



Karoola Park

DRAFT Landscape Masterplan

Karoola Park Masterplan Report

Located on Wonnarua Country

Prepared for
Muswellbrook Shire Council

Issue
02

Date
09.07.24



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Acknowledgement of Country

Moir Landscape Architecture would like to acknowledge the traditional custodians of the lands and waters of Australia, most notably the Wonnarua Nation, the traditional owners of the lands on which this project resides. We acknowledge their contribution to our community and their deep connection to the land. We pay our respects to Elders, past and present.



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Issue 01

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01

Project Introduction



Project Overview

Moir Landscape Architecture has been engaged by Muswellbrook Shire Council to prepare a Landscape Masterplan for the existing Karoola Park, Muswellbrook NSW. The comprehensive Landscape Master Plan for the proposed park will comprise of multiple sporting facilities for larger sporting events, a functional recreational space that encourages community connection, active play opportunities, educational nodes, connected pathways for pedestrian and cyclists, and the integration of flood mitigation. The landscape masterplan is to be prepared in accordance with Muswellbrook Shire Council (MSC) requirements, relevant DCP's and design guidelines. Relevant NSW policies, strategies and frameworks will guide the design intent to ensure best design outcomes of the built environment and improve health and well-being benefits within the Muswellbrook community.

The key landscape objectives:

- Incorporate the storm water drainage design and community needs to establish a safe and functional public open space.
- To allow activation of event spaces, sporting facilities and recreation opportunities.
- Improve circulation and connectivity throughout the park by providing key entry points for adjacent residential area, public school and wider community.
- To provide a thriving place for the community that allows expression of creativity and adventure.
- Provide education of the landscape through connected nodes and experiences drawing people throughout the park to key landscape features.
- Address parking and traffic requirements and further resolve pedestrians experience at the thresholds to storm water services.



Site Overview

Karoola Park is a public open space located within the Muswellbrook residential zone northeast of the commercial town centre and main street (Bridge Street). The park is generally a northwest to southeast orientation bordered by Shiraz Street, Humphries Street, Cook Street and Hunter Street. The park is predominantly surrounded by residents lots, further increasing its use, frequency and need within the local community. Due to the sites low-lying topography, the sites concurrent use is a storm water management system that includes a mix of graded swale drains, storm water inlets and outlets and a central concrete weir beginning approximately in the middle of the parkland and directing water to the northwest outlet at the Hunter Street boundary. The park has multiple sporting facilities accommodating a variety of sporting and community events for larger groups.

LGA: Muswellbrook Shire Council

Suburb: Muswellbrook

Existing Facilities

- Netball Courts
- Sporting Change Rooms and Canteen/ Kiosk
- BMX Pump Track
- Open Playing Field
- Dog Park
- Playground Equipment
- Cricket Nets

Existing Users

- Local Community
- Adjoining Residents
- Muswellbrook Public School Students, Parents and Staff
- Fitness and Training Groups (Park Run)

- Property boundary
- Extent of works boundary
- Suburb boundary



Source: Nearmap, 2024. Scale: 1:3000 @ A3

Site Photos



Site Photos



Sporting/ Recreational



BMX Track



Sporting Facilities and Playgrounds



Educational



Shelter and Seating



02

Document Overview

Government Architect NSW Documents

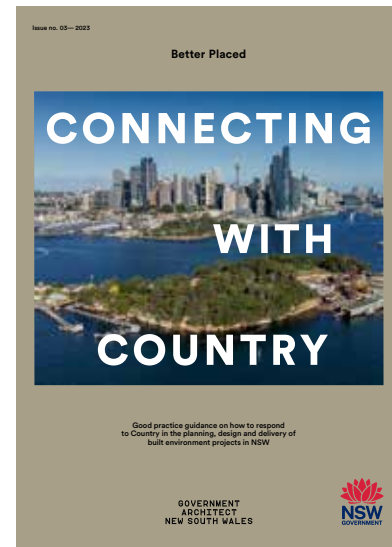


Better Placed

The Government Architect NSW (GANSW) has prepared Better Placed as an overarching policy that guides the planning and design of the built environment across NSW.

