5

Archaeology & Cultural Heritage

5 Archaeology and Cultural Heritage

Introduction

5.1 This chapter of the FEIA has been produced to address the consultation comments from the Historic Environment Division (HED) and the reduced turbine layout which was reduced address potential impacts. The baseline for this can be found in the CHBA (appendix 5.1), an ES chapter (appendix 5.2), a Lidar assessment (appendix 5.3) and a field walkover survey (appendix 5.4). Four further heritage visualisations of the Proposed Development have also been produced as requested from HED to inform the assessment provided in the baseline assessment and in this chapter, and these are provided in Appendix 5.5. Since the original ES chapter was undertaken the Proposed Development Footprint has reduced in size and removed several turbines including Turbines 2, 7, 9, 12 and 13 in response to impacts identified through the ES chapter, further investigations within the site and consultation with planning officers. This FEIA baseline is limited to the features identified by the Lidar and Field walkover surveys and those that were identified by HED as requiring further assessment, therefore this chapter should be read in conjunction with the appendices provide as these form the overall baseline for the Application Site.

5.2 These vary in scope from buried archaeological remains up to late 20th century industrial structures. Cultural heritage can be broadly divided into the following two categories:

6. Archaeology

- Scheduled Ancient Monuments (SAMs) (statutory); and
- Archaeological finds and site (non-statutory).

7. Built Heritage

- Conservation Areas (statutory);
- Listed Buildings (statutory);
- Registered Parks and Gardens
- Non-designated built heritage assets (non-statutory).
- Registered Historic Battlefields, Shipwrecks, World Heritage Sites and Locally Listed Buildings are not considered within this Chapter because there are no such designations within, or adjacent to the Application Site.

7.1 This Chapter describes the methods used to establish baseline conditions currently existing on the Application Site; the methodology used to determine potential effects and the mitigation measures required to prevent, reduce or offset (where possible) any significant adverse effects; and the likely residual effects after these measures have been implemented.

Scope of Assessment

Legislation and Policy Framework

Legislation

7.2 The Historic Monuments and Archaeological Objects (Northern Ireland) Order 1995 protects the fabric of Scheduled Monuments but does not afford statutory protection to their settings. Relevant policies relating to the protection of the setting of scheduled monuments are contained within national and local development plans and are set out below.

7.3 The Planning (Northern Ireland) Order 1991 sets out provisions relevant to the protection of listed buildings and conservation areas and their setting. The following sections are relevant to the Application Site.

7.4 Section 45 states that:

> *"In considering whether to grant planning permission for development which affects a listed building or its setting, and in considering whether to grant listed building consent for any works, the Department shall have special regard to the desirability of preserving the building or its setting or any features of special architectural or historic interest which it possesses"*

Regional Planning Policy

8. Regional Development Strategy 2035

8.1 In 2010 the Strategic Planning and Co-ordination Division (an agency within the department of Regional Development) published Regional Development Strategy 2035. Regional Development Strategy set out an overarching strategic planning framework to facilitate and guide the public and private sectors. Section 3 refers to the environment and provides guidance on for property owners, developers, their professional advisors and others on the preservation and investigation of built heritage. The Department's relevant guidance on this topic is set out below:

> ***RG11 – Conserve, protect and where possible, enhance our built heritage and our natural environment***
>
> *The environment, both in terms of natural and built heritage, is one of Northern Ireland's most important assets. Effective care of the environment provides very real benefits in terms of improving health and wellbeing, promoting economic development and addressing social problems which result from a poor quality environment. It is a basic premise of the environmental justice agenda that everyone should have the right to, and be able to live in, a healthy environment, with access to sufficient and appropriate environmental resources for a healthy life. However, the importance of the environment goes far beyond the immediate benefits it can provide. Northern Ireland's environment is a unique asset; sustaining its landscape and biological diversity also makes a small but significant contribution to protecting a much wider ecosystem which sustains life on*

earth. We therefore have a responsibility to protect and enhance this asset for the benefit of future generations.

Built Heritage

3.30 The Region has a rich and diverse built heritage which contributes to our sense of place and history. It is a key tourism and recreational asset, and sustainable management of the built heritage makes a valuable contribution to the environment, economy and society. The built heritage embraces many sites of local and international interest which once lost cannot be fully replaced.

- *Identify, protect, and conserve the built heritage, including archaeological sites and monuments and historic buildings. Northern Ireland's archaeological sites and monuments provide a tangible link to the distant past, as well as more modern remains. For example, the suite of historic monuments in State Care in the Region ranges from the earliest known dwelling-sites and burial monuments through to twentieth-century fortifications. New discoveries are made every year that contribute to our understanding of the past and its place in the future landscape. Continuing work to identify these built heritage assets, on land, along the coast and within coastal waters helps inform future decisions about development and land-use change.*
- *Identify, protect and conserve the character and built heritage assets within cities towns and villages. Historic buildings and monuments are key elements of our historic townscape, Conservation Areas, key civic and publicly accessible buildings, as well as everyday dwellings and shops. If these assets are recognised and managed, they can make a positive contribution to regeneration. This will allow the maintenance of craft skills, and the development of a sense of place that can be respected by future development.*
- *Maintain the integrity of built heritage assets, including historic landscapes. Historic sites, buildings and landscapes do not exist in isolation. Their appropriate management and wider integration with their surroundings will help contribute to local character and ensure that these assets continue to make a valuable contribution to our tourism economy*

9. Strategic Planning Policy Statement for Northern Ireland (SPPS)

9.1 The SPPS is a statement of the Department's policy on important planning matters that should be addressed across Northern Ireland (SPPS paragraph 1.3). The second edition was published in December 2025. Paragraph 1.5 of the SPPS notes that the provisions within the SPPS apply to the whole of Northern Ireland and must be taken into account in the preparation of Local Development Plans, and are also a material consideration in all planning applications and appeals.

9.2 All local councils in Northern Ireland are in the process of developing new local plans which conform with the SPPS. Once these are all completed and adopted, they, together with the SPPS, will replace the Planning Policy Statements, which will be cancelled (SPPS paragraph 1.7).

9.3 Paragraphs 1.8 to 1.14 of the SPPS set out that until the adoption of the new local plans by the eleven local councils in Northern Ireland, the existing adopted local plans and Planning Policy Statements will continue to apply alongside the SPPS. However, where a policy within an existing local plan or PPS conflicts with that set out in the SPPS, the policy in the SPPS Should be accorded greater weight in the decision making process (SPPS paragraph 1.10).

9.4 SPPS policy in relation to archaeology and built heritage is set out in paragraphs 6.1 to 6.30 of the SPPS. It sets out the aim of the SPPS in relation to archaeology and built heritage in paragraph 6.3:

"The planning system has a key role in the stewardship of our archaeological and built heritage. The aim of the SPPS in relation to Archaeology and Built Heritage is to manage change in positive ways so as to safeguard that which society regards as significant whilst facilitating development that will contribute to the ongoing preservation, conservation and enhancement of these assets."

9.5 Paragraph 6.4 sets out the regional strategic objectives for archaeology and built heritage as to:

- *secure the protection, conservation and, where possible, the enhancement of our built and archaeological heritage;*
- *promote sustainable development and environmental stewardship with regard to our built and archaeological heritage; and*
- *deliver economic and community benefit through conservation that facilitates productive use of built heritage assets and opportunities for investment, whilst safeguarding their historic or architectural integrity.*

9.6 The SPPS goes on to set out policy in relation to the determination of planning applications in relation to different types of archaeological and built heritage assets in paragraphs 6.6 through 6.27. Key elements of the policies set out in this section are reproduced below for ease of reference:

World Heritage Sites

6.6 Development that would adversely affect the Outstanding Universal Value of a World Heritage Site (WHS) or the integrity of its setting must not be permitted unless there are overriding exceptional circumstances.

Archaeology

6.8 Archaeological remains of regional importance include monuments in State Care, scheduled monuments and Areas of Significant Archaeological Interest (ASAIs). Such sites (or constituent parts of them) benefit from statutory protection. Development which would adversely affect such sites or the

integrity of their settings must only be permitted in exceptional circumstances. The scheduling programme is an ongoing process and there are archaeological remains of regional importance yet to be scheduled. In order to make sure that the most up to date information is taken into account when determining applications, this policy approach should also apply to such sites which, whilst not scheduled presently, would otherwise merit such statutory protection.

6.9 Development proposals which would adversely affect archaeological remains of local importance or their settings should only be permitted where the planning authority considers that the need for the proposed development or other material considerations outweigh the value of the remains and/or their settings.

6.10 Planning authorities should seek all necessary information from applicants in making well informed planning judgements, particularly where the impact of a development proposal on archaeological remains is unclear, or the relative significance of such remains is uncertain. Should an applicant fail to provide a suitable assessment or evaluation on request, the planning authority should adopt a precautionary approach and refuse planning permission.

6.11 Where a planning authority is minded to grant planning permission for development which will affect sites known or likely to contain archaeological remains, it should ensure that appropriate measures are taken for the identification and mitigation of the archaeological impacts of the development. Where appropriate, this may involve the preservation of remains in situ, or a licensed excavation, recording examination and archiving of the archaeology by way of planning conditions.

Listed Buildings

6.12 Listed Buildings of special architectural or historic interest are key elements of our built heritage and are often important for their intrinsic value and for their contribution to the character and quality of settlements and the countryside. It is important therefore that development proposals impacting upon such buildings and their settings are assessed, paying due regard to these considerations, as well as the rarity of the type of structure and any features of special architectural or historic interest which it possesses.

6.13 Development involving a change of use and / or works of extension / alteration may be permitted, particularly where this will secure the ongoing viability and upkeep of the building. It is important that such development respects the essential character and architectural or historic interest of the building and its setting, and that features of special interest remain intact and unimpaired. Proposals should be based on a clear understanding of the importance of the building/place/heritage asset, and should support the best viable use that is compatible with the fabric, setting and character of the building. Applicants should justify their proposals, and show why alteration or demolition of a listed building is desirable or necessary.

Historic Parks, Gardens and Demesnes

6.16 Planning permission should not be granted for development that would lead to the loss of, or cause harm to, the overall character, principal components or setting of Historic Parks, Gardens and Demesnes.

Conservation Areas

6.18 In managing development within a designated Conservation Area the guiding principle is to afford special regard to the desirability of enhancing its character or appearance where an opportunity to do so exists, or to preserve its character or appearance where an opportunity to enhance does not arise. Accordingly, there will be a general presumption against the grant of planning permission for development or conservation area consent for demolition of unlisted buildings, where proposals would conflict with this principle. This general presumption should only be relaxed in exceptional circumstances where it is considered to be outweighed by other material considerations grounded in the public interest. In the interests of protecting the setting of designated Conservation Areas, new development in proximity needs to be carefully managed so as to ensure it respects its overall character and appearance. Important views in and out of the Conservation Area should be retained.

Areas of Townscape Character (ATC)

6.21 In managing development within ATCs designated through the LDPs process, the council should only permit new development where this will maintain or enhance the overall character of the area and respect its built form.

Non-Designated Heritage Assets

6.24 The effect of an application on the significance of a non-designated heritage asset such as an unlisted vernacular building, or historic building of local importance should be taken into account in determining the application. In weighing applications that affect directly or indirectly non-designated heritage assets, a balanced judgement will be required having regard to the scale of any harm or loss and the significance of the heritage asset. Councils may wish to bring forward bespoke local policies for such buildings.

Enabling Development

6.25 Enabling Development is a development proposal that is contrary to established planning policy and in its own right would not be permitted. Such a proposal may however be allowed where it will secure the long term future of a significant place and will not materially harm its heritage value or setting. Enabling development typically seeks to subsidise the cost of maintenance, major repair, conversion to the optimum viable use of a significant place where this is greater than its value to its owner or market value.

9.7 The SPPS also provides policy in relation to renewable energy developments in paragraphs 6.214 through 6.241. Paragraph 6.223 makes specific reference to how effects of renewable energy developments to the historic environment should be weighed (emphasis added for clarity):

6.223 All renewable and low carbon energy development, any associated buildings, and supporting infrastructure will be permitted where the proposals will not result in an unacceptable adverse impact (alone or in combination with other developments) on the following planning considerations:

- *public safety, such as roads, rail, and aviation safety (including communications interference);*
- *human health;*
- *residential amenity and impacts on other such sensitive receptors (communities and individuals, including future occupants of committed developments);*
- *visual amenity and landscape character, including cumulative impact (see also paragraph 6.225 in respect of proposals impacting designated landscapes);*
- *biodiversity and geodiversity, nature conservation, archaeological or built heritage interests;*
- *local natural resources, such as air quality, water quality or quantity;*
- *the capacity of and effects on the transportation network; and,*
- *impacts on tourism, recreation, and public access to the countryside.*

Local Planning Policy

9.8 Local planning policy is provided by the Mid and East Antrim Borough Council's Local Development Plan 2030: Plan Strategy. The Development Plan 2030 contains the following policies relating to archaeology and cultural heritage:

Policy GP1 General Policy for all Development

Planning permission will be granted for sustainable development where the proposal accords with the LDP and there is no demonstrable harm to interests of acknowledged importance. Where this is not the case there will be a presumption to refuse planning permission.

All development proposals requiring planning permission with the exception of minor proposals, will be assessed against the following general policy criteria a) - e) and will, where relevant, be required to demonstrate compliance with them. In addition, all development proposals outside settlement limits and within the countryside will also be required to demonstrate compliance with general policy criterion f).

Criteria relating to Design Quality and Respecting Local Character and Distinctiveness

[…]

The development does not adversely affect features associated with the historic environment/setting, natural heritage or areas recognised for their exceptional

landscape quality and should seek to retain or integrate such features wherever possible.

[…]

Policy HE1 Archaeological Remains and their Settings

The Preservation of Archaeological Remains of Regional Importance and their Settings. There is a presumption in favour of the physical preservation in situ of archaeological remains of regional importance and their settings. These comprise Areas of Significant Archaeological Interest, monuments in State Care, scheduled monuments and other sites and monuments that would merit scheduling. Development which would adversely affect such sites of regional importance or the integrity of their settings will not be permitted unless there are exceptional circumstances.

A development proposal which would adversely affect the integrity of these assets and their settings will only be permitted in exceptional circumstances where it is determined to be of overriding regional importance and there are no alternative solutions.

