



**Comments by  
The Royal Society for the Protection of Birds**

**on**

**Review of evidence underpinning the English Nature  
Thames Basin Heaths Delivery Plan**

**10 November 2006**

## Introduction

1. The RSPB submits these comments in response to the “*Review of evidence underpinning the English Nature Thames Basin Heaths Delivery Plan*” (the ‘PR’) completed by the RPS Group plc on behalf of the Department for Communities and Local Government. References in this document to the ‘RSPB submission’ are to the document submitted to the Assessor by the RSPB on 30 October 2006.

## Overview

2. While the RSPB disagrees strongly with a fundamental conclusion of the PR that the ecological evidence base is weak (see section 2), we support the overall conclusion (at paragraph 0.1.6) that the Delivery Plan (DP):

*“...provides a Birds and Habitats Directive compliant mechanism for the consideration of residential development applications around the Thames Basin Heaths SPA.”*

3. We make the observation that a recurrent failure in the PR is that it does not view the DP approach as integral to the application of Articles 6(3) and 6(4) of the Habitats Directive to the South East Plan and related local development frameworks, in compliance with the European Court of Justice ruling against the UK Government<sup>1</sup>. Addressing the cumulative effects of the proposed allocation of thousands of new homes on the Thames Basin Heaths SPA is the *raison d’être* of the DP<sup>23</sup>.

## The Legal Opinion (LO)

4. The RSPB has considered carefully the independent legal advice provided in the PR. In general, we find it a well-articulated analysis of the legal obligations under the Birds and Habitats Directives and their correct application. It sets out a highly convincing assessment of the DP as a well conceived and thought through application of the Habitats Directive requirements, designed to secure the protection of the Thames Basin Heaths SPA and enable residential development to proceed in an efficient manner. It confirms the soundness of the DP’s strategic approach and, even on the flawed review of the ecological evidence base (see section 2 below), that the DP is both justified and proportionate.
5. Overall, it appears to the RSPB that there is an uneasy tension between the LO and the remainder of the report.
6. Notwithstanding our general support for the LO (which supports the interpretation of the Birds and Habitats Directives set out in the RSPB submission), we have the following minor comments:
  - 6.1. the LO in places (e.g. paragraphs 11.2.5, 11.3.4 of main report, and paragraphs 1.5 and 2.4, Appendix J) fails to set out the full sequential tests of Articles 6(3) and 6(4) of the Habitats Directive. In particular it sometimes fails to refer to the Article 6(4) alternative solutions test as a precursor to those on imperative reasons of overriding public interest and compensatory measures, although the test is correctly described at paragraph 2.5, Appendix J;
  - 6.2. alternative solutions are incorrectly referred to as part of Article 6(3) (paragraph 5.11, Appendix J);
  - 6.3. it fails to distinguish between ‘*avoidance measures*’ designed to avoid a likely significant effect and ‘*mitigation measures*’ to reduce or remove a predicted adverse effect;
  - 6.4. it also fails to distinguish between measures to mitigate the potential adverse effects of a plan or project under Article 6(3) and alternative solutions to the plan or project in question under Article 6(4)(paragraph 5.11, Appendix J);
  - 6.5. it is incorrectly stated that woodlark is not one of the qualifying interests of the SPA (paragraph 5.9, Appendix J): we assume this is a typographical error since it correctly includes the woodlark in the rest of the opinion.

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<sup>1</sup> See Case C-6/04

