SITE LAYOUT

Energy efficiency objectives
To achieve and protect energy efficient dwellings and buildings.
To ensure the orientation and layout of development reduce fossil fuel energy use and make appropriate use of daylight and solar energy.
To ensure dwellings achieve adequate thermal efficiency.

Standard D6
Buildings should be:

- Oriented to make appropriate use of solar energy.
- Sited and designed to ensure that the energy efficiency of existing dwellings on adjoining lots is not unreasonably reduced.

Living areas and private open space should be located on the north side of the development, if practicable.
Developments should be designed so that solar access to north-facing windows is optimised.
Dwellings located in a climate zone identified in Table D1 should not exceed the maximum NatHERS annual cooling load specified in the following table.

Table D1 Cooling load

<table>
<thead>
<tr>
<th>NatHERS climate zone</th>
<th>NatHERS maximum cooling load MJ/M² per annum</th>
</tr>
</thead>
<tbody>
<tr>
<td>Climate zone 21 Melbourne</td>
<td>30</td>
</tr>
<tr>
<td>Climate zone 22 East Sale</td>
<td>22</td>
</tr>
<tr>
<td>Climate zone 27 Mildura</td>
<td>69</td>
</tr>
<tr>
<td>Climate zone 60 Tullamarine</td>
<td>22</td>
</tr>
<tr>
<td>Climate zone 62 Moorabbin</td>
<td>21</td>
</tr>
<tr>
<td>Climate zone 63 Warrnambool</td>
<td>21</td>
</tr>
<tr>
<td>Climate zone 64 Cape Otway</td>
<td>19</td>
</tr>
<tr>
<td>Climate zone 66 Ballarat</td>
<td>23</td>
</tr>
</tbody>
</table>

Note: Refer to NatHERS zone map, Nationwide House Energy Rating Scheme (Commonwealth Department of Environment and Energy).

Decision guidelines
Before deciding on an application, the responsible authority must consider:

- The design response.
- The size, orientation and layout of the site.
- The existing amount of solar access to abutting properties.
- The availability of solar access to north-facing windows on the site.
- The annual cooling load for each dwelling.
Communal open space objective

To ensure that communal open space is accessible, practical, attractive, easily maintained and integrated with the layout of the development.

**Standard D7**

Developments with 40 or more dwellings should provide a minimum area of communal open space of 2.5 square metres per dwelling or 250 square metres, whichever is lesser.

Communal open space should:

- Be located to:
  - Provide passive surveillance opportunities, where appropriate.
  - Provide outlook for as many dwellings as practicable.
  - Avoid overlooking into habitable rooms and private open space of new dwellings.
  - Minimise noise impacts to new and existing dwellings.

- Be designed to protect any natural features on the site.
- Maximise landscaping opportunities.
- Be accessible, useable and capable of efficient management.

**Decision guidelines**

Before deciding on an application, the responsible authority must consider:

- Any relevant urban design objective, policy or statement set out in this scheme.
- The design response.
- The useability and amenity of the communal open space based on its size, location, accessibility and reasonable recreation needs of residents.
- The availability of and access to public open space.

Solar access to communal outdoor open space objective

To allow solar access into communal outdoor open space.

**Standard D8**

The communal outdoor open space should be located on the north side of a building, if appropriate. At least 50 per cent or 125 square metres, whichever is the lesser, of the primary communal outdoor open space should receive a minimum of two hours of sunlight between 9am and 3pm on 21 June.

**Decision guidelines**

Before deciding on an application, the responsible authority must consider:

- The design response.
- The useability and amenity of the primary communal outdoor open space areas based on the urban context, the orientation of the building, the layout of dwellings and the sunlight it will receive.

Safety objective

To ensure the layout of development provides for the safety and security of residents and property.

**Standard D9**

Entrances to dwellings should not be obscured or isolated from the street and internal accessways.
Planting which creates unsafe spaces along streets and accessways should be avoided. Developments should be designed to provide good lighting, visibility and surveillance of car parks and internal accessways.

Private spaces within developments should be protected from inappropriate use as public thoroughfares.

**Decision guideline**

Before deciding on an application, the responsible authority must consider the design response.

**Landscaping objectives**

To encourage development that respects the landscape character of the area.

To encourage development that maintains and enhances habitat for plants and animals in locations of habitat importance.

To provide appropriate landscaping.

To encourage the retention of mature vegetation on the site.

To promote climate responsive landscape design and water management in developments that support thermal comfort and reduces the urban heat island effect.

**Standard D10**

The landscape layout and design should:

- Be responsive to the site context.
- Protect any predominant landscape features of the area.
- Take into account the soil type and drainage patterns of the site and integrate planting and water management.
- Allow for intended vegetation growth and structural protection of buildings.
- In locations of habitat importance, maintain existing habitat and provide for new habitat for plants and animals.
- Provide a safe, attractive and functional environment for residents.
- Consider landscaping opportunities to reduce heat absorption such as green walls, green roofs and roof top gardens and improve on-site stormwater infiltration.
- Maximise deep soil areas for planting of canopy trees.

Development should provide for the retention or planting of trees, where these are part of the urban context.

