

APPENDIX 4:
LANDSCAPE ARCHITECT MEMORANDUM

TO: Nicola Petrie, Planner

FROM: Luke McKinlay, Landscape Architect

DATE: 22-December-2020

SUBJECT: Land Use Consent – Scheduled Tree
LUC-2020-341 - 516 Highgate Dunedin
Landscape Architect Comments

Hi Nicola,

This memorandum is in response to a request for comment on an application to remove two significant trees from the property at 516 Highgate, Dunedin. The significant trees are as follows:

- Spreading Elm, *Ulmus glabra* 'Horizontalis' (Plan ID: T608) and,
- English Beech, *Fagus sylvatica* (Plan ID: T609)

The subject site is 1340m² and located opposite the intersection of Highgate and Lynn Street.

As you note, the applicant considers that the trees have been in a state of decline for years and are now an 'eyesore'. They have attempted remediation works, including various tree maintenance and feeding methods. They consider that the trees, particularly the beech, are now damaging the front boundary wall.

The original STEM assessments for the two trees, made in 2001, are as follows:

- English Beech, *Fagus sylvatica* (Plan ID: T609): **168** (condition evaluation 81, amenity evaluation 87)
- Spreading Elm, *Ulmus glabra* 'Horizontalis' (Plan ID: T608): **150** (condition evaluation 87, amenity evaluation 63)

Under the Operative District Plan (ODP), the proposal is a restricted discretionary activity pursuant to Rule 15.5.1(i). Council are to have regard to the health and quality of the trees, the reason for the proposed work, any alternatives to their removal and the impact of the removal upon the amenity of the locality and values of the trees.

Under the Proposed District Plan (2GP), removal and other work on a scheduled tree that will lead to the death or terminal decline is automatically assessed as a **non-complying activity** pursuant to Rule 7.3.2(3). Applications or resource consent for the following activities will be publicly notified in accordance with section 95A of the RMA:

1. Removal and any other work on a scheduled tree that will lead to the death or terminal decline of a scheduled tree, except where:
 - a. the tree is dead or in terminal decline;
 - b. and the application is accompanied by written documentation by a suitably qualified arborist to this effect.

Council's discretion is not restricted, and the following matters are considered relevant:

- Significant risk to personal/public safety or a risk to personal safety that is required to be managed under health and safety legislation (Assessment Matter 7.8.2(1)(c)(i))
- Moderate to significant risk to buildings (Assessment Matter 7.8.2(1)(c)(iii))

- The removal of the tree is necessary to avoid significant effects on existing infrastructure and network utilities (Assessment Matter 7.8.2(1)(c)(iv))
- The removal of the tree will result in significant positive effects in respect of the efficient use of the land (Assessment Matter 7.8.2(1)(c)(v))

Council Arborist Report

Council's consultant arborist, Mark Roberts, has reviewed the proposal. He made initial comments in response to the request to remove these trees, which addressed whether the trees were in a terminal state of decline, whether remedial works could address this decline and whether the trees were good examples of their species. He has subsequently provided an updated STEM assessment (condition assessment only). He reached the following conclusions/recommendations:

- Both trees are in a state of decline (based on photographic evidence, the trees appear to have entered a state of decline in or about 2009 and if these trees were left to their own devices (if no intervention occurred) then the decline of both trees will be terminal;
- It might be possible to halt or reverse the decline of these trees;
- Remedial works would be substantial (reconfiguring the landscaping to create and improve drainage, improving soil structure and the addition of soil amendments). Further, it is possible that the trees may not fully recover and/or if they did it is possible that the residual form of these trees may not be acceptable in terms of aesthetics or risk;
- As of November 2020, the spreading elm (T608) has poor form, reduced vigour and limited vitality. Based on the current condition of this tree, it would not meet the criteria for inclusion on the DCC 2GP schedule of trees (Appendix A1.3) and based on the current rate of decline it is unlikely that this tree will be able to meet the criteria for inclusion at a future date.
- The English beech has an acceptable form but has reduced vigour and limited vitality. Based on the current condition of this tree, it is unlikely to meet the criteria for inclusion on the DCC 2GP Schedule of trees (Appendix A1.3) and based on the current rate of decline it would not be able to meet the criteria for inclusion at a future date.
- Re-evaluated STEM assessment for T608 (condition only): **57**
- Re-evaluated STEM assessment for T609 (condition only): **57**

Amenity Effects

These comments are restricted to considering broader amenity values associated with T608 and T609. It is acknowledged that the planner must weigh up the amenity values of these trees and any potential adverse effects of tree removal alongside issues of health and safety and effects on property.

