Chapter 1: Introduction

This thesis is a description of Enindhilyakwa, a non-Pama-Nyungan language spoken on the Groote Eylandt archipelago in the Gulf of Carpentaria, Northern Territory, Australia (Map 1.1 on p.2). Enindhilyakwa is spoken as a first language by over 1200 people living on Groote Eylandt and neighbouring Bickerton Island (Map 1.2 on p.5). It is fully acquired by children. Enindhilyakwa is classified as a language isolate by O'Grady, Voegelin & Voegelin (1966), O'Grady, Wurm & Hale (1966) and Evans (2005: 250).

Enindhilyakwa is richly polysynthetic, with extensive cross-referencing of subject and object arguments on the verb, noun incorporation, and a variety of argument-changing affixes. Every part of speech (except adverbs and particles) is obligatorily inflected for person, number and gender for humans, or noun class for non-humans. Consistent with its head-marking nature (Nichols 1986), case-marking is primarily exploited as a strategy for the more semantic grammatical roles such as locative, ablative, allative, instrumental, and to indicate relations between nominals. There is no case-marking on subjects or transitive objects, apart from some well-defined instances of differential object marking.

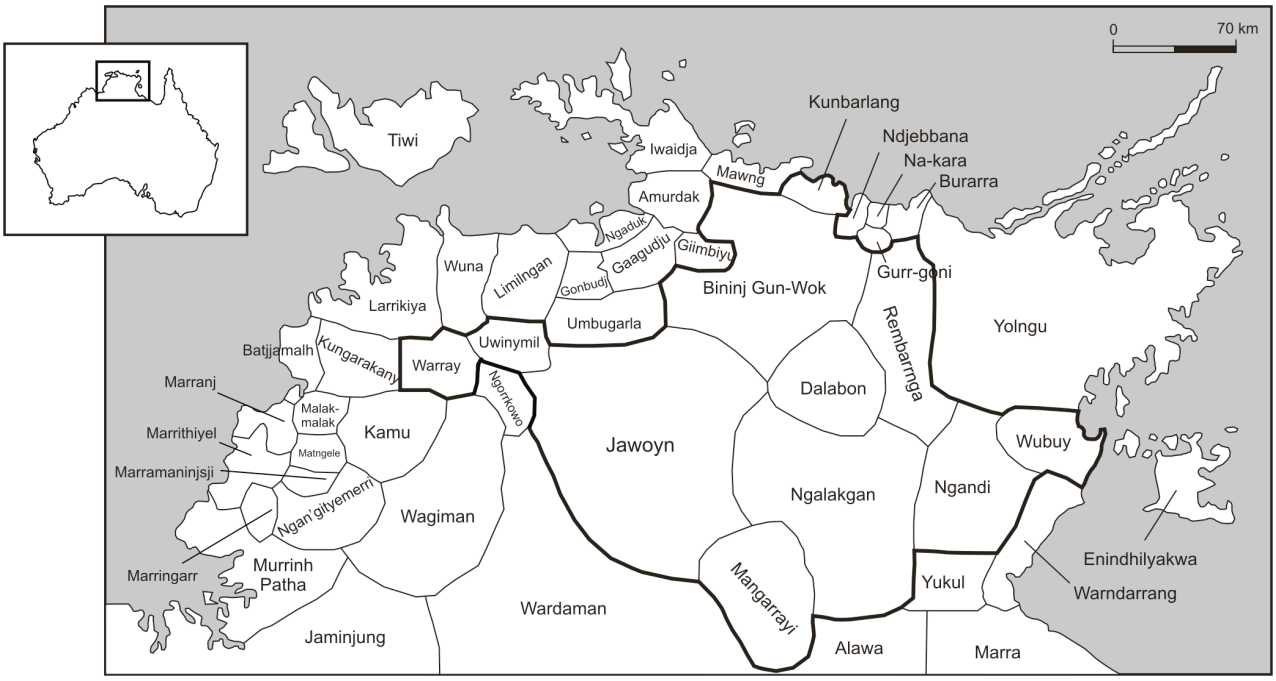
Together with Wubuy spoken on the mainland opposite Groote Eylandt (Map 1.1), the language has been described as "by far the most complicated [language] in north Australia, perhaps in the whole of Australia" (Capell 1942: 376). This perceived complexity of Enindhilyakwa is likely to be related to what is deemed the most complicated noun-classifying system in Australia (Sands 1995: 275), involving noun classes, verb-incorporated classifiers, and gender. To this complex system of noun classification may be added: (i) the obligatory cross-referencing and agreement on nominals and verbs; (ii) an atypical vowel inventory and phonotactics; (iii) four distinct series of pronominal prefixes on verbs encoding an equal number of moods; and (iv) extensive nominal derivation by means of prefixes - and the result is a language that is judged as "perhaps the most difficult of all Australian languages, with a very complex grammar" (Dixon 1980: 84).

This thesis aims to unravel the complexities of this language. I hope to show that, despite its intricacies, Enindhilyakwa grammar is also fairly regular, and, in fact, patterns much like the Gunwinyguan family of languages on the mainland to its west.

