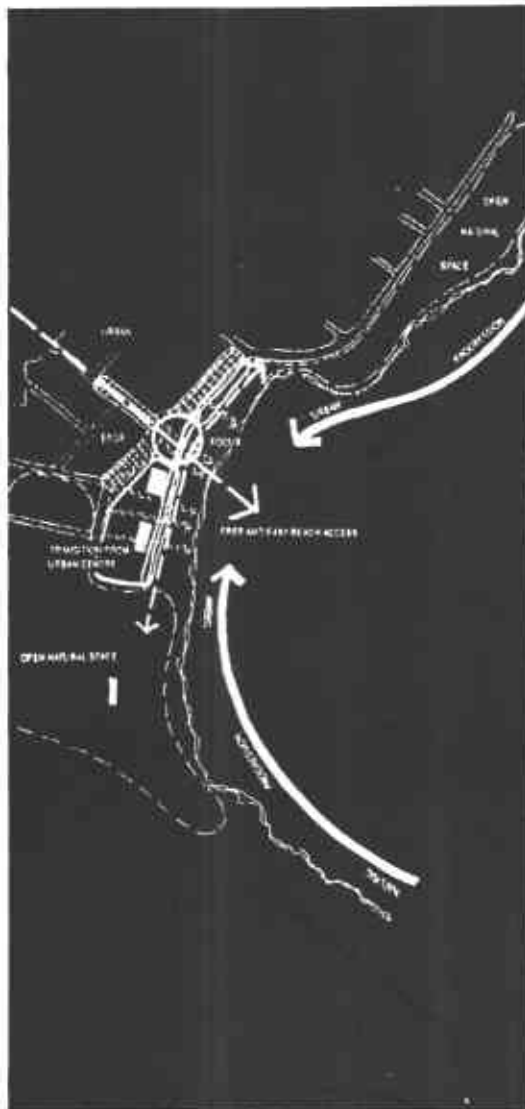


Maroubra Beach



Plan of Management Overview

Prepared for
RANDWICK CITY COUNCIL
by
HASSELL PTY LTD

SEPTEMBER 1996

MAROUBRA BEACH

PLAN OF MANAGEMENT OVERVIEW

Prepared for

RANDWICK CITY COUNCIL

by

HASSELL PTY LTD

SEPTEMBER 1996

RANDWICK CITY COUNCIL

ADMINISTRATIVE CENTRE

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Dear Readers,

Randwick City Council embarked on a major programme to carry out Plans of Management for all our major beaches during the years 1993 to 1996.

Maroubra Beach has been given special consideration due to the fact that it is a huge expanse of imposing natural beauty, characterised by a sense of openness which, unfortunately, has been severely neglected by the Council and various governments in the past.

For several years I have been personally pushing the Council in committing the greatest amount of our financial resources and with the Council's support and that of the Premier, who is also the Local Member for Maroubra, we have been successful in receiving a commitment for a dollar-for-dollar grant until the works have been completed.

Our City's eastern beaches are our greatest natural resources and the Council believed that for these areas to develop over the years to come, we needed a solid plan to work on. The Maroubra Beach Plan of Management provides us with this opportunity.

The essential element in these plans was to ensure maximum community involvement and I am therefore grateful to the members of the Maroubra Beach Plan of Management Community Consultative Committee for all the efforts they have made in making their time available to assist in the preparation of this Plan.

I would also like to acknowledge the work done by the Consultants, Hassell Pty Ltd, particularly Mr Ross de la Motte the chief consultant.

What needs to be done now is to ensure the recommendations of this plan are carried out and that will be up to the community to see that funds are made available to ensure the vision of Maroubra is implemented.

I would also like to thank Gary Eastman, Recreation Assets Manager, and Council's dedicated staff who prepared this vital document and the assistance given to this Plan by the NSW Department of Land and Water Conservation.

I commend this report to you.



Councillor Chris Bastic,
MAYOR OF RANDWICK.

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Appendix 1 - Maroubra Beach Indicative Plant Species List and Jack Vanny Reserve Bushland Remnants.

Appendix 2 - Maroubra Beach Questionnaire and Summary of Responses.

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VOLUME 1 - POLICY AND PLANNING

1.0. Executive Summary

Maroubra Beach is one of Sydney's most popular seaside recreation attractions. However, it has progressively deteriorated to an extent where the Council has expressed concern over its ability to adequately service the needs of the local community.

Maroubra Beach is characterised by an image of tired neglect, inadequate amenity, and less than satisfactory levels of public safety. There is an ineffective disposition of land uses across the area and there are conflicts between several user groups ie. pedestrians/drivers.

The commercial centre is in a state of economic decline and the beach and reserves are subject to unsatisfactory discharge of stormwater. Faced with these considerable issues Council is experiencing difficulty in allocating sufficient financial or human resources to develop new or indeed maintain existing levels of service.

It is in this context that this plan of management overview has been prepared. This document outlines Council's long term vision for the rejuvenation of Maroubra Beach.

Before major capital works are initiated a number of key initiatives and specialist studies are required to be undertaken. These include:

- > an urban design strategy for the commercial precinct;
- > a hydraulic and geotechnical study of the western reserves and southern beach area;
- > ecological studies; and
- > bus terminus relocation study.

The plan of management overview comprises an extensive list of recommendations concerning the development and management of the beach. These recommendations are summarised for each management zone as follows.

- > The Northern Headland - Reinststate heathland communities in association with unstructured recreation zones and facilitate greater public access and usage.
- > Beach - Maintain its pre-eminent position as one of Sydney's greatest recreational assets and improve amenity and safety.
- > Promenade and Plaza - Develop this zone as a major community focus and a meeting and events space with strong physical and visual integration to the beach and commercial zones.

-
- > Commercial Area - Revitalise this area through good urban design, including the streetscape redevelopment of McKeon Street and Marine Parade, encourage development within pre-determined limits and provide improved levels of public amenity.
 - > Western Recreation Reserve - Develop these reserves as substantial community assets for structured and unstructured recreation and utilise the large available area for possible stormwater detention and water quality enhancement.
 - > Southern Dunes - Retain and protect the existing dunes with minor and strictly controlled incursion for beach access and recreation areas associated with the South Maroubra SLSC.

The works required to effect the renewal of Maroubra Beach are of a large scale, with a potential capital value between \$7m and \$10m. The implementation of these works will therefore be a long term urban project, one that will require a strong and ongoing commitment by Council and the State and Federal Governments. Yet the opportunity exists, with the celebration of the second millennium in five years time, to make a substantial and decisive impact on the rejuvenation of Maroubra Beach and to ensure that it fulfils its potential as a great natural and cultural resource of which Sydney and Australia can be proud.

2.0. Introduction

2.1. BACKGROUND

Maroubra Beach is a site of imposing natural beauty characterised by a sense of openness created by a long stretch of gently curving sand, only partly enclosed to the north and south by rocky headlands, and relatively open parklands and gently rising topography to the west.

The beach is one of the most popular surfing beaches in Sydney and during the summer months is subject to intensive use. Because of its intrinsic scenic and recreational values the beach is highly valued by the community.

Despite these considerable attributes and the community's concern for its protection, Maroubra Beach has not achieved its potential as a premier coastal attraction and recreational resource. Its inherent natural qualities have been lost or severely compromised by progressive urban development. Past attempts at redefining these qualities to achieve a resource complementary to the natural environment and capable of withstanding urban pressures have been largely unsuccessful.

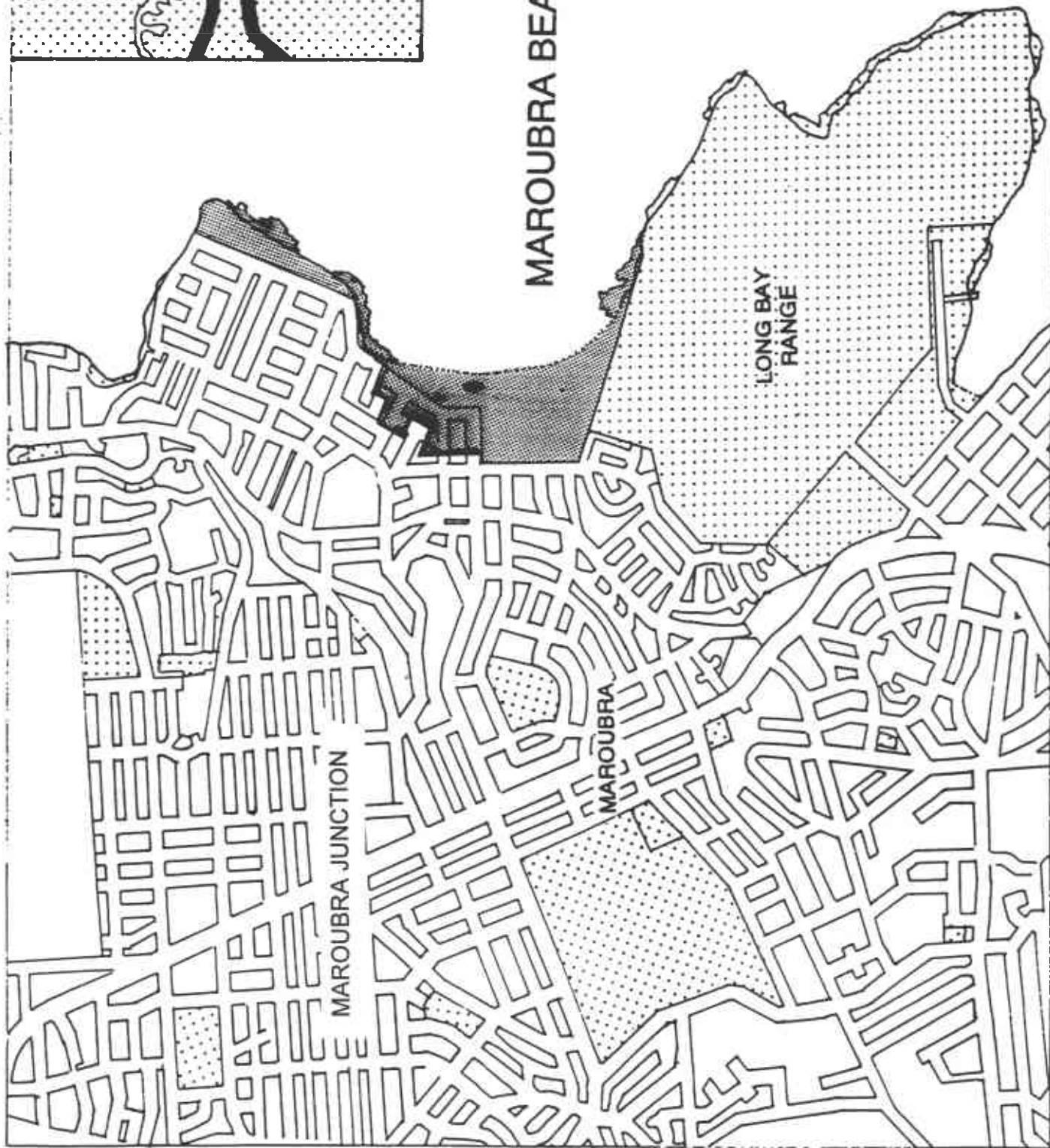
These pressures and the desire for enhancement of the site have created the need for a revised plan of management. In coming years Maroubra Beach will be subject to increasing demands upon its carrying capacity and it will become the subject of greater public scrutiny.

Maroubra Beach and its reserve areas are classified as community land under the provisions of the Local Government Act, 1993. In July 1994, Randwick City Council commissioned Hassell (formerly Land Systems EBC Pty Ltd) to undertake a plan of management overview study for Maroubra Beach. Maroubra Beach is located between Lurline Bay and Long Bay and is 12 kilometres south east of the Sydney CBD.

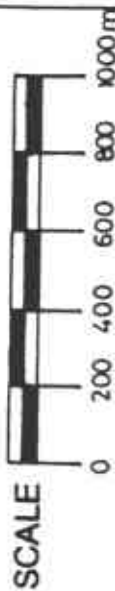
The scope of the study included an analysis and assessment of the site's physical, ecological and cultural resources in the light of current and future usage, and the development of a new management regime to guide the rehabilitation and conservation of the beach.

2.2 SITE LOCATION CONTEXT

The study area is defined by Jack Vanny Memorial Park: Mahon Pool and associated rock headland to the north; Arthur Byrne Reserve and rock headlands to the south; John Shore Reserve, Broadarrow Reserve and the McKeon St/Marine Parade shopping area to the west; as well as the beach and associated buildings (Refer Figure 1). Maroubra Bay (ie the area below the mean high water mark) is not included in the study area.



MAROUBRA BEACH STUDY AREA



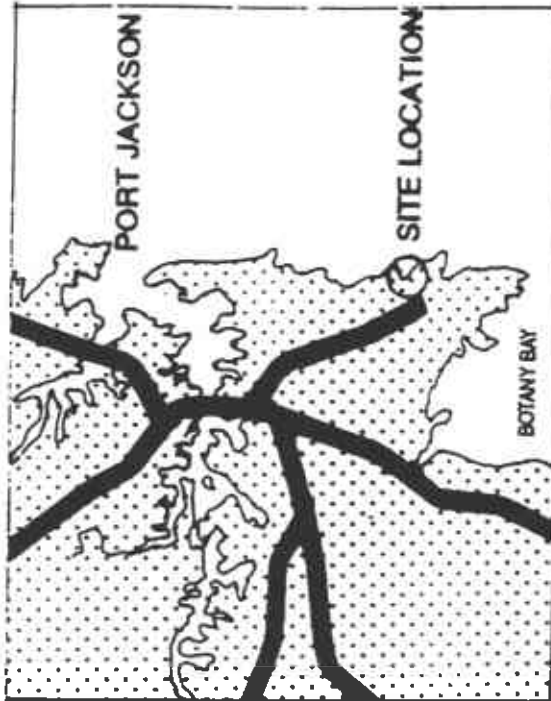
MAROUBRA BEACH

PLAN OF MANAGEMENT

SITE LOCATION

FIGURE 1

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL AUGUST 1996



PORT JACKSON

SITE LOCATION

BOTANY BAY

The study area comprises approximately 35 hectares.

The principal features of the study area are the sandstone cliffs and rock platforms, the sandy beach and large expanses of reserve, associated car parking areas, beach pavilions and surf club buildings.

The area is surrounded by residential development and has an urban character to the north. The southern portion of the site comprises a quasi natural, open landscape consisting of the Arthur Byrne Reserve with Long Bay Rifle Range beyond.

The main recreation features of the beach include:

- > the coastal walking path;
- > the surf life saving clubs;
- > swimming and surfing;
- > sunbathing;
- > ball sports;
- > picnicking, and
- > other organised group activities on the reserves.

2.3. STUDY OBJECTIVES AND SCOPE

The primary objective of the study is to update the 1978 Maroubra Beach Management Study so that Council can better manage the coastal environment of Maroubra Beach and its surrounds, while providing a diversity of local and regional recreational opportunities, and achieving a sustainable relationship between the conservation value of the beach and its foreshore areas and the recreational needs of the local community, tourists and visitors.

The scope of the plan of management as outlined in Council's brief was as follows.

- > Identification and evaluation of the key issues and associated sub-issues, and review and prioritisation of their relevance to the broader community.
- > Consultation with appropriate Council staff and other Government Departments as required, e.g. Department of Planning, Department of Public Works, Department of Conservation and Land Management (CALM), etc.
- > Formulation and recommendation of policies, outlining appropriate actions, identifying resources for policy implementation and devising a systematic monitoring and review strategy.
- > Preparation of a timetable outlining priorities for short and long-term works programs.

-
- > Preparation of a financial plan for all proposed works.
 - > Preparation of an appropriate coastal environmental management strategy for the conservation of the foreshore and hinterland of Maroubra Beach in accordance with appropriate government legislation and identified community concerns.
 - > Identification and prioritisation of latent and manifest recreational and tourism needs and opportunities, amenities and facilities for local and regional user groups including able bodied and disabled persons.
 - > Review of the provisions of the existing State, regional and local planning conservation policies and instruments as they apply to the area and assessment of their implications regarding the management of Maroubra Beach.

However, given the limited available budget, a proposal was formulated on the basis of an overview study only. No baseline research was undertaken and the review of the existing Management Study was to be undertaken by Council. The final overview plan of management is a working brief for the preparation of a comprehensive plan of management to be prepared at some future time.

The study does not seek to provide a solution for all management issues at Maroubra Beach as this would be a substantial undertaking. The emphasis at this stage has been to concentrate on issues of strategic importance, to establish an agreed philosophy for further development of the study area and to graphically illustrate how the major issues affecting land use may be overcome.

It is envisaged that a substantial amount of further research, analysis, design and evaluation will be required to formulate comprehensive policies for all management issues.

2.4 STUDY PROCESS

The study was undertaken in three phases.

Phase 1 - Issues Identification: This phase included the gathering of information and assessment of the existing environment, definition of management zones, issues and objectives and the formulation of management guidelines and an opportunities and constraints working paper.

Phase 2 - Development of a Management Approach: This phase involved the formulation and evaluation of development and management strategies, the preparation of a cost estimate and an implementation strategy culminating in a draft report.

Phase 3 - Draft Plan of Management: This phase will involve a public exhibition and review of the draft plan of management.

