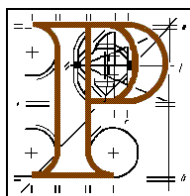


An Bord Pleanála



Inspector's Report

Reference: PL03.131382

P.A. Reference: P00/2417

Title: Windfarm comprising 2 wind turbine generators, ancillary equipment for generation of electricity and control building.

Location: Carrawnaweelaun, Kilkee, Co. Clare

Applicant: Banner Energy.

Appellants: Patrick & Richard Roche and others.
Marion & Hugh Sheehy and others

Observers: Anne McCarthy, Patsy McCarthy and Peter Duffy

Planning Authority: Clare County Council

Type of Appeal: Third parties against permission

Decision: Permission granted with conditions.

Date of Site Visit: 22nd July 2004

Inspector: Philip Davis

1. Introduction

This appeal is by a number of local landowners and residents against the decision of the planning authority to grant permission for a pair of wind turbines on a lowland site on the Loop Head peninsula in County Clare. The grounds of appeal relate mainly to landscape and amenity issues.

2. Site Description

Photographs of the site and environs are attached in Appendix 2 to this report.

Landscape and settlement

The appeal site is located on a low-lying site approximately half way along the extended Loop Head Peninsula in south-west County Clare. At this point the peninsula is approximately 4 km in width. The general topography rolls very gently, with a small number of prominent hills, most notably Knocknagarhoon, at 127 metres AOD. Most of the landscape is between 20 and 40 metres AOD. For much of its length, the central area of the peninsula is lower than both coasts, particularly the Atlantic side, which terminates abruptly in 30 metre cliffs.

The Peninsula is relatively sparsely populated, with a scattering of farmsteads and single houses along its road network. There are the remains of a few clachán type rural clusters, the closest to the site are Oldtown and Newtown, at Knocknagarhoon, 1.5-km north-west of the appeal site. The nearest settlements of any size are the coastal village of Carrigaholt, 3-km to the south, and the holiday town of Kilkee, 6-km to the north-east.

Highways

The R487 Regional Road runs through the centre of Loop Head, with the R486 forming a spur to Carrigaholt. Otherwise, a network of minor roads and tracks serves the area. The closest road to the appeal site is a straight relatively good quality third class road, the L-21140.

The site and environs

The appeal site is located at the base of a very shallow valley running north to south across the peninsula, approximately 1.5 km south of the coast. The site area is given on the appeal documentation as 7 hectares, but is indicated on site plans as a narrow strip of land essentially wide enough for an access track from a nearby third class road, and the proposed turbines. They are on an axis along the base of the shallow valley. The land is low-lying wet pasture, with a watercourse running to the north. It links to an adjoining third class road (L021140) to the west.

North of the site is low-lying land prone to flooding in a shallow valley that eventually drains into the Atlantic in a narrow inlet just over 1-km from the site. East of the inlet is a narrow ridge running parallel to the coast. The small

island of Illaunearaun lies off the coast here – this island is a Special Protection Area (SPA no.4114) for Barnacle Geese (an Annex I species). The L-21140 runs north and just before the sea inlet turns east, spitting in two, one road following the coast on scenic route, the other following the south side of the coastal ridge. There are a handful of isolated houses along this stretch, almost all on the southern side of the ridge.

East of the site are low-lying fields. The R487, located further east, follows the low-lying ground to Kilkee. A stream known as the Lisheen River drains the area, running approximately 600 metres from the appeal site.

South of the site is a farmhouse (where the control building will be located), and the R487. The land rises very gently south of here to the coast at Carrigaholt Bay, some 2-km distant.

West of the site is the access road (L-21140). The land rises beyond this road (the foothill of Knocknagarhoon), then drops to a low plain before reaching the coast, 5 km away.

North-west of the site is a distinct hill called Knocknagarhoon, with a high point of 127 metres. The peak is just over 1 km from the appeal site. Two small settlements, Oldtown and Newtown are marked, these are just a small scattering of dwellings, but were probably once substantial clacháns.

3. Proposal

The proposed development consists of two wind turbines with ancillary works, including an access track, hardstanding, electrical apparatus and a control room (the original submission was for four turbines, later reduced in two subsequent resubmissions). Hub height is up to 60 metres, with a blade diameter (three blades) of up to 70 metres, with a projected power output of approximately 3.5MW each.

