

# NATURAL HISTORY OF LIME KILN WAY OPEN SPACE



JUNE 2018

Update August 2019

Cover photograph

*Nephrotoma flavescens* Tiger Crane-fly

THIS LOCATION IS REFERRED TO AS

# LIME KILN DOWN

And for biological records as

## LIME KILN CHALK SU12.080

Species records are mostly held by the Wiltshire and Swindon Biological Records Centre (WSBRC) some species records are held at specific records centres.

Produce by J. Austin BSc (Hons) ARCS

Supported by the late Bridget M. Morgan

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# Lime Kiln Down.

## Introduction

The title for the site has been deliberately chosen as the site is not entirely Chalk and not entirely a way. A road nearby is named “Lime Kiln Way”. The site is officially known as “Lime Kiln Way Open Space”. “Lime Kiln Down” is the preferred description.

Lime Kiln Down is situated off the Odstock Road on the right hand side of the approach to Salisbury District Hospital from Salisbury. A site information board for Lime Kiln Way Open Space is located at the entrance at the Odstock Road layby. Salisbury Cathedral can be seen to the north. See map in centre of this booklet.

Lime kiln Down consists of 9.6 hectares of grassland with numerous wildflowers, clumps of brambles and bushes and is surrounded mostly with trees. The dominant species such as the Rosebay Willowherb, Old Man’s Beard, Bramble and bushes are being controlled by cutting and scything to protect and enhance the grassland and wildflowers. This is done by volunteers under the guidance of Salisbury Area Greenspace Partnership.

There is a splendid display of Pyramidal Orchids in June 2018 and the appearance of an extremely rare Lizard Orchid attracted a lot of attention.

Earlier in the year abundant cowslips can be seen and as summer progresses numerous colourful wildflowers appear attracting insects. Often the sky is full of swallows, swifts and house martins, however, it has been noted that so far in 2018 house martins and swallows are much lower in numbers.

A number of birds of importance have been identified by local wildlife groups as being at Lime Kiln Down. The Linnet, Yellowhammer and Corn Bunting are of Red Conservation status nationally and Common White Throat of Amber Conservation status, (Ref 1).

A group (charm) of Goldfinches can also be seen and heard at Lime Kiln Down.

There was a proposal put forward for the development of a GP Centre at the north-eastern edge of the site.

*A Preliminary Ecological Appraisal* was produced for NHS Wiltshire CCG (ref. NHS-170916), (Ref 1).

This report refers to Lime Kiln Down as “Lime Kiln Chalk Meadow”. The report highlights the contribution of work done by local wildlife groups and experts in identifying the ecological value of Lime Kiln Down.

The site has been assessed as HG3, semi-natural grassland site with high species diversity.

HG3 designated sites are to be protected as safeguarded land; protected from both housing and employment.

A bulk standard calcareous grassland information sheet was produced in the name of Lime Kiln Chalk, grazing is largely irrelevant to this individual site as the site is not fenced. (Ref. 2)

The site was designated as a County Wildlife Site in 2013, (Ref 3)

There are other forms of site designations for lowland calcareous grassland, the National Vegetation Classifications, (NVC). Calcareous grassland designations are firstly based on the characteristic grasses and associated herbaceous plants. The Trees, Shrubs and Herbs considered native, associated with calcareous grassland, at Lime Kiln Down numbered 39 (in addition to the sedge and grasses).

The category that suits best is CG6 and is characterised by, *Avenula pubescens*, Downy Oat Grass.

Lime Kiln Down has 100% of the mentioned associated plant species.

The detail for this category is:-

- 1 dominated by various mixtures of Red Fescue and generally smaller amounts of Meadow and Downy Oat-grasses.
- 2 small quantities of Dandelion and Bird's-foot-trefoil scattered Glaucous Sedge, Rough Hawkbit, Ribwort Plantain, Salad Burnet and Stemless Thistle.
- 3 moister and more neutral soils on flat or gently sloping sites where there is a history of ploughing and little or no grazing.
- 4 widely scattered across lowland England.
- 5 the invertebrate associations are unclear.

That Lime Kiln Down is calcareous grassland is further supported by comparison with the list of calcareous associated plants, (Ref 4). Lime Kiln Down has 57 of the 124 species listed many of which are associated with northern limestone and more extreme environments. Lime Kiln Down reaches 46% of this list with the likelihood of a number of species, common in the area, yet to be identified.

If one were to assign a category **GC6** is the best fit, (Ref 4). It is therefore proposed that a NVC category GC6 be assigned to Lime Kiln Down. The foregoing provides evidence that Lime Kiln Down is, as has already been described, a lowland, high-quality, calcareous grassland, (Ref. 2).

The “ploughing”, mentioned under 3 above, was the initial influx of footings extracts both from the building of the Hospital at top east of the site and the Housing Estate at bottom north of the site and previous land use. The site is unfenced.

The pits in the centre of the eastern end of the site have signs of modification for mountain bikes when they were more in vogue. In 2016 vegetation had also been cut to create a clear route, the tyre marks being clear. This year, 2018, there were signs of a powered bike being ridden on the site but not through the area of the pits. This forms another level of disturbance.

Even though the site is unfenced it has been grazed by tethered horses. However in 2018 the presence of three horses was far too much for the site. These were being accessed by vehicle in 2018.

Plant surveys were carried out during 2015 by South Wiltshire Biodiversity Group and involving the Salisbury & District Natural History Society (SDNHS). (Ref. 5)

This booklet is produced from the results of further surveys undertaken from June 2017 to August 2019. Surveys that record just the species are termed Preliminary Phase I Habitat Surveys, (Ref.6)

A Reptile Survey in 2017 continued into 2018 uses corrugated iron as refuges, (Ref. 7)

A moth survey is being carried out in 2019 and the author is very grateful for the lists of moths.

Additional contributors are in brackets after the species name.

This booklet is being continually updated with any additional species.

## RESULTS

The extended Phase I has resulted in the identification of 3 additional species requiring Phase II(2) assessment and these have been recorded, namely, the Slow-worm, *Anguis fragilis*, the Hornet Robberfly, *Asilus crabroniformis*, and the Small Eggar moth, *Eriogaster lanestris*.

In addition the following should be noted.

First, *Meloe proscarabaeus*, the Black Oil Beetle is a UK BAP (Biodiversity Action Plan) Priority species and hence comes under the Natural Environment and Rural Communities Act 2006 – Species of Principal importance in England.

[Species “of principle importance for the purpose of conserving biodiversity” are covered under section 41 (England) of the NERC Act (2006) and therefore need to be taken into consideration by a public body when performing any of its duties to conserving biodiversity, (ref 10).]

The spider, *Araneus alsine*, the Strawberry /Orange Wheelweaving Spider; *Liparus coronatus*, a weevil and a moth, *Catarhoe rubidata*, the Ruddy Carpet are Nationally Notifiable B, as declining species, (ref. 10).

These can all be considered as high fidelity species having dependence on habitat continuity. This is especially so for the slow-worm, (Ref. 7). It is also so for the Hornet Robberfly as this is not considered a “wandering” species and is highly dependent on its near environment, (Ref. 8).

The Small Eggar moth has suffered from the hedge trimming of its favoured foodplants mainly Hawthorn and Blackthorn that are both in numbers at Lime Kiln Down, (Ref. 9).