The Protection of Archaeological Remains of Local Importance and their Settings

Development proposals which would adversely affect locally important archaeological sites or monuments or their settings will only be permitted where it is clearly demonstrated that the need for the proposed development outweighs the value of the remains and/or their settings.

Archaeological Assessment and Evaluation

Council shall seek all necessary information from applicants particularly in cases where the impact of a development proposal on archaeological remains is unclear, or the relative significance of such remains is uncertain. Should an applicant fail to provide a suitable assessment or evaluation on request, Council shall adopt a precautionary approach and refuse planning permission.

Archaeological Mitigation

In exceptional circumstances where planning permission is granted for development which will affect sites known or likely to contain archaeological remains. Conditions will be attached to ensure that appropriate measures are in place for the identification and mitigation of the archaeological impacts of the development, including where appropriate the completion of a licensed excavation, recording examination and archiving of remains before development commences.

Policy RE1 Renewable Energy Development

A proposal for a renewable energy development together with any associated buildings and infrastructure, will be permitted where it meets the General Policy and accords with other provisions in the LDP. In addition, the proposal must meet all the following criteria:

[…]

e) it will not have unacceptable adverse impact on built heritage or on biodiversity or nature conservation (including cumulative effects);

[…]

Consultation

9.9 Consultations were held with the Historic Environment division (HED) in order to agree the scope of the assessment work, and also the key elements of the historic environment that would require consideration. Liaison between Landgage Heritage and HED occurred between 24th June 2025 and 19th December 2025 and these comprised:

- Email correspondence to agree the area around the Application Site that should be examined for potential indirect impacts; agreed to be 10km.
- Consultation from HED on the Cultural Heritage Baseline Assessment and Environmental Statement and request for Further Information Environment Assessment (included in the consultation response section below)
- Email correspondence to agree the scope and methodology for the lidar archaeological assessment and commencement alert.
- Chris Long of Gahan and Long, phone call with Andrew Gault to confirm expected methodology of the field walkover survey.
- Email Correspondence regarding separate lidar projects being undertaken and the availability of the report as it may be relevant to this assessment.

HED Consultation Response

9.10 HED (Historic Environment Division) advises that the following additional information should be included with the Archaeology and Cultural Heritage section of the ES:

1. *Doonan Fort ANT029:004 (scheduled): HVP 1 has been taken from the laneway at NGR 327493, 414267. This is c. 200m from the actual monument and therefore does not illustrate the potential impacts of the proposed development upon the setting of the scheduled monument as experienced from the site. Please submit a HVP (to scale, see Point 13) from the scheduled monument, looking towards the proposed development.*
2. *Ticloy Portal Tomb ANT092:031 (scheduled): HVP 3 has been taken from public footpath c. 50m to the west of the monument. This does not illustrate the potential impacts of the proposed development upon the setting of the scheduled monument as experienced from the site. Please submit a HVP (to scale, see Point 13) from the scheduled monument, looking towards the proposed development.*

3. *Tamybuck Wedge Tomb ANT029:039 (scheduled): This monument is aligned northwest-southwest. No assessment has been provided regarding critical views from the entrance of the tomb, towards the northeast. Please provide an assessment of the impacts of the proposed development upon this aspect of the monuments setting including a photomontage from along this alignment towards the PDA.*
4. *Antynanum Court Tomb ANT029:092 (scheduled): This monument is aligned ENE/WSE; Section 5.111 states that "the turbines would not interfere with the view toward to the entrance of the tomb, which faces away from the Application Site". There is no assessment of the impact of the proposed development upon the views from the entrance of the tomb, which are also an important aspect of the setting of the monument. Please provide such an assessment including a photomontage looking along the alignment of the tomb towards the PDA.*
5. *Proposed development area: Section 5.160 states that "the Application Site is unlikely to contain the buried archaeological remains of settlement activity from any period reviewed", but that there is "general potential" for archaeological remains of "low interest". HED (Historic Monuments) does not accept this and considers that the Archaeology and Cultural Heritage chapter has not fully assessed this potential. There is no examination of the aerial photography of the area, and the field walkover (Sections 5.3.2-5.3.4) appears to have been limited to a very small extent of the proposed development area concentrated around sheepfold ANT029:091.*

HED (Historic Monuments)'s own analysis of the aerial photography and field walking of the proposed development area has revealed that there are several areas of upstanding archaeological remains within, and adjacent to, the proposed development area. Some of these have added to the NISMR while others are in the process of being added. They demonstrate that there are indeed widespread and potentially regionally significant archaeological remains in this area, contra to that suggested in the ES.

In order to adequately assess the impacts of the proposed development upon the archaeological remains within the proposed development area, and potentially influence the proposed site layout and archaeological mitigation strategy, HED (Historic Monuments) advises that further, more comprehensive, archaeological survey is required to inform consideration of this proposal. HED (Historic Monuments) advises that a comprehensive archaeological walkover survey and a LiDAR survey of the proposed development area are necessary. The LiDAR survey should be taken at a resolution minimum of 0.5m, and ideally 0.25m (or higher). The survey should follow industry standards such as those laid out by Historic England (https://historicengland.org.uk/images-books/publications/usingairborne-lidar-in-archaeological-survey/heag179-using-airborne-lidar-inarchaeological-survey). The LiDAR survey does not need

to be undertaken by an archaeologist; however, archaeological interpretation of the data should be provided and this needs to be undertaken by someone with the necessary skills and experience to do so. The results of this LiDAR analysis should then be included in the archaeological impact assessment and the results of the existing assessment updated accordingly. This new information will influence consideration of the proposed site layout and the archaeological mitigation for the proposed development. The DTM and unprocessed data should be submitted as part of this additional information.

6. *The Potential Grid Connection Route (Appendix 2.1): states that there will be the "Limited loss of some fragmentary archaeological remains along the cable routes". Further information is required regarding the precise location of the cable routes in relation to the archaeological record in order to determine if these "losses" are acceptable to Policies BH 1 and BH 2 of PPS 6 and the SPPS.*
7. *No mention is made of the industrial heritage importance of the area or the assets IHR06692 mill dam and IHR06694 old ironstone levels. Policy BH2 of PPS 6 applies to these sites. Please include a full assessment of the impacts of the proposed development upon the industrial heritage of the area.*
8. *There does not appear to be an assessment of the impacts of the proposed development upon ANT029:003: standing stone and ANT029:089 field system. Please provide an assessment of the impacts of the proposed development upon these recorded archaeological sites and their settings.*

9.11 HED (Historic Monuments) has the following general comments regarding Chapter 5:

1. *Archaeology and Cultural Heritage (these apply also, where relevant, to Appendix 5.1): Sections 5.7–5.9 Regional Planning Policy does not reflect the current planning system in Northern Ireland and should be amended.*
2. *Section 5.30 refers to "the residential development"; this is a windfarm development.*
3. *There are repeated references to Northern Ireland Environment Agency (NIEA); HED is not part of NIEA and this should be amended as appropriate. HED is part of the Department for Communities.*
4. *Figure 5: 1st Edition OSNI maps 1832; the map is missing from the figure. Please amend. Section 5.4.8: "The 1st Edition OS map for this area was not available at the time of writing": hard copies are available for consultation either through HERONI or OSNI.*
5. *Regarding the photographs: Section 3.4.4 (Appendix 5.1) states that "photographs within the body of this assessment are provided for illustrative purposes only and are not sized within the assessment for viewing to scale as is done in Landscape and Visual Impact Assessment. If*

it is necessary to provide such a scaled view, it will be clearly labelled with specific viewing instructions". All Heritage Viewpoint Photomontages should be provided for viewing to scale in order to properly assess potential impacts upon the heritage assets.

6. *The ES demonstrates a lack of understanding regarding Irish upland archaeology. References should be made to the archaeology found within other upland areas in Northern Ireland, such as Gardiner 2012; Gardiner et al., 2019; Neary 2014, among others.*

Assessment Methodology

Scope of Study

10. For the Assessment of Archaeological Potential

10.1 The archaeological potential of the Application Site will be assessed by reviewing available relevant evidence, both from within the Application Site, and also from the surrounding area, and using this to assess the potential the Application Site has to contain buried archaeological remains. The evidence will be drawn from the following resources, where relevant and available:

- Data from the Historic Environment Record of Northern Ireland (HERoNI);
- The results of previous archaeological investigations (if available and relevant);
- Consultation of the schedule of ancient monuments and lists of listed buildings and other designated heritage assets held by the Historic Environment Division of the Department for Communities of Northern Ireland;
- Local studies and record office research;
- Satellite imagery (if available and relevant);
- A site walk over (where possible and appropriate); and
- Review of historic mapping.

10.2 In addition, information about the topography and geology of the Application Site will also be collated and considered alongside the archaeological evidence. These records and resources will be examined in relation to the Application Site, and a suitable buffer zone (the study area) around the Application Site. This is to ensure that the baseline information used to inform the assessment of potential for the Application Site includes sufficient information with which to understand the context of the evidence discussed. The extent of the study area needed to inform the assessment will depend on the quantity and quality of the evidence available, as well as the size of the Application Site among other factors.

10.3 The standard extent of the study area is usually 1km from the Application Site's boundary. However, this may be varied depending on the nature of the evidence available; for example in some urban settings there may be a high quantity of

evidence in the immediate vicinity of the Application Site, meaning that the extent of the study area can be reduced and more focussed on the Application Site and the immediately surrounding area. On this occasion, a 1km search radius from the Application Site boundary is considered appropriate for the study area.

11. For the Assessment of Setting Impacts

11.1 This assessment will also consider the potential effects of development within the Application Site on the significance of heritage assets, through effects to their settings. This will include any heritage assets within the Application Site, and those in the surrounding area, whose setting may be affected. The heritage assets which require assessment have been selected with reference to the Northern Ireland Sites and Monuments Record and the Northern Ireland Buildings Record, as well as information held by the LPA on conservation areas and heritage assets.

11.2 A basic search radius of 10km from the Application Site boundary was used to establish which heritage assets required assessment for impacts. This is normally sufficient to ensure all assets which require consideration are properly assessed, as beyond this distance the windfarm development is rarely discernible to the degree that it would affect the heritage value of a view.

11.3 Designated heritage assets of the high significance, comprising listed buildings and registered parks and gardens graded A and B+, scheduled ancient monuments, world heritage sites and conservation areas within the whole 10km search radius are assessed for potential impacts from the proposed development. This is because such assets tend to either be prominent or have heightened sensitivity to change before their significance is affected.

11.4 Other designated heritage assets, such as grade B listed buildings and registered parks and gardens and conservation areas are assessed for impacts within a 5km search radius from the Application Site boundary. This is because assets at this level of designation tend to have a lower sensitivity to change than higher graded assets.

Methodology for assessment of setting

11.5 This assessment will consider the potential effects of development within the Application Site on the significance of heritage assets, through effects to their settings. This will include any heritage assets within the Application Site, and those in the surrounding area, whose setting may be affected.

11.6 Heritage assets and potential impacts will be assessed using best practice, including that set out in the HED's Guidance on Setting and the Historic Environment (2018 HED). This defines setting as:

11.7 *The term 'setting' applies to the physical space that is part of – and contributes to – the significance and distinctive character of a heritage asset, and through which the asset may be seen, experienced, understood and enjoyed.*

11.8 The guidance goes on to set out a three stage process for the assessment of the setting of heritage assets, and of development impacts to the significance of heritage assets through changes to their setting:

- Stage 1: identify the heritage assets that might be affected.
- Stage 2: define the setting by establishing how the surroundings contribute to the significance of the heritage assets in the ways they are understood, appreciated and experienced.
- Stage 3: assess how any change would impact upon that setting.

11.9 As part of stage 1, set out above, the heritage assets which require assessment have been selected with reference to the heritage data for the Application Site and surrounding area provided by the HED and held by the Department for Communities. A basic search radius of 10km from the Application Site boundary was used to establish which heritage assets required assessment for impacts, which is usually sufficient to ensure all assets which require consideration are properly assessed.

11.10 Not all designated heritage assets within this radius will require full assessment for impacts; where a designated heritage asset has been excluded, a clear justification will be provided, for example if the asset is sufficiently far, and well screened from the Application Site. Also, not all assets will require the same level of assessment; more complex and/or significant assets which may be subject to a higher level of impact will require more detailed consideration than those of less significance, or which are not highly affected by the proposed development.

11.11 The scope of study and assessment of effects will also be informed by a Zone of Theoretical Visibility (ZTV) for the proposed development. The ZTV models the potential visibility of the wind turbines in the wider landscape, taking account of local topography, which may prevent intervisibility in some areas. The Proposed Development would be a wind farm, which would not produce noise or light pollution, or generate increased traffic, or other effects which could adversely affect these assets in a way unrelated to visibility. Therefore, where heritage assets fall outside the ZTV it is considered that the Proposed Development would not affect their significance.

Methodology for assessment of archaeological potential

11.12 The available evidence will be reviewed and used to determine what potential the Application Site has to contain buried archaeological remains. Regard must be had to the reliability of the evidence reviewed, any limitations inherent in the methods used to generate that evidence, and to the relevance of the evidence in informing the assessment of archaeological potential of the Application Site. The assessment will consider the available archaeological evidence by historical period.

11.13 It is not necessary to describe all available evidence available for each period exhaustively; the assessment of potential should focus on the evidence which helps to clarify the archaeological potential of the Application Site.

11.14 The historical periods referred to in this assessment are set out below:

12. Prehistoric period

- Mesolithic 8,000 BC to 4,000 BC
- Neolithic 4,000 BC to 2,500 BC
- Bronze Age 2,500 BC to 500 BC
- Iron Age 500 BC to AD 400

13. Historic period

- Early Medieval AD 400 to AD 1100
- Medieval AD 1100 to AD 1600
- Post-Medieval AD 1600 to AD 1901
- Modern AD 1901 to present

13.1 The potential for the Application Site to contain buried remains will be categorised as either known, moderate, general, low, limited, no potential or unknown potential, based on the criteria set out below.

