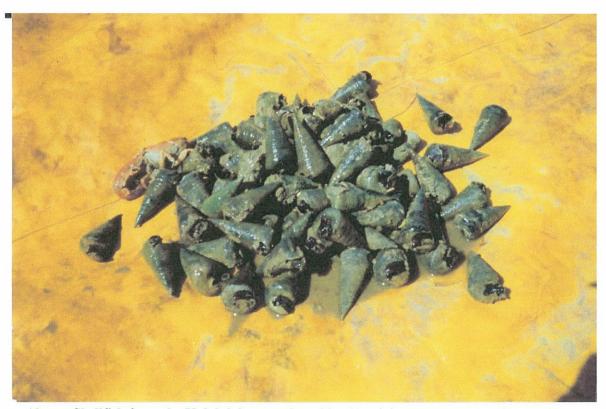
Land Use Field Study of the Kulaluk Area.

by Krimhilde Henderson

1983



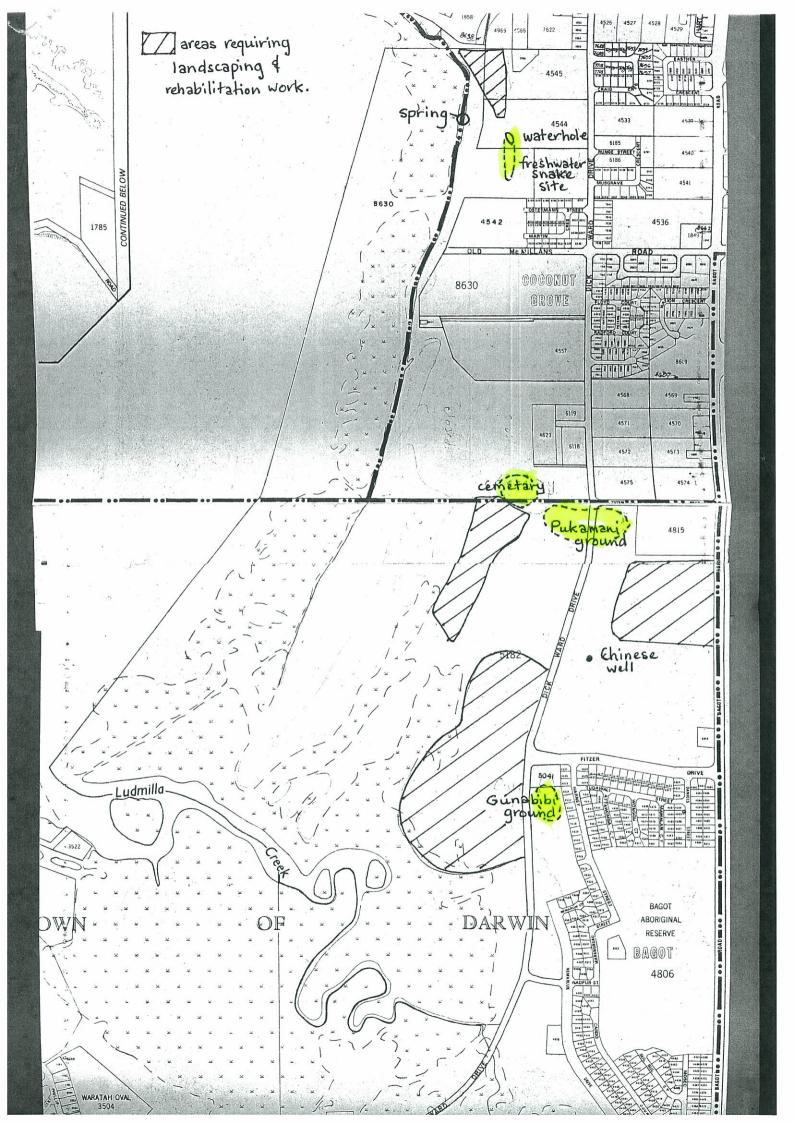
Above: Shellfish from the Kulaluk lease gathered by Aboriginal people as subsistence food.

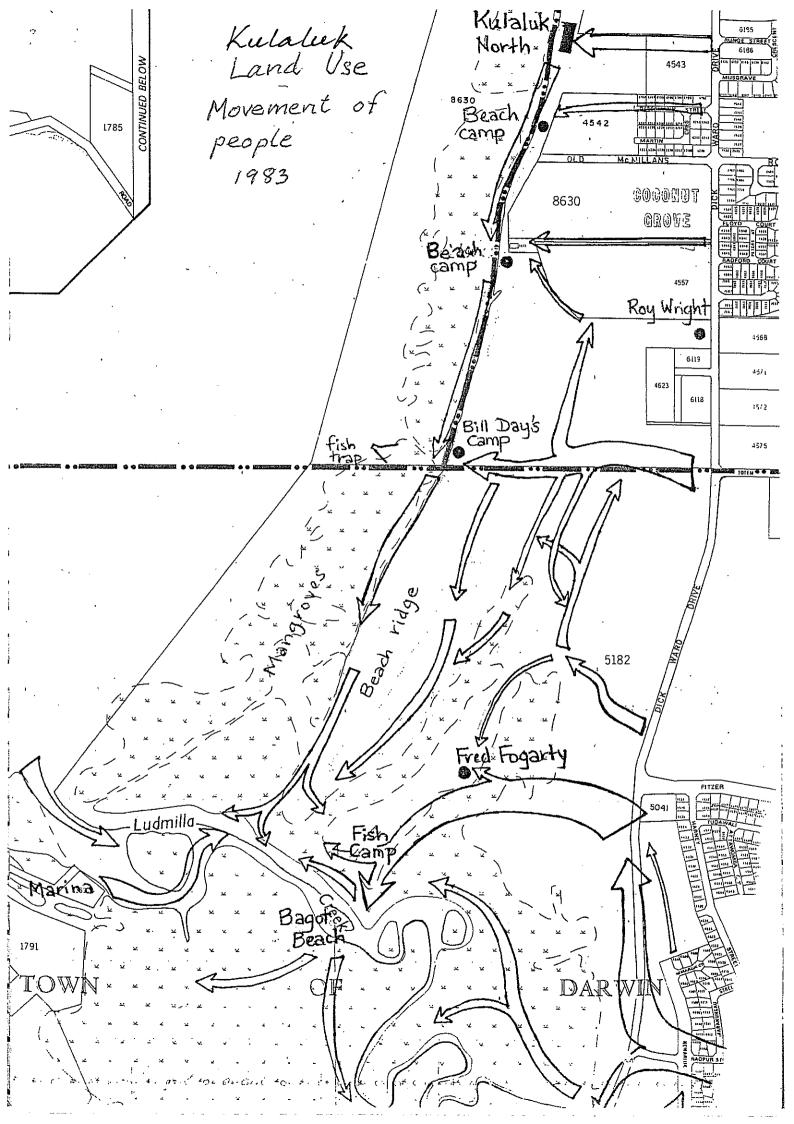
Aboriginal Sacred Sites Protection Authority

Darwin

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Ref: AS.81/147

26 March 1982

The Secretary
Gwalwa-Daraniki Association
P.O. Box 3970
DARWIN NT 5790

Dear Sir/Madam,

Recently it was brought to the attention of the Aboriginal Sacred Sites Protection Authority that a Gunabibi ground is located on Kulaluk Community land, south of Fitzer Drive and just east of Dick Ward Drive (see enclosed map).

Guwaykuway, a North East Arnhem Lander from the Naymil/Datiway clan group, now living at Bagot, says that the site was used during the 1950's and although no longer active is still out of bounds to all women and children. Other North-East Arnhem Landers consulted, including Wesley Lanhupuy from the Northern Land Council, agree that the prohibition on access by women and children still applies to the site.

The Aboriginal Sacred Sites Protection Authority has not received a formal request to register the ground as a sacred site, and as the area concerned is already Aboriginal land this action seems unnecessary. However, in the light of the recent rezoning of lot 5182 to a Special Planning Instrument Zone, the Authority seeks to pass on the above information to the Gwalwa Daraniki Association to assist in any future planning decisions for the area.

The map enclosed also outlines the area behind the Reta Dixon Home, used by the Tiwi as a burial place. If you need any further information please contact me.

Yours faithfully,

David Ritchie

David Ritchie Consultant Anthropologist

LAND USE FIELD STUDY OF KULALUK AREA.

1:0 PROJECT PURPOSE

The field study was proposed to establish the importance of the area to Aboriginal residents and visitors in Darwin. The Kulaluk lease is a valuable and regularly used recreational, nutritional and educational resource primarily because of its proximity to Bagot Reserve, but people from all over the Darwin area come to fish in Ludmilla Creek.

