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# Appendix 5.3

## Residential Visual Amenity Assessment

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### 5.3.1 Introduction

- 5.3.1.1 The purpose of the Residential Visual Amenity Assessment (RVAA) is to identify potential effects of the Proposed Development on the visual component of residential amenity.
- 5.3.1.2 The assessment of residential amenity is a planning matter that involves consideration of several aspects (including noise and shadow flicker), of which residential *visual* amenity is a single component. The RVAA is therefore limited to the consideration of visual effect on residential visual amenity of residential properties only. Visual amenity is defined in the Guidelines for Landscape and Visual Assessment – Third Edition (GLVIA3, paragraph 2.20, page 21)<sup>1</sup> as:
- “the overall pleasantness of the views they enjoy of their surroundings”.*
- 5.3.1.3 The Landscape Institute have produced RVAA guidance<sup>2</sup> on undertaking a RVAA which is founded on the principles and processes set out in GLVIA3. ‘Residential Visual Amenity’ is defined in the RVAA guidance as:
- “the overall quality, experience and nature of views and outlook available to occupants of residential properties, including views from gardens and domestic curtilage. Residential Visual Amenity is one component of ‘Residential Amenity’”.*
- 5.3.1.4 The RVAA guidance advises further that the *“aim is to identify those residential properties whose visual amenity has the potential to be affected to the largest magnitude of impact. Properties with the highest magnitude of effect are assessed further culminating in a professional judgement as to whether the Residential Visual Amenity Threshold is likely to be reached at this property or not.”* This is a separate although related consideration from the assessment of visual effects resulting from the Proposed Development and is restricted to residential properties only.
- 5.3.1.5 Other factors affecting residential amenity such as noise and shadow flicker are not considered as part of this assessment and can be found in Chapter 10: Noise and Chapter 13: Aviation and Other Effects respectively.
- 5.3.1.6 Figures supporting this assessment are illustrated in Volume 2c, Figures 5.34-35a-j.

### 5.3.2 Planning Context

- 5.3.2.1 Planning law contains a widely understood principle that the outlook or view from a private property is a private interest and not therefore protected by either the Scottish or UK planning system. However, the planning system also recognises situations where the effects on residential visual amenity are so serious as to become a matter of public interest. This matter has been examined at a number of public inquiries in the Scotland and the rest of the UK where the key determining issue was not the identification of significant effects on views, but whether the proposed development would have an effect on the residential visual amenity through an ‘overbearing’ and / or ‘dominating’ effect resulting in unsatisfactory living conditions, leading to a property being regarded, objectively, as an unattractive (as opposed to a less attractive) place in which to live. The effects on residential amenity are subsequently considered as part of the planning balance as part of the consent process.
- 5.3.2.2 Consequently, the RVAA methodology provides for a much more detailed assessment of the closest residential properties to the Proposed Development. This allows the assessor and consequently the determining authority to make a judgement as to whether the residents at these residential properties would be likely to sustain unsatisfactory living conditions which it would not be in the public interest to create. Reviews of decisions demonstrate that significant visual effects or changes to the views available from a residential property and its curtilage are not the decisive consideration, rather it is the residential amenity and, in this case, residential visual amenity that is determinate.

<sup>1</sup> Landscape Institute and Institute of Environmental Management and Assessment, Guidelines for Landscape and Visual Impact Assessment, 3rd Edition (GLVIA3) (2013).

### 5.3.3 Methodology

#### Method of Assessment

- 5.3.3.1 The RVAA accords with GLVIA and RVAA guidance which advises that the *“purpose of carrying out a Residential Visual Amenity Assessment (RVAA) is to form a judgement, to assist decision makers, on whether a proposed development is likely to change the visual amenity of a residential property to such an extent that it becomes a matter of ‘Residential Amenity’”.*
- 5.3.3.2 In summary, the methodology for RVAA is set out in Technical Appendix 5.1 and involves a four-step process as follows:
- *“Step 1: Define Study Area and identify properties to be assessed.*
  - *Step 2: Evaluate baseline visual amenity of properties.*
  - *Step 3: Assess change to visual amenity of properties and identify properties requiring further assessment.*
  - *Step 4: Detailed [RVAA] assessment of individual properties identified.”*

### 5.3.4 Stage One: Establishing the RVAA Scope

- 5.3.4.1 Based on the RVAA guidance an initial Study Area of 2km distance from the proposed turbines was selected for the RVAA. Only those properties which can be identified on the Ordnance Survey 1:25,000 scale map and are overlapped by the blade tip ZTV are included in the assessment.
- 5.3.4.2 In reviewing the Study Area, there are no properties within 1.25km of the proposed turbines. There are three properties within 2km (RVA04 Clawfin, comprising the main farmhouse, bungalow and Owl Barn). A number of others are however located at between 2-3km distance from the nearest proposed turbines and also overlapped by the Zone of Theoretical Visibility (ZTV). For these site-specific reasons the Study Area has been extended to 3km to include these additional properties as a precaution. The study area was agreed at the Scoping stage through consultation with South Ayrshire Council, East Ayrshire Council and Dumfries and Galloway Council.
- 5.3.4.3 The scope of the RVAA has therefore included all individual residential properties within 3km of the Proposed Development that are overlapped by the blade tip ZTV as illustrated in Figures 5.34. Additional wirelines from the centre of each property are illustrated in Figures 5.35a-j.

#### Site Surveys

- 5.3.4.4 The assessment has been informed by Census data (OS Address Point Data) and publicly available aerial and ground level photography, Ordnance Survey 1:25,000 map-based data, the production of ZTV plots (excluding forestry screening) and visualisations such as wirelines. Where possible site visits were undertaken observing from the closest publicly accessible location or desk based. As such the assessment represents an informed judgement of the likely visual effects and the consequential effects on residential visual amenity.

<sup>2</sup> Landscape Institute, Residential Visual Amenity Assessment Technical Note 2/19, (15 March 2019) (the ‘RVAA guidance’).

### Cumulative Wind Farm Development

- 5.3.4.5 The assessment has also considered the effects of cumulative wind farm development, taking account of the Proposed Development as well as other large scale existing (under construction), consented and application wind farms within 10km. This includes:
- South Kyle and Enoch Hill which extend to the immediate east of the Proposed Development with a large group of existing and consented wind farm development extending beyond this including Pencloe, Afton, Windy Standard (and two extensions), Windy Rig and Benbrack to the south. Included within this group is the 3 turbine Enoch Hill 2 application.
  - North Kyle (under construction) is located approximately 4km to the north and includes the consented Over Hill and Greenburn wind farms, with a further development at Polquhairn beyond.
  - Dersalloch is located to the west at approximately 10km distance and two further wind farm applications are located at Scienteuch and Knockkippen on either side of the River Doon valley near Patna.
- 5.3.4.6 The main cumulative wind farm developments relevant to this assessment are South Kyle, Enoch Hill and North Kyle which are the three closest and most immediate, existing / under construction wind farms.

### 5.3.5 Stage Two: Evaluation of Baseline Visual Amenity

- 5.3.5.1 Stage Two detailed an observational survey of each property including in the RVAA, describing the type, nature, extent, and quality of the existing views that may be experienced 'in the round' from the dwelling itself and the domestic curtilage which includes the main living areas, usually the ground floor and the main garden and immediate driveway. The relationship of the property with the surrounding landscape and a description of the views in terms of whether they may be considered as primary, secondary, or peripheral views.
- 5.3.5.2 The baseline assessment for Step 2 is recorded for each property under the heading 'Description' on the survey forms for each property (see Table 5.3.2) which includes details such as:
- Each property's location, geographical extent and curtilage, and landscape and visual context;
  - The type of property: whether detached, semi-detached or terraced; whether the property is single-storey or two-storey;
  - Orientation of the property (i.e. its main entrance and its main façade);
  - Main external recreational and amenity spaces and views including their character and scenic quality, and any specific qualities or elements that are key to the property's amenity;
  - Secondary locations, including utilitarian spaces and associated views; and
  - Details of any restrictions on views or other limitations.
- 5.3.5.3 The RVAA guidance advises that the assessment can be undertaken from publicly accessible locations and that this is usually appropriate at this stage. Best practice dictates that where required, visits to private property should only be conducted with the occupier's consent and arranged between the parties along with the involvement of the determining / competent authority.
- 5.3.5.4 The baseline assessment takes account of the likely views from the ground floors of the properties and main garden areas but excludes the upper floors and other land that may relate to the property as it does not form part of the main living areas.