1.1 The Enindhilyakwa speakers and their language

This section introduces the reader to the Enindhilyakwa language and its speakers. Following an outline of the principal morphosyntactic typological features (section 1.1.1), I discuss its genetic affiliation in some more detail (section 1.1.2). The next two sections - the geography of Groote

Eylandt (section 1.1.3) and the archaeological record and prehistoric population density on the island (section 1.1.4) - are relevant to the presumed (but disputed) isolate status of the language: these records may provide clues to the timing of settlement of Groote Eylandt, and consequently the period of linguistic isolation. Section 1.1.5 describes the contact history, and section 1.1.6 the present-day speech community. I address the previous work on Enindhilyakwa in section 1.1.7 and the background to the current work in section 1.1.8. Section 1.1.9 concludes this chapter with an outline of the thesis.



Map 1.1: Languages of the Top End (based on Harvey 2003a: 204). The thick line indicates the Gunwinyguan family of languages according to Alpher, Evans & Harvey (2003)

1.1.1 Features of the language

The principal morphosyntactic typological features of Enindhilyakwa are:

- Prefixation to predicates for up to two arguments, and to nominals for one of five noun classes (non-humans) or one of three genders (humans)
- Suffixation for local semantic roles (Locative, Allative, Ablative, Ablative-Pergressive), arguments (Dative, Instrumental), and adnominal relations (Possessive, Proprietive/Privative, Denizen). Most of these can also be used as complementising cases on verbs
- A number of derivational affixes that alter the argument structure of the verb: the benefactive applicative prefix *mvn-* raises non-subcategorised arguments, and the reflexive, reciprocal and causative suffixes change the valency of the verb

- Incorporation of body part and generic nominals into verbs and adjectives, leaving the valency of the verb unaffected; the incorporable grammatical relations are restricted to the absolutive pattern
- Quantifier prefixes occurring between the pronominal prefix and the stem
- Complex verb stems that historically consist of an uninflecting plus an inflecting element, the latter determining the conjugational class of the stem
- Syntactically free, pragmatically-determined word order

The following examples illustrate some of the above features: the pronominal prefixes on verbs and noun classes on nominals in (1a-c), noun incorporation in (1b) and derivational affixes in (1c) (see pages xviii - xix for a list of abbreviations and glossing conventions used in this thesis).

(1) a. *ngayuwa yiba-rrvngkv-na-ma nungkuwa adhalyvmv-manja arnungkwaya*
1.PRO IRR.1/2-see-NP2-*ma* 2.PRO NEUT.river-LOC tomorrow
'I will see you at the river tomorrow' (anin4_mm_au_001)

b. *nanga-lyang-barra arvngkv-manja akinv-mvrra dhukururrku-manja*
FEM/FEM-head-hit.P1 NEUT.head-LOC NEUT.that-INSTR FEM.brolga-LOC
'She [Emu(FEM)] hit Brolga on the head with that [stick(NEUT)]' (VL1 p.310)

c. *kvrr-env-mvnv-muku+lharri-ju-wa merra*
2a.O-3m.S-BENE-fluid+fall-CAUS-P2 VEG.blood
'he shed his blood for you' (Ansec2)

Similar typological features as those listed above are found in the Gunwinyguan languages spoken on the mainland opposite Groote Eylandt.

1.1.2 Genetic affiliation

Enindhilyakwa is classified as a language isolate in the O'Grady, Voegelin & Voegelin (1966) and O'Grady, Wurm & Hale (1966) classifications,[1] based primarily on lexico-statistics. However, this isolate status is not undisputed. Some researchers have noted structural similarities between Enindhilyakwa and Wubuy (aka Nunggubuyu)[2] (Capell 1942; Worsley 1954a; Heath 1978b, 1984, 1990, 1997, n.d.), although Worsley notes that the two languages have a "totally different vocabulary" (1954a: 20). Based on these structural parallels, Heath has long persisted that Enindhilyakwa forms a subgroup with Wubuy and the neighbouring language Ngandi (1978b, 1984: 638, 1990, 1997, n.d.), though without providing much formal evidence to support this claim. Dixon (2002) follows Heath in grouping the three languages together into a subgroup of his

[1] These two classifications are essentially identical, the former being a special fascicle of *Anthropological Linguistics*, and the latter a wall map (Evans 2005 fn5). They will be referred to together in this thesis as 'O'Grady et al.'.

[2] Wubuy is more commonly known as "Nunggubuyu", as in Heath (1984). Technically, "Wubuy" is the indigenous name for the language, while "Nunggubuyu" is the name for the people who speak Wubuy (Baker 2008b fn2). Wubuy is currently spoken in Numbulwar at the Rose River mouth (Map 1.2), but the traditional country is as indicated in Map 1.1.