A connection to the national grid is not included in the application.

4. Planning Context

Planning permissions – appeal site

There are no records on file of previous applications or appeals relating to the site. I note that there is an anemometer close to the appeal site but there is no record on file of when it was granted permission.

Planning permissions – general vicinity

None on file, but the Board has in the recent past granted a number of permissions for windfarms in the uplands of southern Clare (to the east of the appeal site), and on the Kerry side of the Shannon Estuary, in addition to one around Moneypoint Power Station, on the Clare side of the Shannon Estuary.

Development Plan

The site is in an unzoned area in the 1999 County Development Plan. It has no specific landscape designation in that plan. The site is not within an SAC, NHA or SPA (although there is an SPA offshore on the island of Illaunonnaraun).

The area is covered by the West Clare Local Area Plan adopted 2003. The area has no zoning or landscape designation in this plan, but the adjoining road is designated a scenic route. The upland ridge to the north is indicated as 'visually vulnerable coastline'. Policy SER17 on windfarms states that they will be permitted subject to a number of criteria. There is a general presumption against such developments in areas of landscape protection. Extracts from this LAP are attached to Appendix 1 of this report.

National policy is set out in the DoEHLG guidelines on Windfarms; the recently released new draft version of these guidelines; the National Development Plan 2000-2006; Sustainable Development: A Strategy for Ireland (1999); the Green Paper on Sustainable Energy (1999); and the National Climate Change Strategy 2000.

5. Decision

The planning authority decided to grant permission (for 2 turbines only) subject to 23 conditions. Most are standard conditions, with a limitation placed on dates for work to minimise the impact on wildlife.

6. Grounds of Appeal

Patrick & Catriona Roche, Mathew and Peggy Green of Newtown

- It is argued that the impact on the landscape would be unacceptable, especially in the context of development plan policies.
- It is submitted that the condition set by the planning authority of 45 dB(A) is excessive and will impact on local amenities.
- It is suggested that the archaeological information on file is inadequate.
- Concerns are expressed at the potential impact on bird life, in particular Barnacle Geese.
- It is argued that it will represent a traffic hazard, as it will distract drivers.
- Concerns are expressed at the impact of shadow flicker, and on local property values, and on tourism.
- It is also submitted that the local infrastructure is insufficient for the construction works

There are a number of attachments to this appeal.

Marion and Hugh Sheehy of Breffa, and others

- The grounds of appeal submitted are essentially the same as for the first appeal – i.e. visual amenity, residential amenity, archaeology, traffic hazard, and local infrastructure.

7. Applicants response

- It is submitted that a detailed analysis has been carried out of the visual impact of the proposed development and it is argued that the proposal is not excessive in its impact.
- It is argued that the predicted noise levels are well within the parameters accepted by the planning authority and the Board on other sites in Clare.
- It is argued that all archaeological issues have been covered fully in the EIS.
- Evidence is submitted in support of an argument that there would be no impact on birdlife, specifically barnacle geese.
- It is noted that the roads have been used for quarry traffic so is of sufficient quality for construction traffic. It is not accepted that turbines represent a traffic hazard.
- It is submitted that shadow flicker will not occur at any vulnerable dwellings, and in any event, a ‘shadow-stop’ device will be used.
- It is denied there will be any impact on property values.
- Figures are submitted to support an argument that the turbines would have no impact on tourism.
- In relation to infrastructure, it is noted that a 20Kv line would be required, and that these are exempt from planning permission.
- A number of additional points are made in relation to the EIS and submission. It is argued that there is significant support in the community for the proposed turbines.

8. Observers

Anne McCarthy, Patsy McCarthy and Peter Duffy of Ragoon, Galway.

- They write in support of the appeal of Marion and Hugh Sheehy.
- They also argue that the application is in breach of the EIS regulations.

9. Planning Authority’s Comments

The planning authority has stated that it has no further observations to make on the appeal.

10. Technical Reports and planning file correspondence

An EIS was submitted with the application. I shall assess this in the section below.

A letter on file from Michael McNamara (15th November 2000) confirms permission from the landowner for the application.

