Volume 5: Appendix 9.4 – Cumulative Landscape and Visual Assessment

Scottish & Southern Electricity Networks
TRANSMISSION

CONTENTS

LIST OF ABBREVIATIONS

BESS: Battery Energy Storage System

EIAR: Environmental Impact Assessment Report

LCT: Landscape Character Type

LLA: Local Landscape Area

LVIA: Landscape and Visual Impact Assessment

OHL: Overhead Line

UGC: Underground Cable

VRA: Visual Receptor Area

ZTV: Zone of Theoretical Visibility

EXECUTIVE SUMMARY

Introduction

This appendix presents the assessment and findings of the cumulative landscape and visual impact assessment for the proposed Kintore to Tealing 400 kV overhead line (OHL) ('the Proposed Development'). The aim of the cumulative assessment is to identify any interactions with other types of development (including transmission infrastructure, wind farms or other large-scale development) which could result in further Significant landscape and visual effects not identified within the Landscape and Visual Impact Assessment (LVIA).

Methodology

The assessment of cumulative landscape and visual effects focuses on changes which may result during construction and operation from the introduction of the Proposed Development in-combination with and in-addition to:

- 'Intra' Developments (SSEN Transmission Associated Developments); and
- 'Inter' Developments (Other SSEN Transmission Developments and Third Party Developments).

For the purposes of the cumulative LVIA, reasonably foreseeable developments[1] within 3 km of the Proposed Development were considered. In addition, projects including tall infrastructure (eg wind farms and OHLs) have been included where these would be within 5 km of the Proposed Development.

A staged approach was taken to the cumulative LVIA, which is summarised as follows:

- cumulative assessment of potential in-combination and in-addition effects of the Proposed Development together with the Intra Developments; and
- cumulative assessment of potential in-combination and in-addition effects of the Proposed Development together with the Intra Developments and Inter Developments.

Overview of Cumulative Developments within the Study Area

The Intra and Inter Developments considered within the cumulative LVIA are listed in **Table 9.4.1: Intra and Inter Developments considered in the cumulative LVIA** of this appendix. In total, 29 reasonably foreseeable developments have been considered in the cumulative LVIA. This includes:

- those with planning consent (including Section 36 and Section 37 Consent) but where construction had not commenced at the time of the assessment;
- those with valid Environmental Impact Assessment (EIA) scoping or consent applications (including Section 36 and Section 37 applications); and
- other projects which have not been submitted into the planning system, but where sufficient information is available to inform a cumulative assessment.

The Intra and Inter Developments primarily comprise electricity infrastructure (eg substations, overhead lines, battery energy storage systems (BESS)), and energy generation infrastructure (eg wind farms and solar farms). In addition, one residential development near Laurencekirk has been included.

The Intra and Inter Developments are not distributed evenly along the route, however, they are predominantly concentrated at the northern and southern ends of the Proposed Development alignment, near Kintore and Tealing, respectively, and in the area around Fetteresso Forest, halfway along the alignment.

Overview of Findings

A summary of the significant cumulative landscape and visual effects identified in the cumulative LVIA are presented below on a section-by-section basis, as per the assessment set out in the appendix.

[1] Reasonably foreseeable developments are described in Section 1, paragraph 1.2.3.

Section A

During construction, Moderate (Significant) cumulative landscape effects are expected on parts of Landscape Character Type (LCT) 382 and LCT 387. Major (Significant) cumulative visual effects are expected on some visual receptors (people) within Visual Receptor Areas (VRAs) A2, A3, A6 and A9.

During operation, Moderate (Significant) cumulative landscape effects are expected on parts of LCT 382, LCT 384, and LCT 387. Major (Significant) cumulative visual effects are expected on some visual receptors within VRAs A3 and A6, and Moderate (Significant) cumulative visual effects on some receptors in VRAs A2, A7, A8 and A9.

The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be Significant. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments and would have greater landscape and visual effects.

Section B

There are no Intra Developments or Inter Developments that would interact with Section B of the Proposed Development, and therefore no cumulative effects would arise.

Section C

There are no Intra Developments or Inter Developments that would interact with Section C of the Proposed Development, and therefore no cumulative effects would arise.

Section D/E

During construction, Moderate (Significant) cumulative landscape effects are expected on parts of LCT 24 and LCT 29. Major (Significant) cumulative visual effects are expected on some visual receptors within VRAs D22, D23, D24, D25, D26, E1, E2, E3, E4, E5 and E6.

During operation, Major (Significant) cumulative landscape effects are expected on parts of LCT 24 and LCT 29. Major (Significant) cumulative visual effects are expected on some visual receptors within VRAs D22, D23, D24, D25, E1, E2, E3, E4, E5 and E6 as well as Moderate (Significant) cumulative visual effects on some receptors in VRA D23.

The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be Significant. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments and would have greater landscape and visual effects.

Section F

During construction, Moderate (Significant) cumulative landscape effects are expected on some parts of LCT 26. Major (Significant) cumulative visual effects are expected on some visual receptors within VRAs F16, F30, F32 and F33, and Moderate (Significant) visual effects on some receptors within VRAs F29 and F31.

During operation, Moderate (Significant) cumulative landscape effects are expected on some parts of LCT 26. Major (Significant) cumulative visual effects are expected on some visual receptors within VRAs F10, F11, F17, F21, F23, F30, F32 and F33, and Moderate (Significant) cumulative visual effects on some receptors in VRAs F29 and F31.

The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be Significant. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments and would have greater landscape and visual effects.

1. INTRODUCTION

1.1.1 This appendix presents the assessment and findings of the cumulative landscape and visual impact assessment for the proposed Kintore to Tealing 400 kV overhead line (OHL) ('the Proposed Development'). It should be read in conjunction with:

- **Volume 2, Chapter 9: Landscape and Visual Amenity** and **Volume 5, Appendix 9.1: Landscape Assessment** and **Appendix 9.2: Visual Assessment** of the EIAR for the assessment of effects of the Proposed Development**;**
- **Volume 5, Appendix 9.5: LVIA and Visualisations Methodology** of the EIAR for the assessment methodology; and
- **Volume 1, Chapter 3: Project Description** of the EIAR for full details of the Proposed Development.

1.1.2 This appendix is supported by the following figures (**Volume 3** of the EIAR):

- **Figures 5.1.1** to **5.1.6: Cumulative Developments;**
- **Figures 9.2a: Landscape Character Types Overview;**
- **Figures 9.2b.1** to **9.2b.6: Landscape Character Types;** and
- **Figures 9.3b.1** to **9.3b.6: Visual Receptor Areas, Viewpoint Locations and other Visual Receptors with Overhead Line Tower Height Zone of Theoretical Visibility (ZTV).**

1.1.3 The following terms are used in this appendix to describe types of cumulative effect:

- In-combination, combined and total[2] – cumulative effects arising from all reasonably foreseeable developments[3], including the Proposed Development, compared to the current baseline.
- In-addition and additional – cumulative effects arising from the addition of the Proposed Development to a future baseline, which assumes other reasonably foreseeable developments are already present.**Error! Bookmark not defined.**
- Combined views – views of the Proposed Development and one or more other reasonably foreseeable developments are experienced at the same time, within the viewer's same arc of vision (ie viewed in the same direction).[4]
- Successive views – views of the Proposed Development and one or more other reasonably foreseeable developments experienced from the same location but seen in different directions of view (ie the viewer will need to turn to see other developments)[4].
- Sequential views - views of the Proposed Development and one or more other reasonably foreseeable developments which occur when a viewer is moving through the landscape from one area to another, for instance when a person is travelling along a road or footpath and is able to see two or more developments at the same, or at different times as they pass along the route[4].

1.2 Scope

1.2.1 The assessment of cumulative landscape and visual effects focuses on changes which may result from the introduction of the Proposed Development in addition to:

- the Intra (SSEN Transmission Associated) Developments defined in **Volume 2, Chapter 16: Cumulative Effects** of the EIAR. These are the substation proposals at Emmock and Hurlie which would be directly connected with the Proposed Development; and
- the Inter Developments defined in **Volume 2, Chapter 16: Cumulative Effects** of the EIAR. These are other reasonably foreseeable SSEN Transmission and Third Party developments (collectively, referred to as Inter Developments).

1.2.2 The developments considered in this cumulative Landscape and Visual Impact Assessment (LVIA) are listed in **Table 9.4.1: Intra and Inter Developments considered in the cumulative LVIA**, and shown in **Volume 3, Figures 5.1.1 - 5.1.6: Cumulative Developments**. This includes all reasonably foreseeable developments within 3 km of the Proposed Development. In addition,

[2] 'Additional' and 'combined' effects are defined in Landscape Institute and institute of Environmental Management and Assessment (2013) Guidelines for Landscape and Visual Impact Assessment. 3rd Edition. ('GLVIA3'), page 124.
[3] Reasonably foreseeable developments are described in paragraph 1.2.3.
[4] 'Combined', 'successive' and 'sequential' views are defined in Nature Scot (2021) Guidance - Assessing the cumulative landscape and visual impact of onshore wind energy developments

for the purposes of the LVIA, projects including tall infrastructure (ie wind farms and OHLs) have been included where these would be within 5 km of the Proposed Development.

1.2.3 Operational and under construction developments form part of the baseline for the LVIA and therefore inform the 'primary' LVIA assessment. Proposed developments within the study area that are considered reasonably foreseeable to the Applicant are considered within this assessment of potential future cumulative effects, as they may give rise to different potential future baseline scenarios. Reasonably foreseeable projects include:

- those with planning consent (including Section 36 and Section 37 Consent) but where construction had not commenced at the time of the assessment;
- those with valid EIA scoping or consent applications (including Section 36 and Section 37 applications); and
- other projects which have not been submitted into the planning system, but where sufficient information is available to inform a cumulative assessment.

Table 9.4.1: Intra and Inter Developments considered in the cumulative LVIA

Name	Distance from the Proposed Alignment	Status[5]	Proposed Development Section
Intra Developments			
Emmock 400 kV Substation	Adjacent	Proposed (submitted)	A
Hurlie 400 kV Substation	Adjacent	Proposed (submitted)	D/E
Inter Developments			
Emmock Tie-ins and Tie-backs, comprising: Tie-in of (existing, upgraded) Alyth to Tealing 275 kV OHL to Emmock Substation; Tie-in of (existing, upgraded) Tealing to Westfield275 kV OHL to Emmock Substation; and Emmock and Tealing Substation OHL Tie-Backs	Adjacent	Proposed (scoping)	A
Alyth to Tealing 275 kV OHL Upgrade (to 400 kV) (SSEN Transmission Development)	Adjacent	Proposed (submitted)	A
Tealing to Westfield 275 kV OHL Upgrade (to 400 kV) (SSEN Transmission Development)	240 m	Proposed (submitted)	A
Fithie Energy Park (BESS) (Third Party Development)	760 m	Proposed (scoping)	A
Balnuith Battery Energy Storage System (BESS) (Third Party Development)	870 m	Consented	A
Myreton BESS (Third Party Development)	1.8 km	Proposed (scoping)	A
Ark Hill Wind Farm Extension (Third Party Development)	3.4 km	Proposed (submitted)	A
Cossans Solar Farm and BESS (Third Party Development)	Adjacent	Proposed (submitted)	A/B
Laurencekirk Residential Development (Third Party Development)	2.2 km	Proposed (submitted)	D
Glendye Wind Farm Grid Connection[6] (SSEN Transmission Development)	Adjacent	Proposed (scoping)	D/E

[5] Status of the proposed cumulative developments as of 31st May 2025, which is the cumulative cut-off date.
[6] Proposed OHL on trident poles

Name	Distance from the Proposed Alignment	Status[5]	Proposed Development Section
Network Rail Drumlithie[7] (SSEN Transmission Development)	Adjacent	Proposed (scoping)	D/E
Fiddes 132 kV Grid Replacement (SSEN Transmission Development)	Adjacent	Proposed (scoping)	D/E
SSEN Transmission offshore grids project[8] (SSEN Transmission Development)	200 m	Proposed (scoping)	D/E
Fetteresso Wind Farm Grid Connection and Access Corridor[9] (SSEN Transmission Development)	Adjacent	Consented	D/E
Craigneil Wind Farm Future Grid Connection[10] (SSEN Transmission Development)	Adjacent	Proposed (scoping)	D/E
Glenbervie BESS (Third Party Development)	Adjacent	Proposed (scoping)	D/E
Quithel BESS (Third Party Development)	695 m	Proposed (scoping)	D/E
Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm[11] (Third Party Development)	Adjacent	Proposed (submitted)	D/E
Craigneil Wind Farm (Third Party Development)	950 m	Proposed (submitted)	D/E
Hill of Fare Wind Farm (Third Party Development)	4.7 km	Proposed (submitted)	F
Kintore to Craigiebuckler 132 kV OHL (existing) realignment (undergrounding) (SSEN Transmission Development)	225 m	Proposed (scoping)	F
South Leylodge Farm BESS (Third Party Development)	380 m	Consented	F
Kintore Substation BESS (Third Party Development)	550 m	Consented	F
Kintore Hydrogen Production Facility (Third Party Development)	435 m	Proposed (submitted)	F
Kintore South Solar Array and BESS (Third Party Development)	1.8 km	Proposed (scoping)	F
Womblehill Farm BESS (Third Party Development)	1.1 km	Proposed (scoping)	F

1.3 Approach

1.3.1 The assessment of cumulative landscape and visual effects has been undertaken using a staged approach, summarised as follows:

- cumulative assessment of potential in-combination and in-addition effects of the Proposed Development together with the Intra Developments; and
- cumulative assessment of potential in-combination and in-addition effects of the Proposed Development together with the Intra Developments and Inter Developments.

[7] Proposed installation of transformers at the Fetteresso Substation extension and the instalment of two cables that connect to the railway to the southeast.
[8] Proposed converter station near Hurlie substation and installation of underground cables.
[9] Proposed underground cable between Fetteresso Wind Farm and Fetteresso Substation.
[10] Proposed OHL between Craigneil Wind Farm and Fetteresso Substation.
[11] Proposed substation and installation of export cables.

1.3.2 Judgements relating to all Intra Developments and Inter Developments contained in this assessment have been made on the basis of the information available to the authors at the time of writing[12].

