

The Brighton and Hove Local Biodiversity Action Plan

Table 2: list of species requiring conservation action in Brighton and Hove

The table shows important species for which Brighton and Hove has a particular responsibility to conserve, because the city supports suitable habitat or existing native populations of the species. Species which occur only as casual records, garden escapes or which are dependent on habitats which are not represented in the city, are not included. Species highlighted in yellow are recommended for particular attention because their needs are unlikely to be addressed through habitat action alone and these are specifically addressed by chapters in the main report.

Species no.	Latin Name	English Name	Taxon	Status	Notes
1	<i>Halictus eurygnathus</i>		Bee	RDB1	Coastal Lowland calcareous grassland with abundant Greater Knapweed. Requires areas of bare soil, sparsely vegetated or short-turf. Retain dead wood, <i>Rubus</i> clumps and pithy dead plant stems, flower-rich areas which need to be as large as possible and include flowering trees and shrubs. Retain some scrubby and coarse vegetation areas. Lowland calcareous grassland HAP
2	<i>Ulopa trivialis</i>		Leafhopper	Locally notable. Nationally Notable b	Often associated with Coastal vegetated shingle but also known from calcareous grassland sites in the local area
3	<i>Hennediella macrophylla</i>	-	Moss	Locally notable	found in bare soil patches in parks both sides of the A23 in Brighton and opposite the Booth Museum in Dyke Road. Not seen since the late eighties but almost certainly still extant
4	<i>Physcia clementei</i>	A lichen	Lichen	Locally notable Nationally Scarce Species.	Found on nutrient-rich, well-lit trunks of wayside and parkland trees; steeply sloping, basic rock faces near the sea, on walls near the coast and inland in churchyards. Found some time ago in Stanmer Churchyard. Threatened by the repair and maintenance of wall surfaces, the inappropriate management of graveyards, including the movement of gravestones from their original positions, thereby altering the abiotic factors affecting the lichen, and the cleaning of headstones
5	<i>Vipera berus</i>	Adder	Reptile	NERC S41 species	National action plan recommends species-specific action
6	<i>Lysandra bellargus</i>	Adonis Blue	Butterfly	Locally notable Wildlife and Countryside Act 1981 (Schedule 5 Section 9.5a,b)	Lowland calcareous grassland HAP. Sole foodplant is Horseshoe Vetch
	<i>Allium ampeloprasum</i> <i>var babingtonii</i>	Babington's Leek	Vascular Plant	Nationally Scarce	Occurs along the Volks Railway
7	<i>Clinopodium acinos</i>	Basil Thyme	Vascular Plant	NERC S41 species	Lowland calcareous grassland HAP
8	<i>Thesium humifusum</i>	Bastard Toadflax	Vascular Plant	Locally notable	Lowland calcareous grassland HAP – bare soil on Lowland calcareous grassland.
9	<i>Phoenicurus ochruros</i>	Black Redstart	Bird	W&C Act Schedule 1. Bird Population Status - Amber	Several possible breeding records along the beach from the Palace Pier to Rottingdean. Confirmed breeding at Black Rock.

ADOPTED VERSION: FEBRUARY 2013

10	<i>Pyrochroa coccinea</i>	black-headed cardinal beetle	Beetle	Nationally Notable b	Preys on other insects; normally found on flowers at the edges of woodland. Stanmer Park. Lowland Mixed Deciduous Woodland HAP
11	<i>Euphorbia platyphyllos</i>	Broadleaved Spurge	Vascular Plant	Locally notable	Farmlands HAP
12	<i>Thecla betulae</i>	Brown Hairstreak	Butterfly	NERC S41 species	Extrapolated 99% decline over 25 years from 1984. Requires abundant blackthorn with nearby nectar sources. Unsympathetic farming practices that involve the flailing of Hedgerows containing overwintering eggs are considered to be one factor causing decline. Recently considered to be quite common in much of West Sussex, although thought to be almost absent from East Sussex. Records from Brighton and Hove. Farmlands HAP, Hedgerows HAP
13	<i>Lepus europaeus</i>	Brown Hare	Mammal	NERC S41 species	Useful farmland indicator species in continuing decline Farmlands HAP
14	<i>Plecotus auritus</i>	Brown Long-eared Bat	Bat	NERC S41 species	Declined in Britain due to changing land use, including modern intensive agricultural practices, which have resulted in the loss of suitable feeding habitats and hollow trees for roosting. It is particularly susceptible to pesticides, especially their use in roofs where it often roosts on exposed timbers. Bats Group SAP
15	<i>Bombus humilis</i>	Brown-banded Carder Bee	Bee	NERC S41 species	Restricted to southern England coastal and chalkland areas. Quite widespread on the downs but prefers larger areas of flower-rich habitat. Recent records for urban Brighton and Hove.
16	<i>Poa bulbosa</i>	Bulbous Meadow -Grass	Vascular Plant	Locally notable	urban commons HAP –needs dry ground with patchy, open vegetation
17	<i>Pyrrhula pyrrhula subsp. pileata</i>	Bullfinch	Bird	NERC S41 species	70% of the European population in the UK. 43% decline over 25 years. Associated with overgrown Hedgerows and field margins. The reasons for bullfinch decline are not fully understood. Scattered breeding records across Brighton & Hove. Hedgerows HAP, Farmlands HAP
18	<i>Orchis ustulata</i>	Burnt Orchid	Vascular Plant	NERC S41 species	Occurs only at Castle Hill SAC. Lowland calcareous grassland HAP
19	<i>Monacha cartusiana</i>	Carthusian Snail	Mollusc	Locally notable	Lowland calcareous grassland HAP
20	<i>Scotopteryx bipunctaria</i>	Chalk Carpet	Moth	NERC S41 species	Benfield Hill. Fairly common and widespread on chalk downland and limestone hills in the south. Bird's-foot trefoil (<i>Lotus</i>) and clover (<i>Trifolium</i>) are the larval foodplants. Appears to be a continuing decline in this species distribution. Seems to be dependant on the earliest successional stages of Lowland calcareous grassland. - broken soils on calcareous habitats. Around Brighton, distribution is mostly fragmented on steep, incised bostal paths or on vegetating old disused chalk pits Re-creation of extensive areas of early successional Lowland calcareous grassland seems key to the future of this moth. Lowland calcareous grassland HAP
21	<i>Euphrasia pseudokernerii</i>	Chalk Eyebright	Vascular Plant	NERC S41 species	Near endemic International responsibility. Recorded at Castle Hill. Lowland calcareous grassland HAP
22	<i>Eurysa douglasi (Eurysanoides douglasi)</i>	Chalk Planthopper	Bug	NERC S41 species	Highly restricted distribution; outside England, known only from Siberia - near-endemic in UK. 50% decline over 20 years. only two recent (since 2000) UK records, both in Sussex. Apparently restricted to high quality long-established Lowland calcareous grassland. Incorporate into Lowland calcareous grassland HAP .