To most residents of nearby suburbs it is obvious that the creek is an important recreation area for Aborigines staying at Bagot Reserve, as people walk from there to the lease area across Dick Ward Drive on most days. The amount of time people spend in the area, the range of food resources procured and other activities are less well known, however, so a simple documentation of the variety of peoples' activities over a short period of time was undertaken.

1:1 Future Planning

The effect that any new developments will have on Aboriginal land use of the area must be the primary consideration in any future plans for Kulaluk lease and surrounding land. The recreation opportunities for residents of Kulaluk and Bagot, particularly those who do not have access to vehicles, will be affected by deterioration in the environment or reduction in the extent of natural areas on the leaseholá.

The growth of Darwin has brought pressures for development on inner city areas previously considered unusable. These developments include residential, recreational and public utilities. The Kulaluk area has been no exception and it is likely, despite the unsuitability of Kulaluk for extensive residential purposes, that these pressures will increase in the future.

2:0 THE SURVEY

The survey was designed to obtain a record of the numbers of people visiting the Kulaluk lease area and Ludmilla Creek over the four week period of the June-July 1983 school semester holidays. Attention would be paid to the range of resources utilised and the techniques involved in procuring them, where the people who use the area come from, and the composition and interaction of these user groups.

While this could not be exhaustive, an indication of the diversity

of activities and the frequency of visits was obtained. The popular areas were visited on most days, in particular the "Fish Camp" or "Bagot Beach" fishing area on Ludmilla Creek (see Map 1). Bill Day's camp is a popular place with the many children who regularly spend hours playing there or just visiting. Mr Day agreed to keep a diary of the number of visitors over the period. Other residents of Kulaluk in a position to observe the movements of people provided useful

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Many people visit Kulaluk North but because of time limitations a record of their numbers could not be taken.

2:1 Seasonal Changes in Land Use

The information derived from this one month dry season survey is part of a longer term study of the seasonal cycle of Aboriginal land use around Darwin. The nature of the recreation environment is subject to dramatic changes from the wet to the dry and the numbers of people staying on and using the Kulaluk area varies accordingly.

Quite clearly bush food procurement is dictated by the seasonal availability of resources, but whether people recognise the familiar environmental cues to seasonal changes and maintain traditional patterns of resource utilisation accordingly is more difficult to determine.

2:2 Population

information.

The population of the Kulaluk lease varied in terms of the total numbers and the individuals present. There is, however, a core of permanent residents and an average number of visitors. The total number was around 45-50 during the study period. The distinction between residents and visitors is unclear because of the fluid nature of domestic arrangments and because some people alternate between Kulaluk and other places. Several people who have rooms at Kulaluk North were involved in casual employment outside Darwin.

Kulaluk North - There were 25-30 permanent residents present and up to 10 visitors during the study. At the end of this period numbers swelled to 40 briefly after the Darwin Show. Residents are from several extended families and identify as Larrakia, Tiwi, Torres Strait Islanders and Darwin people. Visitors have come from Belyuen, Milingimbi, the Kimberleys, Townsville, Port Keats, Daly River, Croker Is., Goulburn Is., and Thursday Is.

Beach Camps - There are two currently occupied camps along the beachfront from Kulaluk North. The first is a temporary camp beneath shrubs in front of the housing estate. This is primarily a drinking camp occupied by a few single men, but is frequently unoccupied. At the end of the study 10-12 people came to this camp on several nights to drink.

The more permanent camp is at the sewerage pumping house and is serviced by a tap and garbage collection and is visited regularly by the Aboriginal Health Service. There were 2-8 people here over the study period with a core of 4 single men and one woman. A makeshift kitchen shed has been constructed here. These people are in the main Burrara speakers from the Maningrida region but have been around Darwin for many years. They are visited often by people from their homelands or from Bagot and camps around Darwin, many of whom stay for several days.

Roy Wright's Camp-5 Aboriginal people were living here with MrWright 3 women, 1 man and 1 boy. It consists of 3 caravans and sheds adjacent to Bakhita Village. The Association previously informed Mr. Wright that permission to remain here could be withdrawn.

Bill Day's Camp - near beach end of Totem Road track. One resident and overnight accommodation for about 10. Visitors every day, mainly boys in the 9-15 age group.

Fred Fogarty's Camp - 1 permanent resident with 2-5 visitors over the study period. Three sisters from Maningrida were staying at first, then a young couple. Three-roomed iron shed, 2 toilets and town water.

There have been a number of dwellings on the beach ridge leading to fish camp in the last 10 years but only one is currently occupied. The more permanent camps are dependent on the availability of water. Previous camps obtained water from shallow wells. In 1982 a camp on the old dump site was disbanded after the disconnection of the tap.

Population estimates for the Kulaluk lease over recent years from Hayward-Ryan (1982) are given below:

1979/80	1980/81	1981/82	1983
25	30	45	45-50

There were also people who had moved from Bagot camping off Nemarluk Drive in the creek area in 1982. The population on the leasehold has developed from one permanent camp behind the drive-in in the early 1970's and could continue to rise if the trend of recent years continues.

3:0 LAND USE

3:1 Use of Ludmilla Creek

The lower reach of Ludmilla Creek is a popular fishing spot for Darwin people, being close to the inner suburbs and having both pedestrian access from Dick Ward Drive and a boat ramp and marina near its mouth. In terms of the amount of time spent at the creek and the diversity of activities the most consistent users of the creek are Aboriginal people from Bagot and Kulaluk. On some days, however, they may be outnumbered by Europeans who come up the creek in boats to set crab pots.

On one Sunday in July over 50 people came to the main fishing area. Twenty-eight of these came up-stream in 10 boats crab fishing. The rest walked in from Dick Ward Drive, 20 from Bagot and 7 from nearby suburbs. On some weekdays the creek was deserted.

While large numbers of people may visit the main fishing area on any day, it is not often crowded because of the partitioning of activities around the tidal sequence. During the low tide people fish with lines and nets, while the rising tide brings boats up-stream to set crab pots and nets.

It is not only fish and crabs which bring people to the mangroves. Aboriginal people also collected mangrove worms (<u>Teredo spp.</u>), Periwinkles (<u>Nerita lineata</u>), Longbum (<u>Telescopium telescopium</u>) cockles (<u>Anadara sp</u>) clams (Batissa & Mactra sp) and yams (<u>Dioscorea traversa</u>). Indeed some members of nearly every fishing party spent time collecting mangrove worms.

Generally, fishing parties consisted of extended family groups (up to 14 people) with greater numbers of children than adults. Most of these groups came from Bagot and during the study period particular families were regular visitors to the creek.

These family groups often spent the whole day in the area and came equipped for a picnic (billy cans, food), fishing (throw nets and lines) and yam digging (crow bars). Most parties had one throw

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net with them to catch mullet, prawns, sandcrabs and to obtain bait fish.

There is a concentration of activity on weekends, by both Aborigines and other users. Indeed large family groups only came to the creek on weekends, as can be seen in Appendix V.

The total numbers of people seen at the main fishing areas of Ludmilla Creek for the period June 20 to July 17 are given below. (Table 1) These can be taken as minimum numbers of users because of the large area involved, and include Aborigines, Europeans and Asians.

TABLE 1. Total Numbers of People at Ludmilla Creek.

	Mon.	Tues.	Wed.	Thurs.	Frid.	Sat.	Sung	
June 20	3	3	8	3	5	34	21	
·	4	5	14	7	-	8	53	
	2	5	4	2	1	16	12	
	5	7	3	3	6	15	14	July 17
TOTALS	14	20 .	29	15	12	73	100	

Sixty three percent of the total of 260 users were Aborigines and the majority of these people came from Bagot or Kulaluk. Aborigines also came from Darwin suburbs and from other camps around Darwin. These figures include people who used the creek frequently and represent about 80 Aboriginal individuals from all age groups.

3:2 Homeland Affiliations

During the study period particular family groups from Bagot and Kulaluk were regular users of the creek area. The majority of these people are from the Maningrida area now living at Bagot and their visiting relatives. A large extended family group are from Kopanga on the Blyth River (15 people). Other people were from Darwin, Belyuen, Groote Eylandt, Bathurst and Goulburn Islands, Milingimbi and Alice Springs. To some extent people transpose their own cultural frames onto this environment. Thus women from Maningrida refer to familiar shell fish species as those from their homelands. At the same time however, general terms for the same species are recognised, eg. Telescopium telescopium = Nornda (Burrara) = longbum (Aboriginal English).

3:3 Other User Groups

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Apart from residents of Bagot and Kulaluk, Aboriginal people who live in suburbs as far away as Tiwi and Casuarina, and from camps as far as 15 mile came to Kulaluk to visit friends and relatives or to obtain saltwater food.

In addition to the European users Vietnamese people visit the creek at low tide on most weekends. Parties of up to 12 people were seen making their way up the creek from the Fannie Bay side at low tide with throw nets.