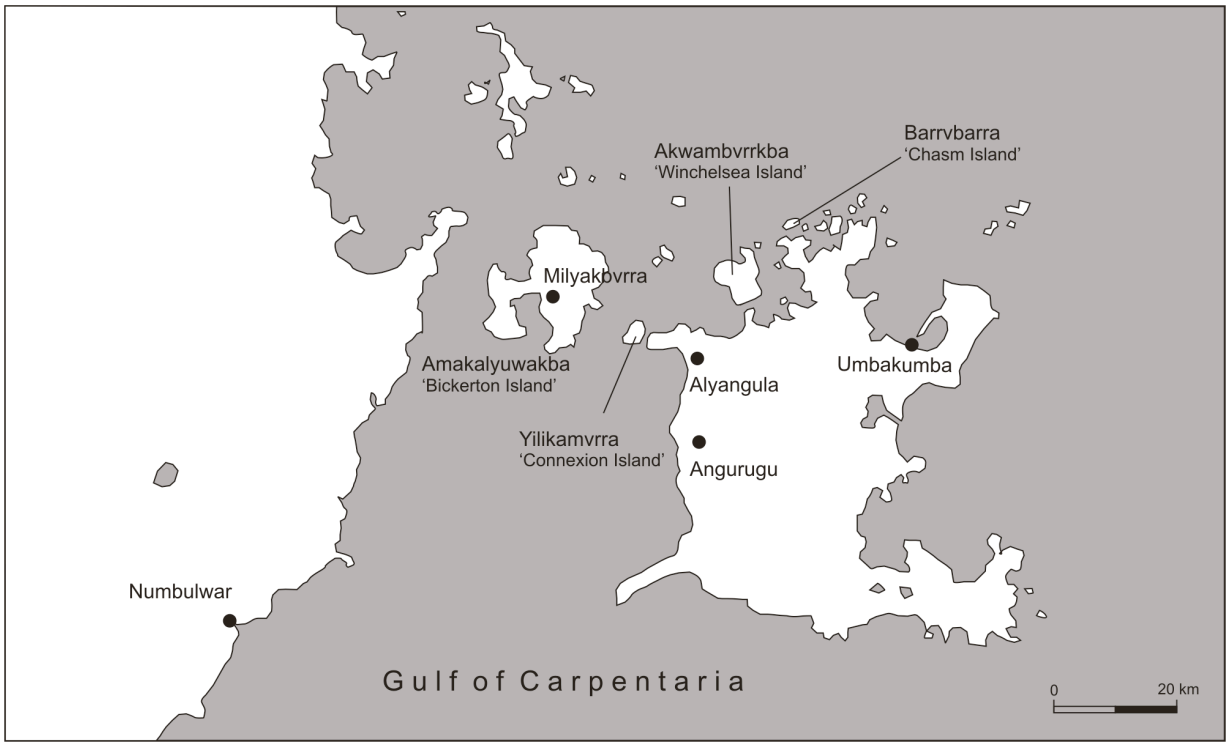
"Arnhem Land Group", but still without any justification for the reasons. Therefore, the generally accepted view, as worded by Evans (2005: 250), is that "the evidence for Heath's claim is slender", and that "one should, for the moment, maintain the conservative position that [Enindhilyakwa] is a family-level isolate".

An issue related to the genetic affiliation of the language is the timing of settlement of Groote Eylandt. Does the archaeological record provide evidence for long-term linguistic isolation, which could support an isolate status of the language, or is settlement of the island more recent, which could support Heath's claim that Enindhilyakwa, Wubuy and Ngandi share a common ancestor? The following two sections - largely based on Clarke (1994) and Brockwell et al. (2009) - address these questions by providing an overview of the geography, archaeology and prehistoric population density of Groote Eylandt.

1.1.3 Geography of Groote Eylandt

Groote Eylandt is the largest island in an archipelago located on the western side of the Gulf of Carpentaria, which consists of over one hundred islands, ranging in size from small rocky outcrops to substantial islands capable of sustaining a permanent human population (see Map 1.2 on next page). The archipelago is a geological extension of Arnhem Land with a similar range of landscape features and vegetation. Groote Eylandt is located 43 km east of the Arnhem Land coast, while Bickerton Island lies 10 km east of the mainland and 17 km west of Groote Eylandt. Groote Eylandt is about 70 km from west to east and 70 km from north to south, covering an area of approximately 2260 km^2. Groote Eylandt and Bickerton Island can each be divided into three main geomorphological zones: a sandstone plateau, coastal plains, and dunefields, spits and sandplains (Shulmeister 1991). The sandstone plateau forms the central core of Groote Eylandt, with *Yandharrnga* 'Central Hill' rising 100 m above the surrounding plateau.

When sea levels were low during the Pleistocene (> 10,000 BP), the Groote Eylandt archipelago was part of the supercontinent Sahul, which embraced Australia and Papua New Guinea. The end of the Pleistocene at about 10,000 years BP is marked by an end to the glacial period and subsequent rise in sea-level, transforming Groote Eylandt into an island at around 7000 BP (Prebble et al. 2005: 358).