ADOPTED VERSION: FEBRUARY 2013

23	<i>Lysandra coridon</i>	Chalkhill Blue	Butterfly	Locally notable	Horseshoe Vetch is almost the exclusive food plant but three other food plants have been recorded: Bird's-foot Trefoil Kidney Vetch and Bird's-foot (<i>Ornithopus perpusillus</i>). Lowland calcareous grassland HAP
24	<i>Adscita geryon</i>	Cistus Forester	Moth	Locally notable	A nationally local day-flying species found during June and July over much of England and Wales. Found in Lowland calcareous grassland, lowland meadow, woodland rides, with larvae feeding on Sheep's Sorrel and Common Sorrel. In Sussex it is found on the downs between Brighton and Eastbourne. In West Sussex it is very scarce with recent records only from the Downs near Upper Beeding. Larvae feed on common rock-rose. Lowland calcareous grassland HAP
	Gadus morhua	Cod	Fish	NERC S41 species	Overfishing; Brighton Marina
25	<i>Zootoca vivipara</i>	Common Lizard	Reptile	NERC S41 species	Declining in Southern England. Needs suitable basking, feeding, breeding and hibernation sites in a connected landscape An "indicator" species for Urban Commons HAP
26	<i>Pipistrellus pipistellus</i>	Common Pipstrelle	Bat	Locally notable	Semi-natural woodland, tree lines, parks and gardens: Summer roosts in cracks and crevices in new and old buildings Winter roosts: trees, buildings. Threats are attributed to the use of agricultural chemicals in the intensification of agriculture and loss of roost sites. Loss of Hedgerows and woodland edge habitats. Declining. Numbers unknown in Brighton & Hove. Bats Group SAP
27	<i>Bufo bufo</i>	Common Toad	Amphibian	NERC S41 species	Serious decline demonstrated among many populations across large areas of S, E and C England where 50% or more of toad populations in rural areas have experienced recent declines (1985-2000) including extinction or near-extinction of some populations. Countering the effects of habitat fragmentation at the local scale is a very high priority. Ponds HAP / Gardens HAP
28	<i>Emberiza calandra subsp. calandra/clanceyi</i>	Corn Bunting	Bird	NERC S41 species	Dramatic UK decline. Still breeds at Mile Oak and east of Brighton., Farmlands HAP
29	<i>Lithospermum arvense</i>	Corn Gromwell	Vascular Plant	Locally notable	Records from the 1980's – may reappear. Arable Annuals Group SAP, Farmland HAP,
30	<i>Petroselinum segetum</i>	Corn Parsley	Vascular Plant	Locally notable	Arable Annuals Group SAP, Farmland HAP,
31	<i>Centaurea cyanus</i>	Cornflower	Vascular Plant	NERC S41 species	Has occurred in the 1980's and more recently as possibly native seed on road verges in Brighton. Arable Annuals Group SAP, Farmlands HAP,
32	<i>Cuculus canorus</i>	Cuckoo	Bird	NERC S41 species	57% decline over 25 years Reasons unclear or probably out of the control of the local authority. Still believed to breed on the urban fringe around Moulsecoomb. Lowland Mixed Deciduous Woodland HAP, Hedgerows HAP
33	<i>Fumaria densiflora</i>	Dense-flowered Fumitory	Vascular Plant	Nationally Scarce	Brighton & Hove is the Sussex stronghold for this species. Arable Annuals Group SAP, Farmlands HAP
34	<i>Erynnis tages subsp. tages</i>	Dingy Skipper	Butterfly	NERC S41 species	The main foodplant is Bird's-foot-trefoil (<i>Lotus corniculatus</i>). Ongoing decline.
35	<i>Bombylius discolor</i>	Dotted bee-fly	Fly	Nationally Scarce	Larvae are parasitic on solitary bees, so the species can persist only where there are good host populations, typically open areas, with dry, bare soil where the hosts can nest. Suitable sites must also provide

