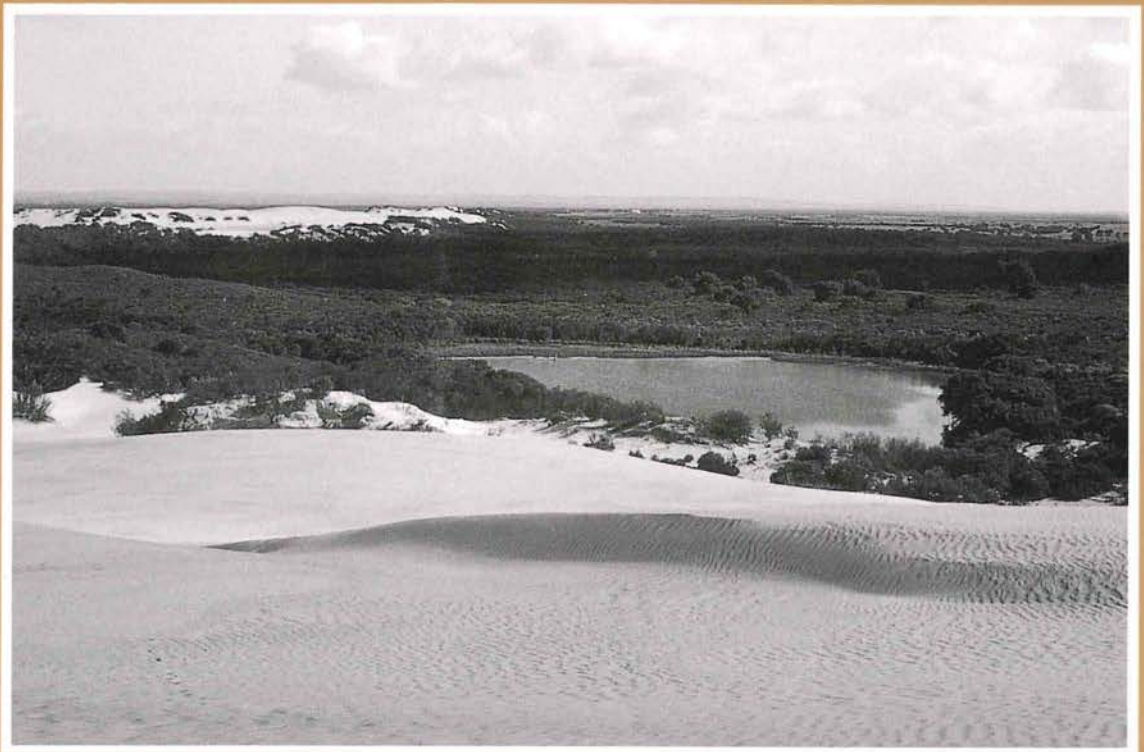


Wedge and Grey

Draft Master Plan

1999



Department of Conservation
and Land Management



National Parks and Nature
Conservation Authority

DRAFT MASTERPLAN

Wedge and Grey

Department of Conservation and Land Management
for the
National Parks and Nature Conservation Authority
Perth, Western Australia, 1999

MAKING YOUR SUBMISSION

We want to know what you think of the proposals in this draft masterplan. Have you thought about writing a submission ?

Why Write A Submission ?

It is an opportunity to provide information, express your opinion, suggest alternatives and have a say on how we are proposing to manage the Wedge and Grey areas.

If you prefer not to write your own submission you could make a joint submission with others.

What Makes An Effective Submission ?

To ensure your submission is as effective as possible:

- make it concise and clear.
- list your points according to the subject sections (and page numbers) in the plan.
- describe briefly each subject or issue you wish to discuss.
- say whether you agree or disagree with any or all of the objectives or recommendations within each subject or just those of specific interest to you; clearly state your reasons (particularly if you disagree) and give sources of information where possible.
- suggest alternatives to deal with any issue with which you may disagree.

It is important to indicate those strategies and recommendations you agree with as well as those with which you disagree.

Each submission is important in its own right but those that give reasons for concerns, give support where appropriate and offer information and constructive suggestions are most useful.

What Happens To Your Submission ?

All submissions will be summarised according to the topics discussed. The draft masterplan will then be reviewed in the light of submissions, according to established criteria (see over). An analysis of the submissions will be published, including an indication of whether the plan was or was not amended in response to the comments and justification for the decisions. All submissions are confidential. If you do not want your name appearing in the analysis of submissions please note this on your submission.

What Criteria Will Be Used In Assessing Your Submission?

1. The draft masterplan *will* be amended if a submission:
 - (a) provides additional resource information of direct relevance to management;
 - (b) provides additional information on affected user groups of direct relevance to management;
 - (c) indicates a change in (or clarifies) Government legislation, management commitment or management policy;
 - (d) proposes strategies that would better achieve management goals and objectives; or
 - (e) indicates omissions, inaccuracies or a lack of clarity.

2. The draft masterplan *will not* be amended if:
 - (a) there is clear support for the draft proposals;
 - (b) a neutral statement is offered or no change is sought;
 - (c) the submission addresses issues beyond the scope of the plan;
 - (d) the submission makes points which are already in the plan or were considered during plan preparation;
 - (e) existing strategies and recommendations appear to be the most practical, where submissions are in conflict with others or where resources are limited;
 - (f) the submission contributes options which are not feasible (generally due to conflict with existing legislation, or Government or departmental policy).

Deadline

Submissions are welcome for at least two months following the date of release of the draft masterplan. Please ring Mr Matt Cavana at CALM Como (08) 9334 0594 or the CALM Moora District Office (08) 9651 1424 for enquiries.

Where Do You Send Your Submission ?

Written submissions should be sent to:

Executive Director
Department of Conservation and Land Management
Locked Bag 104
Bentley Delivery Centre W.A. 6983

Attn: Plan Coordinator
Wedge and Grey Masterplan

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EXECUTIVE SUMMARY

The Department of Conservation and Land Management (CALM) is preparing a Masterplan for Wedge and Grey according to the standard CALM management planning process. The Masterplan will provide a framework to guide future planning, development and management of recreation and tourism at Wedge and Grey, so that visitors can enjoy the areas' natural attractions in a sustainable manner.

This draft Masterplan has been published to seek public comment on proposals prior to preparing the final Masterplan.

Wedge and Grey are coastal sites in the Central Coast Region of Western Australia, located between the towns of Lancelin and Cervantes and approximately 150 km north of Perth. At present Wedge and Grey are remote, difficult to access, environmentally degraded and used almost exclusively by squatters. However, changes are on the horizon for both sites and a Masterplan is being prepared to guide their future planning, development and management.

The 500 or so recreational squatter shacks currently occupying Wedge and Grey will be removed soon after June 2001. In their place, a range of nature-based recreation facilities and visitor accommodation types will be established, and the sites will be incorporated into Nambung National Park. Several Government plans pave the way for this to occur, most notably the State Government Squatter Policy, the Central Coast Regional Strategy and the Nambung National Park Management Plan. The Government initiative to construct the seven metre wide sealed coast road (Indian Ocean Drive) between Lancelin and Cervantes by 2002 is another major factor in planning for the future of Wedge and Grey.

The main aim of the Masterplan is to determine the most appropriate forms of land use and development to ensure that future use is equitable, sustainable and compatible with the high conservation values of the surrounding areas.

The scope of work in preparing the Masterplan is to develop proposals for appropriate and sustainable land use, suitable recreation uses, accommodation types, access and circulation, rehabilitation, interpretation, management arrangements and implementation of works.

The contents of this document emulate the steps taken to prepare the draft Masterplan, which were to:

- review relevant background information;
- involve key stakeholders in preparing the Masterplan;
- assess the sites' physical characteristics and existing use;
- consider recreation opportunities and constraints;
- develop a vision for recreation and tourism;
- develop management strategies to guide ongoing planning and development, including indicative land use zones; and
- provide site development concepts to indicate the type of land use and development envisaged.

The vision for future recreation and tourism is that Wedge and Grey will achieve best practise standards in environmentally sustainable development, providing for socially acceptable and equitable uses which are economically sustainable and rely on the use, conservation and enhancement of natural resources.

It is envisaged that Wedge and Grey will provide nature-based recreation and tourism opportunities for day visitors and short-stay holiday makers, catering for a wide range of interests and budgets. Basic amenities and interpretive facilities will be provided for potentially large numbers of visitors seeking access to the beaches and other natural attractions of the region.

Visitor services available may include information, marine and land-based tours and refreshment sales. Overnight facilities should cater for limited numbers of visitors and include a spectrum of accommodation types such as unserviced bush camp sites, basic self-contained beach huts for families, group accommodation for budget travelers and special interest groups, and some accommodation with a higher standard of amenity and service.

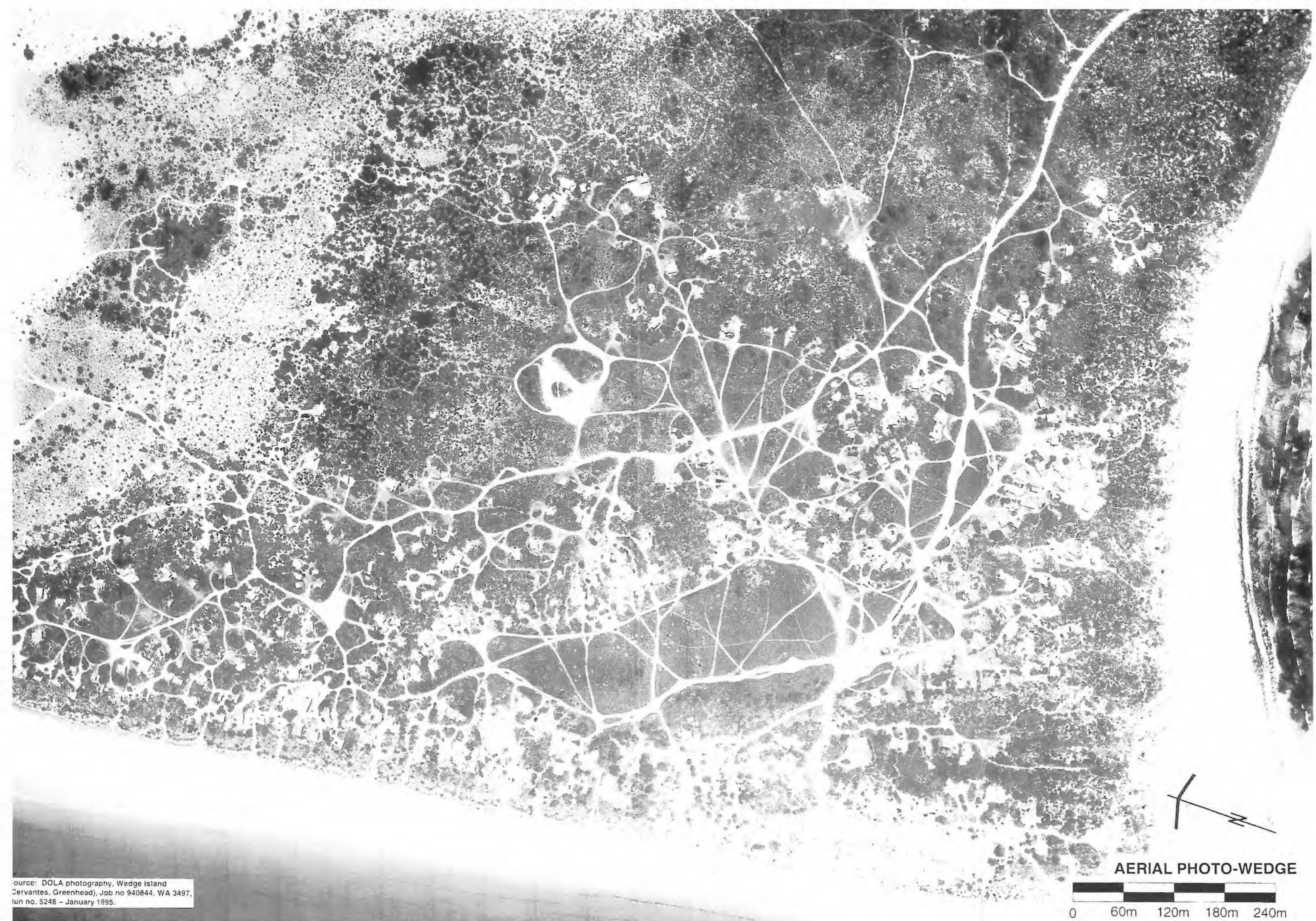
Development and management of Wedge and Grey should achieve high standards of environmental awareness and protection, and the natural environment should be an integral part of visitor experiences and facilities. Sensitive landscapes will be restored and protected, and infrastructure should incorporate appropriate technologies to minimise environmental impacts and maximise the use of renewable resources.

Government will undertake rehabilitation and landscape protection works, and provide basic amenities for day visitors and possibly campers. Commercial partnerships should be established with suitable proponents to develop accommodation and other services, whereby the revenue from commercial operations covers the costs of maintaining the sites' public facilities and services and provides adequate returns for the developers and operators.

This Masterplan is being prepared by a CALM Planning Team, with input from a group of stakeholders which form the Masterplan Consultative Group (MCG) and financial assistance from Coastwest Coastcare funding.

Public comments on this draft Masterplan will be analysed and appropriate amendments will be made to the plan. A summary of comments on this draft plan will be published with the final Masterplan.

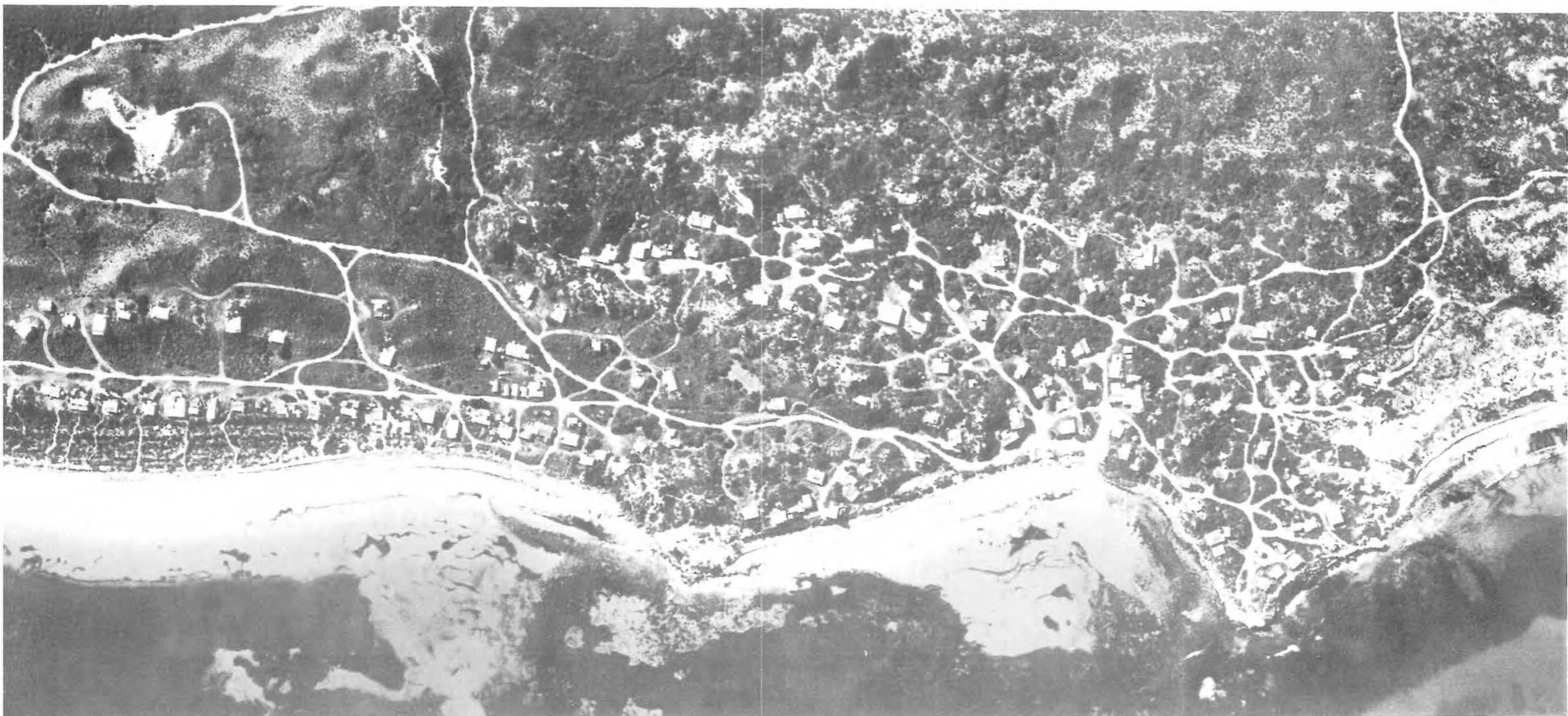
After the Masterplan is finalised, expressions of interest will be called to seek proposals from prospective developers to provide accommodation and other visitor services. Subject to the outcomes of the expressions of interest stage, CALM will prepare detailed site development plans to establish basic public amenities and landscape protection. It is hoped that suitable commercial partners will commit to this project, work closely with CALM's planners and develop the full range of facilities and services envisaged for Wedge and Grey.



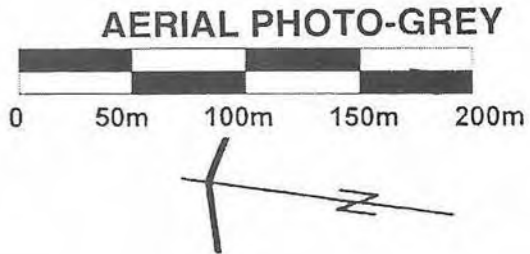
AERIAL PHOTO-WEDGE

0 60m 120m 180m 240m

Source: DOLA photography, Wedge Island
Cervantes, Greenhead), Job no 940844, WA 3497,
Run no. 5248 - January 1995.



Source: DOLA photography, Wedge Island,
File no 93952, WA 3380, Run no. 5050 - April 1994.



INTRODUCTION

1.0 PURPOSE OF THE MASTERPLAN

The purpose of the Wedge and Grey Masterplan is to provide a framework to guide future planning, development and management of recreation and tourism opportunities and facilities, so that visitors can enjoy the areas' special values, particularly the natural attractions and landscapes, in a sustainable manner.

The Masterplan aims to determine the most appropriate types and combinations of land use for Wedge and Grey. It will guide development and management to ensure that future use is equitable, sustainable and compatible with the high conservation values of the surrounding area.

This Masterplan is consistent with the State Government's Squatter Policy to remove existing recreational squatter shacks by June 2001. Professional fishers' shacks are subject to separate arrangements as outlined in Attachment 6. The impetus to prepare this Masterplan has come from the Central Coast Regional Strategy and the Nambung National Park Management Plan. In the context of CALM Policy Statement No. 1, the Masterplan is technically an amendment to the Nambung National Park Management Plan. These two documents recommend that Wedge and Grey be developed to provide a range of accommodation and day visitor facilities for recreation and tourism, and that the sites be incorporated into Nambung National Park.

The Department of Conservation and Land Management (CALM) has undertaken to prepare this Masterplan to facilitate proper planning and management of Wedge and Grey.

2.0 BACKGROUND

2.1 Location

Wedge and Grey are squatter shack settlements located in the Central Coast Region (referred to as the 'Turquoise Coast') between the towns of Lancelin and Cervantes, approximately 150km north of Perth (Figure 1). The squatter settlements currently occupy reserved land at Wedge Point (Reserve No. 43283 – 213ha) and Grey (Reserve No. 43284 – 193ha). These reserves are unvested, unclassified reserves gazetted on 24 February 1995 for the purpose of Parkland, Recreation and the Letting of Cottages (Figure 2). The reserves were gazetted as a temporary measure to enable the implementation of the State Government's Squatter Policy as outlined in Section 2.2 Squatter Policy. The reserves have been placed under the management of CALM according to Section 33(2) of the CALM Act

1984. Registered shacks at Wedge and Grey number 370 and 130 respectively.

Both sites are surrounded by Parks and Reserves of high conservation value and form part of CALM's Moora District, which extends from Dongara in the north to Lancelin in the south and about 150km inland to the east. Nambung National Park (surrounding Grey) and Wanagarren Nature Reserve (surrounding Wedge), are listed on the National Estate Register in recognition of their significance for conservation. As stated in the Nambung National Park Management Plan, Wanagarren Nature Reserve will be incorporated into Nambung National Park and Wedge and Grey will also be incorporated into the Park when the squatter shacks are removed.

2.2 Squatter Policy

The control of squatters on Crown land in Western Australia is in accordance with the Cabinet endorsed State Government Squatter Policy, shown as Attachment 1.

The objective of the policy is:

'to control the establishment of any new unlawful dwellings (squatter shacks) on coastal Crown land and facilitate the removal of existing dwellings (shacks) over a six year period'.

Problems resulting from squatter occupation along the Western Australian coast have been identified as:

Environmental Impact

- Settlements are unplanned, uncontrolled and have an adverse impact on fragile coastal environments they are located on.