Map 1.2: The Groote Eylandt archipelago

1.1.4 Archaeology, rock art and prehistoric population density

All the dated sites from eastern Arnhem Land relate to a Mid - Late Holocene (6000 - 4000 years BP) occupation of coastal environments (Clarke 1994; Brockwell et al. 2009). There is no comparable sequence of human occupation to that from western Arnhem Land, where human settlement has been shown to have begun at least 55,000 years ago (see Clarke 1994: 7 and the references therein). The archaeological record suggests that the pattern of settlement on the coastal plains of Arnhem Land roughly followed the evolution of the landscape (Brockwell et al. 2009). Shortly after stabilisation of sea-levels at around 6000 BP, people began foraging the edges of the vast swamps, occupying the adjacent rock shelters. With increasing sedimentation people began to move out onto floodplains after 4000 BP and onto the prograding coast. People also began to travel further out to sea and occupy islands, such as Groote Eylandt, after 4000 BP (ibid p.62). The oldest archaeological record on Groote Eylandt to date comes from a midden and is dated at 2987 - 2677 years (ibid p.66). Archaeological finds of this age are however rare, and only begin to increase at dated ages of about 1300 years. They become most frequent at around 700 BP.

Dutch explorers visited the Gulf of Carpentaria in the 17th century but left little record of their doings (Tindale 1925: 61), apart from the naming of Groote Eylandt (Dutch for 'big island' in archaic spelling) by Abel Tasman in 1644. The first known record of an Aboriginal presence in the Groote Eylandt archipelago was made by Matthew Flinders (1814), who noted rock art on

Chasm Island to the north of Groote Eylandt (Map 1.2) during his 1803 voyage around Australia, representing porpoises, turtle, kangaroos and a human hand. McCarthy (1960) recorded some forty-five rockshelters with paintings depicting emus and kangaroos, neither of which now live on the archipelago. He attributed these paintings to either mainland visitors or to Groote Eylandters who had visited the mainland. Representations of mythical beings and ceremonial figures, extensively depicted in mainland caves, are not seen on the archipelago (Tindale 1926: 117).

Chaloupka (1989) divided the rock art into two phases: the Sahulian phase, associated with low sea-levels during the Pleistocene (> 10,000 BP), and the marine phase. He suggested that depictions of large macropods on Chasm Island represent the large macropods that would have been found on the Sahulian plains. This interpretation is, however, based on a brief field observation and not on a detailed analysis (Clarke 1994: 5). McCarthy also observed pictures of these large animals but noted that it is impossible to distinguish between kangaroos and wallabies, or between the emu and other birds (1960: 388).

Turner (1973) recorded art sites on Bickerton Island, and found that some of them were very recent. He also found out that people tended to depict unique events, which would explain the high proportion of European ships present in Bickerton art, and the apparent mainland images in Groote Eylandt art. He suggested that these were painted by Groote Eylandters on their return from the mainland, as a record of their experiences. These suggestions are supported by Rose (1942, 1961), who proposes that the rock art on Groote Eylandt was made by two peoples at different times. The earlier paintings were made by visitors from the mainland who brought their ochre with them, while the later paintings were done by the inhabitants of Groote Eylandt who used local ochres. The earliest paintings are probably very old, but the newer ones were done within historical times (Rose 1942).

No stone suitable for implements is found on the island, so that "all the stone implements found on Groote Eylandt have at one time or another passed in turn through the hands of the Allawa, Ngalakan, Mara and Nunggubuyu, the former obtaining them from tribes still further south" (Tindale 1925: 98).

Regarding the prehistoric population density, Rose estimated the maximum population on Groote Eylandt to be around one hundred before the advent of Macassan fishermen (1961: 528) in the late 17th century (see next section). Tindale estimated the population of the entire archipelago at the time of first European contact in 1921 at little more than 300 (1925: 64). This gives a pre-European contact population density figure of 1 person per 9 km^2, which falls within the lower ends of the ranges recorded for Yolngu coastal groups (see Clarke 1994: 13). For the Nunggubuyu the estimated pre-contact figure is 1 person per 13-18 km^2. White et al. (1990) attribute this low

Nunggubuyu figure to environmental factors, arguing that this region is drier and lacks the diversity of resources found on the north coast of Arnhem Land.

These numbers raise interesting further questions in relation to the prehistoric population density and the timing of settlement of the Groote Eylandt archipelago, as Clarke (1994: 14) points out. Why is there a lower population density in comparison to northern coastal Arnhem Land? Is it a function of ecological variables, as White et al. (1990) have suggested for Nunggubuyu country, or could it be due to a more recent time span for settlement? Would a late Holocene (< 2000 BP) settlement of Groote Eylandt relate to the stabilisation of productive coastal habitats following the post-glacial sea-level rise? Is there evidence for a late Holocene development of watercraft capable of crossing the sea from the mainland to Bickerton Island, and from there to Groote Eylandt, a stretch of altogether 27 km?

This thesis investigates the linguistic components to these questions in Chapter 9. There I hope to demonstrate that the linguistic evidence coincides with both the archaeological record and the low pre-contact population density figures: Enindhilyakwa is not a family-level isolate, as was hitherto assumed, but is genetically affiliated with some of the mainland languages. In other words, the available evidence from a range of disciplines all points to a comparatively recent timing of settlement of Groote Eylandt, which may have taken place around 3000 years ago. There is no evidence - archaeological or linguistic - for a great time-depth of occupation that would coincide with the geographic isolation of the island at around 7000 BP.