2.5. STRUCTURE OF THIS DOCUMENT

This document has been divided into five sections in accordance with the Local Government Act 1993 as follows:

- > Introduction - providing the context for the plan and explaining how it fits into Council's public land management programme.
- > Value Statement - defining the characteristics and relative importance of the study area.
- > Basis for Management - defining the issues of importance derived from supporting papers, previous studies and community consultations.
- > Policy - identifying policies to address issues.
- > Management Areas - providing management guidelines for zones of the site which have similar functional characteristics.

This document will provide the basis of Volumes 1 and 3 of the final plan of management.

3.0. Value Statement

3.1 PHYSICAL INFLUENCES

3.1.1. Climate

The climate effecting Maroubra Beach is temperate maritime and typical of that experienced along Sydney's eastern coastline. The summers are warm to hot and the winters cool to mild with maximum rainfall occurring in summer. The average monthly temperature range for January is between a minimum of 18°C and a maximum of 25.7°C. During July the monthly temperature range is between a minimum of 7.9°C and maximum of 16°C. The average annual rainfall is 1226mm. The highest average monthly rainfall of 135mm occurs in March, whilst the lowest rainfall of 69mm occurs in September.

From November until March the prevailing winds are from the east. During these summer months the coast experiences light southerly winds in the morning swinging around to the southeast, east and northeast, becoming more intense during the afternoon. In the winter months the prevailing winds are from the west.

The micro-climate of Maroubra Beach is dominated by wind. The prevailing winds have a substantial impact upon local temperature and humidity regimes and therefore affect the comfort and amenity of beach users as well as having substantial influence on the composition and morphology of natural plant and animal habitats.

3.1.2. Vegetation (Refer Figure 2)

Large areas of open space exist at Maroubra Beach. Re-vegetation and replanting has been undertaken on the beach foredunes, Arthur Byrne Reserve, and Broadarrow Reserve. However, other reserves have been cleared and established with grass. Some areas are subject to weed infestation.

Remnant endemic vegetation exists towards the southern boundary of the site and consists of some unusual species for this locality. Overall, however, the study area has a barren appearance. The lack of vegetation particularly to the north of the beach, does not afford protection to residences and park users from windblown sand and salt spray.

The vegetation of Maroubra Beach has been classified into nine areas.

- Area 1: The embankment planting at Arthur Byrne Reserve, consisting of dense shrubland and heath vegetation planted in 1986/87.
- Area 2: The area north of Maroubra Surf Life Saving Club. Landscape works were carried out here between 1986 and 1989.



Jack Vanny Memorial Park

Marian Ford

Marian Ford Amphitheatre

Car Park

South Maroubra Surf Life Saving Club

Car Park

Bus Stop

Maroubra Surf Life Saving Club

Beach Pavilion

Car Park

Long Bay Rifle Range

KEY

- 1 SHRUBLAND/HEATH
- 2 MIXED LANDSCAPE
- 3 GRASS AND SHRUBLAND
- 4 OPEN GRASSLAND AND SCATTERED SHRUBS
- 5 MIXED LANDSCAPE
- 6 SAND DUNES
- 7 REMNANT HEATH
- 8 REMNANT HEATH
- 9 GRASSLAND

John Brad Reserve

Brookman Reserve

Arthur Byrne Reserve



MAROUBRA BEACH PLAN OF MANAGEMENT

VEGETATION

FIGURE 2

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995

-
- Area 3: Broadarrow Reserve, consisting of grassland and shrubland vegetation planted in the late 1980's.
- Area 4: Arthur Byrne Reserve lower areas, consisting of a simplified open grassland and scattered shrub vegetation similar to that planted in Area 1.
- Area 5: The area west of Maroubra Surf Life Saving Club which was landscaped in the late 1980's.
- Area 6: Planting on the sand dunes, which consists of dune stabilising native grasses and shrubs suitable for the local environment.
- Area 7: An area of beach remnant consisting of indigenous heath and groundcover species with weed infestation. Some plants here are uncommon locally.
- Area 8: A second beach remnant area consisting of a number of plants uncommon in the Sydney region.
- Area 9: This area consists of the Jack Vanny Memorial Park and John Shore Reserve. Jack Vanny Memorial Park contains areas of mown grass, native tree and shrub plantings and remnant herbs, edges and grasses mostly on rock outcrops. John Shore Reserve consists mainly of introduced grasses and infested by weeds.

The species list for the study area is appended (Refer Appendix 1) but is indicative only of the general composition of the vegetation in these areas. The information presented here is preliminary and supplied for general purposes only. This list was compiled with the assistance of Dannie Olbrich of Randwick Community Nursery and from planting plans held by Randwick City Council.

3.1.3. Fauna

The study brief did not encompass a fauna survey. Given the extremely disturbed nature of the study area and almost total loss of original vegetation and habitat it is likely that the diversity and number of endemic fauna will be very limited.

A comprehensive ecological assessment should be conducted before any redevelopment works are undertaken.

3.1.4. Marine Environment

The northern end of the beach zone is situated on a rock shelf with a thin layer of overlying sand. Moderate swell conditions can remove sufficient quantities of sand to limit the recreational use of this part of the beach.

Data from the last summer season at Maroubra Beach showed that bacterial levels approached National Health and Medical Research Council Guideline limits and that the beach was affected by stormwater flows.

In addition the beach was considered unsuitable for swimming on the basis of visual indicators on 63 days during the season. Whilst these current levels are not believed to pose a health risk for swimmers, Beachwatch concluded that any proposals in the plan of management that would contribute to improved stormwater management would be likely to improve recreational amenity.

Water runoff into Maroubra Bay comes from several sources.

- From the main pipe under Fitzgerald Avenue which discharges into the sea at the northern end of the beach.
- From a second smaller stormwater outlet at the boundary of Jack Vanny Reserve and the beach proper.
- A third stormwater drain exits Long Bay Rifle Range at the southern end of Maroubra Beach.
- Two more stormwater drains situated near Mahon Pool.
- From adjacent streets.

3.2. CULTURAL INFLUENCES

3.2.1. Historical Overview

The word Maroubra comes from the aboriginal meaning "like thunder," an apt description of the sound of local heavy surf pounding against the beach and rocks.

The area was originally part of the 'Church and School Lands', a grant of land set aside in the early days of the colony for the support of clergy and teachers. The land later reverted to the Crown but, in spite of this, Maroubra remained generally unknown, unvisited and isolated from Sydney.

There were few people at Maroubra during the mid 19th Century. One householder in the area was Humphrey McKeon after whom McKeon Street is named. Otherwise the only other habitation at Maroubra Beach was some housing attached to a wool scouring works at the north end.

Towards the end of the 19th Century some building did start to take place as well-to-do Sydney merchants established country estates at Maroubra.

At this time people were beginning to see Maroubra Beach as a resort area - a place to escape the city. Travelling to Maroubra Beach was still difficult and this gave the place an unspoilt but isolated air.

In the 1920's the real estate developer Herbert Dudley engineered the tram connection between Maroubra Beach and Sydney. This led to a boom in land sales and house building. By the 1930's Maroubra Beach had become a Sydney suburb described as a "paradise next to the sea."

In the last 30 years or so Maroubra Beach has undergone further housing development changing areas of the suburb from detached dwellings to medium density apartments.

Maroubra Surf Life Saving Club was established in 1906. South Maroubra Surf Life Saving Club is somewhat younger and was relocated to its present building in 1969.

3.2.2. Visual Quality and Landscape Character

The following key visual elements have been identified in the study (Refer to Figure's 3 and 4).

- > Sandstone cliffs
- > Mahon Rockpool
- > The water surface
- > Areas of vegetation
- > Urban development
- > The surf club and beach pavilion
- > McKeon Street shops
- > The car parks
- > The powerlines - not shown on plan.

> The Sandstone Cliffs

The steep faces of the sandstone cliffs and exposed rock outcrops offer a diversity of rich honeycomb colours and textures and are visually prominent from many areas of the bay. The rocky outcrops vary in height from 6m to approximately 20m.



Jack Veeney Memorial Park
 Mahon Pool
 Mahon Pool Amenities
 Car Park

South Maroubra Surf Life Saving Club

Car Park

Bus Stop

Maroubra Surf Life Saving Club

Beach Pavilion

Car Park

Long Bay Little Ranges

LEGEND

- SANDSTONE CLIFFS
- MAHON ROCKPOOL/SOUTHERN ROCKPOOL
- BEACH AREA
- VEGETATION GRASSES WEEDS AND SCRUB
- MCKEON STREET SHOPS
- CARPARKS
- URBAN DEVELOPMENT MOSTLY RESIDENTIAL
- JOHN SHAW RESERVE
- SPOOKANAH RESERVE
- ARTHUR BYRNE RESERVE

MAROUBRA BEACH PLAN OF MANAGEMENT PLAN KEY VISUAL UNITS

FIGURE 3
 PREPARED FOR RANDWICK CITY COUNCIL
 BY HASSELL
 AUGUST 1995



CLIFF FACE

MAGIC POINT

LONG BAY RIFLE RANGE

SURF LIFE SAVING CLUB

PAVILION

ARTHUR BYRNE
RESERVE DUNE

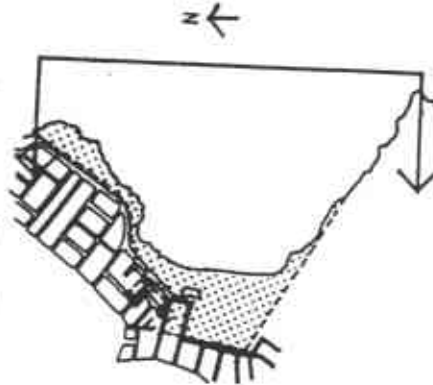
MISTRAL POINT

CLIFF FACE

FOUR STOREY HOUSING

TWO STOREY HOUSING

JACK VANNY MEMORIAL PARK
AT FRONT



MAROUBRA BEACH

PLAN OF MANAGEMENT

TYPICAL ELEVATION EAST

FIGURE 4

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995

> **The Mahon Rockpool**

The rockpool area is dominated by exposed rock outcrops and cliffs offering an unusually rich diversity of colour and texture.

Rockpools of this nature are a particularly valuable attribute and the Mahon Rockpool is considered to be visually and culturally significant.

> **Vegetation of the Reserve and Clifftop Areas**

The study area contains only a little of the original indigenous vegetation. Several species are however, uncommon in the Randwick Area. Indigenous and exotic species have been planted in an attempt to stabilise dunes, reduce erosion and create useable spaces within the reserves. Such planting has created a green open natural expanse to the south of the beach and at the top of the northern bay headland.

> **Urban Development**

The dominant cultural feature of the north of the bay is the presence of residential buildings. These buildings consist of one and two storey detached buildings and two and three storey residential flat buildings.

Apartments line Marine Parade close to the clifftop at the northern end of the beach. Towards the central and southern end residential buildings are located back from the beach front behind the open spaces of the reserves and Long Bay Rifle Range.

The mass of urban development particularly around the northern part of the bay provides a conflict of colours and textures to its perimeter. Many buildings within this zone are visually incompatible with each other by virtue of their form, scale and colour creating visual confusion and lack of cohesion. There is a distinct lack of vegetation in the urban areas.

The former Maroubra Bay High School (outside the study area) is a proposed redevelopment site with a mixed use development providing up to 150 medium density residential units and associated community facilities.

> **The Surf Clubs and Beach Pavilion**

The pavilion and the two surf life saving clubs are the main buildings situated on the beach.

The pavilion is the most recent building and is of monumental form. It is the visual focus at the centre of the beach (together with the Maroubra Life Saving Club). The structure is visually intrusive due to its form and vibrant colour scheme and contrasts strongly with the natural backdrop of the reserves and foreground of the bay.

Maroubra Surf Life Saving Club is a recently extended building next to the pavilion. It, too, is a large structure and a visually disruptive element on the beach.

South Maroubra Surf Life Saving Club is less apparent from the beachfront being situated in Arthur Byrne Reserve and partly hidden by dune vegetation. It is however a large building, and is intrusive when viewed from most of Arthur Byrne Reserve and housing beyond.

> **McKeon Street/Marine Parade Shops**

The McKeon Street/Marine Parade precinct is a diverse shopping area towards the north west of the beach. The majority of shops date from the 1920's. The shops are generally run down with poor streetscape. Local residents wish to see the McKeon Street area and the beach as a reflection of their neighbourhood and desire beautification of the area. Maroubra Hotel on Marine Parade is a significant commercial establishment and generates considerable patronage, however, many local residents would like to see the elimination of unruly and anti-social activities by some of the hotel clientele.

The commercial area is zoned Business 3 (a2) with a 12 metre height restriction and a floorspace ratio of 1.5:1. The surrounding residential area is zoned Residential 2(c1) which permits residential flat buildings. Issues of mix, scale and bulk of future development should be addressed by a Development Control Plan for the commercial area.

> **The Car Parks**

There are three car parks in the study area.

- > The car park situated in Jack Vanny Reserve atop the northern headland has spaces for approximately 200 cars. There are expansive views over the ocean and beach from the car park. This car park is visible from overlooking apartments on Marine Parade and from various parts of the beach. The northern car park is large but is broken up by central planting softening its overall effect. The planting and parking barriers however have been vandalised and the area is now being used to dump garbage, giving the car park an unkempt, dirty appearance detracting from the visual quality.
- > The central car park is situated behind the beach pavilion and appears as a sea of bitumen. The car park has a capacity of 250 cars. It lacks aesthetic appeal and gives an unwelcoming feel when entering the beach at this point.
- > The southern car park is situated behind South Maroubra Surf Life Club and has spaces for 160 cars. The car park also lacks any visual appeal, is visible from many parts of Arthur Byrne Reserve and nearby housing, but is screened from the beach.

> **Power Lines - (Not shown on plan)**

The overhead poles and lines detract from the visual quality of the area and the 1978 Plan of Management recommended they be placed underground.

3.2.3. Impact of Federal, State and Local Government Planning Instruments

> **Sydney Regional Environmental Plan No. 14 Eastern Beaches**

Maroubra Beach is included within the State Government's Sydney Regional Environmental Plan No. 14 Eastern Beaches (SREP 14) and the Design and Management Guidelines Eastern Beaches.

These guidelines are relevant to Maroubra Beach and specific reference should be made to them when considering any development proposal for the site.

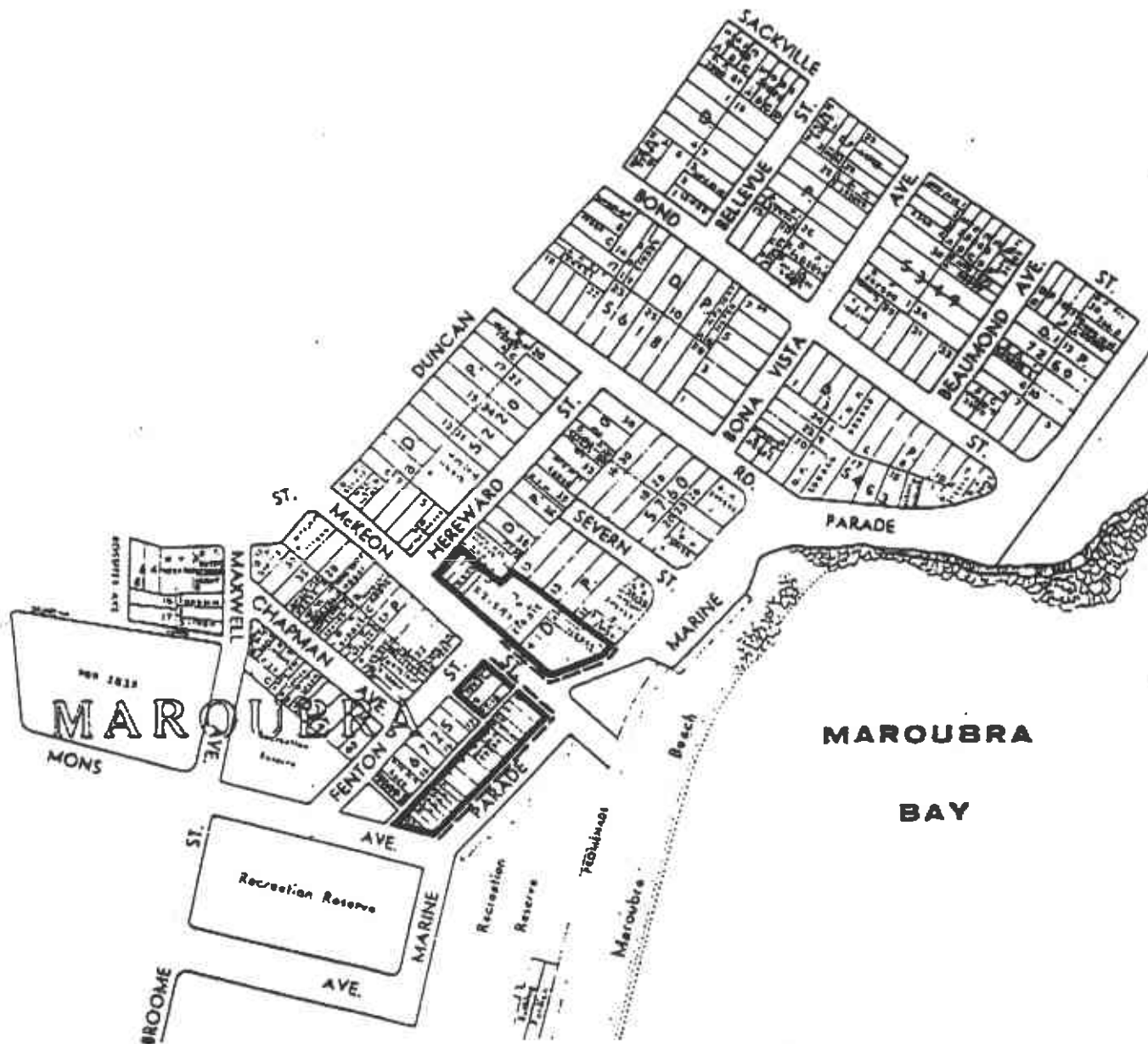
Specific guidelines for Maroubra Beach from each of these documents include:

Beach Front Open Space

- > Provide pavilions, screens, walls etc to give shelter from the elements.
- > Build a shelter pavilion at the northern end of the promenade, to provide a viewing point and a visual termination to the beach and open spaces.
- > Establish a range of recreation facilities.

