3 Revised Proposed Development Description

3.1 Introduction

3.1.1 This chapter of the AEI Report provides an update to Chapter 3: Proposed Development Description included within the EIA Report October 2023. It explains the changes to the design of the original proposed development and presents the revised proposed development for which section 36 consent is now sought. These changes are proposed in response to post submission comments received from consultees. The revised proposed development is illustrated on **AEI Figure 1.3**.

3.1.2 This chapter is supported by a new technical appendix, which has been prepared to reflect consultation responses received to the original application:

- **AEI Technical Appendix 3.5:** Outline Fire Risk Management Plan

3.1.3 Chapter 3 of the EIA Report October 2023 was supported by a number of figures (Figures 3.1 – 3.17), which provide an overview of the key components of the original proposed development. There are no changes to these figures therefore they remain applicable to the revised proposed development.

3.1.4 Chapter 3 of the EIA Report October 2023 was also supported by a number of Technical Appendices (TA's 3.1 – 3.4) comprising an Outline Construction Environmental Management Plan (CEMP); an Outline Borrow Pit Management Plan (BPMP); an Outline Peat Management Plan (PMP); and an Outline Access Management Plan (AMP). The changes to the design of the original proposed development do not change any of the management measures detailed within these TA's, which therefore remain applicable to the revised proposed development.

3.1.5 This chapter should be read in conjunction with Chapter 3 of the EIA Report October 2023.

3.2 Site Location and Description

3.2.1 The site has been reduced in size from 1,290 hectares (ha) to 831 ha and the extents of the site of the revised proposed development are indicated on **AEI Figure 1.2**. As a result of the reduction of the site boundary, the site is now centred on Ordnance Survey grid reference E 356000, N 657000. It is located to the north-east of the A697, approximately 9.9 km north-north-east of the Lauder in the Scottish Borders.

3.2.2 The revised proposed development comprises the following infrastructure:

- up to 12 three-bladed horizontal axis wind turbines of up to 220 m tip height.
- at each wind turbine, associated low to medium voltage transformers and related switchgear;
- wind turbine foundations;
- hardstand areas for erection cranes at each wind turbine location;
- a network of access tracks including watercourse crossings, passing places, turning heads and site entrance from the D124;
- borrow pits (dependent on availability of stone within the site);
- a substation compound containing electrical infrastructure, control building, welfare facilities and a communications mast;

- a battery energy storage system (BESS), rated at 50MW and associated compound;
- a transfer station;
- public road widening along sections of the D124;
- a network of buried electrical and communication cables;
- temporary construction compounds;
- signage; and
- habitat management and biodiversity enhancement and restoration (see **AEI Chapter 8: Terrestrial Ecology** and **AEI Technical Appendix 8.6: Outline Biodiversity Enhancement and Restoration Plan** for details).

3.2.3 The revised proposed development is expected to operate for up to 50 years following which decommissioning of the wind turbines and other infrastructure would be undertaken or an application may be submitted to repower the site.

Revised Proposed Development Layout

3.2.4 The changes to the original proposed development are as follows:

- Deletion of wind turbines T1-T4 and T17-T19;
- Deletion of the access track sections leading to T1-T4 and T17-19; and
- Addition of an abnormal indivisible load (AIL) turning head at T16.

3.2.5 There is no change to the proposed wind turbine dimensions from the EIA Report October 2023.

3.2.6 **AEI Figure 1.3** presents the infrastructure layout of the revised proposed development. **AEI Table 2.1** gives the proposed centre point location, tip height and hub height for each of the proposed wind turbines; those where the position has been amended from the EIA Report October 2023 are highlighted in grey.

AEI Table 2.1: Wind Turbine Locations

Wind Turbine	Easting	Northing	Tip Height (m)	Hub Height (m)
T1	Wind turbine removed			
T2	Wind turbine removed			
T3	Wind turbine removed			
T4	Wind turbine removed			
T5	355688	655868	135	220
T6	356323	656104	135	220
T7	355898	656509	135	220
T8	356429	656886	135	220
T9	356059	657276	135	220
T10	356612	657632	135	220
T11	357010	658361	135	220

T12	356390	658096	135	220
T13	355614	657800	135	220
T14	355275	657314	135	220
T15	355148	656448	135	220
T16	354396	656398	135	220
T17	Wind turbine removed			
T18	Wind turbine removed			
T19	Wind turbine removed			

3.2.7 For the purpose of the revised assessment presented in this AEI Report, a maximum wind turbine tip height of up to 220 m to tip has been used. Where necessary for assessment purposes a rotor blade diameter of 170 m has been used although the blade length may vary (within the maximum wind turbine tip height) depending on wind turbine availability at the time of construction. This reflects the approach to assessment taken for the original proposed development set out in the EIA Report October 2023.

