

Landscape Referral Response

Application Number:	DA2019/1505
Date:	16/04/2020
Responsible Officer:	Lashta Haidari
Land to be developed (Address):	Lot 1 DP 11545 , 84 Avalon Parade AVALON BEACH NSW 2107 Lot 2 DP 11545 , 84 Avalon Parade AVALON BEACH NSW 2107

Reasons for referral

This application seeks consent for the following:

- Construction / development works within 5 metres of a tree or
- New residential works with three or more dwellings. (RFB's, townhouses, seniors living, guesthouses, etc). or
- Mixed use developments containing three or more residential dwellings.
- New Dwellings or

Officer comments

The development application proposes the demolition of existing structures and the construction of a two storey seniors housing development of seven dwellings under SEPP (Housing for Seniors or People with a Disability) 2004.

In the landscape assessment of this application, consideration of the submitted Landscape Plan prepared by Plot Design Group and the Arboricultural Impact Assessment prepared by Hugh The Arborist is assessed for compliance with the following relevant controls and policies:

Housing for Seniors or People with a Disability:
Clause 33 Neighbourhood amenity and streetscape
Clause 34 Visual and acoustic privacy

Pittwater 21 DCP Controls:
B4.22 Preservation of Existing Trees and Bushland Vegetation
C1.1 Landscaping
C1.21 Seniors Housing
C1.24 Public Road Reserve - Landscaping and infrastructure

The landscape proposal retains existing trees within the front setback including one indigenous Cabbage Tree Palm of high retention value, and proposes small canopy trees as enhancement to satisfy the relevant policies and controls. A condition of approval shall be imposed to amend the landscape plan to include one additional tall canopy tree within the front setback typical of the landscape setting. The proposed turf area within the front setback shall also be removed and replaced with garden.

Along the rear setback the proposed paving area within the rear setback shall be removed and replaced with steeping stone access to reduce any detrimental impact to neighbouring trees from excavation

works associated with paving. The extent of stepping stone access shall be reduced in area to service the clothesline only. The proposed turf area likewise shall be removed and replaced with garden. Conditions of consent shall be imposed to amend the landscape plan to document suitable screen planting along the rear boundary.

The rear of the development site adjoins 82 Avalon Parade containing numerous high retention value trees along the common northern boundary. The proposed elevated building on piers reduces the impact to the existing trees, allowing that all excavation works for piers are managed and approved by a AQF Level 5 Arborist. Conditions of consent shall be imposed to satisfy ensure the protection of existing trees within 82 Avalon Parade including the root system entering 84 Avalon Parade.

An existing footpath is present within the road verge, consistent in width to all adjoining footpaths east and west of the site and is accepted as satisfying C1.24.

The landscape component of the application is acceptable subject to the retention and protection of existing vegetation as conditioned, and the completion of landscape works as conditioned.

The proposal is therefore supported.

Note: Should you have any concerns with the referral comments above, please discuss these with the Responsible Officer.

Recommended Landscape Conditions:

CONDITIONS TO BE SATISFIED PRIOR TO THE ISSUE OF THE CONSTRUCTION CERTIFICATE

Tree Root Investigation

A non-destructive root investigation shall be conducted complying with clause 3.3.4 (TPZ encroachment considerations) of AS 4970-2009 Protection of Trees on Development Sites to all construction areas within the tree protection zone of existing trees as identified for retention in the Arboricultural Impact Assessment prepared by Hugh The Arborist dated 24 October 2019. The root investigation shall locate existing tree roots to be protected during excavation works for the proposed driveway, external stairs and fences, and the building pier footings, including the following existing trees:

i) front of Property for proposed driveway;

T40 Cabbage Tree Palm

T43 Bangalay (within No. 86)

ii) eastern boundary;

T21 Umbrella Tree

T25 Jacaranda

T22 Tallowwood (within No. 82)

T24 Tallowwood (within No. 82)