A letter from the Carrigaholt Development Association confirms their support for the proposed development (13th December 2000).

A letter from the Irish Aviation Authority requests that if permission is granted, the developer contact them to determine any aeronautical lighting required (28 December 2000).

A letter from the ESB dated 2nd January 2001 stated that they could not make comments at that time.

A planner's report on file set out a series of additional questions for the applicant relating to noise and archaeology (17th January 2001).

A detailed letter dated 21st February 2001 from the applicant submitted additional information and redesigned the proposed windfarm from four to three turbines (each up to 55 metres high).

A letter from Birdwatch Ireland dated 4th April 2001 outlined a number of concerns with regard to the possible impact on Barnacle Geese in addition to wintering Whooper Swan, Chough and Hen Harrier.

A further planning report made additional requests for information, including new planning notices and plans (19th April 2001)

The applicants responded on August 8th 2003 to the request for additional information and resubmitted the application. They reduced the number of turbines to two, but proposed an increase in the height and diameter of the turbines (now 60-metre hub height, rotor diameter of 70 metres, with approximately 3.5 MW output each). Additional information was also submitted on ecological, amenity and design matters.

An internal memo (15th August 2003) from the Council Heritage Officer outlined a number of concerns on the ecological impact of the turbines. It states that much of the information on Barnacle Geese in the area may be outdated.

A letter dated 2nd October 2003 from the DoEHLG recommended a study specifically relating to the use of the area by Barnacle Geese.

A hand-written fax from Birdlife International states that they have no data for Barnacle Goose or other species in the vicinity of the site (30th October 2003)

The final planner's report on file provides a detailed analysis of the proposed development. It is considered that it is consistent with the recently adopted Local Area Plan, and that it is not in a visually vulnerable location. It is considered that the separation distance from the proposed turbines to nearby dwellings is acceptable and in conformity with guidelines. It is not considered that shadow flicker would be a major issue. However, information on ecology was considered insufficient and additional information was requested.

A letter from the applicant dated 28th October 2003 argued in detail that there is no evidence that the site is used or overflowed by Barnacle Geese.

A letter from the DoEHLG dated 19th December 2003 comments on the response by the developer but requests an independent study.

Subsequent to a letter from the planning authority stating that they still have concerns about the ecological impact of the proposed turbines, the applicant submitted (7th January 2004) a number of affidavits from local residents stating that they have never observed Barnacle Geese in the area.

11. Assessment

Having inspected the site and reviewed the file documents, I consider that this appeal can be assessed under the following broad headings:

- Principle of development (including development plan policy, etc)
- Environmental Impact Statement
- Alternatives
- Visual impact
- Ecology
- Impacts on human beings
 - *Noise*
 - *Shadow flicker*
 - *Economic effects*
 - *Public safety*
- Local infrastructure
- Water, soils and geology
- Cultural heritage
- Air quality and climate
- Electromagnetic interference

Principle of development

National policy on renewable energy has arisen primarily in response to international agreements, most particularly the UN Framework Convention on Climate Change and the Kyoto Protocol. National planning policy is set out in the Governments Wind Farm guidelines, and the current revised draft guidelines on windfarms. Targets for renewable energy are set out in a variety

of government policies including the National Development Plan 2000-2006 and the National Climate Change Strategy 2000. The more recent draft national policy on windfarms generally takes a more favourable view on such developments than previous policy.

Local policy is outline in the Local Area Plan for West Clare. This policy sets out criteria rather than area based plans for wind power. The only significant 'negative' in policy terms for the proposed development is its proximity to a designated scenic route. This route mainly focuses on the very attractive coastal road to the north (from which it would not be visible). I will assess the visual aspects further below, but I consider that in terms of development plan policy there is no fundamental objection to the proposed development.

Environmental Impact Statement

An EIS was submitted with the original application. As the design has changed twice (each time, losing a turbine), the circumstances have changed, but, having regard to the significant amount of additional information submitted after the first application, I consider that the EIS is comprehensive and satisfies the Regulations. The appellants have raised the issue of the lack of an assessment of alternatives to the proposed development. This is a short, somewhat sparse section on alternatives in the original EIS. In most circumstances I would consider it to be inadequate. However, the issues surrounding wind farms are well known to the planning authority and the Board so I do not consider that there is anything to gain from requesting additional information on this matter from the applicant.