ADOPTED VERSION: FEBRUARY 2013

					sufficient nectar-rich flowers for the adults to feed on. Lowland calcareous grassland HAP
36	<i>Prunella modularis</i> <i>subsp. occidentalis</i>	Dunnock (Hedge Accentor)	Bird	NERC S41 species	100% of the European population in the UK. 27% decline over 25 years. Deciduous woodland, farmland edges, parks and gardens. Gardens HAP, Hedgerows HAP
37	<i>Gentianella anglica</i>	Early Gentian	Vascular Plant	NERC S41 species	Castle Hill. May not be a separate species. Lowland calcareous grassland HAP
38	<i>Poa infirma</i>	Early Meadow-grass	Vascular Plant	Locally notable IUCN (pre 1994) - Rare	needs dry ground with patchy, open vegetation. Increasing (or previously overlooked?) in Sussex. Urban Commons HAP
39	<i>Ophrys sphegodes</i>	Early Spider Orchid	Vascular Plant	Sch. 8, W&C Act 1981, Locally notable	Castle Hill and some other, scattered localities. Lowland calcareous grassland HAP
	<i>Seligeria calycina</i>	English rock-bristle	Bryophyte	Locally notable Lower Risk in Great Britain.	grows in patches on shaded chalk fragments. A Species Action Plan has been produced for this moss under the UK Biodiversity Action Plan. Endemic to Europe; in Britain it has a wide distribution in the chalklands of southeast England, reaching up to Humberside and down to south Devon. Outside of Britain it is very rare; it has been recorded from Belgium, France and Italy. Typically found on the ground in woodlands, but it also occurs in chalk pits and, very rarely, Lowland calcareous grassland. In Sussex it is not uncommon in very steep sided chalk pits where it receives very little competition from other plants. Threatened by growth of scrub and saplings in old chalk pits producing excessive shade. Destruction or inappropriate management of woodlands. Proposed UK action: Monitoring only.
	<i>Anguilla anguilla</i>	European Eel	Fish	NERC S.41, IUCN Red List of Threatened Species (2008) - Critically Endangered	Spawning believed to occur in the Sargasso Sea, south of Bermuda. The larvae drift northeast with the Gulf Stream, arriving in early winter off Southern Europe and in spring or early summer in Northern Europe. The leaf-like larvae then transform into transparent juveniles called glass eels. These gather in river estuaries and swim upstream. They then acquire green and brown pigments to become yellow eels and live in inland waters for a number of years. Those that survive their time in the river then undergo one final transformation into silver eels. They then start their journey to the Atlantic Ocean to spawn. Fragile Sponge and Anthozoan Communities; on Subtidal Rocky Habitats; Subtidal chalk; Subtidal sands and gravels.
40	<i>Chirocephalus diaphanus</i>	Fairy Shrimp	Crustacean	IUCN Pre 1994 RED vulnerable Wildlife and Countryside Act 1981 Schedule 5	Recorded from ponds around the city. Useful indicator for Dewponds? Ponds HAP
41	<i>Tephrosieris integrifolia</i> <i>subsp. integrifolia</i>	Field Fleawort	Vascular Plant	NERC S41 species	Recent records from castle Hill and Newtimber Hill. Needs short Lowland calcareous grassland. Lowland calcareous grassland HAP
42	<i>Fumaria parviflora</i>	Fine-leaved Fumitory	Vascular Plant	Locally notable	Brighton & Hove is the Sussex stronghold for this species Arable Annuals Group SAP, Farmlands HAP
43	<i>Ophrys insectifera</i>	Fly Orchid	Vascular Plant	NERC S41 species	Present in Stanmer / Coldean Woods. Decline across the UK is an indicator of closure of woodland glades, scrubby grassland and eutrophication of Lowland calcareous grassland. Lowland Mixed Deciduous Woodland HAP
44	<i>Adscita stacies</i>	Forester	Moth	NERC S41 species	larval foodplant is Common sorrel. 83% decline over 25 years, 1980-2005 seriously declined in Sussex and numbers now a tenth of earlier levels. flagship species for open grassy habitats such as meadows and neutral grassland. An attractive, day-flying species. Maintenance of a

ADOPTED VERSION: FEBRUARY 2013

					medium-tall sward with abundant sorrel and nectar plants is essential. Light grazing is required to prevent scrub encroachment, over-grazing can be very detrimental. Lowland calcareous grassland HAP
45	<i>Coeloglossum viride</i>	Frog Orchid	Vascular Plant	NERC S41 species	Declining and a good indicator of a threatened habitat (Lowland calcareous grassland). May be extinct outside Castle Hill NNR. Lowland calcareous grassland HAP
46	<i>Atriplex laciniata</i>	Frosted Orache	Vascular Plant	Locally notable	Recorded from Black Rock Beach in the 1990's. Coastal Vegetated Shingle HAP
47	<i>Lampyrus noctiluca</i>	Glow-worm	Beetle	Locally notable	Rough Lowland calcareous grasslands and scrub interface – Lowland calcareous grassland HAP
48	<i>Natrix natrix</i>	Grass Snake	Reptile	NERC S41 species	Widespread in gardens with ponds –Pondfs HAP, Parks & Gardens HAP
49	<i>Hipparchia semele</i>	Grayling	Butterfly	NERC S41 species	Substantial decline since 1980's. – Lowland calcareous grassland HAP
50	<i>Triturus cristatus</i>	Great Crested Newt	Amphibian	NERC S41 species	16 records from Brighton 1983 – 2000. Continued threat from development, habitat fragmentation, fish introductions and lack of habitat management as well as pond loss. Only small populations if now present all in Brighton and Hove – Ponds HAP
51	<i>Perdix perdix</i>	Grey Partridge	Bird	NERC S41 species	Breeds at a number of localities across the Brighton Downs. Farmlands HAP
52	<i>Pyrgus malvae</i>	Grizzled Skipper	Butterfly	NERC S41 species	Found on chalk grasslands with scrub and disused artificial (industrial) habitats such as railway lines. Declined in recent years Lowland calcareous grassland HAP
	<i>Micromys minutus</i>	Harvest Mouse	Mammal	NERC S41 species	71% decline over 18 years. Farmlands HAP
53	<i>Muscardinus avellanarius</i>	Hazel Dormouse	Mammal	NERC S41 species	Recently discovered in Waterhall, Green Ridge and Stanmer Park. Declining populations nationally.
54	<i>Helica itala</i>	Heath Snail	Mollusc	Locally notable	Dry, open habitats Lowland calcareous grassland HAP
55	<i>Erinaceus europaeus</i>	Hedgehog	Mammal	NERC S41 species	20% decline over 4 years (2001-5). 'headline' species for Parks & Gardens HAP
56	<i>Hyoscyamus niger</i>	Henbane	Vascular Plant	Locally notable	Annual. Needs disturbed, fertile ground. Urban Commons HAP
57	<i>Larus argentatus subsp. argentus</i>	Herring Gull	Bird	NERC S41 species	42% decline over 25 years from 1975 Reasons unclear. Still common in Brighton & Hove and considered a pest by many. No action needed, but population monitoring of value
58	<i>Matthiola incana</i>	Hoary Stock	Vascular Plant	Locally notable IUCN (pre 1994) - Rare	Some confusion as to whether native or introduced (included in RDB ed 1 but excluded from RDB ed 3 as non-native). Known from the cliffs at Kemp Town at Rottingdean from before 1900. The cliffs above the Brighton Marina are its Sussex stronghold, but found in scattered localities to Hastings
59	<i>Asilus crabroniformis</i>	Hornet robberfly	Fly	NERC S41 species	Declining but still found on horse pastures south of Bevendean. Problems include use of Avermectins (wormers and boticides used for treating livestock). habitat loss or deterioration: grassland improvement, overgrazing, absence of suitable dung. Large, showy species with Specialist requirements
60	<i>Delichon urbicum</i>	House Martin	Bird	Locally notable	Numbers in slow decline. Closely associated with man – potential 'flagship' species. Swift, Swallow and House Martin Group SAP
61	<i>Passer domesticus</i>	House Sparrow	Bird	NERC S41 species	68% decline over 25 years - 1979-2004. Reasons not clear. Parks & Gardens HAP
62	<i>Juniperus communis</i>	Juniper	Vascular	NERC S41 species	Only exists as an introduced plant in the city - planted along the A27