I undertook a site visit to the area surrounding the subject trees in November 2020 to determine the likely effect of their removal on existing visual and landscape amenity values. Photographs taken at this time are appended to this report as Attachment 1.

Site Context

The site is located near the top of a rise at this northern end of Highgate, near the intersection with Lynn Street. McMillan Park is diagonally opposite the site to the west. The surrounding area of Maori Hill is largely residential. Most residential sections in this area are occupied by one or two storey stand-alone dwellings. Multi-unit developments are less common. A wide range of architectural styles are represented. Front boundary treatments are commonly tall timber or masonry fences or hedges. Mercy Hospital is located nearby to the southeast on Newington Avenue. Balmacewen Intermediate and Columba College are located to the west and southwest respectively.

There are no street trees on this section of Highgate, however there are several mature trees in the front yards of properties that are visible from surrounding public locations and several large specimen trees in nearby McMillan Park. There are several scheduled trees in the wider surrounding area (two red beeches near the corner of Drivers road and Highgate (T611 and T612), a Lancewood, Totara and Southern Rata on Burwood Ave (T249, G026 and T250) and a Red Beech on Newington Avenue (T849).

The English Beech occupies a prominent location near the northern corner of this site. Approximately a third of the canopy appears to overhang the footpath and roadway. The Spreading Elm is located more internally within the property and, being somewhat lower growing, is less prominent from surrounding publicly accessible locations.

STEM Assessment

There are two broad assessment categories to a STEM report – condition (health) and amenity (community benefit). My role in the assessment of applications to remove a scheduled tree, is to comment on amenity related matters, this involves both a re-evaluation of the amenity section of the existing STEM assessments and consideration of the amenity effects of the trees removal.

English Beech, *Fagus sylvatica* (Plan ID: T609) STEM re-evaluation:

The 2001 council STEM assessment of T609, resulted in a total amenity 'score' of 87. The largest component of this score was for the proximity component, where the tree scored 27 as a 'solitary' tree.

The proximity criterion of STEM emphasizes the potential significance of a lone tree in an urban situation. The rationale for this is that one tree in a street or park draws attention to itself, meaning the fewer the trees the more they are valued. While there is clearly another tree in relatively close proximity to T609 (T608), the STEM does not provide a category for a group of two trees. Further, it is agreed that T609 is generally perceived as a solitary tree. As one approaches the site from either the north or south on Highgate, the Beech forms a visually distinct natural feature from surrounding locations, whereas the Elm is quite visually recessive.

The stature of the tree appears to have not increased significantly since the 2001 assessment, remaining in the 15-20m height range. It is also considered that the visibility rating remains accurate.

With regards to the "role" rating, it is considered that this has lowered somewhat since the 2001 assessment. This criteria relates to a tree's value in a setting or as part of a composition. This beech is in a relatively prominent location, near a local high point and street intersection. As a large, solitary tree in a street without street trees, T609 was identified as having an important role in its setting. However, taking the consultant arborists comments into account, it is considered that some of the features of this trees decline (uneven distribution of foliage, leaves with reduced size and lustre, delay in coming into leaf) have reduced the amenity values of the tree. As such, it is considered that the role of the tree is now moderate rather than important.

The climatic influence criteria is related to a trees ability to ameliorate climate, predominantly in the form of shade, shelter and temperature control. As with the comments related to the role of this tree, it is considered that the uneven canopy of leaves and their reduced size inevitably reduces the climatic influence of this tree. It is considered that T609 now has only a moderate contribution to local climate.

My re-evaluation of the 2001 STEM, results in a total of **75** points for the amenity section:

- Stature: 15-20 (15 points)
- Visibility: 2km (15 points)
- Proximity: Solitary (27 points)
- Role: Moderate (9 points)
- Climate: Moderate (9 points)

Spreading elm - *Ulmus glabra* 'Horizontalis' (Plan ID: T608) STEM re-evaluation:

The 2001 council STEM assessment of T608, resulted in a total amenity 'score' of 63. The largest component of this score was for the proximity component, where the tree scored 27 as a 'solitary' tree. The proximity score remains valid.