Maroubra Commercial Area

- > Consider the closure of McKeon Street between Marine Parade and Fenton Street for a pedestrian precinct.
- > Improve the visual connection between the commercial area and the beach at McKeon Street by keeping the area open, widening footpaths, and by providing formal planting.
- > Limit building heights to 12 metres (4 floors) and make them relate to surrounding residential development.
- > Control the demolition of buildings in the commercial area (Refer Figure 5 from SREP 14) by requiring the consent of Council.



SCALE 1:5 000

LEGEND

— SUBJECT LAND

- - - DESIGNATED STREET FRONTAGE

DEPARTMENT OF ENVIRONMENT AND PLANNING
ENVIRONMENTAL PLANNING & ASSESSMENT ACT, 1979

**SYDNEY REGIONAL ENVIRONMENTAL PLAN NO. 14
(Eastern Beaches)**

**MAROUBRA BEACH
PLAN OF MANAGEMENT**

SREP NO. 14
(EASTERN BEACHES)

FIGURE 5

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995

-
- > Grant greater floor space ratios for developments in the commercial area if extra space is used for a dwelling, hotel or motel.
 - > Limit building heights to no more than 12m under normal circumstances but consider allowing an increase to 15m if the building meets certain Council criteria.

Other Areas

- > Areas bounded by Marine Parade, Maroubra Road, Duncan Street, Mons Avenue (but not buildings in the commercial area), to be limited to a height of three storeys (nine metres).

Designated Street Frontages

- > Buildings in these areas must have a continuous facade along street frontages
- > No vehicular access will be provided to the buildings across the designated street frontage.

In addition the Design and Management Guidelines Eastern Beaches recommended specific improvements to the coastline between Coogee Beach and Malabar Beach by:

- > planting suitable street trees above the cliff tops along the section of coastline between Lurline Bay and Jack Vanny Reserve to the north of Maroubra, in association with the development of the coastal walking trail, to provide shade and soften the impact of urban development on the coastal landscape;
- > locating the coastal walking trail within Jack Vanny Reserve to link Mahon Pool with the Maroubra Beach promenade, further upgrading the more southerly car parking area in Mahon Reserve and setting back parking areas from the trail to enable the establishment of planting to screen the car parks;
- > narrowing Marine Parade to the north of Maroubra Beach in the vicinity of Jack Vanny Reserve, creating paving and street tree planting;
- > providing a walking trail around the headland (Long Bay Rifle Range) and below the western escarpment connecting Maroubra Beach and Malabar Beach;
- > ensuring the protection of the coastline and escarpment at Long Bay Rifle Range, and
- > ensuring the protection of the sewage treatment works buffer zone.

The Design and Management Guidelines Eastern Beaches also recognises the future development of Long Bay Rifle Range and outlines proposals to;

- > ensure the future provision of utility installations related to the supply of water and sewerage facilities;
- > ensure the preservation of bushland;
- > acknowledge the presence of landfill around Maroubra Bay and possibly the presence of toxic waste in the fill, and
- > consider the future of the wind power generator device on the southern coastline.

> **Randwick Local Environmental Plan No. 91**

McKeon Street Shops Commercial Area

The relevant clause of the plan is detailed below.

To facilitate redevelopment of land at Maroubra Beach that is within the business zone to general business A2 and to encourage the provision of accommodation in the form of residential flat building, hotels, motels, serviced apartments and backpacker accommodation by permitting a higher floor space ratio in relation to those purposes than would otherwise be allowed.

> **Randwick Local Environmental Plan No. 18**

Maroubra Beach is a foreshore Scenic Protection Area under LEP No. 18. This plan requires consent for building heights and establishes permissible uses within certain parts of the study area.

> **Randwick Local Environmental Plan No. 102.**

The Maroubra Beach Hotel (c1920's) is the only heritage item in the study area listed in Local Environmental Plan No. 102. The Mahon Pool is a proposed heritage item.

3.2.4. Land use (Refer Figure 6)

The study area comprises the following primary land uses.

- > The recreational reserves of Arthur Byrne, Broadarrow, John Shore, Jack Vanny Memorial Park, and the "Control Zone" reserves.



Jack Vanny Memorial Park

Marion Pool

Marion Pool Amenities

Car Park

South Maroubra Surf Life Saving Club

Car Park

Bus Stop

Maroubra Surf Life Saving Club

Beach Pavilion

Car Park

Long Bay Rifle Range

LEGEND

MCKEON STREET SHOPS

BEACH AREA
OPEN SAND AND ROCKS

RECREATIONAL RESERVES

CARPARKS

John Shaw Reserve

Woodhouse Reserve

Arthur Byrne Reserve



MAROUBRA BEACH PLAN OF MANAGEMENT LAND USE

FIGURE 8

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995

-
- > The McKeon Street/Marine Parade shopping area which includes part of the Maroubra Beach commercial area.
 - > The beach area including the beach pavilion and the Maroubra and South Maroubra Surf Life Saving Clubs, and rocky outcrops which contain the Mahon Pool.
 - > The car parks - spread around the site, situated in reserves.

Maroubra Beach was declared an alcohol free zone on 28 November, 1995.

3.2.5. Access (Refer Figure 7)

> Pedestrian Access

Pedestrian access around the study area has two predominant characteristics.

Jack Vanny Reserve and the beach including the beach pavilion and surf clubs and Arthur Byrne Reserve. These areas are continuously joined by open space and footpaths. Access from one to another is generally easy for able-bodied persons.

Areas which are potentially attractive to pedestrians such as McKeon Street shops, Broadarrow Reserve and John Shore Reserve are separated from each other, adjacent open space and public areas by roads. Pedestrian access is generally hampered, particularly between the McKeon Street shops and the beach where there is car/pedestrian conflict and change in level.

In addition, there is a traffic/pedestrian conflict in the main car parks because of the lack of defined access and circulation routes.

> Cycle Access

The Design Guidelines for Eastern Beaches recommends that beach areas be made accessible for cyclists. At present, it is possible to travel most of the proposed cycle path as set out in SREP No 14. However, cycle path extensions in Arthur Byrne Reserve will be needed to make the path system complete.

> Diver Access

Divers currently access the water near Mahon Pool.



Joel Ventry Memorial Park

Marion Road

Marion Road Amenities

Car Park

South Maroubra Surf Life Saving Club

Car Park

Bus Stop

Maroubra Surf Life Saving Club

Beach Pavilion

Car Park

Long Bay Rifle Range

LEGEND

PRIMARY ENTRANCES

SECONDARY ENTRANCES

VEHICULAR CIRCULATION

PEDESTRIAN CIRCULATION

John Shaw Reserve

Woodhouse Reserve

Arthur Byrne Reserve



MAROUBRA BEACH PLAN OF MANAGEMENT ACCESS

FIGURE 7

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL

The Department of Sport and Recreation has expressed a view that, although Maroubra Beach has rough, turbid water towards the beach, beyond the breakers there may be a good diving environment. To protect this sport, 'water quality must be regularly monitored and appropriate remedial measures implemented when required.

> **Water Access**

Water access is generally uninhibited. At times there may be conflict between board riders and swimmers but this is generally kept to a minimum by the use of defined areas.

Entering the water at times is restricted by rough surf, rips and bad weather conditions. Decisions to close the beach are made by the attending beach inspector.

> **Dogs**

There are concerns over the presence of dogs around the rockpool, the beach and reserves generally, particularly health hazards caused by excrement. All dogs should be kept on leads and appropriate signage and community education programmes implemented to ensure this policy is implemented.

> **Vehicle Access**

The majority of people who use the beach and reserves at Maroubra arrive by car. Vehicular access is good and leads to three main car parks as shown on Figure 7.

There is a large bus stop serving the Maroubra Beach area situated near the Maroubra Surf Life Saving Club. Two bus routes connect Maroubra Beach to the City - #377 via Randwick and #396 via Maroubra Junction and Anzac Parade. These buses run every 20 minutes and 15 minutes respectively during the day.

Buses terminate at Maroubra Beach in Marine Parade. Up to three or four buses may be parked simultaneously in front of the existing terminus building.

Vehicular access onto the beach by emergency, maintenance and life-saving club vehicles is provided immediately south of the Maroubra Surf Club and immediately south of the Pavillion.

> **Car Parks**

Four car parking areas are available for use.

1. Jack Vanny Reserve Carpark (200 cars).
2. North Maroubra Beach, Marine Parade Carpark.
3. Pavilion Carpark (250 cars).
4. South Maroubra Carpark (160 cars).

The existing car park layouts, particularly the Jack Vanny Reserve and South Maroubra car parks, are not well organised. Overflow parking at weekends is uncontrolled with excess cars alienating public spaces and destroying open space areas not suited to parking. As the beach is so long people use the car park associated with the area of beach they wish to use. This can mean a shortage of parking towards the south end of the beach whilst there is a surplus at the centre and at the northern end.

The Jack Vanny Reserve car park extends out close to the cliff at the northern headland and offers a clear uninterrupted 180° view over the ocean. This makes it very attractive to people who wish to park and enjoy the view from within their cars. Nevertheless the car park location, size and layout are inappropriate for such a visually prominent headland.

The amenity of all the car parks would be considerably enhanced by tree planting.

3.2.6. Services (Refer Figure 8)

Services within the site include the following.

- > A stormwater pipe is situated beneath Fitzgerald Avenue turning north under Marine Parade and then east to enter the ocean at the northern end of the beach. The outfall structure is a visually obtrusive element.
- > A second smaller drainage pipe exits the rock face where Jack Vanny Reserve meets the northern end of the beach proper. This pipe ends at the cliff face under Marine Parade and stormwater runoff flows over the beach from this point.
- > A third stormwater drain exits Long Bay Rifle Range at the southern end of Maroubra Beach. The runoff flows across the beach adjacent to the southern rockpool. This outflow drains an adjacent tip and may be hazardous to health. However further site investigation is required to confirm this.
- > Two more stormwater drains are situated near to the Mahon Rockpool. These pipes exit at the rockface and stormwater runoff then enters the ocean via channels cut into the rock. There have been many complaints from rockpool users about health hazards this runoff may cause.
- > A small bore water pumping station located at the eastern edge of the John Shore Reserve.
- > Irrigation lines situated in Arthur Byrne Reserve/and a disused pumphouse.



10001 Varsity Memorial Park

Maroon Park

Maroon Pond Amenities

Car Port

South Maroubra Surf Life Saving Club

Car Port

Bus Stop

Maroubra Surf Life Saving Club

Beach Pavilion

Car Port

Long Bay Rifle Range

LEGEND

-  STORM DRAINS
-  TRANSMISSION EASEMENTS
-  SEWAGE EASEMENT
-  SEWER PUMP STATION
-  WATER PUMP STATION
-  IRRIGATION LINES

MAROUBRA BEACH PLAN OF MANAGEMENT SERVICES

FIGURE 8

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995



-
- > An abandoned sewerage pumping station at the southern end of Arthur Byrne Reserve.
 - > A sewage line underneath Arthur Byrne Reserve. It runs from the corner of Broome and Fitzgerald Avenues entering Long Bay Rifle Range near the beach. The line enters the ocean at the southern headland, the outfall having been extended into deeper water in the last few years.
 - > Overhead electricity lines and lights are visually obtrusive in the Maroubra area, and criss-cross the site.

A number of other stormwater drains connect to the main beach outfall.

3.2.7. Recreational Usage

Current recreational usage of the study area consists of non-structured recreational activities (ie including walking, sunbathing, fishing, swimming, surfing, beach fossicking, picnicking, ball games, barbecues, and events organised by local clubs, schools and societies).

The various user groups are described below.

> Promenaders

Walkers are generally members of the local community and use the reserves and beach promenade for access between points of destination and for general exercise.

Promenading is a popular pastime at Maroubra Beach, the beach steps and walkway being used as vantage points. Many of those interviewed during the preparation of the 1978 Plan of Management commented on the role promenading and people-watching played in contributing to their "beach experience".

> Sightseers

Many people enjoy stopping at Maroubra Beach to take in the view of the bay and the ocean.

Cars tend to congregate at the northern car park and adjacent to Marine Parade where there is an elevated outlook over the ocean.

> Swimmers and Snorkellers

Many people use the bay for swimming. Because of the occasional rough surf and murky water conditions, snorkelling opportunities are more limited than at other local beaches.

Swimmers are restricted to certain zones at the beach although there is conflict with board riders.

> **Fishing and Shellfish Collectors**

Rock and beach fishing are popular recreational pursuits at Maroubra.

People have been seen collecting intertidal invertebrates at Maroubra Beach. Intertidal invertebrates in rock platform areas include octopuses, crabs, sea urchins, snails, limpets, chiton and cunjevoi.

The number of invertebrate stocks have been dangerously reduced along the Sydney coast through over harvesting. The NSW Fisheries Department has established bag limits for the collection of stock but has advised that Maroubra Beach is not a protected area and the collecting of marine life is not illegal. However the department would like to see such collecting controlled.

> **Board Riders**

Maroubra Beach is well-known for its excellent surf and attracts large numbers of board riders. Board riders are restricted to certain zones of the beach although conflict with swimmers remains management problem.

> **Picnickers and Ball Game Players**

The large expansions of sand and grass in the study area make it a popular destination for picnickers and ball game players.

> **Sunbathers**

As a complementary activity to surfing and swimming, sunbathing is a popular pastime among beach users at Maroubra. People tend to form clusters around the flagged areas and on the northern rocks and southern rock pool area.

> **Surf Life Saving Clubs**

There are two surf clubs; Maroubra Surf Life Saving Club and South Maroubra Surf Life Saving Club. They operate from their own substantial buildings situated at the centre and southern end of the beach respectively.

Maroubra Surf Life Saving Club has between 450 - 500 members. South Maroubra Surf Life Saving Club has 200 - 250 members but has a large number of younger members, about 300, in its Nipper Club.

The clubs provide a voluntary lifesaving function which supplements Council employed life - guards on Saturday and Sunday afternoons during the surfing season.

The consistent surf at Maroubra ensures that the clubs are frequent hosts of surf lifesaving carnivals. Local surf carnivals can attract over 2000 spectators and State carnivals over 15000 spectators.

The large beach area and reserves behind the southern and central zones of the beach provide considerable amenity for competitors and spectators.

> Other Organised Activities

A number of local clubs, societies and schools use the reserves for picnics and other outings.

3.2.8. Management Practices/Arrangements

> Limits of Responsibilities

The areas above the high water mark and extending to adjacent private property boundaries are owned either by Council or are Crown Land managed by Randwick City Council. These areas include the beach, recreation reserves, car parks, the beach pavilion and promenade, Mahon Rockpool and the roads and footpaths of the McKeon Street area.

The surf lifesaving clubs are situated on Council reserve land but are leased for extended periods. In accordance with the Crown Lands Act, 1989 maintenance and extensions to these buildings are usually carried out under grants and payments from Randwick City Council. The area below the high water mark is Crown Land and is under the care, control and management of Department of Land and Water Conservation.

> Maintenance

Maintenance of the beaches, reserves and associated buildings is carried out by the Council. Considerable sums of money are spent each year repairing vandalised toilets, waste bins, park furniture and removing general waste and litter.

Maroubra Maintenance Budgets for 1994/5

> Arthur Byrne Reserve	\$ 39,000 (\$65,000 1993/94)
> Maroubra Centre	\$ 13,900
> Maroubra Northpoint	\$ 26,000
> Broadarrow Reserve	\$ 9,000
> Beach cleaning and maintenance	\$125,000
> Pavilion cleaning and maintenance	\$ 60,000
> Mahon Pool cleaning and maintenance	\$ 6,000
> The Maroubra Beach Consultative Committee	

The Maroubra Beach Consultative Committee was formed to develop the plan of management along with Council and consultants, having a key role to play in the planning, general maintenance and development of the beach. The committee is chaired by the Mayor and its members include Councillors and local residents including the Maroubra Beach Precinct Committee actively involved in the community. The committee is in regular contact with Council.

> The Surf Clubs

The surf club buildings are maintained by Council and the clubs are given annual subsidies to carry out repairs and major works. The surf clubs lease their land for a nominal amount from Council.

3.2.9. Coastline Hazards Policy

The Coastline Hazards Policy is a NSW Government environmental document prepared by the Environment Protection Authority.

The primary objective of the Coastline Hazards Policy is to reduce the impact on and losses incurred by individual owners and occupiers of coastal lands as a consequence of coastal hazards.

hazards.