1.3.3 Cumulative landscape and visual effects are assessed for Sections A-F of the Proposed Development, as illustrated in **Volume 3, Figure 1.1: Overview of the Proposed Development**. To aid understanding of the impacts at different locations along the route the assessment has been presented on a section by section basis. The assessments for Sections D and E however are presented together due to the concentration of Intra and Inter Developments around the Section boundary at the proposed Hurlie 400 kV substation. **Section 2** of this Appendix provides the overall assessment of cumulative landscape and visual effects, during construction and operation, arising from Intra Developments and Intra and Inter Developments. Where construction programmes for the Intra and Inter Developments are known, this has been used to inform the cumulative assessment. However, where construction programmes are unknown, the assessment considers the worst case scenario of all Intra and Inter Developments being constructed simultaneously.

1.3.4 Assessments of cumulative landscape and visual effects for each Intra and Inter Development are set out separately in the tables presented in **Section 3**.

[12] As of 31 May 2025, which is the cumulative cut-off date.

2. CUMULATIVE ASSESSMENT

2.1 Introduction

2.1.1 This section sets out the assessment of cumulative effects for each Section of the Proposed Development. The assessment draws on the tables presented in **Section 3** of this Appendix, which assess the in-combination effects of the Proposed Development with each of the Intra and Inter Developments in turn. This section presents the overall assessment of the cumulative effects of the Proposed Development with the Intra and Inter Developments in each Section, taken together, and comments on the in-addition cumulative effects of the Proposed Development.

2.2 Section A

Cumulative effects on landscape character – Intra Developments

2.2.1 One Intra Development (Emmock Substation) is located within Section A. See **Table 9.4.2: Cumulative Landscape and Visual Effects – Intra Developments** for individual assessment.

2.2.2 The overlap of the construction phases[13] would require concurrent activities at the Emmock Substation site, and along the proposed overhead line. The scale of construction activities would affect the key characteristics of LCTs 382 and 387, including their rural character and open views, in the area between Tealing Substation and the lower slopes of Craigowl Hill. Effects would be **Large** in scale over a **Small** area, and would be short term and partially reversible. The cumulative magnitude of change to the local landscape would be **Medium**. The LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during construction, in a localised area between Tealing Substation and the lower slopes of Craigowl Hill. Beyond this area, construction of Emmock Substation would cease to have an influence, and cumulative effects would reduce to **Not Significant**. Due to distance, there would be very limited change to the special qualities of the Sidlaw LLA, and cumulative effects on the LLA would therefore be **Negligible** (**Not Significant**).

2.2.3 During operation, the vertical prominence of the Proposed Development and the spatial scale of Emmock Substation would combine to affect the key characteristics of LCT 387, in particular its rural character. Due to the bunds which would contain the Emmock Substation during operation, effects would be limited to the area around and immediately north of the proposed substation, where the two projects meet. Effects would be **Large** in scale over a **Small** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape would be **Medium**. The LCT is of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during operation, in a localised area around and immediately north of the proposed Emmock Substation. Beyond this area, the influence of Emmock Substation would reduce, and cumulative effects would reduce to **Not Significant**. Due to distance, there would be very limited change to the key characteristics of LCT 382 or the special qualities of the Sidlaw LLA, and cumulative effects on these receptors would therefore be **Negligible** (**Not Significant**).

Cumulative effects on visual amenity – Intra Developments

2.2.4 The overlapping construction activities would result in changes to views from nearby receptors within VRA A6. Construction work of both projects would be visible to people in this area, affecting combined and sequential views from residential receptors and road users. Cumulative effects on views would be **Large** in scale over a **Small** area and short term, resulting in a **High** magnitude of change. Cumulative effects would be **Major** (**Significant**) during construction, for nearby receptors within the localised area of VRA A6. More distant receptors would experience more limited change, and effects would be **Not Significant**.

2.2.5 During operation, the Proposed Development would comprise prominent vertical structures, while the Emmock Substation would be relatively contained behind earth bunds. Due to the projects being adjacent, nearby receptors in VRAs A3 and A6 would experience combined and successive views. Cumulative effects on views from VRA A6 to the north would be **Large** in scale over a **Small** area and long term, resulting in a **High** magnitude of change. Cumulative effects would be **Major** (**Significant**) during operation over the localised area of VRA A6. For receptors within VRA A3, the Proposed Development is slightly more distant and Emmock Substation would be screened by the proposed bunding, resulting in a **Medium** magnitude of change.

[13] Refer to **Volume 1, Chapter 3: Project Description** for more information on construction activities and programme for the Proposed Development.

Cumulative effects would be **Moderate** (**Significant**) during operation over the localised area of VRA A3. More distant receptors would experience more limited change, and effects would be **Not Significant**.

Cumulative effects on landscape character – Intra and Inter Developments

2.2.6 Inter Developments in Section A are the Emmock Tie-ins and Tie-backs, upgrades to two existing OHL projects (Alyth to Tealing 275 kV and Tealing to Westfield 275 kV OHLs), and three proposed Battery Energy Storage Systems (BESS) projects (Fithie Energy Park, Balnuith BESS and Myreton BESS), all located close to the Tealing Substation. The proposed Ark Hill Wind Farm Extension is further north in the Sidlaw Hill, and Cossans solar farm and BESS is located at the north end of Section A.

2.2.7 Cumulative effects of these projects in combination with the Proposed Development and the Intra Development (Emmock Substation) are set out below. See **Table 9.4.3** for individual assessments.

2.2.8 It is expected that Fithie Energy Park BESS (proposed) would be constructed after construction of the Proposed Development is complete, and therefore no cumulative effects would occur. Construction of the other Intra and Inter Developments may overlap with construction of the Proposed Development. This would lead to a large area of active construction works, between Myreton BESS in the south, and the Proposed Development in the north. There would be a cumulative effect on landscape character within the area between Tealing Substation and the lower slopes of Craigowl Hill, affecting key characteristics of LCTs 382 and 387. Effects would be **Large** in scale over this **Small** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape would be **Medium**. The two LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during construction across a localised area between Tealing Substation and the lower slopes of Craigowl Hill. Beyond this area, the influence of construction would reduce, and effects on landscape character would reduce to **Not Significant**.

2.2.9 During operation, the presence of all the Intra and Inter Developments alongside the Proposed Development would lead to a concentration of infrastructure to the northwest of Tealing Substation. This would add to the existing infrastructure at Tealing and Seagreen Substations, and change the current rural landscape to one characterised by overhead lines and electrical compounds. There would be effects on the key characteristics of LCTs 382 and 387, particularly their rural character and openness. The cumulative effect would occur across the area between Tealing Substation and the lower slopes of Craigowl Hill. Effects would be **Large** in scale over a **Small** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape would be **Medium**. The two LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during operation, across a localised area between Tealing Substation and the lower slopes of Craigowl Hill. Beyond this area, the influence of the Intra and Inter Developments would reduce, and cumulative effects would reduce to **Not Significant**. Due to distance, there would be very limited change to the special qualities of the Sidlaw LLA, and cumulative effects on these receptors would therefore be **Negligible** (**Not Significant**).

2.2.10 Further north are two projects that would interact with the Proposed Development, but not with each other or with other Intra and Inter Developments. The proposed Ark Hill Wind Farm Extension is not predicted to have significant cumulative effects in combination with the Proposed Development. The cumulative influence on LCT 382 would be small and limited to a small area around Craigowl. The magnitude of change would be **Small** and the cumulative effect would be **Minor** and **Not Significant.** The proposed Cossans Solar Farm and BESS would have localised cumulative effects in combination with the Proposed Development, which would pass over the solar farm. The combined influence on the character of LCT 384 would be **Large**, over a very small area. The magnitude of cumulative change would be **Large** due mainly to the presence of the Proposed Development. The cumulative effects would be **Moderate** and **Significant** within a small area around Cossans Solar Farm and BESS.

2.2.11 The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be **Significant**. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments, and would have greater landscape effects, as set out in **Volume 5, Appendix 9.1 Landscape Assessment**.

Cumulative effects on visual amenity – Intra and Inter Developments

2.2.12 It is expected that Fithie Energy Park BESS (proposed) would be constructed after construction of the Proposed Development is complete, and therefore no cumulative visual effects would occur with this development. The overlapping construction activities of Emmock Substation, Emmock tie-ins and tie-backs, the Alyth to Tealing OHL and Tealing to Westfield upgrades from 275 kV to 400 kV, and the potential construction of the Balnuith and Myreton BESS developments alongside the Proposed

Development, would result in changes to views from nearby receptors between Myreton and Craigowl Hill. Construction activity (including works to dismantle sections of existing OHL) would be visible in combined and successive views from receptors within VRAs A2, A3, A6 and A9. The scale of change for the closest receptors would be **Large**, over a **Small** area. Effects would be short term and partially reversible. The magnitude of cumulative change would be **Large**, and given **High** sensitivity of these receptors, cumulative effects would be **Major** (**Significant**) for people within the localised areas of VRAs A2, A3, A6 and A9 during the construction period. Effects may reduce depending on the length of construction phases on different projects, but this assessment considers the worst case scenario of all Intra and Inter Developments being constructed simultaneously. Effects on receptors within other VRAs would be **Not Significant** due to greater distance leading to lower magnitude of change in views.

2.2.13 During operation, the Intra and Inter Developments around the proposed Emmock Substation would result in a cluster of infrastructure being visible in the area northwest of the existing Tealing Substation. This would include the existing Tealing Substation as well as the proposed Emmock Substation, the Emmock Tie-ins and Tie-backs, and the three proposed BESS installations ((Fithie Energy Park, Balnuith BESS and Myreton BESS), in addition to the Proposed Development. These views would be experienced by receptors within VRAs A2, A3, A6, A7, A8 and A9. Multiple infrastructure projects would be visible to people in these areas, affecting combined and sequential views. For receptors within VRAs A3 and A6, close views of the Proposed Development, Emmock Substation and the Emmock Tie-ins and Tie-backs would give rise to a **Large** magnitude of change in views, which would result in a **Major** (**Significant**) cumulative effect across these localised areas. Receptors in VRAs A2, A7 and A9 would experience views of the Proposed Development alongside some of the Inter Developments, but some would be at further distance. Cumulative magnitude of change in views would be **Medium**, and the cumulative effect would be **Moderate** (**Significant**) across these localised areas. Views from higher ground in the Sidlaw Hills, experienced by recreational users in VRA A8, would take in all the Intra and Inter Developments around Emmock Substation, as well as sequential views of Ark Hill Wind Farm Extension to the north. The area across which these effects would be experienced is **Small**, and the developments would be more distant and would not affect the wider panoramic outlook from the summits. The magnitude of cumulative change is judged to be **Medium** and cumulative effects would be **Moderate** (**Significant**) within the localised area of VRA A8. Cumulative effects of the Proposed Development in combination with the Cossans Solar Farm and BESS would be experienced separately to the other Intra Developments, as it is at the north end of Section A. Receptors close to the solar farm would experience views of the Proposed Development passing over the solar panels. The magnitude of cumulative change would be **Medium**, and the cumulative effects **Moderate** (**Significant**) in a very localised area around the Cossans Solar Farm.

2.2.14 The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be **Significant**. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments, and would have greater visual effects, as set out in **Volume 5, Appendix 9.2: Visual Assessment**.

2.3 Section B

2.3.1 There are no Intra Developments or Inter Developments that would interact with Section B of the Proposed Development, and therefore no cumulative effects would arise.

2.4 Section C

2.4.1 There are no Intra Developments or Inter Developments that would interact with Section C of the Proposed Development, and therefore no cumulative effects would arise.

2.5 Sections D and E

Cumulative effects on landscape character – Intra Developments

2.5.1 One Intra Development (Hurlie Substation) is located at the boundary of Section D and E. See **Table 9.4.4** for individual assessment.

2.5.2 The overlap of the construction phases would require concurrent activities at the Hurlie Substation site, and along the proposed overhead line. The scale of construction activities would affect the key characteristics of LCTs 24 and 29, including the patchwork of arable and pastoral fields in LCT 24 south of Fetteresso Forest and the distinctive upland plateau to the north in LCT 29 which forms part of the Highland Boundary Fault. Effects would be **Large** in scale over a **Small** area, and would be short term and partially reversible. The cumulative magnitude of change to the local landscape would be **Medium**. The LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate**

(**Significant**) during construction, within a localised area in Fetteresso Forest and in a localised area to the south between Hurlie Substation and Carmont Hill, and north around Slug Road. Beyond these areas, construction of Hurlie Substation would have limited influence, and cumulative effects would reduce to **Not Significant**.

2.5.3 During operation, the vertical prominence of the Proposed Development and the spatial scale of Hurlie Substation would combine to affect the key characteristics of LCT 24, including views across the Howe of the Mearns, and LCT 29, in particular the role the upland plateau plays in forming a distinctive backdrop to the surrounding lowland areas. Due to the extent of commercial forestry surrounding Hurlie Substation, which would partially screen the substation, cumulative effects would be limited to the area immediately south of Fetteresso Forest where visibility of Hurlie Substation would greatest, although still reduced by commercial forestry. Effects would be **Large** in scale over a **Small** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape would be **High**. The LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during operation, in the localised area around and immediately south of the proposed Hurlie Substation. Beyond this area, the influence of Hurlie Substation would reduce, and cumulative effects would reduce to **Not Significant**.

Cumulative effects on visual amenity – Intra Developments

2.5.4 The overlapping construction activities would result in changes to views from nearby receptors within VRAs D23, D26 and E2. Construction work of both projects would be visible to people in this area, affecting combined and sequential views from residential receptors, recreational receptors and road users. Cumulative effects on views would be **Large** in scale over a **Small** area and short term, resulting in a **High** magnitude of change. Given the **High** sensitivity of these receptors (see **Volume 5, Appendix 9.2: Visual Assessment**), cumulative effects would be **Major** (**Significant**) during construction, for nearby receptors within the localised areas of VRAs D23, D26 and E2. More distant receptors would experience more limited change, and effects would be **Not Significant**.

