
**Victoria Nurseries
Wargrave**

Report for:
Palatine Homes Limited
Ospreys
Scotswood Close
Beaconsfield
Buckinghamshire
HP9 2LJ

INTRODUCTION

AA Environmental Limited (AAe) has been commissioned by Palatine Homes Limited to complete a revised Biodiversity Net Gain (BNG) calculation for the above site. The purpose of the assessment is to provide a comparison between the biodiversity value of the site before and after development. This revision included modifications to the soft landscaping (removal of any enhancement measures within new planting areas). The BNG assessment has been completed based on the existing and proposed habitats for the site (Figures 1 and 2).

The consented scheme is to construct eight residential dwellings with associated hard and soft landscaping, requiring the demolition of the existing buildings and clearance of some vegetation.

METHODOLOGY

The Ministry of Housing Communities & Local Government released an updated National Planning Policy Framework (NPPF) in December 2024, which encourages new developments to secure measurable 'net gains' for biodiversity. The Environment Bill gained Royal Assent in November 2021, which mandates Biodiversity Net Gain (BNG) as a condition of planning permission, meaning that all future developments in England will have to provide a minimum 10% increase in biodiversity on site, once development is complete.

In order to calculate BNG for a site, existing and proposed habitats are entered into DEFRA's Statutory Biodiversity Metric and are automatically 'scored' on their relative biodiversity value and are then classified according to their condition and location, to calculate site specific 'biodiversity units'. The pre-development biodiversity unit is then compared to the proposed, post-development biodiversity unit, allowing the difference in biodiversity to be measured.

An ecological survey was completed by AAe in July 2024 to record the habitats present on the site. The findings are provided in the Preliminary Ecological Appraisal dated December 2024 and submitted with the application and used in the preparation of this assessment. Condition assessments for the habitats on site were carried out, following the DEFRA Statutory Metric proforma sheets and professional judgement (copies attached at Appendix B).

NET LOSS

If the development results in a biodiversity loss then this becomes an 'offset requirement' and compensation will be required. At the moment there are two main options to compensate for the loss of biodiversity, as detailed below:

1. Identify an area of land off-site and enter into an agreement with the landowner to create and manage the site for nature conservation value.
2. Make a financial contribution via a Section 106 legal agreement to the Council (if they have a scheme in place) or another offsetting provider such as the Environment Bank.

DEFRA's Statutory Metric is the metric that underpins the Environment Act's provisions for mandatory biodiversity net gain in England.

RESULTS

Site Description

The site is located off Victoria Road in Wargrave, Reading, centred at National Grid Reference: SU 792787 and covers 0.272 of a hectare. The site is bordered by Victoria Road to the south and residential dwellings to all other sides.

Habitats

The site comprised the existing nursery including various buildings with associated hardstanding, growing and bedding out areas. There are no habitats of international, national, county or local importance that would be directly affected by the proposals. The site is of overall low ecological value, with the species recorded described as common or abundant and are found in similar places across much of Britain, with no evidence of protected species recorded on site.

The site will be cleared, with all buildings and hardstanding demolished and replaced with the new 8-unit housing scheme. As the site is for the construction of eight residential units, under the current user guide¹ a private garden area cannot contain any habitat enhancement or new habitats and is instead classified under the habitat category 'Vegetated Garden'. In addition, due to the restricted size of communal areas on site and the dominance of private garden areas along with the issues of delivering significant enhancements, any new planting has now been included under the 'Vegetated Garden' habitat type.

However, certain ecological enhancement measures could be introduced to the site to provide nesting and sheltering opportunities for a range of species and by the creation of new wildlife habitats, such as some of those recommended by the Chartered Institute of Ecology Environment and Management's published Biodiversity Net Gain Good Practice Guidance, and listed below:

- Nest boxes
- Bat boxes
- New planting

Details of existing and proposed habitats have been provided in Table 1.

