

**Between Worlds:
The Historical Development of the Northern
Territory as a Maritime Cultural Landscape
Connected to Maritime Southeast Asia**

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Supplementary notes

- First Nations language/cultural group names provided where known (spelling may vary)
- Tonnage (tons) of known transport type provided in the first instance
- Historical charts are utilised, in part, as a background setting for site locations, etc., as is Google Earth satellite imagery
- *Northern Territory Times and Gazette* (newspaper) abbreviated to NTTG

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Abstract

The Northern Territory has a rich maritime history connecting this coastline with the islands of maritime Southeast Asia. Up until 1911, these histories include early European survey (1627 to 1839); the Macassan trepang industry (c. 1700s to 1907); the British garrisons (1824 to 1849); and the British colonies (1864 to 1911). In focusing on a specific site (such as Port Essington), or group of sites (such as the Macassan trepang industry), archaeologists have highlighted these connections to varying extents, as have anthropologists and historians through First Nations and British maritime histories respectively. In compiling these bodies of research into one cohesive study, the overarching aim of this thesis is to identify aspects of Northern Territory's early historical development that demonstrate a cultural landscape of maritime communities linked with maritime Southeast Asia. This thesis also aims to examine how each community adapted to their maritime and terrestrial environments based on location choice; the way in which people moved through the maritime landscape; and how these landscapes were shared over time.

To undertake such a broad research area, the maritime cultural landscape approach is utilised to interpret both the physical and cognitive aspects of the maritime landscapes that cover coastal and riverine habitation/occupation sites, wreck sites, transport types, transport zones, transport routes, transit points, maritime enclaves, centres of maritime activity and place names. Through this, a broader maritime cultural landscape of northern Australia and maritime Southeast Asia may be viewed as a number of moving parts over time based on economics, geopolitics, and cultural inclusion and division. Of these connections, it is the Macassan trepang industry and their relationships with First Nations peoples that is most visible archaeologically; the ephemeral nature of the historical development of this region visible more through its history, image and memory.

Statement of Authorship

Except where reference is made in the text of the thesis, this thesis contains no material published elsewhere or extracted in whole or in part from a thesis accepted for the award of any other degree or diploma. No other person's work has been used without due acknowledgment in the main text of the thesis. This thesis has not been submitted for the award of any degree or diploma in any other tertiary institution.

Rebecca Mirams

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Chapter 1 – Introduction

1.1 Introduction and aims

Following from the arrival and settlement of First Nations Peoples from Sunda to Sahul at 65-50ka (Clarkson et al., 2017; Kealy et al., 2018), the Northern Territory's more recent relationship with maritime Southeast Asia stems back to the continual visitation of islanders—including the Baijini and Bayini (Berndt and Berndt, 1947:133; Wesley, 2014)—to First Nations' shores that led to the development of the Macassan trepang industry (Macknight, 1969b). Upon the arrival of the Dutch, French and British through survey, followed by British garrisons and colonies, the islands to the north (especially Timor, the eastern archipelago of maritime Southeast Asia, Singapore and Hong Kong), played a significant role in the historical development of the Northern Territory's Top End up to 1911 (Figure 1.1). The geographic setting of the two regions, and the continual movement of people between them, saw overlapping relationships driven by geopolitical, economic and social factors that influenced external interest in the region. Despite the eviction of much of the substantial Chinese and other non-white communities around the turn of the twentieth century—including the forced cessation of the Macassan trepang industry and suppression of its history thereafter—connections between the regions have remained strong.

Archaeological research over the past 50 years has brought to the fore the histories and relationships shared between First Nations, Macassan, British and Chinese communities through the interactions of each group within the maritime and terrestrial landscapes. In focusing on a specific site (such as Port Essington [Allen, 1969]), or group of sites (such as those related to the Macassan trepang industry [Macknight, 1969b]), archaeologists have highlighted these connections to varying extents, as have anthropologists and historians through First Nations and British maritime histories respectively. In compiling these bodies of research into one cohesive study, the overarching aim of this thesis is to identify aspects of the Northern Territory's early historical development that demonstrate a cultural landscape of maritime communities linked with maritime Southeast Asia. This thesis also aims to examine how each community adapted to its maritime and terrestrial environments based on location choice; the way in which people moved through the maritime landscape; and how these landscapes were shared over time.

To take in such a broad research area, the theoretical framework of landscape archaeology that highlights the 'maritime cultural landscape' approach is utilised to interpret both the physical and cognitive aspects of the maritime landscapes. Discussed in detail in the following chapter, this covers coastal and riverine habitation/occupation sites, wreck sites, transport types, transport zones, transport routes, transit points, maritime enclaves, centres of maritime activity and place

names (Westerdahl, 1992). Through this framework, the changing maritime cultural landscape of the Northern Territory over the recent centuries may be viewed.

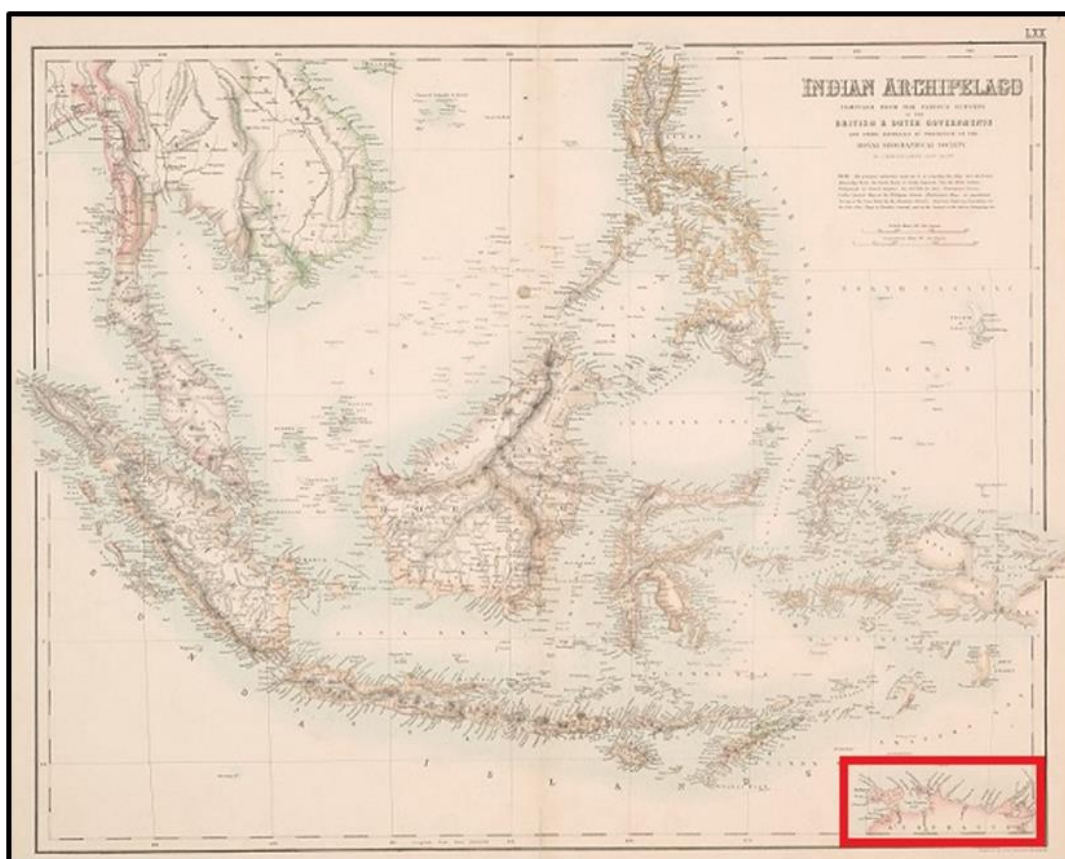


Figure 1.1 Bartholomew's (1862) Sketch map of the *Dutch possessions in the Indian Archipelago*. The red rectangle showing the Northern Territory's position on the southern periphery of maritime Southeast Asia.

1.2 Research area

The research area covers the entirety of the Northern Territory's Top End maritime and terrestrial landscapes within the broader context of maritime Southeast Asia (Figure 1.2). As a Territory of Australia located in north central Australia, the Northern Territory is bounded by the Timor and Arafura Seas to the north, and the states of Western Australia, Queensland and South Australia to the west, east, and south respectively. The Top End is a general term used to define the climatically monsoonal region from the central northern coastline and islands of the Northern Territory to around 500 kilometres south. Specific to this research, maritime Southeast Asia covers the present-day countries of Indonesia, Timor-Leste, Singapore, the Philippines and Malaysia. Historically, this region has been referred to as the Malay Archipelago and East Indies. Also discussed throughout this thesis, the eastern archipelago covers the eastern region of islands within maritime Southeast Asia.

Located on First Nations lands and seas that encompass over 25 First Nations language groups (Figure 1.3), archaeological sites are situated within the Northern Territory's seas, bays and estuaries (wreck sites), along the mainland and island coastlines (wreck sites, trepang processing sites, British occupation sites, maritime infrastructure), estuary shorelines (occupation sites, maritime infrastructure) and further inland (rock art and stone picture sites). Physical remains of pirated ships from Fort Dundas are also noted in the eastern archipelago (Spillett, 1982), as is photographic material of First Nations peoples from South Sulawesi (Lydon, 2014).



Figure 1.3 *Aboriginal Australia wall map* showing First Nations' language groups in the Top End (Horton and Australian Institute of Aboriginal and Torres Strait Islander Studies, 2000)

1.3 Background: Historical archaeology in the Northern Territory

The field of historical archaeology has made a slow but certain imprint on the growing corpus of research undertaken in the Northern Territory. Two seminal doctoral theses that laid the foundations for this field are the research from Macknight (1969b) on the Macassan trepang industry and from Allen (1969) on the British garrison of Victoria at Port Essington. After Macknight and Allen, historical archaeological research was minimal for 20 years due to the lack of academic resources in Darwin (Sullivan and Carment, 1992; Fredericksen and Walters, 2002:30), the exception being Crosby's (1978) survey of the British garrison of Fort Dundas. In spite of this, "the significance of the social and historical interfaces of Indigenous, colonial, migrant and Asian multi-cultural expression" was recognised (Fredericksen and Walters, 2002:31). From the inception of Northern Territory University (now Charles Darwin University) in 1989, the Dean of the Faculty of Arts, Professor Alan Powell, encouraged the teaching and research of historical archaeology at that institution.

From the late 1980s onwards, five distinct historical themes were pursued archaeologically (Fredericksen and Walters, 2002:32): the Macassan trepang industry (see Chapter 5); British occupation prior to the permanent colonisation of Palmerston (Darwin) (see Chapters 6 and 7); Chinese gold mining at Pine Creek (Bell, 1983, 1995, 1996; Pearce, 1982; Hardwick, 1984; McCarthy, 1986, 1988, 1989, 1995; Van Kempen, 1987; Mitchell, 1995b, 1999; Fredericksen et al., 2001); maritime archaeology with a focus on shipwrecks (Jung, 2005; Spillett, 1982; Lewis, 1992; Steinberg, 2001, 2005a, 2005b); and the archaeology of World War II (De La Rue, 2005; Jung, 1996, 2000, 2001, 2005). These and other themes are visible in *Darwin Archaeology: Aboriginal, Asian and European Heritage of Australia's Top End* (Bourke, Brockwell and Fredericksen, 2005), providing an overview of both pre- and post-contact archaeology from the Northern Territory.

Other areas of research explored on a much smaller scale include excavations at Fannie Bay Gaol (Dewar and Fredericksen, 2003; Fredericksen, 1999, 2005), tin mining at Bynoe Harbour (Heritage Surveys, 1997; Gregory, 1999; Mitchell, 2005), and heritage assessments of historic sites including Southport (Guse, D, 2001). Significant historical themes such as pearling and fishing are yet to be explored. These, however, are covered in the historical literature of the Northern Territory (Powell, 2009, 2010) and in archaeological research undertaken in Broome, Western Australia (Hocking and Nayton, 1995; Smith and Devereux, 1999; Aris et al. 2001).

Most recently in maritime archaeology, the Heritage Branch of the Northern Territory has continued working with the Commonwealth in contributing to the Historic Shipwrecks Program through reaching out to museums, groups and individuals holding maritime associated artefacts in

collection that are then recorded and catalogued (David Steinberg, pers. comm., 12 January 2021). In Northern Territory waters, Flinders University recently completed a desktop survey of the potential for submerged cultural landscapes and Silvano Jung continues regional surveys for shipwreck sites; drawing on a variety of data including Aboriginal Areas Protection Authority (AAPA) data.

Currently in progress is the doctoral research of David Steinberg on the archaeological and historical study of Japanese pearling in the Northern Territory during the inter-war years that. In focusing mostly on the foreign fleets entering the region—with limited reference to local pearling and the indentured Japanese who worked for Australian Master Pearlmen—, episodes of contact, trade and conflict with local authorities and First Nations peoples is investigated. This research draws heavily from the survey and excavation of the Sanyo Maru shipwreck, and also includes a study of Japanese material held in private and public collections (David Steinberg, pers. comm., 12 January 2021).

Historical sources greatly assist in the interpretation of the maritime cultural landscape of the Northern Territory through providing context to known archaeological sites and as potential for locating new ones. Following the brief description of First Nations maritime communities prior to contact, a literature review of these histories is shared below through the introduction of the primary maritime communities discussed in this thesis; with the overview of previous archaeological research set in the respective chapters.

1.4 The maritime communities

First Nations Peoples

First Nations Peoples arrived in Sahul (Australia-New Guinea continent) from Sunda (mainland Southeast Asia) between 50 and 65 thousand years ago (ka), thus signifying the earliest known human relationship between the two regions (Clarkson et al., 2017:309; Kealy et al., 2018). Despite sea levels being low at this time, these journeys involved multiple water crossings through Wallacea (maritime Southeast Asia) (Figure 1.4). Of the possible sea routes put forward by Birdsell, the northern routes 1A and 1B have the strongest support in the archaeological community due to the shorter water crossings, yet route 2B, landing at present-day Northern Territory, complements the antiquity of archaeological sites in the region. Located on Mirrar Country, west Arnhem Land, Optically Stimulated Luminescence (OSL) dating methods have produced date ranges for the oldest known First Nations sites of Madjedbebe to be between 50–65ka and Nauwalabila I between 53–60ka (May et al., 2017:92) (Figure 1.5).

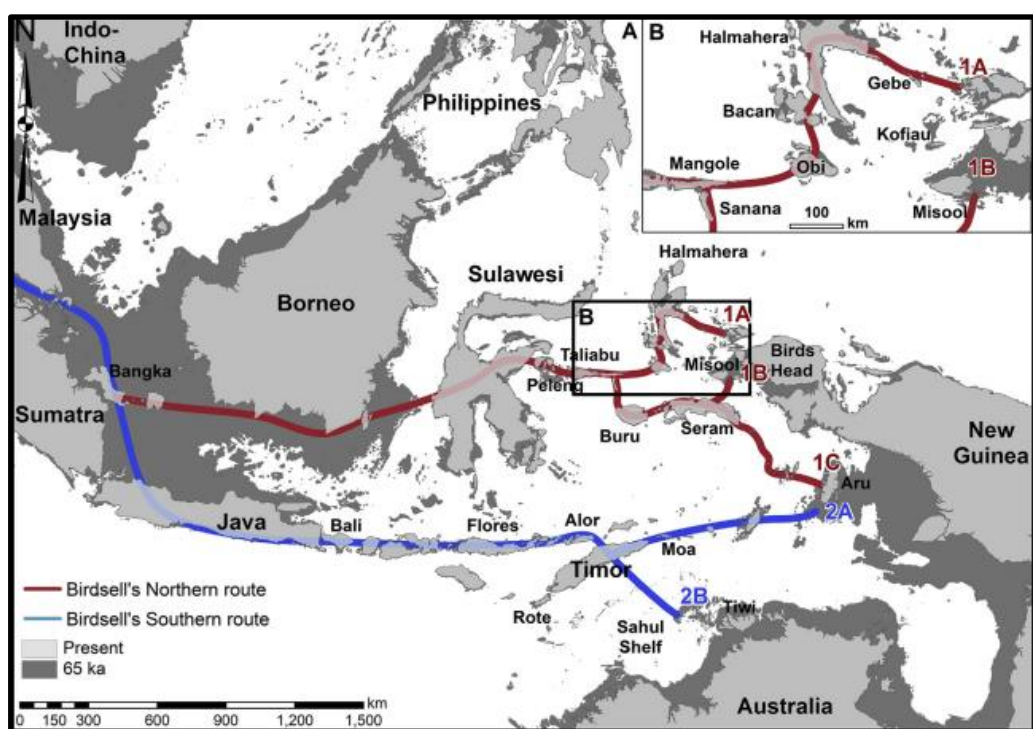


Figure 1.4 Alternative transport routes from Sunda to Sahul (Kealy et al., 2018:60)

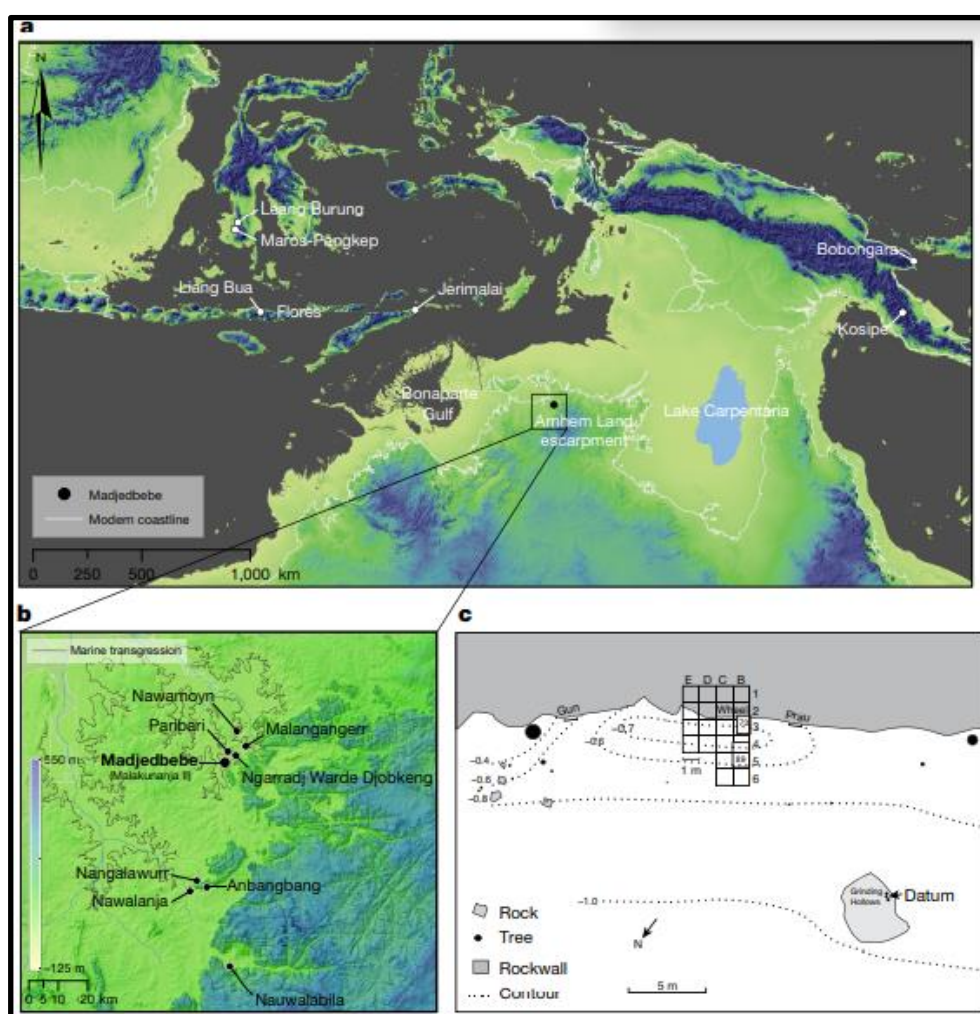


Figure 1.5 First Nations archaeological sites with a focus on Madjedbebe dating to 65ka (Clarkson et al., 2017:307)

From 65ka to the post-Pleistocene marine transgression and stabilisation at between 10–6ka, and throughout the dynamic period of Holocene landform evolution, First Nations peoples have continually adapted to the changing coastal landscapes (Mulvaney and Kamminga, 1999:273; Brockwell et al. 2011:1). Evident in Kakadu (west Arnhem Land), exploitation of the coast has been suggested to have increased between 2–3 ka due to the growing productivity of the coastal zone based on the increasing number and size of habitation sites (Mulvaney and Kamminga, 1999:274). At the rockshelters of Malangangerr, Madjedbebe, Ngarradj Warde Djobkeng and Nawulandja, the earliest recorded shell middens date to after 7ka, with the earliest shell middens at Nawamoyne, Paribari, and Jimeri dating to between 3–7 ka (May et al., 2017:91). Here, and in other low-lying coastal regions of the Northern Territory, floodplains were annually inundated, with First Nations Peoples living on mound sites and along the rocky outliers near the wetland margins. The subsiding of floodwaters then saw all environmental zones (including the mangrove-fringed coastlines, rivers and woodlands) exploited for their resources (Mulvaney and Kamminga, 1999:275–7).

The longevity of First Nations Peoples continuous habitation of the maritime and terrestrial environments of the Top End led to the establishment of over 25 coastal language groups. Within these, residential groups comprising of relatives and kin (unrelated) varied in population size and geographic area. A person's social identity within the group was defined by their age, gender, kinship ties and an abiding sense of place (Mulvaney and Kamminga, 1999:75–7). Intimate connections between person and environment was reflected through the creation stories of the Dreaming where special places, flora and fauna retain sacred status from creation events. In having premeditated subsistence and ceremonial activities, the seasonal movement of people involved trade of subsistence and ceremonial items with neighbouring language groups that played a role in established and upheld relationships. This extended both inland and, over time, to visitors arriving from the seas such as Macassan trepangers (Mulvaney and Kamminga, 1999:93–102). As is evident throughout this thesis, however, visitors such as the European surveyors and the British garrisons and colonists were rarely reciprocal in their respect for First Nations connections and custodianship to land and sea.

Early European surveyors

The Dutch are recognised as the first Europeans to have made an impact through charting and naming sections of the Northern Territory coastline (Powell, 2010:41–106). This is not surprising given their dominant position in maritime Southeast Asia as coloniser and merchant since 1602. From this time, the Dutch East India Company were the largest corporation in Europe, and it took their surveyors only 40 years to map the northern and western coasts of Australia through running survey. Charts of the western coast were essential to avoid shipwreck, yet with the northern coast,

Dutch interest in resources and useful shipping routes, more so than shipping hazards, was the impetus behind surveying this region. After a number of unfruitful voyages of the Northern Territory coast between 1623 and 1705, they withdrew their interest in this region.

Upon the establishment of the penal colony of New South Wales (in present-day southeast Australia) in 1788, British intentions to explore, survey, and occupy other parts of Terra Australis and New Holland became a priority as French interests grew. Consecutive surveys over the course of 40 years were commanded by Matthew Flinders in 1801–03, Phillip Parker King in 1817–21 and John Wickham and John Lort Stokes in 1837–43.

Research into these surveys stems directly from the digitised charts accessible online from Trove. Over time, these charts show the surveyors' movements through the coastlines and shipping routes drawn onto paper. As navigational technology improved, soundings, dates of travel, wind directions, marine hazards, anchorage sites and landing sites where bearings were taken, topographical features and place names were also recorded. Complementing the charts, surveyors' journals provide the narratives of their voyages, showing their perceptions of the coastal landscape, its topography, and the people (Flinders, 1814; King, 1828; Stokes, 1846a, 1846b; Allen and Corris, 1977; d'Urville, 1987; Hordern, 2002).

The Macassans

The Macassan trepang industry operated seasonally in Northern Territory waters from around the 1750s to 1907 (Macknight, 1986:70; Mitchell, 1994:48). The name 'Macassan' refers to members of the numerous maritime communities across the archipelago who sailed from the port of Makassar in present-day South Sulawesi to the north Australian coast to procure edible holothurians—referred to here as trepang—for the Chinese market. With a substantial part of the Bugis-Makassarese population working in the maritime industry through ship-building, voyaging, trade, etc., the trepang industry of coastal Northern Territory was one part of an extensive maritime network that connected this region with the islands of maritime Southeast Asia. This visitation saw the development of longstanding relationships with First Nations groups that saw First Nations men and women working and trading with the Macassans, and joining them on their return voyage to Makassar. The arrival of the British saw to the eventual cessation of Macassan visitation; their contemporary accounts providing a British perspective of the industry and the people (Allen and Corris, 1977; Earl, 1846a, 1846b; Flinders, 1814; LANT, John McArthur, NTRS 3602Stokes, 1846a, 1846b; Jukes, 1847; Knight, 1880; Lee, 1925; Mulvaney and Green, 1992; Searcy, 1909, 1984).

British garrisons

From 1824 to 1849, the British occupied northern Australia at the garrisons of Fort Dundas on Melville Island (1824–29) (Crosby, 1978; De La Rue, 2006), Fort Wellington at Raffles Bay (1827–29) (Spillett, 1971; Gregory, 1996) and Victoria at Port Essington (1838–49) (Allen, 1969; Spillett, 1972; Taçon, 1989:29). The initial motivation for occupation was a response to activities in maritime Southeast Asia (De La Rue, 2006:12), the intention being to deter other European nations from colonising the vast northern Australian coastlines yet to be inhabited by the British (Allen, 1973:44). Another incentive was to enter into the trading network of the eastern archipelago through commerce with Macassan trepangers. The location of the garrisons, along with Dutch influence on the Macassan trepang industry, however, negated the British efforts. The only trade that did occur was the procurement of supplies from Timor and other close colonies by British vessels passing through the region (Powell, 2010).

The first historical accounts of the British in northern Australia by Howard (1933) set the foundations for further research that focused on an overall history of the British in the Northern Territory (McIntosh, 1958; Graham, 1967; Coltheart, 1982; Cameron, 1998; Powell, 2009, 2010). This research expanded into First Nations and contact histories (Krastins, 1972; Cameron, 1998; Morris, 1999), the impact of malaria (Reid 1995, 2004), the presence of convicts (Marshall, 1991; Reid, 1992), and farming and horticulture (Curteis, 1965; Calley, 1998). Despite the predominance of historical publications focusing on north Australian British garrisons as a whole, few of these are site-specific. *The Historical Records of Australia* (Watson, 1923) and publications by Campbell (1834) and Wilson (1835) provide insights into life at Fort Dundas and Fort Wellington, complemented by further publications by the Historical Society of the Northern Territory (1971), Cameron (1985, 1998), Reid (2011) and Pugh (2017, 2020). Campbell's article also covers Victoria, with other accounts being from the garrison inhabitants Commandant McArthur (NTAS, John McArthur, NTRS 3602), linguist, George Windsor Earl (1846a, 1846b) and visitors to the garrison such as Stokes (1846a, 1846b). The publication by Cameron (1999) on Victoria's dispatches, and detailed research by Spillett (1972) and Allen (1972, 1973, 2008) into the history and archaeology of the garrison, including their place within the broader geopolitical region of maritime Southeast Asia and beyond, are the most thorough accounts to date.

British colonies

Further attempts to colonise the Northern Territory coastline took place from 1864 onwards, this time through the South Australian annexation of the Northern Territory for pastoralism and as a conduit of communication between the southern colonies and British colonies such as Singapore, Penang and beyond (Powell, 2009). After the survey and failed colonisation at Escape Cliffs

(Gregory, 1998), the second attempt of colonisation in 1869 at Port Darwin led to the permanent colony of Palmerston within the Northern Territory of South Australia. As the present-day Darwin, the Northern Territory was managed by South Australia up until 1911 when it was handed over to the Commonwealth. Contemporary histories of Palmerston, the Northern Territory, and Palmerston's place within the broader context of maritime Southeast Asia, China, and the southern colonies include reports and dispatches from the consecutive government residents, the *Northern Territory Times and Gazette* (NTTG) and other newspaper articles, the memoirs of Searcy (1909, 1984) and contemporary charts, maps, town plans and photographs. Secondary sources from Carment et al. (2008) and Powell (2009, 2010) provide an overarching history of the region, with research from Pugh (2018) and Wells (2018) focusing on Palmerston—the latter highlighting the almost immediate displacement of the Larrakia from their land. The significant Chinese-specific histories of the Northern Territory are accounted for by See-Kee (1987), Giese (1995), Jones (1997), Ah Kit (2002), Yee (2006) and Martinez (2015).

1.5 Significance of research

With over 50 years of archaeological research covering some of the major aspects of the Northern Territory's historical development, coupled with the more recent application of the maritime cultural landscape approach as a methodological tool, the significance of this research is the ability to collate, examine and interpret the maritime landscape of the Northern Territory as part of the broader geographic region of maritime Southeast Asia. In interpreting both the physical and cognitive aspects of these maritime landscapes, relationships that developed during this time will be brought to the fore, highlighting the impact of geo-political motives and economic interests, along with the way in which people moved through the seas, coastlines and estuaries and the locations they chose to occupy. Through the interpretation of the historical development of this region, a better understanding can be gained of how different groups functioned through the underlying phenomena of 'living by the sea', determining the relationship between this maritime environment and the functional, cultural and social strategies that the different groups developed within it (Rönby, 2007:66). Past perceptions of space and place shall also be brought to the fore, demonstrating the different ways of seeing the land and sea of each group, based on their intentions, methods of adaptation to their immediate environment, and interactions with First Nations Peoples and other communities (Ashmore, 2004; Kealhofer, 1999:61). This leads to a cultural landscape of shared spaces within a region that was governed by its environment and shaped by the many cultural influences within and around it (Harrison, 2002).

1.6 Thesis structure

The crux of this thesis is the examination and interpretation of the four historical phases representing the four main groups of people that entered the geographical boundaries of present-day Northern Territory. These are: early European survey (1627 to 1839); the Macassan trepang industry (c. 1700s to 1907); the British garrisons (1824 to 1849); and the British colonies (1864 to 1911). Chapter Two, *Methodological approach*, describes the maritime cultural landscape approach as put forward by Westerdahl (1992), its use in Australian historical archaeology, and how it will be utilised here as an interpretive tool for the historical phases. This is followed by *Physical environment*, which provides an overview of the maritime and terrestrial environments in which the historical phases took place.

Chapters Four to Seven provide the data for each historical phase based on the interpretive model set out in the methodology. Not surprisingly, each historical phase is dramatically different in the availability and types of archaeological and historical data and fieldwork undertaken. The structural design of each chapter reflects this variability, yet attempts to keep cohesion in first providing a general historical prelude, followed by a breakdown of data for each site(s) that covers the maritime and terrestrial setting, historical overview, previous archaeological research, archaeological attributes, place names and maritime/terrestrial activities undertaken. This information provides a means of better understanding of how each group adapted to, occupied, shared and moved through their immediate and broader maritime landscapes.

The opening chapter on interpretation, Chapter Eight, *Adapting to the maritime landscape*, interprets how each group adapted to the maritime landscape over time based on their intentions and subsequent experiences that shaped it over time. In viewing the interactions of each group with the physical environment, specific maritime landscapes for each group become apparent based on the maritime and terrestrial activities undertaken. Also apparent are the lessons in landscape learning (and not learning) visible for the British garrisons and colonies. A form of adaptation within itself, Chapter Nine, *Shared landscapes*, interprets the ways in which relationships developed over time, and in turn, how this influenced the use and occupation of space. Longstanding First Nations-Macassan relationships are explored first through First Nations visibility at Macassan trepang processing sites and their perceptions through stone pictures and rock art. This is continued with the arrival of European surveyors; their presence also visible in rock art. British surveyors' interactions with the Macassans are instead visible in British charts; the deluge of British place names across the coastline signifies both the beginnings of British intentions to colonise and their lack of regard for First Nations custodianship. As British occupation of the coastline moves from temporary to permanent and from the coast to inland, the shared landscape shifts dramatically through the cessation of the Macassan trepang industry.

With the foundations laid for site locations (and their physical environment) of each group based on maritime/terrestrial activities, and how this influenced the shared landscape, Chapter Ten, *Maritime landscapes of movement*, interprets the region as a maritime cultural landscape. Here, Westerdaahl's (1992) descriptors of transport types, transport zones/routes, transit points, maritime enclaves and centres of maritime culture are used to explore how groups within each historical phase navigated through their maritime and terrestrial environments—and that of the broader region—based on their economic and political pursuits, and their basic requirements for survival. Throughout these chapters, the overlapping maritime cultural landscapes of the Top End of the Northern Territory emerges as part of the broader region of maritime Southeast Asia.

1.7 Limitations

Despite the substantial geographic area of this research, the present-day geopolitical boundaries of the Northern Territory borders exclude significant related maritime histories of northern Australia that connect it with maritime Southeast Asia. Prior to and after the arrival of the British, the Macassan trepang industry also took place on the Ashmore, Seringipatam, Scott and Cartier Reefs between Timor and Western Australia, at Kayu Jawa (Kimberley region, Western Australia) and the Wellesley Islands (Queensland) (Macknight, 1969b:1; Morwood and Hobbs 1997; O'Connor and Arrow, 2008:398; Clark and May, 2013b:1; Oertle et al., 2014; Adhuri, 2013:184). From the late 1800s, the pearling industry also stretched between Western Australia, Queensland and the Torres Strait Islands (Hocking and Nayton, 1995; Smith and Devereux, 1999; Aris et al. 2001; Powell, 2009, 2010). Although significant, these and other maritime histories that connected the two regions were not included primarily due to the research interests of the author, yet also as they posed too great a research area for the scope of this thesis.

Similarly, the date range from the 1600s to 1911 excludes further significant maritime histories such as the arrival of First Nations Peoples from Sunda to Sahul (Allen et al., 1977; O'Connor, 2007; Allen and O'Connell 2008, 2020; Gomes et al., 2015; Kealy et al., 2018), visitation of the Baijini and Bayini to eastern Arnhem Land (Berndt and Berndt, 1947:133; Wesley, 2014), the continued development of the steamship networks (Battersby, 2007), and the Northern Territory's involvement in World War II (De La Rue, 2005; Jung, 1996, 2000, 2001, 2005). As with the geographic range, the temporal range exceeded the research scope of this thesis.

Despite these exclusions, the (still) broad scope of this thesis necessitates limitations in the depth of research for individual sites and groups of sites for a particular activity (such as the Macassan trepang industry). As data acquisition is based primarily on previous archaeological research, the variability of data—ranging from doctoral theses to heritage listings—saw large discrepancies in

available information, compounded further by the wide range of site types. This will be acknowledged throughout the thesis.

With fieldwork forming only a minor component of this research, the potential for acquiring new information on sites was minimal, with only local sites revisited. Limitations in fieldwork relate to time, the remoteness of archaeological sites, the physical environment and the dangers of fauna. Surveys undertaken at Anson Bay, Maria Island, and the Bynoe Harbour tin mines produced only a small number of archaeological features and artefacts. In hindsight, this is reasonable given the ephemerality of the physical aspects of occupation sites relating to maritime activities, and the monsoonal environment in which the activities were undertaken. Despite this, the secondary purpose of the fieldwork—to document the maritime and terrestrial environments in which activities were undertaken—added value to the surveys.

Due again to the broad scope of this research and the prominent use of previous research for data acquisition, the individual voices that formed these histories is rarely heard, nor are the First Nations voices from the land and seas in which they took place. These voices, however, are evident in many of the publications sourced, as recognition of First Nations knowledge and perceptions of historical events continually improves in academia. Despite maritime Southeast Asia being the primary focus of this research, it is also acknowledged that the Northern Territory's archaeological record of people from the present-day countries of Indonesia (aside from the Macassans), Timor-Leste, Singapore and the Philippines are also lacking. Here, non-British research has geared to the more prominent Chinese history.

1.8 Conclusion

In introducing this research, this chapter provides the premise and aims of the thesis, being to identify and examine: aspects of the Northern Territory's early historical development that demonstrate a cultural landscape of maritime communities linked with maritime Southeast Asia; how each identified group adapted to its maritime and terrestrial environments based on location choice; the way in which people moved through the maritime landscapes; and how these landscapes were shared over time. With the research area covering the Northern Territory's Top End maritime and terrestrial landscapes within the broader context of maritime Southeast Asia, the compilation of past archaeological research and historical data form the primary sources of data acquisition, with fieldwork undertaken at a small number of remote and local sites. The outcome of this is an interpretation of four distinct historical phases—early European survey, Macassan trepang industry, British garrisons, and British colonies—through the maritime cultural landscape approach based on the research aim themes.

Chapter 2 – Methodological approach

2.1 Introduction

The methodological framework of landscape archaeology that incorporates aspects of the maritime cultural landscape approach is utilised for this research. The framework integrates the analysis of maritime and terrestrial archaeological sites with historical and other data to interpret both physical and cognitive aspects of maritime landscapes. This interpretation comprises themes of adaptation to the maritime landscape, the shared landscape, and landscapes of movement, all of which answer the overarching aim of identifying aspects of the Northern Territory's early historical development that demonstrate a cultural landscape of maritime communities linked with maritime Southeast Asia.

This chapter begins with an outline of the maritime cultural landscape as a framework within the field of landscape archaeology and its application in Australian historical archaeology. Following a brief description of the thematic approach, an overview of how the Northern Territory will be presented and interpreted as a maritime cultural landscape will be discussed.

2.2 Landscape archaeology and the maritime cultural landscape

In focusing on historical development within a regional context, the theoretical framework of landscape archaeology shall be applied with the underlying theme of the *maritime cultural landscape*. Being concerned with both the natural and human-built environment, landscape archaeology is best defined by Branton (2009:51) as being a framework for modelling the ways that past people conceptualised, organised, and manipulated their environments and the ways that those places have shaped their occupants' behaviours and identities. As an amalgamation of geography and anthropology, landscape archaeology represents the link between culture, space and place (Ford, 2011:1). Space may be at a local or regional level and may contain several landscapes within it, with all places and space being dynamic participants in past human behaviour (Branton, 2009:51). Space covers environmental factors such as the topography of the land and sea, the weather (seasons, climate, wind direction, tides, currents, cyclonic events, etc.), vegetation and resources. Places, on the other hand, are represented by cultural factors such as political motives, socio-economics incorporating trade and industry, the duration of settlement, and the introduction of imported materials, plants, animals and diseases. In understanding the landscape history, temporal measures are also utilised through the changing environmental and cultural factors that affected the movement and settlement of people (Knapp and Ashmore, 1999:18).

Taking into account these spatial and temporal measures, the landscape can be described as part of a world of movement, relationships, memories and histories, adding up to form a complex web of people, places, and things (Bender, 2001:76). This is applicable when exploring how the Top End developed into a cultural hub for First Nations, Macassan, British and Chinese cultures (notwithstanding the Japanese, East Timorese, and others), all having a large impact on how this region developed through their interactions with each other and with their environment. These interactions were primarily based in the maritime setting, with each group reliant upon the seas, bays and rivers to varying degrees as a means of subsistence, travel, communication, economic gain, and control. In this respect, the cultural landscape that developed within the seas, islands, coastline, estuaries and adjacent lands of the Northern Territory is best considered as a *maritime cultural landscape*.

Previously, cultural landscape studies were confined to the land, with maritime archaeology focused specifically on the sea (Duncan, 2006:7). As a sub-field of landscape archaeology, the maritime cultural landscape was created out of the need for a more holistic approach to understanding maritime ways of life (Westerdahl, 1992:5; Tuddenham, 2010:7). The framework of the maritime cultural landscape thus allows for an in-depth study in which a particular place or region can be reconstructed (Evans & Keith, 2011:170). It covers all possible angles of human relationships with the sea, coasts (Westerdahl, 2011:337) and estuaries, including the entirety of past and present networks of sailing routes, ports and harbours, related infrastructure, and the remains of underwater and terrestrial human activity. Simply put by Tuddenham (2010:6), the maritime cultural landscape bridges the divide between land and sea, yet it is the interpretation of maritime life on land perceived from the sea that truly constitutes the maritime cultural landscape (Hunter, 1994:261; Ash, 2007:4; Ford, 2011:4). This landscape is understood in both physical and cognitive respects, with the latter denoting how the functional aspects of the landscape are mapped and imprinted in the human mind. The cognitive perception, argued as being the most ‘natural’ way of recording the maritime cultural landscape, may also be incorporated into the broader theme of landscape archaeology through the *place name landscape*. As the Northern Territory coastline was mapped by a number of colonial navigators over a period of 200 years prior to European settlement (Powell, 2010:1–41), the place name landscape, as discussed in more detail below, is an important factor for this research.

The maritime cultural landscape approach in historical archaeology

As a relatively recent theoretical framework, the maritime cultural landscape has been employed in a number of regional research projects. The most notable of these is the research undertaken in Northern Ireland at Strangford Lough (McErlean et al., 2002). This work was the result of an archaeological survey that focused on the coastal, intertidal and subtidal zones of Strangford

Lough with the aim of addressing the complete maritime cultural landscape of the region. In doing so, the historical development of Strangford Lough—dating from the Mesolithic to the post-Medieval period—was considered. In the absence of intrusive investigations, the archaeological survey was complemented with cartographic and historical documents to present a history of past settlement and economy in the region. The outcome was a detailed account that encompassed virtually every aspect of the maritime landscape ranging from the evolution of the lough through to the submerged landscape, coastal fish traps (stone and wood), fishing and shell middens, ports and towns, landing places, navigation and pilotage, shipwrecks, vernacular boats, and World War II sites, concluding with a discussion on the protection and management of the archaeological sites.

A handful of regional projects have also been undertaken in Australia and New Zealand, albeit on a much smaller scale. Kenderdine's regional analysis of shipwreck resources on the Murray River (1994, 1995b) and in and around Perth (1995a) provides a means of interpreting concealed shipwreck patterning in the historical and archaeological record. Duncan (2004:12) credited the research of Kenderdine in significantly shifting the design of regional studies in Australian maritime archaeology. Moving south towards the Gippsland coastline of Victoria, Duncan (2004) examined the distribution of shipwreck sites through the levels and perceptions of risk. From the analysis of shipwreck sites and historical documents, the active role of risk proved to be a significant factor in determining how this maritime cultural landscape was shaped. A similar theme applied to the research from Ash (2007:14) on the settler history and archaeology of the maritime community of Port Willunga, South Australia, between 1840 and 1920. In this research, the value of the maritime cultural landscape as a theoretical framework was assessed as a means of interpreting the historical development of the community.

Duncan (2006) built upon the use of the maritime cultural landscape as a methodology in Australian historical archaeology through his doctoral research on the maritime landscape of Queenscliffe, Victoria. This was achieved through an archaeological inquiry into the complex relationships that existed between mariners and other community members, and in doing so, defining how each group occupied and utilised both the water and the land. The Queenscliffe region was further developed as a maritime cultural landscape by Duncan and Gibbs (2015) through the exploration of the relationships between the community and the shipping mishaps that occurred within the coastal and inland water surrounds over the past 160 years.

In New Zealand, Carter (2012) applied the maritime cultural landscape approach to the boat-building township of Otago Harbour. This research aimed at investigating the interconnections between archaeological sites and maritime activities in the harbor and the wider maritime cultural landscapes they represent (Carter, 2012:14). This was achieved through the use of ecological,

historical and archaeological data, with themes such as navigation, abandoned watercraft and anthropogenic change representing an interdependent maritime cultural landscape that was present in the region at various points in time.

2.3 Thematic maritime studies

As with other maritime cultural landscape studies that follow a thematic approach (McErlean et al., 2002; Duncan and Gibbs, 2015), this research is approached in a way that allows for the analysis and interpretation of the four distinct historical phases that occurred over the course of around 200 years. These overlapping phases—early European survey of the Northern Territory coastline, the Macassan trepang industry, and the British garrisons and colonies that led to the permanent colonisation of Palmerston—are interpreted through the themes of adaptation to the physical environment, the shared landscape, and landscapes of movement. These themes, discussed further below, were born out of the overarching aim of identifying aspects of Northern Territory’s early historical development that demonstrate a cultural landscape of maritime communities linked with maritime Southeast Asia.

2.4 The Northern Territory as a maritime cultural landscape

The seas, foreshores, coastal margins and estuaries of the Northern Territory—and the material culture within them—represent discrete and overlapping maritime cultural landscapes of movement, exploitation and occupation that, through the collation of data and interpretation, can provide clues to the historical development of the region (Parker, 2001:22). Due to the broad scope of this research, an interpretive model based on the maritime cultural landscape approach is utilised to both moderate the diverse range of data and allow the interactions and associated networks of each maritime community to be put forward; providing an all-encompassing description of the range of activities which took place within the region (Parker, 2001:23) (Figure 2.1).

Specific to the maritime cultural landscape, categories for interpretive modelling proposed by Westerdahl (1992) are natural topography (physical environment); shipwrecks; land remains (archaeological attributes); traditions of usage; and place names (historical data, archaeological attributes and cultural landscape descriptors) (Evans and Keith, 2011:170). Each maritime community can be distinguished through its location choice for occupation or resource extraction, transport routes, transit points and place names. As the purpose of an interpretive model is to connect a singular or specific typology of archaeological site to the broader cultural landscape (Keith and Evans, 2011:185), site types will be categorised into specific maritime communities based on site location, diagnostic archaeological signatures and supporting historical and spatial

data. Through this lens, each historical development phase can be examined thematically in support of the objectives of this research.

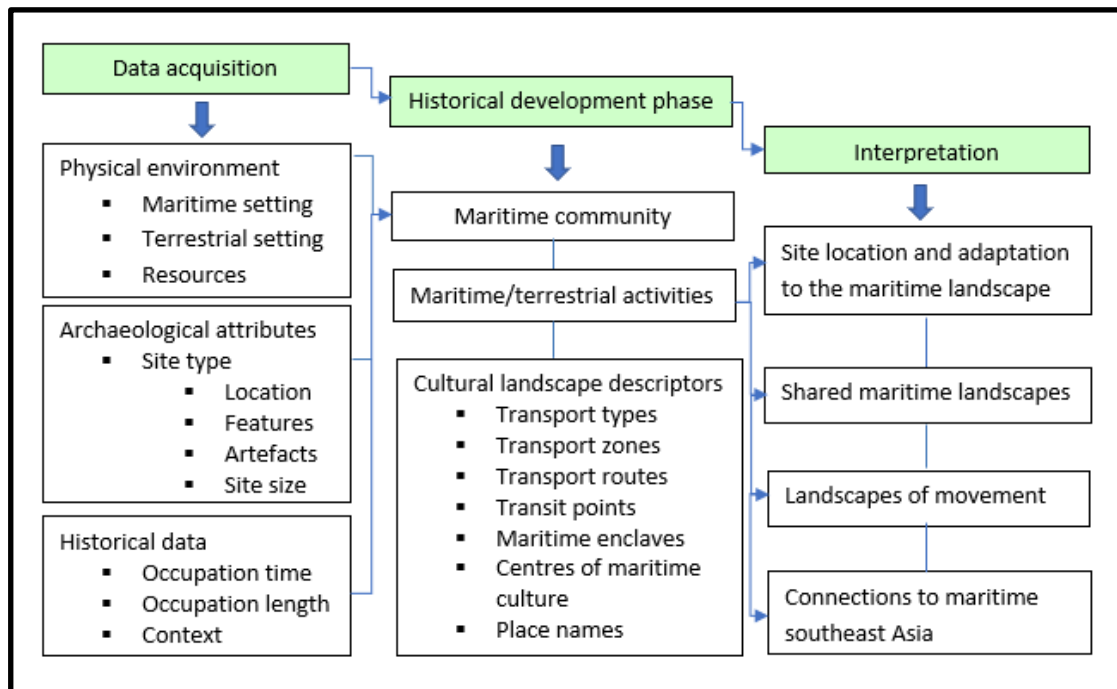


Figure 2.1 Interpretive model matrix

2.5 Data acquisition

The interpretive model matrix begins with data acquisition sources of the physical environment, archaeological attributes, historical data and cognitive attributes. The thematic layout of this research requires the use of different data source ratios for each historical development phase. Relevant also is the variation in outputs for past research from heritage listings to doctoral theses. The doctoral research by Jim Allen (1969) on the Victoria settlement, for example, provides a great deal more detail than that of the heritage report on Escape Cliffs (Gregory, 1998). A brief outline of each data source is provided below.

Physical environment covers the maritime and terrestrial settings in which each maritime community was placed or passed through. Discussed broadly in Chapter Three, the physical environment for the research area includes the Arafura and Timor seas, the open coast, bays, archipelagos, islands, estuaries, coastal and inland topography and resources.

Archaeological attributes covers the *site type*, which is based on the location, features, artefacts and size of a site. Site types are classified on the grouping of archaeological and environmental signatures that cover occupation sites and wrecking events. The primary source of archaeological data is from previous research including doctoral and masters theses, heritage reports, site

bibliographies/gazettes, journal articles, conference papers, and other reports. Information gained from these formats is highly variable, with the doctoral theses containing the most in-depth analysis, the heritage reports the least amount of information, and the papers and site bibliographies falling between the two.

Archaeological fieldwork (survey) complements previous research through an attempt to fill gaps along the coastline and estuaries not known to have been recorded previously. The purpose of these surveys was to locate and examine new archaeological sites and, more locally to Darwin, re-examine previously recorded sites within the context of the maritime cultural landscape. Sites surveyed were the Chinese fishing camp at the mouth of the Daly River, landing sites around the Bynoe Harbour tin mines and Indian Island, Maria Island depot, and potential Macassan sites on the northwest coastline of Maria Island. Sites revisited were Hang Gong's Landing, Leviathan tin mine, Southport Jetty and the Palmerston to Java subsea telegraph cables landing site. Aside from Hang Gong's Landing, little to no new archaeological material was located during these surveys. This was no doubt due to the ephemeral nature of the majority of these maritime activities, as well as the highly volatile landscape of the Northern Territory coastline, where sites can be destroyed, covered or exposed from one wet season to the next. Fieldwork also involved the recording of the physical environment, including the topography and flora, in which the particular maritime activities were placed.

Archaeological site coordinates from the 1960s onwards, especially those of the surveys of Macassan sites by Macknight (1969b) and Baker (1984), will be georeferenced into Geographic Information Systems (GIS) datasets (Wheatley and Gillings, 2002:17). Through GIS, site locations (and their related attributes) are transferred into a spatial format to enable the interpretation of site patterns within the broader maritime cultural landscapes. These will be interpreted within a larger pattern of cultural behaviours, with supporting historical data providing the means to place sites such as shipwreck events within the broader cultural landscape (Keith and Evans, 2011:186). As each archaeologist has their own methods for site recording, factors such as accuracy and environmental detail are taken into account. The GIS pilot study of Fredericksen, Horner and Devonport (2001:7) carried out on the Chinese mining sites at Pine Creek highlights the problematic nature of integrating spatial information of previously-recorded sites into a GIS database. Through this, it was acknowledged that, although not all information from previous records can be incorporated into a GIS database, they could be used to provide a platform for the development of an accurate georeferenced database (Fredericksen et al., 2001:10). The Northern Territory Heritage Branch has also attempted this with Macassan sites, with the inaccuracy of some site recordings leading to the creation of two sites that should be one (Wells and Bourke, 2012, pers. comm.).

Historical data includes journals, charts, government reports, contemporary newspaper articles, memoirs (including oral history transcripts), contemporary charts, maps, town plans, photographs, lithographs and paintings. Secondary sources complement the primary through broader historical depictions of the region. Textual references are utilised as a means of providing the initial narrative of each historical development phase, as well as a contextual basis for archaeological data. These were initially sourced from archaeological publications and regional histories by Powell (2009, 2010). Secondary sources assisted by providing an overview of Northern Territory history which, for the breadth of the research area, highlighted discrete maritime events such as destructive tropical cyclones that impacted on shipwrecks, that may have been missed otherwise. As with virtually all Australian histories, these documents are limited mainly to British and, later, white Australian male accounts. Primary sources include published accounts of British surveyors, garrison members and colonists; Government reports; accounts from customs officers; and contemporary newspaper articles.

Cartographic material such as charts and maps contemporary to the time of Dutch, French and British maritime and terrestrial survey represents the visual recording of the Northern Territory coastline and interior as they took shape on paper over the course of around 250 years. As spatial documents, they provide routes of significant voyages; bathymetric data including soundings, tides, marine hazards (reefs and sandbars); topographical information; and toponymy (place names). Here, visual perceptions of European surveyors are visible through the way in which the geographical data is both presented and omitted through the simplification—or elimination—of some aspects to demonstrate others more clearly (Ford, 2011:3), and in the place names given to the topographical and bathymetric features (Tent and Slatyer, 2009:5). Of the larger-scaled maps of maritime Southeast Asia, northern Australia is generally visible, indicating its geographic position on the region's southern periphery.

Photographs, lithographs and paintings provide a visual representation of both the physical landscape and cultural material/maritime events set within it. With the assistance of textual references, these contemporary documents—and later aerial and satellite imagery—offer the potential to locate archaeological sites based on the surrounding environment. With the landscape of the Top End being relatively inaccessible without significant prior planning and resourcing, aerial and satellite imagery act as a means of reconnaissance or as a primary means of site location identification.

Oral histories are derived primarily from previous archaeological research and transcripts. Macknight (1969b) and Baker (1984) account for the recollections of Traditional Owners and a Macassan trepanger that relate to the location and history of particular Macassan and non-Macassan trepang processing sites. The transcript recording of Ningle Haritos' (1979) memoirs

regarding the Chinese fishing industry from Anson Bay to Chamber Bay strengthen contemporary newspaper articles on this maritime activity despite the absence of archaeological material.

Cognitive attributes contribute to development of the cognitive landscape; being “the mapping and imprinting of the functional aspects of the surroundings in the human mind” (Westerdahl, 1992:5). For this research, cognitive attributes include place names, transport zones/routes, maritime enclaves and centres of maritime culture. These are drawn from the data sources discussed above.

2.6 Historical development phases

Data acquisition feeds directly into the *maritime communities* that fall within the four *historical development phases*: early European survey, the Macassan trepang industry, the British garrisons, and the British colonies. As an example, the maritime communities of the British garrisons include the individual garrisons of Fort Dundas, Fort Wellington and Victoria, as well as First Nations groups and the Macassan trepangers who interacted with the garrison members. These communities extend landscape analysis to the maritime realm and form an umbrella under which individual *maritime and terrestrial activities* such as coastal survey, trepang procurement, maritime defence, net-fishing, etc., are collated into a broader cultural context (Keith and Evans, 2011:186).

Cultural landscape descriptors derived from archaeological site locations, cartographic material, and other historical sources cover transport types, transport zones, transport routes, transit points, maritime enclaves, centres of maritime culture, and place names (Westerdahl, 1992). These descriptors offer a significant contribution to the interpretation of the Northern Territory’s maritime cultural landscape which is most evident in Chapter Nine, *Maritime landscapes of movement*.

Transport types are determined from wreck sites, historical data, and the transport zones they fall within. Transport types are indicative of the maritime community(s) and maritime activities undertaken. The Macassans, for example, sailed to the Top End, which they called Marege, in larger sea-going *perahu*, then procured trepang in shallow waters from dugout canoes. It is noted, however, that for many maritime communities within the Northern Territory, a shortage of appropriate maritime transport led to the use of other transport types. At Palmerston, Chinese sampans generally built for fishing were also utilised as lighters in Port Darwin prior to the construction of the jetty, and older coastal vessels were repurposed as floating quarantine stations.

Transport zones (*Zones of transport geography*) refers to the analysis of the structure of the maritime cultural landscape through the patterning of zonal distribution in transport terms (i.e., symbolised by a functional transport type) and stages of occupation (Westerdahl, 1992:11, 1994:267). These relate to a particular maritime culture(s), its physical environment of open sea, coastlines, bays, and estuaries, and its place within the region's historical development. An example of an estuary (or inland) zone at Palmerston is the Blackmore River as an access route to the transit point of Southport that led to the Pine Creek gold fields. Within these zones, **transport routes** can be determined from archaeological site locations, cartographic material, oral accounts, and historical documents. European navigators, for example, drew the route taken by the ship onto contemporary charts along with the sailing date.

Transit points are locations within the transport zone where a particular maritime group moved from one transport type to another based on the maritime setting. Historical accounts identify Maria Island in the Gulf of Carpentaria as a transit point for the shipment of equipment and workers from larger coastal vessels to smaller vessels that would continue up the Roper River for the construction of the Overland Telegraph Line.

Centres of maritime culture and **maritime enclaves** incorporate the continuity of site locations and transit points through grouping and classification. Central places may represent an entire region, such as the Macassan trepanging grounds of Marege, or a specific area such as the port of Kupang, Timor. The interpretation of centres of maritime culture takes into account the distances between centres and transit points, networks of main waterways and connecting road systems, and local traditions reflected through symbology and place names.

Place names (toponyms) represent the cognitive or immaterial category of a maritime cultural landscape, that Westerdahl (1992:6) argues is an essential component through providing insights into past cultural uses of an area (see also Tent and Slatyer, 2009:5; Duncan and Gibbs, 2015:31). Place names provide insights into contemporary values and belief systems of the time, along with political and social circumstances, and can be classified into groups that relate to physical environment descriptors, colonial or authority names, ship names, warning names, etc. Sources for place names include contemporary cartographic material and textual documents for European navigation and settlement, and oral accounts for First Nations and Macassan names. An important aspect of the place name landscape is its contribution to the maritime cultural landscape where archaeological sites have yet to be recorded. In the case of Chinese fishing after the settlement of Palmerston, Sampan Creek in Chambers Bay indicates one of the prominent fishing locations utilised by the Chinese. Textual and oral histories as well as photographs and images can usually confirm this.

2.7 Interpretation

Adaptation to the physical environment allows for the exploration of location choices made by each group and reflects their immediate requirements based on maritime and terrestrial activities undertaken. The Macassans, for instance, required numerous shallow sheltered bays for the seasonal economic activity of procuring trepang, and adjacent beaches/hinterland to process the trepang, covering an expansive stretch of coastline each season. The British garrisons, on the other hand, were required by order to occupy locations between Bathurst Island and the Cobourg Peninsula as the closest points to maritime Southeast Asia toward the fulfilment of the geopolitical motive of defending the north Australian coastline from Dutch or French occupation. The immediate physical environments of Fort Dundas and Victoria on elevated coastal lands deep within a strait/bay indicate the military nature of the settlement, with the comparatively open location of Fort Wellington showing attempts at contact with the Macassans.

Referring to the contact of different maritime cultures through economic, social and other factors (Westerdahl, 2011:333) *shared landscapes* continues the overarching and underlying theme of research prominent in northern Australia that celebrates culture contact between First Nations peoples and the Macassans. Also visible in past research are the negative impacts British occupation had on First Nations-Macassan relationships and on the Chinese indents who were initially imported in the thousands from Singapore and Hong Kong as cheap labour, only to be evicted a few decades later as Palmerston joined the southern colonies' ideals of becoming a White Australia.

As a sub-field of landscape archaeology, the *maritime landscape of movement* explores linear pathways within the seas, bays and rivers as an essential component of the Northern Territory's maritime cultural landscape; capturing the complex relationships between space, place, and movement that these features articulate (Snead et al., 2009:1). Through the descriptors put forward by Westerdahl (1992) of transport types, transport zones/routes, transit points, maritime enclaves and centres of maritime culture, the way in which groups moved through the maritime landscape is interpreted through archaeological site locations, charts and historical narratives. The outcome of this is the formation of distinct and overlapping patterns of movement over time that bind the objectives of each group to the historical development of the region, visible through the physical remains of occupation locations, maritime infrastructure, and wreck sites, set within distinctive physical environments, and the charts and historical narratives that show the transport routes, place names and overall perceptions of place.

Connections to maritime Southeast Asia are established for each historical development phase through the maritime and terrestrial activities undertaken by each maritime community and from

the influences of the shared maritime cultural landscape upon each community. For the short-term British settlements, the islands within maritime Southeast Asia were places where essential goods were acquired for the survival of the settlement. Subsequent attacks by pirates would influence the choice of islands selected for later settlements, as well as surveying voyages to assess islands where goods could potentially be obtained safely. By the time Palmerston was settled, travel routes to particular islands were established for both goods and as a means of communication with other colonies and with Britain. The settlement at Palmerston also led to the decline of the Macassan trepang industry, the most prominent link between maritime Southeast Asia and the Northern Territory for a period of over 200 years.

2.8 Conclusion

The described methodology will act as a means of best describing, analysing and interpreting the historical development of the Top End as a maritime cultural landscape up until 1911. Given the broad research area, the interpretive model will act as a guide for each of the historical development phases set out in the following four chapters, and their interpretation through the themes of adaptation to the maritime landscape, the shared landscape, and landscapes of movement.

Chapter 3 – The Physical environment

3.1 Introduction

The seas, coastlines and estuaries of the Northern Territory form the physical foundation on which this research is based. For tens of thousands of years, the maritime landscape has played a major role in First Nations peoples' lifeways (Mulvaney and Kamminga, 1999:273–7). Historically, it was the setting for Macassan visitation for over 200 years and the attempted and eventually successful occupation by the British from 1824 onwards (Macknight, 1969b; Powell, 2010). During the historical period, perceptions of the Northern Territory coastline were recorded by numerous mariners, with topographic and hydrographic features influencing how sailors navigated these waters, the places chosen for occupation, and the extraction of natural resources. This chapter provides a summary of the Northern Territory's geographic setting, climate and weather patterns, coastal morphology, and maritime and terrestrial environments that together constitute the physical environment of the region's maritime cultural landscape on which the historical development has built.

3.2 Geographic setting

The Top End of the Northern Territory is bordered west and east by Western Australia and Queensland and situated between the Equator and the Tropic of Capricorn (Figures 3.1 and 3.2). The nearest neighbours of the Northern Territory are islands within maritime Southeast Asia, beginning with Timor at a distance of 350 kilometres. In comparison, distances to southern Australian cities are 3,500 kilometres to Perth and 5,000 kilometres to Sydney. Located between 12° and 17°S latitude, the Northern Territory mainland coastline spans 5,437 kilometres with a total island length of 5,516 kilometres (Geoscience Australia, 2010). Of the 398 islands (Rankmore, 2005:3), a large proportion fall within four major archipelagoes; being the Crocodile, Wessel, English Company and Sir Edward Pellew groups. Melville Island and Bathurst Island (known together as the Tiwi Islands) are located 70 kilometres directly north of Darwin (Short, 2006:200), with Groote Eylandt located east of Arnhem Land in the Gulf of Carpentaria.



Figure 3.1 Research area: the Northern Territory within the context of maritime Southeast Asia. The yellow oval is approximate to show the general region (Google Earth, 2021).



Figure 3.2 Research area: Top End of the Northern Territory (Google Earth, 2021)

3.3 Climate and weather patterns

The climate of the Northern Territory's coastal region is tropical monsoonal with subtropical high and equatorial low-pressure systems (Short, 2006:7). Warm ocean currents flow westwards

through the Torres Strait into maritime Southeast Asia (Williams, 1991:13–4), bringing warmer maritime air, higher sea surface temperatures, higher rainfall and tropical cyclones. Known as the ‘dry season’ the subtropical high runs from April to November with temperatures ranging between 20 and 32 degrees Celsius, the southeasterly trade winds creating warm, dry and dusty winters (Williams, 1991:3). From December to March, the equatorial low moves south to the north Australian coastline, producing hot, wet summers known as the ‘wet season’. During these months, temperatures and humidity levels rise. The northwesterly monsoonal winds that dominate during this time of year meet with easterly trade winds, providing ideal conditions for the formation of tropical cyclones in the Indian Ocean, Arafura and Timor Seas, and the Gulf of Carpentaria (Short, 2006:8). The wet season is characterised by high rainfall and flooding, deriving from the northern monsoon and tropical cyclones and creating a highly seasonal hydrological regime typical of such an environment (Williams, 1991:3). Temperatures during the wet season range between 30 and 40 degrees Celsius with medium to high humidity.

The southeasterly and northwesterly winds that dominate this region at different times of the year were paramount considerations in the way vessels sailed around the north Australian coastline. As early as 1644, navigators were aware of the best season to sail these waters, as is evident in the instructions to the Dutch navigator Abel Janszoon Tasman to follow the southeast trade winds from June onwards (Powell, 2010:24).

3.4 Recent coastal morphology

The Northern Territory coastline is the product of the ever-continuing interaction of the wind, rain, waves and tides with the geological make-up of the land (Short, 2006:1). The end of the last Ice Age—around 15,000 to 12,000 BP—led to the continual warming of the world climate and to rising sea levels, shaping and shrinking the landmasses until sea levels stabilised around 6,500 BP (Mulvaney and Kamminga, 1999:103). From this point onwards, the Northern Territory’s coastal mainland and islands have been shaped by strong currents, high tides, and southeasterly winds during the dry season, and northwesterly winds and monsoonal weather (including cyclones) in the wet. The low-lying coastline of muds and silts created a habitat for the extensive mangrove swamps that developed on coastal plains, with swamps becoming buried beneath metres of alluvial clay from tidal rivers that filled in the coastal valleys, running water being a dynamic agent of landscape change (Haynes et al., 1991:3). The continual processes of weathering and erosion in the littoral zone (between land and sea) created a rather uniform, yet highly active, landmass, with each annual monsoon altering the coastline either slightly or dramatically depending on the severity of the wind, rain, wave and tidal actions.

3.5 Maritime environments

Bordering the Northern Territory to the northwest and north are the Timor and Arafura Seas respectively. Waves from these seas are mostly low, ranging between 0.1 and 1.5 metres and averaging 0.3 metres due to the lack of ocean swell, low wind velocity and limited fetch (Short, 2006:10–11). The generation of waves is therefore dependent upon the prevailing southeast trade winds, the summer northwest monsoonal winds and any accompanying sea breezes.

The tidal system of the northern Arafura Sea (Short, 2006:12) produces a tidal range that varies across the coast. For Darwin, mean spring tides range between 1.3 and 6.9 metres, with Port Essington being 0.5 to 2.6 metres. A large macro tidal estuary, Port Darwin has a maximum tidal range of 8 m, with a neap tide as low as three metres (Williams and Wolanski, 2003:3). The Northern Territory coastline experiences semi-diurnal tides (two high tides and two low tides per day). Tides for bays and inlets with an estuary are amplified due to the funneling of water into an enclosed area. Along the coasts, high tides cause major variations in the shoreline, with strong tidal currents accommodating the tidal flows in estuaries. The high tidal range produces currents that average peak speeds of between two and 2.5 metres per second, carrying muddy and sandy substrates from the sea floor within the bays and inlets, and creating turbid plumes that extend over wide areas (Williams and Wolanski, 2003:3).

Close to the coastline and exposed at low tide, rock outcrops extend out to the sea from many of the points and peninsulas. These are recorded as a hazard to mariners. Another hazard for shipping, coral reefs in the Northern Territory are characteristically fringe reefs that occur along most of the mainland and island coasts (Short, 2006:17). Reefs are also located in the western Gulf of Carpentaria including parts of Groote Eylandt and the Sir Edward Pellew Group. The physical impacts of these reefs are their effects as a barrier, with waves attenuated during low tide resulting in low energy beach systems, and as a source of coral and algal debris to the backing beaches. Throughout this thesis, rock outcrops and reefs exposed at low tide are recorded as ‘marine hazard areas’ in GIS topographic maps.

Bays and inlets are a dominant attribute of this region. At low tide and close to the coast, water depths range from less than one metre (Anson Bay) to over four metres (Cobourg Peninsula). Within the sheltered bays, subtidal seagrass meadows flourish, supporting a rich epibiota and stabilising nearshore sands. These meadows attract marine fauna such as dugong, green turtles and trepang (Marsh, 1988; Mitchell, 1994:22–5; Short, 2006:16). Connecting the water to land, wide, gently sloping tidal/mud flats are formed by an accumulation of fine sediments (Padovan, 2003:5). These flats are dissected by numerous tidal channels (creeks) and have very little catchment input during the dry season.

From the coast, 128 estuaries and deltas enter the landscape of the Top End. Tidal creeks dissect tidal flats, draining and filling the flats at low and high tides respectively (Figure 3.3). Sediment coming in with the tide becomes trapped in the mangroves that fringe the mud flats (Padovan, 2003:5) and saltflats/saltmarshes in the intertidal region of these flats (Figure 3.4). A primary example of tidal flats is at Anson Bay (Department of Natural Resources, Environment, The Arts and Sport, n.d.:26), which created the perfect environment for net-fishing during the decades around the turn of the twentieth century. Tidal flats are also a dominant feature of the Northern Territory's littoral zones (Padovan, 2003:5).



Figure 3.3 Tidal creek at Bynoe Harbour

Figure 3.4 Tidal/foreshore flats at Channel Point, Anson Bay

The low wave energy of northern Australia and the greater tidal range in this region mean most rivers are also tide-dominated, with a small amount being wave-dominated (Turner et al., 2004). Tidal estuaries are relatively long and narrow compared to the estuary entrance, resulting in strong tidal currents and high tidal ranges. The South Alligator River, for example, has a spring tidal range of five to six metres at the mouth, with tidal influence extending 105 kilometres up the channel (Woodroffe et al., 1989:737). Intertidal flats, mangroves and saltflats/saltmarshes are a feature along the margins and behind the estuary channel. Although sediment is both deposited and eroded in these areas (Williams and Wolanski, 2003:3), mangroves and saltmarshes trap sediment to allow for a slow growth in intertidal habitats. Long tidal sandbanks generally build up along the length of the river due to the tidal currents through the process of sediment deposition from the sea. Water is naturally turbid due to the tidal movement continually stirring up fine sediment particles in the estuary.

3.6 Terrestrial environments

From the 1838–39 surveys extending westward from the Cobourg Peninsula, British surveyor John Lort Stokes (1846a:407) writes of the Escape Cliffs region: “Indeed it will in general be

found, that in Australia, a change of formation is necessary to produce any of the scenery, which otherwise exhibits a most monotonous sameness.” Of Port Darwin, Stokes (1846b:8) again states: “There was nothing of interest to recall our memories to this first visit to a new part of Australia, save a very large ants nest, measuring twenty feet in height.” For the most part, this description is accurate in the physical sense, with much of Northern Territory’s coastline being low-lying, with comparatively few hills, mountain ranges, or cliff edges to draw the eye away from the apparently endless lines of beaches and mangroves.

The mainland coastline comprises 1,488 beaches (representing 38% of the Northern Territory coastline), with mangroves dominating 3,360 square kilometres of the sheltered coastal area of the Northern Territory (Short, 2006:1) (Figure 3.5). As an example, Port Darwin supports over 200 square kilometres of mangrove habitat (Padovan, 2003:5). The growth and extent of mangrove forests in this region are due to the warm tropical environment, low energy and low gradient sedimentary shorelines with extensive mud flats and intertidal sand, and high tidal range (Short, 2006:15). Behind the beaches and mangroves, escarpments form a small portion of the coastline that is dominated by low-lying lands (Figure 3.6).



Figure 3.5 Beach backed by hinterland at Cliff Head, Anson Bay



Figure 3.6 Escarpment at Cliff Head, Anson Bay

The coastline east of the Alligator Rivers region is backed by tropical woodland dominated by eucalypt trees and a wide variety of smaller shrubs and grasses (Williams, 1991:1–11). To the west, and throughout the Tiwi Islands, tropical woodland appears in segments. The western region appears to be dominated more by extended river and foreshore flats. Inland from the coast between Darwin and Central Arnhem Land, the gently undulating landscape is covered in tall, open forest of mostly *Eucalyptus tetrodonta* and *Eucalyptus miniata*, with an underlay of yellow dry season straw of the annual sorghums and spiky spear grass *Heteropogon contortus* (Williams, 1991:11).

Rainforests account for a small percentage of coastal vegetation. Patches of spring-fed coastal rainforest are located on the southern margins of Anson Bay above the cliff edges (Department of Natural Resources, Environment, The Arts and Sport, n.d.:27). Coastal wetlands, under which rainforests fall, include the three Gulf Coastal wetlands (303,890 ha), and 12 coastal wetlands throughout the Top End (978,900 ha) (Whitehead and Chatto, 2001:49).

The tamarind tree was introduced by the Macassans and it is generally indicative of Macassan visitation. Although not particularly invasive along the coastline it is now known that the seeds have spread naturally and its presence is not therefore a definitive indicator of Macassan origin.

3.7 Fauna

Of the extensive fauna that occupies the land and seas of the Northern Territory, the edible holothurians known as *bêche-de-mer*, sea cucumber, sea slug or trepang represent the most well-known maritime resource in the history of the region (Macknight, 1969b:1; O'Connor and Arrow, 2008:398; Clark and May, 2013b:1) (Figure 3.7). Found in sheltered shallow waters, trepang inhabit much of the region's bays and archipelagoes. Sought by the Macassans, and by others after the colonisation of Palmerston, these were supplemented with maritime and terrestrial resources collected by First Nations people for trade including pearl shell (also found in sheltered waters), turtle shell and sandalwood. No doubt consumed by all that entered Northern Territory waters, the extensively diverse range of fish species was sought after as a resource by the Chinese between Anson and Chambers Bays. Of the land animals that populate Melville Island, the Cobourg Peninsula, and much of the Top End, it is those that were introduced from the British garrisons that now wreak havoc on the native flora and fauna: buffalo, cattle, pig and Timorese pony (Calley, 1998).



Figure 3.7 Trepang at a Jakarta market, 2019

3.8 Conclusion

The geographic setting of the Northern Territory places it within the tropical climate zone with weather patterns dominated by the southeasterly winds of the dry season and the northwesterly monsoon of the wet. Coastal morphology, and maritime and terrestrial environments, constitute a physical environment of predominantly low-lying coastlines governed by the large tidal range of seas and estuaries, with the occasional cliff face intersecting mangrove-lined beaches and foreshore flats. This environment is home to maritime resources including trepang, pearl shell, turtle and numerous species of fish, and terrestrial resources such as sandalwood, gold and tin. These, coupled with the introduction of the tamarind tree, buffalo, cattle, pig and Timorese pony from maritime Southeast Asia, all are part of the historical development of the region.

Chapter 4 – Early European survey of northern Australia

4.1 Introduction

Early European survey of the north Australian coastline is directly related to the history of trade and the colonisation of maritime Southeast Asia, India and China, and set the foundations for British occupation of the Northern Territory. Despite the absence of archaeological remains left by the surveyors, their actions represent the beginnings of the Northern Territory's maritime cultural landscape for this research through the representation and perceptions of this region transcribed into the physical output of charts from 1623 to the mid-1800s.

This chapter provides a brief history of Dutch, French and British surveys of the coastline, accompanied by a selection of charts that show the development of European understanding of the Northern Territory coastline over time. Evident are the place names (toponymy) given to maritime and topographic features, mainly commemorating significant British people, and the complete absence of First Nations place names. Rock art depicting one of the survey ships at Djulirri, Arnhem Land, on the other hand, marks the European presence, providing a First Nations perspective of the region's evolving maritime cultural landscape.

4.2 Geopolitical setting

From the fifteenth century onwards, European maritime powers became interested in penetrating resource-rich regions such as maritime Southeast Asia (Forbes and Hercock, 2007:13). Stimuli for this included the control of supply routes from Asia to Europe by competing empires; the growing consciousness of nationhood; the desire to expand trading links; and the development of shipping, charts, and navigational instruments. Within less than a century, much of maritime Southeast Asia was colonised by the Portuguese, Dutch, and British (Cady, 1964), with the geopolitical map of the region remaining fluid throughout the colonial era.

4.3 Physical environment

Maritime setting: In sailing from their home ports to record the Australian coastline, the maritime settings for the surveyors ranged from open seas to bays and (for the British) estuaries. These have been discussed in detail in the previous chapter. For the role of coastal survey, environmental factors affecting voyages were seasonal wind directions, and closer to shore, marine hazards included islands, reefs, coral outcrops, shoals and whirlpools, with the ships having to navigate these obstacles through strong tidal flows (King, 1828:61 in Powell, 2010:61).

The importance of recording marine hazards in the seas linking northern Australia to Timor and maritime Southeast Asia for the purpose of future trade is evident in the orders given to Flinders (1814:10): “in the hope that by ascertaining the depth and nature of soundings thereon, great advantage may arise to the East-India Company’s ships, in case that passage should hereafter be frequented by them” (Figure 4.1).

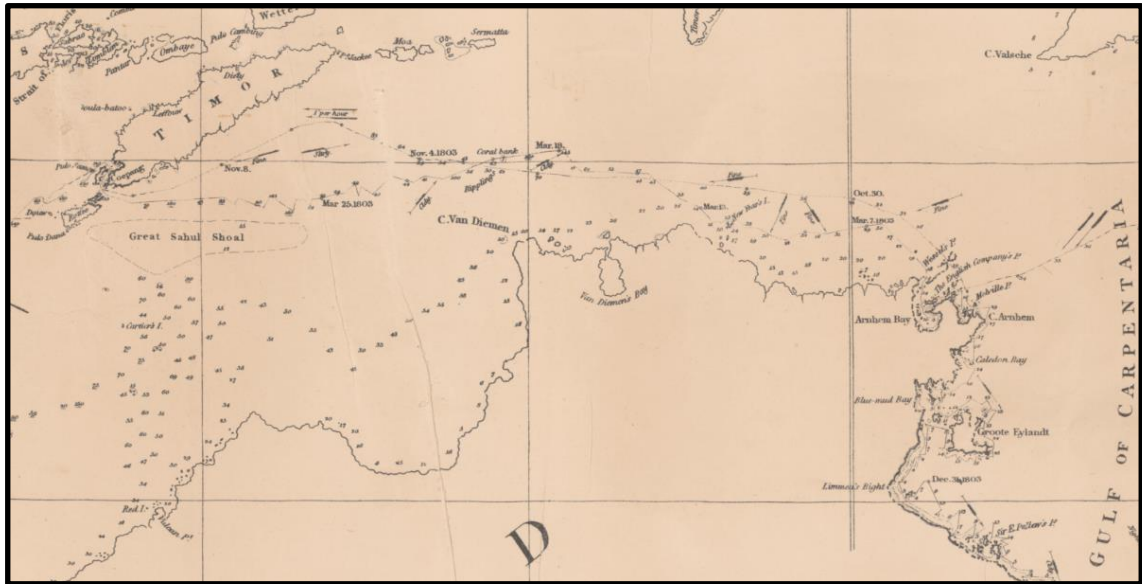


Figure 4.1 [Section of] *General chart of Terra Australis or Australia showing the parts explored between 1798 and 1803* showing survey of the Great Sahul Shoal between north Australia and Timor (Flinders and G & W Nicol, 1814)

Terrestrial setting: The northern coastline is described by King as mainly low, being backed by mangrove swamps or desert and stone (King, 1828:61 in Powell, 2010:61). In 1623, Dutch navigator Jan Carstensz describes the coastline from Cape Grey to the Wessel Islands as “an arid poor tract...low and monotonous without mountain or hill...There is little fresh water...no points or inlets except some bays which are...not sheltered against wind and the sea...all along with muddy or sandy bottoms, with many...salt rivers” (see Powell, 2010:18). The watercolours produced by King of the coastline capture this sense of monotony from a European perception of the region (Figures 4.2 and 4.3).



Figure 4.2 View of Inner Harbour, Port Essington (North Coast) taken from Spear Point, watercolour (King, 1818)



Figure 4.3 Apsley Strait, watercolour (King, 1818)

4.4 Dutch surveyors

The Dutch are recognised as the first Europeans to have made an impact through mapping and naming sections of what they referred to as the New Holland coastline (Powell, 2010:10) (Figure 4.4). This is not surprising given their dominant position in maritime Southeast Asia as coloniser and merchant after overruling the Portuguese in 1602 (Forbes and Hercock, 2007:14). Surveys including of the Northern Territory coastline were undertaken for maritime safety and possible commercial interest over a 40-year period by their Java-based sea-trading company *Vereegde Oost-Indische Compagnie* (VOC, or Dutch East India Company).



Figure 4.4 Chart of the Malay Archipelago and the Dutch discoveries in Australia; the discoveries after 1618 added between 1628 and 1632 (Gerritsz and Heeres, 1618).

Charts of the western coast of Australia were essential for the Dutch sailors to avoid shipwreck while in transit between the southern tip of Africa and the Dutch colonies within maritime Southeast Asia. Ships sailing along this transport route would at times sail too far east, as testified

by the shipwrecks along the West Australian coastline: the *Batavia* (1629), *Vergulde Draeck* (1656), *Zuytdorp* (1712) and *Zeewyck* (1727) (Gerritsen, 2002; Tent and Slatyer, 2009:8). Surveys and sightings by Hartog (1616), van Hillegom and Dirkszoon (1618), Jacobszoon and Jansz (1618) and Houtman (1619, 1622) contributed to the expanding European knowledge of the western and southern coastlines of Australia (Powell, 2010:13–4).

Dutch interest in the northern coast was in resources and faster shipping routes, and these rather than shipping hazards were the impetus for surveying the region (Powell, 2010:23). The first Dutch vessel to enter Northern Territory waters was the yacht *Arnhem* under the command of Willem van Colster in 1623 (Powell, 2010:17). Departing from a surveying voyage with the *Pera* (captained by Carstensz) in the Gulf of Carpentaria due to leakage and rotten rigging, van Colster encountered present day Arnhem Land after *Arnhem* strayed to the west while en route to the Banda Islands in what is now Indonesia. A 1690 copy of the chart created by van Colster marks Cape Grey or Groote Eylandt as the place the *Arnhem* made landfall, prior to continuing northwards to Cape Arnhem and through the Cumberland Strait and Wessel Islands to Banda Island in the eastern archipelago (Powell, 2010:18) (Figure 4.5).

In exploring the northern coastline under the orders of the governor-general of the East Indies, Anthony van Diemen, the yachts *Klyn Amsterdam* and *Wezel* under the command of Pieter Pieterszoon sighted the shores between the Arnhem coastline near Dundas Strait and Melville Island in 1636, naming the region Van Diemen's Land (Powell, 2010:21–2). Dundas Strait was overlooked, with Melville Island thought by Pieterszoon to be part of the mainland.

As part of a larger expedition, Abel Jansz Tasman extended knowledge of the Northern Territory coastline in the yachts *Limmen* (120 tons) and *Zeemeuw* (100 tons) and the galiot *Braek* in 1644 (Tasman et al., 1965:116; Powell, 2010:24; Hordern, 2002:89) (Figures 4.6 and 4.7). The aim of the voyage was “to complete the discovery of Arnhem's and Van Diemen's Lands; and to ascertain perfectly, whether these lands are not one and the same island” (Flinders, 1814:xii). The sailing track of Tasman follows the Northern Territory coastline west from the Gulf of Carpentaria, missing the Wellesley and Pellew islands, between the mainland and what he named Groote Eylandt, and continuing west at a distance that blurred the line between the islands and the continent (Powell, 2010:24–5). As with Pieterszoon, Tasman did not distinguish the Tiwi Islands from the mainland, demonstrated by his naming of present-day Van Diemen Gulf, Van Diemen Bay. In turning south and remaining at a distance from the shore, Tasman missed Darwin Harbour en route to Anson Bay before continuing on to the southwest to the Kimberley.



Figure 4.6 [Australia and New Zealand]: from the original map made under the direction of Abel Tasman in 1644 and now in the Mitchell Library, Sydney (Tasman and Emery, 1947 and Public Library of New South Wales and ST Leigh & Co., 1946)

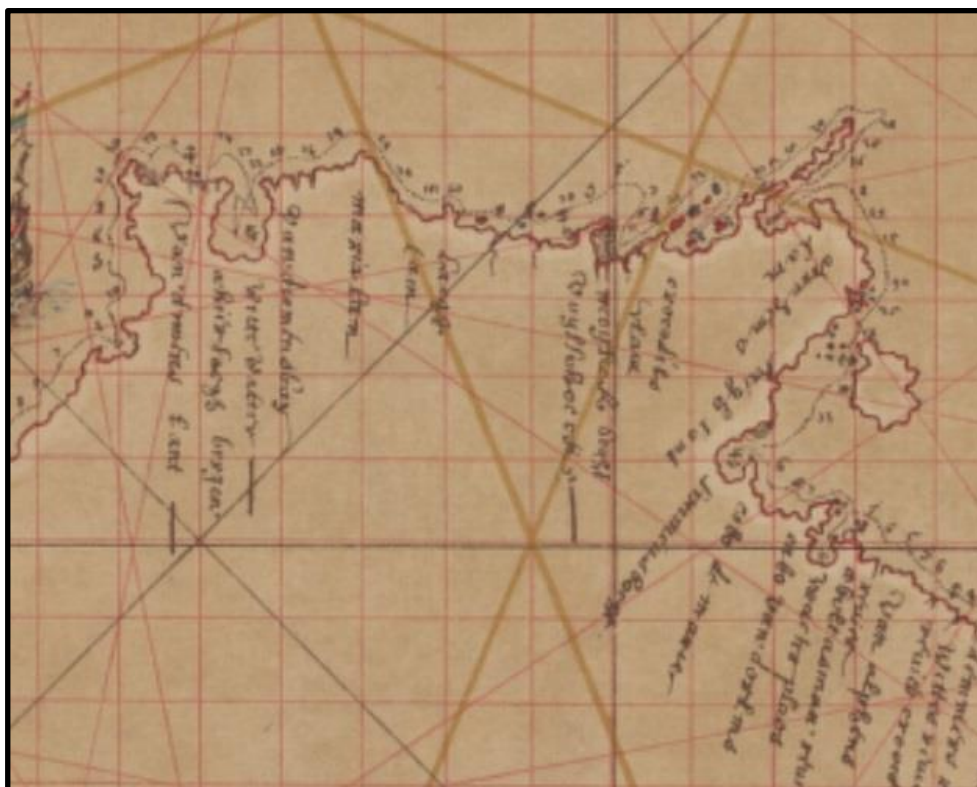


Figure 4.7 [Section of] [Australia and New Zealand]: from the original map made under the direction of Abel Tasman in 1644 and now in the Mitchell Library, Sydney showing Tasman's transport route and place names (Tasman and Emery, 1947 and Public Library of New South Wales and ST Leigh & Co., 1946)

The last explorative voyage of northern Australia by the Dutch in 1705 sought a possible north-south river from Van Diemen Bay (Powell, 2010:28). The *Vossenbosch*, *Nova Hollandia* and *Waijer* under Commander Martin van Delft were sent from Timor, recording little of what was already known from previous voyages (Flinders, 1814:xiv). After the death of Anthony van Diemen in 1645, further exploration of the region discontinued (Powell, 2010:25–6). By this time, the Dutch had surveyed, albeit not incredibly accurately, much of the Northern Territory (and Australian) coastline. Coupled with their monopoly on the spice trade in the Maluku Islands, also known as the Moluccas, since the 1600s and Makassar becoming the port of choice for opposition traders, this likely influenced future visitation by the Macassan trepangers to Marege (Macknight; 1969b:12; Powell, 2010:30). Dutch charts were essential for British and French navigation over a century into the future.

4.5 French surveyors

Nicolas Baudin and Louis de Freycinet

After the British colonisation of New South Wales in what became named both New Holland and Terra Australis (see figure 4.9), French interest in the continent saw the scientific voyages of Nicolas Baudin and Louis de Freycinet explore the south and northwest coasts of Australia between 1800 and 1803 in the schooner *Casuarina* (30 tons) purchased from Port Jackson, the corvette *Geographe* (350 tons) and the *Naturalist* (Hordern, 2002:1) (Figure 4.8). Ordered to record the inhabitants, animals and natural products of the region, the surveys of Baudin and Freycinet were of ground previously covered by the Dutch (Powell, 2010:46). After stopping at Timor for respite and supplies, the survey of the western extent of the Northern Territory saw the naming of Barthelemy Island (later to be recognised as a mountain on the mainland), the Peron Islands, Cape Helvetius and Cape Fourcroy on Bathurst Island. At this point, the survey ended, cut short due to much of the crew being struck down by sexually transmitted diseases, dysentery and malaria acquired in Timor.

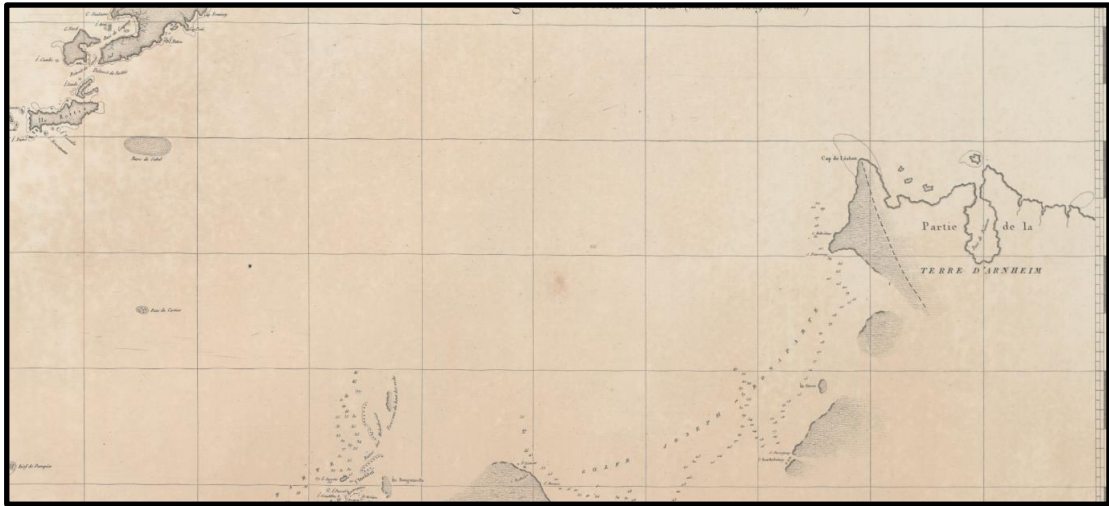


Figure 4.8 [Section of] *Carte generale de la Terre de Witt (a la Nouvelle Hollande)* (Freycinet, 1812)

Jules Dumont d'Urville

Scientific explorations of Australia by Jules Dumont d'Urville reached the northern coastlines in 1839 (Powell, 2009:44). Although not adding to the charts, his visits to the abandoned British garrison of Fort Wellington and Victoria would have confirmed the British belief in the strategic need to occupy the north to stave off the French.

4.6 British surveyors

With an interest to colonise the whole of the continent, British intentions to explore, survey, and settle other parts of Terra Australis and New Holland became a priority as French interest in the region grew (Hordern, 2002:1). Charting safe sea passages between the British colonies and Britain, and the search for a desirable estuary leading to an inland sea, were the primary goals of the British Admiralty. From 1801 through to 1842, three prominent surveying voyages by Matthew Flinders (1801–03), Phillip Parker King (1817–21) and John Wickham and John Lort Stokes (1837–43) gave shape to the mainland and islands of the Northern Territory on paper.

Matthew Flinders

Between 1801 and 1803, Matthew Flinders was commissioned to circumnavigate the continent in the sloop HMS *Investigator* (334 tons) (Flinders, 1814:iii; Hordern, 2002:2). At this time, the colony of New South Wales represented a small portion of eastern Australia, with the land lying westward of the meridian line (longitude 135° easting) passing through Arnhem Land to the north known as New Holland (Flinders, 1814:ii) (Figure 4.9). In his preface, Flinders (1814:i–xxix)

outlines the history of past Dutch and British navigators, recognising their contribution through the integration of their charts into his own.



Figure 4.9 *Hollandia Nova detecta 1644; Terre Australe decouverte l'an 1644* (Thévenot, 1644)

Orders from the *Commissioners for executing the office of Lord High Admiral of the United Kingdom of Great Britain and Ireland*, &c outline the transport route to be followed and the environmental and cultural details to be noted (Flinders, 1814:8–9). These include a potential route to an inland sea; the prevailing winds and weather at different seasons of the year; the productions and comparative fertility of the soil; the manners and customs of the inhabitants; the true positions both in latitude and longitude of remarkable headlands, bays and harbours by astronomical observations; the direction and course of the tides and currents as well as the perpendicular height of the tides; the survey of rivers and examination of the country as far inland as possible; and noting anything useful to the commercial interests or manufacturers of Britain. Specific to the Northern Territory, instructions also included searching for “valuable harbours”, especially within the present-day Northern Territory region, and “those parts of the coast most likely to be fallen in with by British East-India ships in their outward-bound passages” (Flinders, 1814:9–10) (Figure 4.10).

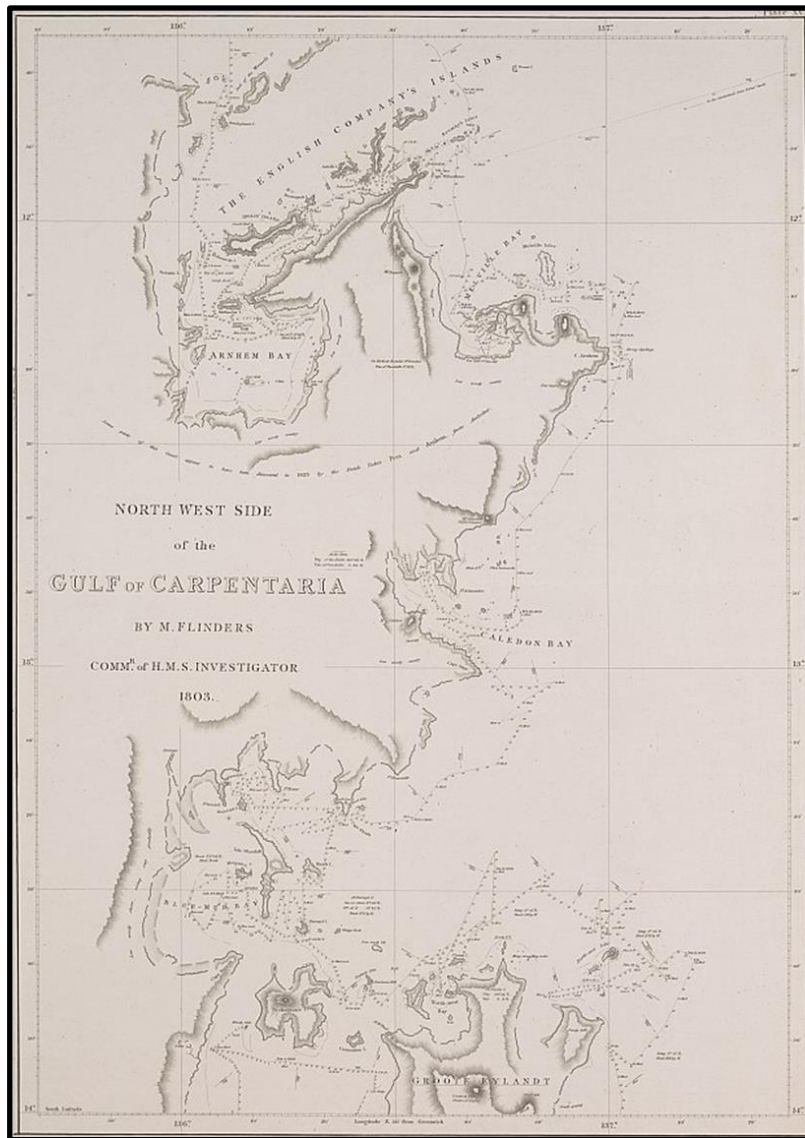


Figure 4.10 *North west side of the Gulf of Carpentaria* (Flinders, 1814)

As with his descriptions of the southern and eastern coasts, Flinders' observations of northern Australia and its inhabitants were recorded in a scientific manner resonant of the time. In one account in which a First Nations man from Blue Mud Bay was murdered in an altercation, science was the reasoning behind retrieving his body from the sea: "the painter being desirous of it to make a drawing and the naturalist and surgeon for anatomical purposes" (Flinders, 1814:197). Directly after discussing the death of the First Nations man, Flinders reported on another deceased man from the expedition. "The body of Thomas Morgan who died so unfortunately, was this day committed to the deep with the usual ceremony; and the island was named after him, Morgan's Island" (Flinders, 1814:198). Although Flinders went straight into the physical description of Morgan's Island with no further mention of his death, the sharp contrast between the scientific investigation of a First Nations man and the compassion shown to his fellow shipmate indicates the professional nature that Flinders intended on portraying to his peers and the wider audience

these volumes would attract, as well as being consistent with contemporary European attitudes towards the Indigenous peoples they encountered on their voyages.