Environmental Health

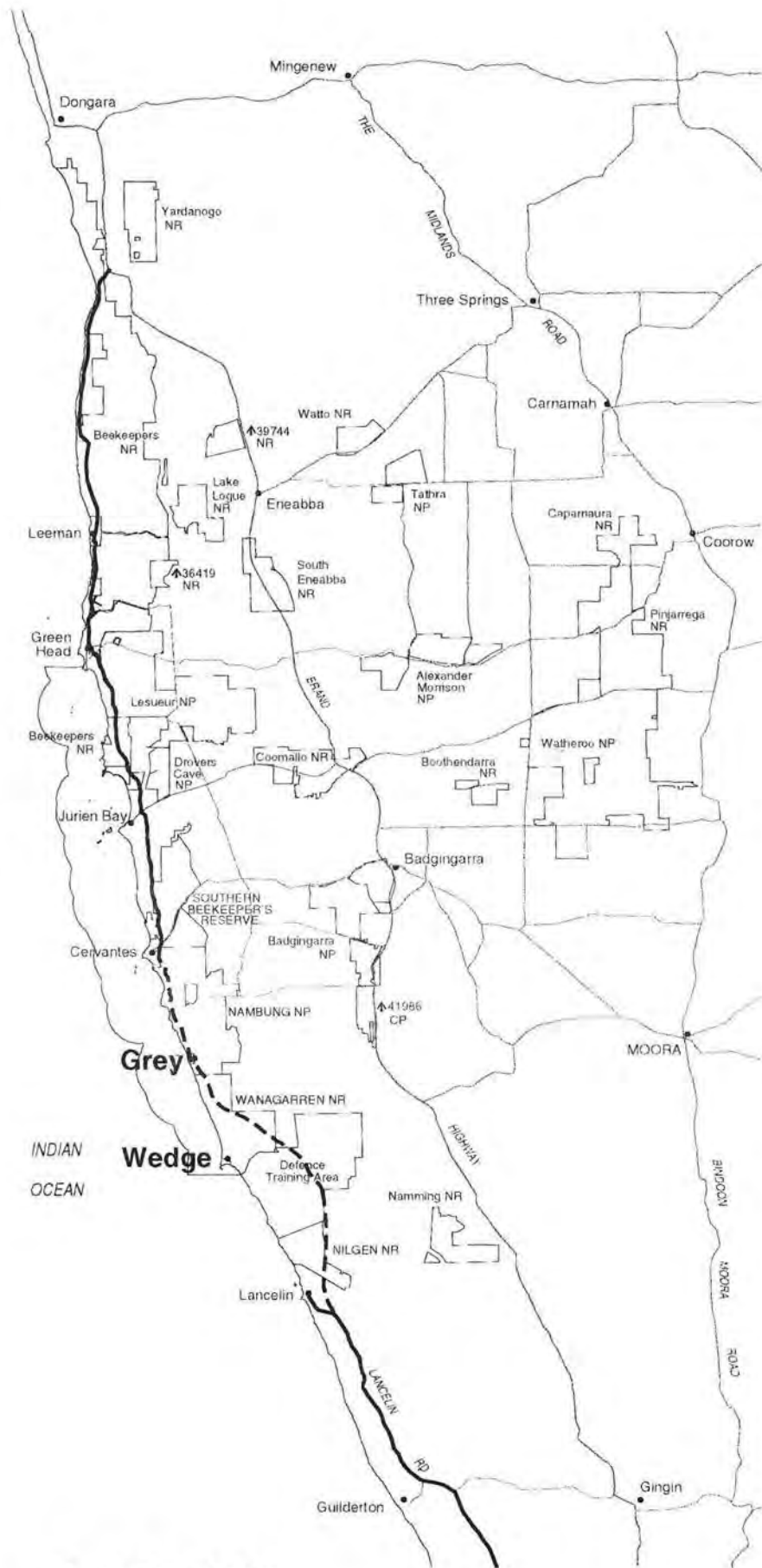
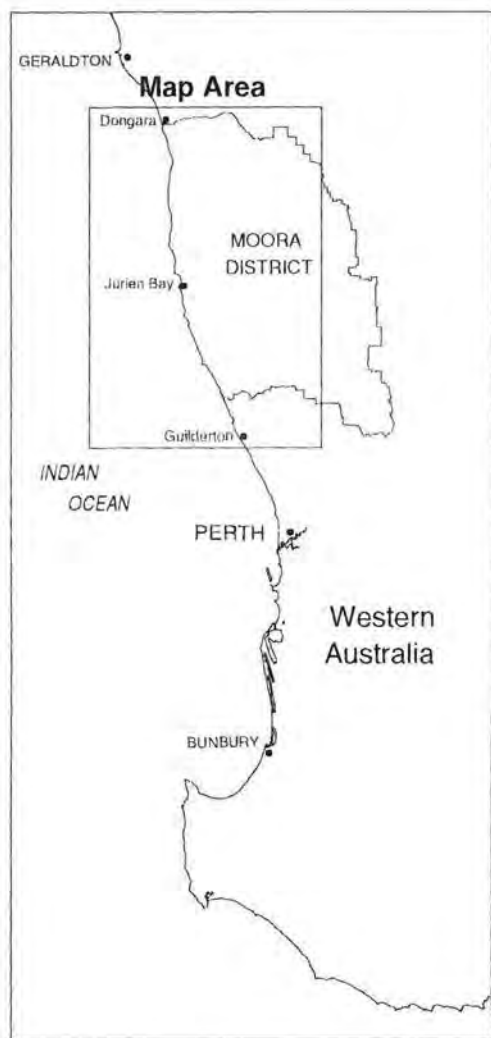
- Sewage and waste disposal systems are inadequate and can become serious health risks.

Exclusive Use and Financial Advantage

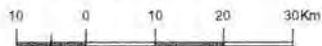
- The shacks occupy the best locations on the coast that would otherwise be available for public use and enjoyment.
- Squatters gain a financial advantage as they have not purchased and do not pay rental to the Crown or local authority.




Demand for Services

- Squatter settlements have grown unchecked thereby creating demand for the provision of public utility services.

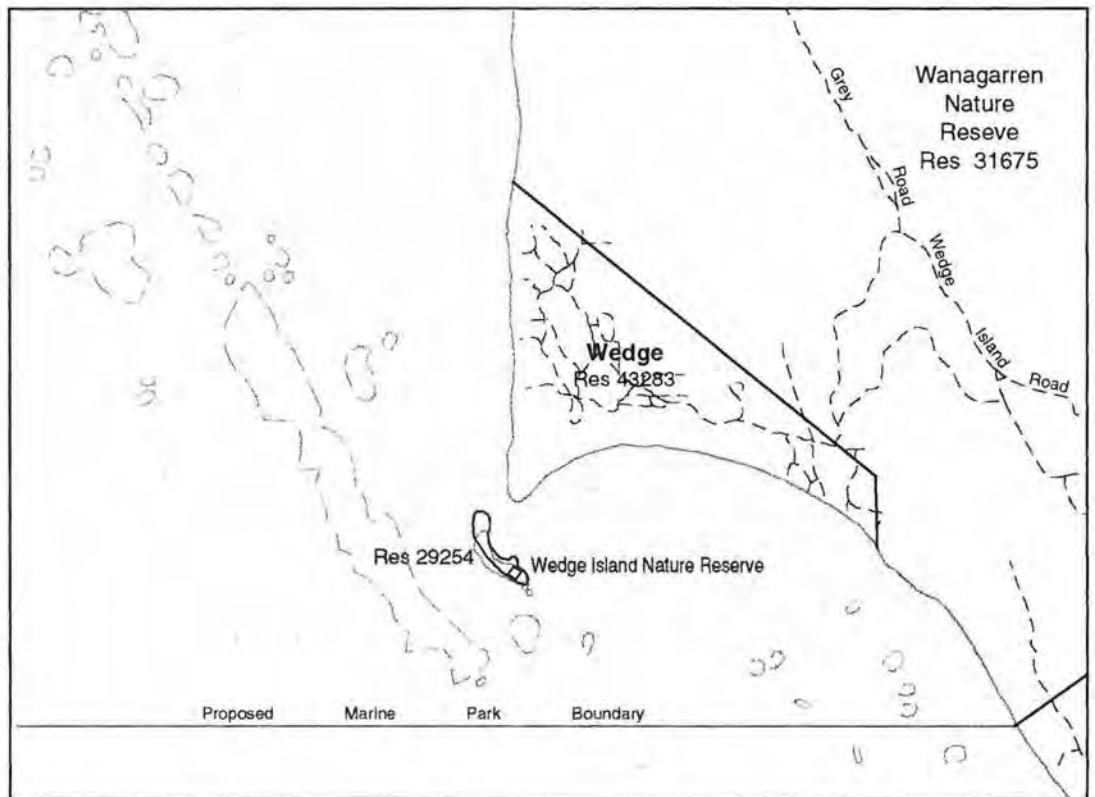
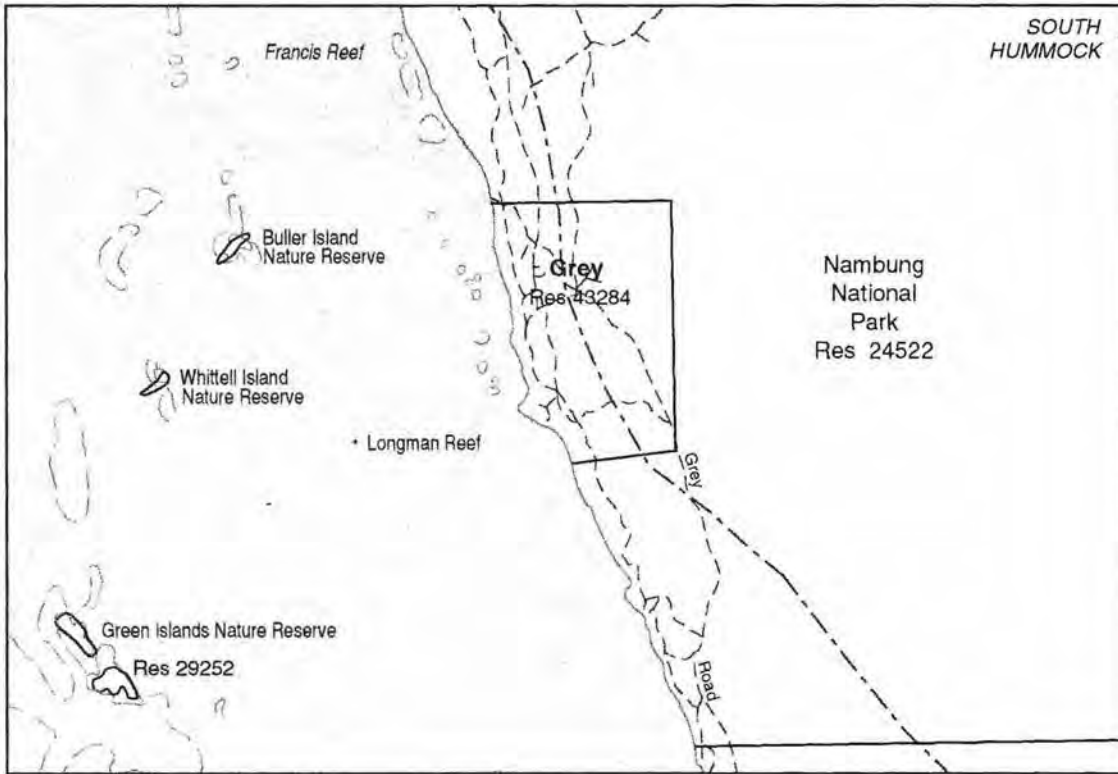


LOCATION

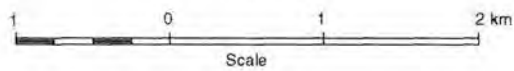


-  Proposed Jurien Bay Marine Park
-  New Coast Road (completed)
-  Proposed Coast Road (to be completed by 2002)

FIGURE



TENURE







-  Proposed Jurien Bay Marine Park
-  Proposed Coast Road
-  Existing roads
-  Tenure Boundary

FIGURE 2

Non Compliance

- The shacks do not comply with Building Codes, other Acts and Regulations and create a double standard for the local authorities.

Implementation of the Squatter Policy has involved:

- Creating reserves for squatter occupation under the control of a management agency (in this case CALM).
- Registering shacks and preventing further construction.
- Charging an annual lease fee to shack owners to be used for site management and policy implementation.
- The State Government providing support for the program.
- Removal of shacks and site rehabilitation at the end of the six-year program.
- Developing arrangements to relocate professional fishers at Wedge to an appropriate area of the Reserve which can be leased for their purposes (see Section 10.9.3 Professional Rocklobster Fishing Development Node).

CALM, in conjunction with the Shire of Dandaragan, have commenced implementation of this Policy at Wedge and Grey. The existing shacks are due to be removed at the expiry of leases on 30th June 2001.

2.3 Future Development Opportunities

The removal of squatter shacks at Wedge and Grey offers an excellent opportunity to rehabilitate and develop existing disturbed land for much needed nature-based recreation and accommodation facilities on the Turquoise Coast. The expansion of Perth's northern and north-eastern growth corridors will significantly contribute to the demand for access, facilities and accommodation on the Central Coast.

The southern section of the new coast road between Lancelin and Cervantes is due for completion to a 7 m wide sealed standard by June 2002. It is anticipated that the coast road, when fully developed between Lancelin and Dongara, will replace the Brand Highway as the primary north-south travel route for domestic traffic. The alignment will pass close to Wedge and Grey, exposing a section of coast that has previously been remote and difficult to access. A new range of visitors seeking a variety of recreation and tourism opportunities will be attracted to the area.

Many of the region's tourism attractions and opportunities are nature-based and managed by CALM (see Attachment 2 – Central Coast Region Nature-based Attractions, and Attachment 3 – Proposed Access and Recreation Sites). A wide range of other tourism proposals and opportunities exist in the Central Coast Region, and completion of the coast road will

substantially increase the demand for accommodation and other services. Existing towns will expand to cater for future demand, and the Shires of Dandaragan and Carnamah have plans for the redevelopment of squatter shack sites to provide new facilities for day use, camping, caravanning and chalet-style accommodation. A major resort development is proposed at Jurien.

Wedge and Grey are proposed for inclusion into the Nambung National Park. The Nambung National Park Management Plan and the Central Coast Regional Strategy (CCRS) recognise Wedge and Grey as potential development nodes supporting *'multifaceted developments which could include a range of accommodation, food services, day use activities, fishing excursions, and other recreation tours and commercial pursuits'*.

2.4 The Masterplan Consultative Group

The Wedge and Grey Masterplan Consultative Group (MCG) was formed to assist CALM's planning team in the preparation of this Masterplan. MCG members come from community groups and Local and State Government agencies that have significant interests in the Central Coast Region and the future of Wedge and Grey. The MCG is a voluntary group that has no statutory decision making powers.

Three meetings of the group were conducted with the aim of bringing the major stakeholders and interest groups together to consider land use options for inclusion in this Masterplan. The MCG met in October 1998, January 1999 and March 1999. At these meetings the MCG discussed background information and the anticipated scope of the Masterplan; reviewed the site analyses, zoning and concept development plans; and provided comment on a preliminary version of this draft Masterplan. Members of the planning team met with various MCG members on several other occasions.

It is anticipated that the MCG will have a final meeting to review comments submitted on the draft Masterplan and consider amendments required to finalise the Masterplan.

2.5 Community Consultation

Community consultation was held at Wedge and Grey over a four day period on the weekend of the 8th to the 11th of January 1999. Shack leaseholders were notified by mail prior to the consultation process and display of plans. Planning team members visited Wedge and Grey to present and discuss preliminary planning options and to gain the community's input and ideas for future land use possibilities. Interest and attendance levels were high (in the hundreds), resulting in useful and constructive outcomes. Although much of the

discussion and comments revolved around the issue of shack retention, the planning team gained valuable insights into a range of site-specific issues based on local knowledge of the existing shack user group.

Refer to Attachment 4 - Public Notice of Consultation, and Attachment 5 - Summary of Comments from Community Consultation.

Individuals and organisations provided substantial useful input by submitting various plans to the planning team during the preparation of this Masterplan.

2.6 Masterplan Process

Because the Wedge and Grey areas will ultimately be incorporated into the Nambung National Park, the formal process adopted for this Masterplan is as though it is an amendment to the recently approved Nambung National Park Management Plan. Following assessment of public input and appropriate amendment to the draft, a final Masterplan will be adopted by the NPNCA and passed to the Minister for the Environment for approval.

3.0 AIM, OBJECTIVES AND OUTCOMES OF THE MASTERPLAN

The aim of the Masterplan is to provide a framework for future land use that is equitable, sustainable and compatible with the high conservation values of the surrounding area.

The objectives of the Masterplan are to:

- Recommend a range of nature-based recreation and tourism opportunities which appeal to a wide range of potential visitors, including existing users.
- Identify appropriate tenure and sustainable land use options and zoning.
- Develop proposals for future access, circulation and use.
- Recommend suitable accommodation zoning and preferred facility design.
- Identify the requirements for rehabilitation and environmental protection and enhancement.
- Identify education and interpretation opportunities.
- Identify strategies for future management, including commercial partnerships, professional fisher facilities, development standards and planning requirements.
- Consider long term staging and implementation of works.

Broad cost estimates were to be considered in the Masterplan but this matter has not been addressed. Further planning is required to enable costs to be defined.

The key outcomes of the draft Masterplan have been:

- the initiation of a forum for positive and effective consultation between stakeholders; and
- the documentation of a set of principles and guidelines which prescribe the requirements for appropriate and sustainable land use, but also allow some flexibility to encourage innovative approaches by planners and prospective developers.

SITE ANALYSIS AND ASSESSMENT

Detailed site assessment and analysis have been undertaken at Wedge and Grey to assist the process of land use planning and Masterplan development. Analysis plans have been developed following data collection, detailed field based assessment and interpretation of aerial photography (see Attachment 7 - Site Analysis Plans).

The site analysis plans provide a broad overview of natural and cultural aspects likely to influence future site development and design. The analysis plans concentrate on the following factors likely to influence future land use decisions:

- Slope and landform
- Vegetation patterns and density
- Existing land uses
- General features (views, prevailing winds, features etc).

Combined and viewed as an overlay system, the analysis plans reveal areas with distinct characteristics that make them suitable for certain types of land use.

4.0 EXISTING CONDITIONS AND PHYSICAL CHARACTERISTICS

4.1 General Site Factors

Wedge and Grey share similar climatic conditions, experiencing a climate of hot, dry summers and cool, wet winters with a moderately reliable winter rainfall. Annual average rainfall is 600mm and falls between May and September. The mean maximum temperature is 30.5 °C, while the mean minimum is approximately 9°C.

Wedge and Grey experience a range of wind conditions as indicated by the wind roses for Lancelin in Figure 3. Strong south to south-westerly sea breezes blow for about 60% of the year. In the summer months, hot east to south east moderate winds predominate in the mornings, while the afternoons experience strong prevailing winds from the south to south west. These conditions accentuate the threat of bushfires in the dry and highly combustible heathland vegetation surrounding both sites. Winter winds are predominantly moderate, coming from the east to north east in the mornings and the south to south east in the afternoons.

Fauna has not been considered as a major planning factor at this stage. No fauna surveys have been conducted for Wedge and Grey though information about native and introduced fauna exists for the surrounding reserves (refer to the Nambung National Park Management Plan). Anecdotal evidence suggests

that large numbers of carpet snakes inhabit the shacks. This will be an important consideration when shacks are removed.

4.2 Landform

Wedge and Grey occur on a coastal plain which rises gradually to the inland. The coastal plain is composed of sediments deposited parallel to the present coast by a receding sea. The landform is generally linear with large low lying areas and dunes rising more than 100m high. The soft sandy coastline at Wedge and in parts of Grey makes for a dynamic, possibly eroding foreshore where the primary dune is alternatively built and eliminated seasonally or by storm seas.

Wedge

Wedge is located on a large sand spit or cusped beach ridge promontory that extends seaward to the nearshore reef. The landform is varied and comprised of dune ridges with low-lying areas or swales located between ridges. Slopes are moderately undulating, resulting in a relatively exposed site.

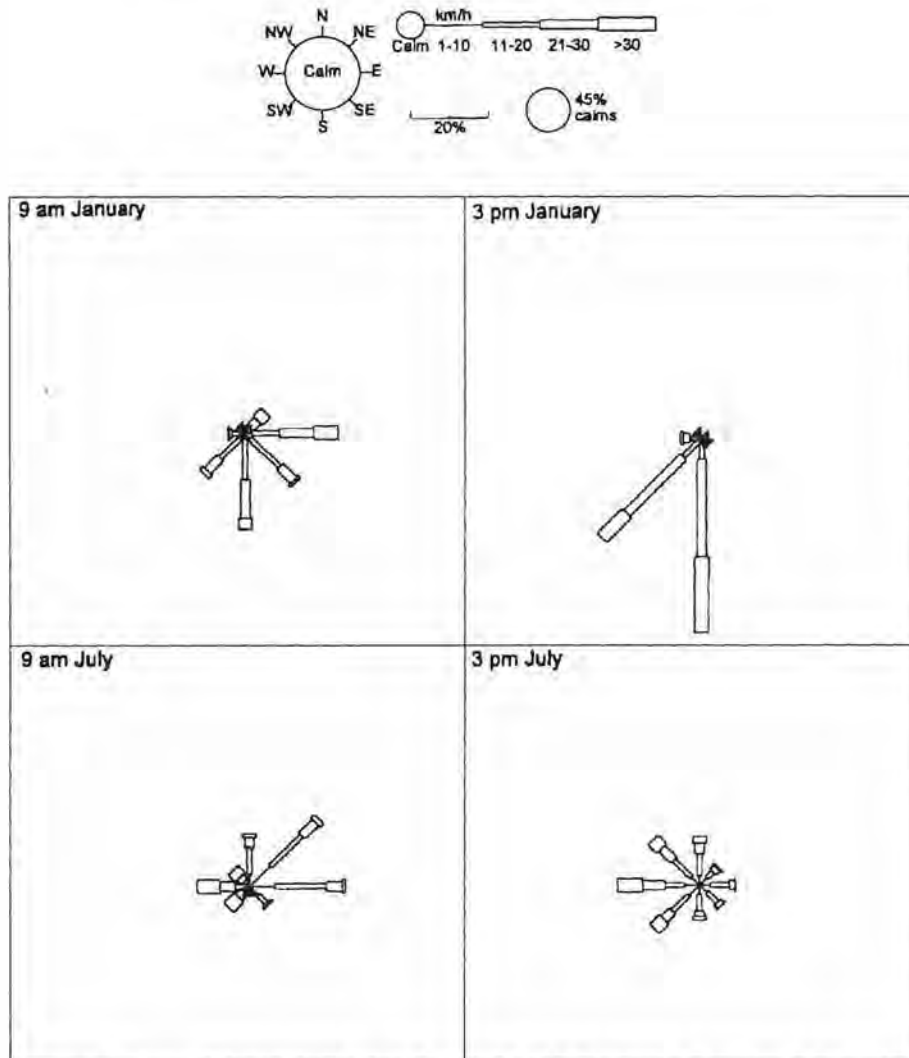
Large, bare, mobile sand dunes north and east of Wedge rise dramatically and steeply providing a strong landscape contrast to the surrounding moderately undulating and vegetated landscape. The dunes are moving northwards and sands blown north across Wedge replenish the dunes. As the dunes progress north, deflation areas on the south edges of the dunes are colonised by plants.

East of the foredune is a large seasonally and tidally inundated area (interdunal-swamp). This saline and dynamic water body floods in winter and presents a major constraint to site development.

The northern foredune is unstable and dynamic. Blow outs occur where undefined vehicle and pedestrian access has destabilised dunes. Shacks have been constructed extensively on the northern foredune, to take advantage of access and views. Future development should take into consideration the fragility and dynamic nature of the foredune and provide adequate setbacks.