- 5.3.5.5 In accordance with GLVIA3 (paragraph 6.33), residents at home are considered amongst those visual receptors most 'susceptible' to change and likely to attach most value to their private views and visual amenity. The sensitivity of individual residential receptors is therefore assessed as *High* in each case.

### 5.3.6 Stage Three: Visual Assessment

- 5.3.6.1 The RVAA guidance advises that the "*third step in the process assesses the magnitude and significance of likely visual effect at the included properties*" and that the "*aim of Step 3 is to identify those properties requiring further assessment in Step 4 in relation to the Residential Visual Amenity Threshold judgement.*" Step 3 is recorded for each property under the heading 'Magnitude' on the survey forms for each property and the visual assessment for each property is summarised under the heading 'Assessment' and Cumulative Assessment (see Table 5.3.2).
- 5.3.6.2 Factors considered in determining the magnitude of change include:
- "*Distance of property from the proposed development having regard to its size / scale and location relative to the property (e.g. on higher or lower ground);*
  - "*Type and nature of the available views (e.g. panoramic, open, framed, enclosed, focused etc.) and how they may be affected, having regard to seasonal and diurnal variations;*
  - "*Direction of view / aspect of property affected, having regard to both the main / primary and peripheral / secondary views from the property;*
  - "*Extent to which development / landscape changes would be visible from the property (or parts of) having regard to views from principal rooms, the domestic curtilage (i.e. garden) and the private access route, taking into account seasonal and diurnal variations of any screening from buildings / structures, landform and vegetation;*
  - "*Scale of change in views having regard to such factors as the loss or addition of features and compositional changes including the proportion of view occupied by the development, taking account of seasonal and diurnal variations;*
  - "*Degree of contrast or integration of new features or changes in the landscape compared to the existing situation in terms of form, scale and mass, line, height, colour and texture, having regard to seasonal and diurnal variations;*
  - "*Duration and nature of the changes, whether temporary or permanent, intermittent or continuous, reversible or irreversible etc.; and*
  - "*Mitigation opportunities – consider implications of both embedded and potential further mitigation.*"
- 5.3.6.3 In considering the screening effects of vegetation the following caveats have also been applied:
- Forestry screening - Due to management practices of felling and restocking, the assessment has assessed the 'worst case scenario' of bare ground post-felling;
  - Woodland and hedgerow screening - Where this includes mature, long standing mixed or broadleaved woodland, a degree of permanence has been assumed in the assessment;
  - Individual trees - Where these are mature a degree of permanence has been assumed in the assessment. However, this is subject to the long-term retention of individual trees that would need to be assessed on a case-by-case basis; and
  - Garden vegetation has been assumed to have a degree of permanence. If it is removed and replanted, most garden shrubs / hedges are reasonably quick to re-establish or are replaced on a piecemeal basis.



- 5.3.6.4 The visual assessment is completed in accordance with GLVIA3 and the methodology set out in Technical Appendix 5.1 (Table 5.1.5) which combines the sensitivity of the receptor (High) with the magnitude of change to produce a level of effect and significance. Whilst all properties scoped into the RVAA (those within 3km and overlapped by the blade tip ZTV) have been assessed through to Step 4 regardless of the level of visual effect, those properties in particular which are assessed as significant should be assessed further (Step 4) in terms of whether the Residential Visual Amenity Threshold will be reached.

### Design and Mitigation

- 5.3.6.5 The design process has followed the mitigation hierarchy and sought to avoid residential properties and areas of settlement as a first principle. Further embedded mitigation has ensured that there are no individual residential properties within 1.25km of the proposed turbines.
- 5.3.6.6 The nearest settlement at Dalmellington (including Bellsbank and Burnside) are located at just over 4km distance from the proposed turbines with much of the main settlement areas either outwith the blade tip ZTV (no view) or screened by mature vegetation / buildings. Further assessment of the visual effects on settlements is set out in the main Chapter 5: Landscape and Visual Impact Assessment.

### Daytime Visual Assessment

- 5.3.6.7 Of the ten properties / groups of properties within the 3 km Study Area, significant visual effects on views towards the Proposed Development were identified for nine of the twelve properties as indicated in Table 5.3.1. These include:

- RVA01 - Upper Beoch;
- RVA02 - Meiklehill;
- RVA03 - Camlarg;
- RVA04 - Clawfin (including three properties: bungalow, Owl Barn and main farmhouse);
- RVA Group 02(a) - Bairds Bungalow;
- RVA Group 02(b) - Almar View; and
- RVA05 - Pennyvenie Farm.

- 5.3.6.8 The remaining properties three properties at Nith Lodge, Knockenlee, Maneight would not be significantly affected due to a combination of screening from intervening topography, outbuildings and woodland / coniferous forestry and other garden / boundary vegetation as well as combinations of property layout and site-specific considerations related to setting and visual context.

- 5.3.6.9 Significant cumulative effects have been identified in respect of Upper Beoch, Meiklehill, and Maneight as a result of the Proposed Development, partly visible to the south with the cluster of development at North Kyle, Over Hill and Greenburn, partly visible to the north, although subject to intervening forestry screening. Further cumulative effects would theoretically occur at Clawfin, Baird's Bungalow, Almar View and Pennyvenie Farm, subject to intervening screening.

### Night-time Visual Assessment

- 5.3.6.10 The Aviation Lighting Strategy illustrated in Figure 5.4a, allows for a reduced number of five lit turbines. Each of these would be dimmed to 10% of the peak intensity (200 cd) during periods of good visibility (exceeding 5km from the lit turbines). In addition, angle intensity mitigation would further reduce the perceived light intensity from lower lying areas, whilst maximum light intensity would be visible from elevated areas as indicated in Figure 5.4c. The Night-time Assessment is set out in Technical Appendix 5.5 and the further night-time assessment for

each residential property has been provided in Table 5.3.2. This assessment draws from the wireframes for each property (indicating the number of visible aviation warning lights potentially visible from each property location) and Figure 5.4c which illustrates the Light Intensity ZTV for the Proposed Development.

- 5.3.6.11 The night-time assessment concludes all of the properties would potentially view one or more of the aviation warning lights subject to intervening screening, although none of the properties within 3 km would experience significant night-time visual effects. This is due to the proposed lighting mitigation which would reduce the number of visible aviation warning lights, and the likely low level of perceived light intensity experienced from each property. This is in part due to the low-lying nature of the residential properties within the upper reaches of the River Nith valley and along the B741 road corridor in relation to the elevation of the proposed aviation warning lights on the turbine hubs, which is a key mitigating factor.
- 5.3.6.12 Subject to the wind direction some of the closest properties may view a small amount of light reflecting off the turbine blades as they slowly rotate to pass behind the aviation warning light. Alternatively, there may be a 'slow blink' or 'on / off' effect when the turbine blade passes in front of the aviation warning light.

