shot him.'
 - 'They don't let you do that anymore.'
 - 'They don't make 'em like they used to.'
- (19) Polish (Siewierska, 2010:74):
 - W niedzielę nie przynoszą POczty
 - on Sunday not bring:3PL mail
 - '(There is) no mail on Sundays.' ('They don't bring mail on Sundays.')

Kaqchikel is a Meso-American language that uses NRAI in much the same way as Nehan but can be shown to be in the process of developing a new passive from 3PL N-Rs.

- (20) Kaqchikel (Broadwell, 2011)
 - a. *x-u-pax-ij* ri achin ri b'ojoy

 COM-3SGE-break-TR the man the pot

 'The man broke the pot.'
 - b. *ri b'ojoy x-ki-pax-ij r-oma' rija'*the pot COM-**3PLE**-break-TR 3SGE-by him
 'The pot was broken by him.'

Broadwell glosses -ki- as PASS as per his analysis, but I want to focus on the fact that -ki- is derived from a 3PL morpheme.

Givón (1976) gives a diachronic reanalysis scenario from 3PL to passive from Kimbundu:

- (21) Kimbundu (Givón, 1976)
 - a. a- mono Nzua

 3PL- saw Nzua

 'They saw Nzua.'
 - b. Nzua, a- mu- mono
 Nzua 3PL- 3SG- saw
 'Nzua, they saw him.'
 - c. Nzua a- mu- mono kwa mem

 Nzua pass- 3SG saw by me

 'Nzua, was seen by me.'

The pattern above suggests that in Kimbundu, 3PL became simply a passive marker when an oblique phrase containing the actor was allowed. Minus the reanalysis, the same pattern can be shown in Nehan:

(22) Nehan

- a. gisin k-a= tapolak ta-r bot TOP.3PL PST-3PL= break CM-R boat 'They broke the boat.'
- b. a bot k-a= tapolak=in
 the boat PST-3PL= break=3SG
 "The boat was broken."
- c. a bot k-a= tapolak=in ta=non
 the boat PST-3PL= break=3SG CM=3SG
 'The boat was broken **because** of him.'

In (22) the pattern suggested by Givón is not borne out. k-a= in (22c) cannot be considered a passive marker, because a passive is not formed here in the canonical sense. In canonical passives (e.g. Dixon & Aikhenvald, 2000), the actor is demoted to oblique, and the undergoer is promoted to subject. Here, a sentence containing a would-be demoted actor as an oblique must be interpreted as oblique to the action, and therefore not the actor of the verb. If obliques like ta=non began to be understood as the actor, a 3PL-to-passive situation could potentially arise.

However, considering a pair of active/passive sentences such as (23a-b), the potential for Givón's reanalysis scenario is complicated.

(23) a. a kuah e=hikutal ta-r su the woman 3SG= wear CM-R shoe 'The woman wears the shoe.'

b.
$$a \, su$$
 $e = hikutal = in$ $i - r$ $kuah$ the shoe $3SG = wear = 3SG$ LCL-R woman "The shoe, the woman wears it."

(23a) is a Type A active sentence. (23b) may seem to be a straightforward active sentence with *a su* topicalized perhaps, but it is significant that a Type B structure is required and the LCL-marked argument *kuah* is not co-referential with the topic. The unnatural relationship (e.g. Silverstein, 1976)—the shoe is made more prominent than the human—is what draws out the Type B clause. Examples like (23b) are not easy to find, but what is crucial for the 3PL-to-passive discussion is that a 3PL is not used, instead 3SG is used to refer to the woman. So if a proper passive is emerging in Nehan it does not appear to be following the path of 3PL-to-passive.

Such is not the case with (23c), where 3PL does in fact refer to the singular actor. However, I find this example to involve noun incorporation of the actor.

5. Discussion

Non-referential actor-indexing is a process used to express propositions where the actor role is, in some way, less than fully defined. In Nehan, a special clause type—which I have called Type B—with an alternation in the VP is preferred in such scenarios. Generally speaking in language, it is the situation with impersonals, middles, and passives that some kind of special clause or valency changing operation is employed. Many languages use non-referring 3PLs to form impersonals, but Nehan may be unique in its use of 3SG to denote non-sentience of the anonymous 3rd person actor. The other functions of 3SG N-Rs in expressing unintentionality and middles may be unique as well.

Like many other Oceanic languages, Nehan has no canonical passive construction. Nehan achieves the functional equivalence of passivization in undergoer foregrounding via the use of non-referring 3PLs. Givón (1976) has argued that impersonals using 3PLs are a source of passives. Givón's reanalysis scenario seems possible in Nehan, however in Nehan 3SG plays another role not considered and 3PLs are not used in the limited passive examples. As to the question of whether 3PL impersonals will ever reanalyze to passives, Siewierzka (2010:104) suggests:

3PL IMPs which are essentially used in generic contexts and/or are restricted to speech act verbs are not promising inputs to reanalysis. Reanalysis requires that 3PL IMPs be used in episodic contexts and with different types of agents, among them individual and specific ones. In other words, reanalysis is predicated on high grammaticalization of the 3PL IMP construction itself.

The facts of Nehan fit this description, 3PL NRAI constructions are not restricted to certain verbs or generic contexts, but reanalysis to passive has not occurred.

Nehan is a language for which transitivity is an elusive notion. It has a grammatical role alignment that changes based on discourse considerations. Verbal participants are frequently omitted and recovered via agreement sometimes, but mainly through pragmatic principles. In order to express more specific scenarios in the distant past when talking to the police or telling a story for which accurate portrayal of the relationship between participants is especially important, Nehan alters argument structure. Explicitness in grammatical relations is not always necessary to achieve communicative adequacy. Nehan is a language that shifts to accommodate such situations. It is interesting that it uses (non-) agreement—a necessarily redundant process—in its existing clause structure to derive more meanings and voice constructions.

References

Broadwell A 2011 'A new passive in Kaqchikel' Paper read at Meso-American parasession to International Conference on Historical Linguistics 2011 Osaka, Japan.

- Dixon RM & AY Aikhenvald 2000 'Introduction' in RM Dixon, MW Riebert & AY Aikhenvald (eds) *Changing Valency* Cambridge: Cambridge University Press. Pp. 1-29.
- Givón T 1976 'Topic, pronoun and grammatical agreement' in C Li (ed) Subject and Topic New York: Academic Press. Pp. 151-188.
- Lynch J, M Ross & T Crowley 2002 The Oceanic Languages Richmond, Surrey: Curzon Press.
- Palmer B & Dunstan B 2007 'Heads in Oceanic indirect possession' Oceanic Linguistics 46(1):200-209.
- Ross M 1982 'The development of the verb phrase in the Oceanic languages of- the Bougainville region' in A Halim, L Carrington & S.A. Wurm (eds) *Papers from the Third International Conference on Austronesian Linguistics. 1: Currents in Oceanic* Canberra Pacific Linguistics, C74:1-57.
- 2007 'Talking about space: terms of location and direction' in M Ross, Pawley & Osmond (eds) The Lexicon of Proto Oceanic: The culture and environment of ancestral Oceanic society 2: The physical world Canberra: Pacific Linguistics. Pp 221-284.
- Siewierska A 2008 'Ways of impersonalizing: pronominal vs verbal strategies' in MA Gómez-González, L Mackenzie & EM Gonzáles Álvarez (eds) *Current Trends in Contrastive Linguistics* Amsterdam: John Benjamins. Pp. 3-26.
- 2010 'From 3pl-to passive: incipient, emergent and established passives' *Diachronica* 27(3):73-109.
- Silverstein M 1976 'Hierarchy of features and ergativity' in R.M.W. Dixon (ed) *Grammatical Categories in Australian Languages* Canberra: Australian Institute of Aboriginal Studies. Pp. 112-171.

Abbreviations

1sg	1st person singular	PASS	Passive
1PLE	1st person plural exclusive	PERS	Person
2sg	2nd person singular	PLANIM	Plural animate
3SG	3rd person singular	PLINAM	Plural inanimate
3PL	3rd person plural	PREP	Preposition
ACT	Actor	PST	Past tense
AGR	Agreement	R	Ligature
COM	Comitative	RCP	Reciprocal
CM	Common	SG	Singular
CS	Causative	TAM	Tense/aspect/mood
LCL	Local	TOP	Topic
NUM	Number	TR	Transitive
		UND	Undergoer

Non-finite complementation in French L2: A learner corpus approach

Hugues Peters
The University of New South Wales, School of International Studies, Sydney
h.peters@unsw.edu.au

Abstract. The Complementizer Phrase (CP) is mainly unexplored territory in L2 French acquisition studies (Herschensohn 2007:128). This study aims at partially filling this gap by exploring the structure of non-finite complementation using data from a longitudinal oral learner corpus of 10 Jamaican learners of French (Peters 2005, 2006). It specifically explores the realization of the Complementizer (COMP) functional category, and analyses the structure of the nonfinite embedded clauses with control and raising structures and embedded interrogative. The influence of the native languages and of the French input on non-target uses will be evaluated. The present study, therefore, answers White's (2003:36) call "to probe quite intricate properties of the interlanguage representation, in order to understand the nature of the grammar that the learner creates to account for the L2." Furthermore, this presentation explores a methodological interface (Rankin 2009) between the framework of the Principle and Parameter framework, and the Minimalist Program (Chomsky 1995, 1999) as applied to SLA research (Lardière 1998, 2000, 2009a, b) and the methods of learner corpus linguistics (Granger et al. 2000). The corpus approach, although unlikely to answer all relevant question of structure when crucial data is missing in naturally occurring data, will prove useful in clarifying the issues and delineate further areas of investigation.

Keywords. acquisition of L2 French, control, embedded interrogatives, non-finite complementation, raising

ANU Research Repository – http://hdl.handle.net/1885/9404

Proceedings of the 42nd Australian Linguistic Society Conference – 2011

1. Introduction

This study analyses instances of non-finite complementation in a longitudinal corpus of oral productions by ten Jamaican adult learners of French as a foreign language. The goal is to describe the grammar of this structure created by these learners. Drawing on the syntax of non-finite complementizers proposed in Kayne (1981) (see also Jones (1996), Rowlett (2007), for more recent approaches), I focus specifically on the distinction between control and raising predicates and on the expression of embedded infinitival interrogatives. This study therefore uses a corpus approach to investigate a specific issue of morpho-syntax (Granger *et al.* 2000, MacWhinney 2000) and is informed by a comparative analysis of the respective grammars of the native (L1: Jamaican English and Jamaican Creole) and target (L2: Standard French) languages of these learners, within the Principle and Parameters framework, and the Minimalist Program (Chomsky 1995, 1999). It exploits an interface between the method of corpus linguistics and the theory of Universal Grammar (UG) in second language acquisition (SLA) (Rankin 2009).

Assuming, as is customary, that the native L1 grammar of the learners and their approximation of the L2 grammar play a crucial role in determining the structure of the interlanguage (IL), this study adopts a contrastive analysis of the structure of non-finite complementation in English and French, and makes hypothesis on how the structure is manifested in the IL on the basis of this comparison (Haegeman 1992). However, this approach also takes seriously the hypothesis that IL is a UG constrained system in its own right, and might therefore have systematic characteristics that are not reducible to the native or to the target languages.

By providing a study of the realization of a precise morpho-syntactic category, the complementizer phrase (CP), this study concurs with the assessment expressed in White: "it seems clear that we (...) are now probing quite intricate properties of the interlanguage representation, in order to understand the nature of the grammar that the learner creates to account for the L2" (2003, 36) and, by

¹ I thank the audience at the Ling@pplied Seminar, November 17, 2011 at UNSW, especially Mengistu Amberber, Debbra Aarons, Alexis Tabensky, James Lee, Aniko Hatoss, and Peter Collins, and at the ALS 2011 congress, December 1-4, 2011, especially Bert Peeters, as well as Barbara Bullock and two anonymous reviewers for their comments and questions. All remaining errors are mine.

focussing on the syntax of CP in L2 French, this study addresses a gap in the research identified in Herschensohn: "As for the CP realm, it is mainly unexplored territory in L2 French" (2007, 128). While there have been studies on the acquisition of properties associated with the extended CP, such as interrogation or relativisation (Myles 1996, Hawkins 1989, Prévost 2009), no specific study is available on the constraints operating on the realization of the head of the non-finite CP itself in L2 French.

The choice of the phonetic realization of the embedded non-finite COMP ('à', 'de', or a phonetically empty variant), and the choice between finite and non-finite object complementation, are well-known difficulties for Anglophone learners of French L2, one of those so-called "unteachables" (Cox 1983). It is characterized by many idiosyncrasies: in some cases several COMPs are allowed with a single matrix verb: 'commencer à/de faire quelque chose' (to begin to do something), etc.; in other cases the choice of COMP is modified by a change in the thematic grid: active vs. passive: 'forcer quelqu'un à faire quelque chose' vs. 'être forcé de faire quelque chose' (to force someone 'à' to do something vs. to be forced 'de' to do something), or intransitive vs. transitive: 'décider de faire quelque chose' vs. 'décider quelqu'un à faire quelque chose' (to decide 'de' to do something vs. to persuade someone 'à' to do something), etc.; additionally, diachronic variation can occur: 'espérer _ faire quelque chose' vs. 'espérer de faire quelque chose' (to hope ('de') to do something), the latter marked as archaic / literary, etc. A clarification of the issue has therefore potential pedagogical import for L2 teaching practices.

This issue has been treated in various theoretical frameworks: Delattre (1964) provides a useful typology of infinitival constructions on the basis of their superficial distribution from a structuralist point of view; Cox (1983) develops an aspectual account of the choice between 'de' and 'a' to help learners grasp the difference between the two COMPs; in a cognitive linguistics approach, Achard (2000) associates different types of finite and non-finite complementation strategies to subtle differences of conceptualization (using the notion of 'perspective'); and finally, Gross (1968) provides the most detailed description of non-finite structures and of the transformations that can be applied to these structures. In contrast to previous linguistically motivated studies focussing on the target L2, however, the present study starts from an analysis of the actual

productions of second language learners. Furthermore, set within a UG approach to language acquisition, it does not rely on apparent word order similarities, but strives at discovering underlying structural and hierarchical convergences in order to describe the grammar the learners attribute to the target language. I will place more emphasis on the realization of the COMP category itself, than on the phonetic form attributed to that category. Finally, focusing on the task of determining the underlying structural specification, I will leave aside issues of meaning in this paper, although I recognize that the meaning issue is essential for communicative approaches to second language teaching.

In section 2, I briefly present the learner corpus used in this study; in section 3, outline the framework of SLA adopted; in section 4, present a brief overview of the syntax of non-finite complementation in French as compared to English, and add some remarks on Jamaican Creole; in sections 5-6, analyse and discuss learner corpus data to determine the structure of CP in their IL grammar, identify in the French input the possible source of the data observed in learners' production, and evaluate the validity of the method, and finally I draw conclusions, and outline possible avenues for further research.

2. Description of the French learner corpus

My learner corpus is composed of semi-guided conversations with ten Jamaican learners of French over a four semester period at the University of the West Indies (UWI), Mona (Peters 2005, 2006). The learners were studying French within the framework of their B.A. in a purely classroom instructed setting, none having spent any significant period of time in a French speaking country. These learners were receiving French language instruction courses (as well as French studies courses taught in English on French civilisation, linguistics and literature) at UWI. The native languages of these learners are Jamaican Creole and Jamaican English. Each learner was recorded individually during six or seven interviews from semester 2 of year 1 (Intermediate level) in April 2003 to semester 1 of year 3 (Advanced level) in November 2004. It is therefore an oral and longitudinal corpus of learners of French in an instructed environment.

To preserve anonymity, each learner has been attributed a code: "L" followed by a two-digit number: L08 – L12 – L14 – L16 – L17 – L18 – L20 – L31 – L33 – L38.² The learners had varied proficiency in French as some had previously studied the language at high school up to four years (L17, L18, L38) or up to six years (L14, L20) while others had studied the language through intensive one-year tracks at the University level (L08, L12, L16), or in a private establishment (L33), or a mix of both high school and private school (L31).

Each utterance produced by the learners has been transcribed on a main tier following the CHILDES transcription and encoding protocol (MacWhinney 2000) and each learner's utterance has been morphologically decomposed on a separate morphological tier (%mor) to allow for deeper analysis. In total, 28,798 words (tokens) of learners' speech have been encoded to this date (excluding repetitions, reformulations in the count).³

3. Overview of the UG model of second language acquisition

There is some debate as to the extent of access to Universal Grammar (UG) enjoyed by adult learners (White 2003), but UG models generally assume that, at the initial stage of acquiring a second language, all parameters are set to the value of the learners' L1. Within this research, I adopt the 'Full Transfer Full Access' model (Schwartz & Sprouse 1996, 2007). This model assumes that learners of a foreign language have full access to UG, and that this faculty helps learners restrict the range of possible grammars they create on the basis of the input they are exposed to. However, the task of adult second language learners, often characterized by incomplete acquisition and optionality, is rendered more difficult than for acquisition of the first language by the fact that a particular association between packages of formal (grammatical) features and lexical items has already been parameterized in their native tongue. The selection of new features that

² The gap in numbering is due to the fact that some learners not included here were part of a pilot group, that other learners didn't continue the full program of study, were not recorded over a four semester period, and therefore are not part of this longitudinal study.

³ Transcription and encoding have been realized by the author: the transcription has been checked several times by the author over a five year period, and finally checked thoroughly by research assistants in 2010 thanks to a grant from the Faculty of Arts and Social Sciences, UNSW.

might not be present in their L1, or the particular reassembly of features in functional categories and their phonetic realization in specific vocabulary items, characteristic of a second language (Lardière 1998, 2000, 2009a, b) is a difficult task for adult learners, and therefore acquisition will be influenced by features of their native language. The influence of the first language on second language acquisition is known as the phenomenon of transfer (Gass & Selinker 1992). Positive and negative transfers occur when features of the L1 respectively facilitate or impede acquisition of a construction in the L2. Within this framework, transfer is not primarily caused by superficial word order similarities / dissimilarities, but, at a more abstract level, by consideration of the value and lexical realization of grammatical categories across languages, and the necessity of a reorganization of these parameterized features.

In summary, one general research question, and two sub-questions come into light:

- How can we account for L2 acquisition by cognitively and linguistically mature learners of (some forms of) non-finite complementation?
- What is the respective influence of the L1 (via parametric transfer) and UG (via universal principles) on L2 acquisition of the French CP system, as manifested in the learners' IL?
- What specific L2 French input might be the source of the correct/incorrect analysis produced by learners?

4. The syntax of non-finite verbal complementation

From a descriptive point of view, complementation covers cases in which an embedded clause functions as the selected argument of a verbal, a nominal or an adjectival predicate. In this paper, I specifically focus on verbal non-finite object complementation, that is, on the production of non-finite embedded clauses as internal argument of a matrix verb.

In the case when the infinitival Verb Phrase (VP) is the sole complement of a verbal predicate, as in the following examples, non-finite completives are

introduced with the morphemes 'de' (of, from), 'à' (to, at), or their phonetically empty counterpart, depending on the matrix predicate:

- (1)a. Jean décide **de/*à/***_ lire un livre John decides *de* to-read a book 'John decides to read a book'
 - b. Jean cherche *de/à/*_ lire un livre
 John looks à to-read a book
 'John is looking forward to reading a book'
 - c. Jean veut *de/*à/_lire un livre

 John wants _ to-read a book

 'John wants to read a book'

In cases of verbal predication with two complements: one overt Determiner Phrase (DP) and one infinitival completive, the DP is either a direct object complement (endowed with Accusative case) or an indirect object complement introduced by the preposition/case marker 'a' (endowed with Dative case) of the matrix predicate. ⁴ In this di-transitive context, the choice of the phonetically empty COMP is restricted: Accusative DPs can be followed by a completive introduced with 'a' or 'de', but Dative DPs can only be followed by a non-finite completive introduced by 'de':

- (2)a. Jean encourage Marie *de/à/*_ chanter John encourages Mary à to-sing 'John persuades Mary to sing'
 - Jean empêche Marie de/*à/*_ chanter
 Jean prevents Mary de to-sing
 'John prevents Mary from singing'

⁴ In the present paper, I leave aside several constructions: causatives: 'je laisse Marie partir' (I let Marie go), and perception verbs: 'je vois Marie partir' (I see Marie go) as well as the periphrastic future 'je vais partir' (I'm going to leave) and deictic verbs of movement 'je vais au supermarché acheter des pommes' (I'm going to the supermarket and/to buy apples).

Jean rappelle à Marie de/*à/*_ chanter
 John reminds to Mary de to-sing
 'John reminds Mary to sing'

The only exceptions to these rules are the impersonal verbs 'falloir' (to be necessary) and 'sembler' (to seem) used with a Dative clitic and an empty COMP (as in 3.a-b) and "apprendre / enseigner à DP à VP" (to teach 'à' DP 'à' to do something) which take an infinitival complement introduced by 'à': "Jean apprend / enseigne à Marie à chanter" (John teaches Mary to sing).⁵

- (3)a. Il lui faut partir

 Expletive him/her-DAT is-necessary to-leave

 'He/She has to leave'
 - b. Il lui semble avoir raison 6
 Expletive him/her-DAT seems to-have right
 'It seems to him/her that he/she is right'

Delattre (1964) provides a classification of contexts of non-finite verbal complementation that offers us a useful point of departure. He creates a typology of 24 sub-structures based on their superficial distribution, but when clustering in the same categories causatives, movement, and perception verbs, and control or raising structures, he fails to distinguish deeper structural properties, and, he does not deal with embedded interrogatives which are, as we will see, at the core of the present study.

Within a UG framework, Kayne (1981, see also Kayne & Haik 1980) proposes to treat the morpheme 'de', sometimes phonetically null, as a non-finite Prepositional Complementizer (COMP) heading its own Complementizer Phrase (CP).⁷

⁵ These verbs meaning 'to teach, to learn' are quite important in the context of classroom instructed lingo, and are likely to be used / known by students.

⁶ See below for the significance of this use of 'sembler' (to seem) as a control verb rather than a raising verb.

⁷ This hypothesis is compatible with a proposal generating 'de' in Spec. of CP as in Kayne (1991), but not compatible with the subsequent revision to the theory proposed in Kayne (1999). This paper does

Similarly, I consider 'a' to be a variant of 'de', as suggested by Kayne (1981), but maybe selected by a distinct aspectual value of the matrix predicate (Cox 1983).8

First, Kayne (1981) reminds us that the complementizer 'de' is distinct from the preposition 'de' (of, from + DP): DP arguments fulfilling the same thematic role as the infinitival object completive, for instance, with the verb 'dire' (to say), are not introduced by a preposition 'de':

(4) J'ai dit à Paul de partir / (*de) quelque chose I told to Paul de to-leave / (*of) something 'I told Paul to leave / something'

This conception of 'de' as a COMP could mean at first sight that 'de' would be the non-finite equivalent to the finite declarative COMP 'que' (that):

(5) J'ai dit à Paul de partir / qu'il parte
I have told to Paul de to-leave / that he leave-SUBJUNCT
'I told Paul to leave / that he (should) leave'

However, in a Split CP framework (Rizzi 1997), 'que' and 'de' (or English 'for' and Jamaican 'fi' (Durrleman-Tame 2008)) are shown to occupy different layers within the CP: respectively Force P and Finite P.

Treating 'de' as a COMP also means that it is of the same syntactic category as 'for'. However, a crucial difference between the two is that 'de' (or its other realizations) is unable to licence overt subjects:

not intend to take position on this theoretical issue, but see arguments in Borsley (2001) against what he and one reviewer believe to be unnecessary complications to account for empirical data.

As pointed out by a reviewer, while there seems to be a clear agreement as to the complementizer nature of 'de'' in some contexts, the complementizer status of 'a'' is not uncontroversial (starting with Huot 1981, see Carnac-Marquis (1996) in the context of tough-constructions, Rowlett (2007:157ff.) for an interesting discussion of 'de'' and 'a'' as case markers, and Martineau & Motapanyane (2000) for a historical overview of the French infinitival complementizer system. I leave this issue of the possible differences between 'de'' and 'a'' in the learner's grammar for further research.

- (6)a. I prefer (for John) to read a book
 Je préfère (*pour/*de/*_John) lire un livre
 - b. Je préfère que John lise un livreI prefer that John read-SUBJUNCT a book'I prefer for John to read a book'

When there is a need for an overt embedded subject, French must resort to a finite embedded sentence, as in (6.b).

The main argument presented in Kayne (1981) supporting the hypothesis that 'de' belongs to the COMP category is that it is syntactically distinct from the English pre-verb 'to' generated at the inflectional level (IP). This is clearly shown by the fact that the overt COMP 'de', as opposed to 'to', is ungrammatical in co-occurrence with an overt wh-constituent (such as where, when, etc.) in the Specifier of CP:

(7) Je lui ai dit où (*d') aller
I him-DAT have told where (de) to-go
'I told him where to go'

This has to do with an observational generalisation: the "doubly filled COMP filter" (Chomsky & Lasnik 1977) that prevents both the head and the Spec. of CP to be overtly filled. The filter operates in both French and English, and maybe universally at a more abstract level.

(8)a. I asked him where (*that) you go
b. Je lui ai demandé où (*que) tu vas
I him-DAT have asked where that you go
I asked him where you go'

This filter has been shown to have apparent exceptions, for instance, in Belfast English (Henry 1995) and in Quebec French, as far as the finite clauses are concerned. However, the generalisation holds without exception for infinitival

embedded interrogatives. As the generalization preventing the co-occurrence of an overt COMP with a *wh*-phrase in Spec. of CP seems robust in both Standard English and Standard French, we would logically expect the learner to take this constraint to hold as well in the grammar of the L2 they are creating to make sense of the French input.

Another argument presented in Kayne (1981, see also Rizzi (1978) for Italian) is that COMP 'de' (or its phonetically empty counterpart) can be found in *control* contexts, but never in *raising* ones:

- (10)a. Jean a essayé/oublié/décidé de partir John has tried/forgotten/decided *de* to-leave 'John tried/forgot/decided to leave'
 - b. Jean semble/parait/se trouve/s'avère (*d') être parti John seems/appears/happens/turns out (de) to-be left 'John seems/appears/happens/turns out to have left'

Although Kayne himself suggests a range of syntactic options to account for this difference, and rather focusses on the respective case properties of Prepositional Complementizers in French and English, I will adopt the by-now traditional proposal (Haegeman 1991, among others) which assumes that raising verbs like 'seem' select an Inflectional Phrase (IP) complement, while control predicates like 'try, decide' select a CP complement.

In the case of control of an understood embedded subject by a DP in a matrix clause: "John decided to sing", both the matrix verb 'decide' and the embedded verb 'sing' assign their own agentive thematic role: there is a decider and a singer that happen to be co-referential. The structural subject position in the embedded infinitival clause is filled with a phonetically empty PRO 'controlled' by a DP in the matrix clause, either the subject or the object.

- (1).a. John tried / forgot / decided [CP PRO to leave] (Subject Controller 'John')
 - b. Mary asked Paul [CP PRO to leave] (Object Controller 'Paul')

In some cases, when no controller is available (as in 12), the embedded PRO subject is assigned an arbitrary generic interpretation.

(12) It is necessary [CP PRO to study more]

In the case of raising from the embedded subject position to the matrix clause subject: "John seems (to me) to have left", the matrix clause subject 'John' is not thematically selected by the matrix verb 'seem', but semantically linked to the embedded predicate 'leave.' This is shown by the possibility of an 'unraised' variant: "it seems (to me) that John has left" with an expletive 'it' inserted because of the need to have an overt subject in the matrix clause in English. Such an expletive subject could not fulfil the thematic role requirements of a control predicate, as shown by the ungrammaticality of "*It tried to be a dog in the garden."

Finally, one also can find 'Raising to Object' (RtO) structures with *believe*-type verbs:

(13) John believes Maryi [IP ti to be late]

Interestingly, the corresponding French verb 'croire' (to believe) behaves more like a control verb, taking a PRO subject, than a raising verb: we therefore observe a perfect contrast between French and English, and this contrast is accounted for by assuming that 'croire' takes a CP complement (making it possible for a PRO to be generated) and that believe takes an IP complement (allowing raising from the embedded to the matrix clause):

- (14)a. *Je crois Jean être le plus intelligent de tous
 - b. I believe John to be the most intelligent of all
 - c. Je crois PRO être le plus intelligent de tous
 - d. *I believe PRO to be the most intelligent of all

There are however contexts of *wh*- or clitic movement in which French *croire*-type has been shown to manifest raising properties (see Kayne 1981, Rooryck 1997, Boskovic 1997), and the third argument advanced by Kayne (1981) in favour of

the complementizer status of 'de' is that, when such raising to object occurs, no 'de' is allowed, as opposed to English 'to':

(15) Quel garçon crois-tu (*de) avoir oublié ses clés? Which boy believe you (*de*) to-have forgotten his keys 'Which boy do you believe to have forgotten his keys?'

The important point to notice here is that the displacement of the embedded subject to the matrix clause would be prevented by an overt complementizer while the presence of a complementizer in a control structure does not interfere with the control of the understood PRO subject by a matrix controller, and furthermore, might be necessary to prevent the empty PRO to incorrectly receive case from the matrix verb.

What we have said for control structures in French and English extends to Jamaican Creole (Bailey 1966, Durrleman-Tame 2008). However, Jamaican Creole does not seem to have typical raising to subject, as there does not seem to be a raised equivalent of unraised 'komiin laik' (is seems like), 'fieba', 'tanka' (it seems) for example:

(16)a. (I) komiin laik se di pikni a go ron we (Durrleman-Tame 2008:108)

Expl seem like se the child prog prosp run away

'It seems like the child is going to run away'

b. tanka se dem gaan aredi (Bailey 1966:40)

seem se they gone already

'They seem to be gone already'

In conclusion, we have seen that the task of the second language learner is not a simple one as he/she must realize (i) that non-finite French COMPs in French do not allow overt subjects, (ii) that the French COMP category has several phonetic realizations, whose selection by the matrix verb is marked by idiosyncrasies, and (iii) that croire-type verbs usually behaves like control verbs, except in cases of *wh*-or clitic movement. It is therefore interesting to observe how learners actually

manage these constraints through the utterance they produce in oral conversation, and what kind of grammar of French they create in order to make linguistic sense of the input they are exposed to.

5. Observation of Learners data in the UWI corpus

Following the constructions emphasized in Kayne (1981) to argue in favour of the COMP status of 'de', I focus on the opposition between control and raising predicates, as well as on the structure of non-finite embedded sentences.

5.1 Embedded non-finite interrogatives

The first issue to deal with is the ungrammaticality of 'de' in co-occurrence with a wh-phrase in the Spec of CP in embedded non-finite interrogatives. Within the entire corpus, one finds seven instances of embedded infinitival wh-interrogatives.

Five are correctly produced without 'de' by L12 (2), L16 (1), L20 (1), L31 (1):

- (17)a. je sais pas comment m' expliquer, comment vous expliquer (L12 III1)⁹ 10

 I know not how myself to-explain how you to-explain

 'I don't know how to explain myself, how to explain to you'
 - b. pour faire comment? (L16 III1) in-order to-do how 'to do how ?' (NB: with the intended meaning: to do what?)
 - c. je dois apprendre comment, comment dit on, diriger mon temps (L20 II2)

 I must learn how, how says one, to-manage my time

 'I must learn how how do you say? to manage my time'

⁹ In all examples, "L" followed by 2 digit refers to the learners, Roman numeral refers to the year and Arabic numeral to the semester when the interview took place, III1 = Year 3 semester 1.

¹⁰ For ease of reading, I will usually reproduce the learners' utterances without the repetitions, hesitations, reformulations, self-corrections, filled pauses, and other encodings, unless relevant.

d. j' avais un besoin de [/] <de apprend> [//] de appris [/] appris comment parler la langue (L31 III1)

I had a need de [/] $\leq de$ learn \geq [//] de learned-PAST-PART [/] learned-PAST-PART how to-speak the language

'I needed to learn how to speak the language'

In (17.c), two intertwined interrogatives are produced by L20, one parenthetic (comment dit-on? / how do you say?) on the other (... learn how to manage my time). The parenthetic interrogative intervenes between the mh-interrogative word and the infinitival verb. In (17.d), L31 easily generates the embedded interrogative, but the control verb is produced with hesitation concerning its morphology, manifested by repetitions, marked by [/], and self-correction, marked by [//], from the part of the learner looking for the correct form of the control verb before finally settling on an incorrect past participial form. These five embedded infinitival interrogatives all use the interrogative adverb 'comment?' (how?), twice with the verb 'apprendre' (to learn how to do something) and twice with the verb 'savoir' (to know how to do something).

The last two utterances of embedded interrogatives in the corpus, produced by L14 and L17, are incorrectly generated with an overt 'de':

```
(18)a. j' ai appris comment d' utiliser mon xx (L14 I2)
```

I have learned how de to-use my xx

'I learned how to use my xx'

b. je ne sais pas quoi <de pense> [//] &euh@fp de penser (L17 II1)

I neg now not what <de think-TNS> [//] de to-think

I don't know what to think'

Again the actual utterances produced manifest a fair amount of hesitation: 'xx' indicating inaudible material, and '&euh@fp' indicating a filled pause. L17 produces an instance of self-correction as the embedded verb is first realized with a bare stem (characteristic of a present tense form), and immediately corrected into the correct infinitival form. This might indicate that the internal grammar of L17 does not yet produce non-finite interrogatives without conscious self-monitoring.

As the doubly filled COMP filter is effective both in the L1 and in the L2 of these learners, I logically assume that it must be effective in their IL as well. As an overt 'de' is generated by these two learners, I must conclude that at that stage in their development, the morpheme 'de' is not generated as the head of CP. So, the question becomes: where is it realized?

As far as learner L14 is concerned, there exists a robust cluster of arguments pointing towards the conclusion that she inserts 'de' as the phonetic realization of a bundle of features corresponding to the English morpheme 'to'.

First, 'de' is systematically overgeneralized in instances of completives where we would expect a phonetically empty COMP in Modern Standard French (see below for exceptions to this rule): three times with the verb 'espérer' (to hope) and once with the verb 'souhaiter' (to wish) within the same interview:

```
(19)a. j' espère d' aller au bureau (L14 I2)
I hope de to-go to-the office
'I hope to go to the office'
b. je souhaite de travailler (L14 I2)
I wish de to-work
'I wish to work'
```

Although not strictly ungrammatical, these examples manifest a rather archaic / literary use of the language, i.e., a register to which learners are not likely to have been exposed to, not typical of colloquial French.¹¹

Secondly, 'de' is incorrectly realized with a non-finite relative clause, instead of the expected COMP 'a':

¹¹ Of course, as we are interested in colloquial French only, we can simply say that the insertion of 'de' is ungrammatical. One reviewer at least strongly agrees with this stance. I must point out however that the participants all took an introduction to French literature course that included classic texts such as *Dom Juan* by Molière or *L'étranger* by Camus and therefore may have encountered some archaic forms (although, as far as I can judge, the latter play does not include any form such as 'espérer' or 'souhaiter' with 'de' and there is only one example of 'souhaiter de' in Camus' novel (1942/1999 L'étranger Paris: Gallimard (Collection Folio Plus 10) p.119)).

