

EQUESTRIAN ACCESS THROUGH WIND FARMS IN SCOTLAND

Wind farms are an important part of strategies to achieve the Scottish Government's target of producing 20% of Scotland's energy from renewables by 2020. As an organisation, British Horse Society restricts its involvement and comments (both those made by BHS at national level and those made by local BHS representatives) to those most relevant from an equestrian perspective, including safety and the potential economic impact on equestrian access or local equestrian businesses. Individual BHS members may choose to take other factors into account in supporting or objecting to wind farm development proposals.

BHS Scotland has produced this information sheet to provide guidance to horse riders and carriage drivers on access through wind farms, and to ensure that equestrian access is taken into account in design and determination of planning applications for wind farms.

Riding and carriage driving through wind farms

Many horse riders and carriage drivers are apprehensive about taking their horses near wind turbines. Some horses may initially react negatively to the sight or sound of turbines, as they would to any new experience, while others are totally unperturbed. Don't assume that wind turbines will necessarily have a negative effect on your horse, or on equestrian access. Horses are very adaptable. BHS has received many more reports of horses being unphased by wind turbines than of adverse reactions, and very few where the horse's response has not eased with familiarity and sensitive handling. In some parts of the country, wind farms provide welcome new opportunities for off-road riding and carriage driving.

Legal context for access through wind farms in Scotland

- The Land Reform (Scotland) Act 2003 provides a right of access for all non-motorised recreational users to most land, provided these rights are exercised responsibly. This includes wind farms (other than during the construction phase – see below).
- The network of tracks built during wind farm construction often provides good opportunities for year-round multi-use access, but does not always link into other routes off the site. There may be maps at the entrance to wind farms, or accessible via the internet, identifying recommended routes. Inevitably some turbines will be located close to tracks because of the economic incentive to minimise the distance between main tracks and individual turbines.
- Access rights also apply to the land between turbines, although most wind farms are built on exposed sites, often on boggy ground which may not support equestrian access. Look at the vegetation and weigh up the ground conditions carefully before you wander off the track.
- Access rights are suspended on land where building or civil engineering work is being carried out, other than on core paths or rights of way. During construction access to live working areas may be restricted under Construction (Design and Management) Regulations 2007 on the grounds of public safety. The Scottish Outdoor Access Code clarifies that restrictions should be kept to the minimum area, and for the minimum duration, reasonably and practicably possible. Access to the remainder of the site should not be affected, even during construction. Existing rights of way, core paths and other promoted routes should remain open even in live working areas, other than where pre-agreed signed diversions have been put in

place to maintain access. If you find this is not the case, consult your local access authority.

Remember access rights in Scotland come with responsibilities. You are responsible for your own horse, your own safety, and deciding for yourself whether you feel the risks involved in riding or carriage driving mitigate against using certain routes. You are also responsible for ensuring your actions do not put anyone else at risk.

How do horses react to turbines?

Like humans, all horses are individual. They each react to circumstances and structures in different ways. Some will take turbines easily in their stride, others may show some initial apprehension.

Generally, horses are more likely to react to unusual noises and sudden movement than the rhythmic rotation of turbine blades. Blades which start to turn while in a horse's sight may provoke more of a reaction than those already in motion as you ride towards them, but start-up movement is usually slow and gradual, so will not frighten most horses. Horses' vision allows them to see to a certain extent behind them, so they may be frightened by something you have not noticed. Smaller turbines, particularly those with a tail fin, tend to adjust to changes in wind speed and direction more quickly than larger turbines, and the sound may change as the turbine moves. Although sudden changes in sound and movement are more likely to startle a horse, they are not dissimilar to many other hazards in windy conditions, such as loose, flapping plastic.

Some horses may react to the moving shadows cast by turbine blades, particularly if these flicker across their path, but as shifting shadows are commonplace, most horses quickly get used to this. Shadows are longest early in the day and during the evening when the sun is at its lowest.

Familiarising your horse

Riding and carriage driving are inherently risk sports. Some relish the thrill of increased risk through challenges such as cross country courses, others prefer a quiet life. When it comes to wind turbines, it's your choice how you perceive and opt to manage the risk. On the basis of experience, BHS believes that most (but not all) horses which are familiarised with wind farms in a gradual and sympathetic way will happily ride or drive past turbines.