Development should provide for the replacement of any significant trees that have been removed in the 12 months prior to the application being made.

The landscape design should specify landscape themes, vegetation (location and species), paving and lighting.

Development should provide the deep soil areas and canopy trees specified in Table D2.

If the development cannot provide the deep soil areas and canopy trees specified in Table D2, an equivalent canopy cover should be achieved by providing either:

- Canopy trees or climbers (over a pergola) with planter pits sized appropriately for the mature tree soil volume requirements.
- Vegetated planters, green roofs or green facades.
Table D2 Deep soil areas and canopy trees

<table>
<thead>
<tr>
<th>Site area</th>
<th>Deep soil areas</th>
<th>Minimum tree provision</th>
</tr>
</thead>
<tbody>
<tr>
<td>750 - 1000 square metres</td>
<td>5% of site area (minimum dimension of 3 metres)</td>
<td>1 small tree (6-8 metres) per 30 square metres of deep soil</td>
</tr>
<tr>
<td>1001 - 1500 square metres</td>
<td>7.5% of site area (minimum dimension of 3 metres)</td>
<td>1 medium tree (8-12 metres) per 50 square metres of deep soil or 1 large tree per 90 square metres of deep soil</td>
</tr>
<tr>
<td>1501 - 2500 square metres</td>
<td>10% of site area (minimum dimension of 6 metres)</td>
<td>1 large tree (at least 12 metres) per 90 square metres of deep soil or 2 medium trees per 90 square metres of deep soil</td>
</tr>
<tr>
<td>&gt;2500 square metres</td>
<td>15% of site area (minimum dimension of 6 metres)</td>
<td>1 large tree (at least 12 metres) per 90 square metres of deep soil or 2 medium trees per 90 square metres of deep soil</td>
</tr>
</tbody>
</table>

Note: Where an existing canopy tree over 8 metres can be retained on a lot greater than 1000 square metres without damage during the construction period, the minimum deep soil requirement is 7% of the site area.

Decision guidelines

Before deciding on an application, the responsible authority must consider:

- Any relevant plan or policy for landscape character and environmental sustainability in the Municipal Planning Strategy and the Planning Policy Framework.
- The design response.
- The location and size of gardens and the predominant plant types in the area.
- The health of any trees to be removed.
- The suitability of the proposed location and soil volume for canopy trees.
- The ongoing management of landscaping within the development.
- The soil type and drainage patterns of the site.

Access objective

To ensure the number and design of vehicle crossovers respects the urban context.

Standard D11

The width of accessways or car spaces should not exceed:

- 33 per cent of the street frontage, or
- if the width of the street frontage is less than 20 metres, 40 per cent of the street frontage.

No more than one single-width crossover should be provided for each dwelling fronting a street. The location of crossovers should maximise the retention of on-street car parking spaces. The number of access points to a road in a Road Zone should be minimised. Developments must provide for access for service, emergency and delivery vehicles.
**Decision guidelines**
Before deciding on an application, the responsible authority must consider:

- The design response.
- The impact on the streetscape.
- The reduction of on-street car parking spaces.
- The effect on any significant vegetation on the site and footpath.

**Parking location objectives**
To provide convenient parking for resident and visitor vehicles.
To protect residents from vehicular noise within developments.

**Standard D12**
Car parking facilities should:

- Be reasonably close and convenient to dwellings.
- Be secure.
- Be well ventilated if enclosed.

Shared accessways or car parks of other dwellings should be located at least 1.5 metres from the windows of habitable rooms. This setback may be reduced to 1 metre where there is a fence at least 1.5 metres high or where window sills are at least 1.4 metres above the accessway.

**Decision guideline**
Before deciding on an application, the responsible authority must consider the design response.

**Integrated water and stormwater management objectives**
To encourage the use of alternative water sources such as rainwater, stormwater and recycled water.
To facilitate stormwater collection, utilisation and infiltration within the development.
To encourage development that reduces the impact of stormwater run-off on the drainage system and filters sediment and waste from stormwater prior to discharge from the site.

**Standard D13**
Buildings should be designed to collect rainwater for non-drinking purposes such as flushing toilets, laundry appliances and garden use.
Buildings should be connected to a non-potable dual pipe reticulated water supply, where available from the water authority.

The stormwater management system should be:

- Designed to meet the current best practice performance objectives for stormwater quality as contained in the *Urban Stormwater - Best Practice Environmental Management Guidelines* (Victorian Stormwater Committee, 1999).
- Designed to maximise infiltration of stormwater, water and drainage of residual flows into permeable surfaces, tree pits and treatment areas.

**Decision guidelines**
Before deciding on an application, the responsible authority must consider:

- Any relevant water and stormwater management objective, policy or statement set out in this scheme.
- The design response.
- Whether the development has utilised alternative water sources and/or incorporated water sensitive urban design.
- Whether stormwater discharge from the site will adversely affect water quality entering the drainage system.
- The capacity of the drainage network to accommodate additional stormwater.
- Whether the stormwater treatment areas can be effectively maintained.
- Whether the owner has entered into an agreement to contribute to off-site stormwater management in lieu of providing an on-site stormwater management system.