WUNGONG URBAN WATER PROJECT

Public Open Space Policy
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<th>Approved By</th>
<th>Date</th>
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1.0 Purpose

The purpose of this policy is to set out the requirements of the Metropolitan Redevelopment Authority (the Authority) for the provision of public open space in the Wungong Urban Water Project Area (hereafter referred to as Wungong Urban). It is aimed at assisting developers/landowners in the design of their respective structure plans/subdivision plan proposals and the Authority in the decision making process.

2.0 Context

The establishment of Wungong Urban’s open space network requires the provision of open space for the conservation of natural and cultural features as well as land to serve the social and recreational needs of its future residents.

The Wungong Urban Water Redevelopment Scheme 2007 (the Scheme) identifies thirteen Structure Plan Areas requiring detailed planning through structure planning. To obtain structure plan approval, developers/landowners are to incorporate such a level of detail as, in the opinion of the Authority, is necessary to satisfy the planning requirements of the Structure Plan Area. These planning requirements are laid out in the Scheme and require developers/landowners to identify public open space and the delineation of Active Open Space Zones and Passive Open Space Zones.

Active Open Space Zones and Passive Open Space Zones are designated on the Master Plan (refer Appendix 1) in strategic locations that are responsive to the physical characteristics of the area and consider the expected density and movement patterns of the future residents.

The principles/objectives of the passive and active public open space zones are contained in the Scheme, together with seventeen Master Plan elements, which are intended to recognise particular features which require consideration as part of the planning and development process. Although these Master Plan elements are depicted on the Master Plan/Structure Plan Map, the Authority has recognised the need to vary the locations of some of these elements as part of the structure planning process.

To ensure equitable contribution towards the provision of public open space and community infrastructure by all landowners at the time of subdividing their holdings, the Scheme establishes a cost sharing arrangement. This arrangement is referred to as the Developer Contribution Scheme (DCS) and is established under Part 7 of the Scheme to provide the mechanism for the acquisition and development of open space, amongst other things. The Authority’s Developer Contribution Scheme Report (2011) has been approved by the Minister for Planning and provides a detailed background to the DCS.

This policy provides guidance on how the Master Plan elements may be varied and identifies requirements for the provision of public open space.
3.0 Objectives

The objectives of this policy are to:

3.1 Ensure that an appropriate amount of public open space is provided to contribute towards the recreational and social needs of the community in appropriate locations.

3.2 Integrate conservation and urban water management principles and functions within public open space including the protection and conservation of water courses and wetlands.

4.0 Policy Application

4.1 This Policy applies to all structure plan and subdivision proposals for residential development in the Wungong Urban Water Redevelopment Scheme (the Scheme) area.

5.0 Status

(a) Relationship to Wungong Urban Water Redevelopment Scheme 2007

This Policy is a zone development policy prepared, advertised and adopted pursuant to Part 4, Clause 4.2 of the Scheme. Under Clause 4.6(3), this policy is to have effect as if it was a standard or requirement incorporated in the Scheme, noting the hierarchy of planning instruments in clause 4.6(4).

(b) Relationship to other State Planning/ Western Australian Planning Commission (WAPC) policies

This policy has due regard to, and should be read in conjunction with the State planning policies. Of particular relevance to this Policy are:

- State Planning Policy 1 – State Planning Framework
- State Planning Policy 3.6 – Development Contributions for Infrastructure
- Development Control Policy 2.3 – Public Open Space in Residential Areas

(c) Relationship to other Planning and Zone Development Policies

This policy has due regard to, and should be read in conjunction with the Wungong Urban Water Redevelopment’s entire Planning and Zone Development Policy suite. Of particular relevance to this Policy are:

- Zone Development Policy - Residential Zones
- Zone Development Policy - Residential Zones: Summary Tables
- Urban Water Management Policy
- Schools Policy
- Public Design Policy
(d) Other

This Policy shall also be read in conjunction with the following:

- Minister for the Environment; Climate Change; Peel Statement that a scheme may be implemented No 762: Wungong Urban Water Redevelopment Scheme 2006
- Wungong Urban Water Local Planning Strategy
- Wungong Urban Water Master Plan
- Wungong Urban Water Developer Contribution Scheme
- Wungong Urban Water Master Plan District Water Management Strategy
- Liveable Neighbourhoods, WAPC
- City of Armadale Community Infrastructure Plan (CIP)
- Designing Out Crime Planning Guidelines, WAPC

6.0 Interpretations

All interpretations are consistent with terms as defined under the Scheme. The following definitions relate directly to the application of this Policy:

‘Public Open Space’ means land used or intended for use for recreational purposes by the public and includes parks, public gardens, foreshore reserves, playgrounds and sports fields but does not include regional open space.

‘Average Recurrence Interval’ (ARI) means the average or expected value of the periods between exceedance of a given rainfall total accumulated over a given duration. It is implicit in this definition that the periods between exceedance are generally random.

‘Living Streams’ are depicted on the Master Plan/Scheme Map as “Retained Brook/Drain(s)” and “Relocated Brook/Drain”. “Retained Brook/Drain(s) are established watercourses which are to be generally retained in place as ‘living streams’ and “Relocated Brook/Drain(s)” are established watercourses which are to be relocated and created as ‘living streams’ in the general location. Living Streams should function as viable aquatic ecosystems that enhance biodiversity and water quality.

‘Community Park’ means a park designed to fulfil a neighbourhood function within the open space network. Community parks should be provided with a minimum dimension of 60x60 metres, allowing for minor variations tailored to suit local site conditions and user requirements, to facilitate active play space areas and help cater for the recreational needs of the surrounding neighbourhood.

‘Senior Playing Field’ means a sports playing field capable of accommodating senior level sports (Australian-rules football being the largest field). Playing field dimensions are ideally 185 metres in length and 143 metres in width, with 4 metre boundary clearances and 15 metre spacing behind goals.
7.0 Policy Measures

Open Space Function and Distribution

7.1 Structure plan proposals are to take into account the placement of the Open Space Place Codes, as well as the elements depicted on the master plan/scheme map, and provide, as a minimum, the open space areas contained in Schedule 1, based on the type of open space credits provided for in Schedule 2, noting that certain Master Plan elements do not attract a credit for public open space.

7.2 A structure plan area may vary the presence or location of any master plan element not referred to in Clause 7.3, having regard to any relevant detailed technical study and advice submitted to the Authority to make up the required provision of public open space. Any proposed variation should seek to:

- Incorporate land for connected or linear open space for walking and cycling;
- Provide for a combination of passive (informal play areas) and active (formal playing fields);
- Provide for local parks in a safe walking distance from all dwellings;
- Take into account shared use of open space, for example, playing fields and schools; and
- Incorporate drainage wherever practicable using urban water management principles set out within the Wungong Urban Water District Water Management Strategy.

7.3 The master plan elements which are considered to be in existence through processes outside the control or discretion of the Authority and therefore cannot be varied under this policy are:

- Conservation Category Wetlands and associated buffers;
- Resource Enhancement Wetlands and associated buffers;
- Water Courses and associated floodways and buffers;
- Bush Forever Sites;
- Registered Aboriginal Heritage sites and
- Current Watercourse prior to relocation.

7.4 The provision of Public Open Space shall also include requirements for community infrastructure as determined through the City of Armadale’s Community Infrastructure Plan. These requirements have been incorporated into the DCS and are outlined in Schedule 1.

7.5 Sufficient active public open space is to be provided to ensure the sporting and recreation requirements of the community are adequately provided for. Senior sized playing fields are required to be provided within structure plan areas as part of the Community Infrastructure Plan allocation consistent with the requirements for playing fields indicated in Schedule 1.
Developers will be required to demonstrate that Public Open Space (POS) turfed areas will be useable within 24 hours of any rain event (excluding greater than five year Average Recurrence Interval (ARI) events).

