



## Submission on Forest Service

# 'Environmental Requirements for Afforestation'

### Contents

1.1 Context.....	2
1.2 Summary of recommendations .....	3
2.0 Specific Comments and recommendations on the text of the Draft 'Environmental Requirements for Afforestation' .....	3
2.1 Section 1.1 1.1 : 'About these Environmental Requirements' .....	3
2.2 Section 1.2.1 European Communities (Forest Consent & Assessment) Regulations 2010 ....	4
2.2.1 EIA Thresholds.....	4
2.3 Section 1.2.2 European Union rules governing the Forestry Programme .....	4
2.4 Section 2.5 Biodiversity.....	5
2.4.1 The impacts of afforestation on biodiversity, pollinators and Birds of Conservation Concern in Ireland.....	5
2.4.2 Rare and designated habitats and species occurring outside designated sites .....	7
2.4.2.1 Annex 1 Species of the Birds Directive .....	7
2.4.2.2 BOCCI listed species .....	8
2.4.2.3 Curlew and other Breeding Waders.....	8
2.4.3 The need for Habitat Surveys on all sites for Afforestation.....	9
2.5 Procedures to Identify designated habitats and species, to avoid the inappropriate afforestation of sensitive habitats and other areas of high ecological value.....	10
2.5.1 Appendix 5: Specialised reports under 'Further Information' .....	10
2.6 Revocation of current suite of guidelines .....	12
3.0 Parallel consultation on Policy change 'To remove the application level limit of 20% on GPC1 type land': .....	12

## 1.0 Introduction

BirdWatch Ireland welcomes the publication of the draft 'Environmental Requirements for Afforestation' (Environmental Requirements) for consultation. In this submission BirdWatch Ireland highlights a number of particular conservation challenges facing birds and biodiversity which are either omitted from the requirements or which must be more comprehensively addressed if national and international biodiversity objectives are to be achieved.

BirdWatch Ireland is broadly supportive of targets to increase forest cover in an environmentally sustainable manner. However, if significant negative environmental impacts from this policy are to be avoided there must be far greater consideration given to ensuring compatibility of afforestation and Ireland's efforts to halt biodiversity loss. With the current measures in place, further serious declines in species and habitats are likely to occur both directly and indirectly from afforestation itself and the subsequent ongoing management of these forests.

BirdWatch Ireland has focused in this submission on biodiversity elements and due to a lack of capacity has not made any appraisal of water quality, climate or other environmental issues in the Environmental Requirements.

## 1.1 Context

Declines in many farmland bird species<sup>12</sup> and habitats are ongoing<sup>3</sup> and of significant concern to the scientific and conservation community. According to Ireland's report on biodiversity to the Convention on Biological Diversity 'The principal pressures identified in Ireland's Habitats Directive report as impacting upon Ireland's biodiversity include unsuitable grazing regimes, natural system modifications, pollution and climate change<sup>4</sup>. There are also other pressures resulting from what are termed 'natural system modifications' or land drainage. The 2014 Article 12 report (required under the EU Birds Directive) identified pressures from agriculture as the leading driver of population decline of bird species in Ireland. The most recent Article 17 report<sup>5</sup> lists Forestry as a high level pressure and threat to almost 40% of EU protected habitats. Natural Systems Modification (i.e. drainage) impacts almost 40% of habitats at a high intensity is the second highest impact on habitats. More than 20% of EU protected species are impacted by afforestation pressure and threats at a high intensity. While impacts do not arise from the forestry sector alone, it is crucial that each sector, through its own regulatory and strategic planning processes, ensure that impacts from its activities are mitigated to the extent that they do not cause unnecessary or long term significant damage to the natural resources. Toward this end, the 'Environmental Requirements for Afforestation' must incorporate measures to prevent conflict between afforestation and environmental conservation, and to address the significant challenges posed to many threatened species and habitats from afforestation which the 'Environmental Requirements' do not yet sufficiently address. Of particular concern is the failure of these draft Environmental Requirements to require biodiversity assessment for the vast majority of afforestation proposals.

---

<sup>1</sup> Colhoun K. & Cummins, S. 2013 Birds of Conservation Concern in Ireland 2014-19. Irish Birds 9:523-544

<sup>2</sup> Article 12 report: [http://bd.eionet.europa.eu/activities/Reporting/Article\\_12/Reports\\_2013/Member\\_State\\_Deliveries](http://bd.eionet.europa.eu/activities/Reporting/Article_12/Reports_2013/Member_State_Deliveries)

<sup>3</sup> NPWS (2013). The Status of Protected EU Habitats and Species in Ireland. Overview Volume 1. Unpublished Report, National Parks & Wildlife Services. Department of Arts, Heritage and the Gaeltacht, Dublin, Ireland. Editor: Deirdre Lynn, available here: <http://www.npws.ie/article-17-reports-0>

<sup>4</sup> DAHG 2014. Ireland's Fifth National Report to the Convention on Biological Diversity. Department of Arts, Heritage and the Gaeltacht.

<sup>5</sup> NPWS (2013). The Status of Protected EU Habitats and Species in Ireland. Overview Volume 1. Unpublished Report, National Parks & Wildlife Services. Department of Arts, Heritage and the Gaeltacht, Dublin, Ireland. Editor: Deirdre Lynn

The significant allocation of public funding to support afforestation targets set out in Ireland's Forestry Programme 2014-2020, requires adherence with EU Common Strategic Framework and Rural Development Regulations (RDR) (No. 1305/2013). The fourth priority of the Rural Development Regulations is: *'Restoring, preserving and enhancing ecosystems related to agriculture and forestry'*. The procedures for preventing loss of and damage to threatened habitats and species from afforestation as currently set out in the Environmental Requirements do not ensure coherence with those set out in the Rural Development Regulation (Regulation (EU) 1305/2013) and its implementing and delegated acts. Additional procedures are required to detect features and locations of threatened species and habitats, in particular habitats of threatened bird species.