- **Known potential**: where a site is known to have archaeological remains, for example from evidence provided by archaeological investigations.
- **Moderate potential**: where the available evidence suggests there is a strong possibility for a site to contain archaeological remains, but it is not conclusive or certain. For example, an adjacent field to that being assessed has been subject to archaeological field investigations and is known to have evidence of occupation remains. But there is no clear evidence in the results of the investigations that these remains continue into the site being assessed.
- **General potential**: where the available evidence suggests that archaeological remains may be present in the Application Site, but the evidence is not clear enough to determine whether the Application Site is likely or unlikely to contain associated buried remains. For example there may be a general potential for archaeology, evidenced by residual finds in nearby investigations and other evidence in the wider area, but no clear evidence close to the Application Site, which would help to determine whether their presence within the Application Site is likely or unlikely.
- **Low potential**: where the available evidence suggests that the presence of archaeological remains within a site is unlikely, but this is not certain or conclusive.
- **No potential**: where a site is known to have no archaeological remains, for example due to past mineral extraction, or when previous archaeological works demonstrate that no remains are present.
- **Unknown potential**: where there is insufficient information to provide any assessment of the archaeological potential of a site.

13.2 The assessments of potential set out above can refer to the potential across the whole of the Application Site, or to only part of it. For example, potential for

evidence from a particular period may be focussed in a specific part of the Application Site, or there may be evidence of localised mineral extraction.

Methodology for the assessment of impacts

14. Significance of heritage assets

14.1 Ultimately the assessment of the significance of archaeological remains and other heritage assets is a matter of professional judgement, having regard to the available evidence, including research priorities, guidance, as well as any designation the asset may have. The assessment will be made with reference to the Historic Environment Division's Criteria for the Scheduling of Historic Monuments and the Listing of Buildings of Special Architectural or Historic Interest, with associated procedures (DfC 2019a), and research priorities set out in the relevant regional and local archaeological research frameworks, as appropriate.

14.2 The levels of significance used in this assessment are defined in table 1, below.

Table 5.1: Criteria for appraisal of level of importance of heritage assets

Importance / value	Description
Very High	World Heritage Sites
High	Scheduled Monuments and archaeological sites of demonstrable schedulable quality & importance; Protected Wreck Sites Listed buildings graded A and B+ Designated registered parks and gardens Registered Historic Landscapes of high interest Conservation Areas
Medium	Local Authority designated sites and their settings; Listed buildings graded B; Undesignated sites of demonstrable regional importance
Low	Sites with specific and substantial importance to local interest groups; Sites whose importance is limited by poor preservation and poor survival of contextual associations.
No importance	Sites with no surviving archaeological or historical component.

15. Assessment of effects

Adverse effects

15.1 Assessments of the degree of adverse effects on the significance of heritage assets are based on the extent to which the Proposed Development would affect the nature, extent and level of significance of the asset.

15.2 The degree of effect will vary in severity, depending on the extent, nature and level of effect to the significance of the heritage asset. Understanding the degree of effect is important to determine whether a potential effect is acceptable or not,

as well as whether mitigation measures should be implemented, and what form them should take.

15.3 In order to inform this process, a spectrum of effects is provided in Table 5.2, below, along with brief descriptions of the terms used. Where this assessment determines that an adverse effect would result from the implementation of the proposed development, the level of effect will be assigned based on the terms used in Table 5.2.

15.4 By nature this process is not quantitative but relies on professional judgement. However, this judgment is informed by accepted, observable facts, such as spatial relationships and designations, the extent of any physical impacts, and the extent of changes to the surroundings of heritage assets.

Table 5.2: Criteria for appraisal of degree of adverse effect on heritage assets

Level of effect	Description
Major Adverse	Total or substantial loss of the significance of a heritage asset. Harm to a heritage asset through effects to its setting, such that the significance of the asset would be totally lost or substantially reduced (e.g. the significance of a designated heritage asset would be reduced to such a degree that its designation would be questionable; the significance of an undesignated heritage asset would be reduced to such a degree that its categorisation as a heritage asset would be questionable).
Moderate Adverse	Moderate harm to a heritage asset, such that the asset's significance would be materially affected/considerably devalued, but not totally or substantially lost.
Minor Adverse	Low level of harm to the significance of a heritage asset. This could include the removal of fabric that forms part of the heritage asset, but that is not integral to its significance (e.g. the demolition of later extensions/additions of little intrinsic value). Some harm to the heritage asset's setting, but not to the degree that would result in a meaningful devaluation of its significance.
Slight Adverse	A slight effect to the significance of a heritage asset. An example would be limited disturbance of an archaeological asset, but which does not actually damage the archaeological interest of the asset in any way. A limited degree of effect through changes to setting, but the degree of effect would not be readily discernible, or meaningfully affect appreciation.
Negligible	A change to a heritage asset or its setting that involves no loss of significance or any harm.
No Impact	No change to a heritage asset or its setting.

Beneficial effects

15.5 In addition to adverse effects, a development may also have beneficial effects on the significance of a heritage asset. For example, a development may involve the repair and restoration of the fabric of a historic building which is at risk.

15.6 Furthermore, there are often instances where the effects of a development on the significance of a heritage asset are multifaceted, with both adverse and beneficial effects. In these instances it is necessary to come to an overall understanding of

the impact of a proposed development, which considers both positive and negative effects. To inform such a judgment, it is not sufficient to understand that an effect is beneficial, it is also necessary to understand the scale of the benefit in order to understand how a harmful effect compares to a beneficial one.

15.7 Therefore, where a beneficial effect to a heritage asset is identified it will categorised as either major, moderate or low, mirroring the degrees of adverse effects set out in table 5.2, above. Where a benefit is categorised, this will be justified within the assessment. The categorisation of a benefit will follow the broad criteria set out below in table 5.3.

Table 5.3: Scale of heritage benefits

Level of effect	Description
Major benefit	Benefits that enhance key elements of a heritage asset's significance to a substantive degree. This would include effects such as substantial repairs or restoration of original fabric of a listed building which is at risk, or works that allow a central part of an asset's special interest to be appreciated or understood where this was not previously possible.
Moderate benefit	Benefits that provide a moderate enhancement to important elements of a heritage asset's significance. Examples would be realising the research value of remains of archaeological interest through archaeological investigation, modest repairs and restoration of key parts of the fabric of a heritage asset, and works that better reveal key elements of the significance of a listed building, either by removing unsympathetic extensions or by sympathetically modifying the building's setting.
Minor benefit	Benefits that either provide minor enhancements to important elements of a heritage asset's significance, or which benefit more peripheral elements of the asset's significance. Examples would include removing unsympathetic elements from the setting of a heritage asset which allow for generally enhanced appreciation of the asset's significance, or minor repairs and restoration of a historic building's fabric.
Slight benefit	Benefits that provide a minor benefit to peripheral elements of the asset's significance. Examples would include limited improvements to the setting of a heritage asset which allow for a small enhancement in appreciation of the asset's significance.

15.8 It is important to note that the descriptions and categories above are for guidance, and that assessments of benefits must ultimately be based on professional judgment which is informed by a thorough understanding of the heritage asset's significance, and of the effects of the proposed development.

Zone of Theoretical Visibility

15.9 This assessment has been informed by a model Zone of Theoretical Visibility (ZTV) for the surrounding area. Further details on the ZTV for the Proposed Development are provided in Volume 3, Section 4, in the Landscape and Visual Impact Assessment. The site visit confirmed that the ZTV model produced for the Application Site represents a “safe” representation of potential intervisibility, with

several areas indicated as tentatively intervisible, which in practice were well screened.

Impacts other than visual

15.10 The proposed wind farm would not produce significant noise or light pollution, or generate increased traffic, or other effects which could adversely affect these assets in a way unrelated to visibility. Therefore, where these assets fall outside the ZTV it is considered that the Proposed Development would not affect their significance.

Photos

15.11 A Landscape and Visual Impact Assessment (LVIA) has also been produced for the Application Site (Ref Vol 2, Chapter 4 LVIA), in conjunction with this assessment. Any viewpoints taken as part of the LVIA used to illustrate effects within this assessment are cross referenced using the same viewpoint numbers as in the LVIA.

15.12 A series of Heritage View Points (HVPs) have also been produced, to provide additional input to the views provided in the LVIA. The HVPs have been agreed with the NIEA during the consultation process and are numbers HVP1 through HVP7 (add ref location). The HVPs are provided under a separate cover due to the size of the file, and should be read in conjunction with this assessment. New HVP were produced in response to HED's comments and these are included in Appendix 5.5.

16. Understanding the significance of adverse effects

16.1 The assessment of the overall impact of the proposed wind farm on the significance of heritage assets is evaluated by taking into account both the heritage significance of the heritage asset in question, and the magnitude of the predicted effect on that significance. As is set out in policy in relation to the determination of renewable energy developments with regard to effects to heritage assets (SPPS paragraph 6.223 and policy RE1 of the Local Development Plan 2030: Plan Strategy), it is important to understand whether a development would result in an unacceptable adverse impact on the significance of built heritage interests.

16.2 To understand whether an effect to a heritage asset is unacceptable, it is necessary to understand the degree of effect a development would have on the significance of a heritage asset, as well as of the level of importance of the heritage asset in question. Due to the higher protection provided to heritage assets of higher importance, the significance of an adverse effect to the planning balance will vary depending on the importance of the asset in question (as defined in table 5.1, above), as well as the level of adverse or beneficial effect identified (as defined in tables 5.2 and 5.3).

16.3 Table 5.4 uses these factors to provide a framework for the identification of the significance of effect of an identified effect on the significance of a heritage asset, which would result from the proposed development.

16.4 The categories of significance of effect defined in Table 5.4, below, have been devised with reference to best practice as set out in ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties (ICOMOS 2011) as well as the Design Manual for Roads and Bridges volume 11 (Standards for Highways).

16.5 The categories of significance of effect are not meant to be proscriptive, but are rather meant to allow the professional judgement of the assessor to be articulated clearly and consistently across different types of effects to heritage assets of varying nature, quality and significance, allowing for nuance where necessary. In recognition of this, where there are two options within a category of significance of effect, the assessor will provide evidence for one or the other of the options. For example, if an asset of high importance is subject to a moderate degree of adverse effect, the significance of that effect may be Moderate or Large, depending on the nature of the effect and of the asset in question. Ultimately, the most appropriate categorisation of the significance of effect must be chosen, using professional judgement which is informed by a thorough understanding of the significance of the heritage asset and the nature of the effect.

Table 5.4: Criteria for determining the significance of effect

Degree of adverse and of beneficial effects (tables 5.2 and 5.3)	Level of importance (table 1)			
	Very High	High	Medium	Low
Major Adverse	Very Large Adverse	Large Adverse	Moderate/ Large Adverse	Moderate/ Minor Adverse
Moderate Adverse	Large Adverse	Moderate/ Large Adverse	Moderate/ Minor Adverse	Minor Adverse
Minor Adverse	Moderate/ Large Adverse	Moderate/ Minor Adverse	Minor Adverse	Slight Adverse
Slight Adverse	Moderate/ Minor Adverse	Minor Adverse	Slight Adverse	Neutral
Negligible/No impact	Neutral	Neutral	Neutral	Neutral
Slight beneficial	Moderate/ Minor Beneficial	Minor Beneficial	Slight Beneficial	Neutral
Minor beneficial	Moderate/ Large Beneficial	Moderate/ Minor Beneficial	Minor Beneficial	Slight Beneficial
Moderate beneficial	Large Beneficial	Moderate/ Large Beneficial	Moderate/ Minor Beneficial	Minor Beneficial
Major beneficial	Very Large Beneficial	Large Beneficial	Moderate/ Large Beneficial	Moderate/ Minor Beneficial

16.6 Where the significance of effect is assessed as being Moderate or higher, this is considered to be a significant effect as referred to in the Planning (Environmental Impact Assessment) Regulations (Northern Ireland) 2017.

Baseline Assessment

Introduction

16.7 This chapter considers the baseline and conclusions which were provided in the Cultural Heritage Baseline Assessment (CHBA) and the subsequent Historic Environment ES chapter which considered the potential effects the Proposed Development would have on the historic environment. It considered both indirect effects, which would result from changes to the setting of heritage assets in the wider area, as well as potential direct physical impacts on buried archaeological remains. The CHBA is provided as an appendix to this chapter, in Appendix 5.1. and the ES is located in appendix 5.2 of this chapter.

16.8 This chapter will provide additional information from archaeological investigations which have been undertaken within the application site subsequent to the submission of the CHBA and previous ES chapter, and in response to the consultation response from HED. This chapter should be read in conjunction with the original submission. The baseline of this chapter has been created based on the comments from HED consultation which requested specific assets undergo further assessments. For other cultural heritage assets previously assessed please review the CHBA and ES chapter (Appendix 5.1 and 5.2 respectively).

16.9 In August to September 2025 a lidar archaeological assessment was undertaken by AMS across the Proposed Development Footprint and a buffer which formed the study area for their assessment (Appendix 5.3). Due to the presence of the Antrim Hills Special Protection Area (SPA) it was not possible to fly over part of the Proposed Development Footprint. AMS work in Northern Ireland and Ireland continuously and undertake lidar assessments to identify archaeological remains. The methodology for this was sent to HED's Andrew Gault for review prior to commencement. The identified lidar anomalies were assigned a confidence score ranging from 0 to 4.

16.10 A confidence score of 0 is attributed to non-archaeological features. A score of 1 means a possible archaeological site which is less definite than a confidence score 2; these features can be either natural or archaeological. A confidence score of 2 represents new probable archaeological site. A confidence score of 3 are SMR sites that are visible in lidar visualisation, and a confidence score 4 are SMR sites not visible in lidar visualisations.

16.11 The lidar assessment suggested that there was potential for thirty-two separate archaeological sites within the Proposed Development Footprint. Five of these represented possible archaeological sites (confidence score 1) which included two possible structures, an enclosure, a possible hut site and a possible quarry. Twenty-

three of these represent probable features (confidence score 2) which include one enclosure, five townland boundaries, eight field systems, one possible stone circle, two banks, three hut sites, one potato ridge and a possible boundary feature. Finally, four features are confidence score of three and comprise three field systems and a trackway (Bonsall, 2025).