Alternatives

A preference for renewable energy is firmly set out in a variety of EU and government guidelines. Wind energy is generally considered the most suitable and 'mature' technology suitable for Irish circumstances. There have been many planning applications along the western coast of Ireland in recent years, and in general permissions granted have generally been given for sites in upland exposed areas that are not subject to specific landscape or wildlife designations. Within Clare, most permissions have been granted for either the southern upland areas (an area of low rounded hills, moorland and conifer plantation), and along the Shannon Estuary, most notably at the Moneypoint power plant. In general, having regard to past decisions of the Board and planning authority, I would consider such sites (i.e. relatively empty uplands or existing industrial sites) as being preferable to the relatively unspoilt area that is subject to this appeal. However, I do not consider that it is likely that there are many sites available in the immediate area that are unequivocally superior to that proposed.

Visual impact

The applicant has submitted a number of visualisations with the original application. These visualisations indicate the original and first revised layout – i.e. with 4 and 3 turbines, with a final set of revised visualisations indicating 2 turbines. The proposal under appeal is the final revised submission – for 2 turbines, albeit larger in scale. I note that the submitted dimensions – 60

metres hub height with 35 metres blades will result in what I would consider to be a more unbalanced, less elegant apparatus than those shown on the first visualisations.

In overall terms, the site is unusual for a wind power generating facility is that it is very low in the landscape. This section of Loop Head is highest along the Atlantic Coast, with a dip to the centre, rising a little higher at the Shannon Estuary coast. Hence, from most long distance views, the proposed turbines will be largely below the skyline. This has distinct visual advantages over upland sites where any turbines tend to break the skyline and so (arguably) become more intrusive. On the negative side, this area is largely free of large industrial style structures and has not been disturbed by afforestation or other features.

There are a number of key views of the site. The most prominent and obvious will be from the ridge and hill to the north, especially Knocknagarhoon to the north-west. There are several viewpoints from the minor road running up this hill giving outstanding views over this part of Loop Head. From here the pair of turbines will be a prominent feature on the landscape. They will not be the only turbines in view – there are distant views over the Shannon Estuary to a windfarm on the Kerry coast.

The most common view for locals and visitors will be from the main road, the R487 (for much of its length, a designated scenic route). This road runs along a fairly flat part of the landscape so there is little cover, apart from hedgerows. The two turbines would be very visible on the approach. The turbines would also be a very prominent feature on the landscape on the adjoining road, running north from the R487. Another very prominent view will be from the nearest of the minor roads that runs parallel to the coast, just over 1-km from the site. This road is also a designated scenic route. However, due to the general orientation of this road, and hedgerows, views will be somewhat intermittent.

It is highly subjective as to whether the two turbines can be considered intrusive in the landscape. The general area is of a high quality and largely unspoilt. I would not consider Loop Head to be a suitable area for large-scale wind power generation. However, an isolated pair of turbines in the centre (i.e., not in a visually vulnerable coastal location) would, while prominent, not in my opinion be highly damaging to the landscape. While it could be argued that sites further inland or along the Shannon Estuary would be more appropriate, this is probably one of the better sites in a visual sense for a modest sized windfarm. Having regard to the positive aspects of the proposal, not least the contribution of renewable energy to the national grid, I therefore conclude that on balance, the visual impact is acceptable.

Ecology

The site has moderate ecological interest, being unimproved wet grassland. The proposed development would result in relatively little loss of this habitat. The key issue is in the potential impact on protected bird species, most notably

Annex I species the Barnacle Goose. There is a question mark over whether it will disturb flight paths and/or, result in mortality from blade strikes.

There is a lack of definitive evidence on local bird behaviour. It is difficult to assess precisely the impact of such structures in the absence of firmer evidence on local bird behaviour and their likely response. However, the available evidence strongly suggests that barnacle geese are, at best, very infrequent visitors to this part of Loop Head. I consider that the likelihood is that the impact on this species and the nearby SPA would not be negligible.