## 1.2 Summary of recommendations

1. Measures to detect threatened bird species which occur outside of the Natura 2000 network have not been incorporated in the draft requirements. Due to the high chance of overlap in sites with proposed afforestation, and in keeping with the requirements of the Birds Directive and the state aid rules cited in section 1.2.2 of the requirements, BirdWatch Ireland recommends that site specific ecological assessments are carried out on sites proposed for afforestation in order to detect use of the site by bird species listed in Annex 1 of the Birds Directive which includes feeding, roosting and/or nesting, where they occur within a non-designated locality. This is a requirement of the Birds Directive.
2. Pre afforestation site surveys should be carried out on all sites proposed for afforestation by a suitably qualified ecologist in order to identify designated habitats and species, to avoid the inappropriate afforestation of sensitive habitats and other areas of high ecological value (such a species rich and semi natural grasslands which occur outside of designated areas), to avoid impacts on a range of birds of conservation concern, and to ensure meaningful application of Areas for Biodiversity Enhancement.
3. The Policy change to remove the application level limit of 20% on GPC1 type land (as per Circular 3 of 2016: Land Types for Afforestation) is a policy that will likely have a significant impact on a range of habitats and species listed in the annexes of the Birds and Habitats Directives. As such the policy change should be subject to an appropriate assessment as per the requirements of the Article 6 of the Habitats Directive.

## 2.0 Specific Comments and recommendations on the text of the Draft 'Environmental Requirements for Afforestation'

Here BirdWatch Ireland addresses specific sections within the Environmental Requirements document.

### 2.1 Section 1.1 1.1 : 'About these Environmental Requirements'

The ecosystem services provided by forestry are described in this section without also referencing the ecological damage that has been and continues to arise from much forest practice in Ireland. There has been greater damage from forestry in recent decades than environmental positives, hence this paragraph should reflect that balance. Damage and degradation can occur through: inappropriate location of new plantation forests, habitat loss including edge effects and habitat degradation, increased risk of predation, soil erosion through management operations, water

pollution arising from nutrient enrichment and sedimentation. Suggested wording for this is inserted in the consultation document after the first paragraph, and reads as follows:

*“Forestry can also contribute to species and habitat loss and damage to the aquatic environment. However, with proper planning and sensitive management, in accordance with relevant Environmental Requirements, such impacts can be avoided and mitigated against.”*

## 2.2 Section 1.2.1 European Communities (Forest Consent & Assessment) Regulations 2010

### 2.2.1 EIA Thresholds

There are outstanding concerns that significant levels of afforestation in marginal grassland habitats and uplands will have negative impacts on a range of threatened species and habitats and that the current EIA regulations and associated procedures in the forest consent system are not sufficient to ensure that such impacts are avoided. In particular, where there is a risk that the ‘in combination effects’ of numerous afforestation sites could be significant, or where the ‘in combination’ effects of forestry and other land uses, such as wind farm development, these could have significant cumulative negative impacts on sensitive, rare or protected habitats and species. The consent procedure and these Environmental Requirements must together ensure full compliance with the requirements of the EIA Directive and amending regulations. Because of the scale of afforestation envisaged under the forestry programme it is likely that afforestation of sites will proceed where environmental damage will likely result from afforestation and subsequent forest management activities. BirdWatch Ireland is concerned that the afforestation consent system will preclude the vast majority of afforestation sites from EIA and that these Environmental Requirements do not implement sufficient measures to protect such species and habitats.

The current system for screening and assessment for EIA, which incorporates the forest consent system and these draft ‘Environmental Requirements’ when implemented, should be reviewed to ensure that potential impacts are detected before consent is granted, including identification and assessment of cumulative impacts. Cumulative impacts can occur as a result of numerous individual afforestation sites in one geographic area; as a result of afforestation and other land use management changes such as land drainage; and from afforestation and wind farm development. EIA screening that caters to the separation of licencing between different agencies (Local Authority and An Bord Pleanála for planning and Forest Service for afforestation and felling) is a particular challenge to be addressed.

## 2.3 Section 1.2.2 European Union rules governing the Forestry Programme

This section of the draft ‘Environmental Requirements’ quotes the RDR rules that *“the selection of species to be planted, of areas and of methods to be used shall avoid the inappropriate afforestation of sensitive habitats such as peat lands and wetlands and negative effects on areas of high ecological value including areas under high natural value farming.”* **The draft ‘Environmental Requirements’ however do not lay out an adequate procedure which will ensure avoidance of afforestation on peatlands and wetlands.**

Many areas of extensive farming have a high diversity of semi-natural habitats and contain a great deal of biodiversity, including flora and fauna that are not found in more intensively farmed land and can be categorised as High Nature Value Farming. High Nature Value Farming must be supported and it is important to recognise that the ecological value of High Nature Value Farming is sustained by farming practices. High Nature Value farming can be threatened by afforestation, the latter in some cases delivering higher economic returns or through changes in land ownership. It is likely that

there will be significant negative effects on High Nature Value Farming arising from the current afforestation targets and the lack of procedures in the draft Environmental Requirements to monitor or prevent such loss. This is a delicate balance of competing land use policies which requires careful consideration. **The Environmental Requirements and the Natura Impact Statement (NIS) of the Forestry Programme 2014-2020 have not dealt with this issue despite there being a high risk that sensitive habitats and areas under high natural value farming will be negatively impacted by afforestation. This is a serious omission.**

#### Peat Soils

The stipulation that additional information and an assessment should be carried out “*where significant areas have peat depths greater than 0.5 metres peat depth.....*” is insufficient to mitigate against the negative environmental impacts of planting on peat soils. Peat depths of significantly less than 50cm can result in habitat loss, impacts on vulnerable and already threatened species, negative hydrological effects, susceptibility to soil erosion, water quality impacts, and loss of greenhouse gases from these soils if drained. In the context of climate change mitigation, it will be necessary to conserve soil carbon stocks, which is likely to be incompatible with afforestation on a commercial rotation, as there is insufficient knowledge of the post afforestation carbon balance once the forestry has been felled. According to COFORD, deforestation of these areas will result in a significant loss of CO<sub>2</sub><sup>6</sup>.

#### 2.4 Section 2.5 Biodiversity

In order to foster an understanding and an appreciation of the ways in which biodiversity protection is to be incorporated in to forestry practice, foresters and applicants reading the ‘Environmental Requirements’ would benefit from a brief explanation of which requirements apply and why. The draft for consultation does not sufficiently explain the basis for many of the stipulations in the requirements. Doing so will aid the roll out and proper implementation of measures. BirdWatch Ireland has made suggested additions to better explain the basis of the requirements in the main body of the document. The basis for these additions is further explained below.

##### *2.4.1 The impacts of afforestation on biodiversity, pollinators and Birds of Conservation Concern in Ireland*

Planted forest can provide habitats for bird, mammal, insect, and plant species, however a change in land-use from open to afforested can be detrimental to a range of other species. While some bird species avail of forest habitats and can make use of some stages of the forest cycle for breeding or foraging, the likely displacement of already threatened habitat types and associated species by afforestation in some locations is a challenge that so far has not been adequately addressed by these draft requirements.