The Policy outlines key priorities for good design in NSW with regard to current issues including climate change, population growth and health. The document provides outlines key objectives for design, driven by an iterative, comprehensive design process.

Better Placed sits alongside other GANSW policies, guides, manuals and case studies including the Draft Connecting with Country framework and the Draft Greener Places Design Guide. The guidance provided by these documents will inform the design approach for the landscape strategy, ensuring the delivery of a high quality design in line with State Government principles.



Connecting with Country Framework

The Connecting with Country document is a framework for understanding the value of First Nations knowledge and experiences in the design and planning of the built environment in NSW. The framework has been prepared by GANSW in collaboration with Traditional Custodians, community representatives, consultants and other government staff.

The framework outlines the term 'Country' as "*Country encompasses everything. It includes both living and non-living elements. It holds everything within the landscape, including Earth, Water and Sky Country, as well as people, animals, plants, and the stories that connect them*" (p.20).

The document provides guidance on developing connections with Country to inform the planning, design and delivery of projects. It includes key principles and strategies for consideration, which are supported by case studies of existing projects across design disciplines.

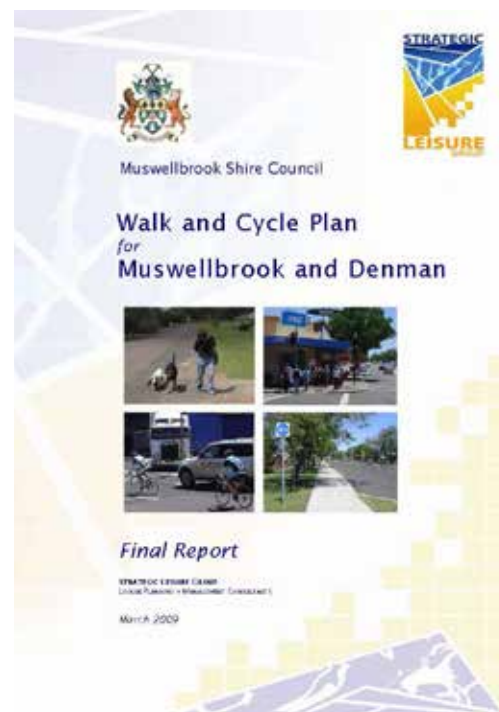


Public Open Space Strategy for NSW

The Public Open Space Strategy for NSW is a significant initiative aimed at enhancing public open spaces across the state. The document aims to create vibrant, accessible, and sustainable open spaces that enhance our quality of life. It's a step toward healthier, happier communities.

These spaces include parks, natural areas, waterways, sports grounds, historical sites, and recreation trails. The strategy aims to create more effective and accessible open spaces that contribute to ecological, economic, social, and cultural well-being. Projects such as the Parks for People program, the Open Spaces Program, and the Everyone Can Play program are part of this effort to improve public open spaces in NSW. Access to these spaces promotes physical and mental health, making them essential for our communities.

It provides a collaborative, coordinated, and evidence-based approach for government agencies to plan, invest, and deliver public open spaces.



Walk and Cycle Plan - 2009

Muswellbrook Shire Council is committed to providing walking and cycling facilities in Muswellbrook and Denman to improve mobility, recreation, and physical activity choices for people of varying ages and mobility. It also aims to ensure that the proposed network enhances the existing pathway network regarding connectivity, coverage, and safety.

The council aims to formalise access points to Karoola Park, increase signage and extend the park trail to the adjacent recreational infrastructure areas, ensuring connectivity and more opportunities for recreational activities. The council aims to address personal safety for path and trail users in linear open space reserves by conducting maintenance on existing paths and trail corridors.



DRAFT Disability Inclusion Action Plan 2022-2026

Muswellbrook Shire Council aims to foster positive community attitudes and behaviours by prioritising accessible infrastructure and social connections, which are crucial for making people with disabilities feel welcome and included.

The council is committed to creating liveable communities by focusing on safe and accessible transport options, well-maintained footpaths, convenient parking, and pedestrian crossings. Public spaces will be enhanced with more seating options, shaded areas, and improved accessibility features.