3:4 Other Areas

or dicreek. The whole length of Ludmilla Creek up to its source near Ludmilla Primary School is used for fishing, shellfish and crabs. Bagot people, mainly women and children, sometimes forage for crabs, clams and other shellfish in the stretch of creek above Dick Ward Drive. The tidal mangrove flats on either side of the creek are a source area for mudcrabs.

Six Pipes The construction of Dick Ward Drive in 1980 created a new fishing and swimming place where it crosses the creek. Aborigines and Euopeans are often seen fishing at Six Pipes at high tide, particularly at spring tides.

Tidal Flats The intertidal mangrove flats which stretch the length of the Kulaluk lease bordering the main beach, are a source of several shell fish species and used for spearfishing stingray and cat fish. Shellfish found here are Nerita lineata, Telescopium telescopium, Terebralia pelustris, Batissa sp. Anandara sp. Regozara sp.

The beachfront itself is an access route from Kulaluk to the creek and to Bagot and is a pleasant place to rest, picnic or camp.

Mudflats Beyond the mangrove fringe the bare mudflats are used chiefly by men for spearfishing stringray. One man from the Maningrida beach camp speared 3 stringray on several occasions with a spear made at Kulaluk from Hibiscus tiliaceus.

Tributary Creek The supratidal creek running parallel to the beach behind the beach ridges is a source area for Batissa and Mactra shellfish, although none were collected here during the study. In 1978 a video film made by students at Kormilda College and the Women's Resource Centre featured women collecting Batissa shells in this creek. The shells on many old camp sites along this creek attest to its having previously been a good source of food. The diversion of drainage by the stormwater channels crossing this creek up-stream may have affected the abundance of these species in large numbers.

The Beach Ridge Jungle

The semi-deciduous monsoon vine thicket was visited several times by women in search of long yams (Dioscorea transversa).

This plant is common along the beach ridge, and although the vines had withered at this time of year they could be traced to the ground to find the tuber.

My impression was that digging yams was an enjoyable activity apart from the food procured. Two Maningrida women spent several hours collecting about 1kg of yams which were taken back to Bagot as it was too late to prepare them by the time they returned from the jungle.

Another woman from Groote Eylandt who often comes to the beach near Bill Day's camp with her daughters, collected about 2kg of yams in about 1 hour.

As far as could be ascertained yams were only collected from the beach ridge south of Bill Day's camp and near Fish Camp. Many other plant species listed in the literature as edible are present in the beach ridge jungle, some of which were pointed out to me. None were sought at this time of year however.

The vacant land between Nadpur Street and Fitzer Drive is used by children as a bicycle path area and is crossed by paths connecting Bagot and Kulaluk.

4:0 COMMENTS ON LAND USE

During the study period family groups from only 6 or 7 households at Bagot and 2 from Kulaluk came to Ludmilla Creek, but there were children from many more. While several of these people have lived in Darwin for many years, others return to their homelands for varying lengths of time. To this extent many of the people who made greatest use of bush food on Kulaluk are visitors to Darwin.

In addition to food gathering and picnicking the lease area provides for other activities and resources. For children the creek is an all year swimming place, and an ideal environment for exploration by canoe or on foot. Bicycle paths cut across all vacant areas, particularly those adjacent to housing.

Some adults see the area as valuable for education of children in traditional skills and knowledge of the environment. The area provides natural materials for spear making and carving, (Hibiscus tiliaceus) fibres and dyes, Pandanus sp., Morinda sp. Sterculia sp. Native animals such as wallabies, bandicoots and goannas are still found on the lease. The beach provides firewood for several camps on the lease and is a pleasant place to drink and camp in peace.

4:1 1981 Survey by Darwin Community College Students

In 1981, students from the Associate Diploma of Social Work Course from Darwin Community College conducted a questionnaire survey of users and nearby residents of Ludmilla Creek to determine who would be most affected by the East Haven development proposal by Redco Real Estate, and to canvass these people's opinions of the project. The numbers of completed questionnaires were from -

•	155
Ludmilla/Fannie Bay	71
Bagot	25
Kulaluk	23

All those from Kulaluk had been to Ludmilla Creek, 84% of the Bagot sample and 70% of the other residents. When this question was extended to members of the household the number of users from Bagot rose to 96%.

More indicative of the frequent users of the creek, 44% of the Bagot sample and 25% of the Kulaluk sample said they had visited the creek in the previous month.

The other users who were surveyed at the creek, were from northern suburbs and the city area, but most came from surrounding suburbs. Other comments from Bagot on the project were that people without cars or who could not afford petrol would no longer be able to go fishing.

4:2 The Importance of Bush Foods

It seems that the Kulaluk lease is important primarily as a recreation area where family groups can spend all day and involve themselves in a variety of relaxing, productive and traditional activities.

When I accompanied Pat Taylor and her relatives from Maningrida, children were instructed about techniques and uses of many foods and products, from finding wild bees and yams to goanna nests. This was partly for my benefit, however, as few of them needed reminding.

Without doubt the nutritional input from the food obtained from Kulaluk is significant for many visitors from Bagot and Kulaluk. The benefits are likely to be more from the variety of protein seafoods available as a change from store bought food than from gross amounts

obtained. When I first asked Pat Taylor if I could join her family when next they went to the creek she said . . . "That is these people's life. They need that place for fish and crabs. When they are sick of white people's food they go there to taste some salty food".

At Kulaluk north significant amounts of bush food are brought in from other places by residents and by friends and relatives. The Torres Strait Island people have a boat and frequently go out into the harbour or to nearby islands. At the start of the study a large sea turtle captured from the Vernon Islands, was brought back to Kulaluk and all the Aboriginal residents of the lease area received a portion of this catch.

Some relatives who live in town frequently go shooting to areas such as the Larrakeyah Reserve to bring wallabies and goannas etc. for the residents of Kulaluk.

It became apparent during the study that when people had access to a vehicle their preference was to go to areas outside of town, rather than Ludmilla Creek, where bush foods were more plentiful. People were always eager for a day outing to places such as Fogg Dam, Lambell's Lagoon, Shoal Bay, Buffalo Creek and Acacia Gap. Most people at Kulaluk and Bagot have few opportunities to go to these places which are not so heavily exploited and which offer fresh water foods not available at Kulaluk.

4:3 Management of Resources

Recently, anthropological and ecological interest has focussed on Aboriginal management of resources. There are documented examples from traditional contexts of deliberate measures to conserve food species and recently an instance of conservation of coastal fish resources by the Bardi people of Northern Western Australia was described by Smith (1983). The Bardi dismantled a stone fish trap around 1940 to prevent unnecessary kills when they moved from the area to a nearby settlement.

At Kulaluk present arrangements for access to ocean resources do not appear to be organised around any traditional system of rights in or ownership of particular areas or species. The ocean resources around Kulaluk are open to all. A sea turtle brought to Kulaluk was cut up and distributed among all Aboriginal residents along the line of traditional pattern of sharing particular portions among kin groups.

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The large proportion of edible plant species in the tropical coastal vegetation zone may be partly explained by its coevolution with humans and the selective management of useful species over the last 5-6000 years since the present shorelines have stabilised. The distributions of such plants and recent ethnographic evidence of subtle management of coastal vegetation has necessitated a reconsideration of the concepts of plant domestication by Aborigines (Hynes et al 1982). The only certain method of resource conservation observed at Kulaluk was the technique of harvesting yams which allows regrowth of the vine. The hole is dug and tuber removed carefully to leave the roots intact.

4:4 Changes in Land Use

Kulaluk was Larrakia land before white settlement and was returned to them through the Gwalwa Daraniki Association under a special purpose lease in 1979. The recognised traditional owners see Kulaluk as an area that is available to all Aboriginal people in Darwin.

In the intervening period Aborigines have had fairly free access to its resources except during the Second World War from 1940-45 when the Army took control of the land for the defence of Darwin.

The land that is now within the lease has been subject to a history of diverse land uses. Many of these (see list Appendix II) and the inevitable urban development of Darwin have reduced these resources and the areas over which they were available. Even during the 1960's people from Bagot could go hunting for wallabies, kangaroo, goanna, on foot over the RAAF base and the area now covered by outer suburbs. No doubt the concentration of exploitation of traditional resources around Darwin has played a part in this.

Discussions with people with a long association with the area revealed such changes are:-

- long necked tortoises were common in the creek behind the Drive-In. - Bobby Secretary.
- crabs, shellfish and fish were caught in creek behind
 Coconut Grove. Barry Butler, Anglican Hostel Centre,
 Bagot Road.
- coconuts and sweet potatoes were once available from Coconut Grove. People occasionally still ask if he has any sweet potatoes. Henry Lee.
- prior to the mid-1960's Bagot gardens provided much fresh fruit and vegetables.

