

Review of 2015 non-avian records in the Folkestone and Hythe area



Moths

Migrant micro moths

The micro moth highlights of the year included the second area record of the adventive ***Cydalima perspectalis*** (Boxworm Moth) at Folkestone on the 28th July (following the first at Saltwood last year), the third record of ***Tebenna micalis*** (Vagrant Twitcher) at Hythe on the 11th July (following the first at Hythe and Saltwood last year), and the second to fifth modern area records of ***Catoptria verellus*** (Marbled Grass-veneer) at Hythe on the 6th July, West Hythe (two) on the 13th July, Folks' Wood (two) on the 18th July and West Hythe on the 23rd July (following the first modern record at Saltwood last year and three nineteenth century records from Folkestone).

Other significant records involved the scarce immigrant pyralids ***Uresiphita gilvata*** (Yellow-underwing Pearl) at Saltwood on the 11th November, ***Acrobasis tumidana*** (Scarce Oak Knot-horn) at Saltwood on the 12th August and ***Sciota adelphella*** (Willow Knot-horn) at Hythe on the 4th July.



Catoptria verellus at Folks' Wood (Ian Roberts)



Catoptria verellus at Hythe (Ian Roberts)



Acrobasis tumidana at Saltwood (Paul Howe)



Sciota adelphella at Hythe (Ian Roberts)

It was an excellent year for some of the more regular immigrant micro moths, with a record total of up to 58 ***Palpita vitrealis*** (Olive-tree Pearl), the majority of which were at Hythe in November. This tally no doubt involved some duplication but included a peak count of five on the 7th November and new arrivals to as late as the 29th November. ***Nomophila noctuella*** (Rush Veneer) were also recorded in good numbers (287), which was a significant increase on a poor previous year. The main arrival occurred between mid-July and late September, with peak counts of 14 (10 at Saltwood and 4 at Hythe) on the 27th August and 16 (9 at Hythe and 7 at Saltwood) on the 18th September.

Ostrinia nubilalis (European Corn-borer) also saw an increase on last year, with 11 trapped between the 30th June and the 3rd August, all singles apart from four at Saltwood on the 14th July. *Udea ferrugalis* (Rusty-dot Pearl) were present in reasonable numbers (98), though with a considerable reduction on last year. There were records between the 3rd July and the 22nd December, typically ones and twos but with a peak of eight (4 at both Hythe and Saltwood) on the 29th August. The total of 263 *Plutella xylostella* (Diamond-back Moth) however was significantly lower than either of the previous two years and the peak counts were just 17 (12 at Hythe and 5 at Saltwood) on the 12th June and 14 (13 at Saltwood and 1 at Hythe) on the 23rd July.



Palpita vitrealis at Hythe (Ian Roberts)



Nomophila noctuella at Hythe (Ian Roberts)

It was another good year for *Evergestis limbata* (Dark Bordered Pearl), with 41 trapped between the 25th May and the 7th September, and it is almost certainly now established locally.

The totals for the year of the regular immigrant micros are shown in figure 1:

	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	2015	2014	2013
<i>Plutella xylostella</i>	17	2	71	89	60	9	12	3		263	1716	796
<i>Ostrinia nubilalis</i>			1	9	1					11	3	2
<i>Udea ferrugalis</i>				13	28	18	5	22	12	98	296	15
<i>Palpita vitrealis</i>					1	4	1	52		58	38	16
<i>Nomophila noctuella</i>		2	10	42	125	77	7	24		287	4	111
<i>Evergestis limbata</i>		1	9	23	5	3				41	49	19
Total	17	5	91	176	220	111	25	101	12	758	2106	959

Figure 1: Regular migrant micro moths in the Folkestone and Hythe area in 2015 (no records of migrants in Jan - Mar)

Resident micro moths

Records of note amongst the resident micros included single *Eriocrania subpurpurella* (Common Oak Purple) at Saltwood on the 12th and 14th April, *Stigmella betulicola* (Common Birch Pigmy) there on the 12th June and *Opostega salaciella* (Sorrel Bent-wing) there on the 8th July. There were singles of *Incurvaria masculella* (Feathered Bright) at Seabrook on the 2nd May and of *Incurvaria oehlmanniella* (Common Bright) at Hythe on the 4th July.