1.1.5 Contact history

The indigenous people of Groote Eylandt experienced contact through two distinctive groups of outsiders: firstly Macassan fishermen, followed by European missionaries (MacKnight 1972, 1976; Stokes 1982; Leeding 1989; Clarke 2004, 2011). Macassans came from the Indonesian port of Macassar in southern Sulawesi for yearly visits to the Northern Australian shores in the wet season, during a period lasting from the late seventeenth century until 1906[3] (MacKnight 1976). The fishermen (often referred to as Malays in many 19th century texts, or more commonly as Macassans [Clarke 2011: 93]) came to Australia in search of commodities to sell, the main focus being on trepang (bêche-de-mer, or sea slug), but also including pearl shell, pearls, turtle shell, manganese, amongst others. Along with North-East Arnhem Land (Yolngu) and the Cobourg Peninsula (Iwaidjan), the region around Groote Eylandt and the adjoining mainland (Wubuy) appears to have been one of the main three foci of Macassan activity (Evans 1992: 51-2). Many place names still in use on Groote Eylandt attest to substantial linguistic influence, such as

[3] In 1906 the White Australian Policy was enforced, restricting "non-white" immigration to Australia (MacKnight 1972, 1976).

Umbakumba (< Malay *ombak-ombak* 'lapping of waves') and Bartalumba Bay (< Macassan *batu lompoa* 'the big rock'), as do the many loanwords of Macassan origin. Evans (1992) lists 35 words, mostly nouns, that have entered the Enindhilyakwa language through contact with the Macassans.

Tindale suggests that although Northern Australian natives have always been hostile to the alien Macassan intruders and no intimate contact took place, on Groote Eylandt closer communication was brought about than elsewhere (1925: 66). The Macassan fleets spent much time at the island, as evidenced by the remains of their camps Tindale observed, covering extensive areas on the northern part of the island. The natives were employed in shelling and trepanging, and many of them accompanied the Macassans on their return voyages to Macassar, often returning with extensive knowledge of their habits and culture (ibid).

The Macassans introduced the dug-out canoe to the Arnhem Land Aborigines, as well as metal, fishhooks, knives, tobacco, alcohol, and diseases (Macassan words for these items can be found in languages all across Arnhem Land; see Evans 1992). Rose (1961) suggests that the introduction of the dug-out canoe brought about a fundamental change in the economy of the Aborigines, as it shifted the emphasis from land hunting and collecting, to sea hunting. This shift was most pronounced for Groote Eylandt, Rose suggests, and he hypothesises that Groote Eylandt may not have been permanently occupied before the advent of the Macassans, but was only visited by the adjacent mainland (Nunggubuyu) tribe (1961: 529). According to Rose, the introduction of the dug-out facilitated the use of the rich resources of the island's waters, thereby paving the way for part of the Nunggubuyu tribe to settle permanently on the island.

Tindale notes that the traditional bark canoe was still in use, but only in sheltered creeks and bays (1926: 103). He witnessed Groote Eylandters making direct voyages of about 30 miles to Numbulwar on the mainland in dug-out canoes (1926: 111). Some older Wubuy speakers told Brett Baker they had travelled to Groote Eylandt in bark canoes (Brett Baker, p.c.).

European settlement started in 1921, when the Emerald River Mission was established by the Church Missionary Society (CMS) (Clarke 1994). This mission was set up as a station for 'half-caste' children from the Roper River Mission on the mainland. By 1933 the number of children had dropped substantially, and the CMS turned their missionary activities towards the Groote Eylandt people (Dewar 1992, cited in Clarke 1994). In 1938 the mission was moved to its present site at the Angurugu river. The Umbakumba settlement was established in 1938 by Fred Gray, in the same year that Qantas started building a flying Boat Base at Port Langdon at the Umbakumba lagoon, to serve as a refuelling depot for the Sydney-London flight. Umbakumba was taken over

by the CMS in the 1960s. In the 1980s the Aboriginal townships became self-governing and administration was handed over to elected Land Councils.

In 1964 the Groote Eylandt Mining Company Pty Ltd (GemCo) was established and began the mining of manganese on the west coast of Groote Eylandt. Currently the mine produces about a quarter of the world's manganese. The mining town Alyangula was erected for non-Aboriginal GemCo employees. GemCo leases the land from the Enindhilyakwa people, who receive royalties in return.

1.1.6 Present-day speech communities

The number of Enindhilyakwa speakers according to the 2006 census was 1,283 - a four-fold increase since the first European contact. Today there are three major Aboriginal communities and several outstations on the archipelago: most Enindhilyakwa speakers live in Angurugu on the west coast of Groote Eylandt (an estimated number of 850[4]). Umbakumba in the north east has a population of 467, and Milyakbvrra on Bickerton Island harbours 180 people. The population of Alyangula is predominantly non-Aboriginal. The number of inhabitants is highly variable due fluctuation of the workforce ("fly-in fly-out" employment at GemCo is common), but averages around a 1000 people.