Playspaces will receive attention with the addition of accessible facilities, clear signage, proper shading, and secure fencing. Accessible parking spaces will be designed to accommodate vans and taxis for unloading, with convenient kerb ramp access to footpaths. Additionally, towns and villages will be equipped with accessible pathways connecting essential services and facilities, ensuring that all community members can navigate their neighbourhoods with ease.



Muswellbrook Urban Riparian Master Plan 2018

Muswellbrook Urban Riparian Master Plan is a framework report that outlines potential land-use opportunities for future development along the Muswellbrook riparian corridors and town centre. The report aims to identify opportunities to reactivate the Hunter River and Muscle Creek corridors, providing formal and informal access to create a sustainable source of tourism and local community space.

The master plan proposes improving the connection between Karoola Park and the Karoola Wetlands. Additionally, the amenities within the park are identified to experience flooding during seasons of excessive rainfall. As such, the master plan proposes using elevated mounds and naturalising the existing concrete channel to slow storm water and protect the existing amenities.

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Site Context



Context

The site is located in Muswellbrook NSW within the Muswellbrook Shire Council LGA. Muswellbrook is approximately 130 km northwest from Newcastle CBD and is connected to the Hunter and Upper Hunter Regions by the New England Highway.

The site is located to the east of the Hunter River and orientated in a northwest to southeast direction and integrating within the surrounding Muswellbrook residential zone.

Muswellbrook Shire is further connected by sporting facilities, recreational zones and smaller community parks and open spaces, generally to the south and east of the site boundary.

- 1 Victoria Park
- 2 Weeraman Fields
- 3 Muswellbrook Hospital
- 4 Muswellbrook Train station
- 5 Muswellbrook High School
- 6 Olympic Park
- 7 Rutherford Park
- 8 Volunteer Park
- 9 Commercial Area
- 10 Muswellbrook Public School

LEGEND

- Site boundary
- Suburb boundary
- Lot boundary
- Significant vegetation areas
- Hunter River



Source: Nearmap, 2024. Scale 1:25000 @A3

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Site Analysis



Existing Tree Cover

Muswellbrook Shire has multiple parks and open spaces, sporting facilities and established street tree species all contributing to the canopy cover and mitigation to the urban heat island.

The established tree species within the site boundary providing essential shade canopy cover are *Eucalyptus crebra*, *Angophora floribunda*, *Eucalyptus blakelyi*, *Acacia linearifolia*, *Eucalyptus fibrosa*, *Eucalyptus tereticornis*, *Eucalyptus sideroxylon*.

Increased canopy cover in voids within the landscape will further increase the overall canopy cover and contribute to mitigation of the urban heat island whilst improving health and well-being benefits and attracting native wildlife.

LEGEND

- Site boundary
- No Canopy Cover
- Canopy Cover



Source: Nearmap, 2023. Scale 1:15000 @A3

Land Use

The site is zoned as RE1 Public Recreation. Design considerations and intent will be guided by the objectives stated in Muswellbrook Local Environmental Plan 2009.

The land use zoning within the site’s immediate surrounds predominantly comprises of R1 - General Residential, SP2 - Health Service and SP2 - Rail Infrastructure. Muswellbrook Public School is zoned within the General Residential zone and adjoins a portion of the western boundary of the site.

LEGEND

- Property boundary
- Suburb boundary
- C3 - Environmental Management
- RE1 - Public Recreation
- R1 - General Residential (Public School)
- R1 - General Residential
- E2 - Commercial Centre
- SP2 - Health Service; SP2 - Rail Infrastructure
- E4 - General Industrial



Source: Nearmap, 2023. Scale 1:15000 @A3

Connectivity

The site access and parking is primarily via the three main carparking lots, one on Hastings Street and two on Newman Street located to the south of the boundary. As a result of the site surrounded by the residential zone, the park can be accessed from the rear of lots and from the surrounding roadway where lots are not located.

The main pedestrian pathway is orientated from Dumaresq Street to the west of the site boundary to Shiraz Street to the east further connecting Muswellbrook Primary School and the existing carparking areas. The pathway extends to the east of site boundary connecting to Queen Street. It is evident that multiple access points have been created by community foot traffic to gain access from adjacent roadways.

A number of bus stops are located within walking distance to the site providing public transport access within the local area and wider region.