A *Nematopogon swammerdamella* (Large Long-horn) was at Saltwood on the 15th May, whilst single *Morophaga choragella* (Large Clothes Moth) were trapped there on the 28th July and 2nd August, and *Psychoides filicivora* (Fern Smut) were again recorded at Hythe (in May/June) and Saltwood (in November). Single *Tinea semifulvella* (Fulvous Clothes Moth) were recorded at Folkestone Warren on the 10th July, Saltwood on the 15th July and Hythe on the 28th September.

A *Bucculatrix ulmella* (Oak Bent-wing) was at Saltwood on the 30th August, with *Caloptilia cuculipennella* (Feathered Slender) at Hythe on the 18th July and Saltwood on the 21st and 22nd July, *Caloptilia betulicola* (Red Birch Slender) at Saltwood on the 26th July and *Caloptilia rufipennella* (Small Red Slender) at Hythe on the 15th August.

Singles of *Caloptilia alchimiella* (Yellow-triangle Slender) and *Caloptilia robustella* (New Oak Slender) were taken at Saltwood on the 4th June and 21st August respectively, whilst *Caloptilia semifascia* (Maple Slender) were noted there on the 20th July and 30th August. There records of both the first generation of *Aspilapteryx tringipennella* (Ribwort Slender), at Saltwood on the 22nd May, and the second, at Hythe in late August.

A *Callisto denticulella* (Garden Apple Slender) was trapped at Saltwood on the 13th June, whilst this site also produced *Phyllonorycter leucographella* (Firethorn Leaf Miner) on the 30th September and *Phyllonorycter coryli* (Nut Leaf Blister Moth) on the 9th August, and a *Phyllocnistis xenia* (Kent Bent-wing) was at Hythe on the 10th July. *Tinagma ocherostomella* was discovered on the food-plant Viper's Bugloss at Folkestone Warren on the 25th June.

Notable among the *Argyresthia* were singles of *A. pygmaeella* (Sallow Argent) at Hythe on the 2nd July and Saltwood on the 11th July, *A. retinella* (Netted Argent) at Saltwood on the 14th July, *A. bonnetella* (Hawthorn Argent) at Saltwood on the 1st August and *A. albistria* (Purple Argent) there on the 18th July. Saltwood also produced an *Yponomeuta plumbella* (Black-tipped Ermine) on the 6th August and an *Yponomeuta sedella* (Grey Ermine) on the 21st July.

As predicted in last year's report, *Prays ruficeps* (Dark Ash Bud Moth), which was only added to the area list in 2014 (having recently been recognised as a distinct species from *Prays fraxinella*) does appear to be relatively common locally, with records from Saltwood (9), Hythe (2) and Folks' Wood between July and September.

Single *Ypsolopha dentella* (Honeysuckle Moth) were recorded at Saltwood on five nights in August, whilst there were *Ypsolopha scabrella* (Wainscot Smudge) there on the 13th and 19th August. Two *Ypsolopha parenthesella* (White-shouldered Smudge) were trapped at Folks' Wood on the 11th September and single *Ypsolopha ustella* (Variable Smudge) were at Saltwood on the 24th February and 9th October.

Singles of *Eidophasia messingiella* (Bitter-cress Smudge) were taken at Hythe on the 20th and 25th June, whilst *Digitivalva pulicariae* (Fleabane Smudge) were recorded at Hythe on the 30th July and Saltwood on the 31st August, and an *Acrolepia autumnitella* (Bittersweet Smudge) was at Hythe on the 15th April. Of interest within the *Coleophoridae* that could be identified were *C. albitarsella* (White-legged Case-bearer) at Saltwood on the 17th June and Hythe on the 10th July, *C. kuehnella* (White Oak Case-bearer) at Saltwood on the 12th June and at least four *C. galbulipennella* (Kent Case-bearer) at Hythe in the second half of July – presumably wanderers from the population at Hythe Ranges.