Identified by a local national expert on bees there is a European Red Book bee that only visits, *Odontites vernus*, Red Bartsia found at Lime Kiln Down.

In 2017 and 2018 Slow-worms were found during the surveys using three refugia set out at the eastern end near the area of pits in 2017 and at the western end in 2018, (Ref. 7). The site needs to be managed for Slow-worms as they are a protected species.

Tethered horse grazing resulted in severe sward reduction but the horse dung is important for the Hornet Robberfly as the larvae eat dung beetle larvae. The horses were removed in 2018.

### **Invertebrates at Lime Kiln Down**

There are many more unidentified species at Lime Kiln Down than identified in the following lists. Everything listed can be seen from the network of pathways across the grassland.

These lists are for educational purposes only and may not be used for commercial gain.

#### **Common Snails**

Ariana arbustum  
Candidula intersecta  
Cepaea hortensis  
Cepaea nemoralis  
Cernuella virgata  
Helix aspersa  
Hygromia cinctella

Snail  
Wrinkled Snail  
Yellow-lipped Snail  
Brown-lipped Snail  
Striped snail  
Brown Garden Snail  
Girdled Snail

Monacha cantiana  
Trichia hispida

Kentish Snail  
Hairy Snail

The number of snails at Lime Kiln Down is huge but based on a small number of species. The large numbers of dead snails is down to the numerous snail-eating species. The surrounding edges harbour brown garden snails. The western end appears to be the main area for the Wrinkled Snail. The Kentish Snail is prevalent over the whole site as is *Arianta arbustorum* but this is more scattered. The Striped Snail appears to be confined to the north-east of the site. Both Yellow-lipped and Brown-lipped Snails are also found in more covered areas. A few other species are in small numbers and need identifying. These give an indication of the wet nature of the site, unusual for a calcareous site indicating that calling it chalk is misleading. Two are known to tolerate drier conditions the Wrinkled Snail and the Striped Snail. Incidentally, snail-shell will increase the calcification of the site (Ref. 4).

Excessive clearance of scrub destroys shelter and increases desiccation from wind. Successful re-introduction of species has not been demonstrated (Ref. 4).

The presence of snails leads to species that are parasitoids of the snails.

Coremacera marginata  
Drilus flavescens

Snail Killing Fly  
Beetle

### Slugs

Arion ater agg.  
Arion flagellus  
Arion subfuscus

Black Slug (large black or orange slugs)  
Green-soled Slug  
Dusky Slug

Note the use of agg. after a species name indicates aggregate and is used when the specific species in that group has not been determined. This also applies to Dandelions, blackberry Brambles and others.

### Millipedes

Millipedes are long-lived animals. The, *Glomeris marginata*, the flat back Millipede under a log (near Wild Strawberry plants) and the very widespread *Cylindroiulus caeruleocinctus* are to be found at Lime Kiln Down.

Cylindroiulus caeruleocinctus  
Glomeris marginata  
Polydesmus inconstans

Millipede  
Pill Millipede  
Flat Back Millipede

Few centipedes are associated with calcareous habitats and none have been found.

### Woodlice

Woodlice however are present including the Common Pill Woodlouse *Armadillidium vulgare*, and the Pill woodlouse *Armadillidium nasatum* is particularly associated with calcareous habitats.

Armadillidium vulgare  
 Armadillidium nasatum  
 Oniscus asellus  
 Philoscia muscorum  
 Porcellio scaber

Common Pill Woodlouse  
 A pill woodlouse  
 The Shiny Woodlouse  
 The Striped Woodlouse  
 Common Rough Woodlouse

The earthworm, *Lumbricus rubellus*, was uncovered during scrub clearance and a large *Lumbricus terrestris* disturbed in its hole under a log.

## Ants

The number and size of the anthills indicate that the site has not been trampled as the nests are friable. These anthills reveal a high loam content over any underlying chalk. Slow-worms will burrow into anthills. This not widely known that slow-worms are a sub-terranean species and can burrow into friable soil very rapidly.

The main ants making hills are Yellow Meadow ants, *Lasius flavus*, and the black garden ant, *Lasius niger*. Among other ants are the red ants *Myrmica rubra*, *Myrmica sulcinodis* and *Temnothorax affinis* (*Leptothorax interuptus*) a small red ant that nested under a reptile refuge. There are number of ants that have not been formally identified.

## Hemiptera

Acanthosoma haemorrhoidale  
 Adelphocorus lineolatus  
 Aelia acuminata  
 Athysanus argentarius  
 Blepharidopterus angulatus  
 Calocoris alpestris  
 Closterotomus fulvomaculatus  
 Coreus marginatus  
 Coriomeris denticulatus  
 Corixidae Bug  
 Drymus sylvaticus  
 Dolycoris baccarum  
 Gonocerus acuteangulatus  
 Leptopterna ferrugata or L. dolabrata  
 Lygus rugulipennis  
 Nabis rugosus  
 Palomena prasina  
 Pentatoma rufipes  
 Philaenus spumarius  
 Phytocoris varipes  
 Picromerus bidens  
 Rhopalus subrufus  
 Scolopostethus decoratus

Hawthorn Shieldbug  
 Lucerne Bug  
 Bishop's Mitre Shieldbug  
 Planthopper  
 Black-kneed Capsid  
 Mirid Bug  
 Plant Bug  
 Dock Bug  
 Shield Bug  
 Lesser Water Boatman (flew to moth light)  
 Lygaeid Bug  
 Sloe Bug  
 Box Bug  
 Nymph (species not determined)  
 Tarnished Plant Bug  
 Common Damsel Bug  
 Green Shield Bug  
 Forest Bug  
 Common Froghopper/Spittle Bug  
 Mirid Bug  
 Shield Bug  
 Bug  
 Lygaeid (Ground) Bug



Stenocranus minutus  
Stenodema laevigata  
Stenotus binotatus  
Tritomegas bicolor

Planthopper  
Grass Mirid Bug  
Mirid Bug  
Pied Shield Bug

#### Leafhoppers

Empoasca decipiens  
Ribautiana tenerrima

Green Leafhopper  
Bramble Leafhopper

Butterflies, moths and bees visit the wildflowers. There are ground nesting bumble bees, and solitary mining bees and wasps. The bees have been surveyed and reported centrally as numbering approximately 50 different visiting species.

#### Butterflies

Aglais urticae  
Anthocharis cardamines  
Aphantopus hyperantus  
Aricia agestis (female)  
Celastrina argiolus  
Coenonympha pamphilus  
Gonepteryx rhamni  
Inachis io  
Maniola jurtina  
Melanargia galathea  
Ochlodes venata  
Pararge aegeria sp insula  
Pieris brassicae  
Pieris napi  
Pieris rapae  
Polygonia c-album  
Polyommatus icarus  
Pyronia tithonus  
Pyrgus malvae  
Thecla betulae  
Thymelicus sylvestris  
Vanessa atalanta  
Vanessa cardui

Small Tortoiseshell  
Orange-tip  
Ringlet  
Brown Argus  
Holly Blue  
Small Heath  
Brimstone  
Peacock  
Meadow Brown  
Marbled White  
Large Skipper  
Speckled Wood  
Large White  
Green-veined White  
Small White  
Comma  
Common Blue  
Gatekeeper  
Grizzled Skipper  
Brown Hairstreak #  
Small Skipper  
Red Admiral  
Painted Lady

# The Brown Hairstreak is a Section 41 species of principle importance under the NERC Act in England. Eggs were discovered by a local wildlife group survey, (Ref 1).

