

River Otter SSSI (north sector within beaver area) bird surveys Apr - Jun 2016

Summary

Since March 2015, the Devon Wildlife Trust has been leading on (with help from other partner organisations) the River Otter Beaver Trial. This exciting five year project records the licensed release of the beavers on the River Otter and monitors their progress, including any habitat change that the beavers may create on the river.

A breeding bird survey was commissioned by DWT with a view to obtaining some baseline bird data before any significant habitat change that might occur as a result of the presence of the breeding beaver population using this part of the river.

Six bird surveys were carried out within the northern part of the Otter Estuary SSSI (see map below) and an area known to be frequented by beavers. The survey area consisted of a thin strip of mixed mature woodland including oak and beech, blackthorn hedgerows, reedbed, willow, scrub and invasive plants such as Himalayan Balsam adjacent to the River Otter.

Method

Six visits were made to the site at regular intervals when weather conditions were favourable for surveying. The majority of the site covered a linear woodland of approximately 850 metres in length, averaging 40 metres in width and 90 metres at its widest point. The survey area has public footpaths bordering the SSSI boundary and these were used as the survey route for each visit. Start and end points were alternated to ensure the same areas were not always surveyed at the same time in the morning.

Surveys generally took around 75 minutes to complete at a slow pace and were carried out somewhere between the hours of 06.00am and 09.00am. Surveys were only carried out on days with light winds less than Beaufort Scale 3 and with no significant rainfall.

Surveys were carried out on the following dates:

25th April, 8th May, 22nd May, 31st May, 11th June and 26th June

Map of survey area and SSSI boundary



Results

All the survey results are shown in the following appendices:

Appendix 1: TABLE OF ALL SPECIES RECORDED

1. All species recorded per survey visit are shown along with appropriate notes.
2. A number is shown against each species and for each visit. This relates to an individual record of a single species or pair present (generally singing males). Numbers in **bold** refer to a specific count of birds e.g. Mute Swan on the river.
3. A number of **red** and **amber** birds of conservation concern (BoCC 4) were recorded on site. These are shown in the appendix with the appropriate colour.

Appendices 2 - 9: TERRITORY MAPS FOR SELECTED SPECIES

1. Species maps showing territory location for selected species. The species chosen are those considered to be of most interest to the local area or with a nationally unfavourable conservation status.
2. Symbols marking territory locations show the approximate centre point of the territory.
3. Species with similar breeding food & habitat requirements are shown on the same maps where possible. Some notes on nesting habits are also included.

Outcome

A total of 42 species were recorded on site during the 2016 breeding season of which 13 were confirmed to have bred, 20 were considered likely to have bred and 3 possibly bred. The remaining 6 species were recorded off site and/or believed not to have on site.

The Otter Estuary has been designated as a SSSI since 1986 for reasons relating to the salt marsh flora found to the south of White Bridge, but also for its bird interest. It is worth highlighting that the SSSI citation sheet lists a number of bird species which historically used to breed within the SSSI and are no longer present as breeding birds. These are Serin, Lesser Spotted Woodpecker, Little Owl and Shelduck.

Three red-listed species, the **Lesser Spotted Woodpecker, Spotted Flycatcher and Marsh Tit** despite not being recorded during the surveys are still possible future breeders to the area. Marsh Tit was recorded at White Bridge on 11th May 2016 (per my personal records) though not during the actual survey visits. Spotted Flycatcher has certainly bred north of the survey area (just outside the SSSI boundary) in the last five years as per my personal records. The last confirmed breeding record for Lesser Spotted Woodpecker on the River Otter is sometime during the late 1980s or early 1990s though birds have been recorded in the last 10 years.

From my own records, the following 11 species were not recorded in the northern survey area but are considered likely to have bred or confirmed to have bred in the southern half of the SSSI (below White Bridge) or nearby adjacent land. The following notes are based on my own personal records during the 2016 breeding season as this area was not included in the DWT survey.

Buzzard - Regular sightings, presumed to have bred nearby off site. South Farm?

Sparrowhawk - Possible breeding just off site. South Farm road plantation?

Water Rail - Confirmed to have bred. Juveniles seen per Peter Bennett (local BTO ringer).

Moorhen - Confirmed to have bred. Juvenile birds seen.

