

RIVERMEAD LEASURE COMPLEX

Application Number: 201734

LIST OF DRAWING AND LANDSCAPE MANAGEMENT PLAN CHANGES

TUESDAY 4th APRIL 2023

DRAWING:
EML PEL 1142 01-06 PL10
DOCUMENT EML PEL 1142



[Type here]

Memo

To: Sarah Hanson, Planning

From: Sarah Hanson, Natural Environment Officer, Planning

CC:

Date: 23 March 2022

Re: Consultation on a discharge of conditions Application

Application Number: 220029

Application Type: Approval of Conditions

Address: Rivermead Leisure Complex Richfield Avenue Reading RG1 8EQ

Proposal: Application for approval of details reserved by condition 26 (Hard and soft landscaping details) of Application 201734

Planners Comments	EML Alterations as per comments received																										
I will leave you to consider this part of the condition. I assume, with regards to boundary treatment and potential need for mammal gaps that GS Ecology have or will comment. Have we had Boundary treatment plans?	EML Ecologist to advise where or if this is required.																										
I will leave you to largely consider this part of the condition services will be considered under part e below. I assume others (Parks) will comment on play equipment. However, have we actually received Hard Landscape Plans or lighting plans?	EML Hard landscaping and lighting plans by architects.																										
Soft landscaping – with reference to: Landscaping Plan Sheet 1 of 5 DWG No. EML PEL 1142 01 Rev PL08 Landscaping Plan Sheet 2 of 5 DWG No. EML PEL 1142 02 Rev PL08 Landscaping Plan Sheet 3 of 5 DWG No. EML PEL 1142 03 Rev PL08 Landscaping Plan Sheet 4 of 5 DWG No. EML PEL 1142 04 Rev PL08 Tree Pit Details & Planting Specification Sheet 5 of 5 DWG No. EML PEL 1142 05 Rev PL08 Largely speaking, the landscaping appears acceptable in so far as it provides a significant number of large canopy trees, includes some evergreens (Scots pine) and addresses the concerns over the loss of the Aspen planted by Reading Tree Wardens (north-east area). However, I have a few concerns:	EML Drawings were changed to incorporate planning comments and site changes from PL08 to PL10																										
Our Tree Strategy includes reference to increasing the diversity of the tree stock to make it more resistant to change & pest & diseases – ref Objective 2 and para 3.37-3.39 (Council tree aims and expectation of developers). The aims is for 30% of any one Family, 20% of any one Genus and 10% of any one species. The breakdown of proposed trees into Family, genus & species has not been provided but from some quick calculations, and as examples, I note that there are 100 trees proposed; 49% (one half) being of one Family (Betulaceae – Alnus, Betula & Carpinus) & 31% (one third) being of another (all the Acer). In terms of genus, there is 31% Acer (one third) and 25% Carpinus (one quarter). In terms of species, there is 25% Carpinus betulus (one quarter). So, in diversity terms, the mix of trees does not meet the expectation and would leave the tree planting vulnerable to e.g. pest & diseases that impact the Betulaceae Family.	EML See genus diversity percentages below. Urban tree population should include no more than 10% of any one species, 20% of any one genus, or 30% of any family. <table><tr><td colspan="2">Genus</td></tr><tr><td>Sapindaceae</td><td>8%</td></tr><tr><td>Betulaceae</td><td>9%</td></tr><tr><td>Fabaceae</td><td>6%</td></tr><tr><td>Fagaceae</td><td>14%</td></tr><tr><td>Platanaceae</td><td>7%</td></tr><tr><td>Rosaceae</td><td>9%</td></tr><tr><td>Altingiaceae</td><td>11%</td></tr><tr><td>Sapindaceae</td><td>2%</td></tr><tr><td>Salicaceae</td><td>9%</td></tr><tr><td>Tiliaceae</td><td>12%</td></tr><tr><td>Pinaceae</td><td>10%</td></tr><tr><td>Ginkgoaceae</td><td>3%</td></tr></table>	Genus		Sapindaceae	8%	Betulaceae	9%	Fabaceae	6%	Fagaceae	14%	Platanaceae	7%	Rosaceae	9%	Altingiaceae	11%	Sapindaceae	2%	Salicaceae	9%	Tiliaceae	12%	Pinaceae	10%	Ginkgoaceae	3%
Genus																											
Sapindaceae	8%																										
Betulaceae	9%																										
Fabaceae	6%																										
Fagaceae	14%																										
Platanaceae	7%																										
Rosaceae	9%																										
Altingiaceae	11%																										
Sapindaceae	2%																										
Salicaceae	9%																										
Tiliaceae	12%																										
Pinaceae	10%																										
Ginkgoaceae	3%																										