<sup>2</sup> See paragraphs 81-87, 95-99 and 133-136 of the RSPB submission

<sup>3</sup> See also section 2 of EiP document TBH 2

### *Application of the precautionary principle*

7. The LO correctly states how the precautionary principle should be incorporated in this case. Firstly, it is correct that the precautionary principle is a principle contained within the EU Treaty and secondly that the Habitats and Birds Directives must be interpreted by reference to such a principle (paragraphs 2.14 and 4.7, Appendix J). However, its use goes further as Regulation 48(5) of the Habitats Regulations<sup>4</sup> contains the precautionary principle within its requirement. Therefore, if there is any doubt that a plan or project might adversely affect the European site, permission cannot be granted.
8. The PR constantly refers to the ideal situation where there is sufficient data and assessment to determine absolutely one way or another the plan/project's impact on an European site. It then argues that the weak ecological evidence base means the precautionary principle has to be *invoked* (e.g. paragraph 11.3.7 first bullet point). We make the following observations on this issue:
  - 8.1. The ecological evidence base is strong (see section 2 below);
  - 8.2. Such an idealised scenario is an impossible way for developers to work (see paragraph 11.3.7 where the PR recognises the high cost involved);
  - 8.3. The drafting of Regulation 48 acknowledges that doubt can exist in all scientific research. The Waddenzee case<sup>5</sup> focuses the debate on reasonable scientific doubt, not necessarily absolutes i.e. requires a robust approach to risk. To carry out such a perfect assessment would be a serious financial burden on developers and scientifically challenging, as it would involve lengthy, robust and scientifically peer-reviewed research.
  - 8.4. The LO correctly states the precautionary principle must be used as a matter of law (paragraph 6.5, Appendix J), and the UK cannot lawfully continue to permit residential development without it (paragraph 5.22, Appendix J). Therefore, the option to ignore the precautionary principle should never have influenced the PR.
9. Therefore, to protect European sites against harm but allow vital and unavoidable projects to proceed in the absence of undisputable scientific evidence, the precautionary principle is used. This is subject to the tests of Article 6(4), and requirement for compensation to offset harm to the European sites.

### **Review of the Ecological Evidence Base**

10. The RSPB is disappointed with the quality of the PR of the ecological evidence base and disagrees strongly with its conclusion that the evidence base is '*weak*'.
11. The PR has not considered some of the latest available evidence, and in a number of instances, where the existing literature has been examined, there are inaccuracies and omissions. Given this flawed literature review, and the partial nature of the conclusions, it is the RSPB's view that the PR of the available literature was poorly conducted and that its conclusions are unsound, inaccurate and lack balance. A comparison between the RSPB review of results (see Appendix 5, RSPB submission) and the conclusions on pages 126-127 of the PR underline this point.
12. We disagree strongly with the view expressed in the PR (for which no evidence is given) that the statistical relationships between measures of access pressure and bird populations are only weak. On the contrary, we believe the results show strong and substantial links between on-site recreational activity and both direct and indirect effects on Annex I birds. Therefore, the RSPB recommends that the PR's description of the ecological evidence base as "only weak" be dismissed.
13. Our comments set out below are based on a detailed examination of Appendix D of the PR. As Appendix D forms the basis of many of the conclusions and judgements made in the main body of the PR, the RSPB considers it necessary to set out in some detail its comments on that Appendix. These comments should also be read against all references to the ecological evidence base contained in the main sections of the PR.

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<sup>4</sup> Conservation (Natural Habitats, &c.) Regulations 1994, implementing Article 6(3) of the Habitats Directive

<sup>5</sup> See Case C-127/02

*Detailed comments*

14. The following comments give a far from exhaustive range of examples to illustrate the reasons for the RSPB's conclusions<sup>6</sup>.

Annex I species in general

15. The recent and important '*in press*' papers by Mallord 2006 and Murison 2006 (see RSPB submission) were not consulted despite being drawn to the attention of one of the reviewers and being available from the authors.