- old campsites at the north end of the saltflat indicate that a greater range of shellfish were available from the mangroves and the tributary creek in particular. Large mangrove oyster shells, <u>Batissa</u>, <u>Anadara & Periglypta sp</u>.

 most people who fished at Ludmilla Creek stated that too many white people go there now, and that there are less fish and crabs now.

5:0 MANAGEMENT PROBLEMS

5:1 Control

The Kulaluk Management is not in a position at present to control all unwanted or illegal activities on the lease area, particularly in the southern end. These include:-

- deliberate dumping of domestic rubbish
- deliberate dumping of car bodies etc.
- entry and movement of vehicles
- trail bikes
- illegal crab potting
- drag netting
- lighting of fires
- activities of neighbours encroaching onto Kulaluk Land.

While some of these activities may not be seen as undesirable by the Association, all may cause environmental degradation. At present the two permanent residents living on the southern part of the lease are acting as defacto rangers of that area, but they have no authority or guidelines as to what uses should or should not be made of the area.

5:2 Management Plan

These problems stem partly from a lack of a clearly defined management plan for the various sections of the lease, and probably also from an attitude of the general public and previously by government and planning authorities that Kulaluk is a waste area. Large sections of the Kulaluk lease bear the scars of a long history of use as both a quarry and a dump.

The present manager of the Gwalwa Dariniki Association services the beach camps and the main north housing area at Kulaluk and has made efforts to control the unauthorized entry of vehicles. Chains have now been installed on the vehicle entrances to the lease on Dick Ward Drive and Bagot Road. The Association also has development plans for the area as a recreation park and is in favour of the

'town camp' proposal on the site of the old Ludmilla Tip.

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The Association management recently received a grant of \$20,000 to undertake a clean-up program of the lease. At present four men from Kulaluk are employed on this project cleaning around trees and removing rubbish on the vacant block between Totem Road and Fitzer Drive.

While the current plan for this block is ultimately to have a landscaped recreation park, this goal is certainly beyond the funding the Association has received and would be extremely costly as a public works project. It has been suggested that the vegetation components already present could be developed as the basis of a future park environment, particularly if protected from fire.

A management plan could be developed to identify areas in need of rubbish removal and landscaping and to construct a system of firebreaks and tree plantings. This would enable discussion with residents and those people affected, and allow the most efficient employment of labour and equipment.

5:3 Rehabilitation

The rehabilitation of areas which have been disturbed by the excavation of sand and the dumping of rubbish is an enormous task on Kulaluk land (see map for these areas). This could be done by filling and landscaping but care should be taken to retain natural areas.

5:4 Fires

Most of the lease area has been cleared in the past and the regeneration of open woodland communities, particularly east of Dick Ward Drive is being retarded by annual hot dry season burns. The majority of fires are not lit by Kulaluk residents, in particular the destructive late dry season daytime burns.

Residents do burn smaller areas around their homes. A system of firebreaks to ensure protection of fire sensitive natural areas and allow vegetation may be useful.

5:5 Noxious Plants and Feral Animals.

Lucaena leucocephala, Mimosa pigra, Lantana sp. and several grasses are expanding within the lease area. To retain the diversity

of plants in natural areas such as the beach ridge jungle and monsoon forest, the spread of noxious weeds should be monitored and selectively removed. Pigs should be removed from the lease.

5:6 Drainage

The construction of several stormwater easements across Kulaluk has caused changes in the natural water movements. This has reduced flow and freshwater input to the parallel tributary creek. The aesthetic value of this creek has been diminished.

The easements present several problems:-

- because of the high water table (2m deep) these easements have created permanent stagnant water;
- they are subject to collapse, infilling particularly at road crossings;
- they channel water from adjacent areas including the minor industrial area. There is a real hazard of pollution and refuse from this area already and more development is taking place;
- they degrade the aesthetic appeal of the beach;
- high tides create up-stream flows.

At present the Darwin City Council has plans to excavate an extensive system of open drainage channels throughout Kulaluk in an attempt to reduce standing water as part of its mosquito eradication program. More channels will change the character of the area, particularly the parallel tributary creek which is to have a channel along its whole length. The environmental impact of such plans has not been considered nor has their efficacy in mangrove muds and clays been fully established.

Dick Ward Drive has similarly disrupted tidal flows within the Ludmilla Creek catchment. The effects may have been locally favourable for mangrove growth, but ponding elsewhere may have caused stagnation and allowed mosquito breeding.

5:7 Darwin Wastewater Treatment Plant

The Fannie Bay sewerage plant, although not within the Kulaluk lease, presents a very real public health threat, particularly to users of the creek.

The plant is not operating at the complete design treatment sequence because the final stage incineration and flow monitor have not been installed. The future of the plant and the lime precipitation treatment process is currently under consideration by the Department

of Transport and Works water division. Meanwhile, the plant is producing about 8 tons of lime sludge per day which is being dumped behind the plant as landfill. The Department does not view this as a problem at present but the fill now covers a 50 x 50m area, is encroaching upon mangrove vegetation and is contacted by spring tides. Elluent water is also being released directly into Ludmilla Creek.

In this regard, the tendency of bivalve molluscs, in particular to take up and retain heavy metal, industrial chemical and bacterial pollutants presents a possible threat to the health of those people who regularly supplement their diet with shellfish from the area.

In addition the plant is not capable of handling inflows of several times the average dry season flow. Increased flow caused by seepage of storm water into the mains results in the release into the creek of sewerage treated only with lime. Tides of 7.5m cause salt water to enter the mains from Nightcliff and Coconut Grove and the plant has malfunctioned when this occurs. Resultant overflows at the pumping house on Kulaluk pour directly onto the beach. There were three such overflows during 1981-82.

6:0 POTENTIAL

6:1 Diversity of Environments

Despite the many obstacles facing the effective management of Kulaluk, the lease posseses areas of natural beauty with the potential to be maintained as a recreational resource in their own right. There are representative samples of a range of natural ecosystems including bay-shore, estuarine and supratidal mangroves, salt flats, semi-deciduous coastal vine jungle, monsoon closed forest, freshwater swamp and open woodland.

6:2 Development Potential

Ground water - the high local water table around Kulaluk is a valuable dry season resource, and several wells still exist on the lease area. Tropicus Nursery obtains its horticultural water supply from a shallow well on Kulaluk, and the watertable occurs at about 2m over most of the lease. There is potential for irrigation of tree planting or horticultural projects.

Several suitable locations for

developments which have been suggested such as an Aboriginal club, or cultural centre, sports grounds, a shop& transient camps occur on the lease.

6:3 Reaforestation

The potential for establishing useful trees on Kulaluk has been demonstrated by Bill Day and Fred Fogarty who have planted on the lease area for several years. Suitable species include Morinda citrifolia, Tamarindus indicus, Eucalyptus camaldulensis, Sterculia quadrifida, Acacia auriculiformis, Samanas saman, Terminalia catappa. In addition, mangrove replanting experiments indicate that damaged areas along the foreshore can be re-established with minimal effort.

7:0 DISCUSSION

The Aboriginal people of Darwin have a long historical association with the Kulaluk area. People from Bagot Reserve have been coming to Ludmilla Creek since the establishment of the compound in 1938, and no doubt Aborigines around Darwin used the area long before this.

Today it remains an important recreation area primarily for people staying at Bagot and Kulaluk, but also for many other town residents. The dietary input of foods obtained in the Ludmilla Creek area provides a welcome change from store bought food and is for some people nutritionally significant.

Several people said that many people come down to the creek when they are short of money and are hungry. The suggestion that there would be more people coming down on the week alternate to cheque week could not be verified. It was noted that the creek was very quiet on cheque days, but most people, and particularly families, came to the creek on weekends. During the study period several families were regular weekend visitors.

Apart from the obvious economic benefits of being able to supplement family diets with the variety of protein sources found at Kulaluk, the psychological benefits of shared family activity and the relief of the social stress by being able to go to the creek and become involved in relaxing, absorbing and familiar activities are equally significant.

While many of the foods sought and the techniques involved in procuring them are peculiar to Aborigines and have been used since

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pre-European times, they are in this sense traditional.

Different peoples' views about the value of these activities ranges as does the extent to which they form part of their Aboriginal identity. People are accutely aware of things Aboriginal and attach a positive value to knowledge of the environment and traditional food resources.

To some people, however, it is just the way everybody goes about getting a little extra food, while to others these activities are an assertion of the strength of traditional culture. There is such a multiplicity of backgrounds and outlooks in Darwin that generalisations about what the lease area means to people other than being a close fishing and swimming place are not possible.

Many of the Aboriginal users of the lease are permanent residents of Darwin living an urban lifestyle. The short and long-term visitors are from a variety of culture areas. The traditional owners of Kulaluk, Larrakia people, use the land in the same way as others.