16.12 A field walkover survey was undertaken by Gahan and Long (Appendix 5.4), which targeted the results of the lidar archaeological assessment, SMR data and the findings of the CHBA. This survey was requested by HED and was focussed on the Proposed Development Footprint. Chris Long at Gahan and Long spoke with HED's Andrew Gault to confirm the methodology for undertaking the field walkover survey prior to commencement. This company works continuously within Ireland and works with upland archaeology on a regular basis. The field walkover survey would focus on the potential remains identified by the lidar assessment, the areas not covered by the lidar assessment and some NISMR and industrial heritage assets highlighted in the HED consultation response. The conclusions of the field walkover survey are included below for ease of reference (Long, 2025):

The majority of the LiDAR anomalies were identified on the ground and their condition was consistent with that as described in the LiDAR report with the following exceptions:

- *Anomaly 5 was located outside the red line boundary*
- *Anomaly 6 was located outside the red line boundary*
- *Anomaly 7 may extend further than the LiDAR survey suggested*
- *Anomaly 17 was a rectangular patch of nettles with no surface expression of any structure*
- *Anomaly 22 displayed very limited surface expression and it is not clear if this is a circular hut feature or not.*

Part of a field system was identified within the special area of conservation (SPA). This consisted of a low earth and stone bank up to 0.3m high and which extended roughly east-west across the full width of the red line boundary (figure 5). An off-shoot from this extended roughly north for approximately 90m. No further features were identified within the special area of conservation.

Inspection of the two IHR sites identified no evidence of surviving features relating to them. The area of the Mill Dam (IHR 6692:02) has been infilled and is overgrown with scrub vegetation. This area is wetter than the surrounding field and this may be a reflection of its previous use. The area of the exposed Ironstone Levels (IHR 6694) consists of an eroded field bank the face of which has been shored up using dry stone walling with the remainder being overgrown with gorse.

Inspection of the two NISMR sites confirmed that both monuments survive upstanding as per their recorded descriptions. The standing stone (ANT 29:03) enjoys 360^{o} panoramic views with direct views to Slemish towards the southwest. Despite its prominent position, it is not observable in the wider landscape due to the nature of the surrounding topography. The field system (ANT 29:89) is more difficult to identify in the landscape due to the extent of the vegetation cover in the area. It is best observed by differences in

the type of vegetation cover, with the low field banks tending to have patches of shorter, new growth grass generated through grazing. Huts circles are identifiable as low mounds with stone protruding from the sod layer.

Two potential features were identified within the area where the LiDAR survey did not cover. The first was located at the northern end of the of the LiDAR free area and consisted of a potential field bank approximately 15m in length. The second site was located towards the southern end of the LiDAR free area and consisted of the remains of a possible rectangular enclosure.

16.13 The relocation of turbines based on the initial field walkover survey results meant that there were changes in the layout after the first inspection, and a second visit was undertaken in the northeast of the Proposed Development Footprint. This is included as an appendix in the field walkover survey report (Appendix 5.4). The conclusions of this are included below (Long, 2025).

No evidence of upstanding features associated with the NISMR site ANT 25:22 was identified during the walk over survey.

The LiDAR anomalies were identified on the ground and their condition was consistent with that as described in the LiDAR report.

An additional field bank was identified extending northwest-southeast across the area of land take beyond the extent of the LiDAR survey. This consisted of a low earth and stone bank up to 0.3m high and which extended across almost the full width of the red line boundary (figure 4). The bank was bisected by a modern vehicle trackway which extends across this area of the site.

The details of the site inspection for each anomaly/monument are contained within table 1.

The remainder of the site consists of a mixture of semi-improved and unimproved upland pasture which is divided northeast-southwest by a dry stone and post and wire boundary (plates 1 and 2). The land to the north of the boundary rises up sharply in a series of undulations to a high point beyond the survey area. The land to the south of the boundary slopes down more gently before levelling out into a wetter area which has more dense vegetation cover. Both sections of land are crossed by drainage channels. The southern section of the survey area is bisected northeast-southwest by a modern vehicle track. No further evidence of potential archaeological features was identified within the survey area.

16.14 The cable routes underwent assessment in Vol. 4 Appendix 2.1 of the ES. A review of the cultural heritage baseline confirms that neither cable route would physically affect any listed building, scheduled monument, or other designated heritage asset of high importance. The route of the cable connections also follows existing roads, and roadside locations, which are areas that will have already been impacted by previous construction along the route. As such it is considered that both of the cable routes have a low potential to contain buried archaeological remains of high significance, that would require an alteration to the proposed route. These will be discussed in further details below.

16.15 A summary of the potential for buried archaeological remains within the Application Site is provided below, and the potential effects of the Proposed Development are also considered below.

Cultural Heritage Baseline

17. ANT 029:003: Standing stone undesignated heritage asset

17.1 The standing stone is located 610m to the north of the Application Site, but the nearest proposed turbine would be located 795m to the southwest of the feature. This is a recorded undesignated heritage asset. This is a recorded undesignated heritage asset and has local archaeological interest therefore based on our methodology this asset has a low archaeological interest (Table 5.1). The field walkover survey undertaken in 2025 identified that while the standing stone is prominent in close proximity, it is not distinguishable from the wider landscape and does not appear to have any inter-visibility with other standing stones in the wider landscape. This is partially due to the nature of the surrounding landscape. Therefore, the immediate vicinity of the heritage asset forms the majority of its setting. From the monument there are panoramic views including a clear view of Slemish to the southwest of the standing stone. Therefore, to appreciate the archaeological significance of the undesignated heritage asset it must be viewed in close proximity.

18. ANT 029:089 – Field System undesignated heritage asset

18.1 The field system is located 485m to the north of the Application Site, but the nearest proposed turbine would be located 725m to the southwest of the feature. This is a recorded undesignated heritage asset and has local archaeological interest therefore based on our methodology this asset has a low archaeological interest (Table 5.1). The Field walkover survey undertaken in 2025 identified that the field system survives as a series of heavily overgrown earth and stone bank. They are identified primarily through the slight changes in the vegetation type, there are possible hut circles identified within the system, surviving as raised areas with stones protruding from the sod. Thus, it is only discernible within its immediate vicinity, and therefore the archaeological interest of the field system cannot be appreciated from the wider landscape in which it is located. The field system has clear views towards the south however this is based on the nature of the surrounding topography and does not represent a designed view.

19. ANT 029:004 – Doonan Fort scheduled monument

19.1 Doonan Fort is located 220m to the east of the Application Site, but the nearest proposed turbine would be located 1.9km to the west. The monument comprises a large, oval mound, 6m in height (see plate 5.1, below).

19.2 The fort is of high significance, as is evidenced by its designation (see Table 5.1). It has high archaeological interest, and the monument will contain considerable

associated artefactual and environmental evidence of high research value. The fort also has both architectural and historic interest.

19.3 The fort is well preserved and highly visible from the immediate vicinity. It is located on the west facing slope of a valley of the Glencloy River, with rising topography to the west and east. The setting of the fort comprises the experience provided by the immediately surrounding area, in particular by views from the farm track immediately to the east, in which the archaeological and architectural interest of the fort can be readily appreciated.

Plate 5.1 Looking S towards Doonan Fort from small lane off of Slane Road

19.4 There is also an information board in a layby off the Carnlough Road (A42) which provides information on the monument's history and context. The fort is a local public attraction and the information board is located in a layby on the Carnlough Road, located between the monument and the Application Site (see plate 5.2, overleaf).

19.5 The location of HVP1 in the CHBA and original ES chapter was based upon the presence of parking and the placement of the information board for the monument here. This provides an appreciation and understanding of the archaeological and architectural interest of the fort to the general public, therefore HVP1 represents a key view within the setting of the monument and the public location that the scheduled monument could be appreciated from. Therefore, as HVP1 represents a key view of the scheduled monument it was assessed in the cultural heritage baseline and the ES chapter as such.

19.6 As seen in the HED consultation response a new HVP was requested that was from the scheduled monument, therefore one was taken here and is provided as an

updated wireframe (see Doonan Fort wireframe of reduced scheme in Appendix 5.5).

Plate 5.2 Looking S towards information boards and layby adjacent to Slane Road

20. ANT 029:031 – The Stone House scheduled monument

20.1 The Stone House scheduled monument is a portal tomb located on a gradual south facing slope of Ticloy Hill, with extensive views across the Braid River Valley to southwest. The tomb is located approximately 1.75km to the west of the nearest turbine location.

20.2 The remains of this portal tomb consist of the two side stones, one on the north side and one on the southern side, plus a slightly gabled backstone. This single chamber is roofed by 2 large capstones, of which the western stone appears partly displaced. There is no visible trace of a cairn (see plate 5.3, overleaf).

20.3 The tomb is of high significance and has a high level of archaeological interest, with good preservation, and the monument will contain additional associated artefactual and environmental evidence of high research value (Table 5.1). The monument is legible and visible from the immediate vicinity and the public footpath located to the west (see plate 5.3). Views of the tomb provide appreciation of the preservation and archaeological interest of the tomb, however the partly displaced stones somewhat obscure the orientation of the tomb from publicly accessible areas. As is noted in the description of the tomb in the HERoNI, the tomb has commanding views to the south-west, across the Braid River Valley, when viewed from the entrance to the tomb. HVP3, included as part of the original CHBA and ES, was taken from the public footpath just west of the scheduled monument which provides an appreciation of the perseveration and archaeological interest of the

tomb. This view also provided an understanding of the visibility of the Proposed Development while located within the setting of the scheduled monument. A further historic viewpoint (HVP) from the scheduled monument looking towards the Proposed Development as requested by HED has been undertaken, however this new HVP will be facing away from the key views across the Braid River Valley to the south west which were identified as contributing to the significance of the tomb (See Ticloy Tomb Wireline of reduced scheme in Appendix 5.5).

Plate 5.3 Looking east forwards Stone House portal tomb

21. ANT 029:092 – Court Tomb scheduled monument

21.1 This court tomb is located approximately 2km to the south of the nearest proposed turbine location. It is situated in a field of heather and rough grazing on northwest facing slope of a hill, with extensive views in an arc from west to east. The tomb consists of a large trapezoidal cairn of boulders aligned ENE/WSW and is preserved to a maximum height of 2.2m. The cairn measures 70m long by 12.6m wide at the front tapering to approximately 4m in width at the rear. The forecourt is formed by fourteen upright slabs and one toppled slab. The exact length of the gallery or number of chambers could not be discerned due to cairn material. The monument is legible and its orientation is readily appreciated at present. The tomb is of high significance, and will preserve additional archaeological evidence of high research value (Table 5.1).

21.2 The tomb is orientated ENE to WSW, and the court opening preceding the burial chamber is at the eastern end. As such the key view of the tomb is looking into the court entrance, towards the burial chambers, looking west of southwest, which is a commanding prospect thanks to the local topography. This view is key to

appreciation of the monument's archaeological interest. The immediately surrounding area also provides a good appreciation of the tomb's archaeological interest, although this is not readily discernible from the wider area. An additional wireframe was undertaken as requested by HED which was taken from the entrance of the tomb towards the development (See Antynanum Court Tomb Wireline of reduced scheme in Appendix 5.5).

22. ANT 029:039 – Wedge Tomb scheduled monument

22.1 This wedge tomb is located 2.9km to the south of the nearest proposed turbine location. It is situated in improved grassland on top of an eminence, with good views in all directions. The monument comprises the well-preserved remains of a wedge tomb, however the SE side of the cairn has been removed when the hill was quarried. It comprises twelve upright slabs forming outer walling, which averages 1m in height. Outside the side stones of the gallery is formed by eleven slabs. The entrance to the tomb is at the north-eastern end, facing towards the southwest.

22.2 The tomb is of high significance, and will contain additional associated artefactual and environmental evidence of high research value. The monument is legible from the immediate vicinity, however there is no meaningful experience of the tomb from the wider area, and public access to the monument was not possible during the site visit.

22.3 However, at close quarters the good preservation of the remains is evident as is its orientation, aligned SW-NE, which would have been a key part of experiencing the asset in the past as well as the present (based on information from HERoNI record ANT 029:039). The entrance was located at the north-eastern end of the tomb, and so views towards the southwest are significant, and are aligned with the past experience of the monument.

22.4 A new HVP has been produced from the tomb looking towards the Proposed Development as requested by HED (see Tamybuck Wedge Tomb wireframe of reduced scheme in Appendix 5.5), however key views from the monument are towards the southwest, which is the opposite direction to the proposed development.

Archaeological Heritage Assets

22.5 The resources reviewed to inform the assessment of potential comprise the following:

- Lidar Survey within the Development Boundary
- Field Walkover Survey within the Development Boundary
- The Northern Ireland Sites and Monuments Record (NISMR);
- Historic Environment Record of Northern Ireland (HERoNI);
- Historic mapping available from record offices and the Northern Ireland Historic Map Viewer;

- The results of previous archaeological investigations where relevant from the HERoNI and from the online database of Irish Excavation Reports (if available); and
- A site walk over.

Proposed Development

22.6 The lidar survey and field walkover survey identified archaeological remains which are likely to date to the prehistoric period within the Proposed Development Footprint, many of which are known from the SMR already. These include hut circles, banks field systems and enclosures which are believed to be associated with prehistoric settlement activity (ANT 029:103, ANT 029:106 ANT 029:109). During the lidar survey no clear indication of the group of hut circles recorded under ANT 029:106 (receptor A6) was identified within this location, during the field walkover survey however it was recorded that some of these huts were visible outside of the Proposed Development Footprint. The presence of ANT 029:103 (receptor A4) was also confirmed by the field walkover survey undertaken by Gahan and Long and therefore, there is a known potential for the presence of prehistoric remains within the northern part of the Proposed Development Footprint, along with a potential structure at ANT 029:109 (receptor A7). No upstanding features associated with ANT 025:022 were identified during the field walkover (receptor A3), however a field system was located just southwest of this which could be associated with this feature (receptor A9). Further Post-Medieval period remains have also been identified within the same location during the field walkover survey including a land division and braided trackway (ANT 029:105, receptor A5) visible on the first OS County Series First Edition map of 1832.

22.7 The lidar and field walkover have identified features that are consistent with an upland agricultural society including the aforementioned features recorded in the NISMR. Three field systems are believed to have been identified during the field walkover, two located in the south with the other located in the north (receptor A9). Further to this, four potential structures were also identified, these are believed to represent remains dated to both the prehistoric and Post-Medieval periods but they are not well preserved or visible on historic mapping (receptor A10). Two enclosures were also identified within the Proposed Development Footprint which may represent further evidence of the prehistoric settlement activities recorded in the NISMR within the Application Site (feature A11). The Antrim Plateau has been shown to contain extensive prehistoric and later landscapes. Recent work into the upland archaeology in Ireland has shown that there is larger survival of prehistoric remains than previously believed, this was ascertained through the use of radiocarbon dating of samples. It has been suggested that the reason for this survival is due to the difficulties in accessing plateaus by machinery during the Post-Medieval period ensuring that there is less recent disturbance from agricultural processes (Gardiner, Magarry and Plunkett, 2019).