**There is an ongoing moth survey in 2019. In the following moth lists an (S) is a survey addition and (C) is confirmation of a previously recorded moth.**

### **Macro Moths**

<i>Abraxas grossulariata</i>	The Magpie
<i>Acronicta leporina</i>	Miller (S)
<i>Acronicta rumicis</i>	Knotgrass
<i>Agrotis clavis</i>	Heart and Club (S)
<i>Agrotis exclamationis</i>	Heart and Dart(S)
<i>Agrotis puta</i>	Shuttle-shaped Dart(S)
<i>Agrotis putris</i>	The Flame (S)
<i>Alcis repandata</i>	Mottled Beauty (S)
<i>Apamea lithoxylaea</i>	Light Arches (S)
<i>Apamea monoglypha</i>	Dark Arches (S)
<i>Apamea sordens</i>	Rustic Shoulder-knot(S)
<i>Apamea sublustri</i>	Reddish Light Arches (S)
<i>Apoda limacodes</i>	Festoon (S)
<i>Autographa gamma</i>	Silver Y
<i>Biston betularia</i>	Peppered Moth (S)
<i>Caliteara pudibunda</i>	Pale Tussock (S)
<i>Callimorpha dominula</i>	Scarlet Tiger (C)
<i>Camptogramma bilineata</i>	Yellow Shell (C)
<i>Caradrina morpheus</i>	Mottled Rustic (S)
<i>Catarhoe rubidata</i>	Ruddy Carpet (Notable B) (S)
<i>Cerastis leucographa</i>	White Marked
<i>Charanyca trigrammica</i>	Treble Lines (S)
<i>Chloroclystis v-ata</i>	V-Pug
<i>Cidaria fulvata</i>	Barred Yellow fp Roses (S)
<i>Cilix glaucata</i>	Chinese Character Moth
<i>Diarsia mendica</i>	Ingrailed Clay
<i>Deilephila elpenor</i>	Elephant Hawkmoth (S)
<i>Deilephila porcellus</i>	Small Elephant Hawkmoth (S)
<i>Dysstroma truncata</i>	Common Marbled Carpet (S)
<i>Eilema griseola</i>	Dingy Footman
<i>Eilema sororcula</i>	Orange Footman
<i>Epirrhoe alternata</i>	Common Carpet (C)
<i>Eriogaster lanestris</i>	Small Eggar moth
<i>Euclidia glyphica</i>	Burnet Companion
<i>Eupithecia centaureata</i>	Lime-specked Pug (C)
<i>Eupithecia subumbrata</i>	Shaded Pug (S)
<i>Eupithecia tantillaria</i>	Dwarf Pug (S)

*Eupithecia tripunctaria*  
*Euthrix potatoria*  
*Gymnoscelis rufifasciata*  
*Habrosyne pyitoides*  
*Hadena compta*  
*Hecatera bicolorata*  
*Hemithea aestivaria*  
*Hoplodrina octogenarian*  
*Idaea aversata*  
*Idaea biselata*  
*Idaea dimidiata*  
*Idaea trigeminata*  
*Korscheltellus (Hepialus) lupulinus*  
*Lacanobia w-latinum*  
*Laspeyria flexula*  
*Lomographa temerata*  
*Macroglossum stellatarum*  
*Meganola albula*  
*Menophra abruptaria*  
*Mythimna albipuncta*  
*Mythimna impura*  
*Mythimna pallens*  
*Mythimna ferrago*  
*Noctua fimbriata*  
*Noctua pronuba*  
*Nola cucullatella*  
*Ochropleura plectra*  
*Oligia fasciuncula*  
*Oligia latruncula*  
*Oligia strigilis*  
*Opisthograptis luteolata*  
*Orgyia antiqua*  
*Orthosia gracilis*  
*Peribatodes rhomdoidaria*  
*Philereme transversata*  
*Phragmatobia fuliginosus*  
*Rhodometra sacraria*  
*Rivula sericealis*  
*Rusina ferruginea*  
*Scopula imitaria*  
*Scotopteryx chenopodiata*  
*Spilosoma lubricipeda*

White-spotted Pug  
 The Drinker  
 Double-striped Pug (S)  
 Buff Arches (S)  
 Varied Coronet (S)  
 Broad-barred White (S)  
 Common Emerald (S)  
 Uncertain (S)  
 Riband Wave (S)  
 Small Fan-footed Wave  
 Single-dotted Wave  
 Treble Brown-spot (C)  
 Common Swift(S)  
 Light Brocade (S)  
 Beautiful Hook-tip (S)  
 Clouded Silver (S)  
 Hummingbird Hawkmoth  
 Kent Black Arches (S)  
 Waved Umber (S)  
 White-point (S)  
 Smoky Wainscot (S)  
 Common Wainscot(S)  
 Clay (S)  
 Broad-bordered Yellow Underwing(S)  
 Large yellow Underwing (S)  
 Short-cloaked Moth (S)  
 Flame Shoulder(S)  
 Middle-barred Minor(S)  
 Tawny Marbled Minor (S)  
 Marbled Minor (S)  
 Brimstone Moth(S)  
 Vapourer (Larva)  
 Powdered Quaker (S)  
 Willow Beauty (S)  
 Dark Umber (S)  
 Ruby Tiger Moth  
 The Vestal  
 Straw Dot (C)  
 Brown rustic (S)  
 Small Blood-vein (S)  
 Shaded Broad Bar  
 White Ermine Moth

Sphinx ligustri  
 Tyria jacobaeae  
 Xanthorhoe ferrugata  
 Xanthorhoe montanata  
 Xestia c-nigrum  
 Xestia triangulum  
 Xestia xanthographa  
 Zygaena filipendulae

Privet Hawkmoth (S)  
 The Cinnabar  
 Dark-barred Twin-spot Carpet (C)  
 Silver-ground Carpet (S)  
 Setaceous Hebrew Character(S)  
 Double Square-spot (S)  
 Square-spot Rustic (C)  
 Six-spot Burnet

### Micro-moths

Acleris variegana  
 Agonopterix heracliana  
 Agriphila straminella  
 Agriphila tristella  
 Alabonia geoffrella  
 Anania hortulata  
 Ancylis badiana  
 Anthophila fabriciana  
 Archips podana  
 Blastobasis adustella  
 Celypha lacunana  
 Celypha rivulana  
 Chrysoteuchia culmella  
 Clepsia consimilana  
 Cnephasia stephensiana agg.  
 Cochylimorpha straminea  
 Coptotriche marginea  
 Crambus lathoniellus  
 Crambus perlella  
 Dichrorampha alpinana  
 Dichrorampha petiverella  
 Dichrorampha simpliciana  
 Emmelina monodactyla  
 Endothenia marginana  
 Endotricha flammealis  
 Epiblema scutulana  
 Eucosma campoliliana  
 Eudonia lacustrata  
 Eupoecilia angustana  
 Eudonia pallida  
 Gillmeria pallidactyla