The four week study revealed only a sample of the changing pattern of users of Kulaluk. The prominence of Maningrida people at the creek was not representative of the range of user groups from Bagot. These people have countrymen and relatives camping on Kulaluk and also had visitors from Maningrida staying with them at Bagot, and this may go some way to explaining their greater frequency of use of the Creek.

There are families who have been associated with Bagot for a much longer period than the Maningrida people who were the most frequent users of the creek, and these people were largely absent from the Bagot Beach area during the study. Several of these families are known to be regular visitors to the creek.

The social interactions and apportioning of recreational space between the members within the Bagot community is beyond the scope of this study.

8:0 RECOMMENDATIONS

- '- Development of an overall management plan for the individual sections of the lease to involve residents of Kulaluk and Bagot;
- If town camps are to be situated on the old Ludmilla tip site, this should be within the management plan and in conjunction with the rehabilitation of other areas.

17. · · ·

- Control of illegal or unwanted activities by employment of part-time ranger.

- upper part of Ludmilla Creek (ie. area lease) closed to crab potting boats;
- areas for vehicle access defined and other areas closed off.
- Construction of fire breaks/access tracks to protect fire sensitive areas, allow access to fire fighting vehicles, and encourage people into little used areas.
- Control of fires to allow vegetation communities to regenerate. Research at Kakadu indicates that tropical tall grasses are perpetuated by annual burning to the detriment of trees. Protection for 5 years allowed open woodland to attain structural formation (Hoare et al 1980).
- Inquiry into status, and impact of Fannie Bay wastewater treatment plant.
- Ascertain plans for Bakhita Village (Catholic Church) not used since 1975.
- Comparative study of sequence of air photographs 1942-1982.
- Literature survey of historical land use changes e.g. Chinese Well, Coconut Grove.
- Environmental impact study of the Darwin City Council plans for a network of drainage channels through Kulaluk to reduce mosquito breeding areas. In particular the parallel tributary creek will be severely damaged by such plans, the efficacy of which has not been demonstrated. The water table along this creek is close to the surface and excavation is likely therefore not to reduce the amount of standing water.
- Ascertain the possibility of inclusion of unused areas of land which were recommended by Ward. J. 1975 to be granted to the Association in particular Balekhita Village owned by the Catholic Church and not used stince 1975, and parts of blocks 4544 and 4545, Retta Dixon Centre etc.
- Investigate the intentions of owner of Agricultural block 408, who at present is accepting landfill and allowing excavation of beach sand on seaward edge of block. This block is currently for sale.

APPENDIX I

The Resources

- Fishing:-
 - throw nets and line fishing at low tide. Throw nets are more productive mullet, sand crabs, prawns, most fish were cooked on fire and eaten at fish camp. Mullet were taken home for soup. No fish over Ikg was seen, although large barra were reported to have been caught at 6 pipes.
 - Line fishing catfish, flathead, javelin fish, whiting barra under 30cm, estuarie rock cod, Russel's snapper.
 - Drag nets Europeans were seen on two occasions using drag nets in the creek.
 - Fish traps Bill Day's fish trap is the only one operative on the lease area. Catches were variable, but often more than 1 person could eat were caught. The people at the Maningrida camp received the excess. A copy of his monthly catch report to the Dept. of Fisheries lists kg weights for:

Sea Mullet 2
Stringray 11
Barramundi 2
Catfish 4
Salmon 3.5
Queenfish 1
Crab 2
Redfin Emperor 1.5

A fish trap was built at Kulaluk north in 1981 but was operated for only about 6 months. The remains of other fish traps are on East Point on the Ludmilla Creek side and at Nightcliff Point.

At Nightcliff Headland there are the remains of 2 stone fishtraps. People at Kulaluk know little about these structures which are of identical construction to traditional Aboriginal fish traps elsewhere.

- Spear fishing - Men from Kulaluk spear mostly stringray and catfish on the mudflats.

<u>Mudcrabs</u> - The women from Bagot sought mudcrabs on the southern side of Ludmilla Creek right across the tidal mudflats from near the sewerage outlet to near spot on marine. Fresh holes in creek banks and on the mudflats usually beneath piles of dead mangroves were probed with sticks at low tide and then dug out by hand or

feet until the crab/s could be manoeuvered out with a stick. The claws were immediately broken off. 2 women were able to find 6 large crabs in 2 hours on the mudflats and recognised holes which they had removed crabs from in previous visits. These crabs were cooked in the fire at the fish camp. The number of crab pots set by Europeans in boats along the banks of the creek at high tide threatens this resource. unregistered pots were commonly used and while most people limited themselves to the limit of two pots per person, some flagrant violations of this requirement were observed, two men with 18 pots being the extreme example.

Nearly all crab potting occurs upstream from Bagot Beach and this section of the creek is fully within the Kulaluk lease. Control over this activity by the Kulaluk managers is therefore possible.

Shellfish -

- Teredo spp two species of mangrove worm are abundant in dead logs (Brugiera, Rhizophora) in the Bagot Beach area. They are a popular food, collected mainly by adults, extracted by axe or by bashing rotten logs with sticks. Both species were eaten raw, but some people stated that the 'cheeky' one should be cooked first. These were always eaten on the spot or at Bagot Beach.
- <u>Nerita lineata</u> Periwinkels are usually found on shaded aerial roots of <u>Rhizophora stylosa</u> within tidal range. They are a popular food but are not abundant. They do occur in some places near Bagot Beach and in the mangrove zone fringing the main beach.
- Telescopium telescopium: (longbum, nornda) These cone shaped gastropods and the similar Terebralia pelustris are abundant on the tidal mangrove mudflats, particularly after spring tides. It is relatively easy to gather large numbers of these shells but more difficult to extract the flesh. These were gathered only occasionally to make a meal during the study period, although many piles of their shattered shells are scattered around the beach ridges on Kulaluk. On several occasions women collected large bags of Telescopium and Nerita to take back to Bagot. On one occasion children were sent to collect shells for

Appendix I cont.....

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their mother in Ludmilla. Hermit crabs which inhabit these shells were also eaten, and were considered to be good bait for fishing.

- Anadara & Regozara spp Cockles are found buried in mud mainly in the mangrove zone fringing the main beach but also in the mud of the tributary creek which runs parallel to the beach ridges. They are not common, however, and were only occasionally collected, although empty shells are present at old camp sites.
- Batissa sp. These large clams are popular but not abundant. They are found in the same areas as Anadara submerged in mud a few centimetres in amongst the roots of mangroves, (mainly Rhizophora) only 2 or 3 were collected at a time and cooked on fires during the study. Their distribution along the tributary creek has probably been reduced in recent years.

Mactra

Other clam species are found in upstream area around Dick Ward Drive.

- <u>Crassostera</u> <u>amassa</u> - These small estuary oysters are found in clumps on a few steep banks on the lower reaches of the creek but have been largely removed.

Plants

<u>Dioscorea</u> transversa - (long yams) are relatively common in the beach ridge jungle and were very popular. I was told the round yam (<u>Dioscorea</u> sativa) is also found in the jungle but was not collected.

<u>Hibiscus</u> <u>tiliaceus</u> - straight branches used for spears also for carving pipes.

Morinda citrifolia - (cheesefruit) rare on Kulaluk, but the few planted speciments at Fred Fogarty's camp fruit all year with watering and were eaten by visitors from Maningrida. Said to have medicinal qualities. Roots produce a yellow dye used for pandanus mats and string bag.

Sterculiaquadrifida - (peanut tree) - occasional on beach ridges edible fruit and bark and roots used for string bags.

Zizyphus <u>mauritania</u> - common along Totem Road track - fruit eaten by children.

Cassytha filiformis - common leafless vine, small white berries

Appendix I cont..... were eaten by some children. Solanaceae - Wild gooseberry - eaten by children. Tamarindus indica (Tamarind) Fruit eaten by children.

ÀPPENDIX II

1975

1976

Landuse History

1876 Goyders map 3340,D. marks Kulaluk area as Aboriginal Reserve No. 839 1888 14 leases held in Palmerston vicinity for Chinese market gardens. - Holtze moved to Fannie Bay area. 1880's Jesuit Mission at Nightcliff - Members of many tribes camped here and would have used resources of Kulaluk. Lease extended to 1000 acres. 1904 Battle between Larrakia and South Alligator men somewhere near, present Racecourse. "Tramp" 1958 - Kenbi Land Claim p. 114. 1913 Dairy at Fannie Bay. Market gardening by Chinese/Holtze? 1920's Salt works on Ludmilla Creek Grazing lease to Holmes from Bagot to Lee Point. 1938 Establishment of Bagot Reserve 837 acres extending to Totem Road and down to beach. 1942 RAAF Base - Evacuation of Bagot. Extension of runway. Roads graded for planes and for beach defences, training manourvers, clearing, excavation. 1949 Rice Farm experiments/Chinese? Post-war soldier settler subdivisions north of Totem Road Tiwi cemetry near Totem Road. 1950's Removal of timber - black wattle, Leichhardt pine and Paper barks from swamp. Still only tracks to subdivisions and Coconut Grove Sand quarried. 1965 Revocation of 580 acres of Bagot Reserve l in 3 houses to be for Aborigines. Construction of suburbs. 1971 Kulaluk Land Claim 1972 Land Claim extended to old Bagot Reserve. Sewerage settling ponds -1973 Establishment of Ludmilla tip Incorporation of Association Subdivision of section (half of) 4542 by Sabrina Holdings firebombing incident

Cyclone garbage dumped on Kulaluk

Sewerage essements. Sewerage plant built.