2.5.5 During operation, the Proposed Development would comprise prominent vertical structures, while the Hurlie Substation would be relatively contained behind intervening commercial forestry in Fetteresso Forest. Due to the projects being adjacent, nearby receptors in VRAs D23 and E2 would experience combined and successive views. Cumulative effects on views from VRA E2 to the east would be **Large** in scale over a **Small** area and long term and partially reversable, resulting in a **High** magnitude of change. Given the High sensitivity of these receptors (see **Volume 5, Appendix 9.2: Visual Assessment**), cumulative effects would be **Major (Significant)** during operation in this localised area. For receptors within VRA D23 the Proposed Development and Hurlie Substation are slightly more distant and Hurlie Substation would be screened by intervening landform and forestry, resulting in a **Medium** magnitude of change. Cumulative effects would be **Moderate (Significant)** during operation in the localised area of VRA D23. More distant receptors would experience more limited change, and effects would be **Not Significant**.

Cumulative effects on landscape character – Intra and Inter Developments

2.5.6 Inter Developments in Section D and E are (see **Table 9.4.5** for individual assessments):

- Fetteresso 132 kV Substation extension;
- Glendye Wind Farm Grid Connection;
- Network Rail Drumlithie;
- Fiddes 132 kV Grid Replacement;
- SSEN Transmission offshore grids project;
- Fetteresso Wind Farm Grid Connection and Access Corridor;
- Craigneil Wind Farm Future Grid Connection;
- Glenbervie BESS;
- Quithel BESS;
- Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm;
- Craigneil Wind Farm; and
- Laurencekirk Residential Development.

2.5.7 It is expected that the construction of the Fetteresso 132 kV Substation extension, Glendye Wind Farm Grid Connection and Network Rail Drumlithie would overlap with construction of the Proposed Development. It is unknown when the construction

of the other Inter Developments would take place. Should construction of all Inter Developments, with exception of the Laurencekirk Residential Development, overlap with construction of the Proposed Development, there would be a large area of active construction works across LCT 24 and 29, between the Carron Water to the south, across Fetteresso Forest itself, and to Durris Forest in the north. There would be both physical and perceptual cumulative effect on landscape character within these areas. Effects would be **Large** in scale over this **Small** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape of LCT 24 and 29 would be **Medium**. The Laurencekirk Residential Development would be located in LCT 22 and would result in some physical and perceptual cumulative effects if construction overlapped with that of the Proposed Development. Given the distance of approximately 2 km between the residential development and the Proposed Development, the interaction between construction activity however would be limited. As such, the scale of cumulative change would be **Small** over a **Small** area. The LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). For LCT 24 and 29, cumulative effects would be **Moderate** (**Significant**) during construction, in a localised area between the Carron Water to the south, across Fetteresso Forest, and to Durris Forest in the north. Beyond this area and in LCT 22, the influence of construction would reduce, and effects on landscape character would reduce to **Not Significant**.

2.5.8 During operation, the presence of all the Intra and Inter Developments alongside the Proposed Development, with exception of the Laurencekirk Residential Development, would lead to a concentration of infrastructure immediately south of Fetteresso Forest and within the forest itself. This would add to the existing infrastructure at Fetteresso Substation and the two existing OHLs that pass over Fetteresso Forest, intensifying the influence of energy infrastructure on LCT 24 and 29. This increased influence would affect key characteristics of LCT 24 and 29, including the patchwork of arable and pastoral fields in LCT 24, and the distinctive upland plateau in LCT 29 which forms part of the Highland Boundary Fault. The cumulative effect would occur across the area between the Carron Water to the south, across Fetteresso Forest itself, and to Durris Forest in the north. Effects would be **Large** in scale over a **Small** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape would be **High**. The cumulative effect of the Proposed Development and the Laurencekirk Residential Development in LCT 22 is considered to be **Small** in scale over a **Small** area given the residential development would be perceived as an extension to the existing settlement of Laurencekirk which already influences LCT 22. The LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). For LCT 24 and 29, cumulative effects would be **Major** (**Significant**) during operation, in a localised area between the Carron Water to the south, across Fetteresso Forest, and to Durris Forest in the north. Beyond this area and in LCT 22, the influence of the Intra and Inter Developments would reduce, and cumulative effects would reduce to **Not Significant**.

2.5.9 The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be **Significant**. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments, and would have greater landscape effects, as set out in **Volume 5, Appendix 9.1: Landscape Assessment**.

Cumulative effects on visual amenity – Intra and Inter Developments

2.5.10 It is expected that the construction of the Fetteresso 132 kV Substation extension, Glendye Wind Farm Grid Connection and Network Rail Drumlithie would overlap with construction of the Proposed Development. It is unknown when the construction of the other Inter Developments would take place. Should construction of all Inter developments overlap with construction of the Proposed Development, there would be changes to views from nearby visual receptors in a localised area between the Carron Water to the south, across Fetteresso Forest itself, and to Durris Forest in the north, as well as further south around Laurencekirk. Construction activity would be visible in combined views from receptors across localised areas within VRAs D1, D3, D22, D23, D24, D25, D26, E1, E2, E3, E4, E5 and E6. The scale of change for the closest receptors would be **Large** over a **Small** area and effects would be short term and partially reversible, resulting in a **High** magnitude of change. The scale of change for receptors around Laurencekirk in D1 and D3 however would be **Small** over a **Small** area as the cumulative visual interaction between the two sets of construction works would be limited due to the intervening distance between them (approximately 2 km). Given the **High** sensitivity of these receptors (see **Volume 5, Appendix 9.2: Visual Assessment**), cumulative effects would be **Major** (**Significant**) during construction for the closest receptors across localised areas within VRAs D22, D23, D24, D25, D26, E1, E2, E3, E4, E5 and E6. Effects may reduce depending on the length of construction phases on different projects, but this assessment considers the worst case scenario of all Intra and Inter Developments being constructed simultaneously. Effects on receptors within other VRAs near Fetteresso Forest and in D1 and D3 near Laurencekirk would be **Not Significant**.

2.5.11 During operation, the Inter Developments together would introduce a range of different energy related infrastructure into views, including prominent vertical structures and electrical compounds. Due to the proximity and location of the projects together within or south of Fetteresso Forest there would be changes to views from nearby visual receptors between the Carron Water to the south, across Fetteresso Forest itself, and to Durris Forest in the north. The Intra and Inter Developments alongside the Proposed Development would be visible in combined views from receptors across localised areas within VRAs D22, D23, D24, D25, E1, E2, E3, E4, E5 and E6. The scale of change for the closest receptors would be **Large** over a **Small** area and long term and partially reversible, resulting in a **High** magnitude of change. The scale of change of cumulative visual effects between the Laurencekirk Residential Development and the Proposed Development in VRAs D1 and D3 however would be **Small** over a **Small** area given the differing nature of the developments, and that the residential development would be perceived as an extension to the existing settlement of Laurencekirk. Given the **High** sensitivity of receptors in each of the VRAs mentioned (see **Volume 5, Appendix 9.2: Visual Assessment**), cumulative effects would be **Major** (**Significant**) during operation for the closest receptors across localised areas within VRAs D22, D23, D24, D25, E1, E2, E3, E4, E5 and E6. Effects may reduce for receptors in more distant parts of these VRAs, where intervening features such as landform or woodland and forestry is likely to filter views of some of the Inter Developments. Effects on receptors within other VRAs near Fetteresso Forest and in D1 and D3 near Laurencekirk would be **Not Significant**.

2.5.12 The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be **Significant**. The Proposed Development would be larger and more extensive than most of the Intra and Inter Developments, and would have greater visual effects, as set out in **Volume 5, Appendix 9.2: Visual Assessment**.

2.6 Section F

2.6.1 There are no Intra Developments that would interact with Section F of the Proposed Development, and therefore cumulative effects would only arise in relation to Inter Developments.

Cumulative effects on landscape character – Inter Developments

2.6.2 Inter Developments in Section F are (see **Table 9.4.6 f**or individual assessments):

- Kintore to Craigiebuckler 132 kV OHL realignment (undergrounding);
- South Leylodge Farm BESS;
- Kintore Substation BESS;
- Kintore Hydrogen Production Facility;
- Kintore South Solar Array and BESS;
- Womblehill Farm BESS; and,
- Hill of Fare Wind Farm.

2.6.3 It is unknown when the construction of these developments would take place, and if there would be any overlap with the construction of the Proposed Development. Should construction of all Inter Developments overlap with construction of the Proposed Development, there would be a large area of active construction works across LCT 26 (Wooded Estates – Aberdeenshire (Echt and Kintore units)). This would result in both physical and perceptual cumulative effects on landscape character. The scale of construction activities would affect key characteristics of LCT 26, including its mixed farmland and strong woodland structure. This would be experienced between the area around Leylodge, Letter and Womblehill near Kintore, and largely associated with the concentration of Inter Developments near Kintore. Construction of Hill of Fare Wind Farm in the neighbouring LCT 28 (Outlying Hills & Ridges) would have an influence on the landscape character of LCT 26 as it would interrupt views of the outlying hills which form a focus of views from LCT 26. Effects would be **Large** in scale over a **Medium** area, and would be short term and partially reversible. The cumulative magnitude of change to the local landscape would be **Medium**. The LCTs are of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during construction, in a localised area around Leylodge, Letter and Womblehill. **Moderate** (**Significant**) effects would also be experienced in a localised area around Meikle Tap and Echt where the influence of construction of both the Proposed Development and Hill of Fare Wind Farm would be experienced. Beyond these areas, the influence of construction would reduce, and effects on landscape character would reduce to **Not Significant**.

2.6.4 During operation, the presence of the Inter Developments alongside the Proposed Development would lead to a concentration of infrastructure around Kintore Substation. The presence of these developments would intensify the influence of electrical and

energy infrastructure near Kintore, which would affect the key characteristics of LCT 26, including the rolling landform of gentle hills, strong woodland structure and mixed farmland. The cumulative effects would be limited to the area between Leylodge, Letter and Womblehill. The presence of Hill of Fare Wind Farm in LCT 28 would have an influence on the landscape character of LCT 26 as it would interrupt views of the outlying hills which form a focus of views from LCT 26, and may diminish the scale of the landform by introducing vertical structures across the top of Hill of Fare. Both Hill of Fare Wind Farm and the Proposed Development would be experienced across large areas of LCT 26 between Crathes and Dunecht. Overall, effects would be **Large** in scale over a **Large** area, and would be long term and partially reversible. The cumulative magnitude of change to the local landscape would be **High**. LCT 26 is of **Medium** sensitivity (see **Volume 5, Appendix 9.1: Landscape Assessment**). Cumulative effects would therefore be **Moderate** (**Significant**) during operation, in a localised area around Kintore Substation (between Leylodge, Letter and Womblehill) associated with the cluster of Inter Developments near Kintore, and more widely between Dunecht and Crathes due to the influence of both the Proposed Development and the large scale Hill of Fare Wind Farm. Beyond this area, the influence of the Inter Developments would reduce, and cumulative effects would reduce to **Not Significant**.

2.6.5 The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be **Significant**. The Proposed Development would be larger and more extensive than most of the Inter Developments, and would have greater landscape effects, as set out in **Volume 5, Appendix 9.1 Landscape Assessment**.

Cumulative effects on visual amenity – Inter Developments

2.6.6 It is unknown when the construction of these developments would take place, and if there would be any overlap with the construction of the Proposed Development. Should construction of all Inter Developments overlap with construction of the Proposed Development, there would be changes to views for nearby visual receptors between Leylodge, Womblehill and Letter due to a concentration of Inter Developments near Kintore Substation. There would also be changes to views for visual receptors near Meikle Tap due to the construction of Hill of Fare Wind Farm alongside the Proposed Development. Construction activity would be visible in combined, successive and/or sequential views from some receptors across localised areas within VRAs F29, F30, F31, F32 and F33, and from F16 with relation to Hill of Fare Wind Farm. The scale of change for the closest receptors would be **Large** over a **Small** area and effects would be short term and partially reversible, resulting in a **High** magnitude of change. Given the **High** sensitivity of these receptors (see **Volume 5, Appendix 9.2: Visual Assessment**), cumulative effects would be **Major** (**Significant**) during construction for receptors across localised areas within VRAs F16, F30, F32 and F33. For receptors in VRAs F29 and F31 cumulative changes to views would be **Medium** in scale over a small area, resulting in a **Medium** magnitude of change. Cumulative effects from these VRAs would be **Moderate** (**Significant**) during construction. Effects may reduce for receptors in more distant parts of these VRAs, where intervening features such as landform or woodland and forestry is likely to filter views of some of the inter developments. Effects on receptors within other VRAs would be **Not Significant** due to greater distance leading to lower magnitude of change in views.

2.6.7 During operation, the Inter Developments alongside the Proposed Development would introduce a range of different electrical and energy related infrastructure into views, including prominent vertical structures and electrical compounds. Due to the proximity and location of the Inter Developments and Proposed Development near Kintore Substation, nearby receptors across localised areas within VRAs F29, F30, F31, F32, and F33 would experience combined, successive and sequential views from residential receptors and road users. Cumulative effects on views from VRAs F30, F32 and F33 would be **Large** in scale over a **Small** area and long term, resulting in a **High** magnitude of change. Cumulative effects from these VRAs would be **Major** (**Significant**) during operation across these localised areas. For receptors in VRAs F29 and F31 cumulative effects on views would be **Medium** in scale over a **Small** area and long term, resulting in a **Medium** magnitude of change. Cumulative effects from these VRAs would be **Moderate** (**Significant**) during operation. Given the scale of Hill of Fare Wind Farm (16 turbines at 180-200 m tip height) situated in an elevated position, there would be widespread visibility from across the lower lying Aberdeenshire countryside. Much of the area between Crathes and Dunecht would experience views of both Hill of Fare Wind Farm and the Proposed Development during operation. The cumulative effect on views from some receptors across localised areas within VRAs F10, F11, F17, F21 and F23 would be **Large** in scale and experienced over a **Large** area, resulting in a **High** magnitude of change. Cumulative effects from these VRAs would be **Major** (**Significant**) during operation. These cumulative effects would be experienced in mainly successive and sequential views, although combined views may be experienced from east of the Proposed Development. Effects may reduce for receptors in more distant parts of these VRAs, where intervening features such as landform or woodland and forestry is likely to filter views of some of the Inter Developments. Effects on receptors within other VRAs would be **Not Significant** due to greater distance leading to lower magnitude of change in views.

2.6.8 The contribution (in-addition cumulative effect) of the Proposed Development to these cumulative effects is considered to be **Significant**. The Proposed Development would be larger and more extensive than most of the Inter Developments, and would have greater visual effects, as set out in **Volume 5, Appendix 9.2 Visual Assessment**.