The south Wedge foredune forms a high and steep ridge that is cliffed along the seaward aspect. Access to the beach across these foredunes is difficult and unsustainable. Tinley (1992) identified this foreshore as being an accretion site.

Figure 3. Wind Rose Data for Lancelin, 1965-1999.



Source: Climate and Consultancy Section in the Western Australian Regional Office of the Bureau of Meteorology, 1999.

Protected swales, between undulating dunes create sheltered nodes capable of supporting development. Refuge from prevailing winds will be a crucial landscape asset in the development of recreation and accommodation sites.

A land bridge or tombolo forms occasionally to connect Wedge Point to Wedge Island (an A Class Nature Reserve). Periodically this allows pedestrians and vehicles to access the island. Management guidelines are required to ensure the islands conservation values are protected from visitor impacts when the tombolo forms.

Grey

The landform at Grey is undulating and offers more sheltered and discrete spaces than at Wedge. Two rocky limestone headlands form a small, protected bay offering an attractive contrast to the predominant beach shoreline. Sections of the limestone headland may be

unstable and cliff hazards require appropriate visitor risk assessment and access management.

Two high north-south dune ridges are found in the centre of the settlement, with a large sheltered swale between them. Dune slopes are moderately steep. Grey's northern beach is narrow with small coves that provide discrete beach areas. The foredune is gently sloping and generally stable, though shacks and associated access tracks constructed on the northern foredune have some impact. Development should respect the fragility and dynamic nature of the coastal zone.

The foredune south of the main headland is steep with sand blow outs through access ways. This erosion requires management and rehabilitation to ensure the integrity of the foredune is maintained and improved. Access to the beach from the area immediately inland is difficult, requiring sensitive development solutions.

Large mobile dunes occur north-east of Grey providing a strong sense of landscape contrast.

4.3 Vegetation Patterns and Density

Vegetation on the seaward margin of the coastal plain consists of a parallel suite of plant communities, with sand-fixing pioneer plants on the littoral, low heath and perennial grasses on the foredunes, and open shrubland and denser thickets on the more sheltered and stable dunes. Undulations amongst the dunes at Wedge and Grey create a mosaic of different vegetation habitats and communities.

Declared rare flora species occur in the Reserves around Wedge and Grey but no rare flora has been recorded at the sites. A flora survey will be conducted prior to development of the sites.

Both sites are reasonably well vegetated with localised disturbance around shacks and tracks. The species mix and plant forms offer minimal shade or shelter. Most vegetation is low lying, a result of the wind swept nature of the coast. Little shelter or shade is found on dune faces and ridges. Thickets of tall shrubs and some trees occur in the more sheltered interdunal areas. Heath or low scrub dominated by *Acacia lasiocarpa* and *Melaleuca acerosa* can also be found.

Significant disturbed or cleared areas are located throughout both settlements, the result of shack occupation, uncontrolled vehicle access, erosion, fire and clearing for fire protection.

Some areas of the large seasonally inundated area at Wedge are infested with the exotic rush, *Juncus* sp., which requires removal and rehabilitation. Clearings have formed in low lying inundated areas at Wedge, due a combination of the close proximity of the saline water table to the ground surface and the excessive proliferation of vehicle tracks, formed to avoid wet and boggy areas. Redevelopment will require extensive revegetation of all disturbed areas.

Foredunes, where not disturbed by squatter shacks, vehicle and pedestrian tracks, are reasonably well vegetated with dune grasses, salt bush and associated plant communities. Every effort to reduce disturbance to the foredune should be taken to ensure vegetation cover is maintained and enhanced.

Squatters have planted numerous trees and shrubs for shade and shelter, which has encouraged vegetation cover throughout the settlements. Planted species include a variety of Eucalypts and Acacias and some exotic and non-indigenous native trees such as Norfolk Island Pines and Tamarisks. Lawn varieties such as couch, buffalo and kikuyu, have been introduced around some shacks. Introduced species may be retained or

removed, depending on the amenity of the plantings and invasiveness of the species.

4.4 Existing Land Use

The existing land use analysis focuses broadly on how land use has affected or impacted on the sites.

Squatting has been the primary land use focus at Wedge and Grey for approximately forty years. In the post war period, as the rock lobster fishing industry developed on the mid-west coast, fishers built shacks to be closer to their fishing grounds. Wheatbelt farmers seeking coastal recreation built shacks in the 1950's and 60's. The 1970's and 80's saw a greater emphasis on recreational squatting, as more Perth based people sought free coastal holidays in an uncontrolled environment. Most shacks were built for the purpose of family oriented recreation use of the coastal zone.

Squatter shacks number 370 at Wedge and 130 at Grey. Both sites have developed on a first come-first served basis resulting in an unplanned, unstructured layout, which while intriguing presents no logic. Shacks are generally located to take advantage of particular site and climatic conditions.

Shack sites have been chosen for:

- ocean and island views
- shelter from the wind and elements
- proximity to the beach
- high, dry sites
- to be near friends or family.

Shack groupings are found in the following areas at both sites:

- along the north-west facing foredunes
- on high points/dune slopes to take advantage of views
- behind and along dune ridges
- in sheltered swales.

Distinct groupings of shacks can be identified and indicate similar periods of construction. Most shacks are concentrated near the coast, although there are a number of more isolated structures inland on the fringe of the settlements. The mobile sand dune at Wedge may limit development to the north and north-east.

There are currently five to seven professional rock lobster fishing boats operating from Wedge. Professional rock lobster fishers, their families and deck hands occupy a number of shacks at Wedge. These shacks are close together and usually have associated storage and maintenance structures. There are no longer professional fishers residing at Grey though one professional fisher moors his boat at Grey and commutes from Cervantes daily.

The number of campers at Wedge and Grey has increased markedly in recent months as the Shire of Gingin has been actively managing unauthorised camping. Many of the campers that previously used the Gingin Shire coast are now travelling further north to Wedge and Grey, and this trend is likely to exacerbate the environmental and safety problems that exist at these sites.

The ad-hoc nature of shack development at Wedge and Grey has resulted in proliferation and duplication of vehicle tracks. A distinct hierarchy of tracks is evident at both sites. A main vehicle thoroughfare provides access through the sites, (usually north-south) and to a vast array of secondary tracks, providing access to individual shacks, groups of shacks and the beach. Most tracks have been established for convenience, rather than necessity. The condition and alignment of many tracks is dangerous and unsustainable.

Many tracks extend beyond the settlement into outlying areas and off-road driving on the large mobile dunes is popular, particularly with trail bikers. The number of trail bikers camping at Wedge and Grey appears to have increased in recent months, most likely as a result of the Gingin Shire's management of unauthorised camping. The noise associated with trail biking through the squatter settlements has become an issue for existing shack dwellers at Wedge.

Multiple beach access points for both vehicles and pedestrians can be found on the northern beach at Wedge. The main beach access point at Wedge is utilised by 4WD vehicles, 4WD tour buses, pedestrians, motorcycles and tractors and fuel trucks used by the professional fishers to launch and re-fuel their boats. The existing main beach access at Wedge does not afford good visibility and should be realigned for safety and environmental reasons.

Easy access to the main beach is available at Wedge though access can vary due to tides in winter and spring. Beach access is not controlled and pedestrian beach users mix with vehicles travelling at speed. This situation is unacceptable and future site development, while not removing the right of vehicle beach access, will provide distinct vehicle free beaches.

Beach access points for vehicles have been rationalised and rehabilitated by the Grey community around the Main Bay. Beach vehicle use in this area is generally limited to boat launching and occasional use by four-wheel motorbikes and is not a significant management problem. Future development of the site will provide for distinct vehicle free beach areas and designated boat launching ramps. Access by vehicle to beaches in the northern part of Grey needs to be controlled.

4.5 Existing Services

Existing services at Wedge and Grey are limited. Individual shacks generally rely on petrol and diesel generators for power supply, although some have developed solar or wind powered systems. Other fuels utilised at Wedge and Grey include bottled LP gas, for cooking and lighting, kerosene lighting and refrigeration and wood heating.

Effluent disposal is unregulated and the majority of shacks utilise individual septic systems or bore hole toilets. The high water table at Wedge is of concern with regard to contamination from septic systems and other forms of effluent disposal. The health risks associated with this require that future development proposals address the provision of environmentally sustainable effluent disposal.

Water is obtained in a number of ways. Rainwater for drinking is collected from rooftops and stored in tanks. Groundwater is generally saline, particularly at Wedge, and unsuitable for drinking. Some shacks pump ground water from shallow bores for the purpose of washing and ablutions. Deeper bores outlying Wedge supply potable groundwater via agricultural windmills to a few shacks. This outlying area is reputed to have underground streams up to 300 mm in diameter that flow within five metres of the ground surface with high quality water.

No formal rubbish collection is provided at Wedge and Grey. However, the communities have established informal rubbish tips located south-east of the settlement at Wedge and north-east of Grey. A number of large vehicle tips are also located on the outer fringes of both sites. Whilst these are generally contained, the large amount of wrecked vehicles are unsightly and require removal. Contamination of soils through leaching of oils, petrol, battery acid and broken glass requires investigation.

5.0 CONSTRAINTS

Constraints to development at Wedge and Grey include:

Services

- Lack of available services (power, water, sewerage) and distance from the nearest connections, in Lancelin and Cervantes, would render any connection expensive and possibly unfeasible. State and Local Government have indicated that mains services will not be provided so future development will need to be 'self-servicing'.

Water

- The provision of reliable and sustainable potable water.

Compatibility with conservation values

- Use must be compatible with proposed tenure of National Park.
- Use will encroach and impact on adjacent conservation lands and waters.
- Infrastructure to service developments may have to be located in the surrounding conservation reserves eg. tip sites, wind turbines.

Wind

- The ferocity of prevailing winds, low lying landform, airborne sand particles and the relative lack of protection can have a significant impact on visitor comfort levels.

Landform sensitivities

- The unstable and dynamic dune landscape requires protection with an aim to minimise impact on the environment by providing controlled use and adequate setbacks. The cliffed foredune south east of Wedge limits the opportunity for development. Seasonally inundated low lying areas at Wedge require engineering advice to determine stability, extent of inundation and feasibility of access construction through this area.

Safety

- Careful planning to avoid hazards and manage visitor risks.

Capacity

- Demand for access may exceed the sites' capacity for sustainable use.
- Concern that the sites could eventually grow to become towns.

Professional rock lobster fishers

- Their continued presence at Wedge combined with a predominantly recreational use of the site is not an ideal use mix. Careful planning, design and management will be required to separate conflicting uses and minimise impact upon both parties.

Social Issues

- Existing users may resist change.
- Residents of adjacent towns may perceive development proposals as being a threat to existing town businesses.

Timing

- Commitments to construct the coast road may be delayed or not honoured.

Access for development

- Good road access to facilitate development is not likely to be constructed for a year or more after shack removal.

6.0 OPPORTUNITIES

Opportunities for development at Wedge and Grey include:

Coastal recreation resources

- Magnificent beaches, reefs, offshore islands and the proposed marine park.

Conservation

- Surrounding areas of high conservation value and nature-based tourism potential.

Tenure

- Proposed tenure as National Park emphasises the strong environmental foci of the sites.

Access

- Improved via the new Indian Ocean Drive.

Proximity

- Within 150km of central Perth and close to expanding northern suburbs.

Existing disturbance

- Vehicle access tracks and levelled shack sites offer an opportunity to develop with minimal impact to existing vegetation and landform.

Landform

- Dune swales provide sites for sheltered camping and low density built development.

Lack of services

- The opportunity to embrace environmentally sustainable development principles and technology, developing Wedge and Grey to best practice standards.
- Wedge and Grey could become models for WA in developing 'self-servicing' infrastructure based on the use of renewable resources.

Ecotourism

- The opportunity to provide a range of recreation and tourism opportunities and visitor experiences based on the natural environment.

Natural landscape attractions

- The Pinnacles and surrounding dune systems offer recreational and nature-based tourism development potential.

Recreation activities

- Swimming, 4WD'ing, beach walking, windsurfing, fishing, snorkelling, exploring, relaxing, boat tours, cycling, nature appreciation environmental education.

Existing users

- Shack owners have expressed a desire to continue to recreate in the area. Their requirements need to be considered.

DEVELOPMENT AND MANAGEMENT DIRECTIONS

7.0 THE VISION FOR RECREATION AND TOURISM

The future redevelopment and rehabilitation of Wedge and Grey should strive to meet best practice standards in Environmentally Sustainable Development, providing for socially acceptable and equitable uses which are economically sustainable and rely on the use, conservation and enhancement of natural resources.

Wedge and Grey will provide nature-based recreation and tourism opportunities for day visitors and short-stay holiday makers, catering for a wide range of interests and budgets. Basic amenities and interpretive facilities should be provided for large numbers of day visitors seeking access to the beaches and other natural attractions of the region. Visitor services available may include information, interpretation, marine and land-based tours, and the sale of refreshments. Overnight facilities should cater for limited numbers of visitors and include a spectrum of accommodation types such as unserviced bush camp sites, basic self-contained beach huts for families, group accommodation for budget travellers and special interest groups, and some accommodation with a higher standard of amenity and service.

Grey's undulating landscape provides scenic diversity, shelter and protection from the wind. It's proximity to the offshore islands, the Pinnacles Desert and other features of Nambung National Park offer great opportunities for nature-based tourism and outdoor and adventure activities.

Wedge's beautiful ocean and wide beaches are ideal for swimming, fishing and four-wheel driving. The site is somewhat exposed to strong winds, however, there is space and opportunity to create a community atmosphere with facilities to enhance social interaction and suit the needs of families. A feature of Wedge could be a creative display that interprets the squatter history.

Planning, development and management of Wedge and Grey should achieve high standards of environmental awareness and protection, and the natural environment should be an integral part of visitor experiences and facilities.

Sensitive landscapes will be protected through controlled access, rehabilitation and education. The provision of services and infrastructure should incorporate appropriate technologies to minimise environmental impacts and maximise the use of renewable resources.

Initial development will probably entail the Government providing rehabilitation and basic amenities for day visitors and possibly campers, and establishing commercial partnerships with suitable proponents to develop accommodation and other services. The revenue from commercial operators should cover the cost of managing and maintaining the sites' public facilities and services, and provide adequate return for developers and operators.

8.0 MANAGEMENT STRATEGIES

Management strategies have been developed to provide clear objectives and direction in the ongoing development and management of Wedge and Grey as recreation and tourism developments.







8.1 Indicative Management Zoning

The objective is to provide a development framework that:

- *protects and enhances sensitive landscapes and natural values;*
- *offers appropriate opportunities for recreation and tourism development; and*
- *is flexible to respond to further planning, assessment and innovative development proposals.*

Management zones indicate land uses and activities that are appropriate in certain areas. Zoning has been determined through a detailed site assessment and analysis process, responding to environmental factors and providing a basis for planning and development. The zoning highlights areas of particular landscape sensitivity. Zones for the development of accommodation and other visitor facilities are predominantly in areas already disturbed by existing shack use.



- Legend**
- 
Conservation, Protection and Rehabilitation
 - restricted and controlled public access-minimal vehicle access.
 - facilities restricted to walk and cycle trails where necessary.
 - rehabilitation of landform and vegetation.
 - habitat protection for native fauna.
 - 
Parkland and Rehabilitation
 - public open space for rehabilitation and compatible recreation uses.
 - landscape treatments to manage inundation in low wet areas and provide a mix of rehabilitation and landscaped areas for recreation.
 - walk and cycle trails and other suitable community recreation facilities.
 - 
Public Recreation
 - predominantly passive recreation uses.
 - public recreation and day use facilities, roads, car parking information and education centres, refreshment sales and toilets.
 - walk and cycle trails.
 - 
Build and Camp Style Accommodation Development
 - bush camping and caravan sites and facilities.
 - built accommodation and service areas.
 - roads, car parks, walk/cycle trails.
 - landscaping and rehabilitation of landform and vegetation.
 - generous vegetation buffers between buildings.
 - 
Access routes for vehicles
 - 
Possible exit for boat launching

WEDGE
Indicative Management Zoning



Note: This management zoning plan is indicative only. Precise management zones will be established subject to further detailed assessment and consideration of proposals by prospective developers.

Note: This plan is based on information interpreted from aerial photography. Source: DOLA photography, Wedge Island (Cervinas, Greenhead), Job no 940944, WA 2497, Run no. 5248 - January 1995.

Department of Conservation and Land Management
October 1998
CALM Recreation planning & design section

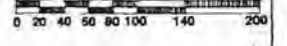


FIGURE 4

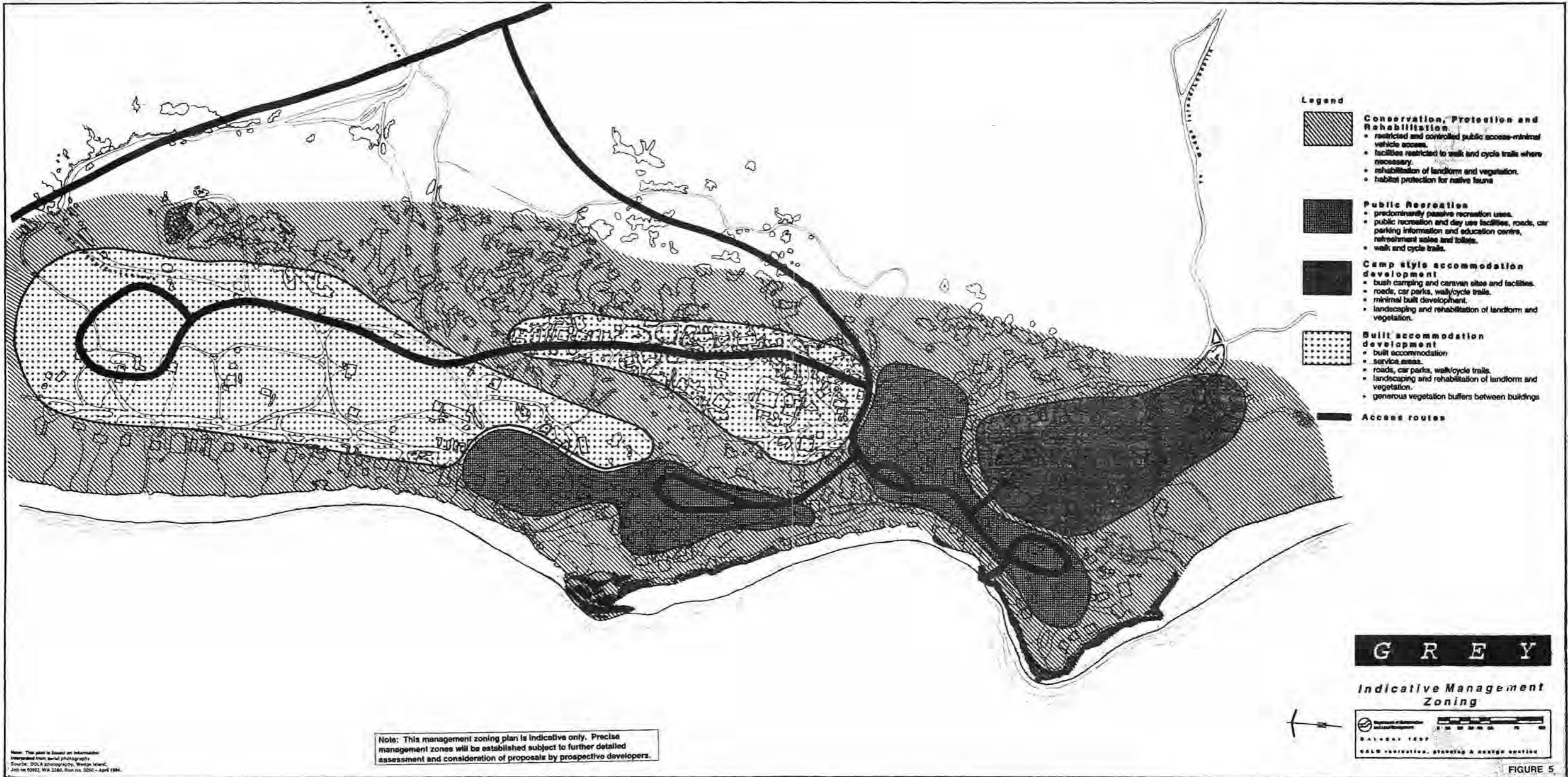


FIGURE 5

The following management zones indicate a clear framework for Masterplanning and future development.

Management Zone and Zoning Criteria	Management Emphasis
<p>Conservation, protection and rehabilitation</p> <p>Areas for the protection of foredunes and undeveloped areas of the Reserves.</p>	<ul style="list-style-type: none"> • Restricted & controlled public access-minimal vehicle access. • Facilities restricted to walk/cycle trails where necessary. • Rehabilitation of landform & vegetation. • Habitat protection for native fauna.
<p>Parkland and rehabilitation</p> <p>Low and inundated areas requiring rehabilitation and landscape management, and adjacent areas suitable for limited recreation.</p>	<ul style="list-style-type: none"> • Public open space for rehabilitation and compatible recreation uses. • Landscape treatments to manage seasonal and tidal inundation. • Provide a mix of rehabilitation and landscaped areas for recreation. • Open space, walk and cycle trails, playgrounds, sports field and other suitable community facilities.
<p>Public recreation</p> <p>Areas most appropriate for day visitors and other public uses.</p>	<ul style="list-style-type: none"> • Predominantly passive recreation uses. • Public recreation & day use facilities, roads, car parking information/education facility, refreshment sales and toilets. • Walk and cycle trails.
<p>Camp style accommodation development</p> <p>Areas suitable for developing overnight facilities.</p>	<ul style="list-style-type: none"> • Bush camping & caravan sites & facilities. • Roads, car parks, walk/cycle trails. • Minimal built development. • Landscaping and rehabilitation of landform and vegetation.
<p>Built accommodation development</p> <p>Areas suitable for developing overnight facilities.</p>	<ul style="list-style-type: none"> • Built accommodation & service areas • Roads, car parks, walk/cycle trails. • Landscaping & rehabilitation of landform & vegetation. • Generous vegetation buffers between buildings.

This zoning scheme for Wedge and Grey is site specific and identifies short-term development opportunities. Broad-scale, long-term management zoning in Nambung National Park allocates recreation zones and natural environment zones. When Wedge and Grey are incorporated into the Park, they will become part of the recreation zone which surrounds the sites.

8.2 Land Tenure

The objective is to allocate a tenure that reflects the areas' importance for conservation and facilitates balanced management for environmental protection, public recreation and nature-based tourism.