Table 1: Habitat Areas

| Existing Habitat Baseline | | | |
|-------------------------------|--------------------------|------------------------------------|----------------|
| Habitat | Area (ha) | Comment | |
| Modified Grassland | 0.109 | | |
| Developed Land/Sealed Surface | 0.086 | | |
| Bramble Scrub | 0.035 | | |
| Horticulture | 0.032 | | |
| Introduced Shrub | 0.010 | | |
| Urban Tree | 0.032 | 8x small trees to be removed | |
| Total Area * | 0.272 | | |
| Biodiversity Units | 0.70 | Taken from Headline Results | |
| Proposed Habitat Creation | | | |
| Habitat | Area (ha) | Comment | |
| Developed Land/Sealed Surface | 0.174 | | |
| Vegetated Garden ** | 0.098 | | |
| Total Area | 0.272 | | |
| Biodiversity Units | 0.19 | Taken from Headline Results | |
| Results | Unit Change | Habitats | -0.51 |
| | Percentage Change | Habitats | -73.09% |

* Urban Tree areas are not included within the total area calculation of the DEFRA Statutory Metric.

** Planting within the curtilage of private gardens are recorded under the category 'Vegetated Garden'.

¹ The Statutory Biodiversity Metric User Guide (updated in July 2025)

Biodiversity Net Gain Calculation

The assessment has resulted in an overall net loss of 0.51 habitat units, the equivalent decrease of 73.09% with a habitat unit deficit of 0.58 required to offset the current unit deficit and achieve the 10% net gain target (a copy of the Headline Results has been attached at Appendix A). Although the scheme does not achieve a biodiversity net gain, certain enhancement measures such as the provision of wildlife boxes, which are not factored in on the DEFRA Metric, will provide additional opportunities and benefits for local wildlife.

SUMMARY

The BNG assessment has been completed based on the existing and proposed habitats for the site (Figures 1 and 2). The consented scheme is for the construction of eight residential dwellings with associated hard and soft landscaping, requiring the demolition of the existing buildings and clearance of some vegetation.

Although the scheme results in a loss in habitat units, the scheme has been sensitively designed with the provision of new wildlife friendly planting and hedgerows. Other enhancement measures such as the provision of wildlife boxes will provide additional opportunities and benefits for local wildlife. These measures if managed appropriately will result in an overall ecological benefit in comparison to the existing onsite conditions.

The loss in biodiversity will be compensated by the purchase of off-site replacement habitat units. The Applicant will provide a Biodiversity Gain Plan to provide the additional information requested as part of the informatives attached to the Planning Permission (Application Number 243229).

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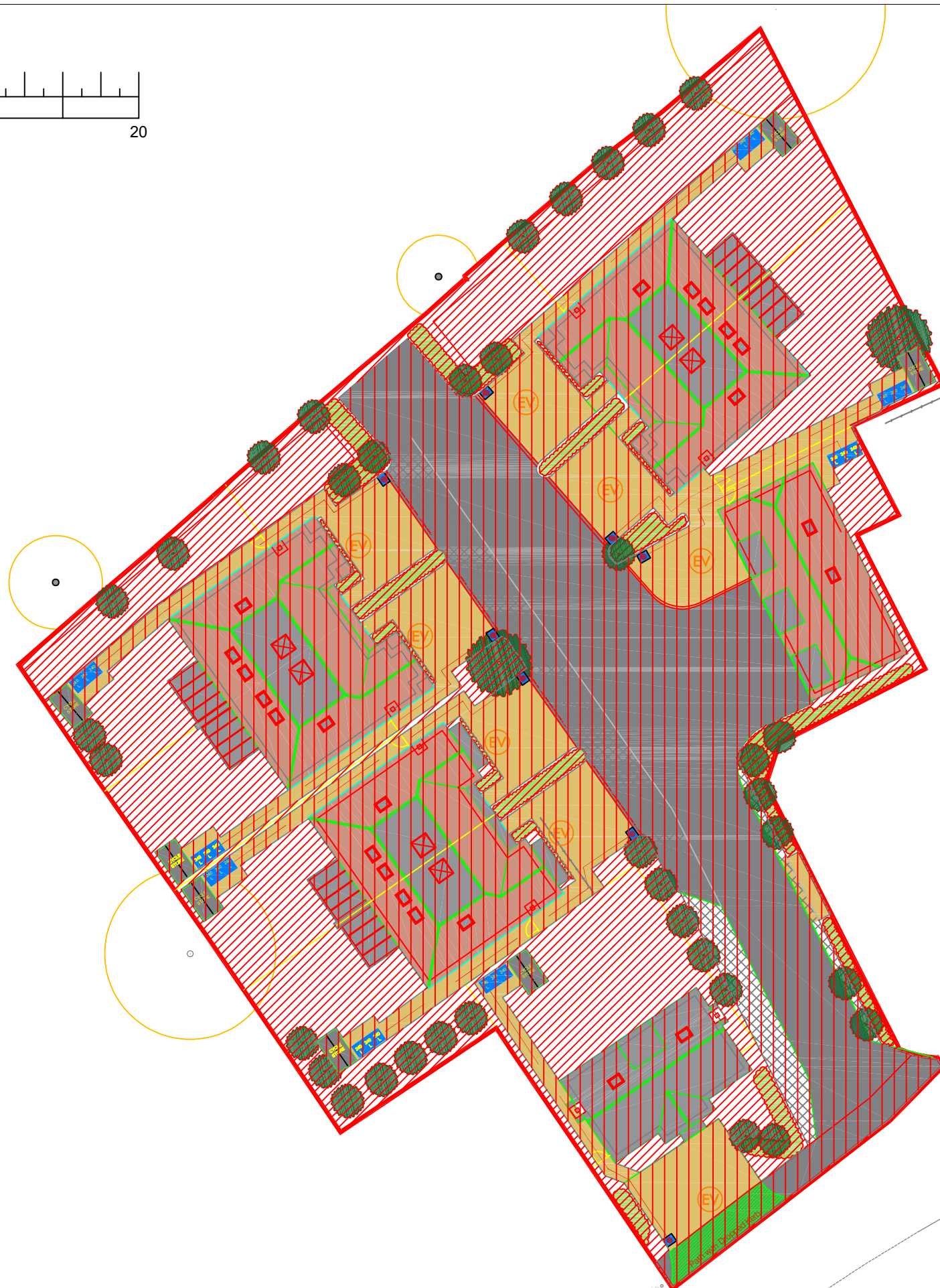
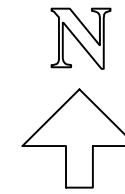
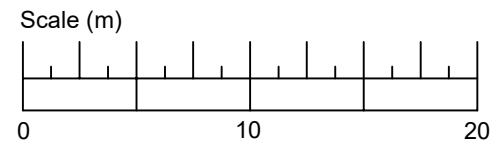
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Figures