Turfed areas that are not useable within 24 hours of a rain event (as described above) will be considered to have a drainage function rather than a POS function.

7.6 Co-location of open space place codes and master plan elements (for example, active open space and schools) is encouraged where possible to optimise the provision of open space throughout each structure plan area.

7.7 The specifications for hard and soft landscaping shall be in accordance with the sustainability objectives and environmental conditions applying to the Scheme. Strategies for achieving those objectives are to be articulated in the WUW Foreshore Management Plan, the WUW District Water Management Strategy, the WUW Developer Contribution Scheme, and in WUW Cell based Landscape and Irrigation Management Strategies and Local Water Management Strategies. Landscape plans are to be prepared in accordance with those strategies and in consultation with the City of Armadale Parks Services. All plantings shall be supported by a maintenance and watering period of at least two summer periods to ensure full establishment.

**Urban Water Management**

7.8 A Local Water Management Strategy is to be developed for each structure plan area, in accordance with Better Urban Water Management (WAPC, 2008) to meet the requirements of the Wungong Urban Water Master Plan District Water Management Strategy.

7.9 All subdivision proposals must address urban water management consistent with Better Urban Water Management (WAPC, 2008) and the Wungong Urban Water Master Plan District Water Management Strategy. Where an approved local water management strategy exists, a condition of subdivision will require the preparation and implementation of an Urban Water Management Plan.

**Foreshore Reserves**

7.10 Consistent with the policy provisions of the WAPC\(^1\), land within a foreshore reserve is to be ceded free of cost and without payment of compensation by the Crown, where a subdivision includes land abutting a water body or a watercourse and is to be provided in addition to the credited public open space contribution.

7.11 The provision of foreshore reserves and any development proposed within or adjacent to foreshore reserves should have consideration for any relevant foreshore management plan adopted by the Authority, including those for the Wungong River and Neerigen Brooks North and South.

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\(^1\) Western Australia Planning Commission (2007), *Liveable Neighbourhoods* Element 4, R9-R11.
**Wetland and Buffers**

7.12 Consistent with the policy provisions of the WAPC\(^2\), land within a Conservation Category and Resource Enhancement Wetlands is to be ceded free of cost and without payment of compensation by the Crown, and is to be provided in addition to the credited public open space contribution.

7.13 The boundary and extent of a wetland and its buffer is to be determined in reference to the Master Plan/Scheme Map, the WUW Foreshore Management Plan and in consultation with the Authority and the Department of Environment and Conservation (DEC). The location and extent of wetland buffers may be refined on a site specific basis as part of the submission of a Wetland Management Plan in the structure planning process. The submission of a Wetland Management Plan is to address the requirements of Ministerial Statement 762 in consultation with the Authority and DEC.

**Registered Aboriginal Heritage Sites**

7.14 The design of all Aboriginal Heritage sites is to be in accordance with the Aboriginal Heritage Management Plan and the Authority’s Interpretative Strategy.

7.15 Where an area of open space includes an archaeological site, the site is to be protected via incorporation into the open space area and managed in accordance with the Aboriginal Heritage Management Plan.

**Park Avenues and Community Parks**

7.16 A flexible approach may be taken to the incorporation of Park Avenues and Community Parks within structure plan designs to accommodate local and neighbourhood level parks (see Figure 1 for typical Park Avenue layout).

7.17 Park Avenue designs should be guided by:-

- The optimal efficiency of drainage design and associated requirements for land fill to elevate properties to a developable level;
- Water corridor linkages with adjacent structure plan areas;
- The optimal allocation of public open space for active purposes; and
- Water quality improvement requirements.