Choughs and Hen Harriers are also discussed in the file documentation. It appears that this is not core habitat for either species, so any impact would probably be minimal.

The planning authority set a condition such that works would be limited in season to minimise any impact on wintering birds. As a precautionary matter I recommend that the Board repeat this if it is minded to grant permission.

Impacts on human beings

Noise

The area has a very quiet and pleasant rural ambience so any significant noise levels could have a serious impact on amenity. There is one dwelling between 4-500 metres and a significant number of other dwellings just over 500 metres from the proposed turbines. The topography is quite open so I would not anticipate any unusual effects on noise. In general, these are considered acceptable separation distances and the EIS predicts impacts less than 40 dBA on any dwellings (which seem to be reasonable predictions). The appellants object to a condition set by the planning authority that sets 45 dBA as a maximum limit. I concur that in the circumstances a limit of 40 dBA would be reasonable and achievable. I therefore recommend a condition to this end if the Board is minded to grant permission.

Shadow flicker

Concerns are expressed by the appellants at the possibility of shadow flicker impacting on their properties. However, the orientation of the proposed turbines combined with the separation distances would make any significant impact very unlikely. I recommend a condition that a shadow stop device be used would be sufficient to protect local residents.

Economic effects

The applicants have emphasised that this is a local initiative, and at least one local economic organisation has welcomed it. The appellants have raised strong concerns about the impact on tourism and property values. It would seem that if it were carried out there would be some positive economic impact locally through shared ownership (although I would consider any condition to confirm this to be *ultra vires*). The impact on tourism would be harder to assess. Anything that degrades the local landscape will effect the tourism

potential of the area, and by implication, local jobs and prosperity in this area, which is very dependent on tourism. The nearby town of Kilkee is a traditional seaside town attracting Irish holidaymakers, while Carrigaholt has recently had success marketing dolphin watching trips. Casual car or bike-borne tourists using the scenic routes will no doubt notice the turbines, but it is difficult to say whether it will have a strong positive or negative impact. Most surveys indicate that well located turbines are viewed positively by the majority of the general public. The main scenic attraction is the Atlantic coastline, and it will not have a serious impact on views from the coast. On balance, I would consider that the economic impact would be slightly positive.

The appellants also raise concerns about their property values. It is unclear as to what impact the proposed development would directly have on such values, but presumably any amenity impact would have an effect. However, I consider that the amenity impacts are of such a minor nature that any impact on property values would be negligible over the long term. There is no evidence that it would effect farming or other economic activity.

Public safety

The Irish Aviation Authority has requested that a hazard light be placed on the the turbines. I consider this to be reasonable and I recommend a condition accordingly.

The appellants have raised strong concerns about the impact on traffic safety. It is hard to deny that two large turbines will distract motorists and there is a potential for this to cause accidents. However, such a theoretical accident risk should be balanced against the benefits of the proposal. The area is very lightly trafficked and most local users will quickly become accustomed to it. Tourists driving in the area are likely to be taking great care due to their lack of familiarity with the road network. I therefore do not consider this to be a reason for refusal.

Local infrastructure

The road network is of a relatively good quality. A number of small quarries generate occasional heavy vehicle movements, but this does not seem to cause significant problems. The main concern with access would be a small number of awkward junctions, most notably at the junction of the R487 and R486, and with the R487 and the adjoining minor road. I consider that this is an issue that can be dealt with by way of a financial contribution to cover any damage to the surface or junction alterations.

Information regarding a connection to the ESB network is somewhat vague. The local network is for local service only. The nearest connection point is a substation at Kilkee. The nearest major power lines are well to the west, in the vicinity of Moneypoint. However, as the output of the windfarm would be around 7MW, I assume any new infrastructure would be quite modest.

Water, soils and geology

There is a small watercourse next to the site, draining into the Atlantic to the north. There is a possibility of contamination during construction works. This can be addressed through standard conditions.

As the site is very low level and on flat ground, there does not appear to be any potential issue with land stability.

Cultural heritage

The general area is rich in archaeological remains, and the overall form of the human landscape with its network of old settlements and field systems is of high importance. There are several Recorded Ancient Monuments (the three closest of which are described as ‘enclosures’) between the proposed turbines and the adjoining road. The EIS is somewhat deficient on information on these remains, but they do not appear to be of the highest importance. None will be directly affected by the proposed works.