Agreement for further dumping and filling

Appendix II cont.....

1977 Correspondence from Darwin Reconstruction Commission that there were no plans and no submissions for further subdivision of section 4542.

1979 Lease transferred

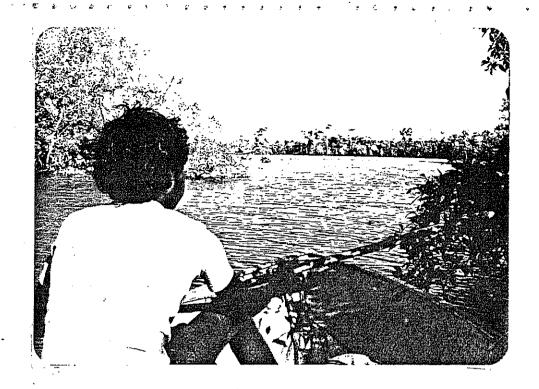
1980 Construction of Dick Ward Drive.

APPENDIX III

Significant Places

Several sites of significance to Aboriginal people have been recorded previously by A.S.S.P.A. Officers.

- A site associated with Fresh-water snake dreaming is located downstream from the waterhole behind the Drive-In lease. This site location was reported in May 1981 and extends some way down the creek line. There has been some damage to this area by gradings created when the tarred access road was constructed in July 1983.
- A Gunabibi ground used by North-East Arnhemland people during the 1950's in the lease area between Fitzer Drive and Dick Ward Drive, was reported to the Authority in March 1982.
- A ceremonial burial area extending from behind the Retta Dixon Homes down along the extension of old Totem Road. Tiwi burial poles stood in this area until recent years. A cemetery in which over 100 people may be buried is marked by one remaining cross and a fence.
- A spring which provided fresh water at Kulaluk North was pointed out by Bobby Secretary. This is right on the beachfront about 100 m north of the houses. This spring stopped flowing when the Drive-In sewerage was put in. Bobby Secretary said of this spring which is located by a patch of green grass on the beach front.
 - ... "When the salt water comes up it is covered, but when the salt water goes back the fresh water bubbled up."
- Areas with historical significance also occur on the lease.
 - A wartime coastal defence bunker on beach with soldiers identification etched in the walls.
 - An old well on the vacant block between Fitzer Drive and Totem Road. Bobby Secretary said that there used to be a house owned by 2 Chinese at this well and that there had been two wells in the area. A track used to pass the site from Bagot Road.



Boat trip down Ludmilla Creek at high tide.



Ludmilla Creek at low tide.



Family group from Bagot line fishing on Bagot Beach, Ludmilla Creek, at low tide.



Casting a throw net at low tide for mullet and bait fish. Ludmilla Creek.



Afternoon meal of fish and periwinkles at Bagot Beach.



Shed on beachridge at Fish Camp.



Digging yams on a beach ridge at Kulaluk.



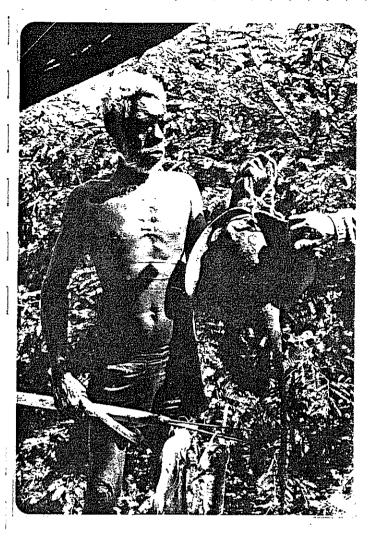
Digging yams on a beach ridge at Kulaluk.



Sunday Afternoon at Bagot Beach.

Low tide fishing with lines, cast
nets and drag nets.

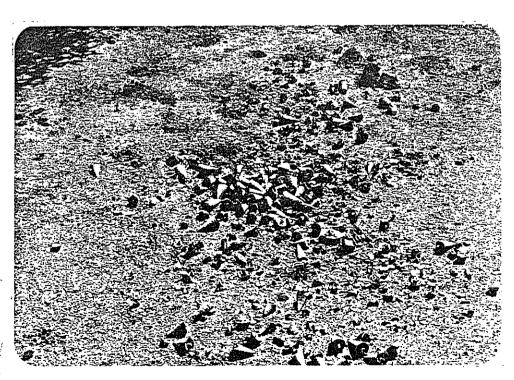




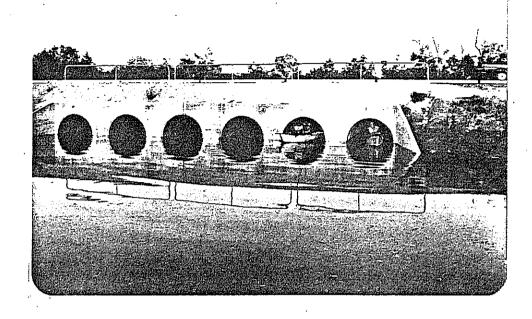
Man from Beach Camp displaying his catch of stringray and catfish from mudflats at high tide.



Long yam <u>Dioscorea</u> <u>transversa</u> dug from ·5m deep with crowbar.

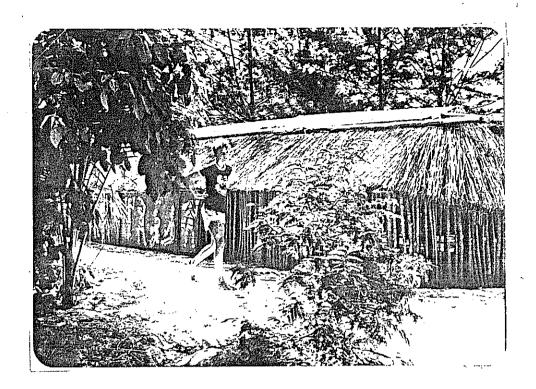


<u>Telescopium</u> shells - a mealtime site near a back beachridge on Kulaluk.

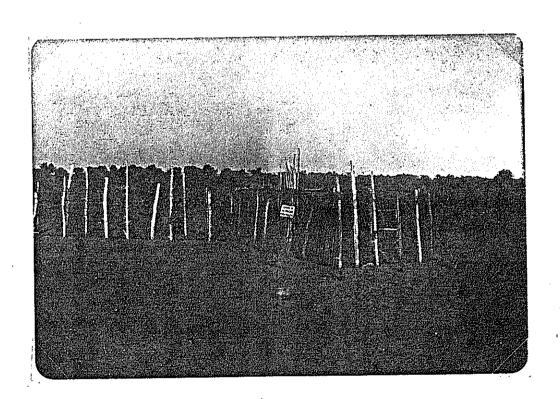


Above & Below: 'Six Pipes' Ludmilla Creek at the Connector Road Crossing.





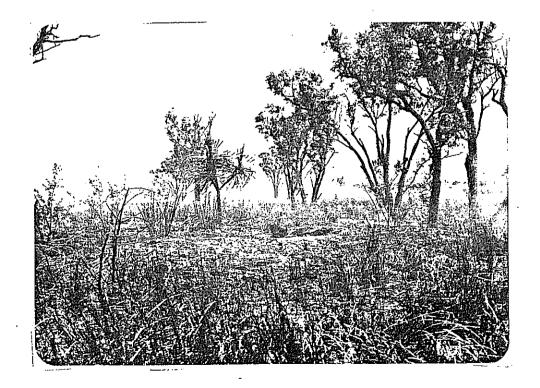
Visitor at Bill Day's Camp.



Fish Trap at low tide.



Pandanus grove near Totem Road.



Fire on the old rice field area.

