

Knepp Castle Estate

Bird Ringing Report 2016

Tony Davis



First winter Woodcock -15th November 2016. Photo: Penny Green

Introduction

This was the second year in which general bird ringing has been undertaken at the Knepp Castle Estate. As in 2015, effort was concentrated in the autumn migration period, although an extended period was covered during 2016.

In 2015 the majority of ringing took place in Brookhouse 8, adjacent to the scrape. In 2016 we switched to primarily operating in Twenty Seven Acres, immediately to the north of the Hammer Pond. The scrub in this field is more diverse and this is reflected in the range of species ringed.

Barn Owl ringing continued, coordinated by Dr Barrie Watson and Penny Green. The results have kindly been supplied and are included in this report for completeness.

Results

A total of 1240 birds of 40 species were ringed or recaptured during 2016, compared with 412 birds of 25 species in 2015. The increased numbers are a reflection of the greater effort that was put in during 2016, as the number of birds caught per session was actually lower in 2016.

Table One : The number of birds ringed, retrapped and recovered at Knepp during 2016.

	Full grown	Pulli	Retraps/ Recoveries	Total
Lapwing	0	1	0	1
Woodcock	1	0	0	1
Stock Dove	0	2	0	2
Collared Dove	0	2	0	2
Barn Owl	3	13	4	20
Green Woodpecker	1	0	0	1
Sand Martin	2	0	0	2
Swallow	35	0	1	36
House Martin	7	0	0	7
Tree Pipit	1	0	0	1
Wren	31	0	5	36
Dunnock	17	0	1	18
Robin	27	9	2	38
Nightingale	4	0	1	5
Redstart	1	0	0	1
Blackbird	30	4	0	34
Song Thrush	18	5	1	24
Redwing	78	0	0	78
Grasshopper Warbler	1	0	0	1
Sedge Warbler	1	0	0	1
Reed Warbler	17	4	0	21
Lesser Whitethroat	29	5	0	34
Whitethroat	58	13	7	78
Garden Warbler	11	0	0	11
Blackcap	153	0	3	156
Chiffchaff	198	14	16	228
Willow Warbler	88	0	1	89
Goldcrest	25	0	2	27
Long-tailed Tit	42	0	21	63
Blue Tit	74	0	16	90
Great Tit	50	0	5	55

Treecreeper	2	0	1	3
Magpie	1	0	0	1
Jackdaw	0	1	0	1
Chaffinch	1	3	0	4
Goldfinch	19	0	0	19
Linnet	8	0	0	8
Lesser Redpoll	26	0	0	26
Bullfinch	11	0	2	13
Reed Bunting	0	4	0	4
Annual Total:	1071	80	89	1240

Figure One shows a comparison of the totals for each species between the two year. Set against the generally higher totals in 2016 are two notable declines; for Long-tailed Tit and Blue Tit. It is known that Blue Tits and Great Tits suffered very poor breeding seasons due to adverse weather at a critical time, and this was reflected at Knepp and elsewhere in the very low proportion of first year birds being caught. However there may also be a habitat factor involved. Whilst most species seem to have been commoner in the more diverse scrub in Twenty Seven Acres than they were in Brookhouse 8 (which is almost pure sallow *Salix* sp.) the almost complete absence of mixed tit flocks in Twenty Seven Acres was noticeable throughout the late summer period. If a direct comparison is made between catches made just in these fields and over the same period (Figure 2), it can be seen that Great Tit and to a lesser extent Goldcrest, were also commoner in the pure *Salix*.

As is often the case, ringing turned up species which would not otherwise have been recorded on the site. A first year Grasshopper Warbler was captured on 27th August. This species is now very rare in southern England and is unlikely to breed at Knepp. A Tree Pipit captured on 6th September will also have been on passage as Knepp does not have suitable breeding habitat. Another scarce passage migrant at Knepp is Redstart and a first year male was captured at the same time as the Grasshopper Warbler.



First year male Redstart (left) and first year Grasshopper Warbler (right). Photo's: Laurie Jackson

The Lesser Redpolls that were caught were also probably passage migrants. The majority were caught on a single date and only occasional individuals have been seen since. Their preferred winter food is birch seed and there is little birch on the site. One individual was very pale and approached Mealy Redpoll (one of the northern species, sub-species or forms depending upon which taxonomist you believe) but it had buff wing-bars and was therefore not a pure Mealy.

Figure One : Comparison of ringing totals for 2015 and 2016 (excluding Barrie Watson totals).