22.8 Finally, the lidar and field walkover survey identified seven boundaries within the Proposed Development Footprint which appear to correlate to boundaries recorded as early as the 2nd Century OS mapping. While their historic nature cannot yet be confirmed due to the presence of post and wire fencing, it is likely these are Post-Medieval in nature and would be of low importance (receptor A8). The majority of the identified features consist of field systems and hut circles which form part of an expansive archaeological landscape extending beyond the red line boundary for the Proposed Development Footprint.

22.9 Based on the evidence provided by the Lidar and field walkover surveys the Proposed Development Footprint has a known potential to contain remnants of agricultural activity from the Post-Medieval period (including NISMR ANT 029:105 and ANT 025:022). These surveys also identified evidence of prehistoric remains associated with settlement activity (including NISMR ANT 029:103 and ANT 029:109). It has found that the Proposed Development Footprint has a low potential for the presence of buried remains of archaeological interest from other periods.

22.10 There is still no evidence for well-preserved prehistoric remains of high significance within the Proposed Development Footprint, such as cairn or tomb. As such it is considered that the remains identified in the surveys within the Proposed Development Footprint are of low importance as defined in Table 5.1, meaning remains which make a meaningful contribution to local research objectives.

22.11 A further lidar survey was undertaken for research purposes which overlaps the lidar survey and field walkover undertaken within the Proposed Development Footprint. This lidar assessment undertaken by Wessex has produced similar results that the one undertaken as part of the Proposed Development, identifying structural remains, stone enclosures, field systems, linear banks and ditches and historic cultivation (Russell, 2024). This further supports the potential of the Footprint of the Proposed Development to contain archaeological remains associated with the Prehistoric and Post-Medieval periods.

22.12 The industrial heritage asset IHR06692 (Mill Dam, receptor IHR1) and IHR06694 (Ironstone Levels, receptor IHR2) were also visited as part of the field walkover survey. The location of the mill dam 20m outside the Application Site was still evident during the survey but it is now overgrown with grass and no structural features of it can be identified. In relation to IHR06694 this is recorded as being located within the eastern most area of the Application Site, during the field walkover survey there was nothing to indicate the location of this feature. An exposed section face has been shored up using dry stone walling with the remainer being overgrown with gorse. Although these industrial heritage assets, very little evidence of these assets remains on the ground with IHR2 unable to be identified therefore these features are of low importance as defined in Table 5.1.

Ballymena Cable Route

22.13 The Ballymena cable route passes over four bridges which are noted as industrial heritage:

- Knockan Bridge (IHR 06807:000:00, receptor IHR3)
- Tullymore Bridge (IHR 06810:000:00, receptor IHR4)
- Priests Bridge (IHR 06787:000:00, receptor IHR5)
- Fork Bridge (IHR 06713:000:00, receptor IHR6)
- Bridge From Bridge St to Henry St across River Braid (IHR 06760:000:00, receptor IHR7)
- Ballymena - Retreat Narrow Gauge Railway Bridge (IHR06516:034:00, receptor IHR8)

22.14 The above bridges are recorded as industrial heritage assets that would contribute to local research aims and objectives, therefore these are of a low importance as defined in Table 5.1.

22.15 It also intersects with the location of a defence heritage asset of a WWII roadblock (DHR: 00413:000, Receptor DHR1); This would have originally been a concrete block to block access with steel beams inserted into the recesses in the concrete in order to close the road. Today only the block on the southern side of the road remains and no associated remains are known to be present across the road. Although this is a recorded defence heritage asset the poor preservation of the site means that this is of low importance as defined in Table 5.1.

22.16 There is also a general potential for the presence of other, as yet unknown remains along the cable route (receptor A15), however any remains will have been either damaged or removed by the construction of the roads, so would be fragmentary and of limited interest.

23. ANT 032:022 Drumfane Motte

23.1 The Ballymena cable route passes immediately to the south of the scheduled remains of Drumfane Motte (HED ref ANT 032:022, receptor SM5). The motte has the following description in the NIHER:

> *Described in PSAMNI as, "456 ft in circumference at base, rising to 28ft in height; flat top 54ft by 39ft; trench 10ft to 12ft deep. The bailey was originally rectangular, measuring 180ft by 170ft along the sides at the base. A wide trench separates the mote from the bailey; the latter has recently been much destroyed through the carting away of soil for top-dressing by a neighbouring farmer". An archaeological evaluation was carried out on a development site to the E of Drumfane Motte, in an area which may originally have been inside the bailey. However, no features or artefacts of archaeological significance were found during the monitoring of topsoil removal from the site [NAC, 2010].*

23.2 The Drumfane Motte is of high significance, as is evidenced by its designation (see Table 5.1). It has high archaeological interest, and the monument will contain considerable associated artefactual and environmental evidence of high research value, the archaeological remains of interest are focussed on the earthworks further to the north, and earlier investigations have not found evidence that remains of high significance extend beyond the scheduled area.

23.3 The moat is discernible in the local landscape; however it is now best appreciated from the immediate vicinity, due to the presence of trees and hedges along the northern edge of Ballygarvey Road. The setting of the Motte comprises the experience provided by the immediately surrounding area, in particular by views from the farm track immediately to the east, in which the archaeological interest of the motte can be readily appreciated.

Kells Cable Route

23.4 The Kells Cable route passes through the site of a former Flaxmill and Cornmill in Buckna. A number of features are recorded by the NIHER:

- Site of Flax mill (IHR 6800:000:00, receptor IHR9)
- Flax mill (IHR 6800:004:00, receptor IHR10)
- Corn mill (IHR 6800:001:00, receptor IHR11)

23.5 The buildings are known from historic mapping, and seem to have been demolished in the 20th century, although some below ground remains may still survive. The road layout in the vicinity of the buildings is still reflective of that present when they were still in place, and so it is unlikely that the remains of these buildings will be located within the cable route. Therefore, while there is some potential for the presence of associated peripheral remains, such as field boundaries and other evidence of agricultural management associated with the flax and corn mills, there is a low potential for the presence of any other remains of interest. These remains would comprise low level of importance as defined in Table 5.1.

23.6 The Kells route also passes over four bridges which are noted as industrial heritage assets:

- Buckna Bridge (IHR 6799:000:00, receptor IHR12)
- Bridge (IHR 06921:000:00, receptor IHR13)
- Bridge (IHR 06924:000:00, receptor IHR14)
- Moorlands Station and Bridge (IHR 06780:014:00, receptor IHR15)

23.7 The above bridges are recorded as industrial heritage assets that would contribute to local research aims and objectives, therefore these are of a low importance as defined in Table 5.1. There is also a general potential for the presence of other, as yet unknown remains along the route (receptor A15), however any remains will have been either damaged or removed by the construction of the roads, so would be fragmentary and of limited interest

Summary of Cultural Heritage Receptors

23.8 A table summarising the cultural heritage resources for the Proposed Development Footprint and their significance is provided below and seen on Figures 5.1 and 5.2.

Table 5.5: Summary of Identified Receptors and their Significance/Sensitivity within the Proposed Development Footprint

Ref.	NIEA/LPA reference if applicable	Description	Assessment of significance/ sensitivity
SM1	ANT 029:004	Doonan Fort scheduled monument	High
SM2	ANT 029:031	The Stone House scheduled monument	High
SM3	ANT 029:092	Court Tomb scheduled monument	High
SM4	ANT 029:039	Wedge Tomb scheduled monument	High
A1	ANT 029:003	Recorded non-designated archaeological heritage assets 500m north of Application Site	Low
A2	ANT 029:089	Recorded non-designated archaeological heritage assets 380m north of the Application Site	Low
A3	ANT 025:022	Recorded non-designated archaeological heritage assets within northern part of the Application Site	Low
A4	ANT 029:103	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low
A5	ANT 029:105	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low
A6	ANT 029:106	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low
A7	ANT 029:109	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low
A8	-	Townland Boundaries including dry walling and post and wire fencing	Low
A9	-	Field Systems identified during Lidar and Field walkover	Low
A10	-	Possible structures identified during Lidar and Field walkover	Low
A11	-	Enclosures identified during Lidar and Field walkover	Low
A12	-	Lazy beds identified during Lidar and Field walkover	Low
A13	-	Low earth and stone Banks identified during Lidar and Field walkover	Low

Table 5.5: Summary of Identified Receptors and their Significance/Sensitivity within the Proposed Development Footprint

Ref.	NIEA/LPA reference if applicable	Description	Assessment of significance/ sensitivity
A14	-	As yet undiscovered buried archaeological remains within Application Site.	Low
IHR1	IHR06692	Designated Industrial Heritage Asset of a Mill Dam	Low
IHR2	IHR06694	Designated Industrial Heritage Asset of an Ironstone Levels	Low

23.9 A table summarising the cultural heritage resources for the cables routes and their significance is provided below and seen on Figures 5.3 to 5.6.

Table 5.6: Summary of Identified Receptors and their Significance/Sensitivity along the cable routes

Ref.	NIEA/LPA reference if applicable	Description	Assessment of significance/ sensitivity
SM5	ANT 029:004	Doonan Fort scheduled monument	High
DHR1	DHR00413	Low earth and stone Banks identified during Lidar and Field walkover	Low
IHR3	IHR06807	Designated Industrial Heritage Asset Knocken Bridge	Low
IHR4	IHR06810	Designated Industrial Heritage Asset of Tullymore Bridge	Low
IHR5	IHR06787	Designated Industrial Heritage Asset of Priests Bridge	Low
IHR6	IHR06713	Designated Industrial Heritage Asset of Fork Bridge	Low
IHR7	IHR06760	Designated Industrial Heritage Asset of a bridge from Bridge St to Henry St across River Braid	Low
IHR8	IHR06516:034	Designated Industrial Heritage Asset of Ballymena - Retreat Narrow Gauge Railway Bridge	Low
IHR9	IHR6800	Designated Industrial Heritage Asset of the site of a flax mill	Low
IHR10	IHR6800:004	Designated Industrial Heritage Asset of a flax mill	Low
IHR11	IHR6800:001	Designated Industrial Heritage Asset of a corn mill	Low
IHR12	IHR6799	Designated Industrial Heritage Asset of Buckna Bridge	Low
IHR13	IHR06921	Designated Industrial Heritage Asset of a Bridge	Low
IHR14	IHR06924	Designated Industrial Heritage Asset of a bridge	Low

Table 5.6: Summary of Identified Receptors and their Significance/Sensitivity along the cable routes

Ref.	NIEA/LPA reference if applicable	Description	Assessment of significance/ sensitivity
IHR15	IHR06780:014	Designated Industrial Heritage Asset of Moorlands Station and Bridge	Low
A15	-	As yet undiscovered buried archaeological remains within Application Site.	Low

Assessment of Development Effects

Construction Phase Effects

24. Assessment of Direct Physical Effects to Buried Archaeological Remains

24.1 The Proposed Development comprises a wind farm, with up to 9 turbines measuring to a maximum of 180m in height, to be placed across the Application Site, together with a BESS and associated access an infrastructure. These turbines will be set on foundations, and will be accessed using a modest track, which will make use of existing routes where possible. There will also be additional construction phase impacts during the erection of the turbines, to stabilise them, and transport the turbine parts to the Application Site and put them into place, any compound which is constructed. The development would be sparsely distributed throughout the Application Site with the northwestern area completely removed , with a low below ground impact relative to the area. Full details of the Proposed Development are provided under a separate cover in ES Volume 2, Chapter 1. There will also be a cable route leading from the turbines to connect them to the grid. The cable route trench would make use of existing road routes (See ES Vol 2 Appendix 2.1).

24.2 These activities have the potential to result in the localised removal of any archaeological remains which may be present where any impact is planned.

Proposed Development

24.3 The Proposed Development's impacts where possible have been designed to avoid buried archaeological heritage assets, this included the removal of the northwestern area from the Proposed Development Footprint, the relocation of the BESS within the Application Site to an area which does not intersect with remains identified in the NISMR and confirmed during the field walkover. The Proposed Development also removed Turbine 9 which was located on top of a field system identified in the south of the Application Site during the field walkover survey. The majority of the remaining Proposed Turbine bases avoid identifiable archaeological features, with the exception of Turbine 1. The base of Turbine 1 intersects with field systems which were identified during the field walkover survey (A9). The access infrastructure does interact with some of the anomalies which are for the

most part still in use as existing field boundaries of either dry stone walling or post and wire fencing which likely date to the Post-Medieval and Modern periods (A8). However, in five locations the trackway does interact with potential earlier archaeological features. These comprise the following:

- A field system in the south (A9)
- ANT 029:105 (A5) and ANT 029:103 (A4), a rectangular stone structure (A10) and lazy bed (A12) in the center
- An enclosure (A11) and potential field system in the north (A9) and below ground remains associated with A3 if present.

24.4 The above receptors would be subject to localised impacts and would not result in the complete removal of the archaeological remains which would result in a **minor** degree of adverse effect; therefore this would result in a **slight significance** of effect (see Table 5.4). Given the potential for the presence of as yet undiscovered buried remains of local/low interest within the Application Site (receptor A4, A5, A8- A14 in Table 5.7), these impacts could result in a **minor** to a **slight significance** of effect, depending on the nature of the remains in question, and whether the localised impacts would result in a substantive loss of remains (see Table 5.4).

24.5 Although industrial heritage asset IHR06694 (IHR2) is located within the Application Site this does not intersect with any of the Proposed Development's impact. Industrial heritage asset IHR06692 (IHR1) is located outside of the Application Site and therefore would not be subject to physical impacts from the Proposed Development.

Ballymena Cable Route

24.6 The impact of the construction of the cable route would be highly localised, consisting of a single trench excavated through areas which have already been disturbed by previous development. As previously discussed any buried archaeological remains which may be present under the road would be fragmentary and of low significance.

24.7 Therefore, the impact to any buried remains under the existing road would be low, and would amount to no more than a minor adverse degree of effect. This would result in a **slight adverse** significance of effect in relation to these remains.