There are 14 clans with territories distributed across Bickerton Island and Groote Eylandt (Turner 1974; Waddy 1988; Groote Eylandt Linguistics 1993; Clarke 1994).[5] These clans are divided into two strictly exogamous patrilineal 'moieties', the society as a whole being over 90% endogamous (Rose 1961). In contrast to the mainland, the moieties have no proper name (Turner 1986: 34): ego calls his own moiety *yirr-enikabvrra* 'us mob', and the other moiety *wurr-enikabvrra* 'them mob'. Turner believes this reflects a fairly recent origin of the moiety divisions. Groote Eylandt people also do not have a name for themselves as a whole. In this thesis I will refer to them as the 'Enindhilyakwa speakers'.[6] The Bickerton Island people, on the other hand, do have a collective name for themselves: *Warnvngamakalyuwakba* 'people belonging to *Amakalyuwakba* [Bickerton Island]' (Turner 1986). The Mamarika and Amagula are recognised as the "original owners" of the land and the language (Leeding 1989: 2). In the 1950s surnames were adopted to comply with requirements for Government welfare records (Turner 1974) and royalty distributions. Many of these surnames are derived from one of the clan totems and they exist alongside the clan names (e.g. *Mamarika* 'southeast trade wind' is a surname of the Warnindhilyakwa clan) (Waddy 1988: 111).

[4] http://www.rahc.com.au/uploads/file/Community%20Profiles/Groote%20Eylandt%20Community%20Profile.pdf
[5] Other previous work lists smaller numbers of clans; see Waddy (1988: 110-17) for an overview of these analyses.
[6] The term *Warnindhilyakwa* that is sometimes used properly refers to the Warnindhilyakwa clan (Waddy 1988: 47).

The Enindhilyakwa people have ties to eastern Arnhem Land through ceremony, trade and exchange networks, song cycles, the routes taken by ancestral beings, marriage and through the migration of people in recent times (Tindale 1925-6; Worsley 1954a; Rose 1960; Turner 1974; Waddy 1988; Clarke 1994). Four clan groups are known to have migrated to the Groote Eylandt archipelago in historical memory (Clarke 1994: 11; Turner 1974; Waddy 1988). The five clans on Bickerton are bilingual and also speak Wubuy (Turner 1974). My impression is that many speakers are multi-lingual: apart from Enindhilyakwa and English, some of my informants told me they also speak Wubuy, Ritharrngu, Rembarrnga or Kriol. However, Kriol, the English lexifier creole prevalent in Northern Australia, is not at all common on Groote Eylandt. The only time I have heard it was from a Wubuy visitor from Numbulwar.

The Aboriginal communities on the archipelago are deeply affected by the Machado Joseph Disease (MJD), previously known as the "Groote Eylandt Syndrome" (www.mjd.org.au). This hereditary neuro-degenerative condition renders people paralysed and wheelchair bound within 10-15 years of the first symptoms emerging.[7] Each child of a person who carries the defective gene has a 50% chance of developing the disease. There is no known cure for MJD.

1.1.7 Previous work

The first Enindhilyakwa word list was compiled by Tindale (1925-6), who called the language *Ingura*.[8] He provides a list of about 500 items, transcribed in the Royal Geographical Society's system (which did not distinguish between for instance retroflex and alveolar consonants). The next brief descriptions come from Capell (1942, 1946), who noted the very close structural resemblance of *Andiljaugwa* with Nunggubuyu (1942: 379). Moody (1954) is a first attempt at deciphering *Anindilyaugwa* phonemics and morphology, while Worsley (1954b) investigates *Enindiljaugwa* noun incorporation.

Between 1975 and 1977 Jeffrey Heath spent a few weeks with one Enindhilyakwa speaker at Numbulwar Mission, while conducting fieldwork on a number of other Arnhem Land languages. This resulted in his insightful but unpublished *Draft grammatical sketch of Anindhilyagwa* (Heath n.d.) (67 pages, includes audio material on tape, archived at Australian Institute for Aboriginal and Torres Strait Islander Studies [AIATSIS] in Canberra). Heath's sketch grammar covers Enindhilyakwa phonology, kin terms, and nominal and verbal morphology.

[7] The disease also occurs in people of Portuguese ancestry. The spread of this disease to Arnhem Land was previously attributed to contact with the Macassans, who in turn traded with Portuguese sailors in the 16th century. However, recent research points to an Asian link (Martins et al. 2012).

[8] This is similar to the Wubuy name for the Enindhilyakwa language and its speakers: *inykurra* (Heath 1982). Conversely, the Enindhilyakwa name for the Wubuy language is *yingkura* (Leeding 1989: 1).

The next published work comes from Judith Stokes, who examines *Anindilyakwa* phonology in Stokes (1981) (41 pages) and describes the expression of mathematical concepts in this language (counting, spatial position, time, and so on) in Stokes (1982) (112 pages). Together with Lois Reid and Julie Waddy, she compiled a series of 'Language Lessons Books' (Reid, Stokes & Waddy 1983; Waddy 1986, 1987). These booklets cover the basic sound system, vocabulary and nominal and verbal morphology. They are designed as learning books for non-Enindhilyakwa speakers and contain drills and conversation exercises. The Waddy (1986) booklet comes with audio files.