	Species Acer campestre 'Queen Elizabeth' 3% Acer platanoides 1% Acer pseudoplatanus 4% Aesculus hippocastanum 6% Cercis siliquastrum 6% Corylus columna 9% Crataegus monogyna 4% Fagus sylvatica 6% Koelreuteria paniculate 2% Liquidamber styraciflua 'Worplesdon' 10% Malus sylvestris 2% Platanus acerifolia 7% Populus tremula 7% Quercus robur 2% Quercus rubra 5% Salix alba 2% Sorbus aucuparia 3% Tilia cordata 2% Tilia europaea 'Pallida' 9% Pinus sylvestris 10% Ginkgo biloba 3%
Tree planting in main car park – these are proposed as Acer campestre Queen Elizabeth, which is a narrow form of Field maple. Whilst I think it is positive and apt to have this named species planted at this time (ref the Jubilee), they do not utilise the canopy space available. Generally, large canopy species should be used to break up large areas of hard surfacing and, in line with EN14, our Tree Strategy and our SDP on Sustainable Design & Construction, large canopy trees should be proposed where feasible for the multiple environmental benefits they provide. This is a regular requirement on development sites and the Council should lead by example on its own sites. I note Acer.campestre Queen Elizabeth are proposed adjacent to the car park, so there would still be some included.	EML The acer along the central car park pathway were changed to Liquidamber styraciflua 'Worplesdon' This species can achieve a broad canopy size of 8m+ and the rooting volumes are appropriate to the constraints of the location. Root barrier 600mm depth was added to each planting bed The acer queen Elizabeth adjacent to the car park have been reduced to 3no. from the original 4no. The stock size of the Acer trees has been increased from 18-20cm girth to 20-25cm girth to increase initial impact and provide mature specimen tree planting. The reason for the reduction in numbers of the tree pits in hard landscaping is due to conflicts with existing and proposed underground services and the Breeam requirement for cycle shelters. The 1no. Acer removed has been replaced within the scheme by an additional Corylus columna (See drawing extract below).



Planters – see concerns under tree pit comments below

In providing any amendments I would request that trees are labelled on all plans. Currently, for example, there are long lines of the same species extending across 2-3 landscape plans but only labelled on one, which makes things more difficult.

In relation to tree pits, they are largely acceptable, except:

Two planters are indicated (PL1 & PL2) but only one Planter Section (Type 1) hence I assume this relates to both. I have concerns over the depth of this at only 500mm deep with is not consistent with the recommended depth within BS5882 Topsoil for tree planting – I note the section labels the larger planting as ‘specimen shrub planting’ but is actually *Acer griseum* (Paperbark maple) which is a tree. It should be noted that this species is not drought tolerant or tolerant of reflected heat or light hence it may not be suitable for the locations proposed (planters surrounded by hard surfacing).

TP2 – this includes the trees proposed along the centre of the main car park, which has adjacent hard surfacing. However, the spec is purely for trees in soft landscaping so it does not e.g. include root barriers to limit the chance of roots affecting the adjacent surfacing in the future. It may be that the applicant is satisfied that adjacent kerbs may act as a partial root barrier, but they are unlikely to be of significant depth? Root barriers on the perimeter of the tree pits may be prudent. Also, given the request for species change, confirmation will be required that these locations have sufficient rooting volume provided by the soft planting beds in which the trees stand.

EML

Landscaping schedules added to drawings 01-04
To clarify each drawing label.

The planters section was changed to show both planters in section for clarity on drawing 05

Depth of planters shown as 700mm depth on drawing 05

Depth of soil in planter increased to 700mm depth and additional soil improver Biochar Tree Fertiliser enriched with potassium phosphate to grow resilient, healthy plants in the harshest conditions.

Planter tree species was changed to *Koelreuteria paniculate*, medium sized, deciduous tree which despite its common name is native to Eastern Asia. It is tolerant of a lot of urban conditions.

EML

Root barrier shown on all drawings to prevent any issues for adjacent hard surfaces.

Rooting volumes indicated on tree pit 1 for trees in hard landscaping.

Rooting volumes indicated on all trees located along the car park promenade.