(20) je sais tous les choses que les hôtels (...) ont d'offrir aux touristes (L14 I2) I know all the things that the hotels have *de to-offer to-the tourists 'I know everything that hotels have to offer to tourists'

Thirdly, 'de' is realized in a probable 'for/to' construction directly transferred from English (see Peters 2009):

c' est important pour les diplomates d' avoir la capacité de parler dans une autre langue (L14 I2)
that is important for the diplomats de to-have the capacity of to-speak in a-FEM other language
'it's important for diplomats to have the ability to speak in a foreign language'

These characteristics of verbal complementation for L14 at level I2 show that 'de' seems to be transferred from English with the features of 'to'. 12 In fact, it is remarkable to note that, at that level, L14 systematically overgenerates 'de' without exception (but see below).

The situation is a bit more confused for learner L17 who, at level II1, systematically uses a phonetically empty COMP with verbal complementation, as in (22) with 'commencer \hat{a} / $d\hat{e}$ ' (to begin to) not followed by the COMP ' \hat{a} / $d\hat{e}$ '. She also confuses verbal moods on several occasions, using infinitival verbs instead of expected past participle or finite tense verbs, or inversely using a finite tense verb instead of an infinitival verb. This confusion might mean a blurring of the line between finite and non-finite completives at that stage:

 $^{^{12}}$ A reviewer points out an interesting parallelism with English speaking learners of Spanish. Despite Standard Spanish not having prepositional complementizers, students tend to grab one preposition and overgeneralise it, usually 'a' the literal translation of 'to'.

¹³ In fact, L14 is the only learner to show such a systematic overgeneralization of 'de.'

(22) *Je voudrais continuer étudier (L17 II1)¹⁴

I would-like to-continue *_ to-study

'I would like to continue to study'

Interestingly, with both L14 and L17, 'de' is correctly never used with 'vouloir' (want) or with the completives of modal verbs 'pouvoir' (can) and 'devoir' (must):

(23)a. je veux parler un+peu à propos de dans le tourisme (L14 I2)
I want to-speak a little about of in the tourism
'I want to speak a little bit about tourism'
b. elle doit payer beaucoup de monnaie (L17 II1)
she must pay a-lot of change (= money)
'She must pay a lot of money'

Considering the possible influence of 'wanna' contraction, one notices that these latter contexts where the learner correctly does not generate an overt 'de' are precisely the contexts that would not take 'to' in English either: 15 16

Modals: can, must, etc.: 'I must (*to) try'

Contracted verbs: wanna, gonna, hafta, sposta, etc.: 'I wanna (*to) try'

There is some evidence, but none conclusive, that at later stages the link between 'to' and 'de' might weaken, as these two learners introduce a greater variety of

¹⁴ As suggested by a reviewer, in this case, the omission of an overt COMP could be akin to an instance of hypercorrection. I suppose that the learner being aware that what she believes to be the translation of 'to' is often not realized, she would overgeneralize the phonetically empty COMP. It is indeed important to distinguish hypercorrection from transfer. More research is needed on this topic. ¹⁵ I also strongly agree with a reviewer's comment that one might speculate that the correct use of these verbs is due to the fact that they are usually taught and acquired earlier than the other verbs (in fact, even used as chunks in the conditional mood long before this mood is systematically taught) and have perhaps become more systematic: indeed, there is just one mistake in the choice of the null COMP with these verbs in the entire corpus.

¹⁶ Again I leave for further research the case of causative verbs: 'faire' (to make), verbs of perception 'voir' (to see), deictic verbs of motion 'venir' (to come), nor the periphrastic future 'aller' (gonna). For these verbs as well: a null COMP in French corresponds to the absence of 'to' in English.

COMPs. L14 no longer systematically over-generates 'de' (She produces one example of 'souhaiter' with a null COMP at level II1). This might indicate that learners develop several options over time. (See below for examples of intralearner variability). However, as they produced only one instance of embedded interrogative each, it is impossible to determine conclusively whether they have managed to restructure their grammar at later stages.

Here we touch some inherent limitations of corpus research: the absence of relevant data, and the absence of starred sentences, as well as the necessity to distinguish performance mistakes from genuine systematic competence (see Peters (in preparation) for a more detailed analysis of the patterns of systematic errors).

In brief, it seems probable that for some learners (namely L14 and maybe L17 and others), a misanalysis of 'de' treated as equivalent to English 'to' in terms of formal features occurs.

5.2 Subject/object/arbitrary control and raising predicates

As shown in Table 1, Cases of control are relatively abundant in the corpus: considering all ten learners, one can find 441 instances of control: subject (417 instances), object (11 instances), or arbitrary (13 instances) control (see examples in 24):

- (24)a. Philippe a décidé d'aller à la plage (L16 III1) (Subject control)

 Philippe has decided *de* to-go to the beach

 'Philippe decided to go to the beach'
 - b. le cours m' a aidé à améliorer la prononciation. (L16 II2) (Object control)
 the course me has helped à to-improve the pronunciation
 'the course helped me to improve the pronunciation'
 - c. il faut pratiquer beaucoup le français. (L33 I2)
 (Arbitrary control)
 it is-necessary _ to-practice a-lot the French
 'it is necessary to practice French a lot'

	L08	L12	L14	L16	L17	L18	L20	L31	L33	L38	Total
Token	43	96	35	36	64	22	53	4	48	40	441
	(2)	(2)	(1)	(1)	(0)	(0)	(3)	(0)	(15)	(0)	(24)
Туре	7	14	11	12	10	8	12	4	12	7	36
	(1)	(2)	(1)	(1)	(0)	(0)	(3)	(0)	(1)	(0)	(7)

Table 1. Number of control verbs in the learner corpus.

In table 1, 'Token' refers to the number of instances of control structures (subject, object and arbitrary), learner by learner, and 'Type' refers to the number of different lexical verbs used at least once for each learner in control structures. The numbers in parentheses refer to the number of cases of non-subject control. The column 'Total' refers to the total number of tokens / types across learners. Instances of embedded interrogatives are not included in the count.

Out of the 24 cases of object / arbitrary control, 13 manifest arbitrary control and 11, object control. All examples of arbitrary control are produced by one learner, L33, who uses one impersonal verb: "falloir" (to be necessary) (as in 24.c) (used also as object control verb).

5.2.1. Subject control

There are 29 different subject control predicates in the corpus, but about two third of all instances of subject control (288/417) are produced with just three verbs: the desiderative verb 'vouloir' (to want): 122 times, and the modal verbs: 'pouvoir' (can) and 'devoir' (must): 83 times each. The modal verbs are always used with a root interpretation. Pouvoir' (can) and 'vouloir' (to want) are the only verbs used at least once by all learners, and 'devoir' (must) is used at least once by eight of the ten learners (only L16 and L31 do not use it). I consider these to be control

verbs with a phonetically unrealized COMP, and there is (almost) no error in the corpus with respect to the choice of null COMP for these verbs.¹⁷

Some other major subject control verbs in terms of productivity are:

- the aspectual verbs: 'commencer à/de VP' (to start 'à/de' to do something): used 25 times by eight learners, almost always correctly with 'à', except once used with a null COMP by L20; another one is 'continuer à/de VP' (to continue 'à/de' to do something) used 4 times by three learners: 3 times with the correct 'à', and once with an incorrect empty COMP by L17; etc.;
- times by six learners, always with the expected null COMP; some other desiderative verbs include: 'préférer _ VP' (to prefer) used 6 times by four learners with the correct empty COMP, except once with an ungrammatical 'de' by L14 ¹⁸; 'désirer _ VP' (to desire/want to do something) used 4 times by one learner, L18, but inconsistently: once with an incorrect archaic/literary 'de', once with an expected empty COMP, and twice with the ungrammatical 'pour' (for); 'souhaiter _ VP' (to wish to do something) used twice by L14, once with the incorrect archaic/literary 'de' and in a subsequent interview, once with the expected empty COMP, etc.;
- some typical control verbs: 'essayer de VP' (to try 'de' to do something): used 18 times by eight learners, mostly with 'de', except by L20 who once uses an empty COMP and once uses 'a'); 'espérer _ VP' (to hope to do something): used 14 times by four learners: 9 times with the incorrect archaic/literary COMP 'de' (5 times by L14, twice by L16, and twice inconsistently by L18), and 5 times with the correct empty COMP; and 'décider de VP' (to decide 'de' to do something): used 12 times by five learners: 8 times correctly with 'de' and 4 times incorrectly with an empty COMP by L12, L16 and L18 (see below); etc.
- and a durative verb: 'passer (duration) à VP' (to spend time 'à' doing something) incorrectly used with 'pour' (for) by L14, etc.

 $^{^{17}}$ I have identified one unsystematic mistake by insertion of ' \dot{a} by L20 (with 'vouloir') who otherwise produces 25 cases without COMP with these verbs.

¹⁸ Remember that L14 is the learner who systematically associates 'de' with 'to'.

As illustrated by this sample of control structures, learners are mostly correct in choosing the COMP. In fact, in total, there are only 29 clear cases of ungrammatical choice of COMP over 417. Overall, these errors can be classified as follows:

- incorrect use of 'de' instead of an empty COMP: 12 times (mainly with 'désirer' (to desire), 'souhaiter' (to wish) and 'espérer' (to hope)); 19
- ungrammatical use of an empty COMP instead of an expected overt COMP: 11 times, 8 times instead of 'de' and 3 times instead of 'd'; 20
- ungrammatical use of 'a' instead of 'de': twice;
- and ungrammatical use of 'pour' (for): 4 times, once instead of 'de' (by L31), once instead of 'à' (by L14), and twice instead of an empty COMP (by L18).

The majority of ungrammatical cases are therefore characterized by the overuse of the empty COMP (11 times), mainly to replace an expected 'de' (8 times) and, inversely, by the overgeneralization of 'de' (sometimes in what would be an archaic / literary register) (12 times). We notice also that there are errors of incorrect use of 'de' instead of 'de', but not one case of an incorrect use of 'de' instead of 'de'. Finally, we notice that the preposition 'pour' (for), that is not a Prepositional Complementizer in French, seems to be reanalysed as COMP by some Jamaican learners, probably as a translation of 'for/fi'. Interestingly, this use of 'for' is not accompanied by the licensing of an overt subject with verbal complementation (although it might be with adjectival complementation (Peters 2009), as seen in example (21) above). (See Peters (in preparation) for an analysis of 'pour' as transfer from the native Jamaican).

The use of 'décider de' (to decide) 'espérer' (to hope), 'desirer' (to desire, to want) provides us with interesting examples of intra-speaker optionality: two learners, L16 and L18, change the COMPs they use within the same interview. L16 first correctly uses the expected 'de' with 'décider' (as seen above in 24.a repeated below in 25.a), and then incorrectly uses an empty COMP in (25.b):

 $^{^{19}}$ When considering ungrammatical the archaic / literary use of 'de'. See note 11.

²⁰ Maybe as a form of hypercorrection, according to one reviewer. See note 14.

```
(25)a. Philippe a décidé d'aller à la plage (L16 III1)

Philippe has decided de to-go to the beach

'Philippe decided to go to the beach'

b. il décide aller chez soi (L16 III1)

he decides *_ to-go at-one's-home

'he decides to go home'
```

Note that, in both examples, there was a slight pause between 'décide' and 'aller' as well as between 'a décide' and 'd' aller.' It is possible that the optionality would be caused by purely phonetic factors such as the difficulty associated with the production of two geminated [d]'s in 'décide d'aller' (decides to go) resulting from the obligatory deletion of the final schwa in 'décide'. Tranel (1987, 89) mentions that English speakers sometimes have trouble pronouncing the consonant clusters resulting from e-deletion in final position. This is not surprising as English does not have true consonant geminates: they occur only at word or morpheme boundaries, and are often not pronounced in informal speech (Kaye 2005).²¹ In that case, the syntax of the choice of COMP would be essentially correct in both cases for that learner. The apparent ungrammaticality of (25.b) would only result from a failure to spell out the underlying 'de' because of a pronunciation difficulty.

L18 first uses 'espérer' (to hope) with an archaic / literary 'de' ungrammatical in colloquial French, and then correctly with the expected empty COMPs in two other occasions, at level II1:

```
(26)a. j' espère de travailler dans une profession sociale (L18 II1)

I hope *de to-work in a-FEM profession social

'I hope to work as a social worker'
b. j' espère voyager d' Afrique (L18 II1)

I hope to-travel of Africa

'I hope to travel to Africa'
```

²¹ Thanks to Barbara Bullock (p.c.) for pointing this out.

c. j' espère passer le temps avec ma famille (L18 II1)I hope to-spend the time with my family'I hope to spend time with my family'

She again produces the same alternation between 'de' and a null COMP in a subsequent interview at level II2. This tends to show that two systems are competing inside L18's grammar of Complementation. ²²

L18 also shows another case of optionality when she uses 'désirer' (to want, to desire) correctly with the expected empty COMP in one occasion, and the ungrammatical 'pour' (for) in two other occasions at level II1:

- (27)a. il désire bâtir une pays l'arabe (L18 II1) he wants to-build a-FEM country the-Arab 'he wants to build an Arab nation'
 - b. je ne désire pas pour engager l'attention des autres étudiantes (L18 II1)
 I neg want not *for to-engage the attention of-the other students-FEM
 'I do not want to attract the attention of other students'
 - c. il y a beaucoup de personnes (...) qui désirer pour étudier à Uwi (L18 II1) it there has a-lot of people who to-want *for to-study at UWI 'There are many people (...) who want to study at UWI'

In the last example, the control verb 'désirer' is an incorrect root infinitive used instead of a finite tense.

As a whole, the data shows that even though learners may be unsure of which phonetic realization they need to give to the COMP, there is little doubt that they are aware that some linking category is necessary in the structure. Of course, it is still an open issue whether this linking category is definitely categorized as a CP: these linking words might also be generated as free morphemes at the inflectional level by some learners, as we have seen.

²² The use of 'pour' here might be facilitated by 'wish for' as pointed out by a reviewer.

One further observation supporting a higher positioning within CP is offered by examples in which an overt linking word is separated from the infinitival verb by an overt clitic pronoun. There are four such cases in the corpus, namely the following from L12, L20 and L33 (see also (31.b) below):

```
(28)a. <j' essaie de> [/] j' essaie de le faire maintenant (L12 III1)
<I try de> [/] I try de it to-do now
'I'm trying to do it now'
b. mais j' essaie à m' organiser meilleur (L20 III1)
but I try *à myself to-organise better-ADJ
'but I try to organize myself better'
c. c' est une femme qui a essayé de s' élever (L33 II1)
that is a-FEM woman who has tried de herself raise
```

It is a woman who has tried to raise herself

If we assume that the pronoun is located at the inflectional level of the clause (as in Kayne 1991 and others), this data constitutes an argument in favour of a generation of 'de' or 'à' higher than IP, as modern French does not allow clitic climbing outside the infinitival clause (Martineau 1991).

5.2.2. Object control

As shown in table 1, instances of object control verbs are few, but attested: six learners produce 11 instances of object control. The corpus contains seven different object control verbs:

- 'aider DP à VP' (to help someone 'à' to do something) used twice by L08 with the incorrect 'de', and once by L12 and L16 each with the expected 'a';
- 'demander à DP de VP' (to ask someone 'de' to do something) used once by L14 with the expected 'de';
- 'enseigner à DP à VP' (to teach someone 'a' to do something) used once by L12 with the correct 'a';
- 'clitic *falloir* _ *VP*' (to be necessary for someone (= obligatorily in the form of a Dative clitic pronoun) to do something), used twice by L33 with a correct empty COMP, once with an incorrect pronoun (see below);

- 'intéresser DP à VP' (to interest someone in doing something) used once by L20 with an incorrect 'de';
- 'permettre à DP de VP' (to allow someone 'de' to do something) used once by L20 (see below);
- 'mener DP à VP' (to lead someone 'à' to do something) used once by L20 with the correct 'à'.

The most productive object control verb is 'aider' (to help) used four times by three different learners with a consistent, if not correct, choice of COMP: L08 systematically selects the ungrammatical COMP 'de' to introduce the completive of 'aider' (as in 29.a, b), while the other two learners, L12 (in (29.c)), and L16 (in (24.b)), use the correct COMP 'a':

- (29)a. je pense que ma linguistique m' aide de parler français pour mieux (L08 I2)
 - I believe that my linguistics me-ACC helps *de to-speak French for better-ADV
 - 'I believe that my linguistic course helps me to speak French better'
 - b. je pense que ça va m' aider de parler français mieux (L08 II2)
 - I believe that that goes me-ACC helps *de to-speak French better-ADV 'I believe that this is going to help me to speak French better'
 - c. je voudrais recevoir quelque chose que peuvent aider moi à étudier . (L12 II1)
 - I would-like to-receive some-thing that can to-help me \hat{a} to-study 'I would like to receive something that can help me to study'

Half the cases of object control (5 out of 11) strictly adhere to the following pattern, as shown in the previous (24.b, 29.a, b) and in the following examples (30.a, b):

- 'Inanimate subject + first person clitic pronoun + control verb + CP (de/\tilde{a}) '
- (30)a l'expérience doive m'enseigner (...) d'avoir plus contrôle (L12 II2) the experience must-SUBJUNCT me to-teach (...) de to-have more control 'The experience must teach me to have more control'
 - b. cette année me demande de faire une haut [^ nivel] de travail (L14 II1)²³
 This year me asks *de* to-do a-FEM high level of work
 'This year requires me to produce a high quality of work'

Slight modifications to the basic pattern occur in four other utterances: one with the incorrect use of a strong object pronoun instead of a weak clitic (see example (28.c): 'aider moi' instead of 'm'aider' (to help me)), one with the use of an impersonal construction and an empty COMP (in (31.a)), one with an animate subject (in (31.b)), and one with the use of an empty pro object pronoun with a meaning that would be equivalent to the indefinite pronoun 'one' in English (Haegeman 1992) (in (31.c)):

- (31)a. il me faut parler maintenant au sujet de monsieur Name (L33 I2) Expl. me-DAT is-necessary to-speak now about of Mr. Name 'it is necessary for me now to speak about Mr. Name_of_Politician'
 - b. vous savez si je m' intéresse de s' inscrire par les moyens virtuels ? (L20 III1)

 you know if I myself interest *de oneself enrol by the means virtual
 - 'Do you know whether I am interested in enrolling myself with virtual means?'
 - c. l'enseignement de la langue, il mène à pratiquer plus (L20 II2) the teaching of the language, it leads *pro à* to-practice more 'Teaching the language leads one to practice more'

Note that in (31.b), the first person *phi*-features of PRO, inherited from the controller, are not transferred on the anaphoric clitic pronoun with 'se' in 's'inscrire'

²³ In (30.b), [^ nivel] is probably a vocabulary interference from Spanish. The intended French word is 'niveau' (level).

(to enrol oneself) used instead of 'me' (myself). However, the very presence of the pronoun is significant as it might confirm that 'de' is generated above the inflectional level in the grammar of this learner. (See the discussion of (27) above).

The last two examples in (32) are ungrammatical: (32.a) has an inanimate object controller in a direct translation of "he allows it to happen." ²⁴ As discussed in Rooryck (1988), the verb 'permettre' (to allow), when used with an inanimate object, acquires a metaphorical meaning equivalent to 'let' and behaves in a manner more akin to raising to object verbs than control verbs. The sentence produced by the learner is ungrammatical, because the correct subcategorization should select a Dative clitic (instead of an Accusative one) and a COMP 'de' (instead of 'à'): 'permettre à DP de VP' (to allow 'à' DP 'de' to do something), and more fundamentally, because this type of metaphorical construction strictly rejects the pronominalisation of the inanimate object. The learner's attempt at producing a control structure as a consequence of direct interference from English therefore results in ungrammaticality.

(32)a. n'importe qui le dieu veut pour moi, il le permit@s à passer pour moi (L20 I2)

Whomever the god wants for me, he it-ACC permits \hat{a} to-happen for me 'Whatever God wants for me, he lets it happen to me'

b. il faut, je pense, nous profiter de l'Internet (L33 III1) it is-necessary, I think, we/us to-take-advantage of the Internet 'it is necessary, I think, for us to take advantage of Internet'

Finally, in (32.b), an overt embedded subject 'nous' (we, us), separated from the matrix verb by a parenthetical, is used instead of a clitic or instead of a PRO.²⁵

In conclusion, we have seen that, in all cases of object control, the embedded CP is correctly realized with an overt COMP, not always the correct one of course,

²⁴ The direct translation from English is made more obvious by the fact that the pronunciation of the form 'permit' is a direct borrowing from English (marked by the @s symbol) used in place of the French verb 'permet' (permits, allows).

²⁵ Therefore, this example should be treated as a case of Exceptional Case Marking or optional control rather than object control of a PRO, and we end up having only 10 true cases of object control instead of 11 in table 1.

when there needs to be such an overt COMP. It seems that the learners never make the mistake of introducing the non-finite clause with a phonetically empty variant of COMP, and therefore are aware of this important characteristic of French syntax which distinguishes object control verbs from perception or causative verbs. The impersonal verb 'falloir' correctly takes a phonetically empty COMP and is used both as object control and arbitrary control predicate. Two ungrammatical sentences are however caused by direct transfer/translation from English.

5.2.3. Raising structure

In contrast to control structures, not one instance of raising to subject is found in the entire corpus. One could assume that there is simply little communicative need to use such a construction. Yet, we find three examples of unraised 'sembler' (seem), or 'paraitre' (appear) with finite CPs:

- (33)a. il me semble que (...) les personnes dans le photo est (...) dans une hôtel pour les couples (L14 I2)
 - it me-DAT seems that (...) the people in the picture *is in a-FEM hotel for the couples
 - 'it seems to me that the people in the picture are in a hotel for couples'
 - b. il paraît que c'est une scène (...) au restaurant de dans un hôtel (L31 III1) it appears that that is a-FEM scene at-the restaurant of in a hotel 'it appears to be a scene in a hotel restaurant'
 - c. il semble que ils font beaucoup de confiance dans leurs médias (L12 III1) it seems that they make a-lot of confidence in their medias 'it seems that they trust their media a lot'

So, no transfer from English that would facilitate the acquisition of the raising to subject construction in French seems to take place (but there could be (negative) transfer from Jamaican Creole in which the structure is missing) (See Peters (in preparation), for an analysis in terms of transfer from Jamaican Creole).²⁶

²⁶ There is however one utterance using 'censé' (supposed to), usually analysed as raising to subject. But the learner, L20, uses it with an overt 'de' instead of the expected IP complement: "si j' étais censée de [/] d' assister un autre université" (L20 III1) (If I was supposed/forced 'de' to attend

Finally, as far as raising to object (with *believe*-type verbs) is concerned, we might have expected the structure to be incorrectly transferred from English even though it is ungrammatical in Standard French (without *wh*-movement). There is only one example in the entire corpus with such a *believe*-type verb followed by an infinitival clause:

(34) j' ai prouvé être prêt [//] ah ah prête ouh: xx (L16 I2)

I have proved to-be ready-MASC [//] ready-FEM xx

'I proved (myself) to be ready'

Interestingly, 'prouver' (to prove) is used correctly, in the sense that it is used as a control predicate taking a CP complement and a PRO instead of being used as a raising predicate with an overt subject. So, again no (negative) transfer from Standard English, that would have produced a raising structure, takes place.

6. Discussion

6.1. Data on the status of 'de' and control

I have hypothesized that, for certain Jamaican adult learners of French (namely L14 and L17), the pre-verb 'to' might be transferred with its morpho-syntactic properties and phonetically realized as 'de'. The source of this structural error seems obvious as both languages have the same basic structural representation and since superficial word order is consistent with both 'de' in CP or IP, the learners therefore could reanalyse (35.a) as (35.c) on the model of (35.b):²⁷

another university). In that case, it is possible that 'censé *de' (supposed to) would have an interpretation of objective modal necessity, maybe in line with the grammaticalization affecting 'sposta' in English (Collins 2009). Alternatively, 'censé' could be treated as a case of adjectival complementation on the model of 'foutu de' (capable of), etc., and for L20 'de' would be required by the adjective, rather than by the CP (See Kayne & Haik 1980:50, note 9).

²⁷ The generation of 'de' in Infl must make special provision with respect to the checking of non-finite features of the infinitival verbs at the inflectional level in covert syntax.

- (35)a. Paul a décidé [CP de [IP PRO chanter]]
 - b. Paul has decided [CP _ [IP PRO to sing]]
 - c. Paul a décidé [CP _ [IP PRO de chanter]]

A learner falling into that trap would not easily find positive evidence that 'de' or other COMPs are in CP, as there is no context in which 'to' would be ungrammatical in English (causatives, perception verbs, modals, and contraction) while the corresponding 'de' would be grammatical in French ('de' is ungrammatical as well in French in these contexts). I suggest, without developing this point due to lack of space, that one must go beyond word order, and, based on the fourth property identified in Kayne (1981) distinguishing 'de' from 'to', introduce considerations of scope with respect to negation to help learners reorganize their L2 grammar.²⁸

The overall data on control structures in the corpus seem to point to the conclusion that the structure is mostly acquired. Learners abundantly use control structures and chose linking words most of the time, although not always the correct one. This indicates their awareness that a linking word must be used. However there is no conclusive way, based on word order alone, to decide whether a learner generates the linking word in CP or in IP, as we have seen. This question therefore cannot be easily resolved based on corpus data alone, but the intervening position of clitic pronouns might indicate that 'de' is generated above IP for at least L12, L20, and L33.

6.2. Data on raising

The important fact is that raising structures are avoided by every learner, even in cases when (negative or positive) transfer of syntactic properties from Standard English would have allowed it to happen. Even though absence of a construction is not definite proof that it is not part of the grammar of the learners, and in any case more research is needed on other structures such as exceptional case marking (ECM) causative and perception verbs, and passivisation, the important point is the contrast between raising and control.

²⁸ Unfortunately, there is no negated infinitive in the corpus that would show the position of 'de' with respect to negation. More research is needed on this topic.

A possible trigger for the misanalysis of the L2 input by the learners could be based on the observation that, as we have seen, some of the most frequent raising structures in English are ungrammatical in French, and inversely that some control structures in French correspond to raising structures in English (see (3.b) and (14) above, repeated in 36):

(36)a. *I believe [CP PRO to be the most intelligent of all]Je crois [CP PRO être le plus intelligent de tous]b. *It seems to him/her [CP PRO to be right]Il lui semble [CP PRO avoir raison]

In (36.b), we even observe the use of 'sembler' (seem) as part of an object control structure, with a Dative clitic controller.

These examples are perfect instances of a "subset principle" (Haegeman 1992): learners, when confronted with an absolutely ungrammatical structure in Standard English that appears to be perfectly grammatical in Standard French, will be forced by the language faculty to reorganize their grammar, and, I hypothesize that this contrast is likely to mislead them into creating a UG constrained, yet incorrectly specified grammar of French in which raising would be disallowed. This, I suggest, would account for the fact that raising is not part of the IL grammar of these learners. Another factor might be the influence of Jamaican Creole which does not appear to have raising to subject structures.

6.3. The value and limitations of a corpus analysis

We have seen that some structures are never produced. Although avoidance can sometimes be interpreted as a symptom of transfer (Gass & Selinker 1992), absence of a structure cannot strictly be equated with ungrammaticality in the internal grammar of the learner. Starred sentences are obviously not part of a corpus.²⁹ Thus, it is impossible to know conclusively, based on corpus data alone, whether these missing structures are part of the grammar of the learner. Pure production data should ideally be complemented by comprehension data and

²⁹ Note that we have some data on learners' self-correction showing that they might be actively trying to modify the current intuitive state of their IL grammar.

grammaticality judgments tasks to have a complete picture of the internalized grammar.

With the use of a relatively small corpus, we can nevertheless draw generalizations, pinpoint specific problems and delineate precise areas of further investigation when the investigation is informed by a comparative approach to the syntax of IL. An advantage of the longitudinal learner corpus is that we are able to analyse each learner at a time the grammar of L2 they are creating. So it is possible that individual differences might emerge showing that some learners would choose one path of acquisition (for instance, in the overuse of 'de') and other learners another. After this individual analysis, one can then hope to find generalization on the entire population of learners (for instance, with respect to raising). Another benefit of the corpus approach is that the data from our oral corpus of Jamaican learners of French could be compared with data from learners of a different linguistic background (for instance, Australian learners of French) or learners of other languages (for instance, English speaking learners of Spanish, see Valenzuela 2008, Pérez-Tattam 2011 for studies on the acquisition of the Spanish CP system), and with written data. Finally, the learner corpus provides data on students' linguistic behaviour that could serve as the basis for pedagogical implementation.

7. Conclusion

This study illustrates a research combining the UG framework of SLA and the method of learner corpus. The study of IL as a grammatical system of its own is an invaluable source of data for trying to determine the grammar that the L2 learners are building, once limitations of a corpus analysis are recognised. Focussing on embedded interrogatives and control structures, we have hypothesized that the French input data and transfer of properties from the L1s can lead some English/Jamaican speaking learners towards an incorrect analysis of French grammar with respect to the categorial status and choice of phonetic realization of the linking words: 'de' as a pre-verb (for L14, L17), the possible use of the preposition 'pour' as COMP (by L14, L18, L31), vs. the correct analysis of 'de' as COMP (for L12, L20, L33). These factors also account for the contrast

between the productivity of control structures and the absence of raising to subject with typical *seem*-type verbs.

Further topics of interest include research on other non-finite completives (for/to, adjectival and nominal complementation, subject and adjunct clauses), a comparison with the acquisition of finite complementation, an investigation of other raising structures (such as passivization), an investigation of the possible semantic distinctions associated with the use of 'de', 'a', 'pour' and a more precise determination of their categorical status, a more precise analysis of the influence of Jamaican Creole, a comparison of Jamaican learners with learners from other linguistic backgrounds (for instance, Australian learners of French), and of course an investigation of the possible pedagogical import of this research.

References

Achard M 2000 'Construal and complementation in French: the perspective dimension' in K Horie (ed) *Complementation* Amsterdam: John Benjamins. Pp.91-120.

Bailey BL 1966 Jamaican Creole Syntax: a Transformational Approach Cambridge: Cambridge University Press.

Borsley 2001 'What do prepositional complementizers do?' Probus 13:155–171.

Boskovic Z 1997 The Syntax of Non-finite Complementation: an Economy Approach Cambridge, MA: MIT Press.

Carnac-Marquis R 1996 'The distribution of à and de in tough-constructions in French' in K Zagona (ed) *Grammatical Theory and Romance Languages* Amsterdam/Philadelphia: John Benjamins. Pp. 35-46.

Chomsky N 1995 The Minimalist Program Cambridge, MA: MIT Press.

Chomsky N & H Lasnik 1977 'On filters and control' Linguistic Inquiry 8:425-504.

Collins P 2009 Modals and Quasi-Modals in English Amsterdam/New-York: Rodopi.

Cox TJ 1983 'Teaching the unteachable' French Review 57:168-178.

Delattre P 1964 'Le jeu des prépositions dans l'enchainement des verbes en français' French Review 38:67-81.

Durrleman-Tame S 2008 The Syntax of Jamaican Creole: a Cartographic Approach Amsterdam/Philadelphia: John Benjamins.

Gass S & L Selinker (eds) 1992 Language Transfer in Language Learning Amsterdam/Philadelphia: John Benjamins.

Granger S, J Hung & S Petch-Tyson (eds) 2002 Computer Learner Corpora, Second Language Acquisition and Foreign Language Teaching Amsterdam/Philadelphia: John Benjamins.

Gross M 1968 Grammaire transformationnelle du français Paris: Larousse.

- Haegeman L 1991 Introduction to Government and Binding Theory Oxford: Blackwell.
- 1992 'La théorie générative et l'acquisition des langues secondes: La position des adverbes en français et en anglais' *Cahiers de linguistique française* 13:148-182.
- Hawkins R 1989 'Do second language learners acquire restrictive relative clauses on the basis of relational or configurational information? The acquisition of French subject, direct object and genitive restrictive relative clauses by second language learners' Second Language Research 5:156-188.
- Henry A 1995 Belfast English and Standard English: Dialect Variation and Parameter Setting Oxford: Oxford University Press.
- Herschensohn J 2007 L2 functional categories: syntactic development and morphological mapping' in D Ayoun (ed) *French Applied Linguistics* Amsterdam/Philadelphia: John Benjamins. Pp.103-129.
- Huot H 1981 Constructions infinitives du français: le subordonnant 'de' Genève: Droz.
- Jones MA 1996 Foundations of French Syntax Cambridge: Cambridge University Press.
- Kaye A 2005 'Gemination in English' English Today 21:43-55.
- Kayne R 1981 'On certain differences between French and English' Linguistic Inquiry 12:349-371.

- Kayne R & I Haik 1980 'De certaines différences entre le français et l'anglais' Langages 14:47-64.
- Lardière D 1998 'Dissociating syntax from morphology in a divergent L2 endstate grammar' Second Language Research 14:359-375.
- ——— 2000 'Mapping features to forms in second language acquisition' in J Archibald (ed) Second Language Acquisition and Linguistic Theory Oxford: Blackwell. Pp.102-129.

- MacWhinney B 2000 The CHILDES Project: Tools For Analyzing Talk Mahwah Hillsdale: Lawrence Erlbaum.
- Martineau F 1991 'Clitic climbing in infinitival constructions of Middle French in D Wanner & D Kibbee (eds) *New Analyses in Romance Linguistics* Amsterdam/Philadelphia: John Benjamins. Pp. 235-252.
- Martineau F & V Motapanyane 2000 'Infinitive subordinators and verb restructuring in French' in S N Dworkin and D Wanner (eds) *New Approaches to Old Problems: Issues in Romance Historical Linguistics* Amsterdam/Philadelphia: John Benjamins. Pp.217-231.
- Myles F 1996 'The acquisition of interrogatives by English learners of French: the role played by structural distance' in K Sajavaara (ed) *Approaches to Second Language Acquisition* Jyväskylä: Jyväskylä Cross-Language Studies. Pp.195-208.
- Pérez-Tattam R 2011 Second Language Competence: The Acquisition of Complex Syntax in Spanish Newcastle upon Tyne: Cambridge Scholars Publishing.
- Peters H 2005 'Development of a longitudinal oral Interlanguage corpus of Jamaican learners of French' *Caribbean Journal of Education* 27:75-96.