UK HABS KEY

-  Site Boundary*
-  Developed Land/Sealed Surface*
-  Vegetated Garden*

* Indicative Location

| Proposed Habitat Areas (ha) | |
|-----------------------------|-------|
| Developed Land | 0.174 |
| Vegetated Garden * | 0.098 |
| Total | 0.272 |

* Planting within the curtilage of private gardens are recorded under the category 'Vegetated Garden'.

| | | | |
|--------|---|------------|----------|
| Rev. B | Modifications to proposed habitat plan. | NAB ARB | 08.12.25 |
| Rev. A | Modifications to existing and proposed habitat plans. | NAB ARB | 16.07.25 |

| |
|--------------------|
| Project |
| 243241 |
| Victoria Nurseries |
| Wargrave |

| |
|------------------------|
| Title |
| Proposed Habitats Plan |

| | |
|---|---|
|  | AA Environmental Ltd Units 4-8 Cholswell Court Shippon Abingdon Oxon OX13 6HX T: (01235) 536042 F: (01235) 523849 info@aae-ltd.co.uk www.aae-ltd.co.uk |
|---|---|

| | | | | |
|----------|-------|----------|----------|------|
| Scale | Date | 19.12.24 | Drg. No. | Rev. |
| As shown | Drawn | NAB | Chkd. | ARB |
| | | | Figure 2 | B |

Appendix A
Headline Results

| |
|---------------------------------|
| Victoria Nurseries, Wargrave |
| Headline Results |
| Scroll down for final results ▲ |

Return to
results menu

| | | | | |
|---|--------------------|-------|---------|--|
| On-site baseline | Area habitat units | 0.70 | | |
| | Hedgerow units | 0.00 | | |
| | Watercourse units | 0.00 | | |
| On-site post-intervention <small>(Including habitat retention, creation & enhancement)</small> | Area habitat units | 0.19 | | |
| | Hedgerow units | 0.00 | | |
| | Watercourse units | 0.00 | | |
| On-site net change <small>(units & percentage)</small> | Area habitat units | -0.51 | -73.09% | On-site net gain is less than target set ▲ |
| | Hedgerow units | 0.00 | 0.00% | |
| | Watercourse units | 0.00 | 0.00% | |