Species-rich grasslands are particularly important for pollinators. There is good evidence that semi-natural grassland habitats<sup>78</sup> support the highest diversity of bees in Ireland<sup>9</sup>. At a time when 1/3 of

---

<sup>6</sup>COFORD Connects: The greenhouse gas balance of peatland forest by Kevin Black and Gerhard Gallagher, available here:

<http://woodenergy.ie/media/woodenergy/content/publicationsreports/The%20greenhouse%20gas%20balance%20of%20peatland%20forest.pdf>

<sup>7</sup> Westphal, C., Bommarco, R., Carré, G., Lamborn, E., Morison, N., Petanidou, T., ... Steffan-Dewenter, I. (2008). *Measuring Bee Diversity in Different European Habitats and Biogeographical Regions. Ecological Monographs, 78(4), 653–671.*

<sup>8</sup> ÖCKINGER, E., & SMITH, H. G. (2006). Semi-natural grasslands as population sources for pollinating insects in agricultural landscapes. *Journal of Applied Ecology, 44(1), 50–59.*

<sup>9</sup> Murray, T. E., Fitzpatrick, Ú., Byrne, A., Fealy, R., Brown, M. J. F., & Paxton, R. J. (2012). Local-scale factors structure wild bee communities in protected areas. *Journal of Applied Ecology, 49(5), 998–1008*

our wild bee species are under threat from extinction<sup>10</sup>, we must do our utmost to protect the semi-natural grasslands that pollinators rely on.

On account of land use changes and habitat loss, and the rapid pace of land use change that is occurring now through activities such as afforestation, a number of breeding bird species are at risk of significant negative impacts from afforestation in Ireland. Potential negative impacts on birds and habitats arising in change of land use from agriculture to forestry depend on the land use and management prior to afforestation<sup>11</sup>. The impacts of afforestation on biodiversity are influenced by many factors including planted tree species, management intensity and preceding land use type. Where plantation forests replace natural or semi-natural ecosystems, negative impacts on biodiversity are typically documented. A recent Irish study has shown that density of bird species of conservation concern increased in response to the planting of intensively managed grassland sites, but decreased in response to afforestation of peatlands and grasslands<sup>12</sup>.

Many upland specialist species are negatively affected by the expansion in forestry, particularly in areas of reduced value as farmland<sup>13</sup>. As many of these birds are now on the Red and Amber lists of Birds of Conservation Concern in Ireland (BOCCI), those involved in the forest sector must ensure that any plans for future planting consider bird communities, particularly those which are most sensitive to afforestation. For example, of the 37 species on the Red List of BOCCI, only Nightjars and Woodcock benefit for forest plantation habitat to a greater and lesser extent respectively. While some species can be found using young, pre-thicket forestry (e.g. BOCCI Amber-listed Hen Harrier), others avoid plantation forest altogether (e.g. breeding waders) and there may also be additional edge effects which reduce the suitability of adjacent habitats. **Much of the land that will be subject to afforestation in coming years will be outside of designated lands and thus require specific measures in the 'Environmental Requirements' to mitigate against impacts on these bird species and their habitats.**

Recognising the value of appropriate spatial planning for new planted forest in the wider countryside, a Scoping project for Bird Sensitivity Mapping Tool for future afforestation is in development by BirdWatch Ireland. It will aim to assess the potential sensitivities of birds to forest expansion, particularly those likely to be most sensitive based on ecological, behavioural and distributional information, in order to inform strategic planning of forest development and to support, maintain and improve the conservation status of priority bird species. This has not previously been carried out in Ireland and will contribute significantly to the decision-making process around environmental sensitivities, acknowledging that planning for forestry expansion in a strategic manner is the most effective means of minimising impacts on vulnerable bird species. It will not, however, serve to replace legal and other requirements for site specific assessments, but rather serve to indicate early where sensitivities are likely to occur.

---

<sup>10</sup> All-Ireland Pollinator Plan 2015-2020. National Biodiversity Data Centre Series No. 3, Waterford.

<sup>11</sup> Graham, Conor.T.; Wilson, Mark W., Gittings, T., Kelly, Thomas C., Irwin, Sandra; Quinn, John; O'Halloran, John., (2015) Implications of afforestation for bird communities: the importance of preceding land-use type *Biodiversity Conservation*, DOI 10.1007/s10531-015-0987-4.

<sup>12</sup> Graham, Conor.T.; Wilson, Mark W., Gittings, T., Kelly, Thomas C., Irwin, Sandra; Quinn, John; O'Halloran, John., (2015) Implications of afforestation for bird communities: the importance of preceding land-use type *Biodiversity Conservation*, DOI 10.1007/s10531-015-0987-4.

<sup>13</sup> Cummins, S., Bleasdale, A., Douglas, C., Newton, S., O'Halloran, J. & Wilson, H.J. 2010. The status of the Red Grouse in Ireland and the effects of land use, habitat and habitat quality on their distribution. Irish Wildlife Manual No. 50. National Parks and Wildlife Service, Dublin.

## 2.4.2 Rare and designated habitats and species occurring outside designated sites

### 2.4.2.1 Annex 1 Species of the Birds Directive

The Birds and Habitats Directives have been developed to reverse trends of severe declines in rare, threatened or endemic animal and plant species. Assigning designated areas is the main tool to achieve this, however the directives also recognise that many species require sensitive management of their habitats outside of the designated areas themselves.

In accordance with the needs of these rare and threatened species and habitats, the objectives under the biodiversity section of the 'Environmental Requirements' **must not be limited to the protection of designated species and habitats within designated sites, but be applied to their occurrence in the wider countryside**. This is currently a problem identified in the European Court of Justice ruling C418-04 against Ireland in which the Court found that despite a requirement to "make a serious attempt at protecting those habitats which lie outside the SPAs" Ireland has not "transposed that provision fully and correctly by taking suitable steps to avoid pollution or deterioration of the habitats lying outside the SPAs. It is thus clear, in the present case that Ireland must endeavour to take suitable steps to avoid pollution or disturbances of the habitats". This case is still open.

While procedures to address the need to protect Annexed habitats that occur in a non-designated locality are contained in Appendix 7, **the need to protect Annexed bird species that occur in a non-designated locality is not addressed in the draft requirements**. This is further dealt with below.