Your own reaction will greatly influence that of your horse. By keeping calm and confident and quietly reassuring your horse, you can help minimise their reaction, just as you would in any other situation. Many riders comment how ethereal and peaceful they find the regular swoosh of turbine blades.

Horses are flight animals. When startled, their first instinct is to flee, then to turn around and look at whatever frightened them. Horses are also naturally herd animals, finding safety in numbers. You can use this to your advantage in familiarising your horse with wind turbines. The same principles apply as introducing young horses to traffic: do it gradually, ideally in the company of an experienced horse.

Before you set off

- If visiting a wind farm for the first time, you might want to have a look round on foot first, so you can plan your route in advance and just concentrate on riding or driving when you get there with your horse.

- Check the weather and do your own risk assessment. Many horses are more sensitive when it is very windy, and the stronger the wind, the louder the noise from the turbines is likely to be. During winter there may be risk of ice or snow falling off the blades, particularly if the sun comes out and prompts a sudden thaw. It is common sense to avoid wind farms, or to stay clear of individual turbines, during thunderstorms when there may be risk of lightning strike. Some wind farms, such as Whitelee near East Kilbride, have their own rangers or website offering up to date weather forecasts specific to the site, or a contact number you can call if in doubt about risks associated with adverse weather.
- Plan in advance where you are going to park to avoid interference with works traffic or other visitors. If possible, park and unload where your horse can see the turbines and then hack towards them to give your horse change to acclimatise to something new from a distance.
- Remember to take hi-viz gear (and wear it when you are riding or driving through the wind farm) so that you are readily visible to site traffic and other recreational users.

Think, look, listen

- Expect the unexpected. Squeaks and clunks as turbines stop and start, or swivel to face the wind, are more likely to cause your horse to react than the rhythmical movement of the blades. Keep calm, and carry on.
- Turbines require maintenance, so bear in mind that there may be vehicles, and people, around. A friendly greeting will help alert your horse to someone they may not have seen working overhead, and help reduce any risk of it taking fright unnecessarily.
- Be aware that some wind farms are used by sled-dog teams for training and exercise. Keep your eyes open, and be willing to step out of the way: your brakes are likely to be better than theirs!

BHS Scotland has run several training days at Whitelee Wind Farm near East Kilbride offering riders opportunity to familiarise their horse with turbines under the expert guidance of Rhoda McVey, a highly experienced qualified BHS instructor. You can watch a DVD of the event at <http://www.youtube.com/watch?v=b0O1hZdaihl>.

Guidance for developers and planning authorities

The notes which follow offer guidance on how any potential negative impacts or wind farm development or operation can be minimised, and highlights opportunities to maximise the benefits of wind farm development for equestrian access. Chapter 7 of Good Practice During Wind Farm Construction (<http://www.snh.gov.uk/publications-data-and-research/publications/search-the-catalogue/publication-detail/?id=1618>) offers more general guidance on access and recreation in relation to wind farm design, construction and operation.

Key issues for horses

The main concerns about turbines from an equestrian perspective are:

- blade movement, particularly when blades start to turn within a horse's sight line, or blades which come into view at eye level;

- moving shadows cast by blades, which some horses may perceive as a threat to their safety, exacerbated by the fact that the object casting the shadow may not be obvious to the horse. Blade shadows are not a problem if the turbine is north of the track or path;
- sun or light flicker off blades;
- noise from turbines, particularly erratic noise during start-up or deceleration;
- risk of snow and ice shedding off blades;
- risk of electrocution (particularly during lightning strike);
- risk of injury or fright resulting from structural failure, breakage or collapse of the tower, blades or other constituent parts of turbines.

Site assessment

BHS recommends that no anemometer should be situated closer than fall over distance plus 10% from any track used, or likely to be used, by horse riders or carriage drivers, and that no associated cables should be situated any closer than 30m from an equestrian route, as the cables may be difficult to see, especially by a startled horse.

Design

BHS expects turbine siting and wind farm development plans to respect all existing equestrian access, and to consider opportunities for development of further access wherever possible. This includes access within, across, through and adjacent to sites. Scope to use new tracks constructed to enable turbine erection to link other routes outwith the site is encouraged. BHS Scotland and local riders will be happy to help identify existing riding routes, and to offer suggestions for how access could be improved as an integral part of wind farm development.