3.3 Construction Phase

3.3.1 This section focuses on the updates to the construction phase details presented in Chapter 3 of the EIA Report October 2023 as a result of the revised proposed development. Updates have only been identified as necessary to the Proposed Infrastructure section as set out below. For all other aspects of the construction phase details reference should be made to Chapter 3 of the EIA Report October 2023.

Proposed Infrastructure

3.3.2 The aspects of proposed infrastructure set out in Chapter 3 of the EIA Report October 2023 that remain unchanged as a result of the revised proposed development are:

- wind turbine foundations;
- crane hardstands;
- public road access;
- onsite cabling;
- substation and battery energy storage system compounds;
- grid connection;
- drainage;
- temporary compounds;
- transfer station; and
- signage

3.3.3 The changes that have been made to the proposed infrastructure details, as result of the revised proposed development, are detailed below.

Wind Turbines

3.3.4 This AEI Report is based upon the installation and operation of up to 12 three-bladed horizontal axis wind turbines.

3.3.5 **AEI Chapter 14: Aviation, Radar and Other Issues** provides updated details of a lighting scheme in light of the reduction in the number of wind turbines, which has been agreed with the CAA (see **AEI Technical Appendix 14.1 - Reduced Lighting Scheme**), and **AEI Chapter 6: Landscape and Visual Impact Assessment** assesses the associated impacts of this revised lighting scheme.

Access Tracks

3.3.6 The measurements for the access tracks are amended to reflect the revised proposed development as a result of the deletion of seven wind turbines. The removal of access tracks associated with T1-T4 and T17-T19 reduces the total length of access track from approximately 19.45 km to 15.11 km. This comprises 11.77 km of new track construction and 3.34 km of upgrade to an existing access track. The access track layout for the revised proposed development continues to be designed to maximise the use and upgrade of existing tracks as far as reasonably practicable.

3.3.7 As a result of the revised proposed development layout, the number of watercourse crossings is amended from 12 to 11. Further information on watercourse crossings is provided in **AEI Chapter 10: Hydrology, Hydrogeology & Geology**.

Substation and Battery Energy Storage System Compounds

3.3.8 A Fire Risk Management Plan (FRMP) will be prepared prior to the start of construction of the battery energy storage system (BESS) compound, detailing measures against the risk of fire ignition and propagation within the BESS compound, and will be agreed with the Fire Service and other stakeholders where necessary. An Outline FRMP is provided as **AEI Technical Appendix 3.5**.

Borrow Pits

3.3.9 The number of proposed borrow pit search areas has been reduced from three to two as indicated on **AEI Figure 1.3**. These borrow pit search areas are shown as the maximum potential area of borrow pit extraction, but it is not expected that these areas would be fully exploited. Final borrow pit search areas would be subject to detailed ground investigation to confirm suitability of material.

3.3.10 If an on-site batching plant is required, it would be situated within a borrow pit or at another secure location, which would be agreed in advance with SEPA and Scottish Water prior to construction.

Habitat Management & Biodiversity Enhancement

3.3.11 As a result of the revised proposed development, amendments have been made to the biodiversity enhancement and habitat restoration proposals. See **AEI Chapter 8: Terrestrial Ecology** and **AEI Technical Appendix 8.6: Outline Biodiversity Enhancement and Restoration Plan** for further details.

3.4 Operational and Decommissioning Phases

3.4.1 The operational and decommissioning phase details as presented in Chapter 3 of the EIA Report October 2023 remain applicable to the revised proposed development and are therefore unchanged.

3.5 Health and Safety

3.5.1 The health and safety details relating to the construction phase, public safety and the operational phase as presented in Chapter 3 of the EIA Report October 2023 remain applicable to the revised proposed development and are therefore unchanged.

3.6 Conclusion

3.6.1 This chapter has set out a description of the revised proposed development and the aspects of the proposed infrastructure that have been amended as a result of the changes to the layout design.

3.6.2 There is sufficient detail to provide consultees with a reasonable understanding of the proposed development and to assess its likely significant environmental effects. Further construction details would be provided in the CEMP, which would be submitted for approval prior to the construction of the revised proposed development.