In addition, the extent of the risk and the need for measures (both in relation to habitats and species) is not made clear in the main body of the Environmental Requirements document. **To facilitate applicants and other parties, it is recommended that this be reflected in the main body of the requirements**. Accordingly, BirdWatch Ireland proposes the addition of the following text to the first objective in this section: *'This includes protected habitats and species occurring outside of the forest that may be impacted by forest activities'* to the first objective in this section (also inserted using track changes to the DRAFT Environmental Requirements document).

Several Annex 1 species have been, and continue to be, impacted by afforestation and forest management practices as documented by the Article 12 reports to the European Commission under the obligations of the Birds Directive. These species include Hen Harrier<sup>14</sup>, Merlin<sup>15</sup>, Golden Plover<sup>16</sup> and Dunlin<sup>17</sup>. Any afforestation in Special Protected Areas designated for these species must ensure it does not conflict with the conservation objectives to meet favourable population status for these species. For all species except Merlin whose population is unknown, their populations are in decline according to the Article 12 report. For Hen Harrier, Golden Plover in particular forest planting on open ground is a pressure/threat of high impact with Hen Harrier populations continuing to decline in Ireland and with fewer pairs nesting in the SPA network designated for the species<sup>18</sup>. For Dunlin, it is a threat of medium importance and for Merlin, another species of open ground which can use

---

<sup>14</sup> Article 12 report on Hen Harrier:

[http://cdr.eionet.europa.eu/Converters/run\\_conversion?file=ie/eu/art12/envuvesya/IE\\_birds\\_reports-14328-144944.xml&conv=343&source=remote#A082\\_B](http://cdr.eionet.europa.eu/Converters/run_conversion?file=ie/eu/art12/envuvesya/IE_birds_reports-14328-144944.xml&conv=343&source=remote#A082_B)

<sup>15</sup> Article 12 report on Merlin: [http://cdr.eionet.europa.eu/Converters/run\\_conversion?file=ie/eu/art12/envuvesya/IE\\_birds\\_reports-14328-144944.xml&conv=343&source=remote#A098\\_B](http://cdr.eionet.europa.eu/Converters/run_conversion?file=ie/eu/art12/envuvesya/IE_birds_reports-14328-144944.xml&conv=343&source=remote#A098_B)

<sup>16</sup> Article 12 report on Golden Plover:

[http://cdr.eionet.europa.eu/Converters/run\\_conversion?file=ie/eu/art12/envuvesya/IE\\_birds\\_reports-14328-144944.xml&conv=343&source=remote#A140\\_B](http://cdr.eionet.europa.eu/Converters/run_conversion?file=ie/eu/art12/envuvesya/IE_birds_reports-14328-144944.xml&conv=343&source=remote#A140_B)

<sup>17</sup> Article 12 report on Dunlin: [http://cdr.eionet.europa.eu/Converters/run\\_conversion?file=ie/eu/art12/envuvesya/IE\\_birds\\_reports-14328-144944.xml&conv=343&source=remote#A466-A\\_B](http://cdr.eionet.europa.eu/Converters/run_conversion?file=ie/eu/art12/envuvesya/IE_birds_reports-14328-144944.xml&conv=343&source=remote#A466-A_B)

<sup>18</sup> Ruddock, M., Mee, A., Lusby, J., Nagle, A., O'Neill, S. & O'Toole, L. (2016). The 2015 National Survey of Breeding Hen Harrier in Ireland. Irish Wildlife Manuals, No. 93. National Parks and Wildlife Service, Department of the Arts, Heritage and the Gaeltacht, Ireland

forest plantations for parts of its lifecycle, sustainable forest management practices during the breeding season are critical. While forestry is not the only impact on these species, all sectors be accountable for their actions and policies.

#### 2.4.2.2 BOCCI listed species

A review by Lynas et al. 2007<sup>19</sup>, identified Curlew, Golden Plover, Lapwing, Redshank, Red Grouse, Ring Ouzel and Twite as being among the birds of highest conservation concern in Ireland which are negatively impacted by afforestation.

The Draft Environmental Requirements must act to protect these species from further declines due to afforestation. **BirdWatch Ireland proposes the addition of the following text to the first objective in this section: “To avoid impacts on undesignated sensitive habitats and species, in particular Annex 1 species rich grassland and Birds of Conservation Concern (BOCCI)” (also inserted using track changes to the DRAFT Environmental Requirements document).**

#### 2.4.2.3 Curlew and other Breeding Waders

Curlew, along with other breeding waders, have almost disappeared from our countryside. The long-term breeding distribution of Curlew has declined by 89%<sup>20</sup> and perhaps only a few hundred pairs remain<sup>21</sup>. Habitat loss and degradation (as a result of agricultural intensification, land drainage and afforestation), predation, and human disturbance were identified as the primary threats to breeding populations in Europe<sup>22</sup>. Curlew nest in a range of habitats in Ireland, including low lying wet grasslands and marginal hill land, habitat types that are particularly targeted for afforestation. In a 2015 survey of breeding waders mechanical removal of peat and afforestation on open ground were the among the five most commonly recorded threats to breeding Curlew<sup>23</sup>. Studies in the UK have also shown that afforested areas are associated with decreased population size and breeding success in Curlew<sup>24,25</sup>. Afforestation of breeding habitat is one of the factors driving declines in Curlew as well as other breeding waders such as Dunlin and Golden Plover as referenced above in the Article 12 reports. Increasing vulnerability to predators (corvids and foxes) associated with planted forest has also been an issue identified in UK research as impacting breeding success of some breeding waders, including Dunlin. Curlew and other waders are now among our most threatened breeding birds and it is crucial that the Environmental Requirements incorporate consideration of Curlew habitat needs if we are to ensure that this species is not lost.

The inclusion of detail on habitat types and likely scenarios in which a special report will be required (Appendix 7 and 8) are welcome in the Environmental Requirements document. **However, BirdWatch Ireland notes the exemption of parallel requirements to address (i) bird species listed under Annex I of the Birds Directive which may be present in the land pinpointed for afforestation**

---

<sup>19</sup> Lynas, P., Newton, S.F. and Robinson, J.A. (2007) The status of birds in Ireland: an analysis of conservation concern 2008-2013. Irish Birds 8:149-166

<sup>20</sup> DAHG 2014. Ireland's Fifth National Report to the Convention on Biological Diversity. Department of Arts, Heritage and the Gaeltacht.