| | | | | |
|--|--------------------|------|-------|--|
| Off-site baseline | Area habitat units | 0.00 | | |
| | Hedgerow units | 0.00 | | |
| | Watercourse units | 0.00 | | |
| Off-site post-intervention <small>(Including habitat retention, creation & enhancement)</small> | Area habitat units | 0.00 | | |
| | Hedgerow units | 0.00 | | |
| | Watercourse units | 0.00 | | |
| Off-site net change <small>(units & percentage)</small> | Area habitat units | 0.00 | 0.00% | |
| | Hedgerow units | 0.00 | 0.00% | |
| | Watercourse units | 0.00 | 0.00% | |

| | | | | |
|---|--------------------|-------|--|--|
| Combined net unit change <small>(Including all on-site & off-site habitat retention, creation & enhancement)</small> | Area habitat units | -0.51 | | |
| | Hedgerow units | 0.00 | | |
| | Watercourse units | 0.00 | | |
| Spatial risk multiplier (SRM) deductions | Area habitat units | 0.00 | | |
| | Hedgerow units | 0.00 | | |
| | Watercourse units | 0.00 | | |

FINAL RESULTS

| | | | |
|--|--------------------------------|---------|---|
| Total net unit change <small>(Including all on-site & off-site habitat retention, creation & enhancement)</small> | Area habitat units | -0.51 | Total net gain achieved is less than target set ▲ |
| | Hedgerow units | 0.00 | |
| | Watercourse units | 0.00 | |
| Total net % change <small>(Including all on-site & off-site habitat retention, creation & enhancement)</small> | Area habitat units | -73.09% | |
| | Hedgerow units | 0.00% | |
| | Watercourse units | 0.00% | |
| Trading rules satisfied? | No - Check Trading Summaries ▲ | | |

| Unit Type | Target | Baseline Units | Units Required | Unit Deficit | |
|--------------------|--------|----------------|----------------|--------------|---|
| Area habitat units | 10.00% | 0.70 | 0.77 | 0.58 | No additional hedgerow units required to meet target ✓ No additional watercourse units required to meet target ✓ |
| Hedgerow units | 10.00% | 0.00 | 0.00 | 0.00 | |
| Watercourse units | 10.00% | 0.00 | 0.00 | 0.00 | |

Appendix B
Condition Assessment Sheets

| Condition Sheet: GRASSLAND Habitat Type (low distinctiveness) | | | |
|--|--|--|---|
| UK Habitat Classification (UKHab) Habitat Type | | | |
| Grassland - Modified grassland | | | |
| On-site or off-site, site name and location | On-site - Victoria Nurseries, Wargrave | Survey date and Surveyor name | 23.07.24 - Alan Beaumont, Director of Ecology |
| Limitations (if applicable) | | Survey reference (if relating to a wider survey) | |
| Grid reference | SU 792787 | Habitat parcel reference | |
| Habitat Description | | | |
| Modified Grassland | | | |
| ukhab – UK Habitat Classification | | | |
| Condition Assessment Criteria | | Criterion passed (Yes or No) | Notes (such as justification) |
| A | There are 6-8 vascular plant species per m ² present, including at least 2 forbs (these may include those listed in Footnote 1). Note - this criterion is essential for achieving Moderate or Good condition. Where the vascular plant species present are characteristic of medium, high or very high distinctiveness grassland, or there are 9 or more of these characteristic species per m ² (excluding those listed in Footnote 1), please review the full UKHab description to assess whether the grassland should instead be classified as a higher distinctiveness grassland. Where a grassland is classed as medium, high, or very high distinctiveness, please use the relevant condition sheet. | No | |
| B | Sward height is varied (at least 20% of the sward is less than 7 cm and at least 20% is more than 7 cm) creating microclimates which provide opportunities for vertebrates and invertebrates to live and breed. | No | |
| C | Any scrub present accounts for less than 20% of the total grassland area. (Some scattered scrub such as bramble <i>Rubus fruticosus</i> agg. may be present). Note - patches of scrub with continuous (more than 90%) cover should be classified as the relevant scrub habitat type. | Yes | |
| D | Physical damage is evident in less than 5% of total grassland area. Examples of physical damage include excessive poaching, damage from machinery use or storage, erosion caused by high levels of access, or any other damaging management activities. | Yes | |
| E | Cover of bare ground is between 1% and 10%, including localised areas (for example, a concentration of rabbit warrens) ² . | No | |
| F | Cover of bracken <i>Pteridium aquilinum</i> is less than 20%. | Yes | |
| G | There is an absence of invasive non-native plant species ³ (as listed on Schedule 9 of WCA ⁴). | Yes | |
| Essential criterion achieved (Yes or No) | | | No |
| Number of criteria passed | | | 4 |
| Condition Assessment Result (out of 7 criteria) | Condition Assessment Score | Score Achieved x/√ | |
| Passes 6 or 7 criteria including passing essential criterion A | Good (3) | | |
| Passes 4 or 5 criteria including passing essential criterion A | Moderate (2) | | |
| Passes 3 or fewer criteria; OR Passes 4 - 6 criteria (excluding criterion A) | Poor (1) | X | |
| Suggested enhancement interventions to improve condition score | | | |
| | | | |
| Footnotes | | | |
| <p>Footnote 1 – Creeping thistle <i>Cirsium arvense</i> , spear thistle <i>Cirsium vulgare</i> , curled dock <i>Rumex crispus</i> , broad-leaved dock <i>Rumex obtusifolius</i> , common nettle <i>Urtica dioica</i> , creeping buttercup <i>Ranunculus repens</i> , greater plantain <i>Plantago major</i> , white clover <i>Trifolium repens</i> and cow parsley <i>Anthriscus sylvestris</i> .</p> <p>Footnote 2 – For example, this could include small, scattered areas of bare ground allowing establishment of new species, or localised patches where not exceeding 10% cover.</p> <p>Footnote 3 – Assess this for each distinct habitat parcel. If the distribution of invasive non-native species varies across the habitat, split into parcels accordingly, applying a buffer zone around the invasive non-native species with a size relative to its risk of spread into adjacent habitat, using professional judgement.</p> <p>Footnote 4 – Wildlife and Countryside Act 1981 (as amended).</p> | | | |

