

INTERNAL MEMORANDUM



To: Gl.planning@n-somerset.gov.uk
Natural Environment Service Area

From: Neil Underhay

Tel Ext: 01934 426 929

Date: 2 July 2013
Application Number: 13/P/0854/F2
Location: Land at South Hill Farm, Bridgwater Road, Bleadon, BS24 0AL
Proposal: Siting of solar photovoltaic (PV) array and ancillary development. This application is subject to an Environmental Statement.
Applicant: Energi Plc

We would be pleased to receive, in writing, any formal observations your team may wish to make on the proposal referred to above within **10 working days** of the date of this memo.

Please record how long it took you to provide your comments in the “Admin use only” table. For example:

Admin use only :	10m
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We have identified in the table below the reasons that we have identified for sending this consultation request. If your team considers that there are additional relevant issues please include these within your response.

ISSUES IDENTIFIED AS REQUIRING ADVICE	MARK ALL THAT APPLY WITH 'X'
1. All major applications	X
2. All applications for new telecommunication masts (including prior approvals)	
3. New Parks or public open space or development that would materially affect existing Parks or Public Open Space	
4. An environmental impact has been submitted	X
5. There is a Public Right of Way (PROW) or byway open to all traffic (BOAT) within the site	NAME:
6. The site is on or within 5 metres of a designated wildlife site	
7. Protected species are known to be within the site	
8. There is a new building or structure within AONB (excluding householder applications)	
9. Application site is on or adjacent to a registered historic park or garden (code RLPRHPG) or an unregistered historic park or garden (code RLPURHPG)	
10. There is a tree with a tree preservation order (TPO) within or immediately adjacent to the site	

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11. Site is within a conservation area and there is a tree with a trunk of 75mm diameter or greater at a height of 1.5 metres	
12. Other (as requested by planning officer)	
Reason:	

All formats comments should be made on the form attached below and emailed back to dcomments (dcomments@n-somerset.gov.uk) with a copy sent by email to the planning officer.

If your team is unable to let me have its observations within this period please inform the case officer when they will be available. If we do not hear from you within 10 working days we shall assume that you have no observations to offer.

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INTERNAL MEMORANDUM

FROM: NATURAL ENVIRONMENT SERVICE AREA

Date Consultation Request Sent:

Development Management Case Officer: Neil Underhay

Application: Siting of solar photovoltaic (PV) array and ancillary development. This application is subject to an Environmental Statement.

Reference Number: 13/P/0854/F2

Location: Land at South Hill Farm, Bridgwater Road, Bleadon, BS24 0AL

All comments should be made on this form and e-mailed back to dcomments (dcomments@n-somerset.gov.uk) with a copy sent by email to the relevant planning officer

Admin use only :	
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Formal comments from the Natural Environment Service Area regarding the above.

Ecological Comments: Susan Stangroom 22/06/2013

The comments are made in response to the Ecology Section (Section 6) of the Environment Statement prepared by ADAS UK to support the application.

Designated sites:

The site location falls within a wider landscape with a number of areas designated for their nature conservation interest, as detailed below:

The site lies 1km from the Severn Estuary European Marine Site, which has a number of overlapping designations: SSSI, Special Area of Conservation (SAC), Special Protection Area (SPA) and Ramsar site. The estuary and marginal habitats are especially important for breeding and over wintering waders and wildfowl, with a number of these bird species cited as qualifying interest features.

Other Special Areas of Conservation are also located within a 1 – 6km radius, to include the Mendip Grasslands SAC and the North Somerset and Mendip Bats SAC.

Purn Hill SSSI is adjacent to the site and the ditches which form the eastern boundary of the site are also a designated Wildlife Site, known as: 'Ditches to the west of Purn Farm' Wildlife Site.

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The site falls within the Somerset Levels landscape, which is an environmentally sensitive area, characterised by coastal and floodplain grazing marsh habitats, drained by wet ditches (rhynes). The Somerset Levels are noted for the birds that are attracted to the area due to these habitats, notably the waterfowl that are attracted to the wetter grasslands. The ditches are noted for the flora and invertebrates they can support. A number of national and local biodiversity action plan species are associated with these habitats: such as, notably, water vole, otter, brown hare and bats.

Due to the rich wildlife habitats within the area, it is essential that the appropriate level of avoidance, mitigation and enhancement are considered and implemented, so that the development does not present a barrier to migration or connectivity within the landscape. For this reason, conditions need to be applied to ensure that wildlife can continue to utilise the habitats on site (unless there are issues of likely direct damage to the structure, that could be caused by certain species).

Mitigation measures need to be in place to minimise negative impacts on the adjacent designated sites, arising from site construction, activities, maintenance and operation.

Condition 1: Ten metre buffer strip to designated sites, water courses (rhynes) and hedgerows.

A ten metre grassland buffer should be maintained between the development and adjacent designated sites, and for all watercourses and hedgerows. No re-seeding should take place within the buffer strip; or storage of materials. The buffer strip should be maintained as tall grass over May to August, subject to any urgent higher priority flood maintenance requirements, to maintain cover for water vole and other key species, and to maximise biodiversity. Management should be planned outside of the key spring and summer breeding periods.

Reason: To meet the guidance outlined within the supplementary planning document 'Biodiversity and Trees', P. 13. 8.4 'Protect existing habitats and species, protect, retain and manage the existing key habitats and species' ... 'At least a five metre strip and sometimes a 10 metre strip for all water courses, hedges and woodlands should be retained to allow for management. However, where the Internal Drainage Board maintains the rhynes, an eight metre maintenance strip must be included'.

Planning Policies: CS4, ECH 11, ECH14 and ECH 15 refer.