<sup>21</sup> Kelly, S. & Donaghy, A. (2015) "Breeding Curlew Survey 2015: Results from Donegal, West Galway, Kildare, Laois, Clare, North Tipperary, Kerry and West Limerick" Report to National Parks and Wildlife Service. BirdWatch Ireland.

<sup>22</sup> European Commission 2007. *Natura 2000 Technical Report 003-2007: Management Plan for Curlew (Numenius arquata) 2007–2009*. Luxembourg: Office for Official Publications of the European Communities.

<sup>23</sup> Kelly, S. & Donaghy, A. (2015) "Breeding Curlew Survey 2015: Results from Donegal, West Galway, Kildare, Laois, Clare, North Tipperary, Kerry and West Limerick" Report to National Parks and Wildlife Service. BirdWatch Ireland.

<sup>24</sup> Amar, A., Grant, M., Buchanan, G., Sim, I., Wilson, J., Pearce-Higgins, J. W. & Redpath, S. 2011. Exploring the relationships between wader declines and current land-use in the British uplands. *Bird Study*, 58, 13-26

<sup>25</sup> Douglas, D. J. T., Bellamy, P. E., Stephen, L. S., Pearce-Higgins, J. W., Wilson, J. D. & Grant, M. C. 2014. Upland land use predicts population decline in a globally near-threatened wader. *Journal of Applied Ecology*, 51, 194-203.



**within a non-designated locality, and (ii) bird species that are red and amber listed on the Birds of Conservation Concern.**

#### 2.4.3 *The need for Habitat Surveys on all sites for Afforestation*

The current section on Biodiversity (section 2.5) gives most attention to Areas for Biodiversity Enhancement. While this is a positive step, there is a logical hierarchy to begin efforts to prevent biodiversity loss with sufficient measures to recognise and address ongoing losses to rare and threatened species and habitats from further deterioration arising from afforestation. The lack of focus on species and habitat protection in this section is of concern.

Recent forest planting has overlapped with 78% of the 10x10 km squares occupied by birds of conservation concern in Ireland<sup>26</sup>

According to the **Bioforest Project**, a major research initiative carried out collaboratively between the EPA, COFORD, and several Irish Universities, deficiencies were identified in the afforestation consent procedure where sites without nature conservation designations are involved. The synthesis report states that *"lack of adequate strategic assessment, failure of regulations to require biodiversity assessment for the vast majority of afforestation proposals, and serious deficiencies in those biodiversity assessments that are carried out mean that sites of high biodiversity importance are currently at risk of being damaged by afforestation"*<sup>27</sup>. This conflict has still not been addressed by the current draft Environmental Requirements which fails to introduce a comprehensive system of assessing the potential negative impacts of afforestation on the large majority of planting sites (especially on undesignated sites). **The solution, as recommended by the 'Bioforest' report, is the introduction of ecological surveys on all new afforestation sites before consent and grant aid are granted.**

Recommendation 1 of the 'Bioforest' initiative states that *'All afforestation sites should be surveyed for the presence of semi-natural and species rich grassland before consent is granted for afforestation'*.

Recommendation 14 of the 'Bioforest' initiative states *'Pre-afforestation site surveys should map habitats using a standard classification and note the presence of indicators and other biodiversity features.'*

Recommendation 16 of the 'Bioforest' initiative states *'Foresters submitting grant applications should have completed accredited ecological training courses or employ qualified ecologists'*.

Habitat surveys on all sites proposed for afforestation will also enable the most ecologically appropriate Areas for Biodiversity Enhancement (ABE) to be identified, supporting the Registered Foresters to identify the best quality habitats onsite. In many cases, the presence of rare and protected habitat types; features and landscape elements important to specific plant or animal species existing in the locality; and even particularly ecological features which merit being included as ABE's, will not be detected or appropriately identified without sufficient ecological expertise. There are many instances where well intentioned policies are implemented without sufficient 'on

---

<sup>26</sup> Corkery, I.; Keating, U.; Lusby, J.; Irwin, S.; Quinn, J.; O'Halloran, J., (*In press*) Overlap of afforestation and birds of conservation concern on farmland habitat in Ó hUallacháin, D. and Finn, J.A. (eds.) 2015, *Farmland Conservation with 2020 Vision*, Portlaois, Ireland, October 21-22 2016, Wexford: Teagasc, 74-75. ISBN 978-1-84170-620-7

<sup>27</sup> Iremonger, S., O'Halloran, J., Kelly, D.L., Wilson, M.W., Smith, G.F., Gittings, T., Giller, P. S., Mitchell, F.J.G., Oxbrough, A., Coote, L., French, L., O'Donoghue, S., McKee, A.-M., Pithon, J., O'Sullivan, A., Neville, P., O'Donnell, V., Cummins, V., Kelly, T.C. and Dowding, P. (2007). Biodiversity in Irish Plantation Forests. Environmental Protection Agency and the National Council for Forest Research and Development.

the ground' ecological input and thus fail entirely to meet the objectives they are designed to meet. **BirdWatch Ireland considers that the implementation of ABEs as per section 2.5 will fail to deliver real benefits to biodiversity without a pre afforestation site survey being carried out by a suitable qualified ecologist.**

## 2.5 Procedures to Identify designated habitats and species, to avoid the inappropriate afforestation of sensitive habitats and other areas of high ecological value

### 2.5.1 Appendix 5: Specialised reports under 'Further Information'

The draft Environmental Requirements does not stipulate sufficient requirement for ecological assessment in a range of scenarios. In relation to species and habitats, the DRAFT states that:

“An ecological report compiled by a suitably qualified and experienced ecologist, e.g. where the potential exists for impacting a Flora Protection Order species, or where a Habitats Directive Annex I habitat is present on the site, within a non-designated locality.”

It has been well documented in published literature, as described above, that afforestation can impact a range of habitats and species, both those annexed in the Birds and Habitats Directives and those that are listed as Birds of Conservation Concern<sup>28</sup>. The above text in the draft requirements does not cater for many of the scenarios in which an ecological report should be required in order to protect features of biodiversity importance. The 'Environmental Requirements' must incorporate sufficient measures to ensure there are no further declines of annexed habitats, important biodiversity features and Red- listed species on the Birds of Conservation Concern.

