

DEEP SOIL AREAS, PLANTING AREAS AND CANOPY COVER

What is a deep soil area?

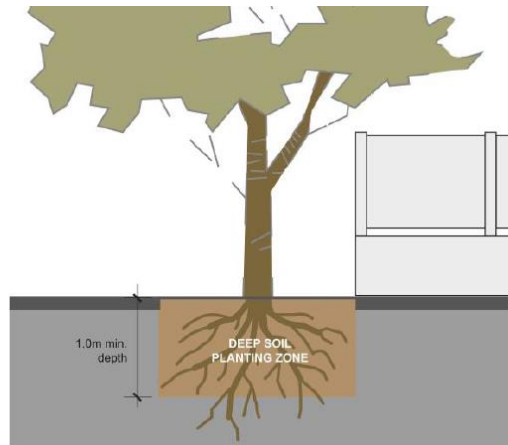
A deep soil area is a soft landscape area on a lot with no impeding building structure or feature above or below, which supports growth of medium to large canopy trees and meets a 1 metre x 1 metre (1 metre squared) dimension. Deep soil areas exclude basement carparks, services, swimming pools, tennis courts and impervious surfaces.

What is a planting area?

A planting area is an area with a minimum soil depth and dimension of 1 metre that supports growth of medium to large canopy trees.

What is the difference between a deep soil area and a planting area?

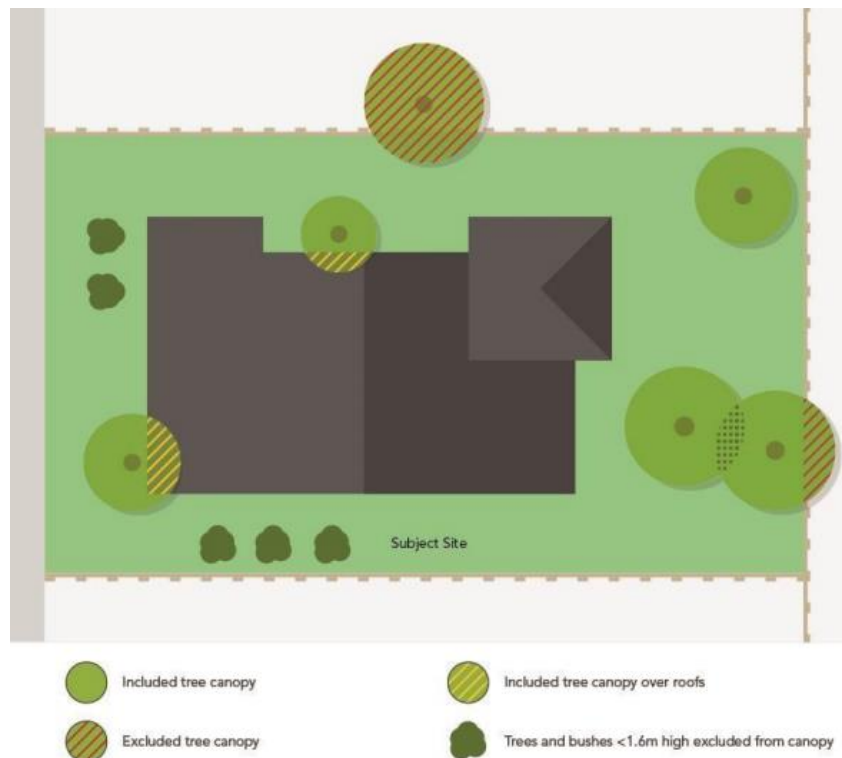
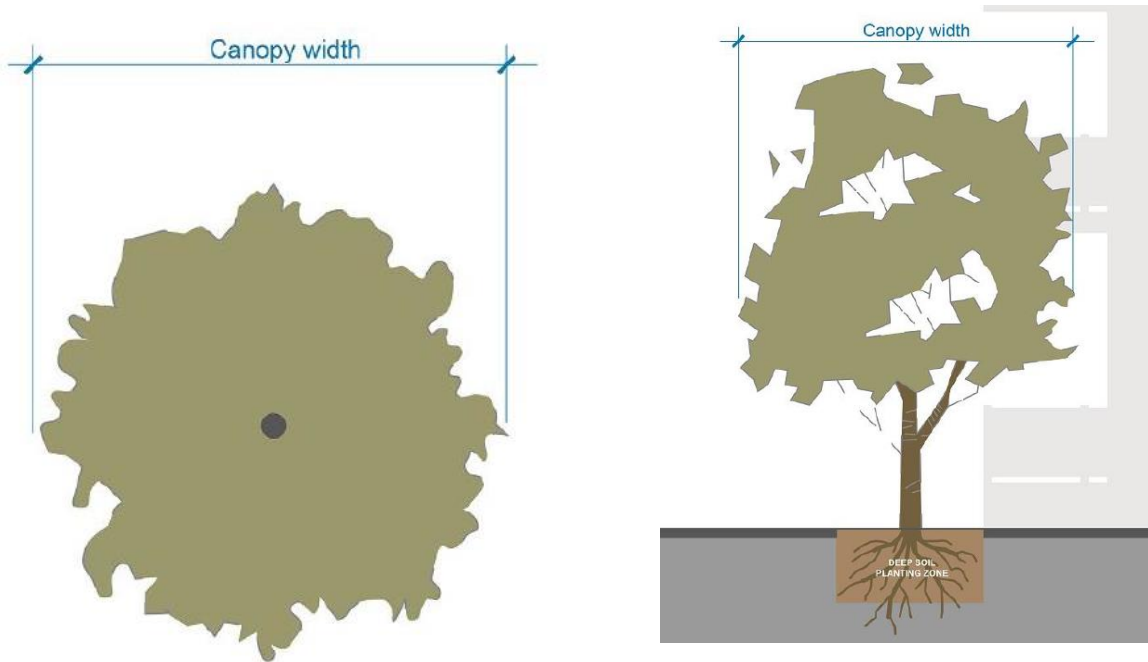
The difference is that a planting area requires a minimum soil depth of 1 metre whereas, deep soil area does not.