ADOPTED VERSION: FEBRUARY 2013

			Plant		Brighton Bypass – occurs naturally at Devil’s Dyke (outside the authority boundary). Lowland calcareous grassland HAP
63	<i>Vanellus vanellus</i>	Lapwing	Bird	NERC S41 species	51% decline over 25 years. Possibly breeds on the downs around the Chattri War memorial. Farmlands HAP
64	<i>Abida secale</i>	Large Chrysalis Snail	Mollusc	Nationally notable	Very slow to recolonise restored Lowland calcareous grassland sites (Boschi & Baur, <u>Basic and Applied Ecology</u> Volume 9, Issue 6, 6 October 2008, Pages 752-761) Requires short turf. Lowland calcareous grassland HAP
65	<i>Mutilla europaea</i>	Large Velvet Ant	Bee	Nationally Scarce	parasite of bumblebees. Flower-rich, open habitats – Lowland calcareous grassland associate
66	<i>Agrotis cinerea</i>	Light Feathered Rustic	Moth	Locally notable	calcareous soils, shingle beaches, quarries and similar stony areas in the South of England. Larvae feed on low-growing plants, including wild thyme – Lowland calcareous grassland HAP; Vegetated Shingle HAP
67	<i>Carduelis cannabina</i> subsp. <i>autochthona/cannabina</i>	Linnet	Bird	NERC S41 species	Breeding records on the Downs across Brighton & Hove Farmlands HAP
	<i>Scomber scombrus</i>	Mackerel	Fish	NERC S41 species	Level of fishing mortality is above level needed for recovery.
68	<i>Salvia pratensis</i>	Meadow Clary	Vascular Plant	Red Data Book & Schedule 8 Species	Recent records from Roedean School grounds. Lowland calcareous grassland HAP
69	<i>Pupilla muscorum</i>	Moss Snail	Mollusc	Locally notable	Restricted to old calcareous grasslands Lowland calcareous grassland HAP
70	<i>Valerianella dentata</i>	Narrow-fruited Cornsalad	Vascular Plant	Locally notable	Scattered localities from Ditchling Road to Beacon Hill and Saltdean – always on arable. Arable Annual Group SAP; Farmlands HAP
	<i>Ostrea edulis</i>	Native Oyster	Mollusc	NERC S.41 species	Occurrence in and around Brighton Marina
71	<i>Chenopodium murale</i>	Nettle-leaved Goosefoot	Vascular Plant	Locally notable	Occasional records from various urban sites and from the allotments at Warren Road annual needs disturbed, fertile ground Urban Commons BAP
72	<i>Nyctalus noctula</i>	Noctule Bat	Bat	NERC S41 species	Destruction of roost sites through deforestation and removal of winter roosts in buildings threatens remaining populations. Proactive protection of all roosts (trees and buildings) is needed Bat boxes can be used to help maintain existing populations. 21% decline over 6 years. Bats Group SAP
73	<i>Silene nutans</i>	Nottingham Catchfly	Vascular Plant	Locally notable	Castle Hill Lowland calcareous grassland on short turf only Lowland calcareous grassland HAP
74	<i>Falco peregrinus</i>	Peregrine	Bird	Locally notable	Several nesting sites across the city – nest density at maximum sustainable levels without intra-specific competition. No need for conservation action but monitor populations as a measure of the health of urban wildlife
75	<i>Doros profuges</i>	Phantom or Wasp Hoverfly	Fly	NERC S41 species	1980’s record from Coldean / Wild Park area. 52% decline over 25 years. Most records of adults are from scrub or wood edge on calcareous grasslands. Factors causing the decline unknown, but calcareous grasslands should incorporate properly managed scrub

