



Planning

Contact: Jane Flanagan
Phone: 9228 6431
Fax: 9228 6455
Email: jane.flanagan@planning.nsw.gov.au

Mr Glenn Colquhoun
Australand Corporation Pty Ltd
PO Box 4148
SHELLHARBOUR NSW 2529

Our ref.: 07_0027

Dear Mr Colquhoun

Subject: Determination of Shell Cove Boatharbour Precinct (07_0027)

I am writing to inform you that the above application was approved subject to conditions on 15 February 2011.

A copy of the approval is enclosed, and the Director-General's assessment report is on the Department's website (<http://majorprojects.planning.nsw.gov.au/page/determinations/>).

Your contact officer for this proposal, Jane Flanagan, can be contacted on 9228 6431 or via email at jane.flanagan@planning.nsw.gov.au. Please mark all correspondence regarding the proposal to Ms Flanagan's attention.

Yours sincerely,

Michael Woodland
Director

2/3/2011

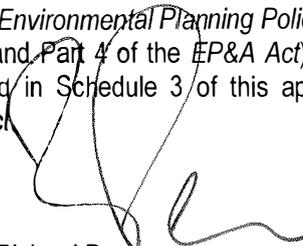
Metropolitan and Regional Projects South

Concept Approval

Section 750 of the *Environmental Planning & Assessment Act 1979*

I, the Deputy Director-General, acting under delegation from the Minister for Planning, under the *Environmental Planning and Assessment Act 1979* (the *EP&A Act*) determine:

- (a) Pursuant to Section 750 of the *EP&A Act* to grant concept plan approval to the proposal (as described in A1 of Part A, Schedule 2), subject to the modifications set out in Part B of Schedule 2.
- (b) Pursuant to section 75P(1)(b) of the *EP&A Act*, approval to carry out the project or any particular stage of the project is to be subject to the provisions of Part 4 or Part 5 of the *EP&A Act*, except where it meets the criteria in Schedules 1 or 2 of the *State Environmental Planning Policy (Major Development) 2005*.
- (c) All future applications (under Part 3A and Part 4 of the *EP&A Act*) are subject to further environmental assessment requirements (as specified in Schedule 3 of this approval) in accordance with sections 75P(1)(a) and 75P(2)(c) of the *EP&A Act*.



Richard Pearson
Deputy Director-General
Development Assessment & Systems Performance
Department of Planning

Sydney

15th February

2011

SCHEDULE 1

Application No.: 07_0027.

Proponent: Australand Corporation (NSW) Pty Ltd.

Approval Authority: Minister for Planning.

Land: Lot 8032 DP 1072187, Lot 8100 DP 1082981, Lot 206 DP 857030, Lot 9004 DP 1117743 and Lot 30 DP 229374
Boollwarro Parade, Shell Cove.

Project: Shell Cove Boat Harbour Precinct, including residential, commercial, community, retail, hotel, business park, dry boat storage facility, open space and wetlands.

Local Government Area: Shellharbour City Council.

DEFINITIONS

Concept Plan	Shell Cove Boat Harbour Precinct Concept Plan comprising residential, commercial, community, retail, hotel, business park, dry boat storage facility, open space and wetlands as described in <i>Shell Cove Boat Harbour Precinct Concept Plan Application and Environmental Assessment</i> , 26 February 2010 prepared by LFA (Pacific) Pty Ltd.
Council	Shellharbour City Council.
DECCW	Department of Environment, Climate Change and Water.
Department	Department of Planning.
Director-General	Director-General of the Department (or delegate).
Environmental Assessment	Shell Cove Boat Harbour Precinct Concept Plan Application and Environmental Assessment, dated 26 February 2010, prepared by LFA (Pacific) Pty Ltd, including Volumes 1 and 2 and Appendices A to P.
EP&A Act	<i>Environmental Planning and Assessment Act 1979</i> .
EP&A Regulation	<i>Environmental Planning and Assessment Regulation 2000</i> .
Minister	Minister for Planning.
NOW	NSW Office of Water.
Preferred project report	Shell Cove Boat Harbour Precinct Preferred Project Report, November 2010 prepared by LFA (Pacific) Pty Ltd.
Project	The development as described in the EA.
Proponent	Australand Corporation (NSW) Pty Ltd, or its successors in title.
RTA	Roads and Traffic Authority.
Site	Land to which the concept plan application applies (see Schedule 1).
Statement of Commitments	Statement of Commitments, January 2011, prepared by LFA (Pacific) Pty Ltd (Schedule 4).