Collared Dove - Likely to have bred near Granary Lane.

Rock Pipit - Presumed to have bred at mouth of estuary or adjacent cliffs. Singing birds present.

Pied Wagtail - Regular sightings, probably bred nearby off site.

Magpie - Presumed to have bred nearby.

Carrion Crow - Presumed to have bred nearby. South Farm Road plantation?

Starling - Possibly bred in houses by Granary Lane. Fields adjacent to estuary used for feeding.

House Sparrow - Likely to have bred near Granary Lane or at the far southern end of estuary in suitable habitat near the cricket club.

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October 2016

References

Birds of Conservation Concern 4: *RSPB et al*

A BTO Field Guide to monitoring nests: *Ferguson-Lees, Castell and Leech*

Devon Annual Bird Reports: *Devon Bird Watching & Preservation Society*

APPENDIX 1: River Otter SSSI (North of White Bridge) Bird Surveys April - June 2016

Survey Visit		Breeding Success			25/4	8/5	22/5	31/5	11/6	26/6	
Species	Map	Conf	Prob	Poss	Record	Record	Record	Record	Record	Record	Notes
Common Chiffchaff	App 2	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	3	7	6	3	4	4	Up to 8 singing males on site. Juvenile birds also recorded on site.
Blackcap	App 2	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	4	6	5	10	5	3	Up to 11 singing males on site. Nest recorded on site.
Blackbird	App 3	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	1	2	3	2	2	4	4-5 territories. A number of family groups recorded on site.
Song Thrush	App 3	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	2	0	1	2	1	1	2- 3 territories recorded on site.
Bullfinch	App 4	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	1	0	1+	0	1	At least 1 territory present within site boundary.
Dunock	App 4	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	2	5	4	2	1	3	6-8 territories recorded on site.
Stock Dove	App 4	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	0	1	0	0	0	A singing male probably breeding on site.
Green Woodpecker	App 5	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	1	0	1	1	0	A singing male recorded regularly on site.
Great Spotted Woodpecker	App 5	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	1	1	1	0	1	A calling and drumming recorded regularly on site.
Eurasian Treecreeper	App 5	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	1	2	1	1	2	2-3 territories. Adults seen feeding young at nest in southern half of site.
Nuthatch	App 5	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	1	2	0	1	2	2 territories on site. Juveniles heard begging at north end of site on 11/6 & seen 26/6.
Lesser Whitethroat	App 6	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	1	0	0	0	0	1	Singing males on site 25/4 and 26/6. Probably migrant and non-breeder?
Common Whitethroat	App 6	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	2	1	1	1	2	1 possibly 2 territories on site.
Reed Bunting	App 6	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	1	0	0	1	0	1 -2 territories. A singing male recorded north & south of White Bridge.
Cetti's Warbler	App 7	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	1	1	1	1	1	Bird seen removing faecal sac from nest immediately north of White Bridge. Further breeding birds to S and W of survey boundary.
Reed Warbler	App 7	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	0	1	2	3	0	Up to 3 singing males. Two north and one south of White Bridge.
Sedge Warbler	App 7	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	1	1	0	0	0	0	Single singing birds on the first two visits only. Maybe just migrants? Likely to have bred to south of survey area.
Kingfisher	App 8	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	0	0	0	2	1	Just north of site boundary on 11/6 & flying north within site 26/6. Prob bred off site.
Grey Wagtail	App 8	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	0	0	0	2	1	Just north of site boundary on 11/7. Calling bird on site on 26/6. Prob bred off site.
Rook	App 9	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	-	-	-	-	-	-	Minimum of 45+ nests on site: 9+ juv on 25/4 and 41+ nests 20+ juv on 8/5.