Wedge and Grey occupy reserved land at Wedge Point (Reserve No. 43283 – 213ha) and Grey (Reserve No. 43284 – 193ha) as mapped in Figure 2. These reserves are unvested, unclassified reserves gazetted on 24 February 1995 for the purpose of Parkland, Recreation and the Letting of Cottages. The reserves were gazetted as a temporary measure to enable the implementation of the State Government's Squatter Policy as outlined in Section 2.2 Squatter Policy. The reserves have been placed under the management of CALM according to Section 33(2) of the CALM Act 1984.

The Nambung National Park Management Plan (1998-2008) proposes incorporating Wedge (Reserve No. 43283) and Grey (Reserve No. 43284) into the Nambung National Park following the removal of squatter shacks in 2001. The Park is vested with the National Parks and Nature Conservation Authority (NPNCA) and managed by CALM. The NPNCA represents a diverse range of community interests. The Authority works closely with CALM to develop and implement management plans for conservation reserves vested in the Authority.

Areas of Wedge and Grey for the development of accommodation services would become lease-hold land within the Park. Other tourist services and facilities such as tours, bookings, sales and information may be provided as part of the accommodation lease or as a separate lease or licence. Leases for tourism development may be offered for up to 21 years with a 21 year option, subject to further detailed planning and an open tendering process. Freehold is not an option.

RECOMMENDATION

- 1. Implement land tenure changes to incorporate Wedge and Grey into Nambung National Park, as per the intent of the Nambung National Park Management Plan (1998-2008).**

8.3 Development Partnerships

The objective is to facilitate the provision of accommodation and other visitor services and facilities, consistent with achieving equitable use, environmental sustainability and economic viability.

The Nambung National Park Management Plan and the Central Coast Regional Strategy identify the potential for multi-faceted developments at Wedge and Grey including a range of accommodation, services and

nature-based activities. CALM's responsibilities for the sites are primarily to ensure that the areas' values are protected and to enhance visitors' experiences and understanding of the natural environment. Private sector involvement provides the means of enhancing public access to and enjoyment of Wedge and Grey, and their use as bases from which other areas of the Park can be visited and enjoyed. This is achieved through providing a range of visitor services including accommodation, tours, information and the sale of refreshments and provisions.

Commercial arrangements with private sector partners can be by way of a lease or licence approved by the NPNCA and the Minister for the Environment. A lease would be offered for accommodation and services which involve significant infrastructure development and exclusive use of land. Licences would be issued for commercial activities of a more itinerant nature which do not involve substantial infrastructure, such as tours.

This Masterplan proposes that private sector partners should undertake the development and management of accommodation at Wedge and Grey, though in the interim CALM may choose to develop some camping facilities. The offering of accommodation leases would be subject to seeking expressions of interest and assessing detailed business plans from short-listed proponents. An existing community group representing shack owners has already indicated interest in developing and managing accommodation at Wedge, with a proposal to develop 300 cottages and associated camping and day use facilities.

Leases for accommodation and other visitor services such as information and refreshment sales can be for a periods of up to 21 years, with options to renew for up to a further 21 years. Lease rental charges would seek to recoup CALM's costs for administering, managing and maintaining the sites, as well as providing sufficient funds to manage adjacent coastal areas of the Park. Lease conditions may be negotiated for the lessee to develop and maintain public amenities outside the lease area. Freehold title and multiple exclusive-use leases will not be considered, and it is CALM's preference to establish only one or two leases at each of Wedge and Grey.

The Shire of Dandaragan and several State Government agencies have worked closely with CALM to develop the current proposals for Wedge and Grey. Under Section 32 of the Town Planning and Development Act, Crown agencies such as CALM are exempt from seeking Local Government approval for public works on Crown reserves. Nonetheless CALM will ensure that the Shire continues to be briefed and given the opportunity to comment on proposals throughout the planning and development of Wedge and Grey.

RECOMMENDATIONS

1. Prepare documentation to enable expressions of interest to be sought and assessed, based on the strategies and development concepts outlined in this Masterplan, and according to the following steps:
 - Assess expressions of interest and shortlist prospective developers.
 - Shortlisted proponents to provide a detailed business plan and site development concepts.
 - Select preferred proponent and negotiate lease arrangements.
2. Continue to involve the Shire of Dandaragan and key State Government agencies in the planning and development of Wedge and Grey.

8.4 Cultural Heritage

The objectives are to:

- Protect and conserve heritage values;
- Increase visitors' awareness, appreciation and understanding of the sites cultural heritage.

Although Aboriginal sites occur in the Park and reserves surrounding Wedge and Grey, limited investigations have been conducted and no sites have been recorded within the squatter settlements. In recent decades, human activity in the settlement areas has significantly modified them, resulting in a great amount of disturbance to landform and soils.

All Aboriginal sites are protected by the provisions of the Aboriginal Heritage Act 1972 regardless of whether they are known to the Aboriginal Affairs Department (AAD) or not. CALM will liaise with AAD concerning any Aboriginal sites at Wedge and Grey and the need for any heritage assessment.

A native title claim registered in July 1999 by the Yued claimants covers an area which includes Wedge and Grey. Under native title legislation, claimants are to be notified of proposed public works and management plans. Claimants have been sent copies of this draft Masterplan and further consultation is required.

During the preparation of this draft Masterplan the Noongar Aboriginal Land Council was invited to meetings of the Masterplan Consultative Group and was sent minutes of the meetings.

The Nambung area also has a history of European visitation and use dating back to 1658 when the area featured on Dutch maps. Land uses around Wedge and Grey have included stock droving, fishing, defence force training, phosphate mining and squatting. Wedge is believed to be the largest remaining squatter

settlement in Australia and Grey is believed to be the second largest.

RECOMMENDATIONS

1. Liase with the local Aboriginal community and the Aboriginal Affairs Department concerning the location and protection of any Aboriginal sites and interpretation of Aboriginal heritage. Comply with the Native Title Act 1993 and the Aboriginal Heritage Act 1972.
2. Ensure visitor, development and management activities do not adversely impact upon significant historical and cultural sites.
3. Where appropriate, incorporate material on historical and cultural use in interpretive displays and community education programs.

8.5 Visitor Information, Interpretation and Education

The objective is to increase awareness, appreciation and understanding of the natural and cultural samvalues of Wedge and Grey and the surrounding Park and Reserves.

An effective information, interpretation and education strategic plan is essential to achieve the goals and objectives for management of Wedge and Grey and for surrounding Park and Reserves. It informs the public of attractions, facilities and opportunities available and provides an avenue for an appreciation and greater understanding of the natural environment. At the same time, it fosters appropriate behaviour so that adverse impacts on the environment are avoided.

These programs will consist of:

Information

- Providing an overview of opportunities and details of facilities, activities and regulations.

Interpretation

- Explaining and enriching visitors' appreciation of natural systems and processes and natural and cultural features.

Education

- Providing detailed materials and programs designed to facilitate learning, focussing on target groups (e.g. visitors with particular interests, school groups, tour groups).

Integrated information, interpretation and education strategic plans will be developed for Wedge and Grey. Mechanisms for facilitating these plans include signs, displays, publications, (such as brochures, notes on the surrounding Parks and Reserves) and activities.

Information will be designed to enable visitors to become oriented, be aware of the access routes and opportunities available, and advise of restrictions and the reasons for these restrictions.

Interpretive stories should encourage exploration toward enhancing visitors' experiences and understanding of the areas values. Topics to be covered include dynamic coastal processes, dunes and vegetation patterns, fauna, dieback, fire and past and present human use, such as squatters and rock lobster fishing. Important messages include minimising human impacts and care of the coast, particularly associated with activities such as 4WD'ing, fishing, camping and camp fires.

A major site for visitor interpretation and education is proposed near the Pinnacles in Nambung National Park. Other visitor information, interpretation and education facilities will be developed along the Turquoise Coast. At Wedge and Grey information facilities will offer advice on recreational opportunities in the region while also providing site-specific thematic stories on natural and cultural features and the opportunities available to visitors.

As the area is attracting increasing numbers of non-English speaking tourists, consideration should be given to providing multi-lingual information in print and through tour operators and guides. The use of bilingual signs should be discouraged to avoid intrusion on landscape values.

RECOMMENDATIONS

- 1. Develop an integrated visitor information, interpretation and education strategic plan for both Wedge and Grey, that is site specific within a regional context.**
- 2. Provide interpretive activity programs for a wide visitor audience, including self guided walks, drives and dive trails.**
- 3. Regularly monitor visitor expectations and impressions of the sites and surrounding reserves to help determine their information needs and the effectiveness of communicative media.**
- 4. Develop visitor interpretation and information facilities at Wedge and Grey that offer a site specific understanding of natural and cultural values and compliment information on the surrounding CALM Estate.**
- 5. Incorporate an interpretation of squatter history and land use.**
- 6. Liase with other agencies involved in tourism promotion to develop an integrated approach for**

providing information about Wedge and Grey.

- 7. Consider producing multi-lingual information (e.g. brochures) in close liaison with commercial operators.**

8.6 Access and Circulation

The objective is to provide and maintain a structured, safe and sustainable access system, while ensuring environmental values are not compromised.

Most of the access tracks at Wedge and Grey have evolved on an unplanned basis over many years. This has led to an uncoordinated network of tracks, both within and surrounding the settlements, often created for convenience rather than necessity. The majority of tracks have originated from uncontrolled off-road vehicle and pedestrian use. They are badly located, in poor condition and are unsuitable for recreation and conservation purposes.

The Masterplan will determine the most suitable approximate alignment for access and circulation into and around Wedge and Grey. The existing access system will be rationalised by stabilising and realigning designated tracks and closing and rehabilitating the remainder. Track closures are necessary due to factors such as unnecessary duplication, detracting from the scenic quality of the landscape, severe erosion and risk of disease spread and visitor safety.

Rationalisation of access tracks within and surrounding both Wedge and Grey will consider:

- Access planning and traffic management.
- Safety of visitors.
- Access requirements for fire management.
- Proximity to the new coast road and associated spur roads.
- Dieback control.
- Location of feature sites.
- Susceptibility to erosion.
- Protection and enhancement of visual qualities.
- Visitor needs and expectations.
- Ongoing cost of maintenance.

Full 2WD access will be provided to both sites from spur roads off the proposed coast road. Internal roads within the developments will be 2WD and possibly sealed. The design and layout of facilities should minimise the use and impacts of cars during the visitors stay.

Four wheel drive access will be permitted along the beach between Wedge and Grey as provided in the Nambung National Park Management Plan. A code of ethics and visitor safety will be promoted to ensure that 4WD vehicle activities do not adversely impact on conservation and landscape values. Access to the beach

by vehicles will be available at boat launching areas and on the north edge of the settlement area at Wedge.

Four wheel drive usage in the Defence Training Area (DTA) south of South Rocks will be subject to Department of Defence requirements. The beach areas north and south of the point will have restricted vehicle access to minimise possible conflicts, enhance the enjoyment of the beach for pedestrians and for visitor risk management. Beach access at Grey will only be permitted for the purpose of launching and retrieving boats, in designated areas.

Boating

Boating associated with recreational fishing and diving is a popular activity at Wedge and Grey. In the right weather conditions, small boats can be easily launched from the beach. Boating generally has little impact on the terrestrial environment, although boat traffic can disturb fauna at some locations or during particular times, such as seabird breeding season. Boat launching areas will be designated at both sites. Boat access and trailer parking at key recreation sites will need to be managed to avoid conflicts with other visitors.

Walking and Cycling

A number of opportunities to explore the areas around Wedge and Grey by foot and bicycle will be developed, incorporating a range of experiences, landscapes and trail lengths. Cycling and walking should be the main forms of transport within the development areas. A selection of trails will be developed using the following guidelines:

- Trails should provide a variety of opportunities in alignment (including loops and circuits), length and level of difficulty.
- Beginnings of trails should be relatively accessible to vehicles to facilitate visitor and management use, and provide information about the path.
- Trail alignments should be located to provide maximum visual diversity and access to key interpretive elements.
- Trails should be in locations that are capable of sustaining them.
- Access for people with disabilities will be provided where possible.

RECOMMENDATIONS

1. **Rationalise the access systems around Wedge and Grey and in adjacent areas.**
2. **Design and maintain access to minimise the risk of causing erosion.**
3. **Restrict or prohibit, if necessary, visitor access to specific areas for wildlife conservation, protection of flora, landform and safety.**
4. **Promote responsible 4WD vehicle use.**
5. **Plan scenic driving opportunities and trails to be representative of the areas landscape diversity.**
6. **Monitor and manage recreational boating at Wedge and Grey, and access to Wedge Island Nature Reserve, to ensure that boating does not conflict with conservation objectives and other recreation users of the areas.**
7. **Plan for the development of walk and cycle trails within and around Wedge and Grey.**
8. **Provide vehicle-free beach areas at Wedge and Grey as indicated on the Masterplan.**
9. **Continue to liaise with local authorities and Main Roads WA concerning the coast road development.**
10. **Request that Main Roads WA construct the spur roads into Wedge and Grey when the coast road is developed.**
11. **Liaise with the Department of Transport in matters relating to the management of boating activities.**
12. **Consider interpretive opportunities when designating recreational access, including marine dive trails.**

8.7 Visitor Safety

The objective is to ensure that planning and development minimises the potential for injuries and misadventure to visitors, in a manner that does not render the environment sterile or unnecessarily diminish visitor use and enjoyment.

CALM's Visitor Risk Management Policy (Policy No.53) outlines the Department's responsibilities for considering the safety and welfare of visitors. Some of the key strategies of this policy are to:

- carry out safety audits on recreation sites, facilities and visitor services;
- maintain an information system to monitor the condition of sites and facilities and the occurrence of safety incidents;
- provide information to enable visitors to act in an informed manner in providing for their own safety; and
- obtain appropriate indemnity from commercial users of CALM-managed estate.

Several safety issues exist at Wedge and Grey as a result of the unplanned nature of use. For example, uncontrolled vehicle access is probably a hazard for pedestrians, and inappropriate waste disposal may be a

hygiene concern. Existing planning related issues will largely be resolved by the post-shack development, but in the interim it may be possible to mitigate some of the existing risks to users through a coordinated and cooperative approach between CALM and the squatter associations.

Visitor safety issues to be considered in developing plans for Wedge and Grey include:

- As outlined in Section 8.6 Access and Circulation, there is potential for conflicts between pedestrians and vehicles using beaches, and vehicle access and speed on beaches will be restricted to minimise the risks to pedestrian beach-goers, particularly children.
- Driving on narrow tracks amongst dunes can be risky when vehicles travelling in the opposite direction are suddenly encountered. To alleviate this risk, visitors to the Central Coast are already advised to drive cautiously and fly warning flags on their vehicles.
- Weather and marine conditions can influence the degree of risk associated with activities such as swimming, boating and bushwalking.
- Some overhanging cliff edges at Grey are cracked and open solution pipes exist in the limestone. Interim remedial works could include closing access to overhanging areas, filling solution pipes with rubble and erecting cliff risk signs.
- Wildfire is a potential risk to visitors at Grey but there is little risk at Wedge which is largely surrounded by bare dunes.
- Exposure of old car bodies, building rubble and debris poses a potentially serious risk to visitors.

RECOMMENDATIONS

1. **Liaise with the squatter associations to consider interim measures to enhance the safety of existing users.**
2. **Conduct a safety audit to assist with the planning of recreation sites and facilities.**
3. **Rationalise access systems as recommended in Section 8.6 Access and Circulation.**
4. **Incorporate safety messages in information for visitors.**
5. **Implement recommendations in Section 8.11 - Fire Protection.**
6. **Assess and take steps to mitigate the safety risk of exposed car bodies and building debris to visitors.**

8.8 Desired Development Character

The objective is for future development to be sensitive in design and character to reflect the areas distinctive social, cultural, physical and natural attributes.

Development and built form at Wedge and Grey should respect, maintain and enhance each site's natural and cultural landscape character. Building infrastructure, access routes and facility design should be developed with the highest level of empathy for natural site features.

The location, scale and form of development should respect and respond to landscape qualities, characteristics and sensitivities. Site attributes should be worked with creatively to produce imaginative and sustainable 'site-specific' developments which integrate the natural landscape into built forms.

While this plan does not support the retention of squatter shacks it is acknowledged that some of the shacks possess practical design elements and a distinctive character that could be incorporated into future development.

Landscape design and infrastructure should compliment existing and indigenous vegetation types, rather than importing landscape elements and species that clash with the natural environment (e.g. palms).

RECOMMENDATIONS

1. **The location, scale and form of development should respect, respond to and enhance existing site topography, climate and landscape qualities.**
2. **Facilities should be designed and located to create a strong 'sense of place'.**
3. **Landscape design and infrastructure should compliment appropriate existing and indigenous vegetation types.**

8.9 Design Guidelines

The objective is to ensure development is appropriate and responsive in form, scale, character and siting to the natural conditions.

While it is not the intent of this Masterplan to provide extensive design detail, design guidelines will set the desired 'flavour' for development. The following recommendations and guidelines will apply as a 'benchmark' for all development proposals for Wedge and Grey.

RECOMMENDATIONS

1. Develop a site-specific, cohesive architectural style and character for each site. Memorable, site specific, engaging and distinctive architecture will be an important ingredient in making Wedge and Grey successful and unique tourism destinations.
2. Incorporate elements of the traditional coastal shack, in scale and materials. Any design reference to shacks should be reinterpreted to provide a more efficient structure and a more obvious sense of environmental empathy.
3. Use architectural styles consistent with the climate, character and culture of the sites, and avoid replica 'heritage' styles.
4. Building scale should:
 - present a subtle and low profile in the landscape.
 - be generally single story.
 - be small, simple in form, with lightly framed, clad construction.
 - respond sensitively to the natural environment and site conditions.
5. Siting and orientation should include:
 - orienting buildings north-south to maximise wind shelter in summer and solar exposure during winter.
 - minimising excavation, cut and fill.
 - preserving and enhancing existing landform and vegetation.
 - utilising areas of natural protection and shelter, such as swales.
 - providing pedestrian and cycle access between buildings and features.
 - containing development within clusters, to reduce infrastructure establishment costs and minimise impact on vegetation.
 - maintaining buffers of natural vegetation between buildings.
6. Develop a code for desired materials and finishes, including colour, and apply it with consistency to all built development, to ensure a harmonious and integrated aesthetic is achieved.
7. Built form should include:
 - lightweight framed structures, with corrugated (zincalume or light colour bond finish) sheeting for roofs and cladding.
 - custom or mini-orb profiled steel, timber weatherboards, limestone, and heavy canvas could also be used for cladding.
 - raised timber or sheeting floors to minimise site disturbance.
 - covered exterior spaces, such as verandahs for shade and shelter.
 - an interactive relationship between interior and exterior spaces.
 - maximising the use of north facing windows.
 - pitched rooflines to reduce the surface area exposed to the midday sun.
 - materials that reference and compliment the colours of the surrounding coastal landscape.
8. All buildings should:
 - respond and be aesthetically sympathetic to the climate, natural environment and cultural context.
 - reinforce and exemplify environmental responsiveness and sustainable design.
 - Comply with the Building Code of Australia.
 - enhance a symbiotic relationship and understanding of the surrounding environment.
 - minimise pollution of soil, air, and water.
 - increase efficiency in the use of materials, energy and other resources.
 - enhance recycling and water conservation and reuse.
 - provide full access to people with physical or sensory impairment.

8.10 Utilities and Services

The objectives are for future development to:

- *Minimise reliance on non renewable resources.*
- *Embrace renewable, low impact energy resources.*
- *Minimise, recycle and sensitively manage waste.*

The isolation of Wedge and Grey and the distance to the nearest services in Lancelin and Cervantes may make connection to mains power and water unfeasible. Furthermore, State and Local Government agencies have indicated that they are not likely to provide mains services to the sites. Development should therefore seek to be self sufficient and sustainable in meeting servicing demands.

Development should be designed to minimise reliance and dependency on non-renewable energy sources from inception. This will require innovative, cost effective and environmentally sensitive technology and solutions. The lack of conventional services at Wedge and Grey provides the opportunity for development to showcase appropriate technology and sustainable design solutions, to explain the implications of tourism use and promote visitor ethics to minimise impact on the surrounding environment.

Options to provide water, power and waste disposal may involve establishing infrastructure outside the existing Wedge and Grey Reserves and within the surrounding conservation reserves. Permission may be

given to establish service and utility infrastructure on conservation reserves, subject to proposals being assessed to determine the physical, biological, social and visual impacts. Proposals for establishing service and utility infrastructure on conservation reserves will be assessed and determined by the NPNCA, though proposals that may have a significant environmental impact can be referred to the Department of Environmental Protection for assessment.

The following services and infrastructure will be required for both sites. Possible 'appropriate technology' solutions have been suggested, however more detailed investigations will be required to determine demand and design options.

8.10.1 Water supply, water use and effluent disposal

The provision of a sustainable and quality water supply at Wedge and Grey is an important issue. Further planning will need to investigate and address the following:

- hydrography of the sites, particularly inundated areas of Wedge, and implications for development and water management.
- water capacity requirements will depend on accommodation capacity.
- rainwater will be the primary source of drinking water.
- Individual tanks should provide enough capacity to collect the maximum amount of water in the wetter, less visited months, to provide a viable resource in the low rainfall more highly visited summer months.
- large capacity rainwater collection tanks could be provided in the outer limits of the settlements, with water pumped in when required.
- desalinated water could supplement drinking water requirements.
- non-potable water should be supplied from deep outlying powered bores, for the purposes of washing, ablutions and firefighting.

Reducing water consumption, through water conservation technologies and environmentally sensitive waste-water management will be an essential aspect of sustainable tourism development of Wedge and Grey. To achieve a reduction in water consumption will require:

- educating visitors and staff as to the benefits of reduced water consumption.
- embracing a range of technical and design measures to reduced water consumption.
- communal ablution facilities in camping and some built development areas.
- landscapes and gardens with plant species that are suited to the sites climatic and rainfall conditions. This will compliment the natural landscape and minimise infrastructure cost and water consumption.

- utilising composting toilets or waterless toilets, shared septic systems, modified leach drains (such as the Ecomax system) or larger commercial waste water treatment plants (such as Biocycle or Biomax).

Sullage from showers, kitchens and laundries will require management with a centralised treatment system. Many treatment systems are available, from modified leach drains, to micro-filtration plants or use of artificial wetlands or reed beds. The appropriate system will depend on accommodation capacity, scale and site design. Treated effluent should be available for irrigation of landscaped areas and rehabilitation.

These proposals suggest that innovative approaches are required for water management at Wedge and Grey, but there is some uncertainty as to whether existing health and water management regulations can accommodate these types of proposals. Measures to ensure that health standards are met will have to be determined in consultation with Local and State agencies.