SCHEDULE 2

Part A – Terms of Approval

1. Approval for the Boat Harbour Precinct

Except as modified by this approval, Concept Plan approval is granted only to the carrying out of development within the Concept Plan area as listed below and in more detail in Shell Cove Boat Harbour Precinct Concept Plan Application and Environmental Assessment, 26 February 2010, as amended by the Preferred Project Report:

- (a) Up to 1,238 dwellings with a total gross floor area of approximately 150,000m² comprising single dwellings, medium density and apartments;
- (b) a business park with a maximum gross floor area of 30,000m²;
- (c) retail/commercial/hotel/community development with a maximum gross floor area of 22,000m²;
- (d) public open space and wetlands; and
- (e) associated drainage, stormwater infrastructure and roads.

2. Approved Plans and Documentation

The project shall be generally in accordance with the following plans and documentation:

- (a) Shell Cove Boat Harbour Precinct Concept Plan Application and Environmental Assessment, dated 26 February 2010, prepared by LFA (Pacific) Pty Ltd, including Volumes 1 and 2 and Appendices A to P;
- (b) Shell Cove Boat Harbour Precinct Preferred Project Report, dated November 2010 prepared by LFA (Pacific) Pty Ltd, including Appendices 1 and 2; and
- (c) Statement of Commitments (Schedule 4).

except as otherwise provided by the terms of this approval.

3. Limits on Approval

This approval does not allow any components of the Concept Plan to be carried out without further approvals or consents being obtained.

4. Lapsing of Approval

Approval of Major Project No. 07_0027 shall lapse 5 years after the date of determination unless works the subject of any related application have been physically commenced, on or before that lapse date. The Director-General may extend this lapse date if the proponent demonstrates to the satisfaction of the Director-General that the project remains current, appropriate and reflective of the best use of the site at the date the approval would otherwise lapse.

5. Inconsistencies

(1) In the event of any inconsistency between:

- a) the terms of this approval and the Statement of Commitments, the conditions of this approval prevail; and
- b) the terms of this approval and the documents referred to in Part A - condition 2, the conditions of this approval prevail.

(2) If there is any inconsistency between the terms of the approval of the concept plan and any project approval or development consent, this concept approval shall prevail to the extent of the inconsistency.

Part B – Modifications to the Concept Plan

There are no modifications required to the Concept Plan outlined in the Shell Cove Boat Harbour Precinct Preferred Project Report.

SCHEDULE 3

Part C – Further Environmental Assessment Requirements

The following environmental assessment requirements apply to the entire project and the requirements specified below must be submitted and approved by the relevant approval authority with the first application made under Part 3A or Part 4 of the *EP&A Act*.

1. Coastal Hazards Study

A detailed Coastal Hazards Study, prepared by a suitably qualified person comprising a coastal hazard risk assessment for the project taking into consideration the requirements of the *Shellharbour Coastal Hazard Study* (April 2010), and complying with the NSW Government's coastal risk planning benchmarks. The study must include an assessment of adequacy of height of sea wall against the predicted impacts of sea level rise, inundation and more frequent and intense storms to the year 2100; and details of dunal stabilisation works to 4.5m AHD. It must also provide details of responsibility for implementation and funding of the operational phase of the Beach Nourishment/Rehabilitation Management Plan.

2. Fauna Assessment

A contemporary fauna assessment and survey for the Green and Golden Bell Frog undertaken in accordance with *Threatened Species Survey and Assessment Guidelines: Field Survey Methods for Fauna – Amphibians*, Department of Environment and Climate Change (April 2009). If the assessment concludes that there will be an impact on the Green and Golden Bell Frog, appropriate mitigation measures and/or changes must be incorporated into the project as recommended by the assessment.

Part D – Further Environmental Assessment Requirements

The following environmental assessment requirements apply, where relevant, to development of each stage/precinct of the project and must be submitted with any subsequent applications to the relevant approval authority made under Part 3A or Part 4 of the *EP&A Act*.

1. Urban Design

The proponent must submit detailed urban design guidelines for the project prepared by a suitably qualified architect or urban designer, for each stage. The guidelines must establish design controls which achieve the following where relevant to the particular stage:

- architectural diversity within all stages which complements the site's coastal context; and
- a variety of detailed designs which avoid monotones and repetition;
- design of the hotel building and public square in the commercial precinct which define street and water edges, and create visual interest;
- a hotel building with tower angled to the east to maximise views to the coast to the north and south and reduce impacts on the boat harbour and which may comprise a 3-4 storey high podium;
- demonstration of a mix of dwelling types and sizes for each residential precinct, including consideration of affordable and adaptable housing;
- building separation, setbacks, solar access, visual and acoustic privacy, view corridors and an adequate level of environmental amenity;
- compliance with *Crime Prevention Through Environmental Design* (CPTED) principles;
- the location and distribution of public car parks;
- where applicable, that *State Environmental Planning Policy No. 65 – Design Quality of Residential Flat Development* principles and the *Residential Flat Design Code Guidelines* can be achieved;

- appropriate density, bulk, scale, textures and colours in relation to surrounding development, topography and streetscape;
- consistency with the *New South Wales Coastal Policy 1997* and *Coastal Design Guidelines New South Wales* in terms of visual impact, bulk, scale and amenity;
- layout and design which satisfies the design considerations in *Healthy by Design: A Planners Guide to Environment's for Active Living*, National Heart Foundation of Australia;
- clear addresses for buildings fronting public walkways along the harbour and direct access from walkways where possible;
- an indicative staging plan identifying the likely timing and sequence for each stage;
- buildings which address main avenues or boulevards and serviced by rear laneways/access ways to improve legibility and prevent gated communities; and
- design and layout to minimise noise impacts to sensitive residential areas near the quarry boundary.