ADOPTED VERSION: FEBRUARY 2013

					and woodland edge habitats as positive features. Lowland calcareous grassland HAP
76	<i>Adonis annua</i>	Pheasant's-eye	Vascular Plant	NERC S41 species IUCN (1994) - Vulnerable	A member of the buttercup family, this annual plant of well-drained, disturbed ground and arable margins is found on calcareous soils in southern England. It may possibly be an ancient introduction, formerly widespread it has declined steadily since the 1880s, now present at half a dozen sites in East Sussex, but long extinct in West Sussex. Not recorded for 17 years in Brighton and Hove but dormant seed may still lead to new sightings. Possible 'flagship' species for Arable Annual Group SAP .
	Pleuronectes platessa	Plaice	Fish	NERC S41 species	Long-lived, vulnerable and low recovery. Brighton Marina Outer Harbour
77	<i>Atypus affinis</i>	Purseweb spider	Spider	Locally notable	Rough chalky grassland – Lowland calcareous grassland HAP
78	<i>Vertigo pygmaea</i>	Pygmy Snail	Mollusc	Locally notable	Lowland calcareous grassland HAP
79	<i>Centaurea calcitrapa</i>	Red Star-thistle	Vascular Plant	NERC S41 species RDB – critically endangered	Marked decline in the UK. In Brighton and Hove, found in hard grazed horse pastures at Mile Oak and Woodingdean, where it can be abundant.
80	<i>Vallonia costata</i>	Ribbed Vallonia	Mollusc	Locally notable	Dry and open habitats on calcareous subground, grassy and sunny slopes. Lowland calcareous grassland HAP
81	<i>Phyteuma orbiculare</i>	Round-headed Rampion	Vascular Plant	Locally notable	Flagship for Lowland calcareous grassland HAP
82	<i>Adscita globulata</i>	Scarce Forester	Moth	Nationally Scarce	larval foodplants are common knapweed (<i>Centaurea nigra</i>) and greater knapweed (<i>C. scabiosa</i>). Lowland calcareous grassland HAP
83	<i>Calystegia soldanella</i>	Sea Bindweed	Vascular Plant	Locally notable	1980's record from stable shingle near the Marina. Coastal Vegetated Shingle HAP
84	<i>Frankenia laevis</i>	Sea Heath	Vascular Plant	Nationally Scarce	Along the cliff top and foreshore from the Marina to Saltdean, particularly around Woodingdean. No need for conservation action but monitor health of population.
85	<i>Polygonum maritimum</i>	Sea Knotgrass	Vascular Plant	Schedule 8 Species Nationally Rare	Records prior to 1996 on shingle at Black Rock. Coastal Vegetated Shingle HAP
86	<i>Cakile maritima</i>	Sea Rocket	Vascular Plant	Locally notable	1980's records from Black Rock. Annual dispersed by sea water, confined to coastal habitats Coastal Vegetated Shingle HAP
87	<i>Eptesicus serotinus</i>	Serotine Bat	Bat	Locally notable	Prefers open habitats. Often found in buildings at the edges of towns. Declined due to loss of feeding habitat where large insects such as chafers and dung beetles can be found. As it roosts almost entirely in buildings it is subject to the effects of building work and the use of toxic chemicals in remedial timber treatment. Bat Group SAP
88	<i>Scandix pecten-veneris</i>	Shepherd's-needle	Vascular Plant	NERC S41 species	Still occurs on the roadside by Roedean School Grounds. Arable Annual Group SAP .
89	<i>Hippocampus hippocampus</i>	Short-snouted Seahorse	Fish	NERC S41 species	Prefers shallow, still seawater. Recorded at Brighton Marina in 2006
-	<i>Hesperia comma</i>	Silver Spotted Skipper	Butterfly	Former UK BAP priority species	Restricted to chalk downland slopes in Southern England. Has increased significantly since 1980. Requires close grazed turf with bare patches (e.g. through cattle grazing). In Brighton and Hove there are recent records from Sheepcote Valley and grassland north of

ADOPTED VERSION: FEBRUARY 2013

					Roedean School. Lowland calcareous grassland HAP
90	<i>Alauda arvensis subsp. arvensis</i>	Sky Lark	Bird	NERC S41 species Birds Directive Annex 2.2	59% decline over 25 years. Still common on Lowland calcareous grassland around Brighton & Hove. Lowland calcareous grassland HAP
91	<i>Anguis fragilis</i>	Slow-worm	Reptile	NERC S41 species Wildlife and Countryside Act 1981 (Schedule 5 Section 9.1, 9.5a,b)	A legless lizard found throughout much of Europe. It is widespread in southern England where it is found in a range of open habitats such as rough grassland and heathland with structural variation. Common and widespread in the city. Gardens HAP, Lowland calcareous grassland HAP
92	<i>Cupido minimus</i>	Small Blue	Butterfly	NERC S41 species	69% decline over 25 years, 1984-2003 Still quite common on Lowland calcareous grassland around the city. Lowland calcareous grassland HAP flagship species(?)
93	<i>Coenonympha pamphilus</i>	Small Heath	Butterfly	NERC S41 species	62% decline over 25 years, 1984-2003. Feeds on Fine grasses, especially fescues (<i>Festuca</i> spp.), meadow-grasses (<i>Poa</i> spp.), and bents (<i>Agrostis</i> spp.). On dry, well-drained situations. Still quite common – a S41 species for research purposes only due to rapid decline.
	<i>Solea solea</i>	Sole	Fish	NERC S41 species	Overfishing. Brighton Marina
94	<i>Turdus philomelos subsp. clarkei</i>	Song Thrush	Bird	NERC S41 species	Over 25% of world population in UK; 25% decline over 25 years. Still quite common in Brighton & Hove. Gardens HAP – flagship species?
95	<i>Muscicapa striata</i>	Spotted Flycatcher	Bird	NERC S41 species	Summer migrant. Breeding records for Preston Park area, Patcham and Stanmer. Woodland edges, parks and gardens. 81% decline over 25 years – reasons unclear but may include lack of nesting opportunities, unsuitable woodland edge' habitat; pesticide use (many farmland birds suffer from low invertebrate prey abundance in the summer); decreases in livestock (which attract flies); problems in the wintering area, or during the migration. Lowland Mixed Deciduous Woodland HAP, Hedgerows HAP
96	<i>Torilis arvensis</i>	Spreading Hedge-parsley	Vascular Plant	NERC S41 species	Arable weed species in sharp decline. Older records for Brighton & Hove. Arable Annual Group SAP
97	<i>Lucanus cervus</i>	Stag Beetle	Beetle	NERC S41 species	Very few verifiable records for Brighton and Hove, although there are records for it as close at Worthing. Soil type seems to be an important influence on its distribution. Most populations breed in timber on warm alluvial soils. Soils over chalk appear to be less favoured and stag beetles are rare or completely from areas with extensive underlying chalk, with the exception of alluvial soils in river valleys.
98	<i>Sturnus vulgaris subsp. vulgaris</i>	Starling	Bird	NERC S41 species	87% decline over 25 years: England-only. Reasons unclear but urban population decline may be due to changing garden management and reduced numbers of invertebrates. Rural population loss may be due to farming practices. Iconic species in Brighton & Hove die to West Pier roost. Parks & Gardens HAP, Farmlands HAP
99	<i>Weissia sterilis</i>	Sterile Beardless-moss	Bryophyte	NERC S41 species	No recent records in Brighton & Hove but the moss recorded in Saddlescoomb chalk pit in 1993. Requires bare patches of chalky soil in short Lowland calcareous grassland on south facing slopes. Decline may be due to loss of suitable Lowland calcareous grassland and encroachment of scrub. Lowland calcareous grassland HAP
100	<i>Hirundo rustica</i>	Swallow	Bird	Locally notable	Not believed to be under immediate threat but a bird closely associated with man – potential 'flagship' species. Swift, Swallow,