I do not consider that there would be an unacceptable impact on local cultural historic remains, but having regard to the proximity to unidentified features I recommend that a standard archaeological monitoring condition be attached if the Board is minded to grant permission.

Air quality and climate

There will be a significant increase in traffic resulting from construction, with consequent air pollution. However, on balance it is clear that over its operating life a wind farm will substantially offset air pollution and CO₂ emissions other forms of power generation.

Electromagnetic interference

In some circumstances, such tall structures can interfere with TV and other signals. There is no evidence that there is any particular concern with the proposed development. However, considering the proximity of houses, I recommend a condition such that measures be taken by the developer in the event of a problem arising.

12. Conclusions and Recommendations

I conclude that the proposed development is consistent with national and local policy. I conclude that policy considerations and the overall benefits from the production of renewable energy outweigh the negative elements of the proposed development.

I recommend, therefore, that subject to the conditions set out below, permission for the proposed 2-turbine windfarm be granted for the following reasons and considerations.

REASONS AND CONSIDERATIONS

Having regard to:

- (a) National policy with regard to the development of sustainable energy resources;
- (b) The general suitability of the site for a wind powered electricity generating facility due to the wind resource available;
- (c) The absence of any zoning, wildlife or archaeological designations relating to the site; and,
- (d) The separation distance of the proposed turbines from any inhabited dwellings.

It is considered that, subject to compliance with the conditions set out in below, the proposed development would not seriously injure the landscape character of the area or local visual amenities, would not cause unacceptable levels of harm to a protected species or habitat, would not interfere with local amenities or property values, and would not constitute a traffic hazard. The proposed development would, therefore, be in accordance with the proper planning and sustainable development of the area.

CONDITIONS

1. The development shall be carried out in accordance with the plans and particulars lodged with the application as amended by the drawings received by the planning authority on the 8th day of August, 2003, except as may otherwise be required in order to comply with the following conditions. For the avoidance of doubt, this permission relates only to 2 no. turbines, with a maximum hub height of 60 metres and rotor diameter of 70 metres.

Reason: In the interest of clarity.

2. This permission shall operate for a period of 25 years from the date of this order. A further permission will be required to operate beyond this date. Prior to the final date for the operation of the windfarm, all turbines and other structures shall be removed, and the site restored to its original condition to the satisfaction of the planning authority.

Reason: In the interest of orderly development.

3. Prior to the commencement of development, all details of the proposed turbines and associated structures, including design, height and colour is to be agreed in writing with the planning authority. The wind turbines

shall be geared to ensure that the blades rotate in the same direction. In default of agreement, the matter shall be directed to An Bord Pleanála for determination.

Reason: In the interest of visual amenity.

4. Work on the proposed windfarm shall not proceed until full permission has been granted for the electricity connection to the national grid.

Reason: In the interest of orderly development.

5. Prior to the commencement of development, the developer shall agree with the planning authority a protocol for annual reports on the impact of the windfarm on wildbirds in the vicinity, with particular reference to the Barnacle Goose. This report shall include surveys of the area for nesting birds, reports of other protected species known to nest or forage in the area and records of bird mortality from blade strikes. These reports shall be submitted on an agreed date annually for the operational life of the windfarm.

Reason: To allow full monitoring of the ecological impact of the proposed development, with particular reference to species scheduled under the Wildlife Act and the EU Habitats and Wildbirds Directives.

6. Construction works shall not be permitted between end of September to mid April to avoid disturbance to Barnacle Geese during the winter season.

Reason: To prevent interference with birds protected under Annex I of the Habitats Directive.

7. Prior to the commencement of development, details of the proposed service road and drains shall be agreed in writing with the planning authority. The new tracks shall be surfaced in gravel or hardcore and shall not be hard topped with tarmacadam or concrete. In default of agreement, the matter shall be directed to An Bord Pleanála for determination.

Reason: In the interests of visual amenity and reducing run-off from the site.

8. Prior to the commencement of development, the applicant shall submit proposals to install fully automatic 'shadow stop' devices on both turbines. Full details of the operating parameters of these devices shall be submitted to the planning authority for agreement.