What is canopy cover?

Canopy cover is the land area covered by tree crowns (branches, leaves, and reproductive structures extending from the trunk or main stems) from trees located within the subject site, excluding any area that falls within an adjoining privately owned lot. It is calculated using the canopy width of a tree species at full maturity. Where overlapping occurs between the tree canopies, the site's total canopy cover is the total land area covered by tree crowns, not the sum of the canopy cover of each individual tree.

Table 1 (below) lists species of trees suitable within the City of Vincent, and provides information on the area of canopy cover provided by each type of tree at maturity.



Why are deep soil areas, planting areas and canopy cover important?

The provision of deep soil areas, planting areas and canopy cover is a key part of good landscape design, which recognises that together landscape and buildings operate as an integrated and sustainable system, within a broader ecological context.



Good landscape design protects existing environmental features and ecosystems, enhances the local environmental context and regenerates lost or damaged ecosystem functionality, where possible. It balances the consideration of environmental factors such as water and soil management, ground conditions, solar access, microclimate, tree canopy, habitat creation and preservation of green infrastructure with social, cultural and economic conditions.

Good landscape design employs hard and soft landscape and urban design elements to create external environments that interact in a considered manner with built form, resulting in well-integrated, engaging places that contribute to local identity and streetscape character.

Good landscape design provides optimal levels of external amenity, functionality and weather protection while ensuring social inclusion, equitable access and respect for the public and neighbours. Well-designed landscape environments ensure effective establishment and facilitate ease of long term management and maintenance.

The removal of trees from private land is contributing to a significant loss of urban tree canopy. Therefore the planning of all developments should make a reasonable effort to retain existing trees, to provide new canopy cover on-site and to ensure that any development does not have a detrimental impact on trees and gardens on adjoining properties. The provision of deep soil areas is important to support and sustain the development of tree canopy. Site planning should seek to co-locate deep soil areas with existing trees on and adjacent to the site, and in locations best suited to the development of viable tree canopy and landscaping.