DIARY OF EVENTS

	•			,
Date/ Tides	Fish Camp/Bagot beach	No.	Bill Day's camp	No.
Monday June 13 (holidáy) 0752- 7.5 1354- 2.3 1920- 6.3	1730-two Maningrida women from Fish camp with yams. couple returning to Bagot -family group fishing at six pipes, 2 old, 4 young women, 3 men, 3 boys. 2E men with crab pots	2 2 2		
Monday June 20 0741- 2.9 1352- 5.6 2047- 2.1	1600-3 boys at 6 pipes with bikes.	3	<pre>1 woman,sleeping 1 man,visit 2 boys,fix bikes 3 boys,swim,play</pre>	7
Tuesday June 21 0853- 3.1 1451- 5.6	1100-2 women & girl wash- ing shells to take to take to Bagot	3	boys from N/cliff repair bikes	3
Wednes. June 22 1000- 3.1 1545- 5.6	1030-2 women with buckets returning to Bagot 6 boys from Bagot playing	2 <u>6</u>	·	
Thurs. June 23 4059- 3.0 1637- 5.7	1100-3 boys swimming at Bagot beach	3	4 boys, bikerepair	4
Friday June 24 1149- 2.9 1720- 5.7	12-3pm.5 people fishing at Bagot beach	5	2 boys,games man,from Bob's camp spear fishing	3
Sat/day June 25 1231- 2.7 1803- 5.8	900-went with Maningrida family to Bagot beach.3 women, 1 man,5 girls,4 boys 9.30-1.00,2 women go mudcrabingon flats, south side of creek-6 crabs.man & children collect mangrove worms, axe. boys line fishing. After lunch, yam digging whol family. 2 women dig yams til dark. young people go swimmin 11-1.00-5 Vietnamese fishing throw nets 2.30family return to Kulaluk from fishing. 3 other men from Kulaluk 2E men fishing,3 men with the nets	e 1 ^g 13 5 3	Groote Eylandt woman and 4 girls, picnic & crabbing, 4 hours. 4 boys visit	5 4
Sunday June 26 1309- 2.6 1841- 5.8	4.00-3 boats come upstream, net and crab pots. 2.30pm.man & wife & 2youths from Kulaluk, line & throw netting, mangrove worms 5 boys from Bagot 12 Vietnamese men with thrownets.	_	2 boys visiting	2

DIARY OF EVENTS (cont'd)

Date/				
Tides	Fish Camp/Bagot Beach	No.	Bill Day's Camp	No.
Monday	1230- 4 boys swimming			
June 27	and fishing	4 .	i boy,visiting	1
0741- 6.8			•	
$\frac{1344-2.5}{2.5}$			·	
Tuesday	9.30-3 boys at 6 pipes	•		
June 28	fishing & playing	3		
0815- 6.7	4.00- boat crab pots	2	man from Bob's camp	
1416- 2.5			spearing 3 stingray	0
Wednes.	1020 2 have for your lates		1 boy, visiting	2
June 29	1030-3 boys from Kulaluk		3 groups of local	•
	spearfishing & throw-	3.	boys visiting and	
cheque day 0847- 6.6	netting.	٠.	passing through	9,
1449- 2.5	1.00pm-4 boys with bikes at Bagot beach.	4		•
1449- 2.3		4		
	went with 2 women & Eman		•	
	fishing & throw-netting, prawns, periwinkles, man-			
•	grove worms & fish, eaten		•	
	at beach.	3		
	woman with 3 boysfrom	J		
	Bagot, throw-net	4		
				
Thurs.	2.00pm-5 boys playing on			
June 30	mud bank.	. 5	2 groups of boys	
0918- 6.3	3.30-2E thrownet fish-		visiting & games	7
1522- 2.6	ermen dragging boat.	2	man from Bob's camp	
, , , , , , , , , , , , , , , , , , ,			visit.	1
Friday			•	
July 1	-		2 groups of boys	
0950- 6.1			on bikes & foot,	
1522- 2.6			visit & play,	
			2 overnight.	6
		_		
Sat/day	Went with Maningrida family			
July 2	to Fogg Dam & Lambell's		2 boys, visiting	2
1024- 5.9	Lagoon area.			
1644- 2.8	-family from Bagot fishing	5		
	-3 people from Fred's camp			
	fishing & throw-netting.	3		
Sunday				
•	1030-3 boys & Bill col-	. 4	3 parties of boys	9
July 3 1102- 5.7	lecting periwinkles.	4	visitng& games	
1740- 2.8	9 boats, all but 1 with	20	2 men visit.	2
1/40- 2.0	crab pots.	28	•	
•	1.30-3 men from Bagot,	/.		
	1from Kulaluk, line	4		,
	fishing & thrownet.			*
•	1400-2 women and4 boys from	6		
	Bagot.	6		
4	E/family with drag net	ς.		
4	and throwpet.	5	•	
Monday	5.00- Bagot family.	6		
July 4	4.00-2 women from Fred's		boys visiting,	
1146- 5.5	camp fishing(Maningrida)	2	passing through	4
1845- 2.7				

DIARY OF EVENTS (cont'd)

					5
	Date/				₹
-	Tides	<u>Fish Camp/ Bagot Beach</u>	No.	Bill Day's Camp	No.
-	Tuesday	family from Bagotfishing	5	3 boys visit	3
-	July 5			3 adults from Kulaluk	
	1239- 5.4			visiting	3
	1949- 2.4	·			
	Wednes	3 women from Fred"s coll-			·—-
	July 6	ect ing shellfish & mangrove			
-	0745- 3.3	worms, (Maningrida)	3	2 boys visit,man	
	1337- 5.4	man fishing,	1	from beach looking	
		-		for fish	3
-	Thurs	130- boat	$-\frac{1}{2}$	3 paties of boys	
Allowers	July 7	helped F, Fogarty		bike repairs &	
223	0858- 3.3	install bath.		visits.	11.
	1439- 5.4			Man, visit -	1
7	Friday	5.00- man in kayak with			
1	July 8	crab nets.	1	4 groups of boys	
	NADOC march	•		visits & bikes, from	
7				Bagot and suburbs	15
	1010- 3.2			paper and papers	13
, Til	<u>1541- 5.5</u>				
	Sat/day	1030-family from Bagot,line		boys from Bagot,	
	July 9	& thrownet(Maningrida &		games(9-13age)	11
-	1115- 2.9	Alice Springs)	8		
	1641- 5.7	12boat with 4 boys, crab			
7		pots	4	•	
E		4 people from Fred's camp	_4		
	Sunday	1030-same Bagot family, throw		4 groups of boys(9-14	
7	July 10	fiets@&llihesm	9	on bikes, visits &	
1	1211÷ 2.7	Fred & couple, lines &			13
滅亡	1739- 5.9	net	3	games.	1.5
				men from beach camp	3
- Charles				pass through to Bagot	
3. 4		19 1 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2		5.00-man spearfishing	1
f.	Monday	12-boat with2/E men & boy	2	boys from N/cliff &	1 1
7	July 11	with rods & crab pots.	3	Bagot (9-15)	11
_	1302- 2.4	2 men from Kulaluk spear-	2		
*•=	$\frac{1831 - 6.2}{5}$	fishing on mud flats	_2		
:	Tuesday	8.30- boat trip down creek	2	boys & girl, games	4
1	July 12	withBill & 2 boys	3	women from Kulaluk	0
ń	0741- 7.4	12-fire onricefield,		on way to creek.	3
	1347- 2.1	attended by brigade.		man from beach return	
٦		5.30 E/man fishing at at pipes.	1	from spearfishing,	
		2pm-women from Kulaluk		caught 3 stingray	1
		coll/cockles, crabs	3		
٦	Wednes	9.00-E/man fishing,6 pipes	_ <u>_</u>	9.00- man from beach	
	July 13	4.00-2 E/boys thrownetting	2	spearfishing, 3 stingray	
5	0824- 7.4	1000 2 By boy b caronacting	_	& catfish	1
_	1432- 2.2			boy visit(Ludmilla)	1 _. 1
	. 1452- 2.2	,		2 adults from fishcamp	_
				passing through	2
AT.	Thurs	9.00-3 E/men at 6 pipes,		motorcyclist past	 -
	July 14	fihing and crab pots.	3	motorcycrist past	1
	0903- 7.3.		ر		
	1517- 1.9				
ħ		°0 30 3/F = 0 = 10 E = 0 = 1		man from field come with	 -
	Friday	'9.30-3/E people fishing at	2	man from fish camp, visit	1
	July 15	at 6 pipes.	3	man from beach, spear-	4
	0943- 7.0	4.30man fishing	1	fishing, no catch	1
	$\frac{2146-2.0}{}$	E/couple thrownetting	2		

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DIARY OF EVENTS)cont'd)

i	DIAKI OF EVENIS/CORE d)					
	Date/	·				
	Tides	<u>Fish Camp/ Bagot Beach</u>	No.	Bill Day's Camp	No.	
•	Sat/day	11-man and children from		R.Wright & children in		
- Franch		Bagot fishing	5	truck, firewood on beach	6	
ì	1024- 6.6	E/family fishing & netting	6	boys from Bagot(16)	-	
		$_{5.00-}$ vietnamese men throw-		visit.	2	
-		netting.	4	-		
-	Sunday	1230am. man fishing at 6 pipes	- 	3 boys from Ludmilla		
	July 17	4.30pm-party from marina throv	J	collect ing longbum		
- Alien M	1108- 6:2	netting.	6	for their mother.(9-11)	3	
-	1751- 2.1	family from Bagot fishing	7	boy passing through to		
_				Bagot.(15)	1	

References

Brandl, M., Haritos, B. and Walsh, M. 1979

Kenbi Land Claim. Northern Land Council

Hayward-Ryan, T. 1982

Aboriginal Urban Drift in the Northern Territory : A Study

-Hoare, J. (et al) 1980

"A report on the Effects of fires in tall open forest and Woodland with particular reference to fire in Kakadu National Park in the Northern Territory".