In applying the Coastal Hazards Policy, local government authorities are required to assess all planning development and building proposals on their merits. Social, economic, aesthetic, recreational and ecological factors need to be considered, as well as coastline hazards. In this way, appropriate development of coastal areas will not necessarily be prevented, but potentially inappropriate development will either be excluded from hazardous areas or be controlled in such a manner as to render it compatible with the dynamics of the marine environment.

Under the policy, legislation will permit rates to be reduced for land that cannot be developed because of its hazard exposure. The Government will also legislate to provide exculpation from liability to councils for decisions and advice provided on the basis of the coastline management principles set down in the Coastline Hazards Policy manual.

Implementation of the Coastline Hazards Policy by Local Government authorities involves the formulation and execution of coastline management plans. The policy requires that such plans should ensure that:

- > all reasonable measures are taken to avoid hazard and potential damage to existing properties and recreational amenity within the risk zone;
- > future development, works and activities in the coastal zone do not cause any significant or unacceptable growth in hazard or damage potential by adverse interaction with coastal processes;
- > the long term future protection and use of the coastline is provided for, as required by the NSW Government Coastal Policy;
- > land subject to coastline hazards is identified and managed in a manner compatible with the type, nature and damage potential of these hazards;
- > guidance is given to developers concerning issues and factors they should address when proposing development;
- > hazardous lands are managed to maximise the social, economic, aesthetic, recreational and ecological benefits to both individuals and the community, as well as taking into account hazard considerations and rights of private landowners;
- > information on the nature of existing and possible future hazards is made available to the public;

-
- > due regard is paid to community safety, health and welfare; and
 - > appropriate warning systems and contingency plans are available to minimise personal risk and to facilitate post-event recovery.

4.0. The Basis for Management

4.1. BACKGROUND

The management objectives for Maroubra Beach have been established following a review of the physical and cultural context of the study area, a review of relevant policy documents and the expressed needs and desires of the local community.

4.2. OBJECTIVES

The objectives of the management plan overview are:

- > to enhance the image of Maroubra Beach and to improve the public's use and enjoyment of its recreational assets;
- > to investigate and resolve all detrimental impacts on the existing environment of Maroubra Beach;
- > to provide an efficient, diverse, environmentally sustainable and socially responsive range of land uses over the site;
- > to facilitate the ongoing involvement of the local community in the planning, design and management of Maroubra Beach;
- > to recognise and capitalise upon those valuable intrinsic characteristics that make Maroubra Beach one of Sydney's most popular recreational assets whilst retaining an essentially local landscape and urban character;
- > to formulate an integrated development, management and administrative programme that responds to community needs and the requirements of Council, and
- > to protect and enhance areas of remnant vegetation and other valuable natural resources and to integrate them with land uses as the essential backdrop to the existing and proposed development of Maroubra Beach.

4.3. CONSULTATIVE PROCESS

During July and October 1994 a consultative process was undertaken involving meetings and general liaison with individuals and organisations interested in the future of Maroubra Beach.

The consultative process included:

- > a site tour with the Maroubra Beach Consultative Committee;

-
- > briefing meetings with key Council personnel including Parks Manager, Works Manager, Landscape Architect, Recreation Assets Manager and Community Services Manager.
 - > public advertisement and call for submissions;
 - > a letter box drop questionnaire (refer Appendix 2); and
 - > correspondence and liaison with a wide range of Government authorities.

The purpose of this consultative process was to thoroughly document the planning, development and management issues associated with Maroubra Beach that are of concern to the key stakeholders.

> **Community Questionnaire**

The principal findings of the questionnaire were as follows:

- > Most respondents visit Maroubra Beach on a daily basis for non-structured activities, such as walking, swimming, relaxing, surfing, sunbaking, running and jogging.
- > Responses such as, "its great open feeling", "its naturalness" and "a feeling of being unspoilt by progress" rated highly when people stated what they like about the beach.
- > The state of McKeon Street shops was a main concern of the respondents followed by the general run down and neglected feeling of the beach area. Major improvements people would like to see involved the upgrading of the local shops, the planting of trees, keeping the area clean and general improvements to the promenade.
- > Most respondents felt there was adequate access to the beach. However, many people expressed the need for a better quality of access including ramps for prams and disabled people, pedestrian crossings to the beach and traffic calming measures.
- > Respondents felt there should be more facilities for the youth of the area. The most popular suggestions were children's playgrounds, a skateboard park and picnic and barbecue facilities together with a bicycle track and handball/volleyball courts.
- > Respondents felt that the beach and streetscape could be improved by the addition of trees and by the upgrading and creation of footpaths and walkways. However, people wanted the area to retain its semi-natural character.
- > The majority of respondents requested the improvement of the McKeon Street shops and the hotel, possibly with the addition of outdoor cafes and roadside eateries.

-
- > Parking in summer was seen as a problem to most respondents, suggestions ranging from "build more car parks," to "planting trees in existing car parks for shade".
 - > Health and safety concerns at the beach centred on the problem of the main stormwater outlet, although rubbish and the general untidiness of the beach were also cited as important issues.
 - > Needles from drug users and broken glass in the sand from drug addicts and drinkers from the Maroubra Bay Hotel were seen as a problem and policing was seen as a way of controlling it.
 - > **Consultation with Authorities**

Numerous government authorities were contacted to provide information concerning existing and past management practices and the identification of development and management issues. A list of the authorities consulted, a copy of the letter of invitation to comment and the responses received are appended (Refer Appendix 3).

4.4. MANAGEMENT ISSUES

The long term development and management of Maroubra Beach will require the resolution of a number of issues. These are:

4.4.1. Image, Amenity and Safety

Despite the beach's renown as a surfing and swimming beach the remainder of the study area offers little amenity to the public. The major viewing areas are in fact the car parks along Marine Parade and there is little shade or shelter.

Maroubra Beach possesses an atmosphere of tired neglect. Nestled between two semi-natural headlands, the beach and adjacent urban fringe are part of a vast basin some 1 km in length and with a broad residential hinterland to the west. This imposing physical setting is marked by a disjointed collection of urban elements at the base of the amphitheatre; buildings of disparate form and condition, broad windswept pavements, and a wide and potentially dangerous road reserve.

The large open space areas are undeveloped and there are only a few commercial or retail outlets providing a limited range of services and products for beach users and the local community.

The large public areas serve as spaces through which people must pass to either reach the beach or the shops, depending upon their direction of travel. There is no stimulus to pause, rest and reflect, nor devices to integrate the beach with the urban zone. There is, in effect, a void or zone of lost opportunity between the commercial zone and the edge of the beach.

The general ambience of neglect, the inappropriate design of public spaces, the unemployed youth and the absence of alternative forms of recreation also contribute to problems of social conflict and personal safety.

4.4.2. Land Use

The study area is characterised by ineffective utilisation of the available land area. Vast areas of Maroubra Beach are used infrequently (Arthur Byrne Reserve, Jack Vanny Memorial Park), offer little amenity and are largely undeveloped whereas others (Marine Parade/McKeon Street and promenade) are intensively used and are frequently sources of conflict between users.

In addition, areas of the site are mono-functional, ie. they lack a diversity of uses and therefore tend to be frequented by a single or a limited range of user groups (eg. Arthur Byrne Reserve, southern beach area).

4.4.3. Access and Circulation

The irregular external spaces, disjointed built form, absence of quality landscape and predominance of the motor vehicle create an environment which is confused and unsafe. There is no recognisable urban structure to tie the various elements together and both pedestrians and vehicles tend to move around the site in an uncontrolled manner or else use desire lines across 'no mans land' to reach points of destination. These haphazard circulation movements not only result in vehicular/pedestrian conflict, and disturbance of landscaped areas but also contribute to visual clutter.

Other sections of the study area including Jack Vanny Memorial Reserve have no apparent function. The amenities and toilet block in this reserve are visually obtrusive and the parking arrangements are irregular and poorly defined. It will be important to ensure that the visual amenity of local residents in Marine Parade is not compromised.

However, these spaces present a great opportunity to provide new access for public recreation, habitat enhancement and recreation facilities as well as catering more adequately for existing users such as rock fishermen and swimmers.

4.4.4. Conservation of Natural Resources

Little of the area's original landscape remains. The cliffs and rock platforms of the northern headland remain of great scenic and recreational value and also provide important habitat. Over 20 indigenous species, mostly herbs, sedges and grasses, survive on and adjacent to rock outcrops in Jack Vanny Memorial Reserve. Soil compaction and erosion threaten their survival.

Dune stabilisation works have occurred on the southern beach. Small remnants survive on sand tracks at the far south end and other indigenous species are colonising the planted area from neighbouring remnants. The area is still subject to considerable pressure from adjacent land uses.

4.4.5. Pollution

The topography of the study area makes the beach a natural repository for all manner of water borne pollution and wind blown litter.

The stormwater outfalls and surface drainage system discharge particulate, gross and chemical pollutants on to the beach from a very large catchment area that extends well beyond the study boundaries. There are no mechanisms in place to collect, detain or treat such pollutants.

Locally generated pollutants such as dog excrement and litter are a source of considerable nuisance to local residents and detract from the image of Maroubra Beach for tourists of regional, national or international origin.

4.4.6. Administration and Management

Whilst Randwick Council is responsible for the administration and management of Maroubra Beach and has an expressed desire to see the area improved, it has not been able to commit the physical and economic resources that would lead to the enhancement of the area and subsequently to the maintenance of high levels of public amenity.

In recent years the annual maintenance budget allocations have been reduced.

4.4.7. Structures

The three major buildings located on the edge of the beach are visually obtrusive. Their size, considerable mass and generally poor relationship to adjacent uses create barriers to movement and views between the beach and the hinterland.

The buildings and associated clubs provide a duplication of function that leads to a waste of human, financial and physical resources.

5.0. Policy

The following policies are recommended for Maroubra Beach. Guidelines which illustrate the application of these policies for the specific areas of Maroubra Beach are outlined in Section 6.

5.1. IMAGE, AMENITY AND SAFETY

5.1.1. Desired Outcome

The development of a resource that engenders community pride and ownership and which has outstanding design quality and public amenity.

5.1.2. Policies

- (a) Recreate the original landscape character of the northern and southern limits of the study area where appropriate eg. Jack Vanny Reserve and sand dunes.
- (b) Develop an urban focus and meeting space in the heart of Maroubra Beach as a commercial space for public events.
- (c) Promote a strong design ethic and a commitment to the use of quality materials and finishes.
- (d) Maintain and enhance water views for residents, shoppers, park users, tourists and club members etc.
- (e) Redevelop the streetscape to provide an attractive backdrop from the beach and reserve areas and reduce the visual impact of buildings and other structures.
- (f) Investigate the feasibility of removing exposed and unsightly infrastructure and utilities.
- (g) Provide continuously clean and safe pavements and beach sand.
- (h) Increase the number and improve the distribution of quality street furniture, toilet facilities and kiosks.
- (i) Reduce the adverse visual impact of roads, car parks and service areas.
- (j) Improve pedestrian and driver safety.
- (k) Reduce fire hazard.

-
- (l) Reduce the potential for public safety risks, promote surveillance over the public domain and remove existing visual barriers.
 - (m) Repair/refurbish neglected facilities.
 - (n) Repair vandalism immediately.
 - (o) Promote public involvement in the planning, design and management of the beach.
 - (p) Ensure that adequate sight distances are maintained on all trails, roads and car parks.
 - (q) Eliminate dangerous practices, elements and obstacles.

5.1.3. Performance Measures

- (a) Improved community attitudes to the quality, amenity and safety of Maroubra Beach as measured by periodic survey analysis.
- (b) Removal of unsightly and unsafe structures, infrastructure and utility services.
- (c) Provision of new furniture, toilet facilities, kiosks and landscaping.
- (d) Reduced incidence of traffic accidents, assault and vandalism.
- (e) Development of a range of community based events and activities and increased community interest in events and planning.

5.2. LAND USE

5.2.1. Desired Outcome

The effective utilisation of the recreational and commercial areas of Maroubra Beach which respond to and satisfy community needs and wants.

5.2.2. Policies

- (a) Provide more effective utilisation of the large area of available land at sites such as Jack Vanny Reserve, and Arthur Byrne Reserve.
- (b) Retain and protect Mahon Pool as a recreational resource.

-
- (d) Integrate the use of adjacent areas to promote physical and visual continuity/hierarchy.
 - (e) Provide a greater diversity of uses to cater for a wide cross section of the community, especially youth.
 - (f) Provide a more effective distribution of land uses throughout the study area.
 - (g) Maintain and enhance existing recreational opportunities.
 - (h) Consider the rationalisation of parking facilities based on traffic and demand analysis providing permanent hard paved areas for constant demand and overflow grassed areas for low frequency peak demand.
 - (i) Endeavour to improve the viability of the commercial precinct and SLSC clubhouses.
 - (j) Allocate land uses commensurate with the capacity of the land to accommodate those uses.
 - (k) Prohibit further building development (except public toilets/kiosks) in the beach and promenade areas ie. all areas east of Marine Parade.
 - (l) Initiate a comprehensive urban design strategy to establish guidelines for controlled and appropriate redevelopment of the commercial precinct to improve its economic vitality, and offer greater public amenity whilst retaining the local character of Maroubra Beach.

5.2.3. Performance Measures

- (a) Increased diversity of land uses.
- (b) Improved environmental qualities
- (c) Absence of additional building development in beach and promenade areas.
- (d) Increased construction and commercial activity in the commercial precinct.
- (e) Increased community involvement in planning, design and management issues.

5.3. ACCESS AND CIRCULATION

5.3.1. Desired Outcome

The development of a legible and robust system of pedestrian and vehicular circulation.

5.3.2. Policies

- (a) Promote ease of access from adjacent residential, commercial and recreational areas to the beach and waterfront.
- (b) Facilitate access to the beach for all, especially the elderly and disabled.
- (c) Provide a continuous north-south pedestrian route along the length of the study area east of Marine Parade and integrate with the coastal walk.
- (d) Rationalise on-street and off-street parking arrangements.
- (e) Reduce vehicular and pedestrian conflict.
- (f) Provide improved access to existing buildings.
- (g) Provide emergency access capability to all areas.
- (h) Avoid trail construction within 15 metres of the cliff face and which may damage sensitive communities.
- (i) Prohibit vehicular access to the beach, promenade and reserve except for emergency and maintenance purposes.
- (j) Investigate the feasibility of relocating the bus terminus to Mons Avenue or other alternative site.

5.3.3. Performance Measures

- (a) Greater utilisation of northern and southern areas by local residents and tourists as measured by survey analysis.
- (b) Greater spread of land uses across the site.
- (c) Reduced area of hard pavement for car parking in conjunction with increased overflow parking.
- (d) Reduction in the incidence of weeds.
- (e) Improved public awareness of natural systems and responsibility for the landscape as measured by community survey analysis.

5.4. CONSERVATION OF NATURAL RESOURCES

5.4.1. Desired Outcome

The immediate commencement of natural habitat enhancement and their long term conservation and interpretation.

5.4.2. Policies

- (a) Prohibit removal of, damage to, or destruction of existing natural resources such as rock platforms and sand dunes.
- (b) Promote an understanding of the value of natural systems and resources through interpretation of existing landscape and habitat.
- (c) Rehabilitate disturbed areas of natural habitat and progressively reinstate additional areas of indigenous vegetation.
- (d) Maintain regular liaison with relevant government and resident groups with an interest in the protection of the environment of Maroubra Beach (e.g. Department of Land and Water Conservation, EPA, Fisheries etc.).
- (e) Monitor public use of all natural areas and take immediate remedial measures when adverse impacts become apparent.
- (f) Progressively eliminate all weeds and pests.
- (g) Rehabilitate disturbed areas using indigenous plants. Avoid the use of non- local species except in urban areas (eg. promenade, commercial zones).
- (h) Establish an ongoing monitoring programme for key environmental criteria.

5.4.3. Performance Measures

- (a) Maintain the existing area of remnant vegetation as measured by ecological survey.
- (b) Maintain or increase the area of revegetated/planted habitats.
- (c) Maintain or increase species richness without species losses as measured by ecological survey.

5.5. POLLUTION

5.5.1. Desired Outcome

The minimisation of all forms of pollution within the study area.

5.5.2 Policies

- (a) Reduce potential for chemical pollution from Mahon Pool and investigate alternative pool cleaning systems/ procedures.
- (b) Reduce sewer overflow and stormwater pollution of reserve and beach areas.
- (c) Increase the quality, size and distribution of litter bins and increase the frequency of litter collection.
- (d) Investigate and eliminate local sources of pollutants.
- (e) Implement community education programmes and enforce administration and management procedures to control the problem of dog excrement.

5.5.3. Performance Measures

- (a) Reduced incidence of marine and terrestrial pollution as measured by:
 - chemical analysis of water samples;
 - visual appraisal of beach condition (i.e. state of cleanliness/pollution);
 - volume of waste collected on beach and promenade areas.

5.6. ADMINISTRATION AND MANAGEMENT

5.6.1. Desired Outcome

The preparation of a sustainable, long term development and management strategy that will maintain community and political commitment.

5.6.2. Policy

- (a) Establish and maintain adequate financial and physical resources to effectively manage the Maroubra Beach area.