3. ASSESSMENT TABLES

3.1 Section A

3.1.1 **Table 9.4.2** below sets out the cumulative assessment of the Proposed Development in combination with each of the Intra Developments within Section A. The only Intra Development is the proposed Emmock substation. The table provides:

- a summary of the effects of the Proposed Development on relevant landscape and visual receptors found in **Volume 5, Appendix 9.1: Landscape Assessment** and **Appendix 9.2: Visual Assessment**;
- the likely significant effects of Emmock substation on its own, drawing on published assessments; and
- an assessment of the in-combination cumulative effects of the Proposed Development with Emmock substation.

Table 9.4.2: Cumulative Landscape and Visual Effects – Intra Developments

	Construction		Operation	
Cumulative Development	**Landscape**	**Visual**	**Landscape**	**Visual**
The Proposed Development (summary of significant effects from the LVIA)	**LCT 387: Dipslope Farmland:** The Proposed Development is predicted to have **Significant** effects on landscape character, reducing to **Not Significant** at no more than 1 km distance. **LCT 382: Lowland Hill Ranges:** The Proposed Development is predicted to have **Significant** effects on landscape character, reducing to **Not Significant** at no more than 1 km distance. **Sidlaw LLA:** Construction of the Proposed Development is not predicted to have significant effects on the LLA. See **Volume 5, Appendix 9.1: Landscape Assessment.**	The Proposed Development is predicted to have **Significant** effects on some receptors within VRAs A2, A3, A6, A7, A8 and A9. Significant effects are predicted due to proximity of the construction works, including access tracks, to residential properties and recreational receptors. All remaining VRAs are not predicted to experience significant visual effects as a result of the Proposed Development. See **Volume 5, Appendix 9.2: Visual Assessment.**	**LCT 387: Dipslope Farmland:** The Proposed Development is predicted to have **Significant** effects within the area between Myreton of Claverhouse, Balkemback and Balluderon. **LCT 382: Lowland Hill Ranges:** The Proposed Development is predicted to have **Significant** effects on landscape character, reducing to **Not Significant** at no more than 1 km distance. **Sidlaw LLA:** The Proposed Development is predicted to have **Significant** effects on the *"Distinctive profile of smooth rounded hills"* special quality at the southeastern extents of the LLA. See **Volume 5, Appendix 9.1: Landscape Assessment.**	The Proposed Development is predicted to have **Significant** effects on some receptors within VRAs A2, A3, A4, A6, A7, A8 and A9 (see **Volume 5, Appendix 9.2: Visual Assessment**). Significant effects are predicted due to proximity of the Proposed Development to residential properties and recreational receptors. All remaining VRAs are not predicted to experience significant visual effects as a result of the Proposed Development. See **Volume 5, Appendix 9.2: Visual Assessment.**
Emmock Substation	**LCT 387: Dipslope Farmland:** As set out in the LVIA for Emmock	As set out in the LVIA for Emmock Substation[14], construction work is	**LCT 387: Dipslope Farmland:** As set out in the LVIA for Emmock	As set out in the LVIA for Emmock Substation[14], the Emmock Substation

	Construction		Operation	
	Substation[14], construction work would have **Significant** effects within the area defined by the minor road to the north and west of the Site, the minor road at Balnuith in the east, and by the low ridge at Hillhouses and existing substations in the south and southeast, reducing **to Not Significant** beyond these areas. **LCT 382: Lowland Hill Ranges:** As set out in the LVIA for Emmock Substation, construction is expected to have **Significant** effects on the character of the southern slopes of Balkello Hill and Craigowl Hill, reducing to **Not Significant** elsewhere. **Sidlaw LLA:** As set out in the LVIA for Emmock Substation, construction is expected to have locally **Significant** effects on the southeastern extents of the Sidlaw LLA, around the Balkello Hill area. ***Cumulative Effects*** The Proposed Development in combination with the Emmock Substation is expected to have **Significant** temporary cumulative effects on landscape character during construction. The construction works would affect the key characteristics of LCT 387 and 382, particularly its rural character, in the area between the Emmock Substation and the slopes	expected to have **Significant** effects on receptors in VRA A6, including residents at Balkemback Farm and Cottages. All remaining VRAs are not considered likely to experience significant visual effects as a result of the construction of Emmock Substation. ***Cumulative Effects*** The Proposed Development in combination with Emmock Substation is expected to have **Significant** temporary cumulative effects on visual receptors within VRA A6 during construction. These receptors to the north of Emmock Substation would experience open views of both developments due to the overlap of construction programmes and activities. No significant effects are predicted for more distant receptors.	Substation[14], **Significant** effects would occur within the area defined by the minor road to the north and west of the Site, by minor road at Balnuith in the east, and by the low ridge at Hillhouses and existing substations in the south and southeast, reducing to **Not Significant** beyond this area. **LCT 382: Lowland Hill Ranges:** As set out in the LVIA for Emmock Substation, no significant effects are predicted on the character of this LCT. **Sidlaw LLA:** As set out in the LVIA for Emmock Substation, no significant effects are predicted on the Sidlaw LLA. ***Cumulative Effects*** The Proposed Development in combination with Emmock Substation is expected to have **Significant** cumulative effects on local areas of LCT 387 to the north of the Emmock Substation, where the two projects would be located close together in the landscape.	is expected to have **Significant** effects on receptors in VRA A3 and A6, including residents at Balkemback Farm and Cottages. All remaining VRAs are not considered likely to experience significant visual effects as a result of Emmock Substation. ***Cumulative Effects*** The Proposed Development in combination with the Emmock Substation is expected to have **Significant** cumulative effects on nearby visual receptors within VRA A6 to the north. Effects are due to the proximity of receptors to both developments, and the scale of Emmock Substation and the Proposed Development in views.

[14] See Angus Council Planning application reference 24/00699/FULN (Available at: https://planning.angus.gov.uk/online-applications/applicationDetails.do?activeTab=documents&keyVal=SN6VOFCFMUA00)

	Construction		Operation	
	of Craigowl Hill. A very small part of the Sidlaw LLA would be affected, but the change to the special qualities would be small and the effect **Not Significant**.			

3.1.2 **Table 9.4.3** below sets out the cumulative assessment of the Inter Developments within Section A. The table provides:

- the likely significant effects of each of the Inter Developments on its own, drawing on published assessments or a high level assessment by the authors (noting that a detailed assessment of these projects has not been undertaken); and
- an assessment of the in-combination cumulative effects of the Proposed Development with each Inter Development.

Table 9.4.3: Cumulative Landscape and Visual Effects - Inter Developments

	Construction		Operation	
Cumulative Development	**Landscape**	**Visual**	**Landscape**	**Visual**
Emmock Tie-ins and Tie-backs, comprising: Tie-in of (existing, (upgraded) Alyth to Tealing 275 kV OHL to Emmock Substation; Tie-in of (existing, upgraded) Tealing to Westfield 275 kV OHL to Emmock Substation; and Emmock and Tealing Substation OHL Tie-Backs	**LCT 387: Dipslope Farmland and LCT 382: Lowland Hill Ranges:** Construction of the Emmock Tie-ins and Tie-backs would have physical and perceptual effects on LCT 387 and LCT 382. They are expected to have **Significant** effects on these LCTs, although effects are expected to be localised. **Sidlaw LLA:** The construction of the Emmock Tie-ins and Tie-backs is expected to have localised **Significant** effects on the southeastern extents of the Sidlaw LLA, on the south slopes of Balkello Hill. ***Cumulative Effects*** The Proposed Development in combination with the Emmock Tie-ins and Tie-Backs is expected	Construction of the Emmock Tie-ins and Tie-backs is expected to have **Significant** effects on some receptors in VRAs A2, A3, A6, A7, A8 and A9. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the tie-ins. ***Cumulative Effects*** The Proposed Development in combination with the Emmock Tie-ins and Tie-Backs is expected to have **Significant** temporary cumulative effects on the visual receptors in the Emmock Area during construction. This is due to the close proximity of receptors (including people in VRAs A2, A3, A6 and A9) to both the Proposed Development and one or more of	**LCT 387: Dipslope Farmland and LCT 382: Lowland Hill Ranges:** The Emmock Tie-ins and Tie-backs, once operational, would have physical and perceptual effects on LCT 387 and LCT 382. They are expected to have localised **Significant** effects on these LCTs. There would be localised positive effects due to the removal of a section of the Alyth to Tealing OHL. **Sidlaw LLA:** The Emmock Tie-ins and Tie-backs, once operational, are not expected to have **Significant** effects on the Sidlaw LLA. ***Cumulative Effects*** The Proposed Development in combination with the Emmock Tie-ins and Tie-Backs is expected to have **Significant** cumulative effects on the local landscape during operation as it would intensify the presence of electrical infrastructure. The resulting effects on LCTs 382 and 387	The Emmock Tie-ins and Tie-backs are expected to have **Significant** effects on some receptors in VRAs A2, A3, A6 and A7. There would be positive effects on some receptors in VRAs A3, A6 and A9 due to the removal of a section of the Alyth to Tealing OHL. All remaining VRAs are not considered likely to experience significant effects as a result of the Emmock Tie-ins and Tie-backs. ***Cumulative Effects*** The Proposed Development in combination with the Emmock Tie-ins and Tie-Backs is expected to have **Significant** cumulative effects on the visual receptors closer to the Proposed

	Construction		Operation	
	to have localised **Significant** temporary cumulative effects on the landscape during construction. This is due to the overlap of construction programmes and the proximity of the works for both projects. This would affect the area between the Tealing Substation and the lower slopes of Craigowl Hill.	the Emmock Tie-ins and Tie-Backs, and the overlap in construction programmes. Some receptors would have views of works in more than one direction.	would be more intense but localised to the area between Emmock Substation and the lower slopes of Craigowl Hill. No cumulative effects on the special qualities of the LLA are expected.	Development. This would alter views experienced by people in VRAs A3, A6 and A7, due to the close proximity of these receptors to both the Proposed Development and one or more of the Emmock Tie-ins and Tie-Backs, and the scale of the proposed towers.
Alyth to Tealing 275 kV OHL Upgrade (to 400 kV) (SSEN Transmission Development)	**LCT 387: Dipslope Farmland and LCT 382: Lowland Hill Ranges:** Construction works associated with the Alyth to Tealing 275 kV OHL upgrade would be small scale and short-term in nature, and are not expected to have significant effects on these LCTs. **Sidlaw LLA:** Construction works are not expected to have significant effects on the LLA. ***Cumulative Effects*** The Proposed Development in combination with the Alyth to Tealing 275 kV OHL upgrade is not expected to have significant cumulative effects on the landscape during construction, as construction activity associated with the upgrades would be limited and undertaken on existing towers.	All VRAs are unlikely to experience significant effects as a result of the construction activity associated with the Alyth to Tealing 275 kV OHL upgrade. ***Cumulative Effects*** The Proposed Development in combination with the Alyth to Tealing 275 kV OHL upgrade is not expected to have significant cumulative effects on visual receptors during construction. Construction activity associated with the upgrade would be seen by some receptors in combination with works on the Proposed Development, but would be limited and undertaken on existing towers.	**LCT 387: Dipslope Farmland and LCT 382: Lowland Hill Ranges:** The Alyth to Tealing 275 kV OHL upgrade is not expected to have significant effects on landscape character, as once operational there would be no material change in the appearance of the existing OHL. **Sidlaw LLA:** The OHL upgrade is not expected to have significant effects on the LLA. ***Cumulative Effects*** The Proposed Development in combination with the Alyth to Tealing 275 kV OHL upgrade is not expected to have significant cumulative effects on the landscape during operation, as the Alyth to Tealing 275 kV OHL would not change in appearance.	All VRAs are unlikely to experience significant effects as a result of the upgrade of the Alyth to Tealing 275 kV OHL. ***Cumulative Effects*** The Proposed Development in combination with the Alyth to Tealing 275 kV OHL upgrade is not expected to have significant cumulative effects on visual receptors, as once operational there would be no material change in the appearance of the existing OHL.
Tealing to Westfield 275 kV OHL Upgrade (to 400 kV) (SSEN Transmission Development)	**LCT 387: Dipslope Farmland and LCT 382: Lowland Hill Ranges:** Construction works associated with the Tealing to Westfield 275 kV OHL upgrade would be small	All VRAs are unlikely to experience significant effects as a result of the construction activity associated with the Tealing to Westfield 275 kV OHL upgrade.	**LCT 387: Dipslope Farmland and LCT 382: Lowland Hill Ranges:** The Tealing to Westfield 275 kV OHL upgrade is not expected to have significant effects on landscape character, as once operational	All VRAs are unlikely to experience significant effects as a result of the upgrade of the Tealing to Westfield 275 kV OHL, as once operational there would

	Construction		Operation	
	scale and short-term in nature, and are not expected to have significant effects on these LCTs. **Sidlaw LLA:** Construction works associated with the Tealing to Westfield 275 kV OHL upgrade are not expected to have significant effects on the LLA. ***Cumulative Effects*** The Proposed Development in combination with the Tealing to Westfield 275 kV OHL upgrade is not expected to have significant cumulative effects on the landscape during construction, as construction activity associated with the upgrades would be limited and undertaken on existing towers.	***Cumulative Effects*** The Proposed Development in combination with the Tealing to Westfield 275 kV OHL upgrade is not expected to give rise to significant cumulative effects on visual receptors during construction. Construction activity associated with the upgrades would be seen by some receptors in combination with works on the Proposed Development, but would be limited and undertaken on existing towers.	there would be no material change in the appearance of the existing OHL. **Sidlaw LLA:** The Tealing to Westfield 275 kV OHL upgrade is not expected to have significant effects on the LLA. ***Cumulative Effects*** The Proposed Development in combination with the Tealing to Westfield 275 kV OHL upgrade is not expected to have significant cumulative effects on the landscape during operation, as the Tealing to Westfield 275 kV OHL would not change in appearance.	be no material change in the appearance of the existing OHL. ***Cumulative Effects*** The Proposed Development in combination with the Tealing to Westfield 275 kV OHL upgrade is not expected to have significant cumulative effects on visual receptors, as there would be no material change in the appearance of the existing Tealing to Westfield 275 kV OHL.
Fithie Energy Park (BESS) (Third Party Development)	Construction of Fithie Energy Park is expected to commence in 2031, after construction of the Proposed Development has completed. ***Cumulative Effects*** Therefore, it is not expected that any cumulative landscape effects would arise as a result of construction related activities of both the Proposed Development and the Fithie Energy Park occurring concurrently.	Construction of Fithie Energy Park is expected to commence in 2031, after construction of the Proposed Development has completed. ***Cumulative Effects*** Therefore, it is not expected that any cumulative effects on visual receptors would arise as a result of the cumulative construction related activities of both the Proposed Development and the Fithie Energy Park occurring concurrently.	**LCT 387: Dipslope Farmland:** Fithie Energy Park has potential to have localised **Significant** effects on the landscape character of LCT 387 during operation. **382: Lowland Hill Ranges:** Fithie Energy Park is not expected to have significant effects on the landscape character of LCT 382 during operation. **Sidlaw LLA:** Fithie Energy Park is not expected to have significant effects on the LLA. ***Cumulative Effects*** The Proposed Development in combination with the Fithie Energy Park has potential to have very localised **Significant** cumulative effects on the landscape character of LCT 387 during operation. It would intensify the presence of electrical infrastructure between the	Fithie Energy Park has potential to have localised **Significant** effects on some receptors within VRAs A2 and A3. ***Cumulative Effects*** The Proposed Development in combination with the Fithie Energy Park has potential to have localised **Significant** cumulative effects during operation on visual receptors located to the south and east of the Proposed Development, within VRA A2 and A3. This is due to the close proximity of receptors directly overlooking the BESS, with the Proposed Development likely to be visible beyond.