8.10.2 Energy supply and conservation

An essential aspect of ecologically sustainable development, is the provision of sustainable energy supply that minimises pollution and the consumption of resources. A combination of solar energy, wind generators and gas could be developed to provide power and energy resources to both sites. The warm climate, low vegetation cover, and extreme winds experienced at Wedge and Grey make solar and wind generated power sources ideal.

Solar power, via rooftop panels, could be utilised for the supply of hot water (a gas backup system may also be required) and some power applications. A wind turbine generator linked to a battery bank located within the development could provide electricity supply for a range of applications, from bore pumps to refrigerators and lighting. A constraint to wind power is that turbines may need to be located on outlying hills outside the existing Wedge and Grey Reserves, which may be of concern in terms of the visual and other environmental impacts on adjacent conservation reserves. Generators will be required for stand-by and peak period electricity supply. Bottled gas and efficient appliances should be used for cooking and auxiliary hot water heating.

Efficient and clean burning wood heaters may be provided for in built accommodation. Firewood is unavailable at Wedge and Grey and supply will involve transporting cut firewood in and building the cost of winter warmth into tariffs for accommodation.

The design of buildings and facilities should incorporate passive solar design principles to take advantage of natural lighting, cooling and heating. The extent to

which buildings are serviced should be minimised to essentials. Reducing the quantity and increasing the quality of lighting, heating and cooling should be applied with rigour and design innovation. Providing only essential resources will minimise waste and educate visitors about their impact on the environment.

8.10.3 Rubbish disposal, waste minimisation and recycling

The large-scale removal of shacks after 30 June 2001 will generate significant waste and the demolition operation requires careful consideration and planning. The current shack lease requires each shack owner to remove and dispose of the shack material at the expiry of the lease. It is important that the landfill disposal site be located as close as possible to facilitate ease of removal for shack owners. The desirable first option is that the disposal sites be located within the existing squatter reserves. If this is not possible, then an excision from the Defence Training Area or from disturbed sites (e.g. disused quarries) within the surrounding reserves may be required. An area near the existing car tip south of Wedge is one possible location for a long-term refuse site for that settlement. Salvaging shack materials is a possibility although not easily done due to the existing rough access track. A preferred option once the coast road is constructed, would be to encourage recycling within the settlements and the transport of waste materials to waste stations in Perth or to nearby townsite tips.

Solid waste is an inevitable product of any tourism operation. Solid waste is comprised of many components from chemicals to kitchen and food scraps, glass, paper, plastics and packaging. Development should introduce methods of reducing and recycling waste produced on site. Recycled materials should be collected or deposited at a central location on site and transported to a recycling station in a larger centre.

Other waste could be incinerated on site or removed to land-fill tips located either in adjacent towns or at appropriate sites in the surrounding conservation reserves. The standards and techniques for waste disposal need to be determined in consultation with prospective developers and relevant State and Local Government agencies.

RECOMMENDATIONS

1. **Conduct hydrographic studies to identify opportunities and constraints to the development and servicing of both sites.**
2. **Provide buildings with rainwater storage tanks and a suitable roof angle and gutter design that ensures maximum runoff and collection.**
3. **Investigate the viability of outlying deep bores for water supply.**
4. **Embrace water conservation measures, through design and education.**
5. **Ensure waste-water treatment systems do not have an adverse effect on the environment.**
6. **Investigate recycling treated sullage for irrigation.**
7. **Develop Wedge and Grey to embrace a renewable, low impact energy resource.**
8. **Apply solar power technology and passive solar design principles.**
9. **Investigate the feasibility and use of wind turbine power.**
10. **Locate solar panels and wind turbines carefully to minimise compromising building aesthetics and visual quality of the surrounding landscape.**
11. **Generator systems must be efficient and have minimal impact on noise and air quality.**
12. **Provide limited but efficient, clean burning wood heaters.**
13. **Educate visitors about their impact on the environment and the benefits of reducing resource use.**
14. **Educate visitors about the benefits of reducing solid waste.**
15. **Introduce methods of reducing and recycling waste produced on site, including composting.**
16. **Implement a recycling program.**
17. **Locate sites sensitively for landfill operations.**
18. **Comply with the relevant agency requirements for waste management.**

8.11 Fire Protection

The objectives are to:

- Protect people, property and conservation values from wildfire.
- Reduce the risk and frequency of unplanned fire starting near or within Wedge and Grey as a result of human activity.

Fire prevention and management strategies are required to protect values such as visitors, buildings and infrastructure and flora and fauna. Strategies should be developed to complement those in the Nambung National Park Management Plan (1998-2008).

Wind speed and direction is a major factor influencing the spread of wild fires in the coastal zone. However, large mobile sand dunes near both sites represent natural fire barriers. Wedge is particularly well protected by dunes. Roads around the sites and through the heath will provide adequate fire buffers for suppression and management. The new Indian Ocean Drive will also provide a buffer.

Wedge and Grey will be designated 'no planned burn' zones, meaning they will not be deliberately burnt for fire management purposes. Wildfires will either be immediately attacked to contain them to a small size, allowed to burn to surrounding low fuel buffers or back burned from existing management tracks.

Visitors should be educated on the dangers of open fires, the susceptibility and fragility of the surrounding heathland to fire and the impact of fire on ecosystems.

RECOMMENDATIONS

1. Develop and implement fire prevention and management strategies for Wedge and Grey to complement those established in the Nambung National Park Management Plan (1998-2008).
2. Maintain a network of fire management access tracks and firebreaks where required to aid pre-suppression activities.
3. Provide water supply points in strategic locations at both sites.
4. Allow wood fires at designated sites at both Wedge and Grey.
5. Provide information on surrounding values and fire risks in order to improve visitor's appreciation and support of fire management programs and fire safety and survival.
6. Liaise with site developers in implementing fire prevention and management strategies, and

require that site developers provide adequate fire fighting facilities.

8.12 Plant Diseases

The objective is to prevent introducing plant diseases into disease-free areas and to control their spread where they are already present.

Dieback disease is caused by microscopic soil-borne fungi belonging to the genus *Phytophthora*. It survives in soil and plant material and produces small motile spores that spread in water and moist soil. It infects plant roots, rotting roots and stem tissue, causing death due to water stress. Dieback is spread by the movement of infected soils during earthworks, on vehicle wheels and underbodies and by mud on shoes.

The coastal strip in which Wedge and Grey are located has very few susceptible plant species and a very low dieback hazard rating as a result of unconsolidated, calcareous sands. The possibility of establishment or survival of an infection in this hostile environment is remote. However, the proximity of the Park and Reserves and the high number of flora species of conservation significance contained in these areas, make it important to minimise the spread of any potential dieback infection.

Intensive monitoring of known infections and further surveys are required to determine the extent of *Phytophthora* dieback in the surrounding Park and Reserves, and the implications for managing visitors to Wedge and Grey.

Armillaria luteobubalina is an indigenous species of mushroom-producing pathogen which causes infection through aerial dispersed spores or root contact. It centres on coastal vegetation of the Quindalup and Spearwood dune systems and is known to occur at Wedge and Grey.

RECOMMENDATIONS

1. Implement CALM's Policy Statement No.3 on *Phytophthora* Dieback and the Moora District Dieback Protection Plan to manage disease.
2. Continue to investigate, and regularly monitor, known infections to determine their impact and extent.
3. Inform visitors about plant diseases and their management, and why it is important to prevent their introduction and spread.
4. Instigate control and eradication procedures that do not place other areas or values at risk.

5. **Close or restrict access to particular areas, roads, tracks and walks if the presence of dieback is suspected or confirmed, or if a high risk of introducing dieback is identified.**
4. **Design facilities that minimise adverse impacts on flora and vegetation.**
5. **Provide interpretation for visitors regarding the spread and control of weeds.**

8.13 Rehabilitation

The objective is to rehabilitate degraded areas to a stable condition resembling the natural environment as closely as possible.

Most areas requiring rehabilitation result from human induced disturbance of the natural environment. At Wedge and Grey, the presence of squatter shacks and associated recreational land use, development of multiple vehicle and pedestrian tracks, unregulated camping and poorly sited buildings have resulted in considerable degradation and erosion of the squatter settlements and surrounding landscape.

A variety of weed species are present throughout both settlements. Rehabilitation of Wedge and Grey will be conducted in accordance with CALM Policy Statement No.10 (Rehabilitation of Disturbed Land) and guidelines. Wherever possible the seeds and cuttings from species in the immediate location will be used and landforms will be rehabilitated to resemble as closely as possible the natural landforms in the vicinity. Methods of weed control must comply with CALM's Policy Statement No.14 (CALM's role in the management of Bushland Weeds). Rehabilitation will be ongoing and periodically monitored. Based on recent examples of shack removal in the coastal zone it is anticipated that disturbed areas will regenerate quickly (within 2-3 years) once the shacks are removed.

A rehabilitation program will be developed for Wedge and Grey based on the following priorities:

1. Exposed shack sites immediately upon removal.
2. Unused vehicle and pedestrian tracks.
3. Disturbed areas within management zones for Conservation, Protection and Rehabilitation.

RECOMMENDATIONS

1. **Rehabilitate degraded and weed infested areas in accordance with a rehabilitation program which defines priorities for both sites.**
2. **Control recreational use and management activities, particularly vehicle and pedestrian access, to minimise the degradation of landform stability and scenic values.**
3. **Facilitate the natural rehabilitation of disturbed areas by controlling the degrading processes, such as uncontrolled vehicle access.**

8.14 Introduced and Domestic Animals

The objective is to minimise the impacts of introduced animals on ecosystem values and protect visitors and the surrounding Park from the impacts of domestic animals.

Introduced animals known to occur in the vicinity of Wedge and Grey include foxes, rabbits, feral dogs and cats, feral birds, house mice and feral bees. Foxes and cats are known to prey on indigenous mammals and birds, as well as reptiles and invertebrates, and are the major threats to their long-term survival. Squatter presence at Wedge and Grey has been ongoing for approximately forty years. In this time, the loss of small mammals and other fauna as a result of feral predators is likely to have been significant.

Domestic animals can have an impact on wildlife, introduce disease and foul recreation areas. Opposing and often strongly held views exist in the community about the presence of domestic animals on public lands. Wedge and Grey will be accessible major day use facilities on a busy tourist route. For this reason dogs may be permitted in designated zones within day use areas. Particular regulations regarding the control of dogs and removal of excrement need to be more fully determined to ensure negative impacts on natural values and the visitor experience are minimised. Cats, horses, camels and other domestic animals will not be permitted at either site or in the surrounding Park.

RECOMMENDATIONS

1. **In conjunction with neighbouring landowners and development partners, develop and implement programs to prevent introduction and control existing populations of introduced animals as resources allow.**
2. **Designate zones within major day use areas where domestic dogs may be permitted and develop regulations regarding dog control and management.**
3. **Inform visitors why domestic animals are not allowed in the Park and why dogs are permitted only in designated areas.**

INDICATIVE DEVELOPMENT CONCEPT PLANS - Wedge and Grey

9.0 INTRODUCTION

Indicative site development concept plans have been prepared to guide future planning for Wedge and Grey (see Figures 6 and 7). These concepts indicate appropriate locations for a range of recreation and tourism opportunities, possible relationships between land uses and approximate locations of public facilities, major access and entry routes.

The development concept plans presented in this Masterplan are indicative only. Final site development plans will be determined subject to further assessment and planning and consideration of proposals from prospective developers.

10.0 RECREATION AND TOURISM SERVICES AND FACILITIES

A range of nature-based recreation and tourism services and facilities are proposed for Wedge and Grey. Both sites will provide for potentially large volumes of day visitors. This Masterplan also proposes that both sites will provide short-stay and holiday accommodation options to suit a variety of visitor market segments seeking nature-based experiences, including the existing users. All facilities and services should be the 'means' to encourage visitor enjoyment of the surrounding environment, not the focal attraction in their own right.

10.1 Day Use and Communal Facilities

Day use sites and facilities will be provided at Wedge and Grey to encourage, promote and facilitate public awareness and the enjoyment of unique attractions and natural values of the area. A range of day visitor motivations will be catered for. For instance some visitors may stay less than an hour, enough time for a quick overview of the place. Others may come from Perth to spend the whole day walking, fishing, swimming, relaxing or boating.

Public day use sites will be developed at Wedge and Grey located in sheltered nodes close to the coast. These sites will be the primary day use focus designed to cater for individuals and tour groups. They will provide:

- Car and long vehicle parking.
- Shade and wind shelters.
- Wheel chair access to key features and facilities where practical.
- A lookout structure for viewing of the surrounding landscape, including the dunes and offshore Islands.
- Sheltered picnic tables, gas bbq's, and water supply.
- Composting or dry sanitation toilets.

- A boat launching and retrieval zone with boat trailer parking.
- An area for rigging windsurfers.
- Interpretation and walk trails.
- Beach shower.

Day use access and facilities should be designed to cater for visitors with disabilities. Facilities at both sites will be located to have minimum visual intrusion on landscape values, provide sustainable access, maximise sheltered areas and be located in distinctly separate zones from other site uses, to minimise intrusion and possible conflict.

10.2 Entry and Service Precincts

Centrally located entry and service precincts are proposed at Wedge and Grey to offer visitors the following services:

- Site and regional information and interpretation.
- Squatter history interpretation.
- Sale of refreshment and basic provisions.
- Bookings for marine and land-based tours.
- Bicycle hire.
- Car and long vehicle parking.
- Accommodation reception.

The entry and service precincts' primary functions should be for orientation, information, education and site management. Roads and walk/cycle trails servicing other site features will connect with these facilities.

A small shop or kiosk is proposed at each site to provide of refreshments and essential items. These facilities should not become major commercial centres, and nearby towns will continue to provide services such as supermarkets and fuel outlets. Commercial signage and product advertising will be regulated.

10.3 Accommodation

Accommodation types suited to a broad spectrum of visitors are proposed, with the emphasis on providing affordable accommodation and a holiday destination for Western Australian families. As such, a mixture of camping, caravan sites, huts and group accommodation will be sought. Alternative forms of 'nature-based' accommodation, such as safari camps may also be provided offering visitors the opportunity for a more interactive experience with the surrounding environment. Accommodation development should offer an equitable range of options.

The carrying capacity for accommodation, or the number of beds to allow at each site, is difficult to

define at this stage as the social and environmental impacts could vary greatly from one development proposal to the next. Also, potential visitor markets and business structures need to be better researched to ensure that capacity reflects the requirements of target visitor markets, including day visitors.

Further planning is required to determine accommodation capacity, and the staging of development approvals could be used as a precautionary measure to ensure that the sites' optimum capacities are not exceeded.

10.4 Camping and Caravanning

Low key camping facilities will be provided to cater for a variety of visitor needs. Camping facilities will be designed to CALM standards, i.e. discreet bush camps will nestle into vegetated, sheltered landforms to create a natural setting with privacy between camp sites.

Four camp site types are proposed:

Small camping sites

- for up to 6 people
- will form the majority of camp sites at Wedge
- marketed at family use

Medium camping sites

- for between 6-15 people
- marketed at small groups and extended family groups

Group camping sites

- for between 15-30 people
- marketed at large groups, such as schools, scouts, 4WD clubs

Caravan sites

- unpowered sites and possibly some powered sites
- designed and marketed as different to traditional commercial or caravan parks
- a range of sites, from private individual to 'cluster' sites, where between two and six vans can congregate together
- no 'on site' vans or permanent sites
- Personal generators permitted in special zones, with distinct use times

Safari camp sites

- well equipped, semi permanent tent structures
- solid, raised floors
- managed in a cluster
- toilets for each tent or shared ablutions
- internal cooking facilities or fully catered options
- marketed at tourists seeking a comfortable camping experience without the trials of transporting equipment and setting up camp

Camping sites will be located off distinct one-way loop road systems and will have designated parking, stabilised tent sites, picnic tables and possibly shelters. Campfires may be allowed at designated sites at Wedge but will be prohibited at Grey due to the highly combustible nature of the surrounding heath.

10.5 Camping Facilities and Services

Central communal service facilities should be provided to each loop with the following facilities:

- Composting or dry sanitation toilets.
- Drinking and washing water supply with collection tanks.
- A bush kitchen with gas cook tops and BBQ's.
- Sheltered tables and a communal social area.
- Low level lighting.

Shelters will be constructed for protection from the weather and elements.

10.6 Built Accommodation

Built accommodation should offer visitors a choice of styles and level of comfort, with an emphasis on providing self-contained, affordable facilities designed for families, nature-based tourists and special interest groups.

The following forms of built accommodation would be appropriate:

Beach Huts

Beach huts to provide affordable and comfortable all season accommodation with the following features:

- 2-8 bed, simple structures offering a range in level of amenity and price
- internal bathrooms
- composting or dry sanitation toilets
- lighting, hot water and heating
- self-catering kitchens
- front and rear verandahs with heavy canvas blinds, like sleep-outs to increase sleeping capacity in summer

Family or Group Huts

Family or group huts to provide affordable and comfortable all season accommodation for groups with the following features:

- three sizes of group huts-12 bed, 24 bed and 30 bed, with similar levels of appointment
- internal bathrooms
- composting or dry sanitation toilets
- lighting, hot water and heating
- self-catering kitchens
- front and rear verandahs with heavy canvas blinds
- marketed at larger family groups, extended families or large groups of friends

Large Group Accommodation

Basic and affordable accommodation marketed to schools, clubs, corporate groups, community groups and extended families providing the following features:

- 30-50 beds or bunks
- enclosed sleeping quarters
- sheltered bush kitchen and eating area
- composting or dry sanitation toilets
- shared ablutions

Lodge

A lodge to provide accommodation choices across the star range with the following features:

- 30-50 beds
- choices from traditional dormitory style (6-12 beds) with shared ablutions, to 4 star double rooms, with en-suites
- composting or dry sanitation toilets
- lighting, hot water and heating
- communal cooking facilities and an affordable café
- sheltered outdoor spaces, such as internal courtyards

10.7 Entry, Access and Circulation

Scaled spur roads from the proposed coast road will provide 2WD access into Wedge and Grey.

Internal roads will be designed for low speed and either bitumen sealed or formed with stabilised and compacted limestone, with stormwater runoff directed to swale drains and vegetated areas. Spur roads and return loop systems in accommodation areas will restrict the intrusion of through traffic. New roads will utilise existing track alignments and disturbed areas wherever possible.

Roads, tracks and carparks will be designed to restrict the visual and other environmental impacts on the landscape and visitor experience. Unused existing vehicle tracks should be closed, fenced and rehabilitated.

Visitors will be encouraged to minimise vehicle use within day use and accommodation areas. A reduction of vehicle use will have significant benefits, including:

- improved safety and pedestrian comfort
- reduced intrusion from vehicles in camping and accommodation areas
- less noise and dust impact
- less road infrastructure requirements
- reduced impact on landform, flora and fauna.

Visitors will be encouraged to park and walk to accommodation units and between visitor facilities, reducing the visual and environmental impact of vehicles on the landscape and creating a more attractive, safe and private tourism experience.

10.8 Parking

All facilities will be provided with centralised, defined car parks. Exact location and bay numbers will be determined by future site development plans, however the following carparks will be required:

Day use areas

- Large capacity car and long vehicle parking inland of the main beach day use areas.

Camping and caravanning areas

- Small car park for 'visitors' or additional vehicles and boat trailer parking

Accommodation

- Small car parks with defined pedestrian collector paths off return loop entry roads connected to clustered accommodation nodes.

Professional fisher's node at Wedge

- Parking for each residence and access for operations, such as boat and jinker storage and truck parking.

Carparks should be:

- small or fragmented in capacity
- have minimal intrusion on landscape amenity
- bitumen sealed or compacted limestone
- defined with bollards, wheel-stops or perimeter fencing
- connected to pedestrian collector paths
- manage water run off sensitively to prevent adverse impacts on the environment

10.9 Pedestrian and Cycle Access

A network of walk and cycle trails will be developed connecting facilities and features at Wedge and Grey. Short bushwalks and longer trails will extend into outlying areas. Trails will be designed to have a minimum impact on the landscape and wherever possible should utilise existing tracks and disturbed areas and provide access for visitors with disabilities. Bicycles should be available for hire, through accommodation services or other enterprises.

Pedestrian beach access points will be located in centralised areas to minimise the need for access duplication all along the beach. Trails crossing the foredune should minimise intrusion and pedestrian damage to fragile dune systems. Areas susceptible to adverse impacts from pedestrians and cyclists will be fenced and managed accordingly.

Different surfacing will be used depending on the condition of the landscape the trail passes through. Options could include timber boardwalks, consolidated limestone marl, paving, sand tracks etc. Trail alignment

and design details will be determined by future site development plans.

10.9.1 Beach Vehicle and Boat Access

Beach access will be managed to minimise dune erosion and potential conflicts with pedestrians. Beach vehicle access and boat launching areas will be designated and trailer parking will be provided inland of the launching zones.

At Wedge, beach vehicle parking may be restricted to particular areas and times. The beach south of the point will be vehicle free to ensure that pedestrian visitors have safe access to attractive beach areas. Vehicle beach access will be provided on the northern edge of Wedge to provide access for 4WD vehicles travelling between Wedge and Grey.

Professional rocklobster fishing operations at Wedge require good beach vehicle access to facilitate boat launching and transport, and to allow fuel trucks to park on the beach while fuel is piped out to the rocklobster boats.

At Grey, a boat launching area has been identified with potential to construct a suspended boat ramp which allows water movement beneath. The ramp is proposed to facilitate safety and to minimise environmental impacts in the launching area. A small timber jetty may be constructed at a later stage to provide mooring and access to commercial charter boats offering a wide range of marine-based recreation activities. The boat ramp and jetty would be in conjunction with future commercial development.

Information regarding vehicle use on beaches will be incorporated in visitor information areas.

10.9.2 Dune Access

Four wheel drive access may be allowed for road registered vehicles along designated routes on the mobile dune fields immediately north of Wedge. Unregistered vehicles are prohibited.

10.9.3 Professional Rocklobster Fishing Development Node

Professional rocklobster fishers no longer reside at Grey though one fisherman operates a boat from Grey and commutes daily from Cervantes.

Five licenced rocklobster fishing boats currently operate from Wedge, with each boat on average requiring a skipper's residence and quarters for two crew. Fishers also occupy areas for maintenance and storage of boats

and jinkers, and the weighing for transport of rocklobsters.

The State Government Squatter Policy recognises that the professional fishers are a special case as they have an economic need to continue to access their moorings and fish from shack areas.