-
- (b) Document the responsibilities of all parties involved in beach management and ensure commitment to and implementation of those responsibilities.
 - (c) Continue the role of consultation through the Maroubra Beach Precinct Committee under Section 377 of the Local Government Act 1993 as the body that oversees the long term planning, design and management of the beach.
 - (d) Prohibit further alienation of public open space e.g. by restricting the granting of licences/ leases over public land.
 - (e) Increase the level of beach surveillance/patrol to improve public safety and reduce surfer/swimmer conflict.

5.6.3. Performance Measures

- (a) Increased annual maintenance and minor works budgets.
- (b) Increased number of personnel dedicated to Maroubra Beach management issues.
- (c) Increased level of public interest in the role of the Precinct Committee.
- (d) Improved public opinion on the quality and vitality of Maroubra Beach as measured by survey analysis.

5.7. INFRASTRUCTURE

5.7.1. Desired Outcome

The provision of infrastructure and utility services that meet community needs, and are attractive, safe, economically efficient and environmentally sustainable.

5.7.2. Policy

- (a) Reduce the visual impact of the existing buildings (clubhouses, pavilion and toilets) by extensive landscape enhancement and renovation of the building facades.
- (b) Refurbish and upgrade the facilities of all buildings to achieve adequate public amenity and in accordance with the Building Codes of Australia.
- (c) Investigate the feasibility of placing overhead powerlines underground, relocating stormwater outfalls on the beach, reconstructing the existing stormwater disposal pipes and providing on site stormwater detention and water quality controls.

-
- (d) Reduce the area of the site devoted to roads.

5.7.3. Performance Measures

- (a) Removal of existing unsightly, unsafe structures.
- (b) Establishment of an integrated stormwater strategy.

6.0. Management Zones and Guidelines

6.1. STATEMENT OF INTENT

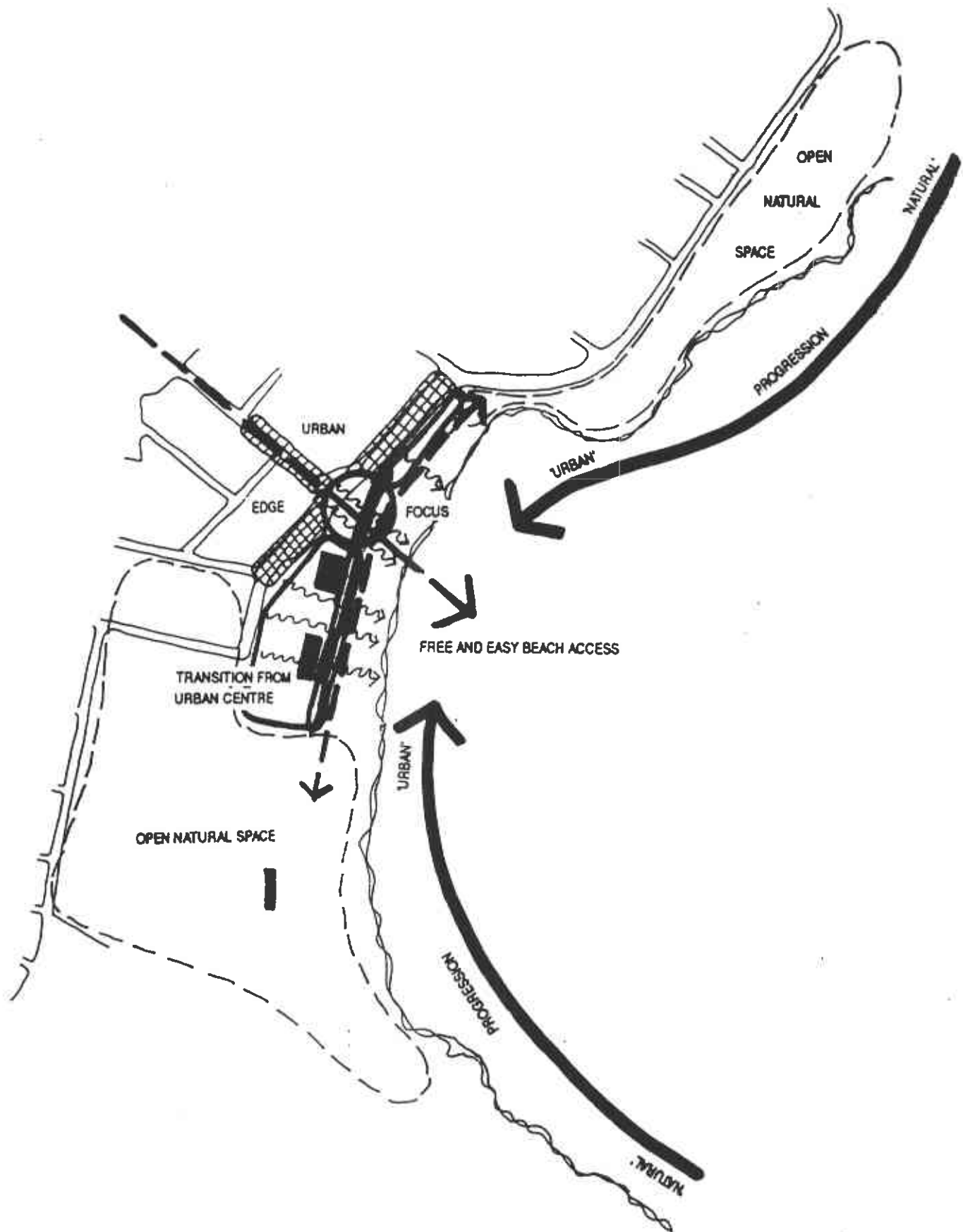
The future development of Maroubra Beach should be based upon the following principles. These are conceptually illustrated in Figure 9.

- > Development of a social, recreational, commercial and visual focus centred on the area around the Marine Parade/McKeon Street intersection.
- > The waterfront area should be characterised by a progression of form from natural, freeform elements in the far north and south of the study area moving to more intensive urban forms and structures towards the central focus or node.
- > The enhancement of the Marine Parade/McKeon Street retail precinct as a distinctive urban edge. This urban edge should include adjacent residential development to the west and provide a backdrop to the public domain and beach front promenade to the east.
- > Provide a mechanism for the ongoing involvement of the local community in the planning, design and management of Maroubra Beach through public surveys, workshops, public meetings, community art projects etc. Particular attention should be given to the provision of facilities for local youth.
- > Access to the beach from the hinterland should be unimpeded, facilitating visual and physical access by all user groups.
- > The substantial areas between the beach and builtup area should be developed with a range of structured and unstructured recreational and community oriented land uses that both activate and control these spaces.

6.2. MANAGEMENT ZONES

The study area has been divided into a number of discrete zones as a means of facilitating the implementation of future management initiatives.

The delineation of these management zones is shown in Figure 10 and has been undertaken on the basis of the distinct variations in land use, morphology, character and management regimes.



MAROUBRA BEACH PLAN OF MANAGEMENT

DESIGN PRINCIPLES

FIGURE 9

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995



Jack Vanny Memorial Park

Marine Park

Marine Park Amenities

Car Park

South Maroubra Surf Life Saving Club

Car Park

Bus Stop

Maroubra Surf Life Saving Club

Beach Pavilion

Car Park

Long Bay Rifle Range

LEGEND

- NORTHERN HEADLAND
- BEACH
- PROMENADE AND PLAZA
- COMMERCIAL STREETSCAPE
- WESTERN RECREATIONAL RESERVES
- SOUTHERN DUNES

John Shaw Reserve

Goodenough Reserve

Arthur Syme Reserve

MAROUBRA BEACH PLAN OF MANAGEMENT MANAGEMENT ZONES

FIGURE 10

PREPARED FOR RANDOWICK CITY COUNCIL

BY HASSELL

AUGUST 1995



Six management zones have been allocated over the study area. They encompass the following areas:

- Zone 1 - The Northern Headland - Jack Vanny Reserve, including sandstone cliffs, Mahon Pool and amenities, and northern car park.
- Zone 2 - Beach - the area of clear sand between the mean high water mark and the sea wall/promenade or frontal dunes to the south.
- Zone 3 - The Promenade and Plaza - the central zone comprising the major public walkways, buildings, landscaped areas and central car park between the beach and Marine Parade.
- Zone 4 - Commercial - the retail shopping area of McKeon Street and Marine Parade including the associated carriageways and bus interchange.
- Zone 5 - Western Recreation Reserves - comprising John Shore Reserve, Broadarrow Reserve and Arthur Byrne Reserve including associated streetscape areas.
- Zone 6 - Southern Dunes - including the South Maroubra Surf Life Saving Club.

6.3. MANAGEMENT PHILOSOPHY

The key management philosophies for each zone are as follows:

- Zone 1 - The Northern Headland - reinstate heathland communities in association with unstructured recreation zones and facilitate greater public access and usage.
- Zone 2 - Beach - maintain its pre-eminent position as one of Sydney's greatest recreational assets but improve public amenity and safety.
- Zone 3 - The Promenade and Plaza - develop this zone as a major community focus, and a meeting and events space with strong physical and visual integration with the beach and commercial zones.
- Zone 4 - Commercial - revitalise the commercial centre, encourage development within pre-determined limits and provide improved levels of public amenity and safety.
- Zone 5 - Western Recreation Reserves - develop these reserves as substantial community assets for structured and unstructured recreation and utilise the large available land area for possible stormwater detention and water quality enhancement.

Zone 6 - Southern Dunes - retain and protect the existing dunes with only minor, strictly controlled incursion for beach access and recreational areas associated with the South Maroubra SLSC.

6.4. SCHEDULING OF LAND

Subject to the findings of a complete plan of management it would be appropriate to designate the public land covered by the study area as "Community" land in accordance with the Local Government Act, 1993.

6.5. POLICY INITIATIVES AND GUIDELINES

The following policy initiatives and guidelines are the recommended actions required to implement the development and management policies for each zone. (Refer Table 1 and 2).

Wherever possible the guidelines are illustrated and an opinion of probable capital cost given with associated priority for implementation. The organisations most likely to be responsible for the initiation and/or implementation of the activity are indicated as required.

It must be stressed that:

- (a) the recommended guidelines are based upon the results of this overview study only and further detailed research, design and policy formulation will be required in several key areas;
- (b) the opinions of probable cost are preliminary budget allowances only based on broad assumptions. They have not been based upon any detailed design, site survey or specialist investigations. It is too early at this stage to estimate recurrent costs;
- (c) the provisional priorities list is based upon preliminary assessment of Council aspirations and feedback gained during the preparation of this study; and
- (d) no attempt has been made to estimate budget allocations for costs in excess of \$250,000.00. The opinions of probable cost should be used only as an indication of the order of magnitude of likely costs.

Priority	Description	Timing
A ¹	Immediate Action - urgent	0 - 3 months
A ²	Immediate Action - as soon as possible	0-12 months
B	Short Term Action	1-2 years
C	Medium Term	2-5 years
D	Long Term	5 years+

RESPONSIBILITIES KEY

RCC	-	Randwick City Council.
STA	-	State Transit Authority.
SE	-	Sydney Electricity.
SW	-	Sydney Water.
SMSLSC	-	South Maroubra Surf Life Saving Club.
MSLSC	-	Maroubra Surf Life Saving Club.
DLWC	-	Department of Land and Water Conservation.

TABLE 1 - POLICY INITIATIVES AND SPECIALIST STUDIES

Strategic Policy Initiatives and Specialist Studies		Provisional Budget Allowance	Priority	Responsibilities
1.	Commercial Precinct Urban Design Strategy and Development Control Plan - desired future character, built form - development potential and FSR - beach and promenade master plan - heritage - traffic and parking - streetscape, public domain, public art programme - economic appraisal - youth facilities plan.	To be determined	A ²	RCC/key land owners
2.	Community Consultation Programme - public exhibitions - community forums - surveys - newsletters - design workshops - public open days.	To be determined	A1	RCC
3.	Hydraulic Study - geotechnical appraisal of potential wetlands - risk assessment, storm wave impact - flood mitigation - remedial works, stormwater outfall diversion and pipeline reconstruction - pollution control strategy e.g. Mahon Pool, litter collection, rifle range leachate.	To be determined	A2	RCC/SW
4.	Ecological Assessment - flora and fauna survey assessments incl. fire hazard	To be determined	A1	RCC

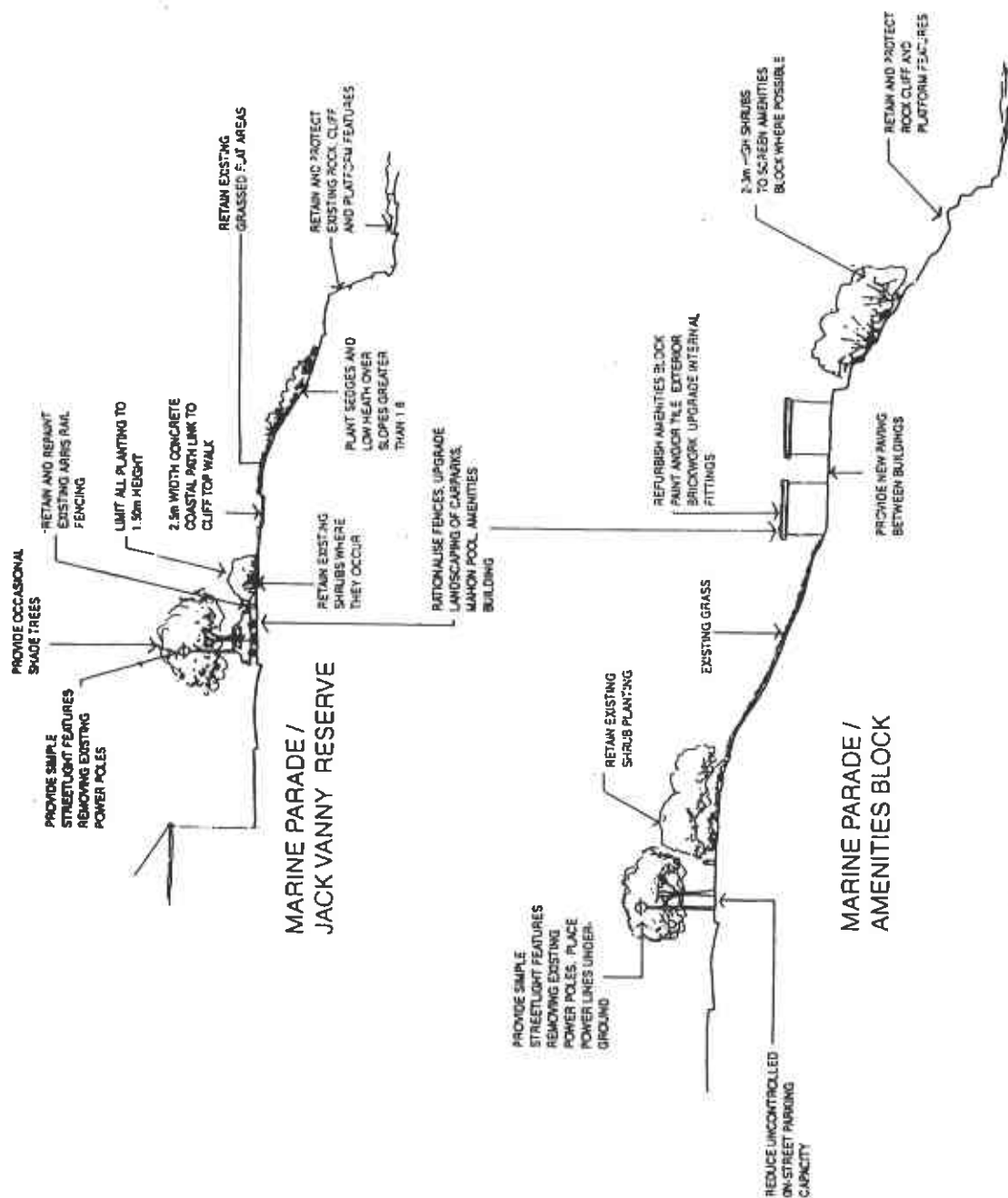
TABLE 1 - POLICY INITIATIVES AND SPECIALIST STUDIES - Cont.....

Strategic Policy Initiatives and Specialist Studies		Provisional Budget Allowance	Priority	Responsibilities
5.	Bus Terminus Relocation Study	To be determined	A ²	RCC/STA
6.	Engineering Survey and Infrastructure Relocation Appraisal	To be determined	A ²	RCC
	- topographic, cadastral, boundary and services survey - power/lighting relocation/undergrounding assessment.			
7.	Reappraisal of Capital and Recurrent Works Budgets			
8.	Reappraisal of Human Resources Allocation	--	A ²	RCC
9.	Review Public Health and Safety Procedures/Practices	--	A ²	RCC
	- Assess public risk and implement appropriate insurances (e.g. cliff top walk) - Develop and implement dog excrement strategy - Upgrade footpaths and signage generally - Upgrade beach cleaning, inspection resources and practices	tba	A ¹	RCC
		tba	A ¹	RCC
		tba	A ¹	RCC
		tba	A ¹	RCC
10.*	Implement comprehensive weed eradication programme.	tba	A ²	RCC
11.*	Maintain and enhance beach dune conservation zone and initiate dune care programme.	tba	A ²	RCC
12.	Implement public health and safety audit - Maroubra Beach Hotel	tba	A ¹	RCC
13.	Review requirements for environmental impact assessment and development approvals.	tba	A ²	RCC
14.	Confirm funding and revenue policies - e.g. application of revenue generated by beach facilities.	tba	A ¹	RCC

* Council to provide seed funding and promotional initiatives to assist community groups, schools and special interest groups.