LEGEND

- Site boundary
- Major road
- Park Accessibility by Street Access
- Bus Route
- Bus Stops
- Pedestrian / Cycle Connections
- Muswellbrook Public School
- Designated Car Parking



Source: Nearmap, 2024. Scale 1:15000 @A3



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Opportunities & Constraints

Opportunities

The following key opportunities have been identified for the site:

- 1 Formalise vegetated 'spine' within residential area for biodiversity and for recreational purposes
- 2 Utilise the proposed retention basin as an ecological micro-zone and increase water-sensitive design throughout the site. .
- 3 Maximise retaining existing trees and adding additional species to improve canopy cover, mitigation to the urban heat island, and enhanced biodiversity.
- 4 Utilise existing and proposed native vegetation for community educational purposes.
- 5 Utilise stormwater management methods as an aesthetic feature.
- 6 Enhance the connection between Karoola Park and Karoola Wetland using the Muswellbrook Urban Riparian Landcare Master Plan.

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Constraints

The following key constraints have been identified for the site:

- 1 Flood prone area, requires formal mitigation measures.
- 2 Manage interface with neighbouring properties, including lot boundaries and fence lines.
- 3 Address gaps in sealed walking and cycling tracks that limit user access of varying mobility.



06

Design Principles And Intent

Design Principles



Play

Develop unique play spaces that encourage visitation and exploration, ensuring a destination that the community can be proud of. Showcasing the Everyone Can Play design principles is also integral to the project.



Open Space

Ensure the site retains its existing open space and landscape character through a sensitive design approach whilst still providing an exciting and diverse range of recreational and passive offerings.



Recreation

Enhance existing sporting facilities and provide new opportunities that encourage physical activity such as an improved network of walking paths, a new play space, improved access to netball facilities and better connections to surrounding sports facilities.



Access For All

The design of the Masterplan will be underpinned by the importance of accessibility. Adhere to all relevant universal design and Australian standards to ensure a safe and enjoyable user experience while also providing unique play and recreation facilities with accessibility at the forefront.



Cultural celebration

Provide opportunities for cultural celebration and education of Muswellbrook’s unique cultural heritage through built form and embellishments within the park.



Celebration of Nature

Create meaningful and unique opportunities to connect with nature. Strengthen and showcase local flora through thoughtful consideration of plant species which enhance the park amenity through provision of shade and comfort.



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Masterplan

Proposed Masterplan

The following form the key elements of the proposed Masterplan:

- 1 Proposed flood mitigation/detention basin
- 2 Proposed viewing platform/deck
- 3 Upgraded car park and additional car spaces
- 4 Naturalised storm water drain
- 5 New play space
- 6 Existing play space removed
- 7 Existing BMX Track (upgrade if demand can be demonstrated)
- 8 Tree planting on north side of paths for shade
- 9 New pathway connections
- 10 Existing Netball/Playing Courts
- 11 Existing Dog Park
- 12 Proposed elevated deck over flood prone land.



Source: Nearmap, 2024.

Area 01 - Western section

The following form the key elements of Area 01:

- 1 Naturalised detention basin
- 2 Viewing Platform
- 3 Upgraded car park and additional car spaces
- 4 Naturalised storm water drain
- 5 BMX Track (upgraded if demand can be demonstrated)
- 6 New Play Space
- 7 Existing Netball/Playing Courts
- 8 Proposed crossings for naturalised drainage channel
- 9 New path connection
- 10 New shade trees on north side of path.