- 2009 'Lexical features in oral interlanguage: The acquisition of multifunctional words by adult Jamaican learners of French' The International Journal of the Humanities 7:51-62.
- ——— Acquisition of French Non-finite Complementation: Transfer in a Diglossic Context. ms. UNSW.
- Prévost P 2009 The Acquisition of French: The Development of Inflectional Morphology and Syntax in L1 Acquisition, Bilingualism, and L2 Acquisition Amsterdam/Philadelphia: John Benjamins.
- Rankin T 2009 'Verb second in advanced L2 English' in M Bowles et al. (eds) Proceedings of the 10th Generative Approaches to Second Language Acquisition Conference (GASLA 2009) Somerville, MA: Cascadilla Proceedings Project. Pp.46-59.
- Rizzi L 1978 'A restructuring rule in Italian syntax' in S J Keyser (ed) Recent Transformational Studies in European Languages Cambridge, MA: MIT Press.
- Rooryck J 1988 'Les verbes de contrôle métaphoriques' Revue romane 23:3-8.
- Rowlett P 2007 The Syntax of French Cambridge: Cambridge University Press.
- Schwartz B & R Sprouse 1996 'L2 cognitive states and the Full Transfer/ Full Access model' Second Language Research 12:44-72.
- 2007 'Linear sequencing strategies or UG-defined hierarchical structures in L2 acquisition? A reply to Meisel' in S. Karimi, V Samiian & W Wilkins (eds) Phrasal and Clausal Architecture: Syntactic Derivation and Interpretation Amsterdam/Philadephia: John Benjamins. Pp.295-318.
- Tranel B 1987 The Sounds of French: an Introduction Cambridge: Cambridge University Press.
- Valenzuela E 2008 'On CP positions in L2 Spanish' in J Liceras, H Zobl & H Goodluck (eds) The Role of Formal Features in Second Language Acquisition New-York/London: Lawrence Erlbaum. Pp.534-560.
- White L 2003 'On the nature of interlanguage representations: Universal Grammar in the second language' in C Doughty & M Long (eds) *The Handbook of Second Language Acquisition* Oxford: Blackwell. Pp.19-42.

Body-parts in Dalabon and Barunga Kriol: Matches and mismatches

Maïa Ponsonnet

The Australian National University, Canberra
Centre de recherche et de documentation sur l'Océanie (CNRS), Marseille
maia.ponsonnet@anu.edu.au

Abstract. This article describes a number of body-part lexemes in Dalabon, a non-Pama-Nyungan language of the Gunwinyguan family (Australia), and their counterparts in Barunga Kriol, the local creole. The aim of this paper is a comparison between some aspects of the Dalabon body-part lexicon and their counterparts in Barunga Kriol. Throughout the study of Dalabon and Barunga Kriol lexemes denoting the hand (or front paw) and its digits, the foot (or back paw) and its digits, the face, the nose and the nostrils, and finally, the head and the crown of the head, it is found that Barunga Kriol replicates some of the lexical structures of the local Aboriginal languages, but not all of them. In particular, a remarkable specificity of Dalabon, the fact that the head and the face are not labelled as such, and are preferably described as an assemblage of features, is only partially replicated in Barunga Kriol. The paper seeks to identify some of the factors explaining the matches and mismatches between Barunga Kriol and Dalabon.

Keywords. body-parts, Dalabon, Barunga Kriol, creole development, substrate influence

1. Introduction¹

This article compares some aspects of the body-part lexicon in Dalabon, a non-Pama-Nyungan language of the Gunwinyguan family,² and their counterparts in Barunga Kriol, the local English-based creole variety. The purpose of the article is two-fold. It is concerned with linguistic descriptions of the body in Dalabon on the one hand, and with substrate influence and other influences in creole development on the other hand. The article remains a preliminary study, leaving many questions unanswered. Wherever possible, I indicate directions for future research.

I present and discuss a number of lexemes of the Dalabon body-part lexicon, where some of the lexical distinctions found in English are merged. These lexical descriptions lead to a few conclusions and hypotheses about the way the Dalabon lexicon channels descriptions of the body.³ I focus particularly on the head and the face, which are described as an assemblage of features rather than wholes. This cross-linguistically unusual feature is partially, but not entirely, replicated in Barunga Kriol, and I will attempt to explain why this is so.

In order to do so, I question the influence of Dalabon and other local languages (Jawoyn, Rembarrnga, Mayali) on Barunga Kriol, the local creole (BK). A number of BK body-part words match Dalabon words in many respects, but not in every respect. I seek to explain resemblances and dissemblances between BK, Dalabon, and other local languages. BK features may result from transfer from local substrate languages (Siegel 2008); influence by Roper Kriol, an adjacent Kriol variety; from English influence; or—without actualising a "bio-program" (Bickerton 1984), some aspects of BK features may reflect some universal trends. It is often impossible to draw a firm conclusion at this stage, but in some cases it

¹ This research was carried out thanks to a grant from the Hans Rausing Endangered Language Documentation Program. I am very grateful to Gregory Dickson (Roper Kriol), Murray Garde (Bininj Gun-wok) and Adam Saulwick (Rembarrnga) for their generous collaboration. Felicity Meakins provided very helpful feedback on the original presentation of the paper. My warmest thanks go to David Wilkins, who took the time to read the earliest version of the paper in great detail and contributed the most useful comments and criticisms.

² See Evans, Merlan & Tukumba (2004) for a dictionary of Dalabon.

³ My interest in body descriptions in Dalabon is related to my research on the description of emotions; in Dalabon, many of the emotion-denoting words involve body-part nouns.

seems that transfer from local languages is the best explanation. I will also try to explain why transfer is applied to some substrate features, but not to others.

The rest of this section sets the linguistic context, presenting Dalabon first, then BK. In 1.3 I present the theoretical framework I rely upon; 1.4 describes the data and my methodology; and 1.5 describes my approach to lexical descriptions. Sections 2, 3, 4 and 5 in turn describe Dalabon and BK lexemes displaying interesting polysemies, e.g. lexemes that refer to hand (*langu-no*, "hand" and "finger"), foot (*dengu-no*, "foot" and "toe"), face (*dje-no*, "nose", "nostril" and face"), and head (*kodj-no*, "crown of head", "head"). Section 5 focuses on the mismatches between Dalabon and BK with respect to descriptions of the face.

1.1 Dalabon

Dalabon is a non-Pama-Nyungan language of the Gunwinyguan family (Figure 1). It is severely endangered, and the descendants of Dalabon speakers currently speak a creole called Kriol: more specifically, the variety called Barunga Kriol.



Figure 1. Top End languages. Information gathered and presented by Mark Harvey (Humanities and social sciences, University of Newcastle). Used with permission.

1.2 Barunga Kriol

Barunga Kriol is a creole spoken in and around the communities of Weemol, Wugularr/Beswick, and Barunga/Bamyili. It is one of the varieties of English-based creoles that developed throughout the Top End of the Northern Territory (coastal areas excepted) across to the Kimberleys. Kriol is a generic name for these varieties of creole, spoken by up to 30,000 Indigenous people (Lee & Obata 2010), across a vast portion of Central Northern Australia (Figure 2). Although it has not always been the case (Rhydwen 1995, 1996), in the Barunga region Kriol is now identified by its own speakers as a proper language and as an identity marker (Ponsonnet 2011).



Figure 2. Kriol area.

Kriol resulted from the creolisation of a pidgin commonly referred to as the Northern Territory Pidgin, which came to be used in the Northern Territory in the second half of the 19th century (Koch 2000). Roper Kriol, the best documented variety of Kriol, emerged at and around the Roper River Mission in the first decades of the 20th century. Harris (1986) (influenced by Bickerton, e.g. 1984) presents this emergence as a relatively abrupt process concentrating at the Roper River Mission. Munro (2000, 2004) depicts a more progressive and spread out development. It is not yet entirely clear how Kriol spread over such a broad area of Northern Australia. Contra Sandefur's suggestion that varieties of Kriol emerged separately in various places (Sandefur 1986:21), Munro (2000) argues against independent geneses, suggesting that Kriol spread from its original Roper River birthplace.

BK emerged at the settlement of Barunga towards the end of the first half of the 20th century (Sandefur 1986:21). Speakers' accounts confirm that the four languages spoken around Barunga (Figure 1) were in use at the time when Kriol developed. These are all Gunwinyguan languages, namely Jawoyn, Mayali (a Bininj Gun-wok dialect, Evans (2003)), Rembarrnga and Dalabon. Historical research is

needed before I can assess the exact status of each of these languages in the local language ecology at the time, in terms of demographics and social status (Mufwene 2001). For the purpose of the current preliminary study, I rely on oral accounts (corroborated by (Cowlishaw 1999)) which indicate that a significant proportion of the inland Dalabon population had been deported to the Barunga region. As a result, Dalabon numbers at the settlement would have been significant. On the other hand, Dalabon speakers' narratives emphasize that they had to live on Jawoyn land, coping with the distressing presence of other groups. It seems clear from these contemporary accounts that Dalabon speakers were not in a dominant position. But since they formed a demographically significant group, influence of Dalabon on BK is plausible.⁴ When assessing various influences upon BK, the lexicon of the three other substrates will also be considered, based on published material (Garde 2010, Merlan & Jacq 2005a, 2005b, Saulwick 2003), as well as personal communications.

One of my informants reported on the presence of members of the Marra group at Barunga in the 1960s, when BK was developing as the first language of the emerging generation. Marra is spoken around Ngukurr/Roper River, and it is likely that these people spoke Roper Kriol as well. This supports Munro's diffusion hypothesis, indicating possible influences from Roper Kriol on BK. On the other hand, the lexical study shows that this influence would have been limited, at least with respect to lexical structures (see section 5.3 about BK *hed*).⁵

1.3 Explaining Barunga Kriol lexical structures

In the following sections, I will investigate the lexical distinctions found in Dalabon for a number of body-parts. I will compare them to those found in BK, and in English, the lexifier. In each case I will consider which lexical distinctions are shared by Dalabon and BK, and which are not. Overall, the semantic structure

 $^{^{4}}$ Especially with respect to the particular variant used by BK speakers of Dalabon descent.

⁵ Ideally, the influence of the Northern Territory Pidgin should be taken into account, but there is little or no data on its lexical structures, let alone for local varieties around Barunga. In addition, one may wonder whether this pidgin could have contributed lexical structures different from the ones already found in English, Roper Kriol or substrate languages. However, the pidgin did contribute forms (see section 5.2). For data on Northern Territory Pidgin see Baker and Mühlhäusler (1996), Foster, Monaghan and Mühlhäusler (2003), Troy (1990, 2003). See also Meakins (to appear) for an overview of contact languages in Australia.

of BK lexemes does match Dalabon patterns closer than English patterns. For instance, while English distinguishes between "hand" and "finger", both BK and Dalabon have one single term meaning both "finger" and "hand": BK *bingga* (<Eng. "finger") and Dalabon *langu-no.*6 But there are also dissemblances. For instance, the Dalabon term for "nose", *dje-no*, can also mean "face." Dalabon has no other term for "face". This is not the case with BK *nos* (<Eng. "nose"), which cannot mean "face"—BK has *feis* (<Eng. "face"). Both resemblances and dissemblances call for explanations. They may be accounted for in several ways.

A possible explanation calls upon substrate influence and the notions of transfer, availability constraint and reinforcement principles devised by Siegel (2008:105-234). Siegel defines transfer as a mechanism that takes place during communication in L2, whereby speakers supplement their knowledge of L2 using their knowledge of L1 for the sake of effective communication. As a result of transfer, structural features of L1 (the substrate language) are imposed on L2 (the emerging creole). A condition of transfer is that a perceptually salient element is present in L2 for the substrate feature to be transferred upon: this is the availability constraint (Siegel 2008:148 onwards). Another modulating principle is reinforcement (Siegel 2008:148 onwards): when a given feature is common to several substrates, more speakers are likely to impose a similar feature on L2, and this feature is more likely to persist in the stabilized creole. The mechanism of transfer, the availability constraint and the reinforcement principle will be used to explain some of the resemblances and dissemblances between Dalabon and BK.

Another way to account for BK features is Roper Kriol influence. If, as suggested by Munro, the presence of Kriol across Northern Australia results from the spread of Roper Kriol, we must expect similarities between BK and Roper Kriol. In-depth studies of the Roper Kriol body-part lexicon should be carried out in order to assess the exact impact of Roper Kriol influence. In this preliminary

⁶ In Dalabon, a large number of words are followed by a suffix of the form *-no* which can endorse several functions. *-No* is the 3sg possessive suffix, but can also be (among other things) a morphological filler occurring on bound nouns. Body-part nouns are bound, which means that if they are not included in a verbal or nominal compound, they must be followed by a possessive suffix. This suffix agrees with the person of the possessor, and remains *-no* (3sg) if the possessor is not identified. Early in the study of Dalabon, a decision was made to include *-no* in the quotation form of body-parts (Evans and Merlan 2001). See Ponsonnet (in prep.) for a detailed descriptions of Dalabon nominal subclasses and of the *-no* suffix.

work, I rely on information provided by the linguist Gregory Dickson, a proficient second language speaker of Roper Kriol.⁷

Last but not least, superstrate influence may also account for BK features. Given features in which BK resembles English rather than Dalabon and/or other local or neighboring languages, it is reasonable to hypothesize superstrate influence.

At this stage of the research, it is not always possible to discriminate between each factor. In some cases, like with BK *hed* (5.3), transfer from substrate languages is the most plausible explanation. In other cases, like with BK *feis*, superstrate influence from English is more likely (4.2.1). This partition calls for an explanation: why does substrate influence dominate in some cases, and superstrate influence in other cases? My current hypothesis, developed in 6.2, is that the particular lexical patterns at stake and the nature of the semantic extensions they rely upon may have had an impact on substrate transfer.

1.4 Data and methodology

The lexical and semantic analyses presented below are based on data collected in the communities of Weemol, Wugularr/Beswick and Barunga/Bamyili between 2007 and 2011. The examples are extracted from a corpus containing a mix of narratives and contextualised elicitation. Another important portion of my data on body-parts comes from pointing tasks on life models, photos and pictures of animals, and other tests based on various stimuli. Some of them were designed in advance or repeated from other studies (e.g. Van Staden & Majid (2006)'s colouring task, carried out according to their recommendations); others were improvised in the field. Dalabon and BK speakers responded positively to these tasks and performed them with ease. These tests provide consistent and relevant non-verbal clues about speakers' assessments of their lexemes. The information provided by such tests should be distinguished from the information related to

⁷ Gregory Dickson works on Roper Kriol, and is also an accredited interpreter. However, he hasn't researched the semantics of body-parts, so his personal communications should not be treated as research outcomes but as second language speaker's intuitions.

the use of lexemes in context. Along the article, the code above each example indicates what type of data is being presented.⁸

I have carried out systematic pointing tasks, using standardized sets of photographs and drawings with the available speakers of Dalabon, 4 women in their fifties and sixties. I also carried out similar tests in BK with 14 speakers, ranging from 10 to 70 years old, relatively well distributed across generations. Most (but not all) of them were female of Dalabon descent. The 4 Dalabon speakers were asked to repeat the test in BK.9 The tests repeated in BK and Dalabon focused on heads and legs of kangaroos and crocodiles, as well as human head/faces, hands and fingers, using the same photos and drawings with all participants.¹⁰

1.5 Lexicographic issues

For each lexeme considered, I start with its description in Dalabon, before comparing it with English and BK. I assess its denotational range, i.e. to which part of the body the term can refer to. I also determine which denotation is primary, i.e. which one is more frequent and/or more salient for speakers. This becomes apparent in stimuli-based tasks, and will be relevant when I try to explain some of the mismatches between BK and Dalabon. I will sometimes talk about "semantic extension" or say that the sense of a word "extends" from a given denotation to another denotation. By this I mean that, in synchrony, the former denotation is the primary denotation of the word, while the latter is secondary. I make no claim about diachrony.

Traditionally, a description of a lexical item includes an assessment of the relations between its different senses: is the lexeme polysemous or monosemous?

⁸ [Narr]: narratives; [Sc]: cultural script, scenario; [ContEl]: contextualised elicitation; [ElConv]: conversation in the course of elicitation; [Stim]: response to elicitation stimuli; [El]: pure elicitation.

⁹ At a reasonable distance in time after their Dalabon performance.

¹⁰ The stimuli were: photographs of a crocodile's head and crocodile's leg; of a kangaroo's head, the drawing of an entire kangaroo; drawings of human heads and faces with and without the nose. Due to the circumstances and practicalities in the field, the setting of the test was not entirely standardized. Some of the speakers were presented with a slightly different range of stimuli, or the stimuli were presented in a different order, sometimes in several sessions. Nevertheless, the stimuli used and the questions asked were systematic enough to allow straightforward, unambiguous comparison between speakers' respective responses and between languages.

A polysemous lexeme has several distinct senses, while a monosemous lexeme has one general sense. This distinction, essential to lexicographers, is usually revealed by speakers' reactions in disambiguation tests. While speakers seemed at ease with pointing tasks and stimuli-based tests designed to unfold denotational ranges, most polysemy tests resulted in speakers' confusion, in spite of my efforts to present them adequately. Only a small fraction of the outcome of such tests can be used, and with great caution. In the present study, it is not indispensable to discriminate unambiguously between polysemy and monosemy, but I will punctually exploit polysemy tests, where they provide information about how the speakers assess the sense(s) of their lexemes.

I will not systematically discuss the issue of parthood and meronomy (as considered by Brown (1976), Enfield, Majid & Van Staden (2006)). Dalabon does not have a dedicated expression meaning "part of". BK has a suffix -pat, that occurs optionally on body-parts: am or ampat (<Eng. "arm" + "part"), hed or hedpat (<Eng. "head" + "part"), etc. And we also find hodipat (<Eng. "body" + "part"), but meaning "body", not "body-part". The BK suffix -pat bears some resemblance with the obligatory suffixes on Dalabon bound nouns (note 6). Otherwise, Dalabon has a verb yidjnjan "have", "hold", which can be used in contexts such as "a hand has a finger." But since the same verb can be used to express "the hand holds a spear", tests involving yidjnjan cannot distinguish parthood from contiguity. As a result, linguistic evidence of body hierarchies are not straightforward. For reasons of space, I have chosen not to explore this point systematically, although I will comment on hierarchies in section 5.

2. Around the hand

2.1 Dalabon langu-no, "hand", "finger"

2.1.1 Denotational range

As pointed out by Wilkins (1996:283), many Australian languages use one single term to denote both "hand" and "finger", where English has two lexemes. This polysemy is found in Dalabon, as well as in the neighbouring languages—Jawoyn, Mayali, Rembarrnga. It is also found in Roper Kriol (Dickson pers. comm.).

Dalabon *langu-no* denotes both the finger and the hand. Across contextualised examples, pointing tasks and other tests, *langu-no* is found with the following denotations:

- the whole hand, including the fingers;
- the fingers, or one finger;¹¹
- the front paws on animals like crocodiles and kangaroos;¹²
- the associated digits;
- the back feet on reptiles;
- the digits of the back feet on some animals, like reptiles;
- the long and thin legs of animals like crayfish (Figure 4 below).

Throughout narratives, pointing tasks and other stimuli-based tasks, *langu-no* was never used to denote the arm. ¹³ The term for "arm" is *warnu-no*, and pointing tests demonstrated that *langu-no* cannot be used to refer to the whole arm. Presented with Figure 3, a speaker rejected the sentence "worrbbamh kah-yidjnjan kanh langu-wanjingh-walung" "this one has three [marks] on one *langu-no*" in favor of "worrbbamh kah-yidjnjan kanh warnu-wanjingh-walung", "this one has three [marks] on one warnu-no", confirming that a mark on the arm cannot be described as "on the *langu-no*".

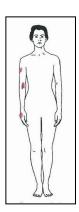


Figure 3. Body drawing used in hierarchy tasks. From Van Staden & Majid (2006). Used with permission.

¹¹ Since Dalabon does not mark plural on inanimates, all body-part terms can denote their referent as one or several.

¹² I have no data regarding feral animals.

¹³ Claws and nails are labeled distinctly as *malanj-no* or *langu-malanj-no*. In pointing tasks, speakers' gestures usually identified nails and claws independently from fingers, and they often uttered the specific label for these body-parts.

In narratives, *langu-no* more often denotes a human body-part that can grab things and that may hurt or be hurt, etc.¹⁴





Figure 4. Crayfish, by a local artist. 15

Figure 5. Short-necked turtle, by a local artist. 16

The fact that the denotations can include the legs of the crayfish on Figure 4 suggests that the shape plays a part in the way *langu-no* is applied: a large number of long, thin body-parts attached to a larger mass are labeled *langu-no*. Shape may also explain why *langu-no* can denote the back feet on reptiles. On Figure 5, the back feet of the short-necked turtle are very similar in shape to the front feet.

Two types of distinctions observed in the English lexicon are merged in Dalabon. On the one hand, Dalabon *langu-no* applies indifferently to human and to animal body-parts, while English has at least two words, "hand" and "paw". This remark applies throughout the body-part lexicon in Dalabon.¹⁷ In contrast, English has at least two sets of terms, one for animals and one for humans (some terms—*head* for instance—are common to both sets). Other local languages, Jawoyn, Rembarrnga and Mayali, resemble Dalabon in this respect. In addition, Dalabon merges the distinction between "hand" and "finger" also found in English:

¹⁴ There is another term, *ngarrinj-no*, used more frequently by some speakers and less frequently by others. In all the occurrences observed, *langu-no* and *ngarrinj-no* display identical denotational range and semantics, so that I consider them equivalent for the purpose of this paper. Here I describe *langu-no*, the most frequent lexeme in the speech of my most reliable informant. LANGU and NGARRINJ are found in compounds denoting social behaviour such as *ngarrinj-yidjnjan*

[&]quot;hand"+"hold", "shake hands", ngarrinj-ye-mang, "hand"+comitative+"take", "lend a hand", etc.

¹⁵ †Kamarrang Neal Manyita.

¹⁶ †Kamarrang Billy Yalawanga.

¹⁷ Even species-specific body-parts are often labeled with terms found for other species: the beak of a bird is called *dje-no*, which means "nose" for a human being (section 4.1.1). There are exceptions: the crest of crocodiles or birds for instance, is called *komdjilin-no*, which does not denote any human body-part.

[ContEl]

[If your wrist is crippled, paralysed; touching the back of her hands.]

(1) Mak wuku-langu-roka-n.

NEG 2sg:APPR-hand-move-PR¹⁸

'[If your wrist is paralysed] you may not move your hand.'

[Stim]

[Describing the photo of a crocodile leg where a digit was missing.]

(2)	Wirrimah	kardu	worrbbamh-wurd	ka-h-langu-dih.
	or	maybe	four-DIM	3sg-R-finger-PRIV
	Wanjingh-walung	kardu	ka-h-langu-dadj-m-inj.	
	one-ABL	maybe	3sg-R-finger-cut-VBLZR-PP	

'Or maybe the small fourth finger is missing.

One finger might have been cut off.'

2.1.2 Salient denotation

Stimuli-based tests demonstrate that the salient sense of *langu-no* is the whole hand (or paw),¹⁹ rather than individual digits. This becomes clear in pointing tasks, where speakers point at the whole hand (at the center of the palm, or circling the whole hand including fingers), not at one finger, for *langu-no*. The same phenomenon recurs in the colouring tasks, where Dalabon speakers asked to colour the area labeled *langu-no* coloured the whole hand, as shown on Figure 6.

List of glosses used: ABL: ablative case; APPR: apprehensive mood; BEN: benefactive; COM: comitative; CSTVR: causativizer; DEM: demonstrative; LOC: locative case; DAT: dative case; DEF: definite article; DIM: diminutive; h: person higher in animacy; INTERJ: interjection; NEG: negation; PI: past imperfective; pl: plural; POSS: possessive; PP: past perfective; PR: present; PRIV: privative; PST: past; R: realis mood; SEQ: sequential; sg: singular; TRSVR: transitivizer; VBLZR: verbalizer.

 $^{^{19}}$ I will say "hand" for the benefit of brevity, but the reader should understand "hand or paw".



Figure 6. Body drawing used in colouring tasks. From Van Staden & Majid (2006). Used with permission.

In the case of *langu-no*, there are convincing indications that the term is polysemous—that is, the two senses are distinct. Example (2) above supports this view. Set up tests involving quantification confused speakers, but one test involving colours yielded better results. Presented with Figure 7, a speaker willingly repeated the following sentence:

 $\mathbb{E}\mathbb{I}$

(3) Yo, langu-ngurrmiyi bah langu-barmiyi-dorrungh.

INTERJ hand-brown but finger-white-COM

'Yes, a brown hand, but with a white finger.'



Figure 7. Drawing of hand used in polysemy tests.

Another clue in favor of polysemy is that in pointing tasks, speakers quantify for *langu-no* "hand" and *langu-no* "finger" separately. Thus, speakers listing body-parts on a drawing may indicate that there are two *langu-no*, and immediately after, that there are many *langu-no*.

Langu-no is genuinely polysemous between "hand" and "finger", and there is no other term meaning "any digit", or meaning the "body of the hand" (without the

fingers).²⁰ However, it is interesting to note that the series of compound expressions used to label the palm and back of the hand on the one side, and types of digits on the other side, delineate a distinction between the "hand" and the "finger" senses of *langu-no*. The palm and the back of the hand, i.e. the two sides of the "body of the hand", can be described using compounds of the form *langu*+body-part noun+*no*.

- (4) langu-kangu-no
 hand-belly-3sg.POSS
 'palm of the hand'
- (5) langu-dolku-no
 hand-back-3sg.POSS
 'back of the hand'

These two expressions activate a metaphor whereby the hand is compared to a whole body, with a back and a belly. Dalabon also has compound nouns to distinguish the thumb from other fingers.²¹ These compounds have a slightly different form: *langu*+adjective+*no*.

(6) langu-boyenj-no (7) langu-yawo-no²²
hand-big-3sg.POSS hand-small-3sg.POSS
langu-badjan-no 'smaller fingers'
hand-mother.one-3sg.POSS
'thumb'

The contrast between the thumb and other fingers operates via specification of size; a possible metaphor is "the fingers are a familly". Both the morphology and the semantics of the compounds in (4) and (5) on one side, and (6) and (7) on the other, covertly contrast the labels for the parts of the "body of the hand" and the labels for different kinds of fingers. This confirms that while the primary denotation of *langu-no* is "hand", the "finger" denotation of *langu-no* is also a well-identified denotation, which speakers perceive and activate as a sense of itself.

²⁰ A part that typically lacks an individual label in English, as pointed by Cruse (1986:171).

²¹ Fingers are used to sign the name of species of kangaroos, in hunting, and each finger can also be called by the name of the species it signs. These labels are no longer well-known and are never used in ordinary speech, nor even in pointing tasks.

²² Badjan-no and yawo-no are among the few Dalabon lexemes for which it is hard to determine whether they are nouns or adjectives. In any case, they are not "straightforward" nouns as body-part nouns are. Boyenj "big", on the other hand, is clearly an adjective. (See Ponsonnet (in prep.) for a description of word classes in Dalabon.)

2.2 Barunga Kriol bingga and hen

2.2.1 Matches

In BK, *bingga* (<Eng. "finger") adequately translates *langu-no*. Evidence from contextualised examples and tests shows that *bingga* covers the denotational range of *langu-no*, including the extremity of front limbs of humans and animals as well as their digits, and, marginally, the back feet of reptiles and associated digits.²³ Examples (8) and (9) exemplify *bingga* as used unambiguously in its "hand" and then "finger" senses respectively.

[Narr]

[Touching the back of her hands.]

(8)*Imin* itim imlanga dis bingga tu said. iya 3sg:PST hit:TRSVR 3sg hand two side here LOC DEF 'He hit her here on both hands.'

[Stim]

[Describing the photo of a crocodile leg where a digit was missing.]

(9) Im oni goda bobala bingga.
3sg only have four finger
'It only has four fingers.'

Speakers' quantificational habits replicate those observed with *langu-no* (5.1.3): speakers are happy to alternate between two and five when they count *bingga* on a drawing. In addition, BK speakers also use adjective+HAND collocations to refer to the thumb as "big finger" and to other fingers as "small fingers": *big bingga*, *lil bingga*.²⁴

Thus, as shown by Figure 4 in section 4.2.3, BK *bingga* aligns with Dalabon *langu-no* to the extent that it replicates the polysemies described above: between animal and human body-parts, and between "hand" and "finger". English does not display such polysemies. Similar polysemies between "hand" and "finger" occur in

²³ BK also has the term *hen* (<Engl. "hand"), which seems to have the exact same denotation range as *bingga*. *Hen* is less frequent than *bingga*, and younger speakers in particular do not use it very spontaneously. I focus on the most frequent lexeme.

²⁴ Also big hen, lil hen.

the other three local languages—Jawoyn, Mayali and Rembarrnga. They occur in Roper Kriol as well.

2.2.2 Possible mismatch

There are some indications that *bingga* may also be used to refer to the whole arm, as suggested in example (10). This is somewhat marginal, as the most common BK term is am (<Eng. "arm"). This extension was encountered only with younger speakers, under 30 years old. In contrast, Dalabon langu-no cannot refer to the whole arm. Further investigation is needed to confirm this extension of bingga to "arm". Even if it does confirm, this use of *bingga* seems relatively marginal.

[Stim]

2.2.3

[Pointing at the shoulder on the photo of a kangaroo.]

Interpretation

The table below compares the lexical structures of Dalabon (and other local languages), BK and English—leaving aside the animal/human merging, which occurs across the whole body-part lexicon in Dalabon and BK.

	upper DIGIT i.e. 'finger'	WHOLE ENDING of upper LIMB i.e. 'hand including finger'	upper LIMB i.e. 'arm including hand and finger'
Dalabon	langu-no		warnu-no
ВК	BK bingga		am
BK (to be confirmed)	?hingga?		
English	finger	hand	arm

Figure 8. Compared lexical structures of Dalabon langu-no and warnu-no, BK bingga and am, English finger, hand and arm.

There may be two reasons why BK lexical structures match Dalabon and other local languages with respect to the "hand"/"finger" polysemy. It may be a case of substrate influence: since this polysemy is present in all local languages, the transfer of this feature would have been amply reinforced. On the other hand, Roper Kriol has the same word *bingga*, with the same polysemy. This Roper Kriol lexeme may be the source of the BK lexeme.

With respect to the possible extension of BK *bingga* to "arm", which is absent in Dalabon, influence from Roper Kriol is less plausible, since in Roper Kriol *bingga* is not attested for "arm" (Dickson pers. comm.). But the hand/arm polysemy is found in one local language, Jawoyn. It is possible that this Jawoyn feature also transferred to BK. This would indicate that Jawoyn had a greater influence than other substrates, which is not implausible considering what is known of the local language ecology at the time (see 1.2). In addition, "hand'/"arm" polysemies are common cross-linguistically (Brown 1976:405), so that transfer may have been favored by universal trends.

3. Around the foot

3.1 Dalabon dengu-no, "foot", "toe"

Dalabon displays the same polysemy between the extremity of back limbs and their digits, as with the extremities of front limbs and their digits. Dalabon dengu-

no "foot", "toe" mirrors *langu-no* in many respects, albeit for back limbs.²⁵ Because the case is similar to the one of *langu-no* in section 2, I will present *dengu-no* very briefly.

Dengu-no and langu-no display parallel denotational ranges. Dengu-no can refer to:

- the whole human foot;
- less frequently, the toes of a human;
- the back paws of various animals with four limbs, including reptiles' back feet (the use of *langu-no* is marginal);²⁶
- the digits of back paws and feet;
- the whole foot of an emu;
- the claws of an emu.

In context, *dengu-no* is often used to talk about the human body-part—on which one walks, which hurts, etc. It is also an important edible part in animals like emus and kangaroos.²⁷ *Dengu-no* is also used to mean "shoe(s)".

"Foot" is the most salient sense, as shown by speakers' responses in pointing and colouring tasks. Polysemy tests with colours yielded comparable results with *dengu-no* as with *langu-no* (example 3). *Dengu-yawo-no* (*dengu*+"small"+*no*) and *dengu-badjan-no* (*dengu*+"big"+*no*) are also attested, contrasting "big toe" and "smaller toes", mirroring the contrast between *langu-badjan-no* "thumb" and *langu-yawo-no* "smaller fingers". However, the covert distinction between the "body of the hand" and the fingers is not as clear with foot and toes.

3.2 Barunga Kriol but, "foot", "toe"

BK has *but* (<Eng. "foot") which displays the same range of denotations as Dalabon *dengu-no*, covering both the extremity of lower limbs and the associated digits, across species. *But* is also used for "shoe(s)". In addition, BK also has the word *tow* (<Eng. "toe"), which means "toe". The table below compares Dalabon, BK and English patterns.

_

²⁵ This parallel conforms to Brown's prediction (Brown 1976:405).

²⁶ Snakes have no *dengu-no*.

²⁷ DENGU is attested in one compound with a social behaviour sense, namely *dengu-rokan* "foot"+"move", in negative clauses: *mak nga-dengu-rokan*, "I don't move my feet", "I'm not influenced by what I was told".

	lower DIGIT	WHOLE PART ENDING lower LIMB	
Dalabon and others	dengu-no		
BK	but		
BK	tow		
English	toe	foot	

Figure 9. Compared lexical structures of Dalabon dengu-no, BK but and tow, English foot and toe.

BK and Dalabon both display a "foot"/"toe" polysemy which is absent in English. The same polysemy is attested in Mayali. Maybe because people do not often talk about toes, it is difficult to find data on "toe" in published material. As a result, it remains difficult to explain the related BK lexical structures and the existence of *tow* in BK. Like with *bingga* "hand"/"finger", the BK *but* "foot"/"toe" polysemy may result from substrate transfer of local features, or may possibly originate from Roper Kriol. BK *tow* "toe" may result from English superstrate influence.²⁸ More data on the lexicon of the other local languages, and of Roper Kriol, is needed to clarify these points.

4. Around the face

4.1 Dalabon dje-no, "nose", "nostril", "face"

4.1.1 Denotational range

Dalabon *dje-no* translates to "nostril", "face" and "nose". Between occurrences in context, pointing tasks and other tests, *dje-no* was found to apply to the following:

- On human beings:
 - the nostrils;

- the nose, including the nose bridge;
- the whole face (the front part of the head).