Eidophasia messingiella at Hythe (Ian Roberts)



Coleophora galbulipennella at Hythe (Ian Roberts)

Single *Bisigna procerella* (Kent Tubic) were taken at Saltwood on three dates in July and at West Hythe on the 13th (two) and 15th July, whilst there were *Batia lambdella* (Greater Tawny Tubic) at Hythe on the 9th and 17th July (2). *Metalampra italica* (Italian Tubic) continues to increase locally with 53 at Saltwood and 9 at Hythe between the 26th June and the 9th September and another adventive species, *Tachystola acroxantha* (Ruddy Streak) was recorded at Hythe on eight dates between the 26th May and 26th August. A single *Borkhausenia fuscescens* (Small Dingy Tubic) was trapped at Saltwood on the 20th July.

There were two *Depressaria daucella* (Dingy Flat-body) at Hythe on the 6th March, with two at Saltwood on the 9th March. Noteworthy amongst the *Agonopterix* were an *A. alstromeriana* (Brown-spot Flat-body) at Hythe on the 9th March, two *A. scopariella* (Broom Flat-body) at Saltwood on the 15th April, two *A. conterminella* (Sallow Flat-body) at Saltwood on the 13th July, three *A. heracliata* (Common Flat-body) in July and a total of five *A. subpropinquella* (Ruddy Flat-body).

Ethmia terminella (Five-spot Ermel) were recorded from Fisherman's Beach, Hythe and Folkestone Warren in June/July, whilst *Ethmia bipunctella* (Bordered Ermel) were recorded from Hythe, Saltwood and Folkestone Warren between the 14th May and the 31st August and an *Ethmia quadrillella* (Comfrey Ermel) was at West Hythe on the 5th August.



Bisigna procerella at Saltwood (Paul Howe)



Ethmia bipunctella at Hythe (Ian Roberts)

A single *Metzneria lappella* (Burdock Neb) was trapped at Saltwood on the 4th August whilst at least three *Metzneria aestivella* (Carline Neb) were trapped at Folkestone Warren on the 10th July. A single *Eulamprotes unicolorella* (Unmarked Neb) was taken at Saltwood on the 25th April, as were a *Carpatolechia decorella* (Winter Oak Groundling) on the 9th April and a *Neofriseria peliella* (White-spot Groundling) on the 20th July. A *Caryocolum vicinella* (Coast Groundling) at Hythe on the 30th July was also of note, and July also produced singles of *Anarsia spartiella* (Small Crest) at Saltwood on the 3rd, *Dichomeris alacella* (Lichen Sober) at Saltwood on the 18th and *Dichomeris marginella* (Juniper Webber) at Hythe on 21st.



Metzneria aestivella at F. Warren (Ian Roberts)



Caryocolum vicinella at Hythe (Ian Roberts)

Notable Tortrix moths included single *Phtheochroa inopiana* (Plain Conch) at Folkestone Warren on the 1st and 10th July, a rather worn *Phtheochroa rugosana* (Rough-winged Conch) there on the latter date and a *Cochylimorpha alternana* (Kentish Conch) at Abbotscliffe on the 21st August. *Cochylimorpha straminea* (Straw Conch) were recorded Saltwood in June and at Hythe in August.

An *Agapeta zoegana* (Knapweed Conch) was trapped at Abbotscliffe on the 21st August, an *Aethes tessera* (Downland Conch) was found in Folkestone Warren on the 25th June and an *Aethes hartmanniana* (Scabious Conch) was found at Abbotscliffe on the 8th May, whilst single *Aethes rubigana* (Burdock Conch) were at Folks' Wood on the 18th July and Saltwood on the 3rd August.



Phtheochroa rugosana at F. Warren (Ian Roberts)



Agapeta zoegana at Abbotscliffe (Ian Roberts)

A *Cochylidia rupicola* (Hemp-agrimony Conch) was trapped at Folkestone Warren on the 1st July and a *Cochylis nana* (Birch Conch) was at Saltwood on the 17th June. *Cacoecimorpha pronubana* (Carnation Tortrix) were recorded from Abbotscliffe, Capel-le-Ferne and Hythe, whilst *Syndemis musculana* (Dark-barred Twist) were at Saltwood on the 26th May and 22nd August and an *Aphelia viburnana* (Bilberry Tortrix) was at Saltwood on the 3rd July.