The professional fishers are to be relocated to a fishing development node and given long-term leases within the existing squatter reserves, in compliance with Building Codes, health requirements and other management guidelines.

Attachment 6 gives details of the arrangements to be entered into between CALM and the professional fishers.

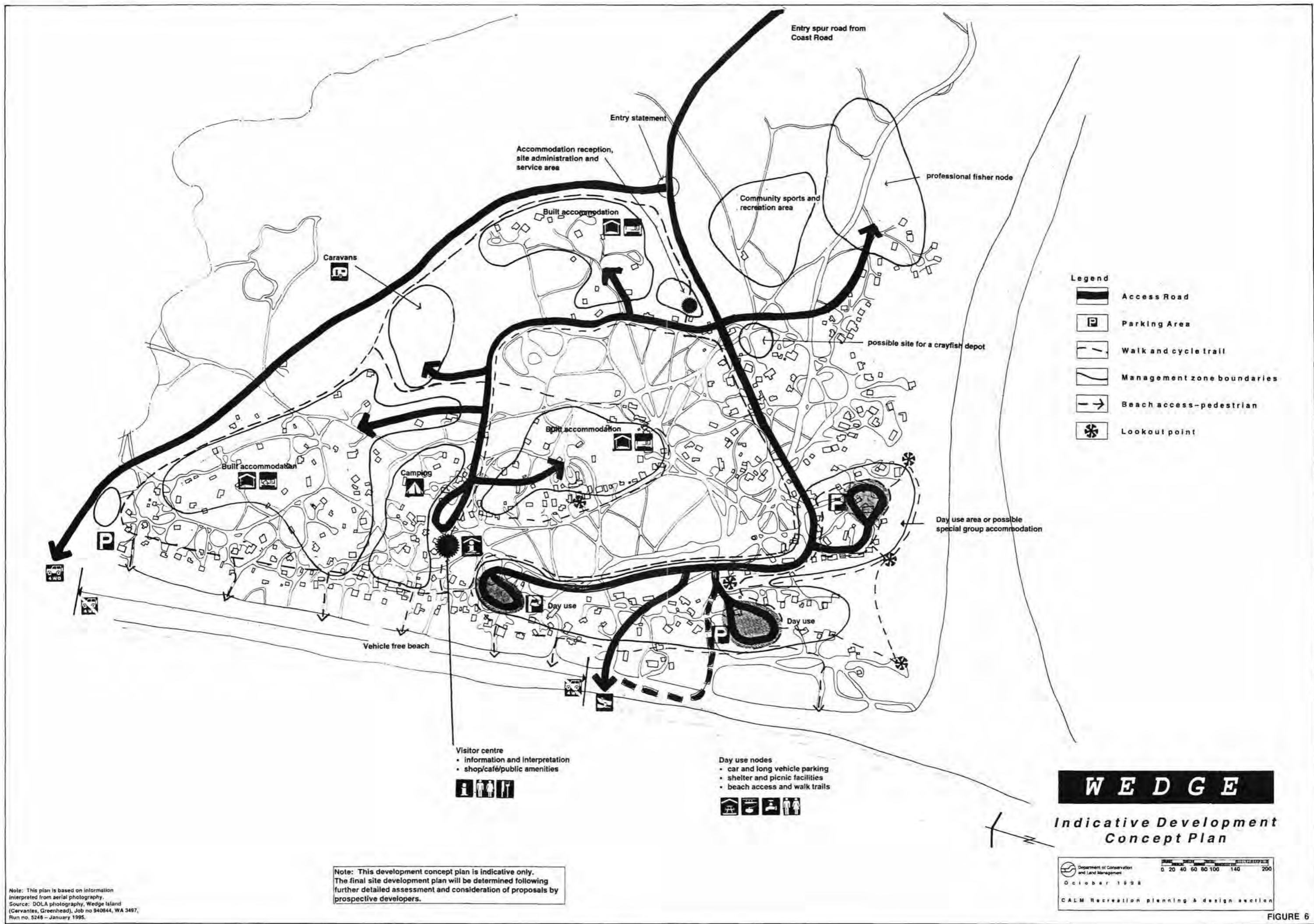
11.0 IMPLEMENTATION

The following tasks are to be implemented by CALM to facilitate planning for the future development and management of Wedge and Grey.

Task	Time Frame
Release draft Masterplan for public comment, including presentations to local Shires and community groups in nearby towns.	Oct-Nov 1999
Analyse and summarise comments and draft amendments to the Masterplan.	Dec 1999
Masterplan Consultative Group meets to consider comments.	Jan 2000
Seek approval of the final Masterplan from the NPNCA and Minister for the Environment.	March 2000
Prepare documentation and seek approval to advertise for Expressions of Interest from prospective developers to provide accommodation and other services and facilities at one or both sites.	Feb-April 2000
Invite short-listed proponents to submit detailed development proposals and business plans.	May-June 2000
Assess submissions according to predetermined criteria.	July 2000
Subject to a proponent being selected, negotiate lease arrangements and conditions.	Aug-Oct 2000
Work closely with the lessee's planners and designers in the preparation of development plans for leasehold areas.	Nov 2000-ongoing
Progressively prepare site development concepts and detailed plans, works programs, cost estimates and funding applications for public works.	July 1999-ongoing
Continue to liaise with shack community associations to discuss potential interim works for environmental protection, rehabilitation and user safety.	Ongoing
Continue to implement interim works where possible.	March 2000-June 2001
Commence large-scale shack removal and redevelopment of sites.	July 2001

The NPNCA will be kept informed on progress with implementing this Masterplan. In particular, a report will be provided on the outcomes of seeking commercial partners for development and management of the sites. To a large extent, the response from prospective developers will determine the feasibility of implementing many of the Masterplan's recommendations.

The term of this Masterplan is 10 years, though a review may be required earlier.



Note: This plan is based on information interpreted from aerial photography. Source: DOLA photography, Wedge Island (Cervantes, Greenhead), Job no 940844, WA 3487, Run no. 5248 - January 1995.

Note: This development concept plan is indicative only. The final site development plan will be determined following further detailed assessment and consideration of proposals by prospective developers.

Visitor centre
 • information and interpretation
 • shop/café/public amenities

Day use nodes
 • car and long vehicle parking
 • shelter and picnic facilities
 • beach access and walk trails

Entry spur road from Coast Road

Entry statement

Accommodation reception, site administration and service area

professional fisher node

Community sports and recreation area

Caravans

Built accommodation

possible site for a crayfish depot

Built accommodation

Built accommodation

Camping

Day use area or possible special group accommodation

Day use

Day use

Vehicle free beach

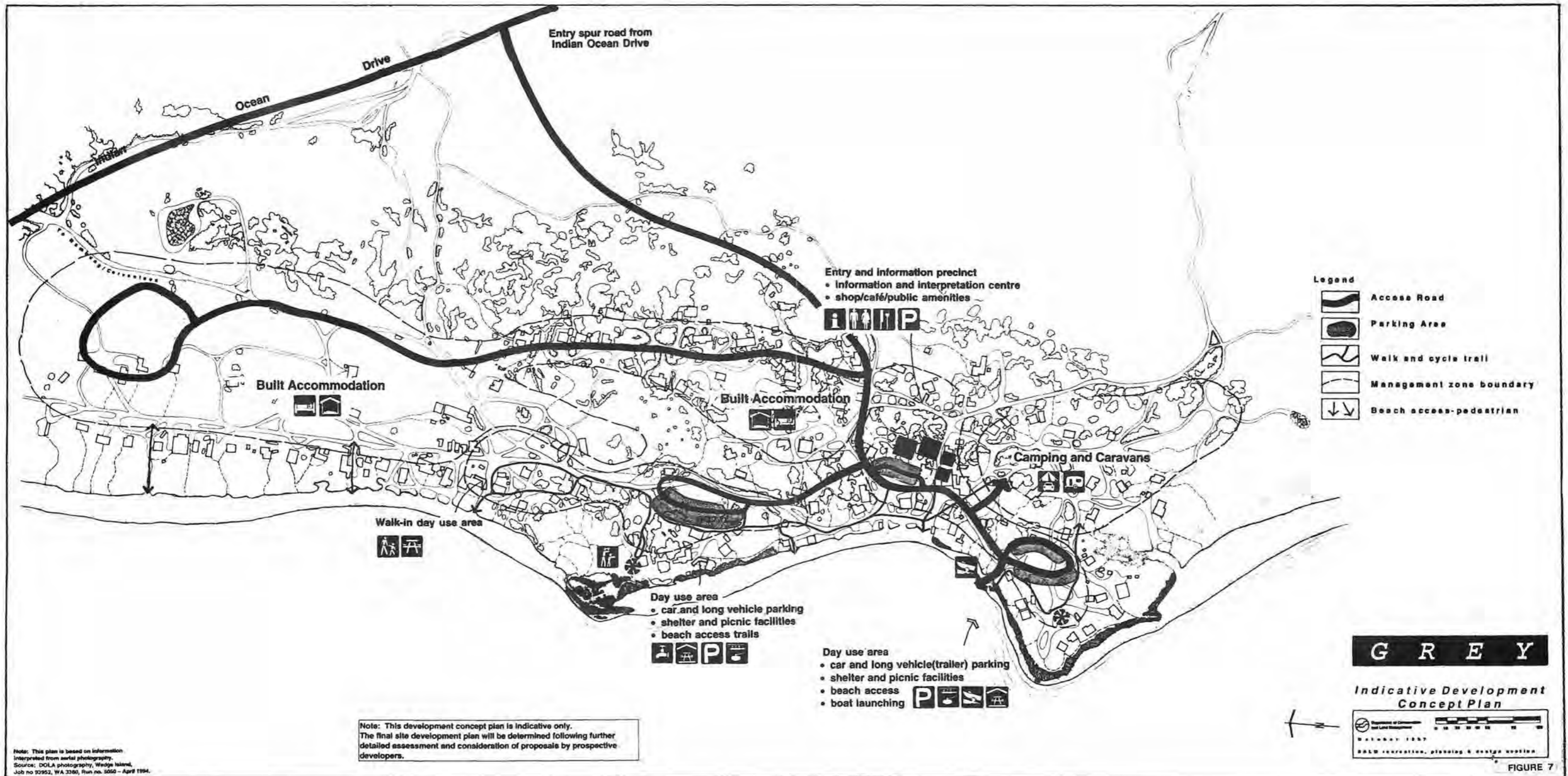


FIGURE 7

ACKNOWLEDGMENTS

CALM Planning Team

This plan was prepared by CALM's Wedge and Grey Planning Team comprising:

- David Rose - Moora District Manager
- Sue Hancock - Midwest Region Program Leader Recreation and Tourism
- Eamonn Fennessy - Landscape Architect
- Steve Meyerkort - Project Manager, CALM/Shire of Dandaragan
- Andy Darbyshire - Moora District Operations Officer
- Matt Cavana – Technical Officer

Wedge and Grey Masterplan Consultative Group

The Planning Team has been assisted by the Wedge and Grey Masterplan Consultative Group, comprising:

- Vicki Pattemore - Ministry for Planning
- John Braid - Coastwest Coastal Facilitator
- Mark South - Wheatbelt Development Commission
- Barry Dimond / John Willis - Regional Manager, Department of Land Administration (DOLA)
- Denis Millan / Richard Austin - Department of Land Administration (DOLA)
- Bob Sutton - Fisheries WA
- Barry Golding - CEO Shire of Dandaragan
- Chris Tate - Western Australian Tourism Commission
- Peter Radigan - Noongar Aboriginal Land Council
- Graeme Rundle - National Parks and Nature Conservation Authority
- Murray Knowles - Wedge Island Protection Association (WIPA)
- David Caddy - Grey Community and Conservation Association (GCCA)
- Colin Dawe - Wedge Professional Rocklobster Fishing Representative.

Many other people have been involved in the preparation of this plan including:

Robin Adair - WIPA; Ray Hill - GCCA; Amanda Goodland - Wedge Professional Rocklobster Fisher; Jim Sharp - Director Parks, Recreation, Planning and Tourism, CALM; David Hampton - Senior Policy Adviser, CALM; Richard Hammond - CALM; Hamish Crawford - Minister for the Environment's Office; Dr Ian Elliot - UWA; David Holland - Chairman Peel Region Tourism Association Inc.

Contributions from the squatters of Wedge and Grey are acknowledged.

Coastwest/Coastcare

The preparation of this Masterplan has been funded by a grant under the Federal and State Governments' Coastwest/Coastcare program, coordinated by the Coastal Management Section of the Ministry for Planning Western Australia.

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ATTACHMENTS

- Attachment 1. State Government Squatter Policy.
- Attachment 2. Central Coast Region - Nature-based Attractions.
- Attachment 3. Proposed Access and Recreation Sites - Nambung National Park Management Plan.
- Attachment 4. Public Notice - Community Consultation.
- Attachment 5. Summary of anecdotal comments taken during community consultation.
- Attachment 6. Arrangements for professional fishermen occupying shacks at Wedge and Grey.
- Attachment 7. Site Analysis Plans:
 - Wedge - Slope and Landform
 - Wedge - Vegetation
 - Wedge - Existing Land Use
 - Wedge - Features
 - Grey - Slope and Landform
 - Grey - Vegetation
 - Grey - Existing Land Use
 - Grey - Features

Attachment 1.
STATE GOVERNMENT SQUATTER POLICY

GOVERNMENT LAND POLICY MANUAL

General Area 12. LAW ENFORCEMENT & TENURE COMPLIANCE

Sub Heading 12.5 Removal of Unauthorised Structures

LAA Section No. 270 – 273 incl

File Number 1109/1963, 2003/1965

Policy Number 12.5.01.1

Status 4. Approved

Policy Title Illegal Occupation of Coastal Crown Land (Squatters)

LAA Priority 1. Essential

Policy Date 01/01/99

OBJECTIVE

To control the establishment of any new unlawful dwellings (squatter shacks) on coastal Crown land and facilitate the removal of existing dwellings (shacks) over a six-year period.

POLICY STATEMENT

i) PRINCIPLE

DOLA has participated in the formulation of an appropriate Statewide policy on squatters and is required to proceed in accordance with the Government's policy on squatters as adopted by Cabinet in 1989 and detailed more fully below.

The policy relates to unmanaged (unvested) Crown land and unmanaged (unvested) reserves. Bodies already holding a Management Order (vesting) of affected reserved land (e.g. local governments) may exercise delegated powers under Section 273 of the LAA, 1997 (Section 164B of the Land Act, 1933) to immediately remove squatters.

A Management Body (vestee) may nevertheless opt to proceed in accordance with the policy, and where that body has indicated an unwillingness to evict squatters, may be required to proceed along these policy lines.

Crown land may be placed under the care and control of (vested in) a management body to facilitate implementation of the policy guidelines through local management.

ii) POLICY

1. No new illegal shacks will be permitted on reserved or vacant Crown land along the State's coastline from the date of Cabinet's approval of this policy.
- 2.1 Existing owners of shacks on Crown land or unvested reserves will be permitted to remain for a period of 6 years provided that:
 - i) there are no extraneous circumstances in particular areas which require shacks to be removed sooner;

- ii) the shacks are not situated on reserved land that has been subject to a management plan under the CALM Act.

The 6 year period is to allow for the reasonable usage of existing investment while deterring extensive improvements or redevelopment. The 6 years will be calculated from the commencement date of arrangements for particular areas.

2.2 This 6 year tenancy is subject to:

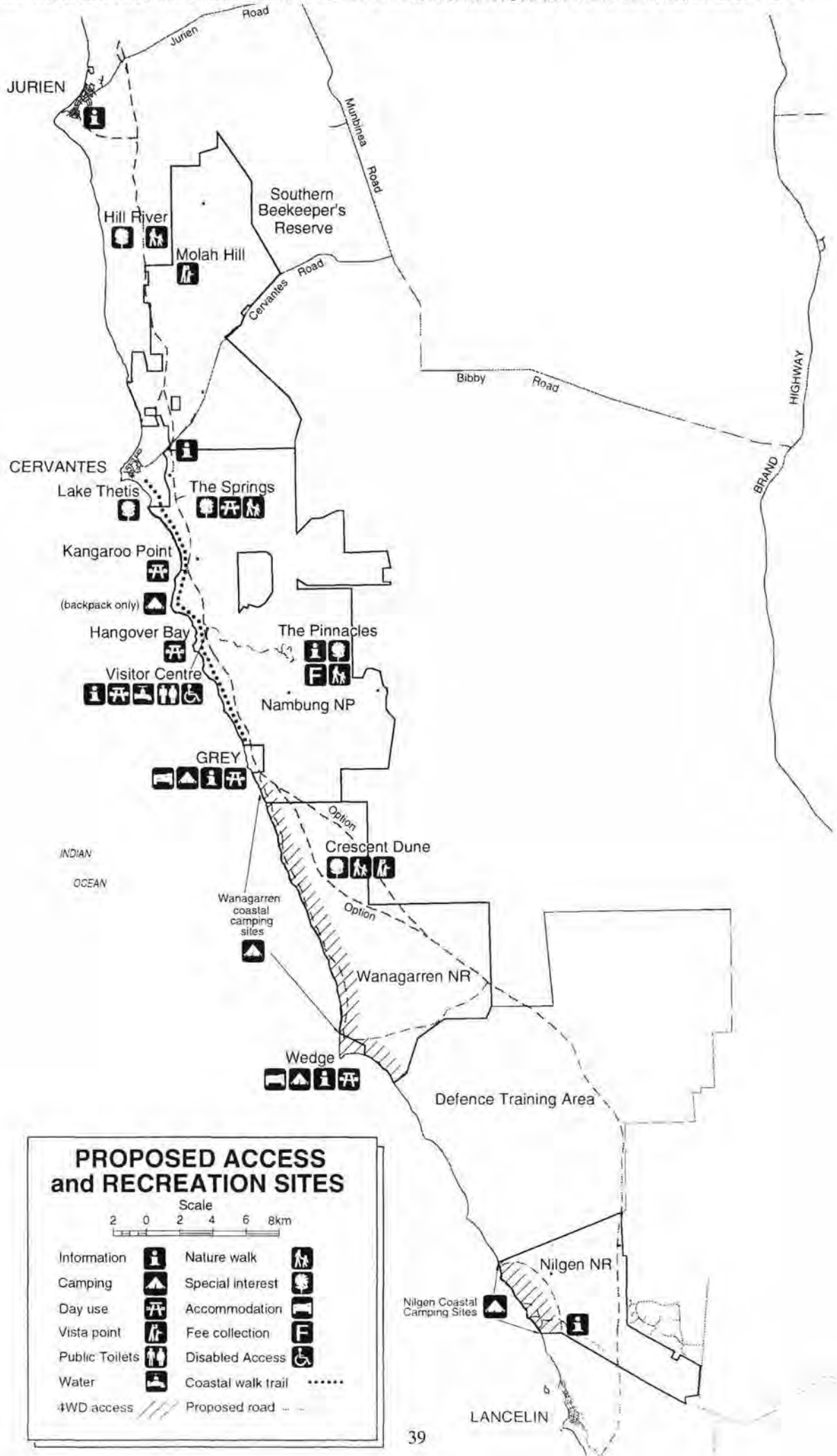
- i) no services being provided by State or Local Government;
- ii) the sites being left in a clean and tidy condition upon completion of occupancy and the cost of removal of the shack and rehabilitation of the site is being borne by the shack owner;
- iii) no further clearing or making of access roads being undertaken;
- iv) no transfer of shacks or occupancy rights being permitted;
- v) no improvements or extensions apart from those sanctioned by the local authority for safety or health reasons being undertaken;
- vi) State, Federal and Local Governments being indemnified against damage to property or persons resultant from the poor condition of the shacks;
- vii) the payment of an annual fee to the Local Authority or other body managing the reserve or Crown land, which should cover progressive rehabilitation and management of shack areas;
- viii) the land not being required for another purpose at an earlier time, in which case the owner(s) would be issued at the conclusion of the six-year period or at an earlier time.

3. The Government recognises that professional fishermen merit an exemption from the policy and will be permitted to continue to operate from shack areas. However, formalised tenure to a fisherman's shack will only be granted in the form of a lease in conjunction with fishing licences under the control of Fisheries Western Australia and subject to conditions laid down by the Department. Leasing of sites for professional fishermen's shacks to generally be granted and administered by local government with variations to be subject to negotiation between local government and the Department of Land Administration and/or consideration by the West Coast Working Group as part of the practical implementation.
4. Fishermen's shacks should be of a reasonable standard as determined by the particular local authority. In using these coastal areas, fishermen must have regard for the coastal environment. This should be monitored and regulated by the local authority.
5. This general policy will be further developed through the progressive examination of individual areas of the State by working groups generally comprised of local government and State government representatives. More detailed studies of particular areas will be undertaken in order to consider the tenure of particular coastal lands, the uses to which these areas will be put once squatters are removed and management programs considered appropriate.

(PPRMLP12)

Attachment 3.

PROPOSED ACCESS AND RECREATION SITES – NAMBUNG NATIONAL PARK MANAGEMENT PLAN



The Masterplan Consultative Group for Wedge and Grey Needs Your Input!

Masterplans are currently being prepared to determine the most appropriate types of future land use for Wedge and Grey. Community consultation is an important part of the planning and design process. Planning Team members will be available on site to discuss future planning options for Wedge and Grey.

This is an opportunity to discuss the planning process and contribute your ideas during the development of Masterplans for Wedge and Grey!

Consultation will be held at:

Wedge

Date: 8th & 9th January 1999
Time: 9 am - till sundown
Location: Follow the signs on site...

Grey

Date: 10th & 11th January 1999
Time: 9 am - till sundown
Location: Follow the signs on site...

Enquiries:

Eamonn Fennessy - CALM, Como - Phone (08) 9334 0544
Andy Darbyshire - CALM, Lancelin - Phone (08) 9655 2092



Wedge/Grey Masterplan Consultative Group

The Wedge/Grey Masterplan Consultative Group (MCG) has been formed to assist CALM's planning team in preparing masterplans that will determine the most appropriate types of future land use for Wedge and Grey. MCG members represent community groups, Local and State Government agencies that have significant interests in the future of these areas.