Garden Rose Tortrix  
 Common Flat-body  
 Straw Grass-veneer  
 Common Grass-veneer  
 Common Tubic  
 Small Magpie  
 Common Roller(S)  
 Nettle-tap  
 Large Fruit-tree Tortrix (S)  
 Furness Dowd (S)  
 Common Marble(C)  
 Silver-stripped Marble fp Hawkweeds, Plantains, Orchids +  
 Garden Grass-veneer(C)  
 Privet Tortrix fp. many trees & shrubs  
 Grey Tortrix dark form (S)  
 Straw Conch fp Common Knapweed  
 Bordered Carl  
 Hook-streak Grass-veneer (C)  
 Satin Grass-veneer (C)  
 Broad-blotch Drill fp Oxeye Daisy  
 Common Drill fp Yarrow + other  
 Round-winged Drill (fp in roots of Mugwort)  
 Common plume  
 Bordered Marble (near roadside probably not resident)  
 Rosy Tabby (S)  
 Thistle Bell (disturbed from Spear Thistle)  
 Marbled Bell (S)  
 Little Grey(S)  
 Marbled Conch (S)  
 Marsh Grey(C)  
 Yarrow Plume (TBC)

Glyphipterix simpliciella  
 Grapholita janthinana  
 Hedya ochroleucana  
 Hedya prunaria  
 Homoeosoma sinuella  
 Isotrias rectifasciana  
 Lozotaenia forsterana  
 Mompha raschkiella  
 Nematopogon metaxella  
 Nomophila noctuella  
 Notocelia (Epiblema) trimaculana  
 Notocelia uddmanniana  
 Paraswammerdamia nebulella  
 Phyllonorycter corylifoliella  
 Pleuroptya ruralis  
 Plutella xylostella  
 Pseudagyrotoza conwagana  
 Pseudoswammerdamia combinella  
 Psyche casta  
 Pterophorus pentadactyla  
 Pyrausta aurata  
 Scoparia ambigualis  
 Scoparia pyralella  
 Spilonota ocellana  
 Stigmella aurella  
 Udea ferrugalis

### Bees

Andrena cineraria  
 Andrena minutula  
 Anthophora plumipes  
 Apis mellifera  
 Bombus lapidarius  
 Bombus pascuorum  
 Nomada goodeniana

Cocksfoot Moth  
 Pale-bordered Piercer  
 Buff-tipped Marble (S)  
 Plum Tortrix  
 Twin-barred Knot-horn (S)  
 Hedge Shade fp unknown possibly Hawthorn  
 Large Ivy Twist  
 Little Cosmet fp Rosebay Willowherb  
 Buff Long-horn (S)  
 Rush Veneer  
 Triple-Blotched Bell fp Hawthorn  
 Bramble Shoot Moth(C)  
 Hawthorn Ermel (S)  
 Hawthorn Midget  
 Mother-of-pearl  
 Diamond Back  
 Yellow-spot Twist (S)  
 Copper-tipped Ermel fp Blackthorn(S)  
 Common Sweep (Larval case)  
 White Plume (C)  
 Small Purple & Gold  
 Common Grey(S)  
 Meadow Grey(C)  
 Bud Moth (S)  
 Golden Pigmy (leaf mine on Bramble)  
 Rusty-dot Pearl

Grey Mining Bee  
 Bee  
 Bee  
 Honey Bee  
 Red-tailed Bumble-bee  
 Common Carder Bee  
 Cuckoo Bee

As there are over 50 species found to visit the site only experts can identify them all and some require DNA analysis to separate them.

### Sawflies

Athalia rosae

Turnip Sawfly

Cephus pygmaeus  
Tenthredo arcuata  
Tenthredo marginella

Grass Stem Borer  
Sawfly  
Sawfly

## Wasps

Amblyteles armatorius  
Caliadurgus fasciatus  
Chrysididae species  
Habrocampulum biguttatum  
Ichneumon extensorius  
Ichneumon sarcitorius  
Tiphia femorata  
Vespula germanica  
Vespula vulgaris  
Vulgichneumon saturatorius

Ichneumon  
Solitary Wasp  
Ruby-tailed Wasp  
Ichneumon  
Ichneumon  
Ichneumon  
Solitary Wasp  
German Wasp  
Common Wasp  
Ichneumon

The presence of galls indicates the presence of the gall wasps. The most obvious of these are the red Pincushion Galls of *Diplolepis rosae* on rose species and the long galls of *Diastrophus rubi* on bramble stems.

## Other Galls

The Bedstraw Gall mite, *Cecidophyes rouhollahi*, causes the forming of gall “fingers” at the end of Goosegrass making it look like a different plant.

Rivet Galls on Dogwood leaves are caused by *Craneiobia corni* the Dogwood Rivet Gall Midge. Hairy grey galls on Germander Speedwell are caused by the midge, *Jaapiella veronicae*. The Hawthorn Button Top Galls, crumpled leaves at the end of a branch, are caused by a midge, *Dasineura crataegi*. A fly *Urophora cardui* causes galls in thistle stems. A fungus *Taphrina pruni* causes Pocket Plum Galls on Blackthorn.

## Aphids

Anoecia corni  
Megora viciae  
Uroleucon sonchi

Common Dogwood/grass Aphid  
Vetch Aphid  
Sow Thistle Aphid

## Thrips

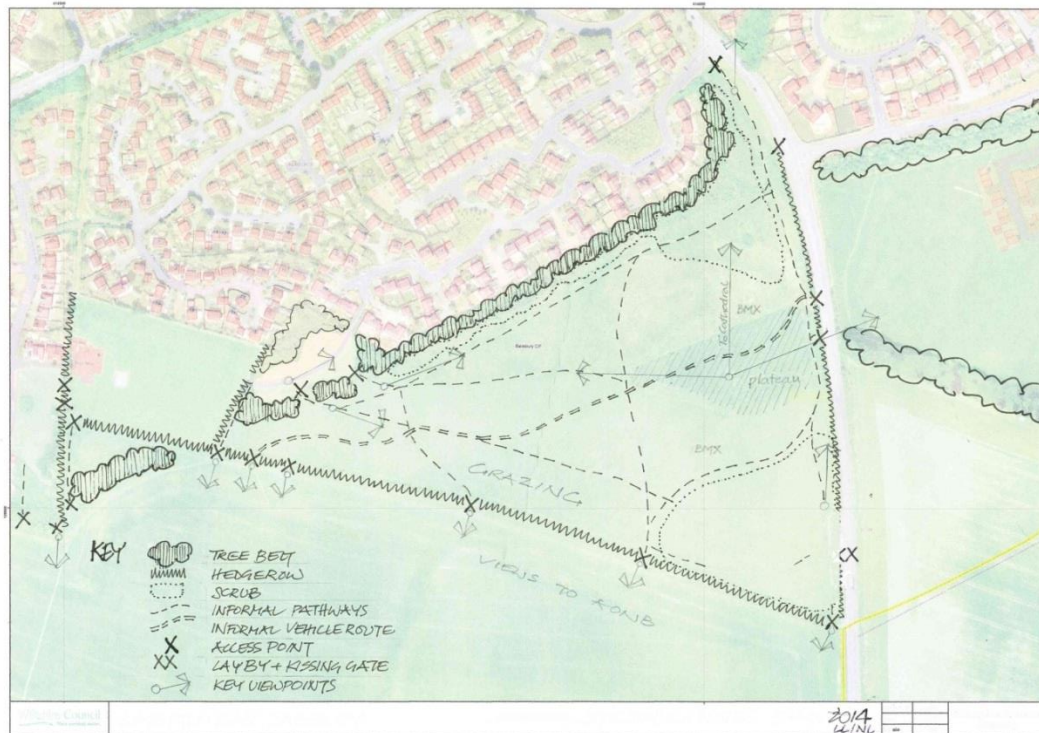
Aeolothrips intermedius agg.