	Construction		Operation	
			existing Tealing and Seagreen Substations and the Proposed Development. Cumulative effects on the landscape character of LCT 382 and the LLA are not expected to be significant due to the intervening distance and the small scale of the Fithie Energy Park.	
Balnuith Battery Energy Storage System (BESS) (Third Party Development)	**LCT 387: Dipslope Farmland:** Balnuith BESS has potential to have very localised **Significant** effects on the landscape character of LCT 387 during construction. **382: Lowland Hill Ranges:** Balnuith BESS is not expected to have significant effects on the landscape character of LCT 382 during construction. **Sidlaw LLA:** Construction works associated with Balnuith BESS are not expected to have significant effects on the LLA. ***Cumulative Effects*** It is unknown when construction of Balnuith BESS would take place. Assuming construction programmes overlap, there is potential for localised **Significant** effects from the area to the south and southeast of the Proposed Development. The small scale of the Balnuith BESS proposal indicates cumulative effects would be limited.	Construction of the Balnuith BESS has potential to have localised **Significant** effects on VRA A2. All remaining VRAs are not considered likely to experience significant effects as a result of Balnuith BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and Balnuith BESS overlap, there is potential for **Significant** cumulative effects on visual receptors to the south and southeast of the Proposed Development, due to the close proximity of views.	**LCT 387: Dipslope Farmland:** Balnuith BESS has potential to have localised **Significant** effects on the landscape character of LCT 387 during operation. **382: Lowland Hill Ranges**: Balnuith BESS is not expected to have significant effects on the landscape character of LCT 382 during operation. **Sidlaw LLA:** Balnuith BESS is not expected to have significant effects on the LLA during operation. It is not expected that the overall integrity of the designation would be compromised. ***Cumulative Effects*** The Proposed Development in combination with Balnuith BESS may have localised **Significant** cumulative effects on the landscape during operation as it would intensify the presence of electrical infrastructure, between the existing Tealing and Seagreen Substations and the Proposed Development.	Balnuith BESS has potential to have localised **Significant** effects on VRA A2 during operation. All remaining VRAs are not considered likely to experience significant effects as a result of Balnuith BESS. ***Cumulative Effects*** The Proposed Development in combination with the Balnuith BESS may have potential **Significant** cumulative effects during operation on visual receptors located to the south and southeast of the Proposed Development. This is due to the close proximity of receptors to both developments and the open views which are available.
Myreton BESS (Third Party Development)	**LCT 387: Dipslope Farmland:** Myreton BESS has potential to have localised **Significant** effects	Construction of the Myreton BESS has potential to have localised **Significant** effects on VRA A2.	**LCT 387**: Dipslope Farmland: Myreton BESS has potential to have localised **Significant** effects on the landscape character of LCT 387 during operation.	Myreton BESS has potential to have localised **Significant** effects on VRA A2 during operation.

	Construction		Operation	
	on the landscape character of LCT 387 during construction. **382**: Lowland Hill Ranges: Myreton BESS is not expected to have significant effects on the landscape character of LCT 382 during construction. **Sidlaw LLA:** Construction works associated with Myreton BESS are not expected to have significant effects on the LLA. It is not expected that the overall integrity of the designation would be compromised. ***Cumulative Effects*** It is unknown when construction of Myreton BESS would take place. Assuming construction programmes overlap, there is potential for localised **Significant** effects from the area to the south and southeast of the Proposed Development.	All remaining VRAs are not considered likely to experience significant effects as a result of Myreton BESS. ***Cumulative Effects*** It is unknown when construction of Myreton BESS would take place. However, assuming construction of the Proposed Development and Myreton BESS overlap, it is unlikely that there would be significant cumulative effects on visual receptors, due to the intervening distance between the two developments and the smaller-scale nature of the BESS. There is a high level of uncertainty attached to this due to the lack of information about the Myreton BESS.	**382: Lowland Hill Ranges:** Myreton BESS is not expected to have significant effects on the landscape character of LCT 382 during operation. **Sidlaw LLA:** Myreton BESS is not expected to have significant effects on the LLA during operation. It is not expected that the overall integrity of the designation would be compromised. ***Cumulative Effects*** The Proposed Development in combination with Myreton BESS may have localised **Significant** cumulative effects on the landscape during operation as it would intensify the presence of electrical infrastructure, particularly around the existing Tealing and Seagreen Substations.	All remaining VRAs are not considered likely to experience significant effects as a result of Myreton BESS. ***Cumulative Effects*** The Proposed Development in combination with the Myreton BESS has potential to have localised **Significant** effects near Myreton of Claverhouse (VRA A2), due to the proximity of these receptors between both developments. Elsewhere, significant cumulative effects on visual receptors during operation are unlikely, due to the intervening distance, smaller-scale nature of the BESS, and intervening development such as Tealing and Seagreen Substations.
Ark Hill Wind Farm Extension (Third Party Development)	**LCT 382: Lowland Hill Ranges:** Ark Hill Wind Farm Extension has potential to have **Significant** effects on the upland landscape character during construction. **Sidlaw LLA:** Located close to its northern boundary, Ark Hill Wind Farm Extension may have locally **Significant** effects on the edge of the LLA during construction. ***Cumulative Effects*** It is unknown when construction of Ark Hill Wind Farm Extension would take place. Assuming construction programmes	The construction of Ark Hill Wind Farm Extension has potential to have **Significant** effects on views experienced by people using upland paths in the Sidlaw Hills, within VRA A8. Effects on receptors in other VRAs are unlikely to be significant. ***Cumulative Effects*** Assuming construction programmes overlap, walkers on hill paths within VRA A8 would have views of both sets of works across a small area of Craigowl Hill and nearby summits. Construction	**LCT 382: Lowland Hill Ranges:** Ark Hill Wind Farm Extension has potential to have **Significant** effects on the upland landscape character during operation. **Sidlaw LLA:** Located close to its northern boundary, Ark Hill Wind Farm Extension may have locally **Significant** effects on the special qualities of the LLA during operation. ***Cumulative Effects*** The Proposed Development would be located 3 km from the Ark Hill Wind Farm Extension, with the high ground of Craigowl Hill and Gallow Hill separating the two. Cumulative effects of the two	Receptors likely to experience **Significant** operational effects of Ark Hill Wind Farm Extension would be concentrated within VRAs A8 and A14. This may include users of upland paths in the Sidlaw Hills and some local residents. Receptors in VRAs to the east and south of Craigowl Hill are unlikely to be affected by views of Ark Hill Wind Farm Extension. ***Cumulative Effects*** The only receptors likely to experience views of both Ark Hill

	Construction		Operation	
	overlap, the two schemes would be geographically separate and cumulative effects on LCT382 and the Sidlaw LLA are judged to be **Not Significant**.	works would be relatively distant, particularly for Ark Hill Wind Farm Extension, and cumulative effects on these receptors are judged to be **Not Significant**.	projects on the character of LCT 382 are judged to be **Not Significant**. Neither project would be located within the Sidlaw LLA, and cumulative effects on the special qualities of the LLA are judged to be **Not Significant**.	Wind Farm Extension and the Proposed Development would be walkers accessing hill paths around Craigowl Hill, within VRA A8. The wind farm extension would be seen in the context of the existing Ark Hill Wind Farm, and therefore cumulative effects on these receptors are judged to be **Not Significant**.
Cossans Solar Farm and BESS (Third Party Development)	The LVIA for Cossans Solar Farm and BESS[15] does not identify any significant effects on the host landscape (LCT 384 Broad Valley Lowland). ***Cumulative Effects*** It is unknown when construction of Cossans Solar Farm and BESS would take place. Assuming construction programmes overlap, there is potential for localised **Significant** effects where the Proposed Development passes through the Cossans Solar Farm and BESS site. Such effects are unlikely to be greater than those of the Proposed Development alone.	The LVIA for Cossans Solar Farm and BESS[15] identifies a small number of residential and recreational receptors who would experience **Significant** effects during construction. ***Cumulative Effects*** Assuming construction programmes overlap, there is potential for localised **Significant** cumulative effects on visual receptors around the Proposed Development, where it crosses through the Cossans Solar Farm and BESS site.	The LVIA for Cossans Solar Farm and BESS[15] does not identify any significant effects on the host landscape (LCT 384 Broad Valley Lowland). ***Cumulative Effects*** There is potential for localised **Significant** effects on landscape character where the Proposed Development passes over Cossans Solar Farm and BESS. Such effects would be localised and unlikely to be greater than those of the Proposed Development alone.	The LVIA for Cossans Solar Farm and BESS[15] identifies a small number of residential and recreational receptors who would experience **Significant** effects during operation. ***Cumulative Effects*** The Proposed Development in combination with Cossans Solar Farm and BESS may have **Significant** cumulative effects during operation on visual receptors located close to the location where the Proposed Development would cross over Cossans Solar Farm and BESS. Cumulative effects are predicted to be very localised.

3.2 Section B

3.2.1 There are no Intra Developments or Inter Developments that would interact with Section B of the Proposed Development, and therefore no cumulative effects would arise.

[15] See Energy Consents Unit application reference ECU00005213 (Available at: https://www.energyconsents.scot/ApplicationDetails.aspx?cr=ECU00005213)

3.3 Section C

3.3.1 There are no Intra Developments or Inter Developments that would interact with Section B of the Proposed Development, and therefore no cumulative effects would arise.

3.4 Section D and E

3.4.1 For the purposes of this cumulative assessment, Sections D and E of the Proposed Development are considered together, as a number of Intra and Inter developments are located close to the boundary between the two Sections, near the proposed Hurlie substation.

3.4.2 **Table 9.4.4: Cumulative Landscape and Visual Effects – Section D and E Intra Developments** below sets out the cumulative assessment of the Proposed Development in combination with each of the Intra Developments relevant to Sections D and E. The only relevant Intra Development is the proposed Hurlie Substation. The table provides:

- a summary of the effects of the Proposed Development on relevant landscape and visual receptors found in **Volume 5, Appendix 9.1: Landscape Assessment** and **9.2: Visual Assessment**;
- the likely significant effects of Hurlie substation on its own, drawing on published assessments; and
- an assessment of the in-combination cumulative effects of the Proposed Development with Hurlie substation.

Table 9.4.4: Cumulative Landscape and Visual Effects – Section D and E Intra Developments

	Construction		Operation	
Cumulative Development	**Landscape**	**Visual**	**Landscape**	**Visual**
The Proposed Development (summary of significant effects from the LVIA)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Proposed Development is predicted to have localised **Significant** effects, extending no more than 2 km from the Proposed Development, and reducing to **Not Significant** beyond this distance. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Proposed Development is predicted to have **Significant** effects within 1 km of the Proposed Development, reducing to **Not Significant** beyond this distance. See **Volume 5, Appendix 9.1: Landscape Assessment**.	Between Drumlithie and Durris Forest, the Proposed Development is predicted to have **Significant** effects on some receptors within VRAs D20, D21, D22, D23, D24, D25, D26, E2, E3, E4, E5 and E6 (see **Volume 5, Appendix 9.2: Visual Assessment**). **Significant** effects are predicted due to proximity of the construction works, including access tracks, to residential properties and recreational receptors.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Proposed Development is predicted to have localised **Significant** effects, extending no more than 1 km from the Proposed Development, reducing to **Not Significant** beyond this distance. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Proposed Development is expected to have localised **Significant** effects. Effects would be limited by commercial forestry. See **Volume 5, Appendix 9.1: Landscape Assessment**.	Between Drumlithie and Durris Forest, the Proposed Development is predicted to have **Significant** effects on some receptors within VRAs D20, D21, D22, D23, D24, D25, E2, E3, E4, E5 and E6 (see **Volume 5, Appendix 9.2: Visual Assessment**). **Significant** effects are predicted due to proximity of the OHL in views from residential properties and recreational receptors.
Hurlie substation	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** As set out in the LVIA for	As set out in the LVIA for Hurlie Substation[16], construction work is expected to have **Significant**	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** As set out in the LVIA for Hurlie Substation[16],	As set out in the LVIA for Hurlie Substation[16], Hurlie Substation is expected to have **Significant**

	Construction		Operation	
	Hurlie Substation[16], construction work would have **Significant** effects within 4 km of the development, reducing to **Not Significant** beyond this distance. **LCT 29: Summits and Plateaux – Aberdeenshire:** Construction of Hurlie Substation would have **Significant** effects within 1.5 km of the development, reducing to **Not Significant** beyond this distance. ***Cumulative Effects*** The Proposed Development in combination with the Hurlie Substation is expected to have **Significant** cumulative effects on the landscape character of both LCT 24 and LCT 29 during construction, due to the overlap of construction programmes.	effects on some receptors within VRAs D23, D26 and E2. All remaining VRAs are not considered likely to experience significant visual effects as a result of the construction of Hurlie Substation. ***Cumulative Effects*** The Proposed Development in combination with Hurlie Substation is expected to have **Significant** cumulative effects on the visual receptors to the east and southeast of Hurlie Substation (VRAs D23, D26 and E2) during construction, due to the close proximity of receptors to both developments, the opportunity for some open views, and the overlap of construction programmes.	Hurlie Substation would have **Significant** effects within 4 km to the southeast of the development, reducing to **Not Significant** beyond this distance. **LCT 29: Summits and Plateaux – Aberdeenshire:** Hurlie Substation would have **Significant** effects within 1.5 km of the development, reducing to **Not Significant** beyond this distance. ***Cumulative Effects*** The Proposed Development in combination with Hurlie Substation is expected to have **Significant** cumulative effects on the landscape character of LCT 29 during operation as it would intensify the presence of electrical infrastructure within this LCT, and the Proposed Development would be afforded limited screening. Combined cumulative effects on the landscape character of LCT 24 are also expected to be locally significant due to the influence of both developments in views from small areas of this LCT.	effects on some receptors within VRAs D23, D26 and E2. All remaining VRAs are not considered likely to experience significant visual effects as a result of Hurlie Substation. ***Cumulative Effects*** The Proposed Development in combination with Hurlie Substation is expected to have **Significant** cumulative effects on the visual receptors to the east and southeast of Hurlie Substation (VRAs D23 and E2), due to the close proximity of receptors to both developments and the opportunity for some open views.