## 5.3.7 Stage Four: RVAA

- 5.3.7.1 The final Step 4 considers the residential visual amenity. The RVAA guidance advises that there is an important distinction between Steps 3 and 4 noting that in "*Step 3 the assessor has reached a conclusion with respect to magnitude and (EIA) significance of visual effect, and the change in visual amenity at the property. In this final step, and only for those properties where the largest magnitude of effect has been identified, a further judgement is required. This concluding judgement should advise the decision maker whether the predicted effects on visual amenity and views at the property are such that it has reached the Residential Visual Amenity Threshold, therefore potentially becoming a matter of Residential Amenity.*" Building on the preceding assessment of magnitude and significance of visual effect, Step 4 should conclude the RVAA explaining why the Residential Visual Amenity Threshold has been reached. Equally the text should explain why the threshold has not been reached.
- 5.3.7.2 The Landscape Institute guidance provides some examples which might be used, including "*blocking the only available view from a property*", or "*overwhelming views in all directions*"; and "*unpleasantly encroaching*" or being "*inescapably dominant from the property.*"
- 5.3.7.3 A summary of the RVAA is provided in Table 5.3.1 with a more detailed assessment set out in Table 5.3.2 for each property under the heading Residential Visual Amenity.
- 5.3.7.4 As noted previously, the experience of a significant view of the Proposed Development is not the same as reaching the Residential Visual Amenity Threshold. The RVAA has concluded that there would be no instances where the Residential Visual Amenity Threshold would be reached and no instances where the visual effects, (although significant in some cases) would be so severe as to be considered as "*overwhelming views in all directions*"; "*unpleasantly encroaching*" or being "*inescapably dominant from the property*" as exemplified in the RVAA guidance. This is due largely to embedded mitigation within the Proposed Development which has ensured that no property is within 1.25km of the nearest turbine and combinations of partial screening, and use / orientation of the property, such that the living standards would not be affected, and the residential property would not be adversely affected to the extent that it would become an unattractive place to live when judged objectively and in the public interest, on an individual basis or cumulatively.

Table 5.3.1: Levels of Impact on Residential Visual Amenity

| Reference No.   | Residential Property / Group                  | Distance of Property from Nearest Turbine | Day-time Effects<br>(Significant effects in bold) |                                  |   | Night-time Effects<br>(Significant effects in bold)                                 |              |                                  |   |
|---|---|---|---|----------------------------------|---|---|--------------|----------------------------------|---|
|   |   |   | Magnitude   | Level of Effect and Significance | Residential Visual Amenity Threshold reached?<br><br>(Yes / No) | Number of visible Aviation Warning Lights at 200 cd<br>(Angle intensity mitigation) | Magnitude    | Level of Effect and Significance | Residential Visual Amenity Threshold reached?<br><br>(Yes / No) |
| There are no properties within 1km of the Proposed Turbines |   |   |   |                                  |   |   |              |                                  |   |
| Properties within 1-3km of the Proposed Turbines            |   |   |   |                                  |   |   |              |                                  |   |
| RVA01   | Upper Beaoch                                  | 2.9 km                                    | Low   | Moderate                         | No – see Table 5.3.2a   | 4No. (42-22 cd)   | Very Low     | Minor                            | No  |
| RVA Group 01(a)   | Nith Lodge                                    | 2.4 km                                    | Very Low  | Minor                            | No  | 4No. (<17 cd)   | Very Low     | Minor                            | No  |
| RVA Group 01(b)   | Knockenlee                                    | 2.3 km                                    | Low – Very Low                                    | Moderate – Minor                 | No  | 2No. (<17 cd)   | Low-Very Low | Moderate to Minor                | No  |
| RVA02   | Meiklehill                                    | 2.1 km                                    | Medium  | Major                            | No – see Table 5.3.2d   | 3No. (<17 cd)   | Low-Very Low | Moderate to Minor                | No  |
| RVA03   | Camlarg                                       | 2.1 km                                    | Medium – Low                                      | Major to Moderate                | No – see Table 5.3.2e   | 1No. (<17 cd)   | Very Low     | Minor                            | No  |
| RVA04   | Clawfin<br>(farmhouse, bungalow and Owl Barn) | 1.2 km                                    | High (bungalow)                                   | Substantial (bungalow)           | No – see Table 5.3.2f   | 3No. (<17 cd)   | Low-Very Low | Moderate to Minor                | No  |
|   |   |   | Medium (farmhouse)                                | Major (farmhouse)                |   | 3No. (<17 cd)   | Very Low     | Minor                            | No  |
| RVA Group 02(a)   | Bairds Bungalow                               | 2.1 km                                    | Medium – Low                                      | Major to Moderate                | No – see Table 5.3.2g   | 2No. (<17 cd)   | Very Low     | Minor                            | No  |
| RVA Group 02(b)   | Almar View                                    | 2.2 km                                    | Low   | Moderate                         | No – see Table 5.3.2h   | 2No. (<17 cd)   | Very Low     | Minor                            | No  |
| RVA05   | Pennyvenie Farm                               | 2.3 km                                    | Low   | Moderate                         | No  | 3No. (<17 cd)   | Very Low     | Minor                            | No  |
| RVA06   | Maneigh                                       | 2.8 km                                    | Low   | Moderate                         | No – see Table 5.3.2j   | 2No. (42-22 cd)   | Very Low     | Minor                            | No  |

Table 5.3.2a: Survey of Properties and Assessment of Impacts on Residential Visual Amenity

| RVA01: Upper Beoch (Figure 5.35a)  |   |
|--|---|
| <b>Field Survey Assessment Locations:</b> Property accessed by private drive, desk based assessment only.  |   |
| <b>Description:</b>  |   |
| <b>Location:</b> The property is located to the west and southwest of Beoch Lane watercourse at approximately 280m AOD, contained to the northwest and northeast by Little Ridgend Hill and Lingie Hill.   |   |
| <b>Property Type:</b> Large, detached farmhouse and courtyard, accessed via private track off the B741.  |   |
| <b>Related buildings:</b> There are a series of equestrian structures to the northeast of the property, including stables and riding arena and other farm buildings / poly tunnels located to the southeast at a lower elevation.  |   |
| <b>Views from the Main Elevation / Principal Views:</b> Appear to be north / northwest and also south and southeast, extending over the grounds and garden areas of the property. Subject to intervening screening from mature garden trees, the views towards the southeast extending towards the B741 and adjacent forested hill slopes of Maneight Hill, Meikle Hill and Lethans Hill, all of which contribute to the rich patchwork of landscape elements within the view. Oblique and secondary views extend to the east and west beyond mature tress / shelterbelt vegetation, at a slightly lower elevation.  |   |
| <b>Magnitude of Change (Proposed Development only)</b>   |   |
| <b>Nearest Turbine to the Property:</b> Turbine 5 is located 2.9 km to the south.  |   |
| <b>During Operation:</b> Figure 5.35a indicates that all eleven proposed turbines (10 hubs and one as a blade only) would be theoretically visible across the skyline to the south of the property, occupying 50° of the horizontal FoV <sup>3</sup> . Turbines T5 and T6 are the most prominent on the wireframe, although views of the proposed turbines would be reduced by the screening effects of intervening vegetation. Given the position of the main elevation (facing southeast), the Proposed Development would be seen in oblique views to the south, partially screened by the adjacent intervening topography and vegetation. The magnitude of change is assessed as <i>Low</i> (allowing for the screening of garden trees / vegetation, but assuming forestry is felled). |   |
| <b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible during the construction and decommissioning periods and the magnitude of change would range from <i>Zero to Low</i> .   |   |
| <b>Day-time Visual Assessment:</b>   | <b>Sensitivity:</b> High  |
|  | <b>Magnitude:</b> Low   |
|  | <b>Level of Effect:</b> Moderate and Significant                    |
|  | <b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b>  |   |
| <b>Existing Wind Farms:</b> <i>Low</i> (assuming forestry is felled). The upper parts of South Kyle and Enoch Hill Wind Farms would be theoretically visible to the south, beyond the Proposed Development and intervening forestry / vegetation.  |   |
| <b>Consented Wind Farms:</b> <i>High – Medium</i> (assuming forestry is felled). North Kyle (under construction), Over Hill, and Greenburn would be theoretically visible to the north and west.   |   |
| <b>Other Wind Farm Applications:</b> There would be no visibility of other windfarm applications within 10km.  |   |
| <b>Scenario 1</b> (Existing + Consented Development):  |   |

|   |  |
|---|--|
| <b>Combined Effect: Substantial to Major</b> (assuming forestry is felled) as a result of the Proposed Development and the North Kyle, Over Hill, and Greenburn wind farms, reducing to Moderate and not significant due to forestry screening.   |  |
| <b>Additional Effect:</b> Moderate (not significant)  |  |
| <b>Scenario 2</b> (Existing + Consented + Applications):  |  |
| No cumulative effect.   |  |
| <b>Night-time Assessment of Aviation Warning Lights:</b>  |  |
| Assuming no forestry screening, but allowing for mature trees up to four, 200 cd aviation warning lights would be theoretically visible (T4, T5, T9 and T10). Accounting for intervening screening the magnitude would be <i>Very Low</i> , and the effect of the aviation warning lights alone would be Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to between 42-22 cd coinciding with periods when the visibility is >5km in all directions. Other effects resulting from the turbine blades passing the light are unlikely when the turbines are facing southwest. |  |
| Cumulatively up to seven aviation warning lights would be theoretically visible at Over Hill to the north, although the Proposed Development would not contribute significantly.  |  |

Residential Visual Amenity Assessment:

Although significant, the day-time visual effects would not be so severe as to appear overwhelming or dominant, due to the partial landform screening, intervening garden trees and distance. The Proposed Development would not overwhelmingly contribute to cumulative effects in views to the south and there would be no significant night-time effects.

