

23th August 2018
Our reference: 2017/11/02

Delcroft and land beyond, Woodchurch Rd, Shadoxhurst
Bat Surveys

KB Ecology Ltd was commissioned to undertake night-time surveys of the Delcroft bungalow (low suitability for roosting bats) and two trees which offer high suitability for roosting bats due to the presence of cavities:

- one willow tree present adjacent to Pond 1;
- One oak tree along the fence line at the back of the unmanaged grassland area at the back of Delcroft.

The emergence surveys were undertaken by Katia Bresso¹ and Megan Austin, using Bat Box Duet heterodyne and frequency division and Pettersson D240x time expansion detectors. Bat echolocation calls were recorded onto digital mini-disc recorders for subsequent up-loading onto the computer software 'BatSound' for analysis; this allows sonograms of the bats echolocation and allows limited spectral analysis of the sonograms to be carried out, in particular the frequency components which can be examined and compared with known data. Infra-red night scopes were also used.

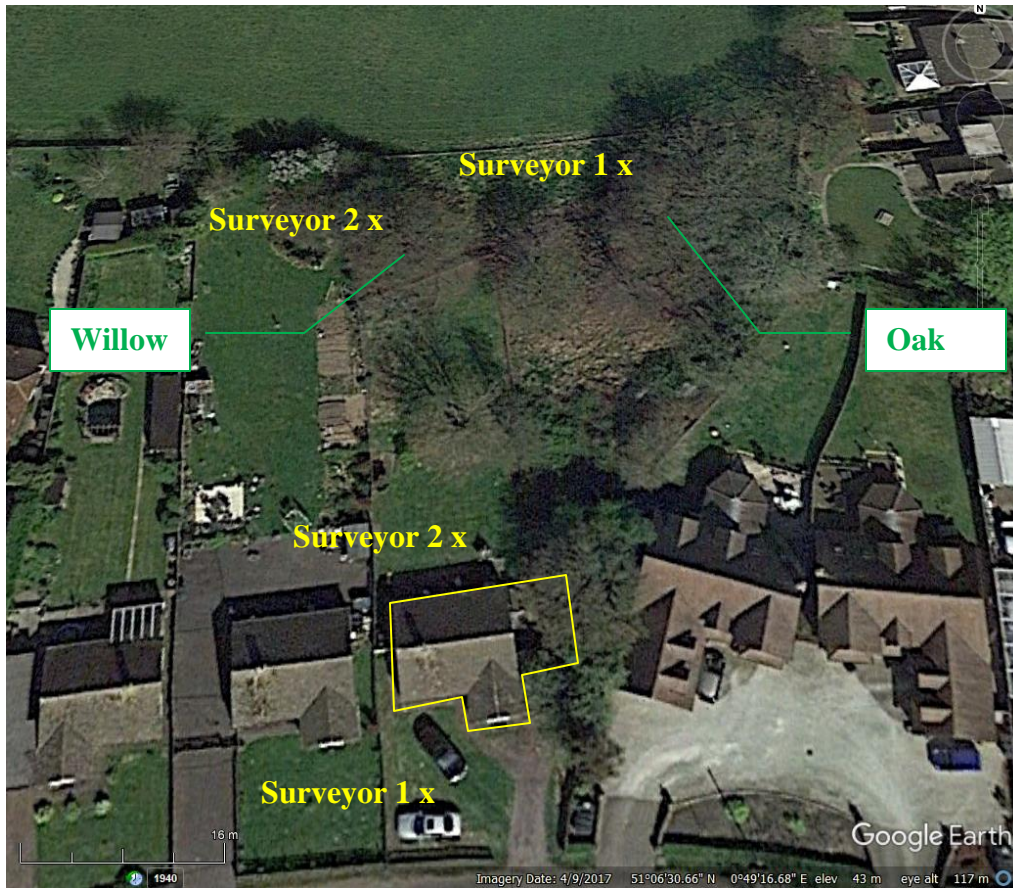
No bats were seen emerging, nor entering the bungalow, nor the trees, with only activity by common pipistrelle and brown long-eared bats.

The tree offers potential for roosting bats and nesting birds (woodpeckers). Even if bats were not found to exit from the tree during the surveys (such surveys are not without limitations as they only provide a snapshot in time and occasional use by single bats could not be ruled out), it should only be cut down following a precautionary approach by:

- Only cutting down the trees outside of nesting bird season and bat hibernation season; i.e. cut trees in September-October only;
- Checking each cavity with an endoscope directly before cutting the tree.