[16] See Aberdeenshire Council Planning application reference APP/2024/1951 (Available at: https://upa.aberdeenshire.gov.uk/online-applications/caseDetails.do?keyVal=SNUVKWCAJ2G00&caseType=Application)

3.4.3 **Table 9.4.5: Cumulative Landscape and Visual Effects – Section D and E Inter Developments** below sets out the cumulative assessment of the Inter Developments within Sections D and E. The table provides:

- the likely significant effects of each of the Inter Developments on its own, drawing on published assessments or a high level assessment by the authors (noting that a detailed assessment of these projects has not been undertaken); and
- an assessment of the in-combination cumulative effects of the Proposed Development with each Inter Development.

Table 9.4.5: Cumulative Landscape and Visual Effects – Section D and E Inter Developments

	Construction		Operation	
Cumulative Development	**Landscape**	**Visual**	**Landscape**	**Visual**
Fetteresso 132 kV Substation extension (SSEN Transmission Development)	**LCT 29: Summits and Plateaux – Aberdeenshire:** The Fetteresso 132 kV Substation extension would have physical and perceptual effects on LCT 29. It has potential to have localised **Significant** effects on this LCT during construction. **LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Fetteresso 132 kV Substation extension is not expected to have significant effects on the landscape character of LCT 24 during construction. ***Cumulative Effects*** Construction of the Fetteresso 132 kV Substation extension is expected to commence in 2026 and overlap with the construction of the Proposed Development. Therefore, it is expected that **Significant** localised cumulative effects would occur on a small area of LCT 29 during construction, due to the overlap of construction programmes.	Construction of the Fetteresso 132 kV Substation extension has potential to have **Significant** effects on some receptors within VRAs D25, E1 and E2. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Fetteresso 132 kV Substation extension. ***Cumulative Effects*** Construction of the Fetteresso 132 kV Substation extension is expected to commence in 2026 and overlap with the construction of the Proposed Development. As such, the Proposed Development in combination with the Fetteresso 132 kV Substation extension has potential to have **Significant** cumulative effects on the visual receptors immediately south of Fetteresso Forest and localised parts within Fetteresso Forest (within VRAs D25 and E2) during construction. This is due to the close proximity of receptors to both developments, the opportunity for some open views, and the overlap of construction programmes.	**LCT 29: Summits and Plateaux – Aberdeenshire:** The Fetteresso 132 kV Substation extension, once operational, would have physical and perceptual effects on LCT 29. It has potential to have localised **Significant** effects on this LCT. **LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire**: The Fetteresso 132 kV Substation extension is not expected to have significant effects on the landscape character of LCT 24 during operation. ***Cumulative Effects*** The Proposed Development in combination with the Fetteresso 132 kV Substation extension has potential to have **Significant** cumulative effects on the landscape character of a small area of LCT 29 during operation as it would intensify the presence of electrical infrastructure within the LCT. Combined cumulative effects on the landscape character of LCT 24 are not expected to be significant due to the filtered	The Fetteresso 132 kV Substation extension has potential to have **Significant** effects on some receptors within VRAs D25, E1 and E2. All remaining VRAs are not considered likely to experience significant effects as a result of the Fetteresso 132 kV Substation extension. ***Cumulative Effects*** The Proposed Development in combination with the Fetteresso 132 kV Substation extension has potential to have **Significant** cumulative effects on the visual receptors immediately south of Fetteresso Forest and localised parts within Fetteresso Forest (within VRAs D25 and E2) during operation. This is due to the close proximity of receptors to both developments and the opportunity for some open views.

	Construction		Operation	
			nature of views towards the Fetteresso 132 kV Substation extension.	
Glendye Wind Farm Grid Connection (SSEN Transmission Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** The Glendye Wind Farm Grid Connection would have some physical and perceptual effects on the landscape character of LCT 24 and 29. However due to the scale and temporary nature of the works, effects are not expected to be significant during construction. ***Cumulative Effects*** Construction of the Glendye Wind Farm Grid Connection is expected to commence in 2026 and overlap with the construction of the Proposed Development. Given that the construction of the Glendye Wind Farm Grid Connection is not expected to give rise to significant effects on landscape character, no significant cumulative effects are expected during construction.	All VRAs are unlikely to experience significant effects as a result of the construction activity associated with the Glendye Wind Farm Grid Connection. ***Cumulative Effects*** Given that the construction of the Glendye Wind Farm Grid Connection is not expected to give rise to any significant visual effects, this development in combination with the Proposed Development is not expected to give rise to significant cumulative visual effects.	**LCT 24: Coastal Farmed Ridges** and **Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** The Glendye Wind Farm Grid Connection, once operational, would have some physical and perceptual effects on the landscape character of LCT 24 and 29. However due to the scale and nature of the Glendye Wind Farm Grid Connection proposed OHL (trident poles rather than lattice towers), effects are not expected to be significant during operation. ***Cumulative Effects*** Given the scale and nature of the proposed Glendye Wind Farm Grid Connection, combined cumulative effects with the Proposed Development on landscape character are expected to be **Not Significant**.	All VRAs are unlikely to experience significant effects as a result of the Glendye wind farm grid connection. ***Cumulative Effects*** The Proposed Development in combination with the Glendye Wind Farm Grid Connection is not expected to have significant cumulative effects on visual receptors. This is primarily due to the proposed scale and nature of the Glendye Wind Farm Grid Connection. There is a high level of uncertainty attached to this due to the lack of information about the Glendye Wind Farm Grid Connection.
Network Rail Drumlithie (SSEN Transmission Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** Construction of the Network Rail Drumlithie development would have physical and perceptual effects on LCT 24 and LCT 29 due to the installation of transformers at the Fetteresso Substation extension and the instalment of two cables that connect to the railway to the southeast. It has potential to have	Construction of the Network Rail Drumlithie development has potential to have **Significant** effects on views from some receptors in VRAs D25, D26 and E2. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Network Rail Drumlithie development. ***Cumulative Effects*** Construction of the Network Rail Drumlithie development is expected to commence in 2027 and overlap with the	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** the Network Rail Drumlithie development is not expected to have significant effects on the landscape character of LCT 24 and LCT 29 during operation. ***Cumulative Effects*** The Proposed Development in combination with the Network	All VRAs are unlikely to experience significant effects as a result of the Network Rail Drumlithie development. ***Cumulative Effects*** The Proposed Development in combination with the Network Rail Drumlithie development is not expected to have significant cumulative effects on visual receptors. This is due to the likely size and scale of the proposed

	Construction		Operation	
	Significant effects on these LCTs during construction, although effects are expected to be localised. ***Cumulative Effects*** Construction of the Network Rail Drumlithie development is expected to commence in 2027 and overlap with the construction of the Proposed Development. Therefore, the Proposed Development in combination with the Network Rail Drumlithie development has potential to have localised **Significant** cumulative effects on the landscape character of small areas of both LCT 24 and LCT 29 during construction, due to the overlap of construction programmes.	construction of the Proposed Development. The Proposed Development in combination with the Network Rail Drumlithie development has potential to have localised **Significant** cumulative effects on visual receptors within and adjacent to the Network Rail Drumlithie development area (within VRAs D25, D26 and E2) due to closer views of both developments.	Rail Drumlithie development is not expected to have significant cumulative effects on the landscape character during operation.	transformers associated with the Network Rail Drumlithie development, which are likely to be filtered in views by surrounding forestry, and the likely scale and extent of the cable connections.
Fiddes 132 kV Grid Replacement (SSEN Transmission Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** The Fiddes 132 kV Grid Replacement would have physical and perceptual effects on LCT 24 and LCT 29 due to the potential installation of a new 132 kV OHL that would connect to the upgraded Fetteresso Substation from the south. It has potential to have **Significant** effects on these LCTs during construction. ***Cumulative Effects*** It is unknown when construction of the Fiddes 132 kV Grid Replacement would take place. Assuming construction programmes of the Fiddes 132 kV Grid Replacement and the Proposed Development overlap, there is potential for localised	Construction of the Fiddes 132 kV Grid Replacement has potential to have **Significant** effects on views for some receptors within VRAs D23 and D25, depending on the route selected. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Fiddes 132 kV Grid Replacement. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Fiddes 132 kV Grid Replacement overlap, there is potential for some **Significant** cumulative effects on visual receptors within and adjacent to the Fiddes 132 kV Grid Replacement development area (likely to be within VRAs D23 and 25) due to the close proximity of views of both developments.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** the Fiddes 132 kV Grid Replacement, once operational, would have physical and perceptual effects on LCT 24 and LCT 29. The new OHL has potential to have **Significant** effects on these LCTs. ***Cumulative Effects*** The Proposed Development in combination with the Fiddes 132 kV Grid Replacement has potential to have localised **Significant** cumulative effects on the landscape character of small areas of both LCT 24 and LCT 29 during operation, as it would intensify the presence and/ or	The Fiddes 132 kV Grid Replacement has potential to have **Significant** effects on views for some receptors within VRAs D23 and D25, depending on the route selected. All remaining VRAs are not considered likely to experience significant effects as a result of the Fiddes 132 kV Grid Replacement. ***Cumulative Effects*** The Proposed Development in combination with the Fiddes 132 kV Grid Replacement has potential to have **Significant** cumulative effects on some visual receptors within and adjacent to the Fiddes 132 kV Grid Replacement development area (likely to be within VRAs D23 and 25). This is due to the close

	Construction		Operation	
	Significant effects from parts of LCT 24 and LCT 29 around the southern edge of Fetteresso Forest.		influence of electrical infrastructure within these LCTs.	proximity of receptors to both developments.
SSEN Transmission offshore grids project (SSEN Transmission Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** Construction of the SSEN Transmission offshore grids project would have physical and perceptual effects on LCT 24 and LCT 29. This is due to the construction of a converter station near Hurlie Substation in LCT 29 and installation of underground cables (UGC) within both LCT 29 and LCT 24 that would connect the converter station to the coast. It has potential to have **Significant** effects on these LCTs during construction, although effects are expected to be localised. ***Cumulative Effects*** It is unknown when construction of the SSEN Transmission offshore grids project would take place. Assuming construction programmes of the SSEN Transmission offshore grids project and the Proposed Development overlap, there is potential for localised **Significant** effects from parts of LCT 24 and LCT 29 in and around Fetteresso Forest.	Construction of the SSEN Transmission offshore grids project has potential to have **Significant** effects on some receptors within VRAs D26, E2 and E3, depending on the route selected. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the SSEN Transmission offshore grids project. ***Cumulative Effects*** Assuming construction of the Proposed Development and the SSEN Transmission offshore grids project overlap, there is potential for some **Significant** cumulative effects on the visual receptors to the north and south of Fetteresso Forest and within Fetteresso Forest itself (within VRAs D26, E2 and E3). This is due to the close proximity of views of both developments.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The SSEN Transmission offshore grids project is not expected to have significant effects on the landscape character of LCT 24 during operation. **LCT 29: Summits and Plateaux – Aberdeenshire:** The SSEN Transmission offshore grids project, once operational, would have physical and perceptual effects on LCT 29 due to the presence of the converter station. It has potential to have localised **Significant** effects on this LCT. ***Cumulative Effects*** The Proposed Development in combination with the SSEN Transmission offshore grids project has potential to have localised **Significant** cumulative effects on the landscape character of a small area of LCT 29 during operation as it would intensify the presence of electrical infrastructure within the LCT. Combined cumulative effects on the landscape character of LCT 24 are not expected to be significant due to the underground nature of cables associated with the SSEN Transmission offshore grids project.	The SSEN Transmission offshore grids project has potential to have **Significant** effects on some receptors within VRAs E2 and E3, depending on the route selected. All remaining VRAs are not considered likely to experience significant effects as a result of the SSEN Transmission offshore grids project. ***Cumulative Effects*** The Proposed Development in combination with the SSEN Transmission offshore grids project has potential to have **Significant** cumulative effects on some visual receptors within Fetteresso Forest (within VRA E2 and VRA E3). This is due to the likely extent of visibility of the SSEN Transmission offshore grids project converter station, which is likely to extend above intervening forestry, as well as the provision of some open combined and sequential views towards both developments.