| Condition Sheet: INDIVIDUAL TREES Habitat Type | | | |
|--|---|---|---|
| Habitat Types | | | |
| Individual trees – Urban trees Individual trees – Rural trees Complete a condition sheet for each tree or block of trees. | | | |
| <i>Please see the separate Line of trees condition sheet for a line of <u>rural</u> trees. You should only use the Line of trees condition assessment and record that habitat type in <u>rural</u> locations.</i> | | | |
| Habitat Description | | | |
| | | | |
| Individual trees (description applied to the urban or rural environment): Young trees over 7.5 cm in diameter at breast height whose canopies are not touching. | | | |
| Urban Perimeter / Linear Blocks and Groups (description applied to the urban environment only): Groups or stands of trees (size requirement as defined above) within and around the perimeter of urban land. This includes those along urban streets, highways, railways and canals, and also former field boundary trees incorporated into developments. Canopies should predominantly overlap continuously. Groups of urban trees that don't match the descriptions for woodland may be assessed within this category. | | | |
| On-site or off-site, site name and location | On-site - Victoria Nurseries, Wargrave | Survey date and Surveyor name | 23.07.24 - Alan Beaumont, Director of Ecology |
| Limitations (if applicable) | | Survey reference (if relating to a wider survey) | |
| Grid reference | SU 792787 | Habitat parcel reference | |
| Condition Assessment Criteria | | Criterion passed (Yes or No) | Notes (such as justification) |
| A | The tree is a native species (or at least 70% within the block are native species). | No | |
| B | The tree canopy is predominantly continuous, with gaps in canopy cover making up <10% of total area and no individual gap being >5 m wide (individual trees automatically pass this criterion). | Yes | |
| C | The tree is mature (or more than 50% within the block are mature) ¹ . | No | |
| D | There is little or no evidence of an adverse impact on tree health by human activities (such as vandalism, herbicide or detrimental agricultural activity). And there is no current regular pruning regime, so the trees retain >75% of expected canopy for their age range and height. | Yes | |
| E | Natural ecological niches for vertebrates and invertebrates are present, such as presence of deadwood, cavities, ivy or loose bark. | No | |
| F | More than 20% of the tree canopy area is oversailing vegetation beneath. | Yes | |
| Number of criteria passed | | 3 | |
| Condition Assessment Result (out of 6 criteria) | Condition Assessment Score | Score Achieved x/√ | |
| Passes 5 or 6 criteria | Good (3) | | |
| Passes 3 or 4 criteria | Moderate (2) | X | |
| Passes 2 or fewer criteria | Poor (1) | | |
| Note that 'Fairly Good and Fairly Poor' condition categories are not available for this broad habitat type. | | | |
| Suggested enhancement interventions to improve condition score ² | | | |
| | | | |