The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest.



Above: Upper Beoch - Google Imagery @2024 Airbus, CNES / Airbus, Maxar Tech. Map data @2024

<sup>3</sup> FoV – Field of View.



Table 5.3.2b: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA Group 01(a): Nith Lodge (Figure 5.35b)  |  |
|---|--|
| <b>Field Survey Assessment Locations:</b> From the adjacent B741.   |  |
| <b>Description:</b>   |  |
| <b>Location:</b> The property at Nith Lodge is located to the north of the B741 on the lower southeastern slopes of Rig Hill at an overall elevation of 282 m AOD.  |  |
| <b>Property Type:</b> 1.5 storey detached farmhouse, accessed directly from the B741.   |  |
| <b>Related buildings:</b> There are a series of outbuildings including a log shed, workshop and large agricultural building to the north and northeast of the main residential property.  |  |
| <b>Views from the Main Elevation / Principal Views:</b> Viewing southeast the principal views appear to extend across a small parking area associated with the property, downhill towards dense, mature, garden boundary vegetation (mostly coniferous Scots pine trees). There are narrow views of the B741 road beyond, viewing along the driveway, towards the forested summit and upper slopes of Maneight Hill and Lethans Hill beyond. This skyline is punctuated by telegraph poles and a single domestic scale turbine. |  |
| <b>Views from the Rear / Secondary Views:</b> Views from the rear elevation of Nith Lodge are restricted due to a combination of screening elements which include mature boundary vegetation and trees, associated outbuildings and the more distant lower slopes and summit of Rig Hill.   |  |
| <b>Restricted Views:</b> Views to the southwest and west are screened by coniferous forestry and vegetation. The felling of adjacent forestry as part of existing forestry management would extend views to the southwest / west until replanted forestry is re-established. Outbuildings would also limit visibility to the northeast.   |  |
| <b>Magnitude of Change (Proposed Development only)</b>  |  |
| <b>Nearest Turbine to the Property:</b> Turbine T5 is located 2.4 km to the south/ southwest.   |  |
| <b>During Operation:</b> Figure 5.35b indicates that ten proposed turbines (nine hubs and one blade) would be theoretically visible across the skyline to the south of the property, occupying 60° of the horizontal FoV. Turbines T3, T5 and T9 are the most prominent on the wireframe, although views of the proposed turbines would be greatly reduced due to the screening effects of intervening mature garden trees and coniferous vegetation.   |  |
| The magnitude of change affecting the property would be <i>Very Low</i> due to vegetation screening in both summer and winter periods.  |  |
| <b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Very Low</i> .  |  |
| <b>Day-time Visual Assessment:</b>  | <b>Sensitivity:</b> High   |
|   | <b>Magnitude:</b> Very Low   |
|   | <b>Level of Effect:</b> Minor and Not Significant                  |
|   | <b>Type of Effect:</b> Long term (reversible), direct and neutral. |
| <b>Cumulative Assessment:</b>   |  |
| <b>Existing Wind Farms:</b> <i>Very Low</i> - South Kyle would be theoretically visible to the south, beyond the Proposed Development and intervening mature coniferous trees at Nith Lodge.  |  |

**Consented Wind Farms:** *Very Low*. North Kyle, Over Hill, and Greenburn wind farms would be theoretically visible to the north and northwest, beyond intervening forestry / outbuildings and coniferous garden trees / vegetation enclosing Nith Lodge.

**Other Wind Farm Applications:** There would be no visibility of other windfarm applications within 10km.

**Scenario 1** (Existing + Consented Development):

**Combined Effect:** Minor and Not Significant

**Additional Effect:** Minor and Not Significant

**Scenario 2** (Existing + Consented + Applications):

No cumulative effect.

**Night-time Assessment of Aviation Warning Lights:**

Up to four 200 cd aviation warning lights would be theoretically visible (T1, T5, T9 and T10) from the driveway on the edge of the B741. Accounting for intervening screening the magnitude would be *Very Low* and the level of effect Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. Other effects resulting from the turbine blades passing the light are unlikely when the turbines are facing southwest.

Cumulatively up to seven aviation warning lights would be theoretically visible at Over Hill to the north, although screened vegetation and the Proposed Development would not contribute significantly.

|   |  |
|---|--|
| <b>Residential Visual Amenity Assessment:</b> | Allowing for vegetation screening there would be no significant day time or night-time visual effects.   |
|   | The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest. |



Above: Google Streetview of Nith Lodge - Image Capture August 2024

Table 5.3.2c: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA Group 01(b): Knockenlee (Figure 5.35c)  |  |
|---|--|
| <b>Field Survey Assessment Locations:</b> From the adjacent B741.   |  |
| <b>Description:</b>   |  |
| <b>Location:</b> Knockenlee is situated at a lower elevation to Nith Lodge, to the south of the B741 road corridor at an overall elevation of 275 m AOD.  |  |
| <b>Property Type:</b> modern single storey detached bungalow, accessed directly from the B741.  |  |
| <b>Related buildings:</b> There is one shed outbuilding associated with Knockenlee, located directly adjacent the rear elevation of the property facing west.   |  |
| <b>Views from the Main Elevation / Principal Views:</b> Views from the main elevation of Knockenlee appear to extend to the east and south, across the narrow, wooded River Nith valley towards Maneight Hill and its western slopes covered in a mosaic of coniferous forestry interspersed by grassland.  |  |
| <b>Views from the Rear / Secondary Views:</b> Views from the rear elevation of Knockenlee (to the west) are partially restricted, extending across a narrow rear garden, boundary wall, small paddock and open semi-improved agricultural field towards a small-scale non-commercial wind turbine. Views further southwest are screened by the intervening topography.  |  |
| <b>Restricted Views:</b> Longer range views (i.e. >100m) to the west / southwest of Knockenlee are restricted by the intervening topography to the west of the River Nith.  |  |
| <b>Magnitude of Change</b> (Proposed Development only)  |  |
| <b>Nearest Turbine to the Property:</b> Turbine T5 is located 2.3 km to the southwest.  |  |
| <b>During Operation:</b> Figure 5.35c indicates that eight proposed turbines (four hubs and four blades) would be theoretically visible across the skyline to the south of the property, occupying 63° of the horizontal FoV. Turbines T7, T9 and T10 are the most prominent on the wireframe, although views of the proposed turbines would be subject to partial screening from intervening woodland vegetation adjacent the property and along the River Nith, with the most distant turbine blades (T3, T5, T6 and T11) being fully screened by the intervening coniferous and woodland vegetation associated with Meikle Hill. |  |
| The magnitude of change affecting the property would be <i>Low to Very Low</i> due to vegetation screening in both summer and winter periods.   |  |
| <b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Low</i> .   |  |
| <b>Day-time Visual Assessment:</b>  | <b>Sensitivity:</b> High   |
|   | <b>Magnitude:</b> Low to Very Low                                  |
|   | <b>Level of Effect:</b> Moderate to Minor and Not Significant      |
|   | <b>Type of Effect:</b> Long term (reversible), direct and neutral. |
| <b>Cumulative Assessment:</b>   |  |
| <b>Existing Wind Farms:</b> <i>Low.</i> South Kyle would be partially visible in views to the south / southeast of the property beyond intervening vegetation.  |  |
| <b>Consented Wind Farms:</b> <i>Very Low to Zero.</i> North Kyle, Over Hill, and Greenburn wind farms would be theoretically visible to the north, although in practice this would all be screened by the intervening landform and coniferous vegetation at Nith Lodge.   |  |

**Other Wind Farm Applications:** There would be no visibility of other windfarm applications within 10km.

**Scenario 1** (Existing + Consented Development):

**Combined Effect:** Minor and Not Significant

**Additional Effect:** Minor and Not Significant

**Scenario 2** (Existing + Consented + Applications):

No cumulative effect.