ADOPTED VERSION: FEBRUARY 2013

					House Martin Group SAP
101	<i>Apus apus</i>	Swift	Bird	Locally notable	Remaining nesting sites threatened by development and housing improvements. Amber Status bird. Swift, Swallow, House Martin Group SAP
102	<i>Ribautodelphax imitans</i>	Tall Fescue Planthopper	Bug	NERC S41 species	Recorded from only four sites in southern England, with only two records from the last 35 years, including Castle Hill NNR. Most strongly associated with calcareous grasslands. Threatened from inappropriate management, including grazing which produces a uniform sward.
103	<i>Calophasia lunula</i>	Toadflax Brocade	Moth	Locally notable IUCN (pre 1994) - Rare	restricted to the south-east and central southern coasts of England, where it frequents mainly shingle beaches and brownfield land with Purple Toadflax. Urban Commons, Coastal Vegetated Shingle HAP
104	<i>Hericium erinaceum</i>	Tree Hedgehog fungus	Fungus (non lichenised)	NERC S41 species	Single extant record for Stanmer Park. Threatened in over 50% of countries in European range. on the dead wood of veteran trees- mostly beech but occasionally other broadleaved tree flagship veteran tree fungi dependant on securing a long term supply of dead wood. Lowland Mixed Deciduous Woodland HAP flagship
105	<i>Passer montanus</i>	Tree Sparrow	Bird	NERC S41 species	96% decline over 25 years. Farmland bird requiring scrub or Hedgerows away from human disturbance. No nesting sites recorded in Brighton & Hove but potential on the downland. Farmland HAP, Hedgerows HAP
106	<i>Streptopelia turtur</i>	Turtle Dove	Bird	NERC S41 species	Breeds on the Downs around the University of Sussex, Coldean, Balsdean, Sheepcote Valley 79% decline over 25 years across UK. Lowland agricultural land with copses, large Hedgerows, and orchards near to cereal or weedy fields increased use of herbicides and pesticides, reducing food availability, and the removal of Hedgerows and scrub which has removed nesting sites. Persecution during migration to Africa. Farmlands HAP, Hedgerows HAP
107	<i>Lasiommata megera</i>	Wall	Butterfly	NERC S41 species	In rapid decline in many inland areas, for reasons unknown. Monitoring required. Foodplants are various grasses. Breeds in short, open grassland where the turf is broken or stony. Found in coastal habitats, including vegetated undercliffs and rocky foreshores, disturbed land, disused quarries, derelict land. Lowland calcareous grassland HAP / Urban Commons HAP, Martime Cliff and Slope HAP
108	<i>Decticus verrucivorus</i>	Wart-biter	Cricket	NERC S41 species Schedule 5 of the Wildlife and Countryside Act 1981.	Occurs at Castle Hill NNR only in Brighton and Hove . Requires a finely balanced habitat mosaic: bare ground/short turf, into which eggs are laid; grass tussocks, amongst which older nymphs and adults conceal themselves from predators; and a sward rich in flowering forbs and invertebrates, which provide nutrition, on warm, south-facing slopes. Inappropriate Lowland calcareous grassland management is the main threat. Lowland calcareous grassland HAP
109	<i>Misopates orontium</i>	Weasel's Snout	Vascular Plant	Locally notable	Arable weed which still occurs sporadically on Whitehawk Hill allotments. Arable Annual Group SAP; Farmlands HAP
110	<i>Cephalanthera damasonium</i>	White Helleborine	Vascular Plant	NERC S41 species	Confirmed extant record at Stanmer Park. In decline due to loss of habitat caused by the clearance of woodlands. In beechwoods on chalk in southern England.
	<i>Merlangius merlangus</i>	Whiting	Fish	NERC S41 species	Overfishing; Brighton Marina
111	<i>Satyrrium w-album</i>	White-letter Hairstreak	Butterfly	NERC S41 species	Recent records throughout Brighton and Hove, particularly London