T27 Tallowwood (within No. 82)

ii) northern boundary;

T1 Swamp Mahogany (within No. 82)

T2 Illawarra Flame Tree (within No. 82)

T3 Coastal Tea Tree (within No. 82)

T5 Swamp Mahogany (within No. 82)

T9 Spotted Gum (within No. 82)

T10 Spotted Gum (within No. 82)

T11 Spotted Gum (within No. 82)

T12 Spotted Gum (within No. 82)

The Arboricultural Impact Assessment prepared by Hugh The Arborist determines that the retention of existing trees subject to intrusion within the tree protection zones can be managed due to the above ground building design on pier footings, and as such a tree root investigation to locate major roots is required to be documented to assist with construction design.

Reason: to investigation the location of existing tree roots as a basis for building pier location, driveway design, and post location for external stairs and fencing, and protect the existing trees identified for retention.

Root Mapping Plan

The findings of the root investigation shall be documented in a Root Mapping Plan that documents 'no-go' areas that can't be excavated without supervision and guidance of a AQF Level 5 Arborist, and shall be the basis for determining the location of all pier footings for the proposed building, driveway design, post location of external stairs and fencing, and all utility services within the tree protection zone of the existing trees identified as:

- i) T40, T43;
- ii) T21, T25, T22, T24, T27;
- iii) T1, T2, T3, T5, T9, T10, T11, T12.

The Root Mapping Plan shall be issued to the Certifying Authority and to the Structural Engineer as the basis for preparation of Construction Certificate structural design. The Root Mapping Plan shall provide a setback clearance recommendation from the existing tree roots and provide recommended construction techniques to ensure no impact to existing roots.

The Arborist shall provide certification to the Certifying Authority that the Root Mapping Plan and clear distances recommended will ensure the long term survival of the existing trees. The Certifying Authority shall approve Construction Certificate design that satisfies the recommendations of the Root Mapping Plan.

Reason: to ensure protection of the existing trees identified as for on-site management and retention.

Pier Footing Plan

A Pier Footing Plan shall be developed in co-ordination with a AQF minimum Level 5 Arborist with qualifications in arboriculture/horticulture and a qualified Structural Engineer, and shall be issued to the Certifying Authority identifying suitable locations for all pier footings for the proposed building, driveway design, post location of external stairs and fencing, and all utility services within the tree protection zone

If structural roots are encountered (>25mm in diameter), recommendations for root pruning and preferably design change to the pier footing location must be recommended and documented in the Pier Footing Plan.

The Pier Footing Plan shall be issued to the Certifying Authority identifying a suitable locations for each pier footing. The Certifying Authority shall approve Construction Certificate design that satisfies the recommendations of the Pier Footing Plan.

Reason: to ensure protection of the existing trees identified for management and retention.

Amended Landscape Plan

Amended Landscape Plans shall be submitted to the Certifying Authority prior to the issue of a Construction Certificate, documenting the following requirements:

- i) at least two indigenous tall canopy tree (Spotted Gum, Swamp Mahogany, or Bangalay) shall be installed within the front setback, and located at least 5 metres from any building, and planted at a minimum 75 litre pot size,
- ii) the documented small trees within the front setback shall be at least 4 metres from any building,
- iii) the documented turf area within the front setback is to be replaced with garden,
- iv) the documented paving area within the rear setback shall be replaced with stepping stone access to reduce any detrimental impact to neighbouring trees. The extent of stepping stone access shall be reduced in area to service the clothesline only,
- v) the documented turf area shall be removed and replaced with garden,
- vi) shrub screen planting along the western and northern boundaries shall be capable of attaining 3 metres in height at maturity, and shall be installed at a minimum 300mm pot size, and planted no more than 1m apart.

The garden areas surrounding the perimeter boundaries to the north, south, east and west shall be maintained as garden areas with trees, shrubs and other plants for the life of the development to assist with the retention and continued growth of all existing trees nominated for retention in the Arboricultural Impact Assessment.