**Night-time Assessment of Aviation Warning Lights:**

Up to two 200 cd aviation warning lights would be theoretically visible (T9 and T10) and the magnitude would be *Low to Very Low* and the level of effect Moderate to Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. This is likely to further reduce the magnitude of change to Minor. Some reflected light may be visible as the turbine blades slowly rotate behind the light when the turbines are facing southwest.

Cumulative visibility of aviation warning lights at Over Hill to the north would be screened by intervening landform and vegetation at Night Lodge.

**Residential Visual Amenity Assessment:**

Allowing for vegetation screening there would be no significant day time or night-time visual effects.

The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest.



Above: Google Streetview of Knockenlee - Image Capture August 2024



Table 5.3.2d: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA02: Meiklehill (Figure 5.35d)  |  |
|---|--|
| Field Survey Assessment Locations: From the adjacent B741.  |  |
| <b>Description:</b><br><b>Location:</b> Meiklehill is situated 262 m south of the B741 road corridor adjacent to the River Nith at an overall elevation of 293.5 m AOD. The property sits within the River Nith valley, flanked to the southwest and southeast by the lower slopes Meikle Hill and Maneight Hill respectively.<br><b>Property Type:</b> Single storey detached cottage, accessed directly from the B741.<br><b>Related buildings:</b> There are a small number of single storey outbuildings associated with the property, including workshops / garages to the south and a larger animal shelter set within an adjacent field to the north / northeast of the property.<br><b>Views from the Main Elevation / Principal Views:</b> Views from the main elevation of the property appear to be focused both east and west, with the west / southwest views extending beyond a garden area towards the Knockenlee Burn. Views west, extend across the main access track, small paddock area and pond towards the forested slopes and summit of Meikle Hill.<br><b>Views from the Rear / Secondary Views:</b> Views to the south are orientated towards the animal shelters / stables and Meikle Hill. Views north extend along the access track towards the B741 and Rig Hill. A single domestic scale turbine is visible in the field closest to the road.<br><b>Restricted Views:</b> Views south are partly curtailed or restricted by Meikle Hill. |  |
| <b>Magnitude of Change</b> (Proposed Development only)<br><b>Nearest Turbine to the Property:</b> Turbine 5 is located 2.1 km to the south.<br><b>During Operation:</b> Figure 5.35d indicates that ten proposed turbines (seven hubs and three blades) would be theoretically visible across the skyline and on either side of Meikle Hill to the south of the property, occupying 67° of the horizontal FoV. The Proposed Development would be highly visible across the skyline to the south when entering the property via the main driveway extending from the A741 to the north and from the southern elevation / views and main garden areas with little intervening vegetation, beyond the more distant forestry. Turbines T5 and T9 are the most prominent on the wireframe. Some limited screening may be provided by the adjacent outbuildings. The overall the magnitude of change likely in respect of views from the southern aspect of the property is considered to be <i>Medium</i> , due to the partial topographical screening limited intervening coniferous vegetation in both summer and winter periods.<br><b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Medium</i> .  |  |
| <b>Day-time Visual Assessment:</b>  | <b>Sensitivity:</b> High<br><b>Magnitude:</b> Medium<br><b>Level of Effect:</b> Major and Significant<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Medium - Low</i> . Enoch Hill and South Kyle would be partially visible in views to the south / southeast. Allowing for forestry felling the to the south, views would be similar to Figure 5.35d.  |  |

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|---|
| <b>Consented Wind Farms:</b> <i>Very Low to Zero</i> . North Kyle, Over Hill, and Greenburn wind farms would be theoretically visible to the north, although in practice they would be screened by the intervening landform and coniferous forestry / vegetation. |
| <b>Other Wind Farm Applications:</b> There would be no visibility of other windfarm applications within 10km.   |
| <b>Scenario 1</b> (Existing + Consented Development):<br><b>Combined Effect: Major – Moderate and Significant</b> (mainly the Proposed Development, North Kyle, Over Hill, and Greenburn).<br><b>Additional Effect: Major and Significant</b>                     |
| <b>Scenario 2</b> (Existing + Consented + Applications): No cumulative effect.  |

**Night-time Assessment of Aviation Warning Lights:**

Up to three 200 cd aviation warning lights would be theoretically visible (T5, T9 and T10) and the magnitude would be *Low-Very Low*, and the effect of the aviation warning lights alone would be Moderate to Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. This is likely to further reduce the magnitude of change to Minor. Some reflected light may be visible as the turbine blades slowly rotate behind the light when the turbines are facing southwest.

Cumulative visibility of aviation warning lights at Over Hill to the north would be screened by intervening landform and vegetation at Night Lodge.

|   |  |
|---|--|
| <b>Residential Visual Amenity Assessment:</b> | Although significant, the day-time visual effects would not be so severe to appear overwhelming or dominant, due to the partial landform screening, oblique views and intervening distance. Views north are restricted limiting cumulative effects and there would be no significant night-time effects.<br><br>The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest. |
|---|--|



Above: Google Streetview of Meiklehill - Image Capture August 2024

Table 5.3.2e: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA03: Camlarg (Figure 5.35e)  |  |
|--|--|
| Field Survey Assessment Locations: From the adjacent B741.   |  |
| <b>Description:</b><br><b>Location:</b> The property is located low down within the Cummock Burn valley, adjacent to and south of the B741 road corridor. The property is flanked to the southeast, south, and southwest by the ridge of Mains Hill and Camlarg Hill. The overall elevation of the Camlarg is 208 m AOD.<br><b>Property Type:</b> Single storey detached cottage, accessed directly from the B741.<br><b>Related buildings:</b> There are no notable outbuildings associated with the property, although a small shed / outbuilding is located to the south.<br><b>Views from the Main Elevation / Principal Views:</b> Views from the main elevation of the property appear to be focused both east and west, with the west facing views extending across a small front garden, semi-improved grassland, the Cummock Burn and along the valley towards Gillies' Knowe in Dalmellington. Views towards the north and east also view across and along the Cummock Burn valley landscape, with a conical bing visible to the east, further along the valley.<br><b>Views from the Rear / Secondary Views:</b> Views to the south include a small car parking area and driveway.<br><b>Restricted Views:</b> Views generally are restricted by the valley topography and associated mature trees. |  |
| <b>Magnitude of Change (Proposed Development only)</b><br><b>Nearest Turbine to the Property:</b> Turbine T1 is located 2.1 km to the south/ southeast.<br><b>During Operation:</b> Figure 5.35e indicates that five proposed turbines (two hubs and three blades) would be theoretically visible on the skyline and across the valley to the east, affecting 30° of the horizontal FoV. Turbines T2 and T5 are the most prominent on the wireframe and appear close to a conical bing, beyond forestry and some existing pylons which reinforce the scale of the proposed turbines in this setting. The Proposed Development would be highly visible with turbines T2 and T5 appearing to overlook the valley. Existing forestry would have a limited screening effect due to the relative scale of turbines T2 and T5. The overall magnitude of change likely in respect of views from the eastern aspect of the property would be <i>Medium - Low</i> , due to the prominence of turbines T2 and T5, relative to the smaller scale valley setting.<br><b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Medium - Low</i> .  |  |
| <b>Day-time Visual Assessment:</b>   | <b>Sensitivity:</b> High<br><b>Magnitude:</b> Medium - Low<br><b>Level of Effect:</b> Major and Significant<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Very Low</i> . Dersalloch Wind Farm would be theoretically visible across the skyline to the west of the property, beyond intervening screening.<br><b>Consented Wind Farms:</b> There would be no visibility of consented wind farms within 10km.<br><b>Other Wind Farm Applications:</b> <i>Very Low</i> . The Scienteuch and Knockkippen wind farm applications would be theoretically visible to the west, although in practice these views are subject to screening.  |  |