The Masterplan Consultative Group (MCG) Members:

Members:

Murray Knowles-Wedge Island Protection Association
David Caddy-Grey Community and Conservation Association
Colin Dawe-Wedge Rocklobster Fishing Representative
Mark South-Wheatbelt Development Commission
John Braid-Coastal Facilitator
Barry Dimond-Regional Manager, DOLA
Vicki Pattemore-Ministry for Planning
Barry Golding-CEO, Shire of Dandaragan
Peter Radigan-Noongar Aboriginal Land Council
Chris Tate-Heartlands Tourism Development
Bob Sutton-Fisheries WA
Graeme Rundle-National Parks and Nature Conservation Authority

Planning Team:

David Rose (Chairperson)-District Manager, CALM Moora
Steve Meyerkort-Project Manager, CALM/Shire of Dandaragan
Sue Hancock-Recreation and Tourism Program leader, CALM
Eamonn Fennessy-Landscape Architect, CALM
Andrew Darbyshire-Operations Officer, CALM

For more information on the masterplanning process contact:

Eamonn Fennessy - CALM, Como - Phone (08) 9334 0544
Andy Darbyshire - CALM, Lancelin - Phone (08) 9655 2092



Attachment 5.

SUMMARY OF ANECDOTAL COMMENTS TAKEN DURING COMMUNITY CONSULTATION

Wedge and Grey Masterplan

Community Consultation Process and Display-January 8th –11th 1999

Summary of Anecdotal Comments and Issues

WEDGE

A large and steady number of concerned shack owners visited the display, in the centrally located 'Pie Shop' to discuss the plans and express their views on both Friday and Saturday. Numbers were in the hundreds, spread over two days, continuing well into the early evening. Many stayed for an hour or more, some returning with families and neighbours for a second look. Participation was constructive and highly useful. Most were concerned and upset about the issue of shack retention, however no ill feeling was expressed towards the CALM staff present and the opportunity to express opinions and contribute to the planning process was appreciated.

The consultation process also provided a venue for WIPA to discuss their opinion with the community, for people to meet and swap stories and seemed to galvanise the shack community. It should be noted that shack owners very generously supplied accommodation, meals and great hospitality.

Anecdotal Comments and Issues

- Camping won't work or be popular-too windy.
- Camping will only work in sheltered areas/ small nodes.
- A mix of accommodation levels and costs would be preferred-perhaps like Rottnest.
- There is nothing significant enough in the area (geology, coastal geomorphology, vegetation etc) to warrant a field study centre or educational precinct. Even for general recreation purposes, there are better areas closer to Perth that would be more attractive to school groups.
- The area that is proposed for a wetland/bird hide/sanctuary is inappropriate as very little wildlife is attracted to this area particularly birds. The water in this area is saline and rises with the tide, as well as being fed by high rainfall in winter. The exotic weed species juncus is a big problem in this area-not appropriate for habitat.
- Setbacks from the coast and from the central wet area will be important-a lot more of the area gets wet than the plans suggest.
- Many felt that the area had stabilised after 30years due to the presence of the shacks and that the place would erode once the shacks were removed.
- The area is claimed to have been a sand dune prior to shacks being built-shacks have greatly contributed to dune stabilisation.
- Dune systems and coastline are very dynamic and change constantly, which will limit development behind the foredune.
- Canal developments were suggested, dredging and flooding the wet area and creating a marina.
- Wind and airborne sand is a huge factor in people's comfort at Wedge. It limits the amount of time you can be outside or camping. Can be positively unpleasant at times and needs to be considered with regard to the feasibility of camping developments and more up market development.
- Many people expressed a concern that they were willing to upgrade the shacks and incorporate an area for public access/camping/chalet, if it meant they could stay (see WIPA plans).
- Why can't the area simply be subdivided?
- Rehabilitation and improved site access will be very expensive, could easily consume massive amounts of money. Is this really viable?
- What's going on with native title claims and how will this affect the policy?
- Mineral sands/mining claims on the dunes to the northeast? How will this affect future development and shack retention?
- Where does the lease money go and how is it spent? Many are confused about this issue. Some are under the misunderstanding that they are paying rates and don't get anything for it.
- The government makes money for nothing out of lease payment. Why not just keep this system going? Everyone benefits!
- Many indicated that they would be very willing to pay significantly more in lease fees to stay longer. 21 or 99 year leases were mentioned.
- Many felt there was a total inequity in the way the policy was being implemented around the state. Windy Harbour and Dampier Archipelago were examples mentioned.

- Tourism could be incorporated into the area with shacks retained as a major focus/attraction. This would benefit everyone, particularly those on the fly through bus tours who get bugger all in regard to services.
- 4WD safari bus tours were criticised heavily for a number of reasons:
 - drivers travel too fast (especially through the settlements) and cut new tracks to save their suspension.
 - the experience was horrible for the tourist and a total rip off (one shack owner had taken a tour out of curiosity).
 - rumours of tour bus drivers charging each passenger \$100 to get off the bus and onto the beach.
 - Drivers have little respect for safety and the environment and many felt CALM let them behave recklessly.
- Shack lifestyle is a unique, valuable and rare link with Australia's history and should be celebrated not obliterated.
- Shacks could be upgraded to meet building codes. Many suggested shackies would be prepared to rally together and do this work and purchase building materials in bulk.
- Some shacks are totally substandard in terms of electrical wiring, fire safety and many felt they should be removed if owners were unwilling to upgrade them.
- Would they have to meet building codes if leased from the government on crown land/CALM estate?
- The new coast road will change the accessibility and remoteness of Wedge dramatically.
- The government have sold Wedge to Asian investors for resort development.
- Squatters are very willing to compromise-there was almost unanimous support for the WIPA proposal and an integration of shack retention and a range of public accommodation.
- Access tracks to and from the main road will need to come from the north due to the sand dunes?
- Why should lease fees pay for future development?
- Soil types and water/geology need to be addressed to a greater degree, a better understanding of the natural systems would be beneficial.
- The plans should be sent to all shack owners with a more detailed survey.
- ORV vehicle use is not safe-kids, cars and conflicts-people are very willing to change this and realise the need for better management of the area.
- Wedge people look after each other. They make sure anti-social or dangerous behaviour is controlled.
- Why are the professional fishermen allowed to stay and we can't?
- If I start a business here, and derive an income from the area can I be exempted?
- What will happen to the 'Pie Shop', fire tender and other important community functions?
- You can't do this sort of development without proper services. Who's gonna pay for the first aid post, ambulance, fire control?
- This is all for the Japanese! (saw the proposal as a farcical veil hiding an exclusive overseas funded development).
- If this development is for the public, well we are the public aren't we?
- Squatters don't stop anyone from camping here and spend a lot of time cleaning up after campers who have little respect for the environment.
- Blow in trail bike riders were seen as a real problem to safety and the environment.
- We respect this place; the average new comer won't give a toss!
- The fishermen do more damage to the environment than us.
- This is 40 years of cultural heritage - Western Australian heritage - how can you destroy it?
- Having a small cluster of shacks or an interpretive centre won't show the lifestyle-it's just a token gesture!
- Beach access needs to be reconsidered - one way on, one way off system, with vehicle free zones.
- The current beach access cutting is dangerous and should be closed. It was suggested that the old access point (rehabilitated, near the old BP depot) should be re-opened.
- CALM will have a huge liability with buried car bodies under the sand. Tragic accidents waiting to happen. Just need a big winter storm. Coastline is very dynamic. Many told stories of old cray boats re-appearing etc.
- The contractor only cut the roofs of many of those car bodies. There's still lots of stuff out there waiting to be exposed and to kill someone.
- Potable water supply will be a problem.
- Wedge has huge potential for tourism and as a 'Way Station', service centre and attraction for the tourism market and tour bus operators
- The shacks are living evidence of the pioneering nature of squatters; cultural heritage should be retained in some way. Western Australian's are excellent at destroying their cultural heritage, perhaps this is a good chance to actually save some and celebrate living history.
- Retaining a token shack settlement would be only end up like Cossack. A totally boring way of viewing history.
- The lease stipulates that all foreign vegetation is to be removed. The shackies have planted lots of native and indigenous trees and unfortunately those will be removed. Why should we leave shade for CALM to benefit from?
- We should get Cheryl Edwardes and Syd Shea up here overnight!

- Many felt that this was the first opportunity for squatters to discuss the situation in an open forum and that all other communication had been arrogant and bureaucratic.
- The community realise that the settlement cannot remain as untamed as it currently does. Unlicensed vehicle use, building guidelines, noise, effluent disposal, beach all requires more environmental friendly management.
- Much criticism was given to CALM's Recreation and Tourism Strategy, 'People in CALM Places', with particular regard to Sense of Place, Heritage Values and Partnerships. They felt the decision to remove the shacks and not to support the WIPA response was a contradiction to the strategy.

GREY

Visitor numbers were less at Grey. Many shackies had returned home that weekend, consequently consultation was reduced to Sunday and early Monday morning. Each shack was visited and the community notified of the location of the display. A number of concerned shack owners visited the display to discuss the plans and express their views. Many stayed for an hour or more and due to the smaller numbers it worked well as a group forum. Participation was constructive and highly useful. Most were concerned and upset about the issue of shack retention, however, no ill feeling was expressed towards the CALM staff present and the opportunity to express opinions and contribute to the planning process was appreciated. Consultation continued over drinks well into the evening.

Shack owners at Grey also very generously supplied accommodation, meals and great hospitality.

Anecdotal Comments and Issues:

- This is all a token gesture.
- We'd be very happy to come to a manageable compromise as per the consultant prepared management plan (Grey Association).
- Why can't the government see sense and be fair. DOLA and the Shire are totally unwilling to even listen.
- We won't be back once the shacks have gone.
- The areas for camping are too exposed. Why would any one want to camp for more than a night on this coast, even in summer.
- The place will close down in winter, and will not be viable
- Alternative energy and sewage management will be required.
- We have planted lots of trees here; they didn't just grow!
- The shacks aid the process of dune stabilisation.
- Boat launching is very difficult at Grey. A proper boat ramp will need to be constructed.
- Water supply is really difficult here.
- What private developer would seriously invest in this place?
- Where is the financial feasibility study for all this?
- Where's our lease money going?
- There's a heap of coastline around here, why can't all of this go somewhere else? (many were under the impression that the shacks were being removed to make way for CALM to redevelop the site and make money).
- The cray fishermen and their deckies caused most of the environmental problems here years ago and the shackies and Grey Association have cleaned it all up! (car bodies etc).
- People love this place and look after it, care for it. We'd do whatever it'd take to stay.
- The main cliff area is very dangerous and unstable. Will this limit development?
- That beach has no rubbish on it. People look after this place
- The shacks are cultural heritage. Removing them goes against the Nambung National Park Management Plan's charter to protect Aboriginal and non-Aboriginal sites of cultural heritage significance.
- The wind is totally oppressive, which most felt would limit the scope for viable development of the site for an 'eco-resort' or even for chalets. People can already do this in more comfort with more exciting recreational attractions in Busselton, Dunsborough, Margaret River etc. Why would you come here?
- Please allow this community to exist in some form. Could special areas be leased by ex-shackies, with a preference given or some sort of ballot system?
- This policy destroys and negates the fact that there is a community here! What happened to celebrating cultural diversity and uniqueness? Surely a positive and constructive compromise benefiting all parties, including the general public could be achieved and would be in the government's best interests?

General issues encountered at both Wedge and Grey

- Many were unaware that the policy was a whole of government decision and had a poor understanding of the history or implications of the policy.
- Many viewed the future development and masterplanning process as the reason why the shacks had to go, that CALM were replacing the shacks with something else, primarily as a money making venture.
- Camping development will require very sheltered conditions.
- Most shackies indicated that they would not return to Wedge and Grey once the lease period expired.
- Lots of useful local knowledge regarding the landscape characteristics and changes that had occurred over 40 years in both areas was shared.
- Both communities were concerned at the lack of previous consultation regarding the policy and issues regarding it's implementation.
- Few actually understood that they were paying a lease for the privilege to simply be there and that paying a lease didn't furnish them with any rights or services.
- There was concern and misunderstanding as to where lease funds went and on what they were spent.
- Very few seemed to understand (or alluded to the fact) that squatting on Crown land was fundamentally illegal and didn't really grasp the notion of exclusivity.

Attachment 6.

ARRANGEMENTS FOR PROFESSIONAL FISHERS OCCUPYING SHACKS AT WEDGE AND GREY

BACKGROUND

The Department of Conservation and Land Management (CALM) in participation with the Shire of Dandaragan and the Department of Land Administration, is implementing the State Government Squatter Policy on some 670 squatter shacks along the coastline of the Shire.

The shacks administered by CALM are concentrated in the areas of Wedge and Grey, where they are managed by CALM under delegated authority from the Minister for Lands pursuant to a CALM Act, Section 33(2) arrangement.

The government policy requires the removal of the shacks by the end of December 2001. After which, the land is to be rehabilitated and returned as far as possible to its natural condition. Proposals for recreational/tourism use of the land and longer term tenure for professional fishers are also being considered.

There are some 300 shacks currently leased by CALM at Wedge and another 120 shacks leased at Grey. About 20 shacks are occupied by professional fishers and their crews at Wedge. There are currently seven licensed fishing boats operating from Wedge (5 for the full season and 2 intermittently). One boat operates from Grey with the crew residing in Cervantes.

The squatter policy approved by Cabinet on 3 July 1989 recognised that special arrangements were required for professional fishers. Part 3.3 of the Cabinet decision states:

"The government recognises that professional fishers merit an exemption from the policy and will be permitted to operate from shack areas. However, formalised tenure to a fisher's shack, in the form of a lease, will only be granted in conjunction with fishing licenses under the control of the Department of Fisheries and subject to conditions laid down by the Department. Professional fishers' shacks should be of a reasonable standard as determined by the particular local authority. In using these coastal areas, fishers must have regard for the coastal environment. This should be monitored and regulated by the local authority."

PURPOSE

The purpose of this document is to give effect to the above Cabinet decision.

The options proposed for each professional fishers currently utilising shacks are to:

1. Relocate to a development node (near a traditional fishing ground) when formally created as a reserve; or
2. Upgrade the existing shack to comply with established building standards (determined by the local authority) if already appropriately located in a proposed development node; or
3. Relocate to existing townsites.

The aim of this document is to establish the criteria by which decisions will be made as to:

- Who qualifies as a professional fisher,
- Under what circumstances a development node will be created, and a lease within that development node offered to a particular professional fisher,
- Under what circumstances a development node will not be considered, and instead a professional fisher will be asked to relocate to an existing townsite, and
- The consequences for those professional fishers shacks that do not comply with the policy.

DEFINED AREAS

For the purpose of this document:

“Wedge” means Reserve No. 43283 Melbourne Location 4153.

“Grey” means Reserve No. 43284 Melbourne Location 4152.

DEFINITION OF A PROFESSIONAL FISHER

For the purposes of this document a professional fisher will be defined as any person having an Unrestricted West Australian Fishing License and/or a Managed Fishery License in accordance with the Fish Resources Management Act 1994 Regulations.

CIRCUMSTANCES WHEN ESTABLISHMENT OF A DEVELOPMENT NODE TO ACCOMMODATE PROFESSIONAL FISHERS’ DWELLINGS WILL BE CONSIDERED.

- When there is no nearby townsite;
- When a suitable site for a development node can be identified; and
- When there are sufficient numbers of professional fishers to justify the establishment of a development node; and/or
- When traditional fishing patterns and restrictive licences apply (where Fisheries WA dictates the area where a fisher can operate).

SELECTION OF SITES FOR A DEVELOPMENT NODE

A suitable site for a development node will be one that:

- Does not have specific environmental or conservation constraints;
- Is adjacent to suitable mooring sites; and
- Does not affect aboriginal heritage sites.

Selection of sites will take into account the development nodes identified in the Western Australian Planning Commission’s “Central Coast Regional Planning Strategy”, the Department of Conservation and Land Management’s Nambung National Park Management Plan and Local Authority guidelines.

The consultative process for site selection and the offering of leases will involve:

- the relevant land management authority (CALM)
- the affected professional fishers
- Department of Land Administration (DOLA)
- National Parks and Nature Conservation Authority (NPNCA)
- Ministry for Planning
- Fisheries WA
- Department of Environmental Protection
- Department of Transport
- Other relevant groups or government agencies.

TENURE OF LEASES WITHIN PROPOSED DEVELOPMENT NODES FOR PROFESSIONAL FISHERS

The Department of CALM will be the management body for the development nodes. CALM will have the power to lease sites to professional fishers within the development node for terms of up to (21) years in accordance with arrangements made in consultation with DOLA. The lease will be renewable at the discretion of the Executive Director of CALM/NPNCA.

If the development node at some future time is no longer required for use by professional fishers, it will revert to a use consistent with the general Reserve purpose.

TRANSITIONAL TENURE FOR PROFESSIONAL FISHERS' SHACKS

Licensed professional fishers who held a lease for their shack from CALM as at 1 July 1995, will be offered a new lease for the area occupied by their current shack for a period of up to three years beyond their existing lease arrangement which expires 30 June 2001. This will allow time (if necessary) to relocate to a fishing development node or to a nearby townsite.

To qualify for a transitional lease, a professional fisher must:

- Be the registered holder of a current fishing boat license granted under the Fish Resources Management Act Regulations authorising a person to use a boat for commercial fishing.
- Be a licensed fisher for the fishing zone in which the shack is located.
- Have an existing mooring that is in use and in close vicinity to the existing leased shack.

GENERAL TERMS AND CONDITIONS OF TRANSITIONAL LEASES AND LONG TERM LEASES

The terms and conditions of leases within the professional fishers development nodes will include (but is not limited by) the following:

- a. A maximum of one site will be offered to each professional fisher. Although, it may be the case that several buildings or crew quarters will be located within this site.
- b. Only the lessee, his/her employees engaged in professional fishing activities and the lessee's immediate family may reside on the land.
- c. Each professional fisher's lease will have a common expiry date unless terminated earlier.
- d. The annual rental will be determined by the Valuer General.
- e. The lease will be subject to the appropriate rates and taxes.
- f. Transfer of leases will only be permitted when in conjunction with the transfer/sale of the lessee's fishing license and other assets associated with that license.
- g. Conversion of leases to freehold title will not be considered at any time during the term of the lease or on its expiration or earlier determination.
- h. The lessee shall not without the prior consent in writing of the lessor (Executive Director of CALM/NPNCA) assign, transfer, mortgage, sublet or part with possession of the land/lease or any part thereof.
- i. A lease may be forfeited if the lessee fails to pay the rent or fails to comply with the lease conditions and local authority requirements.
- j. The lessee is responsible for all damage that may be caused by or due to the escape of any oil or other liquid from the works of the lease.

- k. Compensation will not be payable by the lessor (Executive Director of CALM/NPNCA), State Government or the Local Authority for damage caused by flooding, ocean surges, wind blows, sand accumulation, fire or any other natural disaster.
- l. Lessees shall be mindful of the environment.
- m. Neither the lessor, State Government nor the local authority shall be responsible for provision of services to the land/leased area.
- n. The lessor may vary the rent in accordance with CPI variations.
- o. The lessee shall pay to the lessor on demand, all costs of and incidental to the establishment and location by survey of the boundaries of the land, if a survey is deemed necessary.
- p. If buildings are destroyed by natural causes, the location, replacement of buildings, erections, paving, drainage and other works shall comply with the requirements of the local authority/CALM. The lessee shall perform and discharge and execute all requisitions and works required on the land by any local or public authority operating under any statute, by-law or regulation.
- q. The lessee shall within twelve months from the commencement of (the long term lease), fence the external boundaries of the site to the satisfaction of the lessor, if deemed necessary by the lessor.
- r. The lessee shall maintain existing and future improvements to the satisfaction of the lessor.
- s. The lessee shall not add to existing/future structures or erect any new structures without the prior approval in writing of the lessor.
- t. The lessee shall treat and maintain all frontages to give an aesthetically pleasing appearance consistent with the purpose of the lease.
- u. The lessee shall indemnify and keep indemnified the lessor, State Government and local authority against all claims for damages to persons or property arising from the use of the land.
- v. The lessor and person authorised by the lessor may enter the land for inspection at any reasonable time.
- w. If the lessee fails within six months of the date of judgement or order of court for recovery of rates payable by the lessee to a local authority to satisfy the judgement or order, the lessor may terminate the lease forthwith.
- x. Compensation shall not be payable to the lessee in respect of any improvements effected by him on the land and remaining thereon at the expiration or earlier determination of the lease.
- y. The lessee shall at any time within three calendar months immediately following the expiration or earlier determination of the lease take down and remove any buildings, structures, improvements on the land the property of the lease.
- z. On the expiration or earlier determination of the lease, the lessee shall fill in and consolidate any unevenness, excavation or hole caused by him/her during the term of the lease by removal of his improvements and shall leave the land in a clean, neat and tidy condition to the satisfaction of the lessor and shall remove all waste matter as required by the lessor.

SPECIFIC TERMS AND CONDITIONS OF LONG TERM LEASES TO BE OFFERED TO PROFESSIONAL FISHERS FOR SITES WITHIN FORMALISED DEVELOPMENT NODES

After the transitional arrangements, CALM will offer to professional fishers long term leases for a term of ten years. This lease period has been determined by DOLA and will apply to all professional fishers occupying shack areas along the Central Coast (between Wedge and Dongara).

Any decision by the Executive Director of CALM/NPNCA to renew the lease should be made 12-24 months prior to the expiry of the lease, to give certainty as to the future of the lease.

Attachments

Following the establishment of formalised development nodes, a condition of the proposed leases for professional fishers will provide for the Executive Director of CALM/NPNCA to consider the transfer of a lease to another professional fisher, in certain circumstances.

The Minister for Lands and other relevant government agencies will be consulted when considering renewal or transfer of leases.

The following development conditions are to be followed:

- Structures and improvements must comply with the Building Code of Australia and the Local Authority's requirements.
- All new dwellings should be transportable or demountable and to be of a semi-permanent nature. Over investment is discouraged.
- Development nodes to be low key and self-sufficient. Reticulated water and power supply will not be made available.
- Water supply will be by way of tanks or bores and where possible communal use will be promoted.
- Power supply will be by way of motorised generator, solar, wind or any other environmentally acceptable source (noise control, and spark arresters will need to be provided for motorised generators).
- Sewerage systems or other approved apparatus for waste water treatment must be in accordance with the Health Act of Western Australia.

ROCK LOBSTER RECEIVAL DEPOTS AND ASSOCIATED ACTIVITIES

Sites will be provided within the professional fishing development nodes for the establishment of rocklobster receival depots and other activities associated with professional fishing. Such depots are to be used in conjunction with professional fishing activities for the purposes of weighing/storing rocklobster, bait storage and supply of essential goods and services.

Lease arrangements will be put in place with individual companies at a rental determined by the Valuer General. All uses, structures and facilities shall comply with the requirements of the Executive Director of CALM/NPNCA, Department of Environmental Protection, Health Department WA and the local authority.