Significant to Flinders' voyage were the first British recordings of Macassan trepangers (Figures 4.11 and 4.12). The first sightings of a canoe and a small monument were from the Sir Edward Pellew Group of islands in December 1802 (Flinders, 1814:172–3). Also found were earthen jar fragments, axe marks in trees, bamboo latticing remnants, Chinese-style hat remnants, blue cotton trousers, a wooden anchor with a single fluke, and three boat rudders made of violet wood (*Peltogyne*). Stone lines indicative of the processing of trepang (although not recognised as such by Flinders) were also located, along with the clearing of wood in the vicinity. Although aware of a constant foreign presence henceforth along the coastline, Flinders' (1814:183) predictions of Chinese visitation for nutmeg were abandoned when he met with a Macassan fleet at what he later named the Malay Road. The following extract provides information on this meeting, methods of communication used between the two groups, the trepang industry, and Macassan maritime culture:

“Under the nearest island was perceived a canoe full of men; and in a sort of roadsted, at the south end of the same island, there were six vessels covered over like hulks, as if laid up for the bad season. Our conjectures were various as to who those people could be, and what their business here; but we had little doubt of their being the same, whose traces had been found so abundantly in the Gulph. I had inclined to the opinion that these traces had been left by Chinese, and the report of the natives in Caledon Bay that they had fire arms, strengthened the supposition; and combining this with the appearance of the vessels, I set them down for piratical Ladrões who secreted themselves here from pursuit, and issued out as the season permitted, or prey invited them. Impressed with this idea, we tacked to work up for the road; and our pendant and ensign being hoisted, each of them hung out a small white flag. On approaching, I sent lieutenant Flinders in an armed boat, to learn who they were; and soon afterward we came to an anchor in 12 fathoms, within musket shot; having a spring on the cable, and all hands to quarters. Every motion in the whale boat, and in the vessel along-side which she was lying, was closely watched with our glasses, but all seemed to pass quietly; and on the return of lieutenant Flinders, we learned that they were prows from Macassar, and the six Malay commanders shortly afterwards came on board in a canoe. It happened fortunately that my cook was a Malay, and through his means I was able to communicate with them. The chief of the six prows was a short, elderly man, named *Pobassoo*; he said there were upon the coast, in different divisions, sixty prows, and that *Salloo* was the commander in chief. These people were

Mahometans, and on looking into the launch, expressed great horror to see hogs there; nevertheless they had no objection to port wine, and even requested a bottle to carry away with them at sunset...

[Flinders boarded Pobassoo's boat the following morning with the interpreter] to make further inquiries; and afterwards the six chiefs came to the *Investigator*, and several canoes were along-side for the purpose of barter. Before noon, five other prows steered into the road from the S.W., anchoring near the former six; and we had more people about the ship than I chose to admit on board, for each of them wore a short dagger or cress by his side...

According to Pobassoo, from whom my information was principally obtained, sixty prows belonging to the Rajah of Boni, and carrying one thousand men, had left Macassar with the north-west monsoon, two months before, upon an expedition to this coast; and the fleet was then lying in different places to the westward, five or six together, *Pobassoo's* division being the foremost...

[Prows approx. 25 tons with approx. 25 men in each. *Pobassoo* carried two small brass guns from the Dutch, others had muskets and every Malay man wears a dagger or cress.]

They get the *trepang* by diving, in from 3 to 8 fathoms water; and where it is abundant, a man will bring up eight or ten at a time. The mode of preserving it is this: the animal is split down one side, boiled, and pressed with a weight of stones; then stretched open by slips of bamboo, dried in the sun, and afterwards in smoke, when it is fit to be put away in bags, but requires frequent exposure to the sun. A thousand trepang make a *picol*, of about 125 Dutch pounds; and one hundred picols are a cargo for a prow. It is carried to Timor... seemed to be meant Timor-laoet; for when I inquired concerning the English, Dutch, and Portuguese there, Pobassoo knew nothing of them: he had heard of Coepang, a Dutch settlement, but said it was upon another island...

Pobassoo had made six or seven voyages from Macassar to this coast, within the preceding twenty years, and he was one of the first who came; but had never seen any ship here before... One of their prows had been lost the year before, and much inquiry was made concerning the pieces of wreck we had seen; and a canoe's rudder being produced, it was recognised as having belonged to her. They sometimes had skirmishes with the native inhabitants of the coast; Pobassoo himself had been formerly speared in the knee, and a man had been slightly wounded since their arrival in this road: they cautioned us much to beware of the natives.

They had no knowledge of European settlement in this country... nor had they ever met with cocoa nuts, bananas, or other edible fruits or vegetables; fish, and

sometimes turtle, being all they procured. I inquired if they knew of any rivers or openings leading far inland, if they made charts of what they saw, or used any charts? To all which Pobassoo answered in the negative. There was a river at Timor, into which the ship could go; and he informed me of two turtle islands, one of them not far to the north-west of our situation in the road ...

I could find no other nautical instruments amongst them than a very small pocket compass, apparently of Dutch manufacture; by this their course is directed at sea, without the aid of any chart or astronomical observation. They carry a month's water, in joints of bamboo; and their food is rice, cocoa nuts, and dried fish, with a few fowls for the chiefs ...

My numberless questions were answered patiently, and with apparent sincerity; Pobassoo even stopped one day longer at my desire, than he had intended, for the north-west monsoon, he said, would not blow quite a month longer, and he was rather late. I rewarded his trouble and that of his companions with several presents, principally iron tools, which they seemed anxious to possess; and he begged of me an English jack, which he afterwards carried at the head of his squadron. He also expressed a desire for a letter, to show to any other ship he might meet; and I accordingly wrote him a note to captain Baudin, whom it seemed probable he might encounter in the Gulph, either going or returning." (Flinders, 1814: 228–33)

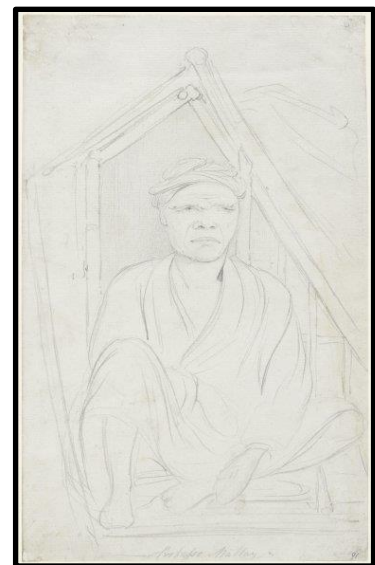
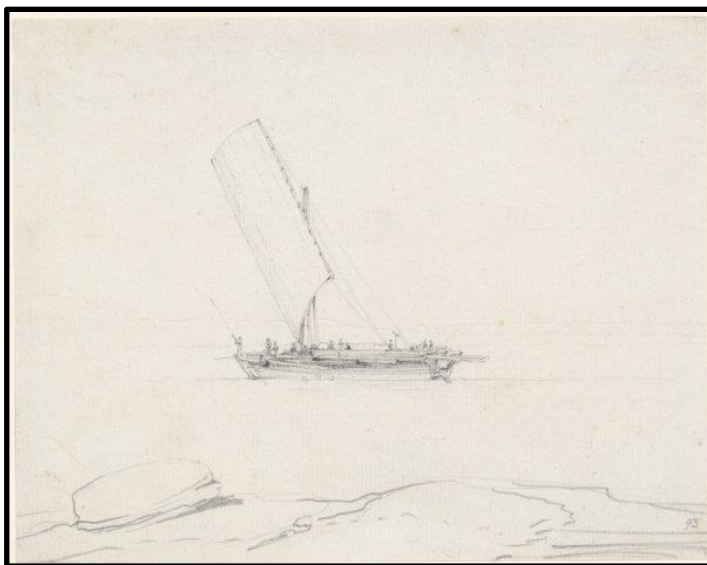


Figure 4.11 *The English Company's Islands, Malay proa*, pencil (Westall, 1803)

Figure 4.12 *The English Company's Islands, Pabassoo, a Malay chief*, pencil (Westall, 1803)

The meeting between Flinders and Pobassoo inspired Flinders to name the stretch of water within the English Company's Islands Malay Road and an island to the southwest Pobassoo's Island (Flinders, 1814:233). It was at this point, due to the bad health and fatigue of the crew and the

ship, that the survey ended (Flinders, 1814: 248). Flinders then sailed to the Dutch outpost of Timor for provisions, charting this island also. The close proximity of Timor to the Northern Territory saw its continued use as a source of provisions for the British up to and beyond 1911.

Philip Parker King

Between December 1817 and December 1821, Philip Parker King made three voyages in the cutter HMS *Mermaid* (84 tons) and brig HMS *Bathurst* (170 tons) to complete the survey of the west and north coasts of Australia (Carment et al., 2008:320; Hordern, 2002:68; Powell, 2010:60). Spurred on by French navigation of the region, Admiralty instructions were similar to that of Flinders, with specific instructions to survey what was previously recorded as Van Diemen Bay and explore the possibility that it may lead to an extensive river and inland sea (Hordern, 2002:19–20, 118).

Commencing at Point Braithwaite (Hordern, 2002:94), King surveyed and named North and South Goulburn Islands, Malay Bay, Croker Island, Bowen Strait, Raffles Bay, Port Essington, Trepan Bay and Cape Don (Powell, 2010:63–4). Of Raffles Bay, King reported fertile soil, yet located only two temporal streams along the mangrove-lined shore (Hordern, 2002:110). Two bays to the east, Port Essington was considered by King to be a superior harbour, with its close proximity to the Malaccas and New Guinea, and its location between India and Port Jackson, as an inevitable future place of great trade. Along the coast of the inner bay, a large shell midden, quartz-tipped spear and paperbark canoe were recorded along with skeletal remains found under a tree (Hordern, 2002:112). The botanist, Cunningham, brought the remains aboard the *Mermaid* to inspect, afterwards tossing them over the side of the ship. With the continuation of the survey west, King renamed the ‘bay’ Van Diemen Gulf, yet overlooked Beagle Gulf and Port Darwin (Powell, 2010:65–6). After surveying Melville and Bathurst Islands and the Apsley Strait separating the two (Powell, 2010:65–6), King turned south, naming Clarence Strait and the Vernon Islands prior to sailing to Timor for supplies and returning to Sydney (Powell, 2010:66).

The second northern voyage by King included the survey of the Liverpool River, followed by the coastal region of greater Darwin, passing and commenting on what is now Casuarina Beach and Charles Point, naming only the outer part of Bynoe Harbour Paterson Bay before heading west down to the Peron Islands and the Cambridge Gulf of Western Australia (Powell, 2010:67) (Figure 4.13).

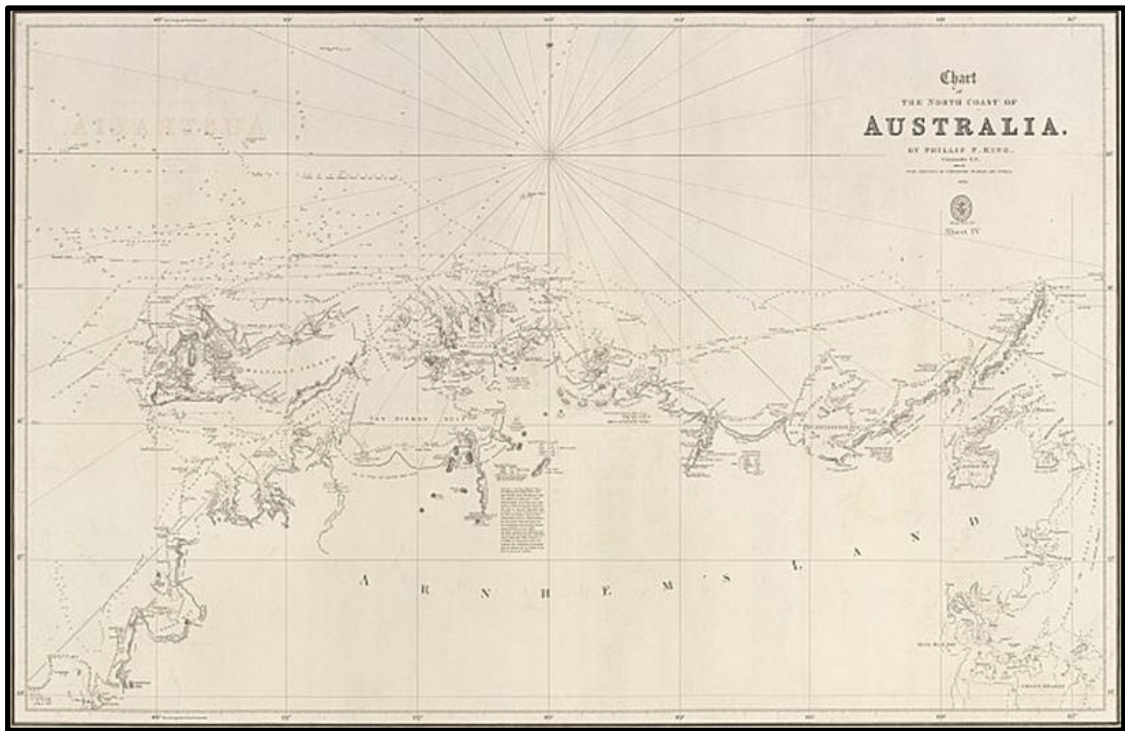


Figure 4.13 *Chart of the North Coast of Australia. Sheet IV* (Great Britain. Hydrographic Dept., 1839)

John Clements Wickham and John Lort Stokes

By the 1830s, the British had occupied two garrisons at Melville Island and Raffles Bay, yet had not completed a survey of the region. As assistant surveyor to Captain John Clements Wickham on the brig HMS *Beagle* (235 tons), John Lort Stokes was part of the company whose objective it was “to explore and survey such portions of the Australian coasts, as were wholly or in part unknown to Captains Flinders and King” (Stokes, 1846a:1). Extensive rivers opening a route into the interior of Australia were also still sought, along with rivers that had the potential to support colonies close to British East Indian territories. Harbours were a priority for the Admiralty as a place for retreat (Stokes, 1846a:15).

From 1839—coinciding with the initial occupation of Victoria at Port Essington, which the *Beagle* visited numerous times—Wickham and Stokes surveyed the coastline west from Port Essington. Recording the Adelaide River south of Cape Hotham, Fitzmaurice and the Master’s Mate came ashore at what was to be named Escape Cliffs after escaping potential spearing by First Nations men from the cliffs above by dancing their way from the beach and onto the boat as a means of distraction (Powell, 2010:90). Returning to Port Essington and then on to Timor for supplies, the *Beagle* recommenced surveying Van Diemen Gulf, naming and exploring Hope Inlet and Shoal Bay, Port Darwin, Bynoe Harbour and the Victoria River (Powell, 2010:91–3) (Figure 4.14 [as additions to King’s chart]).

faith. Thank Heaven, with many a doubt as to the time that must elapse ere that glad day shall come, I can look onward with confidence to a period—I trust not far remote,—when throughout the length and breadth of Australia, Christian civilization shall attest that the claims upon England’s benevolence have been nobly acknowledged!” (Stokes, 1846a:62–3)

Of the First Nations peoples of northern Australia, Stokes (1846a:394) comments on the physical aspects of Macassan influence in the use of Malay-style canoes and the Malay language adopted in the Port Essington region, compared to the lack of a Malay influence at Port Darwin and Shoal Bay (Stokes, 1846b:22). By the 1840s, the British understandings of First Nations-Macassan relationships developed further through the garrisons of Fort Wellington and Victoria; with British garrison connections to maritime Southeast Asia only beginning to expand through the contemporary surveys of the eastern archipelago by Captain Owen Stanley (Figure 4.15).

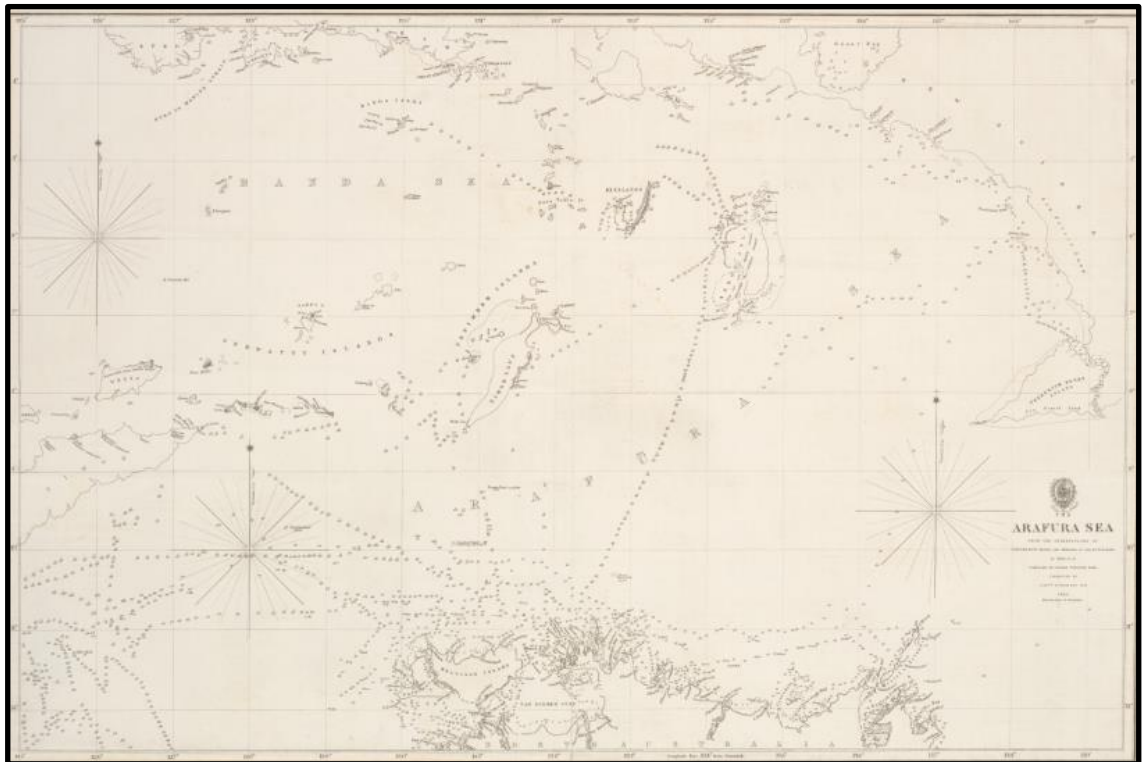


Figure 4.15 *The Arafura Sea* surveyed by Captain Owen Stanley in 1838 (Great Britain. Hydrographic Department et al., 1843)

Owen Stanley

In publishing Stanley’s journal as part of his own, Stokes (1846a) highlights the importance of the geographic relationship of the eastern archipelago to Victoria. Here, Stanley provides a detailed description of the islands, their people and commodities, as well as the presence of Dutch colonisers and British traders. That survey—and place naming—is generally considered the

precursor to colonisation (Battersby, 2007:7; Tent and Slatyer, 2009:9). Stanley's chart, and more so those of Flinders, King, and Wickham and Stokes, provide the backdrop to the increasing presence of the British in the region. Of particular interest are the descriptions Stanley wrote of the islands he visited, the people who had visited them for trade, and the means of communication between the British and the islanders. An example of the latter occurred at Timor Laut (Tanimbar Islands, Indonesia), where two large Macassan *perahu* were anchored, and where "a little thin shrivelled old man came scrambling over the taffrail" (Stokes, 1846a:440). The Macassan man presented Stanley with papers that included "several envelopes, two pieces of lead pencil, part of the leaf of a Norie's Navigation Tables, and some scraps of paper". Part of this collection was a rough journal detailing the wrecking of the Charles Eaton and the journey the survivors made to Timor Laut, Amboyna (Ambon, Indonesia), and Batavia (Jakarta, Indonesia). With the assistance of a Malay dictionary, this form of maritime communication between different cultures was quite common (Stokes, 1846a:454).

Other islands visited by Stanley were the Aru, Kai and Banda Islands of present-day Indonesia. At the trading centre of the Aru Islands (Stokes, 1846a:458), the HMS *Britomart* (237 tons) was piloted through the Dobbo harbour by a man who spoke good English (Stokes, 1846a:462). The Ki Islands were renowned at the time for their high-quality timbers for boat-building, pottery and as a place to obtain provisions (Stokes, 1846a:465–6). Stanley purchased four of the smallest boats from here for Port Essington. The availability of quality timber also saw it as place where the Macassans could haul up and repair their *perahu* while their crews erected houses, similar to those of Aru, for the purpose of carrying out their trade (Stokes, 1846a:469–74).

4.7 Place names

As a significant component of the early European charts, toponyms tell the story of the Dutch, French and British experiences and perceptions as the charted coastline took shape (Westerdahl, 1992:6). For the surveyors, naming newly-surveyed coastlines went part and parcel with possession (Tent and Slatyer, 2009:9). From 1623 to 1644, the Dutch names included Arnhem Land, Groote Eylandt, the Crocodile Islands, Limmen's Bight and Maria Island. As is visible on the 1644 chart created by Thévenot (Figure 4.16), Van Diemen's Land and Van Diemen Bay were incorrectly recorded as part of the Tiwi Islands; these were rechristened Van Diemen Gulf by King in 1818 as his survey better defined the mainland and island coastlines. Underlined in *Chart of the North Coast of Australia* by King (1856) are the place names of Cape Van Diemen and Cape Fourcroy given to the northwest coastline by the Dutch and French respectively, confirming their presence and status within the landscape (Hordern, 2002:132) (Figure 4.17).



Figure 4.16 [Section of] *Hollandia Nova detecta 1644; Terre Australe decouuerte l'an 1644* showing Dutch place names (Thévenot, 1644)



Figure 4.17 [Section of] *Chart of the North Coast of Australia. Sheet IV* showing Dutch and French place names underlined (Great Britain. Hydrographic Dept, 1839)

In using Dutch charts to navigate the coast in 1802, Flinders noted that “...the great alteration produced in the geography of these parts by our survey, gives authority to apply a name which, without prejudice to the original one, should mark the nation by which the survey was made...”, thereby replacing Dutch names relating to what they thought the mainland with British names for what were later recognised as islands. As with the Dutch, British place names commemorated much of the British Admiralty, distinctive topographic features, and events that occurred during the survey voyages; the naming of the Malay Road and Pobassoo’s Island by Flinders marking their initial meeting and confirming their place of the Macassans within the maritime landscape.

In keeping with the notion of Terra Nullius, this process did not recognise First Nations toponymy.

King was the most prolific in place naming, the toponymy including members of the British Admiralty and the Crown, public servants of the British Empire, personal friends, sea lords, buccaneers and battles (Hordern, 2002:68). Among the few event names, King's avoidance of the Macassan fleets at Malay Bay and Trepang Bay were acknowledged. As Hordern (2002:120) fittingly writes on the naming of the Cobourg Peninsula after His Royal Highness Prince Leopold of Saxe Cobourg, "[t]hus, at the stroke of his pen, every mud flat, mangrove tree and rock in the Aboriginals' ancient territory of about a thousand square miles became 'honoured' through association in the young naval lieutenant's mind with a nineteenth century German prince." Possibly as a response to this, Captain Francis Beaufort, Hydrographer of the Navy from 1829 to 1855 (Powell, 2010:84), issued a ruling to surveyors that:

"Experience has shown that the love of giving new and generally unmeaning names tends to confuse our geographical knowledge. The name stamped on a place by the first discoverer should be held sacred by the common consent of all nations, and in really new discoveries it would be really more beneficial to make the name convey some idea of the sense of the place, or some allusion to the inhabitants, or still better to adopt the native appellation, than to exhaust the catalogue of public characters and private friends." (Friendly, 1977:252 in Hordern, 2002:110)

Stokes' toponymy continued in line with Flinders and King in naming places after significant British people, the most notable being Port Darwin after the naturalist Charles Darwin. Also continued was the complete absence of First Nations toponymy that had gone before and existed alongside, with only a few place names such as Escape Cliffs (Adam Bay), Point Pearce, Treachery Bay, and Providence Hill (Victoria River) indicating negative interactions between the two groups (Stokes, 1846a:415; Stokes 1846b:112).

4.8 First Nations archaeology

To date, no archaeological material has been recorded from the Dutch, French or British surveyors. First Nations responses to these voyages, however, may be visible at rock art sites at Mount Wellington and the Arnhem Plateau that provide a maritime history of the region, also including paintings of Macassan *perahu* (Chaloupka, 1979:92; Taçon et al., 2010; Taçon, 2012). At Djulirri, Arnhem Land, a rendering of a European three-masted ship has been dated to the late 1700s or early 1800s, with a later addition of funnel and billowing smoke morphing it into a steamship (Taçon, 2012:28) (Figure 4.18). Taçon et al. (2010:4) note the detailed rigging of the

ship, yet its lack of sails, suggesting it may be anchored off the coast. Complementing this is the watercolour painted by King of a Macassan fleet anchored at Sims Island with the Wellington Range visible in the background (Figure 4.19), and King's chart showing the transport routes and anchorages of the *Mermaid* and *Bathurst* around Sims and Goulburn islands (Figure 4.20). In this sense, two perspectives—one looking out to sea, and the other to land—provide an intertwining of histories that mark this maritime cultural landscape (noting that the rock art does not necessarily depict the *Mermaid* or *Bathurst* and may in fact be the *SS Australian* or *SS Brisbane* from the British colonial historical phase).



Figure 4.18 European three-masted ship dated to the late 1700s or early 1800s, Djulirri, Arnhem Land (Taçon, 2012:28; Taçon et al., 2010:4)

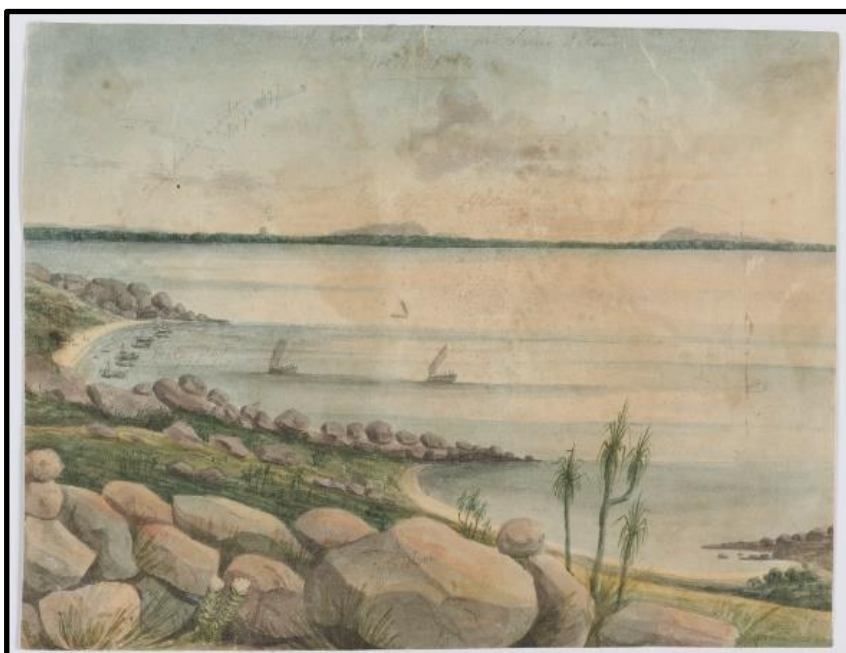


Figure 4.19 View of Wellington [Range?] from Sims Island, watercolour (King, 1818)



Figure 4.20 Approximate location of Djulirri in the Wellington Range, Arnhem Land, and Sims Island directly to the north ([Section of] Great Britain. Hydrographic Dept, 1839)

4.9 Discussion

Despite the current absence of archaeological evidence of early European surveyors in this region, Dutch, French and British charts and accompanying journals act as visual narratives of the gradual recording of coastlines, topographic and maritime features, as well as the evolution of transport routes and place names that reshaped this landscape. Through these means, charts represent the first phase in the Northern Territory's historical development while crossing over into the second and third through interactions with the Macassans and British garrisons.

The plethora of place names given to the islands, bays, straits and topographic features of mostly significant British—and some Dutch and French—individuals create one part of a maritime cultural landscape of the beginnings of the British presence in the Northern Territory. British interactions with the Macassans saw the naming of bays, and a strait and island in their honour, contrasting sharply with the blinding absence of First Nations place names on these charts, being accorded an inferior status in British narratives of a Terra Nullius. Rock art depicting a survey ship at Djulirri, Arnhem Land, however, incorporates the European presence into an inclusive First Nations maritime cultural landscape that, as with the charts, evolves over time.

Chapter 5 – Macassan trepang industry

5.1 Introduction

In navigating the northern coast of Terra Australis in 1803, Flinders recorded the presence of a ‘Malay’ fleet of fishermen who had sailed from Makassar in modern-day Indonesia to procure trepang for the Chinese market (Flinders, 1814:228). The Macassan trepang industry of Marege (Arnhem Land and Gulf coastlines of the Northern Territory) operated for no less than 125 years, developing complex and long-lasting relationships with First Nations peoples that continue to the present day. The arrival of the British through survey, garrison and colony fed British desires to trade with the eastern archipelago through the Macassans. The combination of local duties, Dutch taxes and an increasing rise in Australian nationalism, however, saw to the demise of the industry by 1907. Not long after, ethnographers began recording the presence of Macassan visitors through First Nations stories and material culture, with Macknight’s (1969b) doctoral research on the extant archaeology of the Macassan trepang industry highlighting its vast geographic and temporal range. Continued multidisciplinary research, including a recent focus on rock art, has increased our understanding of First Nations peoples’ connections with maritime Southeast Asia.

This chapter first provides a summary of the history of the Macassan trepang industry, followed by ethnographic and archaeological research carried out from 1921 to the present and the subsequent remapping of site locations derived from this. A description of fieldwork (survey) conducted in 2013 at Maria Island in the Gulf of Carpentaria is then put forward, followed by a description of the Macassan archaeological site there and its physical environment. Through this, and the culmination of gazetting of over 190 sites by Macknight (1969b), Baker (1984) and Cole (1973, 1984), these are separated into definitive and tentative sites; with definite site locations discussed further. As a significant component of the Macassan trepang industry, associated First Nations archaeology, rock art and photographs from Makassar bring this chapter to a close.

5.2 Geopolitical setting

The Macassan trepang industry emerged from the growth in Chinese trepang consumption beginning in the sixteenth century (Aduri, 2015:183) coupled with the longstanding Chinese presence in maritime Southeast Asia (Bowring, 2020:100). Chinese people had been trading with the western region of maritime Southeast Asia from the fifth century CE (Macknight, 1969b:8), settling through much of the region prior to the arrival of the European colonisers, and creating a network of trade across the archipelago with goods being shipped back to mainland China (Cady, 1964:163). By the twelfth century, examples of trade between the eastern archipelago and the

various kingdoms in the western archipelago and further afield are visible in the literature of India, China and Europe (Macknight, 1969b:9).

The impetus for the trepang industry in northern Australia began in the early 1600s when Dutch colonists obtained an exclusive monopoly of the spice trade in the Maluku Islands (Macknight, 1969b:12). This led to Makassar, South Celebes (South Sulawesi), being the port of choice for opposition traders to the Dutch. As the Bugis and Makassarese played a major role in maritime activities throughout the archipelago, their influence encouraged the visitation and settlement of Malay, Chinese, Portuguese, English and other traders from the region. In 1669, the Dutch took control of Makassar with the allied help of the Bugis states (Macknight, 1969b:14). This led to the prohibition of British calicoes in Makassar and the discouragement of trade with the British colony of Singapore, enabling the Bugis to compete successfully in the eastern archipelago trade (Macknight, 1969b:20).

With a substantial part of the Bugis-Makassarese population working in the maritime industry through ship-building, voyaging, trade, etc., the Marege ('wild country') trepang industry was one part of an extensive maritime network that connected the Australian mainland to the islands within the archipelago and beyond (Macknight, 1969b:16). Macknight divides this network into three loose categories. The first two categories cover the long-distance carrying trade between east and west maritime Southeast Asia, followed by the distribution of trade goods throughout the eastern archipelago and the corresponding centralisation of products for sale (Macknight, 1969b:17).

The third category of trade that included the trepang industry of Marege covers the "collection of goods by the crews of the vessels involved" with no exchange occurring between the collectors and the local inhabitants put forward by Macknight (1969b:19). Rather, trade occurred alongside, with First Nations peoples receiving canoes, sails, hooks, fishing lines, beads, metals, tobacco, rice and alcohol in exchange for pearl shell, pearls, minerals, sandalwood and turtle shell (O'Connor and Arrow, 2008:399; Clark and May, 2013b:2). Marege trepang was a valued commodity, attributed to its "first rate" status compared to that of the eastern archipelago (Stokes, 1846a:464; Macknight, 1969b:20).

5.3 Historical background

As noted by Matthew Flinders, the Bugis and Macassans began trepanging in northern Australia from the 1750s onwards after moving progressively south from the Aru Islands and Rote in the eastern archipelago, to the Ashmore Reef, Scott Reef, Seringapatam Reef and Cartier Island north of Western Australia's Kimberley coastline, then finally to Kayu Jawa and Marege (Reid,

2013:47). Upon the establishment of the industry in northern Australia, Macassan fishermen sailed annually from the port of Makassar to either Kayu Jawa or Marege to procure trepang for the Chinese market (Macknight, 1969b:1; Morwood and Hobbs 1997; O'Connor and Arrow, 2008:398; Clark and May, 2013b:1). Popularised by Berndt and Berndt (1947), Thomson (1949b) and Macknight (1969a), the term 'Macassan' refers to the numerous maritime communities that formed these crews, being mostly Makassarese men, yet also Bugis from directly to the north of Makassar (Bisht and Bankoti, 2004:407) and men from islands across the archipelago including Java, Ceram, Aru, Roti, Sumba, Timor and New Guinea (Macknight, 1972: 283; Baker, 1984:6; O'Connor and Arrow, 2008:398).

The perahu

Fleets for the Marege trepang industry averaged from 30 to 60 perahus annually, each holding a crew of about 30 men (Macknight, 1972:283; Baker, 1984:6). Also spelled prau and prahu, these wooden sailing vessels with their distinctive tripod mast ranged in size from between nine and 38 registered tons (NTTG, 25 February 1888:3; Macknight, 1969b:47) (Figure 5.1). In Marege, these were mostly *perahu padewakang* (trading perahu), the *palari* (smaller 'racer' with a poop deck), and *padjala* (a low, undecked perahu without a poop or bowsprit) (Macknight, 1969b:43-48). The terms *bonding* (short and wide) and *lambere* (long and narrow) noted in shipping lists add to the variance of perahu shapes. Other smaller perahus including Badju and Bugis vessels from Sumbawa and the eastern archipelago also sailed to Marege for trade or through being blown off course. Dugout canoes (*lepa-lepa*) were used in lightering from ship to shore and extracting trepang in shallow waters (Macknight, 1969b:85). Macknight provides a detailed description of these vessel types through several historical accounts, with rock art and stone pictures providing a First Nations record (Chaloupka, 1979; Clarke, 1994; Clarke and Frederick, 2006; Taçon et al., 2010; May et al., 2012; Taçon, 2012; May et al., 2013).

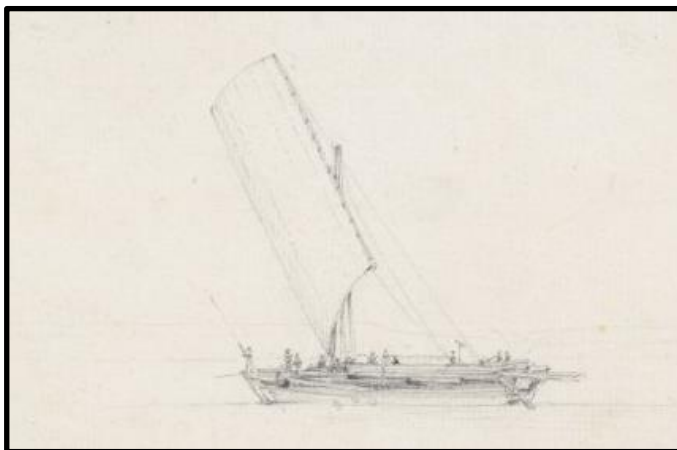


Figure 5.1 *The English Company's Islands, Malay proa*, pencil (Westall, 1803)

The voyage to Marege

The transport routes and timing of the trepanging season were based primarily on seasonal winds. Around December the northwesterly winds were utilised to sail from the port of Makassar to Marege and then east along the coastline into the Gulf of Carpentaria. Around March, the southeasterlies signaled the Macassans to turn around and work the coastline in a westerly direction prior to returning to Makassar. An account of the journey from Makassar to Marege by the Macassan fisherman Daeng Sarro was recorded by the Dutch scholar Cense (1952 in Macknight 1969a:180–5), best described by Macknight (1969b:59–61):

“From Macassar [the route] lay around the southwest corner of Celebes, down past the island Salajar and then southeast towards Timor and the islands fronting it ... dugout fishing canoes were often obtained from the island of Tanahdjampea, which was passed on the way ... The usual route to the Northern Territory passed around the northeast end of Timor, where the praus sometimes called to fill up with fresh water ... or to collect from the neighbouring island of Kisar, a supply of bamboo and rattan ... It was very important before setting out on the next long stage across the open sea to ensure that the northwest monsoon was blowing constantly ... several praus ... passed through between Leti and Moa, presumably having just left Kisar, as late as the end of February ... crossing from Timor to Melville Island. Given no unusual circumstances, the most frequent landfall was somewhere along the north coast of Melville Island or the Cobourg Peninsula. From here the praus turned eastward with the wind still well behind them.”

This journey of over 1,600 kilometres took 10 to 15 days (Macknight, 1969b:65; Blair and Hall, 2013:213) (Figure 5.2). Another more easterly route may have been via the Aru Islands and then south to the Wessel Islands, although information supporting this route is less certain (Macknight, 1969b:65).

Upon reaching the Cobourg Peninsula, perahus sailed east with the winds to the trepanging grounds (Macknight, 1969b:61). Trepang processing sites were set up for a period of a few days or weeks on a sandy beach or hinterland close to the trepanging grounds. (Blair and Hall, 2013:213) (Figure 5.3). Upon setting up their trypots, smokehouses and living quarters, work would commence in collecting trepang from the shallow waters (O'Connor and Arrow, 2008:398). Once caught, the trepang was boiled in large pots supported by stone bays, smoked dry in bamboo and rattan smokehouses, then stored dry on ship. Being a more substantial structure, the stone bays were left in-situ for following seasons, with smokehouse frames and other equipment restowed for the next trepang processing site.

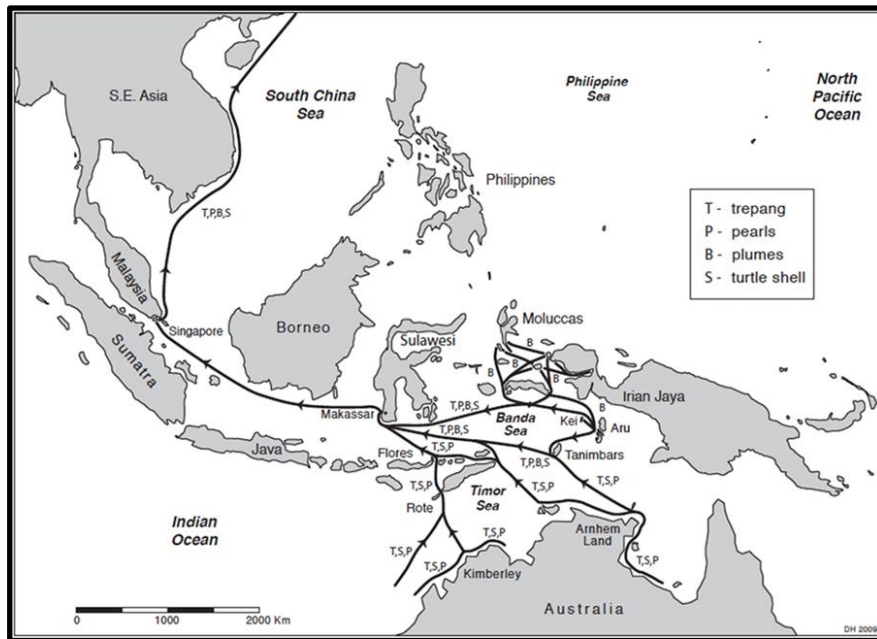


Figure 5.2 Macassan trade routes (Clark, 2011:3)

Over time, the fleet separated across eastern Arnhem Land, Groote Eylandt and to the southern extent of the Gulf of Carpentaria. The geographic range and route taken by each perahu varied annually dependent on the desired trepanging ground sought by each captain, environmental factors such as the timing of the seasonal winds and weather conditions, and cultural factors such as relationships with First Nations peoples and, later, the British garrisons and colonies. When the southeasterly winds began around April, the perahus began their return journey, continuing to work along the Marege coastline prior to returning to Makassar where the cured trepang was sold on to China.

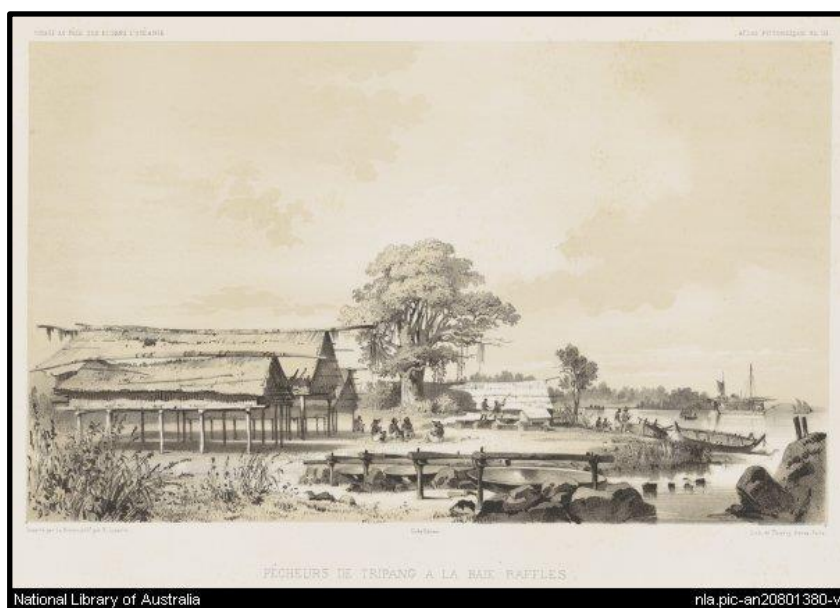


Figure 5.3 *Pêcheurs de tripang a la Baie Raffles*, lithograph, (Lassalle, and Le Breton, 1846. National Library of Australia)

Place names

As is evidenced in Macknight's gazetteer (1969b:110–198), Macassan place names were given to much of the Northern Territory maritime and terrestrial features the Macassans sailed through and extracted resources from. These included islands, bays, capes and rivers and were recorded from First Nations peoples, the Macassan fisherman Daeng Sarro, and contemporary British surveyors, garrison members and customs officers. Beginning at Melville Island and extending through to the Gulf, examples include Lemba Kusissili (Sandfly Bay), Lemba Muttiaraja (Pearl Bay) for Port Essington, Anggarisi' Toaja (Old Englishmen) for Raffles Bay, Limba Raja and Lemba Sialloa (One Day Bay) for Malay Bay, Liukang Kangkonga (Spinach Island) for Grant Island, Lembana Panrea (Bay of the Smiths) for Melville Bay, and Guru Le'leng (Black Guru) and Batjo' Oni (Boys) for sites on Bickerton Island. In contrast with the European surveyors, Macassan toponymy is representative more so of the physical environment, its resources, and of First Nations and British inhabitants.

First Nations-Macassan relationships

The annual visitation of Macassans to Marege led to the development of strong relationships with First Nations groups along the coastline. These relationships, based on economic and social ties (Clark and May, 2013b:2), varied considerably, as each First Nations group was unique in its response to Macassan visitation within its boundaries (Baker, 1984:7). The Yolŋu of northeast Arnhem Land, for example, were known to travel and work aboard Macassan perahus as far east as the Gulf of Carpentaria, with dozens of men—and some women—travelling to Makassar and beyond (Macknight, 1972:286; O'Connor and Arrow, 2008:399). Although most returned home, some settled abroad with new families (Clark and May, 2013b:2). These relationships are discussed further below.

Interactions with the British garrisons

Upon the arrival of the British at Raffles Bay in 1827, the strategy to trade with the eastern archipelago through the Macassans saw Commandant Smyth encourage the Macassans to set up their trepang processing site close to the garrison (Gregory, 1996:5). The following year, Commandant Barker assured them they could settle at Raffles Bay. When the Macassans arrived in 1829, however, the garrison had been disbanded. A decade later, the efforts of Barker were recalled by the navigator John Lort Stokes (1846a:400), who commented that “His enticing the people of Macassar to come and locate there, was another instance of his foresight, which would have led in time to very favourable results.”

At the third garrison of Victoria (1838–49) at Port Essington, Stokes (1846a:388) described the arrival of over six perahus, with the Macassans gaining permission to erect structures for curing trepang under the protection of the British flag. In the early years of the garrison, Stokes (1846a:389) shared the continued British sentiments of the time that “...a very large population of Malays, and even Chinese would speedily collect at Port Essington: but from some defect in the colonial regulations their immigration was for a time checked. At length, however, a remedy has been applied, and facility given for the introduction of settlers from the Indian Archipelago and the Celestial Empire.” Under the consecutive commands of Gordon Bremer and John MacArthur, the Macassans were treated “with a kindness and consideration” by all at the garrison (Earl, 1846a:59). On returning each year, the Macassans brought rice, sugar, poultry and textiles for sale or trade, with rice becoming a staple in both British and First Nations diets (Earl, 1846a:66–7).

The potential for the growth of trade with the Macassans was followed in the south as contemporary newspaper articles expressed colonial interest in Victoria becoming a trading entrepot where British manufactured goods could be sold (South Australian Register, 31 August 1839:5; The Sydney Herald, 29 April 1840:2; The Australian, 15 April 1841:3; The Sydney Morning Herald, 8 September, 1843). By 1844, however, Dutch control of trade in Makassar became apparent through enormous duties taxed on British goods purchased by the Macassans to the point of prohibition (The Sydney Morning Herald, 10 May 1844:4; Launceston Examiner, 5 November 1845:5). At this point, Macassan trade items were described as consisting mainly of rice and the occasional fowl and coconut, with the initial prospect of Macassan settlement all but gone (South Australian Gazette and Colonial Register, 26 December 1846).

British colonisation and the end of the Macassan trepang industry

Despite its distance from the trepanging grounds, the colony of Palmerston (1869 to present) reignited the prospect of trade. In 1873, government resident Captain Douglas came into contact with four perahus of about 100 men sailing under the Dutch flag at Trepang Bay, reporting on their good nature and of their promise to visit Port Darwin the following season (Evening Journal, 7 April 1873:2; The South Australian Advertiser, 16 July 1873:3). Upon speaking with the captains in their own language, Douglas encouraged the Macassans to visit Port Darwin as “...he thought they might dispose of their merchandise there, and obtain stores as advantageously as by going all the way back to Macassar”. When, as with Victoria, a trading relationship could not be established, the notion of taxation instead was born:

“There is no doubt when the commercial value of these fisheries on the North Coast become properly known some regulations will be brought into force, whereby licenses will have to be taken out at Port Darwin instead of in the Dutch

settlements...The trepang in the Java market is worth £200 per ton, so that South Australia should surely receive some recompense for having her coast stripped of so valuable an article of commerce.” (The South Australian Advertiser, 16 July 1873:3)

Within less than a year, local trepanging was being encouraged, to be conducted in an economical way similar to that of the Macassans (NTTG, 27 February 1874:2). It was recommended that First Nations people and, if possible, men from the Aru Islands be employed as labour, and that once cured, the trepang sold at Singapore. In incorporating trepanging with other ventures such as pearling and buffalo shooting, British Australians worked disparately across the coastal region, employing ‘Malays’ and First Nations men and women as advised (NTTG, 24 July 1874:2; The Express and Telegraph, 7 August 1875:2).

In 1882, the South Australian Government published the requirement of annual licenses for both vessels and perahus to fish for trepang in Northern Territory waters under *Act 28 of 1882* (Eccles, 1882:1). This was enforced upon the Macassans by the newly appointed sub-collector of customs, Alfred Searcy, who travelled to Port Essington, Croker Island and Mount Norris Bay to inform the Macassans “that next year they must obtain a license for fishing, and pay duty on the articles which they bring for barter with the natives.” (South Australian Register, 7 July 1883:4) Negative commentary on the Macassans was published soon after, with the acting government resident, McMinn (1884:6), stating that First Nations contact with the Macassans led to their decline in health through alcohol, smallpox “and other filthy contagious diseases”, recommending their protection.

In 1905, Searcy reported to the comptroller of customs in Sydney that the “Malays and the worst class of the whites had introduced disease among the natives, and as things now are, with a decreasing number of proas coming to our coasts to fish, together with the increased cost of collecting dues, and the apparent bona fide attempts by local people to develop the industry...it would be advisable to prohibit proas once and for all, thus giving the local men a chance to carry on the industry.” (The Sydney Morning Herald, 7 April 1905:6). The continued taxing of the Macassans thus resulted in the decline and eventual termination of the Macassan trepang industry in 1907.

5.4 Previous archaeological research

Fourteen years after the last Macassan perahu departed Marege, ethnographers began researching First Nations peoples in Arnhem Land and surrounding islands and their relationships with the Macassans. In 1921–22, Norman Tindale (1926) learnt from the Anindilyakwa peoples of Groote

Eylandt of their contact with the ‘Malays’ (Macknight, 2013:23). Here, Tindale documented several graves with grave-posts at Agbenamanja, Winchelsea Island (Macknight and Thorne, 1968:221), along with tamarind trees and anchorage sites (Warner, 1932:479). From 1927 to 1929, American anthropologist William Lloyd Warner (1932) focused his research on Yolŋu-Macassan relationships in northeastern Arnhem Land. At Milingimbi Island, Warner (1932:488) excavated two large shell middens that had compacted around a tamarind tree next to a waterhole referred to as Macassar Well, with no physical evidence of Macassan visitation evident.

From March to October in 1935, anthropologist Donald Thomson walked across Arnhem Land to determine causes of conflict between the Yolŋu and the ‘outsiders’ with the aim of resolution for the Yolŋu people (Peterson, 2008:577). Through the series of papers by Thomson entitled *Arnhem Land: Explorations among an unknown people* (1948, 1949a, 1949b), the influence of the Macassans is highlighted in the first instance, with a map of Arnhem Land in Part III (1949b) locating a number of Macassan trepang sites across the coastline.

Ronald and Catherine Berndt continued research into Yolŋu culture from 1946 onwards (Berndt and Berndt, 1947, 1954; Berndt, 1948, 1964). In writing on the ceramics located in this region, Berndt and Berndt (1947:133) refer to previous knowledge of large deposits of ceramics and glass along the coastline from early visitation by the “Malays, Macassans, Japanese, Chinese and Europeans”. This research was significant in its recording of Baijini visitation prior to the Macassan trepang industry through song-cycles, describing the “golden brown colour” Baijini as sailing from the western islands. Also described were their sailing vessels, the Baijini women who sailed with the men, textile practices, and fishing and vegetable garden techniques. These stories fall just short of the Dreaming; with the advent of the Macassan trepang industry placed firmly in the historical record. Of the latter, “[n]umerous camp sites, archaeological remains, old graves and tamarind trees testify to a prolonged association. It is the great song cycles, however, and in the stories which survive, that a colourful picture of Malayan and Macassan life on these shores is unfolded.” In recording significant Yolŋu sites as part of *The Gove Dispute*, Berndt (1964) covers both Baijini and Macassan sites as provided by Traditional Owners from Melville Bay to Port Bradshaw.

According to Macknight (2013:7), archaeological fieldwork at Macassan sites began in earnest with the 1948 *American-Australian Scientific Expedition to Arnhem Land* (McCarthy and Setzler, 1960). The expedition covered Groote Eylandt, Winchelsea Island, Yirrkala and Oenpelli. In following the footsteps of previous ethnographers, McCarthy and Setzler (1960:220) excavated the Macassan graves recorded previously by Tindale at Winchelsea Island and surveyed the Macassar Well recorded by Warner at Milingimbi (Macknight, 1969b:149).

It was not until the 1960s, however, that archaeological investigations with the primary focus on Macassan culture began in the Northern Territory (Macknight and Thorne, 1968:221; Macknight, 1969b). This was instigated by an archaeological survey of the Gove Peninsula by Golson and Mulvaney in 1963, followed by further surveys of Macassan sites by Mulvaney in 1965 (Mulvaney, 1966; Macknight, 1969b). Under the supervision of Mulvaney, Macknight's (1969b) doctorate focused on Macassan material culture in the Northern Territory with a twofold aim to consolidate, combine, and extend the historical and ethnographic knowledge already available (Macknight, 1969b:ix), and to recover useful archaeological evidence that could be integrated with other forms of source material (Macknight, 1969b:x). In recording just shy of 150 sites through survey and excavation, features identifying a Macassan site are stonelines (hearths), smokehouse depressions, wells, tamarind trees and burials, with artefacts of diagnostic earthenware, glass and utilised glass (Macknight, 1969b:110–97). Through this research, Macknight has provided the foundations of archaeological research into the extent and types of Macassan sites across the Northern Territory coastline and the profound Macassan influence in First Nations lifeways. (Macknight, 1969a, 1969b, 1972, 1976, 1980, 1986; Macknight and Thorne 1968).

From the 1980s, the management of historical archaeological sites in the Northern Territory through site documentation and registration came into effect (Sullivan and Carment, 1992:3). This is most evident with the survey and bibliography of Macassan sites by Baker (1984) and Cole (1984); with Jung (1992) later referencing wreck locations for perahus. Organised in 1982 by the Museums and Art Galleries of the Northern Territory, Baker revisited sites recorded by Macknight; then broadened the survey area to include the Sir Edward Pellew Group in the Gulf of Carpentaria and the Darwin River area west of Darwin. Sixteen years after the surveys by Macknight, Baker (1984:5) notes the considerable damage caused through human and natural impacts over time, with Macassan sites being incredibly susceptible due to their positions in a monsoonal coastal environment. Wave actions, and in particular cyclonic wave actions, completely alter Macassan archaeological sites through erosion or burial by sand. This is evident at the Macassan trepang processing site of Mungaruda sandbank off South Goulburn Island. Mungaruda was once a small, sandy island used by the Macassans, yet by 1967 it existed only as a sandbank, having eroded over time due to strong tides and currents, wave action and monsoonal weather. (Macknight, 1969b:131).

Baker and Cole surveyed the Groote Eylandt region between 1983 and 1984 (Baker, 1984; Cole, 1984). Sites located by Baker were compiled with the surveys of Macknight and Cole to produce a current gazette of Macassan sites (Baker, 1984:4). Baker (1984:44–64) also provides an exhaustive bibliography of primary and secondary literature relating to Macassan visitation along with recommendations for future research. A few years later, Taçon (1988, 1989) recorded and

registered 48 First Nations, Macassan and European archaeological sites at Gurig National Park, Cobourg Peninsula, erecting ironwood datum posts at each site.

In focusing also on the Cobourg Peninsula, Mitchell (1994, 1995c) examined Macassan influence on the economies of First Nations communities through the archaeological analysis of a number of First Nations shell middens. Mitchell's doctoral research proposes an intensification of regional exchange networks on the Cobourg Peninsula after Macassan contact. As with Macknight (1969b), Mitchell highlights the theme of culture contact shared between the First Nations, Macassan and European peoples. Following from Taçon, Mitchell (1995a) also dealt with conservation and heritage management issues of trepang processing sites in the region.

The theme of culture contact is again visited in Clarke's doctoral research on the archaeological study of contact between the Anindilyakwa-speaking clans of Groote Eylandt and the Macassans, and later, the missionaries (Clarke, 1994:19). Through the combined methods of archaeological excavation of rock shelters and shell middens, and ethnographic and archival research, Clarke posits that changes in resource use and residence patterns of the Anindilyakwa people can be identified in the archaeological record during the period of Macassan contact, and again with the missionary settlement. Results highlight that the influence of Macassan contact on First Nations culture is much more significant than previously thought.

In recent decades, archaeological research on Macassan visitation has expanded through the collaborative papers on the industry compiled by Clark and May, (2013a) and the collaboration of Daryl Wesley, Paul Taçon, Sally May, Michael Pearson, Ronald Lamilami, June Ross, Alistair Paterson, Sue O'Connor, Fenja Theden-Ringl, Jack Fenner (and other researchers) in the funded projects *Picturing Change* and *Baijini, Macassans, Balanda, and Bininj* at the coastal site of Anuru and rock shelters located in the Wellington Range, west Arnhem Land and other sites within the region (May et al., 2012). From Anuru, tooth enamel from skeletal material excavated by Macknight in 1966 was examined through isotopic analysis to determine its origin (Theden-Ringl et al., 2011). The comparison of this enamel with the enamel of a First Nations person from the inland site of Malarrak proved the Anuru burials to be foreign; and more than likely from maritime Southeast Asia. Carbon and isotopic dates from the enamel suggest the burial to have occurred before approximately 1730 AD which in turn suggests Anuru Bay represents an early Macassan site (Theden-Ringl et al., 2011:47).

In the Wellington Range, First Nations contact rock art was dated through radiocarbon beeswax dating to determine the timing of Macassan visitation (Taçon et al., 2010:6); the minimum date of a perahu painting underneath a beeswax figure being 1664 AD. Within the same region, the analysis of a glass bead assemblage excavated from western Arnhem Land and other sites has

highlighted the early history of First Nations engagements with Macassans and European settlers (Wesley and Litster, 2015). Despite the lack of archival information, the presence of glass beads is a significant archaeological example from the contact period assemblage relating to the different periods of historical economic engagements.

The doctoral thesis of Daryl Wesley, one of the primary archaeologists of the western Arnhem Land research projects, focuses on culture contact between the First Nations peoples of Arnhem Land and the Bayini, Macassans and the Bininj (2014). In following from Macknight (1969b), Mitchell (1994) and Clarke (1994), Wesley's (2014:12) overarching aim is to investigate the timing and nature of contact between First Nations peoples with the pre-Macassans, the Macassans, and with the impact of the early British military expansion and later European settlers in the region. In order to test chronologies and models of culture contact, Wesley undertook fieldwork on both Macassan and First Nations archaeological sites at Anuru Bay and South Goulburn Island, and at rock art sites in the Wellington Range. Through the use of the 'Indigenous hybrid economy' model to analyse culture contact, Wesley (2014:328) puts forward that First Nations groups developed customary ways in which to deal with visitors to their country through the use of customary knowledge, beliefs and law, which in turn informed the basis of mediation and exchange in each new economic phase. Based on a suite of radiocarbon determinations obtained from Anuru Bay (excluding those derived from shell middens), the earliest date of 1637 AD (80% probability) suggests a likelihood of pre-Macassan contact, with a 200-year duration for the Macassan economies (Wesley, 2014:86, 129). This supports the long culture contact model.

The current project *Before Cook: Contact, negotiation and the archaeology of the Tiwi Islands* (University of Canberra, 2021) will contribute to the Tiwi history of Macassan (and potentially Portuguese) visitation in this region (Daryl Wesley, pers. comm., 12 December 2019). Noted also is the research undertaken beyond Northern Territory borders including that of Oertle et al. (2014) that extends an examination of the trepang industry to the Wellesley Islands in Queensland waters, and the Kimberley region of Western Australia, an industry that operated simultaneously with that of this research area (Crawford, 1969; Morwood and Hobbs, 1997; O'Connor and Arrow, 2008; Clark and May, 2013a).

5.5 Remapping Macassan archaeological sites

For the creation of GIS datasets, Macassan site coordinates were obtained from the original coordinates from Macknight and Baker, and from the Northern Territory Heritage Department's database. From the early 1980s, the Museum and Art Gallery of the Northern Territory managed archaeological site information supplied by Macknight, Baker, Cole, Taçon, and other

archaeologists. A decade later, site management shifted to the Northern Territory Heritage Department where additional sites continue to be added (Fredericksen et al., 2001:7).

As the Northern Territory is divided longitudinally between the Map Grid of Australia (MGA) zones 52S and 53S, data provided by the Heritage Branch is also divided. At the time of data collection, information relating to sites falling under both MGA zone 52S and 53S covered the basics of site name, Eastings and Northings, site type, contents, map sheet, map number, and comments, with 52S providing further information on archaeologist name, report name, year, site size, condition, materials, significance, etc.

To create digital maps of the Northern Territory coastal region with the current Geocentric Datum of Australia 1994 (GDA94)/Geodetic World System (WGS 84) coordinate systems, Geoscience Australia shapefile datasets from between Auvergne (western boundary) and Robinson River (eastern boundary) were utilised. At the 1:250,000 scale, these files are the digital version of the current map sheet series 1:250,000 NATMAP Edition 2. Digital copies of the 1:250,000 Series R 502 edition 1-AA S maps, originally used by Macknight to record site locations in 1966–67, allowed for the georeferencing of his coordinates.

Sites surveyed by Macknight (1969b:110–97) (Figure 5.4) were given a six-digit coordinate based on the Eastings and Northings from the 1:250,000 Series R 502 edition 1-AA S for Australia maps (Macknight, 1969b:107, 492). The 1:250,000 Series R 502 edition 1-AA S map projections were based on the Transverse Mercator Projection with the horizontal datum based on “astronomical fixations” (Clarke 1858 spheroid). The grid lines on these maps represented 10,000 yards (9.144 km). Compiled into a gazetteer, sites were described in varying detail on physical/environmental aspects, archaeological content, and other forms of evidence relating to Macassan occupation such as historical and previous archaeological/ethnographic research, and local knowledge from Traditional Owners. Sites—including perahu wrecks—that appeared not surveyed were described from the perspective of the previous researcher or Traditional Owner, providing an indication as to where they may be located.

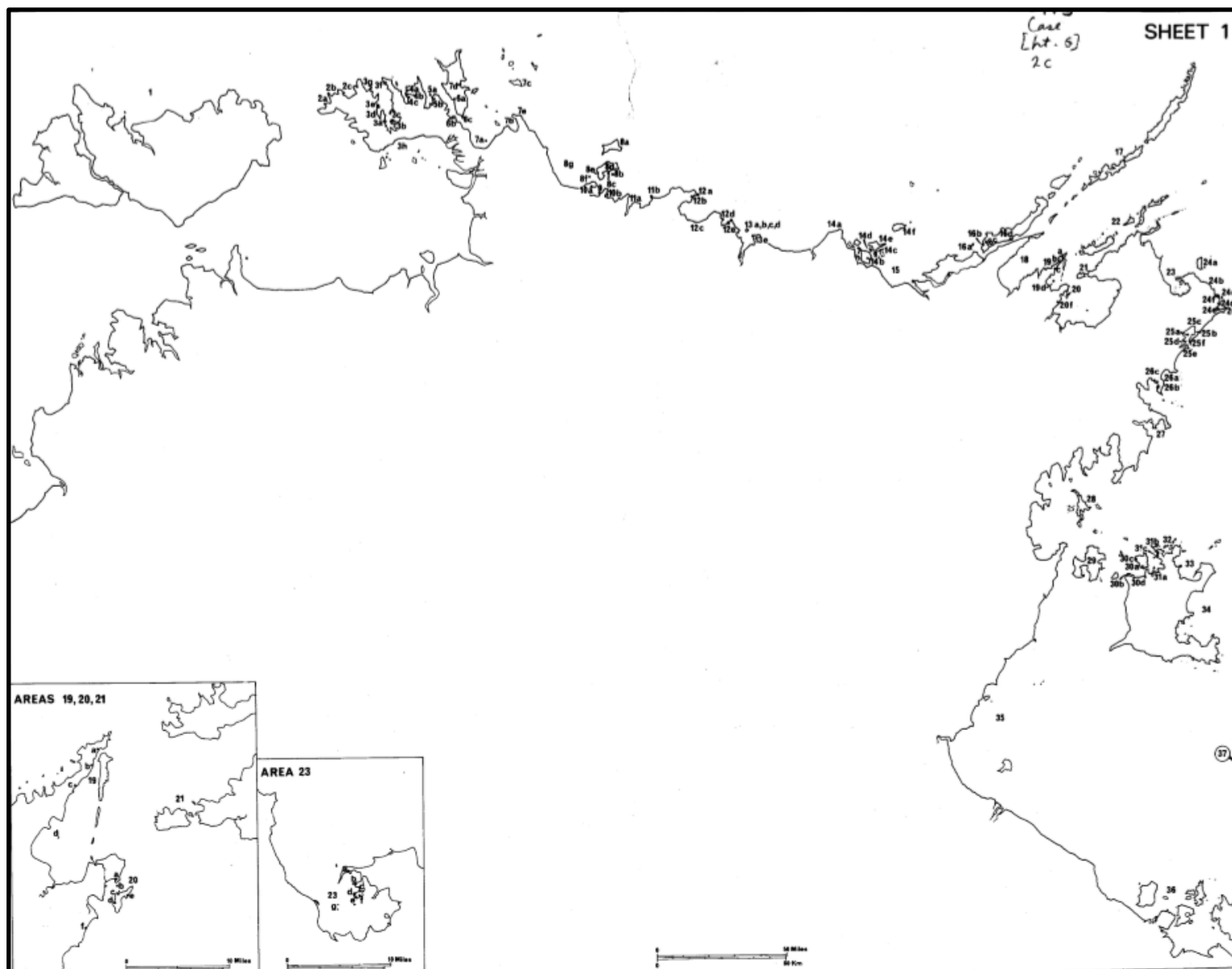
Since Macknight’s recordings, there have been three major datum changes (AGD66, AGD84 and GDA94), and a significant technological advancement in the way in which data is retrieved and managed. In cross-referencing the Clarke 1858 Spheroid to the GDA94 datum currently in use, the distance between the two is variable, with a discrepancy of up to 300 m. The 1:250,000 Series R 502 edition 1-AA S provides the toponomy and landscape features that Macknight refers to in the gazette. This assists in mapping sites that were lacking coordinates, yet were referenced by name and site description. As the current Vector files are relatively basic with topographical attributes, georeferenced maps add depth to the landscape/seascape through the appearance of

vegetation and elevated areas such as hills and mountain ranges. Maritime attributes include soundings, rocky areas, foul ground, sandy areas, shallows, and shawls. Although vector files are basic, information relating to the hydrography of the region assists with the analysis of site choice.

In georeferencing from a topographic map through matching distinctive points of reference, the topographic map framework boundaries match up to the vector framework boundaries at a scale of 1:500,000. At the scale of 1:400,000, slight discrepancies begin to appear. At a scale of 100,000, framework boundary discrepancies are clearly noticeable, and at 50,000, these discrepancies can be measured—at some points—to be 450 metres out. This will cause archaeological site coordinates provided by Macknight to possibly be out, in the worst-case scenario, by as many metres, not taking into account that these coordinates have a prior error value of approximately one kilometre. This is not considered a major concern given site size and description of site within the environment.

In continuing the site listing format created by Macknight, Baker's gazette of Macassan sites incorporated site locations recorded by Macknight with those of Cole and his own (Baker, 1984:4). These were recorded with the use of 1:100,000 scale maps and involved the process of transferring Macknight's coordinates over from the 1:250,000 Series R 502 edition 1-AAS to the 1:100,000 Series R 621 edition 2-AAS. This was achieved prior to the datum update of 1984; a timely conversion as the grid system update in the 1:250,000 maps meant original coordinates from Macknight only applied to the earlier maps. Although this conversion introduced a degree of inaccuracy due to the different scales, it allowed revisited sites to be located more accurately. In stating this, coordinates for site locations by Baker were recorded to 100 metres.

Further site recordings from Paul Taçon (1988) and Scott Mitchell (1994) in the Cobourge Peninsula were retrieved directly from the NT Heritage register. In total, much of the Northern Territory coastline has now been surveyed. As Maria Island south of Roper River in the Gulf of Carpentaria was part of the coastline not yet known to be recorded, this was selected for fieldwork. After fieldwork had been conducted, it was learnt that anthropologist, John Bradley (2018), had visited Maria Island with senior traditional Marra owners between 1981 and 1985 and documented all of the Dreaming and occupation sites.



5.6 Survey of Maria Island

Maria Island (Kurrululinya) is located in the Gulf of Carpentaria 21 kilometres offshore from Limmen Bight River (Figure 5.5). Topographically, the mainland coast and islands are relatively low-lying, with Mount Young (50 m) on the mainland being a significant landmark in the region. Located on the Macassan travel route, historical references suggest the Macassans trepanned on the island (Tindale, 1926:131; Macknight, 1969b:194). For these reasons, accompanied by the potential for archaeological material from British visitation in the 1870s (see Chapter 7), Maria Island was chosen for archaeological survey. Steve Barrett, owner of the Limmen River Fishing Camp, acted as captain and guide for the fieldwork. The survey area covered the western side of the island encompassing Eagle Bay, a smaller bay to the north, and the coastal area to the south (Figure 5.6).

It is noted here that the coastal topography of Maria Island is subject to the effects of monsoonal weather on the physical landscape and hence the potential of locating material culture is affected. The *Register* (5 June 1908:6) reported dramatic topographical changes to the island after heavy storms to the point where the “conformation of the island appeared to be altered”. In noting this, the potential of locating extant material remains is minimal. Prior to fieldwork, Steve Barrett organised for both Maria Island to be back-burned by Sea Rangers to assist with visibility.

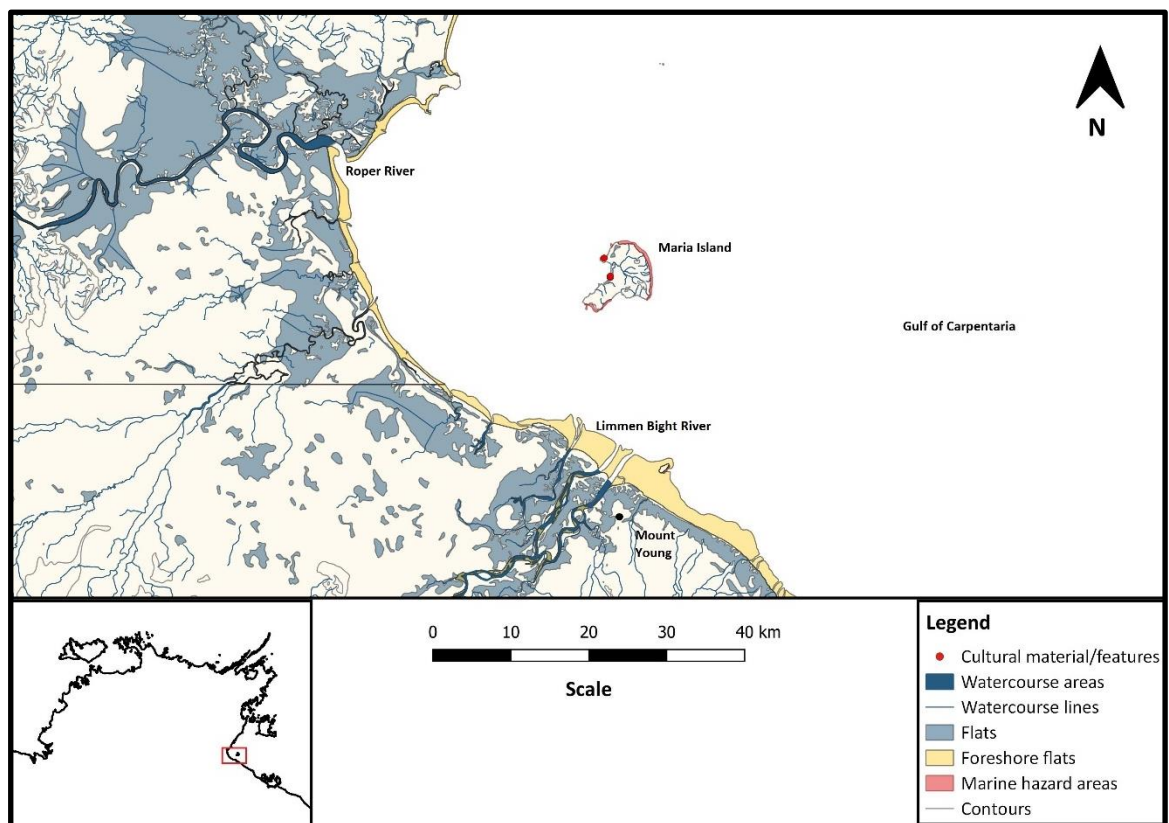


Figure 5.5 Maria Island

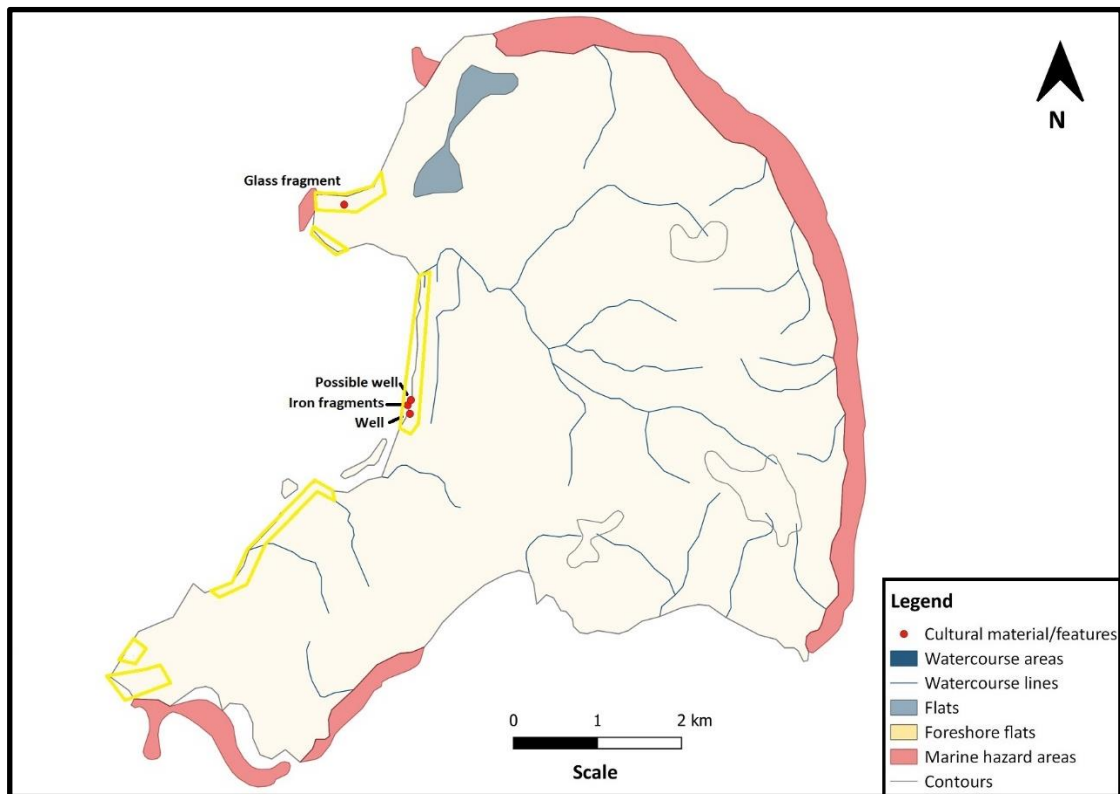


Figure 5.6 Maria Island survey areas (yellow boundaries) and cultural material/features

Archaeological survey began on 3 October 2013. At the northern tip of Eagle Bay, Maria Island (Z53S 576296E 8357528N), survey covered the beach area and 200 metres inland to the west. The impact of the active monsoonal environment is visible here through sand ridges and shells extending over 200 metres inland (Figure 5.7). With only a few small mangroves along the shoreline, scrubby vegetation has stabilised older inland dunes. In surveying the littoral zone southeast for 400 metres, a modern campfire and less modern oil drum were located on a coastal point (Z53S 576595E 8357264N). Evident throughout the survey area, and across the entire island, were thousands of burrows the size of a tennis ball created by the large population of northern brown bandicoots (*Isodon macrourus*) (Figure 5.8). The creation of these burrows contributes to the dynamic coastal environment and potential movement of cultural material through the actions of burial and resurfacing.



Figure 5.7 Shells visible for over 200 metres inland (facing east)



Figure 5.8 Burrows created by the northern brown bandicoot

The next point of survey directly south of the creek at Eagle Bay (Z53S 577578E 8356968N) followed the littoral zone in a southeasterly direction. The first section of coastline represented mostly beach with a few clumps of mangroves. At 425 metres, mangroves dominated the littoral zone for the remainder of the bay (2.7 km) with the beach protected behind them. Surveying the

beach and the land directly behind the beach, weathered shells were again present further inland along with clumps of grasses that grew over the overturned topsoil. Heading to the east, a wide and dry channel full of fresh grass separated the coastal zone from the hinterland of eucalypts, cabbage palms, and other shrubby trees.

At 1.5 kilometres south from the creek and just inland from the beach, a boggy area was visible next to a few trees. The appearance of wet ground suggested the possibility of fresh water located beneath the surface. South of this by another 175 m, a cluster of pandanus trees was targeted as the survey end point (Z53S 577453E 8355338N). Located one and seven metres to the north of the pandanus trees were two freshwater dugout wells that both had a cultural appearance due to their circular shapes. The northernmost well had a diameter of one metre and was covered in dead grass that was quite distinctive compared to the grasses surrounding it (Figure 5.9). The southernmost well was less distinctive, yet freshwater was visible and easily accessible. No cultural material was present.



Figure 5.9 Dugout well distinguished by circular shape and dry grass (foreground) and pandanus trees (background) (facing south)

In returning in a northward direction back to the creek, the survey covered the beach parallel to the mangroves. Two rusted iron fragments were located within the mangrove fringe (Z53S 577427E 8355441N) 107 metres north of the dugout wells (Figures 5.10 and 5.11). The first iron

fragment (left in image) is 120 x 110 x 7 millimetres and has a curved lip. The second is 150 x 150 x 7 millimetres. It has a slight curve. The thickness of the fragments, along with the way in which the iron was eroding, suggested an earlier date than 1942 (many oil drums have been discarded around the Northern Territory landscape after World War II), or that it is the fragment of some other type of utilitarian vessel such as a large cooking pot. No other cultural material was located.



Figure 5.10 Two iron fragments located on the beach extremity of foreshore mangrove belt (recto and verso)



Figure 5.11 Iron fragment (side view)

The next point of survey was a smaller, less sheltered bay located to the north of Eagle bay (Figure 5.12). The coastline here went from low gradient in the littoral zone, curving up to a three-metre sand dune that continued to rise at a lower gradient into a low hill that runs parallel to the bay. The littoral zone has a large number of pebble-sized rocks and is scattered with larger flat sandstone rocks that average 20 x 20 centimetres in size. Here, a weathered green glass fragment was located (Figure 5.13). In surveying the hilltop parallel to the bay, no further cultural material is visible.



Figure 5.12 Small bay north of Eagle bay (facing northeast)

Figure 5.13 Green glass fragment from littoral zone of bay

Driving the boat southwest past Eagle Bay, mangroves sheltering the shoreline thinned to a rocky point. Immediately south of the point was an inlet 250 metres wide and 150 metres deep. A 30-metre gap in the mangrove-lined shoreline acted as an entrance to a low-lying sandy/muddy interior that continued in intervals south along the coast. At this point (Z53S 576279E 8354494N), the land survey continued southward between the low-lying ground and along the edge of the slightly elevated interior of open hinterland (Figure 5.14). Spanning between 60 and 200 metres, the littoral zone here is represented by patches of mangroves that give little protection to the low-lying topography of compacted sand. Throughout this section of coastline, chunks of land have eroded through water run-off and wave actions brought on by the monsoon. The burnt landscape directly inland allowed for good ground visibility; however, no cultural material was visible. This survey terminated at 1.6 kilometres southwest from the drop-off point. In travelling by boat further southwest along the coastline,

The final survey section for Maria Island was at the southwest tip of the island (Figures 5.15 and 5.16). The littoral zone here is a beach with a rocky area extending into a point. The beach rises inland to form a dune that extends into an elevated, sparsely-wooded hinterland. No cultural material was located.



Figure 5.14 Survey area south of Eagle Bay (facing northwest)

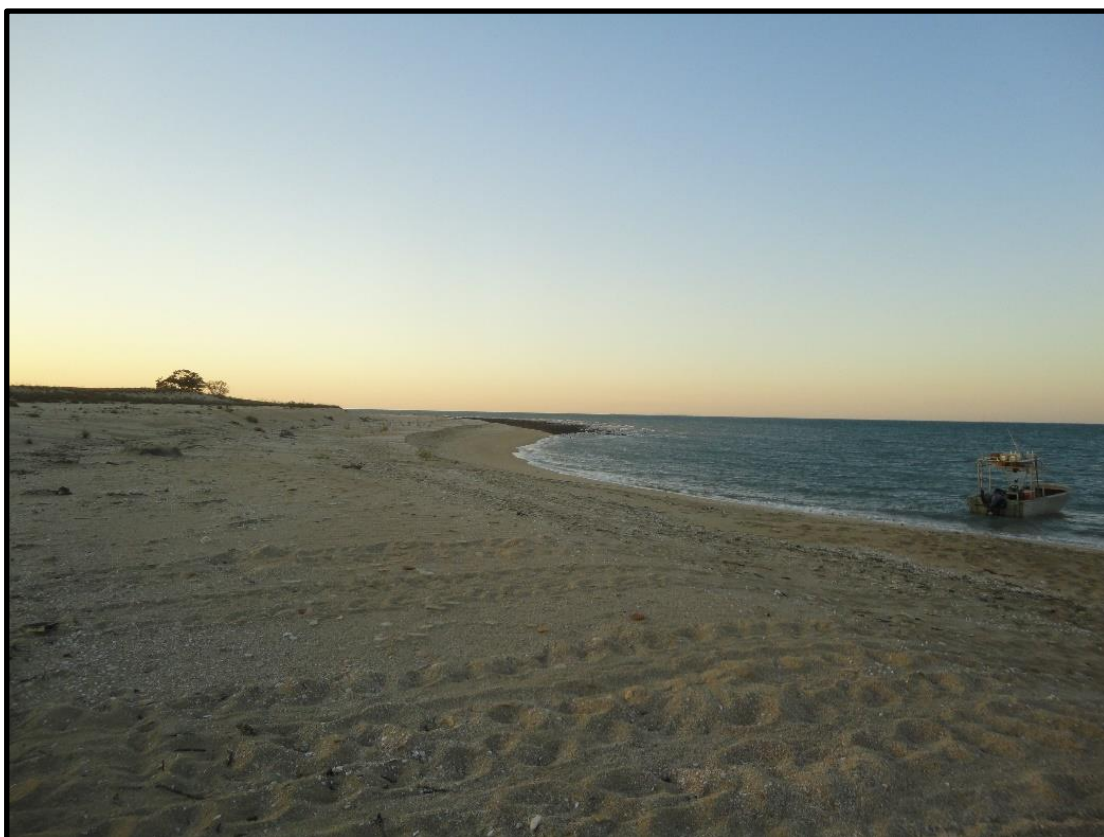


Figure 5.15 Southwest tip of Maria Island (facing south)



Figure 5.16 Southwest tip of Maria Island (facing south) with Mount Young visible on the horizon in centre of image

Although cultural material was located at Maria Island, no diagnostic cultural material to indicate Macassan visitation was located. This absence of Macassan cultural material is confirmed through the anthropologist, John Bradley's (2018) publication *Marra Sea Country: A Report Detailing the Limmen Bight Sea Country and Cultural Values*. Between 1981 and 1985, Bradley had visited and documented all of the Dreaming and occupation sites at Maria Island with senior traditional Marra owners Musso Harvey Bangkirinu, Roy Hammer Abaju, Mack Reilly Manguji and Tommy Reilly Nawurrungu. Further information about Maria Island was documented with senior Marra men and women Dulu Burranda, Emily Reilly Wirdiwidinya and Ruby Wirrinyanku in Borroloola (Bradley, 2018:6). These senior men and women are now deceased. Much of this material remained unpublished and in Bradley's field notes until 2018 when two reports for the management of the Limmen Bight Marine Park were published (Bradley, 2018, 2019).

5.7 Macassan site description and physical environment

Located along the mainland and islands within the sheltered shallow bays and archipelagos of the Northern Territory, Baker (1984:9–10) describes Macassan sites as occurring in areas close to extensive mud flats and shallow sheltered waters where trepang could be procured (see Figure 5.3). Processing sites were set up predominantly on sandy beaches close to the trepanging grounds, and occasionally in a hinterland area behind mangroves or rocks if a beach wasn't present. As is evidenced on the Lyäba site plan (Macknight, 1969b:Sheet 5) (Figure 5.17), stonelines (hearths) were generally located just above the high tide mark and faced at right angles to the shore in a parallel fashion. They generally consisted of five to eight cooking bays in which

large pots were placed to boil the trepang. Behind the stonelines, smokehouse depressions may be visible where the trepang would have been cured after boiling.

Around the stoneline and smokehouse features, artefacts include a high proportion of Macassan earthenware fragments, as well as imported ceramics, glass, metal, bone and charcoal. Considered as distinctively Macassan and consistent with Sulawesi earthenware production between the seventeenth and twentieth centuries, earthenware ceramics are coarse, well-fired and brown in colour with occasional patterning (Bulbeck and Rowley, 2001; Wesley, 2014:34, 148). Diagnostic traits of rim, body and patterned fragments—the latter typical of archaeological earthenware assemblages primarily from South Sulawesi—indicate vessel types such as globular pots, lids and/or shallow dishes, and bowls (Macknight, 1969b:292–296; Wesley, 2014:170) (Figure 5.18).

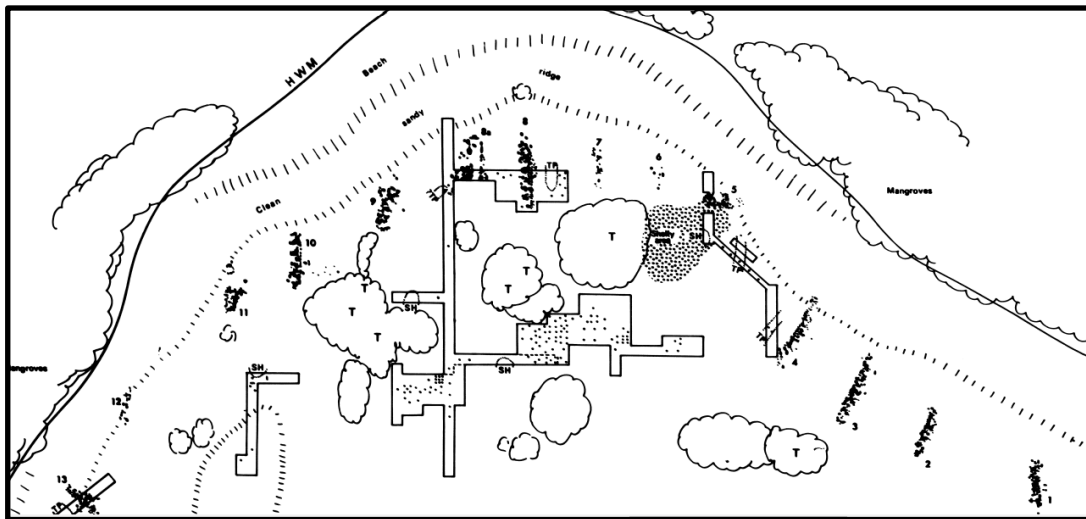


Figure 5.17 Section of Lyäba (Site 32a) site plan (Macknight, 1969b:Sheet 5)

Imported artefacts (having a provenance outside of Sulawesi) including Chinese ceramics, lettered glass and metals may have been acquired outside of Sulawesi and en route to northern Australia (Wesley, 2014:150-151). A broader range of Dutch, Chinese and other European artefacts at sites including Goulburn Island compared to Anuru Bay also reflect the temporal differences of these sites' occupation as the availability of exotic goods increased later at the port of Makassar through the development of maritime trade in the region.

Imported ceramics include a small number of: undecorated, overglaze polychrome (red, green, blue and yellow) and blue on white porcelain (the latter reflecting stylistic qualities of the Wanli rule [1573-1620 CE] of the late Ming dynasty); transfer printed ware with one fragment displaying the makers mark of a Dutch manufacturer 'Maastricht' and another fragment displaying the letters GOU; fine fabric wares of European origin; and stone wares with most having a broad provenance to Asia and a few to Europe (Macknight, 1969b:269–285; Grave and McNiven, 2013:4539). These fragments represent mostly bowls, as well as a small number of

cups, plates, spoons, jars and lids. Macknight (1969b:281–288) attributes these ceramics (excluding those relating to European activity from the nineteenth and twentieth centuries) to the widespread and sustained contacts of the Macassans and development of the Port of Makassar over time as a trading entrepôt. Chinese ceramics dating prior to 1820 most likely derived from the maritime trade from China into the archipelago, with later ceramics potentially procured through Singapore. Although the dating and chronology of the majority of Chinese ceramics found at Macassan sites is yet to be determined, the similarity of porcelain and stone wares at the British garrison of Victoria at Port Essington (operating between 1838 and 1849) indicates a high probability for Macassan porcelains and stone wares to date to around the nineteenth century and were possibly procured from the same sources of supply.

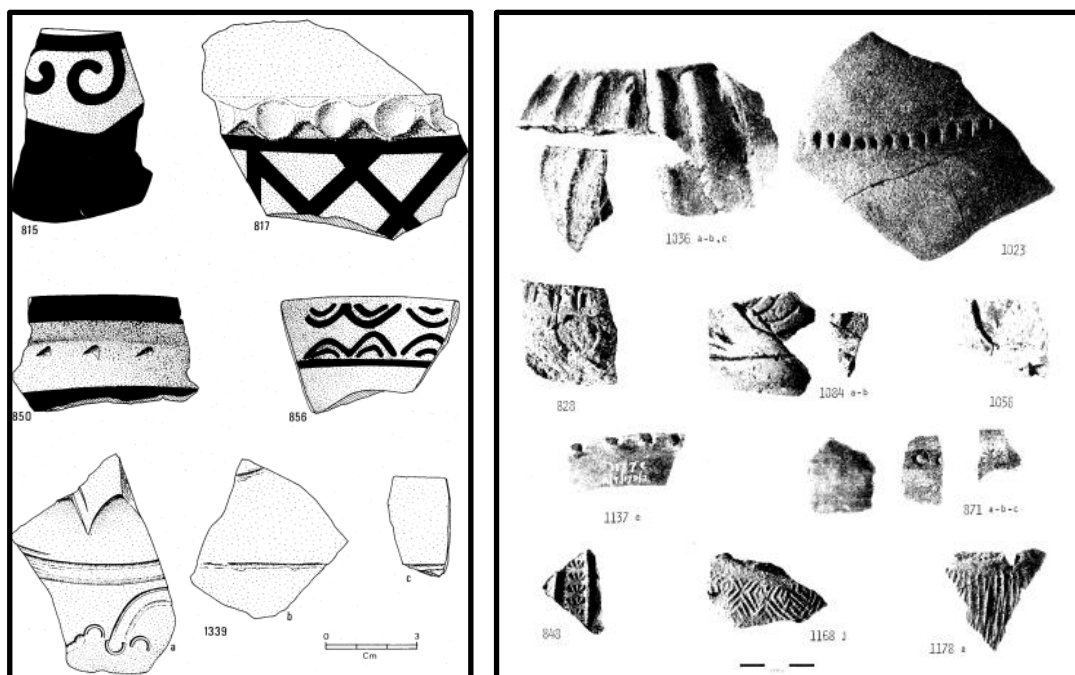


Figure 5.18 Decorated earthenware (Macknight, 1969b:Figures 9.4 and 9.5)

The majority of glass artefacts at Macassan sites are dark green Dutch gin case bottle (prunt) fragments with makers marks that date a large number of the bottle fragments to between 1845 and 1890 (Macknight, 1969b:311–315). That prunts of Dutch make were also found on nineteenth century Northern Territory gold mining sites rules out a wholly Macassan provenance at Macassan sites, the likelihood that they are entirely of British origin is also unlikely. Other glass artefacts include French brandy bottle fragments (2), other nineteenth century bottle fragments, glass beads (5) from Anuru Bay; and utilised glass (First Nations).

Metal artefacts are: a large iron cauldron that was used by the Macassans to boil trepang, and iron cauldron fragments; Dutch coins (6) with minting dates of 1838, 1780, 1790 and possibly 1742 (Figure 5.19); fish hooks (30) made from bent bronze wire; copper needles (3); a small copper spatula; an axe head; an iron chopper; cartridge cases (9) linked to European activity; a shovel

nosed spear blade (First Nations); copper and brass wire; a small brass swivel gun and iron swivel mortar referenced as provenanced from the Northern Territory coastline (historical references) (Macknight, 1969b:304–311).

Other artefacts located include a number of nineteenth century clay pipe fragments (Macknight, 1969b:315–317). As clay pipes were generally given as ‘gifts’ to First Nations people from the British, their presence at Macassan sites may relate to either a First Nations or British presence.

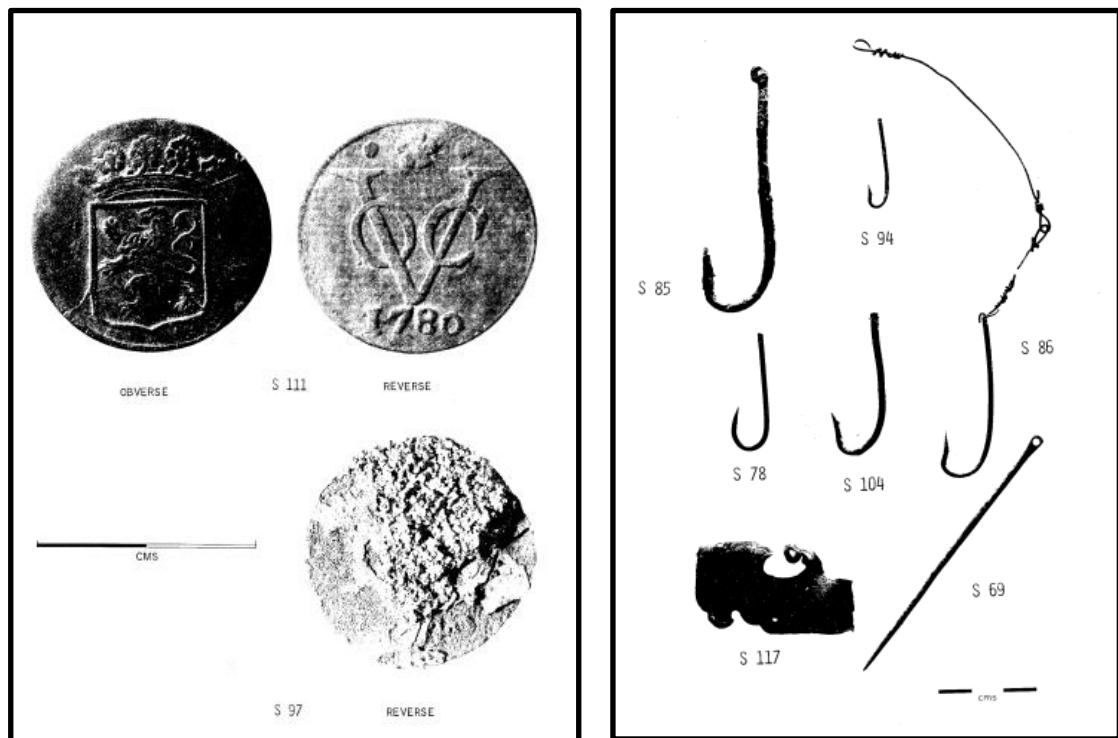


Figure 5.19 Dutch coins and Macassan fishing hooks, needle and other objects (Macknight, 1969b:Figures 10.1 and 10.2)

Also located around the site may be one or many tamarind trees that either grew from discarded seeds or were planted. In short, a Macassan site, of which there are 100 confirmed sites in total, would contain all of the four discussed characteristics: stonelines, smokehouse depressions, earthenware and tamarind trees. Of these, earthenware is the most diagnostic feature of a Macassan presence. Stonelines and smokehouses, although characteristically Macassan, were also utilised by British trepangers (Macknight, 1969b:83–105).

Based on the locations of recorded trepang processing sites, Macknight (1969b:83–4) describes the four key environmental attributes:

- A beach/hinterland sheltered from the northwest monsoon at the beginning of the trepanging season and southeast monsoon as the wet season turns to the dry; with most sites receiving some shelter from either monsoon.
- The close proximity of the site to shallow, resource-rich waters to procure trepang.

- An adequate supply of firewood (i.e., mangroves).
- The site to be isolated or to have clear approaches.

Although the availability of fresh water would seem to be a requirement, monsoonal rains and the use of water storage vessels negated this to an extent. In stating this, 20 wells are recorded at trepang processing sites, with a further seven wells recorded as an isolated site with or without diagnostic ceramics and/or accounts of Macassan use by First Nations informants.

5.8 Macassan archaeological sites – definite and tentative

Between the Cobourg Peninsula and Sir Edward Pellew Group, there are 100 definite Macassan archaeological sites and 90 tentative Macassan sites that require further investigation (Figure 5.20). The majority of these were initially recorded by Macknight, Cole and Baker with the guidance of Traditional Owners, and ranger David Lindner. This research expands on the typical Macassan trepang processing site described by Baker to include: First Nations/Macassan conflict site; potential watering sites; and potential perahu wreck sites. Macassan sites are separated into definite and tentative sites depending on their archaeological signature (Macknight, 1969b:83–105).