	Construction		Operation	
Fetteresso Wind Farm Grid Connection and Access Corridor (SSEN Transmission Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** The Fetteresso Wind Farm Grid Connection is not expected to have significant effects on the landscape character of LCT 24 or 29 during construction. ***Cumulative Effects*** It is unknown when construction of the Fetteresso Wind Farm Grid Connection would take place. Assuming construction programmes of the Fetteresso Wind Farm Grid Connection and the Proposed Development overlap, no significant cumulative effects on the landscape character of LCT 24 and LCT 29 are expected during construction.	All VRAs are unlikely to experience significant effects as a result of the construction activity associated with the Fetteresso Wind Farm Grid Connection. ***Cumulative Effects*** Given that the construction of the Fetteresso Wind Farm Grid Connection is not expected to give rise to any significant visual effects, this development in combination with the Proposed Development is not expected to give rise to significant cumulative visual effects.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** The Fetteresso Wind Farm Grid Connection is not expected to have significant effects on the landscape character of LCT 24 and LCT 29 during operation. ***Cumulative Effects*** The Proposed Development in combination with the Fetteresso Wind Farm Grid Connection is not expected to have significant cumulative effects on the landscape character of LCT 24 and LCT 29 during operation. This is due to the underground nature of the cable connection between Fetteresso Wind Farm and the existing Fetteresso Substation.	All VRAs are unlikely to experience significant effects as a result of the Fetteresso Wind Farm Grid Connection. ***Cumulative Effects*** The Proposed Development in combination with the Fetteresso Wind Farm Grid Connection is not expected to give rise to any significant cumulative visual effects due to the underground nature of the cable connection between Fetteresso Wind Farm and the existing Fetteresso Substation.
Craigneil Wind Farm Future Connection (SSEN Transmission Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Craigneil Wind Farm Future Connection extension is not expected to have significant effects on the landscape character of LCT 24 during construction. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Craigneil Wind Farm Future Connection would have physical and perceptual effects on LCT 29. It has potential to have localised **Significant** effects on this LCT during construction. ***Cumulative Effects*** It is unknown when construction of the Craigneil Wind Farm Future	Construction of the Craigneil Wind Farm Future Connection has potential to have **Significant** effects on some receptors within VRAs E1, E5 and E6. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Craigneil Wind Farm Future Connection. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Craigneil Wind Farm Future Connection overlap, there is potential for some **Significant** cumulative effects on a small number of visual receptors within Fetteresso Forest, and within VRAs E1, E5 and E6, where there	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Craigneil Wind Farm Future Connection once operational, is not expected to have significant effects on the landscape character of LCT 24. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Craigneil Wind Farm Future Connection, once operational, would have physical and perceptual effects on LCT 29 due to the presence of the development within the LCT. It has potential to have localised **Significant** effects on this LCT. ***Cumulative Effects***	Construction of the Craigneil Wind Farm Future Connection has potential to have **Significant** effects on some receptors within VRAs E1, E5 and E6. All remaining VRAs are not considered likely to experience significant effects as a result of the Craigneil Wind Farm Future Connection. ***Cumulative Effects*** The Proposed Development in combination with the Craigneil Wind Farm Future Connection has potential to have **Significant** cumulative effects on some visual receptors within and to the north and south of Fetteresso Forest

	Construction		Operation	
	Connection would take place. Assuming construction programmes of the future wind farm connection and the Proposed Development overlap, it is expected that **Significant** localised cumulative effects would occur on LCT 29 but not on LCT 24.	would be some combined and sequential cumulative views of construction activity.	The Proposed Development in combination with the Craigneil Wind Farm Future Connection has potential to have localised **Significant** cumulative effects on the landscape character of small areas of LCT 29 during operation as it would intensify the influence and presence of electrical infrastructure. These effects are considered to be localised within the area between Craigneil Wind Farm and Fetteresso Substation.	(within VRAs E1, E5 and E6) during operation. This is due to the likely availability of some open combined and sequential views towards both developments.
Glenbervie BESS (Third Party Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** Construction of the Glenbervie BESS would have physical and perceptual effects on LCT 24 due to the construction of the BESS facility within this LCT. The construction of Glenbervie BESS has potential to have **Significant** effects on LCT 24, although effects are expected to be localised. **LCT 29: Summits and Plateaux – Aberdeenshire:** Construction of the Glenbervie BESS is not expected to have significant effects on LCT 29, due to the likely size and scale of the BESS and its location outside LCT 29. ***Cumulative Effects*** It is unknown when construction of the Glenbervie BESS would take place. Assuming construction programmes of the Glenbervie BESS and the Proposed Development overlap, there is potential for localised **Significant** effects from parts of LCT 24 in the area between Quithel and the Carron Water.	Construction of the Glenbervie BESS has potential to have **Significant** effects on some receptors within VRAs D22 and D24. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Glenbervie BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Glenbervie BESS overlap, there is potential for some **Significant** cumulative effects on visual receptors to the south of Fetteresso Forest (within VRAs D22 and D24), where there would be some combined and sequential cumulative views of construction activity. The effects would be localised.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Glenbervie BESS, once operational, would have physical and perceptual effects on LCT 24 due to the presence of the BESS facility within the LCT. It has potential to have localised **Significant** effects on this LCT. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Glenbervie BESS, once operational, is not expected to have significant effects on LCT 29, due to the likely size and scale of the BESS and its location outside LCT 29. ***Cumulative Effects*** The Proposed Development in combination with the Glenbervie BESS has potential to have localised **Significant** cumulative effects on the landscape character of LCT 24 in the area between Quithel and the Carron Water, as it would intensify the influence	The Glenbervie BESS has potential to have **Significant** effects on some receptors within VRAs D22 and D24. All remaining VRAs are not considered likely to experience significant effects as a result of the Glenbervie BESS. ***Cumulative Effects*** The Proposed Development in combination with the Glenbervie BESS has potential to have **Significant** cumulative effects on some visual receptors to the south of Fetteresso Forest (within VRAs D22 and D24) during operation. This is due to the likely availability of some open combined and sequential views towards both developments.

	Construction		Operation	
			and presence of electrical infrastructure.	
Quithel BESS (Third Party Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** Construction of the Quithel BESS would have physical and perceptual effects on LCT 24 and LCT 29 due to the construction of the BESS facility on the edges of the LCTs, and the construction of an underground cable that would connect the BESS facility to Fetteresso Substation in LCT 29. The construction of the BESS facility has potential to have **Significant** effects on LCT 24 between Quithel and Fetteresso Forest. Effects on LCT 29 during the construction of the cable are expected to be **Not Significant.** ***Cumulative Effects*** It is unknown when construction of the Quithel BESS would take place. Assuming construction programmes of the Quithel BESS and the Proposed Development overlap, there is potential for localised **Significant** effects from parts of LCT 24 in the area immediately south of Fetteresso Forest.	Construction of the Quithel BESS has potential to have **Significant** effects on some receptors in VRAs D13, D23, D24 and D25. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Quithel BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Quithel BESS overlap, there is potential for some **Significant** cumulative effects on visual receptors to the south of Fetteresso Forest (within VRA D24), where there would be some combined and sequential cumulative views of construction activity.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Quithel BESS, once operational, would have physical and perceptual effects on LCT 24 due to the presence of the BESS facility within the LCT. It has potential to have localised **Significant** effects on this LCT. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Quithel BESS, once operational, would have perceptual effects on LCT 29 due to the proximity of the BESS facility to this LCT. Effects on LCT 29 are expected to be **Not Significant.** ***Cumulative Effects*** The Proposed Development in combination with the Quithel BESS has potential to have localised **Significant** cumulative effects on the landscape character of LCT 24 between Quithel and Fetteresso Forest, as it would intensify the influence and presence of electrical infrastructure.	The Quithel BESS has potential to have **Significant** effects on some receptors in VRAs D13, D23, D24 and D25. All remaining VRAs are not considered likely to experience significant effects as a result of the Quithel BESS. ***Cumulative Effects*** The Proposed Development in combination with the Quithel BESS has potential to have **Significant** cumulative effects on some visual receptors to the south of Fetteresso Forest (within VRAs D23, D24 and D25) during operation. This is due to the likely availability of some open combined and sequential views towards both developments.
Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm (Third Party Development)	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire and LCT 29: Summits and Plateaux – Aberdeenshire:** Construction of the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm would have physical and perceptual	Construction of the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm has potential to have **Significant** effects on some receptors within VRAs D23, D25 and E2. All remaining VRAs are not considered likely to experience significant effects as	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** The Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm is not expected to have significant	The Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm has potential to have **Significant** effects on some receptors within VRAs E2 and E3. All remaining VRAs are not considered likely to experience

	Construction		Operation	
	effects on LCT 24 and LCT 29 due to the construction of a substation near the Proposed Development in LCT 29 and installation of export cables within both LCT 29 and LCT 24 that would connect the offshore wind farm to the substation. It has potential to have **Significant** effects on these LCTs during construction, although effects are expected to be localised. ***Cumulative Effects*** It is unknown when construction of the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm would take place. Assuming construction programmes of the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm and the Proposed Development overlap, there is potential for localised **Significant** effects from parts of LCT 29 and LCT 24 within and immediately to the south of Fetteresso Forest.	a result of the construction of the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm overlap, there is potential for some **Significant** cumulative effects on visual receptors within and to the south of Fetteresso Forest (within VRAs D23, D25 and E2), where there would be some combined and sequential cumulative views of construction activity of the onshore substation and buried cable route.	effects on the landscape character of LCT 24 during operation. **LCT 29: Summits and Plateaux – Aberdeenshire:** The Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm, once operational, would have physical and perceptual effects on LCT 29 due to the presence of the substation. It has potential to have localised **Significant** effects on this LCT. ***Cumulative Effects*** The Proposed Development in combination with the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm has potential to have localised **Significant** cumulative effects on the landscape character of LCT 29 during operation as it would intensify the presence of electrical infrastructure in the Hurlie Area. Combined cumulative effects on the landscape character of LCT 24 are expected to be **Not Significant** due to the underground nature of the export cables associated with the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm.	significant effects as a result of the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm. ***Cumulative Effects*** The Proposed Development in combination with the Onshore Transmission Infrastructure for Bowdun Offshore Wind Farm has potential to have **Significant** cumulative effects on some visual receptors within Fetteresso Forest and to the north and south of the forest (within VRAs E2 and E3) during operation. This is due to the likely extent of visibility of the substation, which would potentially extend above intervening forestry, as well as the availability of some open combined and sequential views towards both developments.
Craigneil Wind Farm (Third Party Development)	**LCT 29: Summits and Plateaux – Aberdeenshire:** Craigneil Wind Farm would have physical and perceptual effects on LCT 29. It has potential to have localised **Significant** effects on this LCT during construction. **LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** Craigneil	Construction of Craigneil Wind Farm has potential to have **Significant** effects on some receptors within VRAs E2, E3, E4 and E5. All remaining VRAs are not considered likely to experience significant effects as	**LCT 29: Summits and Plateaux – Aberdeenshire:** Craigneil Wind Farm, once operational, would have physical and perceptual effects on LCT 29. It has potential to have **Significant** effects on this LCT.	Craigneil Wind Farm has potential to have **Significant** effects on some receptors within VRAs E2, E3, E4, E5 and E6. ***Cumulative Effects*** The Proposed Development in combination with Craigneil Wind

	Construction		Operation	
	Wind Farm is not expected to have significant effects on the landscape character of LCT 24 during construction. ***Cumulative Effects*** It is unknown when construction of Craigneil Wind Farm would take place. Assuming construction programmes of Craigneil Wind Farm and the Proposed Development overlap, there is potential for localised **Significant** effects from parts of LCT 29 between Fetteresso Forest and south of Durris Forest.	a result of the construction of Craigneil Wind Farm. ***Cumulative Effects*** Assuming construction of the Proposed Development and Craigneil Wind Farm overlap, there is potential for some localised **Significant** cumulative effects on the visual receptors between Durris Forest and Fetteresso Forest (within VRAs E2, E3, E4 and E5). This is due to the views of both developments.	**LCT 24: Coastal Farmed Ridges and Hills – Aberdeenshire:** Craigneil Wind Farm, once operational, would have perceptual effects on LCT 24. It is not expected to have significant effects on the landscape character of LCT 24. ***Cumulative Effects*** The Proposed Development in combination with Craigneil Wind Farm has potential to have localised **Significant** cumulative effects on the landscape character of LCT 29 during operation as it would intensify the presence of electrical infrastructure within the LCT.	Farm has potential to have **Significant** cumulative effects on some visual receptors between Durris Forest and Fetteresso Forest (within VRAs E2, E3, E4, E5 and E6). This is due to the likely widespread visibility of both Craigneil Wind Farm and the Proposed Development in both combined and sequential views.
Laurencekirk Residential Development (Third Party Development)	**LCT 22 Broad Valley Lowland:** it is likely that the proposed residential development at Laurencekirk would have localised effects on landscape character during construction, which may be **Significant**. ***Cumulative Effects*** Assuming construction phases overlap, works would be taking place around 2 km from the Proposed Development, though within the same LCT. There is unlikely to be any interaction between the two sets of works, and cumulative effects are judged to be **Not Significant**.	Construction of the proposed Laurencekirk Residential Development has potential for **Significant** effects on receptors within VRA D1 Laurencekirk and small areas of VRA D3. ***Cumulative Effects*** Assuming construction phases overlap, works would be taking place around 2 km from the Proposed Development. There are no receptors that would experience a medium or large magnitude of change in view from both sets of works, and cumulative effects are therefore judged to be **Not Significant**.	**LCT 22 Broad Valley Lowland:** it is likely that the proposed Laurencekirk Residential Development would have localised effects on landscape character during construction, which may be **Significant**. ***Cumulative Effects*** Within the wider landscape, the residential development would be seen as part of Laurencekirk, while the Proposed Development would be a discrete piece of infrastructure in the landscape further north. Cumulative effects on the LCT are judged to be **Not Significant**.	The presence of the Laurencekirk Residential Development may have effects on local views that are considered to be **Significant**, but overall would be seen as part of the larger settlement in views of the area. ***Cumulative Effects*** Due to the distance and differing nature of the developments, there are no receptors that would experience a medium or large magnitude of change in view from both the Laurencekirk Residential Development and the Proposed Development, and cumulative effects are therefore judged to be **Not Significant**.

3.5 Section F

3.5.1 **Table 9.4.6: Cumulative Landscape and Visual Effects – Inter Developments** below sets out the cumulative assessment of the Inter Developments within Section F. There are no Intra Developments that would interact with Section F of the Proposed Development. The table provides:

- a summary of the effects of the Proposed Development on relevant landscape and visual receptors found in **Volume 5, Appendix 9.1: Landscape Assessment** and **9.2: Visual Assessment**;
- the likely significant effects of each of the Inter Developments on its own, drawing on published assessments or a high level assessment by the authors (noting that a detailed assessment of these projects has not been undertaken); and
- an assessment of the in-combination cumulative effects of the Proposed Development with each Inter Development.