24.8 The cable trench would be excavated into the modern road surface of the bridged noted above. If insufficient depth of such modern fill is available, then the route will proceed alongside the bridge, with directional drilling employed to run the cable under the watercourse. Therefore, the proposed development would not result in a loss of the historic fabric of the bridges, nor would it affect their form, function or historic interest. On this basis it is considered that the proposed development would have a **negligible** effect on these structures.

ANT 032:022 Drumfane Motte

24.9 While the scheduled area extends to just north of the Ballygarvey Road, which is where the cable route would run, the archaeological remains of interest are

focussed on the earthworks further to the north, and earlier investigations have not found evidence that remains of high significance extend beyond the scheduled area. Therefore, while there is some potential for the presence of associated peripheral remains, such as field boundaries and other evidence of agricultural management, but there is a low potential for the presence of any other remains of interest. Furthermore, as the Ballymena Cable route runs along the road, it is unlikely that well preserved archaeological remains will have survived due to the construction methods of the road. Therefore, these remains would be of low significance and it would be of a localised impact, no more than a slight adverse degree of effect. This would result in a **minor adverse** significance of effect in relation to these remains.

Kells Cable Route

24.10 The impact of the construction of the cable route would be highly localised, consisting of a single trench excavated through areas which have already been disturbed by previous development. As has been noted above, any buried archaeological remains which may be present under the road would be fragmentary and of low significance. Therefore, the impact to any buried remains under the existing road would be low, and would amount to no more than a minor adverse degree of effect. This would result in a **slight adverse** significance of effect in relation to these remains.

24.11 The cable trench would be excavated into the modern road surface of the bridged noted above. If insufficient depth of such modern fill is available, then the route will proceed alongside the bridge, with directional drilling employed to run the cable under the watercourse. Therefore, the Proposed Development would not result in a loss of the historic fabric of the bridges, nor would it affect their form, function or historic interest. On this basis it is considered that the Proposed Development would have a **negligible** effect on these structures.

25. Indirect Effects

25.1 The construction phase of the Proposed Development would be short lived, taking less than one year, and the effect of this on the setting of heritage assets in the wider area would be temporary. Furthermore, any effects in terms of the prominence and visibility of the turbines would be less than is the case during the operational phase. As such, the indirect construction phase effects of the Proposed Development do not need detailed assessment, and are adequately covered by the assessment of operation phase effects below.

Operational Phase

26. Assessment of Indirect Effects due to Changes to Setting of Heritage Assets

26.1 The effects of the Proposed Development on the setting of the heritage assets in the wider area are based upon the results of the previous reports, site visits and

walkovers, the Heritage Viewpoints (HVP) which were provided in Vol 4 Appendix 5.2 and the new HVPs which were requested by HED in their consultation (Appendix 5.5). These HVPs are all to scale in order to properly assess potential impacts on the heritage assets from the Proposed Development. Potential effects are discussed in relation to each asset below.

ANT 029:003 – Standing Stone undesignated heritage asset

26.2 Due to the panoramic views from the undesignated heritage asset, the wind turbines will be visible from the heritage asset. Although these would be present within the panoramic views from the monument, views of the surrounding landscape would still be possible, and the setting of the asset would still remain predominantly rural in nature, and would not affect the integrity of its setting. On this basis the overall assessment of the degree of effect of the Proposed Development (Table 5.2) is considered to be **slight adverse**, with a **neutral adverse** significance of effect (Table 5.4), due to the change in the setting of the asset.

26.3 This is not considered to be a significant effect.

ANT 029:089 – Field System undesignated heritage asset

26.4 The field system is recorded as having views towards the south from the monument, within these views Turbines 10 and 11 would be visible in the southwest. However, these would not block views towards the south would still be possible and this does not represent a key view that contributes to the significance of the heritage asset. It is therefore considered that the Proposed Development does not affect the integrity of the setting of the field system. On this basis the overall assessment of the degree of effect of the Proposed Development (Table 5.2) is considered to be **slight adverse**, with a **neutral adverse** significance of effect (Table 5.4), due to the change in the setting of the asset.

26.5 This is not considered to be a significant effect.

ANT 029:004 – Doonan Fort scheduled monument

26.6 The new HVP has highlighted that from the scheduled monument turbines 1,3-6, the nacelle of turbines 8 and 14 and the blade of turbine 10 and 11 would be visible, however these views are distant from the immediate setting of the fort (see Doonan Fort wireframe of reduced scheme in Appendix 5.5). The position of the turbines was also amended to be set further back from the setting of the fort during the design stage in order to protect its setting.

26.7 The blade tips of 2 to 5 of the turbines may be visible in the distant backdrop in views from the layby with the information board, however these would be partially screened by intervening vegetation, and would not meaningfully affect appreciation of the fort's significance (see HVP 1).

26.8 The entrance to the Proposed Development would be located off the Carnlough Road (A42), 265m north of the monument. However, the entrance would also include substantive new planting, in an area which already has a number of trees.

As such, this would not materially change the character of the lane. Therefore, the Proposed Development would not affect any of the key elements of the significance of the monument, and would only have a slight effect on the setting, which would not meaningfully affect appreciation of the fort's significance and archaeological interest nor affect the integrity of its setting. On this basis the overall assessment of the degree of effect of the Proposed Development (Table 5.2) is considered to be **slight adverse**, with a **minor adverse** significance of effect (Table 5.4), due to the high significance of the monument.

26.9 This is not considered to be a significant effect.

ANT 029:031 – The Stone House scheduled monument

26.10 The new viewpoint from the scheduled monument has shown that Turbines 10 and 11 and the blade of turbine 8 would be visible in the distance from the tomb (See Ticloy Tomb Wireline of reduced scheme in Appendix 5.5). Turbines 10 and 11 are the same turbines which were shown as being visible in HVP3 from the public footpath west of the scheduled monument. The Proposed Development would therefore change the setting of the tomb, but it would not affect the view towards the tomb's entrance, nor affect appreciation of its archaeological and architectural interest. Intervening vegetation in the vicinity would also provide partial screening. Therefore, while the turbines may be noticeable in the wider area, they would not affect how the setting contributes to the significance of the tomb nor affect the integrity of its setting.

26.11 Therefore, the Proposed Development would not affect any of the key elements of the significance of the tomb, and would only have a slight effect on its setting, which would not meaningfully affect appreciation of the tomb's significance or archaeological interest. On this basis the overall assessment of the degree of effect of the Proposed Development (Table 5.2 of this Chapter) is considered to be **slight adverse**, with a **minor adverse** significance of effect (Table 5.4 of this chapter), due to the high significance of the monument.

26.12 This is not considered to be a significant effect.

ANT 029:092 – Court Tomb scheduled monument

26.13 The new HVP confirms that the proposed wind turbines would be visible in the wider area, and so would change the setting of the tomb (See Antynanum Court Tomb Wireline of reduced scheme in Appendix 5.5). However, the turbines would not interfere with the view toward the entrance of the tomb, which faces away from the Application Site, nor would it affect appreciation of the archaeological and architectural interest provided by its immediate setting. Therefore, while the turbines may be noticeable in the wider area, they would not affect how the setting of the tomb contributes to its significance nor affect the integrity of its setting.

26.14 Therefore, the Proposed Development would not affect any of the key elements of the significance of the tomb, and would only have a slight effect on its setting, which would not meaningfully affect appreciation of the tomb's significance or

archaeological interest. On this basis the overall assessment of the degree of effect of the Proposed Development (Table 5.2) is considered to be **slight adverse**, with a **minor adverse** significance of effect (Table 5.4), due to the high significance of the monument.

26.15 This is not considered to be a significant effect.

ANT 029:039 – Wedge Tomb scheduled monument

26.16 The new HVP confirmed that the proposed wind turbines would be visible in the wider area, and so would change the setting of the tomb as originally concluded (see Tamybuck Wedge Tomb wireframe of reduced scheme in Appendix 5.5). However, the turbines would not interfere with the view toward the entrance of the tomb, which faces away from the Application Site, nor would it affect appreciation of the archaeological and architectural interest provided by its immediate setting. Therefore, while the turbines may be noticeable in the wider area, they would not affect how the setting of the tomb contributes to its significance nor affect the integrity of its setting.

26.17 Therefore, the Proposed Development would not affect any of the key elements of the significance of the tomb, and would only have a slight effect on its setting, which would not meaningfully affect appreciation of the tomb's significance or archaeological interest. On this basis the overall assessment of the degree of effect of the Proposed Development (Table 5.2) is considered to be **slight adverse**, with a **minor adverse** significance of effect (Table 5.4), due to the high significance of the monument.

26.18 This is not considered to be a significant effect.

Cable Routes

26.19 As the grid connection consists of entirely below ground elements, there is no potential for operational impacts on cultural heritage assets, as any physical effects would have already been completed, and no indirect visual effects would be noticeable.

Summary of Effects

The effects of the Proposed Development on the cultural heritage baseline for the Proposed Development Footprint, as assessed above, are summarised in Table 5.7, below.

Table 5.7: Summary of effects of Proposed Development on Cultural Heritage Receptors within the Proposed Development Footprint

Ref.	NIEA/LPA reference if applicable	Description	Level of Importance (Table 5.1)	Degree of Effect (Table 5.2)	Significance of Effect (Table 5.4)
SM1	ANT 029:004	Doonan Fort scheduled monument	High	Slight Adverse	Minor Adverse

Ref.	NIEA/LPA reference if applicable	Description	Level of Importance (Table 5.1)	Degree of Effect (Table 5.2)	Significance of Effect (Table 5.4)
SM2	ANT 029:031	The Stone House scheduled monument	High	Slight Adverse	Minor Adverse
SM3	ANT 029:092	Court Tomb scheduled monument	High	Slight Adverse	Minor Adverse
SM4	ANT 029:039	Wedge Tomb scheduled monument	High	Slight Adverse	Minor Adverse
A1	ANT 029:003	Recorded non-designated archaeological heritage assets 500m north of Application Site	Low	Slight adverse	Neutral
A2	ANT 029:089	Recorded non-designated archaeological heritage assets 380m north of the Application Site	Low	Slight adverse	Neutral
A3	ANT 025:022	Recorded non-designated archaeological heritage assets within northern part of the Application Site	Low	Minor adverse	Slight Adverse
A4	ANT 029:103	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low	Minor adverse	Slight Adverse
A5	ANT 029:105	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low	Minor adverse	Slight Adverse
A6	ANT 029:106	Recorded non-designated archaeological heritage asset	Low	Negligible	Neutral

Ref.	NIEA/LPA reference if applicable	Description	Level of Importance (Table 5.1)	Degree of Effect (Table 5.2)	Significance of Effect (Table 5.4)
		within the centre of Application Site			
A7	ANT 029:109	Recorded non-designated archaeological heritage asset within the centre of Application Site	Low	Negligible	Neutral
A8	-	Townland Boundaries including dry walling and post and wire fencing	Low	Minor adverse	Slight Adverse
A9	-	Field Systems identified during Lidar and Field walkover	Low	Minor adverse	Slight Adverse
A10	-	Possible structures identified during Lidar and Field walkover	Low	Minor adverse	Slight Adverse
A11	-	Enclosures identified during Lidar and Field walkover	Low	Minor adverse	Slight Adverse
A12	-	Lazy beds identified during Lidar and Field walkover	Low	Minor adverse	Slight Adverse
A13	-	Low earth and stone Banks	Low	Negligible	Neutral
A14	-	As yet undiscovered buried archaeological remains within Application Site.	Low	Minor adverse	Slight Adverse
IHR1	IHR06692	Designated Industrial Heritage Asset of a Mill Dam	Low	No Impact	Neutral

Ref.	NIEA/LPA reference if applicable	Description	Level of Importance (Table 5.1)	Degree of Effect (Table 5.2)	Significance of Effect (Table 5.4)
IHR2	IHR06694	Designated Industrial Heritage Asset of an Ironstone Levels	Low	No Impact	Neutral

26.20 The effects of the Proposed Development on the cultural heritage baseline for the cable routes, as assessed above, are summarised in Table 5.8, below.

Table 5.8: Summary of effects of Proposed Development on Cultural Heritage Receptors along cable routes

Ref.	NIEA/LPA reference if applicable	Description	Level of Importance (Table 5.1)	Degree of Effect (Table 5.2)	Significance of Effect (Table 5.4)
SM5	ANT 029:004	Doonan Fort scheduled monument	High	Slight Adverse	Minor Adverse
DHR1	DHR00413	Low earth and stone Banks identified during Lidar and Field walkover	Low	Negligible	Neutral
IHR3	IHR06807	Designated Industrial Heritage Asset Knocken Bridge	Low	Negligible	Neutral
IHR4	IHR06810	Designated Industrial Heritage Asset of Tullymore Bridge	Low	Negligible	Neutral
IHR5	IHR06787	Designated Industrial Heritage Asset of Priests Bridge	Low	Negligible	Neutral
IHR6	IHR06713	Designated Industrial Heritage Asset of Fork Bridge	Low	Negligible	Neutral
IHR7	IHR06760	Designated Industrial Heritage Asset of a bridge from Bridge St to Henry St across River Braid	Low	Negligible	Neutral

Table 5.8: Summary of effects of Proposed Development on Cultural Heritage Receptors along cable routes

Ref.	NIEA/LPA reference if applicable	Description	Level of Importance (Table 5.1)	Degree of Effect (Table 5.2)	Significance of Effect (Table 5.4)
IHR8	IHR06516:034	Designated Industrial Heritage Asset of Ballymena - Retreat Narrow Gauge Railway Bridge	Low	Negligible	Neutral
IHR9	IHR6800	Designated Industrial Heritage Asset of the site of a flax mill	Low	Negligible	Neutral
IHR10	IHR6800:004	Designated Industrial Heritage Asset of a flax mill	Low	Negligible	Neutral
IHR11	IHR6800:001	Designated Industrial Heritage Asset of a corn mill	Low	Negligible	Neutral
IHR12	IHR6799	Designated Industrial Heritage Asset of Buckna Bridge	Low	Negligible	Neutral
IHR13	IHR06921	Designated Industrial Heritage Asset of a Bridge	Low	Negligible	Neutral
IHR14	IHR06924	Designated Industrial Heritage Asset of a bridge	Low	Negligible	Neutral
IHR15	IHR06780:014	Designated Industrial Heritage Asset of Moorlands Station and Bridge	Low	Negligible	Neutral
A15	-	As yet undiscovered buried archaeological remains within Application Site.	Low	Minor adverse	Slight adverse

Design Evolution and Mitigation Measures

Mitigation Responses to Direct Physical Effects

26.21 As has been noted above, the Proposed Development has been designed to avoid the majority of recorded archaeological heritage assets whose location is confirmed, and so no the majority of the known buried archaeological remains will not be impacted by the Proposed Development.