ADOPTED VERSION: FEBRUARY 2013

					Road, Preston Park and The Level. Across the UK 99% decline in abundance over 25 years, although numbers appear to now be stabilising; breeds on elm species, including Wych Elm (<i>Ulmus glabra</i>), English Elm (<i>U. procera</i>), and Small-leaved Elm (<i>U. minor</i>). Breeds on mature trees or abundant sucker growth near dead trees. Survive on the Dutch Elm Disease-resistant variety of <i>U. japonica</i> , Sapporo Autumn Gold.
112	<i>Vicia lutea</i>	Yellow Vetch	Vascular Plant	Locally notable	Whitehawk Hill allotments. needs dry soil with patchy, open vegetation. Urban Commons SAP
113	<i>Lathyrus aphaca</i>	Yellow Vetchling	Vascular Plant	Locally notable	Rapid decline in UK. Sussex stronghold in Brighton – Mile Oak, Whitehawk Hill and Wilson Avenue – annual needs disturbed, dry ground. Urban Commons BAP
114	<i>Emberiza citrinella</i>	Yellowhammer	Bird	NERC S41 species	Confirmed breeding around the Brighton downs. 53% decline over 25 years. Requires abundant invertebrate prey in summer and seed in winter. Farmlands HAP, Hedgerows HAP
115	<i>Drilus flavescens</i>	Yellowish Drile	Beetle	Nationally Notable A	Predates on snails. Known from Whitehawk Hill and Stanmer Park. Frequent on the Downs in southern coastal areas. Downland specialist. Lowland calcareous grassland HAP

Table 2.1: Moth Species occurring in Brighton and Hove which are listed in the UK BAP as Priority Species for national research purposes only (these are not addressed in the draft Brighton & Hove LBAP)

Latin Name	English Name	Taxon	Status	Notes
<i>Acronicta psi</i>	Grey Dagger	Moth	NERC S41 species	Declined by 77% over the last 35 years.
<i>Agrochola helvola</i>	Flounced Chestnut	Moth	NERC S41 species	larvae feed on deciduous trees. Declined by 88% over the last 35 years. -
<i>Agrochola litura</i>	Brown-spot Pinion	Moth	NERC S41 species	Declined by 76% over the last 35 years, although remains common larvae live on herbaceous plants when young, and later on the leaves of deciduous trees, such as oak and hawthorn. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Agrochola lychnidis</i>	Beaded Chestnut	Moth	NERC S41 species	larvae feed on low plants when small, later consuming the leaves of various trees and shrubs. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. - Threats poorly understood
<i>Allophytes oxyacanthae</i>	Green-brindled Crescent	Moth	NERC S41 species	Found in woodland, Hedgerows and suburban habitats. Caterpillars feed on a variety of trees and bushes. Declined by 79% over the last 35 years. -
<i>Amphipoea oculea</i>	Ear Moth	Moth	NERC S41 species	larvae feed at the base of various grasses and low plants Declined by 71% over the last 35 years. Very distinctive ear-shaped markings on wings. -
<i>Amphipyra tragopoginis</i>	Mouse Moth	Moth	NERC S41 species	Range of habitats and food plants. Declined by 73% over the last 35 years -

ADOPTED VERSION: FEBRUARY 2013

<i>Apamea remissa</i>	Dusky Brocade	Moth	NERC S41 species	Larvae feed on grasses. Declined by 76% over the last 35 years. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Aporophyla lutulenta</i>	Deep-brown Dart	Moth	NERC S41 species	Larvae feed on grasses and bushes such as hawthorn. Declined by 90% over the last 35 years. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Arctia caja</i>	Garden Tiger	Moth	NERC S41 species	caterpillars feed on a number of herbaceous plants. Frequents gardens. Declined by 89% over the last 35 years. -
<i>Asteroscopus sphinx</i>	Sprawler	Moth	NERC S41 species	A woodland species - feed on the foliage of a range of deciduous trees. Declined by 83% over the last 35 years. -
<i>Atethmia centrugo</i>	Centre-barred Sallow	Moth	NERC S41 species	Woodland and hedgerows. Food plant is Ash. Declined by 74% over the last 35 years JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Brachylomia viminalis</i>	Minor Shoulder-knot	Moth	NERC S41 species	larvae feed in spring on willow Declined by 73% over the last 35 years. -
<i>Caradrina morpheus</i>	Mottled Rustic	Moth	NERC S41 species	Range of habitats including suburban areas. Larvae feed on a number of herbaceous plants, especially nettle (<i>Urtica</i>) and dandelion (<i>Taraxacum</i>). Declined by 73% over the last 35 years. -
<i>Diarsia rubi</i>	Small Square-spot	Moth	NERC S41 species	larval foodplants are a range of herbaceous species Declined by 85% over the last 35 years. -
<i>Diloba caeruleocephala</i>	Figure of Eight	Moth	NERC S41 species	The larvae feed on hawthorn, blackthorn and apple. Declined by 95% over the last 35 years. Distinctive markings. -
<i>Ecliptopera silaceata</i>	Small Phoenix	Moth	NERC S41 species	larval foodplants are willowherbs (<i>Epilobium spp.</i>). Declined by 77% over the last 35 years. -
<i>Ennomos erosaria</i>	September Thorn	Moth	NERC S41 species	feeds on oak (<i>Quercus</i>), birch (<i>Betula</i>) or lime (<i>Tilia</i>). Declined by 91% over the last 35 years. -
<i>Ennomos fuscantaria</i>	Dusky Thorn	Moth	NERC S41 species	Declined by 98% over the last 35 years. deciduous woods and their margins, and suburban habitats, where the larval foodplant, Ash grows. -
<i>Ennomos quercinaria</i>	August Thorn	Moth	NERC S41 species	Woodland and suburban habitats. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. Threats poorly understood. -
<i>Epirrhoe galiata</i>	Galium Carpet	Moth	NERC S41 species	bedstraw feeding species, on chalk downland and sea-cliffs. It has a preference for coastal sites. Declined by 76% over the last 35 years. -
<i>Eugnorisma glareosa</i>	Autumnal Rustic	Moth	NERC S41 species	Woodland fringes on chalky soils. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. Threats poorly understood. -
<i>Eulithis mellinata</i>	Spinach	Moth	NERC S41 species	feeds on various <i>Ribes</i> species, such as red currant and black currant, and can therefore be found in suburban areas as well as woodland and similar habitats. Declined by 95% over the last 35 years. -
<i>Euxoa nigricans</i>	Garden Dart	Moth	NERC S41 species	caterpillars feed on a range of herbaceous plants, including clover (<i>Trifolium</i>), plantain (<i>Plantago</i>), as well as various cultivated varieties. Frequents gardens. Declined by 97% over the last 35 years.
<i>Acronicta rumicis</i>	Knot Grass	Moth	NERC S41 species	larvae feed on a range of herbaceous plants, including garden varieties. Declined by 80% over the last 35 years.
<i>Hemistola chrysoprasaria</i>	Small Emerald	Moth	NERC S41 species	inhabits woodland edges and hedgerows mainly on chalk downs Declined by 82% over the last 35 years. -
<i>Hepialus humuli</i>	Ghost Moth	Moth	NERC S41 species	larvae feed underground on the roots of grasses and small plants. Declined by 73% over the last 35 years -
<i>Hoplodrina blanda</i>	Rustic	Moth	NERC S41 species	Foodplants are a variety of low plants. Declined by 75% over the last