- ❖ **BHS' standard guidance is that there should be a separation distance of at least four times the overall height of turbines (i.e. to tip of blade) for core paths, nationally promoted routes such as Scotland's Great Trails and other promoted riding routes**, as these are most likely to be used by equestrians unfamiliar with turbines.
- ❖ **BHS recommends a target of three times overall height between turbines and all other routes** which pre-date wind farm development or turbine erection, including roads.
- ❖ **BHS recommends a minimum separation distance of 200 m between turbines and core paths, rights of way or promoted riding routes.**

Where recommended separation distances cannot be achieved, BHS will expect developers to demonstrate how safety issues can be addressed, including development and signage of alternative routes of comparable length, gradient and appeal to horse riders and carriage drivers to cater for those who prefer not to take their horses so close to turbines. From an equine perspective, turbines which suddenly come into view at close range without any warning are likely to cause the greatest risk of horses reacting.

Traffic during and after development

- Drivers of all vehicles visiting the site should be alerted to where they are most likely to meet horses.
- All vehicles should be required to slow down or stop when meeting walkers, cyclists, and particularly horses.

- Where construction traffic has to cross an equestrian route, this should be at right angles to the path or track, with warning notices for both vehicle drivers and horse riders/carriage drivers. Construction traffic should give way to recreational users.
- A Temporary Traffic Regulation Order should be in place before closure of any core path or promoted route which may be necessary during transportation of large components.
- Traffic movement which may impact on equestrian access should be planned to allow horse riders and carriage drivers to continue to ride safely in the early morning, evening, at the weekend and on bank holidays.
- All drivers of large vehicles should follow BHS' guidance to minimise risk to horse riders and carriage drivers (<http://www.bhsscotland.org.uk/resources-for-developers.html>).
- Where there is no alternative to using the line of a core path or promoted route as an access track during the construction phase, the route should be widened, and a fence erected to segregate vehicles from horses using the route.

Surfacing

BHS recognises that from a developer's perspective, the first priority in constructing tracks providing access to turbines is capacity to support required vehicular access, which usually involves stone surfacing, whereas the ideal surface for horses is firm, well drained turf.

Stoned tracks may increase opportunities for year-round riding, particularly over boggy or waterlogged ground, but sharp stone, particularly if unconsolidated, can quickly lame horses, and will usually restrict pace to walk. Horse riders and carriage drivers understandably feel aggrieved when paths and tracks along which they have previously enjoyed scope to trot, canter or gallop are stone surfaced as part of wind farm development, resulting in loss of amenity for equestrian users.

As a matter of policy:

- Where wind farm development or turbine erection results in loss of previously unsurfaced, firm beaten earth tracks enjoyed by horse riders and carriage drivers, BHS expects developers to provide substitute routes of similar length, gradient and character.
- BHS encourages developers to identify in their proposals what, if any action, is proposed to ameliorate the surface of construction tracks on completion of construction. Where traffic movement and natural consolidation with earth or mud is insufficient to blind sharp stone, dressing with whin dust or similar material may be necessary.
- BHS does not expect paths or tracks with a past history of multi-use, or intended for future multi-use to be surfaced with tarmac, but accepts that developers may agree to bound surfacing of specific routes for the benefit of walkers and cyclists in some instances.

Further guidance on the general principles of equestrian access can be found at <http://www.bhsscotland.org.uk/resources-for-developers.html>.

Access controls

All access controls should ensure that horse riders and carriage drivers, as well as other non-motorised users, are able to exercise their legal access rights. In order to ensure this, and in accordance with national guidance, BHS expects developers and planners to ensure that:

- In keeping with best practice and the Equalities Act, the least restrictive option is used to provide access for all legitimate recreational users. This is usually a gap.
- Where it is necessary to erect or lock gates across a track to restrict illegal vehicular access, a suitable gap, bridlegate or horse stile should be maintained alongside. Guidance on appropriate widths and designs can be downloaded from the BHS Scotland website. Sites likely to be used for carriage driving should incorporate facility such as the Kent Gap design.