Nightjar

16. The report by Liley & Clarke 2002, was, for nightjar, clearly superseded by the peer reviewed and more detailed published paper (Liley & Clarke 2003) (both cited in the PR reference list). The latter receives only one mention in the PR in relation to postcode data, which was not actually used in the paper's analyses. The PR has failed to properly review the latest and most authoritative paper.
17. D3.1.2 - Murison found that failed nests were significantly more likely to fail in short than in tall vegetation; that predated nests were significantly closer to the nearest path than un-predated nests; that nests with a higher total length of path within 50m, 100m and 500m were associated with significantly higher nest predation; and that a predictive model found that the proximity of a nest to paths was a significant predictor of nest success. These rigorous and highly significant results are summarised in the PR as '*it appears that nest success was in some way determined by habitat and location of footpaths*' (D3.1.2 – emphasis added). The reviewers however, point out later in the same paragraph, that the correlation between measures of urban development and nightjar breeding success in Murison's work was "not found to be significant at the 5% level". Thus, the significant results relating disturbance and nightjars are referred to dismissively while a non-significant result on links between disturbance and nightjar breeding results are specifically reported in the PR.
18. D3.3.1 points out that the report by Woodfield & Langston (2004) found that only 12% of dogs were off footpaths, suggesting that this relatively small proportion goes some way to contradict the hypothesis in Appendix 6 of the DP that dogs are responsible for flushing incubating nightjars. Apart from the unsoundness of the implied assumption that only 12% of dogs are insignificant for which the PR offers no evidence, the reviewers have clearly failed to note the conclusions of another study, based on a larger sample size, which gives a figure of 47% of dogs off paths. This study (Clarke et al 2005, now published as 2006) is quoted earlier in D3.1.3 so the reviewers have clearly seen, but not carefully read it.
19. D3.2.1 & D3.3.2 - the paper by Cresswell (1996) listed as having been reviewed in the PR was clearly not consulted, as the PR goes to some lengths to point out that a figure of 8km, given as the maximum range of foraging nightjars is incorrect and goes on to quote a figure of 5.8 km figure taken from a different paper. In fact the correct figure from Cresswell (1996) was 7km.
20. D6.2.1-D6.2.7 – in the summary under nightjar, the PR fails to mention almost all of the significant links found in the research between on-site levels of disturbance and densities or productivities of the Annex I species. It reports on two significant results linking disturbance to nightjar breeding success and dismisses both as unproven, reports on one significant finding in relation to nightjar nest location and housing, and advises on two non significant results. Finally, it mentions, inaccurately, that two nests were disturbed by dogs but fledged successfully (in fact it was a single nest disturbed twice). This should be compared with the RSPB summary of evidence (Appendix 5, RSPB submission), which reports impartially on 30 significant and non significant findings from the same body of research.

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<sup>6</sup> References to 'significance' relate to statistical significance – please see paragraph 55 of the RSPB submission for an explanation of this term.

Woodlark

21. In D4.1.2, the PR notes that the Mallord work was undertaken in 2002 and 2003 with 14 and 28 nests (n=42) located in the two years respectively. Attention is drawn to this small sample size in the summary (and in the main report). A fuller reading of the PhD would have shown that the work started in 2001 and that Mallord found 32, 72 and 106 nests (n=210) during his study, a substantial sample by any standards.
22. D4.2.1 notes that the DP gives a maximum woodlark home range as being 5ha, but states that Bowden (1990), who worked on woodlarks in Suffolk, gives it as rarely less than 3ha, thus implying that the DP had failed to review the Suffolk data. In fact the Bowden figure was taken from territory estimates by another worker, and the figures are from studies in East Germany, as a proper reading of the reference would have revealed.
23. D4.2.2 indicates that the DP did not give the extent to which disturbance measures included forms of recreational access that affected woodlark density, nor state whether postcode data was used to assess the impact data from urban development, and therefore the results should be treated as unproven. In fact, Mallord found woodlark density per site was significantly negatively correlated with numbers of people, dogs and disturbance events, and did not use postcode data in his analysis, information that could be readily obtained by reading his thesis. In the next paragraph D4.2.3, the PR quotes the DP as saying that Mallord's work shows no effect of disturbance on nest survival but adds several more precise details taken from a reading of his thesis. Thus in D4.2.2 the PR appears to cast doubt on the extent and basis of the results even though a reading of the thesis indicates that these were significant, comprehensive and soundly based, whereas, in D4.2.3 the PR reports on the fuller results, taken from a reading of the thesis, apparently to underline that there was no significant effect.
24. In D4.3.1, D4.3.2 and D4.3.3 the PR reports on the model of various visitor scenarios which Mallord has undertaken, but it does not mention or review the underlying assumptions. Nor does it point out that the predicted current population in the model (on which all other percentage changes are based) is 16%-47% higher than actually occurs, although Mallord makes that point in his summary. Therefore, in reviewing the model, the PR is uncritical and selective. However, in paragraph D4.1.3, where reporting on another mathematical model by Mallord, which estimated that woodlark productivity could be 34% higher in the absence of disturbance, the PR casts doubt on this by suggesting the scenario is unrealistic, listing some of the assumptions and pointing out that the actual and predicted means are not different. In other words, the PR is critically reviewing these models in a partial way.
25. D4.3.6 suggests that results referenced in the DP but not published in a peer reviewed paper should be treated with caution, but fails to give the same caution in D3.3.2 and D3.3.3 when quoting at length from Bowden & Green (1991) (which is not referenced in the DP) and was unpublished.
26. D4.4.1 - the PR notes that Liley & Clarke (2003) (as this section refers to work on woodlarks which is not included in Liley & Clarke 2003, we presume the reviewers mean Liley & Clarke 2002 where it is) found no significant relationship between woodlark territory density and developed land surrounding sites, contradicting the results found by Mallord. They fail to note, however that Mallord's work was based on the more precise measurement of suitable habitat, whereas the earlier work was based on heathland patches, and thus there is no contradiction. Neither do they mention that this point i.e. the need to use a more precise measure of woodlark density, was mentioned in the summary to the Liley & Clarke (2002) report.
27. D6.3.1-D6.3.5 - leaving aside the findings on predation to artificial nests (Taylor 2002), the RSPB summary gives 20 findings of significant effects or failure to find effects, between measures of disturbance and woodlarks. The PR summarises only five, and omits to mention all the most important and significant findings that directly relate woodlark density to on-site measures of disturbance. The conclusion repeats the inaccurate information on the nest sample size used by Mallord (2005)(see paragraph 21 above).