ADOPTED VERSION: FEBRUARY 2013

				35 years. -
<i>Hydraecia micacea</i>	Rosy Rustic	Moth	NERC S41 species	larvae live on a range of low plants, but especially dock (<i>Rumex spp.</i>). Declined by 86% over the last 35 years. -
<i>Lycia hirtaria</i>	Brindled Beauty	Moth	NERC S41 species	Woodland and suburban habitats, and feeds on a range of deciduous trees common and widespread, but rapidly declining moth – declined by 81% over the last 35 years. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Melanchra persicariae</i>	Dot Moth	Moth	NERC S41 species	Range of suburban habitats, including gardens, waste ground and roadside verges. Larvae feed on a wide range of garden and wild plants. Visually distinctive 'flagship' for ? Declined by 88% over the last 35 years. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Melanchra pisi</i>	Broom Moth	Moth	NERC S41 species	Declined by 77% over the last 35 years. caterpillar feeds on broom (<i>Cytisus scoparius</i>), bracken (<i>Pteridium aquilinum</i>) and other trees and plants. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Melanthia procellata</i>	Pretty Chalk Carpet	Moth	NERC S41 species	occupies Hedgerows and scrubland, particularly in chalky localities, and feeds on traveller's joy (<i>Clematis vitalba</i>). Declined by 87% over the last 35 years. -
<i>Mesoligia literosa</i>	Rosy Minor	Moth	NERC S41 species	larvae feed on the stems and roots of several types of grass. Declined by 81% over the last 35 years. -
<i>Mythimna comma</i>	Shoulder-striped Wainscot	Moth	NERC S41 species	Caterpillar feeds by night on various grasses, especially cock's-foot (<i>Dactylis glomerata</i>). Declined by 72% over the last 35 years. -
<i>Orthosia gracilis</i>	Powdered Quaker	Moth	NERC S41 species	larvae often feed on willows (<i>Salix spp.</i>). Declined by 76% over the last 35 years. -
<i>Scopula marginepunctata</i>	Mullein Wave	Moth	NERC S41 species	Mainly coastal species. Larvae feed on low plants including yarrow (<i>Achillea millefolium</i>) and mugwort (<i>Artemisia vulgaris</i>). Declined by 76% over the last 35 years. -
<i>Scotopteryx chenopodiata</i>	Shaded Broad-bar	Moth	NERC S41 species	larvae feed on vetch (<i>Vicia</i>) and clover (<i>Trifolium</i>). Declined by 73% over the last 35 years. -
<i>Spilosoma lubricipeda</i>	White Ermine	Moth	NERC S41 species	larvae feed on a variety of herbaceous plants Declined by 77% over the last 35 years -
<i>Spilosoma luteum</i>	Buff Ermine	Moth	NERC S41 species	common and widespread, but rapidly declining - by 73% over the last 35 years. Wide range of food plants. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Tholera decimalis</i>	Feathered Gothic	Moth	NERC S41 species	grass-feeding species. Declined by 90% over the last 35 years. -
<i>Timandra comae</i>	Blood-Vein	Moth	NERC S41 species	Larvae feed on low-growing plants such as dock (<i>Rumex</i>). JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. Threats poorly understood.
<i>Trichiura crataegi</i>	Pale Eggar	Moth	NERC S41 species	Found in scrub on the edge of woodland. Declined by 86% over the last 35 years. -
<i>Trichopteryx polycommata</i>	Barred Tooth-striped	Moth	NERC S41 species	Lowland calcareous grassland and scrub species – larvae feed on Privet and Ash. Threats poorly understood.
<i>Tyria jacobaeae</i>	Cinnabar	Moth	NERC S41 species	Declined by 83% over the last 35 years. Food plant is Ragwort (<i>Senecio jacobaeae</i>). JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -
<i>Watsonalla binaria</i>	Oak Hook-tip	Moth	NERC S41 species	oak (<i>Quercus</i>) is the larval foodplant. Declined by 81% over the last 35 years. -

ADOPTED VERSION: FEBRUARY 2013

<i>Xanthia icteritia</i>	Sallow	Moth	NERC S41 species	larvae feed at first on willow (<i>Salix</i>) catkins, and then later on herbaceous plants. Declined by 82% over the last 35 years. -
<i>Xanthorhoe ferrugata</i>	Dark-barred Twin-spot Carpet	Moth	NERC S41 species	Larvae eat a variety of low plants. Declined by 92% over the last 35 years. JNCC recommends a grouped action plan that investigates the causes of decline of widespread moth species. -

Acknowledgements

Particular thanks to the following for their advice and expertise in compiling this list:

Chris Davis, Sussex Ornithological Society
 Gerald Legg
 Graeme Lyons
 Howard Matcham
 John Patmore, Eco-Logically:
 Martin Allison
 Paul Harmes, Sussex Botanical Recording Society
 Simon Davey
 Steven Falk, Warwickshire Museum

Birds
 Marine species
 Moth recommendations
 Bryophyte recommendations
 Audit to inform possible future LBAP – Final Report 2003
 Fungi recommendations
 Vascular plants
 Lichen recommendations
 Bees, wasps and flies