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7.18 Community Park designs should:-

- Provide a minimum dimension of 60x60 metres, allowing for minor variations tailored to suit local site conditions and user requirements, to facilitate active play space areas and help cater for the recreational needs of the surrounding neighbourhood.
- Be located wherever possible alongside Avenues, Living Streams and Neerigen Brooks North and South, in order to provide easy neighbourhood access to parkland and linkages to the wider integrated open space network in accordance with the master plan/scheme map.
- Protect and enhance vistas to the hills and views to wetlands and significant vegetation stands within Community Parks.
- Permanent open water bodies are not generally supported.
- Water bodies for irrigation and recharge purposes will require Department of Water approval and consistency with the overall Urban Water Management strategy.
- Incorporate community facilities, such as shade structures, ablution blocks and playgrounds. Landscaping, lighting and fencing should have regard for CPTED principles including the use of anti-graffiti paint.
Developers are encouraged to engage in consultation with the City of Armadale Parks Services in designing Community Parks, particularly where community facilities (e.g. playgrounds and other physical infrastructure) are being proposed.

**Living Streams**

7.19 The living streams as articulated in the master plan/scheme map and the DCS Report (2011) should be laid out, aligned and designed as follows:-

- The tributary drains of Wungong River should be rehabilitated as Living Streams and watercourses. Neerigen Brook North and South, the Brickworks ‘A’ & ‘B’ drains shall be generally maintained on their existing alignments, with Birrega Main Drain being addressed on a site specific basis.
- In respect to alignment and/or meandering of Living Stream corridors, a deviation from the central alignment may be supported subject to consultation and agreement with the Authority. Minor variation to location and/or the meandering of Living Streams is encouraged where remnant vegetation, native heritage sites and site topography can be retained and protected in agreement with the Authority.
- Shared use paths along Living Streams should link with the Wungong Trail located along the Wungong River and Neerigen Brook North and South foreshores.
- Living Streams are integral components of the WUW Urban Water Management Policy. As such policy requirements are to be cross referenced with this document and the WUW Foreshore Management Plan.
- The DEC’s River Restoration Manuals may serve as guides for the creation of Living Streams (see Figure 2 for an indicative layout of Living Streams). The open woodland park land zone is a 15 – 25 metre wide area of public open space on each side of the stream. Areas of the woodland park may be grassed with a non-invasive turf species for use as active open space. Playgrounds and small shelters may be located within the open park woodland (above the five year return flood line).

![Figure 2 - Indicative Layout of Living Streams](image-url)

7.20 Any change to the width and alignment of the Living Streams corridor would need to meet the objectives and specifications contained in the Wungong Urban Water Master Plan District Water Management Strategy (2009).
8.0 Planning Approval Requirements

Structure Plans

8.1 When assessing an application for structure plan approval, the Authority will have regard for the requirements and recommendations of the City of Armadale which has responsibility for the ongoing maintenance and management of the open space. Once approval has been granted for a structure plan by the Authority, subdivision applications lodged with the WAPC are to be consistent with the terms of the approved structure plan.

8.2 Applications for structure plan approval are to address the requirements of clause 6.8 of the Scheme. More specifically in respect to public open space, the application is to identify:

A. Total area of public open space as required by Schedule 1 of this policy;
B. Land areas referred to in Schedule 2 of this policy;
C. Senior Playing Fields (where required) in accordance with Schedule 1 of this policy; and
D. Design methods employed to satisfy the objectives of this policy.

Subdivision Applications

8.3 The Authority will provide recommendations to the WAPC in respect of subdivision applications. The Authority will assess whether an application complies with the public open space allocations of an approved structure plan, and make recommendations to the WAPC accordingly. To assist this assessment, subdivision applications are to include a schedule of open space allocations relevant to the subdivisional area, demonstrating compliance with the approved structure plan.