**Scenario 1** (Existing + Consented Development):

**Combined Effect:** Minor and not significant due to the Proposed Development.

**Additional Effect:** Minor and not significant due to the Proposed Development.

**Scenario 2** (Existing + Consented + Applications):

**Combined Effect:** Minor and not significant due to the Proposed Development.

**Additional Effect:** Minor and not significant due to the Proposed Development.

**Night-time Assessment of Aviation Warning Lights:**

One 200 cd aviation warning light would be theoretically visible (T5) The magnitude of change would be *Very Low*, and the effect of the aviation warning lights alone would be Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to between <17 cd coinciding with periods when the visibility is >5km in all directions. There may be a slow 'blink' or on / off effect as the turbine blades slowly rotate to pass in front of the light when the turbines are facing southwest.

There would be no cumulative effects.

**Residential Visual Amenity Assessment:**

The overall visual effect from Camlarg would be significant due to the prominence of the development viewing east. However, the Proposed Development would affect a narrow angle of view along the valley and would not be visible in other directions. Although significant, the day-time visual effects would not be so severe as to appear inescapably or overwhelming or dominant, due to the partial landform screening and intervening distance when considered in the round and there would be no significant cumulative or night-time effects.

The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest.



Above: Camlarg (red dot) Google Imagery @2024 Airbus, CNES / Airbus, Maxar Tech. Map data @2024



Table 5.3.2f: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA04: Clawfin (Figure 5.35f)   |
|---|
| <b>Field Survey Assessment Locations:</b> From the adjacent B741.   |
| <b>Description:</b><br><b>Location:</b> There are three closely associated properties at Clawfin, which is located within the Cummock Burn valley landscape, south of the B741 road corridor and adjacent the Black Burn tributary of the Cummock Burn.<br><b>Property Type:</b> The main property is a large 1.5 - 2 storey detached farmhouse set amongst trees and farm buildings at a lower elevation (250m AOD). The second a modern detached bungalow located at a higher and more open elevation (260m AOD). The third ‘Owl Barn’ is a recent contemporary ‘barn style’ detached property with black corrugated cladding (260m AOD) located between the first and second properties. s All of these properties are accessed directly from the B741.<br><b>Related buildings:</b> These properties are set within the context of a working farm, as such there are some large agricultural sheds and smaller buildings located to the south, southeast and east of the farmhouse.<br><b>Views from the Main Elevation / Principal Views:</b> Clawfin is surrounded by commercial forestry to the east, south and west, although forestry to the east is young and the views out are currently open along the valley in all directions.<br>The main farmhouse is enclosed by mature deciduous trees to the north, south and west. The main elevations of the farmhouse face approximately east and west and the views are likely to be short range and partly enclosed by the topography, perimeter trees and farm buildings.<br><br>The bungalow also faces east / west, with the main gardens on the south and west. Except for the trees to the south, the views to the north, east and west are open, viewing along the valley which is enclosed by Clawfin Hill to the south and Benbeoch to the north. Some pylons are visible on the horizon to the east.<br>The main views from Owl Barn appear to be east, south and west with the main garden areas to the south and west. As with the bungalow there would be open views to the east or rear of Owl Barn along the valley, although subject to screening from forestry along the eastern property boundary.<br><b>Views from the Rear / Secondary Views:</b> The secondary views appear to be east in respect of the bungalow and owl Barn and possibly north in respect of the main farmhouse. Views generally are restricted by the valley topography and associated mature trees. During the winter months, overall visibility would increase when the deciduous trees lose their leaves. As the surrounding forestry matures over the next 20-40 years the views from all properties would become more enclosed, although the assessment assumes a worst case.<br><br><b>Magnitude of Change (Proposed Development only)</b><br><b>Nearest Turbine to the Property:</b> Turbine T2 is located 1.3 km to the south.<br><b>During Operation:</b> Figure 5.35f indicates that 11 proposed turbines (eight hubs and three blades) would be theoretically visible on the skyline and across the valley to the east and affecting 63° of the horizontal FoV. Turbines T2, T1 and T5 are the most prominent on the wireframe appearing beyond the valley, behind existing forestry which would screen the turbine bases / lower towers. The overall magnitude of change likely in respect of views from the eastern aspect of the bungalow and Owl Barn is likely to be <i>High</i> reducing to <i>Low</i> over the next 20-40 years as forestry matures. From the main farmhouse the magnitude of change would be <i>Medium</i> as this property is more enclosed with some screening from farm buildings more likely. Again, the magnitude would reduce to <i>Low</i> over the next 20-40 years as forestry matures. |

**During Construction and Decommissioning:** The upper parts of a crane, may be visible and the magnitude of change during these periods would range from *Zero to High / Medium*.

|                                    |  |
|------------------------------------|--|
| <b>Day-time Visual Assessment:</b> | <b>Sensitivity:</b> High<br><b>Magnitude:</b> High (bungalow and Owl Barn) Medium (farmhouse)<br><b>Level of Effect:</b> <b>Substantial and Significant</b> (bungalow and Owl Barn)<br><b>Major and Significant</b> (farmhouse)<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
|------------------------------------|--|

|   |
|---|
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Medium-Low</i> . Enoch Hill and South Kyle are largely screened by landform as indicated in the wireline. Dersalloch would be theoretically visible to the west with limited visibility ( <i>Very Low</i> ). North Kyle would be visible to the north ( <i>Medium-Low</i> ) beyond the valley topography and vegetation.<br><b>Consented Wind Farms:</b> Greenburn and Overhill would be visible to the north, beyond North Kyle ( <i>Low</i> ).<br><b>Other Wind Farm Applications:</b> <i>Very Low</i> . Scienteuch would be theoretically visible to the west, although in practice these views are subject to screening as with Dersalloch.<br><b>Scenario 1</b> (Existing + Consented Development): – Significant due to the Proposed Development only<br><b>Combined Effect:</b> <b>Substantial</b> (bungalow and Owl Barn) <b>Major</b> (farmhouse) <b>and Significant</b><br><b>Additional Effect:</b> <b>Substantial</b> (bungalow and Owl Barn) <b>Major</b> (farmhouse) <b>and Significant</b><br><b>Scenario 2</b> (Existing + Consented + Applications): – Significant due to Proposed Development only, as above. |
|---|

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|---|
| <b>Night-time Assessment of Aviation Warning Lights:</b><br>Up to three 200 cd aviation warning lights would be theoretically visible (T1, T5 and T9). The magnitude would be <i>Low-Very Low</i> , and the effect of the aviation warning lights alone would be Moderate to Minor and Not Significant in respect of all three properties. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. Other effects resulting from the turbine blades passing the light are unlikely when the turbines are facing southwest.<br>There would be no cumulative effects. |
|---|

|   |   |
|---|---|
| <b>Residential Visual Amenity Assessment:</b> | The overall visual effect on all three properties at Clawfin would be significant due to the prominence of the development viewing east. However, the Proposed Development would appear beyond the valley and would not affect the principal views to the west from the bungalow; to the south and west from Owl Barn, and the views from the farmhouse would have a more enclosed nature due to the farm buildings and perimeter trees. Although significant, the day-time visual effects would not be so severe to appear overwhelming or inescapably or dominant, when considered in the round.<br>There would be no significant night-time effects.<br>The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest. |
|---|---|