Tentative Macassan sites vary in description and detail. These include:

- Tamarind tree(s) only or with a small amount of ceramic/glass
- Perahu wrecks visible in the historical record or through recollection by informants
- Trepang sites that were reported by informants to the archaeologist yet not surveyed
- Trepanging sites that could not be confirmed as Macassan or post-Macassan
- Watering sites (i.e., wells) recalled by informants as Macassan yet with no definitive Macassan signature



Figure 5.20 Macassan definite and tentative sites in the Northern Territory (Google Earth, 2013)

Distinguishing a tentative Macassan site from a definitive site stems primarily from the fieldwork outcomes of previous researchers and the archaeological signatures (or lack thereof) of the sites themselves. Previous researchers recorded sites at varying levels of detail depending on their research aim. Macknight's (1969b) doctoral research involved the recording of both the features and the artefacts at all sites that were surveyed, providing a detailed description within his gazette. Also recorded were potential sites known to informants yet not located by Macknight, and potential perahu wreck site locations. Baker's (1984) research was less informative due to the nature of the report, with many sites not listing if artefacts were present or not. As with Macknight, Baker recorded the presence of tamarind trees along the coastline despite, in some cases, the lack of other archaeological signatures.

Although tamarind trees were a primary indicator in attempting to physically locate a Macassan trepang processing site, their presence within the coastal landscape did not necessarily result in such finds. Historically, tamarind trees were either planted by Macassans or grew from discarded seeds. At trepang processing sites, they were recorded as one tree upwards to a large grove. Their size, and hence age, provide a rough indication of the site's antiquity, yet their presence along the coastline devoid of any archaeological material raises the question of whether these trees were planted for the purpose of acting as beacons (Baker, 1984:10; Cole, 1984:25) or if they grew through natural processes.

An interesting case is the presence of three tamarind groves along the western coast between Port Keats and Anson Bay (Figure 5.21). These were initially recorded by the customs officer Alfred Searcy (1909:189–90) in the late 1800s while surveying the coastline for Macassan trepang stations. Despite their lack of integrity as a definite Macassan site, Baker (1984:11) included them in his gazette. These groves are spaced at intervals of roughly 90 and 45 kilometres respectively and are far from the trepanging grounds to the east. Although it is known that tamarinds self-seed naturally (Baker, 1984:10), their relatively regular interval along the coastline may suggest a cultural rather than natural phenomenon. One potential theory proposed by the author is that the Macassans who trepanged along the Kimberley coastline in Western Australia used these tamarinds as beacons in sailing between the Kimberley and Makassar. Another possibility is that they were planted by Chinese men who had a fishing station in the direct vicinity of one of these groves at the turn of the twentieth century (see Chapter 7). The 2010 discovery of a replica Portuguese swivel gun dating to around 1750 on Dundee Beach 60 kilometres to the north of the northernmost tamarind grove (Clark, 2013), however, heightens the probability that there was a Macassan presence along these shores (Clark, 2013:9; Wesley, 2014:32), even if it were only as a place to replenish supplies prior to entering the Timor Sea. Small cannons were known to be mounted on the bows of perahus of the more important captains within the fleet, although these were rarely seen by observers (Macknight, 1969b:56).

Visible in both Macknight and Baker's research, people other than Macassans (generally Anglo men) were also known to fish for trepang after the Northern Territory was colonised by the British, with a number of sites lacking a definitive Macassan or post-Macassan archaeological presence. As non-Macassan trepangers generally reused Macassan sites, it is viable that this was indeed the case for these tentative sites, yet only further survey and/or excavation can provide a definitive answer.

Table 5.1 highlights the percentage of features and artefacts visible at both definite and tentative Macassan archeological sites. The greater percentage differences between stoneline, smokehouse, ceramic, glass and utilised glass indicates that these are the best precursors in recognising a definite Macassan site over a potential one. The smaller percentage difference for the tamarind trees and wells reflects the grey area that surrounds these tentative features, and hence, the need for further research to clarify their origin. They also reflect that such features, although introduced by the Macassans, were utilised by numerous peoples who lived in or passed by these regions.

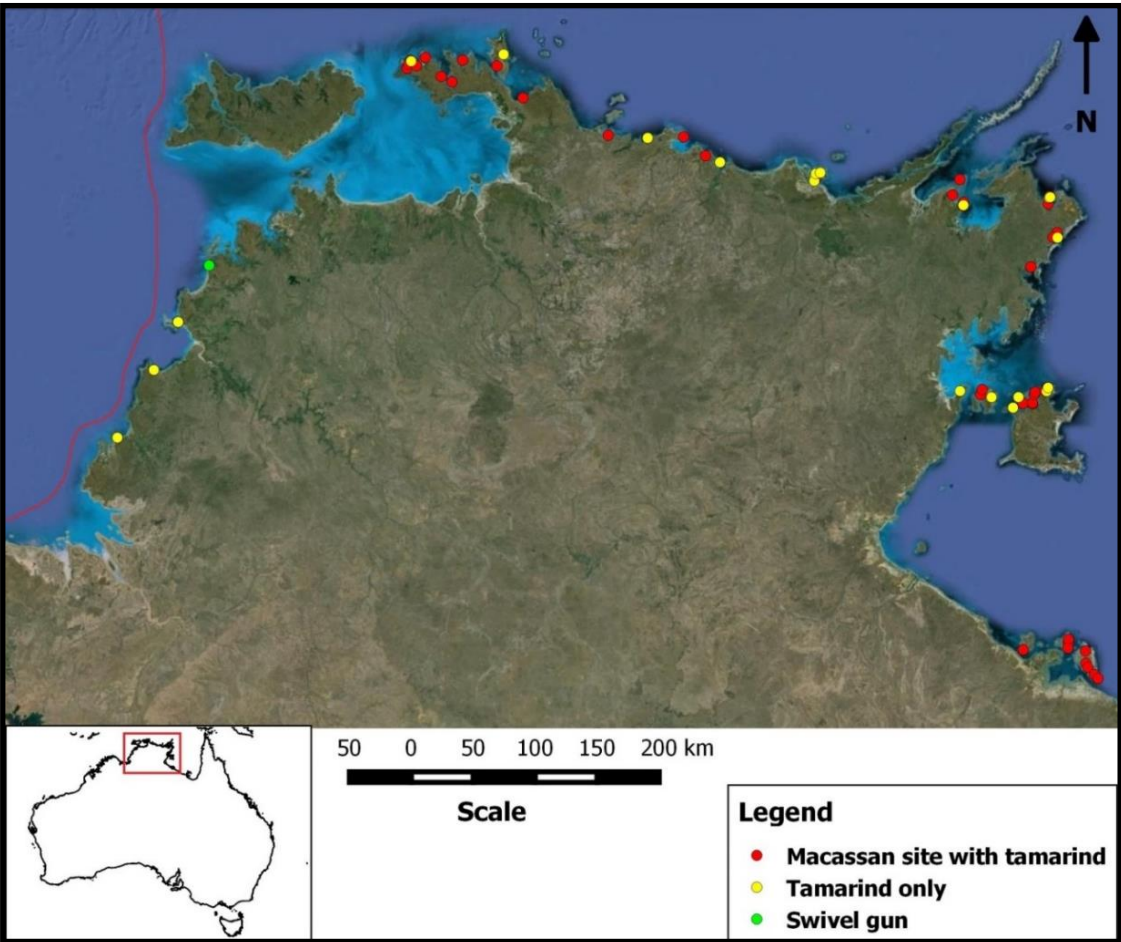
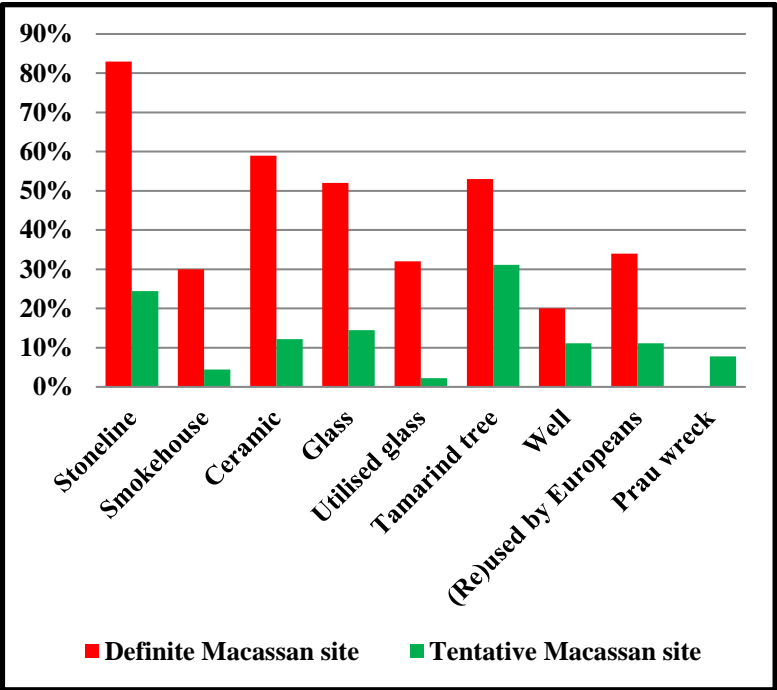


Figure 5.21 Map showing Macassan sites with tamarind trees and tamarind trees only. The red line running along the coastline indicates the possible route taken by Macassans from the Kimberley trepang grounds, with the tamarinds possibly acting as beacons for fresh water, direction, etc. (Google Earth, 2013)

Table 5.1 Feature and artefact percentages of Macassan definite and tentative trepang processing sites (including percentage of sites reused by Europeans and tentative perahu wreck sites)



Not located to date are the 28 perahus known to have wrecked since 1803. Through historic and ethnographic sources, Silvano Jung (1992) created a bibliography of perahu wrecks and sightings; with 14 approximate wreck locations for future research (Figure 5.22). The 2010 discovery of the swivel gun at Dundee Beach (Clark, 2013) opens the possibility for wrecks to be located outside of the trepanging ground region to the east.

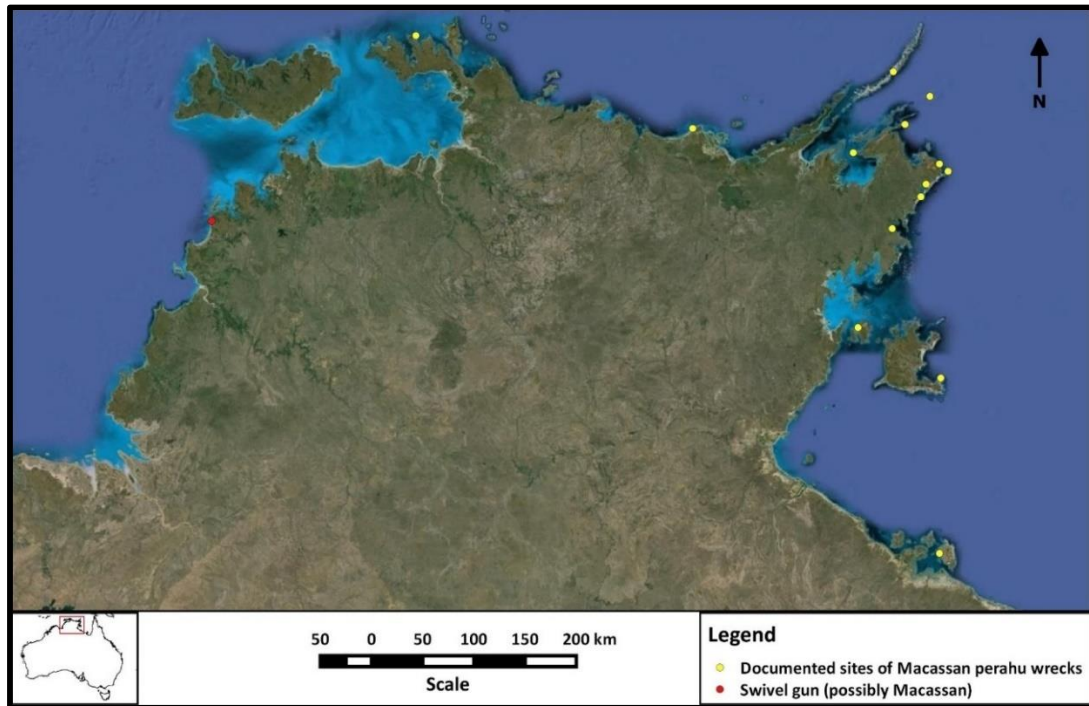


Figure 5.22 Macassan perahu wreck and swivel gun site locations (Google Earth, 2013)

5.9 Macassan definite site locations

Of the 100 definite Macassan sites recorded between the Cobourg Peninsula and Sir Edward Pellew Group (Figure 5.24), 66 are located in a bay, 48 on an island (including bay sites), and three located in a strait or on the open coast. With the majority of bays open at an entrance facing northwest, the location of sites within the bay are 26 (39.4%) on the eastern side, one (1.5%) on the north, 30 (45.5%) on the western side, two (3%) on the south, and seven (10.6%) in the centre (on an island). As the northwesterly winds changed to a southeasterly during the trepanging season, the similar percentages of site locations on both the western and eastern sides of the bay may infer that the site locations were chosen based partially on the need to shelter from these winds (Figure 5.23). In viewing the distance of the site from the bay mouth compared to the length of the bay, and in taking into account the optimal reasons for site location choice, it seems unlikely that the distance of the site location to the mouth of the bay played an important role.

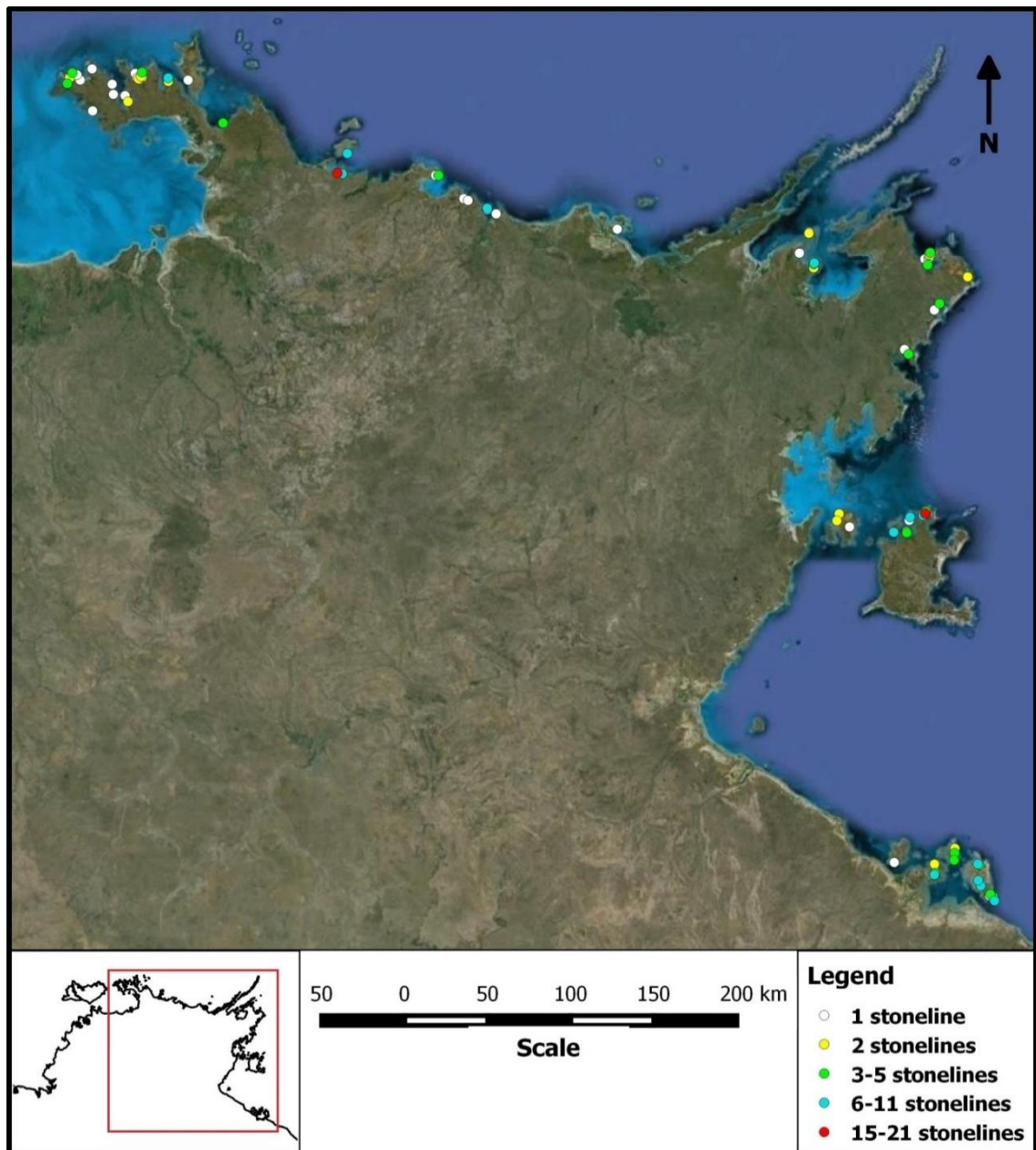


Figure 5.24 Macassan sites locations and number of stonelines (Google Earth, 2013)

5.10 First Nations archaeology for the Macassan trepang industry

Of the 100 definite Macassan sites, 54 display the presence of First Nations peoples through utilised glass fragments and/or lithics (34 sites) and shell middens (20 sites) (Figure 5.25). This is the minimum number for an archaeological presence, as not all sites recorded by Baker (1984) included artefact types. Although it has not yet been proven archaeologically that First Nations peoples occupied these sites at the same time as the Macassans (Macknight, 1969b:236), there is sufficient anthropological and historical data of First Nations peoples working and trading with Macassans to safely assume that they did.

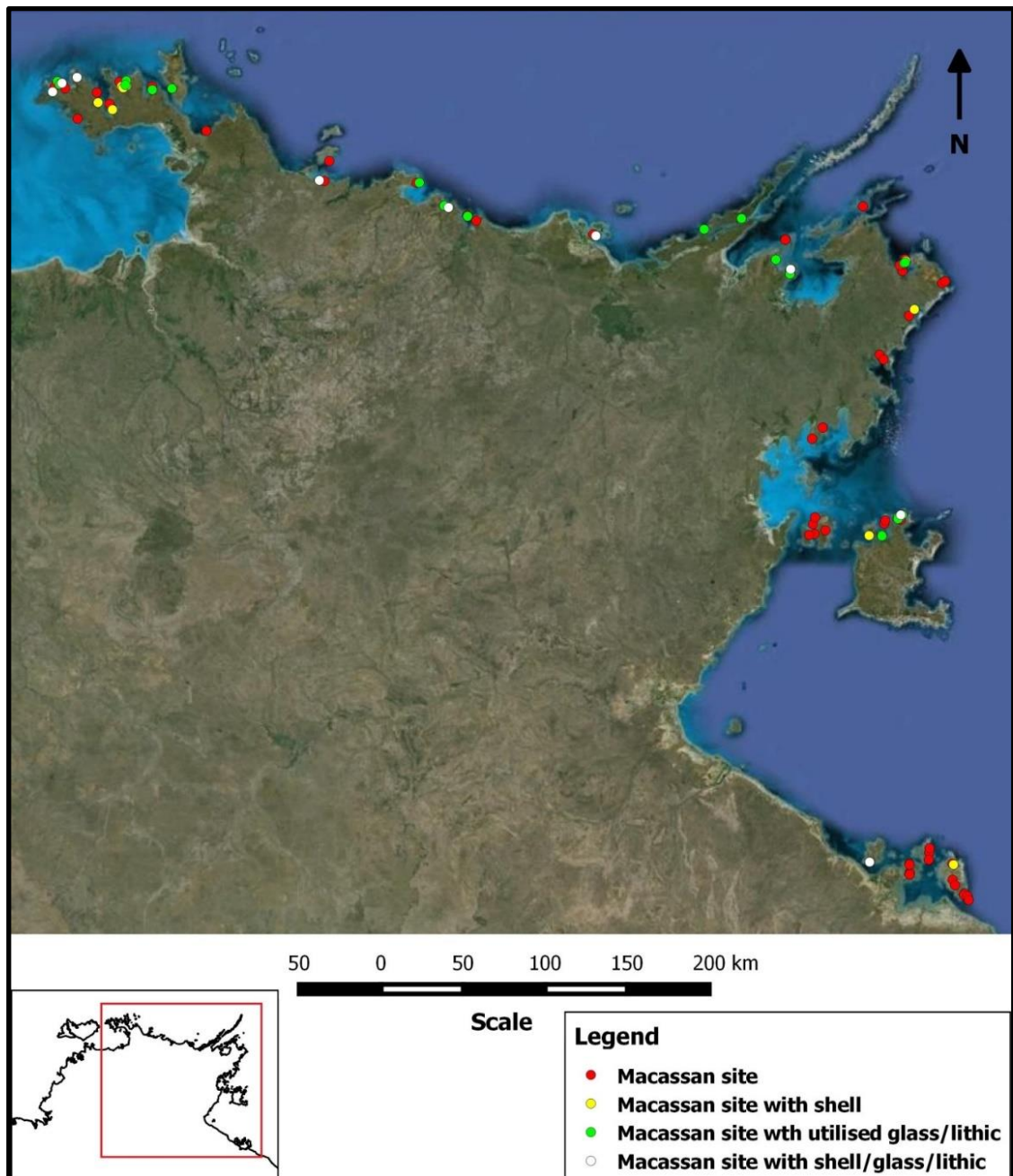


Figure 5.25 Macassan sites with shell middens, utilised glass and lithics created by First Nations peoples (Google Earth, 2013)

First Nations connections and responses to the Macassan trepang industry are also visible in stone pictures and rock art situated both close to and at a distance from Macassan trepanging sites (Figure 5.26). These sites are significant as they form part of the First Nations historical record that highlights relationships between First Nations peoples and the visitors to their shores (May et al., 2012:83).

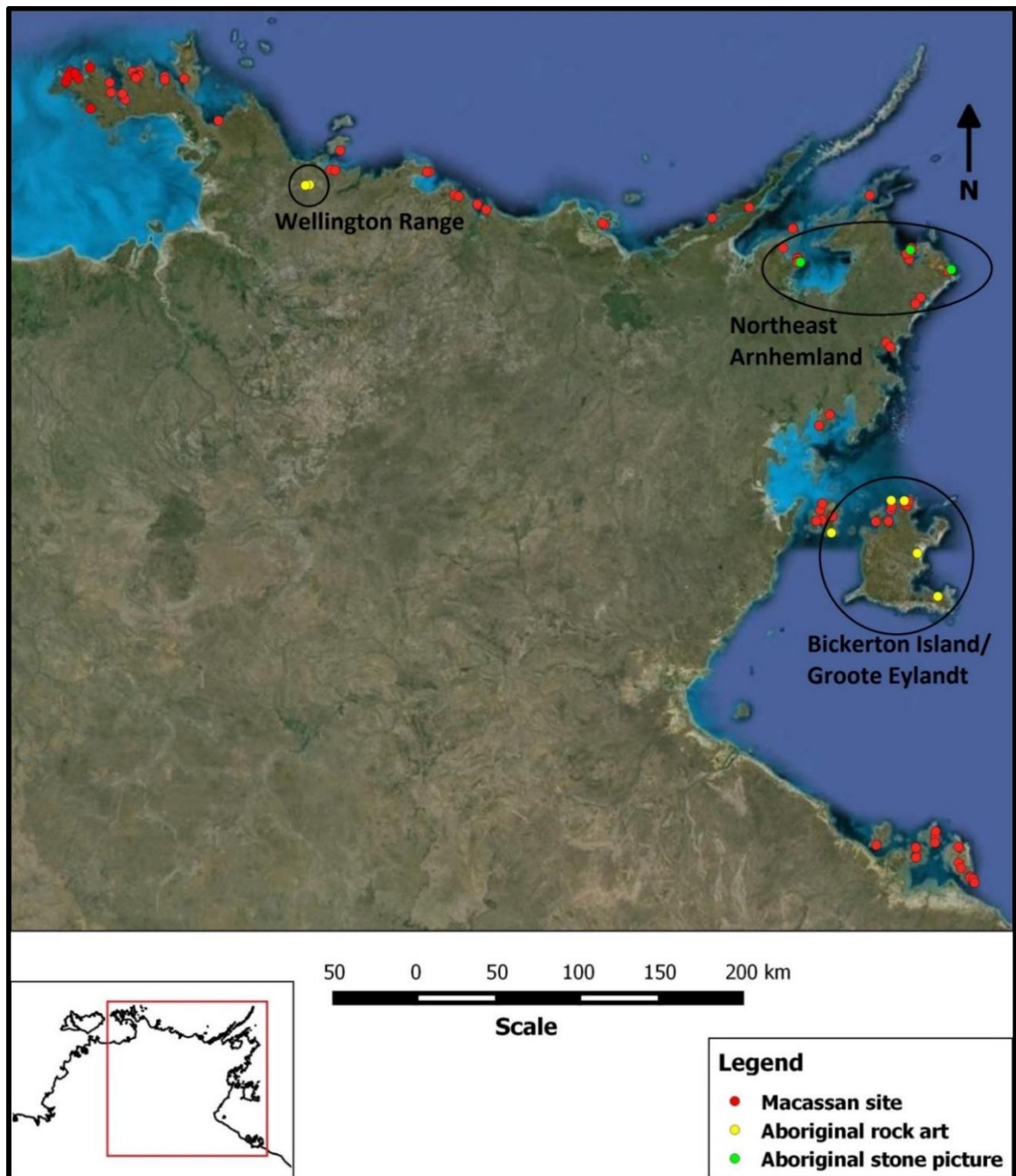


Figure 5.26 Locations of First Nations stone pictures and rock art in relation to Macassan sites (Google Earth, 2013)

Stone picture sites are located at Hardy Island in Arnhem Bay, at Galwoboi/Butjumurru at Drimmie Head, Melville Bay, and at Wurrawurrawoi 10 kilometres south of Yirrkala (Baker, 1984:23; Macknight and Gray, 1969). The Galwoboi/Butjumurru stone picture site at Drimmie Head has one undescribed stone picture associated with a Macassan trepang camp with two stonelines of five bays each (Baker, 1984:23). Located on rocky shelves that overlook the sea, the Hardy Island and Wurrawurrawoi sites are both over one kilometre distant from any Macassan trepang processing site (Macknight and Gray, 1969:33). With 19 and 45 stone pictures respectively, stone pictures include a variety of Macassan boats (Figure 5.27), Macassan and First Nations living quarters, stonelines, structures relating to the processing of trepang, a fish trap,

circular shapes, sharpening stones, and other shapes of which the meaning is unknown (Macknight and Gray, 1969). Unlike the symbolic nature of the majority of stone pictures around Australia, these are unique as they “depict the subjects they represent”. Although it is unknown as to what motivated the artist(s) to create these images (Macknight and Gray, 1969:37), it is clear from the detail of the stone pictures that they had an intimate knowledge of their subjects.

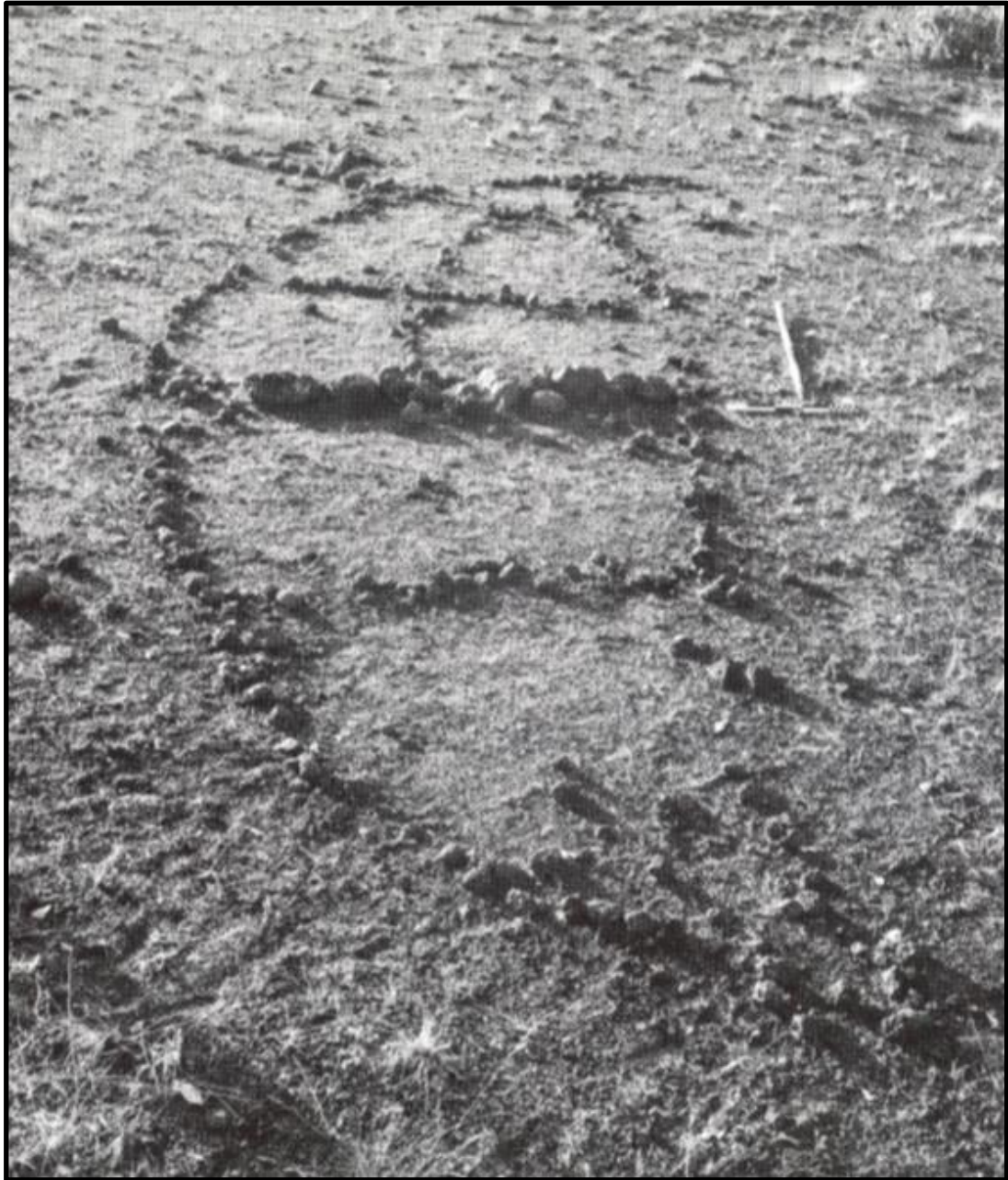


Figure 5.27 Stone picture of a perahu at Wurrawurrawoi (Macknight and Gray, 1969:37)

Intricate detail of Macassan-related subjects is also depicted in rock art. These images are located in the Wellington Range in northwest Arnhem Land (May et al., 2013; Taçon et al., 2010), on several locations around Groote Eylandt (Birmingham, 1994; Clarke, 1994, Clarke and Frederick, 2006), and on Bickerton and Chasm Islands to the northwest and north of Groote Eylandt respectively (Table 5.2).

Table 5.2 Known First Nations rock art sites with Macassan themes (amongst other pre-contact and contact themes)

Region	Site name	Image description (including only Macassan imagery)
Wellington Range	Djulirri	3 perahu; 22 non-Macassan watercraft
	Malarrak	1 perahu; a knife in a sheath; a possible smokehouse; possible monkeys in a tree
Groote Eylandt	Ayuwawa (Marngkala)	1 Macassan <i>libaliba</i> ; 1 Macassan <i>midjijana</i> (2 <i>libaliba</i> canoes inside); 2 bark canoes; 1 Macassan perahu with men and large trepanging knives and axe
	Angwurrkburna	Large detailed perahu painted out of hand's reach on ceiling of shelter
Bickerton Island (Amagaljuagba)	Änerufemadja	5 perahu; 5 dugout canoes; 51 misc. vessel parts (sails, paddles, rudders, bulwarks, flag)
Chasm Island	Chasm Island	2 perahu; 11 dugout canoes; 10 paddles
Chasm Island to North Point Island	West coast of Ilyaugwamaja	2 x small images of men in canoes
	West coast of Ilyaugwamaja	Perahu with seven men in rigging

The Wellington Range rock art sites of Djulirri and Malarrak are unique in their locations approximately 20 kilometres from the coast on the northern outlier of the Arnhem Land Plateau (May et al., 2012:85). This distance reflects the influences of contact far beyond the immediate place where contact occurred (May et al., 2013:52). Contact rock art such as that which contains Macassan themes reflects only one part of a broader range of art that covers a large geographic area and is utilised by numerous clans (May et al., 2013:46; Taçon et al., 2010:1). Images relating to Macassans from across coastal Northern Territory include perahus (Figures 5.28–5.30), dugout canoes, many miscellaneous vessel parts (sails, paddles, rudders, bulwarks, etc.), large trepanging knives, a knife in its sheath, a possible smokehouse, and possible monkeys in a tree, although these last two are debatable (May et al., 2013:48–9).

With the use of Accelerator Mass Spectrometry (AMS), dating of beeswax directly over the top of a Macassan perahu painting at the site of Djulirri suggests that the perahu was painted by at least 1664 AD or possibly earlier (May et al., 2013:47; Taçon et al., 2010:6). This date conflicts with historical accounts of the earliest arrival of Macassans to around 1780 (Flinders, 1814).



Figure 5.28 Perahus painted in white at Djulirri (Taçon et al., 2012:24, 28)

At both Wellington Range and Groote Eylandt, research into contact rock art highlights the enormous benefits of merging archaeology, rock art research and maritime history to interpret the contact period in Australia (May et al., 2012:86). Through this, the complexity of relationships between First Nations peoples and the Macassans (and Europeans and other groups), along with their representations, and exchanges that formed out of the process of culture contact, can be examined (Clarke and Frederick, 2006:117). At Groote Eylandt, the high number of anthropomorphic figures (generally considered humans) on perahus and their positions up the mast, on the top sail, in cabins and below deck “imbue the praus with a dynamism and their placement symbolically entwines the social with the technical features of the prau” (Clarke and Frederick, 2006:127) (Figure 5.30). These figures, and their actions, indicate the familiarity between artist, the subject and those who view it, and hence First Nations social agency and their close relationships with the Macassans.

As implied in rock art, First Nations relationships extended beyond these shores, on board the perahus and to the island of South Sulawesi. This is most evident in the photographs of First Nations men and children taken at Makassar (Figure 5.31), yet also visible in stories from those who themselves lived abroad (Lydon, 2014:140). These histories, and the multi-faceted disciplines of rock art and archaeology, extend First Nations-Macassan relationships beyond the economic to incorporate marriage and kinship ties that show the complexity and energy of these relationships.

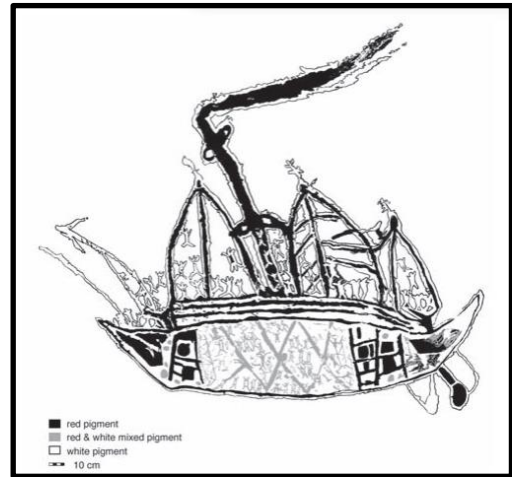


Figure 5.29 Superimposition of perahu at Marngkala Cave (Clarke and Frederick, 2006:125)

Figure 5.30 Perahu with 68 people from a Groote Eylandt rock art site (Clarke and Frederick, 2006:127)

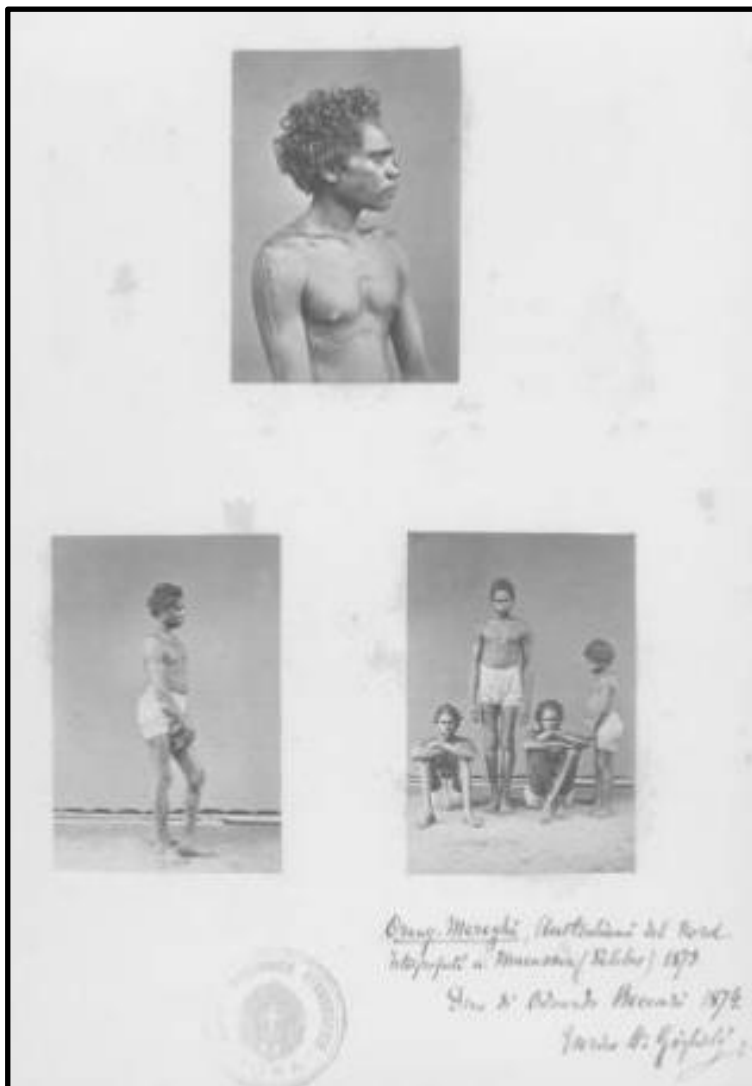


Figure 5.31 Odoardo Beccari, *Orang Meraghi. Australiani del Nord. Fotografato di Macassar (Selebes) 1873*. Collection Enrico H Giglioli, copia 4191. Museo Nazionale Preistorico Etnografico 'Luigi Pigorini', Rome. In Lydon, 2014:146)

5.11 Discussion

As is evident in the historical summary put forward, together with the subsequent ethnographic and archaeological research carried out over the past century, the Macassan trepang industry forms a significant part of the historical development of the Northern Territory—and indeed Australia—that connects this coastline explicitly to that of maritime Southeast Asia. The 190 plus sites recorded (100 of which can be confidently attributed to Macassan visitation) between Cobourg Peninsula and Sir Edward Pellew Group show the vast geographic space covered by the trepangers, with the dating of beeswax overlying a perahu at Djulirri at possibly prior to 1664 AD suggesting a timespan surpassing Flinders' estimation by over 100 years.

In compiling original coordinates from Macknight (1969b), Baker (1984), Cole (1984) and Taçon (1988) and data obtained from the Northern Territory Heritage Branch, sites are located on both the mainland and islands predominantly in sheltered bays and archipelagos. Larger sites with a higher number of stonelines were generally in the archipelago regions, reflecting their ideal environment for trepang habitation. Most significant, however, is the material culture produced at the trepang processing sites, and at a distance in stone pictures and rock art, that highlights the longstanding relationships shared between First Nations peoples and the Macassans, a relationship that surpassed economic benefits and extended in some cases to deep cultural ties, including First Nations peoples visiting and living in Makassar.

Chapter 6 – British garrisons

6.1 Introduction

As the third phase of the Northern Territory's historical development, the three British garrisons of northern Australia each represent a maritime cultural landscape of short-term British military occupation on the peripheries of maritime Southeast Asia and the southern colonies of Australia. Referred to as limpet ports by Blainey (in Allen, 1972:342), the aims of the garrisons of Fort Dundas, Fort Wellington and Victoria between 1824 and 1849 were to deter the Dutch and French from claiming the region as their own, to encourage trade with the eastern archipelago through the Macassans, and as a refuge for shipwreck survivors (Fredericksen, 2003:1; Powell, 2009:37). The outcome was a succession of remote outposts that, despite their efforts at trade, connected with the islands more for their own subsistence and survival as the maritime world developed around them.

This chapter explores the historical development of the garrisons as remote maritime communities set within the broader geopolitical region to the north, including British interests in China. In highlighting the importance of maritime Southeast Asia to the garrisons' creation, the chapter begins with a geopolitical overview of the region throughout the period of European colonisation. This is followed by an overview of each garrison, covering the physical environment, historical background, previous archaeological research, and archaeological and cognitive attributes. Visible through this also is the influence of the Commandants on First Nations/British relationships and those with the Macassans, as well as significant events that shaped the livelihoods of the inhabitants. A summary is then provided of garrison site locations within the context of maritime Southeast Asia.

6.2 Geopolitical setting

Prior to occupying northern Australia, the British had been active in maritime Southeast Asia for over two centuries through trade and colonisation and as a sailing passage between the major trading ports of India and China (Wilkinson, 1938; Cady, 1964; Colombijn, 2003; Powell, 2010:71; Lovell, 2011; Osborne, 2016:70–93). The colonies were managed first by the British East India Company and later by the British Crown. The first of these was Bencoolen (1685–1825) located on southwest coast of Sumatra (Wilkinson, 1938:127). As a trading colony for the export of pepper, Fort York was built upon the establishment of the settlement in 1685, followed by Fort Marlborough in 1714. Its location far from the trading route of the East India Company, however, led to the search for a better situated trading port later in the century. Bencoolen was

exchanged for the Dutch colony of Malacca in the Strait of Malacca through the Anglo-Dutch Treaty of 1824.

Located in the Strait of Malacca, the second colony of Penang (1786–1957) was better situated for the India-China trade route of the British East India Company (Wilkinson, 1938:133). Renamed Prince of Wales Island, Fort Cornwallis was built in the late eighteenth century and the port became a staging post for the opium trade. At the southern tip of the Strait of Malacca, the trading port of Singapore was founded in 1819, growing quickly into a bustling entrepot that secured trade with the western archipelago (Powell, 2010:71). Situated between Penang and Singapore, the fourth colony of Malacca (1824–1957) formed part of the chain of British colonies that later became the political entity of the Straits Settlements in 1826 (Cady, 1964:436) (Figure 6.1). In this year, the British had also annexed two coastal regions of Arakan and Tenasserim, Burma (Cady, 1964:304). In 1841, the private coup by James Brooke in Sarawak, northwest Borneo (Warren, 2002:97–100) and British control of Labuan Island from 1846 (Cady, 1964:439–40) further protected the eastern flank of the China trade.



Figure 6.1 [Section of] *Asiatic Archipelago* showing the British colonies of Penang, Malacca, Singapore and James Brooke's kingdom of Sarawak that lie en route between India and China. The earlier colony of Bencoolen was unsuccessful due to its remote location (Arrowsmith, 1848)

Prior to and during this time, British rivalry with the Dutch and the French was a constant in both maritime Southeast Asia and the Asian mainland (Cady, 1964:303–23). The Dutch controlled the main trading regions of the archipelago through the Dutch East India Company (VOC) up until

1800, followed by the Dutch Crown (Vickers, 2013:10). Forts were built strategically on the islands of Java, Sumatra, Sulawesi, Ambon, Maluku, Banda, Buru and West Timor to protect the industries of nutmeg, clove, pepper, coffee and other trade goods. The online database of Dutch and Indonesian cultural heritage, *Atlas of Mutual Heritage* (2015), exemplifies this through the GIS mapping of VOC, West India Company (WIC) and other pre-colonial Indonesian forts (Rinandi and Suryaningsih, 2015). Figure 6.2 shows the concentrations of Dutch forts in the Java and Banda Arc regions where exportable products were produced under Dutch control.

British interests in this region led to a number of Anglo-Dutch wars occurring between 1652 and 1810 with the later wars resulting with the British taking over Dutch territories; although these were handed back through the treaties that occurred after each war (Watson, 1917:918; Powell, 2009:37). The issue for the British throughout these years, however, was not so much the threat of war as Dutch monopolisation of trade goods in the eastern archipelago, in which the British East India Company and private British traders were determined to gain a foothold. This was despite the fact that the British had a flourishing monopoly on the tea and opium trades between India and China (Cady, 1964:303–4).

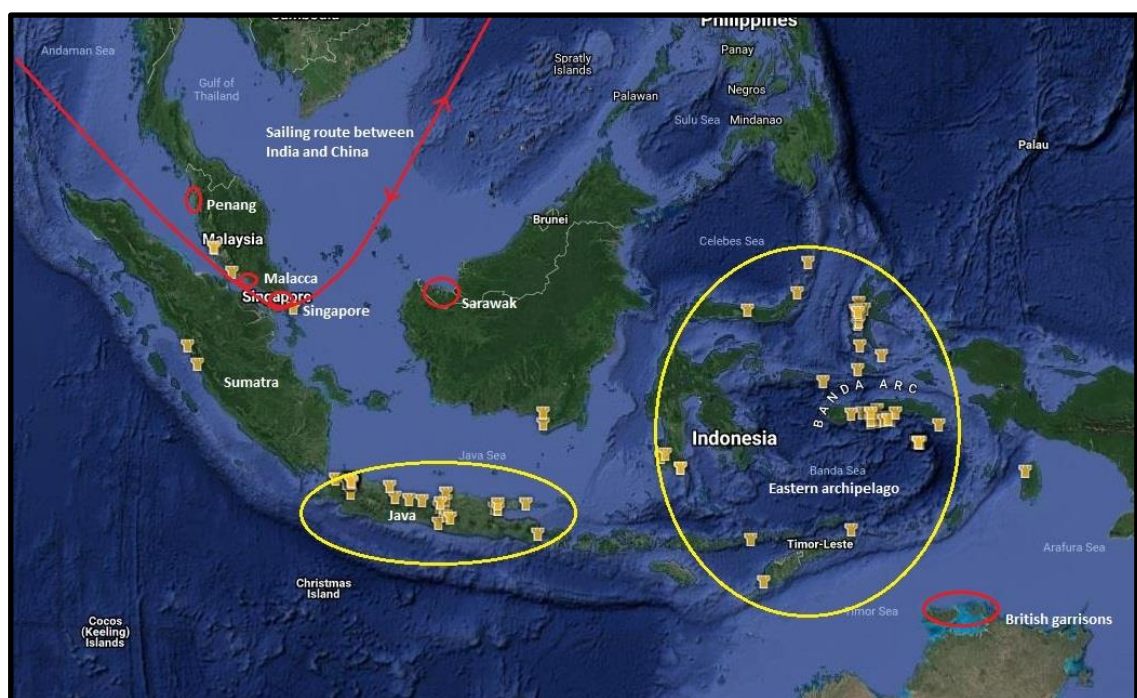


Figure 6.2 Locations of Dutch forts in maritime Southeast Asia. Yellow ovals indicate a high number of forts in Java and the eastern archipelago, with the red ovals showing areas of British colonisation (Atlas of Mutual Heritage, 2015; Rinandi and Suryaningsih, 2015)

Although opium was one of the primary British imports into China, it was illegal and unwanted by the Qing dynastic rulers, and in the 1830s, a state war against the British opium trade began (Lovell, 2012:3–5). This led to the first Opium War (1839–42), with Britain's victory evident in

the 1842 Treaty of Nanjing which opened the five treaty ports of Shanghai, Amoy (Xiamen), Canton (Guangzhou), Foochow (Fuzhou) and Ningpo (Ningbo), along with the cession of Hong Kong (Lovell, 2012:239). Altogether, by the 1840s, the British Empire had greatly extended its power over India, Burma, the coastal ports of China and through the Straits Settlements of maritime Southeast Asia, yet this did not appear to diminish the desire of private traders to enter the eastern archipelago.

In the early 1800s, masters of British East Indies trading vessels recognised that the commodities of the eastern archipelago such as trepang, pearl and tortoiseshell could also be obtained from the northern coasts of New Holland (Campbell, 1834:130). Thus, members of East India Trade Committee—in particular William Barns—rallied the Secretary for War and Colonies, Earl Bathurst, for the initial colonisation of northern Australia (De La Rue, 2006:25; Battersby, 2007:16). Barns saw the potential of creating a settlement in this region as a means of circumventing the regional trade monopolies of the Dutch and English East India companies (Fredericksen, 2001a:49; see also Cameron, 1985 & 1989). John Barrow, Second Secretary to the Admiralty, however, saw the potential of a northern settlement as a strategic step in preventing an extension of Dutch and French influence in the region, thus protecting the sovereignty of the soon-to-be Australian shores.

Following the survey of the north coast by Phillip Parker King (1817–21), the British Admiralty began preparations for the presence of a British garrison. In a pivotal letter to the then-Governor of New South Wales, Sir Thomas Brisbane, Bathurst declared on taking formal possession of the North West Coast of New Holland “...in the name of His Majesty of that part of the said Coast, contained between the Western Coast of Bathurst Island and the Eastern side of Cobourg Peninsula, including the whole of Bathurst and Melville Islands and the said Peninsula.” (Watson, 1917:227) The two objectives for the proposed British settlement were as follows:

“1st. As it regards the Commerce of the United Kingdom and Indian Dependencies, it is considered that, by the Establishment of a British Settlement on that part of the Coast above mentioned, a market would be opened to the British Merchant for the direct disposal of articles of British Manufacture with which he can now only supply the demands of the several Islands in the Eastern Archipelago by first Exporting the Articles to some of the Dutch Settlements, where they are subjected to a high duty with other vexatious Restrictions and impediments, before they can be re-shipped to the other Islands with a View to their ultimate disposal.

2ndly. As a Military Station involving the security of our important possessions and valuable Trade in that part of the World, The Establishment of the British in

the Proposed Situation would...not only furnish the necessary Protection to our Trade in that Quarter, but would give security to the East India Company's and the Indian Private Trade to China by the Eastern Route." (Watson, 1917:228)

Bathurst and Melville Islands and the Cobourg Peninsula represent the northern-most section of Australia and the closest points to maritime Southeast Asia. As pointed out by De La Rue (2006:12), the letter to Brisbane lacked any interest in developing the land of these potential settlements. Colonisation of this region, rather, appeared to be a maritime affair that allowed for the potential establishment of trade with the eastern archipelago directly to the north. "The principal object...to establish a commercial intercourse with the natives of various islands in the Indian Archipelago... might be brought about through the means of the Malays, who annually frequent these shores in considerable numbers, for the purpose of procuring trepang." (Wilson, 1835:123) To Jim Allen (1972:350), these trade-heavy discussions, especially for the later garrison of Victoria, were little more than "lip service". This view is supported by the heavy monopoly of the British East India Company on the trade of opium and tea between India and China contemporary to the timing of British garrisons in northern Australia. With British trade focused in the north of the archipelago, the primary purpose of the north Australian garrisons was, first and foremost, to protect the sovereignty of the new British territory from the threat of Dutch and French colonisation.

6.3 Fort Dundas (1824–29)

Physical environment

Terrestrial setting: Fort Dundas is located on the western side of Melville Island, 24 kilometres south from the northern mouth of the Apsley Strait (Figure 6.3). Situated at Point Barlow (Punata), the settlement was built on a low sandstone point with an elevation of around five metres (Crosby, 1978:1–2). De La Rue (2010:2) describes this site as "an incongruous choice for settlement" with the land being dry and stony and unsuitable for horticulture. The original vegetable garden was situated north of King Cove at Garden Point (Pirlangimpi) where a freshwater lagoon and a number of freshwater creeks were located. The availability of fresh water was a primary factor for the site selection for the first northern British garrison, with Captain James John Gordon Bremer choosing Melville Island over the first preference of Port Essington for this reason (Goodman, 2004:131).

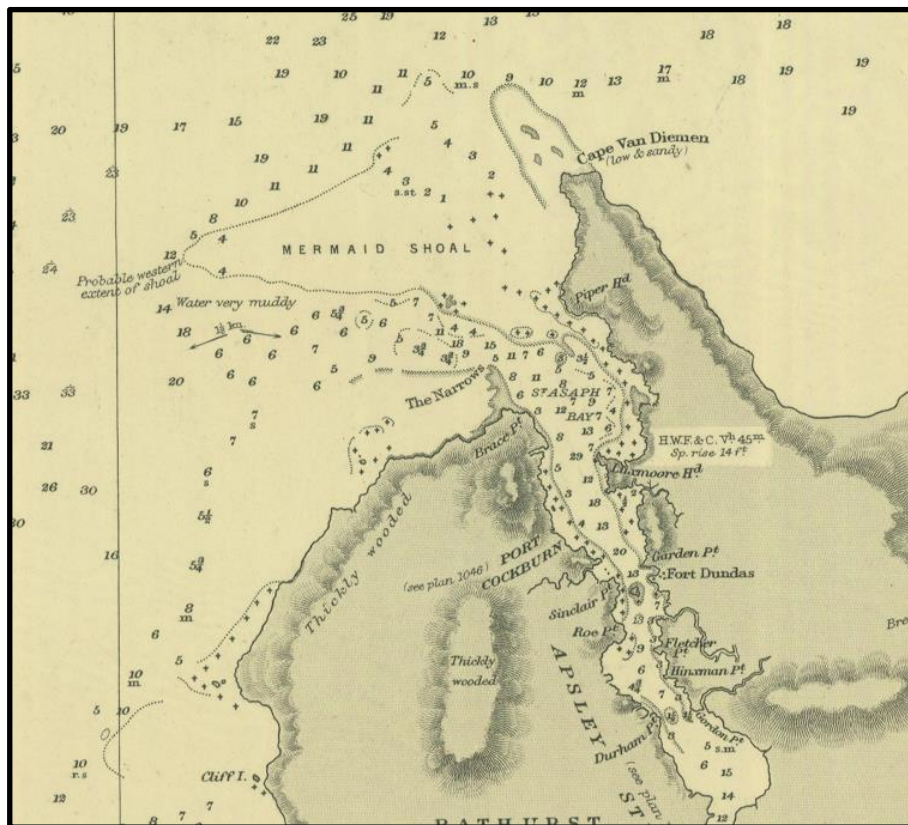


Figure 6.3 [Section of] *Australia-north coast, Melville Island with Dundas and Clarence Straits* showing the location of Fort Dundas in relation to the middle and northern extents of the Apsley Strait (Great Britain. Hydrographic Department, 1883)

Maritime setting: Situated deep within the Apsley Strait, the maritime environment of Fort Dundas offered protection against the possible threat of invaders, yet it hindered potential trade (Crosby, 1978:2; De la Rue, 2010:2). Major Campbell (1834:134) described the Strait as being “intricate, attended with danger, and required much caution, in consequence of extensive reefs, strong currents, and sand-banks, which embarrassed its entrance”. Running between Bathurst and Melville Islands for a distance of around 80 kilometres, the strong currents of the Apsley Strait flow between the Timor Sea into the Beagle Gulf. From the northern entrance, the width of the Strait is between two and three kilometres, with a narrow passageway between 20 and 53 metres in depth depending on the tide. Located six kilometres north of the Strait mouth, the marine hazard of the Mermaid Shoal extends 15 kilometres west from the mouth entrance. To enter the Apsley Strait, ships would have had to sail in from a westerly direction, sticking to the deeper centre of the Strait to avoid the mudbanks visible at low tide. Once through these obstacles, ships could find relative safety at the anchorage of Kings Cove between Point Barlow and Garden Point, as is evident in both the chart and painting of Fort Dundas (Figures 6.4 and 6.5). The high tidal range of around seven metres offered the potential for the construction of dry-docks at Kings Cove, with the location of the garrison at Apsley Strait chosen on this account (Earl, 1846a:4 in De La Rue, 2006:124), although this appears not to have been fulfilled.

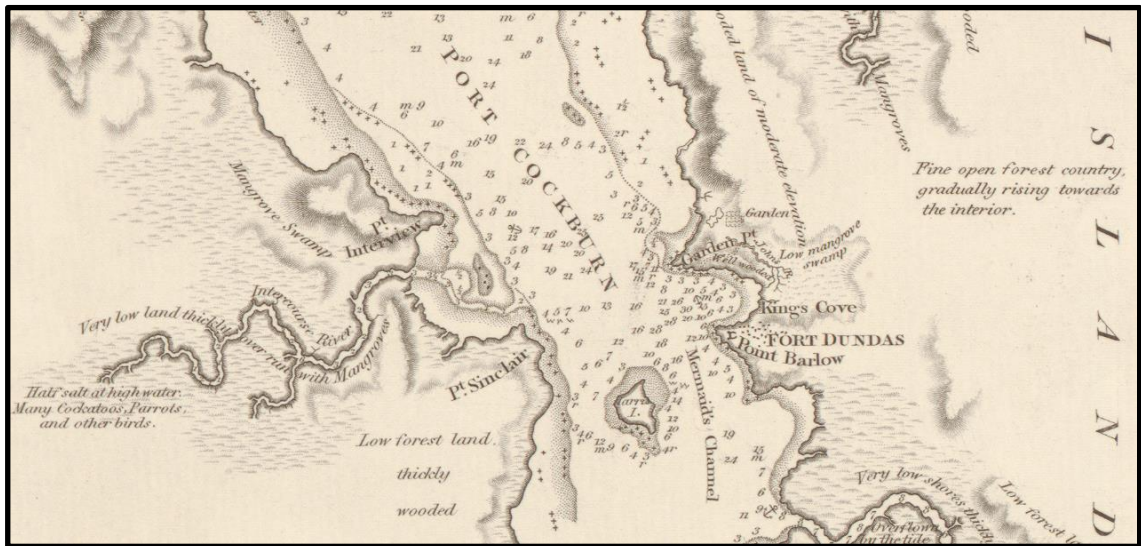


Figure 6.4 [Section of] *A survey of St. Asaph Bay and Port Cockburn, with part of Apsley Strait on the north coast of Australia* showing anchorages at Kings Cove (Great Britain. Hydrographic Dept. et al., 1826)



Figure 6.5 *Fort Dundas from the point near Port Cockburn, below Melville & Bathurst Islands, Australia* showing ships anchored at Kings Cove (Smith, 185-?)

Historical overview

As discussed above, the first choice for a British outpost in northern Australia was Port Essington, yet as fresh water could not be sourced there at the time, Bremer chose instead the west coast of Melville Island (Campbell, 1834:131). Bremer and the new inhabitants of the garrison arrived at

Point Barlow in 1824 on the Conway class sixth rate warship HMS *Tamar* (450 tons), the trading/transport vessel *Countess of Harcourt* (491 tons) and the Colonial brig *Lady Nelson* (61 tons). These larger war ships and barques of between 400 and 700 tons transported residents to and from all three garrisons and provided supplies from Sydney and maritime Southeast Asia throughout their occupation. Their role as couriers to and from the garrisons, however, was small compared to their overall service to the British Empire, the *Countess of Harcourt* having transported convicts to Sydney prior to sailing to Melville Island, then continuing on to Mauritius (Campbell, 1834:132; Watson, 1917:838). Once the garrison took shape, Bremer sailed to India in the HMS *Tamar*.

After Bremer's departure, a succession of Commandants managed the garrison (Frederickson, 2001a:49). These were Captain Maurice Barlow from 1824, Major John Campbell from September 1826, and Major George Hartley from March 1828 until the garrison ceased in 1829. As an ephemeral community, there were a number of changeovers over the period of four-and-a-half years. Upon commencement, the population was around 125 people (Campbell, 1834:134). These were the Commandant, surgeon, three commissariat officers, 27 Royal Marines, 24 British troops from the 3rd Regiment of Foot and 45 convicts (Campbell, 1834:130; Frederickson, 2001a:49). These were replaced at a later date by 43 members of the 57th Regiment of Foot, the free mechanics (bricklayer, nail-maker/blacksmith, and sawyer) and around 43 convicts. Not quite an occupant, Palmer, Wilson and Company of the East India Trade Committee sent the schooner *Stedcombe* (128 tons) captained by William Barns to the garrison in 1824 to trade with the eastern archipelago (Powell, 2010:73), the comparatively larger size of the vessel utilised to procure supplies from Kupang and the eastern archipelago.

Construction of the garrison

Although the garrison at Fort Dundas was a "response to the activities and interests of the Asian North" (De La Rue, 2006:12), the activities undertaken there were limited due to its geographical position, and a lack of maritime transport and men. Within three months of arriving, the wharf, commissariat store, stockade, well, officers' houses and other cottages were built (De La Rue, 2010:1). Most structures were built from local timbers, with only two prefabricated houses shipped up for the officers (Fredericksen, 2001a:58). Located near the wharf, the commissariat store measured 18.3 x 5.5 metres (Figure 6.6). To Frederickson (2001a:53), this seemed large for a store in a pioneer military settlement, yet may have reflected the hopes of trade with the north. In contrast the first wharf, visible in a contemporary map of the settlement (Figure 6.11), was a relatively short structure (De La Rue, 2010:3–4). At high tide it would have been accessible, yet at low tide it stood clear on the mudflats. In late 1826, Campbell wrote of the wharf's insufficiency, "being overflowed at Spring tides and unapproachable by boats at low water", requesting the wharf

to be projected “thirty feet further out and raised two” (Watson, 1923:680); which occurred the following year. Construction and maintenance at Fort Dundas continued throughout its occupation due to the initial poor construction of buildings and their rapid deterioration through white ants and destructive weather events.

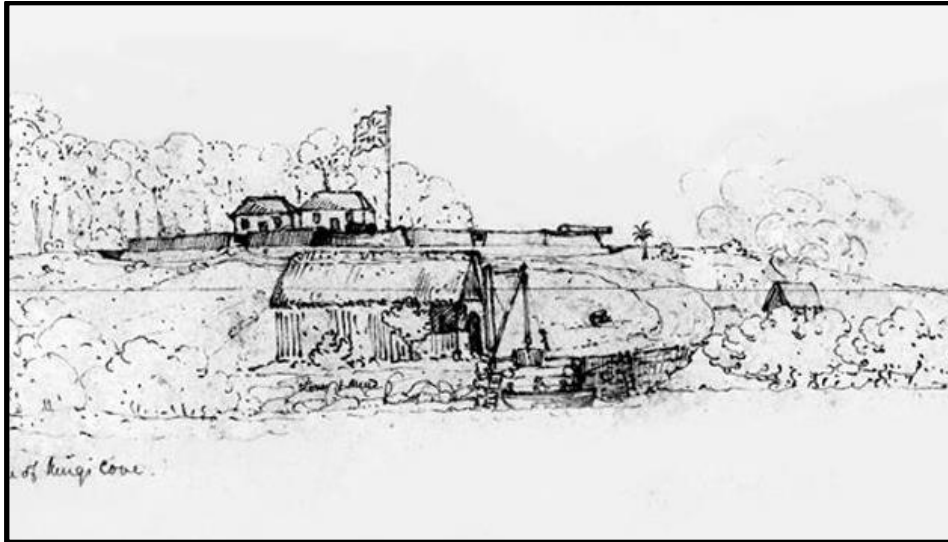


Figure 6.6 [Section of] *View of the settlement of Fort Dundas founded by HM Ship Tamar in Port Cockburn, Melville Island Nn Coast Australia. November, 1824* showing wharf and commissariat store (Roe, 1824 in De La Rue, 2006:11)

In looking inland, the layout and construction of Fort Dundas did not take into account hostile relationships with the Tiwi peoples. As De La Rue (2010:2–4) points out, the separation of the vegetable gardens from the garrison would have made for difficult and dangerous passages for the British intruders. The earthen-walled design of the fort also provided little protection against the Tiwi, or Malay pirates, the reason put forward as Bremer’s intention in constructing it. According to the British War Office, palisades were essential for the anticipation of lightly-armed attackers such as the Tiwi.

The Tiwi people represented the wider community who, as the traditional custodians of the region, held a permanent presence around the outskirts of the garrison during its time of occupation. Recorded interactions between Tiwi custodians and the British provide glimpses into the bilateral tension that existed at Fort Dundas (De La Rue, 2006:13). Aside from Tiwi raids and attacks on the colonists, however, little has been researched of the Tiwi experience during British occupation. Exceptions are the narratives of Mrs Hicks’ grave and Tambu’s cell (Figure 6.7), with Tambu’s cell published by the Nguiu Nginingawila Literature Production Centre (1985) for Tiwi school children (Fredericksen, 2002:294–8). This narrative has been passed down through the generations, with diverging stories all having in common Tambu’s imprisonment in a Fort Dundas dry well. The narrative reads:

“Then another time the soldiers were on their way with some convicts to get water from Munupi [near Pularumpi]. The Tiwi also came for fresh water at the same place. One day they had a fight. One little boy called Keripa was wounded by a musket bullet. One big man called Tambu was also wounded. The soldiers grabbed him and tied him up with strong ropes. Then they took him to the fort as a prisoner. Then they put chains on him. Tambu was taken to the hospital. Then he was better. Later they could not find a jail for him so they put him inside the dry well near the fort. Some people say that Tambu was so strong that he broke the chains and ran away.

Other people say that he stopped eating and became skinny. Then he slipped the chains off his legs and arms and climbed out of the well and ran away. The same evening, Doctor Gold the doctor of the fort and Green, the manager of the store, were speared, Tambu escaped to Malawu on Bathurst Island.” (Nguui Nguiningawila Literature Production Centre 1985:12 in Fredericksen, 2002:297–8)

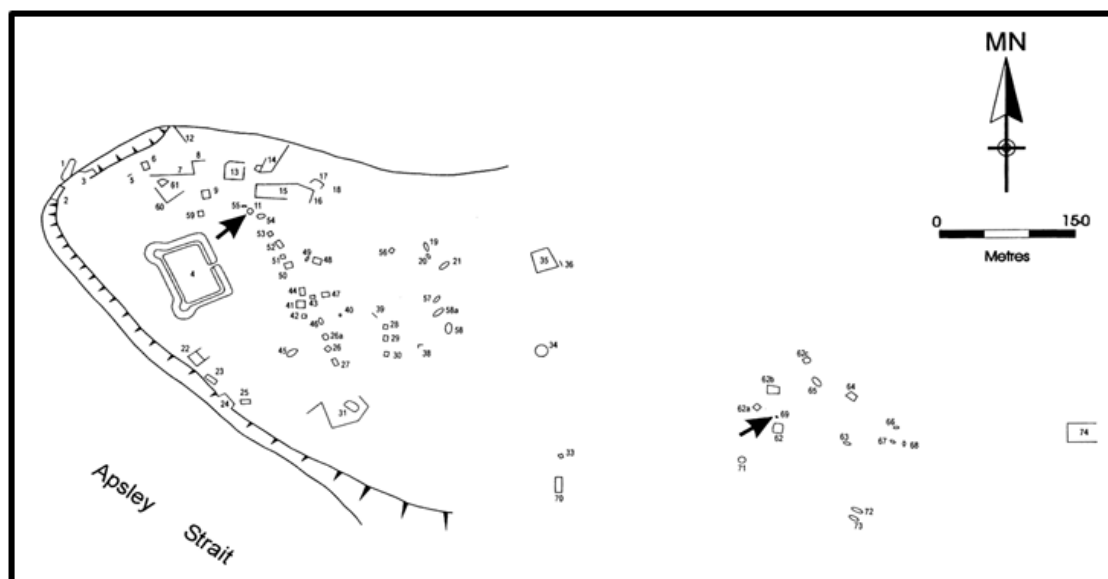


Figure 6.7 Fort Dundas/Punata archaeological site map after Crosby (1978). Arrows show the well (left) and grave (right) from Tiwi narrative (Fredericksen, 2002:295)

As with the Dutch and the Macassans in this region, the British were a group of transient visitors. “Their brief contact provides not a point of cultural disruption but an element, albeit an important one, woven into the tapestry of Tiwi History.” (Fredericksen, 2002:298). As the traditional owners of the land on which Fort Dundas sits, the Tiwi now control physical access to the site; holding the history of the site as an important aspect of Tiwi identity.

Loss of HMS Lady Nelson and Stedcombe

A significant event that led to an island-bound community within a few months of occupation was the loss of the garrison's supply vessel HM Colonial Brig *Lady Nelson* and the East India Trade Committee's schooner *Stedcombe* (128 tons). According to the accounts of the garrisons, these vessels were not large enough to carry in one trip sufficient supplies of fruit, vegetables and livestock from Kupang; requiring several supply runs to sustain the garrison (Watson, 1923:646). Leaving Fort Dundas within a week of each other in February 1825, they had intended to trade with the islands in the eastern archipelago and establish an entrepot at Fort Dundas (Spillett, 1982:1). The *Lady Nelson* was pirated off the coast of Babar Island with all on board murdered. The *Stedcombe* met a similar fate off the east coast of Timor Laut (present day Yamdena Island), where all on board were murdered save two boys, Joseph Forbes and John Edwards.

The loss of the *Lady Nelson* and *Stedcombe* provides an insight into British, Dutch and eastern archipelago islander communications in the early nineteenth century. Three months after the vessels had departed Fort Dundas, Commandant Barlow of Fort Dundas sent a letter to Major Ovens in Sydney via the *Dundas* stating his belief that the ships had either wrecked or had "fallen into the hands of Malay pirates" (Spillett, 1982:5). After visiting Fort Dundas in June 1825, the Sloop HMS *Slaney* sailed to Kupang to gain further information; the resident Governor suggesting pirates due their great numbers settling in the islands north of Timor. Meanwhile, in August 1825, Lieutenant Dirk Kolff, Commander of the Dutch Brig of War *Dourga*, visited eastern archipelago islands on behalf of the Dutch East India Company (Spillett, 1982:5). On his journey, Kolff learnt of an English vessel that had been pirated by the people at Aloetor, Babar, with the crew murdered and the brig plundered and destroyed (Spillett, 1982:6). In continuing his voyage to Watidal on the west coast of Larat, Kolff learned of the second English ship that was pirated at Laoera, Timor Laut, where all were murdered except two boys, the schooner also plundered and destroyed. One village chief stated that he had seen "the chain cable of the brig hanging around the village, and that two carronades ... lay there on the ground, the natives not having yet mustered sufficient courage to fire them off" (Spillett, 1982:6).

It was not until August 1826 when Captain Deliotte of the ship *Faith*, arriving in Sydney from London, reported that a ship's hull with 'Lady Nelson' painted on the stern had been seen at Babar Island (Spillett, 1982:9). One month later, news of the *Stedcombe's* demise was received through a French merchant at Kupang when the replacement supply vessel, the Colonial cutter *Mermaid*, arrived at Fort Dundas via Kupang. Despite this knowledge, a contemporary chart mistakenly annotates *Lady Nelson* as being plundered at Timor Laut, with no mention of the *Stedcombe* (Bateman and Horsburgh, 1839) (Figures 6.8 and 6.9).

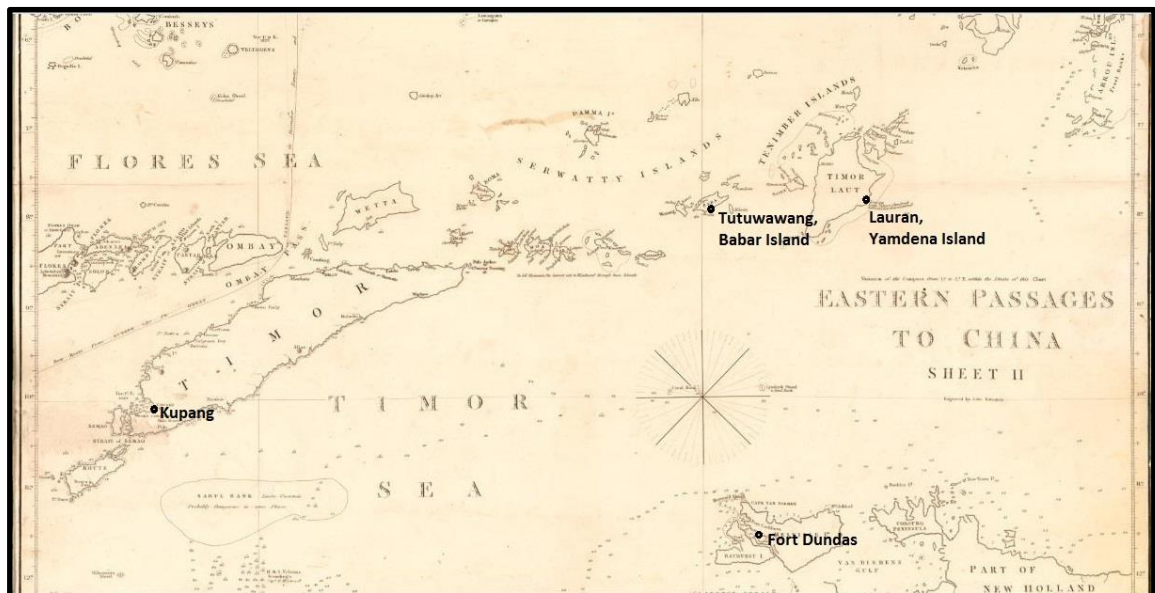


Figure 6.8 [Section of] *Eastern Passages to China Sheet II* chart showing locations of the *Lady Nelson* and *Stedcombe* piracies in relation to Fort Dundas (Bateman, n.d.)

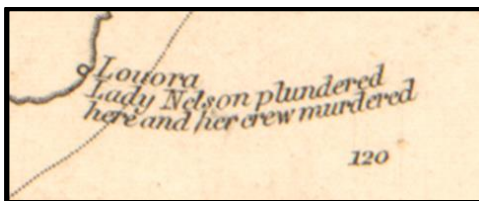


Figure 6.9 [Section of] *Eastern passages to China: sheet II* showing the incorrect annotation of where the *Lady Nelson* was plundered. This was the site where the *Stedcombe* was plundered (Bateman, n.d.)

Island life without a boat

With a shortage of maritime transport after the loss of the *Lady Nelson* and *Stedcombe*, Fort Dundas' location off the transport routes restricted the ability to procure supplies independently until the cutter *Mermaid* (84 tons) was sent up in May 1826 (Watson, 1923:650; Powell, 2010:74), more than a year after the departure of the lost vessels. Even before this, boats were in short supply, with Captain Barlow requesting a whale boat from Port Jackson "as the country is intersected by creeks in every direction" (Watson, 1923:646). Although the garrison originally had two ships' carpenters, they both departed for Kupang in 1828 after receiving their tickets of leave (Watson, 1923:646, 712). Attempts at boat-building occurred regardless, with a boat built in secret two miles from the garrison for a group of convicts to escape the island (Watson, 1923:722). Foiled in their attempt, the 20-foot whale boat was described as so poorly-constructed that the convicts would never have survived the journey.

Local and imported resources

As local resources appeared to be beyond the newcomers' reach, the majority of supplies were imported into Fort Dundas from Port Jackson and the Dutch colony of Kupang on Timor. Having proven itself to the British surveyors a relatively safe place to procure supplies, and as the closest colony to the garrisons, Kupang was the primary port for provisions and forwarding communications between the colonies and England through passing colonial and trading vessels (Watson, 1923:645, 660–8; Cameron, 1999).

Food supplies brought in from Sydney and Kupang included cocoa, mango, tamarind, yam and millet (Watson, 1923:645), with buffalo, pigs, cattle and sheep also imported with varying degrees of success. After two years of numerous failures at keeping sheep alive, it was recognised that they were not suited to the tropical region with recommendations to cease supply (Watson, 1923:665). Imported livestock was necessary as kangaroos were reported as scarce and very small (Watson, 1923:656). Although there was a desire to consume fish resources, there was only one boat in the garrison (Watson, 1923:646). An extra boat and seine were requested by Barlow in August 1825 for this purpose (Watson, 1923:652). Other non-consumable resources requested were nails, white paint, glass and iron from Sydney (Watson, 1923:646).

The importation of virtually all resources required for subsistence and habitation over the four and a half years of occupation demonstrates the foreignness of this new landscape along with the inability to obtain resources from a close proximity with any regularity. As put forward by De La Rue (2006:128), the human energy required to be able to utilise local resources was instead required for the support of the Fort. In stating this, imported fruits and vegetables were grown one kilometre north of the garrison at Garden Point, where there was fertile soil and fresh water. This location, however, involved the risk of attack by the Tiwi custodians due to its distance from the garrison proper and the poor relationships between custodian and invader (De La Rue, 2006:98). Testimony to the danger of this was the fatal spearing of Julius Campbell on the road to the gardens in 1826 (Watson, 1923:685).

Transfer to Fort Wellington

It is argued that Fort Dundas succeeded in its purpose as a military outpost, with its termination occurring at a time when Dutch and French interests were focused elsewhere (De La Rue, 2006:144, 2010:9). The aim of trading with maritime Southeast Asia through the Macassans, however, continued contemporaneously at Fort Wellington, with the remainder of Fort Dundas' people, stores, provisions, building materials, fruit trees and livestock relocated to Raffles Bay (Watson, 1923:xxii, 765; Powell, 2010:73).

Previous archaeological research

A number of archaeological surveys and excavations were carried out at Fort Dundas between 1975 and 2003. In 1975, Eleanor Crosby (1978) mapped the surface remains of the site (Figures 6.7 and 6.10), carried out an extensive surface collection, and excavated a trench through the fort wall (Fredericksen, 2003:1). Crosby returned in 1978 to excavate Structure 41 (S41), recording it as a ‘hovel’ for the marines or convicts (Fredericksen, 2003:1–2). This was followed by a further survey and excavations in 1986 by Reynolds as part of Operation Raleigh (see De La Rue, 2006) and by Pengelly (1986) for the Northern Territory Department of Lands (Fredericksen, 2003:2; De La Rue, 2006). Artefacts recovered from these surveys consist mainly of glass and ceramic fragments, totalling 824 fragments for the 1975 survey and 397 from 1986. These have not as yet been analysed in detail.

As a jointly run project between the Northern Territory University (NTU) and Tiwi Land Council, the NTU Fort Dundas Research Project undertook fieldwork between 1999 and 2003 that resulted in a number of publications on the site (Fredericksen and Walters, 2002:32; Fredericksen, 2000, 2001a, 2001b, 2002a, 2002b, 2003:2; De La Rue, 2006). The first season involved the initial examination of the overall site and the excavation of what was thought to be the commissariat store (S2). Two stone retaining walls were located at either end of the store terrace from which a large quantity of bottle glass was recovered. The following year, the fort was mapped digitally and excavation was undertaken on the possible localities of the hospital (S31) and Commandant’s quarters (S22). In 2001 and 2002, sections of the fort were excavated (De La Rue, 2006:8). This project resulted in two Honours and one Masters theses (Fredericksen and Walters, 2002:32), the latter by De La Rue (2006) whose aim was to investigate and interpret the apparent anomalies between documentary accounts and material remains of the site. Focus was centered on the structural remains of the fort with the intention of evaluating the military component of the settlement. De La Rue argued that although documentary evidence points to Fort Dundas being a commercial trading port, the location of the site and structure types suggested defensive tactics. This outcome overturns common perceptions of Fort Dundas as a failed settlement, instead likely a strategic instrument of a British military gambit (De La Rue, 2006:3). Noting, however, that forts were also built at the British trading settlements of Bencoolen, Penang and Singapore, the intention of trade at Fort Dundas cannot be ruled out.

The site map by De La Rue (Figure 6.10) shows the extant wharf that matches the contemporary map of the site by the Surveyor General in 1827 (Figure 6.11). A letter from Commandant Campbell (Watson, 1923:697) describes the destruction of this wharf in a gale in April 1827, with a new wharf constructed of heavy logs and piles projecting a further nine metres out to allow for

cargoes and stores to be landed at both high and low tide. This extension is not as yet present in the archaeological record.

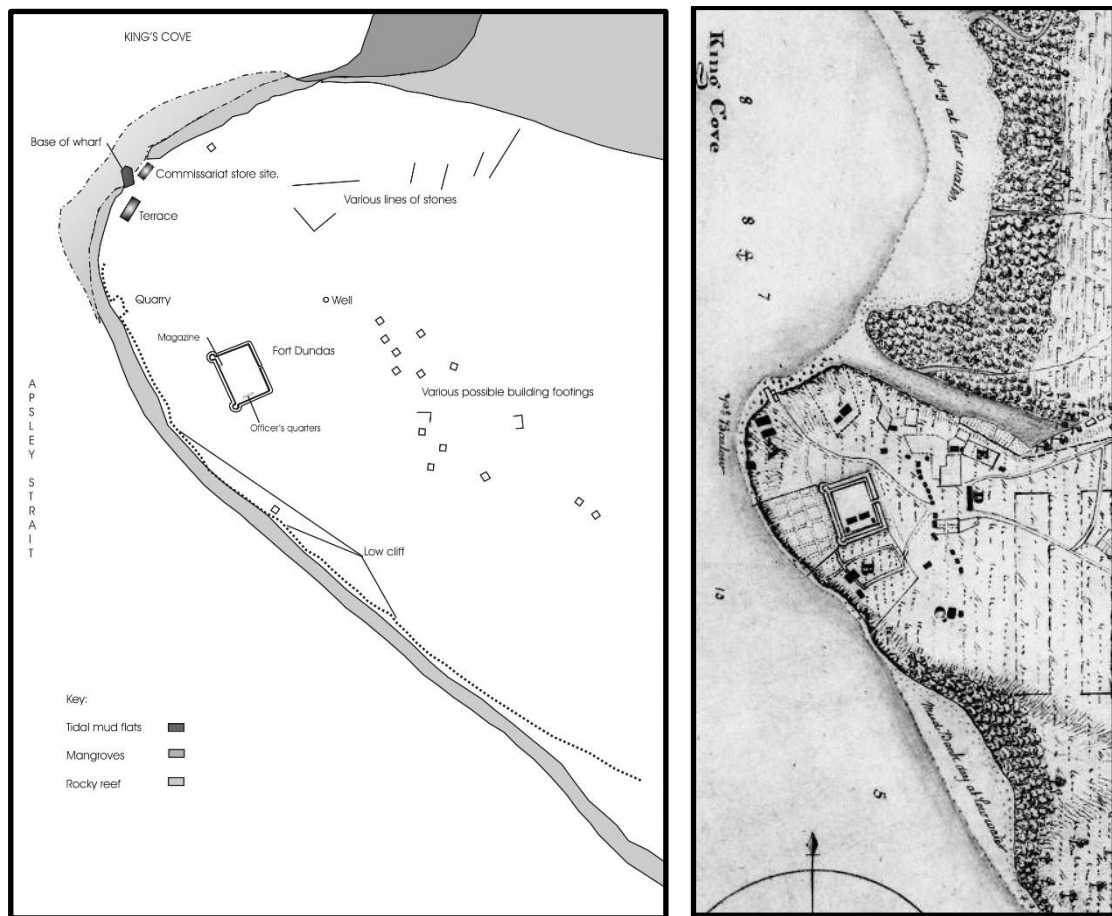


Figure 6.10 Map of Point Barlow from (De La Rue, 2006:41 [after Crosby, 1978])

Figure 6.11 [Section of] *The British Settlement of Fort Dundas on Melville Island. In Lat. 11° 24' 55" S & Lon. 130° 28' 25" E 24 April 1827* showing wharf at low tide (Surveyor General, 1827 in De La Rue, 2006:38)

Further afield, Northern Territory historian Peter Spillett undertook fieldwork at Babar Island and Yamdena Island in 1981 to determine the fate of the *Lady Nelson* and the *Stedcombe*. At Yamada Island, Spillett met with the Bapak Raja of Lauran, Norbert Bwariat, and his family, who provided information on John Edwards, the *Stedcombe* cabin boy presumed dead at the time of Joseph Forbes' rescue in 1838 (The Sydney Gazette and New South Wales Advertiser, 20 July 1839:3; Spillett, 1982:30). According to Daniel Taborat, the holder of traditional stories, John Edwards had been moved to a nearby village where he married and had children. Spillett met and photographed many of the potential descendants of John Edwards and recorded the family tree (Spillett, 1982:47). On enquiry as to the extant remains of the *Stedcombe*, Spillett was taken to a house in the village of Lauran where the potential *Stedcombe* cannon was kept. At the time of viewing, Spillett could not see any markings to indicate its origin. Spillett was informed that a smaller bronze gun was located at Olitlit Lampah, the anchor chain at the Administrator's office

in Saumlaki, the anchor at Kampung Wowonda and the iron steps at Olilit Lamah. On Babar Island, Spillett located the potential carronade of the *Lady Nelson* in the southeastern village of Tutuwawang (Spillett, 1982:39–40). The carronade was marked with a broad arrow and the numbers ‘6-1-7’. These physical remains and the stories that were passed down provide a very strong historical connection between the Northern Territory and maritime Southeast Asia.

Archaeological attributes

Site type: British garrison (military settlement)

Site size: Approximately 1.16 km² (excluding the vegetable garden)

Features: Fort, commissariat store, stone wharf, Commandant’s house, hospital, habitation structures, wells, terraces, quarry and rubbish pit

Artefacts: Fredericksen (2003:8–10) tabled artefacts collected from surface collections and excavations between 1975 to 2000:

- Ceramic (506)
- Glass (>3,234): mostly broken alcohol bottles
- Metal (>2,284): includes musket balls (2); metal buttons (7); key, chisel; door hinge (3) and Shako plate
- Other: stone (51); brick (172); gun flints (5), clay pipes (69); slate pencil; slate roofing (42)

Although a comprehensive analysis of the Fort Dundas artefacts has yet to be undertaken, Fredericksen (2003:2–4) noted a number of trends. The dominant artefact of glass consists primarily of broken alcohol bottles suggesting the importance of alcohol in a remote British garrison. Around half of the overall artefacts were collected from the commissariat store (S2) and rubbish pit (S65), with the other half collected from in and around other site features. An exception to this was the low number of glass (5.6%) and ceramics (2.5%) and high number of metal (85%) collected from the Commandant’s house (S22). Reasoning for this is the posited high status and thus cleanliness of the Commandant’s house where glass and ceramic would have been disposed of at a distance from the structure rather than around it. The high count of metal fragments, on the other hand, is mostly from nail fragments, indicating that S22 was made partially or wholly of wood.

Artefacts associated with domestic living including clay pipe fragments, a spoon, buttons and pencils were recovered from the hospital (S31), Commandant’s house (S22), Royal Marines (41) and/or convict habitation structures (S44 and S47), Military related artefacts including musket

balls, gunflints and powder flask were also retrieved from S22 and S41, with the brass Shako plate from the head dress regalia of the 3rd Regiment of Royal Marines collected from the fort. Roofing slate fragments, generally associated with high status structures, were mostly from the Commissariat store (S2) and Commandant's house (S22), yet that slate is recorded to have been previously collected from across the site by members of the Pularumpi community c these findings.

Cognitive attributes

Place names: given by Captain Bremer upon landing at the settlement (Campbell, 1834:131)

- Point Barlow – for Captain Barlow, 3rd Regiment and first Commandant of Fort Dundas (Campbell, 1834:131)
- Garden Point – named for the location of the vegetable garden
- Kings Cove – named after Phillip Parker King (Searcy, 1909:221)
- Port Cockburn – for Vice-Admiral Sir George Cockburn, GCB (Campbell, 1834:131)
- Fort Dundas – named for Robert Dundas, the First Lord of the Admiralty (Spillett, 1972:13)

That Fort Dundas carries the name 'Fort' suggests that its role was as a military garrison more than a trading port. Most major colonial trading ports in maritime Southeast Asia had defensive military structures, yet none of these settlements contained the military title in their name. Named on its inception in 1824, Fort Dundas represents the first settlement entitled Fort in Australia, reflecting its role as the first solitary British garrison protecting the sovereignty of the British colony situated on the southern periphery of the Dutch-dominated maritime Southeast Asia.

6.4 Fort Wellington (1827–29)

Physical environment

Terrestrial setting: Raffles Bay lies at the eastern end of the Cobourg Peninsula in Gurig Ganuk Barlu National Park (Allen, 2008:xiv). Located four kilometres from the mouth on the eastern shoreline of Raffles Bay, Fort Wellington was built on elevated land surrounded by swamps (Figure 6.12). At the time of settlement, the shoreline was low with drying reefs, mud-banks, and a long, open sandy beach. Contemporary to the time of Fort Wellington, the surrounding landscape is described as dry, well-wooded, and free of mangroves, with the soil being mostly relatively poor with several fertile patches (Campbell, 1834:175; Wilson, 1835:161).

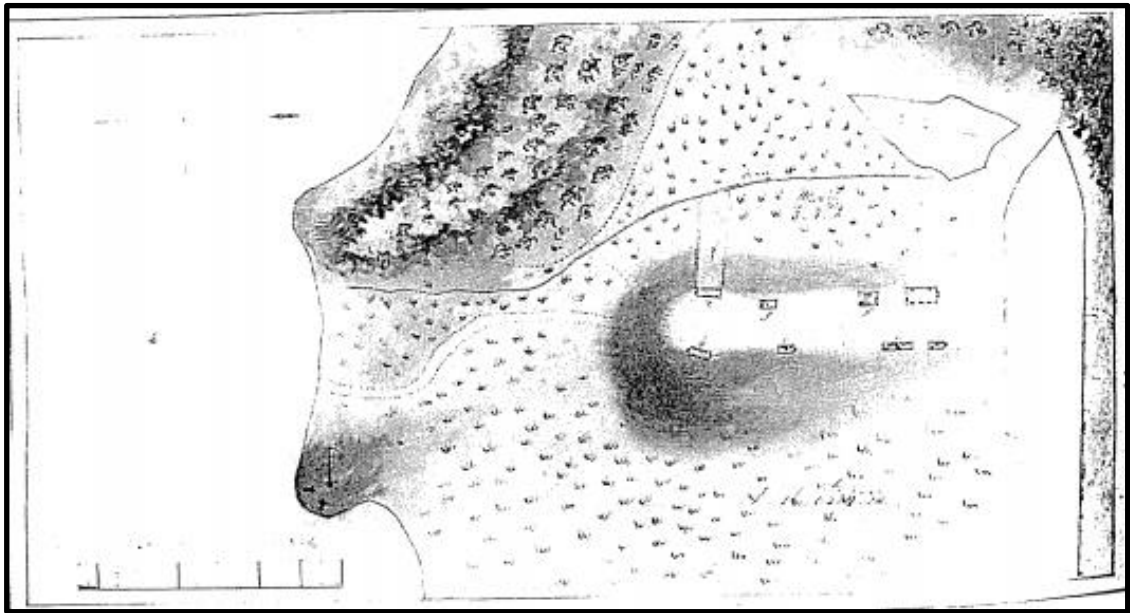


Figure 6.12 Plan of Fort Wellington from Captain Wakefield, 1827 (Mulvaney and Green, 1992:123 in Gregory, 1996:2)

Maritime setting: The maritime setting of Raffles Bay is described by Campbell (1834:175) and Wilson (1835:158) as small and very safe. The bay diameter is 4.8 kilometres and bay mouth 800 metres in width. Compared to the Apsley Strait, Raffles Bay is accessed with ease aside from a sunken reef 4.8 kilometres northwest from the mouth and its concealment by Croker Island when sailing from the east (Figure 6.13). The shallow depth of the bay, three to four fathoms (5.4–7.3 m), was sufficient for nineteenth century vessels of moderate burden. With the majority of the shoreline covered in mangroves, the western shore is described as deep with steep banks, and the eastern shoreline consisting of low-lying mud banks, drying reefs and shoal beyond 1.2 kilometres. The first Commandant, Captain Smyth, wrote in his diary “The bay appears capable of sheltering any number of vessels, but the water is shoal for a mile from the shore; even small boats cannot get in at low water, except at one point, about three quarters of a mile from the camp, to the N.N.W.” (Wilson, 1835:131).



Figure 6.13 [Section of] *Australia - North Coast Cape Stewart to Port Essington* showing Fort Wellington in context with Raffles Bay and Croker Island (Great Britain. Hydrographic Dept., 1867)

Historical overview

By 1826, when it was clear that Fort Dundas was not going to achieve its goal in trade, a new location was chosen by the British Admiralty at Raffles Bay on the Cobourg Peninsula (Fredericksen & De La Rue, 2013:2). Named Fort Wellington in honour of the anniversary of the Duke of Wellington's victory at Waterloo (Wilson, 1835:132), the site was chosen by Captain James Stirling due to its northern location on the Cobourg Peninsula (Powell, 2010:72), with the presence of recent Macassan visitation visible in the form of stonelines and frames located on the shoreline (Gregory, 1996:3). As with Bremer at Fort Dundas, Stirling left the charge of the garrison to Captain Henry Smyth once construction of the fort and habitation structures was underway (Powell, 2009:40). Its initial population of was 77 people and the final population prior to abandonment was ninety-six; including those relocated from Fort Dundas (Gregory, 1996:2; Fredericksen & De La Rue, 2013:3). At the outset, the personnel comprised Commandant Smyth, a surgeon, storekeeper, a Malay interpreter and his son, 30 soldiers of the 39th Regiment of Foot, 14 Royal marines, 13 sailors and 22 convicts. Also present were two women and five children. In 1828, Captain Collett Barker replaced Smyth as Commandant. Under Barker were the commissariat official, 29 soldiers of the 39th Regiment, seven soldiers of the 57th Regiment from Fort Dundas, around nine Royal Marines, 42 convicts—including those from Fort Dundas—and six women and children.

Construction

As with Fort Dundas, there was little in the way of maritime activities at Fort Wellington aside from the visiting ships and the annual arrival of the Macassans. Terrestrial activities involved the

construction of the settlement by the convicts and the soldiers, managing the extensive vegetable garden, and the day-to-day activities of operating the settlement (Figure 6.14). Construction of buildings was kept on a small scale due to the probability that the settlement may be moved to Port Essington (Wilson, 1835:159). Building began immediately with the use of local timbers, and later with material from the dismantled buildings of Fort Dundas (Fredericksen & De La Rue, 2013:9).

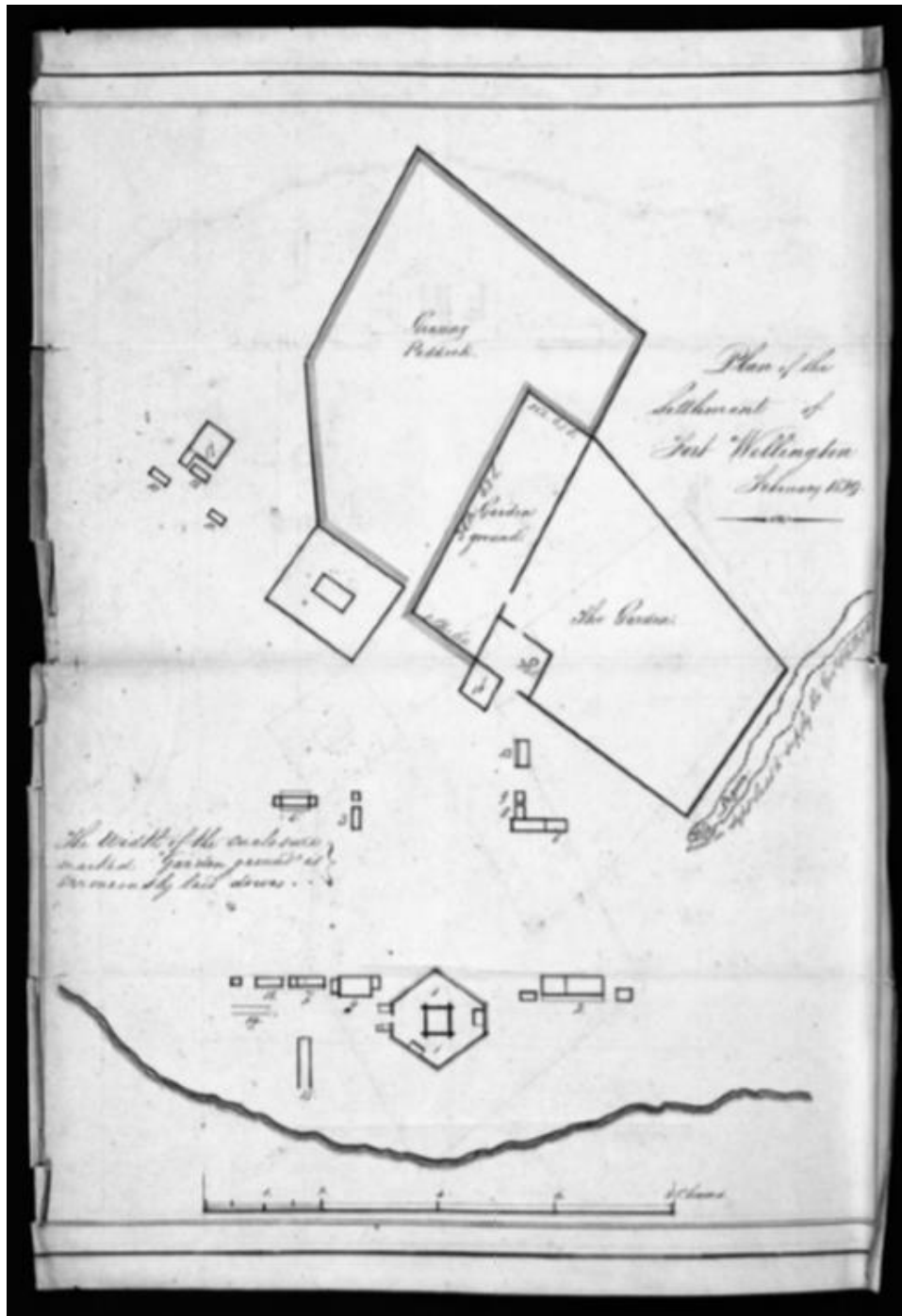


Figure 6.14 1829 plan of Fort Wellington showing the extensive gardens to the north of the buildings and adjacent to the grazing paddock (NSW State Archives NRS906 [4/2060.2] in Fredericksen and De La Rue, 2013:5)

The fort itself was built substantially of wood and surrounded by a hexagonal stockade; each side measuring 14 metres, the entirety measuring 82 metres around (Wilson, 1835:158–9; Gregory, 1996:8). The ground floor of the central blockhouse (6 m height and 6 m²) held provisions and stores, with the Commandant's residence located above. Flanking the stockade were the roughly-built structures of the soldiers' quarters to the south, the prisoners' quarters to the north; and to the east, the marines' quarters. Other structures included the hospital, guard-room, a boat shed and the cells. A few huts were built "without art or elegance", and in contrast, a neatly-finished cottage, the residence of the Commissariat and Medical officers. A paling fence circled the site as an outer defense, with stock pens and gardens adjoining the outside of the fence and a saw pit located near the fort.