Protected species, and national and biodiversity action plan (BAP) habitats and species:

There are a number of national biodiversity action plan species either using the site or with the potential to migrate into the area, to include water vole, brown hare and skylark. The proposal to revert the landholding to a native, species rich grassland offers some positive opportunities to create habitats more characteristic of the Somerset Levels coastal and floodplain grazing marsh habitat. However, the benefit of this grassland reversion is dependent on appropriate re-seeding and highly dependent on the type of subsequent management; as well as the spacing of the panels and breadth of margins and corridors.

Concerns have been raised regarding the possible effects on invertebrates and birds, therefore, mitigation to maximise the opportunities presented by a grassland reversion should be assessed and recorded within a publically available ten year ecological management plan.

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The skylark is a national priority /Section 41 species and also receives full legal protection under the Wildlife and Countryside Act 1981. It is an offence to kill, injure or take an adult skylark, or to take, damage or destroy an active nest or its contents. The only exception is legitimate farming practices that cannot be reasonably delayed, although farming methods can often be modified to reduce impacts.

Skylark habitat will be lost at Weston Airfield due to development. Therefore, further losses of skylark habitat should be minimised as far as possible, to minimise cumulative impacts on the species.

Condition 2 : a mitigation or compensatory proposal needs to be submitted to the local authority to secure the future of skylark at, or adjacent to, the site location. Ideally the area currently being used by skylark, within a suitably sized plot should be retained; and suitable management stipulated with an ecological management plan. If this is not feasible, an area of land adjacent of sufficient size with skylark plots should be designated as skylark compensatory habitat and managed accordingly.

Planning Policies: CS4, ECH 11 refer.

Water vole: water vole are both a national and local priority BAP species, as well as being *fully legally protected under the Wildlife and Countryside Act 1981. As well as being protected from killing or taking, breeding or resting places are also protected from damage, destruction or obstruction; and the water vole is also protected from being disturbed in such places.* The proposed change from arable to grassland could benefit water vole, provided that the grassland on site is managed to provide tall grass or herb cover or refuge areas throughout the year (for example, either by late summer/Autumn mowing, or early spring and late summer grazing, or extensive grazing).

Condition 3: Ecological Management Plan

Management aiming to maintain tall grass cover for water vole over the summer period to minimise disturbance to water vole over the key breeding periods of spring and summer should be incorporated into an ecological management plan. Areas of tall grass or herb cover should also be maintained year round as refuge areas. Such management could also benefit other BAP species such as the brown hare, as well as supporting invertebrates. Sympathetic management of ditches on site should also be incorporated within the plan to include a longer term rotational management to maintain open ditches for invertebrates, whilst also recognising the importance of maintaining sympathetically managed hedgerows for the bird species currently in that location.

As referred to in condition 2, an area of sufficient size should be subject to cropping or grassland management such as to provide habitat for breeding skylark either on site; or in close proximity to site, as feasible.

Planning Policies: CS4, ECH 11 refer.

Condition 4: Fencing design – maintaining access to on-site grassland habitats; and facilitating connectivity and migration through the site.

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The design of fencing needs to be considered to allow key species to be able to continue to gain access to the habitats on site (for example, Section 41/BAP species: water vole, brown hare and other of the smaller mammals, as well as bats) and also to facilitate connectivity of habitats. It is essential that fencing does not cause an issue for bats to be able to continue to forage across the landscape.

If badgers are considered to pose a problem to the installation, a form of mitigation needs to be considered to enable them to continue to move through the area, for example, a fenced grassland corridor.

Proposals for fencing that will meet these requirements need to be submitted to the local authority.

Lighting

One of the main concerns regarding this development, is the potential impact of the solar panels and security lighting on invertebrates and other wildlife, particularly due to the recognised importance of the invertebrate communities of the ditches within the Somerset Levels landscape.

Invertebrates perform key ecosystem services such as pollination and are of fundamental importance in the ecological food web.

A review paper 'A Review of the Impact of Artificial Light on Invertebrates' Charlotte Bruce-White and Matt Shardlow 2011 (http://www.buglife.org.uk/Resources/Buglife/Impact%20of%20artificial%20light%20on%20invertebrates_docx.pdf) highlights a number of areas of concern in relation to security lighting and solar panels; and also makes recommendations to avoid, minimise or mitigate the impacts of light pollution on wildlife (Section 7).

These include assessing: the need for lighting (7.2); minimising the impacts (7.3); and minimising polarised light pollution (7.4).

Condition 5: Lighting Strategy

A lighting strategy should be submitted with full details of lighting proposals and solar panel design that aims to minimise impacts on invertebrates. This should include proposals to keep lighting to a functional minimum in all areas; to avoid lights that emit a broad spectrum of light with a high UV component; and to assess and minimise sources of polarised light pollution. The levels of polarised light emitted by the panels need to be specified and reduced to minimise impacts on invertebrates, particularly aquatic invertebrates. For example, it is recommended within the above-mentioned review that 'solar panels should include a pattern of roughened or painted glass or a horizontal light blocking grid so that they are no longer attractive to aquatic invertebrates'.

The NPPF 125. states: ' By encouraging good design, planning policies and decisions should limit the impact of light pollution from artificial light on local amenity, intrinsically dark landscapes and nature conservation'.

Condition 6: A construction management plan specifying all measures necessary to ensure the protection of nesting birds, and other legally protected species. This should include information relating to the timing of construction activities. Where feasible, construction should be undertaken outside of key nesting and breeding periods. If this is not possible, other avoidance

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measures, such as provision of an ecological clerk of works to oversee construction activities, needs to be stipulated within the plan.

Planning Policies: ECH 11 refers.

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