2. Landscaping

A landscape plan prepared by a suitably qualified landscape architect detailing the locations, types and treatments for landscaping and public domain elements with consideration of Council's requirements.

3. Noise Management Assessment

A detailed Noise Management Assessment identifying:

- traffic noise mitigation measures for the road design;
- areas which require acoustic treatments to dwelling facades to provide satisfactory indoor noise levels; and
- appropriate mitigation measures (the use of mounds and landscape buffers, not acoustic walls) for the design and layout of stages affected by truck noise from the Quarry Haul Road, dry boat storage and marina activities.

4. Utilities

Address and document the existing capacity and requirements of the project for utilities, including any necessary augmentation and staging of any infrastructure works, in consultation with relevant agencies.

5. Earthworks Strategy

Provide a detailed Earthworks Strategy, prepared by a suitably qualified person which addresses erosion and sedimentation controls and includes measures to manage acid sulfate soils and stockpiling.

6. Remedial Action Plan

A Remedial Action Plan is to be prepared for the former golf course area and the south-eastern area of the site at the location of the former farm structure by a suitably qualified person in accordance with *Managing Land Contamination: Planning Guidelines SEPP 55 – Remediation of Land* (DUAP/EPA, 1998), based on the recommendations and conclusions of the Phase 2 Contamination Assessment prepared by Douglas Partners dated October 2010 (Appendix 2D of the Preferred Project Report).

7. Flood Assessment

A detailed Flood Assessment, prepared by a suitably qualified person identifying flood affected parts of the land and showing how the proposed project at each stage will comply with Shellharbour City Council *Floodplain Risk Management Development Control Plan (April 2006)*, (except where it is inconsistent with NSW State Government policy and guidelines), and comply with and the government's sea level rise and climate change benchmarks, current at the time of preparation of the Flood Assessment. The findings of the Flood Assessment must inform the ultimate layout and design of each stage of the project.

The assessment must include a flood planning levels map, details of flood planning levels adjacent to the boat harbour and for the major overland flow paths; and mitigation measures to reduce impacts on flood levels in vicinity of Ron Costello oval.

8. Stormwater and Water Cycle Management Plan

Identify drainage, stormwater and groundwater management issues, on-site stormwater detention (if required), and drainage infrastructure to ensure achievement of the water quality targets identified in the Boat Harbour Development Consent 95/133 for each stage of the project consistent with Council's requirements.

9. Environmental Management Plan

An Environmental Management Plan (EMP), prepared by a suitably qualified person demonstrating measures to mitigate potential impacts on aquatic habitats and aquatic species during the construction and operation periods. The EMP must be prepared in consultation with the Department of Environment, Climate Change and Water.

10. Construction Management Plan

A comprehensive Construction Management Plan, including a traffic management plan identifying truck routes, vehicular frequency, hours of operation, use of equipment, and measures to minimise dust, noise and vibration impacts on surrounding areas, and ensure vehicular and pedestrian safety.

11. Ecologically Sustainable Development

Demonstrate that any future development will incorporate ESD principles in its design, construction and ongoing operation phases, including water sensitive urban design measures, water re-use/recycling, energy efficiency, recycling and waste disposal.

12. Acid Sulfate Soils

An Acid Sulfate Soil Management Plan (ASSMP) for each stage of the project for actual and potential acid sulphate soils prepared by a suitably qualified person in accordance with the *NSW Acid Sulfate Soil Manual* (NSW Acid Sulfate Soil Management Advisory Committee, August 1998). The ASSMP must examine how the pre-loading process and treatment of ASS will be staged and managed throughout the life of each stage especially regarding the impacts of trenches (for service and drainage) on groundwater and acid leachate.

13. Social Infrastructure

Social infrastructure shall be provided in accordance with Council's Section 94 Contributions Plan. The details of any playground, local library and multi-purpose community centre shall be provided with each stage of the project.

14. Local Infrastructure Contributions

Contributions towards local infrastructure in accordance with the *EP&A Act 1979* must be provided.

15. Erosion and Sedimentation Control

A detailed Erosion and Sedimentation Control Plan prepared in accordance with *Managing Urban Stormwater: Soils and Construction*, Landcom (March 2004) ('the Blue Book') detailing the design, construction and implementation of measures to manage stormwater, and erosion and sediment control during the construction phases of each stage of the project.