Most of Julie Waddy's other work on the language is unpublished (her PhD thesis, published as Waddy 1988, deals with the classification of plants and animals by the Groote Eylandt people). In this thesis I make extensive use of her unpublished data, which consist of texts and dictionaries (see below). Most of these are archived at AIATSIS.

A comprehensive Enindhilyakwa dictionary-encyclopaedia *Eningerribirra-langwa jurra* was designed for post-primary school children whose first language is Enindhilyakwa (Groote Eylandt Linguistics 1993). It contains nearly 1500 entries, Enindhilyakwa-English and vice versa, with reference to pictures in a separate section. Pictures of plants, animals, and so on, are accompanied by Enindhilyakwa texts with English translations.

The most thorough description of Enindhilyakwa phonology and morphology is Velma Leeding's unpublished PhD thesis (Leeding 1989; 532 pages). Beside a detailed analysis of the phonology, this work covers the morphology and semantics of all the word classes. In Leeding (1996) (57 pages) she addresses the use of body part nominals in more detail.

References will be made throughout this thesis to previous analyses where relevant.

1.1.7.1 Differences from previous work

This thesis extends the description and analysis of Enindhilyakwa in a number of ways. Firstly, it aims to resolve a number of controversial issues in the previous work, including: the phonology and orthography (Chapter 2), the semantics of the noun classes (Chapter 3), and the number, form and meaning of the inflectional tense/aspect suffixes (Chapter 6). Secondly, I investigate aspects of the language that have so far remained un(der-)described, such as the structure and morpho-syntactic status of the pronominal prefixes (Chapter 4), the structure of the verb stem (Chapter 5), mood and modality (Chapter 6), the incorporation of body part nominals and generics (Chapter 7), and case-marking (Chapter 8), in particular complementising cases on verbs.

Finally, this thesis puts Enindhilyakwa into the context of the neighbouring Gunwinyguan language family. In Chapter 9 I take up the challenge of systematically comparing Enindhilyakwa to Wubuy, and to a lesser extent, Ngandi and other Gunwinyguan languages.

1.1.8 This work: fieldwork and data

This work deals primarily with the Enindhilyakwa language as it is spoken in the community of Angurugu on the western side of Groote Eylandt. Between 2008 and 2011 I undertook three fieldtrips to Groote Eylandt: I was resident in Angurugu for four weeks in November - December 2008, and two weeks in March 2011. Due to lack of accommodation I stayed in the mining town Alyangula for four weeks in March - April 2009, commuting daily to Angurugu.

This work makes use of four types of data, which were collected in a variety of ways. The language examples in this thesis are annotated to indicate their origin.

1. Elicited data: these were produced in elicitation contexts (e.g. 'how do you say X?' 'Can you say X?'). These data were recorded and examples are indicated in the text as 'anin' followed by the fieldwork trip during which it was recorded, the initials of the speaker, the type of recording and the recording number. Thus 'anin2_pw_au_004' refers to an elicitation session on my second fieldtrip, with Priscilla Wurramarrba, which was our fourth audiorecording. Metadata were also recorded, including date, age and gender of speaker, location and type and format of recording (e.g. 48 kHz, 16 bit), type of recorder and microphone, and keywords. Recordings and their transcriptions are, or will be in the near future, archived at AIATSIS, Canberra, and the Endangered Languages Archive (ELAR) at SOAS, London.
2. Overheard speech: I kept a notebook with me at all times in which I wrote down speech which I happened to overhear or which was said to me. Examples of this kind are designated 'Fieldnotes' in this thesis, together with the initials of the speakers and the date.
3. Textual data: this refers to a compilation of over thirty unpublished stories in printed or digital format (no audio). These stories were collected by Julie Waddy, Judith Stokes and colleagues at Angurugu Linguistics in the 1970s and 80s. All stories are translated into English, and about half of them also include morpheme glosses. In this thesis, examples from these stories are annotated with the story name in inverted commas, followed by the reference letter of the story and the reference line number (for example: 'Awurukwa' w3). I also collected a number of short texts myself, which are annotated with the title plus the initials of the speaker (e.g. ['My Dream' DL] represents a text by Dugururru Lalara). Finally, I have a few copies of the 'Akarrikarra' periodical that was published in the 1990s, which contains some short stories written in Enindhilyakwa. Examples taken from it are annotated *Akarrikarra*, with the date of publication.
4. Dictionaries: I have made extensive use of the Groote Eylandt dictionary-encyclopaedia, which contains a large number of texts without morpheme glosses. Data from this dictionary are annotated GED followed by the page number. Data from the unpublished digital dictionary

compiled by Julie Waddy are indicated WD. Data from the two 'ANindilyakwa SECondary roots' digital files are labelled Ansec1 and Ansec2. These are compiled by Julie Waddy and colleagues and contain incorporated body part and generic nominals (Waddy called these 'secondary roots').