Above: Google Streetview of Baird's Bungalow - Image Capture August 2024

Table 5.3.2g: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA Group 02a: Baird's Bungalow (Figure 5.35g)  |   |
|---|---|
| Field Survey Assessment Locations: From the adjacent B741.  |   |
| <b>Description:</b><br><b>Location:</b> Baird's Bungalow (also known as Pines View) is located off the B741 in the Cummoch Burn valley, at an elevation of 208 m AOD.<br><b>Property Type:</b> Single storey detached cottage, accessed to the south of the B741.<br><b>Related buildings:</b> A garage, log shed and / or workshop is located to the south.<br><b>Views from the Main Elevation / Principal Views:</b> Views from the main elevation of Bairds Bungalow, appear to extend west along the valley, beyond the carparking area / drive and perimeter shrubs to overlook a small pasture field and mature trees associated with Almar View to the far west / northwest.<br><b>Views from the Rear / Secondary Views:</b> Views to the south and east appear to be short range and enclosed by deciduous trees and shrubs.  |   |
| <b>Magnitude of Change</b> (Proposed Development only)<br><b>Nearest Turbine to the Property:</b> Turbine T1 is located 2.1 km to the east/ southeast.<br><b>During Operation:</b> Figure 5.35g indicates that six proposed turbines (four hubs and two blades) would be theoretically visible on the skyline along the valley to the east and affecting 32° of the horizontal FoV. Turbines T2 and T5 are the most prominent on the wireframe appearing beyond the valley, set behind existing forestry which would screen the turbine bases / lower towers. Allowing for gaps in vegetation and seasonal change to deciduous vegetation enclosing the garden to the west, the overall magnitude of change is likely to be <i>Medium-Low</i> reducing to <i>Low</i> in the summer months.<br><b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero</i> to <i>Medium-Low</i> . |   |
| <b>Day-time Visual Assessment:</b>  | <b>Sensitivity:</b> High<br><b>Magnitude:</b> Medium-Low<br><b>Level of Effect:</b> <b>Major to Moderate and Significant</b> (reducing to Moderate in the summer months – not significant)<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Very Low</i> . Enoch Hill and South Kyle are screened by landform as indicated in the wireline and Dersalloch although theoretically visible to the west would have limited visibility ( <i>Very Low</i> ). North Kyle would be screened by topography and vegetation.<br><b>Consented Wind Farms:</b> There would be no visibility of consented wind farms within 10km.<br><b>Other Wind Farm Applications:</b> <i>Very Low</i> . Scienteuch would be theoretically visible to the west, although in practice these views are subject to screening as with Dersalloch.   |   |
| <b>Scenario 1</b> (Existing + Consented Development):<br><b>Combined Effect:</b> <b>Major to Moderate and Significant</b> (due to the Proposed Development only)<br><b>Additional Effect:</b> <b>Major to Moderate and Significant</b> (due to the Proposed Development only)   |   |
| <b>Scenario 2</b> (Existing + Consented + Applications):  |   |

**Combined Effect:** **Major to Moderate and Significant** (due to the Proposed Development only)

**Additional Effect:** **Major to Moderate and Significant** (due to the Proposed Development only)

**Night-time Assessment of Aviation Warning Lights:**

Up to two 200 cd aviation warning lights would be theoretically visible (T1 and T5). The magnitude would be *Very Low*, and the effect of the aviation warning lights alone would be Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. There may be a slow 'blink' or on / off effect as the turbine blades slowly rotate to pass in front of the light when the turbines are facing southwest.

There would be no cumulative effects.

**Residential Visual Amenity Assessment:**

The overall visual effect from Baird's Bungalow would be significant due to the prominence of the development viewing east. However, the Proposed Development would appear beyond the valley and would not affect the principal views to the west from the bungalow, whilst the views to the east have some screening from perimeter trees. Although significant, the day-time visual effects would not be so severe to appear overwhelming or dominant, due to the intervening distance and partial screening when considered in the round.

There would be no significant cumulative or night-time effects.

The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest.



Above: Google Streetview of Baird's Bungalow - Image Capture August 2024



Table 5.3.2h: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA Group 02b: Almar View (Figure 5.35h)  |  |
|---|--|
| Field Survey Assessment Locations: From the adjacent B741.  |  |
| <b>Description:</b><br><b>Location:</b> Almar View is located off the B741 in the Cummoich Burn valley, at an elevation of 208 m AOD.<br><b>Property Type:</b> Single storey detached cottage, accessed to the south of the B741.<br><b>Related buildings:</b> A number of outbuildings including a garage / workshop, log shed, and glasshouse are located to the north and east of the property.<br><b>Views from the Main Elevation / Principal Views:</b> Views from the main elevation appear to extend southeast, east and northwest and appear to be enclosed by perimeter trees and shrubs with Pennyvenie Farm visible to the west. The views west extend over a small pasture field, whilst the western views extend along the valley beyond the perimeter hedge.<br><b>Views from the Rear / Secondary Views:</b> Views to the south and west appear to be secondary to the main living areas and main garden areas of the property.   |  |
| <b>Magnitude of Change (Proposed Development only)</b><br><b>Nearest Turbine to the Property:</b> Turbine T1 is located 2.2 km to the east. .<br><b>During Operation:</b> Figure 5.35h indicates that six proposed turbines (five hubs and one blade) would be theoretically visible on the skyline along the valley to the east. Affecting 32° of the horizontal FoV. Turbines T2 and T5 are the most prominent on the wireframe appearing to overlook the valley, from beyond existing forestry which would screen the turbine bases / lower towers. The turbines would be partly visible on the horizon above Baird’s Bungalow and associated trees. Elsewhere the western views would be screened by trees and buildings. Allowing for gaps in vegetation the overall magnitude of change is likely to be <i>Low</i> .<br><b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Low</i> . |  |
| <b>Day-time Visual Assessment:</b>  | <b>Sensitivity:</b> High<br><b>Magnitude:</b> Low<br><b>Level of Effect:</b> Moderate and Significant<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Very Low</i> . Enoch Hill and South Kyle are screened by landform as indicated in the wireline and Dersalloch although theoretically visible to the west would have limited visibility ( <i>Very Low</i> ). North Kyle would be screened by topography and vegetation.<br><b>Consented Wind Farms:</b> There would be no visibility of consented wind farms within 10km.<br><b>Other Wind Farm Applications:</b> <i>Very Low</i> . Sciencetuch would be theoretically visible to the west, although in practice these views are subject to screening as with Dersalloch.  |  |
| <b>Scenario 1 (Existing + Consented Development):</b><br><b>Combined Effect:</b> Moderate and Significant (due to the Proposed Development only)<br><b>Additional Effect:</b> Major to Moderate and Significant (due to the Proposed Development only)  |  |

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| <b>Scenario 2 (Existing + Consented + Applications):</b><br><b>Combined Effect:</b> Major to Moderate and Significant (due to the Proposed Development only)<br><b>Additional Effect:</b> Major to Moderate and Significant (due to the Proposed Development only)   |  |
| <b>Night-time Assessment of Aviation Warning Lights:</b><br>Up to two 200 cd aviation warning lights would be theoretically visible (T1 and T5). The magnitude would be <i>Very Low</i> , and the effect of the aviation warning lights alone would be Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. There may be a slow ‘blink’ or on / off effect as the turbine blades slowly rotate to pass in front of the light when the turbines are facing southwest.<br>There would be no cumulative effects. |  |
| <b>Residential Visual Amenity Assessment:</b>  | The overall visual effect from Almar View would be significant, however, the Proposed Development would appear beyond building and vegetation at Baird’s Bungalow and would not affect other views from the property. When considered in the round, the day-time visual effects would not be so severe to appear overwhelming or dominant, due to the intervening distance and partial screening.<br>There would be no significant cumulative or night-time effects.<br>The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest. |