Thrip

## Beetles

In 2018 there were a large number of Garden Chafers at Lime Kiln Down.

<i>Agapanthia villosa</i>	Golden-bloomed Grey Longhorn
<i>Agonum fuliginosum</i>	Ground Beetle
<i>Agrypnus murina</i>	Mousegrey Click beetle
<i>Altica oleracea</i>	Leaf Beetle
<i>Amara aenea</i>	Common sun beetle
<i>Apion (Oxystoma) pomonae</i>	Weevil
<i>Athous haemorrhoidalis</i>	Click beetle
<i>Cetonia aurata</i>	Rose Chafer
<i>Coccinella 7-punctata</i>	7 spot ladybird
<i>Drilus flavescens</i>	Larva
<i>Galeruca tanacetii</i>	Leaf Beetle
<i>Grammoptera ruficornis</i>	Longhorn Beetle
<i>Harmonia axyridis f. succinea</i>	Harlequin Ladybird
<i>Liparus coronatus</i>	Weevil
<i>Lochmaea crataegi</i>	Leaf beetle
<i>Longitarsus jacobaeae</i>	Tansy Ragwort Flea Beetle
<i>Meloe proscarabaeus</i>	Black Oil Beetle
<i>Melolontha melolontha</i>	Cockchafer
<i>Ocypus olens</i>	Devil's Coach Horse
<i>Oedemera lurida</i>	Dull Green Beetle
<i>Oedemera nobilis</i>	Green beetle
<i>Oedemera virescens</i>	Beetle
<i>Paradromius linearis</i>	Ground Beetle
<i>Paederus littoralis</i>	Rove beetle
<i>Phyllobius argentatus</i>	Weevil
<i>Phyllopertha horticola</i>	Garden Chafer
<i>Propylea quatuordecimpunctata</i>	14-spot Ladybird
<i>Psylliodes chrysocephala</i>	Cabbage Flea Beetle
<i>Pterostichus rhaeticus</i>	Ground beetle
<i>Rhagonycha fulva</i>	Soldier beetle
<i>Sitona lineatus</i>	Pea Weevil
<i>Strangalia maculata</i>	Longhorn Beetle
<i>Subcoccinella 24-punctata</i>	24 –spot Ladybird
<i>Tachyporus hypnorum</i>	Rove Beetle
<i>Timarcha tenebricosa</i>	Bloody-nosed beetle
<i>Typhaeus typhoeus</i>	Minotaur beetle (soil mounds, like molehills)
<i>Tytthaspis sedecimpunctata</i>	16 Spot Ladybird



Lime Kiln Down site map



## Grasshoppers

Chorthippus brunneus  
Chorthippus parallelus  
Omocestus viridulus

Field grasshopper  
Meadow Grasshopper  
Common green Grasshopper

## Bush-crickets

Conocephalus discolor  
Leptophyes punctissima  
Metrioptera roeselii  
Pholidoptera griseoptera

Long-winged Conehead  
Speckled Bush-cricket  
Roesel's Bush-cricket  
Dark Bush-cricket

## Earwigs

Forficula auricularia

Common Earwig

To complete the list of visiting and resident insects are the flies and dragonflies some are resident and breed on site as do *Chrysotoxum bicinctum* and *C. festivum* associated with the ants' nests.

## Flies

Asilus crabroniformis  
Bibio marci  
Bombylius discolor  
Bombylius major  
Chloromyia formosa  
Chrysoperia carnea  
Coremacera marginata  
Conops quadrifasciatus  
Dexia rustica  
Haematopota pluvialis  
Lucilia caesar  
Machimus atricapillus  
Machimus cingulatus  
Minettia fasciata  
Musca autumnalis  
Myopa fasciata  
Nephrotoma flavescens  
Neomyia cornicina  
Panorpa communis  
Panorpa cognata  
Pollenia rudis

Hornet Robberfly  
St. Marks-fly  
Dotted Bee Fly  
Bee Fly  
Soldierfly  
Common Green Lacewing  
Snail Killing Fly  
Conopid  
Tachinid Fly  
Notched-horned Cleg  
Greenbottle  
Kite Tailed Robberfly  
Brown Heath Robberfly  
Lauxaniid Fly  
Fly  
Conopid  
Tiger Crane-fly  
Greenbottle  
Scorpion fly  
Scorpion Fly  
Common Cluster Fly

<i>Sarcophaga africa</i>	Flesh fly
<i>Sarcophaga carnaria</i>	Flesh-fly
<i>Sargus cuprarius</i>	Soldierfly
<i>Scathophaga stercoraria</i>	Yellow Dung Fly
<i>Sepsis fulgens</i>	Lesser Dung Fly
<i>Sicus ferrugineus</i>	Larvae are endoparasites of <i>Bombus</i> sp.
<i>Tachina fera</i>	Tachinid
<i>Thelaira nigripes</i>	Tachinid
<i>Tipula paludosa</i>	Cranefly
<i>Tipula vernalis</i>	Cranefly
<i>Trichocera annulata</i> agg.	Winter Gnat

### **Hoverflies**

<i>Chrysotoxum bicinctum</i>	Hoverfly
<i>Chrysotoxum festivum</i>	Hoverfly
<i>Epistrophe diaphana</i>	Hoverfly
<i>Episyrphus balteatus</i>	Hoverfly
<i>Eristalis abusivus</i>	Hoverfly
<i>Eristalis arbustorum</i>	Hoverfly
<i>Eristalis horticola</i>	Hoverfly
<i>Eristalis interruptus</i>	Hoverfly
<i>Eristalis pertinax</i>	Hoverfly
<i>Eristalis tenax</i>	Hoverfly
<i>Eupeodes luniger</i>	Hoverfly
<i>Eupeodes corollae</i>	Hoverfly
<i>Eupeodes latifasciatus</i>	Hoverfly
<i>Helophilus pendulus</i>	Hoverfly
<i>Merodon equestris</i> var. <i>equestris</i>	Hoverfly (Bumble bee mimic)
<i>Merodon equestris</i> var. <i>narcissi</i>	Hoverfly (Bumble bee mimic)
<i>Myathropa florea</i>	Hoverfly
<i>Paragus haemorrhous</i>	Hoverfly
<i>Platycheirus manicatus</i>	Hoverfly
<i>Rhingia campestris</i>	Fly
<i>Scaeva pyrastris</i>	Hoverfly
<i>Sphaerophoria interrupta</i> agg.	Hoverfly
<i>Sphaerophoria scripta</i>	Hoverfly
<i>Syrirta pipiens</i>	Hoverfly
<i>Syrphus ribesii</i>	Hoverfly
<i>Volucella bombylans</i> var. <i>bombylans</i>	Hoverfly (Bumble bee mimic)

Volucella bobyllans var.plumata  
Volucella pellucens

Hoverfly (Bumble bee mimic)  
Hoverfly

### **Caddisfly**

Mystacides longicornis

Grousewing

### **Mayfly**

Heptagenia sulphurea

Mayfly

### **Dragonflies**

Colopteryx splendens  
Cordulegaster boltonii  
Libellula depressa  
Pyrrhosoma nymphula  
Sympetrum sanguineum