IMPACT OF THE NEW COAST ROAD

The proposed Coast Road between Lancelin and Jurien will provide easier access to Wedge and Grey. This will be taken into account when considering the issue of professional fishers and their need to remain in shack areas, specifically when considering the term of leases.

*Footnote:

These guidelines for accommodating the professional fishers at Wedge and Grey will be further developed through the consultative process in finalising the Wedge and Grey Masterplan. DOLA has released a similar policy for professional fishers operating in other shack areas along the Central Coast. A consistent approach will be taken by CALM, DOLA and the local authorities with respect to professional fishers, with some variation to suit particular local circumstances.



- Slope and Landform**
- ID** Interdunal Swamp (Seasonally inundated)
 - L** Low lying level areas/swale
 - UN** Undulating slopes
 - M** Moderate undulating slopes
 - S** Steep slopes
 - Sand blowout
 - Beach
 - Existing shack structures
 - F** Foredune

Indian Ocean

Indian Ocean

WEDGE

Site Analysis

Slope and Landform



Department of Conservation and Land Management
 0 20 40 60 80 100 140 200
 October 1998
 CALM Recreation planning & design section

Note: This plan is based on information interpreted from aerial photography.
 Source: DOLA photography, Wedge Island (Cervantes, Greenhead), Job no 940844, WA 3497.
 Run no. 5248 - January 1995.



- Vegetation patterns and density
Legend
- Trees and tall shrubs
 - Scattered trees and tall shrubs
 - Low shrubs / coastal heath
 - Coastal heath
 - Swampy flats/rushes (seasonally inundated)
 - Cleared/disturbed areas
 - Dunal Grasses
 - Sand Dune
 - Scattered heath and shrubs on calcrete

Indian Ocean

Indian Ocean

WEDGE

Site Analysis

Vegetation Patterns and Density

Department of Conservation and Land Management
 0 20 40 60 80 100 140 200
 0 20 60 100 140 200
 0 20 60 100 140 200
 CALM Recreation planning & design section

Note: This plan is based on information interpreted from aerial photography.
 Source: DOLA photography, Wedge Island (Cervantes, Greenhead), Job no 940844, WA 3497, Run no. 5248 - January 1995



- Legend**
-  Main vehicle thoroughfare
 -  Vehicle track-major
 -  Vehicle track-minor
 -  Walk track
 -  Beach access track-major, vehicle
 -  Beach access track-minor, vehicle
 -  Existing shack structures
 -  Beach


Indian Ocean

Indian Ocean

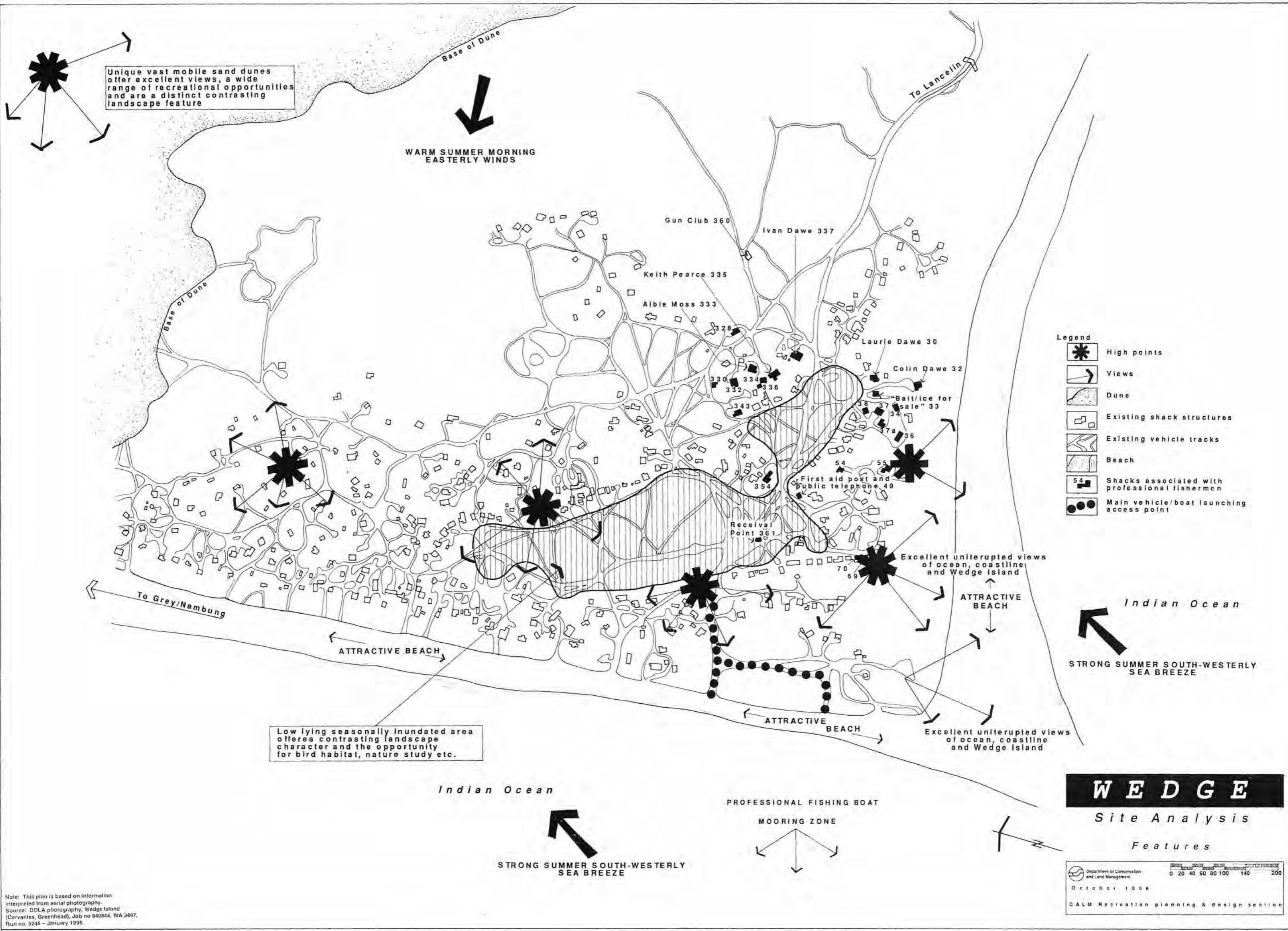
WEDGE

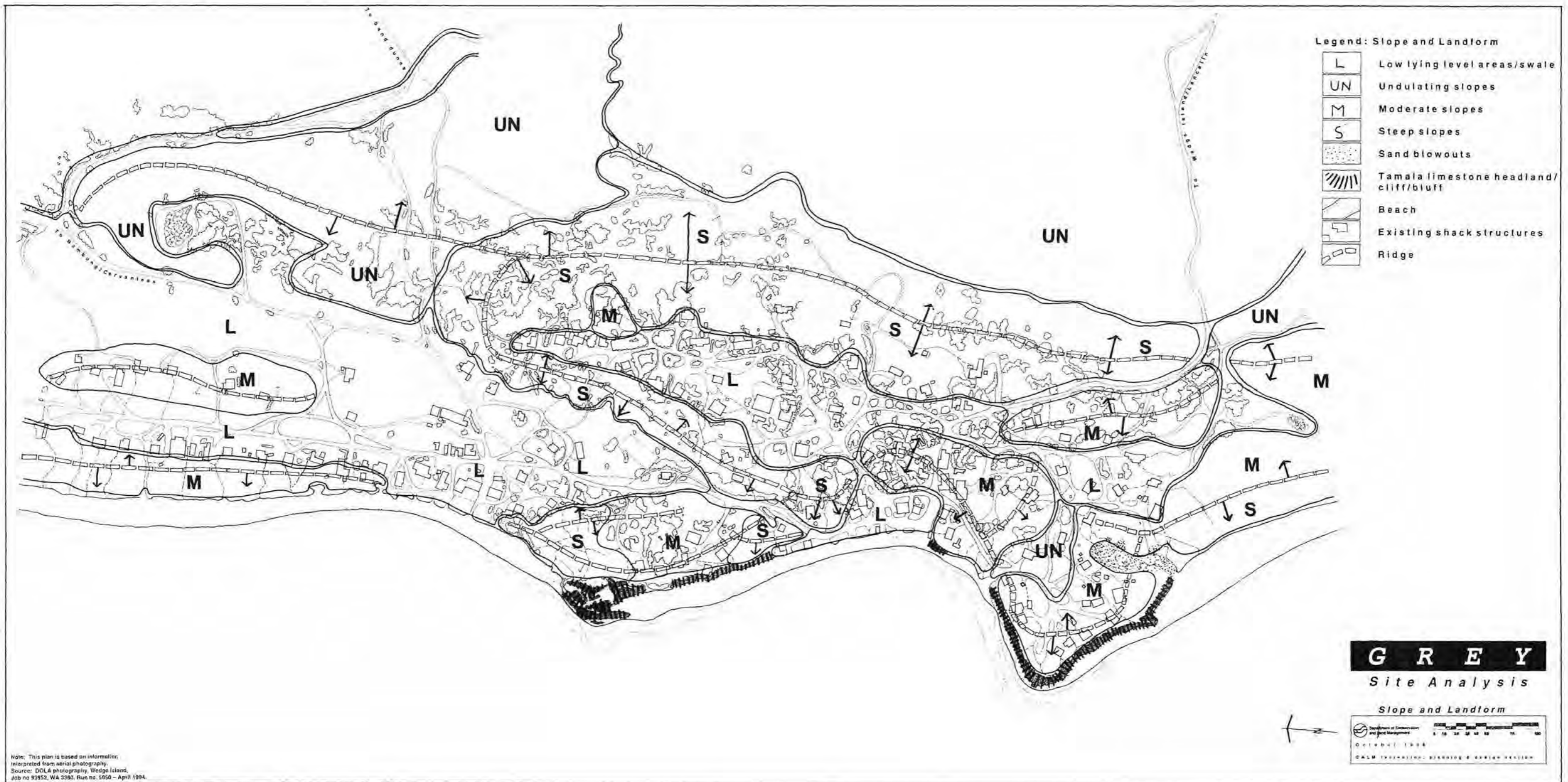
Site Analysis

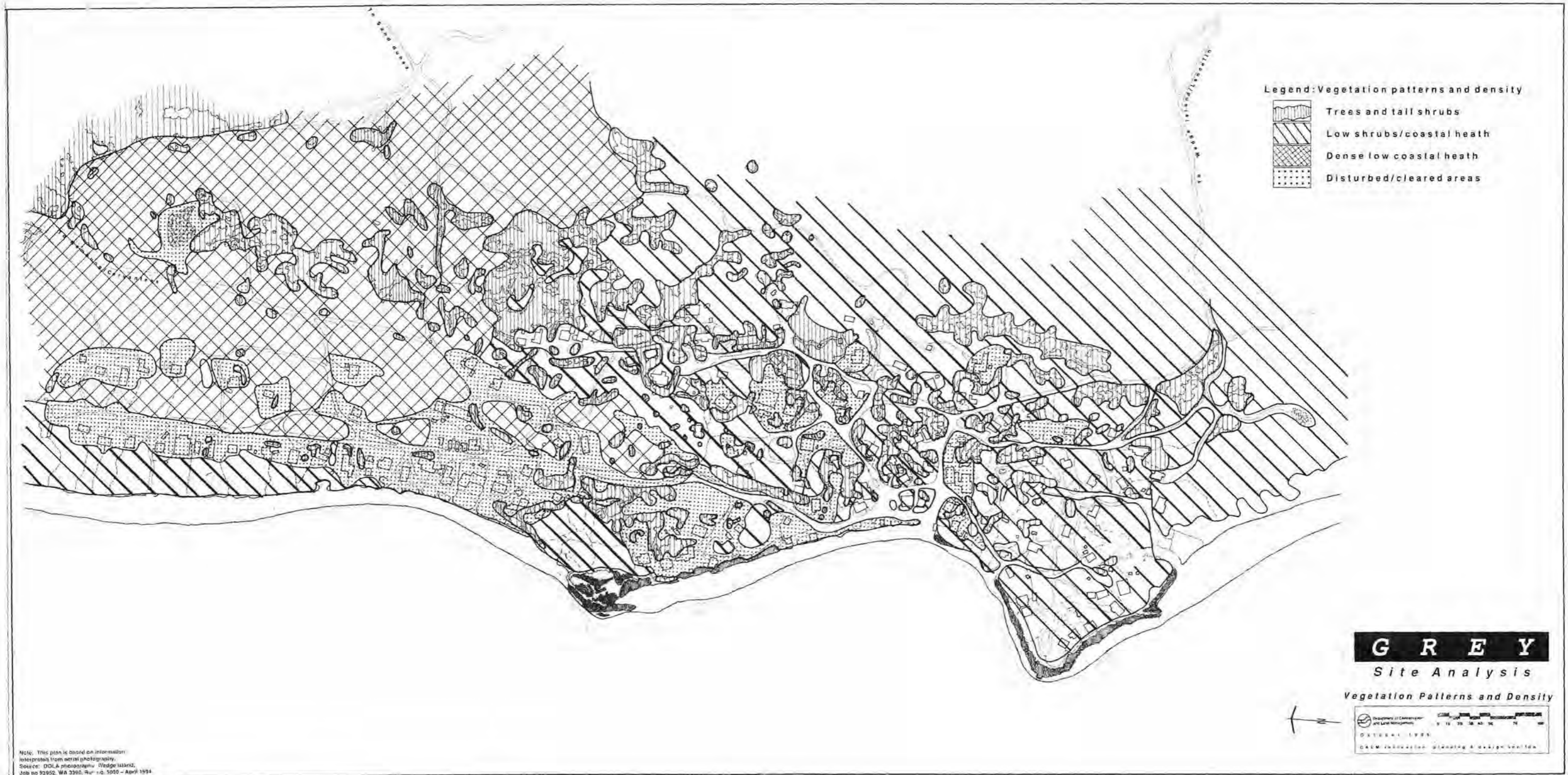
Existing Land Use


 Department of Conservation and Land Management
 October 1998
 CALM Recreation planning & design section

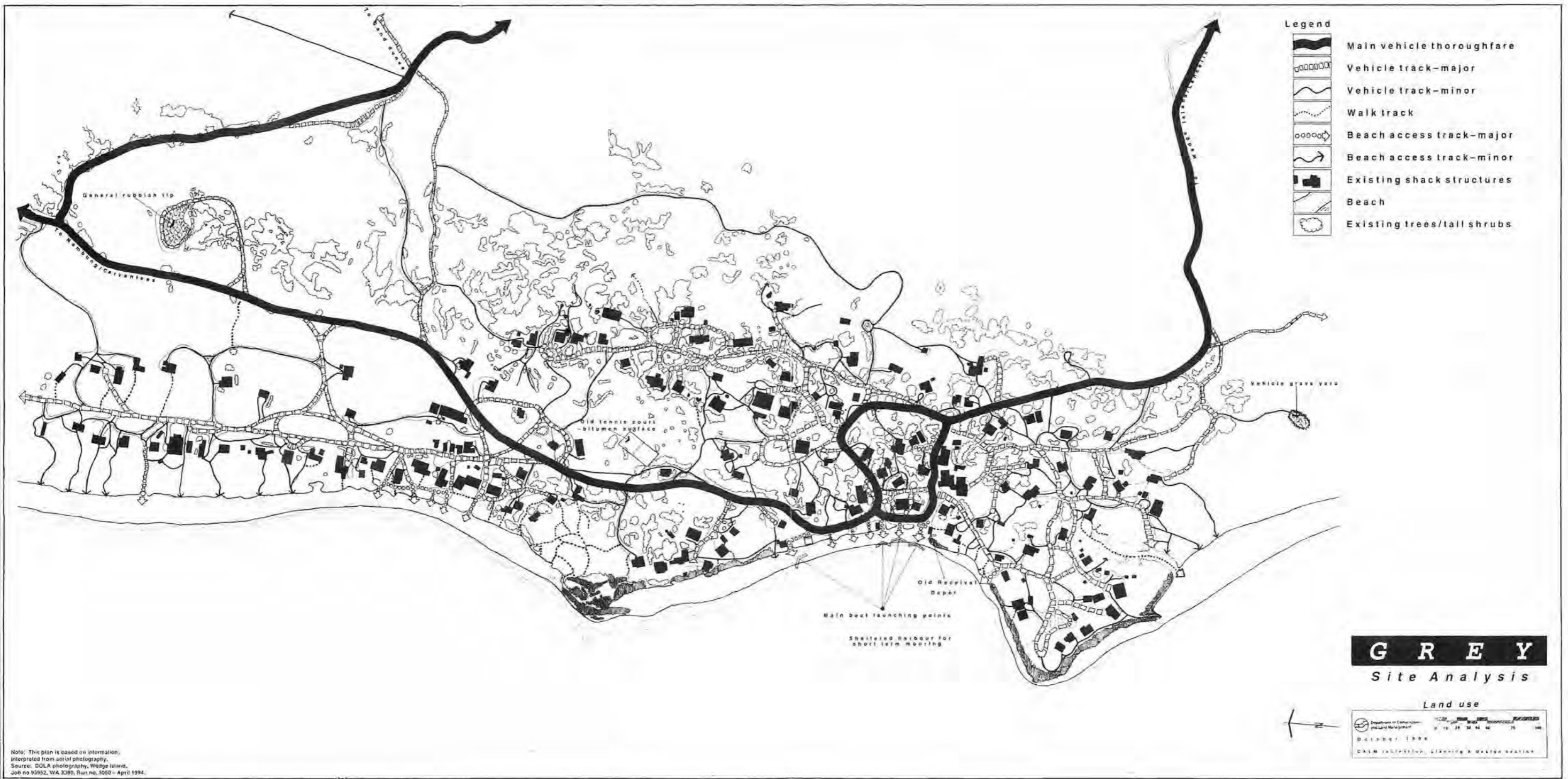
Note: This plan is based on information interpreted from aerial photography.
 Source: DOLA photography, Wedge Island (Cervantes, Greenhead), Job no 510844, WA 3497, Run no 5248 - January 1995.





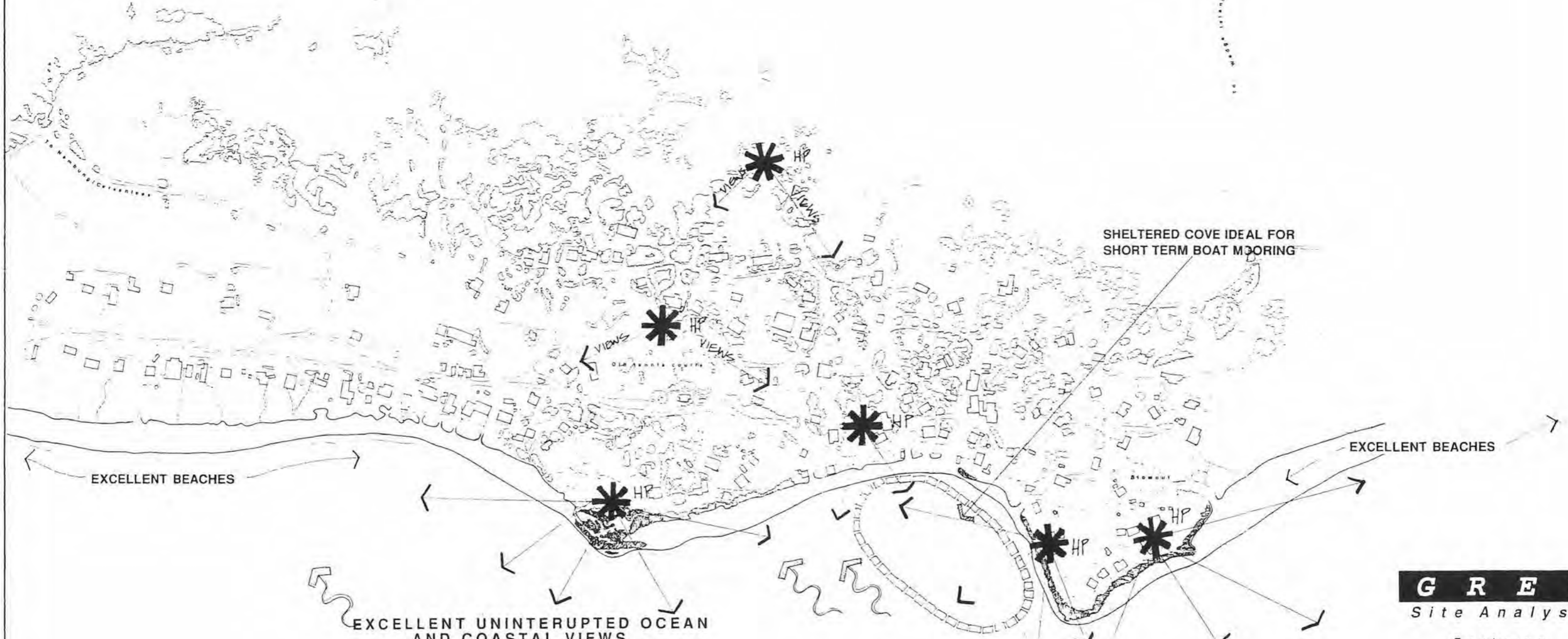
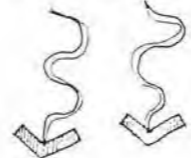


Note: This plan is based on information interpreted from aerial photography. Source: DOLA photography Wedge Island, Job no 92652, WA 3360, Sur v.d. 5020 - April 1974.



UNIQUE VAST MOBILE SAND DUNES
OFFER EXCELLENT VIEWS,
EXCITING RECREATIONAL
OPPORTUNITIES AND A STRONG
SENSE OF MYSTERY AND CONTRAST

WARM SUMMER WINDS
FROM THE EAST



SHELTERED COVE IDEAL FOR
SHORT TERM BOAT MOORING

EXCELLENT BEACHES

EXCELLENT BEACHES

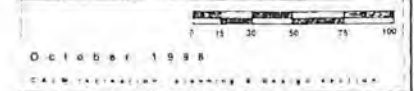
EXCELLENT UNINTERRUPTED OCEAN
AND COASTAL VIEWS

STRONG SUMMER SOUTH WEST
SEA BREEZE

EXCELLENT UNINTERRUPTED OCEAN
AND COASTAL VIEWS

GREY
Site Analysis

Features



Department of Conservation
and Land Management

Note: This plan is based on information
interpreted from aerial photography.
Source: DOLA photography, Westport Island,
July no 93952, WA 3380, Run no. 5050 - April 1994.