Reason: In the interest of protecting residential amenities and protecting public health.

9. Prior to the commencement of development, the developer shall agree a protocol for a full survey of all roads to be used as haul roads before and after construction works. The agreement shall include for the compensation of the Council for any damage to the road surface caused during the works.

Reason: In the interest of traffic safety.

10. The Irish Aviation Authority shall be informed of the co-ordinates of the constructed turbines and the constructed elevation of the highest point of each turbine, in accordance with the IAA specification for the surveying of en-route obstacles. Any warning lights required by the IAA shall be fitted according to their specifications.

Reason: In the interest of public safety.

11. At the critical wind speed (that is, the speed at which the noise of wind turbines and blades is most in excess of ambient noise levels), the noise from the proposed development shall not, when measured externally at the nearest occupied house not in the ownership of the existing landowners, exceed 40 dB(A)Leq when measured over any five minute period. Within six months of commissioning the turbines referred to in this application, the developer shall undertake the measurement of noise levels in order to determine the extent and characteristics of noise levels arising from the wind farm in the vicinity of the nearest two occupied residential properties (excluding the landowners property). The results of such noise measurements shall be forwarded to the planning authority. In the event of a failure to meet the above limit, the wind farm operation shall be stopped until written agreement is reached with the planning authority on design or operational alterations intended to reduce the noise accordingly.

Reason: To protect the amenities of residential properties in the vicinity.

12. Prior to the commencement of development, the developer shall agree a protocol for assessing any impact on radio or television or other telecommunication reception in the area. In the event of interference occurring, it shall be the responsibility of the developer to mitigate such interference according to a methodology to be agreed with the planning authority.

Reason: In the interest of orderly development.

13. Prior to the commencement of development, the developer shall agree a management plan for construction works on the site. This shall include access arrangements for construction materials; the storage of materials on site; details for the control of run-off from the site; extraction and infilling of borrow pits (if any); the removal of all machinery, spoil and waste material from the site following completion; the restoration of vegetation and landscaping; and provisions for emergencies.

Reason: In the interest of visual amenity, public safety, and the prevention of pollution.

14. The developer shall facilitate the planning authority in preserving, recording or otherwise protecting archaeological materials or features that may exist within the site. In this regard, the developer shall –

- (a) Notify the planning authority in writing at least four weeks prior to the commencement of any site operation (including hydrological and geotechnical investigations) relating to the proposed development,
- (b) Employ a suitably qualified archaeologist who shall monitor all site investigations and other excavation works, and,
- (c) Provide satisfactory arrangements for the recording and removal of any archaeological material which may be considered appropriate to remove.

Reason: in order to conserve the archaeological heritage of the site and to secure the preservation of any remains which may exist within the site.

15. The developer shall pay a sum of money to the planning authority as a contribution towards expenditure that was and/or that is proposed to be incurred by the planning authority in respect of the repair of public roads and road widening required to facilitate the proposed development. The amount of this contribution and the arrangements for payment shall be agreed between the developer and the planning authority or, in default of agreement, shall be determined by An Bord Pleanála.

In the case of expenditure that is proposed to be incurred, the requirement to pay this contribution is subject to the provisions of section 26(2)(h) of the Local Government (Planning and Development) Act, 1963 generally, and in particular, the specified period for the purposes of paragraph (h) shall be the period of seven years from the date of this order.

Reason: It is considered reasonable that the developer should contribute towards the expenditure that was and/or that is proposed to be incurred by the planning authority in respect of works facilitating the proposed development.

16. Upon termination of the use of the wind farm, the mast and turbines shall be dismantled and removed from the site and the site shall be restored to its existing condition in consultation with the planning authority. Prior to the commencement of development, the developer shall lodge with Clare County Council a cash deposit, a bond of an insurance company, or other security to secure the satisfactory reinstatement of the site on the cessation of the project. The form and amount of the security shall be agreed between the Council and the developer or, in default of agreement, shall be determined by An Bord Pleanála.

Reason: In the interest of orderly development and visual amenity and to ensure that the structures do not remain on-site in the event of the development not supplying electricity to the national grid.

**Philip Davis,
Inspectorate.**

13th August 2004