Banded demoiselle  
Gold-ringed Dragonfly  
Broad-bodied Chaser  
Large Red damselfly  
Ruddy Darter

### **Spiders**

Agalenatea redii  
Agelena labyrinthica  
Alopecosa pulverulenta  
Araneus alsine  
Araneus diadematus  
Araneus marmoreus  
Araneus quadratus  
Argiope bruennichi  
Cheiracanthium erraticum  
Clubiona diversa  
Dictyna arundinacea  
Enoplognatha ovata  
Euophrys frontalis  
Heliophanus flavipes  
Meta mengei (referred also as Metelina mengei)  
Meta (Metelina) segmentata  
Misumena vatia  
Nerienne peltata  
Nigma puella  
Ozyptila atomaria  
Pardosa nigriceps  
Philodromus cespitum  
Pisaura mirabilis

Orb web Spider  
Funnel web spider  
Spider  
Strawberry /Orange Wheelweaving Spider  
Orb Web spider  
Orb Web spider  
Orb Web spider  
Wasp spider  
Longlegged Sac Spider  
Hunting Spider  
Mesh Web Spider (female)  
Comb-footed Spider  
Spider  
Spider  
Orb Web Spider  
Orb Web Spider  
Crab spider "White Death Spider"  
Sheet Web Spider  
Cribellate spider  
Crab spider  
Wolf Spider  
Hunting Spider  
Nursery Web Spider

Salticus scenicus  
Tibellus oblongata  
Trochosa terricola  
Walckenaeria acuminata  
Xysticus bifasciatus  
Xysticus cristatus  
Zelotes latreillei

Zebra Spider  
Spider on grass stems  
Spider  
Spider under stone  
Spider on flower head  
Spider on low vegetation  
A black spider

### **Harvestmen**

Leiobunum blackwalli  
Leiobunum rotundum  
Rilaena triangularis

Harvestman  
Harvestman  
Harvestman

## Vertebrates at Lime Kiln Down

### **Mammals**

Apodemus sylvaticus  
Equus (domestic)  
Felix (domestic)  
Lepus europaeus  
Meles meles  
Sorex araneus  
Talpa europaea  
Vulpes vulpes

Wood (Long-tailed Field) Mouse  
Horse (grazing on tether)  
Domestic cat  
Brown Hare  
Badger  
Shrew  
Mole  
Fox

### **Bats**

Nyctalus noctula  
Pipistrellus pipistrellus  
Pipistrellus pygmaeus

Common Noctule Bat (S)  
Pipistrelle Bat (S)  
Soprano Pipistrelle Bat(S)

### **Birds**

This not a comprehensive list of the birds nesting or visiting Lime Kiln Down. I have listed a couple of books with recorded birdsongs but this list is based on sightings.

### **Visitors**

Accipiter nisus  
Apus apus  
Buteo buteo

Sparrowhawk  
Swift  
Buzzard

Corvus corone  
Corvus frugilegus  
Corvus monedula  
Delichon urbica  
Falco tinnunculus  
Falco peregrinus  
Hirundo rustica  
Passer domestica

Carrion Crow  
Rook  
Jackdaw  
House Martin  
Kestrel  
Peregrine  
Swallow  
House Sparrow

### **Nesting**

Aegithalus caudatus  
Alauda arvensis  
Alectroris rufa  
Carduelis cannabina  
Carduelis carduelis  
Columba palumbus  
Emberiza citrinella  
Emberiza calandra  
Erithacus rubecula  
Locustella naevia  
Parus caeruleus  
Pica pica  
Prunella modularis  
Sturnus vulgaris  
Sylvia communis  
Turdus merula  
Turdus philomelos  
This is not an exhaustive list.

Long-tailed Tit  
Skylark  
Red-legged Grouse  
Linnet  
Goldfinch  
Woodpigeon  
Yellow Hammer  
Corn Bunting  
Robin  
Grasshopper warbler 2018  
Blue Tit  
Magpie  
Dunnock  
Starling  
Common White Throat  
Blackbird  
Song Thrush

### **Reptiles**

Anguis fragilis  
Natrix natrix  
Pelias (Vipera) berus

Slow-worm  
Grass Snake  
Adder

The following are lists of the plants that can be found at Lime Kiln Down. These can all be observed from the network of pathways that are maintained by Salisbury City Council in Lime Kiln Down except for 2 from the path by the field margin south of Lime Kiln Down.

The following plant lists also have a bracketed category as following:

(In) is Introduced and become naturalised

(A) is Archaeophyte uncertain whether native or introduced

(pN) is probably Native and (?) unknown origin

If the plant is considered native there is no category added.

These categories are based on Stace, 2016 (ref. 11) and give the following statistics as at August 2019. Grasses and Sedge 20 native out of 21, other herbaceous plants 106 native out of 140 and Trees and shrubs 16 native out of 28.

### **Grasses and sedges.**

<i>Agrostis capillaris</i>	Common Bent
<i>Agrostis stolonifera</i>	Creeping Bent
<i>Anisantha sterilis</i>	Barren Brome (A)
<i>Arrhenatherum elatius</i>	False Oat Grass
<i>Avenula (Helictotrichon) pubescens</i>	Downy Oat-grass
<i>Brachypodium sylvaticum</i>	False Brome
<i>Bromus hordeaceus</i>	Soft Brome
<i>Carex flacca</i>	Glaucus sedge
<i>Cynosurus cristatus</i>	Crested Dog's-tail
<i>Dactylis glomerata</i>	Cock's-foot
<i>Festuca ovina</i>	Sheep's Fescue
<i>Festuca pratensis</i>	Meadow Fescue
<i>Festuca rubra ssp rubra</i>	Red Fescue
<i>Holcus lanatus</i>	Yorkshire Fog
<i>Holcus mollis</i>	Creeping Soft-grass
<i>Lolium perenne</i>	Perennial Rye-grass
<i>Phleum bertolonii</i>	Smaller Cat's-tail
<i>Phleum pratense</i>	Timothy
<i>Poa annua</i>	Annual Meadow Grass
<i>Poa trivialis</i>	Rough Meadow Grass
<i>Trisetum flavescens</i>	Yellow Oat Grass

### **Other Herbaceous plants**

<i>Achillea millefolium</i>	Yarrow
<i>Agrimonia eupatoria</i>	Agrimony
<i>Allium vineale</i> var. <i>compactum</i>	Crow Garlic
<i>Allium vineale</i> var. 'Dready'	Hair Garlic (?)
<i>Anacamptis pyramidalis</i>	Pyramidal Orchid
<i>Anagalis arvensis ssp. arvensis</i>	Scarlet Pimpernel
<i>Artisima vulgaris</i>	Mugwort (A)
<i>Atropa belladonna</i>	Deadly Nightshade
<i>Bellis perennis</i>	Daisy
<i>Brassica napus</i>	Rape (In)
<i>Calystegia pulchra</i>	Hairy Bindweed (?)
<i>Calystegia sepium</i>	Hedge Bindweed
<i>Cardamine hirsuta</i>	Hairy Bittercress