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3 It is acknowledged that there are limited and special instances where open space will be managed by a State Government agency and not the City of Armadale.
Schedule 1: Provision of Public Open Space

The Wungong Urban Water Developer Contribution Scheme (DCS) 2011, established under Part 7 of the Wungong Urban Water Redevelopment Scheme 2007, provides for the acquisition of open space areas. The DCS incorporates an estimate of the total cost of land to be acquired for public open space. As landowners elect to subdivide, they pay their proportion of DCS costs. These funds are used to, amongst other things, acquire land for public open space or to reimburse landowners the value of credited land that may be ceded through the process of subdivision. In addition to the acquisition of land for public open space, the DCS also coordinates the funding of the development of the land to a standard suitable for community use and for ongoing maintenance by the City of Armadale.

Landowners who provide the amount of public open space indicated in Table 1 consistent with an approved structure plan are refunded from the DCS for the value of the land contributing to public open space. Land that achieves credit for public open space, and is therefore subject to acquisition through the DCS is determined by Schedule 2.

Land required for Foreshore Reserves, wetlands and associated buffers (as detailed in provisions 7.10 and 7.12) is additional to the land required in this Schedule.

Table 1: Total (net) amount of public open space to be provided in each structure plan area

<table>
<thead>
<tr>
<th>Wungong Urban Water Structure Plan Area</th>
<th>Master Plan Open Space Areas</th>
<th>Community Infrastructure Plan (CIP) Areas</th>
<th>Senior Playing Fields required</th>
</tr>
</thead>
<tbody>
<tr>
<td>Structure Plan Area A:</td>
<td>641m²</td>
<td>+ 167,076m²</td>
<td></td>
</tr>
<tr>
<td>Structure Plan Area B:</td>
<td>46,943m²</td>
<td>+ Nil</td>
<td></td>
</tr>
<tr>
<td>Structure Plan Area C:</td>
<td>75,105m²</td>
<td>+ 2,500m²</td>
<td></td>
</tr>
<tr>
<td>Structure Plan Area D:</td>
<td>76,967m²</td>
<td>+ 32,045m²</td>
<td>2 fields</td>
</tr>
<tr>
<td>Structure Plan Area E:</td>
<td>52,859m²</td>
<td>+ Nil</td>
<td></td>
</tr>
<tr>
<td>Structure Plan Area F:</td>
<td>283,934m²</td>
<td>+ 5,000m²</td>
<td></td>
</tr>
<tr>
<td>Structure Plan Area G:</td>
<td>87,110m²</td>
<td>+ 27,745m²</td>
<td>1 field</td>
</tr>
<tr>
<td>Structure Plan Area H:</td>
<td>152,551m²</td>
<td>+ 1220m²</td>
<td>1 field</td>
</tr>
<tr>
<td>Structure Plan Area IB:</td>
<td>15,683m²</td>
<td>+ Nil</td>
<td></td>
</tr>
<tr>
<td>Structure Plan Area J:</td>
<td>87,317m²</td>
<td>+ 5200m²</td>
<td>1 field</td>
</tr>
<tr>
<td>Structure Plan Area K:</td>
<td>125,911m²</td>
<td>+ 25,291m²</td>
<td>2 fields</td>
</tr>
<tr>
<td>Structure Plan Area L:</td>
<td>37,056m²</td>
<td>+ Nil</td>
<td></td>
</tr>
</tbody>
</table>
The identified “Master Plan Open Space Areas” and CIP areas in Table 1 are the net areas to be provided in each structure plan area. These figures are consistent with Schedule 3, Item 11 of the DCS, which gives a break-down of the type of open space apportioned to each Structure Plan Area under the Master Plan modelling process.

The playing fields identified in Table 1 are in addition to, and complement the Regional Open Space identified in the Scheme Map at Twelfth Road.

Landowners may provide public open space in addition to that shown in Table 1, but no DCS refund applies to the additional public open space.

Where landowners elect to improve the open space through landscaping they may enter into an agreement with the Authority to undertake the DCS works. Where the cost of such work is equal to, or exceeds, the DCS provisions, the developer will receive a DCS refund to the value of the minimum standard. Once the public open space areas have been developed they are transferred and become the responsibility of the City of Armadale, subject to any construction maintenance period relating to improvements. An estimate of cost for the development of Active Open Space can be found in the Public Open Space Development cost estimates contained in the WUW Developer Contribution Scheme Report (2011) available on the WUW website.