Table 9.4.6: Cumulative Landscape and Visual Effects – Inter Developments

	Construction		Operation	
Cumulative Development	**Landscape**	**Visual**	**Landscape**	**Visual**
The Proposed Development (summary of significant effects from the LVIA)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore and Echt Unit):** The Proposed Development is predicted to have localised **Significant** effects, extending no more than 1 km from the Proposed Development, reducing to **Not Significant** beyond this distance. See **Volume 5, Appendix 9.1: Landscape Assessment**.	Between Dunecht and Kintore, the Proposed Development is predicted to have **Significant** effects on some receptors within VRAs F25, F29, F30, F31, F32, and F33 (see **Volume 5, Appendix 9.2: Visual Assessment**). **Significant** effects are predicted due to proximity of the construction works, including access tracks, to residential properties and recreational receptors.	**LCT 26: Wooded Estates – Aberdeenshire (Kintore and Echt Unit):** The Proposed Development is predicted to have **Significant** effects extending no more than 1 km from the Proposed Development, reducing to **Not Significant** beyond this distance.	Between Dunecht and Kintore, the Proposed Development is predicted to have **Significant** effects on some receptors within VRAs F25, F29, F30, F31, F32, F33, and F35 (see **Volume 5, Appendix 9.2: Visual Assessment**). **Significant** effects are predicted due to proximity of the OHL in views from residential properties and recreational receptors.
Kintore to Craigiebuckler 132 kV OHL (existing) realignment (undergrounding) (SSEN Transmission Developments)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** Construction of the Kintore to Craigiebuckler 132 kV OHL realignment would have physical and perceptual effects on LCT 26 due to the disruption to landcover in order to underground the OHL. ***Cumulative Effects*** It is unknown when construction of the Kintore to Craigiebuckler 132 kV	Construction of the Kintore to Craigiebuckler 132 kV OHL realignment has potential to have **Significant** effects on views from some receptors within VRAs F30, F32 and F33. All remaining VRAs are not considered likely to experience significant visual effects as a result of the construction of the Kintore to	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** The Kintore to Craigiebuckler 132 kV OHL realignment is not expected to have significant effects on the landscape character of LCT 26 due to the underground nature of the new cable. ***Cumulative Effects*** The Proposed Development in combination with the Kintore to	All VRAs are unlikely to experience significant effects as a result of the Kintore to Craigiebuckler 132 kV OHL realignment. ***Cumulative Effects*** The Proposed Development in combination with the Kintore to Craigiebuckler 132 kV OHL realignment is not expected to give rise to any significant cumulative visual effects due to the

	Construction		Operation	
	OHL realignment would take place. Assuming construction programmes of the Kintore to Craigiebuckler 132 kV OHL realignment and the Proposed Development overlap, there is potential for localised **Significant** effects within LCT 26 to the east of Leylodge.	Craigiebuckler 132 kV OHL realignment. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Kintore to Craigiebuckler 132 kV OHL realignment overlap, there is potential for some **Significant** cumulative effects on visual receptors around Leylodge (within VRAs F30, F32 and F33) due to the close proximity of views of both developments.	Craigiebuckler 132 kV OHL realignment cumulative effects are expected to be **Not Significant** on the landscape character of LCT 26 and during operation. This is due to the underground nature of the cable associated with the Kintore to Craigiebuckler 132 kV OHL realignment.	underground nature of the cable connection associated with the Kintore to Craigiebuckler 132 kV OHL realignment.
South Leylodge Farm BESS (Third Party Development)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** Construction of the South Leylodge Farm BESS would have physical and perceptual effects on LCT 26 due to the construction of the BESS facility within this LCT. ***Cumulative Effects*** It is unknown when construction of the South Leylodge Farm BESS would take place. Assuming construction programmes of the South Leylodge Farm BESS and the Proposed Development overlap, there is potential for localised **Significant** effects within LCT 26 to the west of Leylodge.	Construction of the South Leylodge Farm BESS has potential to have **Significant** effects on views from some receptors in VRA F30 and F33 All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the South Leylodge Farm BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and the South Leylodge Farm BESS overlap, there is potential for some **Significant** cumulative effects on visual receptors around Leylodge (within VRAs F30 and F33) due to the close proximity of views of both developments.	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** The South Leylodge Farm BESS would have physical and perceptual effects on the landscape character of LCT 26 due to the presence of the BESS facility within the LCT. ***Cumulative Effects*** The Proposed Development in combination with the South Leylodge Farm BESS has potential to have localised **Significant** cumulative effects on the landscape character of LCT 26 during operation as it would intensify the influence and presence of electrical infrastructure within this LCT. These effects however are considered to be localised around Leylodge.	The South Leylodge Farm BESS has potential to have **significant** effects on views for some receptors in VRAs F29, F30 and F33. All remaining VRAs are not considered likely to experience significant effects as a result of the South Leylodge Farm BESS. ***Cumulative Effects*** The Proposed Development in combination with the South Leylodge Farm BESS has potential to have **Significant** cumulative effects on some visual receptors around Leylodge (within VRAs F29, F30, and F33) during operation. This is due to the likely provision of some open combined and sequential views towards both developments.
Kintore Substation BESS (Third Party Development)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** Construction of the Kintore Substation BESS would have physical and perceptual effects on LCT 26	Construction of the Kintore Substation BESS has potential to have **Significant** effects on views	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** The Kintore Substation BESS would have physical and perceptual effects on the landscape character of LCT 26	The Kintore Substation BESS has potential to have **Significant** effects on views for some receptors in VRAs F30, F33, and F35.

	Construction		Operation	
	due to the construction of the BESS facility within this LCT. ***Cumulative Effects*** It is unknown when construction of the Kintore Substation BESS would take place. Assuming construction programmes of the Kintore Substation BESS and the Proposed Development overlap, there is potential for localised **Significant** effects within LCT 26 around Leylodge.	from some receptors in VRA F30, F33, and F35. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Kintore Substation BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Kintore Substation BESS overlap, there is potential for some **Significant** cumulative effects on visual receptors around Leylodge (within VRAs F30 and F33) due to the close proximity of views of both developments.	due to the presence of the BESS facility within the LCT. ***Cumulative Effects*** The Proposed Development in combination with the Kintore Substation BESS has potential to have localised **Significant** cumulative effects on the landscape character of LCT 26 during operation as it would intensify the influence and presence of electrical infrastructure within this LCT. These effects however are considered to be localised around Leylodge.	All remaining VRAs are not considered likely to experience significant effects as a result of the Kintore Substation BESS. ***Cumulative Effects*** The Proposed Development in combination with the Kintore Substation BESS has potential to have **Significant** cumulative effects on some visual receptors around Leylodge (within VRAs F30 and F33) during operation. This is due to the likely provision of some open combined and sequential views towards both developments.
Kintore Hydrogen Production Facility (Third Party Development)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** Construction of the Kintore Hydrogen Production Facility would have physical and perceptual effects on LCT 26 due to the construction of the facility within this LCT. ***Cumulative Effects*** It is unknown when construction of the Kintore Hydrogen Production Facility would take place. Assuming construction programmes of the Kintore Hydrogen Production Facility and the Proposed Development overlap, there is potential for localised **Significant** effects within LCT 26 around Leylodge.	VRA F39: Construction of the Kintore Hydrogen Production Facility has potential to have **Significant** effects on some receptors within VRAs F29, F30, F32, F33 and F35. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Kintore Hydrogen Production Facility. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Kintore Hydrogen Production Facility overlap, there is potential for some **Significant** cumulative effects on visual receptors around Leylodge (within VRAs F29, F30, F32 and F33) due to the close proximity of views of both developments.	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** The Kintore Hydrogen Production Facility would have physical and perceptual effects on the landscape character of LCT 26 due to the presence of the facility within the LCT. ***Cumulative Effects*** The Proposed Development in combination with the Kintore Hydrogen Production Facility has potential to have localised **Significant** cumulative effects on the landscape character of LCT 26 during operation as it would intensify the influence and presence of electrical infrastructure within this LCT. These effects however are considered to be localised around Leylodge.	The Kintore Hydrogen Production Facility has potential to have **Significant** effects on some receptors within VRAs F29, F30, F32, F33, and F35. All remaining VRAs are not considered likely to experience significant effects as a result of the Kintore Hydrogen Production Facility. ***Cumulative Effects*** The Proposed Development in combination with the Kintore Hydrogen Production Facility has potential to have **Significant** cumulative effects on some visual receptors around Leylodge (within VRAs F29, F30, F32 and F33) during operation. This is due to the likely provision of some open combined

	Construction		Operation	
				and sequential views towards both developments.
Kintore South Solar Array and BESS (Third Party Development)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** Construction of the Kintore South Solar Array and BESS would have physical and perceptual effects on LCT 26 due to the construction of the facility within this LCT. ***Cumulative Effects*** It is unknown when construction of the Kintore South Solar Array and BESS would take place. Assuming construction programmes of the Kintore South Solar Array and BESS and the Proposed Development overlap, there is potential for localised **Significant** effects within LCT 26 east of Leylodge.	Construction of the Kintore South Solar Array and BESS has potential to have **Significant** effects on receptors within VRAs F31, F32 and F33. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Kintore South Solar Array and BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Kintore South Solar Array and BESS overlap, there is potential for some **Significant** cumulative effects on visual receptors around Letter and Leylodge (within VRAs F31, F32, and F33) due to the close proximity of views of both developments.	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** The Kintore South Solar Array and BESS would have physical and perceptual effects on the landscape character of LCT 26 due to the presence of the facility within the LCT. ***Cumulative Effects*** The Proposed Development in combination with the Kintore South Solar Array and BESS has potential to have localised **Significant** cumulative effects on the landscape character of LCT 26 during operation as it would intensify the influence and presence of electrical infrastructure within this LCT. These effects however are considered to be localised around Leylodge and Letter.	The Kintore South Solar Array and BESS has potential to have **Significant** effects on receptors within VRAs F27, F30, F31, F32 and F33. All remaining VRAs are not considered likely to experience significant effects as a result of the Kintore South Solar Array and BESS. ***Cumulative Effects*** The Proposed Development in combination with the Kintore South Solar Array and BESS has potential to have **Significant** cumulative effects on some visual receptors around Leylodge and Letter (within VRAs F30, F31, F32 and F33) during operation. This is due to the likely provision of some open combined and sequential views towards both developments.
Womblehill Farm BESS (Third Party Development)	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** Construction of the Womblehill Farm BESS would have physical and perceptual effects on LCT 26 due to the construction of the facility within this LCT. ***Cumulative Effects*** It is unknown when construction of the Womblehill Farm BESS would take place. Assuming construction programmes of the Womblehill Farm BESS and the Proposed Development overlap, there is potential for localised **Significant**	Construction of the Womblehill Farm BESS has potential to have **Significant** effects on receptors within VRAs F32, F33, F35 and F36. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of the Womblehill Farm BESS. ***Cumulative Effects*** Assuming construction of the Proposed Development and the Womblehill Farm BESS overlap, there is potential for some	**LCT 26: Wooded Estates – Aberdeenshire (Kintore Unit):** The Womblehill Farm BESS would have physical and perceptual effects on the landscape character of LCT 26 due to the presence of the facility within the LCT. ***Cumulative Effects*** The Proposed Development in combination with the Womblehill Farm BESS has potential to have localised **Significant** cumulative effects on the landscape character of LCT 26 during operation as it would intensify the influence and	The Womblehill Farm BESS has potential to have **Significant** effects on receptors within VRAs F32, F33, F35 and F36. All remaining VRAs are not considered likely to experience significant effects as a result of the Womblehill Farm BESS. ***Cumulative Effects*** The Proposed Development in combination with the Womblehill Farm BESS has potential to have **Significant** cumulative effects on some visual receptors around

	Construction		Operation	
	effects within LCT 26 around Womblehill.	**Significant** cumulative effects on visual receptors around Womblehill and Leylodge (within VRAs F32 and F33) due to the closer views of both developments.	presence of electrical infrastructure within this LCT. These effects however are considered to be localised around Womblehill and Leylodge.	Womblehill and Leylodge (within VRAs F32 and F33) during operation. This is due to the likely provision of some open combined and sequential views towards both developments.
Hill of Fare Wind Farm (Third Party Development)	**LCT 28: Outlying Hills & Ridges:** Construction of the Hill of Fare Wind Farm would have both physical and perceptual effects on LCT 28. It has potential to have localised **Significant** effects on this LCT during construction. **LCT 26: Wooded Estates – Aberdeenshire (Echt Unit):** Hill of Fare Wind Farm would have perceptual effects on the landscape character of LCT 26 during construction; however, these are not expected to be significant. ***Cumulative Effects*** It is unknown when construction of Hill of Fare Wind Farm would take place. Assuming construction programmes of Hill of Fare Wind Farm and the Proposed Development overlap, it is considered that is potential for localised Significant effects from parts of LCT 28, from the area around Meikle Tap.	Construction of the Hill of Fare Wind Farm has potential to have **Significant** effects on some receptors within VRA F16. All remaining VRAs are not considered likely to experience significant effects as a result of the construction of Hill of Fare Wind Farm. ***Cumulative Effects*** Assuming construction of the Proposed Development and Hill of Fare Wind Farm overlap, there is potential for some localised **Significant** cumulative effects on the visual receptors at the summit of, and surrounding slopes of Meikle Tap (within VRA F16). This is due to the views of both developments.	**LCT 28: Outlying Hills & Ridges:** Hill of Fare Wind Farm, once operational, would have both physical and perceptual effects on LCT 28. It has potential to have localised **Significant** effects on this LCT during operation. **LCT 26: Wooded Estates – Aberdeenshire (Echt Unit):** Hill of Fare Wind Farm would have perceptual effects on the landscape character of LCT 26. It has potential to have localised **Significant** effects on this LCT during operation. ***Cumulative Effects*** The Proposed Development in combination with Hill of Fare Wind Farm has potential to have localised **Significant** cumulative effects on the landscape character of LCT 28 and LCT 26 during operation as it would intensify the presence of electrical and energy infrastructure within the landscape.	Hill of Fare Wind Farm has potential to have **Significant** effects on some receptors within VRAs F2, F10, F11, F16, F17, F21, F22, F23, F24, and F28. ***Cumulative Effects*** The Proposed Development in combination with Hill of Fare Wind Farm has potential to have **Significant** cumulative effects on some visual receptors between both developments (within VRAs F10, F11, F16, F17, F21, and F23). This is due to the likely widespread visibility of both Hill of Fare Wind Farm and the Proposed Development in successive and sequential views.