

City of Ballarat

Roundabout Landscape Guidelines 2016

Introduction

City of Ballarat recognises the significant role roundabouts can play as part of enhancing the streetscapes of Ballarat.

These guidelines are intended to provide greater clarity to officers and residents in undertaking landscaping and enhancement of roundabouts across Ballarat.

Roundabouts are often high visibility sites that are ideal showcases for innovative compact landscaping displays.

With the move to higher density living many people only have small areas to pursue horticulture at home and roundabouts with their limited size can inspire residents with small yards by examples of plant selection and landscape styles. (Many people contact Council to ask about plants and materials that we have used in our roundabouts).

Roundabouts present many challenges for plants as they are often exposed to extremes of weather, so roundabout landscapes often combine durable 'hard' elements such as stone, metal, timber etc along with 'soft' elements like plant and mulch surfaces to create a hardy landscape effect.

Planting Treatments

Roundabout plants are selected from water efficient varieties and show good examples of quality low water usage horticulture. Roundabout plant selection should consider durability and ease of replacement for when damage, vandalism or vehicle damage occurs. Roundabouts are generally un-irrigated sites. Irrigation should only be installed as an exception for special sites, rather than the rule. Roundabout landscapes are often short term displays that last up to a few years and then are renewed or changed to utilise new methods, materials and themes.

Roundabout landscapes should have a theme that fits into the area or street as in if there are a number of roundabouts in a street they should have complementary landscaping to indicate a consistent theme for the street.

Streets that have isolated roundabouts could be landscaped to provide an individual style or create an interest or point of difference.

Landscape Treatments

Roundabouts that are close to prominent sites can or should have a complimentary theme to the site an example is the Armstrong and Market St roundabout in front of the Aboriginal Co-op.

Roundabout landscape features should not be considered as Public Art but as short term feature objects to add to the overall landscape effect. Public art is generally a commissioned work that is longer term in nature.

Roundabout landscapes should not be overly complex or need high levels of maintenance or use high water use plants to preserve the landscape effect. Any hard landscaping and/or structures shall be undertaken in a manner that is respectful of the immediate neighbourhood and the context of the area.

Heritage Areas / Planning Controls

The Ballarat Planning Scheme provisions including all zone controls and overlay shall be met and installation or structure shall comply with the intent and purpose of these controls.

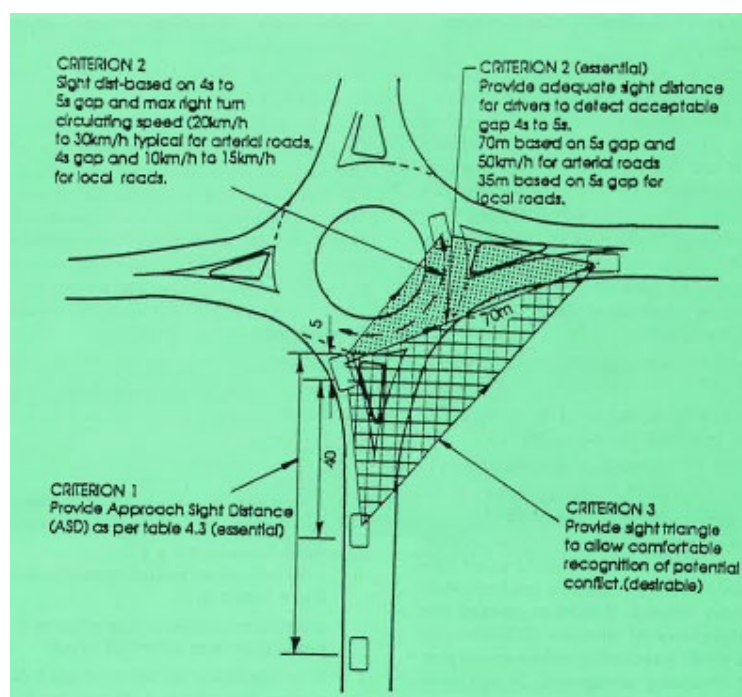
Traffic Controls

As roundabouts are traffic control devices landscape treatments must be designed or managed to meet traffic sight-line distances and angles as required by VicRoads. VicRoads guidelines recommend drivers approach a roundabout at 15 km/hr in a 60 k zone.

Newly constructed or refurbished roundabouts should have a concrete annulus inside the kerb to protect the landscape edges and features from traffic mounting the kerb, this may also reduce the chance of any claim for damage should a vehicle contact any landscape feature close to the back of kerb. Also helps to increase the safety of crews undertaking any maintenance on the roundabout.

Sight Distance

Several sight distance criteria should be applied to the combination of vertical and horizontal geometrics at roundabouts. These criteria which greatly influence the safety performance of a roundabout and also affect the positioning of signs and plantations etc, are illustrated below.



Criterion 1

The alignment on the approach should be such that the driver has a good view of both the splitter island, the central island and desirably the circulating carriageway. Adequate approach stopping sight distance should be provided, to the “Give Way” lines and, as an absolute minimum, to the nose of the splitter island.

Criterion 2

A driver, stationary at the “Give Way” line, should have a clear line of sight to approaching traffic entering the roundabout from an approach immediately to the right, for at least a distance representing the travel time equal to the critical acceptance gap. A critical gap value of 5 s, giving a distance of 70 m, (based on an entry speed of 50 km/h), would be typical for arterial road roundabouts operating with low circulating flows. At sites with higher circulating flows or in local streets, criterion 2 sight distance could be based on a critical gap of 4 s.

Criterion 3

It is also desirable that drivers approaching the roundabout are able to see other entering vehicles well before they reach the “Give Way” line. The 40 m – 70 m sight triangle shown in the above diagram allows an approaching driver, slowed to 50 km/h, time to stop and avoid a vehicle driving through the roundabout at 50 km/h. It is desirable that this sight triangle be achieved, although in urban areas it may not always be possible.

Referral

Any roundabout installation proposed beyond the planting of a roundabout shall be formally referred to for comment and advice to:

- The Heritage Advisory Committee (If the roundabout is in a heritage area.)
- The Public Art Advisory Committee
- The Disability Advisory Committee

Consultation

Where a roundabout installation or landscape treatment is proposed beyond planting all households and / or commercial premises within the immediate vicinity of the roundabout shall be consulted.