The stipulations laid out in Appendix 7 and 8 are welcome, however many of these habitats and species listed in these appendices will likely not be identified prior to afforestation due to the lack of ecological expertise of the applicant and /or the forester. In most cases, the applicant and/ or forester are not qualified ecologists and while they may have excellent knowledge and insight and will be able to pick up on many features and habitat types, they do not possess sufficient skills and knowledge to comprehensively identify, describe and map biodiversity interest features, including rare features, or to evaluate their conservation importance. **The stipulations in the draft are thus likely to fail in the objective of compliance with the legal requirements (as sated in Section 1.2.4 of the draft requirements) and the biodiversity objectives described in section 2.5.**

‘An appropriate ecological assessment is required in sites where Annex I habitats or the habitat of Annex I birds or Annex II species occur or are likely to occur’ is specified in the Forestry Programme 2014-2020 (as stated in section 1.2.3) **however the requirements do not give effect to this necessity in relation to Annex 1-listed birds as there is no reference nor procedure laid out in the appendix nor in the main body of the text of the requirements. This is a serious omission.**

In accordance with the ambitious forest expansion plan contained in the Forestry Programme 2014 – 2020, it is likely that significant land area of sensitive habitats and other areas of high ecological value, will be contained within the category GPC 2-12 as described in Land Types for Afforestation (DAFM 2016) and thus may be afforested. Land types that will be afforested will potentially include areas of species rich semi-natural grassland; habitat for breeding waders such as the Curlew; undesignated lands which are important breeding, feeding and foraging habitat for Annex 1 birds of

---

<sup>28</sup> Colhoun K. & Cummins, S. 2013 Birds of Conservation Concern in Ireland 2014-19. Irish Birds 9:523-544

the Birds Directive; and various land types under High Nature Farming. While such habitats are not 'no go areas' for afforestation, the AA screening procedure and the requirement for specialised reports are currently inadequate to ensure that the more important of these habitat types will not be forested.

Specifically, the requirement for specialised reports under 'Further Information' (Appendix 5) does not address the following scenarios in which negative impacts on biodiversity may occur:

- i. Loss from afforestation of feeding, foraging or nesting habitat for bird species listed in Annex 1 of the Birds Directive, where they occur within a non-designated locality.
- ii. Loss from afforestation of feeding, foraging or nesting habitat by Birds of Conservation Concern including the following:
  - Breeding Curlew – a breeding wader suffering severe population declines (described above), Red-listed in Birds of Conservation Concern. Breeding Curlew require specific concerted protection from afforestation of open breeding habitat.
  - Lapwing and Redshank – grassland breeding wader species Red-listed on Birds of Conservation concern and shown to be adversely affected by afforestation<sup>29</sup>
  - Small passerines such as Skylark, Whinchat and Meadow Pipit (see BOCCI list)
  - Red Grouse as indicator species for peatlands (including heath) where the assessment of habitat status is poor – these birds are not on the Annex 1 of the Birds Directive but likely to be affected by afforestation
  - Twite is also a species of highest conservation concern in Ireland (BOCCI) which could potentially be negatively impacted by afforestation
  - Riverine species such as Dipper and Grey Wagtail. Potential to be negatively impacted through acidification of river catchments
  - Loss of seed eating farmland birds such as Linnet and Yellowhammer which will not utilise new or existing forestry habitats
- iii. Loss of species rich and semi natural grasslands which occur outside of designated areas. These often contain many plant species, including broadleaved herbs, sedges, and a variety of seed producing grasses which support a wide variety of invertebrates, pollinators and a high diversity of birds. All sites proposed for afforestation should be surveyed for the presence of semi-natural and species rich grassland before consent is granted for afforestation. The overall quality of each of the Annex I grassland habitats surveyed in response to Article 17 requirements of the Habitats Directive<sup>30</sup> was 'Unfavourable – Bad', emphasising their vulnerability in Ireland and the urgency with which they need to be studied, monitored and offered suitable management support measures.

Specific consideration of avoidance and mitigation of potential negative impacts on the above listed species and habitats can only be effectively applied with pre afforestation ecological site surveys. These would provide the first step of the assessment of potential impacts and the procedures laid out in Appendices 5, 7 and 8, of the 'Environmental Requirements for Afforestation'. The

---

<sup>29</sup> Lauder, C. & Donaghy, A. (2008) Breeding Waders in Ireland 2008: A Review and Recommendations for Future Action. Unpublished report to the NPWS

<sup>30</sup> NPWS (2013). The Status of Protected EU Habitats and Species in Ireland. Overview Volume 1. Unpublished Report, National Parks & Wildlife Services. Department of Arts, Heritage and the Gaeltacht, Dublin, Ireland. Editor: Deirdre Lynn

introduction of pre-afforestation site surveys will allow for compliance with the obligations to protect biodiversity contained in the wider countryside as stipulated in the Birds and Habitats Directives, the ECJ Ruling against Ireland (C418-04), and the objectives of the EU Biodiversity Action Plan. Such surveys are a necessary step to help to avert further population declines of lowland farmland birds and breeding waders such as Curlew, as identified in Corkery et al (*in press*) and Graham et al 2015.

Additionally, neither the existing screening procedures nor the criteria for requesting specialised reports will effectively address the EU RDR Regulation that requires *“the selection of species to be planted, of areas and of methods to be used shall avoid the inappropriate afforestation of sensitive habitats such as peat lands and wetlands and negative effects on areas of high ecological value including areas under high natural value farming.”* The avoidance of such habitats, including afforestation of peatland soils (including those >0.5m depth) and areas under high natural value farming will not be detected unless the routine pre afforestation site surveys carried out by suitable qualified ecologists.

In order to comprehensively address these needs, BirdWatch Ireland considers that, in accordance with the recommendations of the ‘Bioforest’ report, and in order to meet a range of legislative requirements and policy commitments, **pre afforestation site surveys must be carried out by a suitably qualified ecologist in order to identify designated habitats and species (such a species rich and semi natural grasslands which occur outside of designated areas), to avoid the inappropriate afforestation of sensitive habitats and other areas of high ecological value, and to ensure meaningful and effective Areas for Biodiversity Enhancement.**

## 2.6 Revocation of current suite of guidelines

BirdWatch Ireland wish to raise concern that in the event these ‘Environmental Requirements for Afforestation’ replace the current suite of guidelines regarding water, archaeology, biodiversity and landscape, there will be no guidance or Environmental Requirements in place for either ongoing forest management operations nor for felling. The Review of Forest Policy commits that ‘all environmental guidelines will be updated’. Updating the afforestation requirements in isolation is a partial fulfilment of this commitment and must not be seen as an entire fulfilment of this commitment. It is recommended that new requirements be produced for these stages of the forest cycle also and be in place before the revocation of the current suite of guidelines.