Smith, M. (1983) - W.A. Museum. Cited in <u>Search April 1983</u>, p.115

Darwin Community College, Social Work Department 1981

Ludmilla Creek: Canals or Conservation

The Transient Camp Proposal

The proposal to establish transient camps on Kulaluk stemmed from a decision of the Northern Territory Cabinet in May 1981 that meant, in effect, that there would be no new land grants for Aboriginal town camps in Territory centres until existing areas were adequately and rationally utilised. The Minister for Lands and Community Development would consult with municipal authorities prior to issuing titles with municipal boundaries but Darwin municipal authorities have stated that no further camps will be approved in Darwin.

The effect of this decision led to Kulaluk residents being encouraged to agree to establishment of new camps on the lease, because of its central location and the large areas of unoccupied land. The issue was first raised at a meeting at Kulaluk in the same month. Since then the issue has sparked much controversy throughout the whole community over both the rationale behind the 'transient camps' and to their location.

Clearly there is an accommodation crisis for Aboriginal visitors to Darwin, and presumably these are the people for whom the 'transient' camps are to provide short term accommodation. There are also a number of homeless Darwin Aborigines. Whether these camps are to be permanent homes for any of these people who would choose to live there has not been determined.

Many visitors stay at Aboriginal hostels or motels when they first come to Darwin and are forced to the streets because of financial problems. Other people prefer the communal atmosphere and the economy of accommodation in town camps. People who stay at town camps stay with friends and countrymen.

There has also been much deliberation over the site for the camps on Kulaluk. In October 1981 areas were partially cleared on the east side of Dick Ward Drive but plans were suspended after several complaints. The Association management currently favours the old Ludmilla tip site on the west side of the road.

Considerations in the event of camps being established:

- the administration of the camps is to be the responsibility of the Association management. It will require increased resources and budget funding. An outline of how they will be organised and run should be drafted with input from relevant departments Community Development and Conservation Commission;
- without a clear definition of 'transient' or the identification of particular people who will stay at these camps, it is unclear whether the camps will develop as permanent town camps or as a camping park. No doubt people will stay there if facilities are provided, but there is a likelihood that people will not choose to camp in areas set out which will place strain on the servicing of sites and on the local environment;
- the area should be landscaped and planted with trees which are provided with individual protection before camps are established.

 Separate camping areas should be located at maximum distances apart.

Out and about: A guid

KIDS

A visitor's first impression of Kulaluk "outstation" might be well be of an african village of thatched huts or of a Wild West fort protected by armed soldiers.

But the red, yellow and black Aboriginal flag flying high over the roof gives the game away.

Earlier a sign warned that this was not just an unusued piece of bush between the Darwin and the sea but an important recreation area to the people of Bagot Aboriginal Reserve.

Childrens' laughter floats across as you discover you either have to cross a rickety minature version of the Bridge on the River Kwai or wade through some muddy water to get to the camp.

But it's worth it.

The camp looks over the hollow of a former quarry.

The camp looks over a hollow of a former quarry. A caravan and a circular shelter with a thatched roof is surrounded on one side by bush and the other by a sandhill. A scamble to the top gives one of Darwin's best views blue water, white sands and miles of mangroves.

Some boys have been out fishing in a boat. They drag it onto the sand - no fish today but they did catch a crab which they take up to the camp to cook.

Cubby houses the children built are visited by a group of chooks - the remainder of the \$2 specials that have not been eaten will be kept as layers.

Like Aboriginal outstations everywhere, Bagot outstation has its distinctive aims. Firstly it was started to look after the land on a part of the Kulaluk lease which was being ravaged by trail bikes, dumpers and people helping themselves to the sand.

People could go there to get away from problem drinkers and it gave them a chance to "find themselves" without being overmanaged by one policy or the other.

But this month, like most weekends, the camp has been filled with Bagot's school children. The third program of vacation activities there since the first rustic shelters went up last July has proved an overwhelming success.

And why not? The beach setting at Kula-luk is a kid's dream. Maybe that's why they nicknamed it "Paradise Island".

When one group goes home to Bagot in the afternoon for a rest another lot quicklyl

rest another lot quickly takes their place.

In the shallow bay the swimming is great, helped by, two old dinghys and a few inner tubes donated to the camp.

Billy Day runs the holiday program which he says is pretty loose as the children prefer to make their **Edited By**

own fun.

The Department of Community Development has assisted with a grant of \$800, which has mainly gone to food and utensils as the children have more fun cooking and eating than painting and other more traditional holiday ideas.

One problem in the coming Dry Season is the lack of fresh water, with the nearest tap 600 metres away.

The camp can also use more cooking and eating gear, especially big pots and some extra bedding.

A few hours' work with a front end loader or grader could be helpful too

If you've got something you think children could play on or with don't throw it out, leave a message on 81 6222.

When they're not at the camp a large group of Bagot boys and girls have been seen dominating the roller skating rinks and the Twixteen discos.

At night the boys stay down at the camp and keep themselves amused telling stories about Dracula and other monsters that lurk in the bush around them.

School might start next week but the kids from Bagot will be down at their Kulaluk camp until the bell rings.

REGGAE

Reggae music - the rhythmic beat of the West Indies - is gaining

\$10m playground plar to tempt kids outdoors

BETHANY HIATT FDUCATION EDITOR

Kings Park will unveil plans today for a new \$10 million playground where children will be encouraged to climb trees, build cubbies and paddle in a creek.

The Rio Tinto Naturescape, which will span 60,000sqm, is part of a growing international trend towards getting children away from computer screens and into natural spaces, where they can take risks and use their imagination.

University of WA school of population and health researcher Karen Martin, who was commissioned by the Department of Sport and Recreation to review studies on the value of outdoor play, said children were increasingly surrounded by artificial environments and discouraged from going to parks or bush because of parents' safety concerns.

She said children who played in natural landscapes were less stressed, had better concentration and co-ordination and were more creative than those who spent most of their time in front of a screen.

Even exposure to some soil bacteria could help release the brain chemical serotonin, which decreased anxiety and helped learning.

"And there are studies showing that children's behaviour is better when they've been interacting with nature," she said.

Dr Martin also did research for

Kings Park on what children wanted to see included in the new playground. "The three most important things that children want from play areas are trees, water and rocks," she said.

Kings Park chief executive Mark Webb said the desire to connect children with nature was at the heart of its education program.

Landscape designer David Smith said the playground was believed to be the first of its kind in Australia.

The playground, expected to open mid next year, will include thickets to hide in, a rocky creek, a wetland boardwalk and rope webs for children to climb.

Mr Smith said there was a perception the natural environment was dangerous, so designers had worked hard to make the playground safe and accessible.

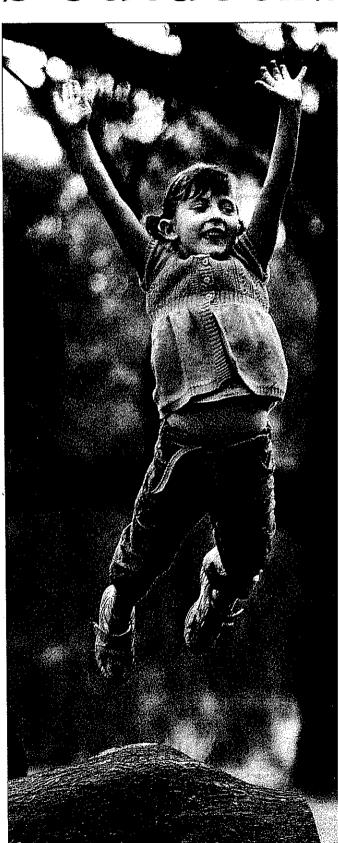
WA Primary Principals Association president Stephen Breen said playing outside helped children use their imagination, learn how to solve problems and make mistakes.

"I think there are baseline educational reasons for 'forcing' children into these situations," he said.

Kardinya father Paul Sherriffs said his daughter, Sophie, 5, loved climbing trees whenever she got the chance and often went bushwalking with her grandmother.

"It's nicer to get them out, where they're controlling their environment, rather than just being passive and dictated to by the TV," he said.





Playtime: Sophie Sherriffs, 5, having fun in Kings Park.