²⁸ Neither the Jawoyn nor the Rembarrnga dictionary mention a separate term for "toe". But since they do not mention "toe" at all (either as a separate lexeme, or as an extension of another term), it is difficult to draw any conclusion.

- Parallel denotations are found on animals, with a couple of differences:
 - on crocodiles, the nostrils and the tip of the nose are the most salient denotations;
 - on birds, *dje-no* is the beak.²⁹

Apart from body-parts, *dje-no* can also refer to little holes in trees, or to the hook of a spear-thrower. Here again, shape seems to play an important part, since the little holes on a tree resemble nostrils visually (especially nostrils of animals, like on a crocodile), and the hook of a spear-thrower is a small protuberance, sticking at an angle out of the main body of the instrument.

In discourse, *dje-no* is more often used to denote the nose. The sense "face" is attested (example 12 below) but is less frequent, and difficult to exemplify because most contexts do not allow to disambiguate between the "nose" and "face" denotations. However, this sense is confirmed by speakers' reactions in pointing tasks: they label the whole face *dje-no* when prompted to give it a name (e.g. circling the face on a drawing), and younger speakers spontaneously use *dje-no* to describe isolated drawings of faces (Figures 10 and 13 below).³⁰

Dje-no covers the denotations expressed by three distinct English lexemes: "nose", "nostril" and "face". Example (11) shows how in some contexts, *dje-no* is used where "nose" would be used in English (as opposed to "face", which would be inadequate). In contrast, in example (12), *dje-no* may not be translated as "nose", but as "face". Unfortunately, I have no contextualised example displaying a clear contrast between "nostril" and "nose". However, the distinction between these two denotations became clear in elicitation, for instance when speakers pointed twice separately to each nostril, labeling them *dje-no*. Nostrils may alternatively be labeled *dje-dun-no*, literally *dje+*"hole"+no.

[ContEl]

(11) Dje-no-walung [...], ka-h-dja-kulu-bo-n, kanh wurdurd-wurd [...]. nose-3sg.POSS.ABL 3sg-R-just-mucus-go-PR DEM child-DIM '[It's running] from her nose, this child's nose is running.'

²⁹ Dalu-no "mouth" cannot be used for "beak".

³⁰ A couple of verbal compounds including DJE lexicalise a social or emotional sense. Examples of these compounds are *dje-bruh(mu)*, DJE+"blow": "be sad", "be upset"; *dje-bengkan*, DJE+"know": "think about someone" or "know someone".

[ContEl]

[Touching her cheek and side of chin.]

(12) Wurdi nga-h-dje-werleberrk-mu!

INTERJ 1sg-R-nose-?hang.down?-VBLZR:PR

'Oh dear, I'm all wrinkled!'31

Just like *langu-no* "hand", "finger" and *dengu-no* "foot", "toe", *dje-no* applies across human and animal species. Modulations between species are more significant, probably because the differences in shape across species are more important than with limbs. In English, "nose", "nostril" and "face" also apply to animals, hence in this case, Dalabon does not differ from English.

4.1.2 Salient denotations

4.1.2.1 Nose and nostril

The "nose" denotation of *dje-no* is the most salient. When asked to point at *dje-no* on a human being, speakers pointed at the tip of the nose or circled the whole nose; on kangaroos they pointed at a relatively large area around the nostrils; and on birds they pointed at the beak. On crocodiles, however, they usually pointed at the tip of the nose, which corresponds to the nostrils (but the tip of the lower jaw, where there is no nostril, was also sometimes called *dje-no*). In colouring tasks, speakers coloured the whole nose, and the nose only.

The nostril denotation is also relatively salient (and maybe prominent on crocodiles). In pointing tasks, speakers often embedded a discrete double pointing at the nostrils as they circled the nose. With quantification, speakers can identify one *dje-no*, circling the whole snout of a kangaroo for instance, and immediately after, state that there are two *dje-no*, meaning that there are two nostrils. This suggests that *dje-no* is polysemous between "nose" and "nostril", with the larger part, the "nose", being the most salient denotation.

Thus the pattern is the same as the one identified in section 2.1 for *langu-no*, between the senses "hand" and "finger". That is, while the "nose", the larger part, is the primary denotation of *dje-no*, the "nostril", the smaller part, is also a well-

_

³¹ There is no reason to think that *dje-weleberrkmu* attracts a non-compositional reading. *Weleberrkmu* is found in verb compounds of the form body-part+*weleberrkmu*, with body-parts of various sorts, where the compounds have a compositional reading meaning "body-part hangs down".

identified sense, and a denotation that speakers activate independently and identify somewhat consciously. Like with *langu-no*, the primary denotation for *dje-no* is the larger part (hand or nose), while the secondary but well-identified denotation is a smaller part (finger or nostril).

4.1.2.2 Nose and face

In contrast, the "whole face" denotation of *dje-no*, while relatively common in discourse,³² becomes radically backgrounded in stimuli-based tasks. Speakers will only label the whole face *dje-no* if prompted—there is no alternative word to refer to the face, so that in fact speakers rarely label the face. Older speakers, who have learnt BK as a second language and have had less exposure to English, only label the face if the prompt to do so is very straightforward. For instance, tests based on drawings where part of a human head was coloured so as to isolate the face as a whole, in order to trigger the label *dje-no* for "face", systematically failed. In pointing tasks, older speakers would only associate the label *dje-no* to the whole face when I explicitly encouraged them to do so, circling the whole face with my finger. The "face" sense of *dje-no* is slightly more salient for speakers who are more familiar with BK and more exposed to English. I account for this phenomenon below (4.2.1).

No test could ever demonstrate a polysemy between *dje-no* "nose" and *dje-no* "face". When Figure 10 was presented to speakers, one of them came close to saying "nunh dje-no kah-dje-dih", "this dje-no has no dje-no"—"this face has no nose". But her reaction of surprise and denegation indicated that this co-occurrence of the two denotations of *dje-no* in the same sentence sounded abnormal to her.



Figure 10. Face drawing used in polysemy tests.

In principle, this judgment may indicate that the item is monosemous between "nose" and "face". Based on a traditional definition of monosemy, this amounts to saying that *dje-no* is general between "nose" and "face", "nose" and "face" thus being subsumed under one general concept. But since the salient denotation of

³² Albeit often within verbal compounds.

dje-no is "nose", the smaller part, monosemy is implausible—because it would entail that the concept of face should be subsumed under the concept of nose, which is counter-intuitive. In fact, the result of this polysemy test is better interpreted as an indication that the "face" denotation of dje-no is so secondary that it is virtually inaccessible to speakers' metalinguistic awareness. In this sense, Dalabon speakers do not have a well-identified concept of face. As a result, it is less surprising that speakers do not distinguish the "face" denotation from the "nose" denotation, of which they are aware.

To summarize, *dje-no* operates two distinct mergings as compared to English. One of them, the merging of "nostril" and "nose", displays a similar structure as the *langu-no* "hand"/"finger" merging. In this merging, the larger part is the most salient denotation, the smaller part is a well-identified denotation, and the lexeme is polysemous. The other merging displays a different structure: the salient denotation is the smaller part, the larger part is a very secondary denotation, and speakers' awareness of the second denotation is so low that polysemy tests cannot obtain it.

4.2 Barunga Kriol nos and feis

4.2.1 Matches and mismatches

Here again, BK lexical structures resemble Dalabon lexical structures, albeit partially. The lexeme *nos* (<Eng. "nose") appears to denote the nose and the nostrils:

[ContEl]

(13) Nos raningdan, bedkol.

nose run.down mucus

'His nose is running, with mucus.'

With respect to "nose" and "nostril", the respective denotations of *dje-no* and *nos* display an accurate match.³³ Across species, the BK speakers I have interviewed used *nos* exactly like Dalabon speakers used *dje-no*. For instance, the tip of the nose

³³ However, it seems that *nos* cannot be used to describe the hook of spear-throwers (which is called *huk* (<Eng. "hook")).

is salient on crocodiles; gestures and counting practices are identical, etc. The expression *noshol*, (<Eng. "nose"+"hole") replicates Dalabon *dje-dun-no* (literally "nose hole"), for "nostril".³⁴

While BK *nos* replicates the "nose"/"nostril" polysemy found in Dalabon, BK *nos* does not occur with the "face" denotation. Instead we find *feis* (<Eng. "face"): ³⁵

[Sc] [About signs of pregnancy.]

(14) Laik if dat mamiwan im grou rili puti feis en lait skin. like if DEF mother 3sg grow very pretty face and light skin. 'Like if the mother's face gets really pretty, and light skin.'

The table compares the lexical structures of the lexemes presented above.

	SMALLER PART	LARGER PART	WHOLE
Dalabon	dje-no		
Dalabon	dje-dun-no		
BK	nos		feis
BK	noshol		
English	nostril	nose	face

Figure 11. Compared lexical structures of Dalabon dje-no and dje-dun-no, BK noshol, nos and feis, English nostril, nose and face.

More data on Jawoyn, Rembarrnga, Mayali, and Roper Kriol is needed to clarify the source of the "nose"/"nostril" polysemy in BK. Considering the precise match in denotational range between Dalabon *dje-no* and BK *nos*, transfer from local languages is an attractive hypothesis; on the other hand, borrowing from Roper Kriol remains a possibility.

But the status of BK *feis* raises a more intriguing question. So far, all the polysemies observed in Dalabon, while absent from English, were replicated in BK. Yet the "nose"/"face" extension is not. Instead, BK has a dedicated lexeme,

³⁴ The use of *nos* rather than *noshol* for "nostrils" seems to be gaining ground among younger speakers. This became apparent when I interviewed a 60-year-old BK speaker of Mayali background along with her 35-year-old daughter (also a speaker of Mayali). All along the interview, the younger speaker kept using *nos* for "nostril", while her mother insisted in correcting her the whole time, implicitly relying on her parental authority, to impose the use of *noshol*—with little or no success.

³⁵ The two older BK speakers I worked with, who have learnt BK as adults and have not been extensively exposed to English, both display the same bias with respect to the word *feis* in BK: they do not seem to use it spontaneously, and they interpret it as denoting the nose.

feis. Influence from Roper Kriol could be an explanation, since Roper Kriol is not reported to have a lexeme covering both "nose" and "face" (Dickson pers. comm.). But the study of the lexemes denoting the head, namely Dalabon kodj-no and BK hed, indicates that this is probably not a good explanation. Section 5 presents these two lexemes, before returning, in section 6, to the question of why BK nos does not extend to denote the face.

5. Around the head

5.1 Dalabon kodj-no "crown of head", "head"

5.1.1 Denotational range

Dalabon *kodj-no* is an adequate translation for the English body-part term "head" in most situations.³⁶ Across species, *kodj-no* denotes the upper part of the body, the body-part that contains the brain, the locus of intellect.³⁷ Used metonymically for the brain,³⁸ *kodj-no* refers to an important part to be consumed when a kangaroo is killed; the word may also refer to the edible part of a yam. Both Dalabon *kodj-no* and English *head* can refer to the whole head or to a part of the head of a human or an animal, depending on the context. There are contexts where *kodj-no* can only be the crown of the head, not the whole head, as in example (15). But usually, it is ambiguous which portion of the head is being referred to.

[Sc]

[After explaining how a kangaroo head gets split to open the skull and access the brain.]

(15) Duway-no buka-h-lng-marnu-yin husband-3sg.POSS 3sg>3sg.h-R-SEQ-BEN-say:PR

Thorois another t

³⁶ There is another term, *bamburridj-no*, which has cognate forms in Jawoyn. *Bamburridj-no* is very rarely used, and for that reason I will leave it out of this study.

³⁷ KODJ is used in compounds related to intellectual functions and states (e.g. *kodj-mayah*, KODJ+"lost": "think wrongly", *kodj-muk*, KODJ+"cover": "forget"), and also, via a complex network of metaphors and metonymies, the social individual (e.g. *kodj-ngalka*, KODJ+"find": "have a child", *kodj-djawan*, KODJ+"ask": "seek "official" permission"). See Ponsonnet (2009).

³⁸ The specific term for the brain is *kodj-kulu-no*.

```
nunda ngey nga-h-dulubun-inj
DEM 1sg 1sg-R-spear-PP
```

da-h-lng-kodj-ngu-n ngey kunj-yelung

2sg>3-R-crown.head-eat:PR 1sg kangaroo-?common.POSS?

nga-h-yin.

1sg-R-say:PR

'Then her husband would say to her, I killed one, you can eat the head [the content of the skull, the brain] of our common kangaroo, here it is.'

5.1.2 Salient denotation

The Dalabon term *kodj-no* and English term *head* appear in many respects to overlap semantically. There is, however, an important difference between *kodj-no* and *head*: the salient denotation of *kodj-no* is not the whole head, but the crown of the head. Gestures that accompany speech are informative in this respect: in a hunting narrative collected by Sarah Cutfield, for instance, a speaker pointed at the top of his skull, raising his arm above his head, as he explained how he speared a kangaroo in the head.

That *kodj-no* primarily denotes the crown of the head also becomes clear in various stimuli-based tasks. In pointing tasks, speakers most systematically point at the curve of the skull or at the tip of the skull when asked to point at *kodj-no*. In colouring tasks, speakers only colour the crown of the head. In contrast, English speakers usually circle the whole head with their finger in pointing tasks, and colour the whole head in colouring tasks. Listing practices provide further evidence: speakers list *kodj-no* along with *mumu-no* "eyes", *dje-no* "nose", and *dalu-no* "mouth". Order, gestures and intonation indicate that these parts are on the same level (rather than *kodj-no* "head" containing the others). In one of the tasks, speakers attributed labels to the parts of a car.³⁹ The part they labeled *kodj-no* was the roof, as shown on Figure 12. Like with *dje-no* and the face, *kodj-no* comes to denote the whole head only when triggered by context (for instance, when

³⁹ One speaker deemed the exercise creative, as she claimed most car parts weren't assigned a conventional name in Dalabon.

describing the picture of a whole body without a head) or by an explicit question or gesture.

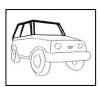


Figure 12. Part of a car labeled kodj-no (in bold).

Since the "crown of head" denotation of *kodj-no* is so prominent, and because most contextualised examples allow, strictly speaking, both a "crown of head" and a "whole head" interpretation, one may wonder if *kodj-no* actually means "whole head" at all. Stimuli-based tests, however, made it clear, as in Figure 13 where a head without a crown was described as *kodj-no*. Interestingly, speakers' responses to this picture and to other tests showed that the "whole head" denotation of *kodj-no* is slightly more prominent than the "face" denotation of *dje-no*.

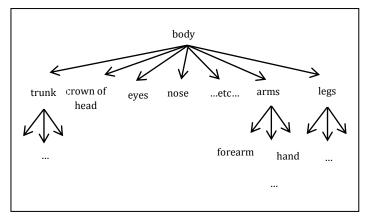


Figure 13. Drawing used in polysemy tests about kodj-no.

In addition, reactions to Figure 13 suggested that *kodj-no* is probably polysemous (rather than monosemous) between "crown of head" and "head". One of the speakers willingly accepted and repeated the statement *kodj-no kah-kodj-dih*, "this *kodj-no* has no *kodj-no*"—"this head has no crown"—thus grouping the two denotations of *kodj-no* in one utterance. As stated in section 4.1.2.2, a parallel statement with *dje-no* ("this *dje-no* has no *dje-no*" for "this face has no nose") was deemed abnormal. This was interpreted as an indication of the low salience of the "face" denotation of *dje-no*. With *kodj-no*, a sentence including both denotations was accepted. This confirms that the "whole head" denotation of *kodj-no* is slightly more accessible to speakers' metalinguistic awareness than the "face" sense of *dje-no* (consistent with what was found in pointing tasks).

5.1.3 Meronomy

Neither *dje-no*, which primarily means "nose", nor *kodj-no*, primarily "crown of head", have larger parts of the head as salient denotations. These other denotata are only remotely accessible to speakers' metalinguistic awareness. Echoing these lexical features, Dalabon speakers describe heads as assemblages of features rather than wholes. This has consequences with respect to Dalabon lexical hierarchies, namely the human and animal body meronomy (see Cruise 1986:157-180). In most languages in the world, including English, there is a "primary" label for "head", and it occupies the first level of the hierarchy under the "body" label (Brown 1976:405). But in Dalabon, it is "crown of head", *kodj-no*, that sits on the same level as the limbs and the trunk, along with other features of the head and face. Hence the Dalabon body meronomy (Figure 14) differs from crosslinguistically standard body meronomies (Figure 15). 40 While the Dalabon pattern is unusual, other languages in the world also diverge from the standard meronomy (see Terrill (2006:307) about Lavukaleve, Papuan, Solomon Islands).



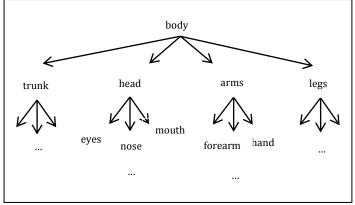


Figure 14. Dalabon body meronomy.

Figure 15. English body meronomy.

Interestingly, the crown of the head takes some importance in a number of culturally specific situations. One example is the distribution of game: as indicated in example (15), the skull containing the brain, once cut off from the rest of the head, is a valued staple and an important social symbol in sharing.⁴¹ Another context that comes to mind is the observation of animals in long grass, or

⁴⁰ Alternatively, on Figure 15, "crown of head", "eyes", "nose" etc. may align with the level below, on the same level as "hand".

⁴¹ It may be noted that one of the youngest BK consultants, in her early twenties, claimed that *kodj-no* "crown of head" and *dengu-no* "foot", named on the photo of a kangaroo, were the only two Dalabon words known to her (in fact, she probably has passive knowledge of more lexemes).

crocodiles in water, where the crown of the head would often be the crucial bodypart to be spotted.⁴²

It is possible to risk a speculative explanation with respect to this specificity of Dalabon. As pointed out in section 4.1.1, Dalabon (and BK alike) has only one set of body-part terms. These body-part terms apply across species, whether human or animal. It was also shown in the same section that shape is an important factor in determining the detonational range of a given term. Animals' heads (crocodiles in particular, but also emus, and kangaroos to a lesser extent) are somewhat more likely to be visually perceived as an assemblage of features as opposed to a human head, which is relatively spherical. With many animal species, the nose doesn't look like an appendix on a flat face as it does on humans (yet when prompted, speakers can also use *dje-no* to label the whole face of animals like kangaroos, including the snout, the eyes, the jaws etc.). A similar point could be made about limb extremities (front limbs in particular) where digits are more identifiable visually on humans than on most other species. Thus, it is possible that Dalabon lexical divisions with respect to body-parts are modeled on speakers' perceptions of animals rather than humans (for a similar case in a Papuan language, see Levinson (2006:232)).

5.2 Barunga Kriol hed and gabarra

BK has two words for head: *hed* (<Eng. "head"), and *gabarra* (<NT Pidgin "gabarra" <Sydney language, Harris 1986:288). BK speakers of Dalabon background use *hed* exclusively, but I have collected data about *gabarra* with BK speakers of Mayali background. *Gabarra* is also found in Roper Kriol, also meaning "head" (Harris 1986:288).

Hed is found in the same range of contexts as kodj-no. It is also treated as the locus of intellectual functions, and can refer to the part of the skull to be eaten in a kangaroo. I haven't observed that it can refer to the edible part of a yam, but apart from this, the denotational range is exactly the same as with kodj-no. Pointing tasks and stimuli-based tests demonstrate that the primary denotation of hed is the same as with kodj-no, i.e. "crown of head". The label comes to denote the whole head in

⁴² It may be noted that cutting off the head of an animal when roasting it (whether a turtle, a goanna, a fish, a kangaroo, or a bird) is unnecessary and, to my knowledge, unusual.

the same situations as with *kodj-no*, i.e. when it is induced by the context or by a question.

BK has another term for "head", namely *gabarra* (<NT Pidgin "gabarra" <Sydney language), which is not used by BK speakers of Dalabon background. However, the data collected with the speakers of predominantly Mayali background show that *gabarra* covers the same range of denotations as BK *hed* (and Dalabon *kodj-no* within the body-part domain). Like with *hed* and *kodj-no*, the primary denotation is "crown of head". This point is particularly interesting because the form *gabarra* is also found in Roper Kriol, albeit apparently with a different, more standard lexical structure (Dickson pers. comm.).

5.3 Substrate transfer

Since this particular lexical structure of BK *hed* and *gabarra* is not reported for Roper Kriol, and since it is too unusual to examplify any universal trend,⁴³ it must result from a transfer from local features. This is further supported by the fact that the salience of the "crown of head" denotation is also found in Mayali (Garde pers. comm.).

The fact that this substrate feature transferred to BK is particularly interesting because *kodj-no*, *hed* and *gabarra* encapsulate unusual aspects of the Dalabon body meronomy. The lexical structure of *dje-no* ("nose", "nostril", secondarily "face") and *kodj-no* ("crown of head", secondarily "head") match the fact that Dalabon speakers describe the head and face as an assemblage of features rather than a whole (section 5.1.3). This distinctive aspect of the descriptions of the body channeled by Dalabon is replicated with the lexical structures of *hed* and *gabarra*. But as we saw in section 4.1.2, it isn't entirely replicated, since BK has *feis* for "face". Native BK speakers' reactions in pointing tasks also show that they are much more familiar with the concept of the face as a whole that speakers whose mother language is Dalabon.

_

⁴³ While the "hand"/"arm" polysemy, being cross-linguistically common, could have been reinforced by universal trends, this does not apply to the "nose"/"face" monosemy. "Eye" and "face" are often merged across languages of the world (Andersen 1978:356; see also Brown & Witkowski 1981; Burenhult 2006:166; Wegener 2006:346), but this is less frequent with "nose" and "face". It is not particularly frequent in Australia either (although it does occur, see Gaby (2006:211) for Kuuk Thaayorre).

6. Why doesn't BK *nos* extend to mean "face"?

Of the 5 Dalabon polysemies (or semantic extensions) presented above—langu-no: "hand"/"finger"; dengu-no: "foot"/"toe"; dje-no: "nose"/"nose"/"nose"/"face"; dengu-no: "crown of head"/"head"—only one, the "nose"/"face" extension, is not matched in BK. Why does it stand out? Influence from Roper Kriol is possible, but since BK hed and gabarra match Dalabon lexical structures regardless of the fact that Roper Kriol gabarra is reported to have a different lexical structure, we still need to explain why things are different in the case of BK nos. The existence of feis in BK probably reflects superstrate influence from English, but why does superstrate influence apply here, when I does not apply elsewhere? Two hypotheses are considered in the following sections.

6.1 Reinforcement principle

In order to explain why not all features of substrate languages transfer to creoles, Siegel suggests two regulatory principles, namely the availability constraint and the reinforcement principle (Siegel 2008). According to Siegel, the mechanism of transfer results in a large pool of L1 (the substrate) structural features being imposed on L2. But which subset of these features are retained in the stabilized creole depends on whether a given feature is common to several substrate languages, or restricted to one or a few. This reinforcement principle may explain the lexical structure of BK *nos*.

Apart from Dalabon, both Bininj Gun-wok and Rembarrnga have a term for "nose" which also means "face", but Jawoyn does not. This absence could explain the presence of a lexeme meaning "face" in BK. This hypothesis is complicated by the fact that Jawoyn does not seem to have a term meaning "face". Nevertheless, divergence between substrates may have prevented transfer. However, this hypothesis also forces us to admit that Jawoyn would have had a significantly greater influence on BK than did other substrate languages.⁴⁴ We would have to accept that the absence of the feature at stake in Jawoyn alone would have been enough to prevent *nos* from acquiring the sense "face". Section 2.2.3 also hypothesized that the possible polysemy between "hand" and "arm" in BK may have been inspired by Jawoyn. If these hypotheses confirm, then Jawoyn

⁴⁴ This hypothesis echoes one put forward by Dickson (pers. comm.) about Marra in the Roper region.

influence at the time when creole emerged would have been significant. This is not inconsistent with what is known of the language ecology around Barunga at the time (see 1.2), but further historical research is needed to assess this hypothesis.

6.2 The nature of polysemies

In addition, the nature of the semantic extensions at play in each case of polysemy may also contribute to explain why certain lexical features have transferred to BK, and others haven't. The 5 polysemies considered so far can be grouped into two types, as shown in Figure 12. The second line of the table lists the lexemes in Dalabon and in BK. The third line displays the primary denotation first (in capitals), then the secondary denotation (in lowercase). In the "type 2" columns, the second denotation appears between parentheses because it is not a well-identified sense. The last two lines show which polysemies are present in Dalabon (all of them), and then in BK (all but the "nose"/"face" semantic extension).

I call the three following cases type 1:

- langu-no, "hand" and "finger";
- dengu-no, "foot" and "toe";
- dje-no, "nose" and "nostril".

In these cases, the pattern of the polysemy is as follows:

- the larger part denotation is the primary denotation;
- the smaller part denotation is secondary but well-identified (the lexemes are polysemous).

The "nose"/"face" semantic extension in *dje-no* and the "crown of head"/"head" semantic extension in *kodj-no* present a different pattern, which I call type 2. This pattern shows the following characteristics:

- the primary denotation is the smaller part denotation;
- the whole denotation is extremely secondary (speakers are hardly aware of this sense of the word).

	TYPE 1		TYPE 2		
	langu-no	dengu-no	dje-no	dje-no	kodj-no
	bingga	but	nos	(not nos)	hed, gabarra
	1. HAND	1. FOOT	1. NOSE	1. NOSE	1. CROWN of head
	2. finger	2. toe	2. nostril	(2. face)	(2. head)
Dalabon	YES	YES	YES	YES	YES
BK	YES	YES	YES	NO	YES

Figure 12. Summary of semantic extensions.

With type 1, the semantic extension goes from the larger to the smaller part; with type 2, from the smaller part to a larger part denotation. These patterns are inherently different. While type 1 is pragmatically automatic and predictable, type 2 isn't. If I have a cut on my finger, strictly speaking it remains accurate to say that I have a cut on my hand.⁴⁵ In contrast, if I have a pimple on my cheek, it is not automatically granted that I can say that I have a pimple on my nose. A different mechanism of semantic extension is at play.⁴⁶

Based on these patterns, we can observe that all the Dalabon polysemies falling under type 1 are replicated in BK. Type 2 polysemies diverge: BK *hed* and *gabarra* match Dalabon *kodj-no*; but BK *nos* does not entirely match *dje-no*—BK has an extra lexeme, *feis*. This difference is easily explained by Siegel's availability constraint, which stipulates that a common, morphologically integrated, perceptually salient element must be available for the substrate feature to transfer

⁴⁵ It may be deemed unacceptable for pragmatic reasons (because of a maxim of quantity, Grice 1975:45), but in terms of truth conditions, it is true to the extent that the finger is part of the hand.

⁴⁶ This echoes a remark by Wilkins (1996:275), who states that semantic extensions from part to whole and extensions from whole to parts are not logically symmetrical. In the context of the human body, the concept of a part calls for the concept of a whole, while when we have the concept of a whole, we do not need the concept of a part. My claim seems to reverse the pattern, stating that a whole calls for a part, while a part does not call for a whole. I believe these claims are in fact similar, the difference being that Wilkins considers the point in diachrony, while I consider synchronic matters.

to. The English expression "crown of the head", a fairly uncommon collocation in ordinary speech, is not a good candidate to support transfer. English has only one ordinary term, *head*, to talk about both "head" and "crown of head"—whereas with the face and the nose, both English terms are available to support transfer. Thus the availability constraint predicts that BK *hed* had to encode both senses.

As a result, out of the 5 cases presented in Figure 12, the "nose"/"face" extension remains the only Dalabon semantic extension for which the availability constraint is satisfied, and which is not matched in BK. It is tempting to hypothesize that the fact that the "face" extension of *dje-no* is structurally different, and is a very secondary extension, may have affected the transfer of this lexical feature.

If this is correct, the factors modulating transfer have to do with the nature of the semantic extension at stake in the lexical structure of a given lexeme. This point is important, because while it confirms the importance of substrate influence, it also suggests that substrate influence may be modulated by universal trends. These trends may dictate which lexical structures are more easily replicated in creoles than others, depending on the intrinsic nature of these features. The scale of the present study is too limited to allow firm conclusions on this point. Further research on local language ecologies, on the body-part lexicon in Jawoyn, Rembarrnga, Mayali and Roper Kriol, and on similar issues in other regions of Australia is necessary in order to explore the above hypotheses.

7. Conclusions

I have presented and analysed four Dalabon lexemes and their counterparts in BK: langu-no and bingga, "hand" and "finger"; dengu-no and but, "foot" and "toe"; dje-no "nose", "nostril" and "face"; nos "nose" and "nostril"; kodj-no and hed (or gabarra) "crown of head" and "head". All these lexemes merge lexical distinctions present in the lexifier, English. Overall, BK lexical structures in many respects resemble Dalabon (and other local languages') lexical structures more than English. However, there are mismatches.

This is the case in particular with the semantic extension from "nose" to "face" in Dalabon *dje-no*. This extension is not replicated by BK *nos*, which cannot denote the face. Among the cases presented in the article, this semantic extension stands out as the only one without a BK counterpart. The lexical study reveals that the particular nature of this semantic extension may contribute to explain why it did not transfer to BK. Most lexemes have a larger part as a primary denotation, and a smaller part as a secondary, but well-identified denotation. With the "face" sense of *dje-no*, things are reversed. The primary denotation is the smaller part; the larger part denotation is extremely secondary, and is very remote in speakers' metalinguistic awareness. I hypothesize that the nature of this semantic extension may have impeded the transfer of this feature.

The fact that the "nose"/"face" extension is not replicated in BK is a significant shift. Indeed, it is a remarkable Dalabon specificity that neither the head nor the face are the primary denotations of any lexemes. As a result, the Dalabon body meronomy displays an unusual pattern. Echoing these particularities, Dalabon speakers prefer to describe the head as an assemblage of features rather than a whole. While some of these aspects persist in BK, a shift towards more standard/English descriptions of this part of the body is perceptible. The existence of the lexeme *feis*, with "face" as its primary denotation, goes hand in hand with the fact that in pointing tasks, Kriol speakers tend to identify the face as a whole more spontaneously than native Dalabon speakers.

References

Andersen ES 1978 'Lexical universals of body-parts terminology' in JH Greenberg (eds) *Universals of Human Language* Standford: Stanford University Press. Pp. 335-368.

Baker P & P Mühlhäusler 1996 'The origins and diffusion of Pidgin English in the Pacific' in SA Wurm, P Mühlhäusler & DT Tryon (eds) Atlas of Languages of Intercultural Communication in the Pacific, Asia and the Americas Berlin: Mouton de Gruyter. Pp. 551-594.

Bickerton D 1984 'The language bioprgram hypothesis' Behavioral and Brain Science 7:173-221.

Brown CH 1976 'General principles of human anatomical partonomy and speculations on the growth of partonomic nomenclature' *American Ethnologist* 3(3, Folk Biology):400-424.

Brown CH & SR Witkowski 1981 'Symbolism and Cognition' American Ethnologist 8(3):596-615.

Burenhult N 2006 'Body part terms in Jahai' in A Majid, NJ Enfield & M Van Staden (eds) *Parts of the Body: Cross-linguistic Categorisation, Language Sciences.* Pp. 162-180.

- Cowlishaw G 1999 Rednecks, eggheads and blackfellas: a study of racial power and intimacy in Australia St Leonards: Allen & Unwin.
- Enfield NJ, A Majid & M Van Staden (eds) 2006 Parts of the Body: Cross-linguistic Categorisation, 28.
- Evans N & F Merlan 2001 'Possession, parts and properties in Dalabon' Paper presented at the Annual Conference of the Australian Linguistic Society, Canberra.
- Evans N 2003 Bininj Gun-Wok: a Pan-dialectal Grammar of Mayali, Kunwinjku and Kune Canberra: Pacific Linguistics, Research School of Pacific and Asian Studies, Australian National University.
- Evans N, F Merlan & M Tukumba 2004 A First Dictionary of Dalabon Maningrida: Maningrida Arts and Culture, Bawinanga Aboriginal Corporation.
- Foster R, P Monaghan & P Mühlhäusler 2003 Early Forms of Aboriginal English in South Australia, 1840s-1920s Canberra: Pacific Linguistics, 538.
- Gaby AR 2006 'The Thaayorre "true man": Lexicon of the human body in an Australian language' in A Majid, NJ Enfield & M Van Staden (eds) Parts of the Body: Cross-linguistic Categorisation, Language Sciences. Pp. 201-220.
- Garde M 2010 Bininj Gunwok Talk about Health: Medical Terms and Vocabulary for Health Professionals Jabiru: Gundjeihmi Aboriginal Corporation.
- Grice P 1975 'Logic and conversation' in P Cole & JL Morgan (eds) *Syntax and Semantics, 3: Speech Acts* New York: Academic Press. Pp. 41-58.
- Harris JW 1986 Northern Territory Pidgins and the Origin of Kriol Canberra: Pacific Linguistics, C89.
- Koch H 2000 'The role of Australian Aboriginal languages in the formation of Australian Pidgin grammar: transitive verbs and adjectives' in J Siegel (eds) *Processes of Language Contact: Case Studies from Australia and the South Pacific* Saint-Laurent: Fides. Pp. 13-46.
- Lee J & K Obata 2010 'Languages of Aboriginal and Torres Straight Islander People A uniquely Australian heritage' in (eds) *Year Book Australia* Canberra: Australian Bureau of Statistics.
- Levinson SC 2006 'Parts of the body in Yélî Dnye, the Papuan language of Rossel Island' in NJ Enfield, A Majid & M Van Staden (eds) Parts of the Body: Cross-linguistic Categorisation, Language Sciences. Pp. 221-240.
- Meakins F To appear 'Language contact varieties' in H Koch & R Nordlinger (eds) *The Languages and Linguistics of Australia: a comprehensive guide* Berlin: Mouton de Gruyter.
- Merlan F & P Jacq 2005 Jawoyn-English Dictionary and English Finder List Katherine: Diwurruwurru-Jaru Aboriginal Corporation.
- Merlan F & P Jacq 2005 *Jawoyn Topic Dictionary (Thesaurus)* Katherine: Diwurruwurru-Jaru Aboriginal Corporation.
- Mufwene S 2001 The Ecology of Language Evotions Cambridge: Cambridge University Press.
- Munro J 2000 'Kriol on the move: a case of language spread and shift in Northern Australia' in J Siegel (eds) *Processes of Language Contact: Case Studies from Australia and the South Pacific* Saint-Laurent, Québec: Fides. Pp. 245-70.
- Munro J 2004 'Substrate Language Influence in Kriol: the Application of Transfer Constraints to Language Contact in Northern Australia' Armidale, University of New England.
- Ponsonnet M 2009 'Aspects of the semantics of intellectual subjectivity in Dalabon (south-western Arnhem Land)' *Australian Aboriginal Studies* 2009(1):16-28.
- Ponsonnet M 2011 "Brainwash from English"? Braunga Kriol speakers' views on their own language' Anthropological Linguistics 52(2):24.