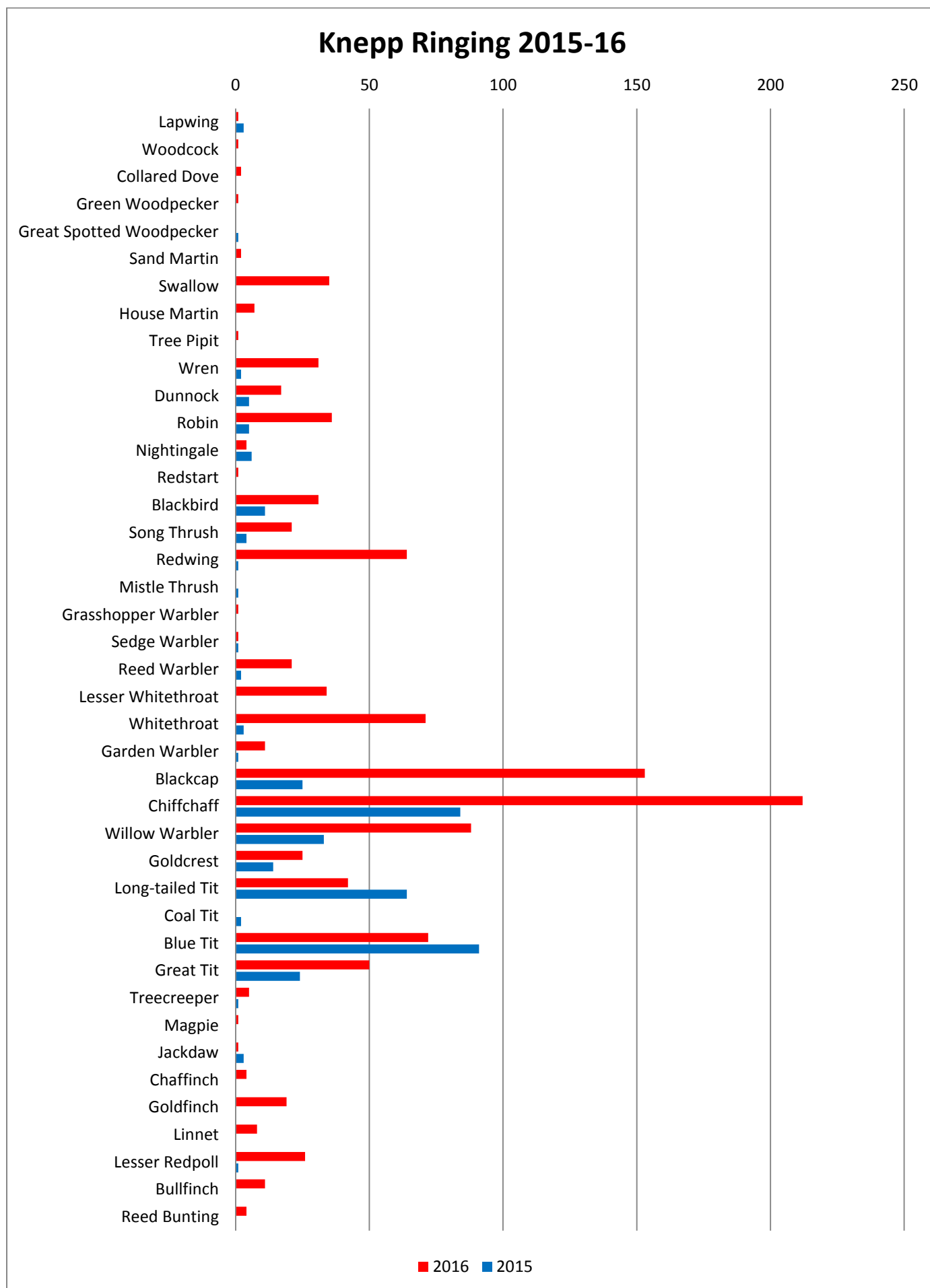
