



Triton Knoll
Offshore Wind Farm -
Electrical Infrastructure

Survey Methodology Summaries
For 2014

For

Triton Knoll Offshore Wind Farm Ltd

Introduction

Over the course of 2014, Thomson Ecology has been commissioned to conduct a large number of protected species surveys over the entirety of the Triton Knoll Offshore Windfarm electrical infrastructure route.

In order to complete these surveys on time and on budget, it is important that Thomson Ecology has proper access to any land that needs to be surveyed and building a good working relationship with land agents is integral to our success.

This document is intended to serve as an aid for land agents and other such parties. It lays out clearly and concisely what surveys we do, how these surveys are carried out, how many visits a survey may require and what time of year they are done.

Phase 1 Habitat Survey (PHS1)

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Ecologist walks over the site to assess what habitats are on site and what species may be present	April to September, but can be undertaken at any time of year	Dependent on size of survey area 1-2	Daytime	1

Protected Species Walkover Survey (PSW)

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Ecologist walks over the site to assess what habitats are on site and what species may be present. Can be done more quickly and over a larger area than a PH1	April to September, but can be undertaken at any time of year	Dependent on size of survey area 1-2	Daytime	1

Great Crested Newt (GCN) Surveys

Survey Name	Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
Habitat Suitability Survey (HSI)	A pair of Ecologists assesses the potential of a water body to support great crested newts	Can be done any time of the year	Dependent on size of survey area 2 as a minimum, for safety purposes.	Daytime	1
Presence/ Absence Surveys	A suite of surveys to determine presence or likely absence of great crested newts in a water body in any ponds identified as suitable in the HSI survey.	Between mid-March and mid-June	Dependent on size of survey area 2 as a minimum, for safety purposes.	A single set of Presence/ Absence surveys comprises 3 visits to site: 1 on the afternoon of the first day, 1 in the evening of the first day and 1 in the morning of the second day	4
Population Assessment	If GCN are confirmed as present in previous surveys, an additional 2 survey visits will be needed. Methodology same as above.	Between mid-March and mid-June	Dependent on size of survey area 2 as a minimum, for safety purposes.	See 'Survey Description'	2

NB: Will need access to the site plus an additional 500m buffer around the site

Water Vole Surveys

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Ecologist walks over the site looking for signs of water vole.	April to October	Dependent on size of survey area 2 as a minimum , for safety reasons	Daytime	1

NB: Water Vole surveys are often incorporated with otter surveys

Otter Surveys

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Ecologist walks over the site looking for signs of otter	May to September	Dependent on size of survey area 2 as a minimum , for safety reasons	Daytime	1

NB: Otter surveys are often incorporated with water vole surveys

Badger Surveys

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Ecologist walks over the site looking for signs of badger	Can be done any time of year, but preferably during the spring or early autumn	Dependent on size of survey area 1 - 2.	Daytime	1

Bat Surveys

Survey Name	Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
Stage 1 Bat Survey	Buildings, structures or trees are assessed for their potential to support	Can be done any time of year	Minimum of 2 ecologists	Surveys conducted during the day	1
Transect Surveys	A pair of Ecologists walk a transect through the site, using specialist bat-detecting equipment	Mid-March to mid-October	Minimum of 2 ecologists	1 visit = 1 survey at dusk (30 minutes before sunset, 120 minutes after) 1 survey at dawn (120 minutes before sunrise, 30 minutes after)	1-3
Dusk Emergence/ Dawn Return to Roost Surveys	A pair of Ecologist conduct surveys on a building, structure or trees which have the potential to support roosting bats	April to October	Minimum of 2 ecologists	1 visit = 1 survey at dusk (30 minutes before sunset, 90 minutes after) 1 survey at dawn (90 minutes before sunrise, 30 minutes after)	1-3
Static Monitoring	Bat-detecting devices are deployed and left for prolonged periods of time	March to October	1 - 2 ecologists	Daytime	1 visit to deploy, 1 visit to collect

	to record bat activity.			
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Bird Surveys

Survey Name	Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
Common Bird Census (CBC)	A survey to determine what bird species are breeding and how many territories they hold	April to August	Number of ecologists dependent on area of land to be surveyed.	Conducted between dawn and noon	3
Wintering Bird Surveys	A suite of surveys to determine the use of a site by birds (resident and wintering migrant). Can include:	November to March	Number of ecologists dependent on area of land to be surveyed.	Conducted between dawn and noon	3
Point Counts	A survey to determine what bird species are breeding and how many territories they hold. Surveys conducted from static points, rather than transect	Varies	Number of ecologists dependent on area of land to be surveyed.	Conducted during the daylight hours	2
Core Tide Counts	Used to survey birds associated with coastline/ estuarine habitats	Varies	Number of ecologists dependent on area of land to be surveyed.	Conducted 1 hour before low tide and 1 hour after	5

Target Species Search	A survey used to search for specific species of birds.	Varies	Number of ecologists dependent on area of land to be surveyed.	Conducted during the daylight hours	2
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Reptile Surveys

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Ecologist walks over the site, looking under deployed refugia for reptiles	April to September	2 to deploy and collect, 1 to survey	Daytime	7 visits in total; 1 to deploy the refugia, 5 to check for presence/absence and a final visit to collect tiles back in.

Arboricultural Surveys

Survey description	Optimal Survey Season	Number of surveyors	Timing of survey (temporal)	Number of visits?
An Arboriculturalist conducts a walkover of the site to evaluate the health of, and assign value to, any trees present	Can be conducted any time of the year	1	Daytime	1