- Ponsonnet M in prep. Parts of speech and nominal subclasses in Dalabon.
- Rhydwen M 1995 'Kriol is the color of Thursday' *International Journal of the Sociology of Language* 113:113-119.
- Rhydwen M 1996 Writing on the Backs of the Blacks: voice, literacy and community in Kriol fieldwork Brisbane: University of Queensland Press.
- Sandefur JR 1986 'Kriol of North Australia: a language coming of age' Summer Institute of Linguistics, Australian Aborigines Branch.
- Saulwick A 2003 A First Dictionary of Rembarrnga Maningrida: Bawinanga Aboriginal Corporation, Maningrida Arts and Culture.
- Siegel J 2008 The emergence of pidgin and creole languages Oxford: Oxford University Press.
- Terrill A 2006 'Body-part terms in Lavukaleve, a Papuan language of the Solomon Islands' in A Majid, NJ Enfield & M Van Staden (eds) *Parts of the Body: Cross-linguistic Categorisation, Language Sciences.* Pp. 304-322.
- Troy J 1990 Australian Aboriginal Contact with the English Language in New South Wales 1788-1945 Canberra: Pacific Linguistic, 103.
- Troy J 1993 'Language contact in early colonial New South Wales 1788 to 1791' in M Walsh & C Yallop (eds) Language and Culture in Aboriginal Australia Canberra: Aboriginal Studies Press. Pp. 33-50.
- Van Staden M & A Majid 2006 'Body coloring task' in A Majid, NJ Enfield & M Van Staden (eds) Parts of the Body: Cross-linguistic Categorisation, Language Sciences. Pp. 158-161.
- Wegener C 2006 'Savosavo body part terminology' in A Majid, NJ Enfield & M Van Staden (eds) Parts of the Body: Cross-linguistic Categorisation, Language Sciences. Pp. 344-359.
- Wilkins D 1996 'Natural tendencies of semantic change and the search for cognates' in M Ross & M Durie (eds) The Comparative Method Reviewed: Regularity and Irregularity in Language Change New York: Oxford University Press. Pp. 264-304.

The expression of potential event modality in the Papuan language of Koromu

Dr Carol Priestley
Griffith University
c.priestley@griffith.edu.au
Research Associate of the Australian National University

Abstract. This paper aims to give an overview of the morphosyntax and semantics of potential event modality in Koromu (Kesawai), a Madang language in the Papuan group. Potential event modality refers to Palmer's "events that are not actualized...but are merely potential" (2001:70).characteristics of event modality are compared with English and other Papuan/regional languages. The study is based on Koromu data in recorded texts, collected over a number of years and on earlier grammatical analysis (Priestley 2002a, forthcominga). Meanings represented in semantic are explications the natural semantic metalanguage, metalanguage that can be used in many different languages (Goddard & Wierzbicka 2002). The findings include a range of constructions and meanings for "imperative" and "desiderative" type expressions, a distinction between external, internal and negative desires, and strategies for testing meaning and grammar analysis with Koromu speakers.

Keywords. potential event modality, imperative, desiderative, semantic primes, explications, grammaticized 'say/do'

1. Introduction

The Koromu (Kesawai) language¹ is spoken in one of the many speech communities in the middle Ramu Valley of Papua New Guinea (PNG). Koromu is a Rai Coast language, in the Madang group of Trans New Guinea languages. Like other Madang languages it can also be referred to as a Papuan language, as it is one of the approximately 800 languages of the region that are not Austronesian.² Some of the typologically interesting features of Koromu are serial verb constructions, impersonal experiencer object constructions, clause chaining, switch reference and grammaticized uses of the verb u 'say (quote form)/do'.

This paper aims to contribute to the study of modality by examining a system of morphosyntactic and semantic distinctions that express event modality. Event modality refers to "events that are not actualized, events that have not taken place but are merely potential" (Palmer 2001:8). Some of the event modality distinctions in Koromu are compared here to examples from English and from other Madang languages, for example, Amele, Bargam, Kalam (Roberts 1990), and Tauya (McDonald 1990). Other references are made to languages in the broader region, for example, Mangap-Mbula an Austronesian language in Papua New Guinea (Bugenhagen 1989), and Ungarinyin, an Australian language (Rumsey 2001).

The meanings of event modality expressions are outlined in tentative explications using reductive paraphrase. These paraphrased explications are written using semantic primes and their combinatorial properties in the natural semantic metalanguage (Wierzbicka 1996, Goddard & Wierzbicka 2002, Goddard 2008, 2011).³ This metalanguage can be expressed not only in English, the language of publication, but also in other languages. In this paper three examples are given using Koromu exponents of the semantic primes.

This study of Koromu event modality refers to examples in natural speech that occur in recorded texts and extracts from conversation. The data was collected while I lived in a Koromu village (1975-1976, 1978-1980, 1986) as well as during

¹ In Z'agraggen (1980) the Koromu language is referred to as Kesawai after the villages of Kesawai 1 and 2 on the north side of the Ramu River.

² Papuan languages are not a genealogical unit (Ross 2005:15).

³ Complete explications using the full rigour of the natural semantic metalanguage are not attempted here.

linguistic fieldwork (2000, 2004 and 2010). The study also refers to my analysis of the language in earlier work (Priestley 2002a, 2008 (revised 2008), forthcominga).

The paper is structured as follows. Section 2 outlines some key theories of modality. Section 3 presents the methodology for semantic description. Section 4 provides a background to the study with a brief introduction to Koromu clauses and dependent and independent verbs. Then various types of potential event modality are examined in sections (5) for imperative, (6) the future tense/hortative overlap, 7 intentive with -mpe, 8 desiderative with V-apesi: what people, want/desire and are about to do, 9 internal and negative experience and 10 concluding remarks.

2. Theories of modality

Modality is a grammatical category closely associated with tense and aspect. All three categories can be expressed from the level of the lexicon to the "level of text" (Timberlake 2007:283). They are "generally, but not always marked within the verbal complex" (Palmer 2001:1). In grammaticalized, regular combinations of verbs and morphological operators, the morphological devices that express tense, aspect and modality include derivational and inflectional morphology, and verbs with particles, auxiliary verbs or participles (Timberlake 2007:283). In Papuan languages such as Koromu, it is common for tense, aspect and mood to be expressed in verbal inflectional morphology, phasal (aspectual) and/or modal verbs in serial verb constructions and in particles and adverbs (see Priestley 2008).

There is a general consensus that tense refers to the time of an event, while aspect characterises the nature of an event (Chung and Timberlake 1985, Palmer 2001) and its "internal temporal constituency" (Comrie 1976:30). However, modality is a category that has been defined in many different ways (for numerous examples of the range of definition, see Roberts 1990:363-367). In this chapter I refer mostly to the discussions of modality in Palmer (2001) and Timberlake (2007). In his book *Mood and Modality*, Palmer (2001:1) describes modality as differing "from tense and aspect in that it does not refer directly to any characteristic of the event, but simply to the status of the proposition". In the second edition of Shopen's

Language Typology and Syntactic Description, Timberlake (2007:315) describes modality as "consideration of alternative realities mediated by an authority", for example:

how we come to know and speak about the world, how the world came to be as it is, whether it might be other than it is, what needs to be done to the world to make it what we want (.)

Timberlake goes on to state that "there are many ways in which a situation can be less than certain and real" (2007:316). His first category, epistemology, "has to do with knowledge about events and the world" (2007:316); the second, directive/jussive/so-be-it modality, is modality in which "the responsibility for the state of the world is transferred from one authority to another" (2007:318); and the third, causation and contingency, involves one situation, rather than an individual, that is "responsible for the existence of another situation". The latter is exemplified in conditional constructions in which a contingency situation is in some sense prior to a consequence (2007:321-322).

Palmer's (2001) classification of modal systems includes propositional and event modality. He describes propositional (epistemic or evidential) modality as being concerned with the "speaker's attitude to the truth-value or factual status of the proposition" (2001:24). In contrast, event modality, which includes both deontic and dynamic modality,⁴ refers to "events that are not actualized, events that have not taken place but are merely potential" (2001:70).

Deontic modality has conditioning factors that are "external to the relevant individual" or the subject of the clause (Palmer 2001:9, 70). They are "generally dependent on some kind of authority" (2001:70, cf. Timberlake 2007). Examples occur in obligation, permission, direction, and so on, when "trying to get someone to do something". Palmer also suggests that commissive "where the speaker guarantees that the action will take place", is a type of deontic modality (2001:70). In contrast, in dynamic modality, the conditioning factors are ability or willingness. These factors are internal to the relevant individual, whether that individual is the speaker or someone else. They can also be based on general circumstances that make the action possible or impossible (2001:70, 76-80).

⁴ Of these two terms 'deontic' often occurs in linguistic descriptions (see, for example, Bugenhagen 1989:17, Roberts 1990:365, Foley 1991:264, Payne 1997:246).

Furthermore, although "the status within modality of wishes and fears is a little more obscure [...]" it is clear that the expression of wants, desires and preferences also relates to "unrealized events" (Palmer 2001:13, see also Timberlake 2007:319).

The main purpose of this paper is to examine key types of event modality in Koromu, the grammatical constructions in which they occur and their core meanings. The modality expressions discussed here are linked by the fact that they refer to non-actualised and potential events. They could be said to fit loosely into Palmer's "event modality system", or into Timberlake's second realm of modality, directive/jussive and so-be-it modality. When Koromu speakers talk about potential events, options and wishes, what they want, don't want, intend and are about to do, they have a variety of ways to do so. The different forms include the verbal inflections for imperative, and the inflections -mpe, -apesi and -apu used in the expression of intention, desire, prospective action, internal experience/desire and negative experience/desire.

3. Methodology for semantic description

Timberlake, Palmer and many others use English terms as a basis for classifying different types of modality in different languages. While English-specific terms for modality may to some extent provide a framework, they can also be misleading in the absence of a more in-depth analysis of the meanings expressed in particular languages. Furthermore, they do not reveal whether there are similar or different components of meaning in modality types in different languages. The difficulty arises, not only from the differences between the categories, but also from limitations inherent in using one language, English, to describe modality in other languages. In fact, the modality terms themselves, for example, 'epistemic', 'deontic' and 'dynamic', need to be clearly defined in simpler terms (Wierzbicka 1987:37).

One way to try to avoid these limitations, to show the differences and similarities between modal expressions and to be able to test the results with native speakers is to use word meanings that can be expressed in other languages. For this purpose, the core categories of Koromu potential event modality in this paper are

accompanied by tentative explications expressed in reductive paraphrase. These explications are based on the proposed semantic primes and their combinatorial properties in the natural semantic metalanguage (Wierzbicka 1996, Goddard & Wierzbicka 2002, Goddard 2008, 2011) rather than on complex English-specific words. Using this method, meanings are represented in explications composed of 'semantic primes' that can be expressed through their Koromu exponents (see Appendices: Table). This tool allows the explications to be directly checked with speakers of the language. It can be used with care to avoid a representation of meaning that is based on Anglo-centric concepts.

When primes are discussed in text they are normally represented in small capitals. In this paper the English exponents are represented in ordinary small capitals while their Koromu counterparts (still under investigation) are in italics. Some primes in specific languages have more than one variant form. This variation is called allolexy and is represented by a tilde '~' between the alternate forms, as in 'SOMETHING~THING' (see Appendices: Conventions).

The most commonly used semantic primes in this study of potential event modality in Koromu are the substantives I, YOU, SOMEONE, and SOMETHING~THING (I, NE, ATO, NA); the determiner THIS (MO); the quantifier SOME (ASAO); the mental predicates THINK, KNOW, and WANT (URUNU, SIPAMU, URUNU~-APESI); the speech word SAY (SA~U); the action word DO (HARU~U); BE (specificational) (MENE), and the logical concepts NOT and BECAUSE (TAI, U SEI). These primes can be used in the explications of modality expressions of similar types in other languages.

Other semantic primes used for this topic in Koromu are: the substantives PEOPLE and BODY (AHAROPU, METE), the determiner THE SAME (ATEREI), evaluators BAD and GOOD (WARIKAU, ETAMAU), the event verb HAPPEN (AIRI), the mental predicate FEEL (ORU~URUNU), the time exponents AFTER and A SHORT TIME (EPONO, SA HANE), and the space exponent INSIDE (ORU PA). Since 'you plural' is not a semantic prime most of the explications are written for a single addressee. Further research is needed to provide more detailed explications that include second person plural addressees.

These primes could be further tested, and also used to provide language-specific definitions, in future semantic fieldwork in Koromu and in studies of modality in other languages. Furthermore, the primes and components of meaning needed in explications of modality may highlight language-specific characteristics of this semantic domain in particular languages. For example, as I will show in this paper, the prime INSIDE, though it may seem an unlikely contributor to explications of modality expressions in English, is used in one of the Koromu explications and may also be relevant in explications of potential event modality relating to internal experience in other Papuan languages.

The natural semantic metalanguage (NSM) has been used in several studies of modality. In addition to a discussion of the semantics of English modality written in an earlier version of the natural semantic metalanguage (1987), Wierzbicka has written an extremely detailed and enlightening study of English epistemic phrases and adverbs in her 2006 book *English: Meaning and Culture.* There, Wierzbicka suggests that "from the speaker's point of view, adverbs of this kind refer to thinking and knowledge (or lack of knowledge) rather than to truth" (cf. Timberlake 2007:316 above). Other work on modality using NSM includes Goddard's study of modals of necessity in English (forthcoming) and Bugenhagen's study of the semantics of modality, using an earlier version of the natural semantic metalanguage, in the Austronesian language of Mangap-Mbula (1989) and in his overview of the semantics of irrealis in several Austronesian languages (1993).

4. Koromu clauses, dependent and independent verbs: background to Koromu event modality

Koromu has both verbal and non-verbal clauses. In verbal clauses there is either a dependent (medial) verb or an independent (final) verb. Modal distinctions are indicated by modal verbs, adverbs and particles (see Roberts 1990 for examples of forms that express modality in a number of other Papuan languages). Modal adverbs and particles, relating to certainty, uncertainty and ability, occur in both verbal and non-verbal clauses. As with many other languages, basic modal distinctions relating to potential events are expressed through final verb

morphology. For further details on any of the grammatical categories in this section, see Priestley (2002a, 2008 and forthcominga).

Independent final verbs are fully inflected for future or non-future tense with portmanteau tense-subject-number inflections. Present tense-aspect, object, reciprocal and/or habitual aspect inflections are optional. Finite verbs, or serial verb constructions, express realis (or indicative) mood in simple declarative clauses inflected for non-future tense, as in example (1).

(1)⁵ ...naere wamte te sa amkoru pate ho -s -a. snake (snake.type) PNP road middle S/L bite -O1s -3s '...in the middle of the road a snake (death adder) bit me.' (T1.6.1)⁶

With independent verbs the present tense-aspect suffix indicates the moment of speaking or time earlier on the day of speaking, as in the quoted speech in example (2). Example (2) also exemplifies the boundary marker (BM) clitic that commonly occurs at the end of a declarative clause (verbal or nonverbal) when it is at the end of a discourse or significant part of a discourse. In this case the discourse is the quoted speech.

NEG: negative; NOM: nominaliser; O: object; ORNT: orientation; p: plural; P: possessive/part of; POS: possibility; PRES: present; PNP: prominent noun phrase; Q: question; s: singular; S/L: source/locative; SR: same referent following; TADJ: temporal adjectiviser; T:S: 'tense-subject suffix'; UNC: uncertainty; V: 'verb'.

⁵ Abbreviations: ALOC: animate locative; APP: apprehensional; BM: boundary marker; DR: different referent following; EMPH: emphatic; F: future; GRD: ground (topic-like element); G/L: goal/locative; HAB: habitual; IMP: imperative; INC: inclusive; INT: intentive; LTD: loose temporal dependency; LV: light verb;

⁶ The majority of examples come from texts (T). The initial T for text is followed by the number of the tape, or other data source, and then the number of the text and number of the line in the original transcription. Several examples come from Databooks (D), a collection of data based on overheard conversations and in some cases related elicitation. D numbers indicate the book, page number and line number. There are also a few examples from a collection of translations (Z) and from an early grammar paper (G.E) that includes some natural examples.

Before moving on to the future tense, example (2) above and (4) below also illustrate direct speech. There are several different word forms that express 'say' in Koromu. The form u 'say' is used following direct speech or thoughts, in grammaticized constructions and in some contexts for 'do'. It appears as θ before PUT where it is affected by a rule of ablaut (Priestley 2008:57). The grammaticized constructions are important in later sections of this paper.

A set of future tense-subject person-number suffixes can occur with an independent verb in a declarative clause, as in example (3).

(3) Weti pa eno pa poho ni -hi =mo. house
$$G/L$$
 over.there G/L sit $STAY$ -F1s =BM 'I will sit at the house over there.' (T1.6b.5)

In contrast, dependent verbs have either no inflections, or partial inflections, for tense-subject person-number and aspect. They do, however, have inflections that indicate whether the subsequent verb has the same or a different subject referent (Priestley 2008:320-340). A series of these dependent verbs followed by an independent verb forms a clause chain. Clause chaining with switch reference inflections on dependent or medial verbs is common in Papuan languages (Roberts 1997). While giving information about the forthcoming subject, they can also give information on whether events in a chain are sequential or simultaneous (Roberts 1997:139-142), on tense (1997:144-148), on aspect, for example durative or punctual (1997:142-144), and also on the distinction between realis and irrealis mood (1997:148-152).

⁷ Glosses in capitals indicate a phasal/valency verb. This shows that the verb has grammatical function as well as lexical meaning. In some cases the lexical meaning remains an important aspect of the function of these verbs. *Here/re* PUT expresses 'put', perfective or a wide range of types of valency increase, depending on the verb it combines with. *Ne* STAY expresses durative, stative aspect or valency decrease (Priestley 2009:341-402).

Koromu switch reference inflections on medial dependent verbs express several types of grammatical information. They indicate whether the subsequent verb has the same subject, whether the events expressed by the verb occur sequentially (in close succession), overlap temporally, or are loosely related in time. With verbs marked for a different referent following, they also indicate whether mood is realis or irrealis. A subsequent, partially inflected dependent verb, or fully inflected independent verb, provides information on tense, aspect and mood. Example (4) has a verb marked by *-pe* for same referent following, followed by a clause in which the verb is inflected for first person singular non-future tense.

(4) ...a mi -pe, weti pa airi ta -i.

come move.down -SR house G/L arrive END -1s

'...I came down and arrived at the house.' (T5.20.45)

5. Imperative

The term imperative is used here as a label for a morphosyntactic category. This category is indicated when a verb root is inflected by an imperative suffix, -ae (IMP2s) or -ahe (IMP2p). A simple imperative, consisting of a verb root and one of the imperative suffixes, is used when the speaker wants one or more addressees to do something, as in (5).

A comparable category is found in many languages and the term "imperative" is commonly used in grammatical description. In Chung & Timberlake (1985:248) imperative mood is described as "the quintessential form of the deontic mode: the speaker is the source that imposes an event on the addressee". However, the term

"imperative" is strongly connected in English with commands, directives and authority. For example, see the following quote from Palmer (2001:80, see also Timberlake 2007:316, 318).

Most languages have a specific form that can be identified as Imperative. [...] It is clearly directive and usually portrayed as indicating a command. In fact it is often thought to be the strongest of the directives, one that emanates from someone in authority, which therefore, does not expect non-compliance.

The use of the English terms 'impose', 'command', and 'directive' can lead to some misunderstanding when looking at so-called 'imperative' forms in other languages, since these terms could be said to relate to one aspect of the 'cultural logic' (cf. Gumperz 1982) of English speakers. In this 'cultural logic', imperatives are commonly associated with 'commands'. In many contexts in English speaking communities, commands act against the strong cultural principles of 'non-interference' and 'avoidance of imposition' on others (Wierzbicka 1991/2003:60-62, 2006:45). Thus English speakers avoid bare imperatives when they want someone else to do something. Instead they commonly use 'whimperative' expressions like *Would you mind shutting the door?* or *Will you close the door please?* (Wierzbicka 1991/2003:30-32). Such expressions are used even when someone is being 'impolite', for example, *Why don't you shut your mouth?*' (1991/2003:60).

Although this is a pragmatic issue, the common association of the bare imperative with 'imposition' is important in a discussion of the grammatical category of imperative, because it is all too easy to allow English pragmatics to impose on our understanding of the meaning expressed by imperative forms in other languages.

The cultural logic in other languages may mean that the use of the bare imperative does not have the negative connotation of 'commands' and 'imposition', or carry the idea that the speaker is an 'authority' in the strict sense of the word. Thus such terms do not give an adequate picture of imperative modality in a language like Koromu. For example, as I will show below, the Koromu grammatical category signalled by the suffixes -ae (IMP2S) and -ahe (IMP2p) is just as commonly used for giving advice, invitations or offers, making suggestions and requests, or expressing salutations.

In fact, even in English the imperative can be used "simply to give permission or advice" as in *Come in* and *Don't worry about it* (Palmer 2001:80) and in offers such as *Have a drink*. These English examples appear to be conventionalised expressions within the domain of hospitality.

Timberlake (2007:316) states that an imperative can be an attempt "to persuade (invite, obligate, cajole) the addressee to act...". This latter description, using the English words 'inviting' and 'cajoling', draws a little closer to the meanings expressed in many languages. For example, when obliged to use English to describe another language like Koromu, one could say that in many canonical examples speakers who use the imperative form are doing something like cajoling, requesting, inviting, suggesting or offering something. For this reason I have omitted the English convention of exclamation marks in many of the following examples.

In example (6), a young man who has just killed a pig (and is not an experienced butcher) comes home and requests help from an older man. He uses a flat imperative but this is not considered disrespectful (cf. Priestley forthcomingb).

In the conversation in (7) a young man, who has just been bitten by a snake, requests some medicine from an older man who offers him a place to sit down. Both speakers use the imperative form.

I said to Bob, "Give me an injection. Give me medicine. A snake bit me and I came." (...) "Ah, sit here a moment (a little)," he said.' (T1.6b.1)

Example (8) is an offer by one woman to her friends.

An imperative form of the verb is also a conventionalised expression used to express friendly farewells, as in (9).

Words like 'invite', 'cajole' and so on have no direct equivalents in Koromu and still cannot fully sum up the meaning of the Koromu imperative form. Based on a study of Koromu usage, the following common meaning for the singular imperative emerges in terms that can be translated into many other languages. In the explication the speaker and addressee are represented by the primes I and YOU.

[A] Koromu verb-ae IMP2s

I say: 'I want you to do this'

Here I propose Koromu versions of explications [A] to [C] that are based on my knowledge of the language. These tentative explications need to be tested with native speakers during future fieldwork.⁸

The Koromu version:

```
[AA] 'mo ne u-apesi,' u-i
['this you do-want,' say-1s]
(I say: 'I want you to do this')
```

In the more routinized hospitality and greeting/farewell contexts in Koromu there is also an implication that can be phrased in terms of reductive paraphrase as follows:

'you can feel something good because of this (because I say this)'

In some contexts, imperative examples are expressed quite forcefully, with a gruff tone of voice and falling intonation. Then they are more like a command than a request. This is particularly common with some verbs, for example, *Si-ahe!* [clear out-IMP2p] 'Clear out of the way'. In this context there is an added implication that:

'it will be bad if you do not do this'

In relation to these findings in Koromu, it would also be interesting to investigate the meanings and implications involved in the distinction between 'strong' and 'polite' imperatives in some other Madang languages, for instance Amele⁹ and Bargam (for which there is some detail in Roberts 1990:384), and in at least one other Papuan language Alamblak (Roberts 1990:390), as well as in the constructions that express simply 'wish' in Nahuatl (Andrews 1975).

-

⁸ Note that speakers can express [A] simply by using the imperative.

⁹ Amele is the closest of these languages geographically and linguistically to Koromu. The strong imperative is expressed by a verb in its final form with the imperative suffix as in, *H-o-g-a* [come-2sg-IMP] 'Come!' The more polite form is expressed by an irrealis medial verb form, as in, *Ho-ho-m* [SIM-come-2sg.DS.IR] 'Would you come.' (The abbreviations are sg.: singular, IMP: imperative, SIM: simultaneous, 2sg.DS.IR: second singular different subject irrealis.)

In order to express an imperative that is negative in Koromu, the speaker includes the standard negative particle *tai* (NEG), which, when it is required, is added to verbal clauses in the position immediately before the verb. An example with a verb inflected by the imperative suffix is given in (10).

(10) I sei tai urunu -ae.

1s ORNT NEG think -IMP2s

'Don't think about me.' (T6.4.24)

The meaning expressed when the imperative is preceded by the negative particle is as follows.

[B] I say: 'I don't want you to do this'

Koromu version:

[BB] 'ne mo u-apu, maikoho-se-r-a,' u-i ['you this do-NOM not.want-O1s-PRES-3s,' say-1s]

Koromu has several types of serial verb construction. In coincident serial verb constructions two verbs "each encode components of one event" (Priestley 2008:383). In order to tell someone to cease doing something, a cessative construction is used. This consists of a main verb, representing the action that the speaker wants to cease, followed by the verb *apaise* meaning 'do not/leave off/stop' with an imperative suffix, as in (11) below. This modal verb has the same form as the main verb *apaise* which means 'leave' (as in 'he left the house'). The context for example (11) is that a man had been lying resting in the house for some time (following an illness). His wife was tired of this and said the following.

(11) Weti pa seka ene ne apais -ae.

house G/L so.much lie.down STAY do.not -IMP2s

'Don't lie around (sleep) in the house so much.' (T1.15.9)

A further example, in (12), is also an attempt to stop someone from continuing to do something.

(12) Ene ne -hera =mo. Wera -ima ani apes -ae. sleep STAY -F3s =BM child -P1s wake do.not -IMP1s 'He will stay asleep. Don't wake my child.' (T2.24.8)

In his paper on modality in Mangap-Mbula, Bugenhagen describes a cessative modal particle (1989:29-30). Two of the components in his explication for this particle are "You are doing X now, I don't want you to do this". These components fit very well with the basic cessative meaning in Koromu serial verb constructions which include the modal verb *apaise* 'leave off/stop'. However, I propose that in an explication of this cessative meaning in Koromu there is possibly a third component, which I have included here in brackets.

[C] I say: 'you are doing something now I don't want you to do this now (it is bad if you do this)'

Koromu version:

[CC] 'apu ne na haru-r-i, apu ne mo u-apu, maikoho-se-r-a ('mo na harur-i uo, mo warikau)

> ['now you something do-2s ['now you this do-NOM not.want-O1s-PRES-3s [('this thing do-2s GRD, it is bad)]

6. The future tense/hortative overlap

Future time reference is an area where tense and modality can merge and overlap. "Situations in the future are inherently uncertain as to actuality [...] they are potential rather than actual" (Chung & Timberlake 1985:243) and "an event in future time can be located deictically on the timeline by a future tense but it can also be categorized as irrealis since it has not been actualized in the real world" (Roberts 1990:373). In Koromu, the first person plural (inclusive) future tense

and hortative modality can be expressed by the same form, the suffix -aho/ho (INC1p). As in the imperative, there is both a speaker and an addressee.

In (13) the first person plural inclusive future tense suffix -aho/ho is used as future tense when giving information to someone.

```
(13)
      Kainantu
                     aire
                            ta
                                   -pe n-ia-te
      Kainantu
                    arrive END -LTD:1p
      si
                                   -ho
                    pate
                            ete
                                          =m0.
      then
             that
                    S/L
                            through-INC1p=BM
```

'We will arrive at Kainantu and then go through it.' (T1.22.38)

Drawing on components from Goddard's (2011:339) explication of 'we',¹⁰ 'some people, I am one of these people',¹¹ the meaning of the future tense first person plural inclusive can be expressed in semantic primes as in explication [D]. Koromu versions of this explication, and the ones that follow, are not included here as further research and consultation with native speakers are required.

[D] Verb with future tense first person inclusive suffix -aho/-ho

I say: 'some people will do something at the same time a short time after, you are one of these people, I am one of these people'

When the suffix -aho/ho combines with a verb and expresses a hortative sense the addressee is invited to share with the speaker in what happens next, "in changing the world", as Timberlake puts it (2007:318). For example, when calling to someone else, as in example (14), the speaker could be said to be using hortative modality.

¹⁰ 'We' is not a semantic primitive, as it can be defined using other primitives. Also, its meaning is not the same in all languages (inclusive, exclusive, dual, plural etc.).

¹¹ Interestingly, the etymology of Tok Pisin *mipela* 'we' is 'I-fellow' (cf. Goddard 2011:339).

It appears that in many everyday contexts this type of expression is used when people have already talked about doing something together or when they have other reasons for thinking they will be doing so. The tentative explication below reflects the hortative inclusive meaning. (For English *let's*, see Wierzbicka 2006a:195-196).

[E] Verb with future tense first person inclusive suffix -aho/-ho used in a hortative manner
I say: 'some people want to do something now at the same time, you are one of these people, I am one of these people because of this, I say: 'I want to do this now, I want you to do the same thing at the same time'

7. Intentive with *-mpe*

When expressing their intention to do something, or to bring about some future event, Koromu speakers use a verb inflected for future tense first person singular, or plural, followed by the suffix -mpe 'intentive'. The expression of intention is restricted to use by the first person, the one who has some ability to bring it about, unless it appears in a special quotative form where it can be used to represent the intentions of a third person. Similar restrictions occur in many languages. In Tauya, a Madang language in the Ramu Valley related to Koromu, there is a necessitive mood suffix that is used only for first person and third person subjects. Like the Koromu intentive suffix, the Tauya necessitive mood suffix combines with a future tense suffix. It is described as being "in complementary distribution with the imperative mood" (MacDonald 1990:213). Further afield, in the Australian language Ungarinyin, intentional meaning is also "limited to cases where the subject of the future-marked verb is a first-person one" (Rumsey 2001:355).

The Koromu intentive is about what someone wants to do and is committed to doing in the near future. Example (15) explains the speaker's intentions or plans to a group of young men recruited to help with some gardening work.

(15) Wa werai u pa hihike re -hi -mpe... garden small that G/L fence PUT F1s -INT
'I intend to fence in a small garden there...' (T6.7.30)

The meaning of a verb with future tense and intentive marking is summarised in [F]. This contrasts with the simple future tense with an agentive subject that can be summed up as, I say: 'I will do something'.

[F] I say: 'I want to do this'
I think about it like this: 'I will do it at some time a short time after'

The intentive can be expressed in first person plural, as in (16).

(16)...sakin -hia sa -mpe. word -F1p -INT say Yare -ia kaset umo-a -te... -PRES -1p be.not STAY -3s but cassette -DR "... we intended to talk. We went but the cassette was not (there)..." (T1.20.57)

With Goddard's (2011:339) explication of 'we' in mind, an explication for first person plural intentive could be written as follows:

[G] First person plural intentive with -mpe

I say: 'some people want to do something, I am one of these people'

I think about it like this: 'these people will do it at some time a short time after'

When speaking about the intentions of someone else, a verb with a first person future subject and the suffix -mpe can be framed by a light verb (LV), u 'say (quote form)/do' with tense-subject person number marking, as in (17). This

construction is not the same as direct speech, where u 'say' follows direct quotes of speech and thought, because there is a different intonation pattern.

Constructions that involve a light verb with a form of the verb 'to say' are found in a number of Papuan languages and similarities can also be found in languages in other parts of the world (see Reesink 1993 on "inner speech' in Papuan languages"). For example, to predicate intention to someone else the Australian language Ungarinyin, mentioned earlier, can have a verb with future and intentive inflections that is "framed by an appropriately prefixed form of the following verb -ma, which means 'say' or 'do" (Rumsey 2001:355).

8. Desiderative with V-apesi: what people want/desire, and are about to do

Potential event modality expressions in which a verb has the suffix -apesi 'desiderative: want/be about to' can appear in different constructions. The first is a simple desiderative in which a verb with the suffix -apesi represents something someone wants to do (8.1). Secondly, when a verb with -apesi occurs as complement of a light verb u 'say/do' the construction expresses what the subject is 'about to do', imminent prospective action (8.2). While -apesi could possibly be glossed as 'desiderative (DES)', the meaning is more clearly expressed by 'want' and 'be about to' depending on the type of construction in which the form occurs.

8.1 Simple desiderative: saying what someone wants with -apesi

When speakers express what they or someone else 'wants', a bare verb root is inflected by -apesi (WANT).¹² There is no indication of subject person or number so the subject has to be understood from the discourse or real world context. This expression is commonly used by the speaker about his/her own desires or,

¹² The gloss for 'want' is written in small capitals in italics to distinguish it as a suffix.

alternatively, in questions to a second person. There is a contrast with intentive constructions because person and number are not specified on the *-apesi* inflected verb. Also these forms do not express such a strong intention, plan, commitment or even ability to do something as first person intentive forms with *-mpe*.

In (18) the subject can be understood to be the same as the one indicated by the person-number suffix on the preceding verb.

The meaning can be explicated simply as in [H].

In (19), the subject can be understood from the third person subject suffix on the final verb in the previous clause. Note that the uncertainty in this example is expressed by the modality particle *tauo* (*taumo*).

Example (20) is from direct speech in a narrative about a large store. The speaker is the person guiding other participants around the store. The narrator was one of the addressees. Although the subject can be understood as 'you, the addressees' it could also be the general public.

The speaker can indicate tense-subject person-number using a similar method to the one that occurs when verbs are inflected by -mpe. The frame consists of the appropriately suffixed form of the light verb u 'say/do'. The third person singular is indicated in example (21). Again the basic meaning is given in [H].

In contrast, when an example like this is an example of direct speech the verb *u* means 'say (quote)', the intonation for direct speech is used and *wera* 'child' can not occur on its own in front of the quote. The morphosyntax of direct speech has an optional pre-quote formula which includes another speech verb, for example *sau* 'say to 3s'. As an example of direct speech, the contents of (20) could be expressed as *Wera sau-pe"Ya hes-apesi," u-a-te* [child said.to.3s-SR water wash-*WANT* say-3s-DR] "The child said to her, '(I) want to wash".