### Dartford warblers

28. As the main research paper on Dartford warblers and research was not reviewed, the conclusions in the PR for this species are largely irrelevant.

### *Criticisms of the statistical robustness of the evidence base*

29. The conclusions (at paragraph 14.2.1) that the statistical robustness of the relationships between measures of access pressures and bird populations is only weak, and that sample sizes are small, is unsound because:
- 29.1. The PR has not fully reviewed the scientific findings, either by not including recent work or, by not including all the findings in those published works that it claims to have studied;
  - 29.2. At no point has the PR examined or questioned the statistical techniques used in the scientific evidence; and
  - 29.3. In one major study, the PR has failed to establish the size of the sample and has inaccurately concluded that it is small.

### *Meeting with the RSPB*

30. The RSPB notes that the PR (paragraph 3.2.2) states that RPS met the RSPB to “ensure access to key documents and to discuss the past and ongoing research that RSPB conducts on the three key Annex I species.” We wish to note that the meeting referred to was an informal meeting with staff not working on the Thames Basin Heaths issue. At this meeting it was recommended that the RPS representative:
- 30.1. Make formal contact with those RSPB staff closely involved in the ecological research elements of the Thames Basin Heaths to obtain more detailed advice; and
  - 30.2. Consult some of those papers referred to in our detailed comments above.
31. Neither recommendation was followed up by RPS.

### **Options for Flexibility**

32. In seeking an alternative approach to the DP, the PR sets out several ‘options for flexibility’ in Chapter 8 and Appendix H. The majority of these are then tested against the requirements of the Birds and Habitats Directives in the full LO (Appendix J).
33. It is the RSPB’s view that many of the options are not worthy of further consideration and it concurs with the LO (Appendix J and paragraph 11.3.11) that they would be in breach of the Habitats Directive, given that they require suspension of the precautionary principle (enshrined in Article 6(3) of the Habitats Directive). They should therefore be ignored on grounds of illegality. We are concerned that the underlying theme of these options encourages developers to pursue a time-consuming and potentially confrontational case-by-case approach, rather than working through the strategic plan-led system to seek a solution that both ensures the protection of the SPA and enables new residential development to proceed in an efficient manner.
34. The RSPB notes and, in general, concurs with Natural England’s comments on the ‘options for flexibility’ set out in its comments on the PR. We have the following additional comments to make:
- 34.1. **Forestry plantations** – we refer the Assessor to paragraphs 89-91 and 101 of the RSPB submission;
  - 34.2. **Presence of Dartford warbler only** (paragraph 8.2.6) - the PR failed to review the evidence for disturbance to Dartford warblers (see above). This evidence shows a clear effect of disturbance to Dartford warblers, a species that is also particularly vulnerable to the effects of increasing numbers of wild fires, another result of urbanisation. Both nightjars and woodlark either do, or could, nest on all the sites where Dartford warblers have been recorded;
  - 34.3. **Straight-line distance versus actual travel distance** - the suggestion that actual travel distances be used in place of straight-line distance would, except in rare instances, provide unnecessary and potentially disputatious criteria. It is almost certain to create disputes over methodologies and models, as well as introduce significant delay, without necessarily creating any additional clarity. At any development it would raise questions on:
    - 34.3.1. Travel mode: walking, driving, cycling?