TABLE 2 - DEVELOPMENT AND MANAGEMENT GUIDELINES

Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 1.	Northern Headland (Refer Figure 11)	1.1 Provide unstructured recreation facilities including children's play area in Jack Vanny Reserve.	\$50,000.00	C	RCC
		1.2 Create heath, sedge and native grassland in lieu of introduced grass (<1.5m).	\$100,000.00	A ¹	RCC
		1.3 Coastal Walk construction including interpretive signage and possible linkages to Coogee Beach, Clovelly, Botany Bay and Yarra Bay.	\$50,000.00	A ¹	RCC/Community
		1.4 Mahon Pool - reconstructed stairs. - refurbish amenities. - paving to amenities. - landscape below and around amenities. - resolve chemical usage/slippery steps. - upgrade cleaning programme.	\$5,000.00	A ¹	RCC
			\$20,000.00	A ¹	RCC
			\$15,000.00	A ¹	RCC
			\$10,000.00	A ¹	RCC
			recurrent	A ¹	RCC
			recurrent	A ²	RCC
		1.5 Rationalise parking bays/barriers and fencing and implement new landscaping including refurbishment of toilet facilities.	\$100,00.00	A ¹	RCC
		1.6 Implement alternative streetscape development and investigate sites for relocation of Norfolk Island Pines.	\$50,000.00	A ¹	RCC
		1.7 Remove overhead power lines and place underground or bundle cables.	tba	D	RCC/SE
		1.8 Repair and mask existing stormwater trench.	\$10,000.00	C	RCC
		1.9 Replace furniture and upgrade.	\$10,000.00	C	RCC
		1.10 Implement weed eradication programme.	recurrent	A ²	RCC



MAROUBRA BEACH PLAN OF MANAGEMENT

ZONE 1
NORTHERN HEADLAND
TYPICAL SECTIONS

FIGURE 11

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL

Cliff-top Walk

- provide interpretive walk and possible future connection to Eastern Suburbs cliff-top coastal trail for walkers and joggers.
- provide interpretive signage.

Jack Vanny Memorial Park

- remove localised weeds and replant with desirable natives and coastal vegetation.

Mahon Pool

- reconstruct existing stairways and balustrades to improve public safety.
- repair existing stormwater trench. Mask with artificial rockwork.

Marine Parade

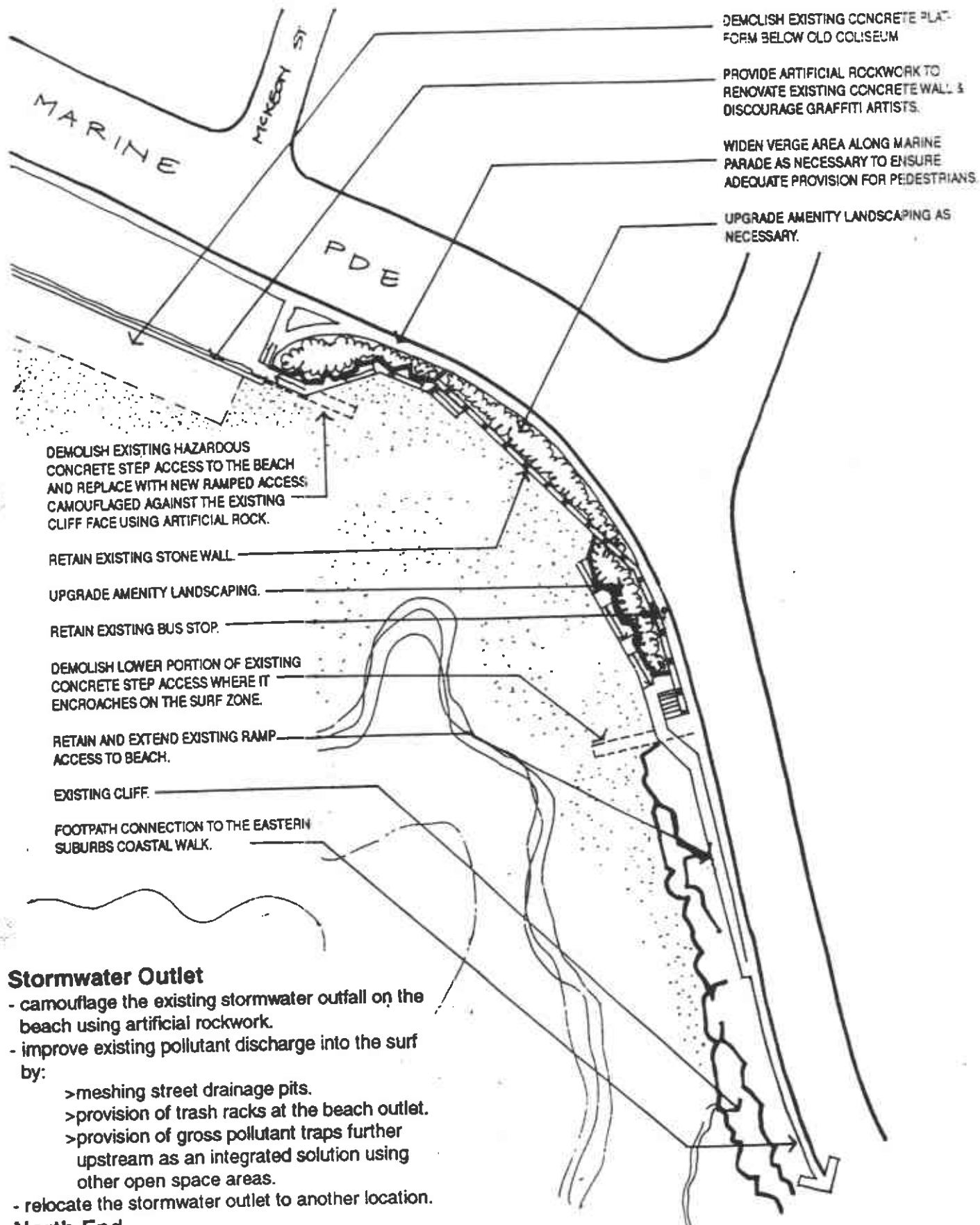
- install power lines underground and replace with attractive street light features.
- provide aris rail fencing throughout as a single design feature (low, one colour).
- provide upgraded furniture and co-ordinated signage.
- redefine on street 90° angle car parking, maintain existing emergency vehicle access.
- plant small trees on park side, spaced between existing buildings to maintain existing views.

Large Carpark

- replace degraded grass with colourful groundcover planting.
- provide new fencing to match above.
- remove weeds above cliff and replant with desirable coastal vegetation.
- upgrade and augment furniture.
- replace concrete planting bed edges with sandstone.
- provide screen shrub planting (1.5-2m) in the verge.

TABLE 2 - DEVELOPMENT AND MANAGEMENT GUIDELINES - Cont.....

Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 2.	Beach (Refer Figure 12)	2.1 Divert or reconstruct stormwater outlets.	\$250,000.00 +	B	RCC
		2.2 Implement comprehensive pollution minimisation strategy - GPT's, trash rack etc.	\$250,000.00	B	RCC
		2.3 Reconstruct access to Maroubra Beach north (x2), new ramps, viewing area and stairs.	\$150,000.00	C	RCC
		2.4 Remove graffiti from seawall and investigate feasibility of community arts programme for wall mural.	\$10,000.00	C	RCC
		2.5 Remove existing litter bins and replace with attractive and durable furniture. Increase number of bins.	\$20,000.00	A'	RCC
		2.6 Investigate feasibility of demolishing base of colosseum pad and reinstate beach sand.	\$20,000.00	C	RCC
		2.7 Provide additional spring loaded beach showers.	\$5,000.00	A'	RCC
		2.8 Upgrade disabled access provisions at southern end of beach and promenade.	\$10,000.00	B	RCC
		2.9 Provide small paved forecourt to each and west of SMSLSC.	\$40,000.00	C	SMSLSC
		2.10 Investigate feasibility of rehabilitation of southern rockpool.	\$1,000.00	C	RCC
		2.11 Provide flags and life guards at Northern end of Maroubra Beach.	\$10,000.00	A'	RCC
		2.12 Investigate purchase of improved beach cleaning machine.	--	A'	RCC
		2.13 Council to investigate opening hours of South Maroubra Surf Club and consider restriction on hours of use.	--	A ²	RCC
		2.14 Establish beach volleyball courts on the sand near the pavilion.	--	A ²	RCC



Stormwater Outlet

- camouflage the existing stormwater outfall on the beach using artificial rockwork.
- improve existing pollutant discharge into the surf by:
 - > meshing street drainage pits.
 - > provision of trash racks at the beach outlet.
 - > provision of gross pollutant traps further upstream as an integrated solution using other open space areas.
- relocate the stormwater outlet to another location.

North End

- clean graffiti from the wall of the old 'Coliseum'.
- provide additional litter bins.
- remove steps above the 'Coliseum' and plant above or camouflage with artificial rockwork.
- remove existing weeds (Bitou Bush) and replant with desirable coastal vegetation.
- locate additional shower points.
- provide disabled access to the southern end of the eastern promenade and re-grade the existing ramp outside the SLSC suitable for disabled

MAROUBRA BEACH

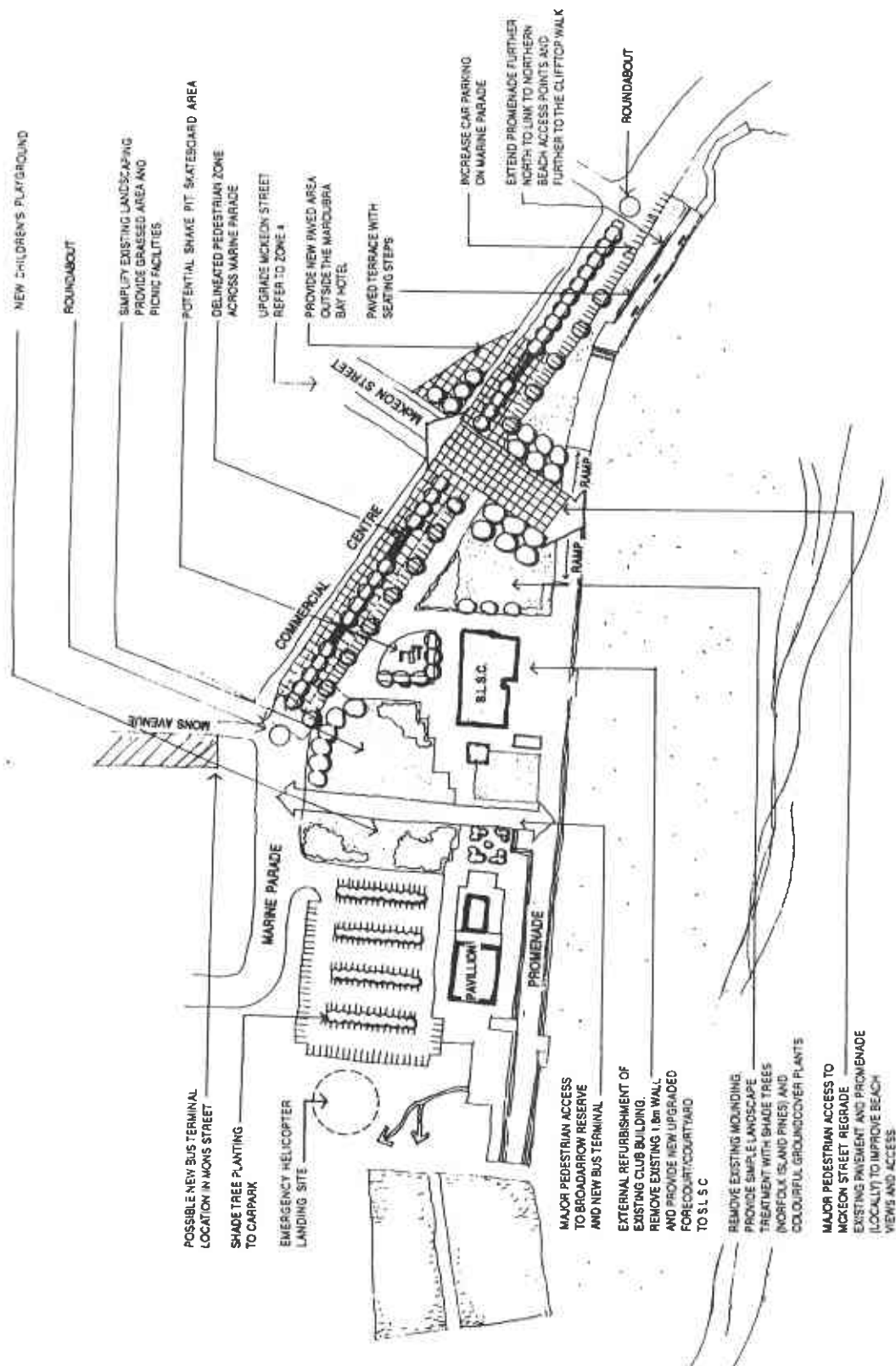
PLAN OF MANAGEMENT

ZONE 2
BEACH
ACCESS NORTHERN END

FIGURE 12

TABLE 2 - DEVELOPMENT AND MANAGEMENT GUIDELINES - Cont.....

Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 3	Promenade and Plaza (Refer Figure 13)	3.1 Extend north/south and east/west pedestrian and cyclist routes and eliminate physical and visual barriers.	\$50,000.00	B	RCC
		3.2 Provide additional recreation facilities and extend plaza area to west.	\$350,000.00		RCC
		- playgrounds. - snake pit, skatebowl, rollerblade circuit. - half pipe ramp. - street skate track. - skatebowl. - multi-purpose courts (basketball, netball etc.) - picnic areas. - shelters. - shade trees. - community art project.		A ² A ¹ B B B A ¹ B B	
		3.3 Re-configure car park to improve circulation, reduce asphalt area, provide shade, increase on road parking to Mons Avenue and Fitzgerald Avenue.	\$80,000.00	B	RCC
		3.4 Renovate Maroubra SLSC by painting and general external upgrade. Investigate feasibility of incorporating public toilet facilities in SLSC.	\$80,000.00	C	MSLSC
		3.5 Investigate feasibility of removing existing walls to promenade and development promenade forecourt.	\$50,000.00	B	RCC
		3.6 Construct east/west pedestrian link between Marine Parade and promenade.	\$50,000.00	B	RCC
		3.7 Develop nodal zone/plaza by lowering promenade, constructing beach terraces and removing mounding and shrub planting. Use shade trees (Norfolk Island Pines).	\$250,000.00+	B	RCC



Promenade

- upgrade the promenade:

- > provide simple coloured tile or paving inset edges and banding
- > highlight the existing 'kerb' above the beach wall by simple tiling or paving
- > provide a co-ordinated furniture range and upgrade lighting features

- consider the promenade to be an extension of the coastal walk link

Access to McKeon Street

- extend existing step access to the beach
- opportunity to add kiosk, toilets, shower points

Plaza Area

- relocate bus terminal
- provide picnic facilities and generally upgrade furniture provision
- provide shower points

Marine Parade

- provide planted central median with formal street tree and coloured groundcover planting



MAROUBRA BEACH PLAN OF MANAGEMENT

ZONE 3 AND ZONE 4
PROMENADE AND PLAZA
AND COMMERCIAL STREETSCAPE

FIGURE 13

SCALE 1:2000

PREPARED FOR: RANDWICK CITY COUNCIL
BY: HASSELL

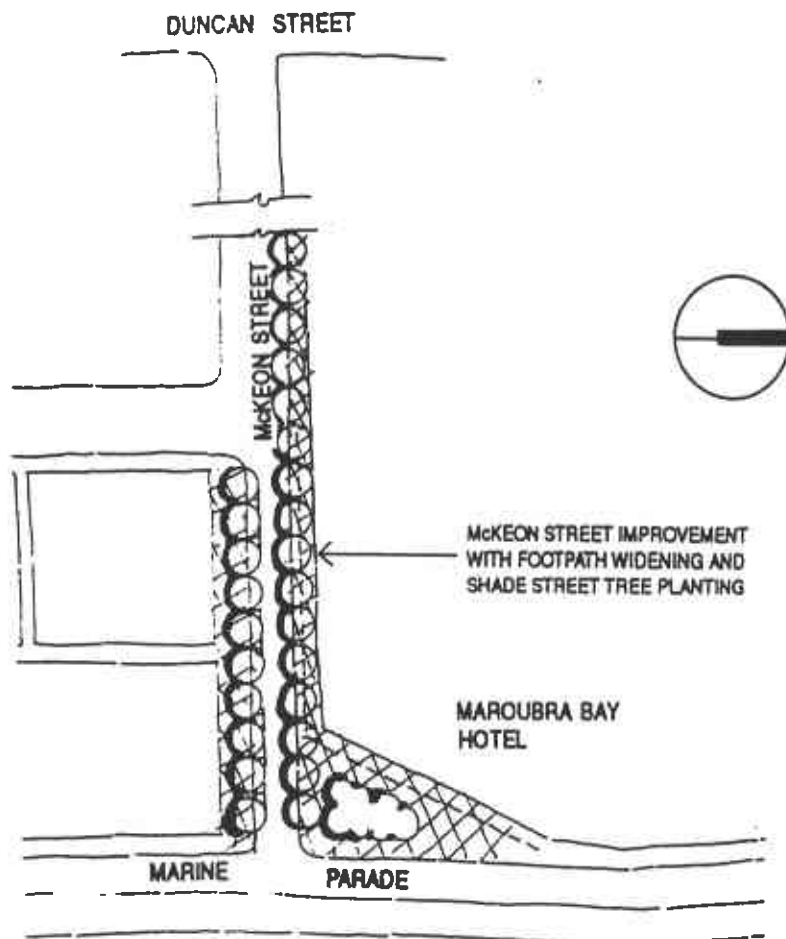
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TABLE 2 - DEVELOPMENT AND MANAGEMENT GUIDELINES - Cont.....