¹ CEnv MCIEEM, a qualified professional consultant ecologist with over 15 years of experience, licensed bat surveyor (Class Survey Licence Registration Number 2015-11917-CLS-CLS (CL15 Bat Roost Visitor Level 1) and 2015-11918-CLS-CLS (CL18 Bat Survey Level 2)) and Registered Consultant of the Bat Low Impact Class Licence with Natural England

Detailed Results:



Delcroft Bungalow:

Site Name	Delcroft, Shadoxhurst	Surveyor Name	Megan Austin - Surveyor 2
Weather Conditions	50% cloud, no wind	Date	24/05/2018
Start Time	20:40	Finish Time	22:20
Air Temperature (°C) at Start of Survey	16	Air Temperature (°C) at End of Survey	14
Sunset	20:52	Sunrise	

East and north elevations

Time	Track Time	Species	Activity*	Comments
21:22:00		45pip	Commuting	From West
21:26:00		45pip	Foraging	Intermittently
21:33:00		BLE	Foraging	under canopy of ash tree
21:40:00		45pip	Commuting	audio only
21:56:00		45pip	Social calls	audio only

Site Name	Delcroft, Shadoxhurst	Surveyor Name	Katia Bresso - Surveyor 1
Weather Conditions	50% cloud, no wind	Date	24/05/2018
Start Time	20:40	Finish Time	22:20
Air Temperature (°C) at Start of Survey	16	Air Temperature (°C) at End of Survey	14
Sunset	20:52	Sunrise	

West and South elevations

Time	Track Time	Species	Activity*	Comments
21:28:00		BLE	Commuting	flying from trees to right, bit over lawn before crossing road
21:41:00		45pip	Commuting	audio only
21:51:00		45pip	Commuting	audio only

Willow:

Site Name	Willow at the back of Delcroft, Sha	Surveyor Name	Megan Austin - Surveyor 2
Weather Conditions	0% cloud, light wind	Date	28/06/2018
Start Time	21:00	Finish Time	22:45
Air Temperature (°C) at Start of Survey	19	Air Temperature (°C) at End of Survey	17
Sunset	21:16	Sunrise	

Willow to the west of back 'garden'

Time	Track Time	Species	Activity*	Comments
21:44:00		45pip	Commuting	audio only
21:45:00		45pip	Commuting	audio only
21:49-22:15		45pip	Foraging	Over pond to the west of willow tree, continuously
22:15-end		45pip	Foraging	Intermittent foraging over pond

Site Name	Willow at the back of Delcroft, Sha	Surveyor Name	Megan Austin - Surveyor 2
Weather Conditions	0% cloud, no wind	Date	25/07/2018
Start Time	20:40	Finish Time	22:20
Air Temperature (°C) at Start of Survey	22	Air Temperature (°C) at End of Survey	20
Sunset	20:55	Sunrise	

Willow to the west of back 'garden'

Time	Track Time	Species	Activity*	Comments
21:24:00		45pip	Commuting	above pond to the south west
21:39:00		45pip	Commuting	audio only
21:42:00		45pip	Foraging	above pond to the south west, 2 passes
21:55:00		45pip	Commuting	audio only
22:14:00		45pip	Foraging	above pond to the south west, 2 passes

Site Name	Willow at the back of Delcroft, Sha	Surveyor Name	Megan Austin - Surveyor 2
Weather Conditions	10% cloud, v.light wind	Date	22/08/2018
Start Time	19:50	Finish Time	21:30
Air Temperature (°C) at Start of Survey	18	Air Temperature (°C) at End of Survey	16
Sunset	20:05	Sunrise	

Willow to the west of back 'garden'

Time	Track Time	Species	Activity*	Comments
20:18-35		45pip	Foraging	continuously in garden to the SW
20:44-48		45pip	Foraging	faint intermittent audio only
20:51-53		45pip x2	Foraging	In gardens to the SW
20:53-59		45pip	Foraging	continuously in garden to the SW
21:08-10		45pip	Foraging	intermittently, audio only

Oak:

Site Name	Oak at the back of Delcroft, Shadox	Surveyor Name	Katia Bresso - Surveyor 1	
Weather Conditions	0% cloud, light wind	Date	28/06/2018	
Start Time	21:00	Finish Time	22:45	
Air Temperature (°C) at Start of Survey	19	Air Temperature (°C) at End of Survey	17	
Sunset	21:16	Sunrise		
Time	Track Time	Species	Activity*	Comments
21:50:00		45pip	Commuting	audio only
22:14:00		45pip	Commuting	audio only
22:23:00		45pip	Commuting	audio only

Site Name	Oak at the back of Delcroft, Shadox	Surveyor Name	Katia Bresso - Surveyor 1	
Weather Conditions	0% cloud, no wind	Date	25/07/2018	
Start Time	20:40	Finish Time	22:20	
Air Temperature (°C) at Start of Survey	22	Air Temperature (°C) at End of Survey	20	
Sunset	20:55	Sunrise		
Time	Track Time	Species	Activity*	Comments
21:49		45pip	Foraging	around trees
21:55:00		45pip	Commuting	audio only
21:57:00		ble	Commuting	flew past trees
21:57:00		45pip	Commuting	audio only

Site Name	Oak at the back of Delcroft, Shadox				Surveyor Name	Katia Bresso - Surveyor 1			
Weather Conditions	10% cloud, v.light wind				Date	22/08/2018			
Start Time	19:50				Finish Time	21:30			
Air Temperature (°C) at Start of Survey	18				Air Temperature (°C) at End of Survey	16			
Sunset	20:05				Sunrise				
Time	Track Time	Species	Activity*	Comments					
20:25:00		45pip	Commuting	audio only					
20:34:00		45pip	Commuting	audio only					
20:38:00		45pip	Foraging	foraging on and off around trees and grassland at back till 20:55					
21:06:00		45pip	Commuting	audio only					
21:09:00		BLE	Commuting	flew past trees					
21:10:00		45pip	Commuting	audio only					