A verb with the suffix -apesi can occur in sequence with another verb. The two verbs have the same subject referent and the subsequent verb is fully inflected for tense-subject person-number. The meaning of this sequence of verbs could be interpreted as 'someone wants to do something, because of this, this someone does something else before'. (The suffix -apesi incorporates forms that are possibly related to -pe 'same subject referent following' and seipa 'reason'.)

¹³ Here u 'do' is a light verb that occurs with borrowings from Tok Pisin such as *baim* 'buy' (Priestley 2009:398).

- (22) ...koia aiake oro -apesi ya ne -e -te...
 sweet.potato cassava dig.up -WANT go STAY -3p -DR
 '...wanting to dig up sweet potato and cassava they went...' (T.2M 1.5)
- (23) sakine nokono te -nek -apesi ka -r -i =mo.

 talk good give -O2p -WANT come -PRES -1s =BM

 'Wanting to give you this good news I've come.' (Za1 Lk 1:19)
- (24)Ian hare sai her рe -apesi Ian ALOC talk stand PUT -WANT Sarere Ihi -hi рa yari =m0.Saturday (Ramu) Sugar G/L -F1s =BMgo 'Wanting to send a message to Ian, I'll go to Ramu Sugar on Saturday.' (D10.48.2)

An initial verb with the suffix -pe 'same referent following' can be followed by a second verb with the suffix -apesi WANT in a clause chain sequence. Neither the same referent following suffix nor the -apesi suffix express tense-subject or mood. This information must be gleaned from the real world context, as in (25), or from other clauses in the discourse, as in (26).

- (25) Heteri -pe usu t -apesi.

 run -SR pig get -WANT

 'He is running (because) he wants to get a pig.'
- (26)**Tamaite** wei -rame semta *-ℓ*. fight play/gamble -3p man -person Yesu tahi porone -pe -apesi. clothes -P3s divide -SR Jesus GEN get -WANT

'The soldiers gambled. They divided Jesus' clothes (because) they wanted them.' (Za4 Lk 23:34)

The meaning expressed here can be summed up briefly in terms of semantic primes.

[I] V-pe V-apesi

someone does something at some time (because) this someone wants to do something else after

8.2 Verb-apesi and the complement-taking light verb u: saying what someone/something is about to do (prospective action)

When a verb with -apesi is followed by a complement-taking predicate with the light verb u 'say/do' (cf. Reesink 1993) the construction describes what someone or something is about to do, that is, prospective or imminent action. In this grammaticized construction -apesi is closer in meaning to 'be about to' than to 'want'. The subject, which may be animate or inanimate, is indicated by the person-number suffix on the complement-taking predicate. Examples of a similar device for expressing a kind of generalised immediate future are found in other Papuan languages, for example Ku Waru (Merlan & Rumsey 1991:330-331). Example (27) with a sentient subject occurs at the beginning of a narrative.

(27) Sakin ato s -apesi u -r -i. story one say -be.about say -PRES -1s 'I am about to tell one story.' (T1.14.1)

Within a narrative an example with similar words might occur as an utterance "I want to tell one story', I said" with intonation and pauses setting off the utterance. Also, examples of direct speech often have a pre-quote formula, as in (20). When a verb with *-apesi* has a subject rather than a pre-quote formula it cannot be direct speech. Example (28), which also has a sentient subject, expresses prospective action since Korike is the subject of *k-apesi* 'be about to come' rather than a pre-quote formula. Like examples (21) and (27) above, this example would have to be rephrased, with an appropriate pre-quote formula and intonation, for it to form an example of direct speech.

Korike -į (28)k-apesi -te u-е men =m0.-3p Korike come-be.about.to say -DR stay -1s =BM'The Korike people were about to come so I stayed.' (G.E.30.1)

There is no possibility of ambiguity at all when prospective action constructions have an inanimate third singular subject, as in (29).

(29)Tiri pere -apesi и -te men −į. -a fall -3s tree -be.about.to say -DR -1s stay 'The tree was about to fall so I stayed.' (G.E.30.1)

The same construction is used when describing the prospective action of wildlife.

(30) Apu uo, atupu uo,
now GRD b.of.p GRD

eti amoko noko -apesi u -r -a.
skirt new dress -be.about.to say -PRES -3s

'Now, the bird of paradise, it is about to put on its new skirts (feathers).'
(T1.5.1) (b.of.p = bird of paradise)

When this construction has a sentient subject the meaning can be represented in reductive paraphrase as:

[J] V-apesi u-i (Sentient subject)
someone will do something a short time after this

When the subject is non-sentient the reductive paraphrase can be phrased as follows:

[K] V-apesi u-a (Non-sentient subject)
something will happen to something a short time after this

9. Internal and negative experience

9.1 Expressing desires that relate to internal experience

Internal experience linked to 'wanting to do something' is expressed when a complement-taking modal verb oru 'feel like' follows a complement that consists of either a bare verb root with the suffix -apu 'nominaliser' or a noun referring to a consumable item. The root oru has a variety of meanings connected to things inside the body, including the verb 'feel' (cf. Priestley 2002b, 2008). These examples with the modal verb oru are impersonal experiencer constructions with an object experiencer and an anonymous third person singular subject (Priestley 2008:403-423, see also Kalam in Pawley et al. 2000 and Amele in Roberts 2001, amongst others). The complements refer to something associated with the inner part of the body. This type of construction is used in Koromu when describing something that is happening to an experiencer through "physical and psychological conditions or sensations" (Priestley 2008:403), for example, mahe 'shame', peraru 'hunger', eri 'fear', sepa 'illness' and oru mere 'feel sorrow/grief' (2009:403-423, see also 2002b).

As the next section, 8.5, on *maikohu* 'not want' shows, the impersonal experiencer construction is not limited to involuntary experience. In example (31) the complement consists of a verb *yakere* 'laugh' with the nominaliser *-apu*. This is combined with a complement-taking, impersonal experiencer verb to describe an internal experience and internal desire to do something.

(31) Yakere -apu oru -se -r -a.
laugh -NOM feel.like-O1s -PRES-3s
'It makes me feel like laughing.' ('I want to laugh.')

Although it is possible to use second person to ask someone about their situation, or third person to report on someone else's feelings, constructions of this type are most commonly expressed in the first person, as in explication [L].

[L] V-apu oru-se-r-a

something is happening inside my body, I want to do something because of this

The complement-taking impersonal experiencer verb can also occur with noun complements that represent consumable entities.¹⁴ Again these constructions can occur with other person-number marking in the object position but examples are particularly common in the first person singular, as in (32).

9.2 Saying that you don't want something or don't want to do something: negative desiderative

Saying that you don't want something or don't want to do something is labelled here as negative desiderative modality. This type of modality is expressed in a very similar form to internal experience and desire. A complement consisting of a noun phrase or a verb with -apu is followed by a complement-taking predicate, the modal verb maikohu 'don't want (to)'. Although the verb is a modal impersonal experiencer verb its meaning is not restricted to internal experiences, such as bodily functions or involuntary conditions/sensations. For an example, see (33).

The Koromu negative desiderative construction expresses the following meanings with a verb and with a noun respectively.

¹⁴ Ne 'consume' is used for 'eat' or 'drink' while oru 'want' is used for hunger and thirst.

Example (34) has an NP complement.

(34)Ea maikoho -hau wene nare -se -a. yesterday -TADJ food cold don't.want -O1s -PRES -3s 'I don't want left over cold food from yesterday.' ('Yesterday's cold food isn't wanted by me.') (D9.7.3)

Maikohu 'don't want (to)' can also stand alone, without a complement. However, the expression still refers to something that the experiencer doesn't want that can be understood from the context.

Lexical exponents that express a similar meaning of rejection can be found in other languages, for example, Tok Pisin *mi les* 'I don't want (to)'. Examples can also be found in more widespread languages, for example, *bèk* 'I don't want/(may it not be or happen that)' in Acehnese (Durie, Daud and Hasan 1994:180), *warnaja* 'diswant/dislike/avoid' in Kayardild (Evans 1994:210) and *oni* 'not want' in Longgu (Hill 1994:322).

10. Concluding remarks

This study of Koromu modality reveals diversity in the potential event category. First of all there are specific tense-subject inflections for expressing what someone wants someone else to do, as in the imperative. Then there are a range of different constructions for talking about intentions and desires of the speaker or subject of the clause.

Imperative constructions differ from other constructions discussed here, both in the form of the imperative suffixes and because they necessarily involve both a speaker and an addressee. The intentive and desiderative type constructions all involve only the speaker or a relevant subject as obligatory participants. When expressing intentions in Koromu, first person marking must occur. This is realised as V-F1s-mpe (cf. -pe 'same referent'). Perhaps this is because a person can express greater certainty about their own intentions. In contrast the form, V-apesi 'want', used to say what people generally, including the first person, want to do

has no tense-subject person-number marking in the verb word at all. However, both intentive and desiderative type constructions can be framed in a construction with the light verb u 'say/do' that can also, in a different construction, be used to indicate quoted direct speech or thought. This framework allows person-number marking to be expressed.

Internal needs or desires are expressed distinctively, because Koromu uses impersonal experiential verb constructions with an object experiencer to express physical and psychological conditions and sensations (Priestley 2002b:259-265, 2008:403, see also Pawley *et al.* 2000, Roberts 2001). Similar constructions are also used for saying that 'someone does not want (to do something)' although the latter is not limited to internal experience.

Some of the core potential event modal categories in the verbal word can be summarised in English exponents of the semantic primes as follows:

Simple imperative V-IMP2s/(-IMP2p)

I say: 'I want you to do this'

Negative imperative *tai* V-IMP2s/(-IMP2p)

I say: 'I don't want you to do this'

Cessative (SVC) V apaise -IMP2s/(-IMP2p)

I say: 'You are doing something now, I don't want you to do this now'

(it is bad if you do this')

Intentive [first person] V-F-T:S -mpe (INT1s)

I say: 'I want to do this' I think about it like this:

I will do it at some time a short time after'

Desiderative V-apesi

(someone) wants to do this

Prospective action V-apesi u 'say/do' (light verb) (Sentient subject)

someone will do something a short time after this

Internal experience-desire Bodily function/experiencer V-apu oru-se-r-a (1s)

something is happening inside my body, I want to do something because of this

Negative desiderative V-apu maikohu-se-r-a (1s)

I don't want to do this

Tracing the instances of modality in Koromu verbal inflections highlights a number of characteristics of potential event modality in this Papuan language. For example, the range of use of the imperative form reveals related pragmatic issues and others may, with further research, reveal more about underlying cultural concepts. The use of the light verb u (used elsewhere with direct speech or thought) is a key structural component in the expression of the intentions and desires of other people than the speaker and also of prescriptive action. Another key structure is the use of impersonal experiential constructions, in which the experiencer is indicated by the object, to express internal experiences and desires (cf. Priestley 2002b) and also to express negative desires or rejection, that is, 'not want'. The latter is expressed in just one word, as in many other languages.

The use of a simple metalanguage to represent the meaning of all of these various types of potential event modality has allowed a very clear formulation of meaning, much clearer than technical labels. It has the added benefit that the Koromu version can be tested with native speakers of this endangered language and also that further research can be done into using such Koromu formulations in language and grammar materials for speakers and their children.

Appendices

Natural semantic metalanguage (NSM) standard conventions

Small caps are used for primes when they are referred to in the text.

Tables

- Tables are kept to one page.
- Equivalent meanings are kept on the same line in all the languages included in the table, i.e. in my English, Koromu, Tok Pisin table I, YOU, SOMEONE are in the same line as their equivalents in the other languages. (Different languages may have word/phrases of different length and different patterns of allolexy.)
- The primes (on the left) are given priority over the English language description (which is placed on the right in small letters).

Explications

- Explications are written in a smaller/more distinctive font than the main text and are set out in single spacing.
- Explications consist of components of meaning. Each new component begins on a new line. In many cases a component fits on to one line. If it is too long and runs over into the next line it should, if possible, be indented.
- Following I say: or I think: the quoted material is put in single quotes. It is also indented if it is on another line.

Notes and table of semantic primes: Exponents in English, Koromu (provisional), and Tok Pisin (provisional)

- Primes exist as the meanings of lexical units (not at the level of lexemes).
- Exponents of primes may be words, bound morphemes, or phrasemes.
- Exponents can be formally complex.
- They can have language-specific combinatorial variants (allolexes, indicated with ∼).
- Each prime has well-specified syntactic (combinatorial) properties.

Semantic primes: English, Koromu, Tok Pisin Exponents

English	Кокоми (provisional)	Τοκ Pisin (see Priestley 1999a&b, 2008	
I, YOU, SOMEONE,	I, NE, ATO,	MI, YU, WANPELA,	
SOMETHING~THING,	NA,	SAMTING,	substantives
PEOPLE, BODY	AHAROPU, METE	MANMERI, BODI	
KIND,	томтом,	KAIN,	relational
PART	MO~ASAO~-NE	НАР	substantives
THIS, THE SAME,	MO, ATEREI,	DISPELA, WANKAIN,	determiners
OTHER~ELSE	томо	NARAPELA	
ONE, TWO,	ATEREI, AERE,	WANPELA, TUPELA,	
SOME, ALL,	ASA, NUPU,	SAMPELA, OLGETA,	quantifiers
MUCH~MANY, LITTLE~FEW	NUPU, WERAI	PLANTI, LIKLIK	
GOOD, BAD	ETAMAU, WARIKAU	GUTPELA, NOGUT	evaluators
BIG, SMALL	ARENE, WERAKAHUNO	BIKPELA, LIKLIK	descriptors
THINK, KNOW,	URUNU, SIPAMU,	TINGTING, SAVE,	
WANT, NOT WANT	URUNU~-APESI, MAIKOHU	LAIK, NO LAIK~LES	mental predicates
FEEL, SEE, HEAR	ORU~URUNU, WERE, ESERE	BEL [~] PILIM, LUKIM, HARIM	·
SAY, WORDS, TRUE	SA, SAKINE, ITINI	TOK, TOK, TRU	speech
DO, HAPPEN,	HARU, AIRI,	WOKIM, KAMAP,	action, events,
MOVE, TOUCH	мотомото, мото	I GO, I PAS	movement, contact
BE (SOMEWHERE),	MENE,	I STAP,	location,
THERE IS,	MENE,	I STAP,	existence,
BE(SOMEONE/SOMETHING),	MENE	ı,	specification,
HAVE (SOMETHING)~BE SOMEONE'S	MENE~-NE*	I GAT	possession
LIVE, DIE	ENE, EME	I STAP (LAIP), DAI	life death
WHEN~TIME, NOW,	ENAPU~SA, APU,	WANEM TAIM~TAIM, NAU,	
BEFORE, AFTER,	SURUMAPA, EPONO,	BIPO, BIHAIN,	
A LONG TIME, A SHORT TIME,	SA OROHOI*, SA HANE*,	LONGTAIM TRU, LIKLIK TAIM,	time
FOR SOME TIME*,	ATOTUHUNU PAO,	LONGTAIM LIKLIK,	
MOMENT	APU MOREI	?WANPELA TAIM	
WHERE~PLACE, HERE,	ANI~SA, MO PA,	WE~PLES, HIA,	
ABOVE, BELOW,	NAUMPA, WARISESA,	ANTAP, DAUNBILO,	space
FAR, NEAR,	AIAKE, WAIMESA,	LONGWE, KLOSTU,	
SIDE, INSIDE	MESA, ORU PA	SAIT, INSAIT	
NOT, MAYBE,	IA~TAI, TAUMO,	NO, ATING,	logical concepts
CAN, BECAUSE, IF	NAUTO, U SEI, UO	INAP, LONG DISPELA, SAPOS	
VERY,	HEREKANI,	TUMAS,	intensifier,
MORE	APAI	MOA	augmentor
LIKE	UAPU	OLSEM	similarity

References

- Andrews JR 1975 Introduction to Classical Nahuatl Austin: University of Texas Press.
- Bugenhagen RD 1989 'Modality in Mangap-Mbula: An exploration of its syntax and semantics' Language and Linguistics in Melanesia 20(1/2):9-39.
- Bugenhagen RD 1993 'The semantics of irrealis in Austronesian languages of Papua New Guinea. A cross-linguistic study' in GP Reesink (ed) *Topics in Descriptive Austronesian Linguistics Semaian* 11. Leiden: Vakgroep Talen en Culturen van Zuidoost-Azië en Oceanië, Rijksuniversiteit de Leiden. Pp. 1-39.
- Chung S & A Timberlake 1985 'Tense, aspect and mood' in T Shopen (ed) Language Typology and Syntactic Description: Grammatical Categories and the Lexicon Cambridge: Cambridge University Press. Pp. 202-258.
- Durie, M, B Daud & M Hasan 1994 'Achenese' in C Goddard & A Wierzbicka (eds) Semantic and Lexical Universals: Theory and empirical findings Amsterdam/Phildelphia: John Benjamins. Pp. 171-201.
- Evans, N 1994 'Kayardild' in C Goddard & A Wierzbicka (eds) Semantic and Lexical Universals: Theory and empirical findings Amsterdam/Phildelphia: John Benjamins. Pp. 203-228.
- Foley, WA 1991 The Yimas Language of New Guinea Stanford, Calif.: Stanford University Press.
- Goddard C 2008 Cross-Linguistic Semantics Amsterdam & Philadelphia: John Benjamins.
- ——— Forthcoming 'Have to, have got to, and must: NSM analyses of English modal verbs of "necessity" in M Taboade & R Trnavac (eds) *Nonveridicality, Evaluation and Coherence Relations* ("Studies in Pragmatics" series Emerald) [submitted Dec 2011].
- Goddard C & A Wierzbicka (eds) 2002 Meaning and Universal Grammar: Theory and Empirical Findings Volume 1 Amsterdam & Philadelphia: John Benjamins.
- Gumperz J 1982 Discourse Strategies Cambridge: Cambridge University Press.
- Hill, D 1994 'Longgu' in C Goddard & A Wierzbicka (eds) Semantic and Lexical Universals: Theory and empirical findings Amsterdam/Phildelphia: John Benjamins. Pp. 31-329.
- MacDonald L 1990 A Grammar of Tauya Berlin: Mouton de Gruyter.
- Merlan F & A Rumsey 1991 Ku Waru: Language and Segmentary Politics in the Western Nebilyer Valley, Papua New Guinea Cambridge: Cambridge University Press.
- Mithun M 1999 The Languages of Native North America Cambridge: Cambridge University Press.
- Mosel, U 1994 'Samoan' in C Goddard & A Wierzbicka (eds) *Semantic and Lexical Universals:* Theory and empirical findings Amsterdam/Phildelphia: John Benjamins. Pp. 331-360.
- Palmer FR 2001 Mood and Modality Cambridge: Cambridge University Press.
- Pawley A, SP Gi, IS Majnep & J Kias 2000 'Hunger acts on me: The grammar and semantics of bodily and mental process expressions in Kalam' in VP De Guzman & BW Bender (eds) Grammatical Analysis in Morphology, Syntax and Semantics: Studies in honor of Stanley Starosta Honolulu: University of Hawai'i Press. Pp 153-185.
- Payne TE 1997 Describing Morhphosyntax: A Guide for Field Linguists Cambridge: Cambridge University Press.
- Priestley C 1999a 'Suggested exponents and grammar of substantives and mental predicates in Tok Pisin' unpublished manuscript (MA course): Australian National University.

- __1999b 'Suggested exponents and grammar of some further predicates in Tok Pisin unpublished manuscript (MA course): Australian National University. 2002a The Morphosyntax of Verbs in Koromu (Kesawai), a Language of Papua New Guinea Unpublished MA thesis: The Australian National University. - 2002b 'Insides and emotion in Koromu' in NJ Enfield & A Wierzbicka (eds) The Body in Description of Emotion: Cross-Linguistic Studies Pragmatics and Cognition Special Issue 10:1/2 Amsterdam & Philadelphia: John Benjamins. Pp. 243-270. — 2008 (revised 2009) A Grammar of Koromu (Kesawai), a Trans New Guinea Language of Papua New Guinea Unpublished PhD thesis: The Australian National University. — Forthcoming a Koromu: A Papuan language of Kesawai and nearby villages Berlin: The Pacific Linguistics Series Mouton de Gruyter. (based on 2008) - Forthcoming b 'What's in a name? Personal reference expressions, cultural values and cultural scripts in the Papuan language of Koromu Intercultural Pragmatics. Reesink G 1993 "Inner Speech" in Papuan languages' Language and Linguistics in Melanesia 24:217-225. Roberts JR 1990 'Modality in Amele and other Papuan languages' Journal of Linguistics 26(2):363-401. - 1997 'Switch-reference in Papua New Guinea: A preliminary survey' in A Pawley (ed) Papers in Papuan Linguistics No. 3 Pacific Linguistics A-87 Canberra: Australian National University. Pp. 101-241. - 2001 'Impersonal constructions in Amele' in A Aikhenvald, RMW Dixon & M Onishi (eds) Non-canonical Marking of Subjects and Objects Amsterdam/Philadelphia: John Benjamins Publishing Company. Pp. 201-250. Rumsey A 2001 'On the syntax and semantics of trying' in J Simpson, D Nash, M Laughren, P Austin & B Alpher (eds) Forty Years on: Ken Hale and Australian Languages Canberra: Pacific Linguistics. Pp. 353-363. Timberlake A 2007 'Aspect, tense, mood' in T Shopen (ed) Language Typology and Syntactic Description Second edition Volume III: Grammatical categories and the lexicon Cambridge: Cambridge University Press. Pp. 280-333. Van Valin Jr RD 2005 Exploring the Syntax-Semantics Interface Cambridge: Cambridge University Press. Wierzbicka A 1987 'The semantics of modality' Folia Linguistica 21(1):25-43. - 1991 Cross-Cultural Pragmatics: The Semantics of Human Interaction Berlin: Mouton de Gruyter (2003). — 1996 Semantics: Primes and Universals Oxford: Oxford University Press. — 2006a English: Meaning and Culture New York: Oxford University Press. — 2006b 'Anglo scripts against "putting pressure" on other people and their linguistic manifestations' in C Goddard (ed) Ethnopragmatics: Understanding Discourse in Cultural
- Z'graggen, JA 1980 A comparative word list of the Rai Coast languages, Madang Province, Papua New Guinea D30 Canberra: Pacific Linguistics.

Context Berlin: Mouton de Gruyter. Pp. 31-63.

Musicolinguistic artistry of *niraval* in Carnatic vocal music

Mahesh Radhakrishnan
Linguistics, Macquarie University
mahesh.radhakrishnan@mq.edu.au

Abstract. Niraval is a form of virtuosic musicolinguistic improvisation in Carnatic music whereby a line within a song is repeated in various melodic and rhythmic manifestations within the ragam (melodic framework) and talam (beat cycle). For a Carnatic singer, *niraval* makes different aesthetic demands than other forms of non-textual improvisation within the tradition. To convey artful, sincere renditions of the same lyrical text, the singer-musician must imaginatively devise interesting repetitions which attend to both melodic and rhythmic elements and the lyric text. Combining melodic and rhythmic skill and verbal artistry in a range of South Indian languages as well as Sanskrit, Carnatic singers display extraordinary communicative and artistic competence and captivate their audiences. This paper analyses the musical and linguistic elements of a single niraval performance in Sydney's Carnatic music community. It is hoped that such research will contribute to a greater understanding of the interplay of language and music in sung performance.

Keywords. Carnatic singing, ethnography, verbal art, music, improvisation

1. Introduction¹

Niraval, also spelt neraval, is a particular form of musicolinguistic improvisation within the South Indian music tradition of Carnatic music (see Subramanian 2006 for a social history; see Viswanathan & Cormack 1998; Morris 2001 for ethnomusicological studies of Carnatic music). Carnatic music is a vocal and instrumental tradition based around the performance of songs interspered by improvisatory formats. The repertoire is multilingual, featuring song compositions, mostly on Hindu devotional themes², composed in Sanskrit and the Dravidian languages Telugu, Tamil, Kannada and Malayalam and different kinds of non-language vocables. Improvisatory formats form a significant part of performance and can take up over half the length of the entire concert. One of these improvisatory formats is niraval. Niraval improvisation involves the repetition of a line or two lines from an already-composed song in various melodic and rhythmic combinations over a continuing beat cycle called the tālam.3 This paper explores the musicolinguistic artistry of a single 4m 53s niraval performance of two lines from a Telugu song as performed by Prema Anandakrishnan a Tamil-speaking South Indian singer in Sydney's Carnatic music community during one of her concerts.

The term *niraval* comes from the Tamil word *nirappu* meaning "to fill up". *Niraval* is also known by the technical term *sāhitya prastāra* (Sundar 2010), Sanskrit for "combination of lyrics". ⁴ *Niraval* generally takes up a small proportion of a typical

_

¹ I would like to express my gratitude to my singing guru Shri Dr. M.S. Ramanathan for his musical instruction and knowledge, to Shri Dr. S. Giridhar Tirumalai for his Telugu translation of the song, to the singer Smt. Prema Anandakrishnan who performed this niraval for being a willing participant, and all the other performers and rasikas at Sydney Music Circle who participated in this particular concert and the research project of which it is part, to my PhD Principal Supervisor Dr Verna Rieschild for her invaluable guidance, and my family for all their support and assistance. All errors are entirely my own.

² This paper deals with mainstream Carnatic music which is almost wholly Hindu in subject matter and tied to Hindu cultural life. There are also Christian and Muslim traditions also regarded in the respective communities as "Carnatic music" which evolved from the same theoretical principles but have adopted different performance practices and repertoire tied to the respective faith traditions. Despite the almost wholly Hindu devotional song repertoire, there are numerous non-Hindu practitioners of mainstream Carnatic music. The degree of Hindu religiosity in (mainstream) Carnatic music is a point of some debate (see, for example, Benary 1972:43-44, Subramanian 2007)

³ The word tāļam refers to the beat cycle and also the names for different beat cycles.

⁴ Sāhitya or sāhiytam is the term for the "text" of a song. Prastāra literally means "spreading out" but can refer to any form of combination. In poetry and music it is used to refer to a rhythmic

Carnatic concert.⁵ For example, in the concert chosen for this study there were three performances of *niraval*, each of roughly five minutes duration within a full three-hour concert. Nevertheless, niraval establishes a mood of heightened engagement for performers and rasikas6 (audience members), making it one of the highlights of a Carnatic music concert. For example, Praveen Narayan, a Sydneybased singer and rasika (audience member) reflected that his "favourite part of the concert would be the main kirtana (song), along with (the improvisatory formats) kalpana ālāpana, neraval and swaram (i.e. rāga (Praveen_Narayan_Email_1/11/11). Praveen Narayan's reflection is significant because it highlights the regard that rasikas (audience members) have for niraval, singling it out as a significant part of the concert even though it takes up such a small duration of a concert.

Niraval is also viewed by Carnatic music scholars as an important part of the concert laden with potential for the expression of affect and as a kind of reverent re-enactment of Carnatic compositional processes. As Sundar (2010) states, "An effective *niraval* has the innate capacity to move the audience to tears. It exemplifies the personal experience the composer must have gone through to come out with such beautiful songs" (2010). At the 1983 Madras Music Academy conference, Telugu scholar and musicologist Kameswara Rao described *niraval* as a means of *rasa pushti* (fullness of aesthetic savour) (J.M.A.M. 1984:25-26). The practice of repeated elaboration on a single line of text has counterparts in Indian classical dance (Ram 2011:162) and North Indian classical music (Sanyal & Widdess 2004:239-245).

composition technique "by which a series of durations is consistently permuted to form rhythmic variety" (Morris 2001: 80) as outlined in musical treatises dating back at least as far back as the 18th century (Groesbeck 1999: 96) and further back.

⁵ Full Carnatic concerts conform to a standard concert format devised in the 1930s referred to as katchēri paddhati which features a range of songs and improvisatory formats. For social historical background on the *katchēri paddhati* see L. Subramanian (2000:30) and for description of the structure of the format see Morris (2006:307) and V. Subramanian (n.d.). Improvisatory formats during a concert take place around pre-composed songs and may be self-contained or embedded within the songs. *Niraval* is one of two improvisatory formats which are embedded in a song, the other being *kalpana swaram* (mentioned in Footnote 7).

⁶ The Sanskrit word is *rasika*. In this paper, the word *rasikas* with an English plural marker is used to refer to the collective. The same plural marking applies to the following Indian language terms used in this article: *āvartanam*, *kriti*, *rāgam*, *swaram*, *naḍai*, *gamaka* and *sangati*.

While most other forms of Carnatic vocal improvisation—rāga ālāpana (freetime melodic improvisation using non-meaningful vocables), tānam (freetime melodic and rhythmic improvisation using specific vocables tānam, tam or ānanda), kalpana swaram (melodic and rhythmic improvisation using solmisation⁷ syllables known as swarams within the beat cycle and progress of the song)—niraval uses part of the song texts, called the sahityam (poetry/literature/composition), as the actual material for melodic and rhythmic improvisation imbuing it with greater potential to draw attention to the semantic content and poetic features of the text. The only other form of improvisation which involves text is viruttam which is a freetime melodic elaboration of a scriptural or poetic verse. Hence, niraval is unique because it brings together melody, text and rhythm. Each performance of niraval requires of the artist improvised treatment of melody and rhythm within the confines of the rāgam (melodic framework) and tālam (beat cycle). And while this improvisation does not involve creating new lyrical material, the set lyric line chosen for niraval is subject to minor alterations in the rendering of the text. In this particular *niraval*, the main alteration to the text is in the form of repetition of phrases from the chosen line. There is also one instance of an omission of a word which may or may not have been intentional.

In this paper, a single *niraval* performance during a Sydney-based Carnatic vocal concert is analysed for its verbal artistry, taking into account the above musical elements. Through carrying out such an analysis, I aim to demonstrate the rich interplay between musical and linguistic elements in *niraval*. A number of recent studies of Aboriginal song have attempted to bring together musical and linguistic analyses (Barwick, Birch *et al.* 2007; Marett & Barwick 2007; Turpin 2005). This paper also draws from that tradition analysing *niraval* as a piece of musicolinguistic artistry. As Turpin & Stebbins (2010) state, "[o]ur understanding of the arrangement of musical components and their effect on linguistic form is still in

_

₇ Solmisation is a system wherein each note of a scale is represented by a syllable. The western system of solmisation, also called solfege or solfa, is one example, made up of the syllables Do, Re, Mi, Fa, Sol, La, Ti, Do. Solmisation systems exist in several cultures and are a useful pedagogical tool. In Carnatic music, the solmisation system known as *swaram* is made up of the seven syllables (called *swarams*) Sa Ri Ga, Ma, Pa, Da, Ni. It is used as a pedagogical tool to provide a linguistic representation of melodies but is also sung (or melodically rendered by instruments) in performance both as set passages within a song known as *ciţţa swaram* and in the improvisatory format known as *kalpana swaram*.

its infancy" (2010:14). The patterned but spontaneous interplay of melody, rhythm and text of *niraval* provides a good opportunity for such an exploration.

2. Data and method of analysis

The discussion of *niraval* in this paper is based on a microanalysis of the melody, rhythm and text in a single *niraval* performance on a line from a song in Telugu by a singer, Prema Anandakrishnan, who is from a South Indian Tamil background. Prema Anandakrishnan is fluent in Tamil, English and Malayalam and can also understand Hindi. The audience is predominantly Tamil-speaking with a few speakers of Telugu and Kannada. In addition, all of the performers and nearly all the audience are also fluent English speakers. This niraval performance was commenced by the singer⁸ and occurred in alternating turns between the singer and the accompanying violinist. The singer and violinist had five turns each in this particular *niraval*. The *niraval* went for 4m 53s and took place during within a 2 hour and 46 minute concert by the singer. There were two other sequences of niraval during her concert which were of 5m 40s and 6m 17s duration respectively. The concert during which these sequences of *niraval* took place was observed and recorded and later one particular niraval was chosen and transcribed for musical and linguistic features. This particular *niraval* provided a good example of the scope of melodic, rhythmic and poetic devices, i.e. the musicolinguistic artistry of niraval.

Microanalysis, in the form of Conversation Analysis (Schegloff 2000; Goodwin & Heritage 1990) has proven useful to linguists interested in the emergent and sequential elements of spoken language through detailing a number of "paralinguistic features" of talk including pauses for breaths, lengthening of words, volume, speed, emphasis, pitch and interactional elements such as turntaking sequences and overlap. The focus on emergent elements makes such a

 $_{\rm 8}$ All niraval performances are commenced by the main performer whether they are the singer or an instrumental performer.

 $_{9}$ Where there is melodic accompaniment, all vocal improvisatory formats typically take place in turns between the main performer and the melodic accompanist. While the self-contained formats of $\bar{a}l\bar{a}pana$ and $t\bar{a}nam$ typically consist of one full turn each, the embedded formats of niraval and kalpana swaram take the form of several alternating turns. Hence, a single niraval performance sequence like the one chosen for this paper will typically consist of several alternating turns between the main performer and the accompanist.

RADHAKRISHNAN

micro-analytical approach useful to the study of singing where it can be combined with musical transcription to provide a fuller picture of the artful interplay of language and music as it unfolds in a given performance sequence. Microanalysis is particularly crucial for the study of musical performance because it can highlight the coordination of timing between participants in performance referred to as "entrainment" (Clayton, Sager *et al.* 2005; Barwick 2011:v169). While I focus mainly on the singer in this analysis, her interplay with the violin accompaniment is an important aspect of the overall performance structure and will also be discussed.

The transcriptions are presented here as "musicolinguistic" graphs (see Figure 1), to present as detailed a picture as possible of the melodic, rhythmic and textual elements as they unfold in performance. Each graph (numbered A.1-A.51 in the top left hand corner) represents one avartanam (beat cycle). The song including the *niraval* which occurs in it is in *ādi tālam*, ¹⁰ more specifically *ādi tālam catusra* nadai. 11 Ādi tālam is the most common beat cycle type comprising 8 beats 12 per cycle. Catusra nadai is the most common and unmarked form of ādi tālam comprising four nadais (sub-beats) per beat. Each avartanam (beat cycle) of adi tālam catusra nadai is made up of 8 beats each of which are made up of 4 nadais making for a total of 32 nadais sub-beats. The line in which the niraval took place covers two avartanams when sung normally without any repetition. The niraval itself took place from the end of A.3 to the end of A.51. However, the three āvartanams leading into the niraval (A.1-A.3) are included to demonstrate the rhythmically seamless transition from the song into niraval which takes place without any pause in the continuing tālam cycle. A.51 is the final line of the niraval sequence before the start of the kalpana swaram, another improvisatory format but involving the singing of swarams which often follows performances of niraval (see

¹⁰ Each beat cycle "type" is given a name. The word $\bar{a}di$ means "primordial". $\bar{A}di$ $t\bar{a}|am$ is the name given to this $t\bar{a}|am$. It is the most common $t\bar{a}|am$ in Carnatic music and the first one taught to students.