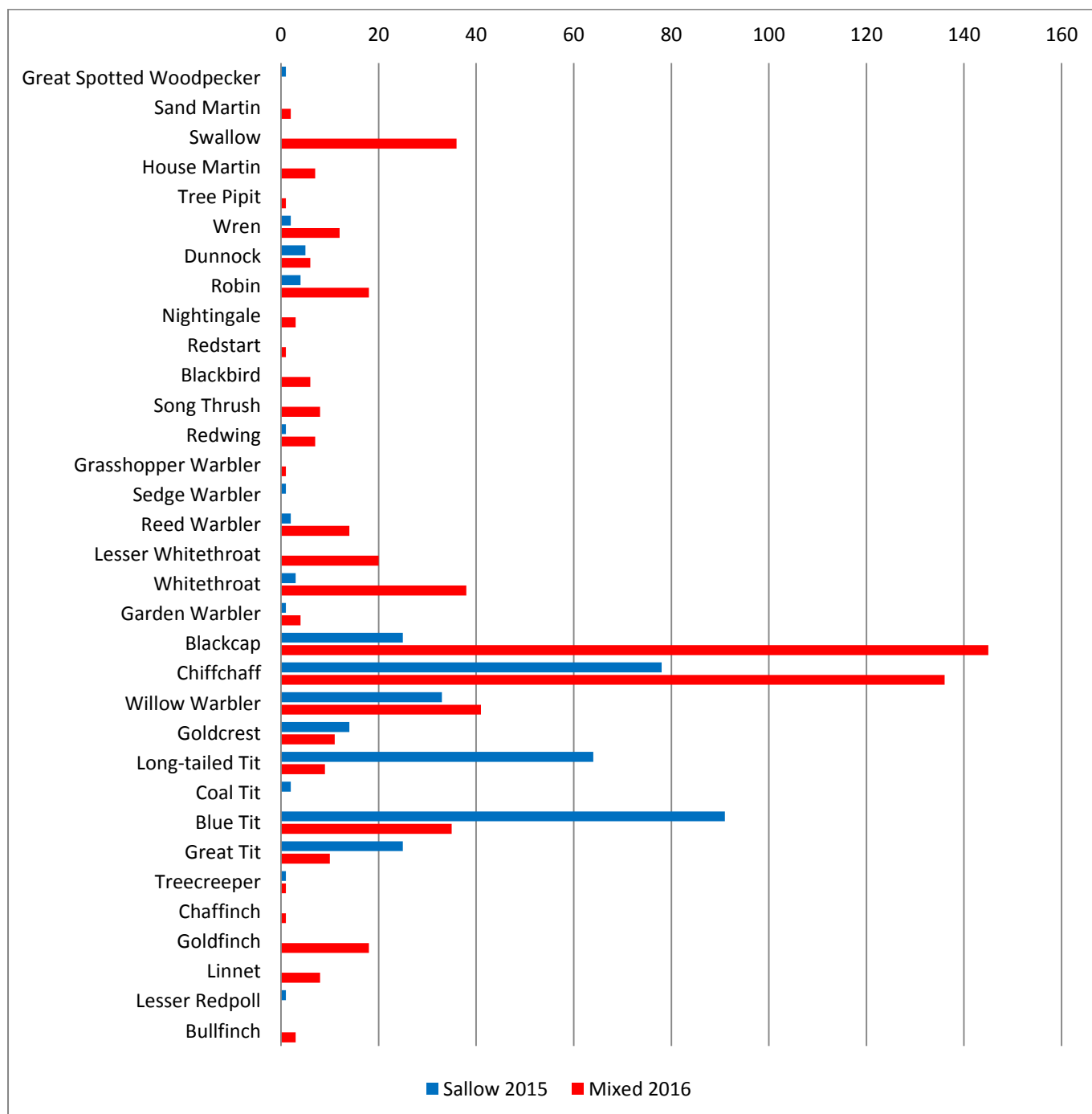


