

## **Longhirst Wind Farm Proposal**

### **End February 2009 Update**

Novera Energy is progressing proposals to submit a planning application for a Wind Farm at Longhirst which lies on farmland between the villages of Longhirst and Hebron, some 2km north-west of Pegswood. This environmental update has been prepared in order to inform you of the progress of these studies and the development of the turbine layout. This is the second update letter to the local community about the scheme, in addition to a two day set of public consultations which were held at Longhirst in mid 2008.

Baseline environmental studies to inform the scheme design have taken place since October 2007. The last outstanding pieces of information, required to feed into the design of the wind farm were completed in late December 2008. These related to telecommunications links and ground conditions. Novera are now considering this information, and its impact on the proposal, prior to any further progression towards a planning application. Further updates on the proposal will be provided when available.

### **Environmental Studies**

A comprehensive range of environmental studies have been carried out in order to inform the wind farm design process. Following finalisation of the turbine layout, these studies will be used to undertake a full Environmental Impact Assessment (EIA) of the proposed scheme. Topics covered in the EIA will be:-

*• Landscape and Visual Assessment • Ornithology & Ecology • Noise • Hydrology, Hydrogeology & Ground Conditions • Cultural Heritage and Archaeology • Shadow Flicker • Telecommunications and Television Reception • Transport and Access • Socio-economics • Aviation and Radar.*

The EIA will be reported in the form of an Environmental Statement (ES), which will accompany any planning application for the wind farm, and will be submitted to the new Unitary Authority, Northumberland County Council. The ES will detail all of the environmental surveys and assessments undertaken and will be available to the public following submission of the planning application.

A brief outline of the main studies that have been undertaken so far is provided below. Additional information can be found in our October 2008 Update (also attached):-

#### ***Landscape and Visual***

A detailed baseline landscape and visual assessment of the site and surrounding area has been undertaken in consultation with Castle Morpeth District Council, Northumberland County Council and Northumberland National Park Authority. A formal landscape and visual impact assessment of the development will not be commenced until the final layout of the turbines has been devised. The specialist advice of our landscape consultants will be continually sought during this phase, in order to refine and create the best fit layout for the wind farm. Visual representations of the Longhirst Wind Farm will form part of the ES and will be available to view at a number of publically accessible locations.

#### ***Ornithology & Ecology***

Baseline bird surveys were carried out across the site during October 2007 up until the end of September 2008. These included walkover surveys and vantage point surveys over both the summer and winter periods.

A Phase 1 Habitat Assessment as well as surveys for signs of badger, otter, water vole, great crested newts, white clawed crayfish, red squirrel and bats were also carried out.

Potential impacts to all species (birds, mammals, and aquatic species) and habitats will be carefully taken into consideration and minimised during the final design of the wind farm, and formal impact

assessments undertaken. Tree and hedgerow loss will be minimised and habitat enhancement initiatives put in place.

### **Noise**

The baseline noise assessments for the Longhirst Wind Farm have been undertaken in accordance with appropriate national guidance in the form of ETSU-R-97 *The Assessment and Rating of Wind Farm Noise*. Background noise monitoring was undertaken in late summer/early autumn 2008.

The results of the noise monitoring studies will be used to design the final wind turbine layout, number and specification of the turbines. The final turbine layout will be developed to ensure that the scheme will fall within the acceptable noise limits that would be permitted at the site in accordance with government guidelines (ETSU-R-97 report for the DTI, *The Assessment and Rating of Noise from Wind Turbines*, September 1996).

### **Hydrology, Hydrogeology and Ground Conditions**

A hydrological site visit was undertaken in September 2008 and will be repeated in the following months. The information gathered during the site visit, supplemented by a desk top assessment, and the results of geotechnical and mining assessments, will be used to design the layout of the wind farm. Turbines and associated infrastructure will not be located within 50m of watercourses. Turbines would need to be located in areas of shallow or no opencast, with foundations piled or specifically designed to the local site specific conditions. We are currently considering the implications of this upon the proposal.

### **Cultural Heritage and Archaeology**

On finalization of the turbine layout, an archaeological impact assessment will consider the impact that the proposed wind farm could have on the historic environment, historic structures and buildings, designated landscapes and the historic character of the wider landscape. The assessment will consider both direct and indirect (largely visual) effects upon a number of cultural heritage receptors.

### **Shadow Flicker**

Shadow flicker can occur in specific atmospheric conditions where the shadow of a moving turbine blade passes over a small opening in a building, such as window. Once the final turbine layout has been developed a computer model will be used to predict any shadow flicker effects on nearby properties. In the unlikely event that significant effects are identified, then there are relatively simple steps which can be taken to halt the turbines during the rare and infrequent occasions when shadow flicker is predicted to occur.

### **Telecommunications and Television Reception**

Novera's have talked to a range of television and telecommunications companies in order to identify the exact paths of various telecommunication and microwave links that may cross the site. We now have responses from all these companies and are considering the implications for the proposal.

Television reception will be monitored during development, and any problems will be relatively easily remedied. All remedial measures would be carried out and funded by Novera.

### **Traffic and Transportation**

A study has been undertaken to determine the most appropriate route for delivery of the turbine components to the proposed site. The preferred access route would seek entry to the site along its western boundary. The turbines would be brought to the site using the A197, then northwards along the B1337. In the event that temporary road modifications are required, these will be agreed in advance with the Highways Agency and the County Highways Department and will be restored following construction.

### **Socio-economics**

If the proposal were to be granted consent, the wind farm development would generate a range of direct and indirect benefits to the local economy during the construction and operational phases.

Once the final turbine layout has been agreed, Novera will commission a study to look into the socio-economic effects of the proposed development on the local area. This will be reported in full within the ES.

### ***Aviation and Radar***

The Ministry of Defence have no objection to the Longhirst Wind Farm proposal, either in relation to military radar or low flying areas. Novera are currently in dialogue with Newcastle Airport, with regard to any potential effects on their radar, and any technological fix that may be required.

### **Summary**

The design and development of a wind farm and the submission of any planning application is a detailed and lengthy process. However, now that all the necessary baseline studies are complete, we are now in a position to finalise our plans, and make more detailed assessments about the financial and environmental viability of the proposal. The next few months will be devoted to this important stage.

Further updates on the likely submission timescale will be provided when available in the coming months.