¹¹ Catusra comes from the Sanskrit catur "four". Tisra naḍai (three sub-beats per beat) and other subdivisions (e.g. five or seven sub-beats per beat) of ādi tāṭam are also used but are much less common than catusra naḍai.

 $^{^{12}}$ The term *akṣara* is often used for beat but I prefer to use the English term beat.

Footnote 7). Hence, this *niraval* performance involved the elaboration of 2 āvartanams worth of sung text over 48 āvartanams.

The first row of each musicolinguistic graph depicts the eight beats of the adi tālam cycle equally spread except in some cases where there are many swarams to fit in and the space for one beat is made bigger to accommodate them. The second row presents the swarams using the first letter of each swaram, e.g. 'S' for {Sa}, 'R' for {Ri} etc. as is conventional practice in Carnatic music notation. In the swaram row, each beat is divided into four nadais (sub-beats) to capture the melodic movement (in some cases there are very fast melodic passages which require a more detailed subdivision of eight). Like the beats, the nadais in the swarams row are also equally or near-equally spread. The third row shows the sung text. In the fourth row, a melodic contour graph is used to depict the movement of the pitch corresponding to the beats and nadais of each avartanam in the above two rows. The equal spread of beats and nadais in the preceding rows enable the melodic contour to provide a better linear representation of the movement of melody according to the beats of the rhythmic cycle. The fifth row captures a phonetic representation of the words to reflect patterns of pronunciation particularly vowel shape and duration/length—by the singer. Integrating Conversation Analysis transcription ideas (Schegloff 2000:60-61), a '.' symbol is used for a pause of one nadai and a ':' is used to show that the previous note/vowel is lengthened for the duration of one nadai. The same symbols are used in the swaram row and the "Phonetic" sung text row.

The melodic contour graph, *swaram* notation and phonetic representation of the sung text are supplemented in the sixth row with staff notation. The staff notation is all in treble clef and is based around the western pitch G as the tonic. Each *āvartanam* of 8 beats (i.e. 32 *naḍais*) is represented by two "bars" of the staff in 4/4 time. Hence, each beat in the 8-beat cycle is worth one crotchet and each *naḍai* (sub-beat) is worth one semiquaver. As the width of a staff is influenced by the number of notes and not by durational elements, it is not possible to spread the beats on the staff to align it with the above rows. To mitigate this lack of alignment, I have reproduced the *swarams* and the text below the staff notation. In the staff notation, one *nadai*, which is a quarter of a beat, is represented by one

semiquaver. Oscillating *swarams* and *gamakas* (ornaments) are captured using slurs¹³ to indicate continuous movement between pitches normally called "slides" and, where required, demisemiquavers are used (e.g. in the syllable *-na* in the word *smarana* in Figure 1).

While the staff notation does not provide an accurate enough representation of the subtle nuances of the *rāgam* to replace the *swarams*, it does provide an illustration which is more accessible to those with a background in general western musicology who are unfamiliar with the *swaram* system. The sung text beneath the staff notation is captured in a way which is revealing of vocalic ornamentation. As the durations of syllables are already captured in the durations of notes in the staff, ¹⁴ the ':' symbol is not used for the sung text which appears below the staff notation. Where a vowel occurs over several notes, it is repeated for each note e.g. the word *hari* may become *ha- a- ri* in the transcription below the staff. In some cases, the staff notation and text underneath it are sufficient enough for the analysis. For example, in Figure 8 and Figure 10 of Section 4.3, I have used staff notation alone to capture textual and/or melodic rhythm.

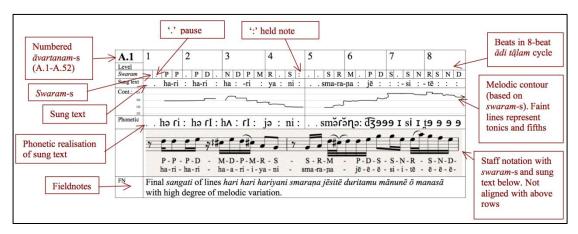


Figure 1. Musicolinguistic graph of the first avartanam (A.1) of the niraval performance

The aim of using the above conventions is to capture the observable pitch, the relative duration or "periodicity" (Clayton 2009:329) and pronunciation of the song text as they unfold together across the axis of the beat cycle in performance.

¹³ Slurs are used instead of glissandi (slides) due to the limitations of the transcription software. Hence, every slur must be interpreted as a slide between notes.

¹⁴ The durations of notes on a staff are distinguished by their form (e.g. semibrieves, minims, crotchets, quavers etc.) unlike the durations of swarams which can only be represented by additional symbols or through spacing.

When the violin takes a *niraval* turn, the melodic contour and *swarams* are captured in the same way as for the vocalist, except with grey coloured lines and script in the musicolinguistic graphs. When the violin—or any other instrument—plays *niraval*, an enculturated listener can discern text from the rhythm of the violin because of the regular rhythmic setting of the line of text (see Section 4.3). This *perceived* lyric line for the violin *niraval* turns is included in the 'text' row- also in grey.

The representation of melody in this paper is based on the basic *swaram* scale of the rāgam in which the song is sung which is in this case is Saraswati rāgam. While there is more to ragam than scale, every ragam has an arohanam (ascending) and avarōhaṇam (descending) scale of swarams on which it is based (Alves 2006:134; Jairazbhoy 1995:28). Some swarams may represent a single pitch value (e.g. in all rāgams with a fifth $\{Pa\}$ this is equal to a fifth) while others are more accurately described and transcribed as oscillations between pitch values. For example, in Saraswati rāgam, the fourth $\{Ma\}$ is regarded as a raised (i.e. sharp) fourth, but this note is typically rendered as an oscillation between a fifth and a sharp fourth in performance. A non-oscillated {Ma} which is a stable sharp fourth occurs more sparingly and is likely to be a more conscious choice. While referring to particular swarams in writing, I will use the Western scale referents, sometimes prefixed by Western notational attributes (e.g. raised, major, minor etc.) followed by the regular abbreviated swaram terms used by performers in curly brackets. The swarams for all notes in the upper octave are prefaced by mēl "top" within the bracket, e.g. 'upper fifth {mēl Pa}. While there are notes in the lower octave these are not discussed in the paper. In the swaram line of the graphs, the upper octave swarams are represented in bold, while any lower octave swarams are underlined. Using this system of description, the arohanam, or "ascending" scale of Saraswati rāgam will be described as:

'tonic $\{Sa\}$ ', 'major second $\{Ri\}$ ', 'raised fourth $\{Ma\}$ ', 'fifth $\{Pa\}$ ', 'major sixth $\{Da\}$ ', 'upper tonic $\{m\bar{e}l\ Sa\}$ '



Figure 2. Ārōhaṇam (ascending scale) of Saraswati rāgam.

and the avarōhaṇam or "descending" scale:

'upper tonic $\{m\bar{e}l\ Sa\}$ ', 'minor seventh $\{Ni\}$ ', 'major sixth $\{Da\}$ ', 'fifth $\{Pa\}$ ', 'raised fourth $\{Ma\}$ ', 'major second $\{Ri\}$ ', 'tonic $\{Sa\}$ '.

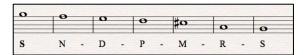


Figure 3. Avarōhaṇam (descending scale) of Saraswati rāgam.

Although both oscillating and non-oscillating raised fourths are included in the ascending and descending staves respectively, in practice, either form of the raised fourth (or other notes such as the minor seventh $\{Ni\}$ which can also be oscillating) can occur whether in an ascending or descending melodic sequence.

3. Where *niraval* fits into the Carnatic concert

The sequence of a Carnatic music concert revolves around the performance of songs (already composed) and improvisatory structures which precede, follow or occur within songs. As mentioned in the Introduction, all Carnatic songs are on Hindu devotional themes with a few exceptions. As a result there is a shared linguistic repertoire of devotional concepts, mostly from Sanskrit, despite the diversity of languages in the song repertoire. This shared repertoire is a significant part of what makes Carnatic song themes accessible to audiences made up of people from Tamil, Telugu, Kannada, Malayalam and other South Indian language communities.

Carnatic concerts subscribe to a format, known as the *katchēri paddhati w*hich was developed in the early 20th century (Subramanian 2000:30). This involves the performance of songs with increasing amounts of improvisation attached to it. Improvisation is almost always in the same *rāgam* as the song to which it is attached together creating discrete units of performance called "items" comprising the song and surrounding improvisatory formats which are all typically tied together by being in the same *rāgam*. The item can be referred to by

¹⁵ There are instances where changes of *rāgam* occur within an "item" including the *rāgamālika* "little garland of *rāgams*" which is a song composition in a few different *rāgams*. A *viruttam* (freetime

the name of the song. The concert builds up to a "main item" which is characterised by the most improvisation (Subramanian n.d.). The observed concert by Prema Anandakrishnan featured 14 items (see Table 1 and Table 2):

Item no.	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Approx	7	9	8	14	21	8	4	40	2	36	3	5	4	1
time														
(mins)														
Niraval?					Y			Y		Y				

Total concert length (including approx 4 min of pauses): approx. 2 h 47 min,

Table 1. "Items" and durations of each item in Prema Anandakrishnan's concert.

Item no. 5 – 'Hari Hari Hariyani'								
Saraswati rāgam								
Instr.	Vocal	Violin	vocal w/	voc + violin				
			violin accomp.	(5 turns each)	voc + violin			
Perf.	ālāpana	ālāpana	Performance	Niraval on	Kalpana swarams			
structure	(freetime	on	of <i>kriti</i>	chosen lines	(solfa			
	improvisation	Saraswati	(composition)	from the kriti	improvisations)			
	using	rāgam	titled 'Hari	(in this case	in Saraswati			
	vocables) on		Hari Hariyanî	the whole	rāgam around			
	Saraswati			pallavi)	chosen line as a			
	rāgam				refrain			
Approx	6	3	4	5	3			
time								
(mins)								

Item no. 5 – 'Hari Hari Hariyani' total time: 21 min

Table 2. Breakdown of Item no. 5 into consitutent sequences.

As mentioned in the Introduction, there were three sequences of *niraval* during the 2 hour 46 minute concert, taking up a total time of roughly 15 minutes.

melodic improvisation of a verse) which can also be in several $r\bar{a}gams$ is typically connected to the song which follows it, providing another instance of changes in $r\bar{a}gam$ within an item.

RADHAKRISHNAN

Niravals took place during three items, the 5th, the 8th and the 10th. The *niraval* during the 5th item has been chosen for analysis.

The most common song format in Carnatic music is the *kriti*, literally, "composition", a form of set composition developed and popularized by Thyagaraja (1767-1847) (Jackson 1992:19-20), one of the most revered Carnatic composers. *Niraval* often takes place in the rendering of *kritis* over a chosen line or pair of lines. The word *kriti* itself is Sanskrit for "a work of art" or "creation". *Kritis* are viewed as complete works of art within the tradition and can be performed as standalone pieces with no additional improvisation. *Kritis* typically have three separate sections called, respectively, *pallavi* (sprout), ¹⁶ *anupallavi* (after sprout) and *caraṇam* (foot/section). Table 3 shows the text and translation for the *kriti* during which this particular *niraval* performance occurred divided into its *pallavi*, *anupallavi* and *caraṇam*. The *kriti* is titled *Hari Hari Hariyani* composed by Walajapet Venkatramana Bhāgavatar (1781-1874).

In performance, each line or pair of lines is repeated several times in relatively set melodic and rhythmic variations called *sangatis* (set variations).¹⁷ Each line can have one or more *sangatis* (typically between two and four and not more than six) and each *sangati* is usually repeated once. Audiences expect *sangatis* in a performance of a song (whatever the song format). Students of Carnatic music learn *sangatis* of a song from their guru and are expected to reproduce them in performance. While these *sangatis* are relatively stable, there is still a degree of flexibility which results in differences in *sangatis* between different major performers or artistic lineages and some room for the innovation of new *sangatis* (cf. Matoba 2008; Morris 2001). Hence, different performers will have different versions of a song (even excluding any improvisatory formats). Some *sangatis* are memorable, and audience members will generally look for those.¹⁸ *Sangatis* can also be regarded as the building blocks for *niraval* (Vijayakrishnan 2007:308) In

¹⁶ The word *pallavi* is used to refer to the first section of the kriti and also to refer to the only section of sung text performed as part of the *Rāgam Tānam Pallavi* (RTP). Both are about the same length (1-2 *āvartanams*)

¹⁷ The link between *sangati* and *niraval* is highlighted by Viajayakrishnan (2007: 11) who states that "the seeds for niraval" were set out "in the sangatis" of Thyagaraja's compositions.

¹⁸ "[T]here are those who like to anticipate particular sangatis in a composition an gain satisfaction in hearing those sangatis which they were expecting" Mohan Ayyar, Carnatic musician, scholar and rasika (FB_Comment_20/10/11)

general, however, *sangati*s are relatively stable structures and are more likely to be learnt or devised prior to performance than improvised. The only thing which does often change in a performance is the number of times each *sangati* is repeated.

The text of 'Hari Hari Hariyan' is presented in Table 3.

Section	Lyric text	Translation
pallavi	hari hari hariyani smarana jēsitē duritamu mānunē ō manasā	If you remember/recite "Hari Hari Hari" all sins/misdeeds will disappear
anupallavi	parama purusudaina bhāva janakuni paripūrṇamuga bhakti sēyucunu shrī	Worship the Great soul, Vishnu with full dedication
caraṇam	rāma bhakta varulanu dūsincaka rātri pagalu yara nimisamē māraka rāmacandrapura vara shrī vēnkata- ramana bhāgavata bhāvitamagu shrī	People who are in the community of Rāma without insulting, day and night, unceasingly, Reside in Rāmachandra pura (like) Venkatramana Bhāgavatar, becoming divine.

Table 3. Text and translation of the kriti titled Hari Hari Hariyani (adapted from a translation by Shri Dr. Giridhar Tirumalai).

As with this particular example, *kritis* generally have short texts. Based on this concert and two other concerts observed and recorded as part of the doctoral project of which this paper is a part, the average song has around 30 words, usually no more than 90 and some as few as 5, for example, the *pallavi* in a *RTP* (see Footnote 16). *Hari Hari Hariyani* has 33 words. The repetition of lines in *sangatis* (set variations) and the repetition of *sangatis* enable the short song texts to take longer than they would if they were performed from start to finish without any repetition. In addition to the repetition of each line in *sangatis*, the *pallavi* acts as a kind of refrain for the whole song, as it is sung at the beginning of the song, between the *anupallavi* and *caranam* and again following the *caranam*. Hence, the

kriti (composition) Hari Hari Hariyani took 4m 8s prior to the start of the niraval.¹⁹ In the analysed performance, the whole pallavi (made up of nine words) was chosen for niraval and the artist commenced it following her rendition of the whole song in its sangatis and followed the niraval with kalpana swaram (i.e. pallavi, anupallavi, pallavi, caraṇam, pallavi, niraval, kalpana swaram).

In the following section, I will discuss the way that the singer combines melody, rhythm and text to create an effective and exciting *niraval* performance.

4. Clever word displays: Niraval as an art of musicolinguistic combination

Niraval always take place on a chosen line or pair of lines within the song. The choice of lines for *niraval* may be a matter of convention because certain lines within certain well-known songs may be well-known choices for rendering niraval. However, as a general rule, lines chosen for niraval are those with heightened poetic language and profound meaning (Sundar 2010; Krishna 2010:17-18). In niraval the set lyric combines with melodic and rhythmic improvisation such that the words themselves are the improvisatory material. As mentioned in the Introduction, this is what sets niraval aside from almost all other forms of improvisation. While the lyrics are not improvised, the melodic and rhythmic configurations are improvised, allowing for semantic emphasis and interesting interplay with the spoken syllabic stress of the sung text. Manipulation of the text mainly takes the form of repetition of phrases from the chosen text during the niraval development. Performers need to balance what is "given" to them by the tradition with their own "added" creativity (Nettl 1983:30), working within the confines of the text, the melodic framework of the *rāgam* and rhythmic parameters of the tālam (beat cycle). While Nettl's formulation of "given" and "added" was used in relation to music, and specifically composition, the rules of creativity and

¹⁹ Niraval can either start following the end of a song (the last return to the pallavi) by going to the chosen line or can take place at the time the particular chosen line is first sung during the course of the song. The flexibility between these two points of commencement adds further to the unpredictability and surprise for the audience. In this case, the *niraval* was performed at the end of the song.

tradition are equally applicable to improvised forms of music and verbal art. Like musical performance, verbal art forms rely on canons and a regard for innovation within that canon, a balance "between extreme fixity and unconstrained creativity" (Foley 1997:364). In singing, the balance between the given and the added is both musical and verbal.

The verbal artistry required for *niraval* is suggested in its technical Sanskrit term, "*sāhitya prastāra*" (see Footnote 4). Other definitions are provided by Kassebaum (1987) and Campbell & Teicher (1997):

"[T]he text and melodic rhythm (i.e. the rhythm of the melody which, during the performance of a song, is the rhythm of the sung text which is conventionalised in set variations called *sangatis*) provide the structure for improvising variations of pitch. While keeping the rhythm intact, parts of the entire theme are filled in with new melodic material" (Campbell and Teicher 1997:32 my parenthesis).

"The text and the tala ($t\bar{a}|am$) are performed as composed, but with variations created within these limits the meaning of the text can be highlighted by reordering the text and its melody to create *clever word displays* while staying within the structure of the precomposed piece" (Kassebaum 1987:45, my emphasis and parenthesis).

Campbell & Teicher's (1997) description emphasises melodic variation which takes place over a seemingly set textual and rhythmic structure. While it is true that the text and rhythm of the text are much more stable than the melody, they are also subject to variation and are not simply empty, still-standing vessels being "filled" with melodic material. Kassebaum's definition appears to be more accurate, taking into account the "reordering (of) text" even if this is only carried out partially through phrase repetition. Neither of these definitions accounts for the rhythmic variation manifest in small departures from and returns to the rhythm of the sung text (see Section 4.3.1). However, both definitions of niraval include elements of rhythmic, melodic and linguistic creativity, demonstrating how niraval could provide a rich field for the exploration of the interplay of musical and linguistic elements in performance.

Drawing on Bauman's (1975:295) notion of "keying" performance (or in this case, a sequence of heightened performance) through a variety of metacommunicative devices which frame a particular communication as performance, the start of the

niraval was "keyed" following the final sangati by Prema Anandakrishnan singing the first line hari hari hariyani smarana jēsitē and holding the final syllable $t\bar{e}$ and ornamenting it around the major sixth $\{Da\}$. The holding of the final syllable of a line is a common device used for closing the pallavi section to go into either the anu-pallavi or caranam sections, or to finish a song. This closure device is also commonly used to mark a transition into the improvisatory formats of niraval or kalpana swaram, both of which occur while the $t\bar{a}$ lam (beat cycle) of the song is still in progress. Following the closure device, the singer repeats the phrase smarana jēsitē and sings the rest of the line with minimal pitch variation which keys the niraval. This is enhanced by a softening of volume and a slowing down of the tempo of the $t\bar{a}$ lam which add dynamic and temporal intrigue.

The melodic contour must be set to the syllables of the text working within and around the rhythmic parameters of the *tālam* (beat cycle) and based on the conventional rhythm of the sung text in its *sangati* form. The artist may depart from the rhythmic constraints of the conventional text rhythm, however, he/she will need to return to the conventional text rhythm following these excursions. The conclusion of each *niraval* turn is marked (melodically and rhythmically) by a return to the *sangati* version of the chosen lines which acts as a refrain. Usually, only the first few words, in this case *hari hari hariyani*, are sung in the refrain at the end of each *niraval* turn.

The following four subsections now examine the ways in which "clever word displays" (Kassebaum 1987:45) manifest through an art of combination in *niraval*. The first sub-section, Section 4.1, looks at the manipulation of the text through the repetition of phrases (Section 4.1.1) and a single instance of an omission of a word (Section 4.1.2), highlighting the importance of knowledge of the line of text and its composite phrases²⁰ in *niraval*. In Section 4.2, melodic ornamentation of words and syllables is analysed in terms of how much it is used to emphasise particular words and phrases as well as how it compares to my own interpretation of syllable stress if the text was spoken. Section 4.3 examines rhythmic variation and the importance of the rhythm of the sung text for both vocal and instrumental performance.

²⁰ When using the term "phrases" with no adjective I refer to language phrases as opposed to "melodic phrases".

4.1 Manipulation of the text

Niraval performances do not introduce new lyrical content. However, singers are able to manipulate the order of the text to some extent. While this is not identified as a central feature of niraval, it is quite typical of niraval performance. In this section I look at two ways in which the singer plays with the order of the words. The text of the chosen lines for niraval (which was, in fact, the entire pallavi section) is presented in Table 4:

Phr. #	Phrase 1				Phrase 2	
Word	Hari	Hari	Hari	yani	smaraṇa	jēsitē
Part of speech	Prop. N. sing.	Prop. N. sing. (dup)	Prop. N. sing. (trip)	quotative particle	N. sing.	V. + conditional
Transl.	Hari	Hari	Hari		rememb ering	having done
Phr. #	Phrase 3		Phrase 4			
Word	duritamu	mānunē	ō manasā			
Part of speech	N. FP	V. FPS FUT	N. + vocativ	ve		
Transl.	"(my) sins/ misdeeds"	"will be healed"	"Oh mind!"			
Full transl.	Tr. "If (you	~				e) sins/misdeeds

Table 4. Full text of chosen lines for niraval and translation of constituents.

²¹ The vocative phrase \bar{o} manas \bar{a} "oh mind!" in various genres of devotional poetry is often translated with an exclamation mark to capture a kind of exclamatory calling out to the mind.

4.1.1 Repetition of phrases

In the observed *niraval* performance, the singer repeats phrases within the chosen line of the text. There were three instances of phrase repetition, two of which involved one particular phrase within the line. In this section we will analyse the three instances and highlight the ways in which these constituted communicatively competent and artful uses of the lyrical material without altering the meaning of the lines.

The first instance of phrase repetition was in the transition into the *miraval* itself where Prema Anandakrishnan repeated the second phrase of the chosen lines *smaraṇa jēsitē*—"if you remember". It is significant that the singer repeated the whole verb phrase (+ conditional marker) instead of simply the verb *jēsitē*—"do" (+ conditional marker). Hence, the singer treated the verb phrase as a single unit encompassing the act of remembering/reciting and she repeated the whole phrase to give it emphasis.

A.3	hari hari hariyani smaraṇa jēsitē:	"Hari Hari Hari" (+quot) if you remember/recite							
A.4	: smaraṇa jēsitē	if you remember/recite							
A.5	duritamu mānunē ō manasā	sins/misdeeds will disappear, oh mind!							
Transl.	If you remember/recite remember/recite (all your) sins/	•							

Example 1. Repetition of smarana jēsitē.

The other instances of repetition involved the vocative phrase \bar{o} manasā "Oh mind". Once again, the singer treated the two words as one phrasal unit. Two examples of the repetition of each of these phrases (Example 2 and Example 3) are presented below with the repeated phrases in bold. Each line represents one \bar{a} wartanam (beat cycle represented by A.2, A.3 etc.) in order to capture how the text falls within the rhythm of the $t\bar{a}$ lam (beat cycle) at the basic level of each cycle. The translation of the whole sequence is presented in the bottom row.

A.12	((violin)) hari hari hariyani ²²	((violin))	"Hari	Hari	Hari"
	((singer)) ō; manasā:	(+quot)			
A.13		((singer))	Oh mind	!	
A.14	ō manasā:: smara:ṇa jēsitē	Oh	mind!	If	you
		rememb	er/recite		
Transl.	((violin)) "Hari Hari Hari" ((sin	ger)) Oh mir	nd! Oh mi	ind! If y	7OU
	remember/recite				

Example 2. Repetition of ō manasā.

The phrase \bar{o} manas \bar{a} "oh mind" is a common phrase used in many of Thyagaraja's kritis (e.g. Sītammamāyamma, Sādincharē, Nāma Kusumamulacē, Gītārthamu, Bhajana Seyya Rādha to name just a few). The phrase typically accompanies some sort of advice, admonition or a statement of which the "mind" is asked to take heed. This device has the effect of capturing the poet addressing their own mind but in the context of performance where it is uttered (i.e. sung) aloud it can also have the effect of addressing the listener's mind. Addressing the mind appears to be a common element of Hindu devotional poetry going back centuries including Tamil Vaishnavite poetry of the *Ālwārs* (see Devasenapathi; 2003:100). The phrase "oh mind" is used in translations of 18th century devotional poetry from Bengal (McDermott 2001) and Orissa (Routray 2007:336). Addressing oneself in a self deprecatory way is also observed by Saloman (1994) in the devotional poetry of the Baul a path in Bengal which syncretises elements of Hinduism and Islam (Saloman 1994:278). The devotional themes and poetic style of Carnatic songs draw from various genres of Hindu devotional poetry, particularly those from South India. Hence, Carnatic songs are sometimes considered part of a broader tradition of Hindu devotional poetry (see Sadarangini 2004:50).

The word *mānas* is a word of Sanskrit origin referring to the mind or heart as distinct from the soul (Monier-Williams 2005[1899]:783) and is the root word for several related words referring to mind, thought, cognition and human beings defined as being "with thought" (Monier-Williams 2005[1899]:783-4). In Telugu as well as Tamil, the word *manasu* means "mind" (Brown 1903:957; Winslow 2004[1862]:854) and is likely to have come from the Sanskrit *mānas*—"mind" given its extensive use in Hindu devotional language in both Tamil and Telugu.

²² These are the words being suggested by the violinist.

According to Caldwell's (1998[1913]) Comparative Grammar of the Dravidian or South Indian Family of Languages, vocatives in Telugu take the form of changing the ending -u into -a or $-\bar{a}$ as well as the insertion of "various unimportant vocative particles, or particles of exclamation (which) are prefixed to nouns" (1987:306). Vocative markers in Tamil are slightly different, generally without the prefixed particle and a different vowel ending. However, the poetic device of addressing the mind is common enough in Carnatic song compositions to be understood. Hence, Prema Anandakrishnan's repetition of the phrase \bar{o} manas \bar{a} exploited her own awareness of the unity of the vocative phrase structure in Telugu, its meaning, poetic conventionality and affective significance although she is not a fluent Telugu speaker. For her, singing was an act of devotional communication, and an important part of this involved being able to express the devotional sentiments in the sāhityam (lyrics).

A.31	((violin)) hari hari hariyani smarana [jēsitē] ((singer)) [ō man]asā :	((violin)) "Hari Hari Hari" (+quot) if you remember/recite						
A.32	: (.) smaraṇa jēsitē ō:	((singer)) Oh mind! If you remember/recite, oh						
A.33	: manasā (.) duritamu mānunē ō:	mind! All sins/misdeeds will disappear, oh						
A.34	: manasā	mind!						
Transl.	***	e "Hari Hari Hari" ((singer)) Oh h mind! All sins/misdeeds will be						

Example 3. Repetition of ō manasā.

The third instance of phrase repetition involved the phrase \bar{o} manas \bar{a} again (Example 3). The repetition of the vocative phrase thrice in Example 3 conveys the poetic effect of addressing the mind between each phrase. Once again, the verb phrase smarana jēsitē was not split and neither was the verb phrase duritamu mānunē. While this particular niraval performance was characterised by the repetition of phrases, other niraval performances may involve the repetition of single words and some reordering of the words in the line.

4.1.2 Omission of words

In A.34, following Example 3, the singer returned to the beginning of the chosen line, but she omitted one instance of the word *hari*. The '(.)' in Example 4 represents this omission in which the singer paused for the duration of the second *hari*. It is unclear whether or not this omission was intended but the meaning does not change significantly as each *hari* which follows the first one is a multiplication intended to enact the repetition of the name "Hari".

A.34	manasā hari (.)	mind! "Hari (.) Hari" (+quot)
	hari yani smaraṇa jēsitē	if you remember/recite
Transl.	mind! If you rememb	er/recite "Hari Hari"

Example 4. Omission of hari.

Examples 1-4 highlight the way that different shades of meaning and emphases can be expressed through the repetition of words and alteration to the order of the text. They also highlight why singers place an importance on knowing the meaning of the text for effective *niraval* performance. Another Carnatic singer and fellow disciple Krishna Ramarathinam (also a Tamil-English bilingual but brought up in Australia) reflected, "initially when I learn the song I won't know the meaning but then **once you take up** *niraval* and stuff like that it's imperative that you know the meaning" (KR_Interview5/09). The examples in this subsection suggest a familiarity by Prema Anandakrishnan with the meaning of the phrases within the chosen line(s) and demonstrate the use of phrase repetition and, in a single case, the omission of a word, in *niraval* to artfully convey the poetic sentiment in a variety of ways.

4.2 Melodic form

Aside from the repetition of phrases from the song text, the communicative competence of the artist can be displayed through their manipulation of melodic form. The importance of melody in *niraval* is highlighted by Campbell & Teicher's description of *niraval* as consisting of "variations of pitch" and "new melodic material" (1997:32). Viswanathan & Cormack's (1998) work on melodic

improvisation highlights the importance of *rāgam*²³ stating that a "broad system of rules has been absorbed and used like a blueprint for molding the edifice of each improvisatory form" (Viswanathan & Cormack 1998:231), emphasising a balance between melodic creativity and familiarity, as integral to the *rāgam* system (1998:229).

Niraval is recognizable as a distinct structure within the Carnatic concert because of its melodic distinctness from the sangati forms of the same lyric lines with which Carnatic audiences are typically familiar. At the phrase level, emphases in the melodic contour through held notes, gamakas (ornaments) and melodic phrases which bring out the beauty of the rāgam can express the poignancy of particular phrases. At the level of the syllable, these melodic emphases do not align with syllable stress patterns of the words in the chosen lines. In this section, we analyse the relationship of melodic form with the phrases of text which are subject to special melodic treatment and with the syllable stress patterns of the text.

4.2.1 Melodic form and salient phrases in the sung text

In Section 4.1.1, we saw that \bar{o} manas \bar{a} "oh mind!" was the phrase which was most often repeated. These repetitions were also characterised by special melodic treatment through long held notes, gamakas (ornaments) and special melodic phrasing. In A.12-A.13 where the singer repeats \bar{o} manas \bar{a} , the long syllables \bar{o} and $s\bar{a}$ were held, the latter being held for a markedly long duration such that the phrase goes over almost two \bar{a} vartanams. The vowel of the final syllable is held over one full \bar{a} vartanam from A.12.8.3 to A.13.8.3, bringing the flow of the text to a standstill (while the mridangam continues to play out the beat cycle)²⁴ and enabling the singer to melodically embellish it with gamakas. Gamakas take place throughout the niraval, but only in a few instances is a vowel lengthened to such

²³ As with "tāļam", "swaram" and the English word "language", the term "rāgam" is used to refer to both the concept or system of rāgam and the individual rāgams within the system.

²⁴ One of the characteristics of Carnatic songs is that there is typically no cessation of or changes in the $t\bar{a}|am$ (beat cycle) from the start of a song to its finish. Freetime formats of $\bar{a}l\bar{a}pana$ and viruttam are always a prelude to songs and never interspersed. There may be sections with a change in speed over the continuing beat cycle. Outside the Carnatic music repertoire, rhythmic discontinuity is more common including the genre of $samprad\bar{a}ya$ bhajan and Bharata $N\bar{a}tyam$ and other Indian classical dance forms where there are changes of $t\bar{a}lam$ and nadai without pause within a particular song or dance item.

an extent to allow extended melodic embellishment. In the final vowel $-\bar{a}$ of the first \bar{o} manas \bar{a} , the singer heavily ornaments the vowel after holding it on a major sixth $\{Da\}$ for three and a half beats. In this particular instance, the $r\bar{a}ga$ $bh\bar{a}vam$ or "affect of the $r\bar{a}gam$ " takes precedence and the singer displays her melodic virtuosity. It is also possible to interpret the recurrence of melodic ornamentation on one particular phrase as a further emphasis on the vocative phrase \bar{o} manas \bar{a} . Hence, the melody, literally "ornaments" the vocative phrase.

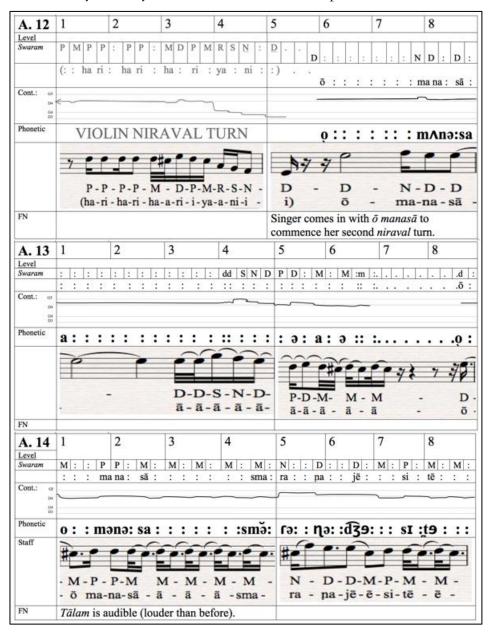


Figure 4. Held notes and melodic ornamentation at the start of the second niraval turn (A.12 to A.14).

There are melodic contrasts between the two repetitions of \bar{o} manasā in A.12-A.13. First, the treatment of the vocative particle \bar{o} is different. In the first \bar{o} manasā the \bar{o} is sung on a major sixth $\{Da\}$ while the second slides down from a major sixth $\{Da\}$ to a raised fourth $\{Ma\}$. This slide adds melodic emphasis to the second \bar{o} and could be interpreted as mimicking the prosody of sighing. At the end of the phrase, the long final vowel $-\bar{a}$ is held for a longer duration and ornamented heavily in the first \bar{o} manasā and more subtly while the same vowel in the second \bar{o} manasā rests on an oscillating raised fourth $\{Ma\}$. The high pitched \bar{o} and heavy ornamentation for $-\bar{a}$ in the first \bar{o} manasā contrast with the down-sliding, shorter \bar{o} resting on a lower pitch, and more subtly ornamented $-\bar{a}$ in the second \bar{o} manasā. These contrasts are foregrounded by the parallelism of the phrase repetition and the rhythm (see Section 4.3). The communicative act of addressing the mind is given fuller poetic and affective scope through such original melodic treatment.