26.22 In some locations where the access infrastructure and Turbine 3 intersects with known archaeological remains and it is possible that additional, as yet unknown remains may be present within the planned areas of impact, which could be impacted (potential cultural heritage receptors A1 to A8). Depending on the extent of the impact and the nature of the buried remains the significance of this impact has the potential to be **minor** or **slight adverse** as it would be localised (Table 5.4).

26.23 With regard to the cable routes, the minor impacts resulting to any buried archaeological remains present under the roadway, or roadside along the cable route could be adequately compensated for by a programme of archaeological monitoring and recording during the excavation works along the route. This would allow the archaeological interest of the remains to be better understood, and could also contribute to understanding of other nearby archaeological remains of interest, such as the Drumfane motte. The archaeological monitoring works would be focussed on key areas of interest, such as the Drumfane motte, and the detailed scope of the works should be set out in a written scheme of investigation, the contents of which should be agree with the HED.

26.24 With the benefit of the mitigation measures outlined, the significance of effect to any buried archaeological remains which may be present within the cable routes would be reduced to **neutral**.

26.25 Such a programme of archaeological works could be secured as a condition to planning consent and implemented ahead of development.

Mitigation Measures in Response to Indirect Effects

26.26 Given the scale of the proposed turbines, there is little scope for additional mitigation beyond the embedded mitigation undertaken by the design process, which sought to minimise the visibility of the turbines as much as possible, while also seeking to ensure the scheme remains viable.

Residual Impacts

26.27 The mitigation measures set out above would serve to reduce the significance of effect which would result from direct physical impacts of the proposed development.

26.28 The residual effects of the Proposed Development within the Proposed Development Footprint are set out in Table 5.9, below.

Table 5.9: Summary of effects of Proposed Development on Cultural Heritage Receptors with the Proposed Development Footprint					
Ref.	**Level of Importance (Table 5.1)**	**Degree of Effect (Table 5.2)**	**Significance of Effect (Table 5.4)**	**Mitigation measures**	**Residual Significance of Effect**
SM1	High	Slight Adverse	Minor Adverse	None possible	Minor Adverse
SM2	High	Slight Adverse	Minor Adverse	None possible	Minor Adverse
SM3	High	Slight Adverse	Minor Adverse	None possible	Minor Adverse
SM4	High	Slight Adverse	Minor Adverse	None possible	Minor Adverse
A1	Low	Slight adverse	Neutral	None Possible	Neutral
A2	Low	Slight adverse	Neutral	None Possible	Neutral
A3	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A4	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A5	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A6	Low	Negligible	Neutral	None required not impacted	Neutral
A7	Low	Negligible	Neutral	None required not impacted	Neutral
A8	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A9	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A10	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A11	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A12	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Neutral
A13	Low	Negligible	Neutral	None required not impacted	Neutral
A14	Low	Minor adverse	Slight Adverse	Programme of archaeological works	Slight Adverse

Table 5.9: Summary of effects of Proposed Development on Cultural Heritage Receptors with the Proposed Development Footprint					
Ref.	**Level of Importance (Table 5.1)**	**Degree of Effect (Table 5.2)**	**Significance of Effect (Table 5.4)**	**Mitigation measures**	**Residual Significance of Effect**
IHR1	Low	No Impact	Neutral	None required not impacted	Neutral
IHR2	Low	No Impact	Neutral	None required not impacted	Neutral

26.29 The residual effects of the Proposed Development baseline for the cable routes are set out in Table 5.9, below.

Table 5.10: Summary of effects of Proposed Development on Cultural Heritage Receptors along cable routes					
Ref.	**Level of Importance (Table 5.1)**	**Degree of Effect (Table 5.2)**	**Significance of Effect (Table 5.4)**	**Mitigation measures**	**Residual Significance of Effect**
SM5	High	Slight Adverse	Minor Adverse	Programme of archaeological works	Slight Adverse
DHR1	Low	Negligible	Neutral	None required not impacted	Neutral
IHR3	Low	Negligible	Neutral	None required not impacted	Neutral
IHR4	Low	Negligible	Neutral	None required not impacted	Neutral
IHR5	Low	Negligible	Neutral	None required not impacted	Neutral
IHR6	Low	Negligible	Neutral	None required not impacted	Neutral
IHR7	Low	Negligible	Neutral	None required not impacted	Neutral
IHR8	Low	Negligible	Neutral	None required not impacted	Neutral
IHR9	Low	Negligible	Neutral	None required not impacted	Neutral
IHR10	Low	Negligible	Neutral	None required not impacted	Neutral
IHR11	Low	Negligible	Neutral	None required not impacted	Neutral
IHR12	Low	Negligible	Neutral	None required not impacted	Neutral
IHR13	Low	Negligible	Neutral	None required not impacted	Neutral
IHR14	Low	Negligible	Neutral	None required not impacted	Neutral
IHR15	Low	Negligible	Neutral	None required not impacted	Neutral

Table 5.10: Summary of effects of Proposed Development on Cultural Heritage Receptors along cable routes					
Ref.	**Level of Importance (Table 5.1)**	**Degree of Effect (Table 5.2)**	**Significance of Effect (Table 5.4)**	**Mitigation measures**	**Residual Significance of Effect**
A15	Low	Minor adverse	Slight adverse	Programme of archaeological works	Neutral

26.30 The mitigation measures set out in the tables above would serve to reduce the significance of effect which would result from direct physical impacts of the proposed development.

Cumulative Impacts

Baseline

26.31 This application has collated existing and proposed developments that could result in cumulative effects within a 30km radius from the Application Site. This comprises the Cumulative Baseline. This baseline has been used to assess whether there is potential for cumulative effects to result to the identified cultural heritage receptors as a result of the combined effects of the Proposed Development and one or more developments recorded in the Cumulative Baseline).

Direct Physical Impacts

26.32 There are no proposed developments which would result in any additional physical impacts to the identified or potential buried archaeological remains within the Application Site. As such, the Proposed Development would not result in any cumulative effects to buried archaeological remains.

Indirect Effects

26.33 The Cumulative Baseline was reviewed in relation to the heritage assets in the wider area which would be subject to indirect effects as a result of the Proposed Development, to determine whether any cumulative effects would result. The Heritage Viewpoints provided in Vol 4 Appendix 5.2, provide descriptions of other extant and potential developments together with a visualisation of the Proposed Development, for ease of reference. Potential effects are discussed in relation to each asset below.

27. ANT 029:003 – Standing Stone undesignated heritage asset

27.1 Based on the panoramic views available from the standing stone several of the cumulative schemes are likely to be visible. These will be distant views and the turbines would not be discernible as to affect the experience of the heritage asset within its immediate setting.

27.2 As such, the presence of these developments in the wider landscape would not change the assessment of the effect of the Proposed Development on the significance of the Field System which is provided in Table 5.9.

28. ANT 029:089 – Field System undesignated heritage asset

28.1 Based on the available viewpoints it is likely turbines at Elginny Hill and Rathsberry to the southwest and carnalbanagh to the south would be visible in the views to the south. However, in practice, these schemes are so distant that they would not be discernible as to affect the experience of the heritage asset within its immediate setting.

28.2 As such, the presence of these developments in the wider landscape would not change the assessment of the effect of the Proposed Development on the significance of the Field System which is provided in Table 5.9.

29. ANT 029:004 – Doonan Fort scheduled monument

29.1 The new viewpoint shows that no other wind turbines would be visible from the setting of the fort looking towards the Proposed Development, this was confirmed as no other wind farms were visible from the setting of the fort during the site visit to inform the CHBA (see Doonan Fort wireframe of reduced scheme in Appendix 5.5). Furthermore, no proposed, or consented schemes are planned to the north or northwest, in the more open views from the monument, which would potentially affect the setting of the fort, or the experience of the information boards located by the roadside.

29.2 As such, the assessment of the effect of the Proposed Development to this heritage asset provided in Table 5.9 would not be affected by cumulative effects.

30. ANT 029:031 – The Stone House scheduled monument

30.1 The new viewpoint produced confirms that a single turbine 1 and the blades of single turbines 2, 3 and 4 would be visible in the views from the stone house towards the Proposed Development (See Ticloy Tomb Wireline of reduced scheme in Appendix 5.5). However, these turbines are located within the wider landscape and would not change the assessment of the effect of the Proposed Development on the Proposed Development on the significance of the stone house which is provided in Table 5.9.

30.2 The viewpoint provided in HVP3 confirms that a single turbine and the proposed wind farm at Ballygilbert would be visible in views of the monument from the footpath to the east. It may also be possible to see the proposed Carnalbanagh scheme in the wider view to the south. However, in practice, the single turbines, and the scheme at Ballygilbert are so distant that they would not be discernible as to affect the experience of the monument in the view. Likewise, the proposed Carnalbanagh scheme is also distant, and would not affect views of the tomb's entrance, which are to the southwest across the Braid River Valley.

30.3 As such, the presence of these developments in the wider landscape would not change the assessment of the effect of the Proposed Development on the significance of the stone house which is provided in Table 5.9.

31. ANT 029:092 – Court Tomb scheduled monument

31.1 The new HVP showed that a single turbine and the some of the turbines at Elginny Hill and Rathsberry would be visible in the views from the wedge tomb towards the Proposed Development (See Antynanum Court Tomb Wireline of reduced scheme in Appendix 5.5). These turbines are located within the wider landscape and would not change the assessment of the effect of the Proposed Development on the Proposed Development on the significance of the stone house which is provided in Table 5.9.

31.2 The court tomb would be located approximately halfway between the Proposed Development, and the proposed turbine scheme being considered at Carnalbanagh, which would be located approximately 2.5km to the south of the monument. The proposed turbines at Carnalbanagh would not be located along the alignment of the tomb, which is orientated from ENE to WSW, with key views to the west towards the entrance. As such, the scheme at Carnalbanagh would be noticeable in the wider area around the monument, but would not materially affect its significance. As such, it is likely that this would have no more than a slight effect to the setting of the monument, and the two schemes together would not result in more than a slight effect to the setting, as they would not affect how the setting of the tomb contributes to its significance.

31.3 On this basis, it is considered that the assessment of the effect of the Proposed Development to this heritage asset provided in Table 5.9 would not be affected by cumulative effects.

32. ANT 029:039 – Wedge Tomb scheduled monument

32.1 The new viewpoint illustrates that the nacelle of a single turbine and some of the turbines at Elginny Hill and Rathsberry would be visible in the views from the wedge tomb towards the Proposed Development (see Tamybuck Wedge Tomb wireframe of reduced scheme in Appendix 5.5). These turbines are located within the wider landscape and would not change the assessment of the effect of the Proposed Development on the Proposed Development on the significance of the stone house which is provided in Table 5.9.

32.2 The wedge tomb would be located between the Proposed Development, and the proposed turbine scheme being considered at Carnalbanagh, which would be located approximately 1.8km to the SSE of the monument. The proposed turbines at Carnalbanagh would not be located along the alignment of the tomb, which is orientated from NE to SW, with key views to the southwest towards the entrance. As such, the scheme at Carnalbanagh would be noticeable in the wider area around the monument, but would not materially affect its significance. As such, it is likely that this would have no more than a slight effect to the setting of the monument,

and the two schemes together would not result in more than a slight effect to the setting, as they would not affect how the setting of the tomb contributes to its significance.

32.3 On this basis, it is considered that the assessment of the effect of the Proposed Development to this heritage asset provided in Table 5.9 would not be affected by cumulative effects.

Summary and Conclusions

Summary

32.4 This chapter has assessed the potential effects that the Proposed Development would have on the historic environment. It has considered potential direct physical impacts, indirect effects resulting from changes to the setting of heritage assets in the wider area, and the potential cumulative effects due to the presence of other extant or proposed developments.

33. Potential for Direct Physical Impacts

33.1 The potential for buried archaeological remains to be present within the Proposed Development Boundary was assessed by a review of the available evidence undertaken within the CHBA, Lidar survey and the field walkover confirmed that the Application Site is unlikely to contain the buried archaeological remains of well-preserved settlement activity from any period reviewed. However, the Application Site is known to contain Post-Medieval features and prehistoric features of low interest, with a possibility for further archaeological remains which have yet to be identified (receptors A3 - A14).

33.2 The Proposed Development has been designed in order to avoid impact on the majority of the identified archaeological remains. There is potential for localised impacts to result to receptors A4, A5, A8 - A12 and as yet unknown buried archaeological remains (A14), which could result in a minor effect. In response a programme of archaeological works is proposed, which would record any remains prior to construction, and would realise the research value of the remains. With the benefit of such a programme works, the significance of any effects to buried archaeological remains would be at most **slight adverse**.

33.3 In relation to the cable routes, the impact of the construction of the cable route would be highly localised, consisting of a single trench excavated through areas which have already been disturbed by previous development. Any buried archaeological remains which may be present under the road would be fragmentary and of low significance. Therefore, the impact to any buried remains under the existing road would be low, and would amount to no more than a minor adverse degree of effect. This would result in a **slight adverse** significance of effect in relation to these remains.

33.4 The cable trench would be excavated into the modern road surface of the bridged noted above. If insufficient depth of such modern fill is available, then the route will proceed alongside the bridge, with directional drilling employed to run the cable under the watercourse. Therefore, the Proposed Development would not result in a loss of the historic fabric of the bridges, nor would it affect their form, function or historic interest. On this basis it is considered that the Proposed Development would have a **negligible** effect on these structures.

33.5 With the benefit of the mitigation measures outlined, the significance of effect to any buried archaeological remains which may be present within the cable routes would be reduced to **slight adverse.**

34. Potential Indirect Effects due to Changes to the Setting of Heritage Assets

34.1 The assessment provided in this chapter was informed by a comprehensive assessment of the potential indirect impacts the Proposed Development could have on the significance of designated heritage assets in the wider area due to changes to their settings, which was provided by the CHBA provided in Appendix 5.1 and the ES chapter provided as appendix 5.2. Based on the comments from HED the following heritage assets were subject to further HVPs:

- ANT 029:004 – Doonan Fort scheduled monument
- ANT 029:031 – The Stone House scheduled monument
- ANT 029:092 – Court Tomb scheduled monument
- ANT 029:039 – Wedge Tomb scheduled monument

34.2 This process has found that in most cases, the degree of effect which would result from the Proposed Development would be no more than **slight adverse**, and in no instance would the Proposed Development result in a significance of effect higher than **minor adverse**. This is consistent with the conclusions of CHBA and the original ES chapter.