Reason: to enhance the landscape setting and satisfy policies and controls of development.

CONDITIONS THAT MUST BE ADDRESSED PRIOR TO ANY COMMENCEMENT

Tree removal within the property

The following trees located on the property assessed as impacted by development, and without an alternative design layout to retain the trees, are approved for removal based on the recommendations of the Arboricultural Impact Assessment prepared by Hugh The Arborist, dated 24 October 2019:

- T6 - Bangalow Palm
- T19 - Monterey Cypress
- T20 - Jacaranda
- T28 - Crepe Myrtle
- T29 - Bangalow Palm
- T30 - Monterey Cypress
- T31 - Macadamia
- T32, T33, T34, T35, T36, T37 and T38 - all Kentia Palms
- T42 - Bangalow Palm
- T44 - Japanese Maple

No other existing tree is approved for removal. Any subsequent request for tree removal is subject to a Section 4.55 modification application, or an assessment by a AQF Level 5 Arborist that determines that the tree presents an imminent risk to life or property.

CONDITIONS TO BE COMPLIED WITH DURING DEMOLITION AND BUILDING WORK

Project Arborist

A Project Arborist with AQF minimum Level 5 qualification in arboriculture/horticulture is to be appointed to supervise and certify tree protection measures for existing trees to be retained and protected, requiring site attendance during excavation and construction works, in accordance with AS4970- 2009 Protection of Trees on Development Sites, with particular reference to Section 4, and the recommendations of the Arboricultural Impact Assessment prepared by Hugh The Arborist dated 24 October 2019, including works in the vicinity of all of the existing trees within the site and on adjoining properties that have been identified for retention in the Arboricultural Impact Assessment, and in particular the following trees: T1, T2, T3, T5, T9, T10, T11, T12, T21, T22, T24, T25, T27, T40, and T43.

The recommendations / guidelines of the Root Mapping Plan shall be adhered to during on site review of all the works.

The following activities as listed in the Arboricultural Impact Assessment shall be specifically supervised and certified as approved following attendance on site, review of the works and acceptance of the works:

- i) actions and recommendations as listed under Discussion within section 7 Assessment of Construction Impacts,
- ii) actions and recommendations as listed under Section 10 Recommendations, and in particular 10.8, 10.9, 10.10, 10.11, 10.15, 10.16, 10.18, and 10.20,
- iii) actions and recommendations as listed under Section 11 Tree Protection Requirements, and in particular 11.2, 11.4, 11.5, 11.13, 11.14, 11.15, and 11.18,
- iv) actions and recommendations as listed under Section 12 Hold Points.

The Arborist shall submit certification that the works described in the above sections have been correctly installed and adhered to during the construction period.

The tree protection measures specified in this clause must:

- v) be in place before work commences on the site, and
- vi) be maintained in good condition during the construction period, and
- vii) remain in place for the duration of the construction works.

The Certifying Authority or a Project Arborist AQF Level 5 must ensure that:

- viii) the activities listed in section 4.2 of AS4970- 2009 Protection of Trees on Development Sites, do not occur within the tree protection zone of any tree, and
- ix) any temporary access to, or location of scaffolding within the tree protection zone of a protected tree, or any other tree to be retained on the site during the construction, is undertaken using the protection measures specified in sections 4.5.3 and 4.5.6 of that standard.

A separate permit or development consent may be required if the branches or roots of a protected tree on the site or on an adjoining site are required to be pruned or removed.

Reason: to ensure tree protection is provided and maintained.