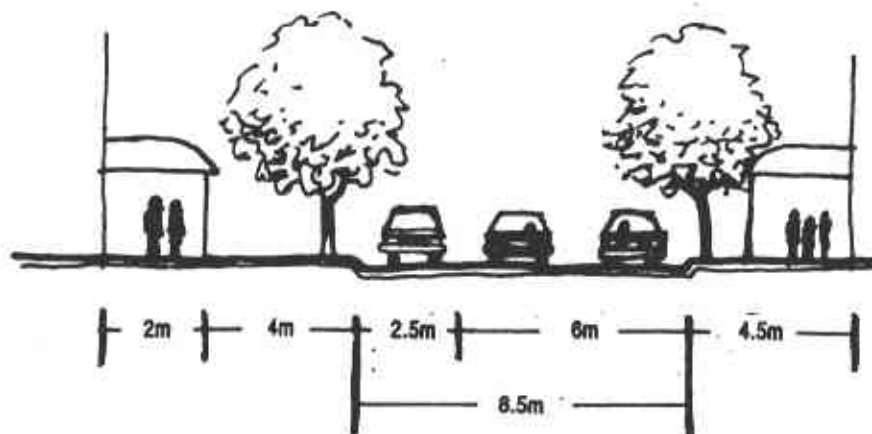
Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 3		3.8 Provide activity focus at northern beach area, toilets, amenities, kiosk.	\$150,000.00	B	RCC
		3.9 Extend promenade to the north over existing grass area and provide steps to beach.	\$50,000.00	B	RCC
		3.10 Upgrade promenade with inset banding and edging in tiles or pavers.	\$80,000.00	B	RCC
		3.11 Relocate bus terminus.	\$250,000.00+	C	STA
		3.12 Formalise pedestrian link to Broadarrow Reserve.	\$25,000.00	D	RCC
		3.13 Selectively remove existing tall shrubs and convert to grass and paved plaza area.	\$25,000.00	B	RCC
		3.14 Investigate and rectify damage to stormwater discharge line.	\$250,000.00+	B	RCC
		3.15 Provide disabled access throughout zone.	\$25,000.00	B	RCC
		3.16 Upgrade promenade lighting and widen footpath to Marine Parade. - develop viewing area from Marine Parade over beach.	\$150,000.00	B	RCC
		3.17 Provide additional parking to Marine Parade.	\$10,000.00	B	RCC
		3.18 Implement 'low speed' zone - signage.	\$5,000.00	B	RCC
		3.19 Replace balustrade to promenade.	\$60,000.00	B	RCC
		3.20 Add street/park furniture - seats, tables, bins, BBQ's etc.	\$100,000.00	B	RCC
		3.21 Remove eucalypts below power lines in Maroubra Road.	-	-	-

TABLE 2 • DEVELOPMENT AND MANAGEMENT GUIDELINES - Cont.....

Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 4	Commercial Streetscapes (Refer Figure 14)	4.1 Redevelop McKeon Street (Marine Parade to High School site). verge widening, streetscape enhancement, lighting, furniture, trees.	\$400,000.00+	B	RCC/Chamber of Commerce
		4.2 Redevelop Marine Parade. - Central planted median - pedestrian priority zone - shade trees - roundabout - pedestrian lighting - street furniture.	\$2,000,000.00+	B	RCC/State/Federal Government.



SCALE 1:1500



SCALE 1:200

McKeon Street

- upgrade McKeon St:
 - > narrow McKeon St and provide wide footpath access and street trees for shade and shelter.
 - > parking on one side only.
 - > install high quality pavements.
 - > provide a co-ordinated range of street furniture and lighting fixtures.
- provide a paved terrace area with shade trees in the corner of McKeon St and Marine Pde in front of the Maroubra Bay Hotel.
- highlight views to beach.

MAROUBRA BEACH PLAN OF MANAGEMENT

ZONE 4
McKEON STREET

FIGURE 14

TABLE 2 - DEVELOPMENT AND MANAGEMENT GUIDELINES - Cont.....

Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 5.	Western Recreation Reserve (Refer Fig. 15)	5.1 Extend north/south and east/west pedestrian/cyclist routes.	\$200,000.00+	C	RCC
		5.2 Provide additional recreation facilities i.e. two basketball courts adjacent to southern boundary of main carpark and capacity for carnivals.	\$55,000.00	C	RCC
		5.3 Selectively thin vegetation along existing walkways and replace tall shrubs with heathland species (<1.5m).	\$10,000.00	A ²	RCC
		5.4 Consolidate uneven filled surfaces (if wetland area does not proceed).	\$20,000.00+	B	RCC
		5.5 Provide "village green" for large community events.	\$25,000.00	B	RCC
		5.6 Provide new artificial wetlands to provide recreational focus, enhanced habitat, pollution mitigation and interpretive facilities.	\$1,000,000.00+	B	RCC
		5.7 Selectively remove tall shrubs to provide for surveillance of open space - replant with clear stemmed shade trees and low shrubs/groundcover.	\$50,000.00	A ²	RCC
		5.8 Develop park entries/signage.	\$15,000.00	B	RCC
		5.9 Provide additional on-street parking areas.	\$100,000.00	C	RCC
		5.10 Provide street trees to Mons Avenue and Fitzgerald Avenue and seal gravel to road shoulder in Fitzgerald avenue - south.	\$20,000.00	C	RCC
		5.11 Place overhead powerlines underground or bundle cables.	\$50,000.00	C	Sydney Electricity
		5.12 Investigate feasibility of emergency helicopter landing area.	--	A ²	RCC
		5.13 Investigate stormwater ponding at South Maroubra Beach.	\$5,000.00	A ²	RCC

REMOVE EXISTING WEEDS AND
REPLACE WITH INDIGENOUS
HEATH SPECIES

SELECTIVELY REMOVE EXISTING
TALL SHRUBS AND REPLACE WITH
HEATH SPECIES LESS THAN
1.5m IN HEIGHT

UPGRADE WALKWAYS TO
PROVIDE 2m CLEARANCE
TO TALL SHRUBS EITHER SIDE

OPTIONAL ACCESS ROAD
TO CARPARK

LOW PLANTING TO EDGE
OF CLUB CARPARK

NEW CLUB CARPARK

LOW SHRUB PLANTING
TO DEFINE OVERFLOW
CARPARK

PROVIDE FORECOURT
ENTRANCE TO CLUBHOUSE

OVERFLOW CARPARKING
(GRASS)

SCREEN EXISTING
CHAIN MESH FENCE

MAINTAIN EXISTING CARPARKING
FOR SURFERS AND CLUB
PROVIDE SHADE TREE PLANTING

REPAIR EXISTING DUNE
FENCING

EXISTING WALKWAYS
TO BE CLOSED

NEW MAIN PEDESTRIAN AND
EMERGENCY VEHICULAR
ACCESS TO SOUTHERN
END OF BEACH. TIMBER AND
CHAIN BOARDWALK CONNECTION

CYCLIST AND
PEDESTRIAN CONNECTIONS
ADDITIONAL VEHICULAR PARKING
PROVIDE 90° KERBSIDE PARKING
AND STREET TREES TO
FITZGERALD AVENUE

VILLAGE GREEN -
SITE FOR CARNIVAL AND
UNSTRUCTURED RECREATION
SUCH AS TOUCH FOOTBALL
REGRADE AND COMPACT EXISTING
SURFACE

EMERGENCY HELICOPTER
LANDING SITE

INVESTIGATE FEASIBILITY OF ARTIFICIAL
WETLAND FOR HABITAT RECREATION AND
WATER QUALITY ENHANCEMENT
INCORPORATING GROSS POLLUTANT TRAP

DIRECT PEDESTRIAN CONNECTION TO
PLAZA AREA. CONSIDER CEMENT
STABILISED GRAVEL OR BOARDWALK

RETAIN AND UPGRADE EXISTING
BEACH ACCESS POINTS

INITIATE DUNE CARE PROGRAM
FOR DUNE SYSTEM

POSSIBLE HELIPORT SITE

PROVIDE PAVED CLUB FORECOURT/
COURTYARD AREA OR BOARDWALK
PLATFORM

Arthur Byrne Reserve

- regrade and compact existing grassed area to create an informal 'village green' for carnivals and informal recreation
- provide a gross pollutant trap to assist improvement of water quality at the beach outlet
- incorporate picnic areas under shade trees as part of the recreation system

South Maroubra SLSC Dunes

- externally refurbish the SLSC
- consider installation of alternative walkway surface on top of the dune:
 - > cement stabilised gravel
 - > raised boardwalk



MAROUBRA BEACH PLAN OF MANAGEMENT

ZONE 5 AND ZONE 6
WESTERN RECREATION RESERVE AND
SOUTHERN DUNES

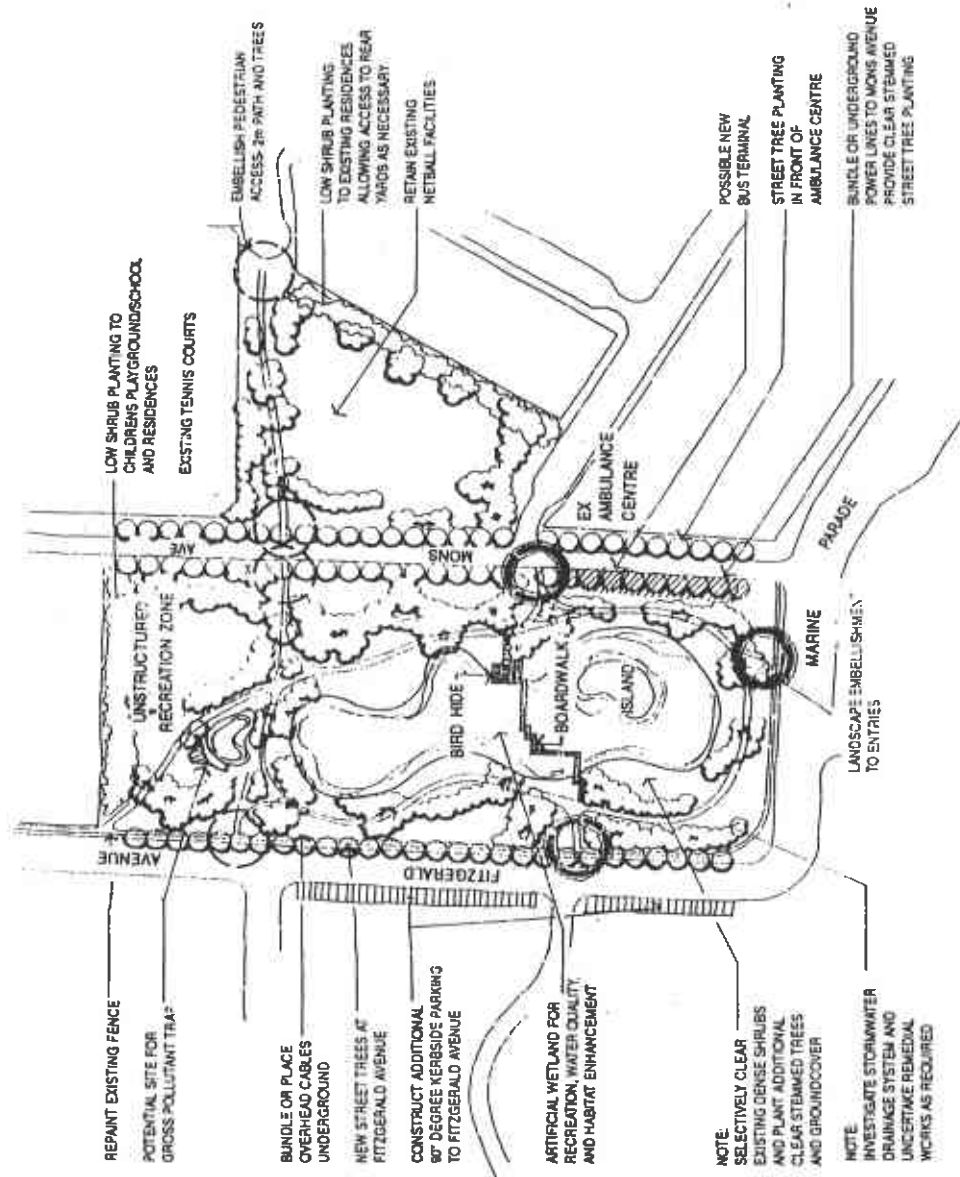
FIGURE 18

SCALE 1:2000

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995

TABLE 2 - DEVELOPMENT AND MANAGEMENT GUIDELINES - Cont.....

Zone	Title	Guidelines	Provisional Budget Allowance	Priority	Responsibilities
Zone 6	Southern Dunes. (Refer Figure 16)	6.1 Repair/reinstate dune fences and undertake additional dune weeding and planting (<1.5M). Seek advice from Department of Land and Water Conservation regarding management of dune system.	\$50,000.00	A ²	RCC/CALM
		6.2 Maintain and upgrade existing dune accessways to beach from reserve areas (east-west).	\$10,000.00	B	RCC
		6.3 Upgrade north-south dune pathway as boardwalk or cement stabilised trail.	\$10,000.00+	B	RCC
		6.4 Remove tall shrubs in front of clubhouse. Replant dense areas in the vicinity of the club to provide low heath (<1m) with views to beach. Note: this area should not extend more than 15m from the east face of the building and the existing sand dunes should remain largely untouched. No structures or walls should be built in the sand dune area.	\$20,000.00	B	SMSLSC/RCC
		6.5 Renovate exterior of South Maroubra SLSC. - paint. - new forecourt to western entrance.	\$35,000.00 \$40,000.00	C B	SMSLSC/RCC SMSLSC/RCC
		6.6 Construct new main beach accessway from SMSLSC to beach and close existing walkways (x 2).	\$15,000.00	B	SMSLSC/RCC
		6.7 Provide new club patrons car park with grassed overflow with new driveway access.	\$120,000.00	C	SMSLSC/RCC
		6.8 Rationalise beach user parking area by delineating parking areas, addition of shade trees and shade planting.	\$30,000.00	B	RCC



Mons Street

- provide 90° angle car parking if necessary.

Broadarrow Reserve

- incorporate a boardwalk, bird hide and other recreational features in the park.
- provide a gross pollutant trap to assist improvement of water quality at beach outlet.
- provide legible park entries at logical locations with paving, landscaping, signage and clear views into the park.
- connect entries to the internal pedestrian system.
- retain and embellish existing pedestrian access to John Shore and Arthur Byrne Reserves.

John Shore Reserve

- provide legible park entries and embellish existing pedestrian access.



MAROUBRA BEACH

PLAN OF MANAGEMENT

ZONE 5
JOHN SHORE PARK AND BROADARROW RESERVE

FIGURE 16

SCALE 1:2000

PREPARED FOR RANDWICK CITY COUNCIL
BY HASSELL
AUGUST 1995

6.6. 1995/96 FINANCIAL YEAR

Council has indicated that capital works funding of \$353,000.00 is available from its 1995/96 budget. Council has been advised by the State Government that supplementary funding will be provided on a one for one basis.