16. Traffic Assessment

An updated traffic impact assessment prepared by a suitably qualified person for each stage/precinct of the project which includes a cumulative impact assessment having regard to the status of the future construction of the intersection of Harbour Boulevard and Shellharbour Road.

17. Public Access

The detailed design and layout of the project must adopt the following principles:

- (a) direct, legible and inviting public pedestrian access from adjoining residential development and pedestrian connections which follow existing and proposed well-connected streets;
- (b) clear and direct access from the public walkway around the harbour to streets that meet the harbour edge to ensure public access is well defined and integrated; and
- (c) clear, through-site pedestrian links with active street frontages, direct and legible access to key points of interest, including Shellharbour village, which are publicly accessible at all times.
- (d) consistency with the Shellharbour Shared Use Path Strategy (Shellharbour City Council, 10 August 2010) unless otherwise justified.

**SCHEDULE 4
STATEMENT OF COMMITMENTS**



Shell Cove Boat Harbour Precinct (MP07_0027)

Statement of Commitments

January 2011



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LFA (PACIFIC) PTY LIMITED

MASTERPLANNING
 URBAN DESIGN
 ARCHITECTURE
 LANDSCAPE ARCHITECTURE
 INTERIORS

SUITE 4, EDGECLIFF COURT, 2 NEW McLEAN ST, EDGECLIFF NSW 2027
 M PO BOX 250, EDGECLIFF NSW 2027 T 02 9327 6822 F 02 9327 5554
 E lfa@lfa.com.au W www.lfa.com.au ABN 92 830 134 905 GM ISO 9001 #100903

NOMINATED ARCHITECTS ALF LESTER NO.2126 STEPHEN ANDERS NO.5764

In Conjunction with

Project	Shell Cove Boat Harbour Precinct
Client	Australand
Project Status	For Approval
Project Director	Alf Lester
Checked By	AL
Date Issued	December 2010
Issue Type	Final

Rev	Amendments	Date

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 OF COMMITMENTS.DOC



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1 BACKGROUND

In February 2010, Australand Corporation lodged a Concept Plan Application for the Shell Cove Boat Harbour Precinct (MP07_0027) under Part 3A of the Environmental Planning and Assessment Act 1979. The Concept Plan Application sought consent for the development of a 100 hectare precinct surrounding the Shell Cove Boat Harbour and Marina (the Boat Harbour) that would include:

- A mixed use town centre, including a landmark hotel;
- A small mixed use precinct adjacent to the Shellharbour South Beach dunal zone;
- Business Park precinct;
- Standard and medium density residential and apartment development; and
- A comprehensive network of open space and wetlands.

Following public exhibition, Australand received a number of submissions lodged by State government agencies, Shellharbour City Council and the general public. Accordingly, a Preferred Project Report was submitted to the Department of Planning in November 2010 which responded to all the issues raised.

2 PURPOSE OF THE REPORT

This document has been prepared upon request from the Department of Planning to provide a consolidated Statement of Commitments for the Shell Cove Boat Harbour Precinct Concept Plan.

This Statement of Commitments supersedes Part 5 of the Concept Plan Application and Environmental Assessment and incorporates the commitments made in the Preferred Project Report.

Accordingly, Australand looks forward to the Minister's favourable consideration of the Concept Plan Application, the supporting Preferred Project Report and this Statement of Commitments.

3 INTRODUCTION

The following Commitments for the Shell Cove Boat Harbour Precinct are set out below.

The Commitments outline the management, mitigation and monitoring measures that will be implemented to minimise any potential environmental impacts during the detailed design, construction and operation phases.

The Commitments respond to the Key Issues addressed by the Environmental Assessment and are set out as such. The Commitments also respond to the issues raised during the public exhibition process.

The range of commitments includes:

- Strategic Planning
- Urban Design, Visual Impact and Sustainability
- Landscape
- Infrastructure Provision
- Traffic and Access
- Hazard Management and Mitigation
- Water Cycle Management
- Heritage and Archaeology
- Flora and Fauna
- Noise, Odour and Air Quality
- Socio-Economic Impacts
- Consultation
- Crime Risk



4 COMMITMENTS

4.1 GENERAL COMMITMENTS

- The Proponent undertakes to pursue the development in accordance with the Concept Plan and Preferred Project Report, which reflects the Shell Cove Masterplan, the Illawarra Regional Strategy, the Illawarra Regional Environmental Plan, the Shellharbour Local Environmental Plan, the Environment Protection and Biodiversity Conservation Act and the appropriate State Environmental Planning Policies.
- The Proponent undertakes to obtain all necessary approvals required by State and Commonwealth legislation prior to undertaking subsequent stages of the development.