Due to the temporary nature of Fort Wellington, no wharf was built. For this reason "embarkation did not proceed so rapidly...in consequence of the low tides, leaving the mud-bank, in front of the settlement, quite dry" (Wilson, 1835:108). Instead, embarking or disembarking involved wading in the shallow waters, which at low tide, extended to a furlong (200 m) due to the extensive mud bank in front of the settlement. "About a quarter of a mile farther to the northward, there was a much more eligible spot, where permanent buildings were intended to be formed."

The Macassans at Fort Wellington

Also at the garrison was an official Malay interpreter, Oodeen, assigned to communicate with the Macassans. Formerly a drum major in the Malay regiment in Sri Lanka, Oodeen was transported to New South Wales in 1816, received his ticket-of-leave in 1818, and arrived at Fort Wellington in 1827 (Thomas, 2013:77–9). Oodeen was literate in Malay and could speak Malay, English and also potentially Sinhalese and Tamil; which was beneficial for linking the garrison with maritime Southeast Asia and India. Oodeen's Muslim faith may have also been viewed as useful, with diplomacy and the aspiration to demonstrate a legitimate desire to develop trade being a primary criterion. Through Oodeen's role as interpreter, the first Macassan perahu encountered in 1828 accepted the invitation to collect and process trepang at Fort Wellington (Thomas, 2013:80).

Upon arrival at the island in 1828, Commandant Smyth encouraged the Macassans to set up their trepang processing site on the foreshore of the garrison. The following season, 34 perahu carrying over 1,000 men stopped in at Raffles Bay (Gregory, 1996:5). One Macassan man by the name of Da'Atea became a permanent member of the garrison after he had deserted a perahu at Trepang Bay and walked approximately 75 kilometres to Fort Wellington, suffering "many dangers and privations" (Wilson, 1835:75). Da'Atea became "much esteemed on account of his good humour and obliging disposition" (Wilson, 1835:180). During his time at the settlement, Da'Atea undertook the workload of "two or three convicts" in the garden, and when the fort was

abandoned, was left in the care of a Mr Tielmann in Kupang despite his wishes to remain with Barker.

First Nations-British relationships

The initial encouragement of Macassan visitation did not extend to the custodians of the land. Under Smyth's orders, an attempt to capture a First Nations man resulted in the murder of a mother and child and the abduction of a six-year-old girl named Rivalal who was placed in the care of a soldier's wife (Powell, 2009:43). In 1828, Smyth's replacement, Barker, reversed the relationship by placing himself unarmed in the company of First Nations men for a number of days in an attempt to earn their trust (Wilson, 1835:79). Although Barker's ideals were not shared by the majority of the party, Fort Wellington improved greatly in morale, with First Nations people becoming regular visitors to the garrison.

Through the writings of Wilson (1835), relationships between the Arrarrkbi with the British and the Macassans can be partially determined. Wilson (1835:81) notes how the Macassans welcomed trepaning at Fort Wellington under the protection of the British due to the apparent poor relationships they held with the First Nations people, the latter being "in the habit of stealing their canoes, and spearing their men, whenever the opportunity offered." First Nations men from the Gulf of Carpentaria, on the other hand, were spoken well of, with four men joining the return voyage to Makassar. This coin was double-sided, however, with Wilson (1835:136) also noting that "the extraordinary jealous caution maintained [by First Nations peoples] induces me to think they have ... been dealt treacherously with by the Malays, of whose visits, on all the small islands contiguous to the mainland (but not on it)."

An indication of Arrarrkbi-British-Macassan relationships can be viewed through the multi-ownership of a canoe. When the Macassans first arrived in 1828, Smyth purchased a canoe off Captain Daeng Riolo for five dollars (Watson, 1923:803). The following year, Barker lent, and later gifted the canoe to a First Nations Elder prior to the abandonment of the garrison (Wilson, 1835:80). Although the canoe is visible only through the historical record, its shared ownership represents the developing relationships between the three groups.

Local and imported resources

At its conception, Fort Wellington was supplied with resources from Sydney and Kupang, along with the transfer of personnel, livestock and transportable structures from Fort Dundas (Watson, 1923:xxii, 765; Fredericksen and De La Rue, 2013:2). Contemporary with Fort Dundas, Fort Wellington continued to rely upon supplies from Kupang over its two-year occupation. Through

the French merchant, Bechade (Watson, 1923:842), the colonial brig *Amity* (148 tons) and a vessel purchased by Bechade were utilised for this purpose. Wilson (1835:67) wrote of the lack of mechanics in Kupang, with Bechade obliged to send a coffee-mill to Fort Wellington for repairs. Kupang relying on a garrison for assistance would have been a rare reversal. Although visitation from the Macassans had begun at Fort Wellington, the short duration of the garrison meant that further supply networks were unable to be developed.

Produce from the vegetable garden, later attended to by Da'Atea, also sustained the garrison. In contrast to the buildings, the vegetable garden was described as a major undertaking, with a large area of the garden fenced in (Wilson, 1835:159). Upon abandoning the garrison, fruits and vegetables were described in detail to First Nations man Miago and his friends for their future use (Wilson, 1835:159). The Fort Wellington plan from 1829 shows the extent of the gardens in comparison to the structures (Figure 6.14). The inaccuracy of the 1829 plan (Fredericksen and De La Rue, 2013:18), however, means the size of the gardens can be used as a guide only.

In 1829, Wilson (1835:114–7) described the public gardens as flourishing, with banana, sugar cane, pineapples, lemons, lime, oranges, papaws, coconuts, sweet potatoes, shaddocks, citrons, figs, custard apples, tamarinds, dates, arrowroot, peaches, pumpkins, sweet potatoes, turmeric, capsicum, black pepper, bamboo and many other useful and ornamental articles. Despite this claim, however, a lack of vegetables in the diet of garrison members led to parties being sent to procure cabbage palm that grew local to the region (Watson, 1923:826). As with the fishing parties, these forays were a way of breaking up the monotony of garrison life as much as providing sustenance to the population.

Historical records suggest that fish was a staple of the garrison's diet. Official correspondence had Raffles Bay abounding in a variety of fish including barracuda, mullet and pomfret (Watson, 1923:769). These were relied upon from the outset as much of the livestock from Sydney died from the poor quality of maize (Wilson, 1835:140; Watson, 1923:769). A whale boat purchased by Smyth from the Master of the *Lansdowne* may have been used for fishing, yet the seine purchased from Sydney was too inferior in quality, with Captain Stirling being "so good as to put a Cod to it for us and fresh lead it" (Watson, 1923:772). Fresh water was available through wells near the shoreline and a freshwater stream roughly four kilometres to the south (Gregory, 1996:8).

Local timbers were used for construction. A number of potential sawpits were recorded in 1966 and 2003 (discussed below), with S6 possibly being the first mill due to its distance from the fort (see Figure 6.17 and Table 6.1). As Smyth feared for the safety of the sawyers, a second sawpit (S1 or S2) was located closer to the fort (Watson, 1923:775). As logs of apparent high quality

were floated to the sawpit in the shallows of the bay, S1 may more closely fit the second sawpit location. Other local material including local clay from the wells was also used for brick-making.

Abandonment of Fort Wellington

Being far removed from the colony of Port Jackson and Britain, Fort Wellington is a prime example of the influence a Commandant had on the success or failure of a garrison (Allen, 1972:345). Captain Barker's management of the colony was highly commended, partly due to his respect for the First Nations custodians (Stokes, 1846a:400), which would ultimately affect future settlement. Efforts in pursuing a more permanent Macassan presence through correspondence with the Dutch Governor at Kupang was also acknowledged as good foresight. Captain Law's account, however, "that one of the Commandants declared that he felt disposed to sell out of the army in preference to going there", prejudiced the future of Fort Wellington (Stokes, 1846a:399). The "unfounded abandonment" in 1829 was allegedly due to the unhealthiness of the climate, the hostility of the natives, and the non-visitation of the Malays (Stokes, 1846a:400; Watson, 1923:xxiii).

Previous archaeological research

In 1966, Fort Wellington was located and surveyed by the Northern Territory Historical Society. Their inspection of the structural remains was to complement the historical account written by the Society (Figure 6.15) (Historical Society of the Northern Territory, 1971; Spillett, 1971; Gregory, 1996:8; Fredericksen and De La Rue, 2013:11). The survey located and recorded a number of structural footings, a fireplace, paths, causeway and other features documented in Table 6.1. In the vicinity of the well, glass and ceramic was recorded in abundance, along with nails, the top half of a George IV bottle, clay pipe stems, and a knife handle. Spillett (1971:11) also recorded some glass shards flaked into points. Gregory (1996:9) points out that the cutting into the coral reef may have occurred at a later date when the site was occupied by buffalo shooters and that the interpretation of the cutting by Spillett may be incorrect.

On the open sandy flat between the beach and garrison proper, two stonelines were recorded by both the Historical Society of the Northern Territory in 1966 and Macknight in 1967 (Macknight, 1969b:124). Of these, Macknight points out the irregularity of one in design and orientation to the beach, suggesting a non-Macassan construction. Artefacts collected from this area include diagnostic glass fragments of various colours, a clay pipe mouth, a bullet case and a piece of flat iron. In contrast to this small site, the recording by Macknight (1969b:123) of the trepang processing site on the island in Raffles Bay noted eight stonelines, one smokehouse and a possible

grave. This contributes to historical accounts of the Macassans preferring the island over the mainland previous to the occupation of Fort Wellington (Macknight, 1969b:124) (Figure 6.16).

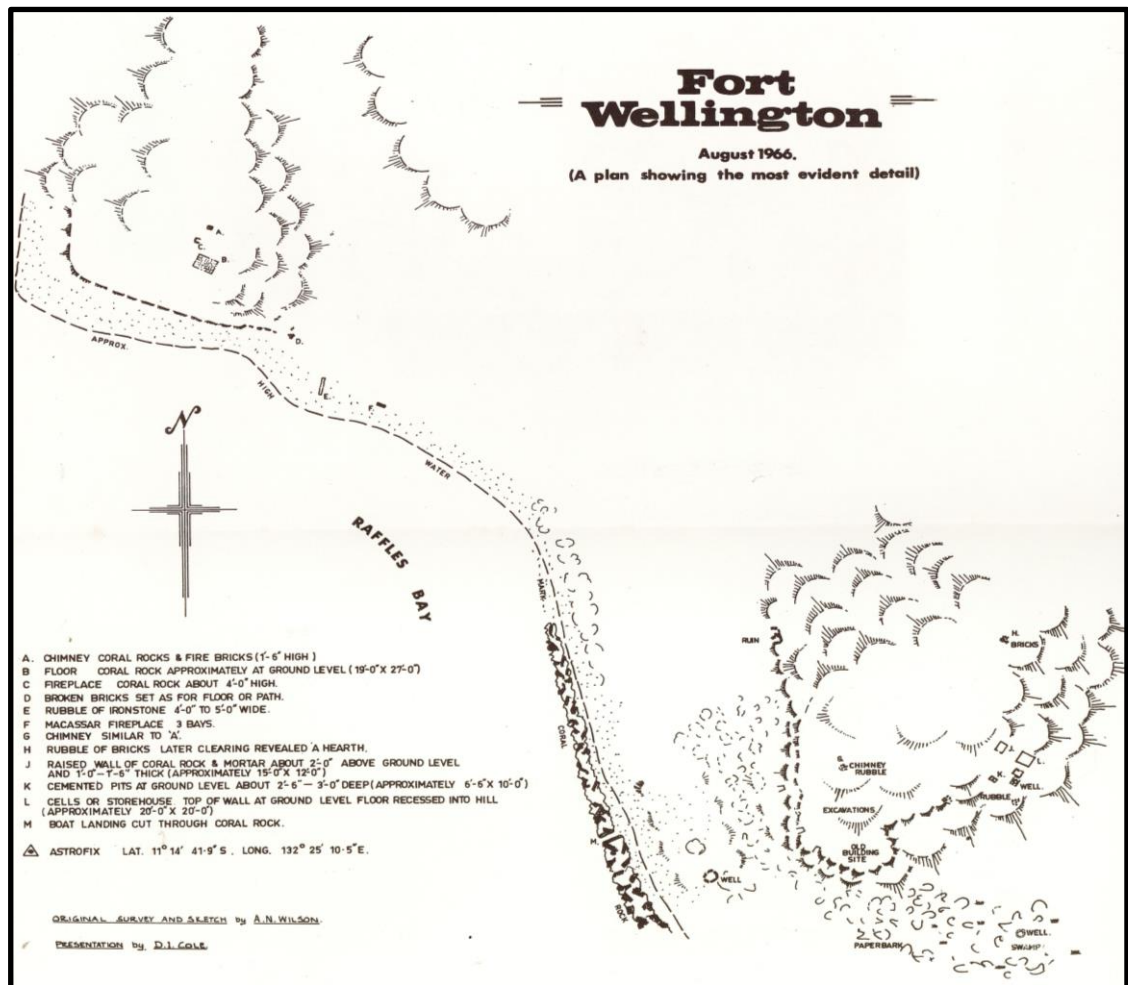


Figure 6.15 Fort Wellington site map (Spillett, 1971)

Across Raffles Bay, the potential remains of the settlement gardens were recorded by Taçon in 1988 (1988:22–3). At this location there are four freshwater wells located at the base of small raised area in a creek bed and situated 40 to 50 metres apart (Gregory, 1996:11). Three of the wells are circular and are three to 4.5 metres in diameter and between one and 1.5 metres deep. A coconut palm in the remnant garden is interpreted as being a descendent from an original palm planted at the time of settlement. A green glass bottle was recorded at 200 metres northeast from the wells. The heritage survey by Gregory (1996:11) of Fort Wellington and surrounds found no historical evidence for settlement gardens on the western shore of Raffles Bay; the only gardens mentioned being in the vicinity of the fort. In 1999, further assessments of Fort Wellington were undertaken as part of a conservation management plan for the historical sites of the Cobourg Peninsula, with the gardens potentially located (The Architects Studio, 2000:11)

Charles Darwin University undertook a nine-day archaeological survey of Fort Wellington in 2003 to locate previously recorded structures and to locate remains from structures identified in

historical accounts (Fredericksen and De La Rue, 2013:14). Although material including the stonelines could not be located, five previously unrecorded features were identified (Figure 6.17). Recorded structures were tabled to compare the 2003 survey with the 1966 and 1999 recordings (Table 6.1) (Fredericksen and De La Rue, 2013:16–7). Between 2008 and 2010, the Historical Society of the Northern Territory organised three investigations to locate features further inland: to gain a temporal relationship between the settlement, a coral-walled structure and the concrete cisterns; and to locate the stockade and the gravesite of Doctor Cornelius Wood (Reid, 2011:42 in Fredericksen and De La Rue, 2013:15). Artefacts were collected, yet dates for the structures were unobtainable at the time of publication. Fredericksen and De La Rue (2013:23) place the cisterns as contemporary to the 1870s when Fort Wellington was used as a buffalo hunters' camp.

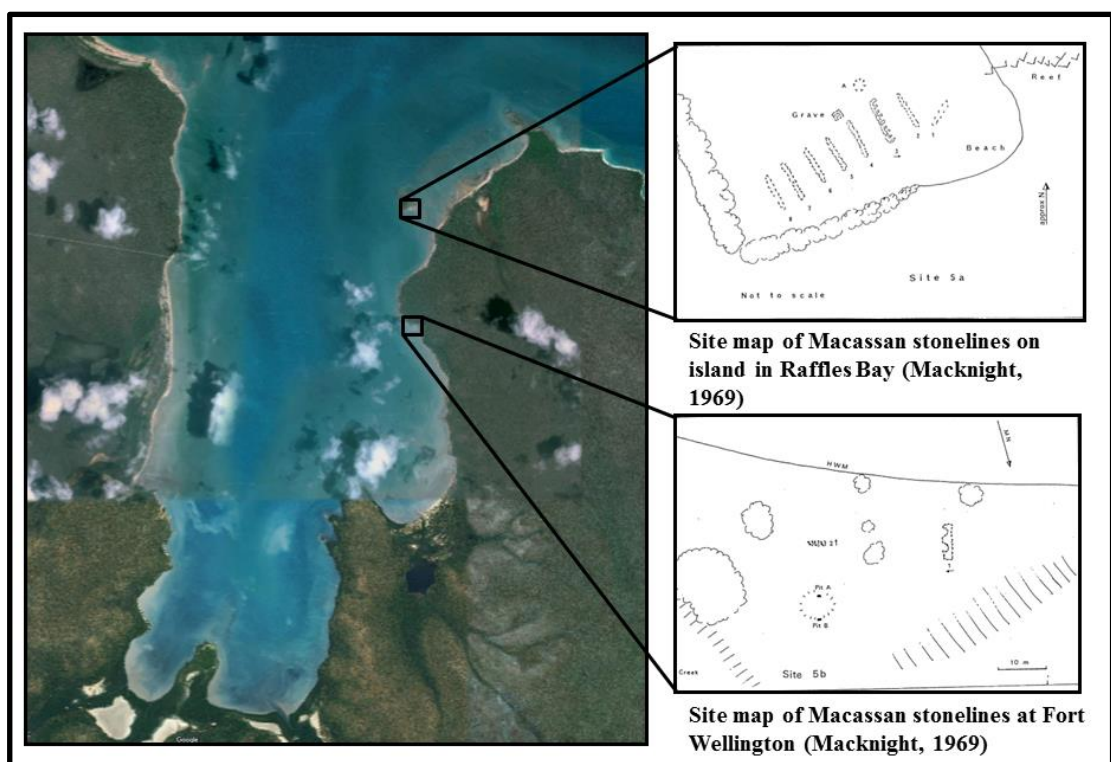


Figure 6.16 Macassan archaeological sites in Raffles Bay indicating a larger site on the island than at Fort Wellington (Macknight, 1969b; Google Earth, 2014).

Despite numerous surveys, the location of the Stockade is yet to be determined (Frederickson and De La Rue, 2013:11). In 1966, the Northern Territory Historical Society recorded an extensive coral rock floor and two chimneys on a high headland at the northwest end of Raffles Bay as the Stockade and Commandant's house. This location has an impressive view out to the entrance and southern extents of the bay. Further surveys, however, suggest the Stockade to be on a low dune immediately behind the beach (Frederickson and De La Rue, 2013:15–23), with further research required to confirm this.

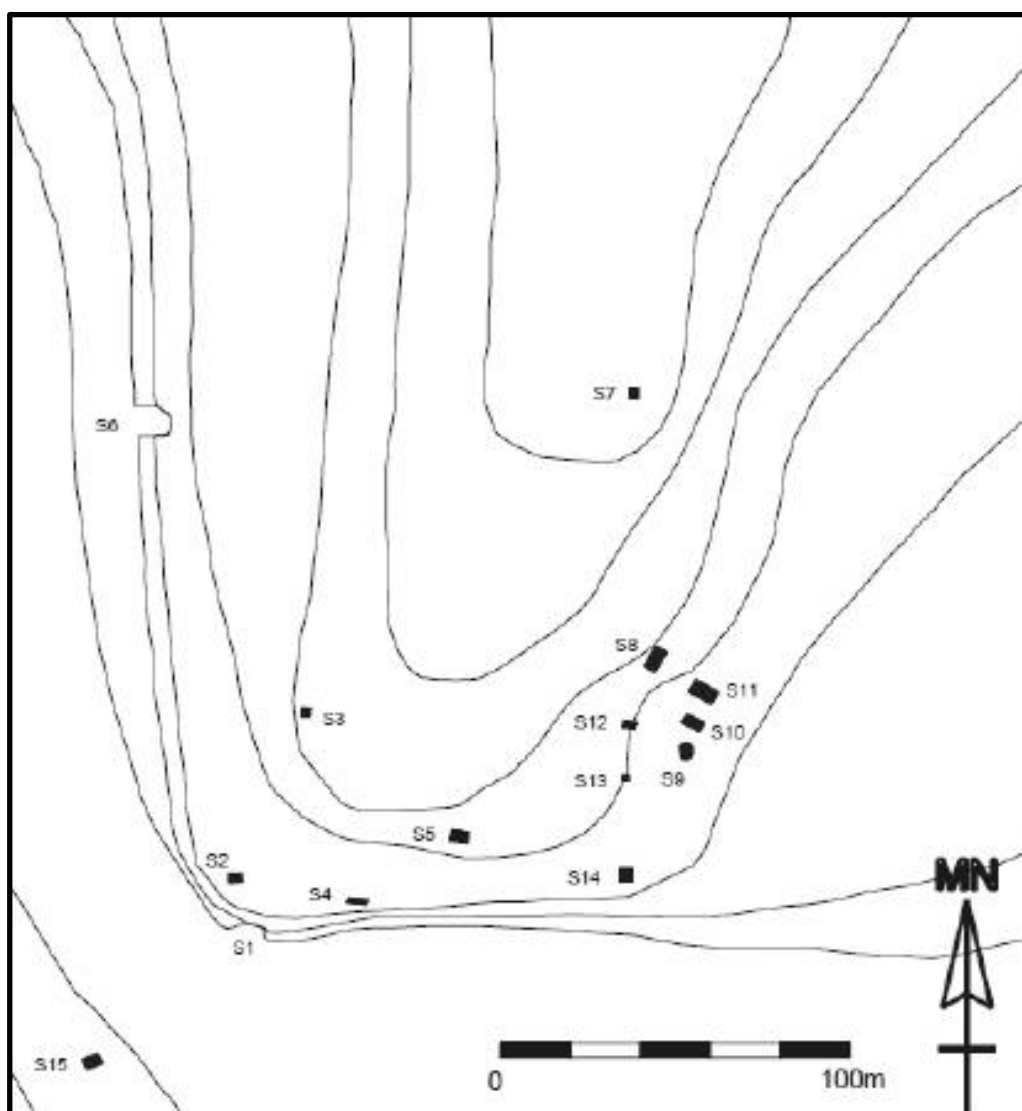


Figure 6.17 Previously unrecorded archaeological features identified in the 2003 field survey (Fredericksen and De La Rue, 2013:14)

Table 6.1 Comparison of investigation results tabled by Fredericksen and De La Rue (2013:16–7)

2003 Investigation	1999 Investigation	1966 Investigation
S1: 4 x 5 m cutting near base of ridge; possibly a sawpit or a borrow pit for building material		Shown on plan as a U, but no identifying label
S2: regular 1.3 x 2.3 m cutting in top of ridge scarp; possibly a sawpit		Shown on plan as a U, but no identifying label
S3: 5 x 5.5 m pile of ironstone (90%) and coral rubble (10%) in southeast part of site; possible collapsed structure		
S4: 5. x 6.5 m terrace on southern aspect of ridge; 2 m west of this		"Excavations"

feature is a surface scatter of ceramic sherds and clay pipe stem		
S5: compacted pile of ironstone (50%), coral (45%) and brick (5%) rubble on coral slab foundation; likely fireplace/chimney	Site 7: "Chimney"	Feature G: "Chimney"
S6: large cutting into the base of the ridge slope; possibly a sawpit or a borrow pit for building material		Shown on plan as a U, but no identifying label
S7: U-shaped outline of double row of bricks enclosing flat coral slabs; bricks range from well to poorly fired and are probably a chimney base	Site 8: "Brick rubble hearth"	Feature H: "Rubble of bricks; hearth"
S8: walled structure of slabs of coral rock mortared together; interior consists of a compacted and crushed coral floor	Site 9: "Raised wall of coral rock and mortar"	Feature J: "Raised wall of coral rock and mortar"
S9: partially-collapsed well	Site 13: "Well"	"Well"
S10: rectangular excavation; possibly an uncompleted version of S11		Shown on plan, but no identifying label
S11: rectangular excavation supported by placed coral rock and concrete-lined	Site 11: "Cells (or possible storehouse)"	Feature L: "Cells or Storehouse"
S12: rectangular semi-subterranean two compartment 'tank' made of coral rock and lined with concrete	Site 10: "Cemented pits located at ground level"	Feature K: "Cemented pits at ground level"
S13: pile of coral slabs and rocks in southeast part of site; probably a pile of unused building material		
S14: an artificially-levelled area immediately downslope of S13 in southeast part of site		
S15: disturbed platform of ironstone and coral rock on crest of foredune behind beach in southeast part of site		
S16: disturbed platform of ironstone and coral rock on crest of foredune behind beach in southeast part of site		
S17: scatter of brick and ironstone near the foot of the knoll	Site 4: "Broken bricks (or path)"	Feature D: "Broken bricks set as for floor or path"

S18: large rectangular platform approximately 6 x 8 m of coral paving 'stones' set at ground level; in the northwest corner is a large post mortared in place at the base	Site 2: "Floor"	Feature B: "Floor – Coral Rock approximately at ground level"
S19: collapsed fireplace of mortared coral rock with some brick	Site 3: "Fireplace"	Feature A: "Fireplace - Coral Rock"
S20: structure of mortared coral and brick approximately one metre high, but with no opening as for a chimney	Site 1: "Chimney"	Feature C: "Chimney - Coral Rocks and Fire Bricks"

Although little remains of Fort Wellington today, this was also the case shortly after the settlement was disbanded in 1829 (Macknight, 1969a:90; Gregory, 1996:12). In 1839, the French captain D'Urville could not locate a landing stage, with only a thick wall in ruins, the remnants of an old forge, a well and a graveyard. This was due to the dismantlement of many of the substantial buildings for the transshipment to the Swan River colony (Fredericksen & De La Rue, 2013:11).

Archaeological attributes

Site type: British garrison (military settlement)

Size: Approximately 0.07 km²

Features: cells or storehouse, cuttings (possibly sawpits or borrow pits), collapsed structure, terrace, ceramic surface scatter, fireplaces/chimneys, well, disturbed platforms of ironstone and coral rock, levelled area, brick and ironstone scatter

Artefacts: amount yet to be determined – glass (including bottles and flaked glass implements), ceramic (including willow pattern and clay pipe stems), metal (nails)

Cognitive attributes

Place names: given by Captain Phillip Parker King and Captain Stirling upon landing at the settlement.

- Raffles Bay – for Sir Stamford Raffles, Lieutenant-Governor of British Indonesia and founder of Singapore (Spillett, 1971:14; Gregory, 1996:1)
- Fort Wellington – named after the Duke of Wellington who, allied with the Dutch, defeated the French army under the command of Napoleon Bonaparte at the Battle of

Waterloo on 18 June 1815 (exactly 12 years to the day before Fort Wellington was first settled) (Spillett, 1971:17; Gregory, 1996:1; Wilson, 1835:131)

People names: given to First Nations people at Fort Wellington by the British

- Waterloo – a First Nations man, Iacama, was given the name jocosely
- Wellington – a First Nations man named in the same vein as Waterloo
- Mary Waterloo Raffles – a First Nations girl, Rival, six years of age, was taken captive by the British and given the middle name Waterloo due to her resemblance to her father Iacama (Waterloo), (Watson, 1923:781)

As with Fort Dundas, the place name of Fort Wellington signifies the military role of the garrison. This is evident with the title of ‘Fort’ along with the title of ‘Wellington’, representing the recent British victory in battle against the French. That this battle was won with Dutch allies may suggest a strategic move to promote peace with the Dutch in this part of the world. Peace may have also been encouraged with the First Nations people, with two men named Waterloo and Wellington respectively, continuing the tradition of the garrison’s place name. These men were also known by their birth names, as were many First Nations men who were associated with the garrison.

6.5 Victoria (1838–49)

Physical environment

Maritime setting: Port Essington is the largest harbour of the Cobourg Peninsula. The mouth is 11 kilometres wide and the harbour extends 32 kilometres to the south (Allen, 1973:46; Allen, 2008:2) (Figure 6.18). A narrow spit of land divides the outer and inner harbours. The outer harbour has an average depth of between five and 12 fathoms (9 to 30 m) and the inner harbour an average depth of between three and 11 fathoms (5 to 20 m). As is indicated on the 1839 chart of Port Essington, safe anchorages were recommended in the smaller bays of the outer harbour, in the centre of the inner harbour, and directly in front of the settlement. As with many of the bays in the Northern Territory, the shoreline of Port Essington consists mainly of low-lying dunes screened by mangrove mudflats or sandy beaches. Low cliff lines occur occasionally, revealing open sclerophyll hinterland forests and pockets of monsoonal jungle. Marine hazards are the Orontes Reef, located seven kilometres north of the Port Essington mouth and a number of shoals located throughout the harbour.

Terrestrial setting: Victoria is located on the western shore of the inner harbour of Port Essington (Figure 6.18). The site was built on the highest plateau in the harbour above the white cliffs of



Figure 6.19 [Section of] *Victoria, Port Essington, New Holland* (Hatfield, 1838)

Historical overview

Nine years after the disbandment of Forts Dundas and Wellington, the initial choice of Port Essington as a location for a garrison came to fruition. The key protagonist for another settlement in the north was George Windsor Earl (Powell, 2009:44), a linguist and adventurer who had spent many years sailing and trading through maritime Southeast Asia (Earl, 1971; 1978). Earl's argument for a northern settlement reflected that of the British Admiralty: its proximity to maritime Southeast Asia for trade, protecting the colony's northern reaches from foreign occupation, and as a place of refuge for shipwrecked mariners. Interest from private traders developed in the lead-up to the occupation of Victoria, with Stokes (1846a:245–6) noting that:

“as soon as its destination became known in the colony, several persons came forward as volunteer-settlers, and expressed the greatest anxiety to be allowed to accompany the expedition. Their views extended to the establishment of a trade with the islands in the Arafura sea; and certainly they would have been far more likely to draw forth the resources of the country, than a garrison, whose supplies are brought to them from a distance, whose presence holds out no inducement to traders, and who are not impelled by any anxiety for their own support to discover the riches of the soil.”

In 1838, the Atholl class 28-gun sixth-rate ship HMS *Alligator* (500 tons) and Colonial brig HMS *Britomart* (237 tons), chartered barque *Orontes* (452 tons) and schooner *Essington* (123 tons) sailed to Port Essington, with Captain Bremer selecting the site of Victoria within the inner harbour of Port Essington (Powell, 2009:44). The *Orontes* departed for India soon after, yet struck a reef off Smith Point (named thereafter Orontes Reef) and was driven ashore at Vashon Head (Powell,

2010:80). After the departure of Bremer in HMS *Alligator* on June 1839 to command the first Opium War in China, John McArthur commanded the garrison for 11 years. Between 1838 and 1844, the population of Victoria was 65 people. These were Captain John McArthur and his son James, George Windsor Earl as linguist and draftsman, a surgeon, a botanist, 53 Royal marines, three Marines' wives and their four children (Allen, 1973:46). The Royal Marines were relieved in 1844, with the new population consisting of 66 Royal Marines, six of their wives and their five children, and one civilian. Although there were no convicts permanently at Victoria, a group of 20 were stationed there from September 1844 to January 1845 (Allen, 1973:51). The lack of convicts may be attributed to the view of Stokes (1846a:436–7) that they would have a negative effect on the “savages” and would desert with the Macassans. Over the course of the settlement, British numbers fell, with 14 or more people dying from malaria.

Continued relationships with First Nations people

First Nations people were present at Victoria and, with the garrison's policy of non-violence, coupled with the previous positive influence of Commandant Barker at Fort Wellington, good relationships appear to have been maintained (Allen, 1973:54; Powell, 2009:47). Not long after the arrival of the British, a camp was established just south of the garrison, with First Nations men and women working with the British in construction, as crew on the ships, in their homes and offices, and supplying local food with the aid of British firearms. The British, in turn, learned First Nations culture and language, as is evident in the writings of Earl (1846b) and Father Confalonieri (1846, 1847).

Construction of Victoria

On arriving at Victoria, Stokes (1846a:384) wrote of the expediency in which the buildings and jetty were erected. This was aided by the seven prefabricated buildings brought up from Sydney: the Commandant's home, one for the officers, two barrack rooms, a kitchen, hospital, storehouse and church (Allen, 1973:47). Twenty-four cottages were also built for the men using local materials (Allen, 1973:48). Ironstone boulders scattered throughout the settlement were used in construction, yet their hardness meant they were difficult to shape (Allen, 1973:48). An example of this was the construction of the jetty, with the masonry dressed on the southern side only. The nature of the ironstone topography led the inhabitants to build their structures on dwarf piles and timber piles rather than levelling the ground, providing ventilation and, fortuitously, protection against termites. A contemporary map of Victoria shows its structures as of 1847 (Figure 6.20).

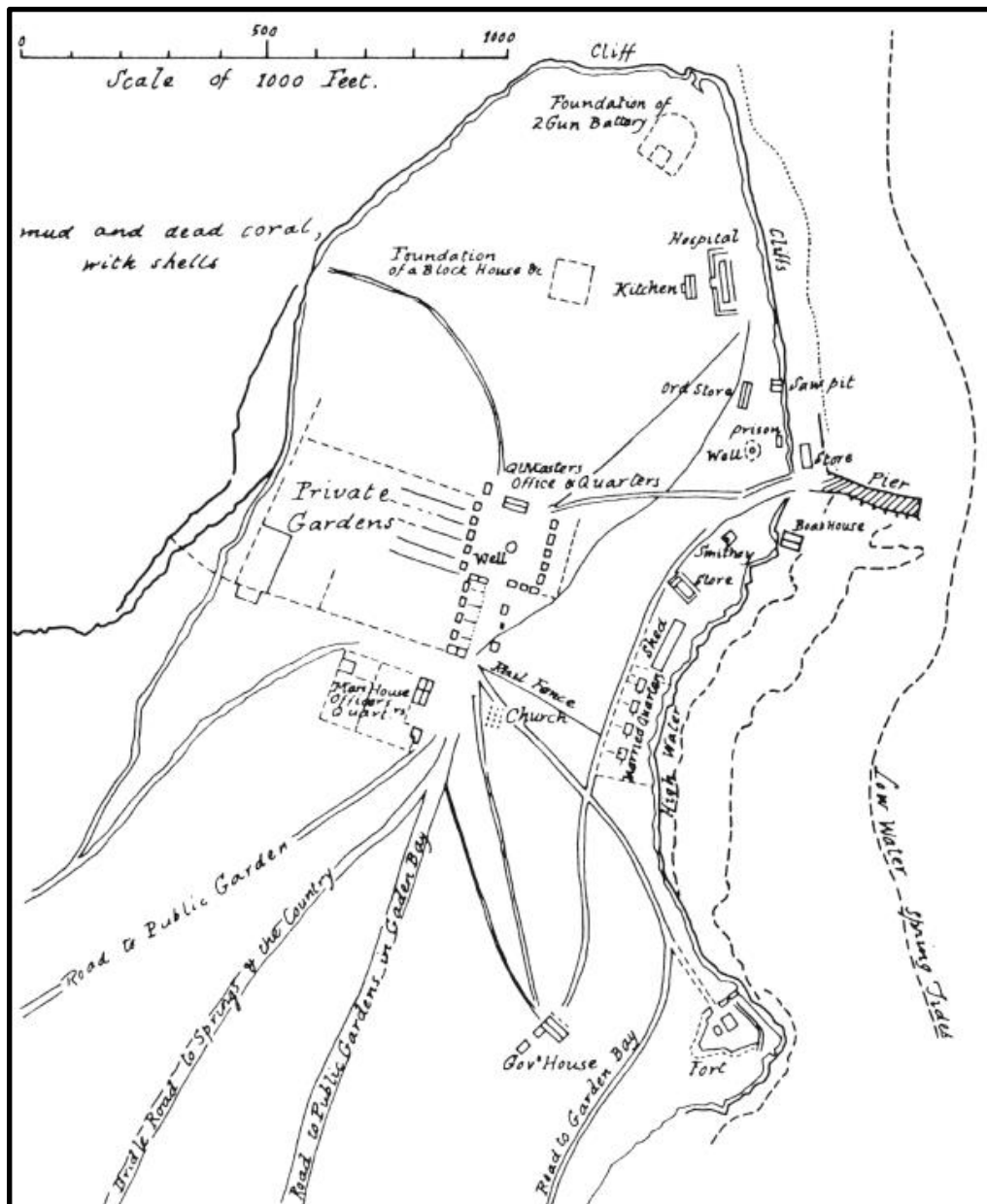


Figure 6.20 Contemporary map of Victoria settlement produced in 1847 (Allen, 2008:4)

In November 1839, most of these buildings were destroyed by a severe cyclone, which also wiped out much of the vegetation and stranded the HMS *Pelorus*, killing eight men (Allen, 1969:359–61; Cameron, 1999:60–6; Powell, 2009:46) (Figure 6.21). In rebuilding the garrison, the British changed building methods to better withstand a similar catastrophic event. A sawpit was cut into a cliff face to enable the production of battens and planking for the buildings, and the blacksmiths made nails, mason's tools and ironwork for the buildings (Allen, 1973:49). After the cyclone, the *Pelorus* was refloated, staying on at Port Essington until March 1841 to assist in its reconstruction (Allen, 1973:49).

Over time, further construction occurred outside the garrison proper. Upon the arrival of 20 convicts in 1844, Smith Point Beacon was built at the mouth of Port Essington (Allen, 1969:372–

3). Coral conglomerate for construction was quarried on site (Allen, 2008:55). The circular structure of solid fill was approximately 2.5 metres in height, with blocks around 45 by 20 centimetres. The block faces were cut carefully to create a continuous curvature. The lower section of the beacon was cemented with lime mortar, with the upper section dry-built. The beacon was positioned on a rise at the tip of Smiths Point, standing at 7.4 metres above sea level.

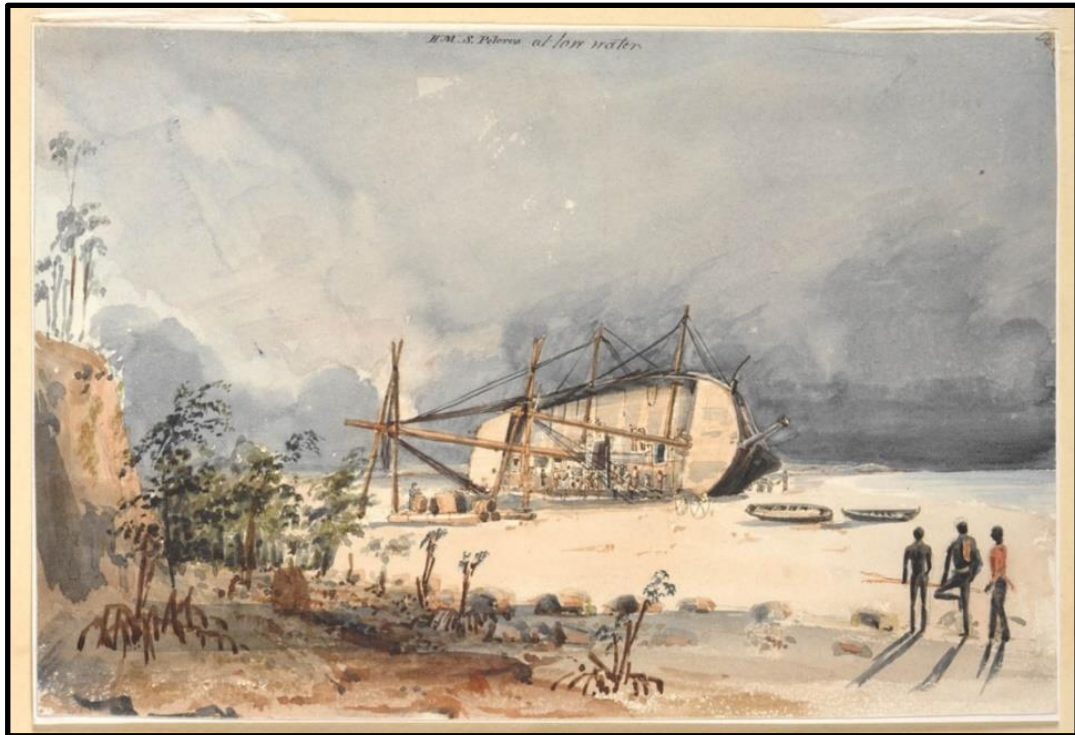


Figure 6.21 *H.M.S. Pelorus at low water, 1840, watercolour (Stanley, 1840)*

Surveys of the north Australian coast and eastern archipelago

The initial occupation of Victoria was concurrent with the survey of the northern coastline by Wickham and Stokes and the eastern archipelago by Captain Owen Stanley (Stokes, 1846a, 1846b) (discussed in Chapter Four). The aim of Stanley's expedition was to acquire knowledge of the region relating to trade and the procurement of goods to assist in the sustainability and development of Victoria (Earl, 1846a:68; Stokes, 1846a:439). According to Earl, "... the names of many of the larger islands were associated with outrages committed on our countrymen ... but no sooner had it become known that the British possessed a settlement in the neighbourhood ... than these aggressions suddenly and totally ceased." Dutch retribution for acts of piracy was more likely the cause of its decline in the eastern archipelago.

The first vessel to be stationed at the garrison, the *Essington*, was thus able to make several supply voyages to the eastern archipelago and Timor to procure buffalo, pigs, sheep, poultry and tropical produce (Powell, 2010:80). It was on one of these voyages that Captain Watson managed to

rescue Joseph Forbes from Timor Laut (present day Yamdena Island), the only survivor from when the *Stedcombe* was pirated while procuring supplies for Fort Dundas 14 years earlier (Spillett, 1982).

In 1839, the French explorer Jules Dumont d'Urville was also exploring the northern coastline in the *Astrolabe* and *Zelie*. Arriving at Victoria after visiting the disbanded Fort Wellington, initial suspicions subsided and “the greatest harmony prevailed during their stay” (Stokes, 1846a:388). As with the Dutch, the French appeared to have little interest in the northern coastline, with d'Urville (1987:390) stating that “[t]he British consider themselves the owners of the whole of New Holland. It is mainly to indicate that assumption of ownership and to secure this vast territory that they are so persistent about establishing an outpost on these inhospitable shores” (d'Urville, 1987:390).

Overland survey

As with maritime surveys, overland explorations were also occurring across the new British colonies, including that of the 1844–45 expedition by Friedrich Wilhelm Ludwig Leichhardt (Powell, 2009:51). Setting off near Brisbane, Queensland, Leichhardt and his team reached the Gulf of Carpentaria in 14 months, skirting west around the estuaries of the coast to the East Alligator River, then north across the Arnhem escarpment to Port Essington. On reaching the East Alligator River, Leichhardt was approached by a First Nations man:

“We received him, of course, most cordially; and upon being joined by another good-looking little man, we heard him utter distinctly the words, “Commandant!” “come here!!” “very good!!!” “what’s your name?!!!!” If my readers have at all identified themselves with my feelings throughout this journey; if they have only imagined a tithe of the difficulties we have encountered, they will readily imagine the startling effect which these, as it were, magic words produced – we were electrified – our joy knew no limits, and I was ready to embrace the fellows... They knew the white people of Victoria, and called them Báländä, which is nothing more than “Hollanders;” a name used by the Malays, from whom we receive it.” (Leichhardt, 1847:500)

Leichhardt was able to communicate with the First Nations men through a small collection of words made by Mr Gilbert when at Port Essington. The translation for Port Essington was Limbo Cardja, a name that was clearly Macassan. These men guided Leichhardt to Victoria, and on the way, updated him on all of the news of the garrison (Leichhardt, 1847:534). One month after their

arrival, Leichhardt and the remaining team departed Port Essington for Port Jackson aboard the *Heroine*.

Macassan trepang industry

As with Fort Wellington, the Macassans arrived annually to fish for trepang at Victoria. Stokes (1846a:388) recorded six perahus at Victoria in late March 1839, with more arriving soon after. As this was at the end of the monsoon, the Macassans would have been at the tail end of their season. In the hope of potential trade, McArthur granted their request to procure trepang under the protection of the British flag. As expressed by Stokes (1846a:388–9) the Macassans sought the protection of the British from First Nations hostility, with previous attacks resulting in “every other man of them to keep under arms whilst the rest worked”. Despite this tension the British encouraged Macassan and Chinese settlement at Victoria, yet by 1846 the hopes of McArthur for trade had dissipated due to the exorbitant Dutch taxes on British goods and the Macassans lack of trade goods for the British (The Sydney Morning Herald, 10 May 1844:4; South Australian Gazette and Colonial Register, 26 December 1846; Allen, 2008:128).

Refuge for ships

The presence of Victoria in northern Australia led to the occasional visit of damaged ships and shipwreck survivors seeking assistance, linking Port Essington with the broader trading and transport routes of the British between its colonial outposts (Powell, 2010:80). In 1843, the British ship *Manlius* (700 tons) en route from Bombay to China with a cargo of cotton, was blown off course due to a lack in ballast and inability to carry sail (The Cornwall Chronicle, 19 August 1843:2). Much of the cotton was water-damaged and great exertions from the garrison were required to have the ship seaworthy (Cameron, 1999:128). From the Torres Strait, shipwrecked survivors from the barque *Montreal* (1841), barque *Coringa Packet* (1845) and *Hyderabad* (1845) arrived at Victoria (Powell, 2010:80). The last of these, the *Heroine*, was en route to Victoria with the *Enchantress* when it was wrecked on the western extremity of the Torres Strait with a loss of eight lives (Spillett, 1972:131–3). Survivors of the wreck, including Father Angelo Confalonieri, arrived at Victoria aboard the *Enchantress*.

As a Roman Catholic missionary, Confalonieri appeared to have intended to live at Port Essington to learn from and Catholicise First Nations peoples (Powell, 2009:48). For this reason, the Marines built a hut for him on the northeastern coast of Port Essington at Black Rock Point. Within weeks, Confalonieri had surpassed the British in learning the languages of the region (Spillett, 1972:135), producing a bilingual manuscript that included seven dialects and an

accompanying map of the Cobourg region. Not long before the garrison was disbanded, Confalonieri died from fever and was buried in the graveyard (Spillett, 1972:156).

Local and imported resources

Victoria followed the tradition of the garrisons in relying on Port Jackson and Kupang for supplies (Cameron, 1999:27; Wilson, 1835:63). Thus, as with the preceding garrisons, subsistence (along with communications) was dependent on available colonial and trading vessels stationed at the garrison, or stopping at the garrisons en route. Heightened shipping activity between Port Jackson and other British colonies resulted from the opening up of trade with China after the first Opium War (The Cornwall Chronicle, 19 August 1843:2). In 1843, The Cornwall Chronical (19 August 1843:2) reported the HMS *Alligator* arriving at Port Essington from China en route to Sydney “loaded with provisions for the use of the settlement”.

British survey of the eastern archipelago also saw supplies arriving from India, Lombok, Singapore, China and the Ki Islands (Cameron, 1999:126–31) (Figure 6.22). From the latter island, McArthur purchased a small sailing vessel named the *Gipsy Queen*, possibly to sail to the satellite sites around Port Essington, and as recreational vessel for his son. In McArthur’s notebook, there are several references and sketches of the *Gipsy Queen*. McArthur (LANT, John McArthur, NTRS 3601:33) wrote “My dear friend, do not let that rascal [Cordozo] forget to bring a boat for me from Ki...” One sketch from the notebook is of the *Gipsy Queen* sailing with the *Lizard*, another small vessel stationed at Victoria in 1847 (LANT, John McArthur, NTRS 3601:90) (Figure 6.23), suggesting its use as a vessel of leisure in an otherwise regimented environment.

Despite the close link with Kupang and higher rate of maritime traffic within the region, official and personal letters would take from a few months to as long as two years to be responded to (South Australian Register, 1 October 1845:3) In 1839, Bremer’s visit to the Portuguese colony of Dili, Timor, prompted communications from Victoria to be sent to Dili, thence to Singapore, Bombay and England, taking around four and a half months (Cameron, 1999:30). Kupang, however, remained the primary communications link.

The higher rate of shipping within the region did not hinder the use of local resources for both sustenance and construction. Local food recorded by Allen (2008:103) includes kangaroo, wallaby, bandicoot, lizard, birds, fish, dugong and crab. Although the numbers of identifiable bones are low, they complement the historical record of local animals consumed by both British and First Nations people (Allen and Corris, 1977:140; Allen, 2008:125). Local stone and timber were also used for the construction of buildings including the wharf, cairn and habitation

structures (Allen, 2008:5–55). Clay and shells were used as flooring in habitation sites (Allen, 2008:29), with two lime kilns suggesting a further use of shells for lime mortar (Allen, 2008:19, 51–2).

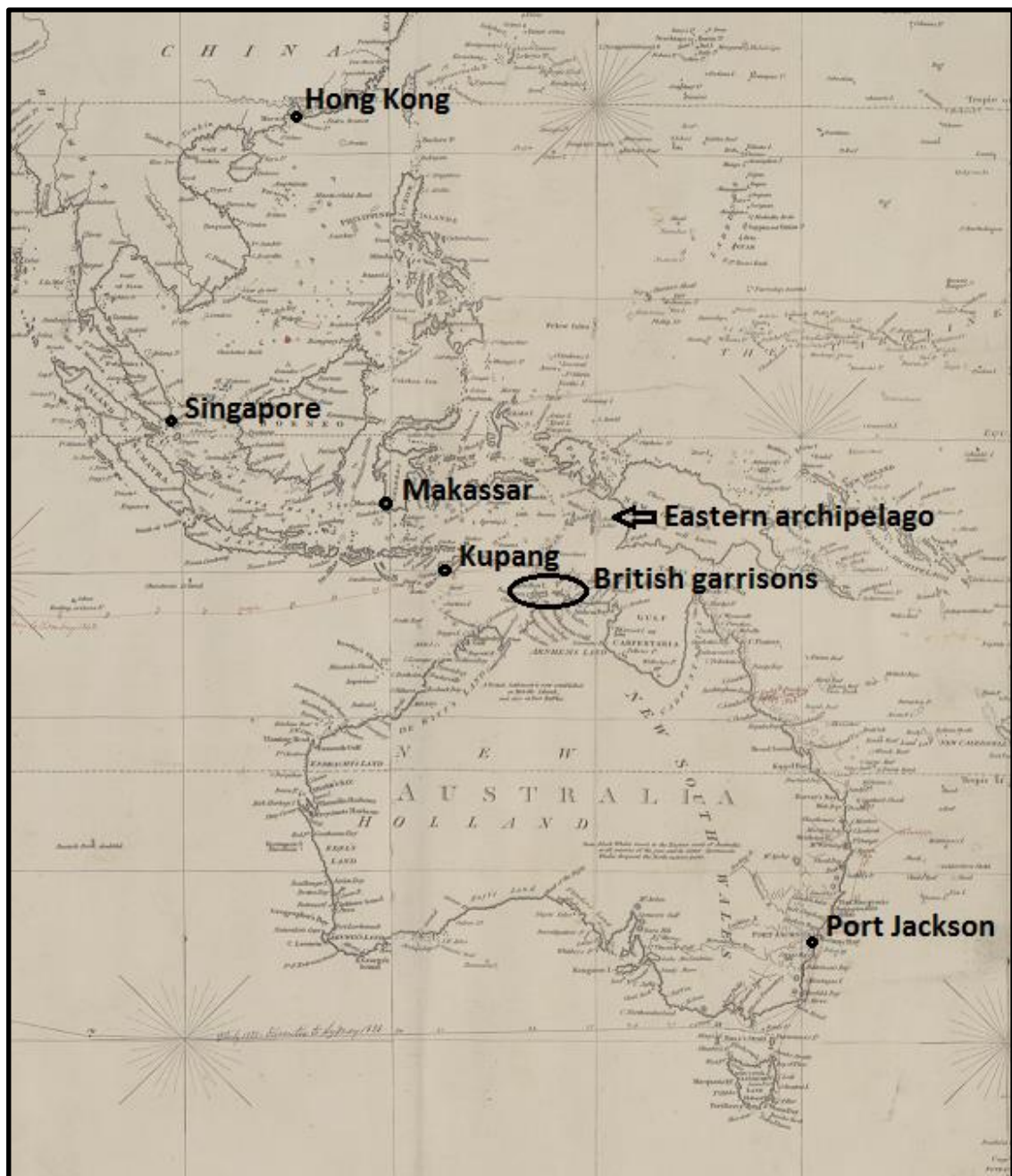


Figure 6.22 [Section of] *A general chart for the purpose of laying down a ship's track on her voyage from England to the East or West Indies or the Pacific Ocean, Additions to 1844* showing primary sources of subsistence for the British garrisons (Norie, 1852).



Figure 6.23 Sketch of *Lizard and Gipsy* – Port Essington (LANT, John McArthur, NTRS 3602:107)

Abandonment of Victoria

By 1847, the initial reasoning behind the British garrison at Port Essington as a trading port with the eastern archipelago was reassessed and found to be mostly redundant (The Port Phillip Patriot and Morning Advertiser, 24 November 1847:2). Abandonment, however, was held off due to the continued potential threat of ‘foreign’ occupation, and the potential of Victoria as a coaling station for steamships en route from Sydney to Singapore. By this time, however, Cape York in the colony of Queensland was recommended as a superior port due to its proximity to the Torres Strait (Geelong Advertiser, 26 January 1848:1). Between 1847 and 1849, malaria and other illnesses saw the deaths of 13 people, 20 per cent of the population (Spillett, 1972:160–8; Allen, 2008:125–6). With many of the garrison having already departed due to illness, orders were given by Colonel Owen, Adjutant-General of the Royal Marines, for the marines to withdraw. McArthur and the remaining 37 British departed Victoria on the HMS *Meander* on 30 November 1849, thus ending the era of British garrisons in northern Australia.

Previous archaeological research

Allen’s (1969) doctorate on Port Essington was the first major piece of research to be undertaken in Australian historical archaeology. Objectives were to test archaeology as a new line of enquiry into Australian colonial history; to excavate an uncontaminated single occupation phase site; and to examine culture contact through First Nations archaeological sites within the general area (Allen, 1969:2–4). The single basic premise was to determine “whether historical archaeology is sufficiently robust intellectually to survive as an academic discipline, rather than a tool to classify monuments or implement ‘heritage’ management.” (Allen, 2008:xiii).

Fieldwork undertaken by Allen between 1966 and 1968 involved survey and sample excavations of the structures at Victoria (Allen, 2008:2–4) (Figure 6.24). Of note are the local materials used for construction, with two of the 24 cottages either completely bark-covered or with reed walls and thatched roofs (Allen, 1973:48). Flooring consisted firstly of introduced red clay, with beach shell introduced at a later date; visible archaeologically in successive layers. Distinctive in the extant archaeology are the more substantial structures of the five married quarters and their semi-circular buttressed stone chimneys (Allen, 1973:50). The ironstone blocks from the chimneys and southern walls were quarried within the garrison, with the remaining walls built from bark and rushes and a light wooden framework, with the roof being grass thatch (Allen, 2008:19). Five dry wells were also recorded with the deepest of seven metres located in the town centre (Allen, 2008:44). Artefacts recovered were mostly of British origin, reflecting the military nature of the garrison (Allen, 1973:56). Southeast Asian ceramics were also present, reflecting contact with Singapore and China through visiting ships. In this sense, Allen's research also had a significant impact in debunking the perception of colonial Australia suffering the tyranny of distance to England and the world at large through the connections the garrison had with maritime Southeast Asia and the increased movement of shipping between the southern colonies with those of the north (Blainey, 1982).

Macknight and Mulvaney surveyed the shorelines of the garrison for Macassan visitation in 1966, locating only a grove of tamarind trees along the southern beach (Macknight, 1969b:116–7). Based on historical documents, however, it is known that the Macassans would have set up their station on either the north or south beach close to the garrison. Within the garrison proper, Allen located eight distinctively Macassan earthenware sherds, along with stoneware and porcelain that is also suggested to have a Macassan origin.

Around the harbour, satellite site structures were recorded by Allen (1969:143; 2008:55) and later by Taçon (1988:44–6) in the 1980s (Figure 6.25). The presence of these structures complements the history of Victoria, with the convalescent stations at Coral Bay and Spear Point built in the outer harbour to supply fresh breezes for benefit of the sick (Allen, 2008:126); Smiths Point Beacon constructed by convicts in 1845 (Allen, 2008:55); and Father Confalonieri's house built far from the settlement proper so he could study and attempt to convert First Nations people (Allen, 2008:131). These satellite sites reflect the longer duration of the settlement, an available labour force, and the accessibility of vessels to move people between these sites. The location of the convalescent camps signifies the superiority of the outer harbour for sea breezes, and the presence of sickness such as malaria (Powell, 2009:47).

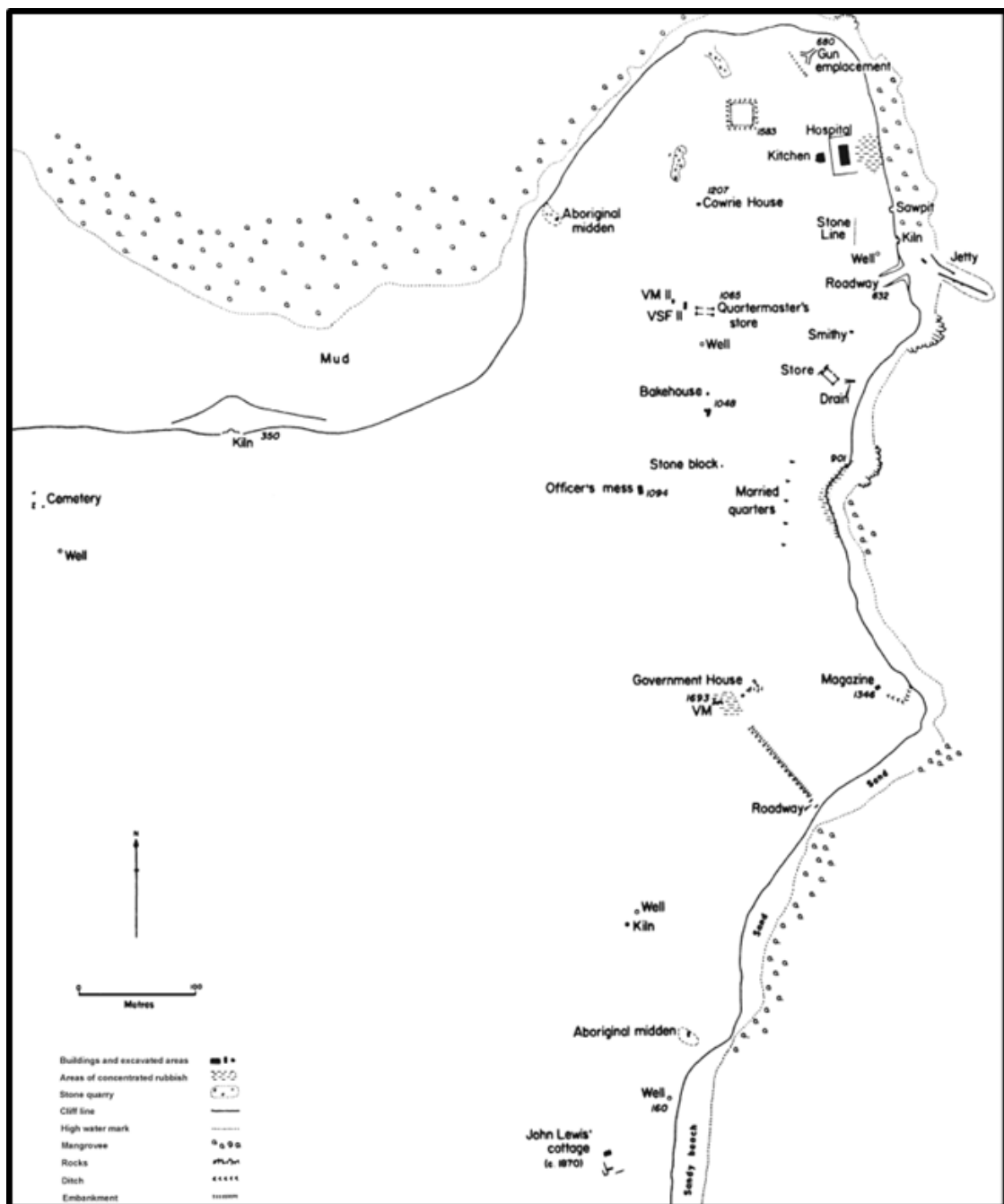


Figure 6.24 Map of Victoria settlement showing archaeological sites (Allen, 2008:3)

With an initial focus on Victoria, Taçon (1988) undertook research into the First Nations, European and Macassan archaeological sites of the Cobourg Peninsula as a whole. His objectives (Taçon, 1988:3) were to undertake further research and documentation of the roles of specific structures at Port Essington, yet this was broadened to encompass First Nations and Macassan material culture also. Taçon revisited the majority of sites on the Peninsula, recorded their condition, and entered them onto the Northern Territory Heritage Site Register. Further information on Victoria's satellite sites that Allen (1969) was unable to visit were also recorded.

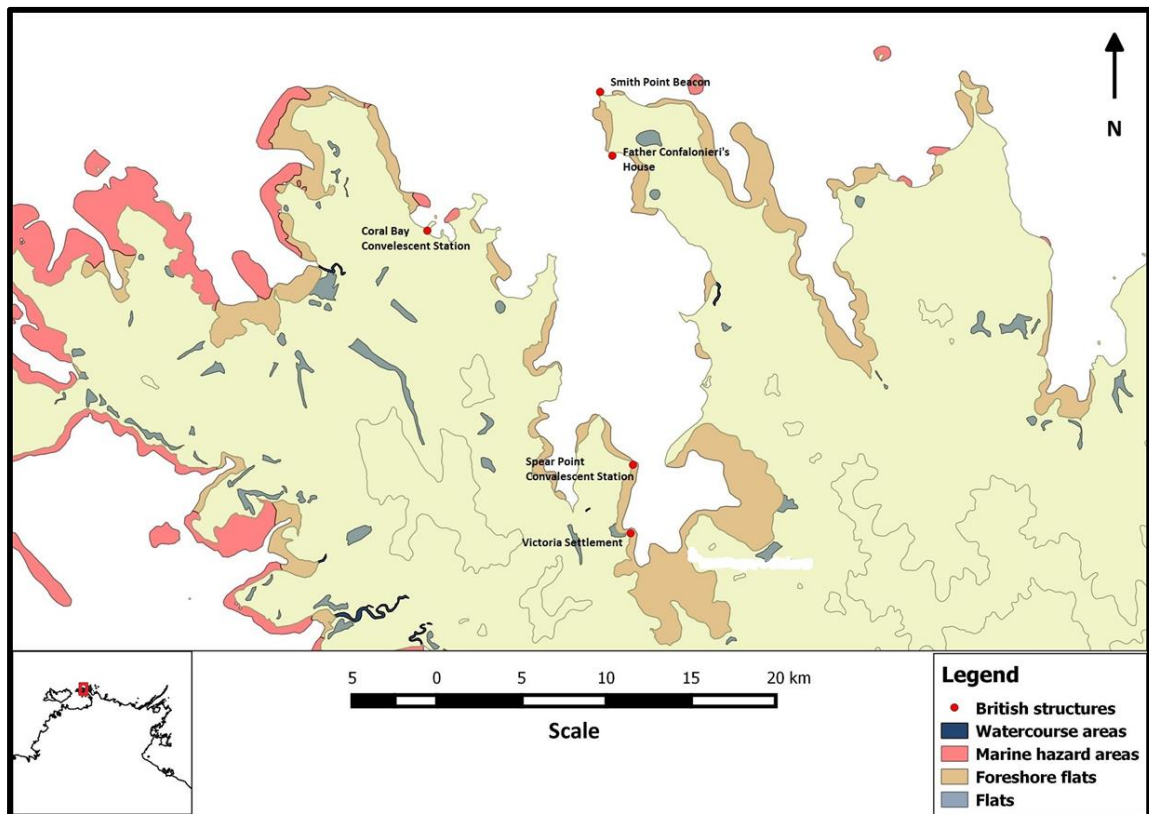


Figure 6.25 Map of Port Essington showing Victoria and satellite sites

Archaeological attributes

Site type: British garrison (military settlement)

Size: Approximately 0.36 km² for the garrison proper and 200 km² including the satellite sites

Features: rubbish dump (x2), hospital, married quarters, quartermaster's store, shell floors, officers' mess, store, bakehouse, the smithy, cowrie house, First Nations middens, magazine, kilns, cemetery, jetty, Government house, wells, sawpit, Macassan stoneline, quarries, convalescent stations, Smith Point beacon (Allen, 2008)

Artefacts: Jim Allen (1973:56–57; 2008:57–104) has provided a detailed analysis of Victoria's artefacts which are summarised below. Taçon (1988:4) collected 815 artefacts, with further undocumented collecting surveys increasing this number.

- Ceramics (>1,828): earthenware (white clay wares, transfer printed ware, coloured clay wares), porcelain (undecorated, overglaze polychrome, blue on white and transfer printed, white clay and coloured clay), stoneware, a nga-kwun ceramic fragment and clay pipes
- Glass (>15,275): retouched glass, bottle fragments, phials, stoppers, wine glasses and tumblers

- Metal (>2,216): nails, hoop iron, musket balls, cannon balls, angle iron, boot heels, lock, forks, screws, hinges, rings, belt buckle, uniform insignia, coins, buttons, furniture knobs, percussion caps, keyhole, washers and scrap lead and copper
- First Nations stone artefacts (>27)
- Bone (>39 MNI): cow/buffalo, sheep/goat, pig, dog, kangaroo, wallaby, bandicoot, lizard, reptile, bird, fish, dugong and crab

The majority of artefacts at Victoria recorded by Allen (1973:56) were of British origin and reflects the military nature of the garrison. Ceramics were primarily provenanced to the Potteries region of Staffordshire, England from between 1830-48. Of the porcelain fragments (representing 14.1% of the ceramics), many were made in mainland Southeast Asia, thus highlighting the dependance of the garrison on its island neighbours and its isolation from Sydney (Allen, 2008:73). Although there is a small possibility that porcelain may have been brought in by the Macassans, the likely source would have been from traders or supply voyages from Singapore, Hong Kong or Canton. The presence of three supikas (copper coins of Southeast Asian origin) strengthens the link between the garrison and the northern periphery of maritime Southeast Asia.

Glass constituted mostly bottles, of which include a number of seals. Seven seals were of government issue with one GR (George IV pre-1830), two WR (William IV 1830-7) and four VR (Victoria post-1837) indicating British monarchical rule at the time of manufacture. These seals may be representative of the eighty-five bases collected by Allen (1973:57), suggesting a small time-lag for glass also from manufacture to use in the garrison.

Retouched glass located in two First Nations shell middens close to the garrison show the peaceful relationships held between the British and First Nations peoples as well as the value of glass to produce implements in a region short in quality stone (Allen, 1973:54).

Cognitive attributes

Place names:

- Victoria – named by Bremer after the new Queen of England (Cameron, 1999:21)
- Barrow Bay – named after John Barrow, Second Secretary to the Admiralty and a protagonist of the Victoria garrison (Spillett, 1972:27)
- Minto Head – named by Bremer in honour of Gilbert Elliot-Murray-Kynynmound, 2nd Earl of Minto, First Lord of the Admiralty when Victoria was founded (Cameron, 1999:19)
- Orontes reef – named after the *Orontes* that was shipwrecked on the reef in 1839.
- King River – Possibly named after the surveyor Phillip Parker King (Tyers, 1844)

- River McArthur – Possibly named after the Commandant John McArthur (Tyers, 1844)

6.6 Overview of garrison locations

In contrast with the economic motivation for the Macassan trepang industry, the geopolitical and economic motives of the British garrisons in protecting the northern shores of the embryonic colony from the threat of French and Dutch colonisation (Fredericksen, 2003:1), as well as attempted trade with the eastern archipelago, are apparent in their site locations, history and archaeology (Figure 6.26). For the former, the British succeeded with Fort Dundas. Its situation far from the Macassan and other transport routes and located 24 kilometres within the Apsley Strait, however, meant that ships were disinclined to visit, thus it failed at the latter. The location of second garrison of Fort Wellington near the mouth of Raffles Bay made it more accessible to passing ships and placed it directly in the path of the Macassans, but visiting vessels during this time were limited. The lack of maritime infrastructure in the low-lying landscape reflected the temporary nature of the garrison as it awaited orders to move to Port Essington (Wilson, 1835:159), only to be shipped out altogether.

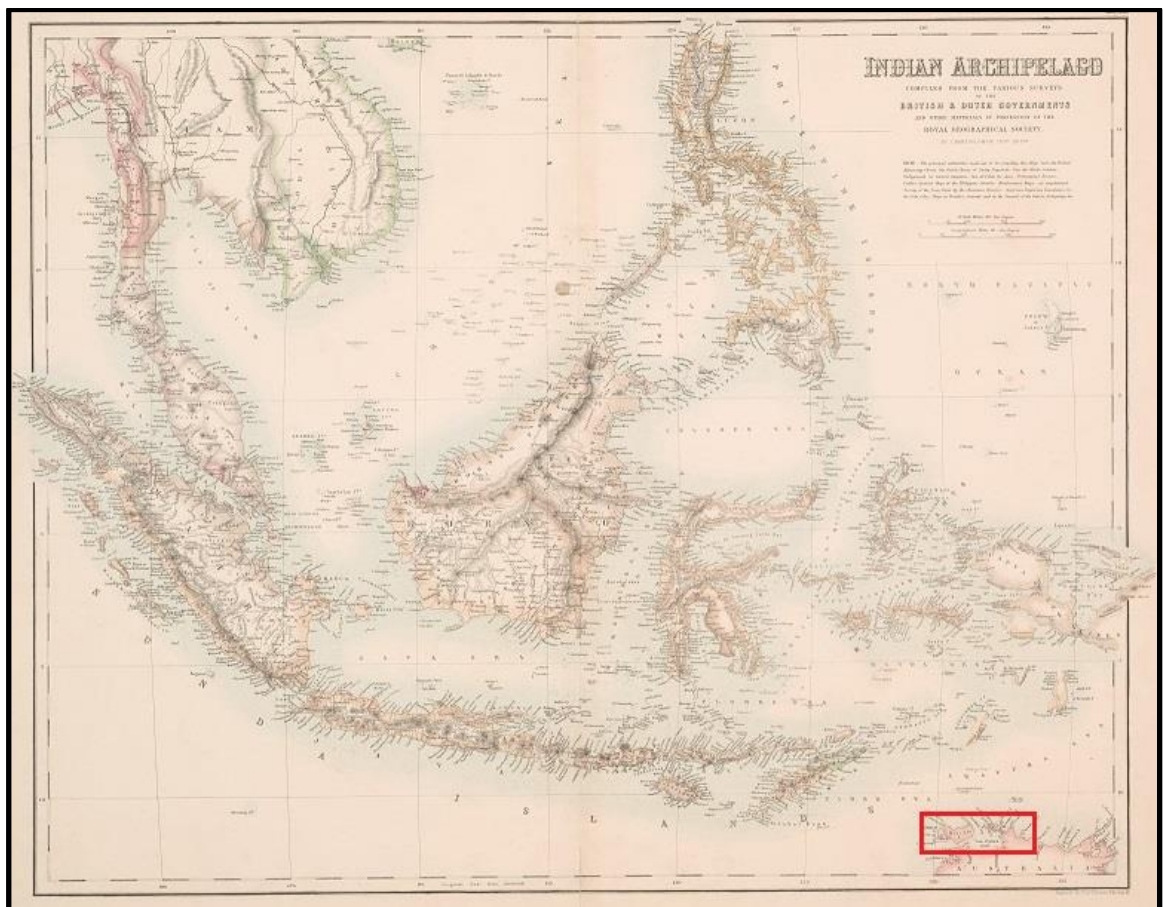


Figure 6.26 Sketch map of the Dutch possessions in the Indian Archipelago showing the location of Bathurst Island and the Cobourg Peninsula (within red rectangle) as the closest Australian landmass to Maritime Southeast Asia (Bartholomew, 1862)

The location of Victoria is similar to Fort Dundas in its defensive tactics, positioned as it is deep within the harbour on elevated land facing the harbour mouth. This position chosen over a location closer to the open sea was justified through the availability of fresh water, fertile soil, and deep sheltered anchorage (Bremer and Barrow, 1839:500). These benefits, however, were to the detriment of healthier sea breezes, which led to the construction of two convalescent stations at Coral Bay and Spear Point further north (Allen, 2008:126). Despite this, the death rate at Victoria was high at around 23 per cent of the population; as is testified by its cemetery extant today.

6.7 Discussion

From the compilation of historical and archaeological data, the three British garrisons can be categorised as a maritime cultural landscape of short-term British military occupation on the periphery of the predominantly Dutch colonies within maritime Southeast Asia. As is evident in Table 6.2, all three garrisons shared similar characteristics in physical environment, coastal habitation sites on elevated land, archaeological features and artefacts, resources, and the use of place names derived from the British Admiralty and Crown. Differences over time were the maritime setting from strait to bay; the presence of First Nations people, sometimes hostile outsiders, sometimes welcomed guests; the presence of Macassan trepangers; and the short occupation. The larger size and presence of satellite sites at Victoria can be attributed to the extended duration of occupation at this site compared with Fort Dundas and Fort Wellington. That they remained close to the coast, and were disbanded after the threat of Dutch/French colonisation—along with the potential for trade with the Macassans—dissipated, signifies both their success and failure, as the colonies to north and south prospered around them.

Table 6.2 Overview of physical, historical, archaeological and cognitive characteristics of the British garrisons

	Fort Dundas	Fort Wellington	Victoria
Time and length of occupation	1824–29 4.5 years	1827–29 2 years	1838–49 11 years
Physical environment	Coastal, elevated land	Coastal, elevated land (surrounded by swamps)	Coastal, elevated land
Maritime setting	Strait between two islands	Bay	Bay (inner bay)
Maritime infrastructure	Wharf	None	Wharf
Local resources	Water, timber, stone	Fresh water, fish, cabbage palm, trepang	Fresh water, stone, clay, timber, shell, fish, kangaroo, wallaby, bandicoot, lizard, birds, fish, dugong, crab, trepang
Site size	Approx. 1.16 km ²	Approx. 0.07 km ²	Approx. 0.36 km ² Approx. 200 km ² including satellite sites
Satellite sites (no.)	1	0	5
Features	Stockade, commissariat store, wharf, Commandant's house, hospital, habitation structures, wells, terraces, quarry	Cells or storehouse, cuttings (possibly sawpits or borrow pits), collapsed structure, terrace, ceramic surface scatter, fireplaces/chimneys, well, disturbed platforms of ironstone and coral rock, levelled area, brick and ironstone scatter	Fort, Commandants' house, commissariat store, habitation structures, wharf, wells, vegetable garden
Artefacts	>6,363 – glass, ceramic, metal (nails), Shako plate from the 3 rd Regiment of Royal Marines	Amount yet to be determined – glass, ceramic, metal	>19,385 – glass, ceramic, metal, stone, bone
Non-British presence	First Nations people as hostile outsiders	First Nations people, Macassans,	First Nations people, Macassans, trepang fisher (Rae [not discussed])
Place names	Prominent British peoples	Prominent British peoples	Prominent British peoples

Chapter 7 – British colonisation

7.1 Introduction

The expansion of the populations of Australia's southern colonies and the desire to acquire land for cultivation led to the annexation of what became the Northern Territory of South Australia. The failed colony of Escape Cliffs (1864–67), followed by the permanent colony of Palmerston (1869 to present), represent the fourth and final historical development phase that ends with South Australia handing the Northern Territory over to the Commonwealth in 1911 (Figure 7.1).

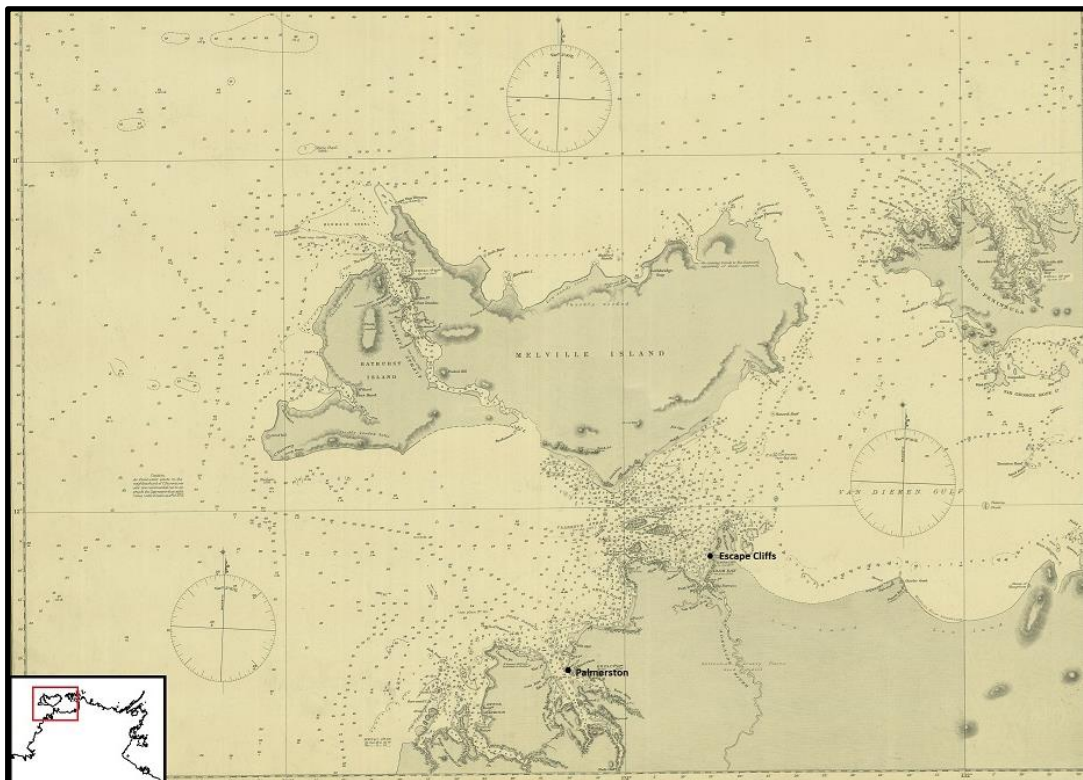


Figure 7.1 [Section of] *Australia - North Coast Melville Island, with Dundas and Clarence Straits* showing locations of Escape Cliffs and Palmerston (Great Britain. Hydrographic Department, 1883)

As with the British garrisons, this chapter begins with the geopolitical setting, followed by a review of Escape Cliff's physical environment, a historical overview, previous archaeological research undertaken and the site's archaeological and cognitive attributes. From this point, the chapter structure changes to accommodate the dramatic increase in maritime and terrestrial activities as the Northern Territory transitioned from short-term to permanent settler occupation. Here, the physical environment of Palmerston is examined, followed by an overview of the First Nations, British and Chinese communities that share the history of the region. A selection of maritime and terrestrial activities relating to the research aims are then presented through their

historical context, archaeology, and fieldwork undertaken by the author at selected sites. These are:

- Initial colonisation and land survey
- Overland and subsea telegraph cables
- Port Darwin maritime infrastructure
- Maritime industries
- Terrestrial industries
- Customs and quarantine
- Shipwreck events

The outcome of this chapter is an overview of maritime communities and archaeology from the period of British colonisation that highlights the importance of the maritime cultural landscape of the region as a foundation for occupation, habitation, resource extraction and industry, and as a conduit for local and regional travel. In concluding with a brief discussion on the resources and site location of Palmerston, this material will contribute to the interpretation of the historical development of the Northern Territory as a maritime cultural landscape of adaptation, shared landscapes and movement that shows continual links to maritime Southeast Asia.

7.2 Geopolitical setting

Within a few years of Victoria's abandonment in 1849, the southern colonies of Australia expanded rapidly through the influx of immigrants following the discovery of gold (Lawrence and Davies, 2011:147). At this time, the primary industries of gold mining and pastoralism saw many of the new immigrants moving inland from the major ports to secure land to prospect or farm. In the colony of South Australia, the ownership of land was the road to respectability, and in the 1850s, land sales boomed (Powell, 2009:53). Knowledge of fertile lands in northern Australia through the expeditions headed by Augustus Gregory in 1855–56, John McDouall Stuart in 1862 and John McKinlay in the same year led the South Australian Government to successfully petition for the annexation of the north on 6 July 1863 (Powell, 2009:52–8). Contrary to their British garrison predecessors who were looking out to sea, the South Australian Government focused their view inland for pastoralisation and developing a northern community. Land was sold to speculators in Adelaide and London prior to the colonists arriving in the new Northern Territory (Powell, 2009:61), and as with the British garrisons beforehand, strong personalities and poor judgement marked the beginning of 48 years of South Australian governance prior to handing the Northern Territory over to the Commonwealth in 1911.

The colonisation of Palmerston falls within a time of continued colonisation and exploitation of maritime Southeast Asia by the Dutch and British (Battersby, 2007:13–7; Osborne, 2016:70–92).

The Dutch were extending their territories to northern Sumatra, Lombok, Bali and other islands to expand their plantation exports through an inexpensive Chinese, and then Javanese indentured labour force (Webster, 2011; Lamb, 2014). Of the British Straits Settlements, the prime location of Singapore on the India-China trade route saw its dramatic rise as a trading entrepot. The high Chinese and Indian populations in Singapore during this time reflect the continued tea and opium trades—along with the human slave trade of ‘coolies’—under British rule. It also reflects the increased British presence in China after the second Opium War (1856–60), with the subsequent Treaty of Tianjin opening a further 10 Chinese ports to foreign trade, granting foreign access to inland travel and regulating the ‘coolie’ trade, which the British colonies relied heavily on (Lovell, 2012:259).

The trade of people and goods was further mobilised by the increase of steam-powered shipping in the mid to late 1800s (Steinberg, 2001:18–26; Battersby, 2007:17–65). Ships moved between the southern and eastern colonies of Australia, Palmerston, then on to the British and Dutch colonies in maritime Southeast Asia and onwards to China. The increased movement between China and Australia during this time highlights that the British interest in the eastern archipelago as a region to sell British goods was declining, while it increasingly became a conduit between the expanding British colonies in the south and in Singapore and Hong Kong to the north.

7.3 Escape Cliffs (1864–67)

Physical environment

Terrestrial setting: Located 58 kilometres northeast of present-day Darwin, Escape Cliffs sits on a small peninsula on the eastern shores of Adam Bay, midway between Cape Hotham 12 kilometres to the north and the Adelaide River mouth 10 kilometres to the south (Figure 7.2). Situated on a low escarpment, the land directly around the site is lightly timbered, with low-lying swamplands and areas subject to monsoonal flooding two kilometres to the east and five kilometres to the south (The South Australian Advertiser, 19 December 1864:3). Directly south of the peninsula, the Adelaide River connects with seasonal floodplains to the east that extend inland from three to 70 kilometres from the sea. In following the river inland “...the land undulates and the soil is rich, well grassed, and interlaced with magnificent and permanent creeks lined with high umbrageous and tropical like trees including Stringybark, Ironbark, Blackwood, and cabbage palm that tower above the other trees” (Geelong Advertiser, 19 October 1864:2–3).

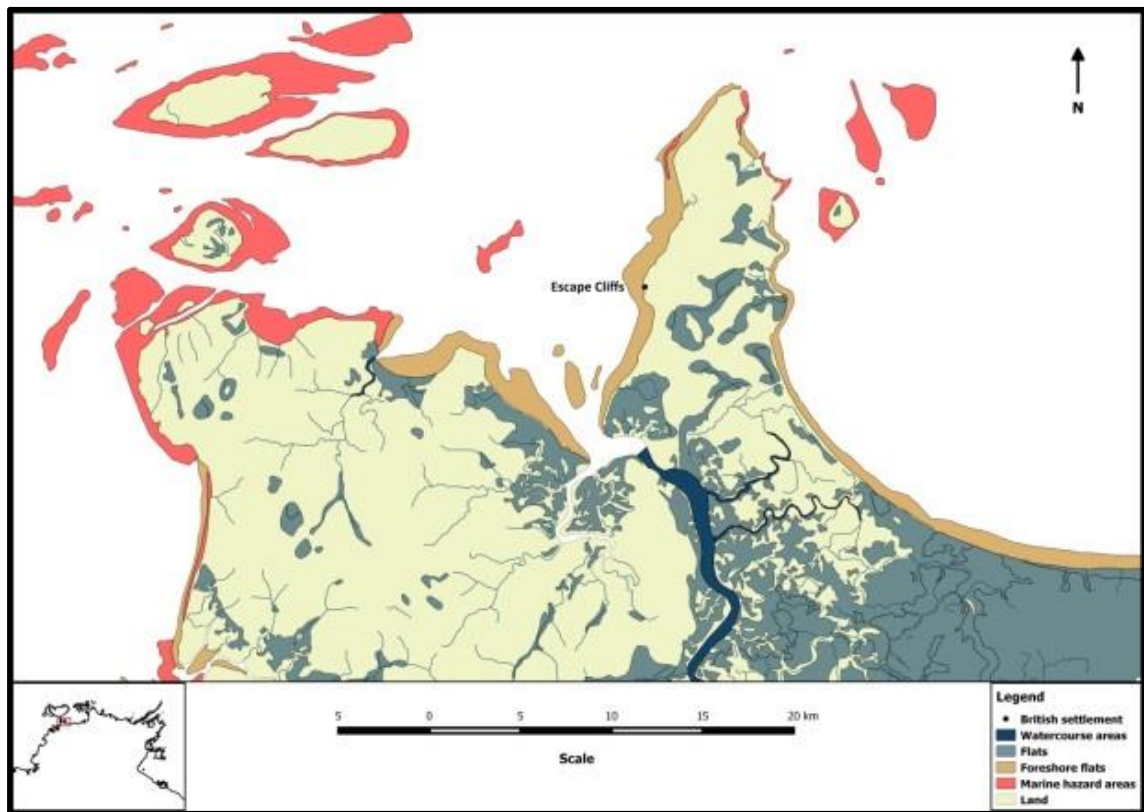


Figure 7.2 Topographic map showing Escape Cliffs and the surrounding region of extended foreshore flats, the course of the Adelaide River and the flats stretching from the Adelaide River east and to the coast that become floodplains during the wet season

Maritime setting: The maritime setting of Adam Bay is shallow, with extensive shifting sand bars influenced by the silt carried on the outward tides and currents of the Adelaide River to the south (Figure 7.3). Within the vicinity of Escape Cliffs, the depth of Adam Bay is between 3.7 and 4.3 metres, increasing to 16.5 metres at the bay mouth. At low tide, the coast directly below turns to a mud flat fringed by a coral reef extending seawards for up to 1.5 kilometres. The Adelaide River mouth is 1.5 kilometres broad, with the width varying between 300 and 600 metres for 32 kilometres upstream (South Australian Register, 14 October 1864:2). From 155 metres upstream the river narrows, yet the depth is described as “sufficient to float the largest ship close to the banks, which [for 48 km] are made up of thick mangrove and woodbine, thinning out to tremendous plains” (South Australian Register, 14 October 1864:2).

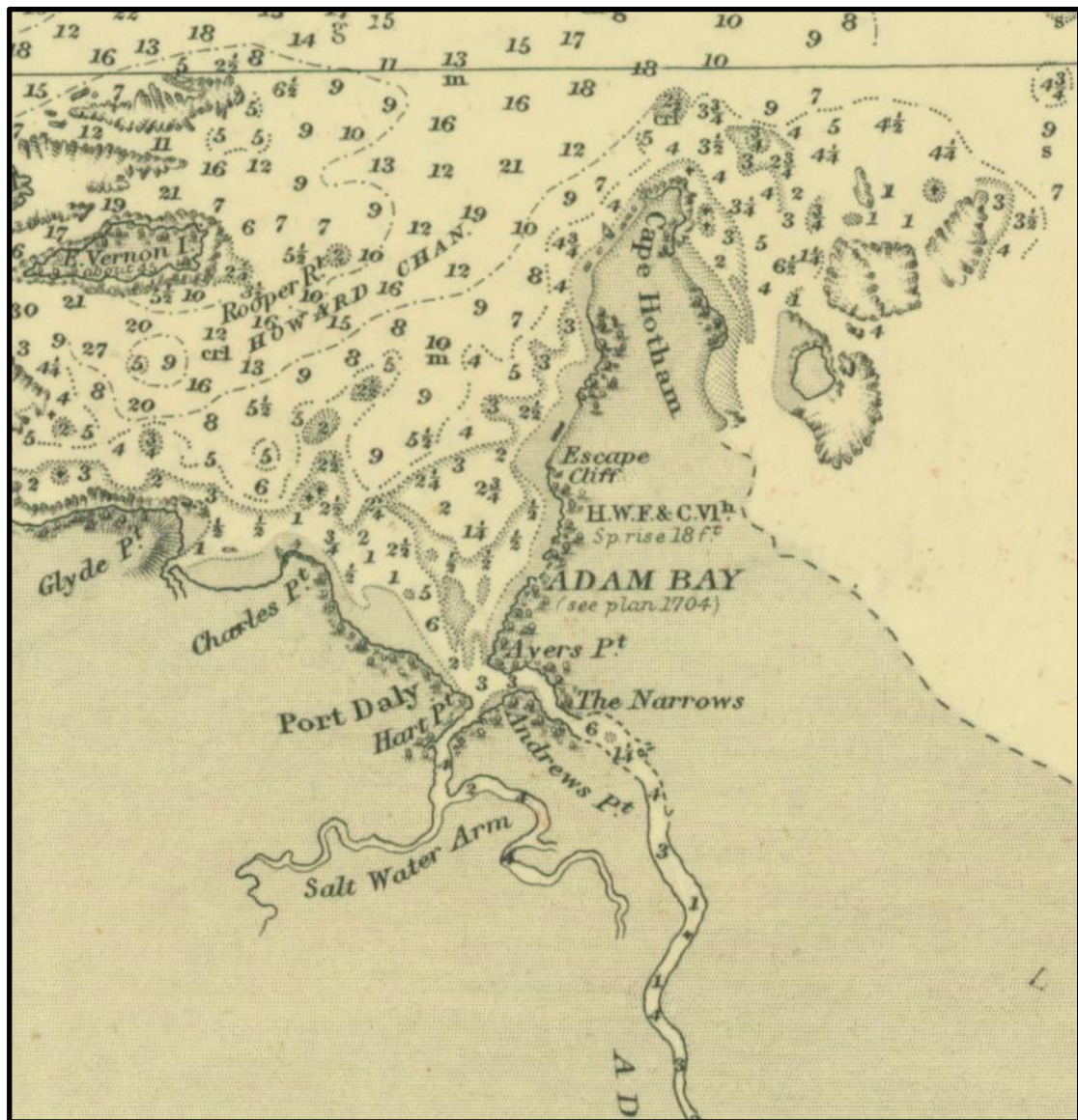


Figure 7.3 [Section of] *Australia - North Coast Melville Island, with Dundas and Clarence Straits* showing Adam Bay soundings in fathoms (Great Britain. Hydrographic Department, 1883)

Historical overview

Under the pretext of locating and surveying previously-purchased land suitable for agriculture, the appointed government resident, Boyle Travers Finniss, chose Adam Bay for the new colony of the Northern Territory of South Australia in July 1864 (Powell, 2009:61). The first surveyors sailed from Adelaide to Adam Bay on the *Henry Ellis* (412 tons), and the schooners *Beatrice* (100 tons) and *Yatala* (80 tons) (Geelong Advertiser, 19 October 1864:2). At its inception, the community included Finniss and his second-in-command engineer and surveyor James Thomas Manton, a surgeon and protector of Aborigines, clerk in charge, the accountant and postmaster, the storekeeper and superintendent of stock, assistant storekeeper, two draftsmen, two junior surveyors, eight chainmen (five of which were also able seamen), two carpenters, a blacksmith, and 18 labourers with additional skills; some having joint roles as miner, able seaman, shoemaker

and bullock-driver. (Pugh, 2018b:25). A further 40 people arrived in December of the same year, including surveyors, two women, and Jefferson Stow as the representative of the 200 land-order holders (Pugh, 2018b:52). During its short lifespan, the community of Escape Cliffs was involved in exploration and survey, the construction and maintenance of the colony, and the occasional supply voyage to Timor.

Escape Cliffs as an ephemeral capital

In first arriving on 31 May 1864, Manton selected a site for livestock and began construction of the stockyards, landing jetty and stores (South Australian Register, 14 October 1864:2; O'Brien, 2008:381; Powell, 2009:59–62) (Figure 7.4). Named River Camp, the site was 80 kilometres up the Adelaide River. When Finnis arrived in July, however, he chose the ill-suited site of Escape Cliffs for the colony proper. Annoyed by his selection, members of the survey party described Escape Cliffs as "...the worst possible site any one could conceive for a township. A tremendous reef runs out about a mile from shore, which prevents even boats from landing except at high tides" (The South Australian Advertiser, 19 December 1864:3). "No water exists, such as creeks or waterholes; and the wells where we found water are more than one and a half miles off ... I think that the site will again be altered, and again we will have to perform all the lumping work belonging to shifting stores and camp." (South Australian Register, 14 October 1864:2)

Permanent structures at Escape Cliffs, including Government House, were few, with many of the surveyors living in tents, and surveying away from the colony for extended periods (Figures 7.5–7.7). The 'colony' of Escape Cliffs was thus more a temporary surveyors' base, awaiting relocation to the preferred site of Port Darwin (Powell, 2010:120–1), just as Fort Wellington's occupants expected to relocate to Port Essington 42 years prior.



Figure 7.4 *View in the Northern Territory - First camp on the Adelaide River*, print/wood engraving (Calvert, 1865 [SLV, b48931])



Figure 7.5 1865. *Escape Cliffs* (SLSA, B 7196)



Figure 7.6 1866. *Escape Cliffs, Northern Territory* (SLSA, B 8960)

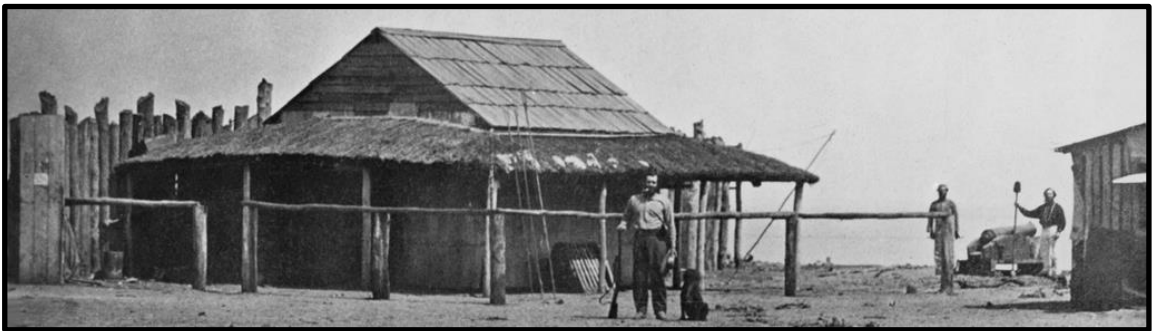


Figure 7.7 1865. *Escape Cliffs* (SLSA, B 7195)

Colonial/First Nations relationships

From the outset, First Nations peoples were regular visitors to the surveyors' camps that occupied Woolna land (Geelong Advertiser, 19 October 1864:2; Powell, 2009:62). Finnis, however, lacked the ability to foster the peaceful relationships that had been previously achieved at the garrisons of Fort Wellington and Victoria. His hostile and defensive attitude towards First Nations peoples is evident in his descriptions of their character as "bold, treacherous, and aggressive, and sufficiently numerous to hold in contempt the small body who compose the first expedition" (The Inquirer and Commercial News, 30 November 1864:4). "Blatant thievery" of government stores was complained of, with a stockade constructed around the camp and a police force requested as workmen kept guard over stores and furniture within the tents (Geelong Advertiser, 19 October 1864:2; Manton et al., 1865–66:1–7).

Within months of occupation, the non-fatal spearing of one of the survey party led to a number of First Nations men being shot and wounded and the murder of an Elder by Alaric Ward; described nationally as "justifiable homicide" (Geelong Advertiser, 19 October 1864:2). One year later, Alaric Ward was murdered through a retaliation spearing (Powell, 2009:62). From this time, First Nations peoples were not trusted or permitted into the camp, and by the following year, the surveyors were not permitted to visit the "native encampment after dark", with firearms to be

ready in case of attack (Manton et al., 1865–1866:7). Despite this, relationships improved over time, with respect given towards First Nations peoples, seeing regular visits of large groups to the River Camp; “the greatest good feeling has existed” (The Wallaroo Times and Mining Journal, 17 February 1866:5).