The above data span a time period in which some language change has taken place. For example, noun incorporation, which is amply present in the older texts, appears to have gone out of use (see Chapter 7). Therefore, the language "Enindhilyakwa" as presented in this thesis may in some cases be something of an artefact and not synchronically accurate. This will be acknowledged in the relevant sections.

Unless specifically indicated, I changed the orthography and morpheme glosses of the original texts according to the analyses developed in this thesis, while maintaining the original translations as much as possible. This means that, based on my knowledge of Enindhilyakwa phonology, I have also altered transcriptions of words that I have never heard myself (as will be justified in Chapter 2). Examples in this thesis from Gunwinyguan languages are adjusted to conform to the orthography used here, for ease of comparison. For instance, the reconstructed proto-Gunwinyguan form **patca*- 'hit' (Alpher, Evans & Harvey 2003) is converted here to **-badja*-, to better expose the similarities with Enindhilyakwa +*baja*- 'hit'.[9]

1.1.9 Outline of thesis

This thesis can be divided into two parts. The first part, Chapters 2 to 8, is a synchronic description of aspects of Enindhilyakwa grammar (with acknowledgement of those features that are present in the older material but may have gone out of use today). The second part, Chapter 9, investigates the genetic relation of Enindhilyakwa to Wubuy and, to a lesser extent, Ngandi, by comparing synchronic features (vocabulary, grammatical morphemes), and by reconstructing diachronic changes.

CHAPTER 2 deals with what is probably the most controversial aspect of the language: its phonology. I propose a vowel inventory that not only differs from the previous work, but also departs from the typical Australian, and the typical Gunwinyguan, pattern. The main difference is the phoneme /ə/. The vowel [u], on the other hand, which is typically phonemic in Australian languages, is not contrastive in Enindhilyakwa. Another departure from the typical Australian pattern is the strong tendency to avoid codas, as evidenced by: (i) all words ending in [a], (ii)

[9] This is not problematic because a voicing contrast for the stops is not reconstructed for proto-Gunwinyguan (Harvey 2003a). Australian languages generally do not contrast voicing in stops (Dixon 1980).

frequent vowel epenthesis to break up consonant clusters, and (iii) the syllabification of some consonants clusters as onsets.

The nominal word class is described in CHAPTER 3. This chapter also investigates the rich nominal classification system, and the productive set of derivational prefixes that derive adjectives from nouns and verbs. Adjectives derived from nouns denote various types of possession, and a nominaliser prefix derives adjectives and non-finite verbs from verbs. This degree of productive derivation is rather unusual for the Gunwinyguan languages.

CHAPTER 4 describes the four distinct pronominal prefix series that encode an equal number of moods: realis, irrealis, imperative and hortative. This chapter also investigates the morpho-syntactic status of the pronominal prefixes, and the various other prefixes that precede the verb stem.

The structure of the verb stem is examined in CHAPTER 5. Here I show that many verb stems are historically complex, consisting of an uninflecting element plus an element that takes the inflections and that determines the conjugational class of the complex stem. This makes Enindhilyakwa fit in with the 'complex verb' area of Northern Australia. In some Northern Australian languages the uninflecting and the inflecting element are independent words, but in most Gunwinyguan languages they are locked up in a frozen complex stem - as they are in Enindhilyakwa.

CHAPTER 6 deals with another controversial issue in the previous work: the tense/aspect suffixes. This chapter also describes the system of composite mood marking, which combines prefixes encoding mood with the inflectional suffixes to mark a variety of modal meanings.

In CHAPTER 7 I investigate the incorporation of body part nominals and generics in more detail than has been done before. An interesting aspect of Enindhilyakwa incorporated nominals is that they are first of all frequently suppletive, and secondly they are often polysemous between a body part reading and a generic reading. Suppletion and polysemy of incorporated nominals occurs to some degree in the Gunwinyguan languages, but not to the extent that can be observed in Enindhilyakwa.

Case-marking is the topic of CHAPTER 8. Given its head-marking nature, the primary use of case is not to mark the grammatical relations of core arguments of the verb, as this is done by the pronominal prefixes on the verb. Instead, case suffixes are used to mark local semantic relations, and adnominal relations. But, since languages usually are not either strictly head-marking or

strictly dependent-marking (Nordlinger 1998), some dependent-marking occurs in Enindhilyakwa as well. The very productive use of case suffixes on verbs is also investigated.

Finally, CHAPTER 9 addresses the issue of the genetic status of Enindhilyakwa. Focussing on Wubuy, but also addressing Ngandi and other Gunwinyguan languages, I examine the three criteria for recognising a genetic relation: (i) shared basic vocabulary; (ii) systematic sound correspondences in shared forms; (iii) sharing of morphosyntactic features, in the form of inflectional suffixal paradigms. I will conclude that there are plenty of formal similarities, including shared innovations, to indicate that Enindhilyakwa and Wubuy form a subgroup, nested within another subgroup including Ngandi, in turn embedded within the large Gunwinyguan family.