4.2 STRATEGIC PLANNING

- The Proponent undertakes to respond to relevant local, regional and State planning strategies.
- The Proponent undertakes to consider the recommendations of the *Shellharbour Local Government Area Retail/Commercial Study and Employment Study*, which includes:
 - Enhancing public domains in support of Shell Cove as a creative and cultural hub.
 - Establishing a retail centre and operating a supermarket.
 - Establishing a Business Park.
- The Proponent undertakes to demonstrate consistency with the Sustainability Criteria set out in Appendix 1 of the Illawarra Regional Strategy, which includes:
 - Providing infrastructure.
 - Enhancing access to and within the Boat Harbour Precinct.
 - Providing employment opportunities.
 - Encouraging both conservation and enjoyment of the natural resources and coastal environment of Shell Cove.

4.3 URBAN DESIGN, VISUAL IMPACT AND SUSTAINABILITY

- The Proponent undertakes to respond to the surrounding area by addressing bulk, scale, amenity (including noise) and visual amenity, with regards to the NSW Coastal Policy (1997), which includes:
- Implementing maximum building heights of 4 storeys (excluding the landmark hotel which is proposed to have a maximum height of 8 to 9 storeys).
- Adopting a contemporary coastal village materials palette.
- Providing parks and boardwalks which establish public access to the harbour perimeter.

- Establishing visual connections between streets and open spaces and the harbour.
- The Proponent undertakes to respond to the surrounding area by addressing bulk, scale, amenity (including noise) and visual amenity, with regards to the Coastal Design Guidelines of NSW (2003), which includes:
 - Incorporating visual and physical links to the natural environment, such as integrating wetlands.
 - Providing an open space network.
 - Maintaining the Shell Cove Town Centre as a visual landmark.
 - Managing increased local population and visitor access to the foreshore.
- The Proponent undertakes to ensure that the relevant residential components of the development demonstrate compliance with SEPP 65 - Design Quality of Residential Flat Development, which includes providing:
 - Private open spaces.
 - Courtyards.
 - Useable balconies.
 - Decks.

4.4 LANDSCAPE

- The Proponent undertakes to implement street tree planting in accordance with a landscape plan to be submitted as part of each Project Application.
- The Proponent undertakes to implement planting and other works in areas of public open space as designated in the landscape plan to be submitted as part of each Project Application.

4.5 INFRASTRUCTURE PROVISION

- The Proponent undertakes to assess existing capacity and provide infrastructure requirements for sewerage, water, electricity, telecommunications and gas.
- The Proponent undertakes to adopt Water Sensitive Urban Design principles in the provision of infrastructure requirements.
- The Proponent undertakes to obtain and maintain all necessary licences, permits and approvals for the development prior to and during construction.



4.6 TRAFFIC AND ACCESS

- The Proponent undertakes to implement a traffic management strategy - in relation to the capacity of the road network to cater for additional traffic generation including service vehicles, access to and within the site, and connectivity to existing developments - with particular emphasis on the following key intersections:
 - Shellharbour Road/Harbour Boulevard/Wattle Road - revised layout.
 - Addison Street/Harbour Boulevard - new traffic signals.
 - Brigantine Drive/Harbour Boulevard - single lane roundabout.
 - Cove Boulevard/Harbour Boulevard - single lane roundabout.
 - Road A/Harbour Boulevard - single lane roundabout.
- The Proponent undertakes to consider the impact of the development on existing public transport provision, identify pedestrian movements and implement appropriate provisions for shared path/cycleway/public transport routes to the existing and proposed road network, including a Pedestrian Shared Zone in the Town Centre.
- The Proponent undertakes to incorporate parking in accordance with the requirements as part of subsequent Project Applications.
- The Proponent undertakes to protect existing public access to and along the beach and coastal foreshore and provide new opportunities for controlled public access including providing continuous public access to the perimeter of the harbour.
- The Proponent undertakes to maintain good access to the Bass Point Reserve.

4.7 HAZARD MANAGEMENT AND MITIGATION

4.7.1 Coastal Processes

- Under the separate Boat Harbour approval the Proponent undertook to implement a Beach Nourishment/Rehabilitation Management Plan which identifies measures to protect and rehabilitate the Shellharbour South Beach dunal system.
- The Proponent undertakes to ensure that beach behaviour is monitored to provide information which will facilitate effective management of natural coastal processes.
- The Proponent undertakes to respond to potential sea level rise as a result of climate change by ensuring that all habitable buildings within the Boat Harbour Precinct adopt a freeboard of 0.5m and providing a sea wall with a height of 2.00m AHD.

4.7.2 Contamination

- The Proponent undertakes to identify any contamination on site and apply appropriate mitigation measures in accordance with the provisions of SEPP 55 - Remediation of Land.
- The Proponent undertakes to remove any residual landfill within the site associated with the Shellharbour Swamp.