Local and imported resources

As a colony of South Australia, Adelaide was the primary port for Escape Cliff’s supplies and communication (Manton et al., 1866:1; Webling, 1995:24–9), with Kupang a regular source of provisions. For this, the *Beatrice* was used, sailing to a number of times to Timor, and once to Sourabaya and Adelaide (The South Australian Advertiser, 13 October 1864:2; The Adelaide Express, 15 December 1864:2; The Wallaroo Times and Mining Journal, 17 February 1866:5). As with the earlier British garrisons, personal communication was slow, as is evident with arrival of the *Ellen Lewis* (336 tons) from Adelaide late in 1865, bringing a “general rejoicing” due to the lack of contact for the past eight months. Two years later, the screw steamer *Eagle* (144 tons) brought dissatisfaction to the colony in arriving from Adelaide without “a single private letter” after seven months of no contact (South Australian Register, 26 February 1867:4).

Of the local resources, Escape Cliffs appeared to be lacking compared to the Adelaide River region to the south, with drinkable water over three kilometres away, and edible animals, building stone, timbers and lime scarce (South Australian Register, 14 October 1864:2; The South Australian Advertiser, 19 December 1864:3). In contrast, the inland country abounded in kangaroo, wallaby, bustards, quail and pheasants, with fresh water, fish and small sweet oysters available on the coast, and fish and prawns in the river (Geelong Advertiser, 19 October 1864:2).

The Forlorn Hope

A dislike for Finniss from the majority of the surveying party was evident from the outset (Geelong Advertiser, 19 October 1864:2). This was best exemplified by the actions of Jefferson Stow, who in April 1865 purchased a ship’s boat from the *Bengal*, which was visiting Escape Cliffs to drop off supplies en route to the East Indies (Powell, 2010:122–3). Naming the two-masted whaleboat *Forlorn Hope*, Stow and six others sailed 1,600 nautical miles to Geraldton, Western Australia, to escape the flailing colony. In such a small vessel, this was an enormous feat. When the barque *Ellen Lewis* brought up McKinlay and his survey party in November 1865, many more chose to leave. “In fact if it were not for the officers, the place would be abandoned” (The Wallaroo Times and Mining Journal [Port Wallaroo, SA], 17 February 1866:5).

Survey expeditions

Survey of the surrounding terrestrial and maritime region was the primary activity of the fledgling colony (Figure 7.8). Of the maritime environments, Commander John Hutchison of the *Beatrice* surveyed the Adelaide River and Adam Bay (The Adelaide Express, 15 December 1864:2; Webling, 1995:13), with Lieutenant Frederick Howard later surveying Port Darwin, Bynoe Harbour, the coast of Arnhem Land and Limmen Bight, the channel between the Vernon Islands, and the Daly River (Powell, 2010:119). Manton, Dr Millner and 10 others also visited Port Darwin on the Government boat *Julia*. Manton's glowing account of the harbour and the land (evidenced below in his descriptions of the physical environment of Palmerston at 7.4) no doubt encouraged its colonisation a few years later (The Mercury, 27 August 1867:3). From the surveys carried out across the country that extended from Port Darwin to Chambers Bay, Finnis made a number of recommendations for townships and land for cultivation. Of these, the Eastern District sectioned for future survey was a floodplain in the wet season. This was confirmed by explorer John McKinlay in 1866, when, after the recall of Finnis, he and his team attempted to survey this region as far as the Roper River (Powell, 2009:62; Pugh, 2018b:115–30). Having taken six months to traverse the flooded land, the survey was cut short at the West Alligator River. In the end, the survey party's horses were slaughtered for their hides, which were stretched around the frame of the makeshift boat, *The Pioneer*, so the party could return to Escape Cliffs (Figures 7.9 and 7.10).

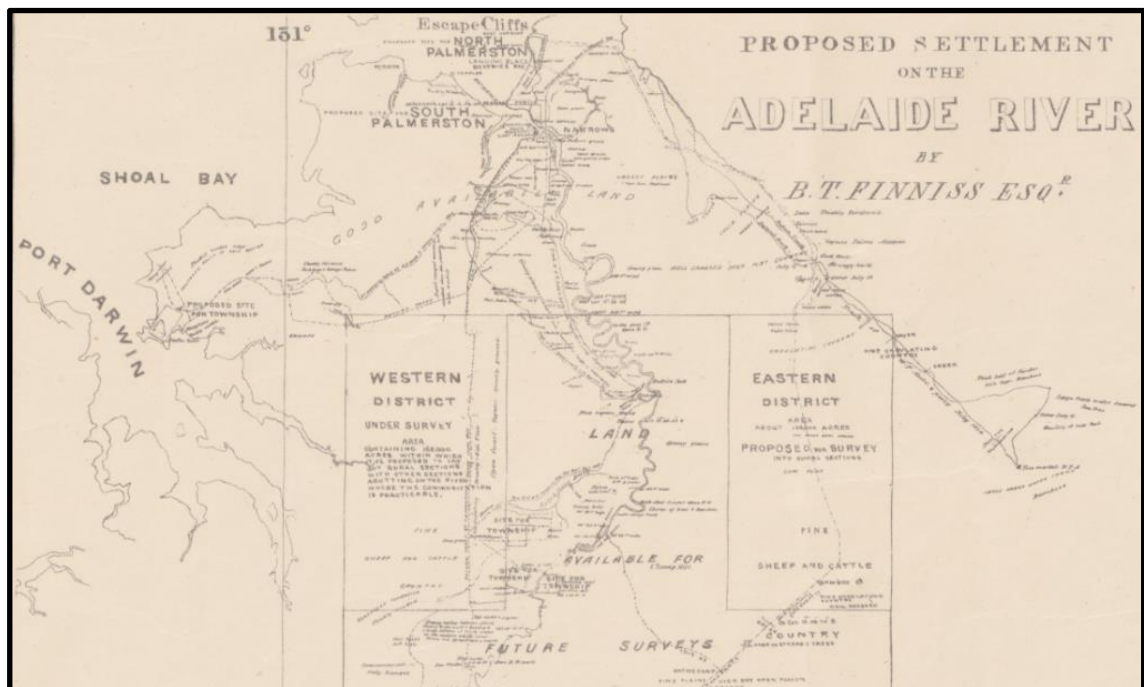


Figure 7.8 [Section of] *Map of the Northern Territory shewing recent surveys* (South Australia. Surveyor-General's Office et al., 1868)

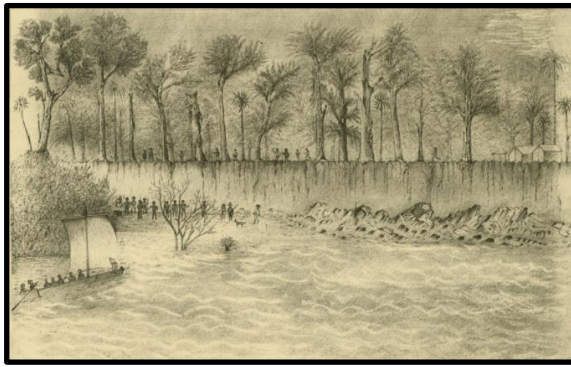


Figure 7.9 1866. *Escape Cliffs* (SLSA, B 8961)



Figure 7.10 1866. *Escape Cliffs* (SLSA, B 31111)

Abandonment of Escape Cliffs

After Finniss was recalled to Adelaide in late 1865, Manton became acting government resident, yet he was described as worse than Finniss in his “arbitrary and despotic conduct” (South Australian Register, 26 February 1867:4). Although expeditions led by Litchfield, Manton, and McKinley resulted in the selection of Port Darwin as the preferred location for the colony, the new ministry under lawyer JP Boucat recalled the surveying party in November 1866 (Powell, 2010:121). On the arrival of the *Eagle*, the valuable property of Escape Cliffs was stowed, and on 11 January 1867, the cramped vessel departed for the southern colonies; the last of inhabitants leaving Escape Cliffs “as Russian prisoners would leave Siberia.” (South Australian Register, 26 February 1867:4).

Archaeology

Escape Cliffs has had little archaeological attention compared to the British garrisons. In 1968, the Historical Society of the Northern Territory recorded features and artefacts including nine water tanks, a pathway marked by inverted glass bottles and a corrugated iron beacon (Pugh, 2018b:152). The site was reported on again in 1995 by Scott Mitchell, and in 1998 by Robin Gregory and Stephen Sutton to determine the boundaries for heritage declaration and condition of the site (Gregory, 1998:1) (Figure 7.11).

This report noted that the site was obscured by vegetation, the pilfering of artefacts, and the rate of erosion of the cliff face, between one and four metres since 1995. Features recorded were the floor of Government House and cement floor, five ship’s tanks, a scarred tree, an artefact scatter, a “Moresby 1934” plaque, three pits, a brick scatter, and a bakehouse oven. Compared against Mitchell’s report, archaeological features showed little deterioration. The report concluded that the floor of the Government House would be on the edge of the cliff within the next five to 10 years (Gregory, 1998:3). The original surveyors camp located approximately 80 kilometres up the

Adelaide River has yet to be surveyed. In 2017, the Past Masters visited Escape Cliffs, providing a detailed account of the site and its history on their website (Past Masters, n.d.[b]).

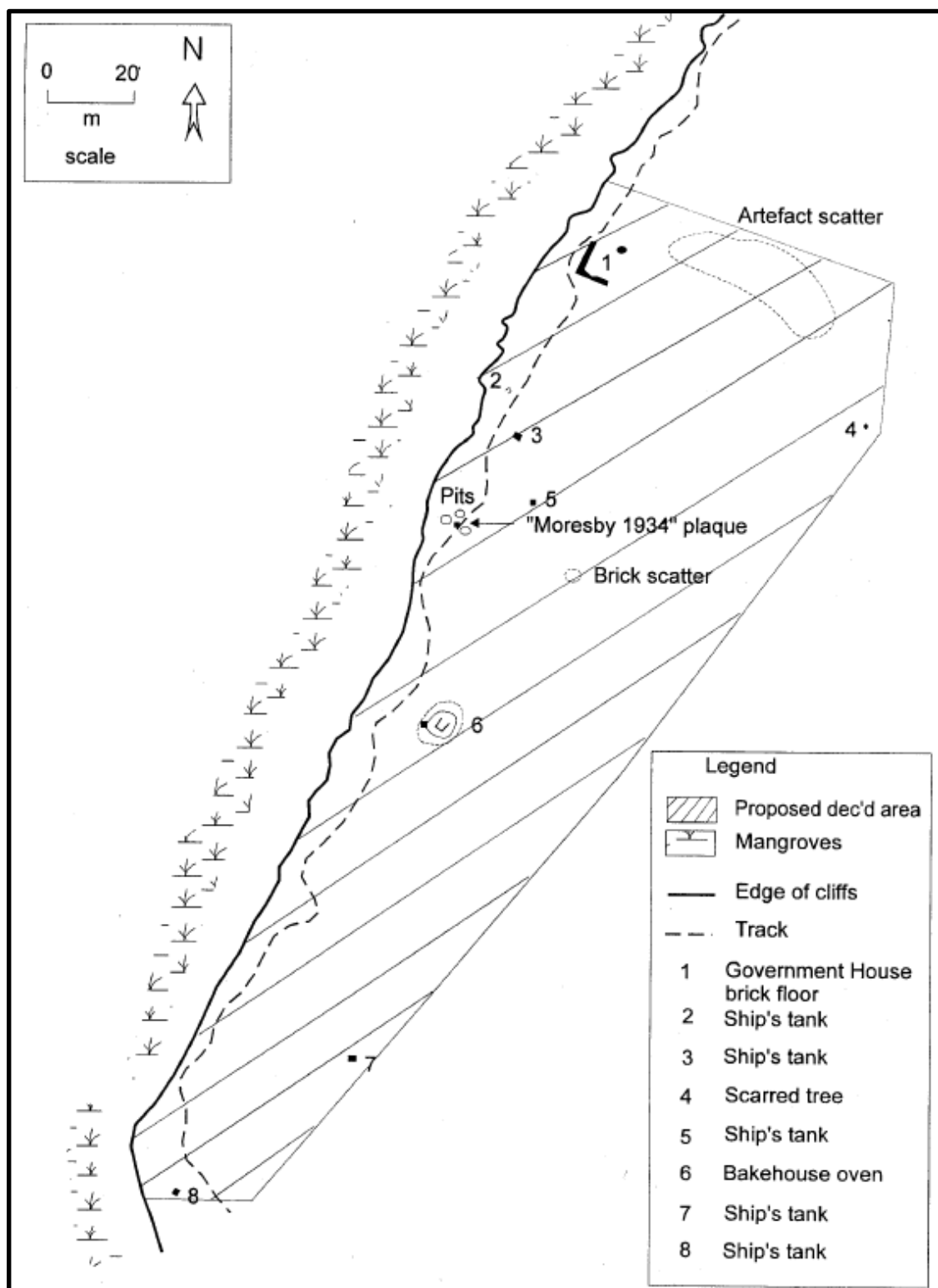


Figure 7.11 Site plan of Escape Cliffs after Mitchell's unpublished field map illustrating the area proposed for declaration in 1998 (Gregory, 1998)

Archaeological attributes

Site type: Settlement of the Northern Territory of South Australia

Size: 0.013 km²

Features: the floor of Government House and cement floor, five ship's tanks, a scarred tree, an artefact scatter, a "Moresby 1934" plaque, three pits, a brick scatter, and a bakehouse oven.

Artefacts: bottle glass, bricks, Telescopium shell

Cognitive attributes

Place names:

- Escape Cliffs – named by Wickham and Stokes after the escape of two men from being speared
- North and South Palmerston (in honour of the then-Prime Minister of the United Kingdom, Henry John Temple, 3rd Viscount Palmerston)
- Daly River and Port Daly (named by Finniss after Sir Dominick Daly, the then-Governor of South Australia [Geelong Advertiser, 19 October 1864:2; Powell, 2010:119])
- Ayers Point (after Henry Ayers, South Australian Premier from 1863, minister and prominent businessman)
- Hart Point (after South Australian minister John Hart, treasurer to Ayers)
- Glyde Point (after Lavington Glyde, South Australian minister)
- Finniss River (after the first government resident, Boyle Travers Finniss)
- Beatrice Bay and Julia Plains named after the schooner and boat

The *Sketch Map of the North Territory Country in the vicinity of Adam Bay* by Bennett (1865) (Figure 7.12) shows place names given to maritime and topographical features of the region both previously by King and Wickham and Stokes, as well as Escape Cliffs' land investors (mostly South Australian politicians), surveyors, and the survey watercraft.

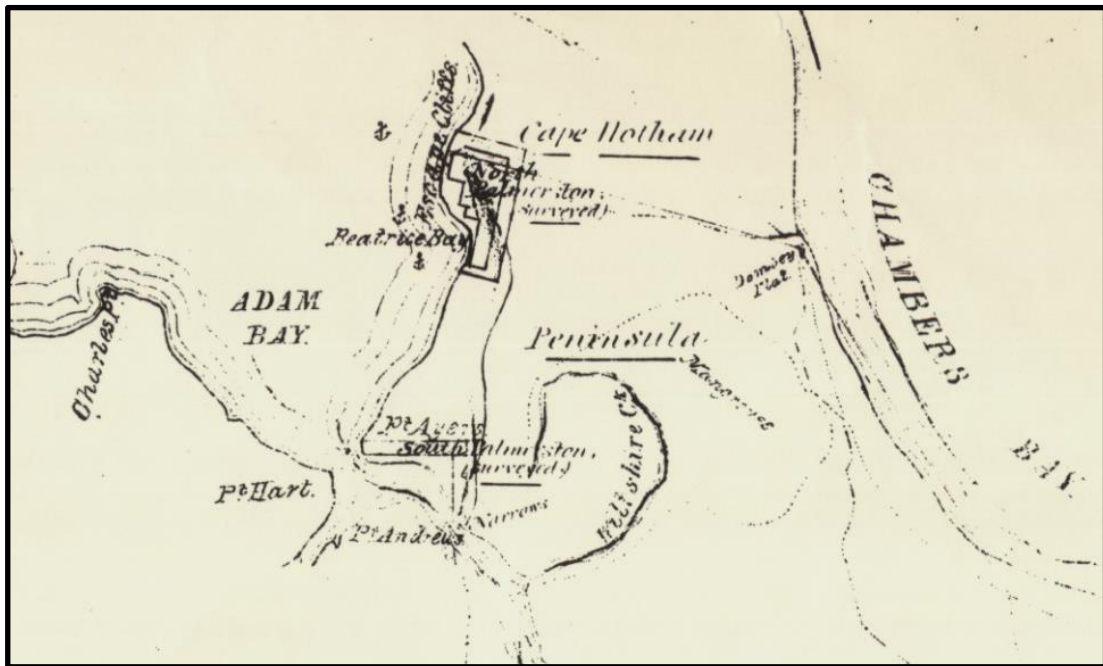


Figure 7.12 [Section of] *Sketch Map of the North Territory Country in the vicinity of Adam Bay* (Bennett, 1865)

7.4 Palmerston (1869–1911)

Physical environment

Maritime setting: Averaging between 12.8 and 34.7 metres in depth, Port Darwin is relatively deep from the mouth to the settlement, providing sheltered anchorages for larger ships (Figure 7.13). Due to the high tidal range of seven metres and the numerous estuaries entering the bay, mudflats dominate the littoral zone for up to two kilometres at low tide. Although this is less so in the immediate vicinity of Palmerston, extended jetties are still required to allow ships to manage cargos without the assistance of the lightering method. This, however, did not occur within the first two decades of the settlement, with the lightering system being the primary means of transporting people and stores between ship and shore.

Manton described Port Darwin as “...indeed a magnificent harbor for shipping and landing cargo. It has a beautiful entrance, perfectly clear of rocks, shoals, and bars, and quite safe for any shipmaster to take his vessel into without a pilot, steam-tug, or lighthouse; and even with a head wind, provided he takes the advantage of a flood tide, the narrowest place at the entrance of the harbour is between Point Emery and the Talc Head, which is about two miles and a quarter across, with deep water close up to within a few yards of the land on both sides. Anywhere near Point Emery, a vessel could be anchored in nine or ten fathoms of water at low-water spring-tides; be calm as a mill-pond, and near enough to land to stand on the deck and throw a biscuit ashore, this

is not in one place alone, but there is plenty of room to accommodate a sufficient number of ships trading with a large commercial city” (The Mercury, 27 August 1867:3).



Figure 7.13 [Section of] *Australia - North Coast Melville Island, with Dundas and Clarence Straits* showing soundings, mangrove coastlines and mudflats of Port Darwin (Great Britain. Hydrographic Department, 1883)

Terrestrial setting: Located on the eastern side of Port Darwin at around 5.5 kilometres from the bay mouth, Palmerston sits on a low plateau that juts out as a small peninsula commanding clear views of the bay and taking advantage of sea breezes. The township of Palmerston extends from Point Emery and Point Elliot in the east, curving around to Stokes Hill and Fort Point in the west. The surveyed land north of Palmerston is open forest that passes through the Botanic Gardens and stretches to East Point before dropping into mangroves and swamplands fed by Rapid Creek and Buffalo Creek. Surveyed allotments continue through a low relief landscape of gently undulating hills intersected by numerous rivers and creeks extending around 100 kilometres south of

Palmerston and 80 kilometres west to east, bordered by the Adelaide River (Figures 7.14 and 7.15). A brief description of the land is provided for each Hundred in Section of *General plan showing natural features of the country, towns, reserves, roads & sectional lands at, and in the vicinity of Port Darwin, Northern Territory of South Australia* (South Australia Surveyor-General's Office, 1872).

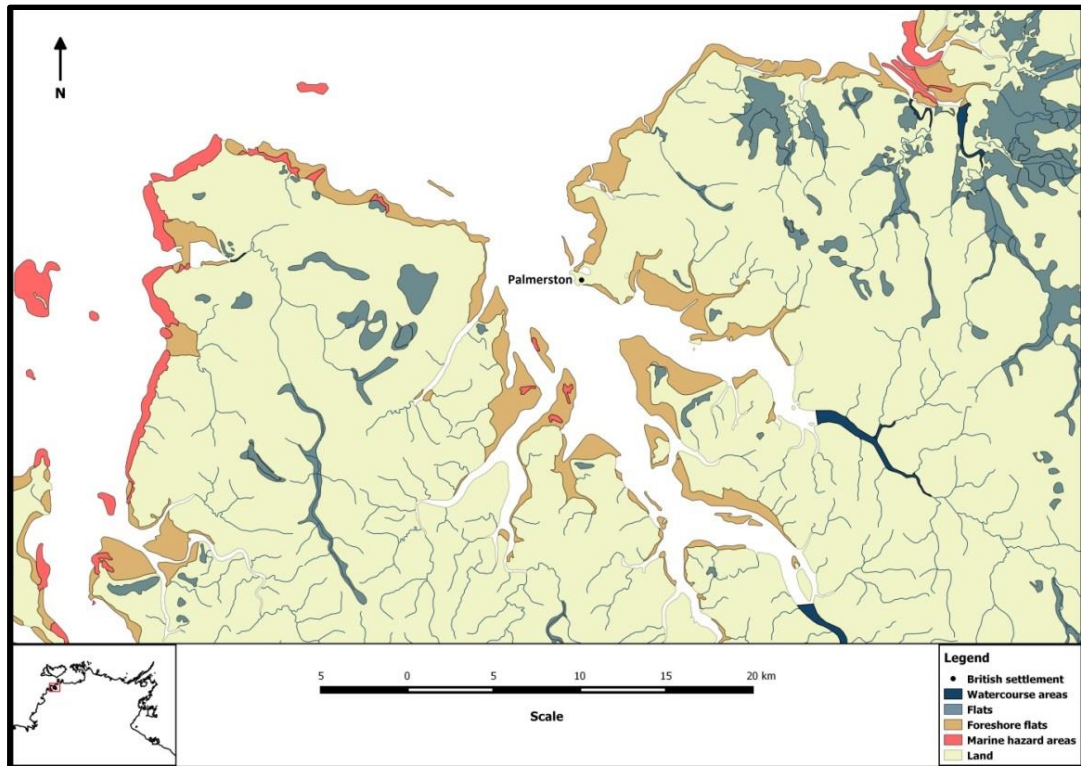


Figure 7.14 Topographic map of Port Darwin and surrounds. The lack of contour lines and extensive foreshore flats demonstrates the flatness of the landscape

Communities

The history of Palmerston and its First Nations, British and Chinese communities is well documented (Searcy, 1909, 1984; See-Kee, 1987; Jones, 1997; Ah Kit, 2002; Bourke et al., 2005; Duminski, 2005; Yee, 2006; Carment et al., 2008; Powell, 2009, 2010; Pugh, 2018a; Wells, 2018). As the Traditional Owners of the Port Darwin region and beyond, the Larrakia people met with Surveyor-General George Goyder's surveying team upon their arrival on 5 February 1869 (Wells, 2018:58). As pointed out by Wells (2018), both the Larrakia and the surveyors were aware of each other's expectations through previous experiences including the surveying voyages of Wickham and Stokes and the Escape Cliffs settlement. Relationships between the two groups were respectful at first, yet deteriorated after a few months. Following the spearing of surveyors Bennett and Guy which led to the death of Bennett, Larrakia people were not welcome at the surveyors' camp and the surveyors were continually on guard against an impending attack. Although Goyder did not approve of further retaliation, Larrakia people were shot at by the

surveying party on several occasions. Fatalities were not recorded by the British, although it can be assumed they occurred.

Goyder may have recognised the Larrakia as the custodians of the Port Darwin region, along with the neighbouring nations of Woolna and Kungarakan as evidenced in Goyder's map, yet he shared Stokes' vision that Christianity and working for Europeans would assist in civilising "these miserable specimens of humanity" (see Powell, 2009:65). In 1870, instructions from the South Australian Government to the government resident and protector of Aborigines were to encourage good relationships and learn languages so that First Nations people could be made to "comprehend, as clearly as possible, that they are British subjects..." (South Australia. Office of the Government Resident, 1870–82 [1870:5]). As with the Dutch colonisation of the Javanese and other groups in the East Indies, the ranks and social positions of the various "chiefs" of First Nations people were to be recognised, "and their authority, so far as consistent with law, supported ..." In this respect, they could be controlled from above.

Following the departure of Goyder in 1869, a succession of 12 government residents oversaw the implementation of orders from the South Australian Government between 1869 and 1911. These were the development of industries such as horticulture that could support the growing population and create revenue for the State, along with the construction of the overland and undersea telegraph line. Government residents fulfilled the role of special magistrate, and depending on their qualifications, also the roles of medical officer and protector of Aborigines (Carment et al., 2008:399). Each government resident brought his own set of views on how the Northern Territory should be governed. The worst of these was Parsons (1884–90) whose term began with the retribution murders of 150 First Nations people after four miners were murdered at Daly River (Carment et al., 2008:449).

The small white population of Palmerston consisted mainly of itinerant Government employees who served for a few years before returning to the southern colonies. Their experiences in the Northern Territory are described in contemporary newspapers, Government reports and personal accounts. Many of these publications highlight the inherent racism of the white community in their perceived authority over First Nations, Chinese and other non-white communities. This is evident in the memoirs of the sub-collector of customs, Alfred Searcy (1909) who travelled across the coastline and rivers to ensure that the Macassans paid their duties and to prevent the smuggling of opium, alcohol, etc. into Port Darwin. Accounts from Searcy also provide insights into the lives of men such as Edward Robinson, who worked remotely with First Nations, Chinese and Malay men and women in a variety of industries such as buffalo hunting, trepanging and pearling (Carment et al., 2008:499–500). Robinson was also employed as a customs officer at Port Essington and Bowen Strait, and could speak Malay and local First Nations languages.

The discovery of gold at Pine Creek saw a rise in the white population, yet the Northern Territory was unable to support its population through its resources and relied on inexpensive Chinese indentured labour for both Government and private enterprises (Jones, 1997). The popular British view of the 1800s was that Chinese people were better suited to labouring in hot climates such as northern Australia (Yee, 2006:2). In his report to South Australia in July 1871, government resident Douglas insisted upon the importation of Chinese “coolies” for labour from Singapore, stating that it was “useless to depend on a supply from the islands in the Arafura Sea, or Java, or the Dutch East India Islands” (South Australia. Office of the Government Resident, 1870–82 [1871:2–3]). By the early 1870s, Singapore had grown into a prosperous British entrepot that traded in, along with various goods, indentured labourers from China. In 1873 alone, 30,000 Chinese from various Chinese ports had reportedly passed through Singapore in search of a better life. After his term as government resident expired, Douglas was commissioned with the importation of indentured Chinese labourers from Singapore, of which 187 were contracted (NTTG, 8 August 1874:2; Yee, 2006:2; Carment et al., 2008:147). Government infrastructure projects were completed through this labour force including the improvement of the Eastern Causeway through its lengthening into the port, allowing for ships to dock alongside the wharf. The employment of Chinese on the *Flying Cloud* also assisted with beacons and buoys being erected between Palmerston and Southport (South Australia. Office of the Government Resident, 1870–82 [SAA 1876/102:2]; Powell, 2010:143).

By 1875, the loose estimation of Palmerston’s population was 240, with 180 Europeans and 55 Chinese and Malays, with the total settler population for the Northern Territory being around 700 with 470 Europeans, and 170 Chinese and Malays (South Australia. Office of the Government Resident, 1870–82). Within a few years, 3,000 Chinese men were working in the Top End, quickly outnumbering the white population by three to one. This number rose to over 7,000 by 1888 yet declined to 1,352 Chinese and 1,182 Europeans by 1910 (Powell, 2010:143). The introduction of the *Federation of States Restriction Act (1901)* reduced the numbers of indentured Chinese, yet many merchants and entrepreneurial men stayed, the foundation of a strong Chinese community that remains to the present day.

Maritime/terrestrial activities

The maritime and terrestrial activities discussed here relate to the historical development of Palmerston and regional maritime Northern Territory through the adaptation and utilisation of the maritime environment, as a shared maritime landscape, and through the connections of different communities to maritime Southeast Asia (analysed in the following chapter). These activities are each described through their historical context, then by their archaeological signature through

previous archaeological research or surveys by the author. Where no archaeology was present, the physical environment is described to provide the setting in which the activity once took place.

7.4.1 Initial colonisation and land survey

Town plans

Historical context: With large investments from land purchases looming over the South Australian Government, George Goyder was employed to survey Port Darwin and the surrounding region (Powell, 2009:64). Goyder sailed with 120 men aboard the coastal barque *Moonta* (627 tons) arriving at Emery Point, Port Darwin on 5 February 1869. The lightly undulating topography of the Port Darwin region allowed the six surveying parties to move across the land, with the long harbour arms extending the ease of exploration to the south and east (Carment et al., 2008:395). Within seven months, Goyder and most of the surveying party fulfilled their duties and returned to Adelaide (Wells, 2018:65). The result was the survey of 266,000 hectares and the allocation of over 2,700 Sections (Lots) within 16 Hundreds (Figure 7.15). Four townships were also planned, with Palmerston located directly on the coast on an elevated plateau close to the bay mouth, Virginia and Southport next to major tributaries extending from Port Darwin, and Daly just to the west of the Adelaide River at Fred's Pass. Of these, Palmerston and Southport were the only town plans that were realised.

Archaeology: Physical evidence of the surveys supervised by Goyder is visible in the current location and physical layout of the townships of Palmerston (present-day Darwin) and Southport. For Palmerston, the current layout of the streets in the city centre (Figure 7.16) mostly reflects the *Township of Palmerston* (South Australia. Surveyor-General's Office, 1870) (Figure 7.17), although many smaller streets have intersected the original plan over a 150-year period of development. The town grid street names of Mitchell, Smith, Cavanagh, Woods, McMinn, Daly, McLachlan, Peel, Knuckey and Bennett all refer to members of the initial survey and Doctor Peel, who first colonised Palmerston in 1869. The street plan of the present-day suburb of Larrakeyah to the left of Doctors Gully did not follow the original plan, yet the original allocated street names are still used in both present-day Larrakeyah and Darwin city.

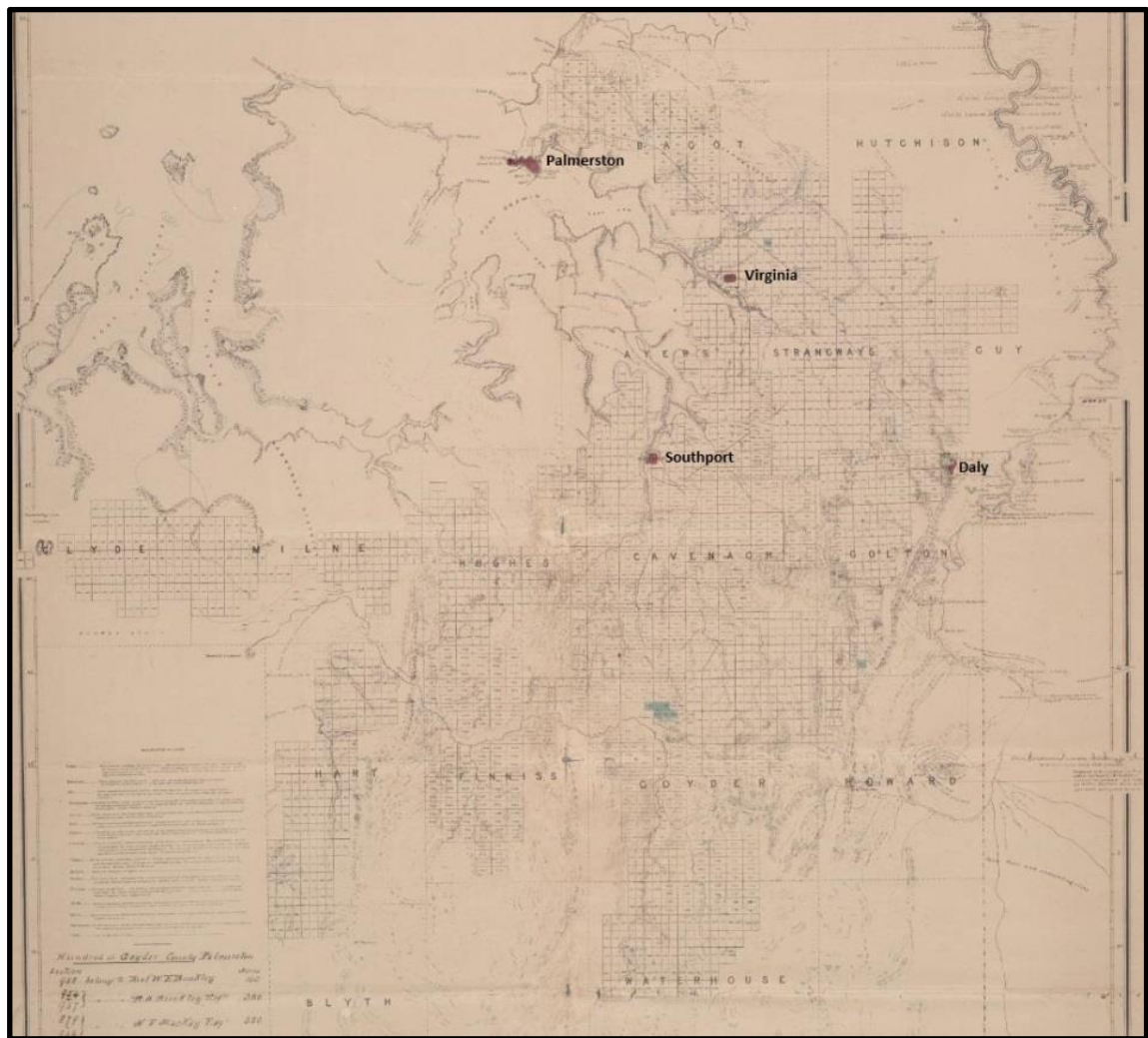


Figure 7.15 [Section of] *General plan showing natural features of the country, towns, reserves, roads & sectional lands at, and in the vicinity of Port Darwin, Northern Territory of South Australia with the surveyed townships highlighted purple* (South Australia Surveyor-General's Office, 1872)



Figure 7.16 Present-day street layout of Darwin (previously named Palmerston) (Google Earth, 2019)

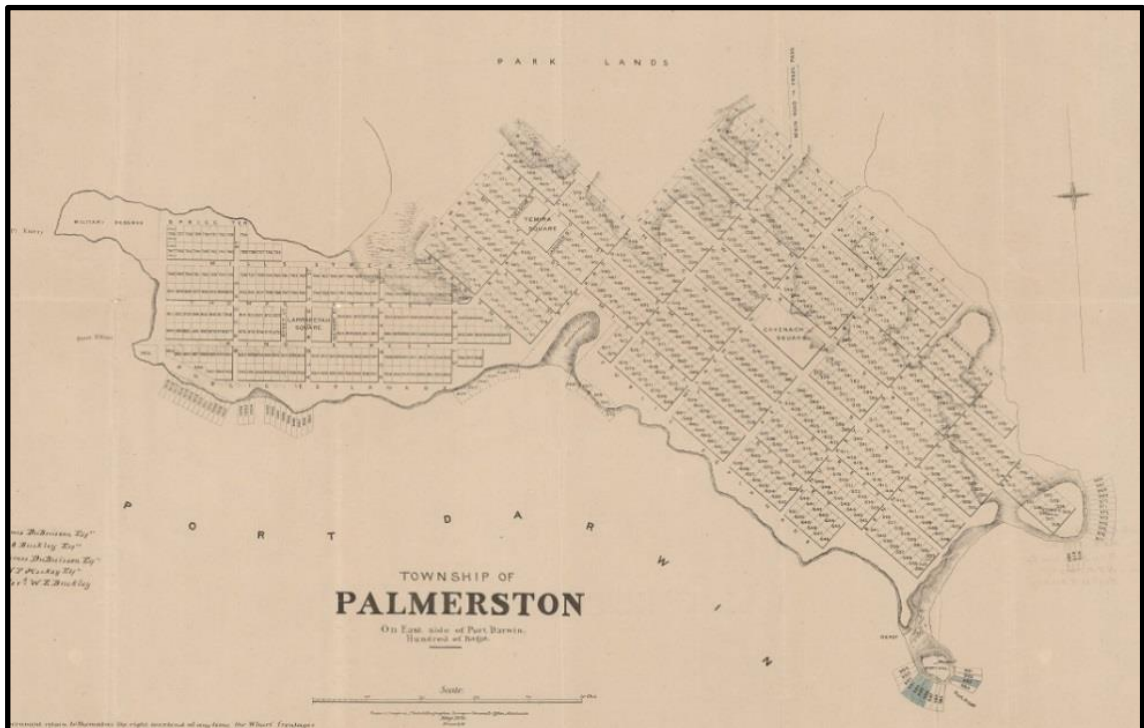


Figure 7.17 Section of *Township of Palmerston on east side of Port Darwin, Hundred of Bagot* (South Australia. Surveyor-General's Office, 1870)

The riverside town of Southport provides the best example of a town that reflects the original town plan of 1870. This is evidenced through the overlay of *Township of Southport* (1870) onto Google Earth satellite imagery (2019) showing a match in streets (including street names), Lots,

Mira Square and the Darwin and Blackmore Rivers (Figure 7.18). The course of the Blackmore River to the lower left of the image and the Darwin River to the lower right may have changed over time, although it is more likely an error by the draftsman. The landing for the Blackmore River is also one Lot lower than the physical remnants of the landing place. The lack of change at Southport after 150 years can be linked to the opening of the railway line from Palmerston to Pine Creek. This bypassed the town in 1889, rendering the town redundant as a transit point from water to land on the way to the goldfields (Powell, 2009:74).



Figure 7.18 Overlay of *Township of Southport* (South Australia. Surveyor-General's Office & Crawford, 1870 onto Google Earth, 2019)

The 1870 town plan for Virginia situated on the bank of the Elizabeth River did not eventuate. Rather, Virginia grew as a township closer to the railway line and highway to the west. That this shift occurred demonstrates the reduced use of rivers as transport routes upon the introduction of rail and roads (Figures 7.19–7.21). The plan for Daly at Fred's Pass also did not eventuate into a physical town, although it is interesting to note that the streets from the original plan remain active (as is visible in Google Earth) despite not being built (Figure 7.22).

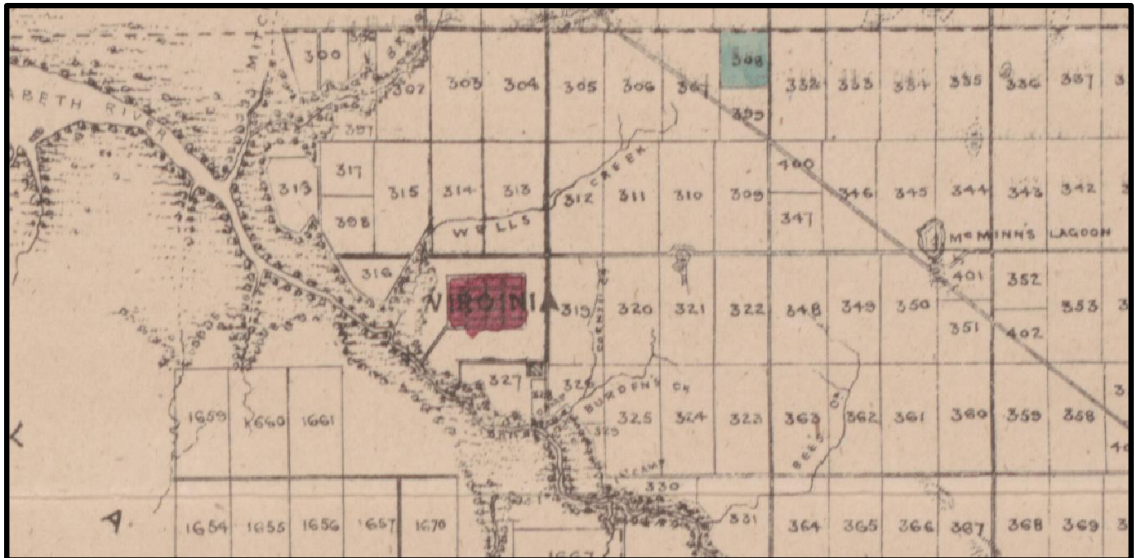


Figure 7.19 [Section of] General plan showing natural features of the country, towns, reserves, roads and sectional lands at, and in the vicinity of, Port Darwin, Northern Territory of South Australia with the surveyed township of Virginia highlighted purple (South Australia. Surveyor-General's Office, 1872)

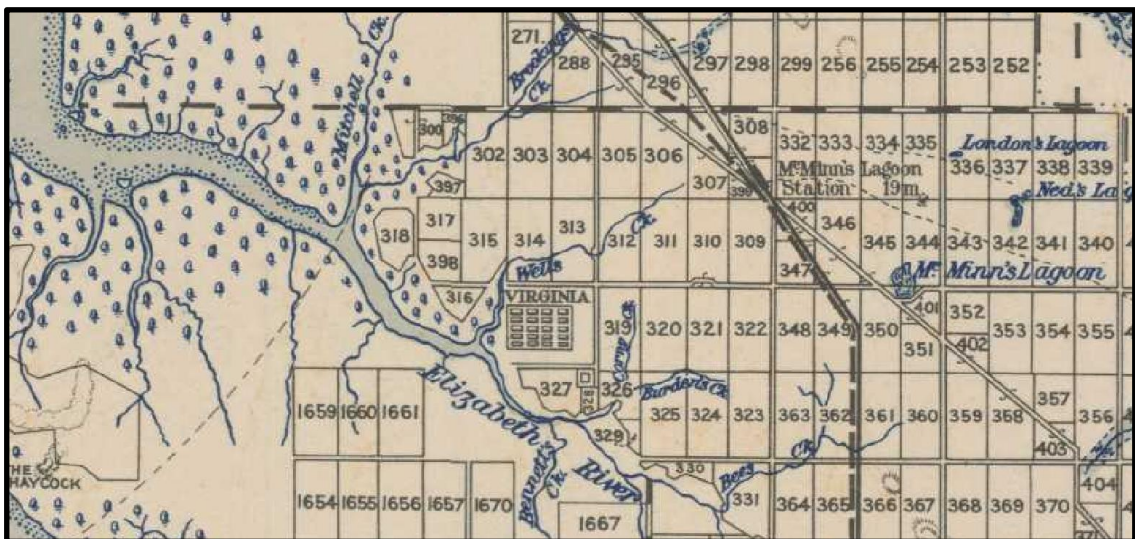


Figure 7.20 [Section of] *Darwin and Environs* showing the previously proposed township of Virginia on the Elizabeth River and McMin's Lagoon Station along the train line to the northeast (Australia. Department of the Interior. Property and Survey Branch, 1937)



Figure 7.21 Google Earth satellite imagery showing the present-day township of Virginia to the north (near Stuart Hwy) and the natural bushland to the south where the proposed township was originally to be located



Figure 7.22 Overlay of *Township of Daly* (South Australia. Surveyor-General's Office & Crawford, 1873) onto Google Earth satellite imagery (2019)

Peel's Well

Historical context: The first wells at Palmerston were located at Doctors Gully, at the surveyors' camp, and at Cavanagh Square (Figure 7.23) (Carment et al., 2008:399). Peel's Well at Doctors Gully was one of the first coastal springs to supply Goyder's survey team with fresh water (Northern Territory Government Heritage Register, 2009). It was named for Doctor Robert Peel, the medical officer attached to the survey party, as was Doctors Gully. Peel's Well was gazetted on 19 April 1877 and provided water for the first gardens in the settlement and for visiting ships. Most of the gardens were the work of the Chinese and the first formal lease issued at Doctors Gully was on 30 March 1875 to three Chinese settlers.

Archaeology: Peel's Well was declared a heritage site on the Northern Territory Heritage Register in 2003 (Figure 7.24). No known archaeological research has been undertaken.

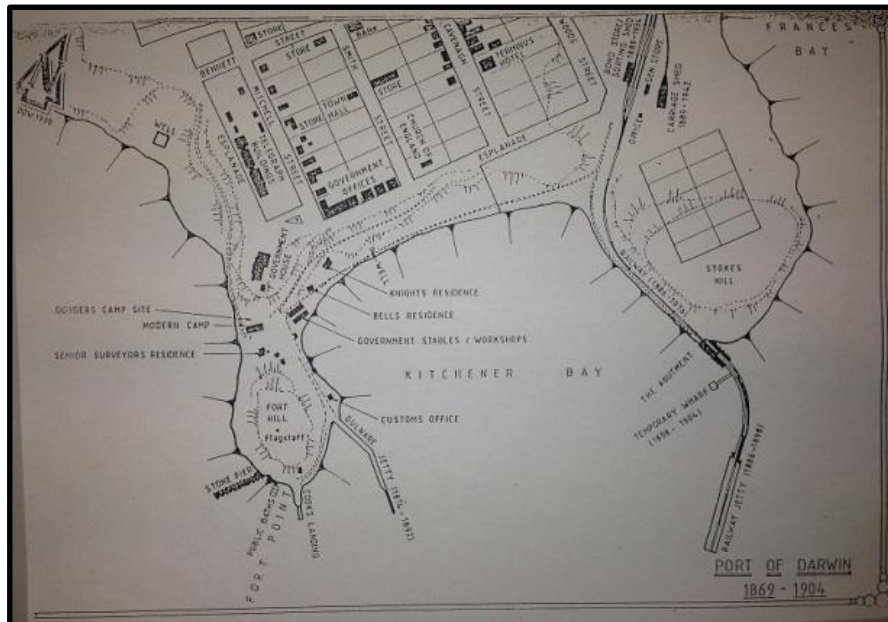


Figure 7.23 Port of Darwin 1869–1904 with Peel's Well located at Doctors Gully (Clinch, 1999)



Figure 7.24 Peel's Well (Northern Territory Government Heritage Register, 2009)

7.4.2 Overland and subsea telegraph cables

Historical context: During the first years of British colonisation at Palmerston, South Australia had won the contract from the British Australia Telegraph Company to have a subsea telegraph cable run from Banjoewangi, Java, to Port Darwin, and on to Port Augusta (Powell, 2009:66). The subsea telegraph cable was completed in 1871, connecting Palmerston to maritime Southeast Asia and beyond (Figure 7.25). A second cable to Java was laid in 1879, and subsequent repairs to the submerged cable continued throughout its usage.

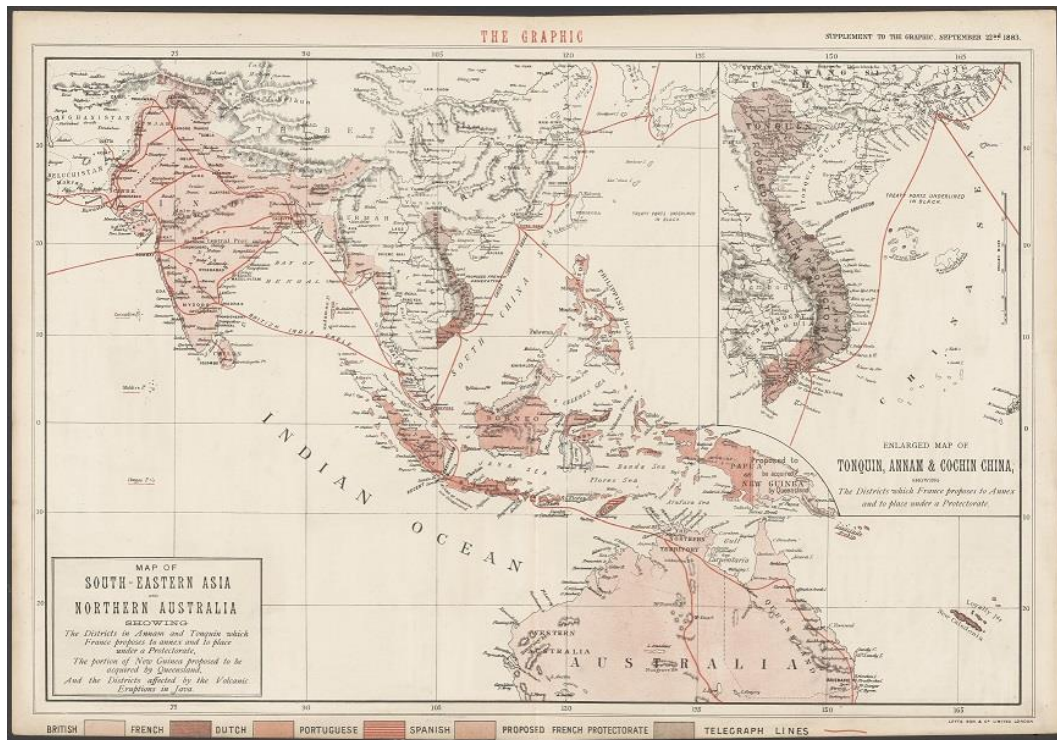


Figure 7.25 Map of south-eastern Asia and Northern Australia showing the districts in Annam and Tonquin which France proposes to annex and to place under a Protectorate, the portion of New Guinea proposed to be acquired by Queensland, and the districts affected by the volcanic eruptions in Java (Letts, Son & Co., 1883)

Spanning 1,750 kilometres, the Overland Telegraph Line was constructed from Port Augusta north to Tennant Creek by the beginning of 1872, the wet season halting construction further north. (Powell, 2010:138). Time constraints coupled with a saturated land led Charles Todd, the superintendent of the project, to organise for a workers' camp at Patterson's Landing to be established 150 kilometres up the Roper River (Powell, 2009:69; 2010:139) (Figures 7.26–7.28). The steamships *Tararua* and *Omeo* (>1000 tons) and the barque *Bengal* (323 tons) were chartered to drop off supplies and stores to the camp with the assistance of the paddlewheel steam tug *Young Australian* (93 tons) (Powell, 2010:139). Once the wet season was over, the remaining 990 kilometres of telegraph line were constructed by December 1872. Prior to this time, iron poles were being shipped in to replace the wooden ones, with the *Young Australian* towing the supply

ships along the Roper River until it ran aground permanently near the township of Ngukurr in December 1872 (described further in *Shipwrecks* below) (Powell, 2010:141).

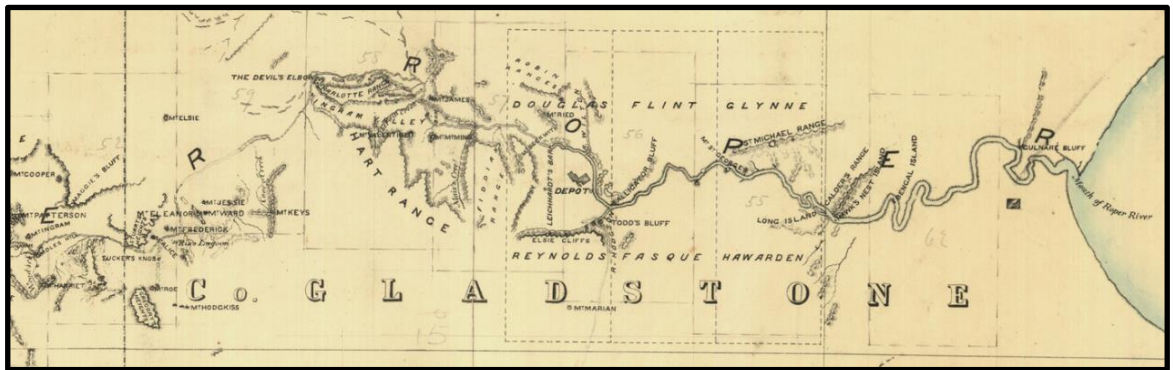


Figure 7.26 [Section of] *Plan of Overland Telegraph from Port Darwin to Port Augusta* showing the Depot (centre of image) at Patterson's Landing 145 km up river (Ringwood et al., 1873)

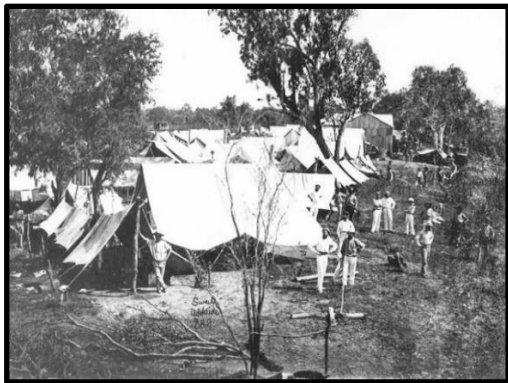


Figure 7.27 Roper River Depot Camp, 1872 (Sweet, State Library of South Australia)

Figure 7.28 The *Omeo* and the *Bengal* with the tug *Young Australia* at the Roper River Depot (State Library of Western Australia).

During the construction of the telegraph line, Maria Island acted as a transit point for men to return to Darwin on larger vessels such as the *Omeo* (Northern Argus, 15 November 1872:3) and as a convalescence station for unwell workers. Situated about 15 miles east of the mouth of the River Roper, Maria Island was "...considered to be very healthy, catching the sea breeze both day and night, and having a good supply of fresh water and grass, with plenty of fish of different kinds, and shells of great variety." On completion, the telegraph cables initiated a new phase in the history of Palmerston as the conduit of communication between the southern capitals of Australia and the wider world, highlighting the value of its position within close proximity of maritime Southeast Asia.

Archaeology: The 1891 *Plan of Palmerston* details the pathway of the subsea cable and the point at which it connects to the shoreline, extending to the Telegraph Station and continuing as the Overland Telegraph Line (Figure 7.29). David Steinberg of the Northern Territory Heritage



Figure 7.30 Subsea telegraph cable within the littoral zone (Steinberg, 2013)

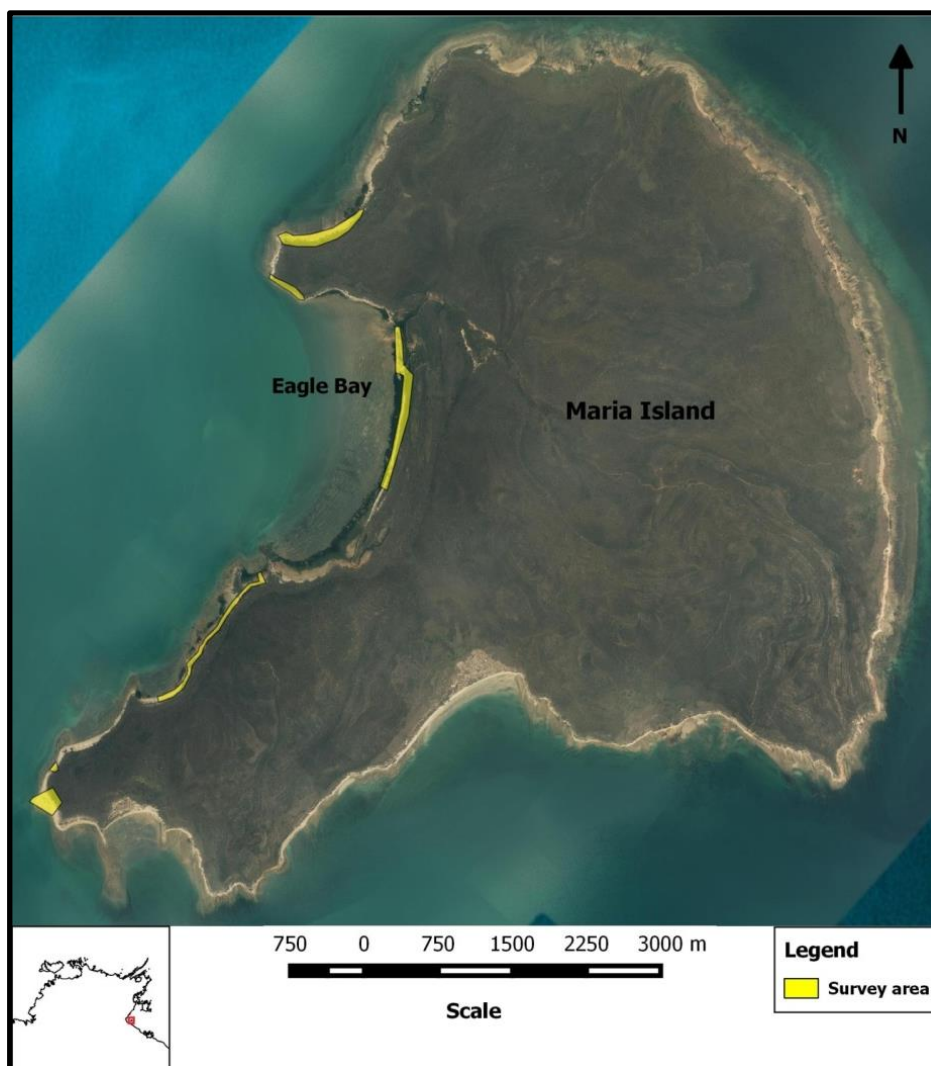


Figure 7.31 Survey area and cultural material of Maria Island. The yellow section on the southwest corner of the island was the possible location for the British depot (Google Earth, 2013)



Figure 7.32 Southwest coast of Maria Island facing southeast 2013. Region where the British depot may have once stood.

7.4.3 Port Darwin maritime infrastructure

Stokes Hill Jetties

Historical context: For the first three decades, there was a lack of coastal infrastructure to support the demands of Port Darwin. Prior to 1886, two jetties existed in the port, both being lower than the high tide and unsuitable for steamers (Powell, 2010:144). Cargo and passengers had to be lightered to shore, with costs incurred and goods damaged when landed below the high tide mark. Built in 1886, the first railway jetty curved into the harbour, yet was rendered unsafe by 1897, destroyed by teredo worm. Regressing to the lightering system, it was not until 1902 that the new wharf opened. This L-shaped structure was built parallel to the shoreline, with a turntable necessary to manoeuvre stores around the bend, and served the port for 40 years. Figures 7.33 to 7.36 show the changes of the Stokes Hill Jetty from 1890 to 1904, with Figure 7.23 (above) providing an overview of Palmerston's maritime infrastructure.

Archaeology: No known archaeological survey has been carried out on the Stokes Hill Jetties.

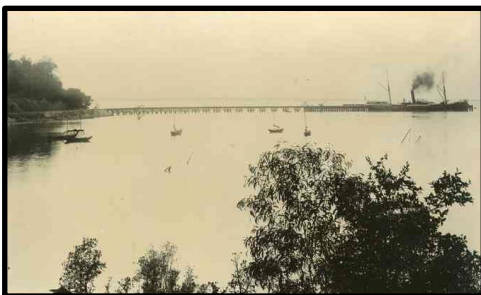


Figure 7.33 Palmerston. Old Jetty built by Wishart, contractor, later destroyed by tornado. 1890 (SLSA, B9754)

Figure 7.34 Collapsed jetty, Stokes Hill, Port Darwin, Palmerston. 1890 (Bleser, 1890)



Figure 7.35 1901. *Darwin* (SLSA, B 1154)

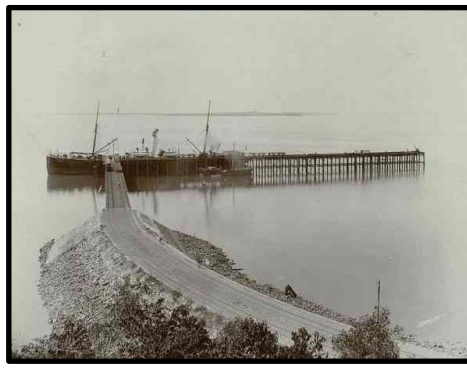


Figure 7.36 Jetty, *Port Darwin*. 1904 (SLSA, B 9434)

Point Charles Beacon and Lighthouse

Historical context: After numerous complaints from captains regarding the hazardous nature of the Northern Territory coastline and harbours due to the numerous reefs, moving sandbanks, high tidal range and strong and unpredictable currents, a beacon was constructed in 1881 at Charles Point (NTTG, 26 November 1881:2). The location of Point Charles was chosen for its close proximity to Port Darwin and Bynoe Harbour, the elevation at the tip of the Cox Peninsula being suitable for such a structure. Constructed from timber and galvanized iron, the beacon stood at 40 feet and was painted white to be visible from a ship's deck as far as 20 kilometres away. This structure collapsed in 1892, and the Point Charles Lighthouse replaced the beacon in 1893 (NTTG, 6 May 1892:4). Three keepers' cottages were built and a permanent staff including Hugh Christie and Benison (and their families) managed the light (NTTG, 24 September 1897:3), followed by other families such as the Sheppards (NTTG, 17 April 1908:3). As the lighthouse was only accessible via the coastal waters, a high tide landing was cut into the coast. A large vegetable and fruit garden was established to supply the keepers' families with produce including pineapple, banana, papaya and mulberries. During its first years, access to the lighthouse was by vessel only, with the boat landing—a cutting in the mangroves—accessible only at high tide.

Archaeology: No known archaeological research has been undertaken at Point Charles Lighthouse. Although not surveyed by the author due to government restrictions, the 1911 plan of the lighthouse complex match the Google Earth satellite imagery from 2013, indicating the archaeological presence of the Point Charles Lighthouse complex with the footprints of the three keepers' cottages and boat landing (Figures 7.37 and 7.39). Figures 7.40 and 7.41 provide further evidence of the keepers' cottages and vegetable gardens.

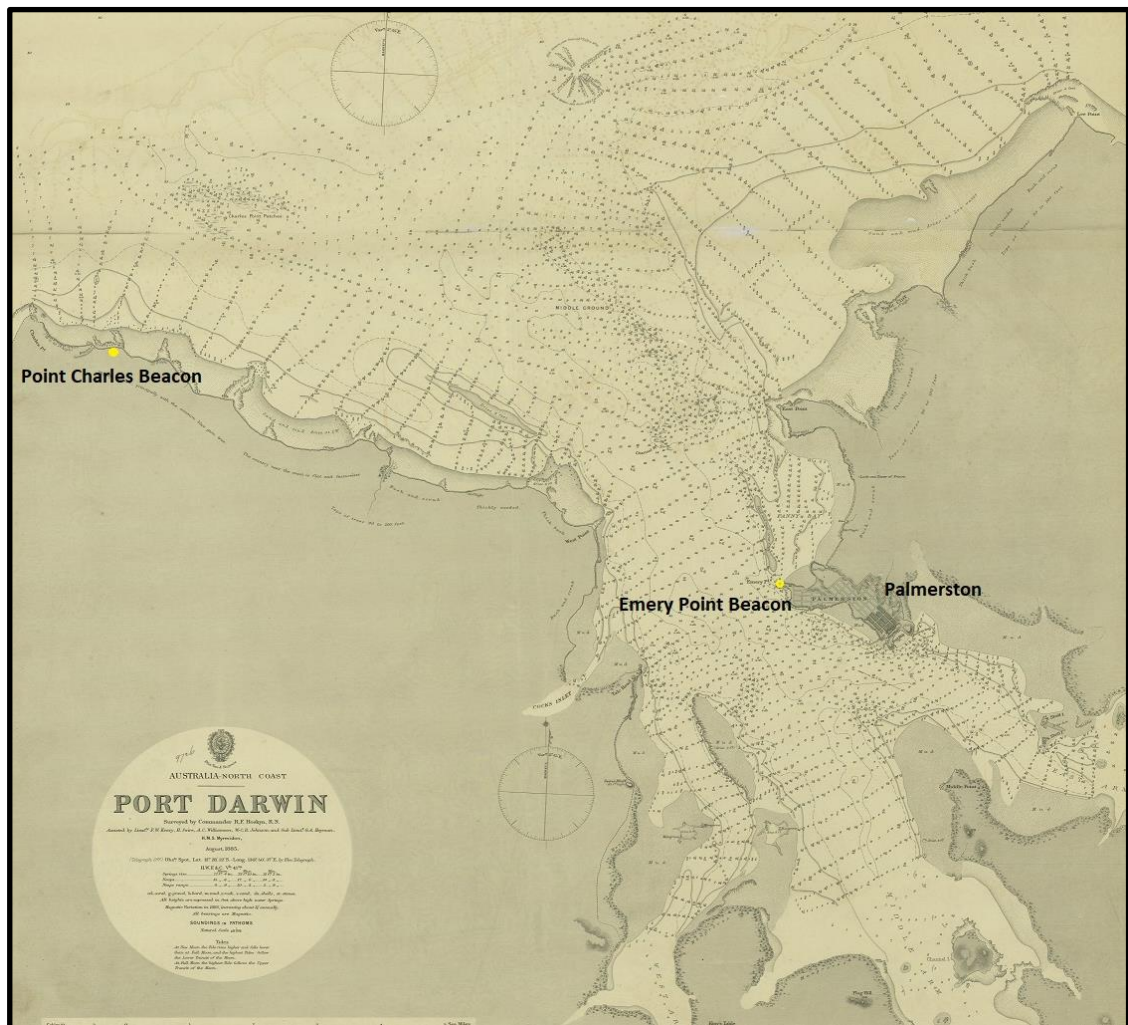


Figure 7.37 [Section of] *Australia - North coast, Port Darwin* showing locations of Point Charles and Emery Point Beacons, replaced at a later date by lighthouses (Great Britain. Hydrographic Department et al., 1886)

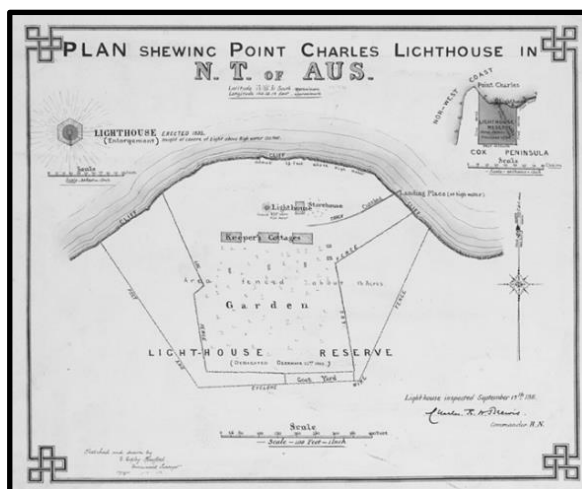


Figure 7.38 *Plan Shewing Point Charles Lighthouse in NT of Australia, 1911* showing the keepers' cottages and boat landing (NAA: A9568, 2/1/3)



Figure 7.39 Google Earth satellite imagery (2013) showing the present-day footprints of the keepers' cottages and the boat landing

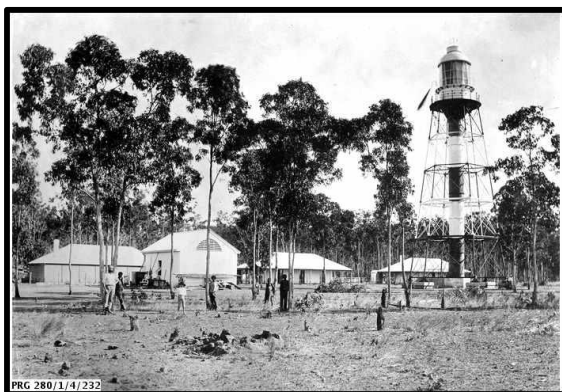


Figure 7.40 *The lighthouse, cottages, and other buildings at Point Charles, Northern Territory* (SLSA, PRG 280/1/4/232)

Figure 7.41 1908. *Point Charles Lighthouse* with crops in the foreground (SLSA, B 9450)

Emery Point Lighthouse

Historical context: The demand from pearlers and other captains led to the construction of the Point Emery beacon in Port Darwin in 1900. A captain described this beacon as “...a lantern something like a street lamp...lit at night...” (NTTG, 18 November 1904:3) By 1908, a new light was built on an iron tripod with an enclosed room built around the top not long after to protect the light from winds (NTTG, 16 October 1908:3) (Figure 7.42).

Archaeology: No known archaeological research has been undertaken



Figure 7.42 Emery Point Lighthouse (n.d.) (AMSA, 7419p)

7.4.4 Maritime industries

Of the industries that relied on maritime resources, net-fishing, trepanging and pearling operated along the Northern Territory coastline. These were undertaken by First Nations, Chinese, Malay, Japanese, Filipino and British people (Stephenson, 2007:61), with First Nations and Chinese homes and sampans lining Fishermans and Hospital beaches at Palmerston (NTTG, 18 September 1896:3). Chinese habitation and occupation along these shores may be behind the ‘Shou Lao’ carved pinite figurine discovered by a Chinese labourer in the roots of a Banyan Tree at Doctors Gully in 1879 (Jose, 2013:119) (Figure 7.43). In close proximity to this was the Moo Tai Mue Chinese Temple or Fisherman’s Joss House located at Fishermans Beach, also at Doctors Gully (Bowen, 2012:48) (Figure 7.44).

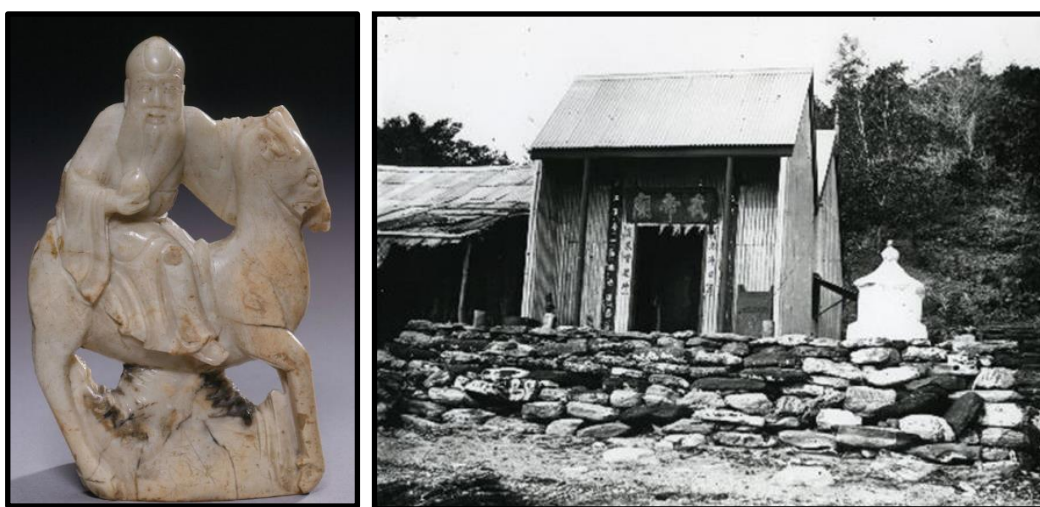


Figure 7.43 ‘Shou Lao’ carved pinite figurine (Museum of Applied Arts and Sciences, 2020)

Figure 7.44 ‘Moo Tai Mue Chinese Temple. Otherwise known as the Fisherman’s Joss House (Territory Stories, n.d.)

The arrival of a proportionally large Chinese community in Palmerston saw the introduction of the sampan, defined as “a small flat-bottomed boat used in rivers and harbours in the Far East and usually propelled by an oar or oars at the stern” (Allen, 2001:783). From 1879, sampans and junks are recorded to have been built locally in a boat-building yard near the hospital at Doctor’s Gully (South Australian Register, 31 March 1879:6 ; NTTG, 29 December 1888:2; Kellie Clayton pers. comm., 29 May 2021). The story of Jimmy Ah Kit and six fellow Cantonese men sailing a sampan from southern China to Palmerston circa 1890 (Ah Kit, 2002:2; Yee, 2006:39) also suggests their importation. These vessels were used by Chinese sailors in the fishing and trepang industries and as lighter and cargo vessels for passengers and goods throughout maritime Northern Territory (NTTG, 4 September 1886:3; 29 September 1905:2). The vessel shortage at Port Darwin saw the British relying on sampans for maritime services, however, sampans were unrecorded in the shipping news, leaving their numbers uncounted. Although sampans are

recorded in the Australasian Underwater Cultural Heritage Database (n.d.), this is through historical accounts, with wrecks yet to be physically located).

Net-fishing

Historical context: The arrival of Chinese men at Palmerston in the 1870s was the result of the British colonists' desire for cheap labour on Government works and in the Pine Creek goldfields (Yee, 2006:2). Over time, Chinese men started their own businesses, setting up as merchants, market gardeners and fishermen. Of the latter, little has been documented in the historical record despite the prominence of the fishing industry in Port Darwin and further afield. This prominence was due to the ideal conditions in the Northern Territory for net-fishing, with its extensive foreshore flats and high tidal range, coupled with available fish resources.

The Chinese fishing industry of Palmerston operated between the 1870s and 1920s and possibly beyond (South Australia. Office of the Government Resident, 1870–82 [SAA 790/1878/178 67/78]; LANT, Ningle Haritos, NTRS 226, TS 693). Fishermen lived along the beaches of Palmerston and across the harbour at West Point where their sampans could be beached (North Australian, 24 September 1887:3). Recorded fishing expeditions stretched as far east as Anson Bay and west into Chambers Bay (NTTG, 18 September 1896:3), both locations approximately 150 kilometres from Palmerston. Net fishing was carried out with long fishing nets stretched out across the mudflats at low tide. Sisters Imelda Woods and Marjorie Morgan (pers. comm. 9 August 2013) who grew up in the Channel Point area recalled stories told by their father and aunt who assisted the Chinese with net-fishing at Channel Point during the 1920s or 1930s. Specifically, they recalled how a board had to be used by their father to skid on as he retrieved the fish from the net at low tide due to the muddy intertidal zone being too cumbersome to walk across.

Fish would be caught in the net as the tide came in, then collected on the following low tide. Once processed by burial, drying, smoking, or other methods, the fish were brought to Palmerston and sold to Chinese merchants who then exported the product to the southern colonies or overseas. In 1895, 67 bags of dried fish were exported on the SS *Changsha* and 10 bags of salt fish on the SS *Airlie* (destinations not provided) (NTTG, 6 December 1895:2). This continued into the 1900s with 57 bags of salt fish sent on the steamer *Eastern* and five cases of fish dispatched on the steamer *Aldenham* for the southern ports. (NTTG. 17 October 1902:2; NTTG 2 October 1908:2).

First Nations men and women were employed by the Chinese to assist in the fishing industry. An article in a contemporary newspaper on the murders of two Chinese fishermen, Ah Sing and Sing Hoy, at Daly River in January 1896 (NTTG, 18 September 1896:3) sheds light on the Chinese

fishing industry during this time. Ah Sing and Sing How sold their fish to and procured stores from the Palmerston store keeper Kwong Lee Chong. They had been fishing for about four years with First Nations men and typically spent four to five weeks at a time in Anson Bay from December to February. During the other months they fished in the east. An assault on Chinese fishermen in the same region six years previous told of a Chinese fishing station located along the red cliff coast to the west of the Daly River mouth where the fishermen would sleep in their beached sampans (NTTG, 24 October 1890:3). On the whole, relationships between the Chinese and First Nations groups were very strong. In response to the drowning of three Chinese men in 1917 near Point Blaze (north of the Peron Islands), “[t]here were keen demonstrations of grief among them, as the old Chinese captain of the doomed craft had been fishing and sailing along this coast for the past 20 years, and was well known and liked among the various tribes.” (NTTG, 12 April 1917:12)

In Searcy’s (1909) *In Australian Tropics*, several photographs depict life in coastal Northern Territory during the late 1800s. One of these photographs, taken by HW Christie, is entitled ‘Chinese fishing station at mouth of Daly River’ (Figure 7.45). No reference is given to this fishing station within the book, with only brief mention of Chinese fishing in general. Contemporary newspapers mention the fishing station at Cliff Head, yet there are no descriptions as to the duration of the site or the daily life of those who worked there. Conversations with Karrabing people whose land encompasses Anson Bay indicated that there were no substantial remnants of the fishing station left intact, although stories were shared of family members working with Chinese fishermen at Channel Point on the northern side of Anson Bay. As numerous sources suggest Chinese fishermen in Anson Bay prior to 1911, this area was selected for archaeological survey.



Figure 7.45 ‘Chinese fishing station at mouth of Daly River’. HW Christie (Searcy, 1909)

Archaeology: In viewing the net-fishing regions utilised by the Chinese there is a clear pattern regarding the topographic and maritime environments in which this industry took place (Figure 7.46). The three main regions were Port Darwin, Chambers Bay 125 kilometres to the east of Palmerston (Figure 7.47), and Anson Bay 165 kilometres to the west (Figure 7.48). All of these areas have extensive foreshore flats due to the low gradient of the littoral zone and high tidal system. These are necessary attributes for net-fishing to be undertaken. Port Darwin differs to Anson and Chambers Bays with its deeper bay and higher elevation in land that inhibits extensive floodplains to develop in the wet season. By contrast, Anson and Chambers Bays are both some distance away and both exhibit extensive floodplains, reflecting the lower gradient between land and sea. These differences may not have affected the net-fishing practice, with Anson and Chambers Bays possibly being preferred through less competition and overfishing due to their distance from Palmerston. In 1903, a fight did occur between two Chinese boat crews “respecting the right to fish on a noted rich fishing ground almost opposite the Hospital” (NTTG, 25 December 1903:3). In order to reach these bays, access to and/or ownership of a sampan played a key component. This would have presumably lowered the number of people who had the resources to fish in these waters, with Port Darwin providing an opportunity for net-fishing without the extra advantage of the sampan. Due to the lack of historical information regarding the Chinese net-fishing industry in maritime Northern Territory, these statements are speculation only.

Anson and Chambers Bays may have also provided better yields of higher quality fish, making the journey to each destination more profitable. This factor is noted by Searcy in 1889, describing the Anson Bay region and Port Keats further west as “the only two practicable fishing places upon our west coast” (Macknight, 1969b:63). As the fish were dried within the vicinity of where they were caught at purpose-built fishing stations, concerns regarding the fish spoiling prior to reaching Palmerston would have been greatly minimised. In stating this, the historical record has only provided the author with one fishing station at Cliff Head, Anson Bay, where the curing of fish would have occurred. Despite any knowledge of fishing stations elsewhere, the naming of the mouth of the Mary River as Sampan Creek reflects the strong presence of the Chinese fishermen in this region.

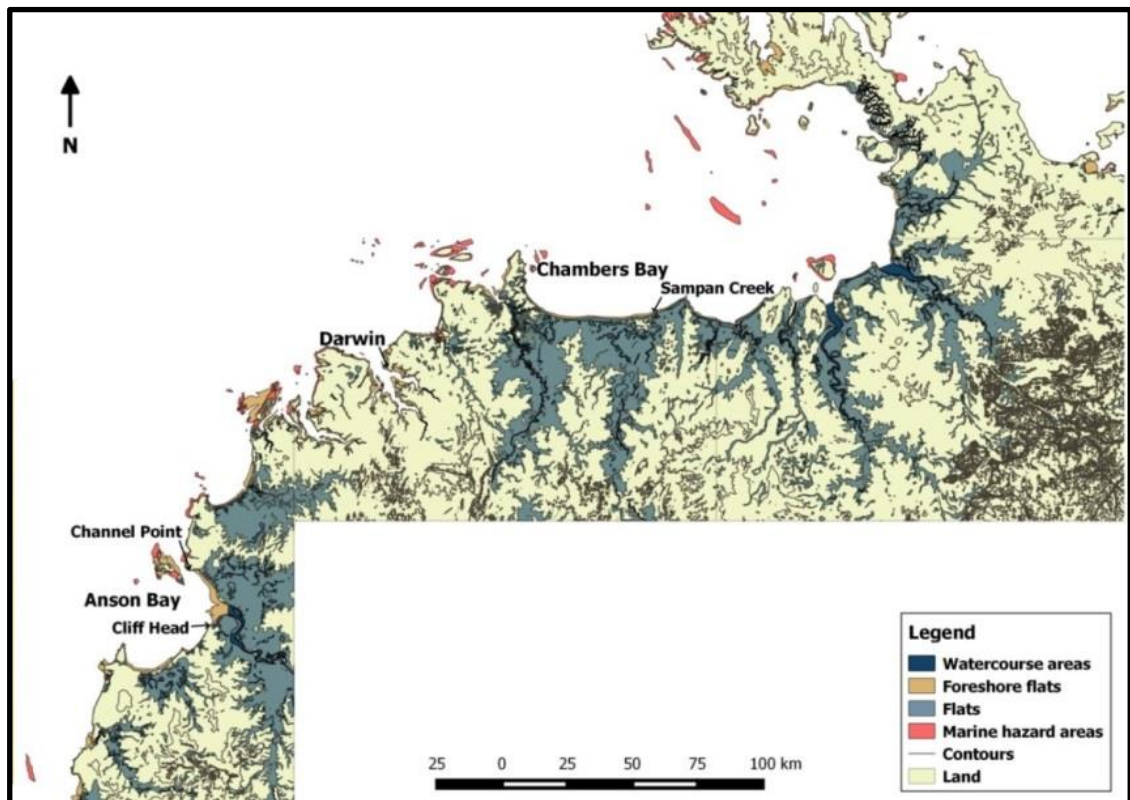


Figure 7.46 Coastal region from Anson Bay to Cobourg Peninsula. The high tidal range coupled with low-lying coastal and inland areas is signified by the extensive seasonal watercourse areas

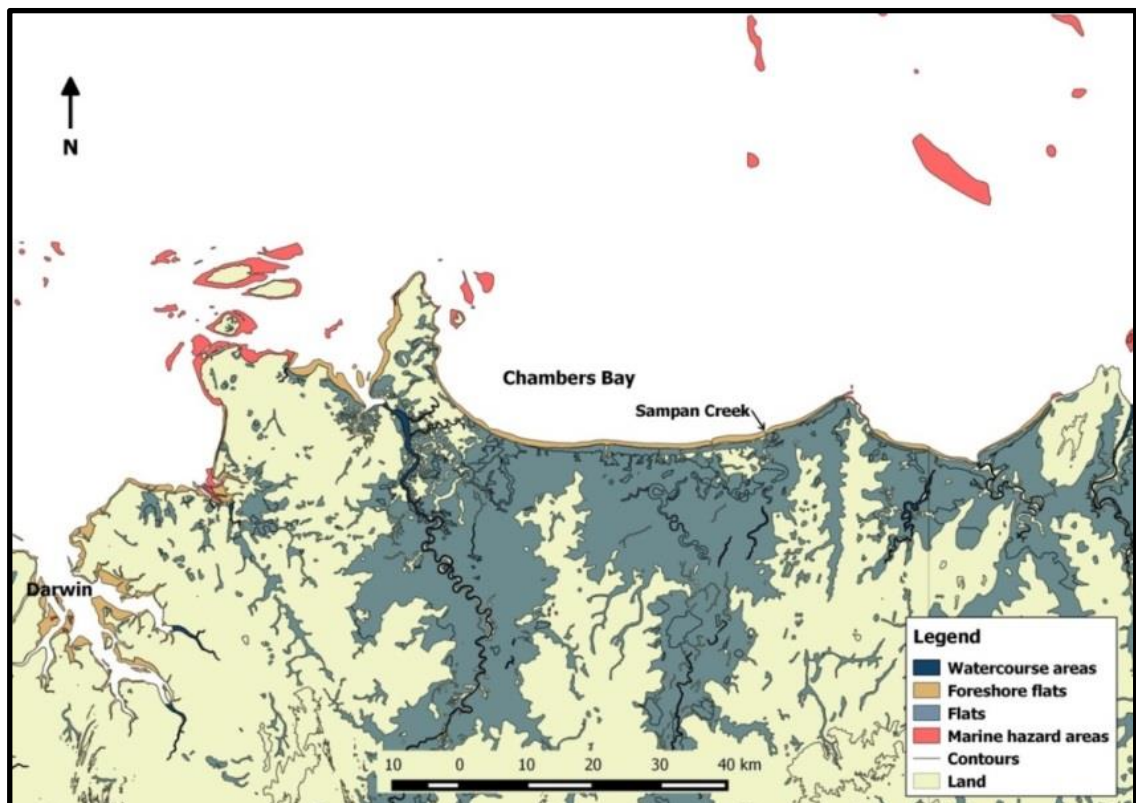


Figure 7.47 Extensive foreshore flats are visible in both Port Darwin and Chambers Bay. The name 'Sampan Creek' reflects the vessels that occupied it.

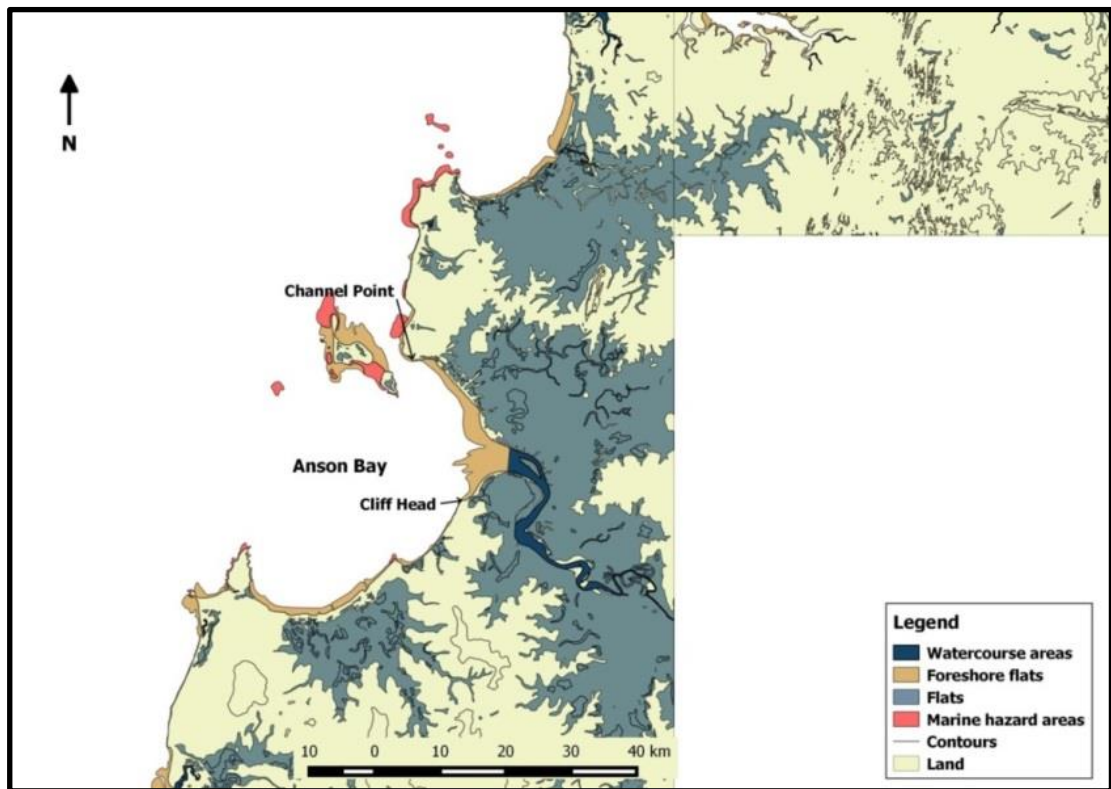


Figure 7.48 Extensive foreshore flats are visible in both Anson Bay and the Peron Islands. The fishing station was located at Cliff Head

Archaeology: Archaeological survey at Anson Bay involved the survey of Cliff Head and Channel Point (Figure 7.49). The Cliff Head survey was conducted on 3 September 2013 with Traditional Owners Rex Sing (Captain), Linda Yarrowin, Sandra Yarrowin, Shannon Sing and Talisha Bianamu. The objectives of this survey were to locate any material indicating the presence of the fishing station and to determine how the physical environment would have influenced the choice of location for the station and how fishermen moved throughout the land and seascape.

A five-metre boat was used to access Cliff Head 25 kilometres from the boat landing at Channel Point. With an outgoing tide from the Daly River, Anson Bay was choppy with a swell of around one metre. The turbidity of the bay is due to the length of river at over 350 kilometres. The continual movement of the tidal currents in and out of the wide-mouthed Daly River carries sediment substrates from both the sea floor and upstream, reducing water visibility within the bay to almost nil. Water depth averaged between three to seven metres within the bay. At just under one kilometre out from the shoreline of Cliff Head, water depths averaged between two to four metres.



Figure 7.49 Anson Bay in relation to Darwin (Google Earth, 2014)

Within the littoral zone of Cliff Head (on which vessels were disembarked at high tide) the water was calm and light muddy brown in colour. The sea floor was soft and stable with a higher consistency of sand over mud. The slope grade was incredibly subtle. Immediately inland, the beach sand was smooth and firm with small to medium grains. The beach rises only slightly towards the cliffs directly southwest, with possibly a metre difference in elevation between the intertidal zone and inland. Closer to the cliffs, the sand becomes less consolidated, yet still relatively firm. This position in the littoral zone represents the best area to bring vessels to shore. There are no rocks (as compared to directly opposite the cliff edge), the gradient is low, and the coastal waters are relatively calm. A flat-bottomed vessel could be anchored at high tide, then safely beached as the tide receded. As the beach area where the fishing station was potentially located is less than 50 metres east of the distinctive cliff termination point, it would have been easily located from a far distance within the harbour (Figure 7.50).

To the east of the cliffs the area of beach comes to a slight rise (50 cm) at 10 metres inland from the water's edge, the termination of the high tide mark. The land then falls slightly again into a vegetated area of sand for approximately 25 metres inland. Immediately to the left of Cliff Head behind the sandy vegetated area is a grove of tamarind trees and other trees including eucalypts and scrubbier plants (Z52S 630100E 8521170N). At the time of survey, this area contained recent cultural material (last 50 years) from a camp site. The total area of low-lying land is around 25 square kilometres. This area contained no physical evidence of a fishing station. From the viewpoint of the shoreline, however, the sandy vegetated area with the trees behind appeared very similar to that of the photograph taken by HW Christie (Figures 7.51 and 7.52). The lack of any cultural material did not deter from the judgement that this was once the site of the fishing station.

Over a century of strong winds and rains associated with the monsoonal climate, sand deposition, and vegetation growth would have covered or washed away any fragments of inorganic material that were left behind once the station disbanded. These environmental factors would coincide with the ephemeral nature of such a camp, where utilitarian objects such as bowls, cooking utensils, bottles and jars would have been kept to a minimum to save space on the sampans and therefore were less likely to be discarded.



Figure 7.50 Cliff Head and the potential site of the Chinese fishing station to the east (facing southwest)



Figure 7.51 Potential site of Chinese fishing station (facing south)

Figure 7.52 'Chinese fishing station at mouth of Daly River'. HW Christie (Searcy, 1909)

Moving further north-northeast, the landscape rose around seven metres to a relatively flat land (Z52S 630373E 8521089N) (Figure 7.53). Along with the low area, the elevated landscape had recently been burned off, with the surface being 95 per cent visible. Flora includes eucalyptus trees, cycads, and other trees unknown to the author. According to Linda Yarrowin, this area has been a camping ground for her family for years. Yarrowin made a point of stating that they always came back to exactly the same place. This was evident in the presence of cultural material that included some broken glass bottles with screw tops, pieces of rusty metal, and three metal plates. The metal included two rake heads and an iron rod. These all appeared to be under 50 years in age, although the rod may have been older. This elevated area provided a raised view of the low-lying sandy vegetated area and the bay, the perfect position to view approaching vessels and watch people in the low-lying area. There was no physical evidence of human occupation prior to 1911.



Figure 7.53 Elevated camp area shown to author by Linda Yarrowin (facing north)

The coastal area below the cliffs directly southwest of the Cliff Head termination point showed no signs of habitation for several hundred metres. The absence of the vine plant present in Christie's photograph and the closeness of the cliffs to the shoreline make it very unlikely that the Chinese fishing station would have been located here. This, together with the floodplains covering the land to the northeast of Cliff Head, means that the Chinese fishing station would have been located directly northeast of the cliffs in the sandy vegetated area just inland from high tide, yet before the rise that leads to higher land (Figure 7.54). The higher land would more than likely have been

where First Nations people camped, as they have done in more recent history. Only further archaeological survey or excavation could verify this.

After surveying Cliff Head area, the coastline was surveyed from the sea in a southwest direction. From the beginnings of the cliff face at Cliff Head, rocks protrude from the intertidal zone, creating a hazard for landing boats for approximately 500 metres. The cliffs continued southwestward for a further 6 kilometres, of which four were surveyed by boat. Of this section there was no area that deemed suitable for a fishing station or resembled the background landscape of the photograph taken by Christie. This conclusion, along with the contemporary newspapers describing the location of the fishing station at the red cliffs west of the Daly River mouth, led to the conclusion that the fishing station was located in the above-mentioned spot directly northeast of the cliff termination at Cliff Head.



Figure 7.54 Location of potential Chinese fishing station site. Grove of tamarind trees and vegetated sandy area within yellow oval (Google Earth, 2014)

Channel Point boat landing

Historical context: The Channel Point boat landing is potentially connected to the net-fishing industry carried out by Chinese fishermen; with the extensive foreshore flats of Channel Point, the Peron Islands and Red Cliff all used as net-fishing grounds. Imelda Woods recalled the presence of a stone structure possibly made by the Chinese that was still visible today. Viewing Channel Point through Google Earth, a structure in the form of a boat landing is visible as a line running from the coastal edge through the mangroves and out into the bay (Figure 7.55). This landing was also mentioned by Francoise Barr at the Northern Territory Archives, although when she viewed

the Google Earth image, it didn't seem familiar. Archaeological survey of the mangrove-lined beach at Channel Point was undertaken to locate and record the landing.



Figure 7.55 Boat landing cut into mangroves and cleared area directly inland at Channel Point (Google Earth, 2014)

Archaeology: At the Channel Point Coastal Reserve lookout (Z52S 622911E 8543262N), a track leads directly onto the beach. This beach is approximately 10 metres in width and lined with mangroves that screen the view of the bay. In surveying the beach in a westerly direction for 500 metres, the cutting in the mangroves was located at Z52S 622561E 8543239N (Figure 7.56). The relatively straight line of the cutting covered in smooth flat sandstone rocks, confirmed its cultural status. These rocks are around 10–15 centimetres in width and five centimetres in depth and of a red-brown colour. These were not visible in the local vicinity of the boat landing indicating their importation from elsewhere. The cutting is around three metres in width and 80 metres in length. Exposed at low tide and submerged at high tide, the sandstone rocks would have provided a causeway traversing compared to the muddy littoral zone (Ross Anderson, pers. comm. 9 April 2021).

Directly inland from the cutting and up a one metre incline from the beach is a clearing approximately 250 metres in length and 70 metres in width. As with the boat landing, this is situated on a point in the coastline. The clearing is sandy and covered in weathered shells. Archaeological survey was undertaken for cultural material, with only recent material found. Finds included a rubbish pit filled with a few hundred rusted beer cans and the odd spice jar, part of a brick, and what looked to be a rusted metal plate. Archaeological excavation and/or remote sensing would be needed to determine if cultural material is present from Chinese visitation.



Figure 7.56 Sandstone rocks laid down to create boat landing cut into mangroves (facing south)

Following the beach 630 metres northwest to the edge of the mangroves, the low tide exposed extensive mud flats that had also been discussed by Imelda and Marjorie (Z52S 621913E 8543619N) (Figure 7.57). These extended out into the bay for approximately 500 metres with little to no gradient. A mooring buoy was visible about 300 metres out from the high tide mark. The mudflats were surveyed out to the mooring buoy for cultural material and to assess the stability of the muddy littoral zone underfoot. It is in this immediate area that the Chinese would have set their nets to catch fish. The mud contained a variety of shells and pockets of small puddles. Survey across the mudflats proved futile, with the viscosity of the mud and shell fragments creating a slow and awkward journey. For this reason, it made sense that a board would have been utilised to skim across the mudflats to collect fish from the nets. Aside from a discarded oil drum and the mooring buoy, no cultural material was located.



Figure 7.57 Mudflats directly northwest to landing in mangroves (facing southeast)

Trepang industry post-1869

Historical context: As discussed in Chapter Five, the Macassan trepang industry continued to be active during the early years of the colonisation. This was due to the western extremity of the trepanging region being over 170 kilometres from Palmerston, and the initial British perceptions of the Macassans as potential trading partners. By 1873, however, the Macassans began to be seen as extracting British resources and discussions began on charging duties. At this time, local trepang fishing with the assistance of First Nations and Aru Islanders was encouraged, with men such as Rodney Spencer (NTTG, 23 June 1905:3), Edward Robinson (Carment et al., 2008:499), Alfred Brown (Carment et al., 2008:62), JR McPherson (NTTG, 26 November 1909:3) and Ah Sing (NTTG, 2 May 1885:3) trepanging with the assistance of First Nations people who had worked previously with the Macassans.

Compared to the extensive industry undertaken by the Macassans under mainly Chinese ownership, the colonial trepang industry was generally run by individual men on a much smaller scale. These men had their own vessels and—aside from Ah Sing who had a group of Chinese men working for him—would typically work as a solo Anglo with an all-First Nations team. Other activities were also undertaken by these men, including pearling, buffalo hide export, logging and government roles in customs or First Nations custodianship (Carment et al., 2008:499). Camps would shift as occupations changed or if hostilities with First Nations groups emerged.

