

#### **BTO Research Report No. 422**

# A continuation survey of Nightjars *Caprimulgus europeaus* on SSSIs in East Anglia 2005

#### **Authors**

**Greg Conway & Ian Henderson** 

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## 1. EXECUTIVE SUMMARY

A total of seventy-one 1-km squares within SSSI's in East Anglia, were identified as requiring coverage during 2005. A total of twelve territorial Nightjars were located within SSSI boundaries, which had not been recorded in 2004. Eight territorial males were located within the original set of seventy-one survey squares and a further four territorial males in adjacent survey squares.

#### 2. INTRODUCTION

The nightjar is a breeding visitor to the UK, wintering in Africa. In the UK, their historical distribution extended across the whole of mainland Britain, although it underwent serious population declines during at least the 1970s and early 1980s. Declines across much of Europe, mean that its conservation status is considered as 'unfavourable' (SPEC2; Tucker & Heath 1994). In the UK, it is of high conservation status due to its population size and relatively restricted range distribution. In 2004 a National survey was conducted to assess the current status of Nightjars in the UK (Conway *et al.* In press), in view of the requirements of the national Biodiversity Action Plan, and distribution within designated areas of conservation (Sites of Special Scientific Interest, and Special Protection Areas). The national survey revealed an increase of at least 36% since 1992. Most birds were recorded on dry heath and forestry plantations and much of the recovery has been attributed to management of afforested heaths and young plantations.

The 2004 population figure for the UK, regions and larger sites, was estimated, based on a sampling process. For some SSSIs, however, more exact figures were required so that the condition of these sites, at least for this species, could be accurately assessed. For this reason, in 2005, a follow-up survey of Nightjars was organised for areas of southern England and East Anglia. This report presents the results for East Anglia.

**Objective**: A 'follow-up' survey to the National Survey of Nightjars in 2004, to obtain accurate estimates of the Nightjar population at sites of high conservation priority.

## 3. SURVEY METHODS

The survey followed the methods of the National Survey 2004 (Conway et. al. in press). Between June and July 2005, two survey visits of were made to 71 pre-allocated 1-km sites in East Anglia in 2005. On each visit, at dusk, all potentially suitable areas of habitat within the square were approached to within 200m. Around half of 1km squares visited that were classified as heathland were in practice almost entirely grass dominated. Though not deemed likely suitable habitat for breeding Nightjar, a number of these squares were also surveyed.

#### 4. RESULTS AND CONCLUSIONS

### 4.1 Survey Coverage

Of the seventy-one 1-km squares selected for the survey (see Maps 1 & 2), fifty-four 1-km squares received at least one dusk visit. Of the remaining 1-km squares, seventeen were not surveyed having been deemed unsuitable during daytime visits.

#### 4.2 Territorial Males

A total of eight territorial males were located in the seventy-one 1-km squares originally identified for surveying (see Table 1, Map 1 & 2). In addition, four territorial males were located in adjacent 1-km squares (within the relevant SSSI boundaries), which are also included.

#### 4.3 Habitat suitability

Only thirty-nine of the seventy-one survey 1-km squares were deemed to contain potentially suitable habitat (Table 2). However, in many cases only small areas were involved.

The vast majority of the open heathland areas within Breckland are heavily dominated by grasses. This results in a very dense deep sward with minimal bare ground. Much of the suitable habitat was associated with conifer plantations (Sandlings) and Birch woodland (Stanford Training Area).

## Acknowledgements

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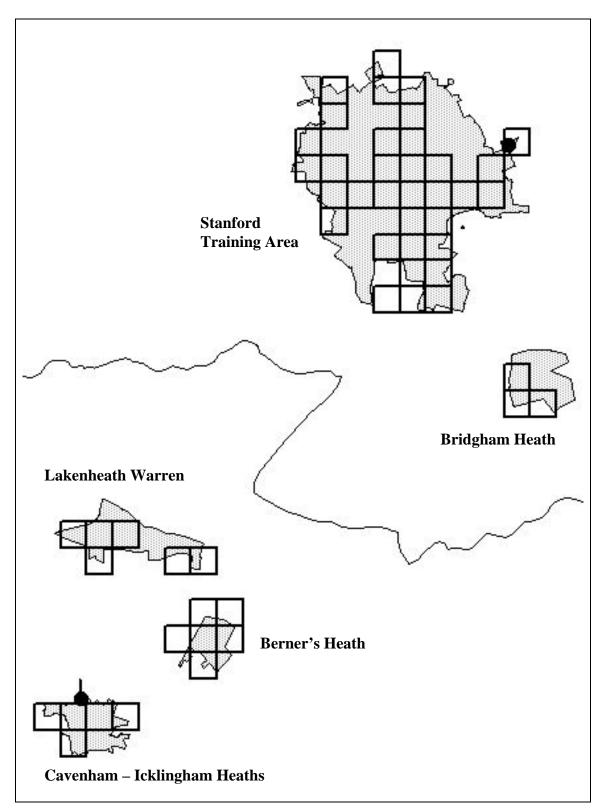
 Table 1.
 Summary of territorial Nightjars located.

General Location	County	Number of 1km-	Males in survey	Males in adjacent
		squares	squares	squares
Berners Heath	Suffolk	5	0	0
Bridgham Heath	Norfolk	3	0	0
Cavenham – Icklingham Heaths	Suffolk	6	0	1
Lakenheath Warren	Suffolk	6	0	0
Minsmere – Walberswick	Suffolk	4	0	1
Sandlings	Suffolk	17	7	2
Stanford Training Area	Norfolk	34	1	0
	Totals	75	8	4

**Table 2.** Summary of habitat suitability of the 71 1-km survey squares.

General Location	County	Number of	Squares
		1km-squares	containing
			suitable
			habitat
Berners Heath	Suffolk	5	5
Bridgham Heath	Norfolk	3	3
Cavenham – Icklingham Heaths	Suffolk	5	4
Lakenheath Warren	Suffolk	6	0
Minsmere – Walberswick	Suffolk	3	3
Sandlings	Suffolk	15	9
Stanford Training Area	Norfolk	34	15
	Total	71	39

Map 1. Location of Breckland 1-km survey squares and territorial male Nightjars in relation to target SSSIs.



**Map 2.** Location of Sandlings 1-km survey squares and territorial male Nightjars in relation to target SSSIs.