- The Proponent undertakes to ensure that further investigations of the former golf course area and the south-eastern area of the site at the location of the former farm structures will be carried out based on the recommendations and conclusions of the Phase 2 Contamination Assessment prepared by Douglas Partners dated October 2010 (Appendix 2D of the Preferred Project Report), as part of the relevant Project Application investigations.

4.7.3 Acid Sulfate Soils

- The Proponent undertakes to treat any disturbed ASS material in accordance with the ASS Management Advisory Committee Guidelines.

4.7.4 Bushfire

- The Proponent undertakes to implement an Asset Protection Zone from the revegetated dunal zone located to the east of the study area to any residential, commercial or retail buildings within the Boat Harbour Precinct in accordance with the Planning for Bushfire Prevention guidelines.

4.7.5 Geotechnical

- The Proponent undertakes to preload areas of soft soil prior to construction in accordance with the separate Boat Harbour approval.
- The Proponent undertakes to ensure that following satisfactory preloading, the compacted preload is removed and extra compacted fill is placed, as required, to match the final design level.

4.7.6 Flooding

- The Proponent undertakes to provide waterway corridors to be used as floodways - using Water Sensitive Urban Design principles and incorporating wetlands, natural creeklines and open space areas - to manage and contain flood hazards.
- The Proponent undertakes to implement a Flood Emergency Response which includes remaining on site during PMF events and maintaining safe pedestrian and vehicular access routes out of the Boat Harbour Precinct for events up to the 100yr ARI flood.
- The Proponent undertakes to respond to sea level rise by adopting Flood Planning Levels based upon the 100 year ARI flood level plus 0.90 m sea level rise (for the year 2100) plus 0.50 m (to comply with Council's freeboard requirement).
- The Proponent undertakes to prepare a FPL map in accordance with Figure 5 of the NSW Coastal Planning Guideline Adapting to Sea Level Rise for each Project Application when more detailed definition of final design levels is available. This will include localised flood modelling for each stage of the Boat Harbour Precinct to demonstrate compliance with the NSW Coastal Planning Guideline Adapting to Sea Level Rise.
- The Proponent undertakes to prepare an assessment of the impact of 0.9m sea level rise on the 5 year and 100 year ARI and PMF storm events during detailed design phases of the Boat Harbour Precinct associated with each Project Application.



- The Proponent undertakes to ensure that the development does not result in any significant increase in flood levels on adjacent properties. Flood impacts will not exceed those identified in Appendix F of the EA.
- The Proponent undertakes to ensure that flood risk will be assessed in each Project Application for consistency and compliance with the Concept Plan and compliance with the NSW Flood Plain Development Manual 2005 and Council's Flood Plain Risk Management DCP (except where inconsistent with NSW State Government Policies and Guidelines).

4.8 WATER CYCLE MANAGEMENT

- The Proponent undertakes to mitigate the potential impact of the development on the environment through a Water Cycle Management Strategy which includes:
 - Rainwater tanks.
 - Grass swales.
 - Vegetated drainage corridors.
 - Bio-retention swales and basins.
 - Gross pollutant traps.
 - Wetlands.
- The Proponent undertakes to implement a Water Cycle Management Strategy which adopts Water Sensitive Urban Design principles and identifies measures to ensure protection of water quality within the sensitive near-shore coastal environment.
- The Proponent undertakes to provide multiple, connected freshwater wetlands to the north and west of the Town Centre in accordance with the Stormwater Quality Management Strategy.

4.9 HERITAGE AND ARCHAEOLOGY

- The Proponent undertakes to progress works in accordance with the approved Archaeological and Heritage Protection Plans and the ss87/90 consent and permit (No 2534) of the NP&W Act.
- The Proponent undertakes to protect the Shellharbour Aboriginal Objects (Sites) identified as being of relatively high archaeological value in accordance with the Archaeological and Heritage Protection Plan and the consent and permit granted by the Department of Environment and Climate Change.
- The Proponent undertakes to notify the National Parks and Wildlife Service immediately in the event that any previously unidentified Aboriginal relics (including human skeletal material) are discovered on the site.

4.10 FLORA AND FAUNA

- In accordance with the Boat Harbour Ministerial Consent, the Proponent has undertaken to compensate for any impact of the development on aquatic and terrestrial flora and fauna and their habitats by the construction of the Myimbarr Wetlands.
- The Proponent undertakes to enhance the environment through the use of native flora in landscaped parklands and public spaces.
- The Proponent undertakes to mitigate the impact of construction on flora and fauna populations through erosion and sediment control measures including:
 - Diversion drains.
 - Rapid revegetation of cleared areas.
 - Silt fences.
 - Stabilising drains.
 - Use of temporary and permanent sediment traps.