Having previous experience in pearling and sailing through maritime Southeast Asia and northern Australia, Edwin Robinson, as an example, began his time in the Northern Territory in the Palmerston Hospital receiving medical attention for spear wounds (Carment et al., 2008:499). In 1874, he trepanged in Port Essington for six months then headed to Blue Mud Bay in a failed attempt to search for gold. After a few years in the goldfields, Robinson set up a trepang processing station on Croker Island in 1878 with Thomas Wingfield. The murder of Wingfield and the destruction of the station by First Nations people the following year saw Robinson abandon Croker Island to become the manager of the Coburg Cattle Company in Port Essington. In 1881, Robinson was appointed as a provisional and temporary customs officer, and by 1884, had become a full-time customs officer at Irgul Point (known as Oojountambanoonoo to the Macassans and Adjaka to First Nations) in Bowen Strait where he also fished for trepang and traded with the Macassans until his retirement in 1899 (Searcy, 1909:23). By this time, Robinson was fluent in Malay as well as the Port Essington First Nations dialect, and appeared to be respected by both parties. He had a vast knowledge of the coastal waters and, by the account of Searcy (1909:20), had adapted to his environment; his full dress in the early years consisting “generally of a strap and revolver...” and not much else.

Archaeology: Non-Macassan trepang processing sites were recorded as part of the surveys and excavations of Macknight (1969b), Baker (1984), Cole (1984) and Taçon (1988) relating to the Macassan trepang industry (Figure 7.58). These sites were distinguished by the smaller size and shape of stonelines, the presence of non-Macassan features and artefacts, and absence of Macassan features and artefacts, and historical and anthropological supporting data. Overall, there are three non-Macassan trepang processing sites, six sites that may be either Macassan or non-Macassan, and 30 Macassan sites that were reused by non-Macassans. The higher number of reused sites demonstrates British utilisation of Macassan processing equipment, as the Macassans had done themselves for over a century.

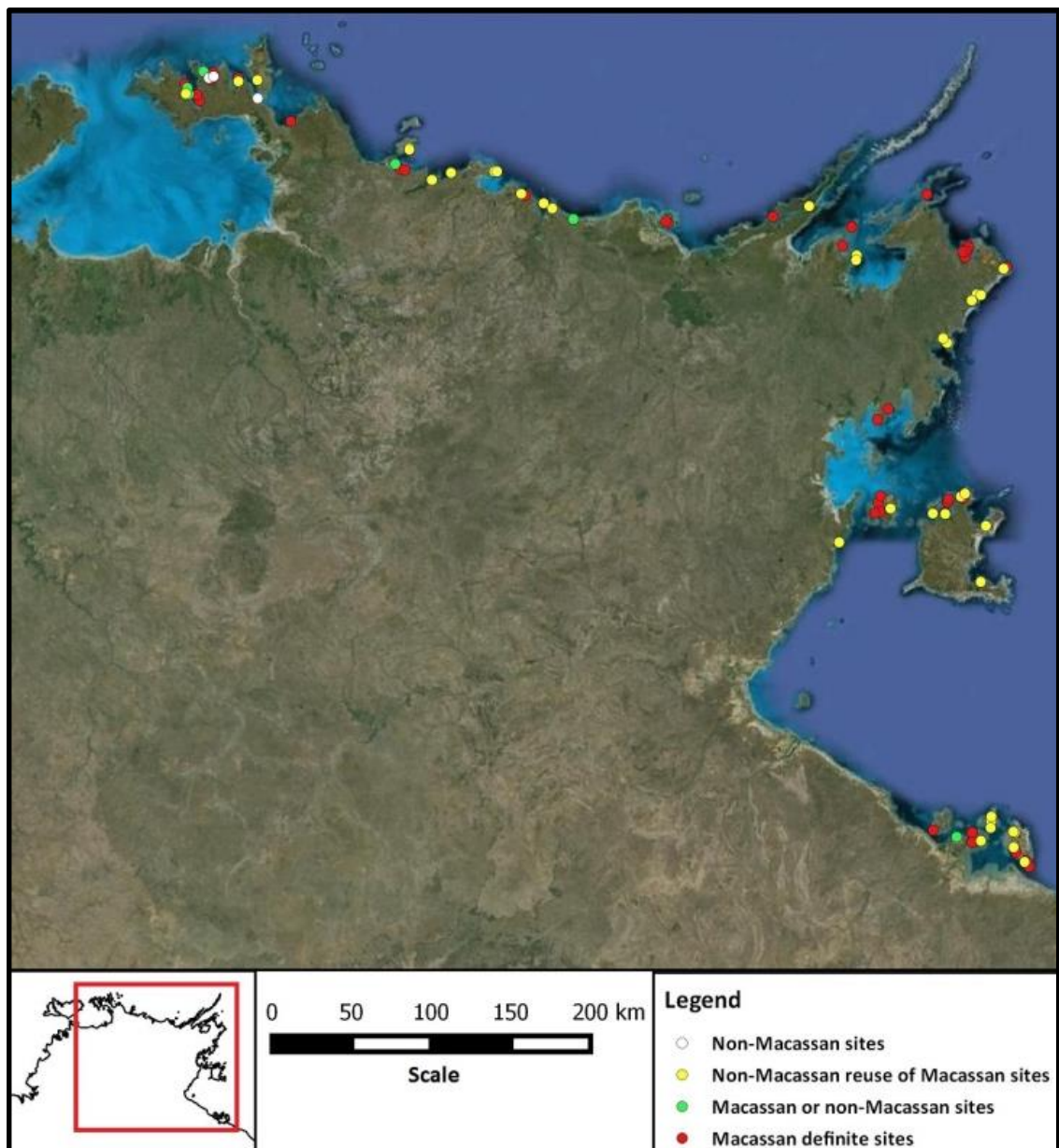


Figure 7.58 Non-Macassan trepang processing sites (white and yellow dots)

Pearling

Historical context: Success of the pearling industry in the Torres Strait and around Broome from the 1860s led to unsuccessful attempts to find pearl oyster within the Northern Territory waters prior to 1883 (Powell, 2010:151). The arrival of the *Sree pas Sair* pearling schooner in 1884 with 60 experienced divers, however, produced one and a half tons of pearl shell from Port Darwin within a few days. Despite this, the Northern Territory pearling industry was not as successful as Broome and the Torres Strait (Powell, 2010:152). Independent and company-owned pearling luggers were spread across the coastline, with more remote regions worked as shell beds closer to Port Darwin became exhausted. These included the southern coast of Melville Island by 1902, and Goulburn, New Year and Croker Islands, and further afield into the Aru Islands by 1907 (NTTG, 22 November 1907:2). With better options for pearl crews in the Aru Islands and other regions of maritime Southeast Asia, in 1908 local pearl crew shortages led to the sourcing of extra men from Kupang (NTTG, 6 March 1908:3) in spite the legislation of the White Australia policy, that started with the *Immigration Restriction Act 1901*.

Although a maritime industry, pearling crews hunted for crabs and game in the littoral zone and inland (NTTG, 13 June 1902:2). Stations to process the shell were commonly based on board the vessel, yet were also occasionally set up on shore, with the Australian Pearl-fishing Company setting up a station at Cox Peninsula (North Australian, 18 April 1884:3). Pearling seasons ran through the dry season, taking advantage of the clear waters once the southeasterly winds abated. On the whole, the pearling industry in the Northern Territory was rather small compared to that of Broome and the Torres Strait, yet continued on with a crew of Anglo, Japanese, Chinese, Malay, Filipino and First Nations men through to the twentieth century (Powell, 2010:151).

Archaeology: No known archaeological research has been undertaken on the pearling industry, although pearling luggers wrecked in Port Darwin from the 1897 cyclone event are listed on the Australasian Underwater Cultural Heritage Database. These are *Ark*, *Black Jack*, *Brisbane*, *Charity*, *Faith*, *Gertrude* and *Olive*.

7.4.5 Terrestrial industries

As with the construction of the Overland Telegraph Line, a number of terrestrial activities relied on the seas and rivers as a means of transporting workers, supplies and products to Palmerston for export. These included timber, livestock, buffalo hides, gold and tin (the latter three of which will be discussed further).

The two main terrestrial extractive industries prior to 1911 were the Pine Creek gold mines (Pearce, 1982; Bell, 1983, 1995, 1996; Hardwick, 1984; McCarthy, 1986, 1988, 1989, 1995; Van Kempten, 1987; Mitchell, 1995b, 1999; Fredericksen et al., 2001) and the Bynoe Harbour tin mines (Heritage Surveys 1997; Gregory, 1999; Mitchell, 2005). Mitchell's (2005:55–7) analysis of the Wheel of Fortune Tin Mine and worked by predominantly Chinese miners highlights the marked contrast between Bynoe Harbour and the archaeologically rich Pine Creek sites and recognises the potential for research into Chinese identity. Both mining districts relied on watercourses to ship people and supplies as close to them as possible. For Pine Creek, Southport was the transit point from water to land. The Bynoe Harbour tin mines had many other closer landings. Landings for both sites are discussed below.

Southport Jetty

Historical context: Located at the junction of the Blackmore and Darwin Rivers, Southport was a significant port township as the gateway to the Pine Creek gold mines. This was due to its distance by water being only 35 kilometres from Palmerston compared to 68 kilometres by road (Duminski, 2005:5). Southport Jetty was constructed from local timber by John Lewis in 1873 under government contract. In the same year, complaints were being publicised as the jetty was “12 feet too high for even the highest tide which can occur, whilst as to medium to low tides, it will be perfectly useless...Like everything else in the Northern Territory it is in a state of suspense, hanging midway between heaven and earth, and nobody can say when it will be completed” (NTTG, 14 November 1873:3). A lower landing was eventually built, yet the Southport jetty was in constant need of repairs due to its fast rate of deterioration. Additional landing places were constructed by local residents; a photograph dating to 1878 of “Lot 337, Adcock's store and jetty” captures one such smaller jetty in the foreground, directly in front of the store (Figure 7.59). Despite repairs being undertaken, the use of the jetty declined with the township by the 1890s as Southport was bypassed by the new railway leading into the goldfields (Powell, 2009:74). The railway and other government infrastructure were constructed with the assistance of Chinese indentured labour (Yee, 2006:2).



Figure 7.59 Adcocks Store and Jetty, Southport, August 1878 (Foelsche, 1878)

Archaeology: Southport is located at the junction of the Darwin and Blackmore Rivers 70 kilometres south of Darwin (Z52S 711296E 8593142N) (Figure 7.60). It was originally surveyed by Goyder in 1869 and became the main port for the Overland Telegraph Line between 1870 and 1872 (Duminski, 2005:5). From 1872 onwards, it was the main port for the Pine Creek goldfields, with a jetty being built between 1873 and 1874. The large tidal range (over 5 m) restricted times of shipping, with low tide virtually emptying out the river. Around 1889, the jetty fell out of use as the township declined once the Pine Creek railway began operations further to the west.

Archaeological research was first undertaken at Southport in 2001 by Daryl Guse (2001) as part of a heritage assessment of the telegraph and police stations. Although the historical overview by Bob Alford mentions the Southport jetty (Guse, 2001:3–33), the primary focus is the township. In 2010, further archaeological research was conducted through Flinders University and Larrakia Nation as part of the Ethnoarchaeology in Aboriginal Australia Field School. The field school assisted Kellie Pollard's doctoral research into First Nations contact sites throughout the Larrakia region (Kellie Pollard, pers. Comm., 2013).

The site of the jetty was revisited on 11 September 2013. It is situated on the Blackmore River 680 metres downstream from the junction of the two rivers, 11.3 kilometres south from the mouth of the Blackmore River, and around 36 kilometres south from Darwin. The old jetty remains are on a cleared block of land (Lot 337) that has evidence of recent human visitation through refuse

and camp fire remains. Thirty metres to the northwest of the old jetty site is the current boat landing in the form of a concrete ramp.

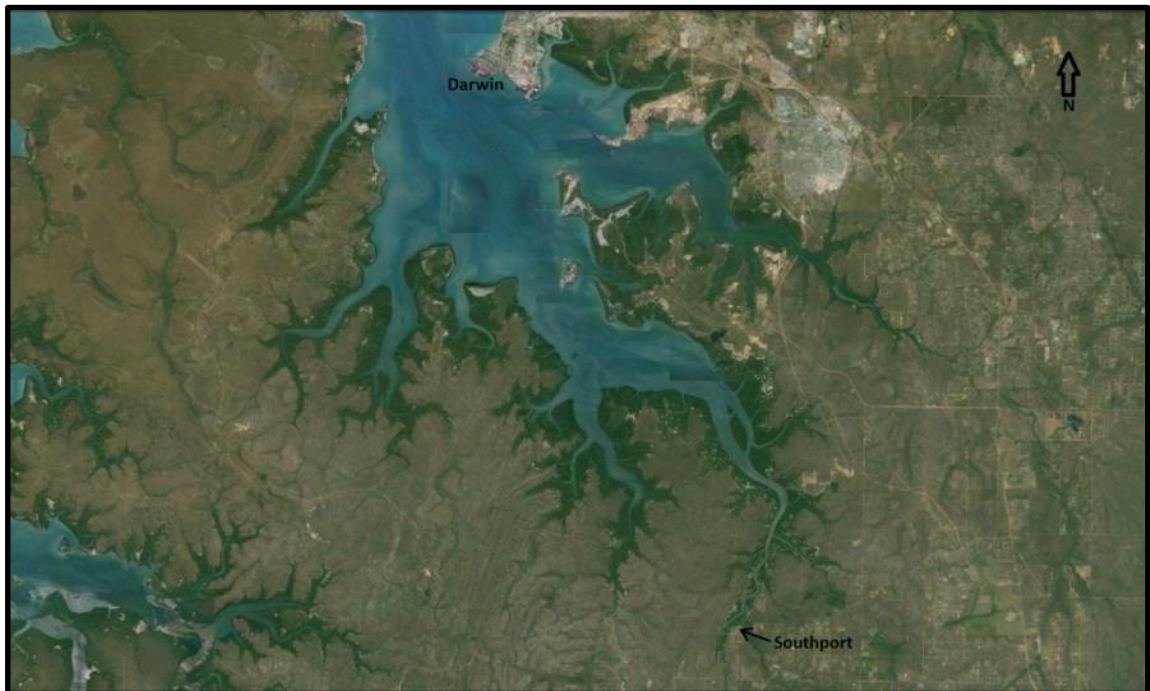


Figure 7.60 Southport in relation to Darwin (Google Earth, 2014)

Extant remains of the jetty are two steel beams jutting out 25 centimetres from underneath a layer of asphalt (Figure 7.61). The distance between them is 2.7 metres. It is not yet known if these are the original beams or not. The asphalt covers an area of three metres by two (Figure 7.62). The geology of the immediate site is a sandstone outcrop that runs northeast to southwest, abruptly ending at the Blackmore River. The sandstone is visible at the base of the river at low tide, with a height of five metres from low tide to the top of the jetty landing. The surrounding river edge was surveyed for evidence of other jetties that appear in photographs taken prior to 1900. In surveying the area 50 metres southwest and 30 metres northeast along the river edge, no further material evidence was found. Survey was also undertaken within the cleared block in which the jetty is situated, and in the cleared block immediately to the north (Lot 336). Glass and ceramic shards were found beneath a tree 15 metres inland and a bottle dump was located in the scrub on the eastern edge of Lot 336. No structural remains are present. Aside from these finds, there is little evidence left of this once busy river port.

The site of the jetty was no doubt picked due to the natural landing place created by the sandstone outcrop. The eastern side of the Blackmore River remains relatively high for a few hundred metres upstream before turning into a low-lying mangrove bank similar to the western bank. With a tidal range of approximately five metres, the Blackmore River provides a higher depth than that of the Darwin River that separates from the Blackmore at the northern extent of the Southport

township. This area therefore provided the best place to land goods at mid to high tide depending on the draught of the vessel. As with all Northern Territory estuaries, the optimum way to sail or steam up the Blackmore River would be to follow the incoming tide up river and leave on the outgoing tide. A vessel could not navigate the shallow depths at low tide without the risk of damaging the hull and/or remaining beached until the incoming tide refloated it.



Figure 7.61 Steel beams protruding from asphalt (left and right respectively)



Figure 7.62 Asphalt covering sandstone outcrop (facing southwest and west respectively)

Hang Gong's Landing

Historical context: With the discovery of tin at Bynoe Harbour (or West Arm) in 1885, small vessels would make their way down the numerous rivers and creeks to the mining sites (Gregory, 1999:9). By 1904, the tin fields had developed significantly and a landing of a steep muddy bank was used to access the closest mines via Port Darwin's West Arm estuary (Gregory, 1999:23). The difficulties of delivering mining equipment and stores to the landing led the Government to advertise for tenders to build a suitable landing, and by 1908, a substantial jetty of cypress pine logs was constructed (NTTG, 7 February 1908:3). Hang Gong's Landing, named for businessman and miner Lee Hang Gong, was also known as West Arm Landing. It had two levels for high and medium tides, and remained functional well after the decline of the mines. The use of the white

ant-resistant cypress pine for the structure was no doubt based on hindsight from the numerous repairs needed for both the Port Darwin Railway and Southport jetties.

Archaeology: Hang Gong's Landing was first recorded by the Northern Territory Heritage Department in 1997 as part of a broader survey of the West Arm-Bynoe Harbour tin mining area (Gregory, 1999). Sites recorded were predominantly historic tin mines, with Hang Gong's Landing being the only landing site recorded. From this report, information relating to Hang Gong's Landing included a historical background and a basic map of the landing area (Gregory, 1999:23–6). This site, defined specifically as a landing site, is recognised as the primary landing site for miners, machinery, and other goods. Construction of the jetty was completed by the Government in 1908 (NTTG, 7 February 1908:3) from cypress pine logs brought in from across the harbour (NTTG, 13 December 1907:3). Tenders to construct a shelter shed at the landing site to protect goods, etc. during the wet season were also advertised around the same time (NTTG, 27 September 1907:3).

Located at 693335E 8602432N (Zone 52S UTM) (Figure 7.63), Hang Gong's Landing is situated 11 kilometres downstream from the mouth of West Arm and 23 kilometres south of Darwin. West Arm is a tidal channel that has a tidal range of around 5 metres, with high and low tides occurring twice a day (Figure 7.64). The channel is navigable by small/medium sized vessels at medium to high tide depending on their draught. The southern bank of the channel is quite steep in the immediate area of the landing, while the northern bank is relatively flat. This is due to the channel bending sharply to the east just prior to the landing. Mangroves dominate the banks on both sides, extending inland from the banks between one and 30 metres. The continual movement of water encourages a large amount of mud and silt to line the banks, with low tide exposing the mudbanks and mangrove roots. Salt water flows through the channel, bringing with it marine life such as fish, sharks, and saltwater crocodiles. Past the mangroves, the land rises gradually into an open hinterland. A small amount of recent cultural material marks Hang Gong's Landing as a place to visit, although it is not known to the wider public.

Hang Gong's Landing was visited twice for reconnaissance prior to mapping. As the landing is located on unsealed roads still utilised by the local community, and due to its relative intactness, it was easily located on the first and second reconnaissance trips using the UTM coordinates from the heritage report (Heritage Surveys, 1997). Survey within the mangroves to the immediate west of the landing revealed a large section of the landing previously unrecorded. A contemporary newspaper account details the plans for the "...erection of one jetty for use at half-tide with a ramp leading to the top of the bank, and another for use at high tide which will be nearly level with the top" (NTTG, 25 October 1907:3).



Figure 7.63 Hang Gong's Landing in relation to Darwin (Google Earth, 2014)



Figure 7.64 High and low tide at Hang Gong's Landing (facing northeast)

On 26 September 2013 Hang Gong's Landing was mapped and its immediate environment recorded (Figure 7.65). At high tide, the main jetty (western side) of Hang Gong's Landing is fully submerged by around 50 centimetres. In mapping the eastern section of the landing, the fragility of the mangroves became apparent. The entire site was initially mapped to a scale of 1:50 and later to 1:100. Overall, the landing spans 28 metres in width from west to east and extends 13 metres south from the bank. There is a gap of five metres between the two landings where the bank curves to the southeast. Materials used to construct the landing are cypress pine logs averaging a length of five metres and a diameter of 25 centimetres, iron pegs, iron sheeting, and local ferruginous rocks (known as coffee rock) for the fill. Over the course of a century, it appears that much of the cypress pine logs had been removed from the site for other uses, no doubt due to its resistance to white ants.

The western landing extends into the channel by 3.5 metres. It measures 13 metres in length, five metres in width and just over two metres in height. The missing uppermost decking provides an

insight into how it was constructed, with the bank cut four metres in width and three metres in length. The overall construction involved three or more logs planted into the ground vertically on each side to create the outer framework of the jetty. Logs were then laid out horizontally adjacent to the bank in intervals of one metre at the base of the jetty and parallel to the bank (intervals unclear) to form a framework. From this base, it appears that logs were then laid out in the same intervals to create compartments in which the coffee rock the size of small boulders could be distributed as fill (Figure 7.66). The western side of the extant jetty exemplifies this with the outer wall still relatively intact.

The post at the end of the jetty has a large iron peg (bolt) located around 1.5 metres above the floor of the landing (Figure 7.67). This peg represents the original height of the jetty, with the uppermost logs now missing and the lower ones slumping down into the channel. As the cypress pine logs located at the far end of the landing (inland) are also higher than the extant jetty, it would seem that this structure would have originally been over a metre higher than it is at present. This section of the jetty continues into the present road that leads out of the site.

The eastern landing appears to begin five metres to the east of the western landing, spanning 17 metres in length and 13 metres in width. This section of landing is much more ambiguous as to its original construction due to the movement and removal of the majority of cypress pine logs. It appears that this landing stopped at the channel edge. Two sets of logs run adjacent to the channel for eight metres. They are separated by a space of six metres, possibly indicating the actual size of this landing. Fifteen logs are scattered diagonally and parallel to the channel, with one in a position that suggests it ran adjacent to the channel in the middle of the two outer logs. Four metres inland are two five metre logs that run between the eastern landing and a ditch/creek that runs off the channel, with a seven-metre log crossing the end of the ditch/creek at eight metres inland. One last log extends directly parallel to the ditch for seven metres, running between the two logs that cross the ditch. Directly behind the logs that cross the end of the ditch are numerous small iron sheets or slats that each measure 10 centimetres in width and one metre in length prior to breakage. This may have been the base of a small crane or other maritime structure (Figure 7.68).

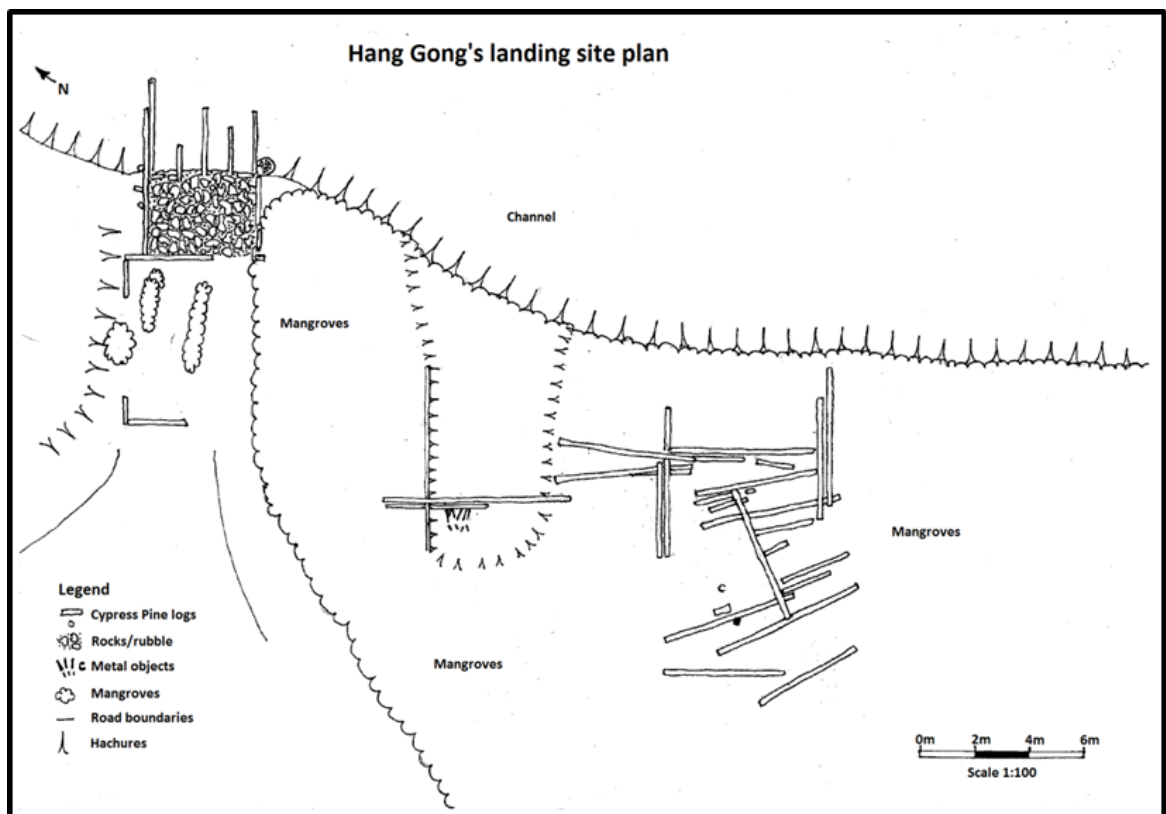


Figure 7.65 Hang Gong's Landing site plan (mapped and drawn by author)

Other material visible at the site of Hang Gong's Landing includes an iron wheel located in the channel directly to the east of the western landing that would have been used as a mooring for small boats (Ross Anderson, pers. comm. 9 April 2021) (Figure 7.69), a portable steam engine around 15 metres inland from the western landing (Figure 7.70), another small wheel next to the mangroves at the rear of the western jetty, and scattered glass fragments throughout the site. The archaeology of Hang Gong's Landing, when compared to other landings throughout the tin mining region, confirms the importance of this site as the main entry point into the Bynoe Harbour tin mines.



Figure 7.66 Western side of landing facing northeast and east



Figure 7.67 Iron peg on upright pole showing original height of landing deck (facing northeast)



Figure 7.68 Iron slats protruding from underneath cypress pine logs (facing north)



Figure 7.69 Wheel visible in channel at low tide directly east of landing



Figure 7.70 Portable steam engine located on elevated ground at Hang Gong's Landing (facing southwest)

Bynoe Harbour tin mine landing sites and Indian Island (by water)

Historical context: Hang Gong's/West Arm Landing was the primary landing place for people and goods entering and exiting the Bynoe Harbour tin mines. Contemporary newspaper articles and a map of the region dating to 1958 show several less significant landing sites that delivered people much closer to the tin mines to the southwest so as to avoid lengthy journeys across land. As is evident in the newspaper articles, these landings could only be reached at high tide in small vessels (North Australian and NTTG, 22 June 1889:3). Larger coastal vessels would have sailed (or steamed) around the Cox Peninsula into Bynoe Harbour, transferring people and goods into small vessels at high tide to move up the tidal rivers and creeks to their destination. Whether the boat remained at the landing or headed back on the outgoing tide is not yet known by the author.

Archaeology: Archaeological survey was undertaken of the tin mine region both by water and by land to locate river and creek landings. The purpose of survey by water was to examine the maritime environment that was the secondary entry point to the tin mines after Hang Gong's

Landing. Factors such as wave and tidal actions, general harbour conditions, coastal topography and vegetation, water depths, and other information concerning travelling by water were to be assessed. Through these means, a better understanding of the conditions faced by the captains and tin miners could be gained. The planned route of survey was to travel up the Charlotte River and Bells Creek to the potential landing place for Bell's tin mine, and to navigate around Indian Island to assess potential landing sites for the extraction of cypress pine by Chinese loggers (Figures 7.71 and 7.72).



Figure 7.71 Bynoe Harbour in relation to Darwin (Google Earth, 2014)

On 18 September 2013, Karrabing traditional owners Rex Sing, Linda Yarrowin, Trevor Bianamu and Robyn Lane met with the author at the Keswick Point boat ramp located on the eastern side of the inner harbour. The five-metre runabout boat was launched by Sing at 8am and the party proceeded south down to the Charlotte River. The weather was mostly sunny with a few clouds and a slight breeze and the harbour was calm and clear. In cruising down Bynoe Harbour, small beach areas were visible to the northwest and southeast of the harbour and on Knife and Crocodile Islands. The remainder of the littoral zone was low-lying mangroves. In travelling down to the entrance of the Charlotte River, the many inlets in this area created a sense of being in a maze, where all mangrove-lined entrances appeared the same to the inexperienced eye.



Figure 7.72 Route taken by boat, Bynoe Harbour (Google Earth, 2014)

The entrance to the Charlotte River is around 90m wide and the river extends down two major tributaries at past 17 kilometres. With Rex as the driver of the boat, the entrance of Bells Creek was located and followed up for 500 metres (Figure 7.73). It was decided to turn around at this point due to the outgoing tide shrinking the creek down to just above one metre in depth. The landing visible on the historical map placed Bell's Landing at around 2.4 kilometres upstream; 1.9 kilometres northeast of our turning point. No other landing areas were visible within the first 500 metres of the creek. The banks of Bells Creek are lined with dense mangroves that, at mid to low tide, reveal their roots and the muddy slopes up to two metres in height. The creek is around eight metres in width. Occasional narrow tributaries of one metre or so in width run off the creek underneath the mangrove branches. The land extending from the bank of Bells Creek is low-lying, with higher ground of two to four metres at points along the Charlotte River. The water for both estuaries is muddy due to tidal flow, with the direction of the tide visible through the floating debris. On exiting the Charlotte River, sand bars and rock outcrops became visible with the lowering tide, inducing the need for high caution to avoid becoming grounded or damaging the hull (Figure 7.74).

Heading west for 18 kilometres, a route was taken towards the southern point of Indian Island. This island was logged for cypress pine during the late 1800s and early 1900s by Chinese men on behalf of the Government. The harbour was relatively calm with a light breeze creating waves of under 50 centimetres. Current pearl culture buoys were visible either side prior to reaching the southern extent of the island. The channel separating the island from the mainland is around 360 metres wide. Mangroves line the shore of both the mainland and Indian Island, with cypress pine visible as tall dark vegetation. A rocky outcrop was visible at the southeastern extent of the island

that would not be visible at high tide. In following the western side of Indian island north, mangroves dominated the coastline aside from a sandstone bedrock plateau visible at approximately Z52S 665535E, 8596725N (Figure 7.75). This platform is roughly 35 metres in length and stood at over two metres at medium to low tide. At high tide, the platform may have been suitable as a natural dock to disembark or load vessels with cypress pine, although its location on the western side may have been too inconvenient for the loggers, and the large boulders in front of the platform may have been a hazard for a vessel.



Figure 7.73 Bells Creek mouth (facing north)

Figure 7.74 Charlotte River during outgoing tide (facing west)

Travelling to Grose Island and the adjacent reefs along the northwestern extremity of the harbour, the lowering tide exposed reefs that extended north-northeast for over five kilometres (Figure 7.76). At over one metre above the current sea level, these reefs were grey in colour and had a constant flood of seawater streaming down from their crevices. To exit the harbour safely at low tide, captains would have to navigate around the eastern extremity of the reefs and islands rather than between them, although at high tide this may have been possible with a vessel of low draught. The waters in the northern extents of the harbour were choppy than the south, yet it was still relatively calm compared to Anson Bay. In travelling back towards the northern extent of Indian Island, rocky outcrops frilled the northwestern point, immediately followed by a 2.7 kilometre stretch of beach running northeast and backed by 300 metres of low-lying mangroves. The land around the northwestern point is elevated with the red sandstone cliffs distinctive to the region, lowering again on the eastern coastline where mangroves again dominate. At just over two kilometres south from the northern point, a natural beach landing place 50 metres in width is situated between two rock outcrops extending 60 metres into the harbour, although this does not appear to lead to cypress pine. The most likely landing spot for any vessels would be in the mid to southeastern extent of the island where a few clear beaches are visible. These lead directly onto higher ground that is densely vegetated and would have had patches of cypress pine. The eastern side of Indian Island would have also been quicker to access by sail and safer to anchor or beach depending on the vessel type.



Figure 7.75 Rock platform on western side of Indian Island at low tide

Figure 7.76 Reef off Grose Island (facing north-northwest)

At three kilometres north of the southeastern extent of Indian Island, the Bynoe Harbour survey by water was concluded. The outcome of this survey was an acute awareness of how the tides would have dictated the movements of vessels traveling up the estuaries to supply the mines with people and goods. The narrowing creeks, moving sandbars and rock outcrops in the rivers would have also influenced the size and type of vessels for these voyages. At five metres in length, the boat used for the survey was too large for an outgoing tide. Contemporary newspapers do discuss travelling into Bynoe Harbour by a larger vessel, with smaller boats boarded to access creeks leading to the tin mines (North Australian and NTTG. 22 June 1889:3). Regarding the procurement of cypress pine on Indian Island, larger boats such as the cutter *Flying Cloud* (28 tons) were used to carry the pine to Port Darwin. To anchor in a high tidal zone where beaching would have been immanent, a flat-draughted vessel such as a sampan would have been best suited. Considering that the loggers were Chinese, this would more than likely have been the case.

Bynoe Harbour tin mine landing sites (by land)

As the Bynoe Harbour survey by water to Bell's Landing was unsuccessful in locating the landing site, the alternative method for locating landing sites was by land survey. The aim of the land survey was to locate the landing sites for the Leviathan tin mine, Kelly's mine, and Bell's Landing for the Mona Mine, etc. This accounted for four landing sites in total, all of which were located on the *Darwin and Environs* map (Division of National Mapping, 1958) (Figure 7.77). In surveying the region by land, restrictions such as tidal levels could be avoided. Only approximate GPS coordinates were assigned to each landing site due to the *Darwin and Environs* map being incompatible with the present WGS84 projection. Expected findings at the landing sites would be an area of creek/river bank that formed a natural landing spot for small vessels and cultural material associated with late nineteenth century tin mining.

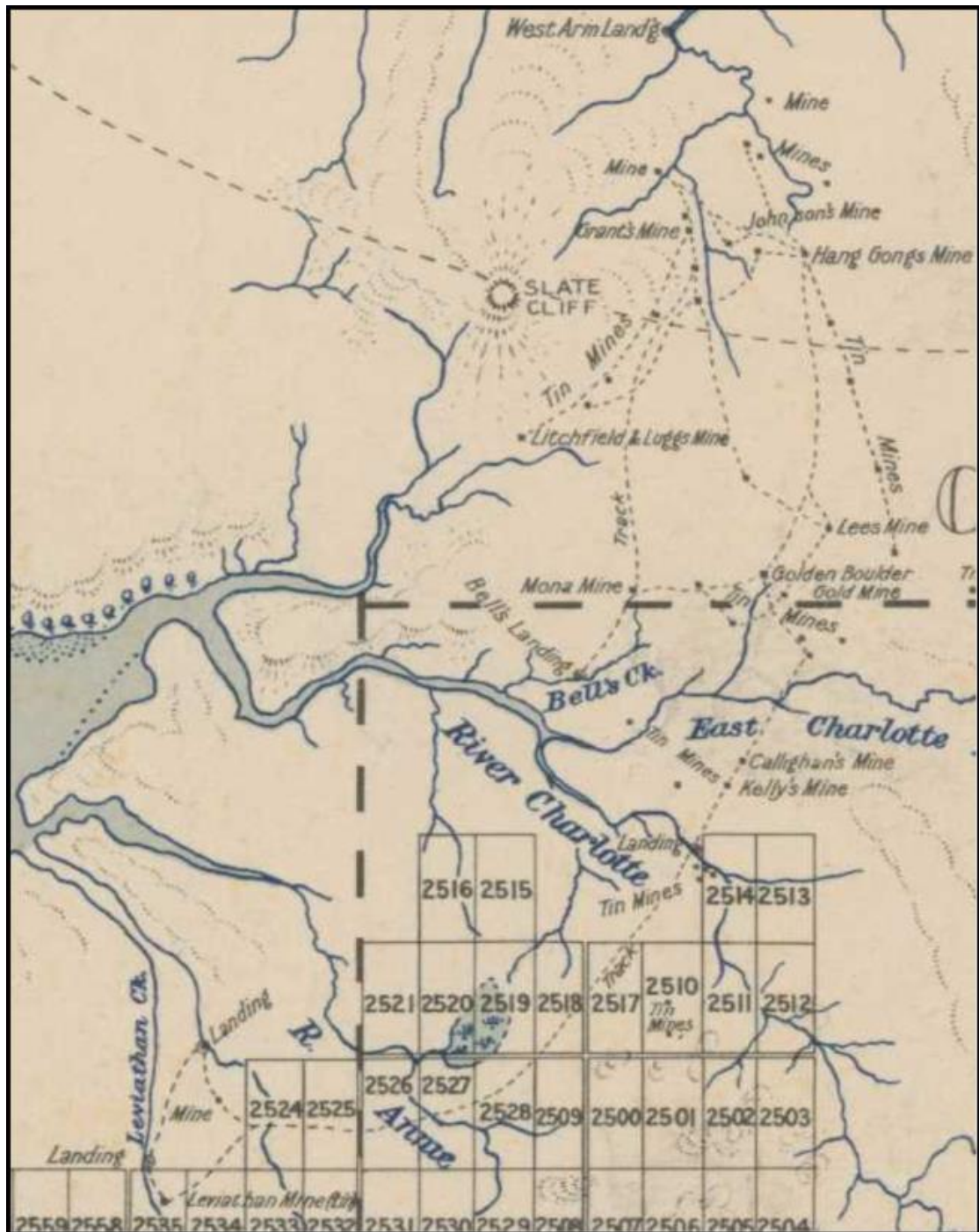


Figure 7.77 [Section of] *Darwin and Environs* map showing landings (Australia. Department of the Interior. Property and Survey Branch, 1937)

On 20 September 2013 the landings associated with the Leviathan tin mine—being the easiest to reach due to its proximity to the main road—were surveyed by the author and Colin Holt. Locating the steam boiler at the Leviathan mine site (Z52S 686346E 8585582N) (Figure 7.78), the Leviathan Creek was followed north along what appeared to be an old track for 320 metres to where a suitable place was located for landing (Z52S 685988E 8585732N) (Figure 7.79). Although no cultural material was present, the potential landing had a clear steep bank that rose 50 centimetres above watermark with a depth of 80 centimetres at low tide and a width of four

metres. The land surrounding this area was clear, with the track continuing further north. Following the track, a second mining site (assuming to be another section of the Leviathan tin mine) was located (Z52S 685614E 8586300N) one kilometre north northwest of the previously recorded tin mine. Several large tailing mounds were visible as were a number of metal mining fragments including a pipe that ran from the site into the creek (Figure 7.80). The potential landing place at this site (Z52S 685593E 85886305N) has a depth of less than one metre at low tide (Figure 7.81). The steep mangrove-lined banks, however, rose to around four metres, suggesting a good position for landing larger vessels. This may have been the case, as Leviathan mine is 19 kilometres southwest by land from Hang Gong's Landing with many tributaries in between. To cart all of the mining equipment including the steam boiler from Hang Gong's Landing would have been a time-consuming and hazardous task.



Figure 7.78 Steam boiler at Leviathan tin mine (facing north and northwest)



Figure 7.79 Possible landing upstream, Leviathan Creek (facing west)

Figure 7.80 Section of pipe leading into Leviathan Creek (downstream)



Figure 7.81 Possible landing downstream at second mining site, Leviathan Creek (facing west)

Another option for delivering equipment and men to the Leviathan tin mine was a landing site located on a tributary that runs off the Annie River approximately three kilometres to the north (see Division of National Mapping, 1958).

“The anchor was dropped at 5 a.m., and after a hasty breakfast a start was made in two boats for the landing place, some distance farther up the creek. On the way up attention was called to a high gravel bank on the west side of the creek, as being a capital natural landing place for heavy material should the locality prove to possess the mineral wealth its admirers hope for; it was stated that from this point to the "Leviathan" a good road could be made in four miles. As the boats proceeded the channel rapidly narrowed; the tide was high; and in many places the over-hanging mangroves almost blocked up the passage. On landing, a walk of a little over a mile brought the party within view of the mine...” (North Australian and NTTG, 22 June 1889:3)

In traversing the landscape between Leviathan Creek and the unnamed Annie River tributary, the land rose slightly yet was relatively flat with light vegetation of palms and eucalypts. In reaching the approximate GPS location, no cultural material was visible to indicate a landing site. The tributary was surveyed for a few hundred metres, with the mangrove density hiding the river from view. The only place that represented a gravel bar (discussed in the newspaper article above) was

at Z52S 685574E 8588316N (Figure 7.82). The quartz gravel bar extended inland around 200 metres from the creek. The creek itself was not visible due to the obstruction of young mangroves, yet these mangroves were less dense than in other sections, possibly relating to the geology of the gravel bar.



Figure 7.82 Gravel bar on an Annie River tributary (facing east [towards river] and west [towards land] respectively)

On 27 September 2013, survey of the Kelly's mine and Bell's Landing was attempted. In surveying the Charlotte River for landing sites close to Kelly's tin mine, three potential landing sites were visible: a possible gravel landing at Z52S 693263E 8590969N (Figure 7.83); a possible slope landing at Z52S 693191E 8590950N (Figure 7.84); and a possible cutting into the land from the river at Z52S 693092E 8590950N (Figure 7.85). These potential landing sites are within 180 metres of each other and it may be argued that, considering the density of the tin mines in this area (over 10 within a radius of one kilometre), numerous landing sites were used within the period of occupation. No cultural material was visible at these locations to confirm these as actual sites. After completing the Charlotte River survey, locating Bells Creek was attempted. The landscape surrounding Bells Creek being a low-lying floodplain, it was decided that this area was not safe to survey due to the possibility of encountering boars or saltwater crocodiles (Figure 7.86).

The absence of cultural material at all of the potential landing sites (excepting the Leviathan) suggests one of two things, that the actual landing sites were not located, or that the sites were simply used as entry and exit points into the tin mines with little to no infrastructure required. As is evident in the above newspaper article, natural features such as gravel bars were utilised as landing spots with little to no alteration needed for such a small anchorage. Regarding survey of the region, reaching the landing sites by land was far easier than by water. This would have been reversed, however, if a smaller vessel had been used and with a better understanding of tidal actions.



Figure 7.83 Possible gravel landing on Charlotte River (facing southeast)



Figure 7.84 Possible slope landing on Charlotte River (facing south)



Figure 7.85 Possible cutting landing on Charlotte River (facing south)



Figure 7.86 Floodplain leading to Bells Creek (facing southwest)

Buffalo camps

Historical context: The introduction of the buffalo with the with British garrisons led to a flourishing yet hazardous industry of buffalo-hide and meat production on the Cobourg Peninsula and Melville Island. Located remotely from Palmerston, cattle stations such as those on the Cobourg Peninsula relied on maritime transport to move livestock and buffalo hides. In the 1870s, the Coburg Cattle Company, just south of Victoria garrison at Port Essington (Powell, 2009:94), and a buffalo camp occupying the site of Fort Wellington were more buffalo-shooting and hide-processing camps than cattle stations (Gregory, 1996:6). These industries were run by entrepreneurial men such as Edward Robinson, Robert Cooper, Fred Dewar and Munro Leslie from the 1870s through to the early 1900s (Searcy, 1984:69; Carment et al., 2008:110, 498;

Fredericksen and De La Rue, 2013:3). In working with First Nations men and women, these men also participated in other terrestrial and maritime activities such as logging, trepanging and government postings. By 1884, Robinson become a customs officer at Irgul Point and Cooper an honorary sub-protector of Aborigines at Melville Island in 1911. Due to the remote, tough and dangerous nature of the occupation, fatalities such as the death of Ah You through buffalo injury were unavoidable (North Australian, 14 November 1884:3). Despite this, buffalo hides continued to be shipped to Port Darwin for export either by private vessels or by coastal steamers (The North Australian and NTTG, 27 December 1889).

Archaeology: The sites of the Coburg Cattle Company at Port Essington and the revenue station at Irgul Point have been recorded by Macknight (1969b), Baker (1984) and Taçon (1988) as part of their broader recordings of archaeological sites within the Cobourg Peninsula and region (Figure 7.87). This is as with the buffalo camp at Fort Wellington, Raffles Bay, with further visitation by Gregory (1996), the Historical Society of the Northern Territory (Spillett; 1971; Reid, 2011:42), and Charles Darwin University (as discussed in Chapter 6), with a number of papers by Fredericksen and De La Rue (2013) detailing features of the site in an attempt to differentiate its dual occupation as garrison and buffalo camp.

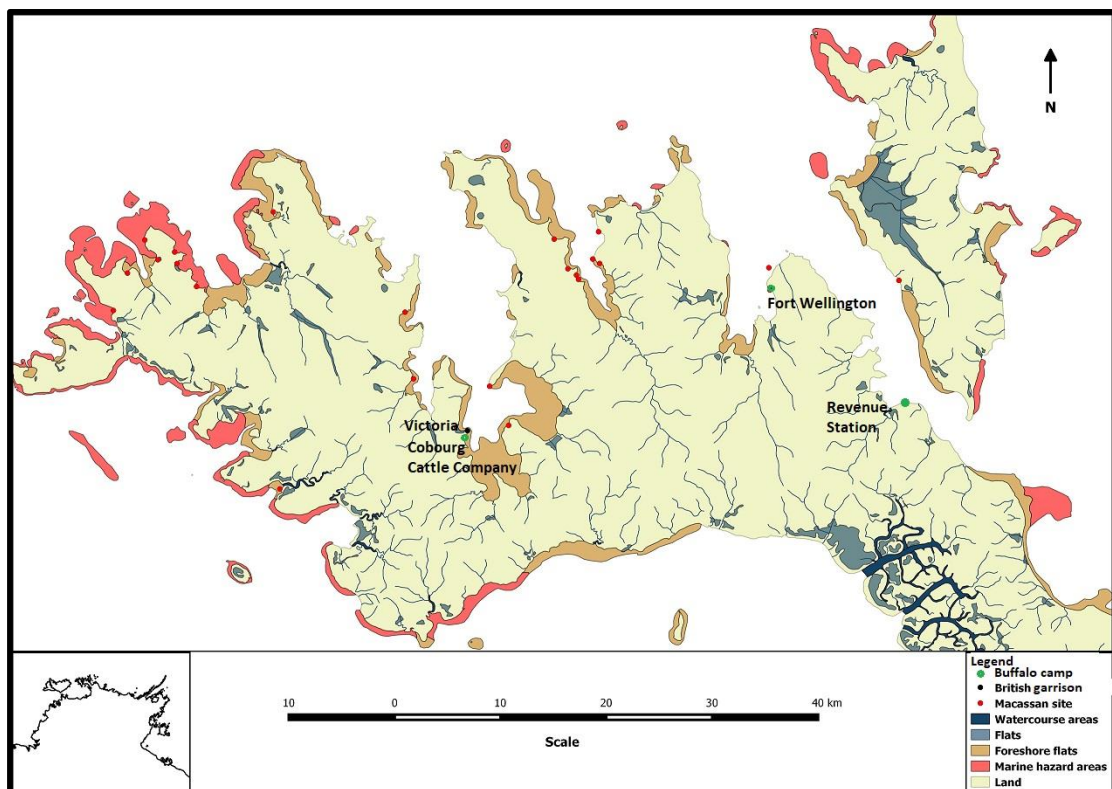


Figure 7.87 Locations of buffalo camps on the Cobourg Peninsula

At the site of Fort Wellington, archaeological features linked to the buffalo camp are the three concrete cisterns (S10, S11 and S12) located on the site's eastern periphery (see Figure 6.17)

(Fredericksen and De La Rue, 2013:18–23). Built from coral rock and lined with cement render, the cisterns are semi-subterranean and were used as tanning vats for the thousands of buffalo hides that were processed at the site (Figures 7.88 and 7.89). Although the coral reef cutting (S1) and coral walled structure (S8) may also be from this time, this is yet to be confirmed.

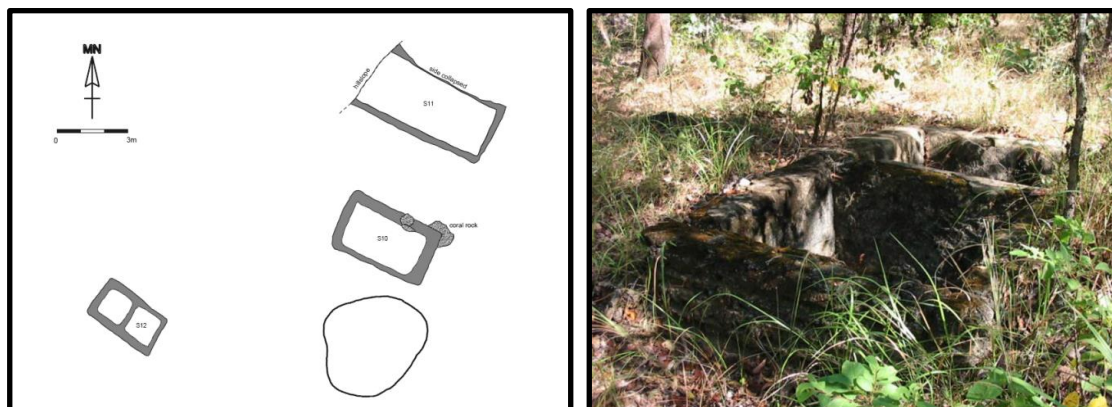


Figure 7.88 Plan of cistern complex S10, S11 and S12 (Fredericksen and De La Rue, 2013:22)

Figure 7.89 Double compartment cement-lined ‘cistern’ (S12) (Fredericksen and De La Rue, 2013:22)

7.4.6 Customs and quarantine

The increase of shipping into Palmerston, a growing Chinese population, fear of infectious diseases, and the continuation of the Macassan trepang industry led to developments in customs and quarantine activities. The sub-collector at Port Darwin managed customs duties across the entirety of the Northern Territory coastline. From 1882 to 1896, Alfred Searcy (1909, 1984) filled this role, his memoirs recalling his time intercepting Macassan perahus, managing imported goods such as opium, tobacco and tea, inspecting vessels, and accounting for passengers (NTTG, 11 November 1882:2, 3 October 1885:3). To manage customs duties outside Port Darwin—primarily taxing the Macassans—customs officer Edwin Robinson was stationed at the Coburg Cattle Company just south of the British garrison of Victoria in Port Essington. Due to its poor location, the revenue station was later moved into the direct path of the Macassans at Irgul Point, where Robinson collected duties and license fees from the Macassan trepangers (Carment et al., 2008:62). Alfred Brown replaced Robinson in 1899, but the duties and licencing fees lead to the eventual cessation of the industry in 1907.

With leprosy and smallpox entering Port Darwin from new arrivals in the 1880s, quarantine became an essential component of maritime affairs (Powell, 2010:150). During this time, Searcy also undertook the role of Assistant Health Officer under the *Quarantine Act 1877* (NTTG, 14 July 1893:4). Potential carriers arriving from China, Singapore, and Dutch-India were either quarantined on designated ships such as the schooner *Levuka* (79 tons) and SS *Ellengowan* (58

tons) (NTTG, 22 January 1887:3) or sent to quarantine stations at Point Emery (white people), and Mud Island or Goat Island (Chinese and First Nations people), with patients attended by visiting doctors (NTTG, 3 September 1887:3). By 1888, sections of the harbour were also declared as a quarantine station with “A line drawn from King’s Table north thirty-one degrees east, intersected by a line from South Shell Island south thirty-four degrees west, intersected by a line from a point south east of Point Emery...fifty-six degrees east.” (NTTG, 3 March 1888:2)

Archaeology: Situated at Irgul Point on the south side of the small bay on the southwest side of Bowen Strait, the revenue station was recorded by Macknight (1969b:127) in 1967. Inland from the beach, a wide sandy area contained the more recent materials of an old shed, a blitz truck and an extensive shell and glass scatter; potentially from timber-getting activities. Up a rise to the west and 300 metres past a tamarind tree, a clearing extends close to a cliff overlooking a beach. In the centre of the clearing, a rectangular concrete floor facing north is the remains of Robinson’s house. This had a central room with heavy posts at each corner and slab walls. A verandah with an outer edge of large stones (now removed) surrounded the room. Ten metres to the east, a stoneline with four or five bays faces north, and 10 metres to the south is a possible smokehouse depression. These are described by Macknight to be in a “very strange position” for a Macassan trepang processing site and therefore were possibly constructed by Robinson and Brown. A sample of artefacts collected mainly from the beach area include: import ware ceramic (1,378–80), glass bottle fragments including three rings, two bases, green, brown, violet and clear fragments with some utilisation; metal, piece of sheet brass; and two cowrie shells.

The archaeology of the wreck of the SS *Ellengowan* is detailed below under Shipwrecks.

7.4.7 Shipwrecks

The combination of marine hazards, strong currents and cyclonic events, coupled with the lack of maritime infrastructure, led to a number of shipwreck events along the coastline and rivers of the Northern Territory. The Australasian Underwater Heritage Database lists 65 shipwrecks between 1869 and 1911. One or two ships were generally lost each year, with nine lost in 1886, five in 1888, and 14 in 1897 after a cyclone event, although contemporary accounts record 21 vessels being destroyed (NTTG, 5 February 1897:3). These were mostly pearling luggers, a government steam launch, a Chinese junk, and three sampans. Vessel types wrecked are listed as 33 sailing vessels, five single screw steamers, 11 perahus, three Chinese vessels, one boat and 18 unknown vessels. Of these, the six that have coordinates on the Australasian Underwater Heritage Database are discussed below (Figure 7.90). Significant wrecking events with no coordinates in the Australasian Underwater Heritage Database include the yacht *Red Gauntlet* which ran aground on a reef 11 kilometres west-southwest of Vashon Head, Port Essington in August 1887 (North

Australian, 3 September 1887:3) and the schooner *Nebraska* that took on water at Greenhill Island south of the Cobourg Peninsula around late 1908 (NTTG, 11 December 1908:3).

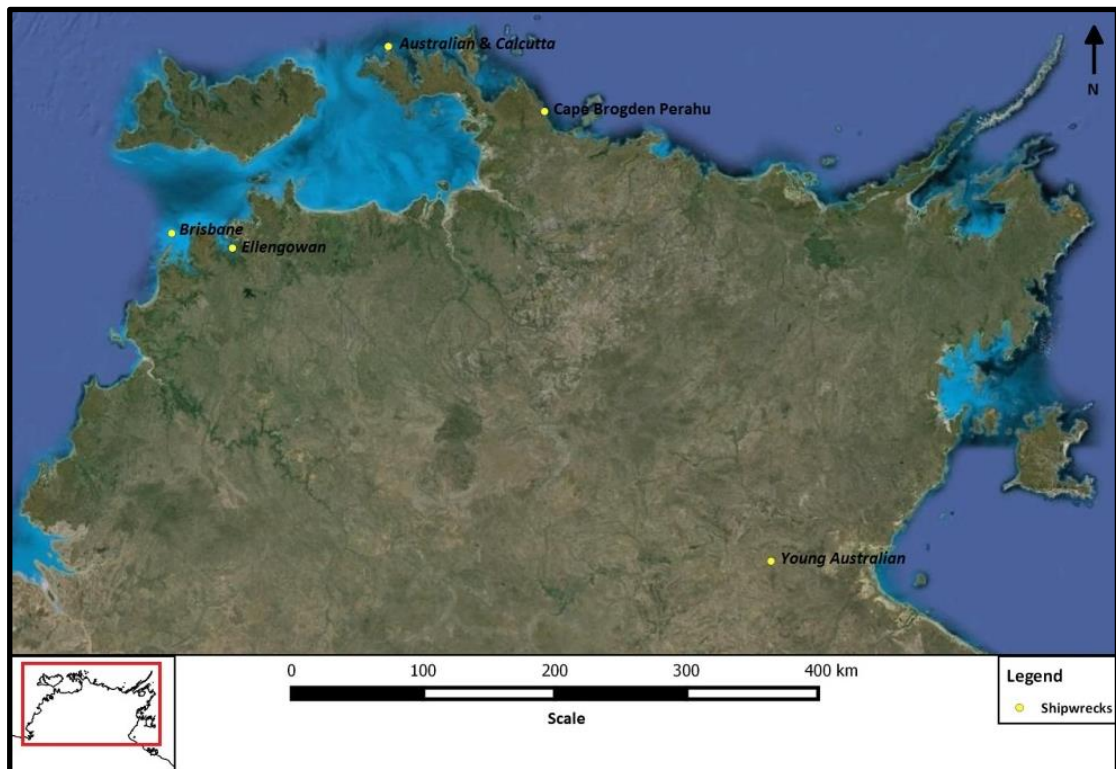


Figure 7.90 Map of selected shipwrecks with coordinates in the Australian National Shipwrecks database and discussed below (Google Earth, 2014)

***Young Australian* (wrecked 1872)**

Historical context: The government paddlewheel steam tug *Young Australian* arrived in the Northern Territory in 1872 to assist with guiding larger vessels up the Roper River for the construction of the Overland Telegraph Line (Powell, 2010:139–41). These vessels transported men and building materials for the Overland Telegraph Line and First Nations commuters between the offshore depot at Maria Island, the Roper River mouth and Patterson’s Landing upriver. On 30 December 1872, the *Young Australian* ran aground on a submerged rock close to the northern shore while towing the *Flying Cloud* down the Roper River to the Roper Bar Depot. Captain Lowie and his crew spent six weeks attempting to remove the steam tug to no avail and it was discarded as a wreck.

Archaeology: The wreck of the *Young Australian* is located near the northern bank of the Roper River around six kilometres from Ngukurr and was declared a heritage place in 2001 (Figures 7.91 and 7.92). Its significance is tied into the physical reminder of the role of the Roper River in the construction of the Overland Telegraph Line and its subsequent connection with the subsea

telegraph cables from Palmerston to Java and beyond to the British colonies of maritime Southeast Asia and England. The wreck also highlights the hazards of shipping in tidal rivers.



Figure 7.91 1920. The wreck of a paddle steamer (*Young Australian*) SLSA, PRG 280-1-25-152)

Figure 7.92 Wreck of the *Young Australian* 2004 (NT Govt. Heritage Register, 2007)

SS *Brisbane* (wrecked 1881)

Historical context: The SS *Brisbane* was an iron-hulled middle-sized ocean-going steamship of 1,503 tons owned and operated by the Eastern and Australian Mail Steamship Company (Figure 7.93) (Steinberg, 2005a:75–6). Ports of call included Melbourne, Sydney, Moreton Bay (Brisbane), regional Queensland ports, Port Darwin, ports in the Indonesian archipelago, Singapore and Hong Kong (Powell, 2010:148). In 1880, the SS *Brisbane* was contracted to provide a mail service for Port Darwin. With few ocean-going steamships servicing Port Darwin at this time, the SS *Brisbane* played a significant role in connecting Palmerston with the colonies to the south and in Asia and as a Chinese immigration vessel that brought 242 Chinese passengers to Australia in 1880. Its final voyage was the transport of Chinese indentured labourers from Hong Kong to Palmerston in 1881.

On 9 October 1881, the SS *Brisbane* estimated its position incorrectly, striking a reef off Quail Island, refloating, then wrecking on the submerged Fish Reef during high tide (Steinberg, 2005a:76). No lives were lost, with all on board transported to shore. As the SS *Brisbane* could not be saved, it was sold to a local partnership and salvaged extensively over the following months (Steinberg, 2005a:76). The absence of any distinguishing features along the coast for ships heading into Port Darwin was blamed for the wrecking event (NTTG, 29 October 1881:2). The captain and crew's statements of the event pointed out the need for a beacon at Point Charles; had there been one at the time, the wrecking may not have occurred.

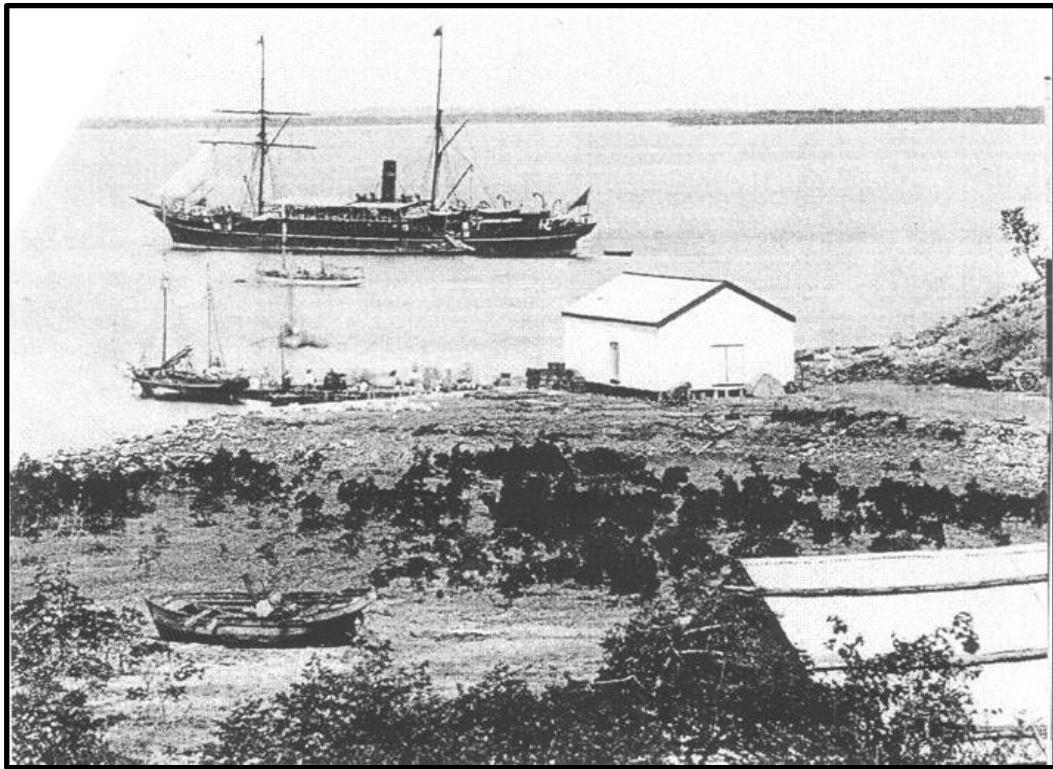


Figure 7.93 The SS *Brisbane* moored at Fort Hill, Darwin Harbour, 1879, Inspector Paul Foelsche. (Bob Noyle Collection [from Steinberg, 2005a:22])

Archaeology: The SS *Brisbane* has been protected under the *Historic Shipwrecks Act 1976* since 1993 (Steinberg, 2005a:75). In 2000, Steinberg surveyed the wreck and prepared a management plan for the site. As the superstructure and decks have collapsed, only the forward section of the wreck is exposed at extreme low tides (Steinberg, 2005a:76). Steinberg (2005a:77) describes the SS *Brisbane* wreck as a scattered wreck site with poor integrity. Its social significance is tied in with Chinese immigration of the Northern Territory (Steinberg, 2005a:58). Archaeological material from the wreck held at the Museum and Art Gallery of the Northern Territory and includes the ship's bell, a brass lock, jar lid, three Chinese wooden shoes (Figure 7.94) and a large bower anchor.



Figure 7.94 Two of the three Chinese wooden shoes excavated from the SS *Brisbane* by David Steinberg (REC 0609, MAGNT)

SS Ellengowan (wrecked 1888)

Historical context: The *SS Ellengowan* was a small iron steamer of 58 tons purchased circa 1880 by a sugar plantation company on the Daly River after having been a mission boat in New Guinea (Powell, 2010:154). In 1881, the *SS Ellengowan* struck a reef in the Daly River and sank (NTTG, 5 May 1888:4). Five years later it was raised, sold to the government, and repaired to take up a government mail contract to the ports within the Gulf of Carpentaria. In 1886, sub-collector of customs Alfred Searcy joined the *SS Ellengowan* on its maiden mail voyage to inspect the customs situation of the coast and rivers of Roper Bar and Borrooloola (Searcy, 1909:136). Repairs were insufficient for the coastal journey and it became a quarantine hulk just north of Channel Island during the 1887 smallpox epidemic, on which Chinese people were segregated from the whites for quarantine. It was here that the *SS Ellengowan* sank at its moorings in 1888 (Powell, 2010:155).

Archaeology: The *SS Ellengowan* is listed as a heritage site and is protected by the *Underwater Cultural Heritage Act 2018*, which superseded the *Historic Shipwrecks Act*. In 1991, the vessel was located north of Channel Point by a group of divers and an archaeology student, Rob Williamson (NT News, 19 May 1991). Material from the wreck including a brass lantern was recovered for dating. Where this material is located is currently unknown to the author.

Cape Brogden Perahu (wrecked 1892)

Historical context: In early 1892, a perahu was wrecked south of Cape Brogden with all on board murdered upon reaching shore. Sub-customs collector Alfred Searcy wrote in his memoirs (1909:211) that the perahu was smaller than those of the Macassan trepangers and had possibly been blown down from the Aru Islands (Jung, 1992:12). Manggeripi's account to customs officer Robinson tells of how the perahu was burnt to hide the evidence, the crew being killed and buried near Wa Wu-I Billabong, and the crew's possessions, including boxes and krises, taken to another swamp (Jung, 1992:13).

Archaeology: There have been many contemporary reports of wrecked perahus across the Northern Territory prior to the end of the Macassan trepang industry in 1907 (Macknight, 1969b; Jung, 1992). These were compiled in a report to MAGNT by Silvano Jung in 1992, with a number of these now registered on the Australian National Shipwreck Database. The Cape Brogden Perahu is the only one of these that has coordinates. The kris and dagger recorded as having been taken from the crew ended up in Searcy's personal collection, and were donated to the Museum and Art Gallery of the Northern Territory in 2016 by his grandchildren (Searcy, 1909:ix) (Figure 7.95).



Figure 7.95 The kris (left) and dagger (right) collected by Alfred Searcy that complement his account of the Cape Brogden perahu (2016.012.004 and 2016.012.003. Searcy Collection. MAGNT)

***Calcutta* (wrecked 1894)**

Historical context: In search of fresh water en route between Saigon, China and New Caledonia, the barque *Calcutta* struck Sandy Reef at Vashon Head, Cobourg Peninsula on 10 August 1894 (NTTG, 1894). The cargo of rice was mostly destroyed with the vessel taking on 10 feet of water through its damaged hull. The *Calcutta* was soon abandoned, with provisions, water, the ship's fittings and riggings and some cargo transferred to shore. The steamship *SS Darwin* provided assistance, taking the crew to Palmerston.

Archaeology: The *Calcutta* was surveyed by Cosmos Coroneos (1996) as part of the Museum and Art Gallery of the Northern Territory's broader survey of maritime cultural resources of the northern Cobourg Peninsula.

***SS Australian* (wrecked 1906)**

Historical context: The *SS Australian* was a Sydney-based Eastern & Australian Steamship Company single screw steamer that serviced the coastal passenger, mail and freight service (Steinberg, 2001:3). Stops included Adelaide, Melbourne, Sydney, Brisbane, Townsville, Cairns, Cooktown, Thursday Island, Darwin, Timor, Manila (Philippines), Hong Kong, Fuzhou and Shanghai (China) and Moji, Kobe and Yokohama (Japan) (Australian National Shipwreck Database, 2019). It could hold over 100 passengers, and shipped mail; cargo such as coal, tin, copper ore, building materials, flour, cattle hides, salted fish and beef; refrigerated cargo (including frozen meats, dairy products and chilled fruit); pearl shell; tortoise shell; trepang; whiskey; racehorses and more. The *SS Australian* was also used as a Chinese immigration vessel and had a Chinese crew.

On 17 November 1906, SS *Australian* was steaming from Sydney to Palmerston when it ran aground on a reef at the tip of Vashon Head, Cobourg Peninsula (NTTG, 7 December 1906:2). As with the SS *Brisbane*, this close proximity to the coastline was due to the lack of navigation beacons in the region and unusually strong tidal currents which had pulled the ship off course; the captain of the SS *Australian* believed that had there been a lighthouse at Cape Don, the incident would not have occurred. Passengers and mail were soon transferred to the steamship *Waihoi*, with the officers and crew remaining on board a further 12 days to offload undamaged cargo and unsuccessfully attempt to refloat and salvage the vessel. After two years of various failed attempts to refloat the SS *Australian*, the internal fittings and fixtures were removed and sold at auction in Palmerston in August 1908. In the 1970s, salvors used explosives to remove the condenser of the engine (Steinberg, 2001:3).

Archaeology: The Australian National Shipwreck Database describes the *Australian* as the most intact wreck of a steamer in the Northern Territory with the potential to offer much archaeological information regarding the construction and machinery of late nineteenth century steamers. In 1990, a British-based organisation, Operation Raleigh, visited the site, followed by maritime archaeologists from the Museum and Art Gallery of the Northern Territory (MAGNT) in 1996 as part of a regional maritime archaeology survey (Steinberg, 2001:3–4). An extensive survey was conducted by MAGNT maritime archaeologists in 1997 (Figure 7.96) which led to a plan of management being produced for the wreck by Steinberg in 2001.

Quoted directly from Steinberg (2001:4), “The remains of the ship are best understood as consisting of three main sections. These are the bow, the mid-ship section which rests on the remains of the ship floor and the upright stern counter. Small amounts of debris are located at short distances from this main body of material, however in general these three sections constitute the shipwreck. The wreckage is approximately 110 metres in length and lies in 5-8 metres of water depending on tidal variation. The superstructure of the vessel has been removed by natural forces. The most noticeable features of the site are the bow, stern section, the boilers and machinery. The machinery includes a windlass, winches, a triple expansion engine, a dynamo and twin refrigeration units. In addition to machinery lower deck construction features are visible, for example remains of the cellular double bottom. Other visible site features include a clipper bow, bowsprit and anchor.”

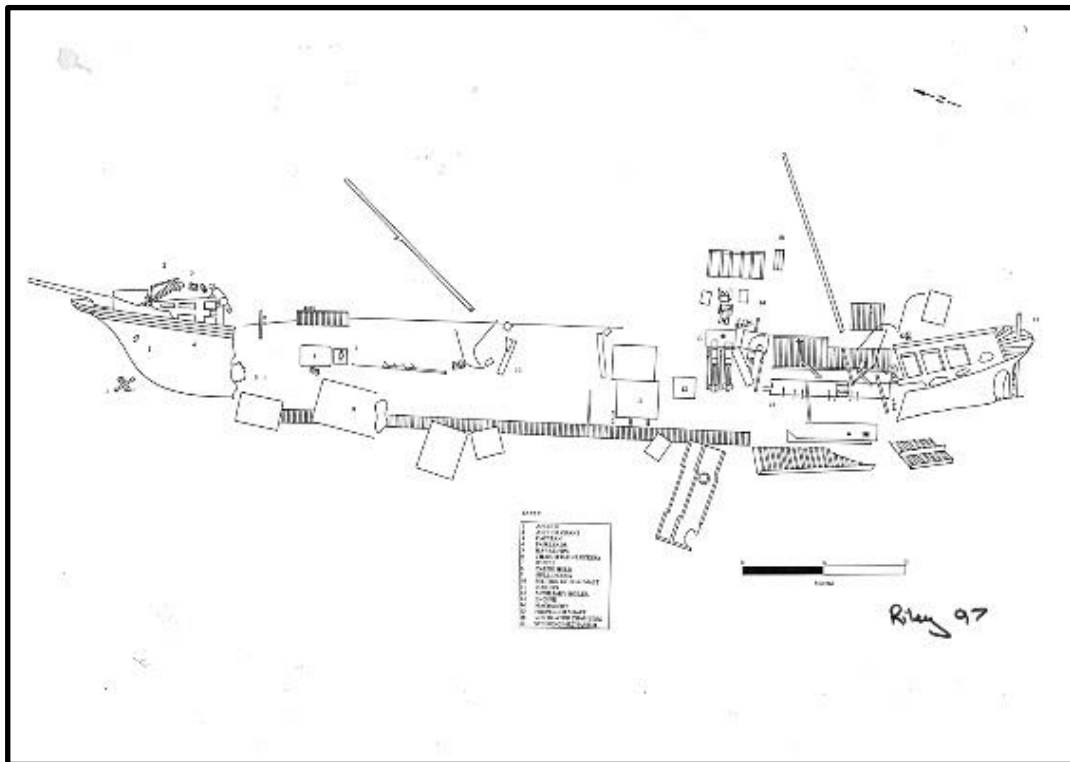


Figure 7.96 Site plan of the *Australian* shipwreck (Riley, 1997 from the Australasian Underwater Cultural Heritage Database)

7.5 Local and imported resources

As is evident through the selection of maritime and terrestrial activities discussed, the successful colonisation of the Northern Territory saw local resources utilised at a much greater level than those of the earlier British garrisons and the colony at Escape Cliffs. Initial colonisation, however, continued the reliance on Kupang for supplies and as a means to forward communication through the government cutter, *Flying Cloud* (28 tons) (South Australia. Office of the Government Resident, 1870–82:3). With the availability of fresh water and fertile soil, experimental gardens at Doctors Gully and Paperbark Swamp saw the growth of fruits and vegetables including banana, pineapple, coconut, tamarind, sugar cane and white mulberries (South Australia. Office of the Government Resident, 1870–82:1). This was followed by a number of Chinese gardens around the township that supplied the colony (Figure 7.97), complemented with local fish and game.

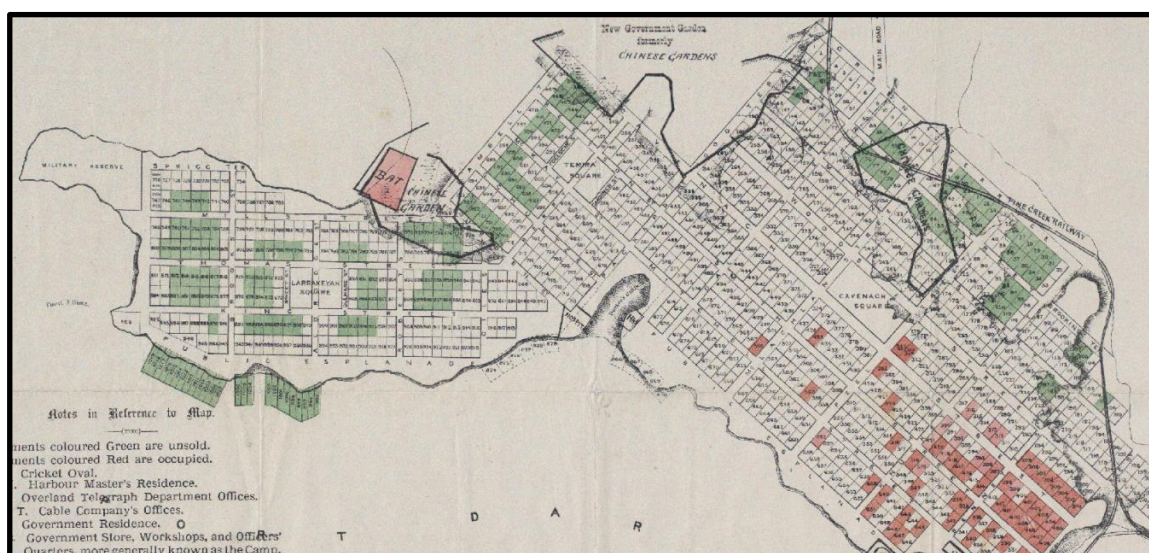


Figure 7.97 [Section of] *Township of Palmerston, on east side of Port Darwin, Hundred of Bagot* (Northern Territory Times and Gazette, 1887)

For local construction, cypress pine was logged throughout the region due to its resistance to white ants (NTTG, 15 January 1904:3; Searcy, 1909:161). Most resources extracted from the seas and land, however, were exported to the south or on to Singapore, Hong Kong and other colonies through the regular services of the Eastern and Australian Steamship Company and China Navigation Company (NTTG, 6 December 1895:2; Steinberg, 2001:3; Powell, 2010:148). This included tin, gold, salted fish, trepang, pearl, shell, hides and tropical productions (NTTG, 17 October, 1902:2; NTTG, 11 November 1904:3). Although not discussed in this thesis, cattle production that spanned much of the Northern Territory was also a major export to the southern colonies as well as Singapore and Java (Powell, 2010:173).

7.6 Overview of site locations

That the locations of both Escape Cliffs and Palmerston were within the regional position south of the Tiwi Islands reflects the inland focus of the South Australian government compared to that of the seaward focus of the British garrisons. With the intention of permanency, one would expect similar physical environments selected as the garrisons of elevated coastal land, deep sheltered bay for anchorage, fresh water and fertile soil, yet the first location of Escape Cliffs on a peninsula at Adam Bay did not reflect this. Although the site was located on elevated coastal land, the bay was turbulent due to the flow of water and sediments in and out of the Adelaide River. Fresh water was not available at the site proper, and fertile soil did not abound. That the site was also surrounded by extensive floodplains during the wet season diminished the potential to utilise the land. In this sense the lack of archaeology at Escape Cliffs (Gregory, 1998:1–3) is indicative of a failed colony, or surveyors' camp prior to the establishment of a colony proper.

Although nestled in behind the Tiwi Islands, the location of Palmerston near the mouth of Port Darwin—which in itself was located favourably close to the Timor Sea—allowed for an ease of access to shipping. As with the garrisons, the township of Palmerston exhibited the key physical features in being situated on elevated land adjacent to the coast, as well as having fresh water, fertile soil, and a deep sheltered bay for anchorage. Peel's Well at Doctors Gully watered both the inhabitants and the vegetable garden planted here, with wells also within township. Foreshore flats were less extensive in the immediate coastline of Palmerston, allowing ships to anchor closer in and therefore requiring less energy to move between ship and shore (Figure 7.98).

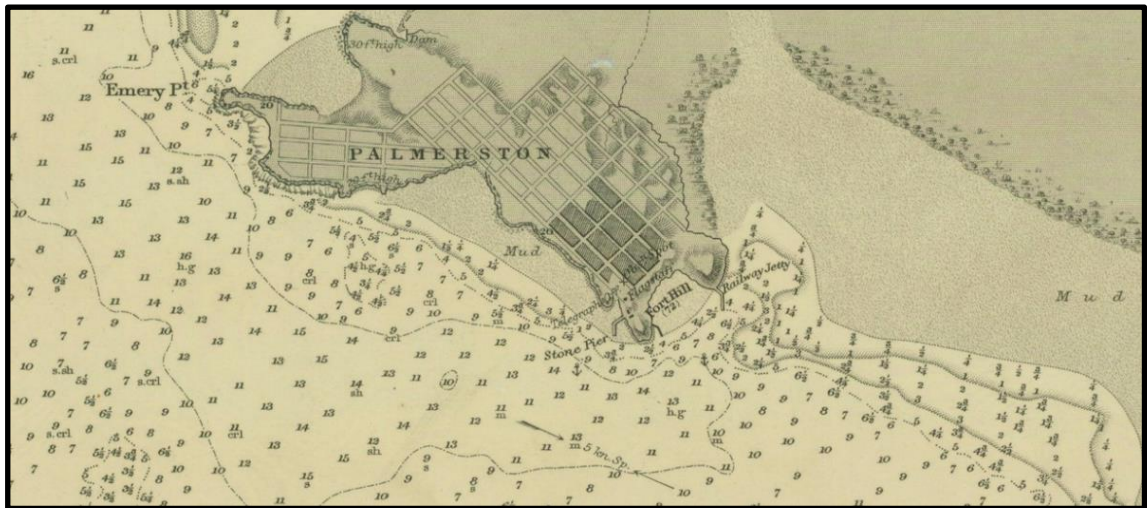


Figure 7.98 [Section of] *Australia - North coast, Port Darwin* showing pier, jetty and anchorage extending beyond mudflats (Great Britain. Hydrographic Department et al., 1886)

As Palmerston expanded in population, maritime and terrestrial activities including the construction of the overland and subsea telegraph cables, and the resource extraction of gold, tin, trepang, fish and pearl saw an expansion into coastal and estuarine environments. As a transit point for the Pine Creek goldfields, the location of Southport on elevated, (relatively) flat land at the junction of the Blackmore and Darwin Rivers served as the primary position for a river township, with the sandstone plateau of the Blackmore River providing an ideal place for landing; the township going into decline once the railway was constructed further east. The location of Hang Gong's Landing at West Arm, also on an elevated bank in a generally muddy and mangrove-lined channel, served as the primary transit point to the Bynoe Harbour tin mines, with smaller landings located up the numerous rivers and creeks that entered the mining region.

For the coastal sites, the Macassans continued to procure trepang from the sheltered shallow bays and archipelagos from the Cobourg Peninsula east to the Gulf of Carpentaria, yet from the 1870s, were joined by Anglo and other trepangers including Robinson and Cooper who reused Macassan stonelines or created new ones. These men were also involved in the buffalo hide industry that took advantage of growing buffalo populations within the vicinity of the British garrisons that had

imported them originally. As a customs officer at Port Essington, and later at Irgul Point, Robinson assisted in the decline of the Macassan trepang industry, with the locations of non-Macassan trepang processing sites throughout the region reflecting the shift from Macassan to non-Macassan trepanging.

While the trepang sites were located east of the Cobourg Peninsula, Chinese net-fishing locations were within a day's sail east or west from Palmerston depending on the season. These sites were on low-lying land with extensive foreshore flats. At Cliff Head, the elevated hinterland behind the beach served as a place of habitation. Mangroves within the littoral zone of Channel Point served as a buffer for the landing, yet to be confirmed as constructed during this time.

Excluding the *SS Ellengowan* that sank at its moorings and Cape Brogden Perahu that was blown off course, shipwreck sites are generally at locations of marine hazards. The *Young Australian* hit a submerged rock in the Roper River, with the wrecks of the *Australian*, *Calcutta* and *SS Brisbane* occurring on submerged reefs close to the coastline. The wreck of the *SS Brisbane* influenced the location of the Point Charles Beacon/Lighthouse on elevated coastal land near the northernmost point of Cox Peninsula just to the west of Port Darwin, and the Emery Point Lighthouse was located within Port Darwin on an elevated headland just north of Palmerston township to in response to the rise in maritime traffic within the harbour (Figure 7.99).

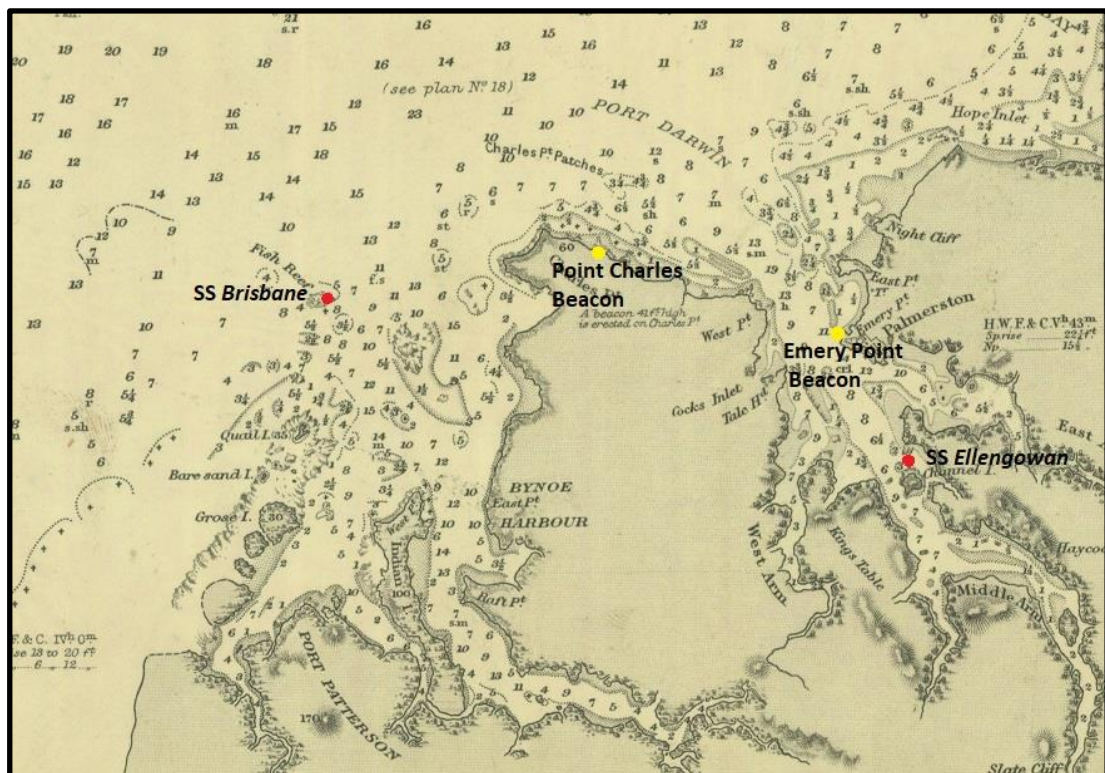


Figure 7.99 [Section of] *Australia - North Coast Melville Island, with Dundas and Clarence Straits* showing locations of *SS Brisbane* wreck of 1881 and Point Charles Beacon that was erected in the same year (Great Britain. Hydrographic Department, 1883)

7.7 Discussion

As the fourth historical development phase up to 1911, the marked contrast of the failed colony of Escape Cliffs compared to the permanent colony of Palmerston led to the former resembling that of the British garrison Fort Wellington; an ephemeral community awaiting relocation to a superior position. The permanent colonisation of Palmerston led to a number of maritime and terrestrial activities—and subsequent archaeology—that complement the research aims discussed in the following interpretive chapters (Table 7.1). Due to the broad nature of this research, it is acknowledged that these sites represent examples only, and do not cover the entirety of activities that occurred during this time.

These activities are visible through historical documents, previous archaeological research and listed heritage sites. Where archaeological research had not yet occurred—such as Chinese net-fishing, boat landings in the Bynoe Harbour tin mines, and the depot at Maria Island during the construction of the Overland Telegraph Line—fieldwork in the form of survey was undertaken by the author. Sites that showed no archaeological signature, along with other activities with no supporting archaeological research, were included for their contribution to the maritime landscapes in which they took place, along with their potential for future research.

Despite their minority, the British—and after federation of the Australian colonies in 1901, Australians—slowly altered the maritime cultural landscape of the Northern Territory to suit the broader racial ideals of a predominantly white Australia. Although the introduction of Chinese indentured labour was initially encouraged by the South Australian Government, Chinese immigration dramatically decreased from its peak of over 7,000 in 1888 to 442 out of a total settler population of 1,387 in 1911 (Martinez, 2015:243). When South Australia handed the Northern Territory over to the Commonwealth, however, the Chinese were still the majority in Palmerston, with the Japanese, Filipino and Malay communities also remaining and continuing well-established industries including net-fishing, pearling, trepanging, and the importation of maritime products (Stephenson, 2007:61). Although many Chinese were now Australian-born, links with their homelands and heritage remained strong, thus continuing the connection with maritime Southeast Asia and further afield to China (Martinez, 2015:243).

The most significant change in the maritime cultural landscape just prior to 1911 was the active abolishment of the Macassan trepang industry. The long-standing connections between the Macassans of maritime Southeast Asia and coastal and island First Nations communities between the Cobourg Peninsula and Sir Edward Pellew Group were severed. During this time, commercial relationships with maritime Southeast Asia dissipated, the British once again turning their gaze inland to the ideology of a unified white Australia where such an industry with our northern

neighbours would seem "... unexpected, perhaps unwelcome, and certainly as exotic and unfamiliar." (Macknight, 1969b:ix)

In the following chapters, the maritime and terrestrial activities and related sites of the British colonies will be compiled with those of early European survey, the Macassan trepang industry and British garrisons to provide an interpretation of the overall historical development of the Northern Territory's maritime communities.

Table 7.1 Summary of maritime and terrestrial activities

Maritime/terrestrial activities	Related sites	Physical environment	Archaeological attributes
Initial colonisation and land survey	Town plans for Palmerston and Southport	Inner bay River	Extant physical layout of townships
Overland and subsea telegraph cables	Section of subsea telegraph cable	Bay	Subsea cables
Port Darwin maritime infrastructure	Stokes Hill and Fort Hill jetties	Bay	n/a
	Point Charles Beacon/Lighthouse	Bay mouth	Footings of lighthouse keepers' cottages
	Emery Point Lighthouse	Bay	n/a
Maritime industries	Trepang industry post-1869 (100+ sites between Cobourg Peninsula and Sir Edward Pellew Group)	Bays Archipelagos	Stonelines, artefact scatters (3 non-Macassan sites; 30 re-use of Macassan sites; 6 undiagnosed sites)
	Net fishing (Anson Bay to Chambers Bay)	Bays	n/a
Terrestrial industries	Southport jetty	River	Steel beams, artefact scatter
	Hang Gong's Landing	Estuary	High and medium tide landing remains; wheel; portable steam engine
	Coburg Cattle Company	Bay	n/a
	Revenue station	Coast	Rectangular concrete floor; stoneline
	Fort Wellington buffalo camp	Bay	Boat landing; cisterns
Customs and quarantine	<i>SS Ellengowan wreck</i> (below)	Open coast	wreck

	Revenue station (above) Macassan sites	Bays River	
Shipwreck events	<i>Young Australian</i> (wrecked 1872)	River	wreck
	<i>SS Brisbane</i> (wrecked 1881)	Bay mouth Reef	wreck
	<i>SS Ellengowan</i> (wrecked 1881/1888)	Bay	wreck
	Cape Brogden Perahu (wrecked 1892)	Coast	wreck
	<i>Calcutta</i> (wrecked 1894)	Bay mouth Reef	wreck
	<i>SS Australian</i> (1906)	Bay mouth Reef	wreck

Chapter 8 – Adapting to the maritime landscape

8.1. Introduction

Significant in interpreting the historical development of the Northern Territory are the ways in which the early European surveyors, Macassan trepangers, and the British garrisons and colonies—all visitors to First Nations lands and seas—adapted to the immediate and broader maritime landscapes. Historical and archaeological indicators of adaptation for each group entering this region include recording the coastline on navigational charts, the locations selected for occupation, and the development of maritime infrastructure (or lack thereof) to move through the physical environment and access resources.

Through the selection of archaeological sites and related histories of the four historical phases, this chapter seeks to interpret how each group adapted to the maritime landscape over time based on their intentions (i.e., political, economic, social) and subsequent experiences that shaped it over time. Touched on throughout the chapter are the interactions between each of these groups and the First Nations custodians that assisted or hampered their interests. The primary focus of this chapter, however, is on the interactions of each group with the physical environment; with interactions between groups discussed further in Chapter Nine, *Shared landscapes*.

8.2 Charting the landscape

For the Dutch, French and British surveyors, adaptation to the maritime landscape was about navigating and charting previously uncharted waters without becoming a part of the landscape through shipwreck, which in this section of the coastline they fortunately achieved. This was a significant feat considering the marine hazards of reefs and shoals littering much of the coastline, coupled with the high tidal range and strong currents in the low-lying maritime region. The Dutch wrecking events along the west Australian coastline of the *Batavia* (1629) *Vergulde Draeck* (1656), *Zuytdorp* (1712) and *Zeewyck* (1727) illustrated the necessity of charting the coastline (Powell, 2010:13–4). This is evidenced in *Chart of the Malay Archipelago and the Dutch discoveries in Australia* (1618) (Figure 8.1) and successive charts that progressively placed Australia on the map.



Figure 8.1 *Chart of the Malay Archipelago and the Dutch discoveries in Australia* (Gerritsz and Heeres, 1618)

Representing the earliest European interpretations of the north Australian coastline, charts show adaptation from the unknown to the known through the tracing the coastlines of the mainland and island onto paper. As navigational aids and methods of surveying developed over time, further information was provided by the surveyor to assist in future safe and efficient travel. As is visible in Flinders' chart *North west side of the Gulf of Carpentaria* (Figure 8.2), this included travel routes of the ship and the regular intervals of soundings (water depth), anchorage points and the geology of the seabed (such as mud, shoal, rocky), time of travel (day, month, year) and the seasonal wind directions, strength and associated weather conditions (such as fine, cloudy, hazy), marine hazards including strong rippings, currents, shoals, rock outcrops and reefs, and the

geology and topography of the coastal regions including geographical markers such as hills. Journals that complemented these charts provided further detail that included day-to-day observations including weather events such as cyclones (Stokes, 1846b:98) and interactions with First Nations peoples (discussed in Chapter 9).



Figure 8.2 [Section of] *North west side of the Gulf of Carpentaria* (Flinders, 1814) showing transport route, soundings, marine hazards, anchorages, wind directions, date, topographic descriptions and place names.

Most significant in European adaptation to the foreign landscape, however, are the place names given to topographic and maritime features during the survey voyages (Figure 8.3) (Table 8.1). Seventeenth century Dutch place names of Nova Hollandia reflect the ships that sailed in these waters (*Arnhem*, *Wessel* and *Limmen*), geographic features (Groote Eylandt, meaning ‘Big Island’), animals (Crocodile Islands) and their Admiralty (Maria Island, Cape Vanderlin, Van Diemen Gulf). Adding to these, French place names reflected the French Admiralty (Joseph Bonaparte Gulf) and prominent scientists (Peron Islands and Cape Fourcroy). As discussed in Chapter Four, the British extended place names beyond the Admiralty to personal friends, battles, distinctive topographic features and events (Friendly, 1977:252 in Hordern, 2002:110). Interactions with the Macassans were represented with positive place names, however the surveyors neglected to transcribe First Nations place names, only referencing interactions negatively with names such as Escape Cliffs and Treachery Bay. Although Dutch and French place names remained after British colonisation, the majority of the northern coastline appeared to be distinctively British. As a precursor to colonisation (Battersby, 2007:7; Tent & Slatyer, 2009:9), the charting by Flinders, King, and Wickham and Stokes provided the means of an

increasing presence of the British in this region, along with the survey of Timor by Flinders (1814) and the islands within the eastern archipelago by Stanley (Stokes, 1846a).

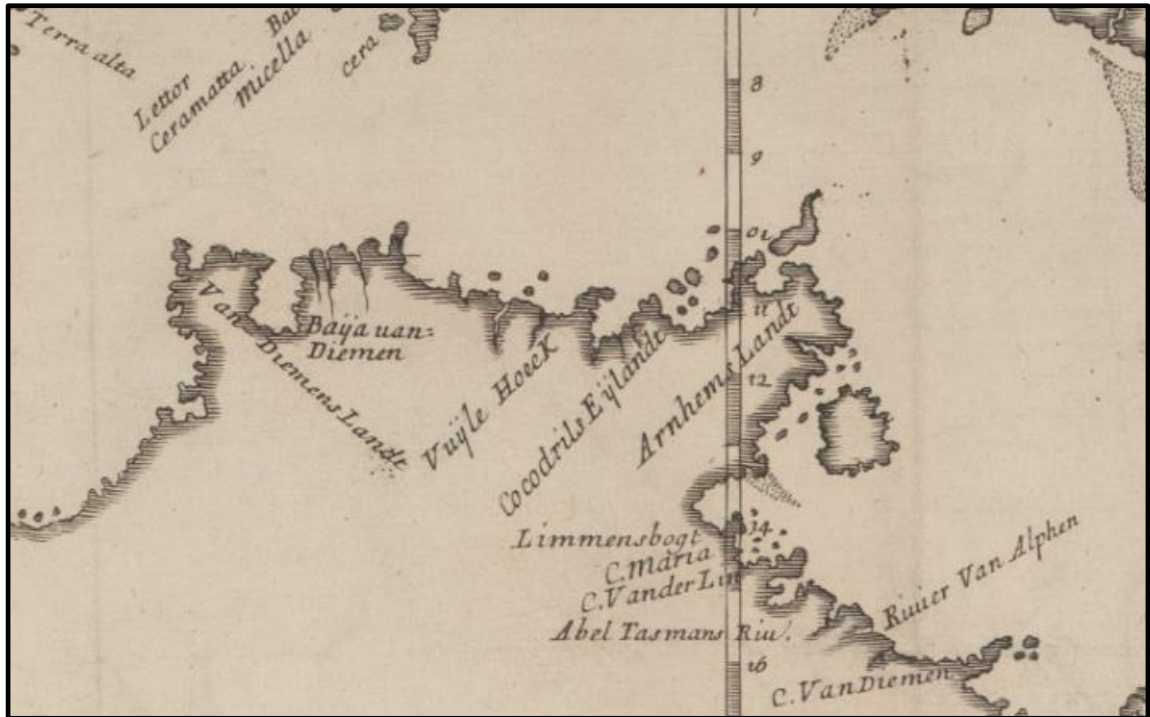


Figure 8.3 [Section of] *Hollandia Nova detecta 1644; Terre Australe decouverte l'an 1644* (Thévenot, 1644)

Table 8.1 Methods of adaptation for early European surveyors

Maritime/terrestrial activities:	Survey/charting the coastline
Physical environments:	Seas, bays, rivers
Archaeological sites/features/artefacts:	N/A
Methods of adaptation:	<ul style="list-style-type: none"> • Charts informed of shipping routes, water depths, marine hazards, topographic features, wind directions, safe anchorages, etc. • European place names for maritime and topographic features • Smaller vessels accessed coastlines and rivers

8.3 Macassan site selection based on marine resources

For the Macassans, place names also assisted in adapting to the coastline, with *Marege* or ‘Wild country’ given to the trepanging grounds of the Northern Territory. Their primary purpose of procuring trepang and trading with First Nations peoples at a number of locations between

Cobourgh Peninsula and the Gulf of Carpentaria, however, saw a very different means of adapting to the maritime landscape based on site selection. Here, the trepang habitat of shallow, sheltered bays and archipelagos (of which the Northern Territory had many) were sought adjacent to a beach/hinterland area in which to set up a temporary trepang processing station. As is visible from British lithographs and paintings, perahus anchored in these bays. Supplies of food and water were obtained from the islands en route to Marege for the season, carried on the perahus along with dugout canoes, trypots and bamboo structures to procure and process the trepang. Of the consumables, the seeds of the tamarind led to tamarind trees growing at trepang processing sites. Where water ran short, this was obtained from wells along the coastline. Stone was also sourced locally for the permanent hearths (stonelines) to place the trypots; of which were reused annually. From the gazetting of over 100 sites by Macknight (1969b:110–97), Baker (1984), Cole (1984), Taçon (1988, 1989), the four key factors that influenced site selection were:

- a beach/hinterland sheltered from the northwest monsoon at the beginning of the trepanging season and southeast monsoon as the wet season turns to the dry, with most sites receiving some shelter from either monsoon;
- proximity to shallow, resource-rich waters to procure trepang;
- an adequate supply of firewood (such as mangroves); and
- for the site to be isolated or to have clear approaches.