Structure Plan Area IA is situated at Rowley Road, and segregated from the balance of the project area. As this structure plan area is excluded from the DCS, public open space within this structure plan area is to be determined in accordance with the provisions of the WAPC Liveable Neighbourhoods policy requirements. Accordingly, Structure Plan Area IA is not included within Table 1.
Schedule 2: Credits for Public Open Space Provision

The following tables identify public open space credits for various Master Plan Elements which are to be used in the calculation of public open space area requirements in Schedule 1. Where Master Plan elements overlap, the lesser POS credit value is to apply.

Table 2: Land without Public Open Space Credit

<table>
<thead>
<tr>
<th>Master Plan Element</th>
<th>Open Space Place Code/ Zone</th>
<th>POS Credit</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bush Forever Sites</td>
<td>Passive</td>
<td>0%</td>
</tr>
<tr>
<td>Conservation Category Wetland</td>
<td>Passive</td>
<td>0%</td>
</tr>
<tr>
<td>Conservation Category Wetland Buffer</td>
<td>Passive</td>
<td>0%</td>
</tr>
<tr>
<td>Wungong River and Foreshore</td>
<td>Active/Passive</td>
<td>0%</td>
</tr>
<tr>
<td>Neerigen Brook and Foreshore</td>
<td>Active/Passive</td>
<td>0%</td>
</tr>
<tr>
<td>Resource Enhancement Wetlands</td>
<td>Passive</td>
<td>0%</td>
</tr>
</tbody>
</table>

The areas identified as Passive Open Space on the Master Plan, being foreshores, Conservation Category Wetlands (CCW) and Resource Enhancement Wetlands(REW) are to be ceded free of cost by the developer, and these areas do not contribute to public open space.

The extent of buffer areas identified on the Master Plan is indicative and may need to be confirmed following more detail investigation at structure planning stage and consultation with the DEC.

Table 3: Land with Partial Public Open Space Credit

<table>
<thead>
<tr>
<th>Master Plan Element</th>
<th>Open Space Place Code/Zone</th>
<th>POS Credit</th>
</tr>
</thead>
<tbody>
<tr>
<td>Park Avenues*</td>
<td>Active</td>
<td>50%</td>
</tr>
<tr>
<td>Resource Enhancement Wetland Buffers</td>
<td>Active</td>
<td>50%</td>
</tr>
<tr>
<td>Living Streams (Parks)</td>
<td>Active</td>
<td>50%</td>
</tr>
</tbody>
</table>

Table 4: Land with Full Public Open Space Credit

<table>
<thead>
<tr>
<th>Master Plan Element</th>
<th>Open Space Place Code/Zone</th>
<th>POS Credit</th>
</tr>
</thead>
<tbody>
<tr>
<td>Community Parks*</td>
<td>Active</td>
<td>100%</td>
</tr>
</tbody>
</table>
* In respect of Tables 3 and 4:

- Where any open space is to be used for the detention of stormwater during and immediately following a greater than five year Average Recurrence Interval (ARI) event, as indicated in the Local Water Management Strategy prepared and submitted in support of the structure plan and adopted by the Authority, 100% credit is given towards public open space.

- Where any open space is used to accommodate the detention of stormwater for a greater than one year ARI event but less than a 1 in 5 year ARI event, as indicated in the Local Water Management Strategy prepared and submitted in support of the structure plan and adopted by the Authority, a 50% credit is given.

- Where any open space is used to detain or infiltrate stormwater from less than a 1 in 1 year ARI event as identified in the Local Water Management Strategy prepared and submitted in support of the structure plan and adopted by the Authority, no credit is to be given towards public open space.

- Where the integration of stormwater into public open space results in a conflict regarding open space credits, the lesser credit value should be applied.
Appendix 1: Wungong Urban Water Master Plan