When are deep soil areas, planting areas and canopy cover required?

Deep soil areas, planting areas and canopy cover are required to be provided in accordance with the deemed-to-comply requirements of the City's Policy No. 7.1.1 – Built Form (Built Form Policy) or where applicable, State Planning Policy 7.3 Residential Design Codes Volume 2 – Apartments (R-Codes Volume 2 – Apartments).

The types of developments that will require the inclusion of deep soil areas and canopy cover are:

- Development applications for new dwellings (a single house, grouped dwelling, multiple dwelling);
- Development applications for new commercial or mixed use building; and
- Development applications for any additions or alterations to all buildings.

What are the requirements for my development?

The requirements for each type of development vary depending on the type of development proposed and the Built Form area your development site is located in:

- For Single Houses and Grouped Dwellings, please refer to Volume 1 of the City's Built Form Policy;
- For Multiple Dwellings (apartments) and Mixed Use developments, please refer to Volume 2 of the City's Built Form Policy; and
- For Commercial Developments, please refer to Volume 3 of the City's Built Form Policy.

How do I show where the deep soil areas, planting areas and canopy cover are located on my site?

The locations of deep soil areas, planting areas and canopy cover onsite should be provided to scale and in a similar way to the example landscape plan in Figure 1. It is important to indicate all pre-existing and proposed landscaping onsite, and to also note the types of species provided.

When do I need to include a Landscape Plan?

A Landscape Plan needs to be included for:

- New Single House and Grouped Dwelling developments;
- Additions to existing Single Houses and Grouped Dwellings where these additions would affect existing deep soil area or canopy coverage on the site;
- Multiple Dwellings (apartments) and Mixed Use developments (plan to be designed by a registered landscape architect); and



- Commercial developments (plan to be designed by a registered landscape architect where the site is located within a 'Town Centre', 'Activity Corridor' or 'Mixed Use' Built Form area).

What if I can't meet the requirements?

If you are unable to meet the deemed-to-comply requirements, written justification against the relevant policy objectives should be submitted to the City alongside your development application. This should outline why you are unable to meet the relevant requirements (e.g. site constraints), and should note any pre-existing landscaping onsite, any proposed landscaping that partially meets the requirements and any efforts to provide additional landscaping on site. All of which should also be outlined on a submitted landscape plan.

An Urban Planner will then review the proposal and consider whether the application meets the relevant design principles or objectives of the City's Built Form Policy to determine whether the departures can be considered. Where the departures are not deemed appropriate or in line with the design principles, amended plans or reconsideration of the proposal will be required.

How long do I have to provide my deep soil areas, planting areas and tree(s)?

Development approvals are valid for 2 years. Deep soil areas, planting areas and trees are to be provided prior to occupancy or use of the development and maintained thereafter to the satisfaction of the City.

Do you have more questions?

To discuss appropriate tree/plant species, please contact the City's Parks Technical Officers.

Applicants can also discuss planning proposals and preliminary plans with the City's Urban Planners. Urban Planners can provide general advice to applicants on a proposed development or land use and the information required to lodge a complete application. The City is unable to confirm if a proposal will be supported in the absence of a formal development applications.