APPENDIX 1: River Otter SSSI (North of White Bridge) Bird Surveys April - June 2016

Survey Visit		Breeding Success			25/4	8/5	22/5	31/5	11/6	26/6	
Species	Map	Conf	Prob	Poss	Record	Record	Record	Record	Record	Record	Notes
Tawny Owl	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>							Not recorded on surveys but recorded personally (CT) during 2016 breeding season
Mallard	None	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	0	9	0	2	12	6 adults and 3 juvenile ducklings on the river on 22/5.
Woodpigeon	None	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	3	5	4	3	5	7	A minimum of 6 singing males on site. Nest recorded.
Swallow	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	4	0	3	1	4	Birds recorded around White Bridge - a possible breeding site.
Robin	None	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	5	9	6	6	2	1	A minimum of 6 territories on site. Adult recorded with food.
Goldcrest	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	0	0	1	1	2	3	A minimum of 3 singing males on site.
Wren	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	6	10	9	7	8	7	Up to 10 singing males on site.
Great Tit	None	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	1	1	3	1	1	1	At least 2 territories on site. Family groups recorded.
Coal Tit	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	1	0	0	1	1	A minimum of one territory on site.
Blue Tit	None	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	4	4	0	2	2	1	A minimum of 3 territories on site. A number of family groups recorded.
Long-tailed Tit	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	1	3	1	0	1	Family party seen 26/6. Presumed to have breed in immediate vicinity of site.
Marsh Tit	None	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>							Not recorded on surveys but recorded personally (CT) 11th May 2016
Jackdaw	None	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	0	0	2	0	0	Active nest with young present on site 31/5.
Chaffinch	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	4	4	2	3	3	2	A minimum of 4 territories on site. Juvenile birds recorded on site.
Greenfinch	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	2	0	1	0	0	1-2 singing males on site.
Goldfinch	None	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	2	3	3	1	2	3	A minimum of 3 singing males on site.
Mute Swan	None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	5	0	0	0	0	0	4 males and 1 female present on the river on 25/4 only.
Kestrel	None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	0	0	0	0	1	Hunting meadows off site west of site boundary on 26/6. Possibly breeding South Farm area?
Swift	None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	0	0	0	0	7	7+ birds circling high off site on 26/6.
Raven	None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	0	3	1	0	0	Calling birds off site . Believed to have possibly bred in pines on east side of estuary on southern half of SSSI boundary.
Linnet	None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	0	0	0	1	0	0	A single bird flying over the site on 31/5.
Pheasant	None	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>							Recorded on site on at least one occasion.

APPENDIX 2: Territory map for Common Chiffchaff and Blackcap

Common Chiffchaff *Phylloscopus collybita*

Minimum of 7 and maximum of 8 territories

Blackcap *Sylvia atricapilla*

Minimum of 9 and maximum of 11 territories

Both these species are summer visitors arriving in March/April and departing in August/September though small numbers do overwinter. Chiffchaff usually nest 10-30 cm off the ground in thick cover, often in brambles and nettles. Blackcaps similarly prefer thick cover for nesting usually below 6ft from the ground.

The **circle** symbol shows a **territory** and relates to the species being recorded on two or more visits at the same location. The **star** symbol relates to the species being recorded at the location on a single visit only.



APPENDIX 3: Territory map for Song Thrush and Common Blackbird

Song Thrush *Turdus philomelos*

Minimum of 2 and maximum of 5 territories.

Common Blackbird *Turdus merula*

Minimum of 5 territories.

Both are resident species nesting in broad range of habitats. Song Thrush is *red-listed* in the UK and usually chooses a nest site <4M above ground such as tree forks, bushes, hedgerows or steep banks. Blackbirds are usually 1-4M above ground and sites include trees, bushes & hedgerows.

The **circle** symbol shows a **territory** and relates to the species being recorded on two or more visits at the



same location. The **star symbol** relates to the species being recorded at the location on a single visit only.

APPENDIX 4: Territory map for Dunnock, Bullfinch and Stock Dove

Dunnock *Prunella modularis*

Minimum of 6 and maximum of 8 territories

Bullfinch *Pyrrhula pyrrhula*

Minimum of 1 territory in southern half

Stock Dove *Columba oenas*

Maximum of 1 territory

All three species are resident and *amber-listed* in the UK. Dunnocks often nest in brambles and hedgerows or small trees usually 15 cm - 1.5M from the ground. Bullfinch choose nests 1-2M high on a flat branch, tangle of twigs in thick bush, hedge or small tree and typically inside canopy. Stock Doves most often nest in a tree cavity and will use large nest boxes too.

The **circle** symbol shows a **territory** and relates to the species being recorded on two or more visits at the same location. The **star** symbol relates to the species being recorded at the location on a single visit only.