TP4 (where planting on a bund) would benefit from a 'dish' of soil and mulch around the tree to help retain water when being watered, i.e. so it doesn't run off down the bund. Establishment on bunds can be more difficult so little things like this can help. It may be that the Maintenance & Management report could include this instead/as well.	EML Tree Pit Type 4 changed to show dished for water retention
a) Maintenance – with reference to SOFT LANDSCAPING MAINTENANCE & MANAGEMENT REPORT (REV D), dated 7 February 2022, this is fundamentally acceptable with two minor errors to correct: - 3.1 – BS3882:2015 Topsoil is missing - 3.2 – should state condition 26, not 21.	EML LMP issued as Rev E 3.1 changed to show BS 3882: 2015: British Standard Topsoil. 3.2 changed to say condition 26
a) Services – with reference to Site Plan - NEW CONNECTIONS Mechanical & Electrical Site Services Layout C7403 - TLP -RM- 00 - DR - ME - 902 J – this appears consistent with that shown in the approved Arb documents (211346/APC) and avoids new trees hence is acceptable. As you know, drainage/SUDs was approved under 211440/APC.	EML Tree positions have been coordinated with the approved set of services drawings.

ADDITIONAL COMMENTS RECEIVED VIA EMAIL 07.03.23

Changes/removal of northwest tree pit in hard landscaping, due to existing foul main & stormwater runs & vehicle tracking conflicts,

- I have been advised by site that the location of this tree pit is not possible due to underground services and could this tree be moved or replaced with a tree planted in a new location?

Please see drawing extract below, regarding the conflicts.

Comment: The last services drawing I saw was Site Plan - NEW CONNECTIONS Mechanical & Electrical Site Services Layout C7403 - TLP -RM- 00 - DR - ME - 902 J which didn't appear to raise conflicts so I assume service routes have changed now? I think this is the northern tree of the row west of the sports hall? Is there scope to move it slightly south to eliminate conflict so that it's still part of the row?

The above comment has not been possible to incorporate the tree further south due to re-integration of cycle shelters to meet the Breeam requirements of the site.

To compensate the loss please see my previous comments and sketch showing how we have compensated the trees move from the location.

The existing bund to the north and northeast bordering Rivermead Park

- We have visited and discussed on site the existing bunds along the north & northeast of the site, these will require minimal adjustment from the site gained soil requirements and as such the existing vegetation can be retained / maintained, with an extensions to the east and southwest of the bund as previously proposed.
- The bund will be flailed on 6 no. visits within the first year to a height of 100mm, this will reduce the overgrown weeds/blackberry and allow the existing grassland to regenerate. Removing the blackberry will also allow access for planting the new trees.
- The existing juvenile trees to the north and northwest of the bund will be retained.

Comment: Sounds like we need to factor in protection / staying away from trees when the bund is flailed?

Comment: Tree guards for the new trees (as now proposed) would prevent this – what about existing trees? Something for the maintenance document perhaps.

All flailing works will be kept clear of the existing juvenile trees and strimming will be used to clear vegetation around the existing trees to 1m beyond overall canopy.

- The reduction in the previously proposed re-seeding works to the bunds, will reduce the amount of site landscape biodiversity loss.
- Existing juvenile trees to the north of the bund, two have been damaged by vandalism and would require replacement.

Comment: OK, I assume these will be included and ID'd on plans

New replacement trees have been included for the two small leaf limes that have been damaged and all 6 of these trees will receive tree protection as per TP4 to provide additional security.

The lime species were noted on the comments from Caversham globe 11th January 2021.

- Due to the potential of vandalism seen on site we have changed (TP4) to show installation of 1.8m tree guards protecting the trees during establishment.

Comment: Fair enough, particularly given the small stock size proposed

All of the small leaf lime juvenile trees will receive tree protection as per TP4 to provide additional security.

- Please see drawing extract below and photos 1-4 of the bund adjacent to the de-mountable pool.

The existing tree line embankment to the eastern sports pitch boundary

- We have changed the extent of the proposed seeding along this boundary, retaining the existing good condition grassland along the tree line, reducing any potential disturbance of the existing trees RPA.

Comment: OK

Additional changes to landscape plan.

1. Planting beds have changed to the main car park entrance and as previously advised an additional *Corylus colurna* has been proposed.
2. Planting beds to play area and de-mountable pool have been altered to suit new site layout.
3. TP1 tree pit in hard landscaping has been changed to accommodate cycle shelter foundations above the tree pit. Additional aeration has been added to the tree pits.
4. Landscape management plan has been
5. Staff area location moved to East side rear of building
6. *Cercis chinensis* Avondale changed to Specimen shrub species *viburnum bodnantense* 'Dawn' & *Cornus mas*. Change due to limited availability at sizes previously specified.

Additional changes to landscape management plan.

1. Annual works - all areas change to number of weeding visits.
2. Annual works - liquid feed specification changed due to product availability.
3. Section added for maintenance of the existing bunds and bund extensions **3.8**