<i>Centaurea cyanus</i>		Cornflower (A)
<i>Centaurea nigra</i>		Common Knapweed
<i>Centaurea scabiosa</i>		Greater Knapweed
<i>Cerastium fontanum</i>		Common Mouse-ear
<i>Cerastium glomeratum</i>		Sticky Mouse-ear
<i>Cerastium semidecandrum</i>		Little Mouse-ear
<i>Chaerophyllum temulum</i>		Rough Chervil
<i>Chamerion angustifolium</i>		Rosebay Willowherb
<i>Chenopodium album</i> agg.	Field margin off site	Fat-hen
<i>Cirsium acaule</i>		Dwarf Thistle
<i>Cirsium arvense</i>		Creeping Thistle
<i>Cirsium vulgare</i>		Spear Thistle
<i>Clematis vitalba</i>		Traveller's Joy /Old Man's Beard
<i>Clinopodium vulgare</i>		Wild Basil
<i>Convolvulus arvensis</i>		Field Bindweed
<i>Crepis biennis</i>		Rough Hawk's-beard (pN)
<i>Crepis capillaris</i>		Smooth Hawk's-beard
<i>Dactylorhiza fuchsii</i>		Common Spotted-orchid
<i>Dactylorhiza maculata</i>		Heath Spotted-orchid (lanceolate leaves)
<i>Daucus carota</i> ssp <i>carota</i>		Wild Carrot /Queen Anne's Lace
<i>Epilobium montanum</i>		Broad-leaved Willowherb
<i>Epilobium parviflorum</i>		Hoary Willowherb
<i>Epilobium tetragonum</i>		Square-stalked Willowherb
<i>Erigeron acer</i>		Blue Fleabane
<i>Euphorbia helioscopia</i>		Sun Spurge (A)
<i>Euphorbia lathyris</i>		Caper Spurge (A)
<i>Ficaria verna</i>		Lesser Celandine
<i>Fragaria vesca</i>		Wild Strawberry
<i>Fumaria officinalis</i> agg.		Common Fumitory (A)
<i>Galium aparine</i>		Common Cleavers
<i>Galium mullugo</i>		Hedge Bedstraw
<i>Galium verum</i>		Lady's Bedstraw
<i>Geranium dissectum</i>		Cut-leaved Crane's-bill (A)
<i>Geranium endressii</i> x <i>versicolor</i>		Druce's Crane's-bill (In)
<i>Geranium pratense</i>		Meadow Crane's-bill
<i>Geranium pyrenaicum</i>		Hedgerow Crane's-bill (In)
<i>Geranium robertianum</i>		Herb Robert
<i>Geum urbanum</i>		Wood Avens/Herb Bennet
<i>Glechoma hederacea</i>		Ground-ivy
<i>Gymnadenia conopsea</i>		Chalk Fragrant Orchid
<i>Hedera helix</i>		Ivy

Heracleum sphondylium	Hogweed
Himantoglossum hircinum	Lizard Orchid
Hypericum hirsutum	Hairy St. John's-wort
Hypericum perforatum	Perforate St. John's-wort
Hypochaeris radicata	Cat's-ear
Knautia arvensis	Field Scabious
Lactuca virosa	Great Lettuce
Lamium album	White Dead-nettle (A)
Lamium purpureum	Red Dead-nettle (A)
Lathyrus pratensis	Meadow Vetchling
Leontodon hispidus	Rough Hawkbit
Leontodon saxtalis	Lesser Hawkbit
Leucanthemum vulgare	Oxeye Daisy
Linaria vulgaris	Toadflax
Lotus corniculatus	Common Bird's-foot-trefoil
Lotus pedunculatus (Lotus uliginosus)	Greater Bird's-foot -trefoil
Malva sylvestris	Common Mallow (A)
Matricaria discoidea	Pineapple Weed (In)
Medicago lupulina	Black Medick
Muscari armeniacum	Garden Grape-hyacinth (In)
Myosotis arvensis	Field Forget-me-not (A)
Narcissus hispanicus	Spanish Daffodil (In)
Odontites vernus	Red Bartsia
Origanum vulgare	Wild Marjoram
Orobancha elator	Knapweed Broomrape
Orobancha minor	Common Broomrape
Papaver rhoeas	Common Poppy
Pastinaca sativa	Wild Parsnip
Pilosella aurantiaca	Orange Hawkweed/Fox-and-cubs
Pilosella officinarum	Mouse-ear Hawkweed
Pimpinella saxifraga	Burnet Saxifrage
Plantago lanceolata	Ribwort Plantain
Plantago major	Greater Plantain
Potentilla reptans	Creeping Cinquefoil
Poterium sanguisorba ssp sanguisorba	Salad Burnet
Primula veris	Cowslip
Primula veris "Sunset Shades"	Red Cowslip
Primula vulgaris	Common Primrose
Prunella vulgaris	Selfheal
Pulicaria dysenterica	Common Fleabane
Ranunculus acris	Meadow Buttercup



<i>Ranunculus bulbosus</i>		Bulbous Buttercup
<i>Ranunculus repens</i>		Creeping Buttercup
<i>Reseda lutea</i>		Wild Mignonette
<i>Rhytidadelphus squarrosus</i>		Springy turf-moss
<i>Rumex acetosa</i>		Common Sorrel
<i>Rumex crispus</i>		Curled Dock
<i>Rumex obtusifolius</i>		Broad-leaved Dock
<i>Sanguisorba minor</i>		Salad Burnet
<i>Scabiosa columbaria</i>		Small Scabious
<i>Senecio erucifolius</i>		Hoary Ragwort
<i>Senecio jacobaea</i>		Common Ragwort
<i>Senecio squalidus</i>		Oxford Ragwort (In)
<i>Senecio vulgaris</i>		Common Groundsel
<i>Sherardia arvensis</i>		Field Madder
<i>Silene latifolia</i>		White Campion (A)
<i>Silene vulgaris</i>		Bladder Campion
<i>Sinapsis arvensis</i>	Field margin off site	Charlock (A)
<i>Solanum dulcamara</i>		Bittersweet/Woody Nightshade
<i>Solidago sp.</i>		A Golden Rod
<i>Sonchus asper</i>		Prickly sow-thistle
<i>Sonchus oleraceus</i>		Smooth sow-thistle
<i>Stachys sylvatica</i>		Hedge Woundwort
<i>Tamus communis</i>		Black Bryony
<i>Taraxacum officinale</i> agg.		Dandelion
<i>Taraxacum hamatum</i> agg.		Dandelion
<i>Torilis japonica</i>		Upright Hedge-parsley
<i>Tragopogon pratensis</i> ssp. minor		Goat's-beard
<i>Tragopogon pratensis</i> ssp. pratensis		Goat's-beard (In)
<i>Trifolium campestre</i>		Hop Trefoil
<i>Trifolium dubium</i>		Lesser Trefoil
<i>Trifolium hybridum</i>		Alsike Clover (In)
<i>Trifolium medium</i>		Zigzag Clover
<i>Trifolium pratense</i>		Red Clover
<i>Trifolium pratense</i> f. albiflorum		White-flowered Red Clover
<i>Trifolium repens</i>		White Clover
<i>Tripleurospermum inodorum</i>		Scentless Mayweed (A)
<i>Tussilago farfara</i>		Colt's-foot (Leslie Lipscombe)
<i>Urtica dioica</i>		Common Nettle
<i>Valeriana officinalis</i>		Common Valerian
<i>Veronica chamaedrys</i>		Germander Speedwell
<i>Veronica persica</i>		Common Field-speedwell (In)