4.11 NOISE, ODOUR AND AIR QUALITY

- The Proponent undertakes to mitigate any excessive noise impacts by implementing appropriate measures such as low noise pavements or incorporating noise reduction features on residential facades, which will be detailed in each Project Application.
- The Proponent undertakes to mitigate odour impacts by adopting odour control measures which comply with Sydney Water guidelines including the reduction in septicity levels.
- The Proponent undertakes to meet the objectives of the NSW Action for Air Plan by:
 - Minimising internal traffic generation.
 - Providing direct pedestrian and vehicle access to the harbour foreshore.
 - Providing continuous pedestrian access to the harbour edge.
 - Providing pedestrian and cycle paths that access key facilities.
 - Minimising through traffic to Bass Point and the Business Park.
 - Encouraging public transport.
 - Providing direct access to the arterial road network.

4.12 SOCIO-ECONOMIC IMPACTS

- The Proponent undertakes to respond to social and economic impacts through increased numbers of new jobs during construction, increased local job opportunities as a result of the Business Park, increased visitor expenditure, and new expenditure and employment in retail, conferencing, restaurants and tourism.

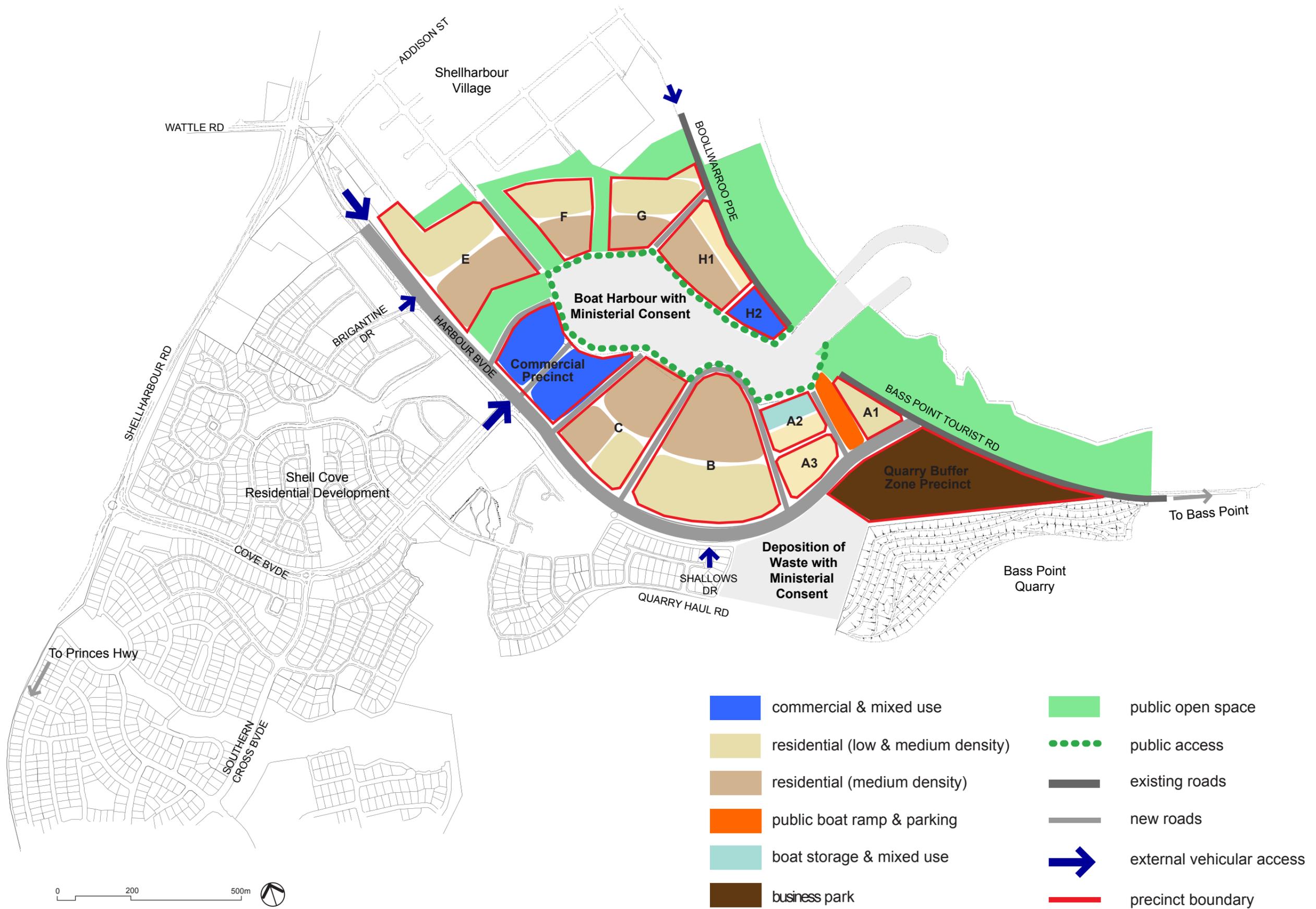


4.13 CONSULTATION

- The Proponent undertakes to continue consultation with the relevant agencies, authorities and the public as pertains to each Project Application.