Tree and vegetation protection - General

a) Existing trees and vegetation shall be retained and protected as recommended in the Arboricultural Impact Assessment prepared by Hugh The Arborist dated 24 October 2019, including:

- i) all trees and vegetation within the site not approved for removal, excluding exempt vegetation under the relevant planning instruments of legislation,
- ii) all trees and vegetation located on adjoining properties,
- iii) all road reserve trees and vegetation not approved for removal.

b) Tree protection shall be generally undertaken as follows:

- i) all tree protection shall be in accordance with AS4970- 2009 Protection of Trees on Development Sites, including the provision of temporary fencing to protect existing trees within 5 metres of development,
- ii) removal of existing tree roots greater than 25mm is not permitted without consultation with a AQF minimum Level 5 Arborist,
- iii) existing ground levels shall remain under the tree protection zone of trees to be retained, unless authorised by AQF minimum Level 5 Arborist,
- iv) any tree roots exposed during excavation with a diameter greater than 25mm within the tree protection zone must be assessed by an AQF minimum Level 5 Arborist. Details including photographic

- evidence of works undertaken shall be submitted to the Certifying Authority,
- v) to minimise the impact on trees and vegetation to be retained and protected, no excavated material, building material storage, site facilities, nor landscape materials are to be placed within the canopy dripline of trees and other vegetation required to be retained,
 - vi) no tree roots greater than 25mm diameter are to be cut from protected trees unless authorised by a AQF minimum Level 5 Project Arborist on site,
 - vii) all structures are to bridge tree roots greater than 25mm diameter unless directed by a AQF minimum Level 5 Arborist on site,
 - viii) excavation for stormwater lines and all other utility services is not permitted within the tree protection zone, without consultation with a AQF minimum Level 5 Arborist, including advice on root protection measures,
 - ix) should either or all of vi), vii) and viii) occur during site establishment and construction works, a AQF minimum Level 5 Arborist shall provide recommendations for tree protection measures. Details including photographic evidence of works undertaken shall be submitted by the Arborist to the Certifying Authority,
 - x) any temporary access to, or location of scaffolding within the tree protection zone of a protected tree or any other tree to be retained during the construction works, is to be undertaken using the protection measures specified in sections 4.5.3 and 4.5.6 of AS 4970-2009,
 - xi) tree pruning to enable construction shall not exceed 10% of any tree canopy, and shall be in accordance with AS4373-2009 Pruning of Amenity Trees.
- c) All protected trees are to be retained for the life of the development, or for their safe natural life. Trees that die or are removed by approval must be replaced with a locally native canopy tree.

Reason: to retain and protect significant planting on development and adjoining sites.

CONDITIONS WHICH MUST BE COMPLIED WITH PRIOR TO THE ISSUE OF THE OCCUPATION CERTIFICATE

Landscape works completion

Landscape works are to be implemented in accordance with the approved Amended Landscape Plan.

Prior to the issue of an Occupation Certificate, a landscape report prepared by a landscape architect or landscape designer shall be submitted to the Certifying Authority, certifying that the landscape works have been completed in accordance with the approved amended landscape plans and with any conditions of consent.

Reason: to ensure that the landscape treatments are installed to provide landscape amenity and soften the built form.

Condition of retained vegetation

Prior to the issue of an Occupation Certificate, a report prepared by an Arborist with AQF minimum Level 5 qualifications in arboriculture/horticulture shall be submitted to the Certifying Authority, assessing the health and impact on all existing trees required to be retained, including the following information:

- i) compliance to any Arborist recommendations for tree protection and excavation works,
- ii) extent of damage sustained by vegetation as a result of the construction works,
- iii) any subsequent remedial works required to ensure the long term retention of the vegetation.

Reason: to retain and protect significant planting on development and adjoining sites.

ON-GOING CONDITIONS THAT MUST BE COMPLIED WITH AT ALL TIMES

Landscape maintenance

Any existing landscaping including trees required to be retained together with any additional landscaping required by this consent is to be maintained for the life of the development.

A 12 month establishment period shall apply for all new landscaping. If any landscape materials/components or planting under this consent fails, they are to be replaced with similar materials/components. All planting must be maintained for the life of the development, or for their safe useful life expectancy. Planting that may die or is approved for removal must be replaced.

Reason: to maintain local environmental amenity and ensure landscaping continues to soften the built form.