Above: Google Streetview of Almar View - Image Capture August 2024



Table 5.3.2i: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA05: Pennyvenie Farm (Figure 5.35i)  |  |
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| Field Survey Assessment Locations: From the adjacent B741.   |  |
| <b>Description:</b><br><b>Location:</b> Pennyvenie Farm is located to the southwest of the B741 within the Cummock Burn valley at an overall elevation of 221 m AOD.<br><b>Property Type:</b> Single storey detached cottage, accessed directly from the B741.<br><b>Related buildings:</b> There are a number of large farm buildings / farmyard area located to the east and south of the cottage.<br><b>Views from the Main Elevation / Principal Views:</b> Views from the main elevation of the property appear to be focused to the west, viewing away from the farmyard and across open fields along the valley to the west and north. Southern and eastern views appear to view across the farmyard area.<br><b>Views from the Rear / Secondary Views:</b> Views to the east and south appear to be secondary to the main living areas.<br><b>Restricted Views:</b> Views east are restricted by farmyard building and mature trees. |  |
| <b>Magnitude of Change</b> (Proposed Development only)<br><b>Nearest Turbine to the Property:</b> Turbine T1 is located 2.3 km to the east/ southeast.<br><b>During Operation:</b> Figure 5.35i indicates that ten proposed turbines (seven hubs and three blades) would be theoretically visible on the skyline and along the valley to the east, affecting 32° of the horizontal FoV. Turbines T2 and T5 are the most prominent on the wireframe appearing to overlook the valley, from beyond existing forestry which would screen the turbine bases / lower towers. The turbines would be partly visible on the horizon above the farm buildings and associated trees and the magnitude of change would be <i>Low</i> .<br><b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Low</i> .                             |  |
| <b>Day-time Visual Assessment:</b>   | <b>Sensitivity:</b> High<br><b>Magnitude:</b> Low<br><b>Level of Effect:</b> Moderate and Significant<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Very Low</i> . Enoch Hill and South Kyle are screened by landform as indicated in the wireline and Dersalloch although theoretically visible to the west would have limited visibility ( <i>Very Low</i> ). North Kyle would be screened by topography and vegetation.<br><b>Consented Wind Farms:</b> There would be no visibility of consented wind farms within 10km.<br><b>Other Wind Farm Applications:</b> <i>Very Low</i> . Sciencetuch would be theoretically visible to the west, although in practice these views are subject to screening as with Dersalloch.   |  |
| <b>Scenario 1</b> (Existing + Consented Development):<br><b>Combined Effect:</b> Moderate and Significant (due to the Proposed Development only)<br><b>Additional Effect:</b> Major to Moderate and Significant (due to the Proposed Development only)   |  |
| <b>Scenario 2</b> (Existing + Consented + Applications):   |  |

**Combined Effect:** Major to Moderate and Significant (due to the Proposed Development only)

**Additional Effect:** Major to Moderate and Significant (due to the Proposed Development only)

**Night-time Assessment of Aviation Warning Lights:**

Up to three 200 cd aviation warning lights would be theoretically visible (T1, T5 and T9). The magnitude would be *Very Low*, and the effect of the aviation warning lights alone would be Minor and Not Significant. Angle intensity mitigation would reduce the light intensity further to <17 cd coinciding with periods when the visibility is >5km in all directions. There may be a slow ‘blink’ or on / off effect as the turbine blades slowly rotate to pass in front of the light when the turbines are facing southwest.

There would be no cumulative effects.

**Residential Visual Amenity Assessment:**

The overall visual effect would be significant, assuming that the turbines would be clearly visible beyond the valley above the farm buildings and trees. Assuming a worst case and considered in the round, the day-time visual effects would not be so severe to appear overwhelming or dominant, due to the intervening distance and the layout of the property with eastern views comprising large farm buildings in the foreground.

There would be no significant cumulative or night-time effects.

The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest.



Above: Google Streetview of Pennyvenie Farm - Image Capture August 2024

Table 5.3.2j: Survey of Properties and Assessment of Impacts on Residential Visual Amenity cont.

| RVA02: Maneight (Figure 5.35j)   |  |
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| Field Survey Assessment Locations: From the adjacent B741.   |  |
| <b>Description:</b><br><b>Location:</b> The property is located directly south of the B741 road corridor at an overall elevation of 312 m AOD, on the northern toe of Maneight Hill as it slopes towards the River Nith valley.<br><b>Property Type:</b> Detached two storey dwelling (under renovation), accessed directly from the B741.<br><b>Related buildings:</b> Various barns, garage, child’s play fort, outbuildings and mobile home/caravans.<br><b>Views from the Main Elevation / Principal Views:</b> Views extend north, across the valley of the River Nith towards the ridgeline formed by Rig Hill and Little Rigend Hill. Coniferous forestry plantations are present along the brow of the hill and skyline.<br><b>Views from the Rear / Secondary Views:</b> Views from the rear of the property extend south, east and west across an auto-parts business / parking area with vehicles and workshop / garage buildings to the fore of the lower slopes of Maneight Hill. The forested lower and upper slopes of Maneight Hill form the main topographical element within the background views. |  |
| <b>Magnitude of Change</b> (Proposed Development only)<br><b>Nearest Turbine to the Property:</b> Turbine T9 is located 2.8 km to the south.<br><b>During Operation:</b> Figure 5.35j indicates that ten of the proposed turbines (seven hubs and three blades) would be theoretically visible on the skyline of Meikle Hill and Maneight Hill on either side of the Nith valley, affecting 40°of the horizontal FoV.<br>It is likely however, that views from the main residential areas (beyond the auto-parts business) would be partly screened by the various outbuildings / garages / containers. The overall magnitude of change to the southern views from the property would be <i>Low</i> .<br><b>During Construction and Decommissioning:</b> The upper parts of a crane, may be visible and the magnitude of change during these periods would range from <i>Zero to Low</i> .   |  |
| <b>Day-time Visual Assessment:</b>   | <b>Sensitivity:</b> High<br><b>Magnitude:</b> Low<br><b>Level of Effect:</b> Moderate and not significant due to the partial screening and context of the adjacent auto-parts business.<br><b>Type of Effect:</b> Long term (reversible), direct and negative. |
| <b>Cumulative Assessment:</b><br><b>Existing Wind Farms:</b> <i>Medium</i> . Enoch Hill and South Kyle would be partially visible in views to the southeast of the property beyond intervening landform / vegetation and foreground screening elements.<br><b>Consented Wind Farms:</b> <i>High – Medium</i> . North Kyle, Over Hill, and Greenburn wind farms would be theoretically visible to the north and west, beyond intervening forestry / vegetation.<br><b>Other Wind Farm Applications:</b> Although Carrick and Knockcronal blades are visible on the horizon, these would be screened by successive layers of intervening forestry. Otherwise, there would be no visibility of other windfarm applications within 10km.   |  |
| <b>Scenario 1</b> (Existing + Consented Development):  |  |

**Combined Effect:** Substantial to Major as a result of the North Kyle, Over Hill, and Greenburn wind farms and *not* the Proposed Development.

**Additional Effect:** Moderate to Minor and not Significant

**Scenario 2** (Existing + Consented + Applications):

No cumulative effects resulting from other windfarm applications within 10km.

**Night-time Assessment of Aviation Warning Lights:**

Two 200 cd aviation warning lights would be theoretically visible (T1 and T5), although in practice it is most likely that they would be screened or partly screened by the auto-parts business.  
Assuming the lights would be visible, the magnitude would be *Very Low* and the level of effect Minor and Not Significant.  
Angle intensity mitigation would reduce the light intensity further to 42-22 cd coinciding with periods when the visibility is >5km in all directions. Some reflected light may be visible as the turbine blades slowly rotate behind the light when the turbines are facing southwest.  
Cumulatively up to seven aviation warning lights would be theoretically visible at Over Hill to the north, although the Proposed Development would not contribute significantly.

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| <b>Residential Visual Amenity Assessment:</b> | Allowing for landform screening and the foreground screening of buildings associated with the auto-parts business there would be no significant day time or night-time visual effects.<br><br>The Proposed Development would not therefore reach the Residential Visual Amenity Threshold, compromise living standards or otherwise render the property an unattractive place to live when judged objectively, in the public interest. |
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Above: Google Streetview of Maneight - Image Capture August 2024