4.14 CRIME RISK

- The Proponent undertakes to incorporate best practice Crime Prevention Through Environmental Design principles into all detailed design development.



- commercial & mixed use
- residential (low & medium density)
- residential (medium density)
- public boat ramp & parking
- boat storage & mixed use
- business park
- public open space
- public access
- existing roads
- new roads
- external vehicular access
- precinct boundary

boat harbour precinct - concept plan

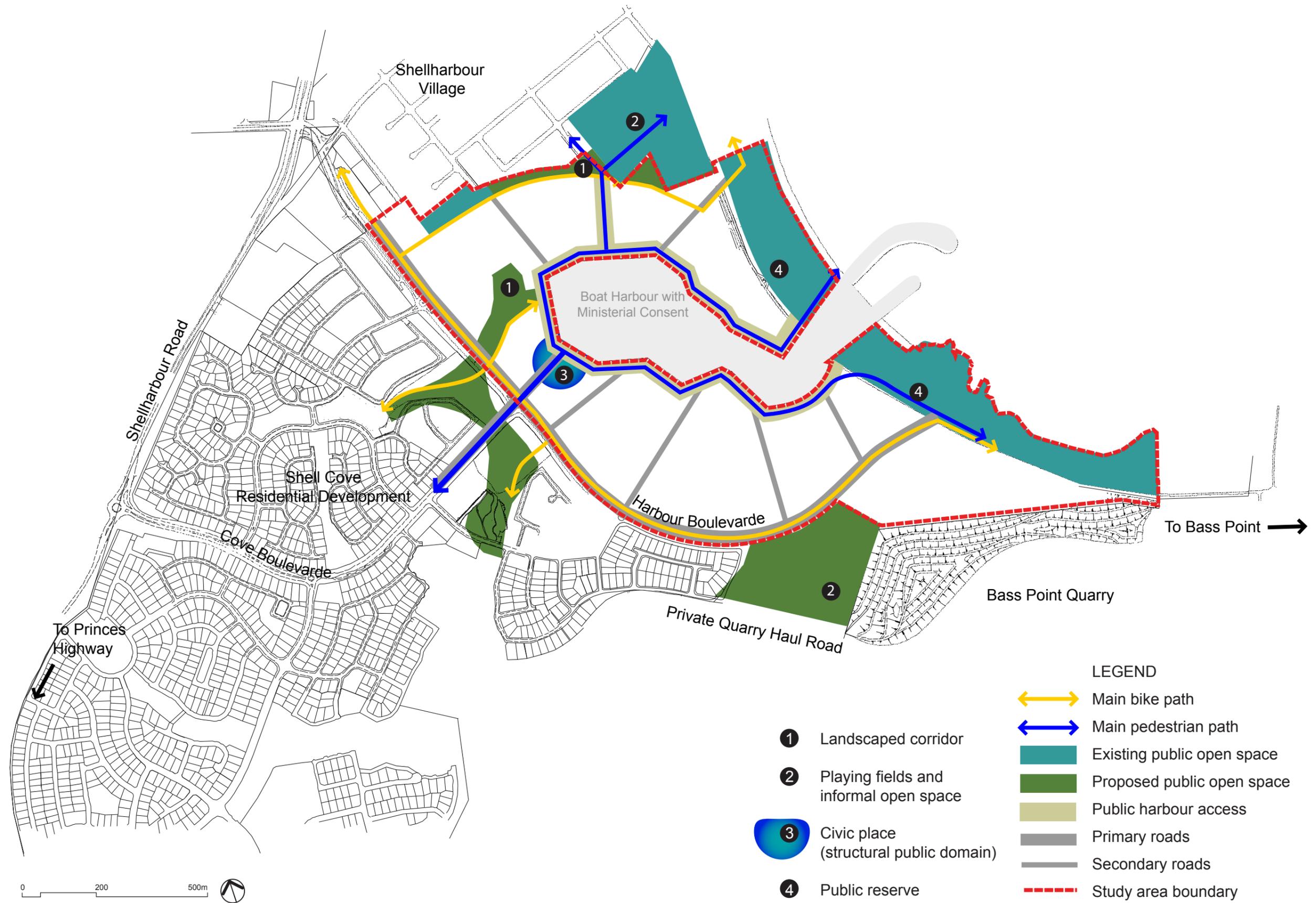


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5th Feb 2010



shell cove
shellharbour - nsw





- LEGEND**
- Main bike path
 - Main pedestrian path
 - Existing public open space
 - Proposed public open space
 - Public harbour access
 - Primary roads
 - Secondary roads
 - Study area boundary
 - 1 Landscaped corridor
 - 2 Playing fields and informal open space
 - 3 Civic place (structural public domain)
 - 4 Public reserve



boat harbour precinct - concept plan

208-8010
5th Feb 2010

0 200 500m

shell cove
shellharbour - nsw