Vicia sativa ssp. segetalis  
Vicia sativa ssp nigra  
Vicia sepium  
Viola arvensis

Common Vetch (A)  
Common Vetch  
Bush Vetch  
Field Pansy (A)

### **Trees and shrubs**

Acer campestre  
Acer platanoides  
Acer pseudoplatanus  
Buddleja davidii  
Cornus mas  
Cornus sanguinea  
Corylus avellana  
Cotoneaster horizontalis  
Cotoneaster integrifolius agg.  
Crataegus monogyna  
Euonymus europaeus  
Fagus sylvatica  
Frangula alnus  
Fraxinus excelsior  
Juglans regia  
Ligustrum vulgare  
Lonicera nitida  
Malus pumila  
Pinus contorta  
Pinus nigra ssp nigra  
Pinus nigra ssp salzmannii  
Prunus avium  
Prunus spinosa  
Pyracantha coccinea  
Quercus robur  
Rhamnus cathartica  
Rosa canina  
Rubus caesius  
Rubus fruticosus agg.  
Sorbus aria agg.  
Sorbus aucuparia  
Sorba intermedia  
Ulmus procera  
Viburnum lantana  
Viburnum opulus

Field Maple  
Norway Maple (In)  
Sycamore (In)  
Butterfly Bush (In)  
Cornelian Cherry (Leslie Lipscombe) (In)  
Dogwood  
Hazel  
Wall Cotoneaster (In)  
Entire-leaved Cotoneaster (In)  
Hawthorn  
Spindle  
Beech  
Alder Buckthorn  
Ash  
Common Walnut (In)  
Wild Privet  
Box-leaved Honeysuckle (In)  
Apple (In)  
Lodgepole Pine (In)  
Austrian Pine (In) planted  
Corsican Pine (In) planted  
Wild Cherry  
Blackthorn  
Firethorn (In)  
Pedunculate Oak  
Buckthorn  
Dog Rose  
Dew Berry  
Brambles (?) (Over 400 micro species in BI)  
White Beam (pN)  
Rowan  
Sorbus intermedia group (In)  
English Elm (pN)  
Wayfaring-tree  
Guelder-rose /High-bush Cranberry

## **Fungi**

Phragmidium violaceum

Violet Bramble Rust

Rhytisma acerinum

Tar Spot Fungus on Sycamore

Scleroderma citrinum

Common Earthball

## **END OF LISTS**

## **References**

Ref 1 *"Preliminary Ecological Appraisal, - - Lime Kiln Chalk Meadow Grid reference SU144281"*

Kingfisher Ecology. Sept. 2016

Ref. 2 *"SU12.080 Lime Kiln Chalk Wildlife Site"* Information Sheets R. Large, Wiltshire Wildlife Trust 05 07 2013

Ref. 3 *"Lime Kiln Down – Summary of Wildlife Value for City Councillors"*

Salisbury Area Greenspace Partnership. 17 10 2016

Ref. 4 *"A review of the invertebrates associated with lowland calcareous grassland"* English Nature Report No. 512 Dr K N A Alexander April 2003

Ref.5 *"Lime Kiln Way, Salisbury"* A. Appleyard. 3 11 2015

Ref. 6 *"Handbook for Phase 1 habitat survey a technique for environmental audit"* Joint Nature Conservancy Committee (JNCC) 2010 Edition.

Ref. 7 *"Reptile Habitat Management Handbook"*, Edgar, P., Foster, J. and Baker, J. Amphibian and Reptile Conservation 2010

Ref. 8 *"British Solderflies and their allies"* Alan Stubbs and Martin Drake, British Entomological and Natural History Society 2001

Ref. 9 *"Complete British Insects"* Chinery, M., HarperCollinsPublishers Ltd. 2005

Ref. 10 *"Report on the Species and Habitat Review"* JNCC DEFRA 2007

Ref. 11 *"New Flora of the British Isles Third edition"* Clive Stace, Cambridge University Press, 5<sup>th</sup> print 2016

## **Recommended books**

*"Wildflowers of Britain & Europe"* Lippert, W., Podlech, D., HarperCollins 1994 (English Edition) Flower photographs by colour recommended for beginners in flower recognition.

*"Collins Wildflower Guide"*, 2<sup>nd</sup> Edition Streeter, D. HarperCollins 2016

*"The Vegetative Key to the British Flora"* Poland, J, Clement, E. John Poland 2009

*"Colour Identification Guide to the Grasses, Sedges, Rushes and Ferns of the British Isles and north-western Europe"* Francis Rose, Penguin Group, reprint, 1st Published 1989

*"British Hoverflies"* Alan E. Stubbs and Steven J. Falk, British Entomological and Natural History Society 2002

*"British Plume Moths"* Colin Hart, British Entomological and Natural History Society 2011

*"Handbook of Biodiversity Methods Survey, Evaluation and Monitoring"* David Hill et.al. Cambridge University Press 2012

*"Field Guide to the Micro-moths of Great Britain and Ireland General Editor, Phil Sterling & Main Contributor Mark Parsons, Bloomsbury Publishing Plc Re-print 2016*

*"Solitary Wasps"* Yeo, Peter F., Corbet, Sarah A. Naturalists' Handbook 3 2<sup>nd</sup> ed. Pelagic Publishing 2015

*"Ants"* Skinner Gary J., Allen Geoffrey W. Naturalists' handbook 24 Pelagic Publishing 2015

*"Indicator Plants: Using plants to Evaluate the Environment"* Paul L. Smith Author and Publisher 2013  
*"Garden Bird Songs and Calls"* Geoff Sample Harper Collins 2000  
Recommended beginners.

*"Garden Bird Songs and Calls"* Geoff Sample, Harper Collins 2000 (40 common birds 1-cd)

*"Bird Songs & Calls"* Geoff Sample Harper Collins 2010 (200 + birds 3-cd)

*"Dragonflies"* Philip Corbet & Stephen Brooks, HarperCollins 2008

## Web Sites

A large number of internet identities were checked using Bing image matching. In Bing images click on upload image and within seconds Bing will display matches and these can be accessed to find experts who have provided an identity. It works for insects or flowers and leaves.

The following sites can be used for confirmation and other sites that specialise in beetles, bugs, bees, etc. can be used to record anything you have found. You can also post pictures in forums especially for pictures of flies asking for an identity.

Adur Wildflowers 2011

David Fenwick, Marine and Botanical Photographer A-P-H-O-T-O (recommended site)

I am indebted to David Fenwick for advice and for identities.

Donegal Wildlife

Eakringbirds.com "Raising the profile of Nottinghamshire's invertebrate fauna".

Flora of Great Britain and Ireland Volume 1 Cambridge University Press

Geometridae Northumberland Moths

Grid Reference Finder (GPS to OS Grid Reference)

NatureSpot Recording the Wildlife of Leicestershire & Rutland

Paul Nielson's British Wild Orchid Gallery

Waste Places – Chris Chadwell

Srs.britishspiders.org.uk (identity and summary for *Araneus alsine* Nationally Notable B)

Mjninsectenwereld.nl Curculionidea (Very good pictures of Weevils.)

What's Flying Tonight Hants Moths Website

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In memory of Bridget M. Morgan.

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