In view of these factors, Macknight states that “it is now relatively simple to predict from aerial photographs or a detailed map where archaeological remains are to be expected”. Based on the locations of the larger trepang processing sites of Anuru Bay and those between Chasm Island and North Point Island that share all of the above features for a functional and safe site—along with the plethora of smaller sites along the coastline—it is clear that the Northern Territory coastline offered a suitable supply of resources and adequate environmental conditions for the Macassans to undertake trepang fishing in this region (Macknight, 1969b:84) (Table 8.2).

Table 8.2 Methods of adaptation for the Macassan trepang industry

Maritime/terrestrial activities:	Procuring trepang, trade
Physical environments:	Bay, archipelago, island, open coast; sheltered beach/ hinterland
Archaeological sites/features/artefacts:	Stonelines; smokehouse depressions; tamarind trees; wells; burials; diagnostic glass/ceramic; shell middens; utilised glass
Methods of adaptation:	<ul style="list-style-type: none"> • beach/hinterland sheltered from the northwest monsoon at the beginning of the trepanging season and southeast monsoon as the wet season turns to the dry, with most sites receiving some shelter from either monsoon • Close proximity to shallow, resource-rich waters to procure trepang • Adequate supply of firewood (such as mangroves) for fires to boil trepang • Site to be isolated or to have clear approaches for safety

8.4 British garrisons looking to the sea

The selection of Melville Island for occupation by the British garrison from 1824 to 1829 was for its proximity to maritime Southeast Asia was geopolitical more than economic, a defensive strategy to deter Dutch or French colonisation. Site selection shifted to incorporate economic interests with the succeeding garrisons, being on the Macassan transport route at Raffles Bay and Port Essington. With their focus on potential threats of competitive colonisers from the sea rather than for the regions' resources, the British struggled to adapt to their maritime and terrestrial landscapes, with a deficiency in subsistence from both imported supplies from Kupang and Port Jackson and local resources, as well as long delays in communication with the British colonies. This is less evident in the archaeological record compared to its historical counterpart, yet the physical environment of their immediate locations, along with the sparsity of the archaeological sites, indicate a short-term presence primarily of defence (Table 8.3).

Table 8.3 Methods of adaptation for the British garrisons

Maritime/terrestrial activities:	Deter Dutch/French colonisation, trade, place of refuge
Physical environments:	Strait, bay, inner bay, elevated coastal land, bay mouth (beacon)
Archaeological sites/features/artefacts:	Fort, gun battery, habitation structures, wharf/jetty (excluding Fort Wellington), well, burial, diagnostic glass/ceramic/metal
Methods of adaptation:	<ul style="list-style-type: none"> • Locations on elevated coastal land with fresh water from wells, and relatively fertile soil to grow vegetables/fruit • Sheltered anchorages; more so at Fort Dundas and Victoria • Imported resources from Kupang (Fort Dundas/Fort Wellington) • Expansion of resource availability from eastern archipelago through survey (Victoria) • Change in construction methods to suit monsoonal climate (Victoria) • Construction of satellite convalescent structures (Victoria) • Construction of Smith Point Beacon at bay entrance (Victoria)

For Fort Dundas, the location of the site deep within the Apsley Strait of Melville Island and far from shipping routes (including the Macassan transport route) led to an occupation of isolation. The early loss of the *Lady Nelson* and *Stedcombe* and most of the crew through piracy in the eastern archipelago in 1825 exacerbated this (Table 8.4), with the continual defence of the Tiwi warriors against the British invaders restricting their movements from within. Despite the construction of habitation sites and a jetty, adaptation ultimately came three years later with the creation of the second garrison of Fort Wellington at Raffles Bay to which the remaining inhabitants were eventually transferred in 1829.

Table 8.4 Methods of adaptation for the British garrison's procurement of supplies

Maritime/terrestrial activities:	Piracy/wrecking event
Physical environments:	Islands within eastern archipelago
Archaeological sites/features/artefacts:	<i>Lady Nelson</i> and <i>Stedcombe</i> cannons
Methods of adaptation:	<ul style="list-style-type: none"> • Restricted transport movement to Kupang for supplies and communication to avoid further risk of piracy (Fort Dundas, Fort Wellington)

At Fort Wellington, the British succeeded in persuading the Macassans to set up their trepang processing station on the garrison foreshore in an attempt to begin a trading relationship. Although supplies were again imported from Port Jackson and Kupang, accounts of a successful vegetable garden showed signs of adapting to tropical horticulture. The eventual development of

relationships between British and First Nations people at Fort Wellington, followed by Victoria, saw local resources obtained through trade (Allen, 1973:54; Powell, 2009:47). With the use of firearms, First Nations people provided the British with local meat that contributed to a local diet of kangaroo, wallaby, bandicoot, lizard, birds, fish, dugong and crab (Allen and Corris, 1977:140; Allen, 2008:125).

Although present, archaeological evidence is small for local subsistence, although the use of local materials for construction is prominent at all garrisons. This is visible with locally-quarried stone and coral used at all sites in building foundations, walls, terraces, paths; and sawpits to fashion local timbers (Crosby, 1975:8; Frederickson and De La Rue, 2013:11–21; Allen, 2008). It is interesting to note that Fort Dundas and Victoria had jetties constructed, yet not Fort Wellington where the extensive foreshore flats inhibited movement from ship to shore except at high tide. This lack of maritime infrastructure, despite the intentions of the garrison to trade, contributes to the historical narrative of its ephemeral presence and the possibility of relocation to Port Essington that inevitably led to abandonment in 1829.

At Victoria, adapting construction methods to complement the local environment is most evident. After the 1839 cyclone destroyed many of the prefabricated and locally-built structures, building methods were altered to better withstand a similar catastrophic event (Allen, 1973:49). Here, a sawpit was cut into a cliff face to enable the production of battens and planking for the buildings, and the blacksmith made nails, mason's tools and ironwork for the buildings. Over time, the construction of satellite sites at Victoria highlighted the need for convalescent stations where fresh sea breezes assisted the rehabilitation of those suffering from malaria and other tropical infections and diseases; the extant graveyard of the site attesting to the high death rate within the later years of the garrison.

8.5 British colonies looking inland

As with Fort Wellington, the short duration and ephemeral nature of the first colony at Escape Cliffs, founded in 1864, is reflected in its lack of archaeological material. Escape Cliffs was similar to Fort Wellington in its initial poor leadership, yet differed in its maritime and terrestrial environments through being ill-suited to its purpose to support cultivation and livestock. Adaptation in selecting a site for this purpose may therefore be viewed as a backward step through Governor Finnis failing to select a location with the basic physical requirements for a colony of landholders. This is evident in Figure 8.4 with the location of Escape Cliffs on the coast fronted with extensive foreshore flats that hindered movement between ship and shore. Within the adjacent bay, moving sandbars and other marine hazards contributed to the inaccessibility of the

site, with the seasonal floodplains to the south and east rendering the region unsuitable for cultivation.

For resources, minor successes were had with imported tropical fruit and vegetables produced locally, yet this was unable to sustain the population (Webbing, 1995:ix). Not learning from the previous failures of the garrisons (Watson, 1923:665), the importation of 120 sheep from Adelaide in 1866 saw 50 ovine deaths shortly after arrival due to their unsuitability to the tropics (The Wallaroo Times and Mining Journal [Port Wallaroo, SA], 17 February 1866:5). Despite the availability of local game and cabbage palm further inland, the lack of fresh foodstuffs and clean water led to prevalent acute and chronic illness (Webbing, 1995:ix), with the southern colonies and Kupang once again relied upon for subsistence.

The selection of Palmerston's location at Port Darwin in 1869 was, in itself, the best example of adaptation the British had made in the region to date. As with the selection of Melville Island over Port Essington in the past, previous recommendations to colonise Port Darwin were ignored for the unsuitable site of Escape Cliffs (Powell, 2010:116–21). The extensive surveys westward from Escape Cliffs confirmed this, with maps showing the region of Port Darwin to be a comparatively superior landscape for landholders (Figures 8.5 and 8.6).

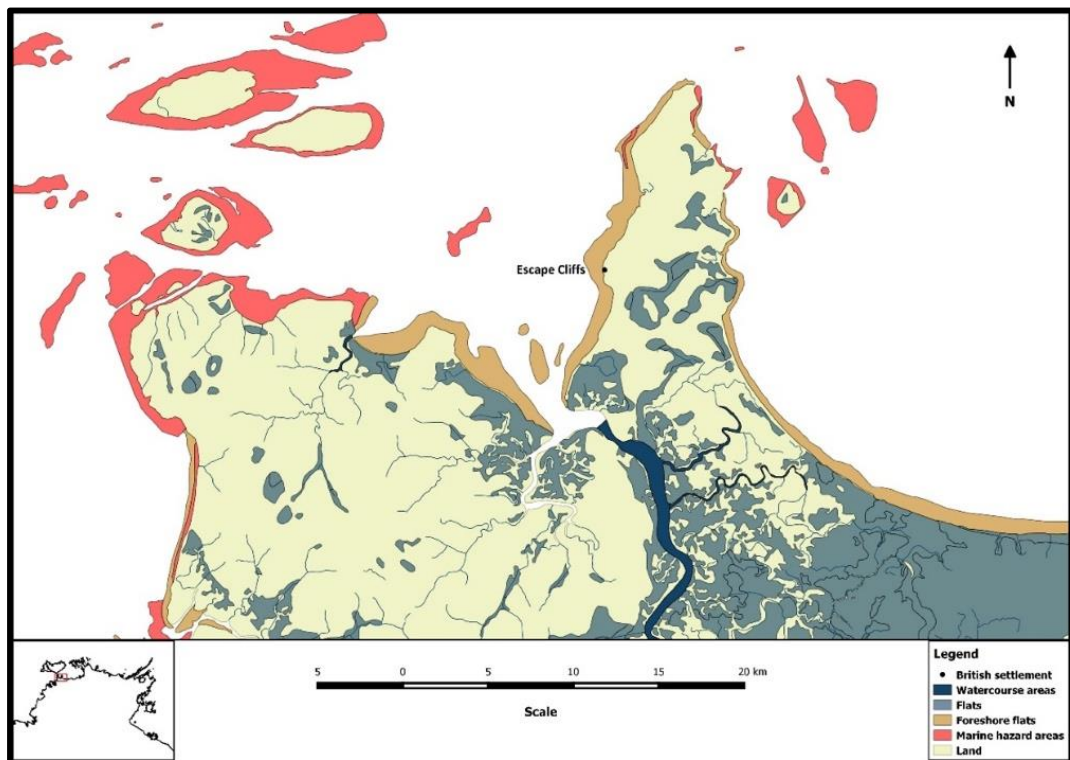


Figure 8.4 Map of Escape Cliffs located on a peninsula seasonally cut off from the mainland. The Adelaide River becomes part of the seasonal floodplains to the south and east, with extensive foreshore flats in Adam Bay from the movement of silt from the river.

Goyder's surveys of the surrounding low relief landscape to the east and south of Palmerston showed predominantly lightly undulating open forest intersected with rivers and creeks. Here, Goyder avoided allotting land on low-lying floodplain regions; a task Finnis had previously failed to do when surveying east of the Adelaide River. This is evident in the *General plan showing natural features of the country, towns, reserves, roads and sectional lands at, and in the vicinity of Port Darwin Northern Territory of South Australia* (Figure 8.6) where the low-lying lands of the Cox Peninsula to the east and Adelaide River region to west remain blank (Table 8.5).

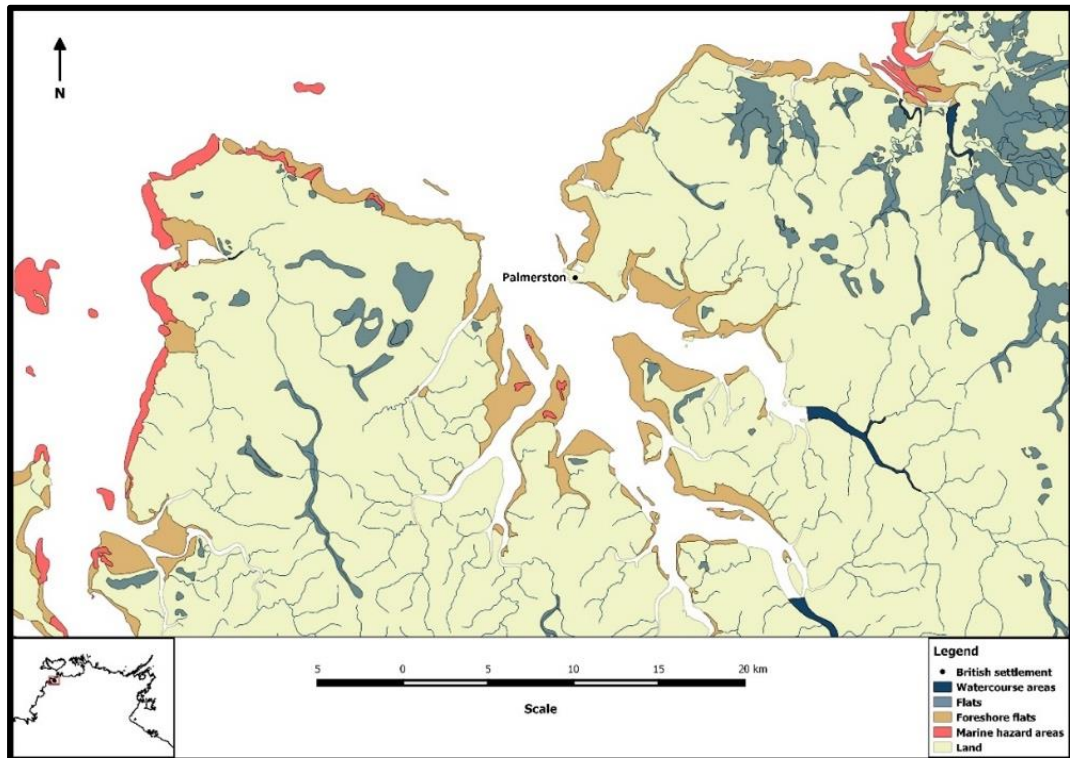


Figure 8.5 Map of Port Darwin and Port Patterson to the left showing land much less affected by seasonal flooding, yet well-watered with numerous rivers and creeks.

Table 8.5 Methods of adaptation for British initial colonisation and land survey

Maritime/terrestrial activities:	Initial colonisation and land survey
Physical environments:	Peninsula/bay, elevated coastal land
Archaeological sites/features/artefacts:	Escape Cliffs site (see Chapter 7), town plans of Palmerston and Southport, Peel's Well
Methods of adaptation:	<ul style="list-style-type: none"> • Escape Cliffs located on elevated coastal land, yet surrounded by wetlands and turbulent bay (poor adaptation) • Palmerston located on low plateau on the eastern side of Port Darwin • Southport located at the junction of the Darwin and Blackmore River



Figure 8.6 *General plan...of Port Darwin Northern Territory of South Australia* showing allotted land with proposed townships marked purple. The vacant land to the northeast considered uninhabitable by the surveys is the Adelaide River and Escape Cliffs (South Australia. Surveyor-General's Office, 1872)

The growth of Palmerston as a capital and the development of the region as a whole was dependent on adapting to both the coastal and inland maritime environments. Securing Palmerston's location as the conduit for communication between the southern colonies and the wider world, the construction of the northern end of the Overland Telegraph Line and subsea telegraph cables to Java between 1870 and 1872 best exemplifies this through utilising the seas

and rivers as a transport routes to avoid traversing the hot and flooded landscape during the wet season (Powell, 2009:67–9); the wreck of the *Young Australian* up the Roper River representing the outcome of this activity (Table 8.6).

Table 8.6 Methods of adaptation for Overland and subsea telegraph cables

Maritime/terrestrial activities:	Overland and subsea telegraph cables
Physical environments:	Bay, land, river
Archaeological sites/features/artefacts:	Section of subsea telegraph cable Wreck: <i>Young Australian</i> Maria Island Depot: N/A
Methods of adaptation:	<ul style="list-style-type: none"> • Seas/river utilised to transport stores and workers to Overland Telegraph Line during construction • River surveyed prior to use as transport route, vessel size suited to rivers, <i>Young Australian</i> tugging larger vessels • Maria Island Depot for transferring Overland Telegraph Line construction material and as a convalescent site for unwell construction workers

Adaption to the high tidal range of the rivers and seas of the Northern Territory through the construction of maritime infrastructure, however, took time, as is evident in the initial ill-designed jetties of Port Darwin and Southport. The first substantial jetty at Palmerston was not built until 1886 (Powell, 2010:144). This was despite the increased shipping between the southern colonies, maritime Southeast Asia and beyond that linked Port Darwin with the broader networks, along with the increase in the population of Palmerston through the importation of Chinese indentured labourers from Singapore and Hong Kong. By 1897, teredo worm and a cyclone event contributed to its demise (Figure 8.7). After this, a temporary wharf was constructed prior to the completion of the second railway jetty in 1902 (Figures 8.8 and 8.9). Despite improvements through the use of concrete-filled cast iron piers and steel braces, its L-shape design required a rail turntable, impeding the manoeuvre of goods from ship to shore.



Figure 8.7 Collapsed jetty, Stokes Hill, Port Darwin, Palmerston. 1890 (Bleeser, 1890)

Figure 8.8 1901. Darwin (SLSA, B 1154)



Figure 8.9 *Jetty, Port Darwin. 1904 (SLSA, B 9434)*

The consecutive jetties at Southport (built circa 1870 and 1873) were flush to the elevated landing at five metres above the riverbed, rendering them accessible only at high tide (NTTG, 14 November 1873:3) (Figure 8.10). Complaints led to the construction of a lower landing for medium tide, yet constant repairs were required due to the fast rate of deterioration of the wooden structure. Adaptation was thus fast in the initial construction of the jetty to assist with the movement of workers and supplies to the Pine Creek gold fields, yet slow in its design to match the tides and material type to survive the tropical environment. Meanwhile, the construction of the railway jetty at Palmerston and railway from this point to Pine Creek in 1889 provided a more efficient means of transport over land (Powell. 2009:74). The jetty was removed sometime after the sharp decline of Blackmore River as a transport route and Southport as a river township after the railway rendered them redundant. This is reflected in the jetty's almost complete absence from the archaeological record.



Figure 8.10 *The Gulnare at Southport, 1871 (Samuel White Smith)*

Built in 1908, the design of Hang Gong's Landing at West Arm best exemplifies adaptation through the use of resistant cypress pine logs in its construction and its design of high and medium tide platforms to match the tides (Figures 8.11 and 8.12). That the landing is still partially extant today testifies, in part, to successful adaptation through the use of local materials suited to the environment.

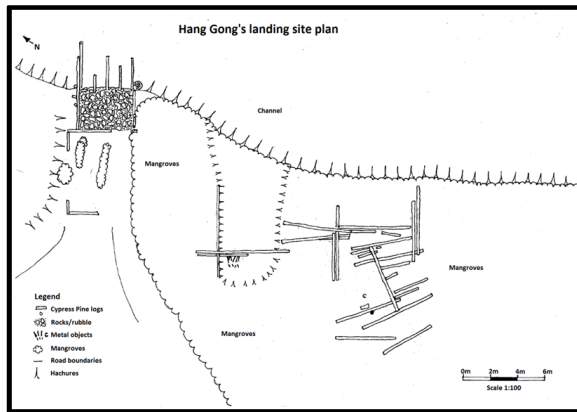


Figure 8.11 Hang Gong's Landing site plan (mapped and drawn by author)

Figure 8.12 Western side of Hang Gong's Landing facing northeast and east

Further afield in the low-lying coastal region of Anson Bay where net-fishing took place, the design of the extant stone causeway at Channel Point reflects its possible use for by the flat-hulled Sampans frequenting the region (Figure 8.13). Not requiring deeper anchorages due to their flat-hull design, sampans were generally beached when not in use (Figure 8.14). Landing at high or medium tide, the hull of the vessel would have rested directly on the landing when the tide receded. The mangroves either side of the landing (if they were there in the early 1900s) would have provided shelter for the vessels (Table 8.7).



Figure 8.13 Sandstone rocks laid down to create a boat landing cut into mangroves (facing south)

Figure 8.14 Beached sampan with fishing nets, 1910 (Gilruth Collection, Library & Archives NT, PH0190/0027)

Table 8.7 Methods of adaptation for maritime infrastructure (landing sites)

Maritime/terrestrial activities:	Landing sites
Physical environments:	Bay, river, estuary
Archaeological sites/ features/artefacts:	Stokes Hill jetties: N/A Southport Jetty: (location only) metal beams, artefact scatter Hang Gong's Landing: extant cypress pine logs, rock, wheel, portable steam engine Channel Point Landing: rocks laid out
Methods of adaptation:	<ul style="list-style-type: none"> • Stokes Hill jetties: poor timber quality (lightering system from 1869–86, Gulnare Jetty 1874–92, railway jetty 1886–98, lightering system from 1897–1902, temporary jetty 1898–1904) • Southport: ease of access to mining region compared to land travel, poor timber quality, jetty too high • Hang Gong's Landing: high and mid-tide landings, cypress pine timbers resistant to white ants • Channel Point landing suited to flat-hulled sampans

As with the jetties and landings, maritime safety infrastructure was also late to come to the Northern Territory. The first beacon was built at Point Charles in 1881 in response to the SS *Brisbane* wreck at Fish Reef to the northwest (Steinberg, 2005a:23) (Figure 8.15). Adaptation thus came as hindsight for the government despite previous complaints from mariners as to the dangers of the Northern Territory's coastal waters (NTTG, 26 November 1881:2). The location of the beacon at Point Charles and its height of at least 50 feet allowed for the beacon light to be visible to mariners from 12 miles west past the marine hazards of Fish Reef and Quail and Gose Islands to the southwest, and to the north and east for ships entering Port Darwin (NTTG, 29 October 1881:3). The replacement of the beacon with Point Charles Lighthouse in 1893 emphasised its necessity as the maritime presence expanded in Port Darwin.

The construction of the Emery Point Beacon at Palmerston in 1900 was in response to continued pressure from mariners as maritime activities such as pearling, fishing, and trepanging increased, along with terrestrial activities that relied on the rivers and coastal waters as transport routes. Further recommendations for lighthouses at Cape Don on the Cobourg Peninsula and Cape Fourcroy on Bathurst Island were not acted on until 1917 and 1935 respectively. The permanent stranding of the SS *Australian* off Vashon Head in 1906—along with the previous wreckings of the *Calcutta* (1894) and *Orontes* (1839) in the same area—rendered the Cobourg Peninsula once again a priority for maritime safety (Steinberg, 2001). Overall, the number of recorded shipwrecks between 1864 and 1911 seems low compared to what they could have been with the lack of

maritime safety infrastructure. This may be attributed to the continual updating of charts, and/or the small number of ships in these waters (Table 8.8).

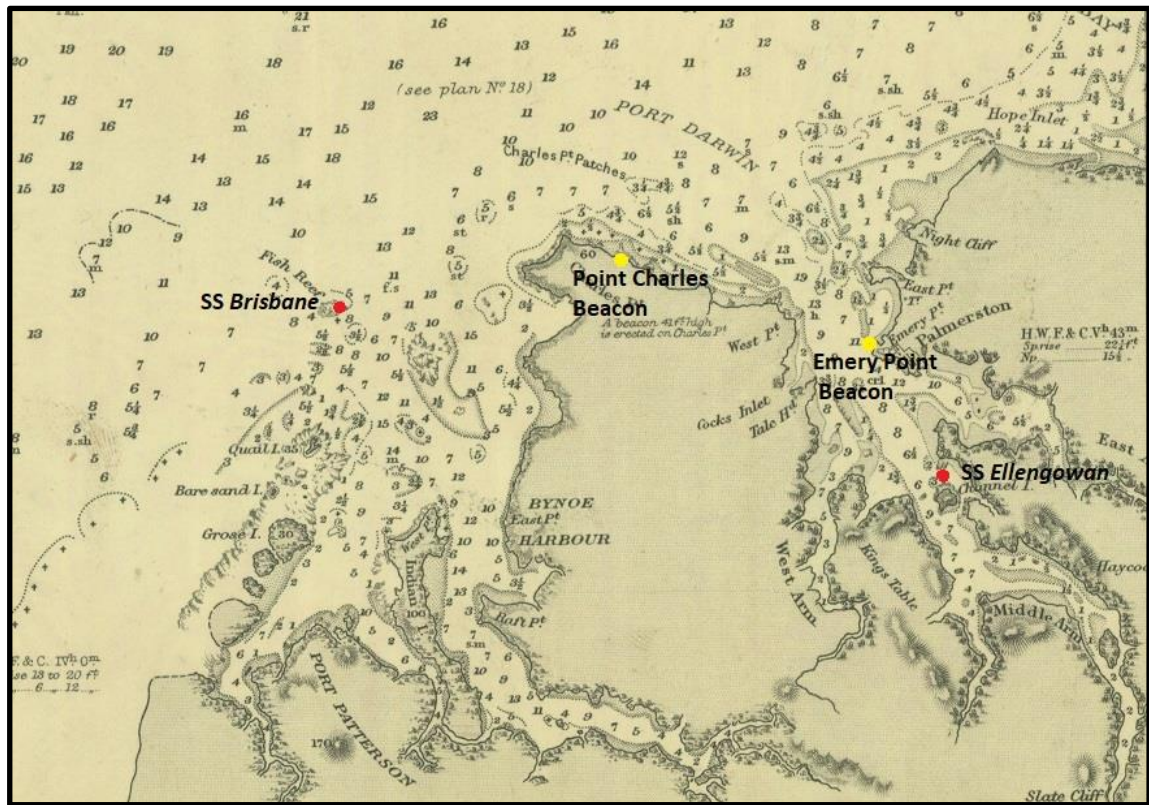


Figure 8.15 [Section of] *Australia - North Coast Melville Island, with Dundas and Clarence Straits* showing locations of SS Brisbane wreck of 1881 and Point Charles Beacon that was erected in the same year (Great Britain. Hydrographic Department, 1883)

Table 8.8 Methods of adaptation for maritime safety infrastructure/shipwreck

Maritime/terrestrial activities:	Maritime safety infrastructure (beacon/lighthouse)/shipwreck
Physical environments:	Open coast, bay, reef (marine hazard)
Archaeological sites/features/artefacts:	Point Charles Lighthouse keepers' cottages: footings Emery Point Beacon: N/A Wrecks: SS <i>Brisbane</i> (associated with Point Charles Beacon), <i>Calcutta</i> , SS <i>Australian</i> (Cobourg Peninsula)
Methods of adaptation:	<ul style="list-style-type: none"> • Point Charles Beacon built 1881 after SS <i>Brisbane</i> shipwreck • Emery Point Beacon built 1900 after further complaints from captains • Assist navigation and avoidance of marine hazards

From the 1880s, customs and quarantine managed the taxation of imported and exported goods as well as imported diseases, while simultaneously segregating the community to the advantage of the whites. The rise of a predominantly Chinese population through indentured 'coolie' labour

coincided with the smallpox epidemic of the 1880s. In managing this, quarantine areas were designated within Port Darwin including the use of the older unseaworthy vessel *SS Ellengowan* as a quarantine hulk. Having sunk at its mooring just north of Channel Island in 1888, the wreck of the *SS Ellengowan* contributes to the physical fabric of the segregation of Chinese and First Nations peoples, with white people isolating within the township.

In taxing the Macassans for the procurement of trepang, the recruitment of a customs officer at the Coburg Cattle Company at Port Essington showed a step towards adaptation over the surveillance of the coastline from out of Palmerston. That the Macassans did not always pass this point saw further adaptation by the British in relocating the revenue station into the direct path of the Macassans at Irgul Point (Table 8.9).

Table 8.9 Methods of adaptation for customs and quarantine

Maritime/terrestrial activities:	Customs and quarantine
Physical environments:	Open coast, bay, river
Archaeological sites/features/artefacts:	Wreck: <i>SS Ellengowan</i> Revenue stations: Coburg Cattle Company, Irgul Point
Methods of adaptation:	<ul style="list-style-type: none"> • <i>SS Ellengowan</i> utilised as quarantine vessel at Channel Island for Chinese immigrants • Initial revenue station location near Victoria garrison, Port Essington, too far within bay to intercept Macassan perahus • Second revenue station located at Irgul Point directly on Macassan transport route

As the Macassan trepang industry dissipated through these actions, customs officers and others used Macassan stonelines and the abandoned British garrisons for their own purposes as they undertook a variety of occupations including trepanging, pearling, logging and buffalo shooting across the coastline (Table 8.10).

Table 8.10 Methods of adaptation for resource extraction

Maritime/terrestrial activities:	Resource extraction
Physical environments:	Open coast, bay
Archaeological sites/features/artefacts:	Fort Wellington features of cisterns and cutting in littoral zone Stonelines
Methods of adaptation:	<ul style="list-style-type: none"> • Fort Wellington used as a buffalo camp • Reuse of Macassan stonelines

8.6 Discussion

As a maritime landscape of adaptation, this chapter has provided examples of how each group adapted to the immediate and broader physical environments over time based on their geopolitical, economic and/or social intents. The resulting archaeological site locations and/or the physical environments within which the maritime and terrestrial activities of each group took place highlight the degrees in adaptation as each group gradually encroached from sea, to coast, to inland.

Although archaeology of the early European surveyors is yet to be recorded, charts provide the physical means to interpret how they adapted to their environment through tracing onto paper the coastline, sailing tracks, water depths, anchorages, wind directions, and anchorages. The addition of European place names, however, strongly influenced the process of turning the unknown to the known for future European surveyors, along with the British garrisons and colonies.

For the Macassans, the high number of trepang processing sites, along with the diagnostic features of stonelines and smokehouse depressions, suggests a high level of adaptation through self-sustainability and location choice that included: a sheltered beach/hinterland close to trepanging grounds; an adequate supply of firewood; and isolation or clear approaches (Macknight, 1969b:83–4). Their temporary presence on First Nations' land, remaining only a few days or more at each site as they worked the trepanging grounds, would have greatly contributed to this (discussed further in the following chapters).

The primary purpose of the British garrisons in this region being to deflect Dutch or French colonisation suggests less incentive to adapt to the landscape. That trade with the Macassans was also desired showed poor location choice for Fort Dundas at Melville Island, with adaptation in location choice visible with the successive garrison locations on the Macassan trepanging transport route on the Cobourg Peninsula. Regardless, the British were located deep within the straits and bays of a foreign and isolated landscape, and, far from the main shipping routes, had minimal visitation and trade. The archaeological record of each site thus points more to the short-term garrisons rather than trading entrepôts.

Even with the British garrisons to learn from, adaptation in location choice initially faltered for the British colonies through the selection of Escape Cliffs at Adam Bay, yet succeeded with the second and permanent colony of Palmerston at Port Darwin due to its superior bay and availability of fresh water and fertile soil. Its expansion within the surrounding region, coupled with its dramatic increase in shipping and population however, was not reflected in the development of maritime infrastructure such as jetties and beacons/lighthouses; as is

demonstrated by the SS *Brisbane* wreck on Fish Reef and subsequent Point Charles Beacon. Despite this, Palmerston managed to connect with maritime Southeast Asia at a much greater scale compared to its earlier British counterparts through the subsea telegraph cables and increased shipping of imported and exported resources, influenced by the overall increase in the movement of people during this time.

Chapter 9 – Shared landscapes

9.1 Introduction

The mainland coastline and islands of the Northern Territory—in which over 25 First Nations language groups have long resided (Figure 9.1)—represent a shared landscape through the visitation of sailors from beyond the Arafura and Timor Seas long before the commencement of the Macassan trepang industry. This is evident through First Nations narratives of the Baijini and Bayini that are beyond the scope of this research (Berndt and Berndt, 1947:133; Wesley, 2014). Starting with the Macassan trepang industry, culture contact in this region has featured prominently in archaeological research (Allen, 1969; Macknight, 1969a, 1969b, 1972, 1976, 1980, 1986; Mitchell, 1994; Taçon, 1988, 1989; Clarke and Frederick, 2006; Clark and May, 2013a, 2013b; Wesley and Litster, 2015). British and Chinese histories contribute to the region as a shared landscape through the gradual movement of people from the seas to the coast, and inland.



Figure 9.1 *Aboriginal Australia wall map showing First Nations language groups in the Top End (Horton and Australian Institute of Aboriginal and Torres Strait Islander Studies, 2000)*

Through a selection of archaeological sites and histories, this chapter examines the relationships that developed over time between each of the maritime communities that entered First Nations peoples' seas and lands and contributed to the region as a shared landscape. This begins with an overview of First Nations peoples' longstanding relationships with the Macassans, followed by the consecutive appearances of the early European surveyors, British garrisons, British colonies

and Chinese labourers that introduced a range of maritime and terrestrial activities. Evident through this is the creation of a range of shared spaces that had both positive and negative impacts on its participants. The movement of the British onto First Nations land and into the maritime enclave of the Macassan trepang industry dramatically altered the maritime cultural landscape of the Northern Territory and its connections to maritime Southeast Asia.

9.2 First Nations-Macassan relationships

In looking out to sea, First Nations groups from across the coastlines of northern Australia witnessed the passing and arrival of vessels that carried with them people from maritime Southeast Asia and beyond. Over the centuries, contact with these groups (such as the Baijini and Bayini, followed later by the Macassans) led to the development of strong relationships between custodian and visitor (Berndt and Berndt, 1947:133; Wesley, 2014). Long before the arrival of the British, First Nations peoples were working and trading with the Macassans, and joining them on their return voyage to Makassar. Archaeological representations of this are visible at 54 of the 100 Macassan trepang processing sites through the presence of utilised glass fragments and/or lithics (34 sites) and shell middens (20 sites) (Figure 9.2). Located across the trepanging region, these are more prominent on the Cobourg Peninsula (13 sites) and the archipelago directly north of Groote Eylandt (nine sites). Trepang processing sites in these regions, along with Anuru Bay and the Sir Edward Pellew group, also have a higher number of stonelines (Figure 9.3), indicating higher populations and probability of revisitation compared to the smaller sites. This direct correlation indicates that the Macassans chose to revisit trepanging grounds where relationships were established with First Nations peoples.

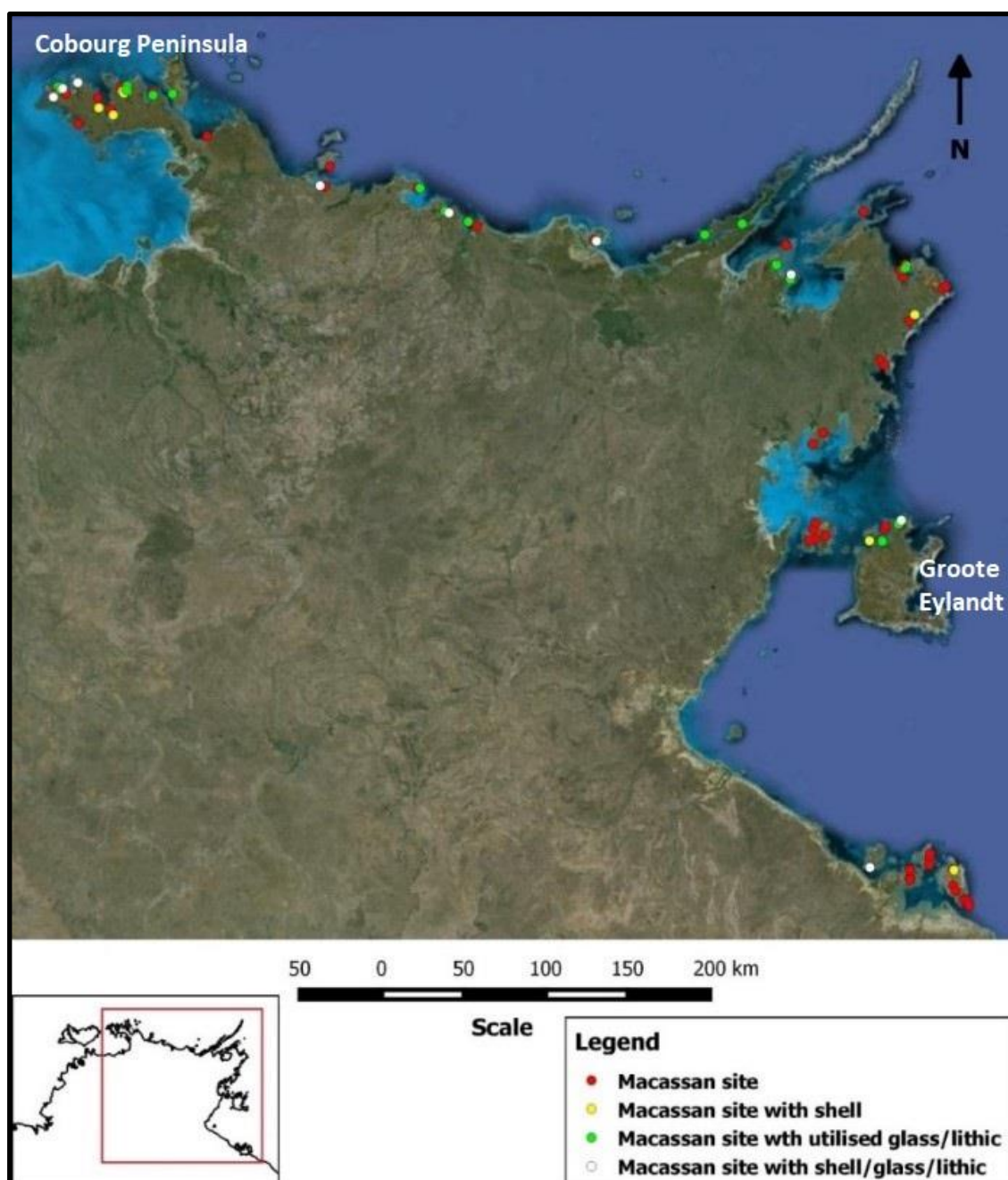


Figure 9.2 Macassan/First Nations sites as shared landscapes (Google Earth, 2013)

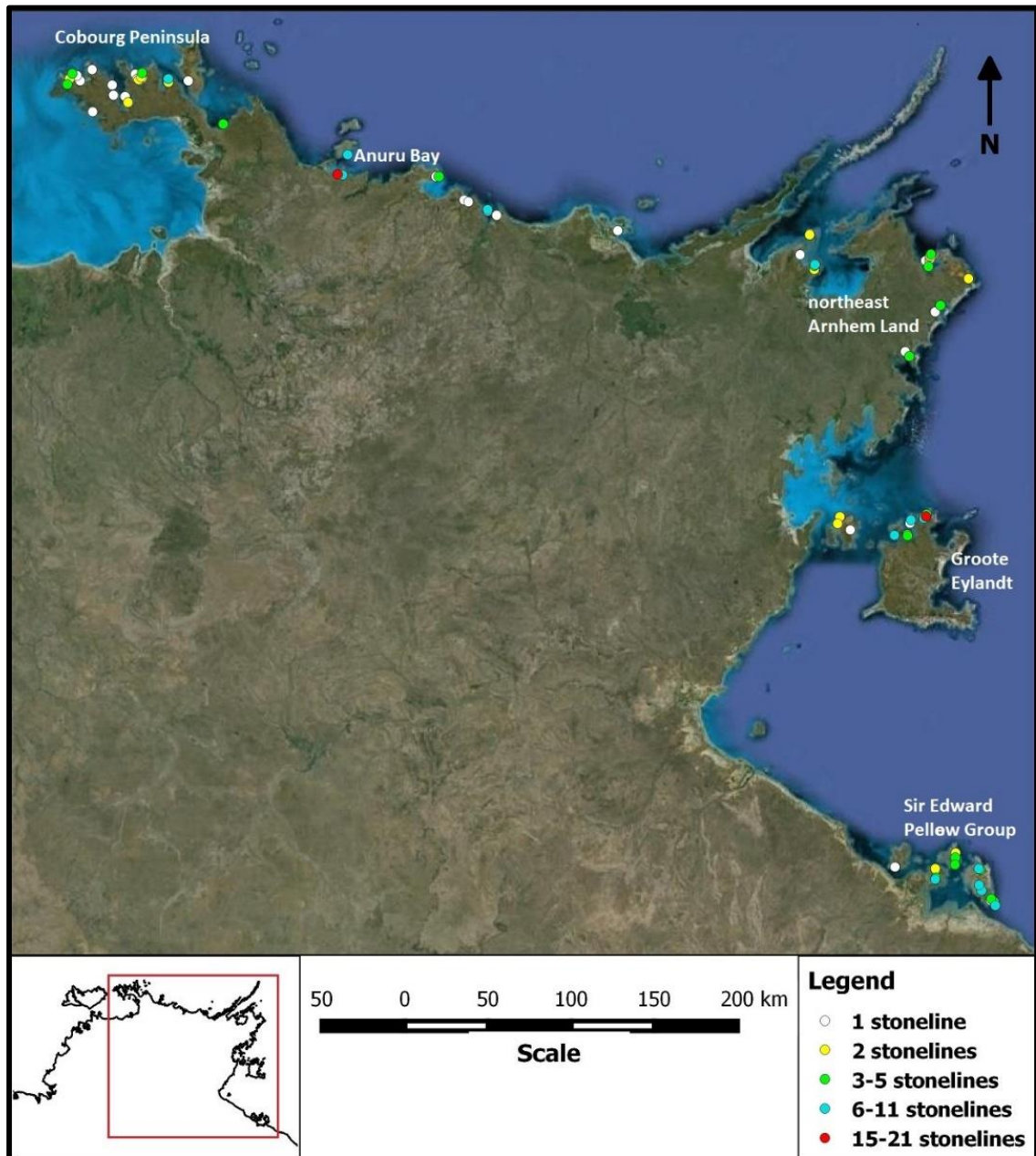


Figure 9.3 Macassan sites showing number of stonelines, sites with a higher number of stonelines also having First Nations archaeological material (Google Earth, 2013)

First Nations stone pictures and rock art with Macassan imagery situated both close to and at a distance from Macassan trepang processing sites add much weight to interpreting these sites as shared landscapes (Figures 9.4–9.6). This is evident in rock art in the Wellington Range in northwest Arnhem Land and on Groote, Bickerton and Chasm Islands in the Gulf of Carpentaria, and stone pictures in northeast Arnhem Land, all of which are relatively close to larger trepang processing sites that also hold First Nations material. The detail in many of these images is highly significant in that it demonstrates the familiarity First Nations people had with the Macassan fleets—and Macassan material culture in general—through the direct contact of working and sailing with the Macassans (May et al., 2013:51–2). As May et al. point out, “[s]uch

paintings support oral histories of the movement of people and close connections between Aboriginal and Macassan groups, something that traditional archaeology is struggling to achieve.”

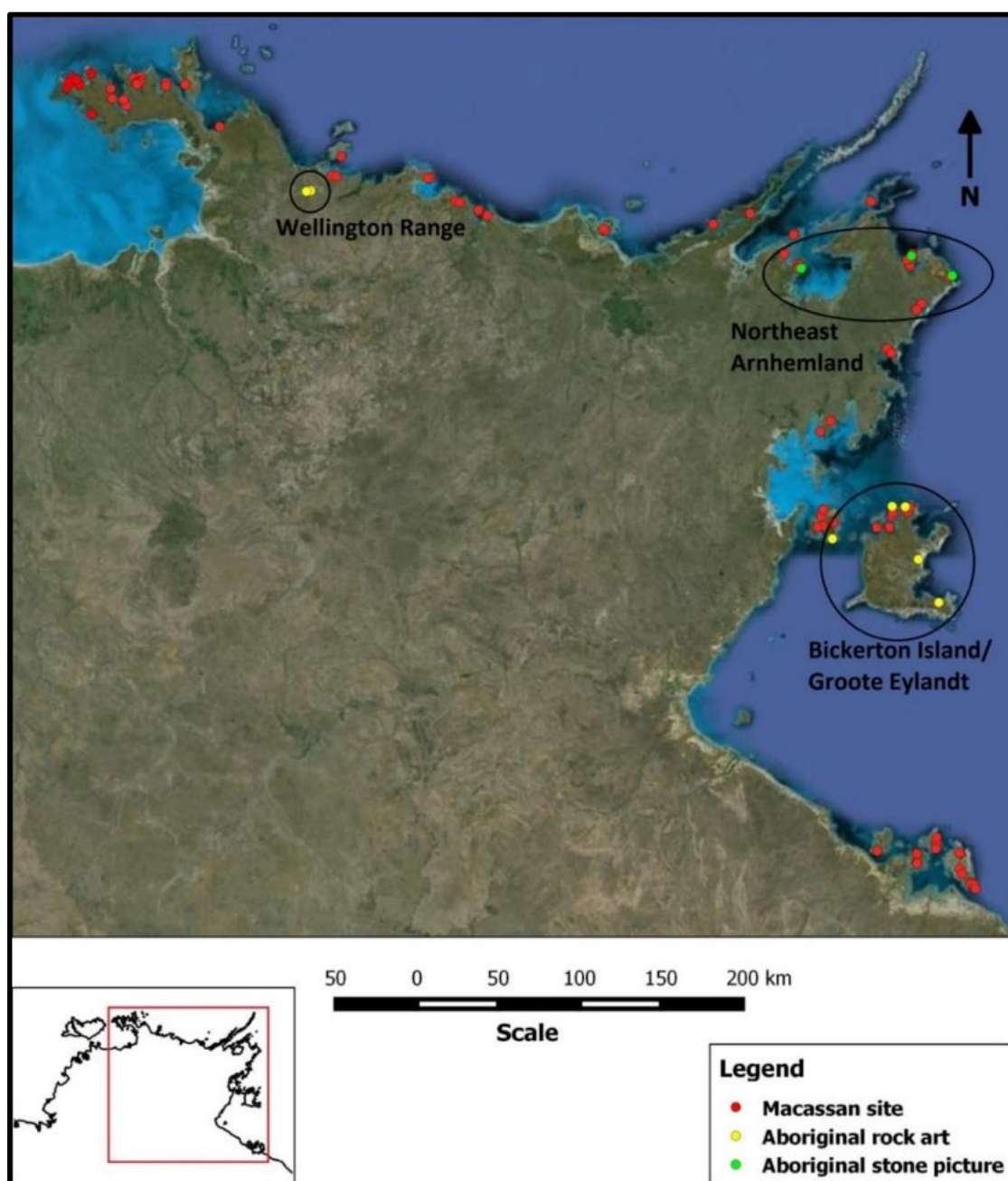


Figure 9.4 Locations of First Nations stone pictures and rock art in relation to Macassan sites (Google Earth, 2013)

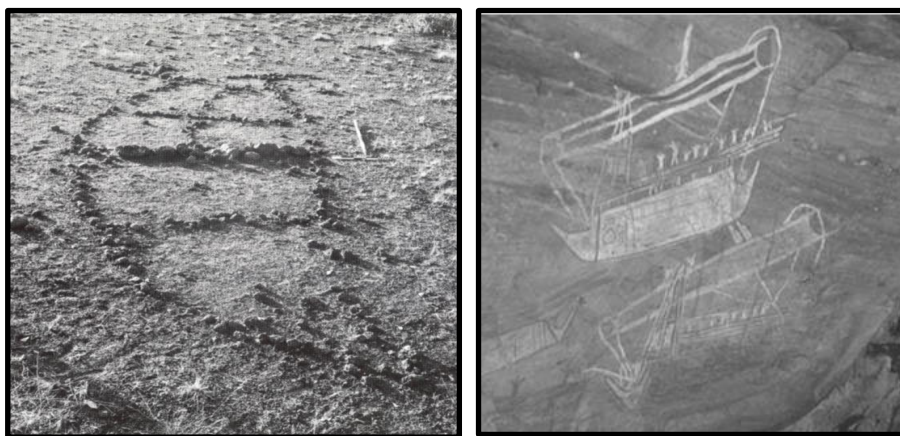


Figure 9.5 Stone picture of prau at Wurrawurrawoi (Macknight and Gray, 1969:37)

Figure 9.6 Macassan praus at Marngkala cave site, Groote Eylandt (Clarke and Frederick, 2006:125)

The absence of First Nations people at 46 of the 100 Macassan trepang processing sites reflects the position of May et al. (2013:51–2) on the invisibility of First Nations/Macassan connections in the archaeological record. Alternatively, this absence also demonstrates that relationships were not static, and potentially that not all First Nations groups welcomed the Macassan trepang industry operating in their region. These sites are located across the coastline, yet are more numerous on Bickerton Island and in east Arnhem Land (see Figure 9.2). Historical data complements this, with Wilson (1835:81) describing the protection of the British sought by the Macassans when relocating from the island trepang processing site to Fort Wellington due to First Nations people being “in the habit of stealing their canoes, and spearing their men, whenever the opportunity offered.” Wilson (1835:136) also noted that “the extraordinary jealous caution maintained induces me to think [First Nations people] have ... been dealt treacherously with by the Malays ...”

The site Ilyaugwamaja 4 (also ‘The Beach of the Fight’) on the eastern coast of Ilyaugwamaja Island (north of Groote Eylandt) represents a rare archaeological record of conflict (Macknight, 1969b:259) through the presence of a musket casing, a shovel nose spear head and bottle fragments. Malgari, an Anindilyakwa man from Groote Eylandt, told Macknight of a clash between First Nations people and Macassans at this site after everyone had become drunk, a narrative that directly relates to these artefacts. As Macknight states:

“It is a remarkable chance that these last two items [the spear and musket casing] should be found to confirm Malgari’s story of the fight. Using perhaps a little more imagination than is justified, one can say that here is the archaeological expression of the weapons used by both sides, and in the fragments of empty gin bottles, the evidence for the circumstances leading up to the fight.”

This unique site highlights the complex relationships held between the two groups; and one whose stories are passed down through generations (Tindale, 1925–28; Warner, 1932; Berndt and Berndt, 1947; Thompson, 1948, 1949a, 1949b, 1949c; Macknight, 1969b; Langton et al., 2011; Clark and May, 2013a; Bilous, 2015). Most significant of these (for this research) are the stories of movement between northern Australia and maritime Southeast Asia that extend the shared landscape to encompass both regions (May et al., 2013:51–2; Lydon, 2014:146); the photographs taken of First Nations people in Makassar by Odoardo Beccari in 1873 providing a pictorial glimpse into these longstanding connections (Figure 9.7).

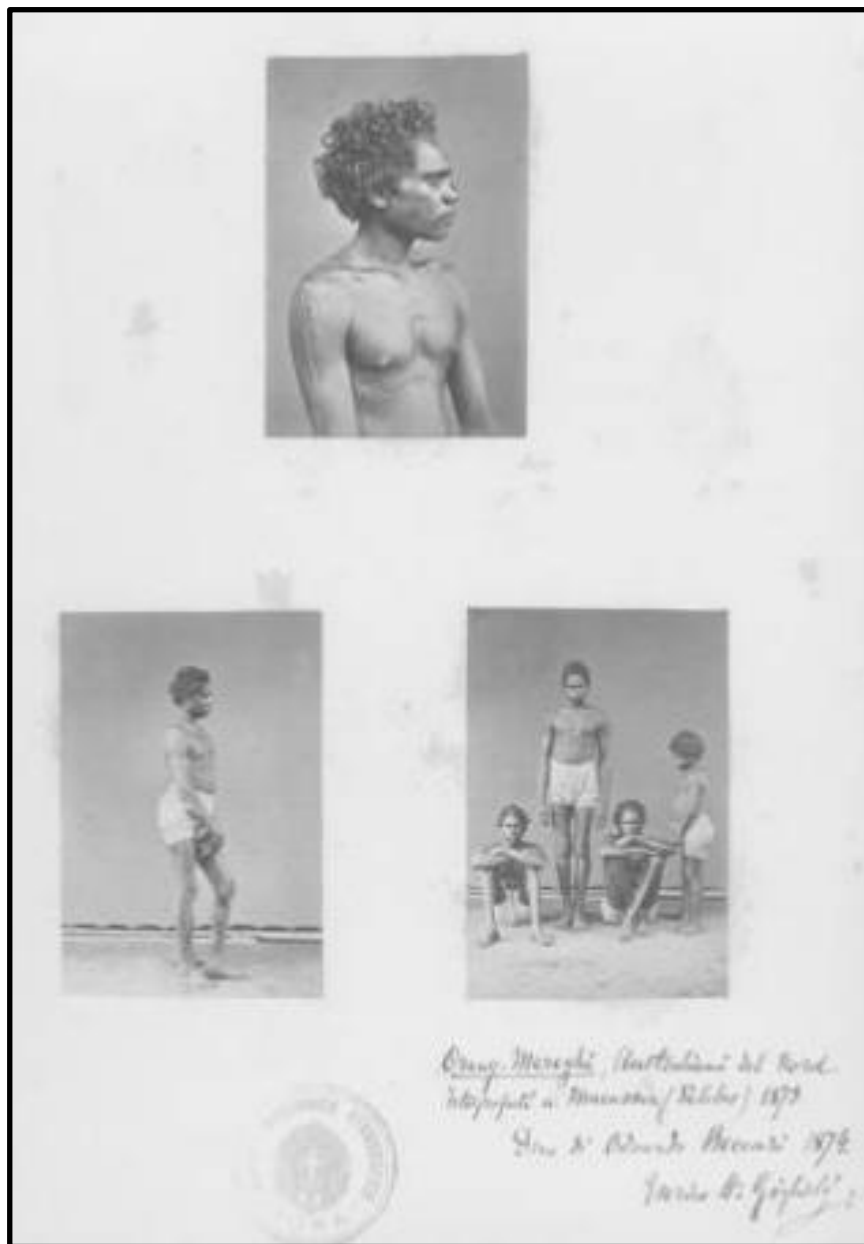


Figure 9.7 Odoardo Beccari, *Orang Mereghi. Australiani del Nord. Fotografato di Macassar (Selebes) 1873, 1873*. Collection Enrico H Giglioli, copia 4191. Museo Nazionale Preistorico Etnografico ‘Luigi Pigorini’, Rome. (In Lydon [2014:146])

9.3 The passing through of European surveyors

Although there is, as yet, no archaeological material from Dutch, British and French survey, a shared landscape, albeit from a distance, may be visible from First Nations rock art at Mount Wellington and the Arnhem Land Plateau. At the site of Djulirri, a European three-masted ship has been dated by Paul Taçon (2012:28; Taçon et al, 2010:4) to the late 1700s or early 1800s (Figure 9.8). The detailed rigging without sails is suggested by Taçon to be a ship anchored off the coast. That this ship shares a wall with two Macassan perahus indicates the beginnings of a shared maritime space between the Macassans and the Europeans; a space observed and documented by First Nations custodians.



Figure 9.8 European three-masted ship dated to the late 1700s or early 1800s, Djulirri, Arnhem Land (Taçon, 2012:28; Taçon et al, 2010:4)

As the surveyors passed through these waters, they were also documenting the presence of—and shared experiences with—First Nations custodians and Macassan trepangers in both their journals and charts (Flinders, 1814; King, 1828; Stokes, 1846a, 1846b; Hordern, 2002; Powell, 2010:41–106). Place names document these perceptions and interactions, with the absence of First Nations toponyms highlighting the surveyors’ disregard for First Nations land and sea ownership as they focused on their own interest in future colonisation (Battersby, 2007:7).

The earliest account in 1623 from Carstensz of the *Arnhem* (see Powell, 2010:18) gave a negative impression of the First Nations peoples of the Gulf country as “...barbarians, pitch-

black and entirely naked...They have no knowledge at all of gold, silver, tin, iron, lead and copper; even nutmegs, cloves and pepper...made no impression on them.” This account is bookended with the last explorative voyage by the Dutch in 1705 (Powell, 2010:28). In landing at Melville Island, Commander Martin Van Delft and his crew were at first welcomed by the Tiwi, yet the meeting deteriorated, with the Dutch escaping Tiwi attack. Van Delft’s final impressions were that “... the nature of these tribes is foul and treacherous”. These negative accounts contributed to the cessation of Dutch survey of the coastline.

British surveyors’ accounts of First Nations peoples had a similar derogatory tone to that of the Dutch. This is most evident in Stokes (1846a:62–3) describing them as savages requiring civilising by the British Christians and naming Escape Cliffs (Adam Bay), Point Pearce, Treachery Bay and Providence Hill (Victoria River) for negative interactions (Stokes, 1846a:415; Stokes 1846b:112). The Macassans, in contrast, were regarded more favourably by the British. In 1803, Flinders’ meeting with a Macassan fleet and its Captain, Pobassoo, is recorded in the *Chart of the North Coast of Australia* through naming the strait east of Cape Wilberforce ‘Malay Road’, and one of the islands Pobassoo’s Island (Flinders, 1813:228–33; Blair and Hall, 2013) (Figure 9.9). To the southeast, Morgan’s Island is named after a deceased sailor, yet no place is named for a First Nations man from Blue Mud Bay murdered, then studied and sketched around the same time.



Figure 9.9 Section of *Chart of the North Coast of Australia. Sheet IV* with Pobassoo’s Island and Malay Road underlined (Great Britain. Hydrographic Dept., 1839)

On the second British survey of northern Australia, King was wary of both First Nations people and Macassan trepangers (Hordern, 2002:96). On South Goulburn Island, surveying equipment left on shore was taken by a group of eight First Nations men (Hordern, 2002:126). Having spotted their canoe previously, the surveying group seized it in retaliation; hence the name Retaliation Point (Hordern, 2002:98). In coming into contact with a Macassan fleet at Sims Island, King described them as an “unprincipled gang” and chose to keep his distance (Hordern, 2002:103–17). Despite Macassan attempts at communication, King sailed on. This is visible in the *Chart of the North Coast of Australia. Sheet IV* (1839) (Figure 9.10) in the line indicating the zigzagging route and related soundings of the *Mermaid*. King had planned to anchor in Malay Bay (unnamed bay to the right), yet as the Macassans had arrived at the bay just prior to the surveyors, he chose to anchor in Mountnorris Bay to the west. When the Macassans sailed to this point the following day, King bypassed them back to Malay Bay to complete the survey of that area before heading west. Although brief contact was made, the crew of the *Mermaid* lacked fluency in Dutch or Malay (Hordern, 2002:109).



Figure 9.10 Section of *Chart of the North Coast of Australia. Sheet IV* showing King’s zigzag sailing track to avoid the Macassans (Great Britain. Hydrographic Dept., 1839)

9.4 British garrisons as sedentary occupation on First Nations land

Unlike the Macassans, whose regular visitation to the coastline was based on seasonal resource extraction and trade, the British garrisons had a more sedentary presence through the creation of much larger habitation sites (of between 0.07 and 1.16 square kilometres) a step further inland. Here, occupation occurred each time without the consent of the land’s custodians. The ensuing

interactions were unique to the garrison locations of the Tiwi Islands and the Cobourg Peninsula, and to the individuals such as the Commandants and First Nations custodians who influenced overall relationships.

British occupation at Fort Dundas (1824–29) was the first instance of a shared landscape in this region where the British took temporary unauthorised ownership of, in this case, Tiwi land near the totemic site of Punata (Campbell, 1834: 154; Watson, 1923:643–845; Fredericksen, 2002b:293). The Tiwi resisted this occupation for its duration through continual attacks on the garrison (Fredericksen, 2002b:292). For this reason, the British were mostly confined to the garrison and the Tiwi mostly kept out of it; the absence of reporting on Tiwi artefacts within the garrison confirming this history (Fredericksen, 2003). An exception is the Tiwi narrative of Tambu, a Tiwi man wounded by the British, and later imprisoned in a dry well as an underground cell (Fredericksen, 2002b:294–8). Recorded by Crosby (1978) in 1975, the well/underground cell is now fenced and signposted due to its significance—and the overall significance of this time—to the Tiwi people (Fredericksen, 2002:297) (Figure 9.11).

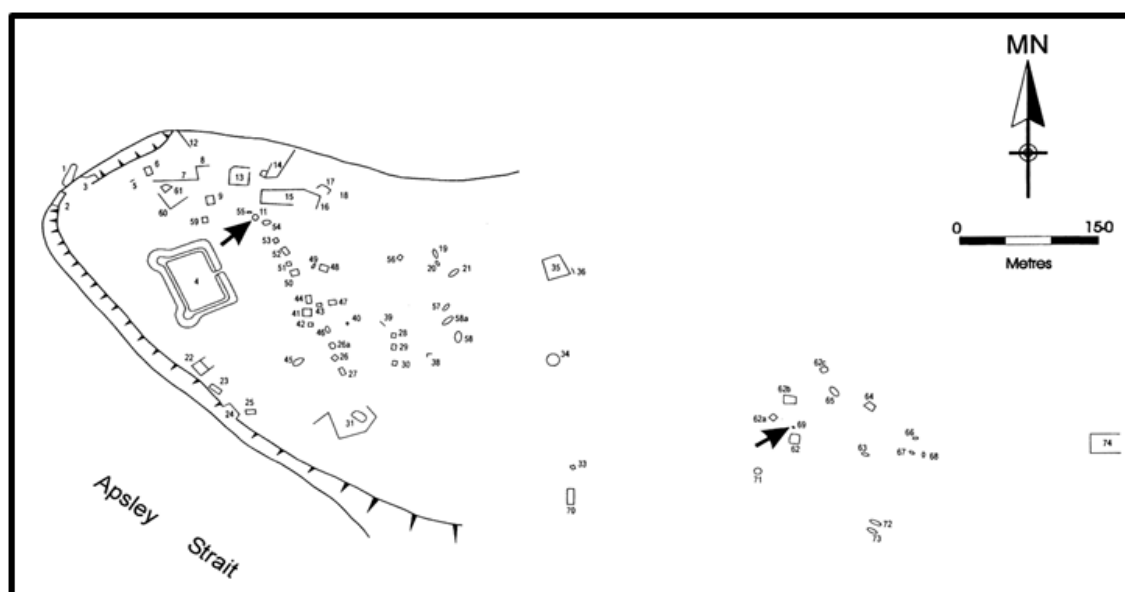


Figure 9.11 Fort Dundas/Punata archaeological site map after Crosby (1978). Arrows show the well (left) and grave (right) from Tiwi narrative (Fredericksen, 2002:295)

The abandonment of Fort Dundas may be partially attributed to the inability of the British to initiate trustful relationships with the Tiwi, and partially to the absence of Macassan trepangers in the Tiwi Islands. The location of Fort Wellington on the Macassan sailing route at Raffles Bay, Cobourg Peninsula, rectified the latter, with the efforts of Commandant Smyth to initiate a trading relationship with the Macassans evident through the shift of the trepang processing site from the island within Raffles Bay to Fort Wellington (Macknight, 1969b:124; Gregory, 1996:5) (Figure 9.12).

In contrast, Smyth was hostile to First Nations custodians, issuing orders of violence against the Iwaidja people leading to the murder of two Iwaidja men, and a woman and child, and the abduction of a child named Rival (Powell, 2009:43). The change in garrison leadership in 1828 dramatically shifted these relationships, with Commandant Barker prohibiting further violence against First Nations people, while at the same time making efforts to gain their trust (Wilson, 1835:79). Despite the brief duration of Fort Wellington, the actions of Commandant Barker contributed to a shared landscape of peace between custodian and occupier. Despite the lack of First Nations archaeology at the site, historical accounts—including Barker gifting the Macassan canoe to Mariac, an Iwaidja man—attest to it (Wilson, 1835:86).

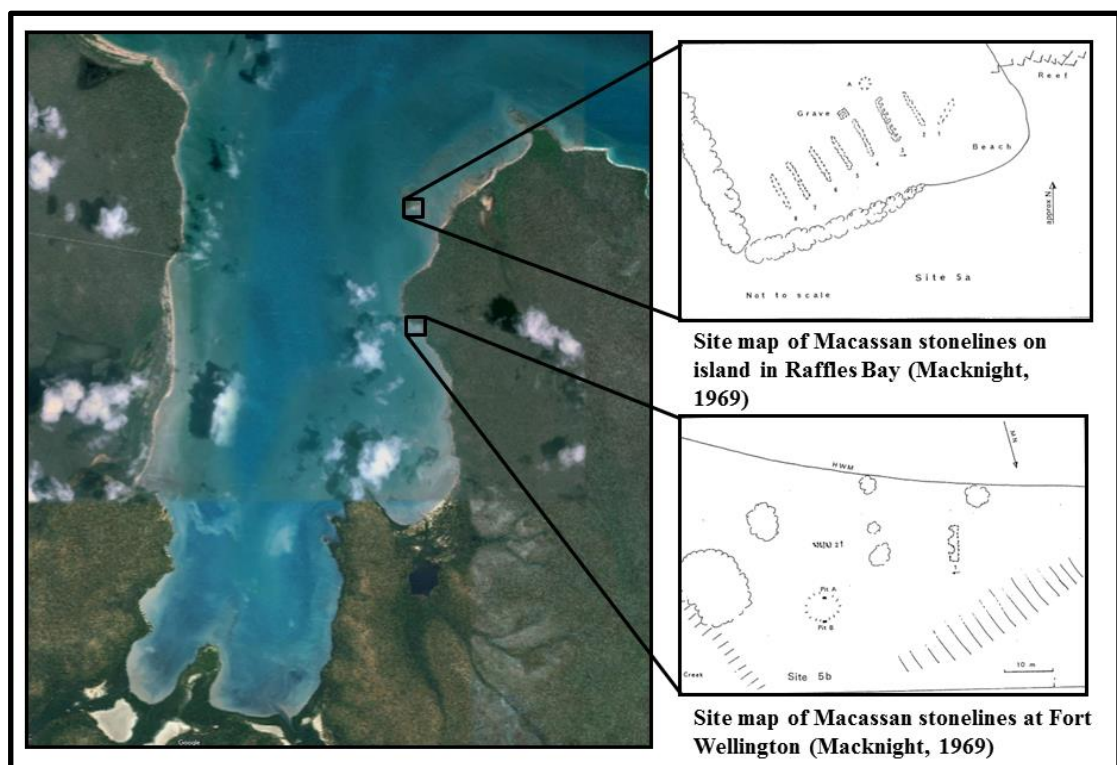


Figure 9.12 Macassan archaeological sites in Raffles Bay. The smaller site at Fort Wellington may have only been used during the time of the garrison (Google Earth 2014).

The diplomatic efforts of Commandant Barker at Fort Wellington influenced First Nations/British relationships at Victoria two bays to the west and a decade later (Allen, 1973:54; Powell, 2009:47). This is visible through utilised glass, stone artefacts, shell middens, and bones of local animals known to be procured by First Nations people and traded with garrison members (Allen and Corris, 1977:140; Allen, 2008:125). Although it may not be demonstrated archaeologically that First Nations people were at Victoria concurrently with the British, these artefacts complement the historical narratives of their presence both at the garrison and the Macassan trepang processing sites close by.

At Victoria, the Macassans continued to be encouraged to set up their trepang processing stations close to the garrison in the hope that British goods could be moved through them to the eastern archipelago (Stokes, 1846a:388–9). After a few years, however, McArthur acknowledged that, due to high taxes imposed on British goods by the Dutch and the lack of goods carried by the Macassans for British consumption, a trading relationship was not going to eventuate (The Sydney Morning Herald, 10 May 1844:4; South Australian Gazette and Colonial Register, 26 December 1846; Allen, 2008:128). With the abandonment of Victoria in 1849, longstanding First Nations and Macassan relationships—including reciprocal trade—continued on.

Overall, short-lived British garrisons did not appear to impact on the well-established trepang industry aside from the temporary movement of trepang processing sites in the vicinity of Fort Wellington and Victoria (Macknight, 1969b:116, 124; Spillett, 1971; Baker, 1984:14,16). The trepang industry, however, did impact on the British through their subsequent locations on the Macassan transport route (Watson, 1917:228). Despite efforts to trade with the Macassans, Dutch tariffs on British goods made this financially unviable (The Sydney Morning Herald, 10 May 1844:4; South Australian Gazette and Colonial Register, 26 December 1846; Allen, 2008:128).

9.5 British colonies

The duration of Escape Cliffs and the first year of Palmerston represented landscapes of segregation where First Nations people were excluded from the land and resources on which the surveyors' camps were built (Wells, 2018). Escape Cliffs is yet to produce archaeological material to discuss culture contact (Gregory, 1998), yet it is known historically that, as with Fort Wellington under Commandant Smyth, poor leadership influenced the initial failure to establish amenable relationships with the Woolna people (The Inquirer and Commercial News, 30 November 1864:4). As with the charts of the coastal surveys, the toponyms of topographic features recorded on the inland surveys surrounding Escape Cliffs show a landscape where the First Nations peoples are excluded (Figure 9.13).

The surveys of Palmerston and the surrounding region similarly cover the landscape with toponyms reflecting names of the survey party and British notables. 'Larrakeyah Square' in the *Township of Palmerston* is the only exception to the rule (Figure 9.14). Despite First Nations names being visible on the *General Plan...of Port Darwin* map (1870), these are listed as descriptors rather than place names (Figure 9.15). The naming of 'Doctors Gully' and 'Peel's Well' (Carment et al., 2008:399) represent the physical reality of the British literally claiming the Larrakia's resources as their own.



Figure 9.13 [Section of] *Sketch map of the North Territory country in the vicinity of Adam Bay showing place names associated with the Escape Cliffs surveys (Bennett, 1865)*

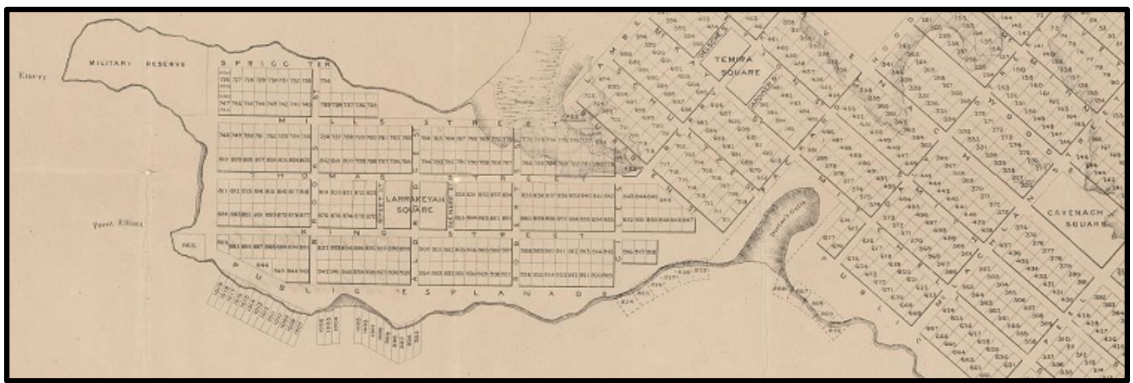


Figure 9.14 [Section of] *Township of Palmerston on east side of Port Darwin, Hundred of Bagot showing Larrakeyah Square surrounded by streets named after the surveyors (South Australia. Surveyor-General's Office, 1870)*

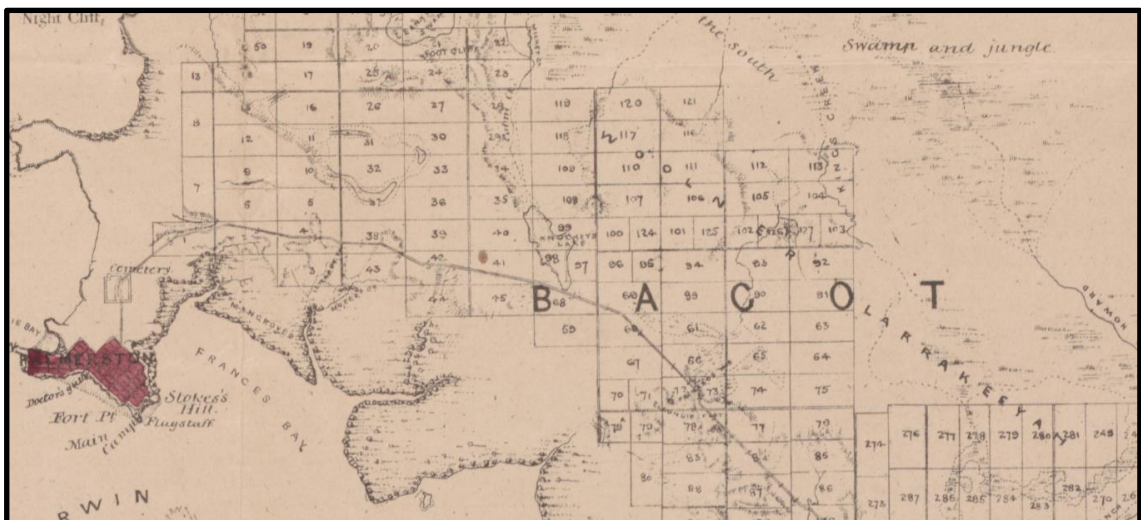


Figure 9.15 [Section of] *General plan showing natural features of the country, towns, reserves, roads & sectional lands at, and in the vicinity of Port Darwin, Northern Territory of South Australia showing 'Woolner Larrakeeyah' land with surveyed land lots superceding it (South Australia. Surveyor-General's Office, 1872)*

As the township of Palmerston and its immediate surrounds developed, so did the maritime landscape of British infrastructure such as the numerous jetties at Stokes Hill and the Point Charles and Emery Point Lighthouses. These and other government infrastructure were constructed with the assistance of Chinese indentured labour, visible discreetly through the ‘Shou Lao’ carved pinite figurine discovered by a Chinese labourer in the roots of a Banyan Tree at Doctors Gully in 1879 (Jose, 2013:119) (Figure 9.16). The only known Chinese maritime infrastructure was the Moo Tai Mue Chinese Temple or Fisherman’s Joss House located at Fishermans Beach, Doctors Gully (Bowen, 2012:48) (Figure 9.17). This building was a permanent structure within an ephemeral landscape of the Chinese fishing community whose homes and sampans lined Fishermans Beach and Hospital Beach (NTTG, 18 September 1896:3).

From a maritime perspective, the high population of Chinese indentured labourers transported to Palmerston is most visible archaeologically through the three Chinese wooden shoes recovered from the 1881 wreck of the SS *Brisbane* (Steinberg, 2005a). The 1888 wreck of the SS *Ellengowan* just north of Channel Island where Chinese people were quarantined a year earlier during the smallpox epidemic contributes to the history of segregation of Chinese and First Nations peoples from the British (Powell, 2010:155). As yet, there is no archaeological evidence of the net-fishing industry dominated by the Chinese. The Chinese are, however, archaeologically visible at the Pine Creek gold mines (Bell, 1983, 1995, 1996; Fredericksen et al., 2001; Hardwick, 1984; McCarthy, 1986, 1988, 1989, 1995; Mitchell, 1995b, 1999; Pearce, 1982; Van Kempen, 1987) and Bynoe Harbour tin mines (Heritage Surveys 1997; Gregory, 1999; Mitchell, 2005). The name of the entry point to the tin mines, Hang Gong’s Landing, highlights the prominence of the Chinese within the tin mining region, along with their rising status in the community as business owners (Gregory, 1999:24). Despite the historical presence of First Nations and European people in the tin mining region, culture contact has yet to be explored archaeologically.



Figure 9.16 ‘Shou Lao’ carved pinite figurine (Museum of Applied Arts & Sciences, 2020)

Figure 9.17 ‘Moo Tai Mue Chinese Temple. Otherwise known as the Fisherman's Joss House’ (Territory Stories, n.d.)

Further afield, no Chinese or First Nations archaeological material associated with the Chinese fishing station at Cliff Head and Channel Point was located through the 2013 survey. Despite this, it is known that both worked together to procure fish throughout the region. When the Chinese were at the fishing station at Cliff Head, First Nations peoples would camp on elevated land that overlooked both the station and Anson Bay (pers. comm. Linda Yarrowin) (Figure 9.18). Although its provenance is not confirmed, the boat landing at Channel Point was likely constructed by Chinese fishermen, based on their known presence in the region (LANT, Ningle Haritos, NTRS 226, TS 693).



Figure 9.18 Location of potential Chinese fishing station site at Cliff Head. First Nations people would camp in the elevated area overlooking the fishing station (Google Earth, 2014)

To the east, the Macassans continued trepanging with First Nations people after the colonisation of Palmerston. Initially, British intentions of developing a trading network with the Macassans continued despite their failure to do so at Victoria 20 years previous (Evening Journal, 7 April 1873:2; The South Australian Advertiser, 16 July 1873:3). By 1873, when it was realised that trade was not a viable option, licence fees and duties were enforced by dedicated customs officers. At the same time, British men were encouraged to trepang with the assistance of First Nations people and Aru Islanders (NTTG, 27 February 1874:2). Thus, the shared landscape of the trepanging grounds was increased with no less than nine non-Macassan trepang processing sites and 30 Macassan sites reused by non-Macassans. As is indicated in Figure 9.19, non-Macassan trepang processing sites are located mainly within the Cobourg Peninsula, with reused sites located across the coastline.

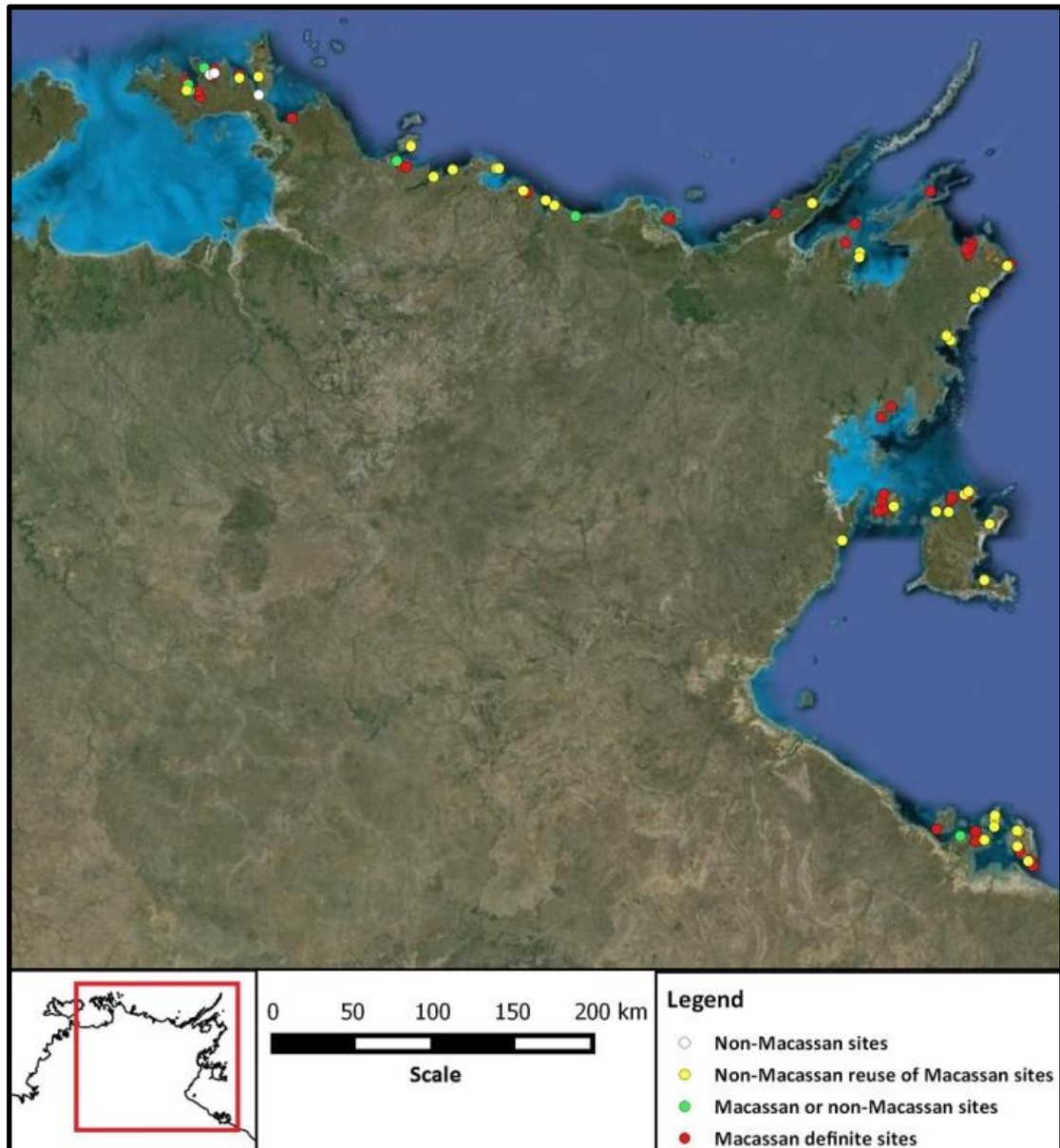


Figure 9.19 Non-Macassan trepang processing sites and non-Macassan reuse of Macassan sites (Google Earth, 2013)

With the movement of people outside Port Darwin for both maritime and land-based resource extraction activities, the expansion of the shared landscape saw First Nations, Chinese and British people working alongside (Searcy, 1909:64). The infiltration of the British to the more remote regions enabled their further control of maritime and terrestrial activities undertaken there by non-British peoples. This is most evident with the physical positioning of customs officer Robinson at Irgul Point, which assisted in the end of the Macassan trepang industry, yet also supported singular events including the provision of aid to shipwrecked Macassans (Macknight, 2008:500) and assisting police with the Cape Brogden massacre. The latter took place around 80 kilometres east of Irgul Point in 1892 when a small perahu—possibly from the Aru Islands—landed just south of Cape Brogden. Soon after landing, all men were murdered and

buried inland, and the perahu destroyed (Jung, 1992:12). First Nations informants reported the massacre to Robinson, leading to Searcy recording the wreckage site and collecting items belonging to the Aru Islanders, including a kris and a dagger. The physical remnants of this event are the listing of the Cape Brogden perahu on the Australasian Underwater Cultural Heritage Database, and the kris and knife originally collected by Searcy now being held at the Museum and Art Gallery of the Northern Territory (Figure 9.20).



Figure 9.20 The kris (left) and dagger (right) collected by Alfred Searcy that complement his account of the Cape Brogden perahu (2016.012.004 and 2016.012.003. Searcy Collection. MAGNT)

9.6 Discussion

From the 1600s onwards, the maritime cultural landscape of the Northern Territory gradually developed into a number of shared spaces influenced by the procurement and trade of its resources, geopolitics through the European race for colonisation, the slow encroachment of the British into First Nations seas and lands, and the immigration of predominantly Chinese labourers.

In this chapter, the selection of maritime and terrestrial activities put forward best highlight culture contact from the four historical development phases. From this, the most prominent was the connection of the Cobourg Peninsula and Sir Edward Pellew Group through the longstanding relationships between First Nations peoples and the Macassan trepangers. As with all contact histories, these relationships varied, with First Nations artefacts at over half of the 100 definite sites attesting to this. That the Macassans had strong bonds with First Nations groups around the Cobourg Peninsula, northeast Arnhem Land, Groote Eylandt and the Sir Edward Pellew Group may be attributed to their temporary, yet regular visitation at each site, the non-invasive size and location of the trepang processing sites close to the shore, and through reciprocal trade.

The early European surveyors had little in the way of contact with First Nations people, yet their movement through the landscape was documented both on land and at sea through rock art and charts. Although British contact with the Macassans led to a number of place names, no First Nations place names were incorporated into the charts, highlighting the European as ‘coloniser’ and complete lack of recognition of the custodians of the land and seas.

In occupying First Nations land, the British garrisons had mixed experiences of contact with First Nations people. At Fort Dundas, failed relationships led to fatalities of British and Tiwi men, and the detaining and escape of Tambu. Despite the Tiwi being unwelcome at the garrison during its time, the physical remains of the garrison have been incorporated into the story of what was always a Tiwi landscape. Fort Wellington exemplifies the transformation from a landscape of segregation between the Iwaidja and British under Commandant Smythe, to a shared landscape under Commandant Barker. Macassan stonelines on the island within Raffles Bay and at the garrison show the movement of the Macassans from the islands to the beach fronting the garrison during its operation. At Victoria, a shared landscape is evident through the physical remains of Macassan stonelines and First Nations and Macassan artefacts within the garrison, yet history tells of the unviability of British trade with the Macassans due to high Dutch taxes.

The inland survey and colonisation of Escape Cliffs and Port Darwin show an extension of mapped toponyms that exclude First Nations people from their landscape, aside from a patch of grass named Larrakeyah Square. The importation of a high population of Chinese indentured labour to work on Government projects around the township is subtly visible in the British-governed landscape through the Shou Lao carved figurine found by a Chinese labourer. The Chinese presence is more visible through shipwreck and associated artefacts. The ephemerality of maritime activities such as net-fishing undertaken together by Chinese and First Nations people is thus far only visible through the historical record.

Throughout the historical development of the Northern Territory, evident over time is how the locations chosen by the Macassans, British garrisons and British colonies shaped the history of this shared landscape up until 1911 (Figure 9.21). The high number of Macassan sites east of the Cobourg Peninsula, including sites with First Nations artefacts, attests to the ongoing relationships shared between the two groups. The British garrisons, although staying within the confines of Admiralty orders, moved from Bathurst Island east to the Cobourg Peninsula to connect with the Macassans. The locations of Escape Cliffs and Palmerston proved safe for the Macassans for a time, yet displaced the Woolna and Larrakia Nations. Maritime industries saw Chinese net-fishing undertaken in Port Darwin and to equal distances west and east along the coast. The movement of non-Macassans into the trepanging region, and the decisive measure to

place the customs officer at Irgul Point, however, altered the longstanding First Nations-Macassan shared landscape from a living to an archaeological landscape.

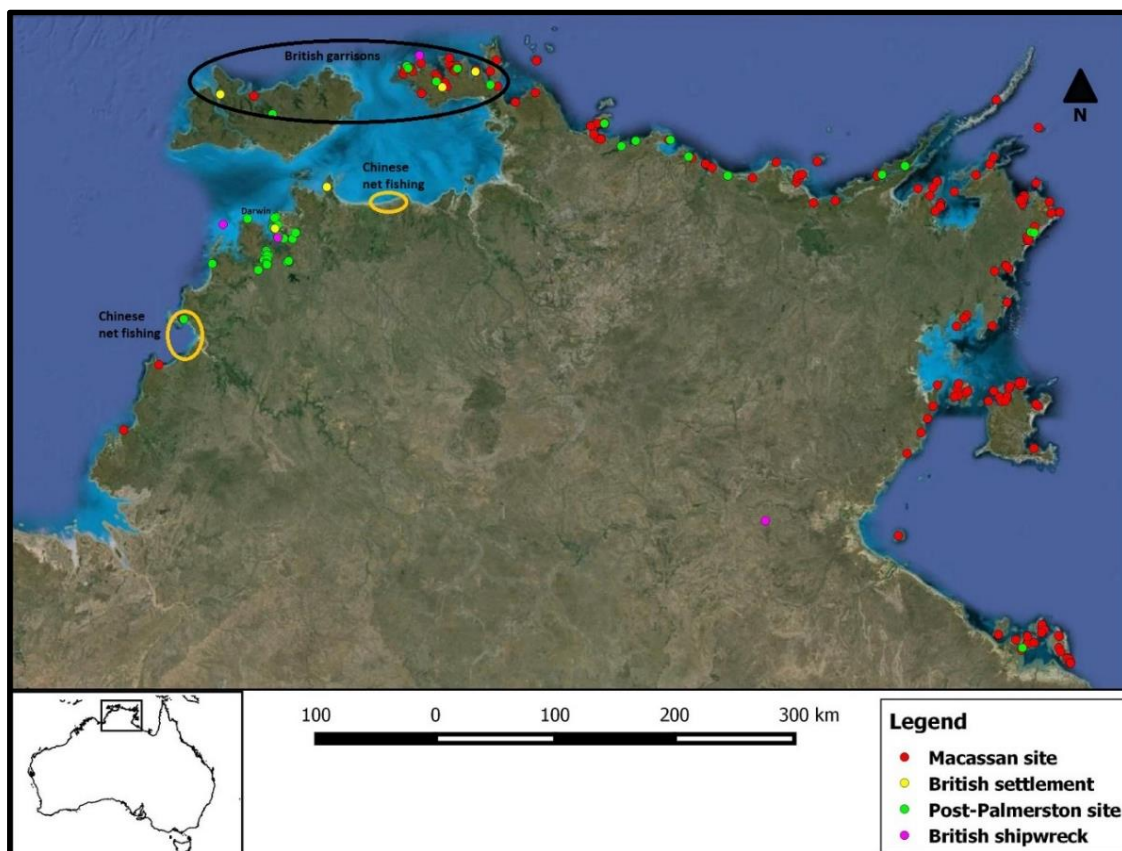


Figure 9.21 Historical archaeological sites of maritime Northern Territory up until 1911. Chinese net-fishing sites are yet to be archaeologically identified (Google Earth, 2013).

Chapter 10 – Maritime landscapes of movement

10.1 Introduction

The historical development of the Top End of the Northern Territory up to 1911 is, in part, shaped by the ways in which people moved through the maritime landscapes. As a sub-field of landscape archaeology, the landscape of movement explores linear pathways as an essential component of the cultural landscape, capturing the complex relationships between space, place, and movement that these features articulate (Snead et al., 2009:1). Following the interpretive model set out in the methodology, this chapter seeks to interpret the archaeological and historical data collected for each historical phase as a maritime landscape of movement based on the descriptors put forward by Westerdahl (1992) of transport types, transport zones/routes, transit points and maritime enclaves. The chapter will explore how each group navigated through their maritime and terrestrial environments and those of the broader region of maritime Southeast Asia and beyond.

10.2 Transport types and transport zones

Generally speaking, transport types reflect the place and time in which they were built, along with their maritime environment, purpose, and the influences of local and broader maritime communities over time, evidenced in their materials and design. A selection of transport types used in the Top End of the Northern Territory from the 1600s to 1911 is described below.

The perahu

Unique to maritime Southeast Asia, the perahu (nine to 38 registered tons) was designed for coastal and open sea transport zones (NTTG, 25 February 1888:3; Macknight, 1969b:47) (Figure 10.1). Its “...well-built hull and ramshackle superstructure...” was described by d’Urville ([1844:259–60] in Macknight 1969b:44) as “although not suited to oceans, was safe in the veritable lakes of the Timor, Molucca and Sunda Seas.” The Northern Territory’s maritime environment of shallow bays, islands and archipelagos from which trepang was extracted was an extension of this region, as is apparent through the high number of sites relating to the Macassan trepang industry. Locations of wrecked perahus have been recorded historically and through living memory, yet none are recorded archaeologically. Most perahu wrecking events are associated with the Macassans, although the smaller Cape Brogden Perahu from the Aru Islands was wrecked through being blown off its more northerly route within the eastern archipelago (Jung, 1992:12).

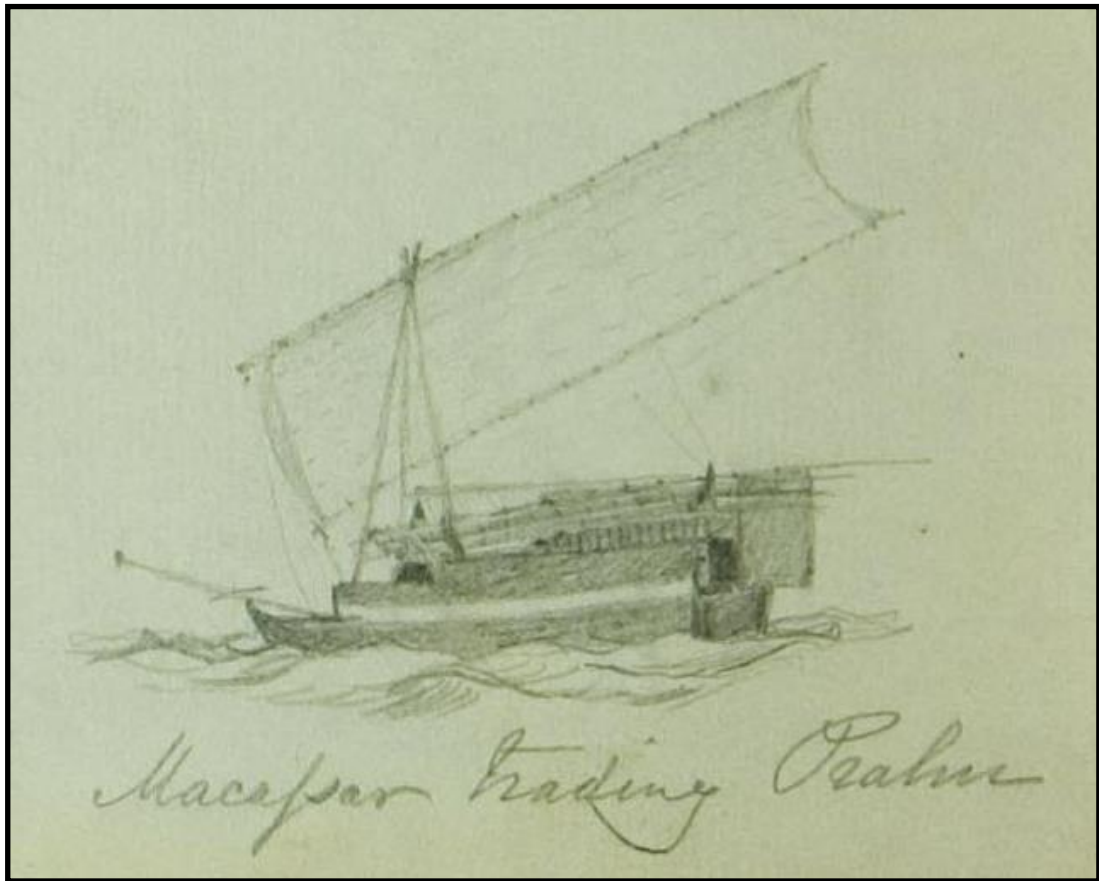


Figure 10.1 Sketch of a *Macassan trading prahu* (LANT, John McArthur, NTRS 3602:112)

European sailing vessels

Contrasting sharply with the prahu in both design and purpose were the European vessels that moved through Northern Territory waters from 1623 onwards. These were wooden sailing ships of varying sizes, riggings and hulls; with smaller and larger vessels often sailing as a pair or part of a fleet. Beneficial in the years of navigation when much of the coastline was charted, smaller vessel sizes (30 to 120 tons) allowed for greater access to the shoreline and estuaries while still being large enough to traverse open seas and oceans (Tasman et al., 1965:116). Larger vessels (between 300 and 400 tons) complemented these through a higher capacity of storage that enabled longer voyages. European transport types used to chart the Northern Territory coastline thus fall within the open sea and coastal transport zones. The lack of detail in Dutch charts suggests, in part, that ships were at a distance from the coastline, with later British charts indicating surveys that covered all transport zones through the use of the smaller ships and ships' boats to survey rivers in search of a potential inland sea. This is evidenced through sailing tracks and river soundings in the *Chart of the North Coast of Australia. Sheet IV* (1839) produced by King and added to by Wickham and Stokes (Figure 10.2).