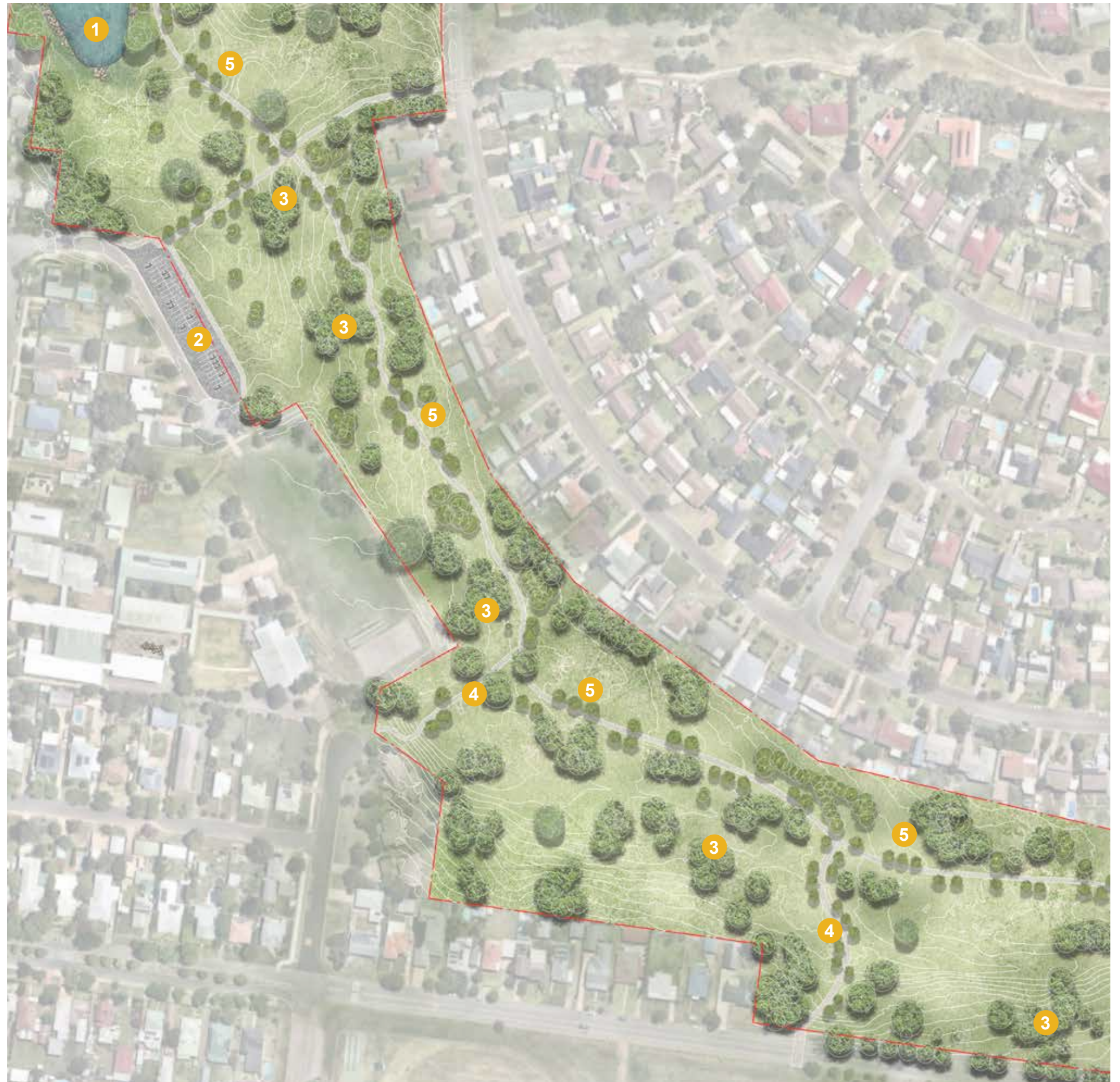


Source: Nearmap, 2024.

Area 02 - Central Section

The following forms the key elements of Area 02:

- 1 Naturalised detention basin
- 2 Upgraded car park and additional car spaces
- 3 Native Planting Grove
- 4 New path connection
- 5 New shade trees on north side of path.



Source: Nearmap, 2024.



Area 03 - Eastern section

The following form the key elements of the proposed Masterplan:

- 1 Boardwalk over low-lying area (All abiliites access)
- 2 Existing Dog Park retained
- 3 Native Planting Grove
- 4 New path connection
- 5 New shade trees on north side of path.
- 6 Existing shrubs removed to improve sight lines



Source: Nearmap, 2024.

Access and Connectivity

-  DDA accessible pedestrian pathways connecting the entire park land.
-  Upgraded and resurfaced car parking areas
-  Improved pedestrian crossings to improve pedestrian safety.
-  Park Access points



Source: Nearmap, 2024.

Precedent Images





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