An *Olindia schumacherana* (White-barred Twist) was taken at Bargrove Wood on the 18th June, whilst a *Cnephasia longana* (Long-winged Shade) was at Saltwood on the 12th June. This latter site also produced a *Tortricodes alternella* (Winter Shade) on the 28th February and four *Spatalistis bifasciana* (Small Purple Button) on the 1st July, when an *Acleris bergmanniana* (Yellow Rose Button) was at Folkestone Warren. The Warren also provided two *Acleris holmiana* (White-triangle Button) on the 10th July and an *Acleris laterana* (Dark-triangle Button) was at Saltwood on the 17th August, with single *Acleris notana* (Rusty Birch Button) there on the 11th March and 14th December.

Acleris kochiella (Elm Button) was recorded at Saltwood on the 11th and 16th July, and there was an interesting run of records of *Acleris umbrana* (Dark-streaked Button), with two at West Hythe on the 13th July, and singles at Hythe and Saltwood on the 16th July, Folks' Wood on the 18th July, and Saltwood on the 20th and 29th July. These may have related to immigrant moths as they represented the first records for the sites involved and there were other occurrences on the south coast around the same time. Three *Acleris cristana* (Tufted Button) were trapped at Saltwood (two in March and one in September), with a single *Acleris literana* (Lichen Button) there on the 16th March and an *Acleris emargana* (Notch Wing Tortrix) at Folks' Wood on the 11th September.



Acleris umbrana at Hythe (Ian Roberts)

Celypha rosaceana (Roseate Marble) was recorded from Hythe on the 11th July and Saltwood on two dates in August and there were singles of *Hedya ochroleucana* (Buff-tipped Marble) and *Hedya salicella* (White-backed Marble) at Saltwood on the 17th June and the 13th July respectively. An *Apotomis betuleta* (Birch Marble) was taken at Saltwood on the 18th June, with another at Folks' Wood on the 11th September. Saltwood also provided captures of *Endothenia gentianaeana* (Teasel Marble) on the 15th June, *Endothenia nigricostana* (Black-edged Marble) on the 3rd July and *Lobesia abscisana* (Smoky-barred Marble) on the 12th and 20th July, with another at Hythe on the 21st July. A *Bactra lancealana* (Rush Marble) was trapped at Saltwood on the 8th August.

Single *Epinotia nisella* (Grey Poplar Bell) were taken at Saltwood on the 18th and 31st August, with an *Epinotia solandriana* (Variable Bell) at Hythe on the 23rd July, whilst there were *Crociosema plebejana* (Southern Bell) at Abbotscliffe on the 21st August and at Hythe the following night. The *Gypsonoma* genus was represented by a *G. aceriana* (Rosy Cloaked Shoot) at Hythe on the 23rd July, single *G. sociana* (White Cloaked Shoot) at Saltwood on the 25th June and Hythe on the 11th July and records of *G. dealbana* (Common Cloaked Shoot) at Saltwood on the 20th June and 20th July.

Notocelia trimaculana (Triple-blotched Bell) were trapped at Bargrove Wood and Saltwood on the 18th June, with two further singles at the latter site in June, *Notocelia rosaecolana* (Common Rose Bell) were at Hythe on the 12th and 16th July, an *Notocelia roborana* (Summer Rose Bell) was at Saltwood on the 19th June and *Epiblema foenella* (White-foot Bell) were at Folkestone Warren on the 1st July, Hythe on the 21st July and Abbotscliffe on the 21st August, with an *Epiblema costipunctana* (Ragwort Bell) at Saltwood on the 26th June.