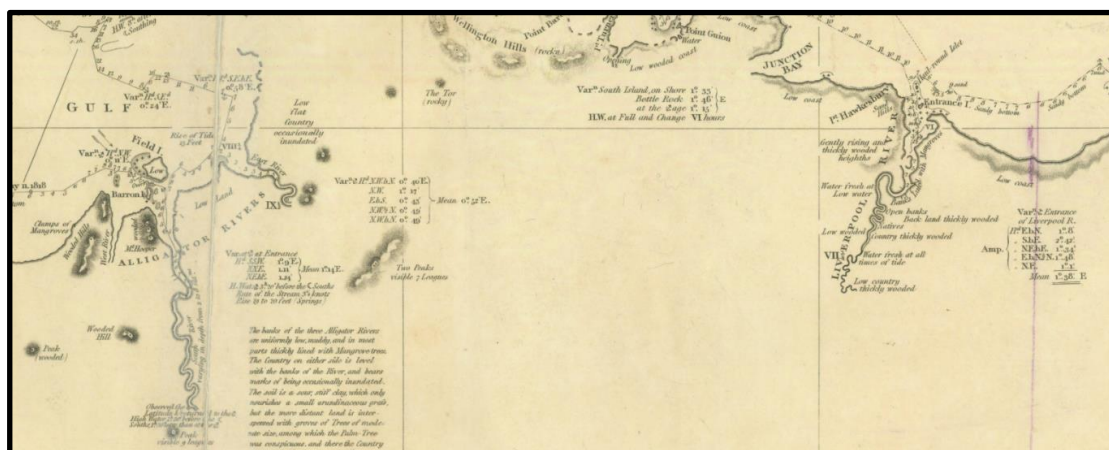


Figure 10.2 [Section of] *Chart of the North Coast of Australia. Sheet IV* showing survey tracks for the Alligator and Liverpool Rivers (Great Britain. Hydrographic Dept., 1839)

Where the singular role of the surveyor's vessel was for charting the coastline, larger men-of-war and barques of between 400 and 700 tons were used at times during the historical phases of the British garrisons and colonies as transporters to and from the garrisons and to acquire supplies from Port Jackson and maritime Southeast Asia while serving the broader demands of the British Empire (Campbell, 1834:132; Watson, 1917:838; Cameron, 1999:25). Although smaller sailing vessels of less than 100 tons were attached to Fort Dundas and Fort Wellington, their inability to transport adequate supplies (Watson, 1923:646) led to the temporary station of larger vessels at Victoria, again as part of their broader roles serving the British colonies in India, the Straits Settlements, and newly-acquired Hong Kong. To move between the transport zones of bays and estuaries, whale boats (Watson, 1923:646), dugout canoes (Watson, 1923:803; Wilson, 1835:80) and small sailing vessels acquired from maritime Southeast Asia were utilised for official and recreational purposes (LANT, John McArthur, 3601:33, 90) (Figure 10.3); including one instance at Fort Dundas where convicts attempted escape (Watson, 1923:722).



Figure 10.3 Sketch of *Lizard* and *Gipsy* – Port Essington (LANT, John McArthur, NTRS 3602:107)

The settlements at Escape Cliffs and Palmerston saw the continued use of wooden-hulled sailing vessels alongside the introduction of steam-powered and iron-hulled ships (Webling, 1995; Powell, 2010:107–93) with all transport zones of open sea, coastal regions and rivers used. This is indicated in the different types of maritime transport visible in both the historical and archaeological record. The significant difference between the colonies compared to that of the earlier historical phases is the expansion of transport zones inland through the use of rivers as a more expedient means of travel than overland for the construction of the Overland Telegraph Line and extraction of terrestrial resources like gold and tin.

To assist with the movement of larger vessels within bays and rivers (as with the *Young Australian* up the Roper River for the construction of the Overland Telegraph Line), steam launches and smaller steam ships of between five and 100 tons were introduced. The shortage of maritime transport in Palmerston, however, meant one vessel would have many roles over its lifetime; not all of which it was necessarily suited to (Searcy, 1984:48). As an example, the government cutter *Flying Cloud*: (28 tons) sailed regularly from Palmerston to Kupang for the outgoing mail run and to procure supplies; erected and replaced beacons and buoys along the coast and rivers; collected cypress pine from Indian Island in Bynoe Harbour; transported the government resident to Port Essington and other sites to inspect remote cattle stations; and transported customs officers such as Alfred Searcy to locate and collect duties and license fees from Macassan trepangers (Searcy, 1909:19,75). During the 1880s, the *Flying Cloud* was sold to Japanese pearlmen and later broke up along a beach after a storm (Searcy, 1909:75).

From the 1870s, other smaller vessel types such as sampans and pearling luggers arrived in Palmerston as maritime and terrestrial resource extraction increased. With their flat-bottomed hulls, sampans were well-suited to the high tidal range of northern Australia in being able to rest on the foreshore flats at low tide. Although primarily used for fishing, the vessel shortage in Palmerston also saw them contracted for lightering and transporting people and goods throughout the coastline and rivers (NTTG, 4 September 1886:3; 29 September 1905:2). Little has been recorded of the history of the sampan in this region compared to their British counterparts, yet their wide usage indicates their suitability to the environment and the people.

10.3 Transport routes

Transport routes contribute to the history of movement within the maritime landscapes of the Northern Territory and the broader regions of maritime Southeast Asia, the southern colonies of Australia, the northern colonies of India and China, and beyond to England. These routes were generally dependant on vessel type, yet history tells of larger vessels successfully navigating rivers, with the wreck of the *Young Australian* indicating the fate of smaller vessels on the same

route. The compilation of archaeological site locations, contemporary writings, charts, and recollections contributes to the recreation of these routes, that in themselves, tell the stories of economic and/or political pursuits, and overlapping transport routes of connection and avoidance.

For the Macassans, the transport route of 1,600 kilometres from Makassar, Celebes (present-day Sulawesi) to the Cobourg Peninsula via the islands of Salajar, Tanahdjampea and Timor is known through the accounts of Daeng Sarro recorded by Cense (1952 in Macknight 1969a:180–5; Blair and Hall, 2013:213) (Figure 10.4). A more easterly route via the Aru Islands may have also have been used (Macknight, 1969b:65). Although evidence of trepang processing sites is yet to surface east of the Cobourg Peninsula, the presence of tamarind trees at Adam Bay and a swivel gun at Dundee Beach may indicate a more easterly transport route along the Northern Territory coastline from the Kimberly trepanging grounds.

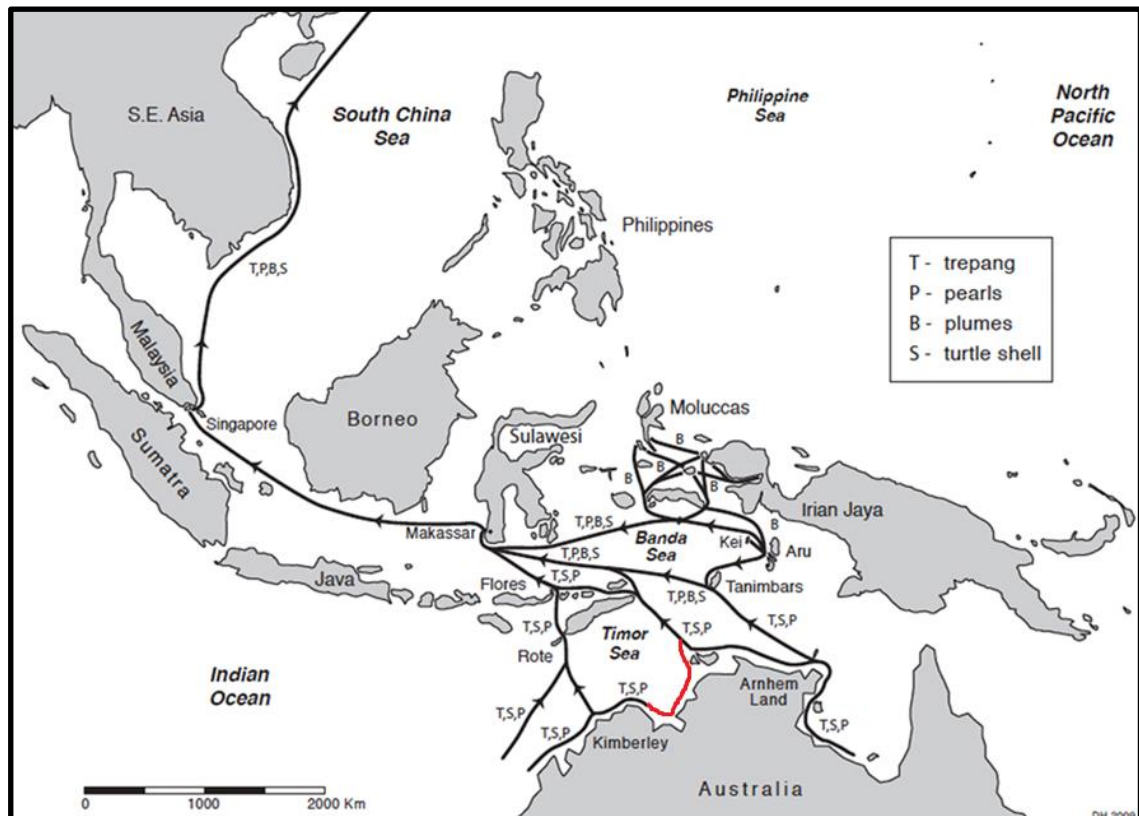


Figure 10.4 Macassan trade routes with red line added by author to indicate a potential transport route from the Kimberley trepanging grounds to maritime Southeast Asia (Clark, 2011:3)

Upon reaching Marege, the transport route taken along the coastline visible in Figures 10.5 to 10.7 is proposed based on archaeological site locations and historical and ethnographic data. The even distribution of sites across most bays suggests that fishing for trepang occurred in both an easterly and westerly direction depending on wind direction, and as stated by Macknight

(1969b:63) “there can be no doubt that virtually the entire coast between the Cobourg Peninsula and the Pellew Group was visited regularly.”

Although archaeological sites on Bathurst and Melville Islands have yet to be recorded, Macassan visitation and sightings have been documented historically through shipwreck events and the personal account of Daeng Sarro (Macknight, 1969b:110–2). Sarro recalls the names along the northern coastline of Melville Island while sailing eastwards towards the Cobourg Peninsula (Macknight 1969a:181–2) (Figure 10.5). These were Deep Bay, Karaeng Mangngemba, “a place which had a beautiful white beach stretching away to the east and a row of casuarina trees, where natives were aggressive”, Ma’ne’s Bay and Sandfly Bay. Only after passing Mud Bay (near present-day Cape Don on the western point of Cobourg Peninsula) is there reference to procuring trepang where “the people were peaceful and the men prepared to work on board the ships” (Macknight, 1969a:182). The current research project *Before Cook: Contact, Negotiation and the Archaeology of the Tiwi Islands* (University of Canberra, 2021), will contribute to the Tiwi’s history of Macassan visitation in this region (Daryl Wesley, pers. comm.).

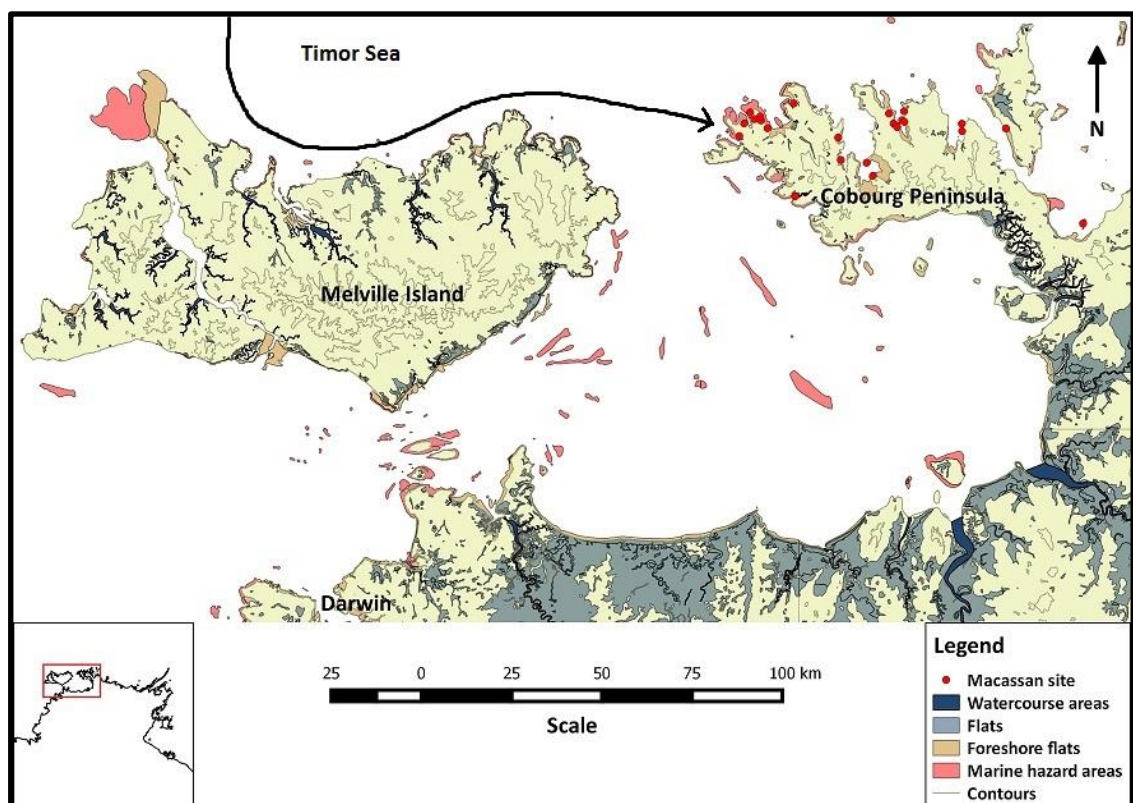


Figure 10.5 General Macassan travel route from the Timor Sea, past Melville Island and arriving at Cobourg Peninsula.

From the Cobourg Peninsula, the transport route continued southeast through the Bowen Strait between the mainland and Croker Island (Figure 10.6). This route is well known due to the

historical accounts of the revenue station situated at Irgul Point from 1884 onwards for the primary task of collecting licence fees and duties from the Macassans (Macknight, 2008:499; Powell, 2010:160). Located on a cliff facing northwest towards the Bowen Strait, the site of the revenue station had a vantage-point for sighting Macassan perahus from afar. The Strait, approximately 25 kilometres in length, funnelled the perahus to Irgul Point, where the distance from the mainland to Croker Island was less than four kilometres.

Prior to this, the Macassans were expected to sail 30 kilometres into Port Essington to the Coburg Cattle Company just south of the abandoned Victoria garrison to pay duties (Macknight, 2008:499). Due to the location of the Coburg Cattle Company deep within the bay, however, access for sailing vessels was inconvenient. In late December of 1883, a First Nations man travelled overland from Bowen Strait to inform Robinson and Searcy of two perahus awaiting the customs officers. As Searcy (1909:66) describes, “The masters had sent their papers over...It turned out as we expected, that the weather had been so tempestuous that they had had to run by...I realised that Port Essington was a bad place for the proas to report at, for if they once got in with the nor’-wester they could not get out until the south-easter set in. In fact, they only fished in these waters during the south-east monsoon.”

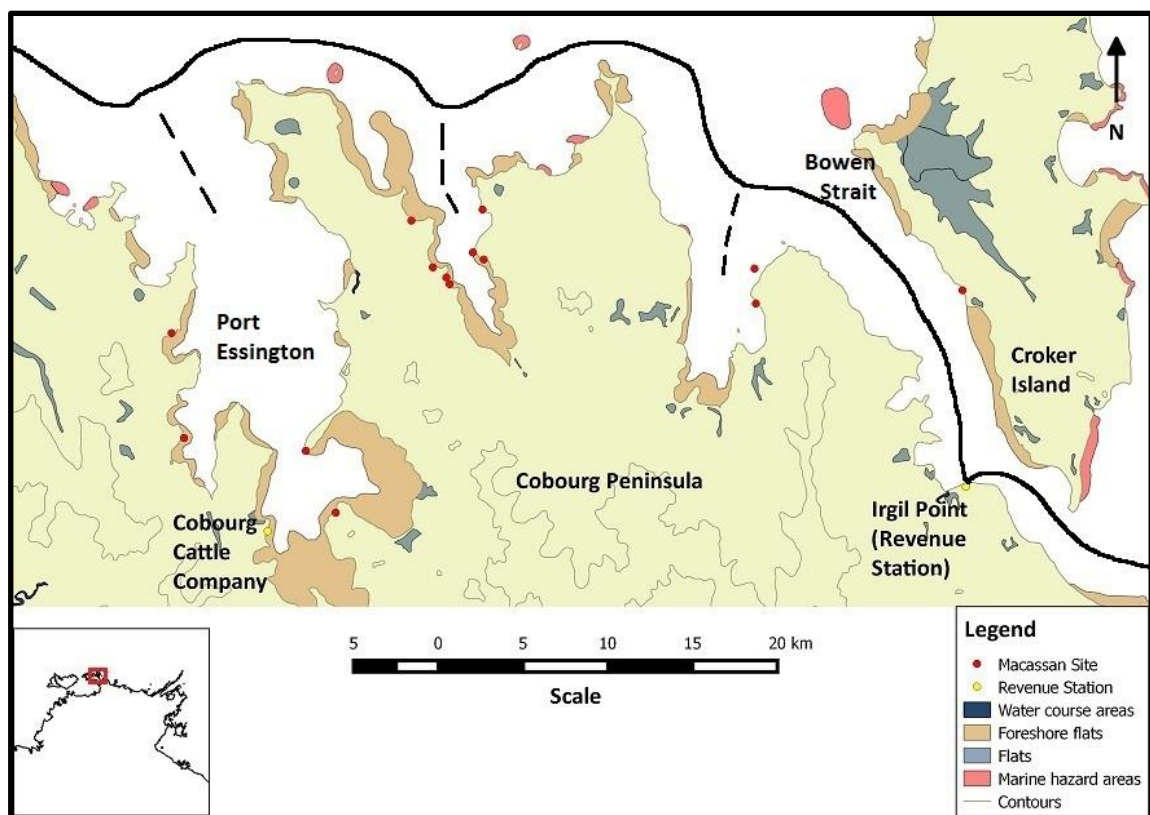


Figure 10.6 General Macassan travel route into the bays of the Cobourg Peninsula and through the Bowen Strait (sailing both east and west).

In viewing the northeast corner of the Arnhem coastline between the Gove Peninsula and the English Company Islands, no definite Macassan sites are present (Figure 10.7). An approximate route, however, can be determined through the historical record of the meeting between Matthew Flinders and Pobassoo in February 1803 at what Flinders named Malay Road (Flinders, 1814: 228–33). Sheltered from the open sea, Malay Road offered safe anchorages northeast of the open waters of the Gulf of Carpentaria where seven perahus are recorded as wrecked (Jung, 1992) (Figure 10.8). The cluster of Macassan trepang processing sites in the bays either side of the Gove Peninsula strengthens the likelihood of this route.

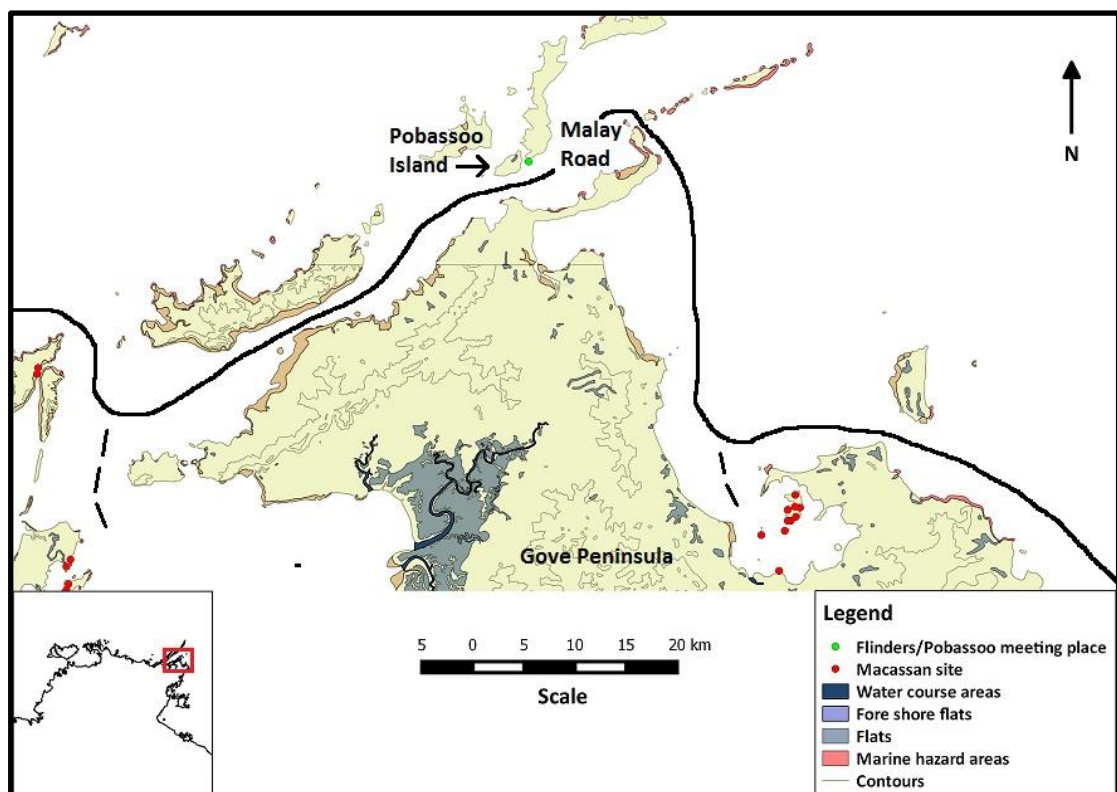


Figure 10.7 Place names of Pobassoo Island and Malay Road given by Flinders after his meeting with a fleet of Macassan praus suggest the approximate route taken by the Macassans despite the lack of archaeological sites in the immediate area.

Lacking the archaeological evidence of that of the Macassans, travel routes of the early European surveyors are determined instead through their charts. For the Dutch, partially charted coastlines including *The Discovery of Arnhemland, Australia, by the yacht Arnhem, 1623* (Wieder, 1670) (Figure 10.9) illustrate new travel routes in an uncharted seascape. New additions to the recorded coastline over time indicate the continuation of one-off surveys along similar travel routes, as is evident with the chart produced by Tasman (1644) including Arnhem Land (Figure 10.10). This chart also illustrates the emergence of the transport route as a dotted line that follows the coastline, along with soundings that measure the water's depth.

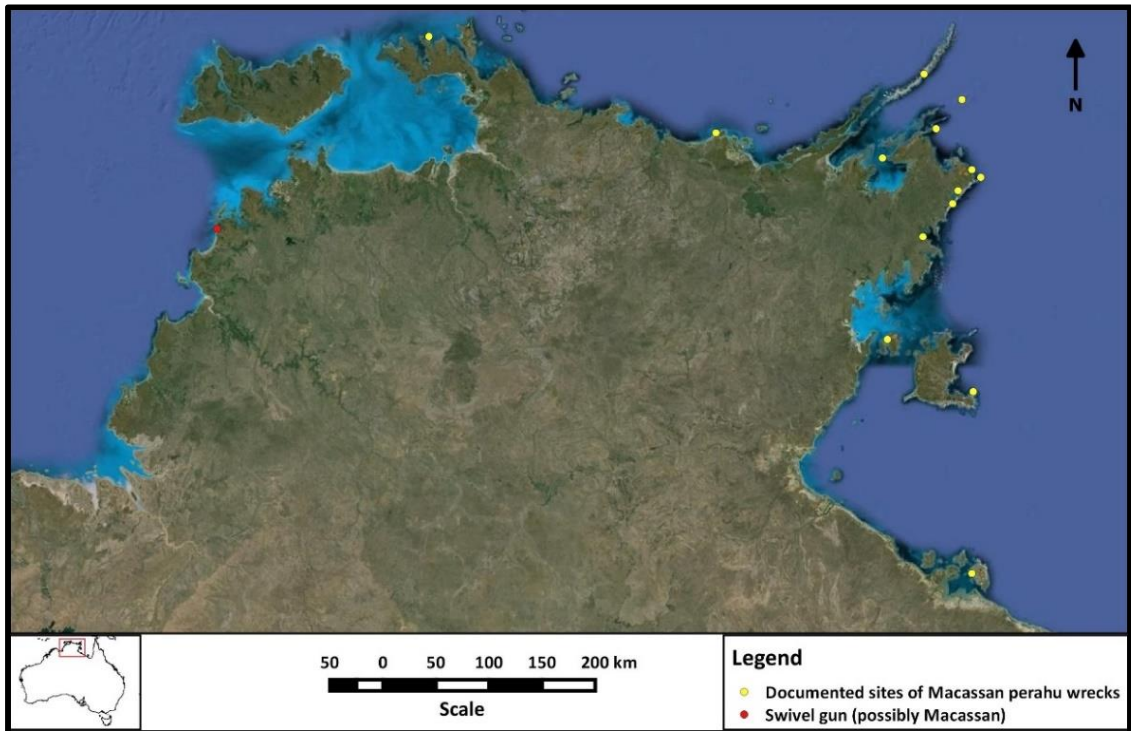


Figure 10.8 Possible locations of fourteen Macassan perahu wrecks compiled by Jung (1992) from historical and ethnographic accounts (Google Earth, 2013)

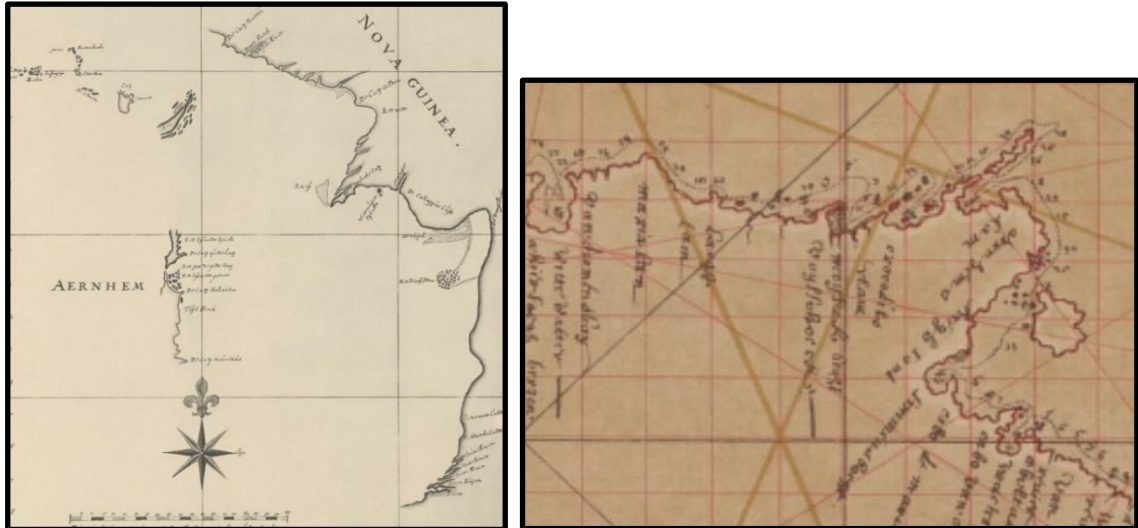


Figure 10.9 [Section of] *The Discovery of Arnhemland, Australia, by the yacht Arnhem, 1623* (Wieder, 1670)

Figure 10.10 [Section of] *Australia and New Zealand: from the original map made under the direction of Abel Tasman in 1644* showing the transport route taken by Tasman and soundings recorded at regular intervals (Tasman, 1644)

In using Dutch charts as guides (Flinders, 1814:169), later British and French charts show travel routes that incorporated geographic markers, times to travel based on winds and currents, places

to avoid due to marine hazards, and anchorages into the paper template of the maritime landscape (discussed in Chapter 8) (Figure 10.11). Coupling these markers with accompanying journals, potential sites along these transport routes may be located; the infamous Kilwa coins (East Africa) and four Dutch East India Company coins found on Marchinbar Island (Wessel Islands) in 1945 being one possible example (Past Masters, n.d.[a]).

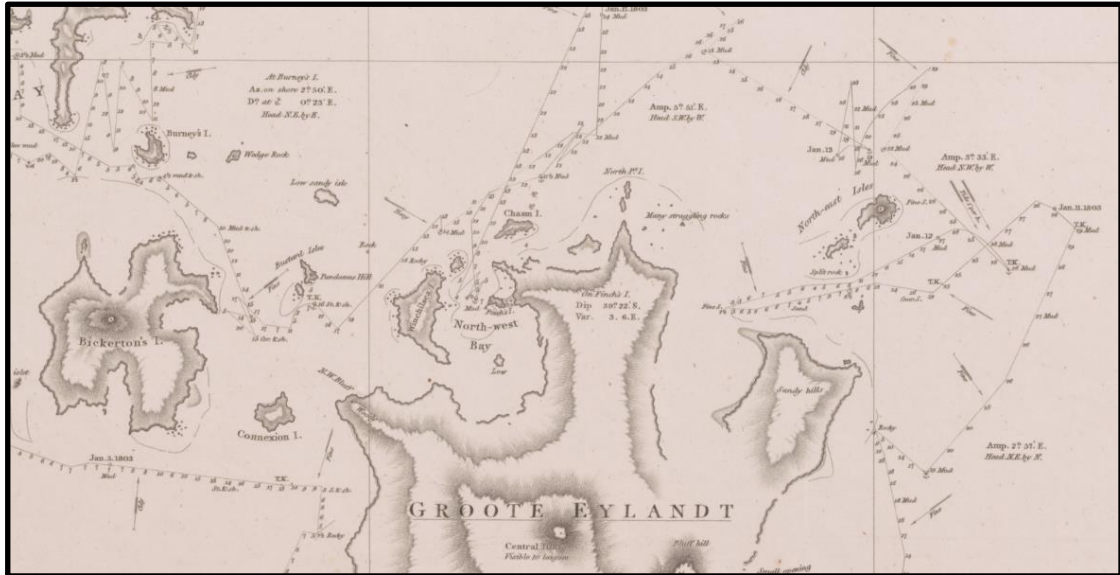


Figure 10.11 [Section of] *North west side of the Gulf of Carpentaria* (Flinders, 1814) showing transport route, soundings, marine hazards, anchorages, wind directions, date, topographic descriptions and place names

Where the Dutch were arriving at New Holland from the VOC East Indies capital of Batavia (present-day Jakarta, Indonesia), French and British surveyors were sailing from their respective countries via Port Jackson (Stokes, 1846a:6; Powell, 2010:41–106). Surveying the north Australian coastline thus meant resupplying the ships at the closest Dutch port of Kupang. These visits are shared in the journals of the surveyors (Flinders, 1814:250; Stokes, 1846a:8), yet the significance of the port as a place to replenish supplies is most visible in Flinders' chart of Timor and surrounding seas that would later assist King and Wickham and Stokes, along with the British garrisons and colonies (Figure 10.12).

As the first British sedentary occupiers of northern Australia, transport routes for the garrisons were based on the requirements of subsistence, which in turn influenced communication with the British Administration (Watson, 1917, 1923). As with the surveyors, determining these routes is based mostly on historical accounts, although the wrecks of the *Lady Nelson* and *Stedcombe* in the eastern archipelago, along with Chinese ceramics excavated at Victoria, provide small archaeological contributions to routes between the garrisons, the eastern archipelago, Singapore and Hong Kong.

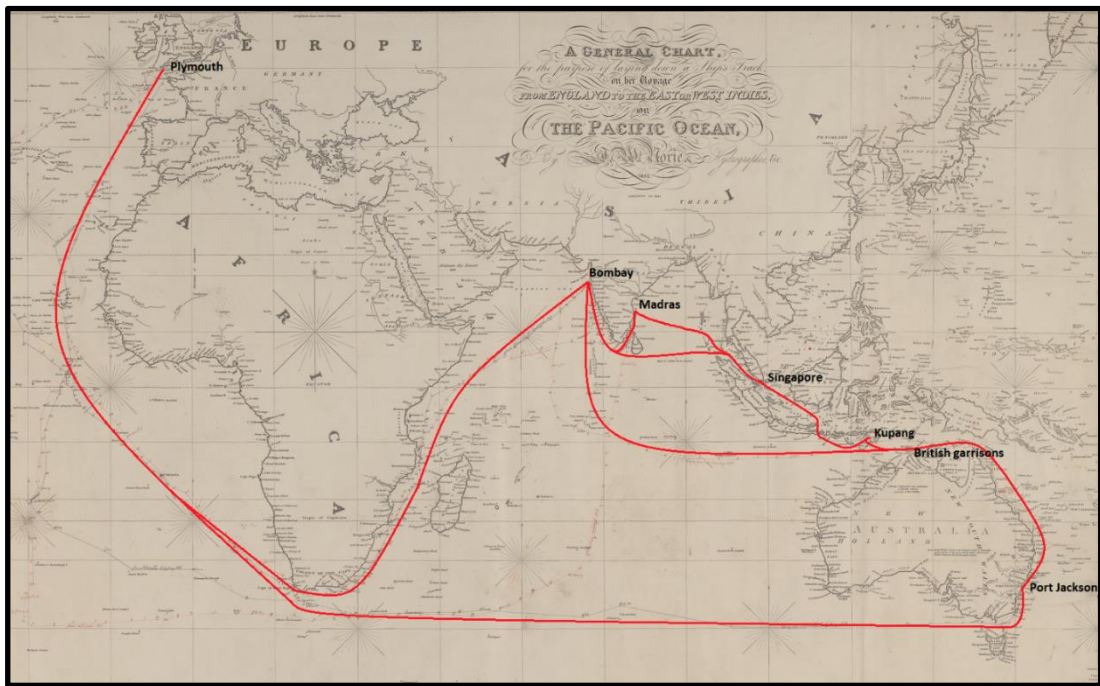


Figure 10.13 An example of British sailing routes between England and Australia in the early to mid-1800s. Vessels from England would sail to Port Jackson, the British garrisons, and return through maritime Southeast Asia and India (Norie, 1844)

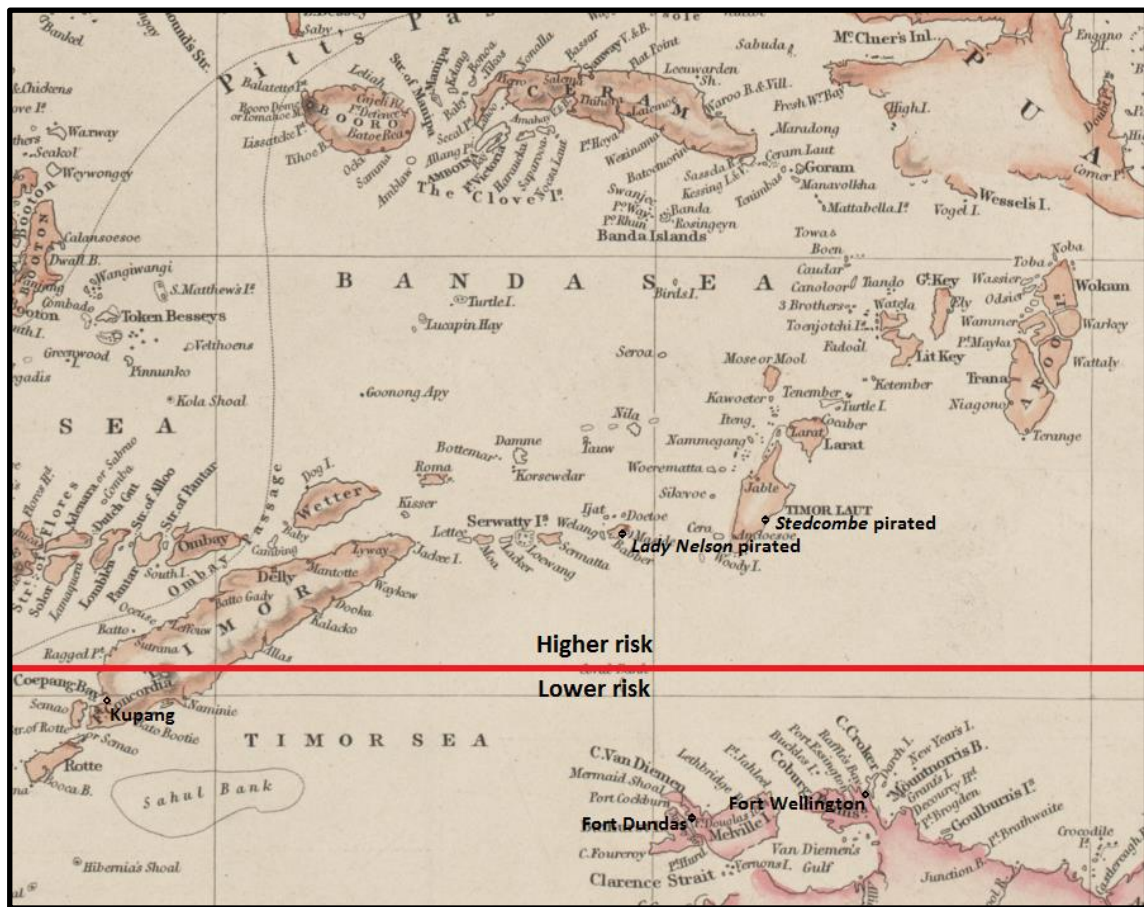


Figure 10.14 Approximate line that signifies the level of risk for the British garrisons of Fort Dundas and Fort Wellington ([section of] *Asiatic Archipelago* [Arrowsmith, 1848])

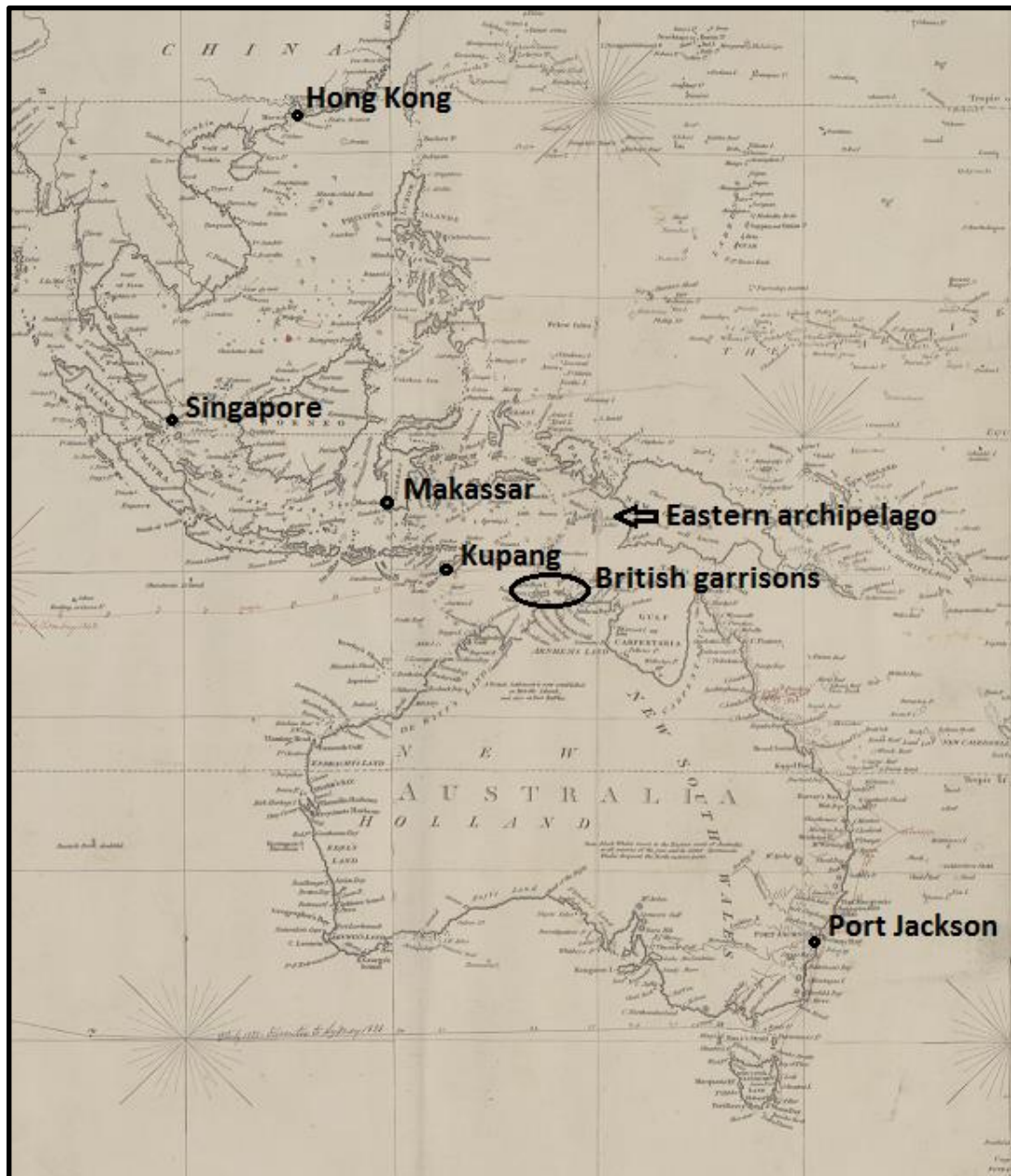


Figure 10.15 Primary sources of subsistence for the British garrisons. Port Jackson and Kupang supplied Fort Dundas and Fort Wellington, whereas Victoria was supplied by these and, to a lesser extent, islands within the eastern archipelago, Makassar, Singapore and China ([section of] Norie, 1844)

Most significantly for the garrisons, the locations of Fort Wellington and Victoria on the Cobourg Peninsula were influenced by the Macassan transport route. This shift east from Melville Island to Raffles Bay in 1827 was intended for the establishment of trading relationships with the Macassans that would extend to the eastern archipelago. That the Macassans were encouraged to move from the island within Raffles Bay to Fort Wellington, and were welcomed at Victoria, strengthens these intentions.

For Escape Cliffs and the early years of Palmerston's colonisation, Kupang continued as the primary port for both supplies and communication, along with the southern capital of Adelaide (South Australia. Office of the Government Resident, 1870–82 [1870:1]; Webling, 1995:24–9). From the 1870s, open sea transport between the southern colonies of Australia, the Dutch and British colonies of maritime Southeast Asia, and the British colonies of Hong Kong, India and England increased through the introduction and growth of steam ship companies (Steinberg, 2005a:17–22; Battersby, 2007:17–65). For Palmerston, this meant regular access to supplies and communication, which had fallen short at the garrisons and Escape Cliffs. The 1875 wrecks of the SS *Gothenburg* (501 tons) in Queensland waters en route from Palmerston to Adelaide (not discussed further), the SS *Australian* en route from Sydney to Palmerston and the SS *Brisbane* from Hong Kong to Palmerston are archaeological features of the increased movement of people along these routes (Steinberg, 2001; Powell, 2010:146) (Figure 10.16).

Travel between Palmerston, maritime Southeast Asia and China is linked directly to the opening of Chinese ports through the Opium Wars incited by the British 30 years prior. The Opium Wars, civil war and widespread famine in China led to the migration of thousands of Chinese people to the British ports of Singapore and Hong Kong in search of work. From these ports they were shipped off and employed as indentured labourers to work (for example) in the Northern Territory on government works or the gold fields. The wreck of the SS *Brisbane* and the three excavated Chinese wooden shoes highlight this route as significant to the Chinese history of the region (Steinberg, 2005a).

The development of Palmerston and the Top End region through maritime and terrestrial resource extraction and land cultivation saw an increase in coastal and river transport routes. These routes allowed more expedient movement of people, foodstuffs, livestock, construction materials and extracted resources through the landscape, avoiding the slower land route during the dry season and the floodplains and water-saturated lands that engulfed the country during the wet.

The use of rivers as transport routes is best exemplified by the use of the Roper River during the construction of the northern end of the Overland Telegraph Line between 1870 and 1872 (Powell, 2009:67–9). With 360 kilometres of the Overland Telegraph Line already constructed from Palmerston to King River by land, transporting materials and men by ship from Palmerston to the workers' depot at Patterson's Landing to continue the line south was an energy and time-saving alternative (Figure 10.17). This was despite the greater distance of around 1,500 kilometres' maritime travel compared to 595 kilometres by land. Steamships—including the SS *Omeo* of around 1,000 tons—were able to transport materials and men to Patterson's Landing with the assistance of the paddlewheel steam tug *Young Australian* (Powell, 2010:139–41). This

was despite significant risk due to the large size of the SS *Omeo*, which was mitigated through surveys of the river in 1868 (South Australia et al., 1868). Ironically, it was the smaller vessel *Young Australian* that became permanently stranded upriver in 1872. Although measures were taken to avoid risk of wreckage, obstacles such as submerged rocks were not always avoidable.

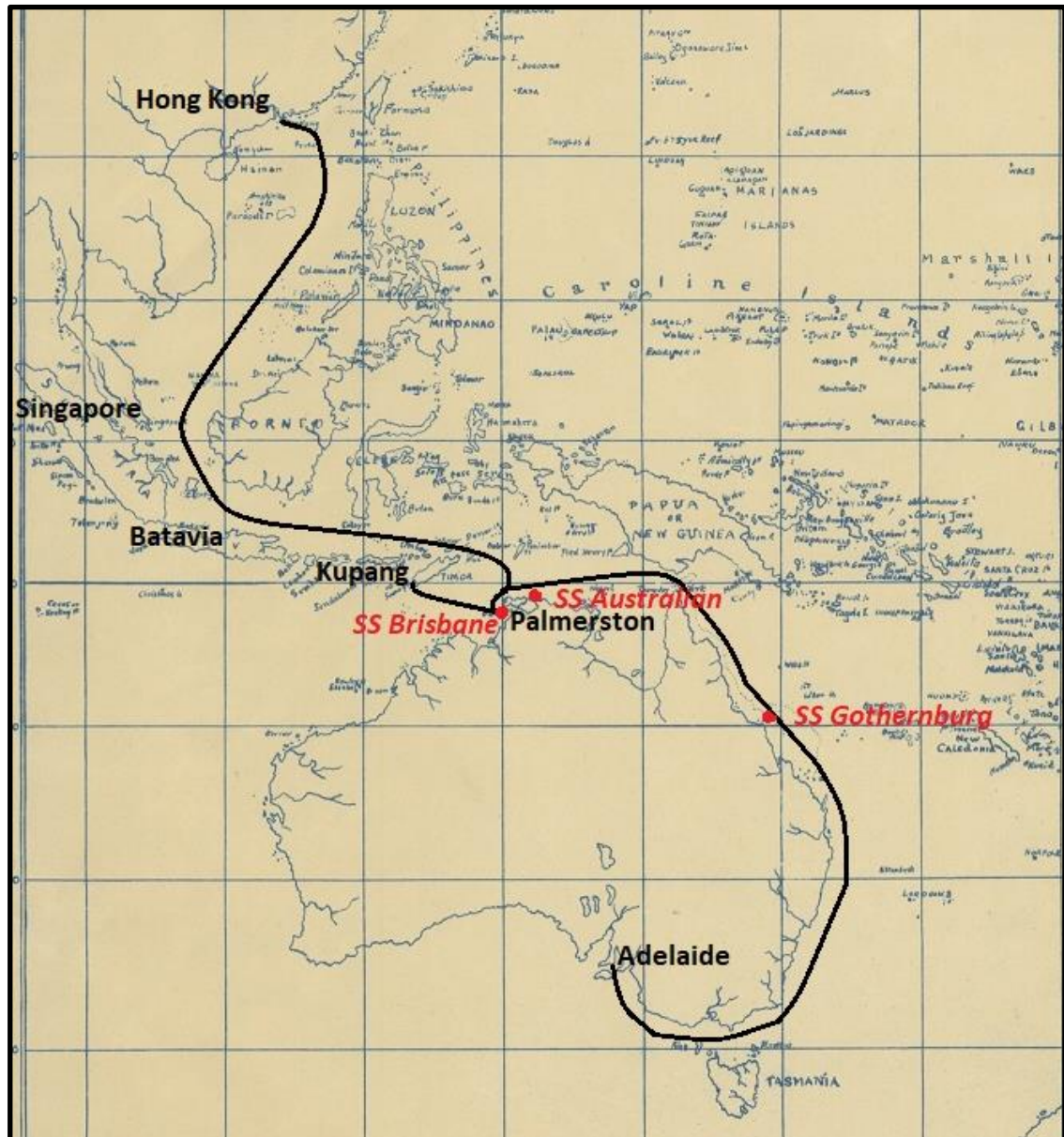


Figure 10.16 Map showing open sea transport route and associated shipwrecks (n/a, 1901)

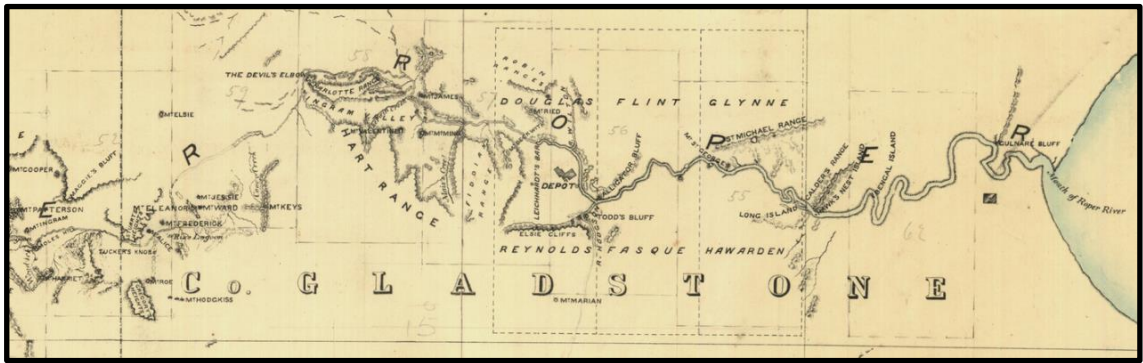


Figure 10.17 [Section of] Plan of Overland Telegraph from Port Darwin to Port Augusta showing the depot (centre of image) at Patterson's Landing 145 kilometres up river (Ringwood et al., 1873)

Other significant coastal and river transport routes (visible in Figure 10.18) from 1865 to 1911 were:

- Escape Cliffs to the first surveyors' camp via Adam Bay and Adelaide River
- Palmerston to Southport via Port Darwin and the Blackmore River
- Palmerston to Hang Gong's Landing via Port Darwin and West Arm
- Palmerston to Cliff Head and Channel Point or Sampan Creek for net-fishing via the coast
- Palmerston to the customs revenue station at Irgul Point via the coast
- Palmerston to Point Charles Lighthouse
- Macassan trepanging transport route (discussed previously)

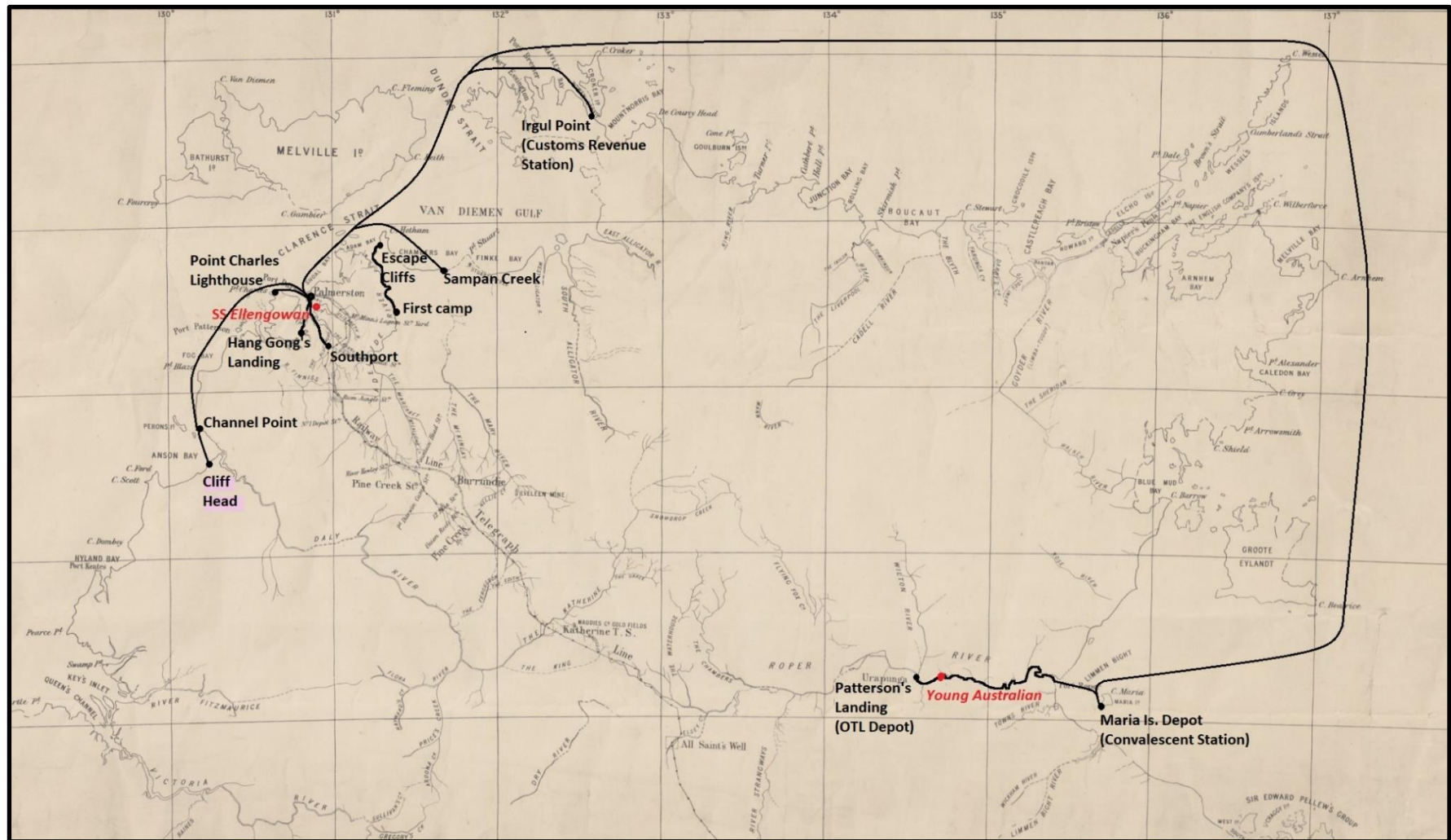


Figure 10.18 [Section of] Map shewing rivers of the Northern Territory of South Australia showing selected coastal and river transport routes and associated transit points and shipwrecks (Carrington, 1886)

10.4 Transit points

As a place of transfer either between two transport types or from water to land (Westerdahl, 1992:6), transit points for the early European surveyors are visible through tracking the movement of each ship simultaneously through chart and journal, enabling the possibility of future archaeological survey at these points. The earliest physical evidence of a transit point in Northern Territory waters was a wooden stake as a Macassan anchorage marker recorded by Tindale in 1926 at Bartalumba Bay, Groote Eylandt (Tindale, 1926:130–1). No longer visible at the time Macknight surveyed the region (1969b:185), the simplicity of the wooden stake reflects the ephemerality of the industry. This is in contrast to the more substantial transit points of the British garrisons.

Transit points are visible at all three garrisons as anchor symbols on contemporary charts. At these points, ships anchored in a sheltered bay close to the garrison to transfer passengers and cargo to shore by boat (Watson, 1923:389). At Fort Dundas and Victoria, jetties enabled a more expedient method of transit. Not extending past the low tide mark, however, these were only accessible at medium to high tide (Figure 10.19). Despite the location of Fort Dundas and Victoria deep within the strait and bay respectively, no transit point appeared to exist in the form of pilotage at the strait or bay mouth. Although Campbell (1834:134) recommended buoys be placed along the strait to mark a safe passage to Fort Dundas, it was at Victoria that a cairn was constructed at Smiths Point to alert sailors of the garrison to their proximity to land (Allen, 2008:5–55).



Figure 10.19 An example of a transit point at Fort Dundas. A ship would anchor at the recommended anchorages in King Cove as is represented by the anchorage symbols, then row or sail to the wharf at medium to high tide. If the tide was low, the transit point would include the shoreline. (Surveyor General, 1827)

Transit points for Escape Cliffs, Palmerston and the broader maritime region initially lacked physical infrastructure. More often, natural landing places such as rock ledges or mangrove clearings appear to have been used. Although not investigated archeologically, paintings, photographs and contemporary newspaper articles document the early landings and jetties of Port Darwin. An overview of these is provided by Clinch (1999) (Figure 10.20). The first landing at Flagstaff Hill, depicted in a painting by Hoare (1869), has two vertical poles rising from the sides of the jetty together to a point (Figure 10.21). This allowed the manoeuvring of goods from boat to shore and signalled the location of the jetty when submerged at high tide (as did the pole at the end of Hang Gong's Landing).

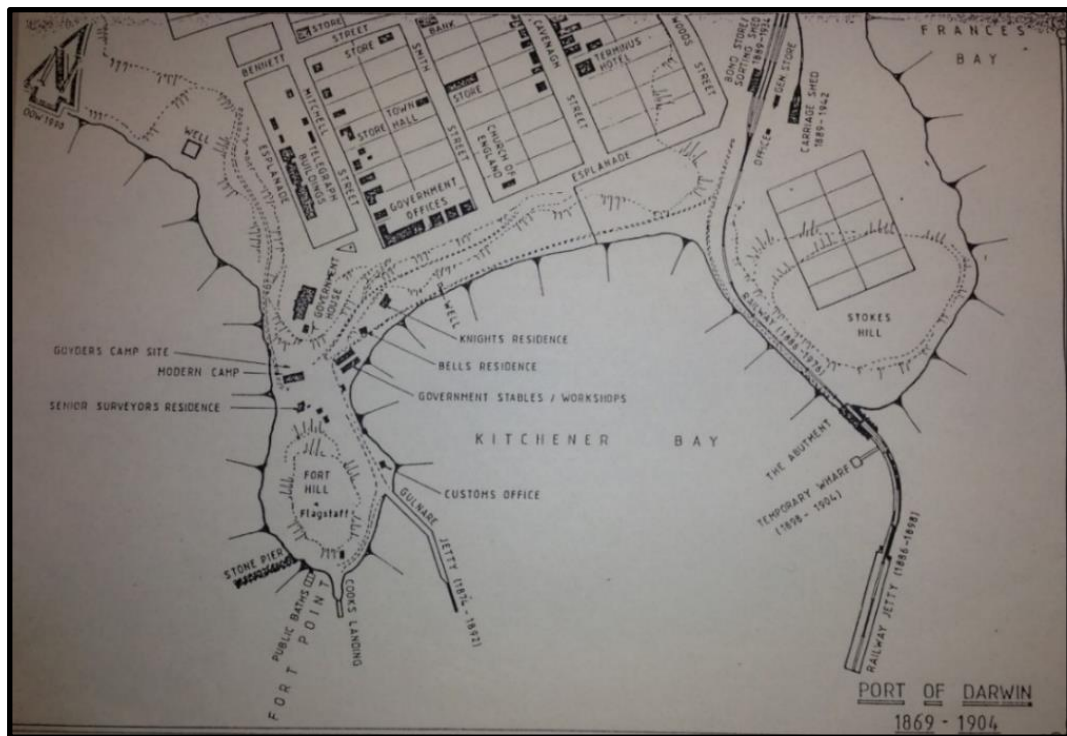


Figure 10.20 Map of Port Darwin and the development of maritime infrastructure from 1869 to 1904 (Clinch, 1999)



Figure 10.21 Darwin, 1869, Section of painting by William Webster Hoare, Surgeon's Assistant, Goyder's Survey, 1869–70 (State Library of South Australia)

Other early examples of maritime structures in Port Darwin include a ramp landing (Figure 10.22) and stone pier (Figure 10.20). These were followed by successive railway jetties from 1886 onwards that acted as transit points from ship to rail into the township of Palmerston and south to Pine Creek (as discussed in Chapter 8) (Figure 10.24). As the initial transit point between Palmerston and the Pine Creek gold mines, the consecutive jetties at Southport from 1873 onwards were built 16 years prior to the railway jetty at Port Darwin. This highlights the importance of Southport as a transit point between water and land prior to the construction of the railway that bypassed the town in 1889 and its steep decline as a transit point thereafter (Powell, 2009:74).



Figure 10.22 *The Estelle at Jetty, Port Darwin, 1878, Paul Foelsche (PictureNT)*

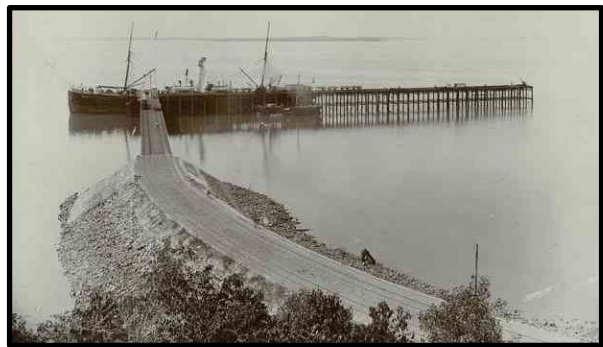


Figure 10.23 *Jetty, Port Darwin, 1904 (State Library of South Australia)*

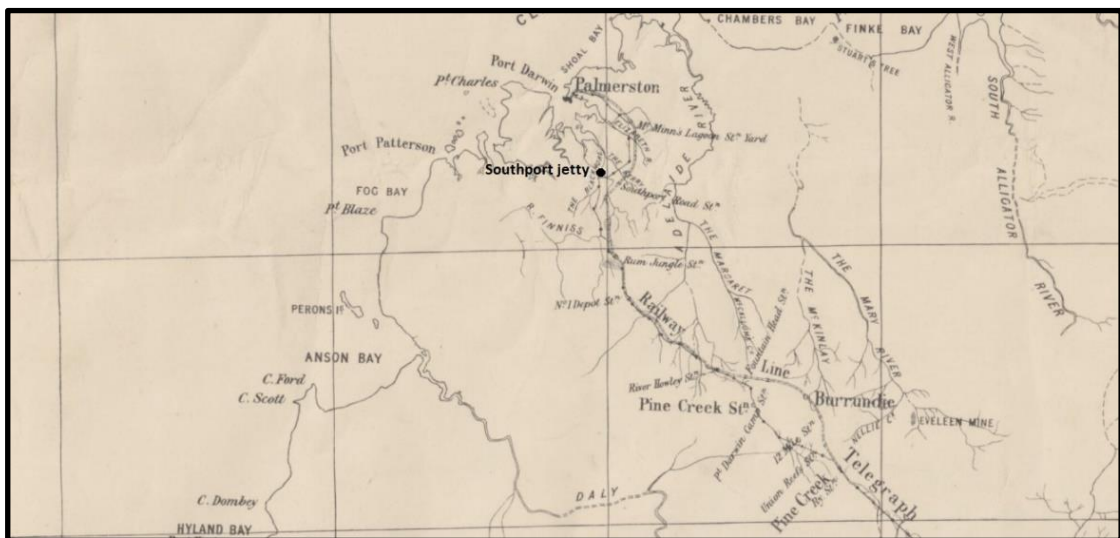


Figure 10.24 Map showing railway line from the transit point at Palmerston to Pine Creek, bypassing the initial transit point of Southport jetty ([section of] South Australia. Surveyor-General's Office et al., 1886)

The transit point from the West Arm estuary to the tracks leading to the Bynoe Harbour tin mines was Hang Gong's Landing. Prior to its construction in 1908, miners and machinery had to negotiate a steep, muddy embankment (Gregory, 1999:23). That a number of smaller

landings in this region are visible on the *Darwin and Environs* map (Figure 10.25), yet not archaeologically, point to the lack of substantial—if any—maritime infrastructure in the region aside from the primary Hang Gong's Landing. Topographical features such as a low rock ledge, gravel bar or clearing appear to have been used instead.

Other transit points that fall between the built structure of a jetty or wharf, or the use of the surrounding topography, were the ramps and causeways designed for smaller vessels. Examples of these are the landing sites at Point Charles Lighthouse, Channel Point at Anson Bay and at the Buffalo shooting camp at the site of Fort Wellington (Figures 10.26–10.28). Both close to Palmerston and remote, these landings modified the littoral zone through either a cutting within the coral/bedrock or through the addition of stones, and were generally linked directly to a small occupation site.

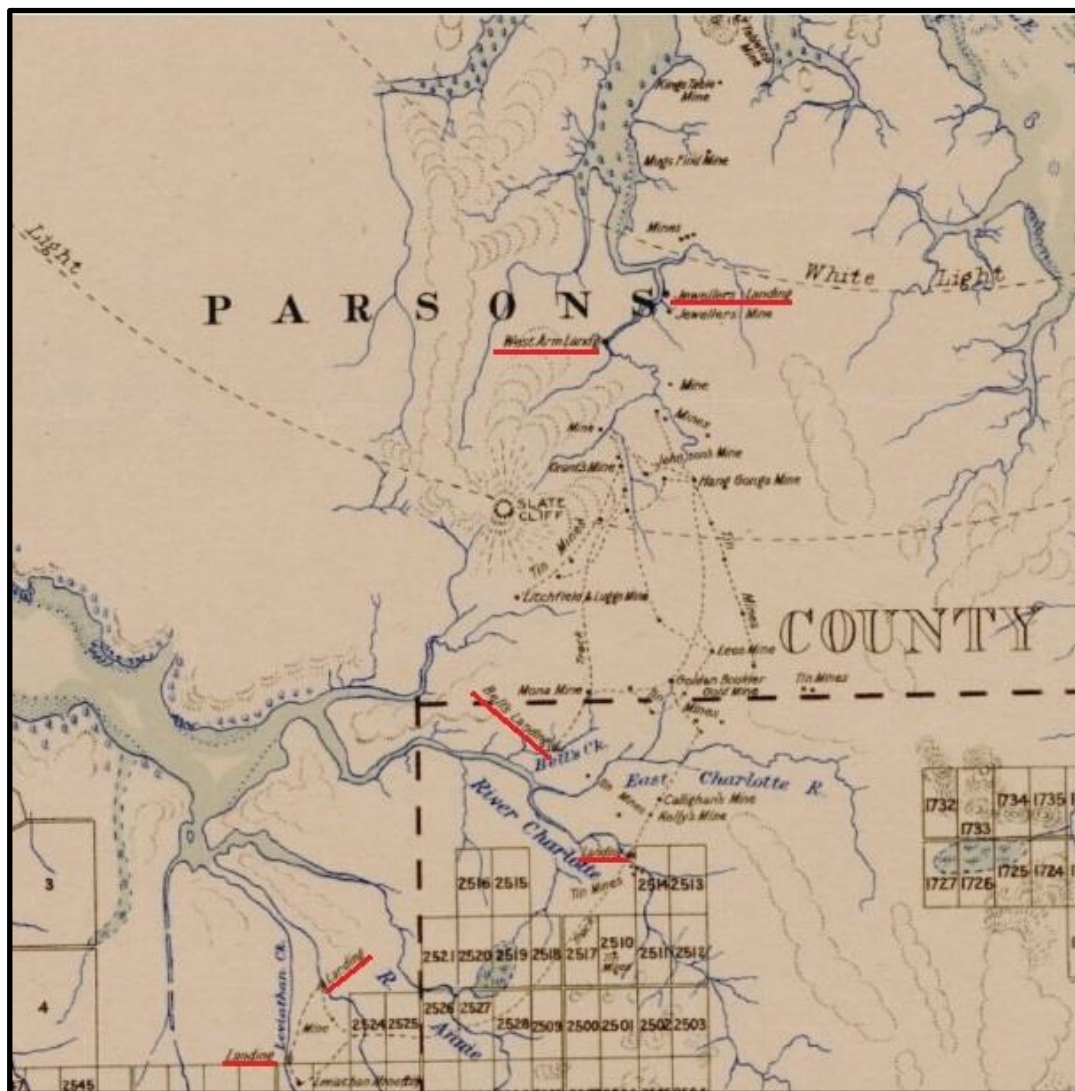


Figure 10.25 Section of *Darwin and Environs* map showing transit points as landings (underlined in red) accessed from Port Darwin to the north and Bynoe Harbour to the east (Australia. Department of the Interior. Property and Survey Branch, 1937)



Figure 10.26 Boat landing at Point Charles Lighthouse visible through the mangroves (Google Earth, 2014)

Figure 10.27 Boat landing at Fort Wellington created during its occupation by buffalo shooters (Past Masters, accessed 2020)



Figure 10.28 Sandstone rocks laid down to create boat landing cut into mangroves at Channel Point, Anson Bay (facing south)

10.5 Maritime enclaves

As a maritime community located far from the permanent settlement of Makassar, the Macassan trepang industry consisted of a number of seasonal maritime enclaves across the Marege coastline.

Based on site location and number of stonelines (Figure 10.29), larger enclaves were located at the Cobourg Peninsula, Anuru Bay, northeast Arnhem Land, the northern coast of Groote Eylandt and the Sir Edward Pellew Group. With the annual visitation of between 30 and 60 perahus moving between Cobourg Peninsula and Sir Edward Pellew Group (acknowledging that perahu numbers and extent of transport routes may be lesser or greater than these parameters), it may be stated that this section of coastline was indeed one extensive maritime enclave, and remained the largest in the Northern Territory up until the industry ceased operating.

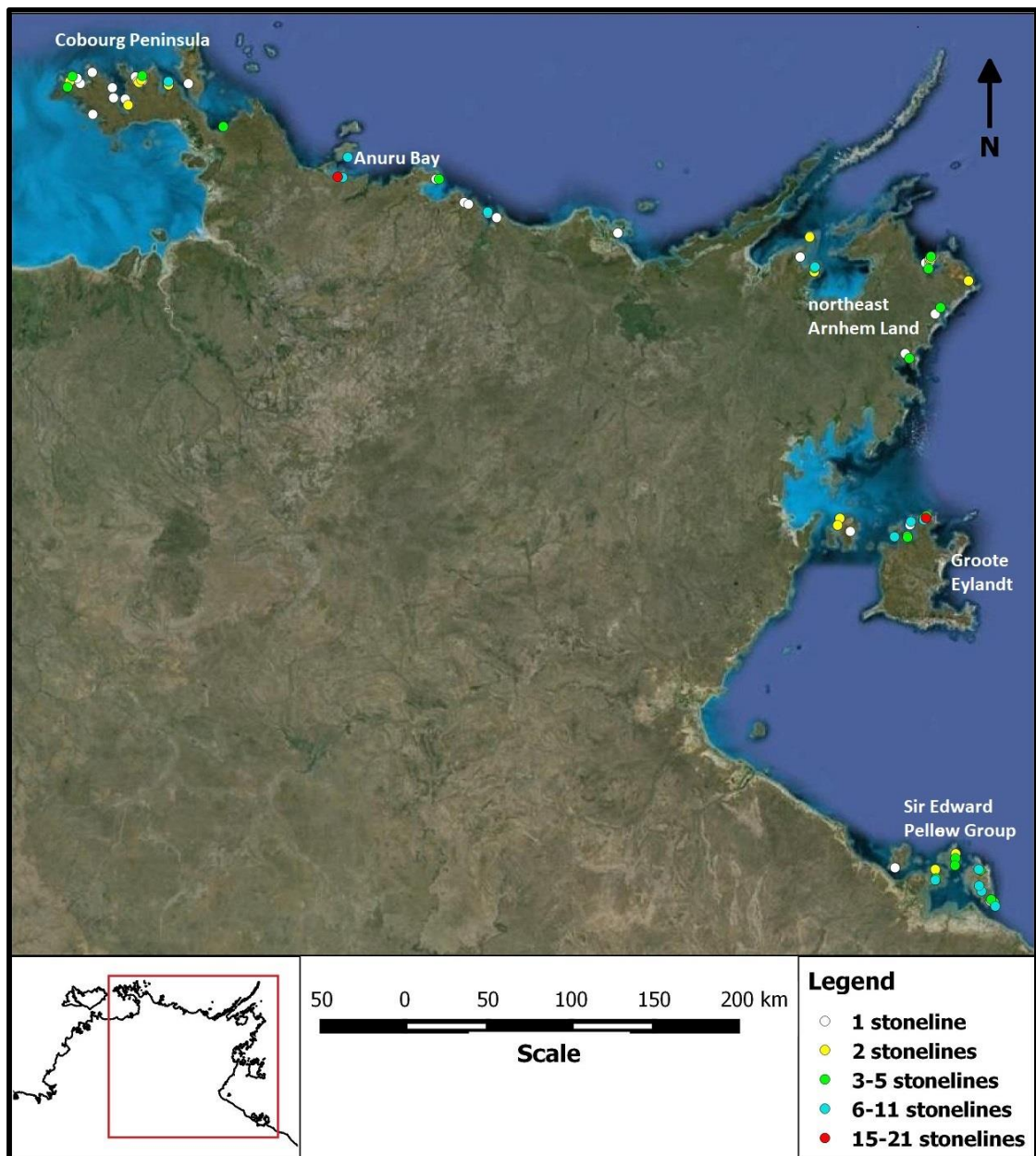


Figure 10.29 Macassan sites showing number of stonelines. Site clusters with a higher number of stonelines represent discrete seasonal maritime enclaves across the coastline (Google Earth 2013)

That the British colonies were largely within the bounds of Port Patterson, Adam Bay and the Clarence Strait meant that the maritime landscape from Cobourg Peninsula eastward remained the

enclave of the Macassan trepang industry. Physically placing the customs officer at Irgul Point to enforce duties and licence fees on the Macassans assisted in the cessation of the industry. During this time, the movement of non-Macassans into the region for the maritime extraction activities of trepanging, pearling and fishing led to the creation of a more diverse space, yet archaeologically, it is the trepang industry—undertaken during this time by both Macassans and non-Macassans—that is most prominent. Current research by David Steinberg (pers. comm.) on the presence of Japanese ceramics relating to the pearling industry, however, may alter this.

Closer to Palmerston, maritime enclaves for net-fishing at Anson Bay and Chambers Bay were established from the 1880s onwards. As is visible in Figure 10.30, these regions were both at a great enough distance from Palmerston for less competition, yet close enough to return in around a day's sailing to sell the smoked fish on to Chinese exporters in town (NTTG, 18 September 1896:3).

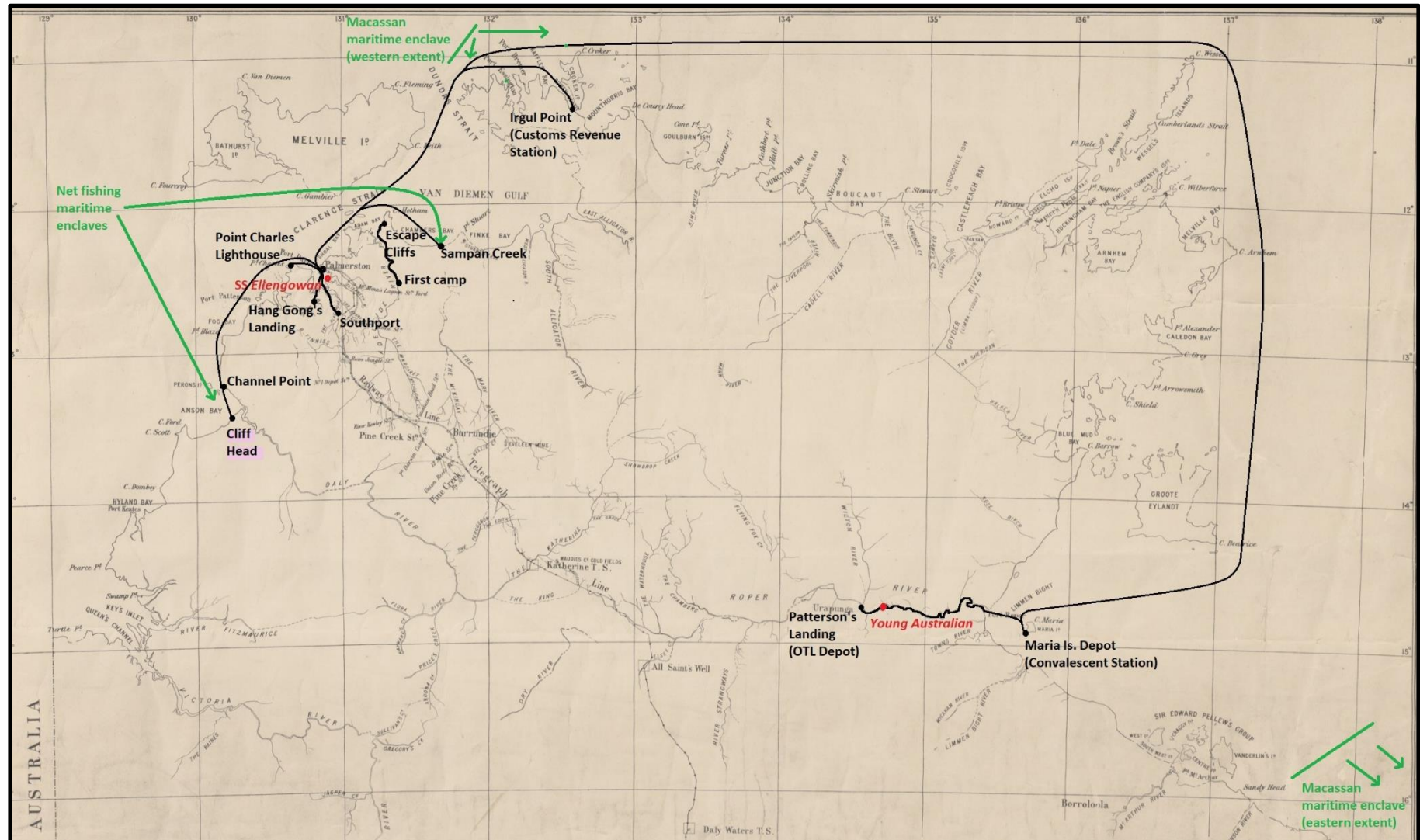


Figure 10.30 Maritime enclaves (shown in green) of the Macassan trepang industry and Chinese net-fishing ([section of] South Australia. Surveyor-General's Office et al., 1886)

10.6 Centre of maritime culture

Throughout its historical development, the Northern Territory's Top End was on the periphery of several maritime cultural centres. For the Macassan trepang industry, its namesake, Makassar, was its centre (see Figure 10.15). Further north, the Straits Settlements of Penang, Malacca, and especially Singapore, formed the maritime cultural centre on the northern periphery of maritime Southeast Asia that linked the British trading ports of India and China; a position that the garrisons had aspired to replicate. For the surveyors, British garrisons and colonies of the Northern Territory, their cultural centre was Kupang as an immediate source of subsistence and means of communication (Figure 10.31). Although Palmerston became a centre of maritime culture in its own right through its position within a developing region, its small population, coupled with its location on the peripheries of both the Australian colonies and maritime Southeast Asia, meant that the more populous entrepôts to the north continued to overshadow it.



Figure 10.31 [Section of] *Timor and some of the neighbouring islands* showing port of Kupang, Timor, as a maritime enclave (Flinders and Nicol, 1814)

10.7 Discussion

The way in which people moved through the maritime landscapes of the Northern Territory is reflective of the intentions of each group (geopolitical [colonisation], economic [survey, resource extraction]), their knowledge of the environment, and means of and access to transport. In applying

the descriptors put forward by Westerdahl (1992) of *transport types*, *zones of transport geography*, *transport routes*, *transit points*, *maritime enclaves* and *centres of maritime culture*, this movement is visualised through the historical record and archaeological sites both within the Northern Territory and further afield. Through this, the ephemerality of most of the maritime and terrestrial activities within the region becomes apparent through the minimal use of maritime infrastructure.

The archaeological record for the landscape of movement in the Northern Territory includes features and artefacts such as the 100 plus Macassan trepang processing sites; the Chinese ceramics of Victoria garrison; the physical remains of the *Lady Nelson* and *Stedcombe* in the eastern archipelago; the *Young Australian*, *SS Australia* and the *SS Brisbane* wrecks (and Chinese wooden shoes); Southport Jetty and Hang Gong's Landing; and the customs revenue stations at Port Essington and Irgul Point. These sites enable the interpretation of movement, with the historical narratives of charts, journals, paintings and photographs filling in the details of ships tracks, place names and evidence of maritime infrastructure and occupation. In stating this, the coastline of the Northern Territory has remained on the periphery, with its British occupants looking less to the southern colonies and more to the centres of maritime culture of Kupang, Singapore and Hong Kong as a means of subsistence, communication, and economic endeavours such as the importation of Chinese indentured labourers. In contrast, the Macassans arrived seasonally to the maritime enclave of Marege from the heart of maritime Southeast Asia.

Chapter 11 – Conclusion

11.1 Introduction

The Top End of the Northern Territory has a rich maritime history that connects its coastline with the islands of maritime Southeast Asia through the movement of maritime communities between the two regions. The culmination of archaeological research over the past 50 years highlights this, as does the early anthropological and later historical research into First Nations and British maritime histories respectively. In compiling these bodies of research into the first cohesive archaeological study, this research has identified aspects of the early historical development the Northern Territory that demonstrate a cultural landscape of maritime communities linked with maritime Southeast Asia.

The broad scope of this research in covering much of the coastline and estuaries of the Northern Territory over a number of centuries recognised the value of the maritime cultural landscape approach as a tool to examine and interpret the historical development of the region. Through this approach, the physical and cognitive aspects of coastal and riverine habitation/occupation sites, wreck sites, transport types/zones/routes, transit points, maritime enclaves, centres of maritime activity and place names emerged, leading to further aims of examining how each community adapted to its maritime and terrestrial environments, how these landscapes were shared over time, and the way in which people moved through the maritime landscape.

From the compilation of previous archaeological research, and that of the histories of the region, four historical phases emerged, being early European survey (1627 to 1839), the Macassan trepang industry (c. 1700s to 1907), the British garrisons (1824 to 1849), and the British colonies (1864 to 1911). The breakdown of these historical phases enabled the categorisation of the Northern Territory's historical development, yet the vast differences between each phase and resulting output of archaeological and historical data challenged the way in which each data set should be put forward and interpreted. An interpretive model based on the maritime cultural landscape approach moderated this to a point, with each historical phase presented through its physical environment, archaeological attributes, historical data, and the maritime/terrestrial activities undertaken by each community (set out in chapters four to seven). To interpret this data, thematic chapters based on the thesis aims followed, provided in a condensed format below.

11.2 Interpretation

For this thesis, the historical development of the Northern Territory as a cultural landscape of maritime communities connected with maritime Southeast Asia began with the recording of the mainland and island coastlines by Dutch, French and British surveyors. As yet, there is no identified archaeological material in the Northern Territory from the surveyors. Despite this, their presence had a massive impact on the future of this region through the physical output of charts from 1623 to 1839. Through these means, the Europeans adapted to this maritime landscape by transforming the unknown to the known in transcribing European place names onto almost every visible maritime and topographic feature. By 1839, charts of northern Australia created the illusion of an overtly British maritime landscape. In reality, however, this was a maritime landscape of First Nations communities already mapped out with toponyms and deeply embedded with cultural meaning, the recording of European survey ships at the Mount Wellington and the Arnhem Land Plateau rock art sites forming one part of this.

The recording of European survey ships at rock art sites acknowledges European movement through First Nations waters. European charts, however, failed to recognise First Nations toponyms. In contrast, British sightings of and interactions with Macassan fleets are portrayed through the positive toponyms of Malay Road, Pobassoo's Island, Malay Bay and Trepang Bay, with the route taken by King showing cautionary avoidance. Although not put to paper, place names such as Marege ('Wild Country') were also given by the Macassans.

Where each of the early surveyors charted the coastline generally once or twice, the annual visitation of the Macassans for well over a century is evident in the 100 plus sites from the Cobourg Peninsula to the Sir Edward Pellew Group. The selection of these sites, coupled with the account of Daeng Sarro, allows for the interpretation of their sailing route from the port of Makassar through the islands to the Tiwi Islands or Cobourg Peninsula, then eastward with the northwest winds. The gazetting of Macassan sites by Macknight, Cole and Baker shows a preference for site locations that included a sheltered beach/hinterland, close proximity to trepanging grounds, an adequate supply of firewood, and isolation or clear approaches (Macknight, 1969b:83–4). The high number of sites and known overall duration of visitation of not less than 100 years indicates adaptation primarily through site selection; the sheltered bays, islands and archipelagos of the Northern Territory providing the ideal environment both as a trepang habitat and place of procurement.

Longstanding trading relationships with First Nations peoples also played a prominent role in the longevity of the trepang industry. These connections are visible archaeologically through utilised

glass, lithics and shell middens at a minimum of 54% of trepang processing sites; the majority of these located around the Cobourg Peninsula and the archipelago north of Groote Eylandt where sites also have a higher number of stonelines. At a distance from these sites, rock art at Wellington Range, Bickerton Island and Groote Eylandt and stone pictures at Arnhem and Melville Bays provides a First Nations perspective of the industry through detailed imagery of perahus, trepang preparation features, and the Macassans themselves; with glass and stone beads from these and other rock art sites indicating one small part of a trading relationship where First Nations people were active participants (Wesley and Litster, 2015). Contemporary portraits of First Nations people in Makassar represent one of many historical and anthropological accounts that expands the shared landscape from the Northern Territory to maritime Southeast Asia through which both groups moved between long before the arrival of the British.

The economic interests of the Macassans in procuring trepang and trading with First Nations groups saw their presence at Marege as strictly coastal and seasonal. For the three British garrisons, however, their attempted permanent presence (albeit lasting only two to 10 years at each attempt) and coastal site locations were influenced more by geopolitical motivations in deflecting potential Dutch or French colonisation, although trade with the eastern archipelago through the Macassans was also encouraged. The charts and journals of Flinders and King informed the orders of site selection by the British Admiralty between the Tiwi Islands and Cobourg Peninsula due to the close proximity of this region to maritime Southeast Asia—which the Dutch had mostly colonised—and through their positions on or close to the Macassan transport route.

Site selections for Fort Dundas (1824–29), Fort Wellington (1827–29) and Victoria (1838–49) tell the story of adaptation over time through landscape learning. Fort Dundas' defensive position deep within the Apsley Strait on Melville Island was far from both the Macassan and British transport routes, with little visitation from passing ships. Although the move to Fort Wellington at Raffles Bay in 1827 led to relationships with the Macassans, initial poor leadership led to the premature demise of the garrison in 1829. The third and final garrison of Victoria, located in the originally-recommended Port Essington, had aspects of the two previous garrisons in being both on the Macassan trepanging route and deep within the port.

On a site level, all garrisons shared similar environmental characteristics in being on elevated coastal land adjacent to a (relatively) deep sheltered bay, with fresh water and fertile soil close by. The defensive positions and archaeology of Fort Dundas and Victoria support their roles as garrisons more than Fort Wellington. Without the benefit of support from the historical record, its features provide little in the way of information due to the ephemerality of the garrison (Taçon,

1988:19; Gregory, 1996:6). For all garrisons, their size of not more than 1.16 square kilometres, seaward outlook, and temporary occupation meant the requirement of adapting to their immediate landscape was greater than the Macassan trepangers, yet less than the colonies of Escape Cliffs and Palmerston. The presence of quarries at all sites, sawpits at Fort Wellington and Victoria, and lime kiln at Victoria indicates the use of local materials for construction, yet much of the infrastructure and supplies were imported from Port Jackson and Kupang. Adaptation is visible at Victoria through a change in building methods after a cyclone event and through the construction of convalescent habitation sites closer to the bay mouth where sea breezes were stronger.

As a maritime cultural landscape, the garrisons represented small short-term British defence outposts far from transport routes and isolated from their British compatriots through their geopolitical position on the peripheries of the fledgling colony to the south and the islands of maritime Southeast Asia to the north. Unlike the colony of Singapore that was situated on the direct trading route between India and China, the primary purpose of the garrisons was not trade. This incentive had been cut short early on through the pirating of the *Lady Nelson* and *Stedcombe* at Babar and Yamdena Islands respectively in 1825, resulting in a swift end to the presence of the British East India Trade Committee at Fort Dundas. The garrison instead became immobile until mid-1826 through the absence of transport; and later with the arrival of the *Mermaid* not risking to venture beyond Kupang for supplies. Fort Wellington might have succeeded as a trade entrepot had it not been disbanded prematurely. That Victoria was occupied for 10 years—coinciding with the opening up of the eastern archipelago—without establishing trading relationships with the Macassans or the islands directly, however, indicates that its geopolitical position on the southern periphery of the Dutch colony of the East Indies was suited to defence only. During this time, British initiation of the Opium Wars in China increased the movement of shipping people and goods between China, Singapore and the colonies, with the relatively high assemblage of porcelain artefacts (representing 14.1% of the ceramic artefacts) at Victoria reflecting this.

While the garrisons were looking to sea, the newly-acquired Northern Territory of South Australia was colonised for the cultivation of land. The British colonies of Escape Cliffs (1864–67) and Palmerston (1869 to present) saw similarities to the garrisons in the environmental characteristic of elevated coastal land, with Palmerston also having sheltered anchorage, fertile soil and fresh water. Although Escape Cliffs was an anomaly in its poor location choice on a peninsula surrounded by seasonal wetlands and a turbulent bay, it may be viewed as similar to the garrisons in the human element of site selection and leadership. As with Fort Wellington, Escape Cliffs was potentially only ever a temporary habitation site until a more suitable site was located. This is suggested through historical narrative, along with the short duration of each site of only a few years, the almost complete removal of material upon abandonment, a consequence of which

is their lack of archaeological material. Both sites also had initial poor attitudes towards First Nations peoples, yet relationships at Fort Wellington improved through the appointment of Captain Barker, influencing the continuation of good relationships at Victoria.

The colonisation of Palmerston successfully realised the shift for the British from the temporary occupation of First Nations land to the permanent. From this point, the British landscape emerged through land survey where British place names filtered inland from the coast. Although First Nations names appeared on Goyder's map to distinguish territories, these were overlaid with land allotments covering 2,660 square kilometres that would inevitably be occupied by white settlers. Land allotments and townships were mapped out through survey. The riverside location of Southport en route to the Pine Creek goldfields saw it develop into a prominent, albeit temporary, township prior to its sharp decline after the railway bypassed in 1880. Its initial layout of streets remains the same to this day.

Once surveyed, a number of prominent maritime and terrestrial activities shaped the maritime cultural landscape of Palmerston and the greater region, mostly through the indentured labour of a large Chinese population. The geographic position of Palmerston between South Australia and Java saw to its selection as the primary transit point for the Overland Telegraph Line and subsea cable within its first year of occupation. Due to the seasonally unnavigable terrain, materials and men were transported by ship east around the coast and up the Roper River. The 1872 wreck of the government paddlewheel steam tug, *Young Australian*, almost defying belief when it had helped so many much larger vessels successfully navigate the river without injury. More generally, smaller sailing vessels including the flat-hulled sampan were used to access and support the extractive activities of gold mining at Pine Creek via the transit point of Southport, and tin mining on the Cox Peninsula via Hang Gong's Landing and other smaller landing sites. Maritime extractive industries such as pearling, net-fishing, and the increase of non-Macassan trepanning, saw the movement of people across the coastal regions, with most engaging in a number of seasonal and year-round activities—including buffalo hunting—to increase revenue.

Movement throughout the coastal and inland maritime environments of the Northern Territory during this time offered advantages over the more arduous option of overland travel, yet also presented unique challenges to the new arrivals. The coupling of the high tidal range and extensive foreshore flats along the coast and inland through the tidal rivers and creeks meant that ships and large boats with a 'v' hull were required to anchor in bays of sufficient depth to avoid beaching at low tide. Despite the construction of Gulnare jetty in 1874, boats transported people and goods from larger ships to shore, optimally at high tide to avoid traversing the muddy foreshore flats. The construction of the Railway jetty in 1886 relieved this to a point, although

teredo worm and cyclone events reduced it to sticks on a number of occasions. Southport Jetty (1873) also required constant repairs due to deterioration, and a second, lower, platform due to it being built too high for any but the highest tide. By 1908, Hang Gong's Landing showed adaptation to the maritime environment through the construction of both high and mid-tide landings built from the durable cypress pine; evident in its extant presence today.

Fortuitously for Palmerston, its colonisation coincided with the introduction of steamships that shifted it from the periphery to a port of call between the British colonies to the south and the Dutch and British colonies of Asia to the north. The increased movement of people between the colonies included the importation of thousands of Chinese indentured labourers from the entrepôts of Singapore and Hong Kong to work in the Northern Territory's mines and on government infrastructure projects. Archaeological research at the Pine Creek goldfields and Bynoe Harbour tin mines has documented a rich history of Chinese life from the 1870s onwards. As a landscape of movement within the broader geographic region of maritime Southeast Asia and Australia, the wrecks of the *SS Brisbane* and *SS Ellengowan* also contribute to the history of Chinese migration and mark the underlying currents of what is now recognised as British slave labour. Further to this, the 1875 wrecks of the *SS Australian* at Cobourg Peninsula while en route from Sydney to Palmerston and the *SS Gothenburg* in Queensland waters travelling from Palmerston to Adelaide represent the increased movement of people along these routes (Steinberg, 2001; Powell, 2010:146), with the late arrival of the Charles Point Beacon/Lighthouse and Emery Point Lighthouse addressing maritime safety within and around Port Darwin after the *SS Brisbane* was wrecked just outside the harbour in 1881.

The increased movement between maritime Southeast Asia and northern Australia from the 1870s onward that led to the development of the Northern Territory as a region more closely related to its island neighbours than the colonies to the south was ironic in face of continued and increasing racism from the new British Australians. This is exemplified by the White Australia policy coinciding with Federation in 1901, resulting in a significant increase in Chinese deportation. Within the maritime landscape, this racism is most visible at the revenue station site at the Coburg Cattle Company in Port Essington, and at the later, more strategically situated, site at Irgul Point, where customs officers intercepted Macassan perahus for the payment of duties and taxes, ultimately ending the Macassan trepang industry in 1907. In spite of this, the rise of Chinese business in Palmerston, partially through the export of gold, tin, pearl, cured fish and trepang, and the increased movement of people via steamship to the island colonial ports, saw the links to maritime Southeast Asia continue up to 1911 and on to the present day.

11.3 Future research

The compilation, analysis and interpretation of known historical archaeological sites across maritime Northern Territory up to 1911 has enabled the interpretation of the historical development of the region as a set of distinctive maritime cultural landscapes all linked to the broader geographic region of maritime Southeast Asia. This thesis, however, has only skimmed the surface of what is a rich maritime cultural landscape awaiting further research, areas of which include:

- the revisitation and rerecording of the 200 plus Macassan sites, especially those that are not yet conclusively identified as of Macassan origin
- further cataloguing and analysis of the British garrison (especially Fort Wellington) archaeological collections held at the Museum and Art Gallery of the Northern Territory
- the pirating sites of the *Lady Nelson* at Yamdena Island and *Stedcombe* at Babar Island in the eastern archipelago
- archaeological research into the failed colony at Escape Cliffs and the associated depot on the Adelaide River
- Point Charles and Emery Point lighthouses (the closure of Point Charles to the public due to asbestos perhaps preserving a potentially rich archaeological environment)
- the Maria Island depot/convalescent site and Patterson's Landing for the Overland Telegraph Line (not located by the author)
- the Chinese fishing industry that spanned the coastline from Anson Bay to Chambers Bay and the possibly related site of the Channel Point stone landing. Potential sites may exist at Channel Point and Cliff Head at Anson Bay, and at Sampan Creek in Chambers Bay
- secondary landing sites within Bynoe Harbour tin mines.

Factors working against further research in this region include the closure of the Anthropology Department at Charles Darwin University (Fredericksen and Walters, 2002), the remote locations of many sites, and the continual destruction of coastal sites in the monsoonal environment of the Top End. Despite these odds, a number of archaeologists continue with research that falls both within and outside the scope of this thesis. The project *Before Cook: Contact, negotiation and the archaeology of the Tiwi Islands* (University of Canberra, 2021) will contribute to the Tiwi history of Macassan (and potentially Portuguese) visitation in this region (Daryl Wesley, pers. comm., 12 December 2019). Focusing on the more recent past is David Steinberg's doctoral research into the wreck of the *Sanyo Maru* and Japanese pearling in the Northern Territory (David Steinberg, pers. comm., 12 January 2021). More broadly, the Past Masters team of archaeologists have undertaken research projects across the Top End since 2012; articles on their website cover many aspects of the historical development of this region and beyond (Past Masters, n.d.).

11.5 Conclusion

Through the four historical phases, the Northern Territory has had a continuing connection with maritime Southeast Asia that has shaped its history over the course of time. Of these connections, it is the Macassan trepang industry that is most visible archaeologically, with the influence of longstanding First Nations-Macassan relationships still visible today. The encroachment of the European surveyors, British garrisons and British colonies—the latter encouraging, then repelling a large Chinese population—shaped the physical maritime cultural landscape little. The ephemeral nature of each group, coupled with a destructive monsoonal environment, left behind only the better built habitation sites, and maritime infrastructure, and the occasional wreck. In compiling contemporary charts, historical narratives, and oral accounts, these maritime cultural landscapes come to life through the interpretation of each group's methods of adaption to their physical location and broader maritime landscape, how each landscape was shared, and the way in which they moved through the maritime environment both locally and regionally. In this sense, in the broader maritime cultural landscape of northern Australia, maritime Southeast Asia may be viewed as one of a number of moving parts based on economics, geopolitics, and cultural inclusion and division. When the Northern Territory was handed to the Commonwealth in 1911, its speed of development had decreased sharply through the rise in British Australian racism that saw the loss of the Macassan trepang industry and much of the Chinese population. The perpetuation of a white Australia has seen to the almost dormant state of this history for nearly a century despite continued research into its many parts, yet as the tide has now turned, past connections between these worlds is once again recognised, encouraging the continuation of research into the future.

Appendix 1 – List of creative commons sources

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Appendix 2 – Supplemental data archaeological sites Z52

Excel list of Map Grid of Australia (MGA) Z52 archaeological site coordinates and attributes retrieved from Northern Territory Heritage Branch, theses, reports and articles (detail varies depending on available information)

Appendix 3 – Supplemental data archaeological sites Z53

Excel list of Map Grid of Australia (MGA) Z53 archaeological site coordinates and attributes retrieved from Northern Territory Heritage Branch, theses, reports and articles (detail varies depending on available information)

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