APPENDIX 5: Territory map for Green Woodpecker, Great Spotted Woodpecker, Nuthatch and Common Treecreeper

Green Woodpecker *Picus viridis*

Maximum of 1 territory

Nuthatch *Sitta europaea*

Min. of 2 and maximum of 3 territories

GS Woodpecker *Dendrocopus major*

Minimum of 1 territory

Common Treecreeper *Certhia familiaris*

Min. of 2 and maximum of 3 territories

All four species are resident. Both Woodpecker species excavate a cavity in a live, decaying or dead tree as a nest site. Green Woodpecker's prefer live trees and both typically nest between 1-14M. Nuthatches are also tree hole nesters (1-20M) with oak, beech and ash being the preferred trees. Treecreepers will often use a crack, crevice or split in the bark of a tree as a nest site usually 1-4M.

The **circle** symbol shows a **territory** and relates to the species being recorded on two or more visits at the same location. The **star symbol** relates to the species being recorded at the location on a single visit only.



APPENDIX 6: Territory map for Common Whitethroat, Lesser Whitethroat and Reed Bunting

Common Whitethroat *Sylvia communis*

Minimum of 1 and maximum of 3 territories

Lesser Whitethroat *Sylvia curruca*

Most likely migrants?

Reed Bunting *Emberiza schoeniclus*

Probably 1 and possibly 2 territories

Both Whitethroat species are summer visitors arriving in April/May and departing August/September. Common Whitethroats prefer nest sites well hidden in thick brambles or rough herbage at 30-50 cm off the ground. Whereas the Lesser Whitethroat prefers a hedge (typically blackthorn) or a bush slightly higher from the ground. The Reed Bunting is *amber-listed* in the UK and a resident species. Nests are typically just off the ground in tussock of grass, sedge or thick cover well hidden by overhanging vegetation. Also flattened dead reeds.

The **circle** symbol shows a **territory** and relates to the species being recorded on two or more visits at the same location. The **star** symbol relates to the species being recorded at the location on a single visit only.



APPENDIX 7: Territory map for Cetti's Warbler, Sedge Warbler & Reed Warbler

Cetti's Warbler *Cettia cetti*

Maximum of 1 territory

Sedge Warbler

Acrocephalus schoenobaenus

Maximum of 1 territory

Reed Warbler

Acrocephalus scirpaceus

Min. of 2 and maximum of 3 territories

Sedge and Reed Warbler are summer visitors. The Reed Warbler nests most commonly in reeds around 80 cm above water but sometimes in willow herb, nettles or meadowsweet. The Sedge Warbler nests lower to the ground or water well hidden in dense vegetation, often in dead stem's of the previous year's growth. The Cetti's Warbler is a Schedule 1 species, specially protected from disturbance. It is one of only two warbler species breeding in the UK that it is resident. It prefers wet swampy areas nesting in dense tangled vegetation near water usually between 25 cm and 1.5M above the water/ground.

The **circle** symbol shows a **territory** and relates to the species being recorded on two or more visits at the same location. The **star symbol** relates to the species being recorded at the location on a single visit only.



APPENDIX 8: Records for Common Kingfisher and Grey Wagtail

Common Kingfisher *Alcedo atthis*

Probably nested north of the site boundary but certainly using the river within the site.

Grey Wagtail *Motacilla cinerea*

Probably nested north of the site boundary but certainly using the river within the site.

Both species are resident. The Kingfisher is a Schedule 1 species, specially protected from disturbance. excavates a nest burrow into a stone-free sandy soil of a low stream bank, usually about 50 cm or more above water. The birds choose a vertical bank clear of vegetation, since this provides a reasonable degree of protection from predators. The Grey Wagtail is *red-listed* in the UK and uses a ledge, recess, hole or crevice as a nest site often overhanging a bank, rock face or bridge almost invariably by water.

The **star symbol** relates to the species being recorded at the location on a single visit only.



APPENDIX 9: Rookery nesting locations

Rook *Corvus frugilegus*

A minimum of 45 active nests were recorded throughout three key Rookery sites as shown below. Difficult viewing to confirm an accurate count - 45 nests is absolute minimum.

The Rook is a resident species. It nests colonially in the tops of large trees and the previous year's nests are often re-used.

The **circle** symbol shows a **nesting colony**.