Further details and specifications for gaps, gates and other access infrastructure are provided in the Outdoor Access Design Guide <https://www.pathsforall.org.uk/pfa/creating-paths/outdoor-access-design-guide.html>. BHS Scotland is happy to provide further guidance and advice where required tel. 01764 656334.

Other facilities

Incorporation within site design of areas with sufficient space for horse boxes and trailers to park, turn and unload easily will be much appreciated by horse riders and carriage drivers. Parking areas should not be close to any turbines to allow horses unfamiliar with turbines to be safely unloaded and opportunity to acclimatise. Corals, tying rails and mounting blocks are valuable additional features.



Maintenance and safety tests

The increased noise during over-speed and similar safety tests which involve rotors being sped up to capacity can be very frightening for horses, even those which are used to turbines. BHS urges all turbine owners and wind farm operators to alert horse riders and carriage drivers in advance of and during scheduled safety tests by erection of suitably placed signs on-site, on websites etc. confirming time and date to enable those concerned about their horses' reaction to avoid the turbines at relevant times. BHS also recommends that planners make it a condition of planning permission that those responsible for turbines are obliged to notify local horse owners of scheduled test dates at least five days in advance.

Guidance for riders and carriage drivers in responding to wind farm development proposals

How BHS responds to development proposals

BHS is a statutory consultee for all major wind farm development proposals in Scotland. It is not generally consulted at national level regarding erection of individual turbines, or small groups of turbines for domestic or commercial use.

For each wind farm application received, BHS consults with local riders and equestrian businesses to identify:

- existing equestrian use of the proposed site (who uses the site, how and when)
- existing equestrian use of adjacent or nearby tracks or roads
- level and frequency of existing use
- how existing use might be affected by proposals
- anticipated changes in future use
- potential for increased equestrian access through site development
- how the proposed development might impact on other equestrian interests.

In some cases BHS responds direct at national level, and in others delegates responsibility to a local Equestrian Access Group or BHS regional access representative.

Key issues to be taken into consideration in responding to development proposals

The main concerns about turbines from an equestrian perspective, which might be referred to in responding to development proposals, are summarised above.

When considering the impact of development proposals, planning authorities are likely to take account of the existing environment (i.e. what the site is like at present) and associated risks. Horse riders and carriage drivers using roads shared by motorists and other users are already in an environment characterised by noise and movement. Consequently objection to development proposals on the basis of horses being unable to cope with noise or movement is unlikely to be taken seriously. This applies to forest roads used by timber wagons as much as to public roads. Similarly objections based on increased risk of horses meeting other recreational users are unlikely to be taken into account in relation to existing multi-use paths where horses may already routinely encounter cyclists and walkers.

Bear in mind that over-exaggerating the fact that horses are inherently unpredictable flight animals may later be used in evidence against you. Planners who have read riders' comments about horses' propensity to spook every time they meet a bike or vehicle of any kind are unlikely to respond positively to future complaints about routes being developed or managed which exclude equestrian use on the grounds of safety risks to other users. Similarly wind farm developers are unlikely to be willing to consider requests for developing additional new multi-use routes through wind farms if you have already protested that you would never go within five miles of a turbine.

It's also worth avoiding the risk of throwing the baby out with the bath water. No matter how strongly opposed you may be to a proposed development, consider carefully whether it is worth commenting on how any potentially negative effects from an equestrian perspective could be minimised, or flagging up opportunities for development of valuable new equestrian facilities or routes linked to development.

Design considerations

The location of individual turbines can have a major impact on horses' response. The following points are worth bearing in mind when considering the equestrian impacts of proposed developments:

- Horses are generally less concerned by turbines if they are able to acclimatise to the noise and sound as they approach. Turbines in close proximity to a path or track which suddenly come into view without any warning may pose more of a problem.
- Blade shadows are not a problem if the turbine is north of the track or path.