Following discussions with the consultative committee a provisional budget allocation has been determined for the 1995/96 financial year as follows:

Jack Vanny Reserve		\$150,000.00
- immediate works design	August/September 1995	
- construction	October/December 1995	
Specialist studies for major works		\$150,000.00
- urban design strategy	September/December 1995	
- hydraulic/geotechnical study	September/December 1995	
Major works implementation		
\$400,000.00		
- design	January/February 1996	
- construction	March/June 1996	
TOTAL		\$700,000.00

VOLUME 3 - SUPPORTING PAPERS

APPENDIX 1

Maroubra Beach Indicative Plant Species List

Area 1 - Embankment Planting at Arthur Byrne Reserve

Acacia sophorae
Acacia suaveolens
Acacia suaveolens
Allo casuarina distyla
Banksia aemula
Banksia ericifolia
Banksia integrifolia
Banksia marginata
Banksia serrata
Carpobrotus glaucescens
Correa alba
Dampiera stricta
Eucalyptus robusta
Eucalyptus botryoides
Ficus rubiginosa
Hakea gibbosa
Hibbertia scandens
Kennedia rubicunda
Kunzea ambigua
Leptospermum laevigatum
Leptospermum squarrosum
Lomandra longifolia
Melaleuca armillaris
Westringia fruticosa

Area 2 - North of Maroubra Beach Surf Life Saving Club

Acacia suaveolens
Banksia ericifolia
Banksia integrifolia
Carpobrotus glaucescens
Correa alba
Eucalyptus botryoides
Hibbertia scandens
Leptospermum laevigatum
Lomandra longifolia
Melaleuca armillaris
Westringia fruticosa

Area 3 - Broadarrow Reserve

Acacia sophorae
Acacia sophorae
Allo casuarina distyla
Banksia integrifolia
Banksia marginata
Banksia serrata
Correa alba
Eucalyptus botryoides
Leptospermum laevigatum
Westringia fruticosa

Area 4 - Arthur Byrne Reserve Planting

Allo casuarina distyla
Banksia integrifolia
Banksia marginata
Banksia serrata
Correa alba
Ficus rubiginosa
Leptospermum laevigatum
Lomandra longifolia
Westringia fruticosa

Area 5 - West of Maroubra Beach Surf Life Saving Club

Allo casuarina distyla
Banksia ericifolia
Banksia marginata
Correa alba
Kunzea ambigua
Leptospermum laevigatum
Lomandra longifolia
Melaleuca armillaris
Westringia fruticosa

Area 6 - Beach Dune Planting

Acacia sophorae
Allo Casuarina distyla
Banksia ericifolia
Banksia integrifolia
Banksia marginata
Carpobrotus glaucescens
Correa alba
Eucalyptus botryoides
Eucalyptus robusta
Hakea gibbosa
Kunzea ambigua
Leptospermum laevigatum
Lomandra longifolia
Melaleuca armillaris
Westringia fruticosa

Area 7 - Beach Remnant

Acacia myrtifolia
Acacia sophorae
Acacia suaveolens
Acacia ulicifolia
Acmena smithii
Allocasuarina distyla
Banksia integrifolia
Brachyloma daphnoides
Carpobrotus glaucescens
Commelina cyanea

Dianella revoluta
Dillwynia retorta
Eragrostis brownii
Gonocarpus teucrioides
Hibbertia scandens
Hypolaena fastigata
Imperata cylindrica
Isolepis nodosa
Lambertia formosa
Lepidosperma sp.
Leptospermum laevigatum
Leucopogon parviflorum
Leucopogon ericoides
Lomandra longifolia
Monotoca scoparin
Monotoca elliptica
Pimelea linifolia
Ponax umbellata
Spinifex sericeus
Typha sp.
Westringia fruticosa
Woolisia pungens
Xanthorrhoea resinosa

Isolepis cernua
Isolepis nodosa
Lobelia alata
Lomandra longifolia
Mimulus repens
Monotoca elliptica
Pultenaea linophylla
Samolus repens
Sarcocornia quinqueflora
Selliera radicans
Sporobolus virginicus
Triglochin striata
Westringia fruticosa
Zoysia macrantha

Area 8 - Beach Remnant

Acacia sophorae
Banksia integrifolia
Baumea juncea
Carex pumila
Cyperus polystachyas
Dianella congesta
Epaltes australis
Isolepis cernua
Isolepis nodosa
Juncus kraussii
Lachnagrostis filiformis
Leucopogon parviflorus
Lobelia alata
Paspalum distichum
Poa sp.
Sporobolus virginicus
Typha sp.
Westringia fruticosa

Area 9 - Jack Vanny Memorial Reserve

Acacia sophorae
Baeckea imbricata
Carex pumila
Carpobrotus glaucescens
Cotula coronopifolia
Cyperus polystachyos
Dichelachne crinita

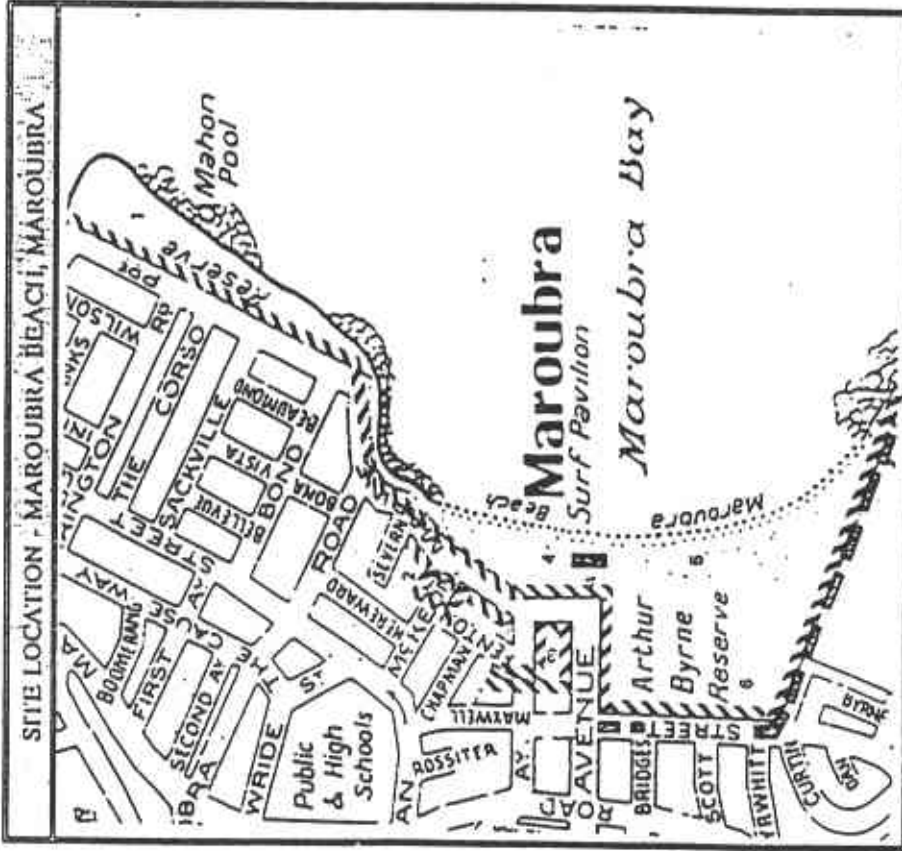
VOLUME 2

(to be progressively prepared by
Randwick Council)



*Do you want to have a say
on how we should
improve Maroubra Beach?*

*We think it's important
that you do.*



Please send the completed questionnaire to the General Manager, Randwick City Council, 30 Frances Street, Randwick, NSW, 2031.

Remember it must be back to us by 7 October, 1994.



An Invitation from the Mayor of Randwick, Chris Bastic

Randwick City Council is currently planning the future of one of our area's major assets - Maroubra Beach. Council has engaged consultants to prepare a Draft Plan of Management for Maroubra Beach. The objective of the Plan of Management is to set out strategies and guidelines for what works are necessary to improve Maroubra Beach and the surrounding area, what maintenance programs are needed and when and how all the work will be done.

But, before any plans are made, we want local residents to have a say about the future of Maroubra Beach. We want your views on how you think Maroubra Beach should be planned for the future. What improvements you think should be made? How you now use Maroubra Beach and how you'd like to use the beach? Does the landscaping need to be improved? Do we need more facilities for young people and other residents?

The Council's planning consultants need to know what you think before they can make their submission to Council.

In order to determine the views of local residents, a questionnaire has been prepared and we'd like you to complete it and send it back to us. We need the questionnaire returned by 7 October, 1994.

If you have any questions please don't hesitate to contact the Council's Recreational Assets Manager, Gary Eastman, on 399 0931.

We need the views of as many residents as possible to make sure we plan the best possible future for Maroubra Beach.

Thanks for taking part in this important program.

**Chris Bastic
Mayor**

MAROUBRA BEACH QUESTIONNAIRE

Please tick appropriate boxes and
attach additional paper if space is
inadequate

1. How often do you visit Maroubra Beach?

- Daily
- Weekly
- Monthly
- Bimonthly
- Annually
- Less than Annually

☐ ☐ ☐ ☐ ☐ ☐

.....

.....

5. How would you like to see Maroubra Beach improved?

.....

.....

2. Why do you use or visit Maroubra Beach?

As an access route

☐

- Walking
- Relaxing
- Swimming
- Surfing
- Sun basking
- Running/jogging
- Picnics
- Fishing

☐ ☐ ☐ ☐ ☐ ☐ ☐ ☐

6. Do you believe there is adequate pedestrian access to the beach?

- Yes ☐
- No ☐

Please explain

.....

Others (please state)

3. What do you like about Maroubra Beach?

.....

How could we provide better facilities for the youth of the area
and what type of facilities would be appropriate?

.....

.....

8. Could the beach and streetscape be improved by additional landscaping?

Yes ☐
No ☐

Please explain

.....

9. What sort of landscape or environmental character should we develop for Maroubra Beach? (ie. leave as is, tourist destination, grand promenade, retain semi-natural qualities, playing fields, passive recreation?)

.....

.....

10. Would Maroubra Beach benefit by different use of the buildings there now?

Yes ☐
No ☐

Suggestions

.....

.....

11. Is parking a problem in summer?

Yes ☐
No ☐

If so please offer possible improvements.

.....

.....

12. Are there any problems with public health and safety (on beach, roads, reserve areas, stormwater pipes) and what could be done to resolve these?

.....

.....

.....

13. Age 5 - 10 years ☐ 20 - 30 years ☐
 10 - 15 years ☐ 30 - 60 years ☐
 15 - 20 years ☐ 60 + ☐

14. Sex Female ☐ Male ☐

Thank you for your contribution.

SUMMARY OF RESPONSES

SUMMARY OF RESPONSES

The following is a brief summary of the results of a community survey conducted through letter box drops in October, 1994. Three thousand questionnaires were distributed to households between Marine Parade to the north and Anzac Parade in the south, the coastline and rifle range boundary in the east, and Inman Street, Torrington Street, Malabar Road, and parts of New Orleans Street in the west.

Four hundred and fifty nine completed questionnaires were returned to Council. The high response rate (15%) indicates a genuine interest and concern for the future planning and management of Maroubra Beach by local residents and users.

Question 1

How often do you visit Maroubra Beach?

Most people surveyed visited the beach daily (61.7%), weekly (31.0%) or monthly (3.8%).

Question 2

Why do you use or visit Maroubra Beach?

The most frequent reasons given for using or visiting the beach were, in order:

Walking, swimming, relaxing, surfing, sunbaking, running/jogging, picnics and access.

Question 3

What do you like about Maroubra Beach?

The most frequent reasons given for liking the beach were:

- its great open feeling;
- its naturalness;
- its feeling of being unspoilt by progress;
- the surf; and
- its uncrowded nature.

Question 4

What do you dislike about Maroubra Beach?

The major objections of respondents to aspects of the beach included:

- the state of the shops;
- its drab/neglected/run down feeling;
- the dirt and rubbish which infested the area;
- the lack of trees;
- the Maroubra Beach Hotel;
- the general surrounds to the beach; and
- the neighbouring apartments.

SUMMARY OF RESPONSES

Question 5

How would you like to see Maroubra Beach improved?

The most frequent responses to this question were:

- the improvement of the local shops;
- the planting of trees;
- keeping the area clean; and
- improvements to the promenade.

Question 6

Do you believe there is adequate access to the beach?

The majority of respondents thought access was not good and 'No' responses included:

- that more ramps be built for disabled and pram access;
- more pedestrian crossings; and
- for traffic calming measures.
- 'No' with no comments;

Question 7

How could we provide better facilities for the youth of the area and what type of facilities would be appropriate?

Responses included in order of preference:

- a children's playground;
- a skateboard park;
- picnic and barbecue facilities;
- a bicycle track; and
- handball/volleyball courts.

Question 8

Could the beach and streetscape be improved by additional landscaping?

The most frequent responses were:

- plant trees;
- 'Yes', with no comments;
- new footpaths and walkways;
- more landscaping and beautification generally; and
- the popular request that Maroubra Beach be "like Coogee".

SUMMARY OF RESPONSES

Question 9

What sort of landscape or environmental character should we develop for Maroubra Beach? (ie. leave as is, tourist destination, grand promenade, retain semi-natural qualities, playing fields, passive recreation?).

The most frequent responses were:

- retain semi-natural qualities;
- grand promenade or improvements to promenade;
- passive recreation;
- tourist destination; and
- playing fields.

Question 10

Would Maroubra Beach benefit by different use of the buildings there now?

The responses to this question were to:

- improve the McKeon Street shops;
- improve the pub with the addition of a beer garden, eatery or cafe;
- allow no more beach buildings; and
- provide outdoor/roadside eateries or cafes.

Question 11

Is parking a problem in summer?

The most frequent responses to this question was:

- yes, with no suggestions;
- yes, with build more car parks;
- remove parking fees for residents; and
- landscape parking areas to provide shade.

Question 12

Are there any problems with public health and safety (on beach, roads, reserve areas, stormwater pipes) and what could be done to resolve these?

The top five responses to this question in order were:

- to tackle the problem of the main stormwater outlet;
- to keep the beach and rockpools clean of rubbish and dirt;
- needles on the beach from drug users;
- broken glass on the beach; and
- the suggestion that the beach have more policing.

SUMMARY OF RESPONSES

Question 13

What age group do you fall into?

Most respondents were aged between 35-60, then 20-30 with the over sixties forming the third largest group, then 15-20, 10-15 and 5-10 year olds forming the smallest groups.

Question 14

What is your gender?

- 66% of respondents were female.
- 34% of respondents were male.

APPENDIX 3

**List of Government Authorities Consulted
Letter to Government Authorities
Responses**

LIST OF GOVERNMENT AUTHORITIES

- NSW Fisheries Department
- Public Works Department
- Department of Housing
- Department of Conservation and Land Management
- Water Board
- Department of Sport, Recreation and Racing
- State Transit Authority
- NSW Police Service
- Beachwatch
- Department of Bushfire Services
- NSW Tourism Commission
- Environment Protection Authority
- Department of Urban Affairs and Planning

SUMMARY OF REPLIES FROM SPECIALIST DEPARTMENTS

The following is a synopsis of the various replies both written and from telephone conversations received from specialist departments in respect of the draft plan of management.

NSW Fisheries Department

The NSW Fisheries Department made a number of comments, these included:

- Taking measures to further improve water quality at Maroubra beach.
- Keeping access to angling and swimming open at the beach.
- Taking measures if possible to protect marine life on the beach.

Public Works Department

The PWD pointed out that the plan of management should take into account two studies, namely:

- NSW Government Coastline Management Manual in respect of coastal hazards, and
- the Maroubra Beach Management Study 1978.

Department of Housing

The Department of Housing had no comments in respect of the plan of management.

Department of Urban Affairs and Planning

The Department of Urban Affairs and Planning pointed out that the plan of management should refer to Sydney Regional Environmental Plan No. 14 - Eastern Beaches.

Department of Conservation and Land Management

CALM pointed out that the department only comments on plans once they have been forwarded to Council.

Water Board

The Water Board's comments centered around the plan of management's need to address stormwater runoff.

The Water Board also expressed the wish that the plan of management explain how all the agencies involved in the study area co-ordinate work to achieve the plan's goals.

Department of Sport, Recreation and Racing

The Department of Sport, Recreation and Racing made a number of points.

- Scavenging on the coastline needs to be controlled - this could be done by placing signs.

SUMMARY OF REPLIES FROM SPECIALIST DEPARTMENTS

- Stormwater outfalls into the bay need to be clean to protect the marine environment.
- Facilities on the beach at the pavillion, reserves and rockpools need to be upgraded. Various grants were cited for achieving this.

State Transit Authority

The State Transit Authority requested that the plan of management locate bus stops as close as possible to facilities pointing out that the more convenient public transport was to use, the less need there would be for parking.

NSW Police Service

Maroubra Beach Police made the following comments.

- Make the beach and reserves alcohol free.
- Consider angle parking at Marine Parade.
- Pedestrianise McKeon Street.
- Structures built under the plan of management must not encourage areas for drug taking, drinking or loitering.

Beachwatch

Beachwatch commented that the beach is effected by stormwater flows. The beach was judged unsuitable for swimming on 63 days during the 1994 season. Baywatch concluded that any proposals to improve stormwater management would be likely to improve recreational amenity.

Department fo Bushfires

The Department of Bushfires had no comments in respect of the plan of management.

NSW Tourism Commission

The NSW Tourism Commission stated it had no comment in respect of the plan of management but point to the local council's tourism plan as offering possible avenues for tourism development.

Environment Protection Authority

The EPA suggested that the plan of management include a stormwater management plan. They are concerned about the impact of stormwater pollution on marine water quality, and the aesthetics of stormwater ponding under low flow conditions at the southern end of the beach.

APPENDIX 4

Study Team

MAROUBRA BEACH CONSULTATIVE COMMITTEE

Mr Chris Bastic
Mr Charles Matthews
Mrs Marie Kibble
Mr Phillip Abadee
Mr Richard Walsh
Mrs Christine Turner
Mr Graham Turner
Mr David Edwards
Mr Ronald Trouville
Mr Gary Hamer
Mr Tony Jackson
Mrs Gloria Baker
Mr Sunny Abberton
Mr Gary Mauric
Mrs Jan Jeffrey
Mr Brian Purdon
Mr Warren Bos
Mrs Kerri Hamer
Mr Bob Goodsell
Mr Gary Eastman

Mayor - Randwick City Council
Councillor - Randwick City Council
Councillor - Randwick City Council
Councillor - Randwick City Council
Councillor - Randwick City Council

Maroubra Seals Club Ltd
Maroubra Surf Life Saving Club
Maroubra Bay Primary School P & C
South Maroubra Surf Life Saving Club
Recreation Assets Manager, Randwick City
Council

STUDY TEAM

The project co-ordinator was Gary Eastman of Randwick City Council. The study was directed and managed by Ross de la Motte, Principal Landscape Architect, HASSELL Pty Ltd with support from Bronwyn Pickering, David O'Brien, Deborah Eastment, Stephen Hammond, Stuart Drury and Elizabeth Read.

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