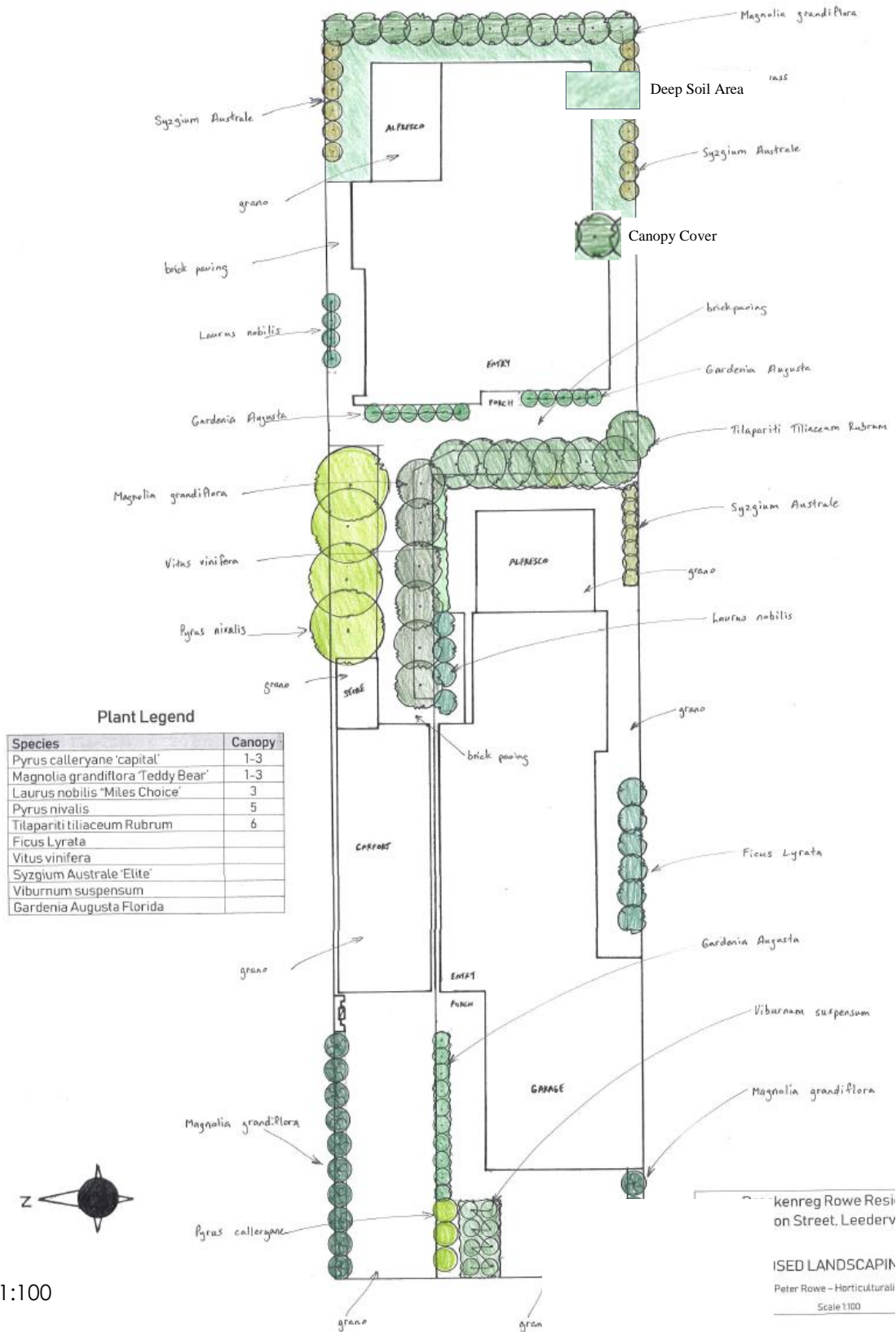
A Duty Planner is available to talk to at the City's Administration Office Monday to Friday, 8.30am to 5.00pm, in person or on the phone.

Phone: 9273 6000

Email: mail@vincent.wa.gov.au

Address: Main Administration Building, 244 Vincent Street, Leederville 6007, WA

FIGURE 1 - EXAMPLE LANDSCAPING PLAN:



Scale - 1:100

INFORMATION SHEET



TABLE 1 - CALCULATION OF TREE CANOPY SPREAD AT MATURITY:

Tree species (Exotic)	Common name	Canopy spread at maturity (Diameter)	Area calculation (3.14 x radius squared)	Total Area (m2)
<i>Pyrus calleryana</i>	Bradford Pear	4 metres	3.14 x 4	12.56
<i>Pyrus ussuriensis</i>	Manchurian Pear	6 metres	3.14 x 9	28.27
<i>Prunus cerasifera</i>	Flowering Plum	3 metres	3.14 x 2.25	7.06
<i>Magnolia grandiflora</i>	Southern Magnolia	6 metres	3.14 x 9	28.27
<i>Magnolia 'Little Gem'</i>	Dwarf Magnolia	3 metres	3.14 x 2.25	7.06
<i>Fraxinus raywoodi</i>	Claret Ash	6 metres	3.14 x 9	28.27
<i>Ulmus parvifolia</i>	Chinese Elm	8 metres	3.14 x 16	50.26
<i>Sapium sebiferum</i>	Chinese Tallow	6 metres	3.14 x 9	28.27
<i>Pistacia chinensis</i>	Chinese Pistacia	6 metres	3.14 x 9	28.27
<i>Gelditsia tricanthos</i>	Honey Locust	8 metres	3.14 x 16	50.26
<i>Bauhinia purpurea</i>	Orchid Tree	4 metres	3.14 x 4	12.56
<i>Hibiscus tiliaceus</i>	Cotton wood	5 metres	3.14 x 6.25	19.63
<i>Lagerstromia indica</i>	Crepe myrtle	4 metres	3.14 x 4	12.56
<i>Jacaranda mimosaeifolia</i>	Jacaranda	10 metres	3.14 x 25	78.53
<i>Delonix regia</i>	Poincianna	12 metres	3.14 x 36	113.09
<i>Tipuana tipu</i>	Pride of Bolivia	12 metres	3.14 x 36	113.09
<i>Pittosporum rhombifolium</i>	Queensland Pittosporum	4 metres	3.14 x 4	12.56
<i>Olea europaea</i>	Olive	5 metres	3.14 x 6.25	19.63
<i>Fraxinus griffithii</i>	Evergreen Ash	3 metres	3.14 x 2.25	7.06
<i>Syzygium australe</i>	Lilly Pilly	4 metres	3.14 x 4	12.56
<i>Agonis flexuosa</i>	Weeping Peppermint	5 metres	3.14 x 6.25	19.63
<i>Melaleuca linarifolia</i>	Snow in Summer	4 metres	3.14 x 4	12.56
<i>Melaleuca viridiflora</i>	Red Flowering Paperbark	4 metres	3.14 x 4	12.56
<i>Melaleuca quinquenervia</i>	Broad Leafed paperbark	5 metres	3.14 x 6.25	19.63
<i>Angphora costata</i>	Apple Gum	6 metres	3.14 x 9	28.27

INFORMATION SHEET



CITY OF VINCENT

Tree species (Exotic)	Common name	Canopy spread at maturity (Diameter)	Area calculation (3.14 x radius squared)	Total Area (m2)
Eucalyptus torquata	Coral Gum	4 metres	3.14 x 4	12.56
Eucalyptus leucoxlyn 'rosea'	Pink Flowering Gum	5 metres	3.14 x 6.25	19.63
Euclayptus victrix	Little Ghost Gum	3 metres	3.14 x 2.25	7.06
Hymenosporum flavum	Native Frangipani	3 metres	3.14 x 2.25	7.06
Eucalyptus forrestiana	Fuschia Gum	3 metres	3.14 x 2.25	7.06
Eucalyptus sargentii	Salt River Gum	4 metres	3.14 x 4	12.56
Eucalyptus synandra	Jingymia Mallee	3 metres	3.14 x 2.25	7.06
Eucalyptus caesia	Gungurru	3 metres	3.14 x 2.25	7.06
Eucalyptus erythrocorys	Red Capped Gum	3 metres	3.14 x 2.25	7.06
Callistemon "Perth Pink"	Pink Flowered Bottelbrush	4 metres	3.14 x 4	12.56
Eucalyptus ficifolia	Red Flowered Gum	5 metres	3.14 x 6.25	19.63
Cupaniopsis anacariodes	Tuckeroo	6 metres	3.14 x 9	28.27
Tristaniopsis conferta	Water Gum	4 metres	3.14 x 4	12.56
Hakea petiolaris	Sea Urchin Hakea	3 metres	3.14 x 2.25	7.06

Disclaimer: This information is produced by the City of Vincent in good faith and the City accepts no responsibility for any ramifications or repercussions for providing this information. Verification with the original Local Laws, planning schemes and other relevant documents is recommended for detailed references.