Other than the phrase \bar{o} manas \bar{a} "oh mind" the phrase smaraṇa jēsitē "if you remember/recite" was also subject to held notes and ornamentation. In contrast, hari hari hariyani "Hari Hari (+quot)" and finally the phrase duritamu mānunē "(your) sins/misdeeds will be healed" were not melodically emphasised.

4.2.2 Melodic and syllabic stress

While the melody can be used to emphasise particular phrases within the chosen line of the song text, it is also interesting to see how melody interplays with syllable stress including cases of alignment and misalignment.²⁵ Melodic stresses can be brought about by ornamentation or the use of notes or melodic phrases which stand out For example, in each repetition of \bar{o} manas \bar{a} in A.12-A.13 (see Figure 4), the singer raises her pitch on the syllable ma-maintaining its emphasis.

At times, the primacy of melodic form creates misalignments in the stresses of the syllables as they would be if the line was spoken or recited. For example, in A.6, the vocalist's rise in pitch at the -ri in hariyani is melodically different from the contour of the sangati (set variation) form in which the pitch rises during ha-. The higher note on -ri has the effect of putting a melodic stress on it which is at odds

²⁵ Alignment and misalignment of melodic, rhythmic and spoken syllable stress is common in both composition and improvisation. In this paper, I focus only on the relationship between the three in *niraval* itself.

with the stress patterns of spoken language in which the first syllable of a word is emphasised.

Figure 5 compares the standard *sangati* version and a melodic *variation* early on in the *niraval* in which the singer rises up in pitch at the syllable -*ri*. By going up on the syllable -*ri*, the singer also renders the melodic pitch at odds with the syllable stress if the words were spoken. This is one example of the misalignment of spoken syllable stress with salient parts of the melody. In such parts, the sung text becomes more of a vehicle for music rather than linguistic meaning.

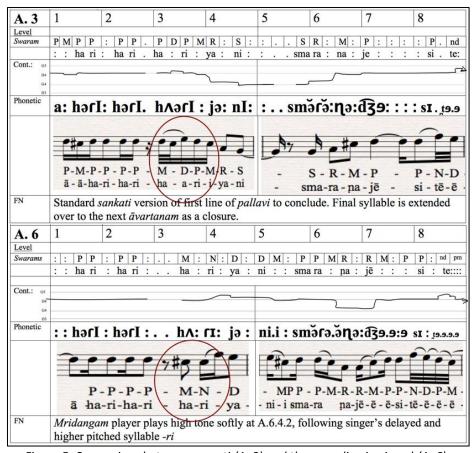


Figure 5. Comparison between sangati (A. 3) and the same line in niraval (A. 6).

Another example of misalignment between melodic and syllabic stress takes place in A.14 in the word *smaraṇa* where the unstressed syllable *-ra-* slides from the oscillating raised fourth $\{Ma\}$ up to a non-oscillating minor seventh $\{Ni\}$ (see Figure 6).

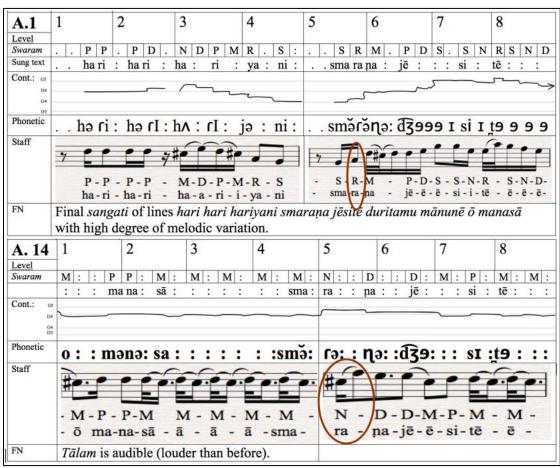


Figure 6. Comparison between sangati (A.1) and niraval (A.14) versions of the first line of the pallavi (chosen lines).

While misalignment between melodic stress and syllabic stress is normal even within a set composition, the degree of plasticity in *niraval* is much greater to the point that the syllable stress becomes almost irrelevant during the latter stages when the line is sung in *dhurita kālam* and the text becomes merely a vehicle for melody and rhythm.

4.2.3 Melodic development through focal notes

The melodic development of *niraval* typically revolves around focal notes, in other words, pitches which are used as the basis for melodic development. Each turn typically starts at (or leads up to) the focal note and the melodic variation takes place around it and may also depart from it. In each turn, the singer develops the *niraval* by moving to a different focal note. Henry (2002) describes the development over various pitches as leading to a climax (2002:47). In general, the increases in pitch ascend from around the fifth {Pa} towards the upper tonic {*mēl*

Sa} and sometimes beyond in the same manner as other forms of melodic improvisation. For example, the singer commences this particular *niraval* performance using a narrow range of notes focusing around the major sixth $\{Da\}$. As the *niraval* unfolds, there is increased melodic variation with each turn but this always begins from focal notes. The shift in the focal notes throughout the *niraval* is one aspect of its melodic variety and structure.

In her second *niraval* turn, the singer focuses again around the major sixth $\{Da\}$ but with a deviation in rhythm and lyrical emphasis. Only in her third *niraval* turn does she make the upper tonic $\{m\bar{e}l\ Sa\}$ her focal note. She does this for two *āvartanams* before going up further to the second above that $\{m\bar{e}l\ Ri\}$ and beyond to an oscillating upper raised fourth $\{m\bar{e}l\ Ma\}$ which is the highest note reached. On her fourth turn, the singer returns to re-explore the major sixth $\{Da\}$ and goes back up to the upper tonic $\{m\bar{e}l\ Sa\}$. The fifth and final *niraval* begins again around the major sixth $\{Da\}$ but then covers a broad range of *swarams*. The different focal notes throughout the *niraval* mean that melodic variety is more easily produced.

Figure 7 captures the singer's use of the upper tonic $\{m\bar{e}l\ Sa\}$ as the focal note in the third *niraval* turn. In A.22 and A.23, the focus on the upper tonic $\{m\bar{e}l\ Sa\}$ is maintained. Then in A.24, the singer goes beyond to the upper second $\{m\bar{e}l\ Ri\}$ and the melody peaks with an oscillating upper raised fourth $\{m\bar{e}l\ Ma\}$ on the final syllable -na of *smarana* before descending again. Hence, the singer uses the focal note of the upper tonic as an anchor, making the rise to the oscillating upper raised fourth $\{m\bar{e}l\ Ma\}$ particularly noticeable. The large interval between the upper major second $\{m\bar{e}l\ Ri\}$ and the oscillating raised fourth $\{m\bar{e}l\ Ma\}$ adds a further sense of leaping to the climax. The use of focal notes enables the singer to build the *niraval* and establish a sense of melodic tension and release as the melody moves beyond each focal note. The point at which the upper tonic $\{m\bar{e}l\ Sa\}$ is reached and when the highest note—in this case the upper oscillating raised fourth $\{m\bar{e}l\ Ma\}$ —is reached are both moments of climax during the *niraval*.

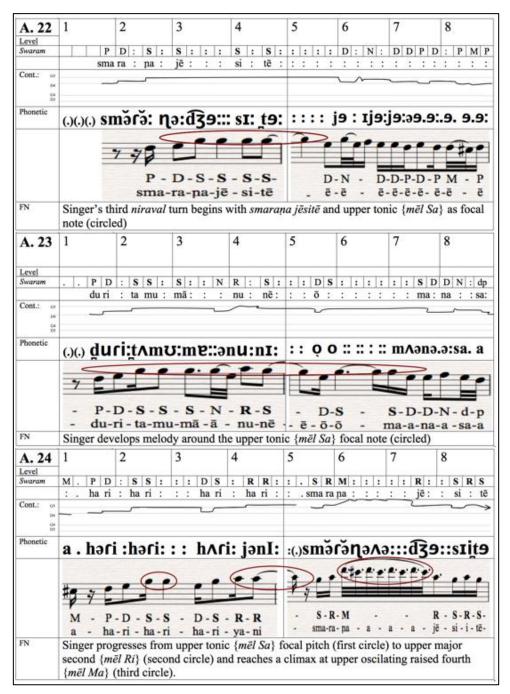


Figure 7. First three avartanams (beat cycles) of the singer's third niraval turn highlighting upper tonic {mēl Sa} as focal note.

4.2.4 Melody and rhythm

While this paper treats rhythm separately in Section 4.3, it is important to look at cases where melody and rhythm work together in *niraval*. In some cases, melodic parallelism and rhythmic parallelism go hand in hand along with parallelism in the text. Returning to the repetition of the vocative phrase \bar{o} manas \bar{a} from A.12-14 (see

Figure 4 earlier), the parallel melodic structure realised by the long held notes on \bar{o} and the final syllable - $s\bar{a}$ and the ornamentation of that final syllable in both repetitions are matched by the same rhythm of the syllables *mana*- of one *naḍai* and two *naḍais* (i.e. one semiquaver and two quavers) for the first and second syllables, respectively, in the two repetitions. While the syllables on either side, \bar{o} and \bar{a} , are not identical in their durations they are sung for longer than the syllables *mana*- providing a further sense of rhythmic parallelism.

Rhythm is also subject to stress through the presence of strong and weak beats and pulses in the tālam which add to the relationships of alignment or misalignment between melodic stress and syllable stress. Hence, syllable stresses of the repetitions of the phrase \bar{o} manas \bar{a} in A.12-14 which are misaligned by melodic "stress" are also misaligned by the rhythmic stress which places the syllable -na on the stressed beat where it would usually be the first syllable mawhich is stressed. Likewise, the rise in pitch which places melodic stress on the normally unstressed syllable -ri- in the word hariyani in A.6 (see Figure 5 earlier) is further emphasised by similar misalignment of rhythmic stress with syllable stress. In particular, the pause before the word *hariyani* places the stressed syllable *ha*- on an unstressed pulse halfway through the third beat while the unstressed syllable *ri*- is on the fourth beat which is stronger. In contrast, the *sangati* version (also illustrated in Figure 5) has both melodic and rhythmic stress aligned with syllable stress. Another example of this connection between melodic, rhythmic and syllabic stress is in the example of the word *smarana* in A.14 (see Figure 6 earlier) which, in spoken form, would normally have a stress on the first syllable sma-. An upward slide on the unstressed syllable -ra- is matched by the lengthening of the same syllable to three nadais creating melodic and rhythmic stress. This lengthening and sliding is a significant contrast to the rhythm and melody used for that syllable in the *sangati* version of the chosen line, where the syllable -ra- is only one nadai long and does not slide. While this could be considered as a misalignment from the perspective of spoken word stress, some sangatis also place a rhythmic stress on -ra- while others stress the other unstressed syllable -na. Hence, the patterns of alignment between melodic, syllabic and rhythmic stress are already fluid in the *sangati* versions of the phrase *smaraṇa jēsitē*.

Another important rhythmic aspect which affects melody is the shift from *madhyama kālam* "medium pace" to *dhurita kālam* "faster pace". This will be discussed further in Section 4.3 but this change is melodically relevant because it involves fitting in more notes into each beat (see, for example, Figure 11). These fast passages of melodic ornamentation, referred to by the term *bhṛṣga* ²⁶ (glossed as "turn" in the sense of melodic ornamentation), characterise the latter *niraval* turns. A detailed discussion of Carnatic ornamentation is beyond the scope of this paper but it is an important aspect of *niraval* which warrants closer attention.²⁷ Rhythm will be discussed in more detail in Section 4.3.

4.3 Rhythm

4.3.1 Rhythmic departures and returns

Except in cases of phrase repetition or long held notes which bring the flow of the sung text to a standstill, the variation in *niraval* is mostly melodic with the text rhythm, i.e. the rhythm of the sung text or "textual rhythm" (Campbell & Teicher 1997), remaining relatively stable. The stability text rhythm is highlighted in a 1955 lecture demonstration of *niraval* at the Madras Music Academy Conference where the presenter, Sangīta Kalānidhi Mudikondan Venkatarama Aiyar stated that the "eduppu" (the point at which the sung text line starts in the tālam) should always be maintained" (J.M.A.M., 1956:23). The *niraval* performance by Prema Anandakrishnan is characterised by relative stability in the eduppu with departures and returns within the sung text line and occasional long held notes.

As mentioned, the *sangati* (or *sankati*) form of the first few words of the *niraval*, the words *hari hari hariyani*, are used as a return point- which I call the *sangati* refrainfollowing each *niraval* turn. The two chosen lines usually take up two *āvartanams* in *niraval* as in the *sangati* version.

Figure 8 depicts, using staff notation, the text rhythms of the first three *niraval* turns, showing how they adhere to the text rhythm of the *sangati*. The first line

²⁶ Bhṛga (also spelt brika, briga or brigha) is defined as a kind of gamaka "ornament" (Swift 1990: 76; Ayyangar 1981: 343). A possible origin of the term is the Sanskrit word bhṛg, an onomatopoeic word evocative of the crackling of fire.

²⁷ For example, one of my reviewers has suggested the importance of final syllables (e.g. $-s\bar{a}$) and open syllables (e.g. \bar{o}) as ripe for ornamentation. See Swift 1990 and Ayyangar 1981 for discussions of Carnatic music ornamentation.

depicts the *sangati* version of the lines prior to the closure which transitions into the start of the *niraval*. A.3, A.8, A.18 and A.26 are presented on their own as single *āvartanam*-s, because A.3 represents a transition into the *niraval*, and the other three are *sangati* refrains where only the first few words of the chosen lines are sung before the violinist commences his *niraval* turn. The rest of the *āvartanams* can be organized in pairs, which are presented in individual rows to compare the text rhythm between them:



Figure 8. Text rhythm over first three vocal niraval turns including sangati refrains.

As the staff notation of the rhythm demonstrates, the text rhythm of the chosen lines is similar for many of the lines with the exception of A.12-13 and in A.22 where the rhythm of the sung text is brought to a standstill by long held notes and/or repetition. In the remaining lines, there are some minor departures, as in A.16 when the word *hari* starts three *naḍais* into the line, as opposed to two. In A.16, the phrase *hari hari hariyani* follows a different beat pattern, starting slightly later, making the final syllable *-ni* start on the fifth beat. This rhythmic departure is

brief as the usual three-*naḍai* pause before the next phrase *smaraṇa jēsitē* (see A.3, A.4 and A.18) is simply eliminated, bringing the line back into the conventional text rhythm. Then, in A.17, the line departs from the text rhythm again when the singer sings the word *duritamu* one *naḍai* later than usual. However, the line returns immediately to the rhythm when the second syllable -*ri*- is shorted to one *naḍai*.

The pause in A.6 is another example of rhythmic departure (see Figure 9). In that case, the return takes place in the following word, *smaraṇa*. The *mridangam* player responds to this delay by playing a higher tone in the following *naḍai*, a percussion response to the change in rhythm and melody:

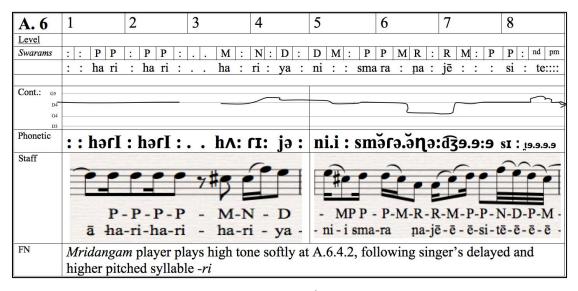


Figure 9. Departure and return in A.6.

As Figure 8 and Figure 9 show, the rhythm of the sung text in *niraval* is characterised by departures and returns from the conventional text rhythm of the *sangati* form creating rhythmic tension and resolution. Repeated phrases and held notes constitute significant departures which are sometimes only resolved by continuing the line in the following *āvartanam* (beat cycle). The other departures tend to be much smaller even during the melodically and rhythmically eventful *dhurita kālam* sections.

4.3.2 The importance of melodic rhythm to instrumental accompaniment 28

Even when the accompanist plays *niraval*, it is possible, especially in the early stages, to distinguish the text rhythm through the rhythm of their melody which I refer to as the melodic rhythm. In songs (i.e. the non-improvisatory sections), the instrumentalist's melody is typically in unison with the singer. In other words, instrumentalists play the tune of the song along with the singer. In niraval, when the instrumentalist takes their niraval turn, they use the rhythm of their melody to suggest the syllables of the words in the sung text with similar departures and returns to a stable text rhythm. A comparison of the singer's text rhythm and violinist's melodic rhythm at the start of every even-numbered avartanam (see Figure 10) shows a correspondence, with the first two *nadais* typically outlining the final $-\bar{a}$ of the word manasā from the previous line, and the notes from the third nadai suggesting the text rhythm of the sangati version of the words hari hari hariyani. The violin niraval turns are within the rounded box in Figure 10. There is a small deviation by the singer in A.6, with the pause following the second hari. Likewise, in A.16, the ā from the previous manasā takes three naḍais rather than two causing a lag. In this particular instance, the text rhythm is more markedly different. In both A.6 and A.16, the syllable -ni spills over onto the fifth beat, in other words, into the second half of the avartanam. The melodic rhythms in A.10 and A.12 played by the violinist very clearly conform to the text rhythm of the sangati versions (A.3, A.8 and A.18) of the lyrical phrase. While A.10 appears to conform more to the syllabic rhythm, A.12, in fact, mirrors the sangati version more accurately because the similarity is also melodic. These are just two examples of how the text rhythm is captured by the violin's melodic rhythm.

²⁸ A further aspect of rhythmicity which adds interest to the *niraval* is in the ways the *mridangam* accompaniment engages with and responds to the text rhythm in performance by the singer and/or the violinist. An analysis of the interplay of *mridangam* and vocal rhythm would require a more detailed and complex analysis.

A.3 closure ā -ha ri - ha-ri-ha - ri - ya - ni A.6 niraval ā ha-ri - ha-riha - ri - ya A.8 sankati as refrain ā ha-ri - ha ri-ha - ri - ya - ni A.10 violin niraval āāha-ri - hari- ha - ri - ya - ni A.12 violin niraval ā ā ha-ri - ha ri-ha-a-ri-i ya-a ni A.16 niraval 2 ha-ri - ha-ri - ha-ri - ya ā ni -A.18 sankati refrain ā ha-ri - ha-ri-ha - ri - ya - ni

Figure 10: Text rhythm of vocal and melodic rhythm of violin niraval (in box) in the first two turns of niraval.

One regular accompanist at the concerts discussed the role that the text plays for accompanists, acknowledging the importance of knowing the words to *niraval* performance for accompanying instrumentalists. For accompanists, knowledge of the phrase boundaries and the number of syllables in each word assists in giving the audience a sense of the rhythmic shape of the lyric text (cf. Krishna 2010:17), as demonstrated by the reflection in Example 5 by a regular Carnatic melodic instrumental accompanist:

In an ideal situation, the accompanist can do complete justice to the niraval only if he knows the lyrics making up the niraval line or phrase. This enables him to mentally vocalise the variation with a greater degree of precision as he progressively elaborates the niraval. However, for obvious reasons, it is not possible for an accompanist to have an intimate knowledge of all the lyrics that every vocalist chooses for the niraval on the concert platform. The accompanist can, however, make up for this by cultivating an awareness of the points in the $t\bar{a}lam$ cycle where he should "break", or where he should "pause", and the length of time-interval each of these requires. This will have substantially (but not exactly) the same effect as if the words are being articulated on his instrument, and will also synchronise to a large degree with the percussionist's beats.

Example 5. A Sydney-based accompanist on knowledge of lyrics for effective accompaniment to niraval (Accomp._Interview 2/07/11).

Example 5 highlights the importance of knowing how the text is realised within the rhythmic flow. This text rhythm awareness includes knowing at what point word and syllable boundaries occur in order to give the impression of playing lyrics of the song during *niraval*, i.e. "the same effect as if the words are being articulated on his instrument". Without outlining the phrase or syllable boundaries, the instrumentalists' *niraval* playing will sound more or less identical to *kalpana swaram* (a form of improvisation featuring sung *swarams*), especially in the latter stages of the *niraval* where the *dhurita kālam* "faster pace" melodic phrases fill out the whole *āvartanam* (beat cycle) with little pause, much like the *dhurita kālam* playing of the latter stages of *kalpana swaram* improvisation.

4.3.3 Rhythm during the **dhurita kālam** section

In the *dhurita kālam* section, rhythmic patterns are emphasized in a melismatic style which accentuates each *naḍai*. This is achieved melodically by regular pitch movement at the *naḍai*- (semiquaver-) level and a *bḥṛṣa* style which involves vocal attacks on almost every *naḍai* regardless of whether there is pitch movement or not. There are very few held notes as with the earlier *niraval* turns. This accentuation makes it possible to discern rhythmic patterns made by the syllables and through melodic and rhythmic accents. In the *dhurita kālam* section, there are also fewer pauses for breath and little or no spaces between words resulting in the words seeming to "fill up" each *āvartanam*, recalling that the word *niraval* itself means filling up.

The singer's fifth and final *niraval* turn is characterized by a *bhṛga* style and is wholly in *dhurita kālam*. Rhythmic patterns are discernible from the outset in A.43. The singer distributes each of the first two syllables in the word *jēsitē* over two *naḍai*s (two semiquavers) each and produces an intervocalic /j/ on the third *naḍai* of the syllable (A.43.8.4), creating a new rhythmic accent within the syllable and giving the effect of continuing the two-*naḍai* pattern of the first two syllables:

Further rhythmic patterning takes place in A.44. Within the phrase duritamu mānunē, the syllables -mu and -nu- go over two nadais and the long vowels mā- and - $n\bar{e}$ go over four. This rhythmic pattern of 2, 4, 2, 4 is actually the normal text rhythm of the sangati version, however, the pattern is accentuated by the melodic and vocal treatment in *dhurita kālam* (faster pace) in a *bḥṛga* style. The phrase \bar{o} manasā in A.44 also has a rhythmic pattern with the syllable \bar{o} broken up into two three-note phrases each going over four *nadai*s, then the word *manasā* is sung with the first two syllables taking two nadais each and the final syllable -sā going over four nadais. In that final syllable, the four nadais are further broken up by the beginning of the new avartanam, A.45, which suggests a continuation of the twonadai pattern in A.45 of the first two syllables. Following this pattern, the normally syncopated text rhythm of the phrase hari hari hariyani is replaced by a continuation of the two-nadai pattern for all eight syllables, i.e. 2, 2, 2, 2, 2, 2, 2 (see Table 3). Following this, the phrase *smaraṇa jēsitē* in A.45 has a pattern of 2, 2, 4, 2, 2, 4. A.46 is rhythmically very similar to A.44. There is a slight difference in the rhythm of the word duritamu which forms a pattern of 1, 2, 1, 2 in A.46, and the word manasā, although the same length, is also rhythmically different with a 2, 3, 3 pattern, as opposed to the 2, 2, 4 pattern at the end of A.44. In A.47, the singer returns to the sangati refrain which cues the violin to take their fifth turn.

Α.	Syll.	-	sma	ra	ņа	jē	si	tē-								
43	No. of	19	1	2	3	2	2	3								
	nadais															
Α.	Syll.	<u>-</u> е	du	ri	ta	mu	mā	пи	nē	ō	та	na	sā			
44	No. of	2	1.5	1.5	1.5	1.5	4	2	4	8	2	2	2			
	na _i dais															
A.	Syll.	<u>-</u> ā	ha	ri	ha	ri	ha	ri	ya	ni	sma	ra	ņа	jē	si	tē
45	No. of	2	2	2	2	2	2	2	2	2	2	2	4	2	2	2
	nadais															
Α.	Syll.	- -ē	du	ri	ta	ти	mā	nu	nē	ō	та	na	sā			
46	No. of	2	1	2	1	2	4	2	4	8	2	3	1			
	naḍais															
Α.	Syll.	-ā	ha	ri	ha	ri	ha	ri	ya	ni	-					
47	No. of	2	1	2	1	2	2	2	2	2	16					
	nadais															

Table 5. Number of nadais in each syllable demonstrating rhythmic parallelism, especially A.44, A.45.

Rhythmic combination is, therefore, an important part of setting the text29 to build the *niraval*. The artist may depart from the text rhythm slightly in order to develop these rhythmic patterns, especially in the latter stages of *niraval*. In these stages the clear word boundaries and enunciation of the words in the text yield to the display of rhythmic and melodic patterns. In the latter *niraval* turns, phrase order is usually maintained and the nuances of meaning created by melodic emphasis and repetition are no longer used by the artist. The heightened meaning of the whole line is what remains and is emphasized purely by the excitement of rhythmic flurry as the text spreads out across the whole beat cycle in bursts of

²⁹ Turpin (2007) uses the term "text setting" to refer to the process of "aligning rhythmic and text groups" in Central Australian song (2007:101). In a sense, rhythm, text and tune of *niraval* are all independent of one another, however, the way that the set *sangatis* of the chosen two lines are patterned over the set of two 8-beat $\bar{a}vartanams$ provide a model for the extempore rhythmic patterning of *niraval*.

bḥṛga, with almost one note to every *naḍai*, ranging up and down the *rāgam* (see the melodic contours in A.44-A.46) in Figure 11.

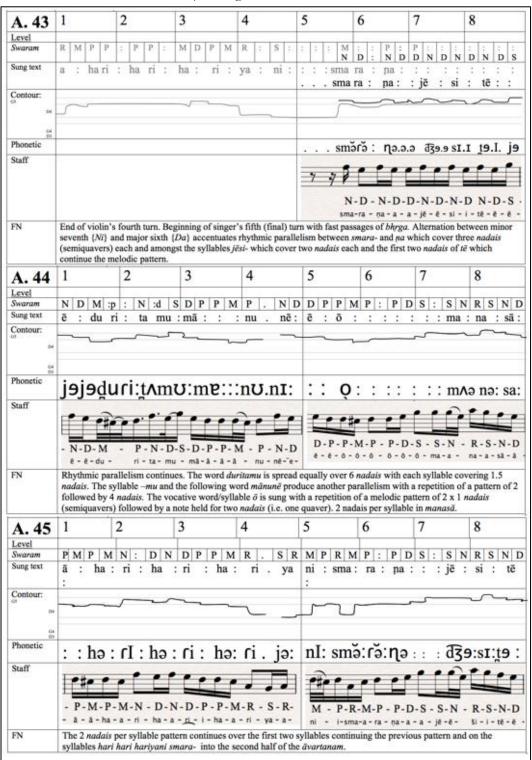


Figure 11. Musicolinguistic graph of A.43-A.45. Corresponds to first three rows of Table 5.

5. Conclusion

While *niraval* performances involve a small portion of text, the analysis of a single performance shows how melody, rhythm and text combine to create a heightened aesthetic musicolinguistic experience. *Niraval* performances are special moments during the Carnatic concert where the artist's creative abilities are on display. The performance frame moves from the rendering of set musical and textual structures to an improvisatory frame where the artist can use those canonical elements as material for improvisation. The *niraval* frame is made all the more special by the fact that the material for improvisation includes a portion of the song text itself. Hence, the artist is given the opportunity to render the lyrical line within the beat cycle in various combinations of melody, rhythm as well as text. The performance of *niraval* thus demonstrates how advanced Carnatic singers fit Barwick, Birch *et al.*'s (2007) definition of great singers, who are "at once musicians and wordsmiths, who toss rhythm, melody and word against one another in complex cross-play" (2007:6).

Skill in performing *niraval* requires not only the verbal, rhythmic and melodic mastery discussed here but also attention to where it is appropriate to do *niraval*, ways in which it should be appropriately "keyed", the ability to build the niraval melodically and rhythmically in stages and, where it is done with an accompanying or co-artist, awareness of musical turn-taking conventions and the interplay with percussion instruments. Like good conversationalists, Carnatic singers work with their co-performers to co-create a verbally artful musical experience and niraval is an appropriate example of this. These additional performance skills are beyond the scope of this discussion but would better inform an understanding of the creative processes at play during niraval and other Carnatic singing performance practices. Another weakness in my analysis is that I have focused on one particular niraval performance which raises questions regarding the extent to which this performance is typical. I have demonstrated this to some extent by drawing on definitions of and participant reflections about niraval. Comparative musicolinguistic analyses of several niraval performances including performances by different singers would be a worthwhile follow-up.

References

- Alves W & C Baxter 2006 Music of the Peoples of the World Thomson Schirmer.
- Ayyangar RV 1980 Gamaka and vadanabheda: a study of Somanatha's Ragavibodha in historical and practical context Unpublished PhD Thesis, University of Pennsylvania.
- Barwick L 2011 'Including music and temporal arts in language documentation' *Linguistic Fieldwork* N Thieberger (ed) Oxford: Oxford University Press. Pp. 166-179.
- Barwick L, B Birch, et al. 2007 'Iwaidja Jurtbirrk songs: Bringing language and music together' Australian Aboriginal Studies 2007(2):6-34.
- Bauman R 1975 'Verbal Art as Performance' American Anthropologist 77(2):290-311.
- Brown CP 1903 A Telugu-English Dictionary. New ed., thoroughly revised and brought up to date. 2nd ed. Madras: Promoting Christian Knowledge. Available via Digital Dictionaries of South Asia University of Chicago, Accessed June 2012. http://dsal.uchicago.edu/dictionaries/brown/ Accessed 28 July 2012.
- Caldwell R 1998 [1913] A comparative grammar of the Dravidian or South-Indian family of languages Asian Educational Services.
- Campbell PS & J Teicher 1997 'Themes and variations on the creative process: tales of three cultures' Research Studies in Music Education 8(1):29.
- Clayton M;R Sager & W Udo 2005 'In Time with the Music: The Concept of Entrainment and its Significance for Ethnomusicology' *European Meetings in Ethnomusicology* 11:3-142.
- Clayton MRL 2009 'Free rhythm: ethnomusicology and the study of music without metre' Bulletin of the School of Oriental and African Studies 59(2):323-332.
- Devasenapathi V 2003 [1997] 'Exemplars in the Life of Grace: Māṇikkavācakar and Nammālvār' Hindu Spirituality: Postclassical and Modern R Sundararajan & B Mukerji (eds) Delhi: Crossroad Publishing Co. 2:83-111.
- Feld S, AA Fox et al. 2004 'Vocal anthropology: From the music of language to the language of song' in A Duranti (ed) A Companion to Linguistic Anthropology Malden, Massachusets: Blackwell. Pp. 321-346.
- Foley W 1997 Anthropological linguistics Sydney: Blackwell.
- Goodwin C & J Heritage 1990 'Conversation analysis' Annual Review of Anthropology 19:283-307.
- Groesbeck R 1999 'Classical Music, Folk Music, and the Brahmanical Temple in Kerala, India' *Asian music* 30(2):87-112.
- Henry EO 2002 'The rationalization of intensity in Indian music' Ethnomusicology 46(1):33-55.
- ijunoon 2009 'Urdu Dictionary'. http://www.ijunoon.net Accessed June 2012.
- Jackson W 1992 'Features of the Kriti: A Song Form Developed by Tyagaraja' Asian Music 24(1):19-66.
- Jairazbhoy NA 1995 [1971] The rāgs of North Indian music: their structure and evolution. Bombay: South Asia Books.
- J.M.A.M. 1956 'The 29th Madras Music Conference 1955- Official Report' *Journal of the Music Academy Madras*.
- J.M.A.M. 1984 'The Madras Music Conference 1983- Official Report' Journal of the Music Academy Madras.
- Kassebaum GR 1987 'Improvisation in Alapana Performance: A Comparative View of Raga Shankarabharana' Yearbook for Traditional Music 19:45-64.

- Marett A & L Barwick 2007 'Musical and linguistic perspectives on Aboriginal song' *Australian Aboriginal Studies* 2007(2):1-5.
- McDermott RF 2001 'Raising Snakes in Bengal: The Use of Tantric Imagery in Sakta Poetry Contests' in DG White (ed) *Tantra in Practice* Princeton: Princeton University Press. Pp. 167-183.
- Monier-Williams SM 2005 [1899] A Sanskrit-English dictionary: etymologically and philologically arranged with special reference to cognate Indo-European languages New Delhi, Chennai: Asian Educational Services.
- Morris R 2001 'Variation and Process in South Indian Music: Some "Kritis" and Their "Sangatis" Music Theory Spectrum 23(1):74-89.
- 2006 'Architectonic composition in South Indian classical music'. M Tenzer (ed) Analytical studies in world music. Oxford, New York: Oxford UP.
- Nettl B 1983 'Ethnomusicology: definitions, directions, and problems' *Musics of many cultures: an introduction*. Pp. 1-9.
- Ram K 2011 'Being 'rasikas'': the affective pleasures of music and dance spectatorship and nationhood in Indian middle class modernity' *Journal of the Royal Anthropological Institute* 17:S159-S175.
- Routray S 2007 'The Mahimandala Gita, Chapter 66, by Arakkhita Das: Notes towards a translation' *Sarai Reader 2007: Frontiers.* New Delhi: Impress. Pp. 332-338.
- Salomon C 1994 'The Cosmogonic Riddles of Lalan Fakir'. A Appadurai, FJ Korom, MA Mills (eds) *Gender, genre, and power in South Asian expressive traditions* Pennsylvania: University of Pennsylvania Press. Pp. 267-304.
- Sanyal R & R Widdess 2004 Dhrupad: tradition and performance in Indian music. Aldershot: Ashgate Pub Ltd.
- Schegloff EA 2000 'Overlapping talk and the organization of turn-taking for conversation' Language in society 29(1):1-63.
- Subramanian L 2000 'The master, muse and the nation: The new cultural project and the reification of colonial modernity in India' South Asia: Journal of South Asian Studies 23(2):1-32.
- Subramanian V n.d. *The Kutcheri Paddhati (or Concert Format Sequence)*. http://members.tripod.com/~Vijay_Arun/concert.htm Accessed 15 June 2012.
- Sundar MR 2010 *The Art of Niraval singing.* www.maduraisundar.com/docs/niraval_singing.pdf Accessed 24 January 2012
- Swift GN 1990 'South Indian "Gamaka" and the Violin' Asian music 21(2):71-89
- Turpin M 2005 Form and meaning of Akwelye: a Kaytetye women's song series from Central Australia Unpublished PhD thesis, University of Sydney.
- Turpin M & T Stebbins 2010 'The language of song: Some recent approaches in description and analysis' *Australian Journal of Linguistics* 30(1):1-17.
- Vijayakrishnan KG 2007 The grammar of Carnatic music Berlin: Walter de Gruyter.

Viswanathan T & J Cormack 1998 'Melodic Improvisation in Karnatak Music: The Manifestations of Raga' B Nettl & M Russell (eds) *In the Course of Performance: Studies in the world of musical improvisation.* Chicago, London: University of Chicago press. Pp. 219-236. Winslow M 2004 [1862] *Winslow's a comprehensive Tamil and English dictionary* Laurier Books Ltd.