## 3.0 Parallel consultation on Policy change ‘To remove the application level limit of 20% on GPC1 type land’:

BirdWatch Ireland has previously made a submission to the land availability working group in August 2012 in which concerns were raised about the environmental implications of extending the rate of afforestation on unenclosed upland. The DAFM publication entitled Land Types for Afforestation, released under Forest Service Circular 3 of 2016, describes land types according to their productivity by assessing vegetation, and accordingly identifies the overlap between ‘unsuitable land’ and annexed habitats under the Habitats Directive. BirdWatch Ireland is concerned that there will likely be significant negative impacts on protected species and habitats which are likely to occur in GPC 1 land types as there is likely to be a high overlap with sensitive habitats and other areas of high ecological value.

As stated in the Land Types for Afforestation document, sites over 300m above sea level in the west of Ireland and over 400m in the east of Ireland are classed as unsuitable land for afforestation under the Afforestation Scheme. Any new planting on peatland soils, in particular on lowland and upland

blanket bogs sites<sup>31</sup> which lie below these 300 and 400m as limits, could have negative consequences not just for these peatland habitats, but for those breeding birds that are uniquely associated with them<sup>32</sup>. Up to 20% of Ireland's Land Cover is peatland<sup>33 34</sup> with most of these peatland habitats being in poor or unfavourable conservation status<sup>353637</sup>. Ireland's peatlands are an integral part of our natural heritage, and provide a host of ecosystem services that need to be safe-guarded<sup>38</sup>. Overall, drainage, associated with afforestation in peatland habitats, reduces the cover of species dependent on high water tables, notably cottongrass and Sphagnum spp, and tends to increase the cover of those plant species with affinities to drier heath<sup>39</sup>.

Species assemblages for insect communities varies depending on the underlying habitat. Studies of bogs and heath in the UK have shown that True flies, particularly craneflies (Tipulidae) are most numerous on blanket bogs and other peat-based habitats, being estimated to comprise 20% of the standing crop on such habitats in one study, compared to 4% on dry heath<sup>40</sup>. Craneflies and their larvae are an essential component of the diet of many breeding waders<sup>41</sup> including the Golden Plover (Annex 1 species) and the Curlew, both of which are Red-listed in Ireland<sup>42</sup>. The standing crop of invertebrates is substantially greater on upland limestone grasslands than on other moorland habitats, due largely to the abundance of earthworms in this habitat, with blanket bog having a greater standing crop than dry heath<sup>43</sup>.

Mountain blanket bog represents just under a quarter of our peatlands, with lowland blanket bog (41%) and raised blanket bog (37%) making up the vast majority<sup>44</sup>. With over a third of the forest estate now on peatlands<sup>45</sup> further afforestation of new peatland areas needs to be managed so as not to adversely impact many species associated with these habitats, many of which are species of conservation concern<sup>46</sup>. Grassland habitats on peatland soils (e.g. wet grassland with rushes) act as

---

<sup>31</sup> Fossitt, J.A. 2000 *A Guide to Habitats in Ireland*. The Heritage Council.

<sup>32</sup> BirdWatch Ireland. 2011. Action Plans for Dune and Machair Birds/ Shore and Lagoon Birds/ Riparian Birds/ Woodland and Scrub Birds/ Raised Bog Birds/ Upland Birds/ Lowland Farmland Birds/ Marine & Seacliff Birds/ Urban and Suburban Birds and Lake, Fen and Turlough Birds. A project partially funded through the Environment Fund by the Department of the Environment, Community and Local Government. BirdWatch Ireland, Wicklow.

<sup>33</sup> Connolly, J., Holden, N.M., 2009. Mapping peat soils in Ireland: updating the derived Irish peat map. *Irish Geography* 42 (3), 343–352.

<sup>34</sup> Hammond, R.F., 1979. The peatlands of Ireland. *Soil Survey Bulletin*. An Forás Talúntais, Dublin.

<sup>35</sup> Douglas, D.J.T., Bellamy, P.E., Stephen, L.S., Pearce-Higgins, J.W., Wilson, J.D. & Grant, M. 2013. Upland land use predicts population decline in a globally near-threatened wader. *Journal of Applied Ecology* DOI: 10.1111/1365-2664.12167

<sup>36</sup> Renou-Wilson, F. et al (2011) BOGLAND: Sustainable Management of Peatlands in Ireland, published by the Environmental Protection Agency, available online: [http://www.epa.ie/downloads/pubs/research/land/name\\_31495,en.html](http://www.epa.ie/downloads/pubs/research/land/name_31495,en.html)

<sup>37</sup> NPWS (2013). The Status of Protected EU Habitats and Species in Ireland. Overview Volume 1. Unpublished Report, National Parks & Wildlife Services.

<sup>38</sup> Renou-Wilson, F. et al (2011) BOGLAND: Sustainable Management of Peatlands in Ireland, published by the Environmental Protection Agency, available online: [http://www.epa.ie/downloads/pubs/research/land/name\\_31495,en.html](http://www.epa.ie/downloads/pubs/research/land/name_31495,en.html)

<sup>39</sup> Coulson, J.C., Butterfield, J.E.L. & Henderson, E. 1990. The effect of open drainage ditches on the plant and invertebrate communities of moorland and on the decomposition of peat. *Journal of Applied Ecology*, 27, 549-561.

<sup>40</sup> Coulson, J.C. 1988. The structure and importance of invertebrate communities on peatlands and moorlands, and effects of environmental and management changes. In: Usher, M.B. & Thompson, D.B.A. (eds) *Ecological Change in the Uplands*. Blackwell, Oxford.

<sup>41</sup> Grant, M., Orsman, C., Easton J., Lodge, C., Smith, M., Thompson, G., Rodwell, S. & Moore N. 1999. Breeding success and Causes of Breeding Failure of Curlew *Numenius arquata* in Northern Ireland. *Journal of Applied Ecology* 36: 59-74.

<sup>42</sup> Colhoun K. & Cummins, S. 2013 Birds of Conservation Concern in Ireland 2014-19. *Irish Birds* 9:523-544

<sup>43</sup> Coulson, J.C. 1988. The structure and importance of invertebrate communities on peatlands and moorlands, and effects of environmental and management changes. In: Usher, M.B. & Thompson, D.B.A. (eds) *Ecological Change in the Uplands*. Blackwell, Oxford.