34.3 It was also requested that further analysis be undertaken on two undesignated heritage assets. These comprised

- ANT 029: 003 – Standing Stones
- ANT 029:089 Field systems

34.4 This assessment found that in both cases, the degree of effect which would result from the Proposed Development would be no more than **slight adverse**, and in no instance would the Proposed Development result in a significance of effect higher than **neutral**.

34.5 As the grid connection consists of entirely below ground elements, there is no potential for operational impacts on cultural heritage assets, as any physical effects would have already been completed, and no indirect visual effects would be noticeable.

34.6 In all cases, the effects are medium term and reversible, and in no instance would the Proposed Development directly affect a key aspect of the significance of any of these assets nor affect the integrity of their setting.

35. Cumulative Effects

35.1 The potential for cumulative effects has been considered for each of the heritage assets assessed by this chapter. The assessment of potential cumulative effects has been made with reference to the cumulative baseline consisting of a consideration of consented and operational schemes within 30km of the application site, together with information provided in the heritage viewpoints and LVIA.

35.2 The potential for cumulative effects was considered in detail, and it was found that the developments within the cumulative baseline are sufficiently far and well screened, that they would not affect the impact assessments within this chapter. As a result, it is concluded that the presence of the developments within the cumulative baseline would not result in a materially higher level of effect to the identified heritage assets than what would result from the Proposed Development on its own.

Conclusion

35.3 In conclusion, the potential effects of the Proposed Development on the setting of heritage assets have been minimised by the design of the proposed development, and any archaeological impacts could be mitigated by a programme of archaeological works secured via planning condition. It would therefore be possible to implement the Proposed Development in accordance with the requirements set out in policy RG11 of the Regional Development Strategy 2035, RE1 and HE1 Mid and East Antrim Borough Council's Local Development Plan 2030: Plan Strategy, and paragraph 6.223 of the SPPS.

References

General

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List of Figures and Appendices

Figures

Appendices

722000
724000
726000
728000
730000
916000
914000
912000
910000

T.1
T.3
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T.6
T.8
T.10
T.11
T.14

IHR1 - IHR06692
IHR2 - IHR06694
SM1 ANT029:004
SM2 ANT029:031
SM3 ANT029:092
SM4 ANT029:039

Legend

- Planning Application Boundary
- Turbines
- New Site Tracks
- Buildings
- Relevant Scheduled Monuments
- Relevant Industrial Heritage

0 1.5 km

Scale: 1:30,000 at A3

Project Number: PR0034 Date: 7 April 2026
Drawing Number: PR0034-5.1

Address:
Unshinagh Wind Farm

Title:

Figure 5.1: Designated Heritage Assets Considered

724000
726000
728000
916000
914000
912000

A7 ANT029:109
A6 ANT029:106
A4 ANT029:103
A5 ANT029:105
A1 ANT029:003
A2 ANT029:089

Legend

Planning Application Boundary
Turbines
New Site Tracks
Buildings
Relevant NISMR

Fieldwalking Features

A4 - Hut and Field System
A5 - Trackway
A6 - Fieldbank
A8 - Boundary
A9 - Field system
A10 - Possible Structure
A11 - Enclosure
A12 - Lazy Beds
A13 - Stone and earth bank

0 1 km

Scale: 1:20,000 at A3

Project Number: PR0034 Date: 7 April 2026
Drawing Number: PR0034-5.2

Address:
Unshinagh Wind Farm

Title:
Figure 5.2: Non-Designated Heritage Assets Considered

710000
715000
720000
725000
730000
915000
910000
905000
900000

IHR9 - IHR6800
DHR1 - DHR00413
IHR11 - IHR6800:001
IHR12 - IHR6799
IHR10 - IHR 6800:004
IHR14 - IHR06921
IHR13 - IHR06921

Ballymena

Legend

- Kells Cable Route
- Kells 500m search area
- Relevant Scheduled Monuments
- Relevant Historic Parks, Gardens and Demesnes
- Relevant Industrial Heritage
- Relevant Defence Heritage

Relevant Historic Buildings

- Grade B2

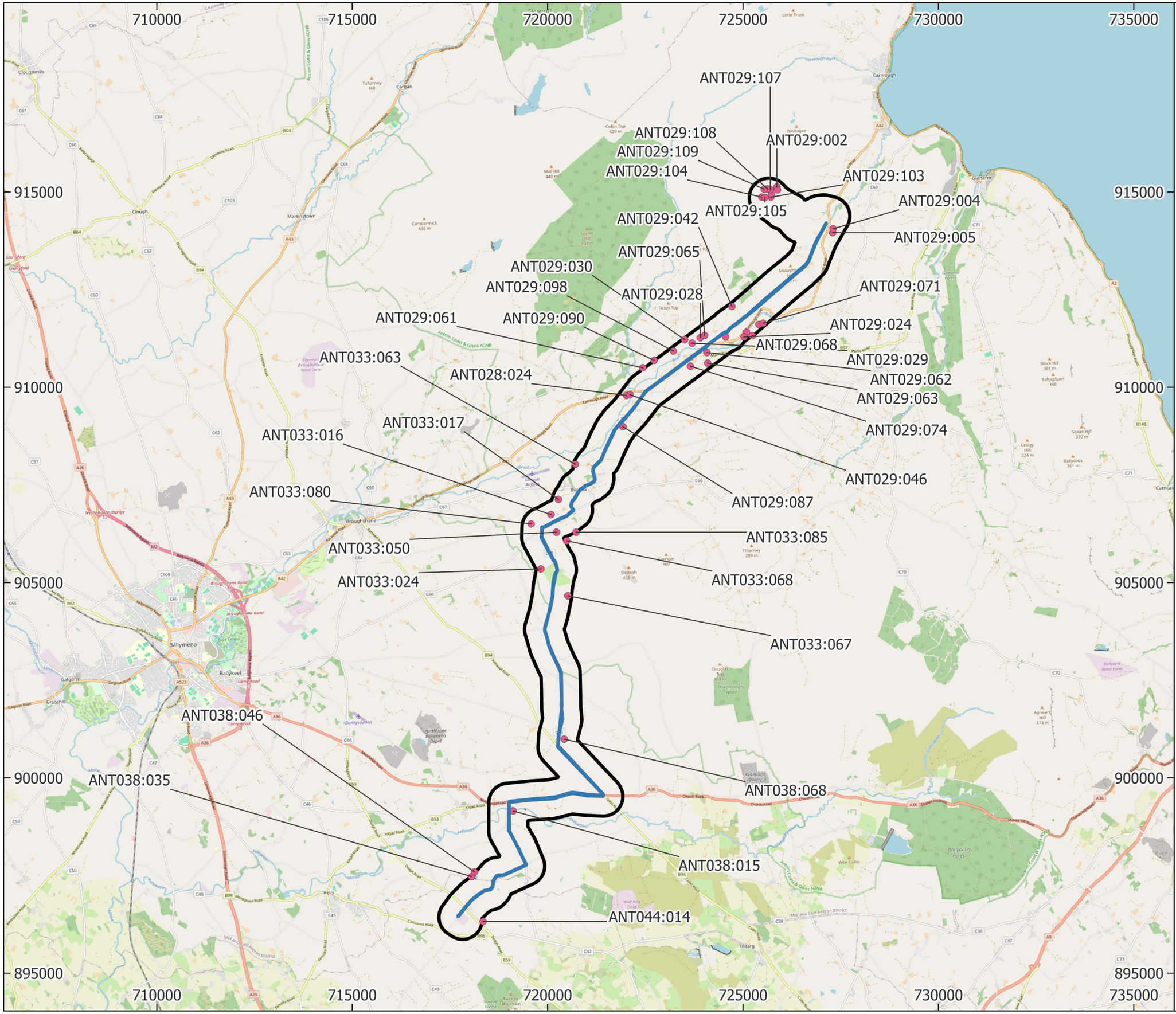
0 2 km

Scale: 1:75,000 at A3

Project Number: PR0034 Date: 7 April 2026
Drawing Number: PR0034-5.3

Address:
Unshinagh Wind Farm

Title:
Figure 5.3: Kells Cable Route Designated Heritage Assets



Legend

- Kells Cable Route
- 500m search area
- Non-Designated Heritage Assets

0 5 km

Scale: 1:90,000 at A3

Project Number: PR0034 Date: 7 April 2026
Drawing Number: PR0034-5.4

Address:
Unshinagh Wind Farm

Title:

Figure 5.4: Kells Cable Route
Non-Designated Heritage Assets

710000
715000
720000
725000
730000
915000
910000
905000
900000

IHR3 - IHR06807
IHR5 - IHR06787
IHR8 - IHR06516:034
DHR1 - DHR00413
SM5 - ANT029:004
IHR4 - IHR06810
IHR7 - IHR06760

Legend

- Ballymena Cable Route
- Ballymena 500m search area
- Relevant Scheduled Monuments
- Relevant Historic Parks, Gardens and Demesnes
- Relevant Industrial Heritage
- Relevant Defence Heritage

Relevant Historic Buildings

- Grade B
- Grade B+
- Grade B1
- Grade B2

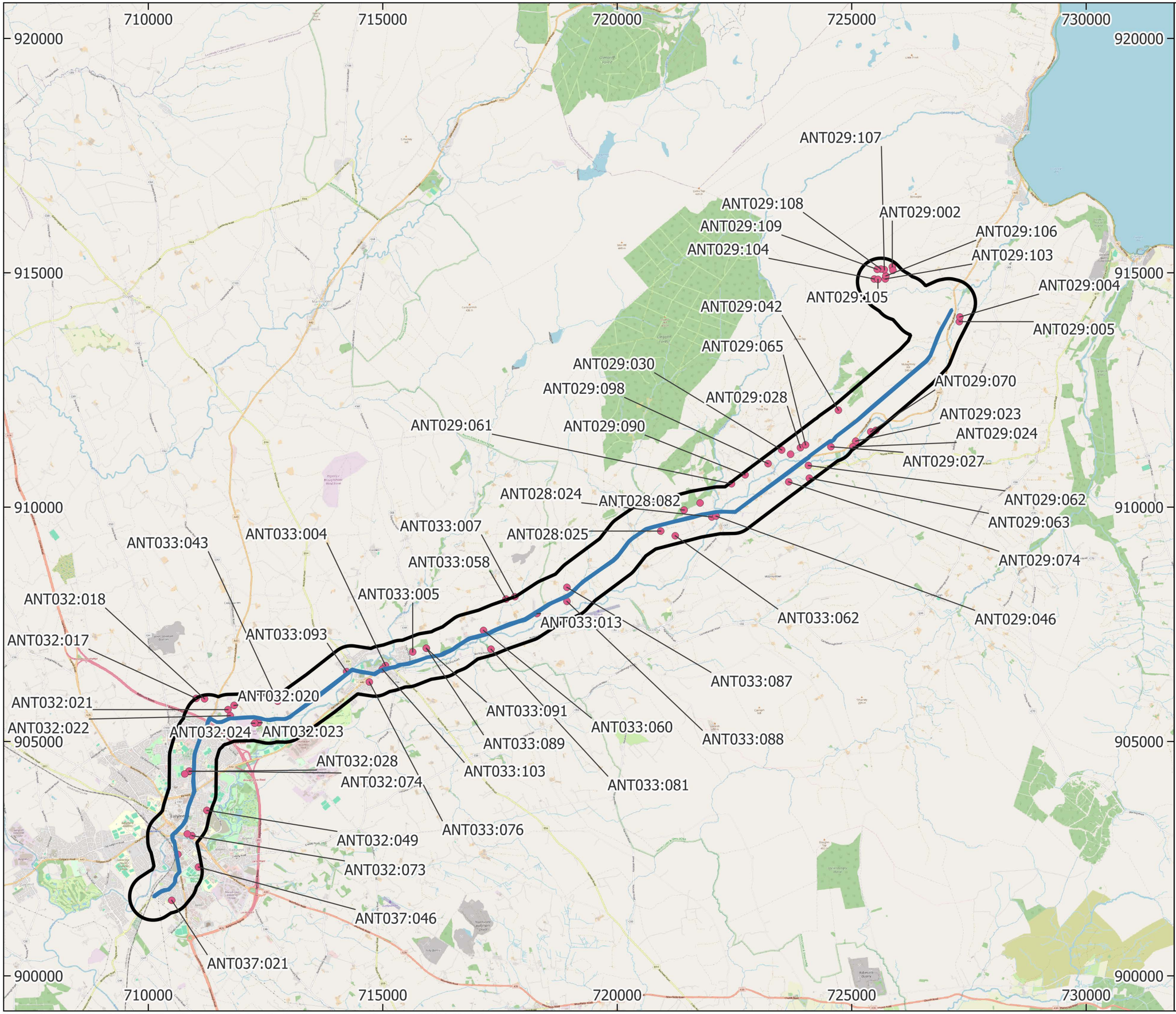
0 2 km

Scale: 1:75,000 at A3

Project Number: PR0034 Date: 7 April 2026
Drawing Number: PR0034-5.5

Address:
Unshinagh Wind Farm

Title:
Figure 5.5: Ballymena Cable Route Designated Heritage Assets



Legend

- Ballymena Cable Route
- 500m search area
- Non-Designated Heritage Assets

0 2 km

Scale: 1:75,000 at A3

Project Number: PR0034 Date: 7 April 2026
Drawing Number: PR0034-5.6

Address:
Unshinagh Wind Farm

Title:

Figure 5.6: Ballymena Cable Route
Non-Designated Heritage Assets

724000
726000
728000
730000
916000
914000
912000

Legend

Planning Application Boundary

0 1.5 km

Scale: 1:25,000 at A3

Project Number: PR0034 Date: 3 April. 2026
Drawing Number: PR0034-5.7

Address:
Unshinagh Wind Farm

Title:
Figure 5.7: Planning Application Boundary overlain on 1st Edition OSNI maps 1832