- 34.3.2. From where: the centre or edge of a large development, from each individual house, end of each road?
- 34.3.3. To where: pedestrian or car access, which access point or points, official or unofficial?
- 34.3.4. By what route: main roads, minor roads, one-way roads, unofficial short cuts, private roads etc?
- 34.3.5. The day-to-day relevance of travel time in determining individual choices on travel mode, route and access point selection.
- 34.4. **Improved SPA management/Access management first and foremost** – we refer to the RSPB submission on the issue of habitat management (paragraphs 89-91 and 101) and access management (paragraphs 103-105). The former and to a large extent the latter are more properly viewed as measures to meet Article 6(2) obligations to restore the SPA to favourable conservation status and therefore inappropriate in respect of proposals considered under Article 6(3).
35. Many of the PR options considered acceptable by the LO when taken together with the DP (paragraph 11.3.12) should in fact be more properly viewed as either integral to the DP or as potential implementation mechanisms. The PR instead presents them as novel ideas. These include:
- 35.1. Strategic SANGS in advance of development;
- 35.2. SANGS and visitor management combination; and
- 35.3. A body to receive funds, purchase, create and manage greenspace.
36. Similarly, several of the proposals depicted as required to “test” the effectiveness of an “*overly cautious*” DP (for example, see paragraphs 13.4.6, 14.5.5) are in fact measures already acknowledged in the DP as essential to ensure it is being properly implemented in a manner compliant with the Directives viz:
- 36.1. Test the effectiveness of visitor management;
- 36.2. Carry out an evidence-based review of the DP after a period of 2-3 years.

### Miscellaneous comments

#### *Review of approaches to heathland access management*

37. In Chapter 10, the PR makes a series of fundamental errors in its analysis of the different types of ‘access’ land. Therefore, the text from 10.3.4 to 10.3.9 (including Table 10.1) should be disregarded until it is completely revised. The text should have distinguished between:
- 37.1. Open access land mapped under s4 of the Countryside and Rights of Way Act 2000 (CRoW 2000) i.e. heathland or registered common land;
- 37.2. As (1) but excluded under paragraph 13, Schedule 1, Part 1 CRoW 2000 by being subject to Ministry of Defence byelaws; and
- 37.3. Land excluded under s15 CRoW 2000 as being ‘urban commons’ under s193 the Law of Property Act 1925 (1925 commons).
38. At paragraph 10.3.9, it is correct to say that CRoW 2000 restrictions cannot be applied to 1925 commons. However, it is incorrect to say no restrictive measures can be applied to such land. Possible measures include:
- 38.1. Special Nature Conservation Order under Regulation 22 of the Habitats Regulations;
- 38.2. Byelaws made under Regulation 28 of the Habitats Regulations;
- 38.3. Byelaws under s28R of the Wildlife and Countryside Act 1981 (as amended by CRoW 2000); and
- 38.4. Third party offences under s28P of the Wildlife and Countryside Act 1981.
39. However, these are all more difficult to implement than the DP, would not guarantee no adverse effect on the SPA from new residential development, and their long standing classification as urban commons means they have an even stronger presumption against restrictions than open access land created under CRoW 2000.