<sup>44</sup> Renou-Wilson, F., Keane, M. and Farrell, E.P. (2009) 'Afforestation of industrial cutaway peatlands in the Irish midlands: site selection and species performance'. *Irish Forestry*, 66 :85-100.

<sup>45</sup> The second *National Forestry Inventory 2012, Republic of Ireland, Main Findings*. Published by: Forest Service, DAFM

<sup>46</sup> Colhoun K. & Cummins, S. 2013 Birds of Conservation Concern in Ireland 2014-19. *Irish Birds* 9:523-544

an important feeding habitat for our breeding waders utilised by Curlew, Golden Plover and Lapwing  
47 48

The decline in Curlew and Lapwing is well documented in Ireland in this submission, the decline in Curlew being so severe that the species' status was elevated to IUCN near-threatened in 2008. Recent work in the UK has demonstrated that Curlew declines are linked with landuse changes in British uplands (chiefly afforestation) is associated with Curlew declines, with predation the most likely mechanism<sup>49</sup>. While negative effects of forest and forest edge effects on species such as Golden Plover and Dunlin are also known<sup>50</sup>, the possible effects on other sensitive upland birds breeding in areas outside of the core breeding range for Golden Plover and Dunlin<sup>51</sup>, needs to be also taken into account. Red-listed species occurring in such areas include the Red Grouse, Woodcock, Meadow Pipit, Whinchat and Twite<sup>52</sup>. Any major landuse changes such as afforestation are likely to impact the species directly through losses in suitable nesting and foraging habitats and changes in composition of habitats and invertebrate communities adjoining newly forested areas through drainage, changes in plant composition etc.<sup>53,54,55</sup>.

### Key Concerns:

1. According to the programme of measures by Ireland<sup>56</sup> to ensure full compliance with the Judgment of the Court of Justice of the European Union, Ireland has committed to 'no afforestation of heath/bog' as one of the measures that will address Ireland's failure to apply obligations to protect birds in the wider countryside as required by Article 4(4) of the Birds Directive. The removal of the application level limit of 20% on GPC1 type land will open up significant areas of heath and bog to afforestation, directly contrary to the commitment submitted by Ireland in July 2015 to address this ruling. **Thus this policy change contravenes the measures that Ireland has put in place to address the findings of case 418-04 and, if implemented, may instigate further legal action against Ireland for non-compliance with an existing ruling.**

---

<sup>47</sup> Buchanan, G.M., Grant, M.C., Sanderson, R.A & Pearce-Higgins, J.W. (2006). The contribution of invertebrate taxa to moorland bird diets and the potential implications of land-use management. *Ibis* 148: 615-628.

<sup>48</sup> Lauder, C. & Donaghy, A. (2008) Breeding Waders in Ireland 2008: A Review and Recommendations for Future Action. Unpublished report to the NPWS

<sup>49</sup> Douglas, D.J.T., Bellamy, P.E., Stephen, L.S., Pearce-Higgins, J.W., Wilson, J.D. & Grant, M. 2013. Upland land use predicts population decline in a globally near-threatened wader. *Journal of Applied Ecology* DOI: 10.1111/1365-2664.12167

<sup>50</sup> Wilson, J.D., Anderson, R., Bailey, S., Chetcuti, J., Cowie, N.R., Hancock, M.H., Quine, C.P., Russell, N., Stephen, L. & Thompson, D.B.A. 2013. Modelling edge effects of mature forest plantations on peatland waders informs landscape-scale conservation. *Journal of Applied Ecology* DOI: 10.1111/1365-2664.12173.

<sup>51</sup> Cummins, S., Corbishley, H. & Newton, S. 2003. Upland Bird Survey Report 2003 for Counties Sligo, Leitrim, Cavan & north County Mayo. BirdWatch Ireland Conservation Report.

<sup>52</sup> Balmer, D., Gillings, S., Caffrey, B., Swan, B., Downie, I. & Fuller, R. 2013. *Bird Atlas 2007-11 The breeding and wintering birds of Britain and Ireland*. British Trust for Ornithology. Thetford.

<sup>53</sup> Stroud, D.A., Reed, T.M., Pienkowski, M.W. & Lindsay, R.A. 1987. Birds, bogs and forestry: the peatlands of Caithness and Sutherland. Nature Conservancy Council, Peterborough. 121 pp.

<sup>54</sup> Coulson, J.C., Butterfield, J.E.L. & Henderson, E. 1990. The effect of open drainage ditches on the plant and invertebrate communities of moorland and on the decomposition of peat. *Journal of Applied Ecology*, 27, 549-561.

<sup>55</sup> Douglas, D.J.T., Bellamy, P.E., Stephen, L.S., Pearce-Higgins, J.W., Wilson, J.D. & Grant, M. 2013. Upland land use predicts population decline in a globally near-threatened wader. *Journal of Applied Ecology* DOI: 10.1111/1365-2664.12167

<sup>56</sup> Department of Arts Heritage and the Gaeltacht 'A Programme of measures by Ireland to ensure full compliance with the Judgment of the Court of Justice of the European Union in Case C 418/04 Commission v Ireland "The Birds Case"; Update – July 2015 [http://www.ahg.gov.ie/app/uploads/2015/09/birds-case-pom-july-2015\\_0.pdf](http://www.ahg.gov.ie/app/uploads/2015/09/birds-case-pom-july-2015_0.pdf)

2. BirdWatch Ireland consider that this policy change, which will result in significant land use change and potential significant negative impacts on a wide range of habitats types, including likely impacts on Annex 1 bird species occurring in the wider countryside, should be subject to screening for **Strategic Environmental Assessment**. This must be conducted prior to the implementation of the policy change.
3. Because of the threat posed by the policy change to annex 1 species of the Birds Directive and associated threat to the potential of reaching the conservation objectives for a number of designated habitats, it would be prudent for the Forest Service to conduct an **appropriate assessment**, in accordance with Article 6 of the Habitats Directive, of the plan to remove the application level limit of 20% on GPC1 type land. According to the legislation, the authority must assess, in the light of the best scientific knowledge in the field, all aspects of the policy which can, by itself or in combination with other plans or projects, affect designated sites.

This submission was prepared by BirdWatch Ireland staff and further communication should be directed to Oonagh Duggan at [oduggan@birdwatchireland.ie](mailto:oduggan@birdwatchireland.ie).