The stature of this low spreading tree appears to have not increased significantly since the 2001 assessment, remaining in the 9-14m range. It is noted that for spreading forms, such as this Elm, the width of the canopy can be used as the stature measurement, if that is a larger measurement than the height. This appears to be the situation with this tree, which has a wide canopy, within the 9-14m range.

The visibility rating remains valid. Being setback from the street front of the property, this moderately tall tree is not highly prominent from surrounding locations.

As with the assessment of the beech, it is considered that the loss of symmetry and uneven distribution of foliage has resulted in a reduction in the role and climatic influence scores for this tree. As such, re-evaluated scores for role and climate are moderate and minor respectively.

My re-evaluation of the 2001 STEM, results in a total of 51 points for the amenity section:

- Stature: 9-14 (9 points)
- Visibility: 0.5km (3 points)
- Proximity: Solitary (27 points)
- Role: Moderate (9 points)
- Climate: Minor (3 points)

Potential Effects of Tree Removal on Existing Amenity Values

Whilst both trees are showing signs of decline that negatively affect their amenity value, their removal will have some adverse effects on existing amenity effects. The Beech tree, in particular, is a prominent natural feature and focal point near the intersection of Lynn St and Highgate. Both trees retain some amenity value as natural features of the streetscape and their removal will therefore have some adverse effects on streetscape amenity.

However, given that the arborist has determined that the trees are in a state of terminal decline, it follows that their amenity value will similarly decline. If their canopy of leaves, which are already reduced and unevenly distributed, continue to thin, it is likely that the trees will be perceived negatively, due to their poor state of health becoming more obvious. With a reduced canopy of leaves, the tree will not form a positive, natural counterpoint to built development in this residential suburb or provide useful climate amelioration.

The removal of these trees will not reveal an undesirable view. Whilst both trees soften views of the dwelling at 516 Highgate and neighbouring dwellings, they do not currently provide a visual screening function.

It is noted that whilst there are no street trees lining this part of Highgate, there are some well-established trees and other greenery in the front yards of properties in the sounding area (refer figures 3 & 4), which contribute positively to the amenity of the neighbourhood. In addition, mature trees in McMillan Park contribute to the amenity of the surrounding area and are a natural counterpoint to adjoining residential development. As such, that the removal of subject trees will not leave this area devoid of large trees or greenery.

Proposed Mitigation

The applicant has proposed that mitigation is provided in the form of additional tree planting in McMillan Park. PARS have indicated that they may be willing to take on ownership of two trees at this park or another reserve nearby to help mitigate the loss of the subject trees, should it be determined that removal is appropriate.

It is considered that additional planting at a nearby park could have neighbourhood amenity benefits, if these new trees are carefully sited to enhance the appearance and function of the park. Care would be required to maintain the open spatial characteristics of McMillan Park, which make it a popular recreation space in this neighbourhood. Whilst not directly addressing the site-specific adverse effects of tree removal from the subject site, it is agreed that if supported by PARS, additional planting within a nearby park could have broader neighbourhood amenity benefits.

Conclusion

Overall, it is my opinion that the proposed removal of the T608 and T609 will have low adverse effects on the broader amenity values of the surrounding Highgate streetscape. While both T608 and T609 retain some amenity value, the decline of these trees is starting to become obvious and the consultant arborist has determined that this decline is terminal. Given this diagnosis, amenity values associated with these trees will likely continue to reduce.

If it is clearly determined that the terminal decline of these trees cannot be halted or potentially reversed, it is considered that the potential effects of the trees removal on existing amenity values will be low, based on their current poor health and the likely trajectory that amenity values will continue to decline.

Based on the combined amenity and condition re-assessment scores provided by myself and the consultant arborist, both trees no longer reach the pass score of the STEM assessment.

Regards,

Luke McKinlay
Landscape Architect

Attachment 1. Site Photographs



Figure 1. View towards T609 from south of the site on Highgate



Figure 2. View of T608 from opposite the site on Highgate



Figure 3: View of existing greenery in front yards south of the site (western side of Highgate)



Figure 4: View of existing greenery in front yards south of the site (eastern side of Highgate)



Figure 3. McMillian Park, opposite the site.