Figure Two: Comparison of ringing totals in pure *Salix* at Brookhouse 8 in 2015 and mixed scrub at Twenty Seven Acres in 2016.



Linnets breed in small numbers around the site. A few of this Red Listed species were caught on 29th August and 3rd September. The flock was present earlier but had disappeared by mid-September, presumably the site does not have the preferred weed seeds to sustain a wintering population.

Of the hirundines (swallows and martins), Swallows breed in scattered locations around the estate and House Martins breed on the castle itself. An autumn gathering of Swallows on the wires adjacent to the ringing field was thought to initially be composed of locally bred birds. As the autumn progressed the presence of this flock became more intermittent and was presumably comprised of birds moving through the area. The few House and Sand Martins which were caught were passage birds, flocks (sometimes quite large) would appear and feed over the Hammer Pond and surrounding area for a few minutes before moving on. It has been suggested that an artificial Sand Martin bank might be created on the estate and there are certainly young birds moving through which might be attracted to it in subsequent summers.



First year House Martin (left) and Sand Martin (right). Photo's: Mya Bambrick

The bulk of the catches during the late summer and autumn were of migrant warblers. Most notable amongst these were the number of Lesser Whitethroats caught.

Of other important breeding species at Knepp, there was no sign of Lapwings breeding in the fields in which they bred in 2015. This was not entirely surprising as the habitat in which they bred in 2015 was rather unusual. Late in the 2016 breeding season Penny Green found two chicks along the river restoration. One of these chicks was relocated subsequently and ringed. It is not known whether the second chick was from a different pair. This area seems a far better breeding area for Lapwings than those used in 2015 and it is hoped that the population here will start to build, although recent tree planting will reduce the suitability of part of the area.

Little time was available to work on Nightingales during 2016. Two juveniles were caught at the same time in the Twenty Seven Acres field on 24th August. Although only one was subsequently retrapped, both birds could be heard calling next to the same net prior to dawn for several weeks afterwards. A third juvenile was caught in a different net on 18th September and was similarly heard calling next to this net until at least the end of the month – rather a late date for Nightingales.

Of wintering species, only Redwing was ringed in significant numbers. This is partly the result of a sound lure which is particularly successful but there are large numbers of this species feeding and roosting on the site. Song Thrushes are the nearest relative of Redwings and are obviously resident at Knepp. However numbers in winter are boosted by birds from abroad, as evidenced by two birds caught together on 15th December. One had a wing length of 118mm and a weight of 69 grams, the other had a slightly longer wing at 123mm but weighed in at 104 grams. The latter bird almost certainly came from considerably further north.

Barn Owl report

Out of 29 Barn Owl boxes on the estate 12 were occupied, four of which contained singletons (possibly roosting away from their young in another nearby box, although one was in moult so would not be feeding young) and seven boxes contained evidence of breeding or attempted breeding: 18 pulli found in total in six of the boxes, of which 13 were processed and ringed: the others were too small to ring. There was a maximum brood size of four, and a minimum of two. The seventh box contained four cold eggs. Of the 11 adult birds three were not trapped, one was left undisturbed as it was incubating, four were retraps and three were processed and ringed. One box contained a Mandarin with 7 eggs. Ten boxes contained used Jackdaw nests and were duly cleaned out, and four boxes contained Stock Dove nests (two eggs in each of two boxes, two chicks in one box and one sitting female).

Retraps and recoveries

As the primary ringing site was in a different location in 2016, there were unsurprisingly few between-year retraps. One retrap of interest was a Chiffchaff ringed as a nestling on the bridleway alongside Brookhouse 4 on 21st May 2015 which was retrapped a year and eight days later as a breeding male in the north-west corner of Brookhouse 13. Two further Chiffchaffs which were ringed in Brookhouse 8 in autumn 2015 were retrapped in Twenty Seven Acres in autumn 2016 and a 2015 Long-tailed Tit from Brookhouse 8 was retrapped in Fresco East in 2016.

The following recoveries were received from the BTO:

A juvenile Swallow S094999 ringed at Fleetwood Tip, Lancashire on 19th August 2016 was retrapped at Knepp on 6th September, a movement of 372 SSE in 18 days.

A juvenile Chiffchaff ETV467 ringed at Knepp on 17th July 2016 was caught by another ringer at St Margaret's at Cliffe, Kent on 2nd September, a movement of 124km east in 47 days.

A juvenile Goldfinch S093151 ringed at Knepp on 24th August 2016 was caught by another ringer in Blackgate Lane, Henfield, West Sussex on 6th October, a movement of 9km south-east in 43 days.

Training and Education

Six trainees were trained primarily at Knepp during 2016. In addition a trainee based with another trainer attended a number of sessions at Knepp in order to expand her experience. A ringing demonstration for members of A Focus on Nature – the youth conservation organisation – was carried out with the help of Josie Hewitt, resulting in at least one person seeking ringing training in their own part of the country. Ringing demonstrations were also laid on for Knepp employees and neighbours as requested.

Whilst it is not possible to carry out ringing demonstrations for safari visitors on a pre-arranged basis, we are always happy to do a brief demonstration if a safari happens to be taking place when we are ringing on site. Feedback from the Estate Ecologist suggests that these are enjoyed and appreciated by guests on the safaris.

A training course was held for the British Trust for Ornithology's Nest Record Scheme in late May. This was fully booked and was a successful course, despite losing an important field session as a result of torrential rain.

Acknowledgements

I am most grateful to Sir Charles Burrell for allowing us to undertake ringing activities on his estate. Thanks are also due to Penny Green, Dave Green, Laurie Jackson, Connie Tremlett, James McCulloch, Mya Bambrick and Sophie Trice for assistance with fieldwork. Josie Hewitt led the ringing demonstration for AFON members.

Special thanks are due to Penny Green for putting up with endless communications about whether it was ok for us to operate on the estate at particular times.



Linnet (left) and Redwing (right). Photo's: Mya Bambrick