Equestrian access

In assessing the effects of proposed development on equestrian access, BHS recommend that you take account of the following:

- Which turbines are the most critical in terms of any potential adverse impact from an equestrian perspective? Identifying which you feel are totally unacceptable, and why, will help developers tailor their proposals to minimise the adverse impacts. Take into consideration not only how close turbines are to existing tracks, but also how readily visible they are: will they suddenly come into view as you round a corner from dense forestry? How far is the closest turbine from any parking area(s), or where you would enter the site? Most horses unaccustomed to turbines are unlikely to take kindly to being unloaded where turbine blades are swooping overhead, but have no problem if they have time to acclimatise from a distance.
- How will site construction or development, particularly construction of stone access tracks, affect the nature of routes currently used for riding?
- What scope is there to make proposed tracks or access roads more useful or acceptable from an equestrian perspective?
- What alternative routes are currently available, or could be developed to avoid the turbines or to substitute for sharp stoned access roads?
- What scope is there for extension or further development of the wind farm access track network to link with other routes outwith the site?

Submitting your comments

- Research your facts carefully. Details of the number and proximity of horses which might be affected by the proposed development, or the number currently making use of the proposed site, or a particular route, will help back up your case.
- State the basis or justification for your comments as clearly as possible.
- Work with others. Submissions that have the support of walkers and cyclists are stronger.
- Remember the significance of numbers, and that each letter counts as one objection. Letters from 10 individual members of a local riding club or riders access group will therefore have far more impact than a single letter from a group which purports to represent 50 members.
- If you decide to object, make sure you include the critical phrase "I/we object to..." within your submission, and state your reasons for objecting.
- Substantiate your comments or objections wherever possible by reference to relevant local planning policies, BHS guidance re. separation distances between turbines and riding routes etc.
- Providing a template or summary of points which you wish to encourage others to submit in response to wind farm applications can drum up more support, but planners are likely to take individual letters much more seriously than mass produced identical letters, even if individually signed.

Case study – Grimes Wind Farm, Cumbria

Considerable weight was attached to the potential significant adverse impact on three equestrian businesses in refusing planning permission for this wind farm. In each case, the highly volatile nature of visiting young horses and breeding mares, particularly bloodstock and those in race training, was influential in justifying the impact of turbine development. Use of bridleways by local horses which would have opportunity to become accustomed to the turbines was largely discounted as an objection.

Case Study - an example of refusal of planning permission

Proposals were submitted to Aberdeenshire Council for erection of two 800 kw wind turbines (hub height 55 m, total height 79 m) and associated infrastructure at Newton of Flouzie, in Banffshire. Balhagan Equestrian Services objected to the proposal on the basis of the potential impact of the proposed turbines on the riding stables, which is located approximately 500 m north of the nearest turbine. The business specialises in training and schooling of young horses as well as offering riding, stable management and a range of livery services. Balhagan commissioned an expert witness who undertook a risk assessment of the impact of the two proposed turbines on the business and its users, which concluded that the proposed turbines would have an extremely detrimental impact on any horse on or near the property, that the turbines would increase the risks to training and working horses at the stables, and to their riders, and consequently horse owners would seek other more suitable training facilities elsewhere, resulting in loss of business. BHS supported the objection on the basis that the construction of the turbine in such close proximity to the arena would force Balhagan out of business. The reporter appointed by the Scottish Ministers noted that “it would be naive to think that the proposed turbines would have no effect on the behaviour of some horses at the stables, and on adjoining roads (<100m from the turbines) well within the BHS guideline distance...(particularly given the age of the horses). Nevertheless I remain to be persuaded that the increased risk to the welfare and safety of horses or the persons handling them would be of such a scale as to lead to horse owners withdrawing their horses and taking their business elsewhere in sufficient numbers to lead to the demise of the business.” Taking account of the conflicting evidence submitted by the appellant regarding livery yards operating in close proximity to turbines elsewhere in the country and to the provision of bridleways as an integral part of some wind farms where horse riding is actively encouraged and promoted, the reporter concluded “I am not in a position to be certain that the proposal would have a significant adverse impact on the viability and future of the equine business.” The proposal was, however, deemed unacceptable on the grounds of landscape and visual impact, and consequently the equestrian issues were not further pursued.

If you need further advice on equestrian access in Scotland, contact your local BHS access representative (see www.bhsscotland.org.uk for contact details) or Helene Mauchlen, national manager for BHS Scotland Tel. 01764 656334 or email Helene.Mauchlen@bhs.org.uk.

For guidance on equestrian access in England and Wales, contact Access and Rights of Way Department, The British Horse Society, Abbey Park, Stareton Lane, Kenilworth, Warwickshire CV8 2XZ. Telephone 02476 840581. Email access@bhs.org.uk.