Six *Eucosma campoliliana* (Marbled Bell) were taken at Abbotscliffe on the 21st August and a single *Eucosma hohenwartiana* (Bright Bell) was trapped at Saltwood on the 18th August, with an *Eucosma obumbratana* (Two-coloured Bell) at the latter site on the 11th August. Other noteworthy Tortrix included a *Spilonota laricana* (Larch-bud Moth) at Saltwood on the 2nd July, a *Rhyacionia pinicolana* (Orange-spotted Shoot) there on the 18th July, single *Enarmonia formosana* (Cherry-bark Moth) there on three dates, a *Selania leplastriana* (Cabbage Piercer) at Hythe on the 4th July, *Lathronympha strigana* (Red Piercer) at Saltwood on the 16th June and the 11th August, *Cydia microgrammana* (Rest-harrow Piercer) at Folkestone Warren on the 25th June and *Strophedra weirana* (Little Beech Piercer) at Saltwood on the 1st July.



N. trimaculana at Bargrove Wood (Ian Roberts)



Selania leplastriana at Hythe (Ian Roberts)

A *Pammene albuginana* (Blotched Piercer) was trapped at Bargrove Wood on the 18th June, with *Pammene regiana* (Regal Piercer) at Saltwood on the 12th and 16th July, a *Grapholita funebrana* (Plum Fruit Moth) at Saltwood on the 3rd July, a *Cydia nigricana* (Pea Moth) at Botolph's Bridge on the 14th June and *Cydia fagiglandana* (Large Beech Piercer) at Saltwood on the 17th June and Hythe on the 21st July.

A single *Cydia coniferana* (Pine-bark Piercer) was trapped at Hythe on the 1st July, a *Pammene aurana* (Orange-spot Piercer) was found at Botolph's Bridge on the 13th June, three *Dichrorampha alpinana* (Broad-blotch Drill) were Hythe on the 30th June and on two dates in July and a *Dichrorampha plumbana* (Lead-coloured Drill) was at Saltwood on the 25th and 26th May.

Notable among the Plume moths were a single *Crombrugghia distans* (Breckland Plume) at Hythe on the 23rd July, a total of eight *Marasmarcha lunaedactyla* (Crescent Plume) from Folkestone Warren, Hythe and Saltwood in July, four *Stenoptilia pterodactyla* (Brown Plume) at Saltwood (3 in July, 1 in August), a *Merrifieldia baliodactylus* (Dingy White Plume) at Abbotscliffe on the 21st August and four *Pterophorus pentadactyla* (White Plume) at Saltwood between the 10th June and the 9th August.

Single *Chilo phragmitella* (Reed Veneer) were trapped at Saltwood on the 17th June and on four dates in July, whilst *Calamotropha paludella* (Bulrush Wainscot) was recorded at Hythe on three dates in July and at Saltwood on the 27th July and an *Agriphila latistria* (White-streak Grass-veneer) was taken at Samphire Hoe on the 10th September.



P. albuginana at Bargrove Wood (Ian Roberts)



Pammene aurana at Botolph's Bridge (Brian Harper)



Crombrughia distans at Hythe (Ian Roberts)



M. baliodactylus at Abbotscliffe (Ian Roberts)

A total of five *Catoptria pinella* (Pearl Grass-veneer) were recorded from Folkestone Warren and Hythe in July, with singles of *Catoptria falsella* (Chequered Grass-veneer) and *Pediasia contaminella* (Waste Grass-veneer) at the latter site on the 23rd and 21st August respectively. Hythe also produced at least two *Platytes alpinella* (Hook-tipped Grass Veneer) in July/August and up to 13 *Platytes cerussella* (Little Grass-veneer) in June, with two at Fisherman's Beach on the 12th June.



Pediasia contaminella at Hythe (Ian Roberts)



Platytes alpinella at Hythe (Ian Roberts)

A single *Eudonia lacustrata* (Little Grey) was trapped at Saltwood on the 24th June and there were up to five *Evergestis pallidata* (Chequered Pearl) there in July/August. A total of up to eight *Cynaeda dentalis* (Starry Pearl) were recorded at Hythe in July/August, with a further three at Abbotscliffe on the 21st August.

A *Paratalanta pandalis* (Bordered Pearl) at Saltwood on the 4th July was a very good record and *Anania lancealis* (Long-winged Pearl) were trapped at there on the 3rd July and Folks' Wood on the 18th July. On the 3rd July singles of *Phlyctaenia perlucidalis* (Fenland Pearl) and *Anania crocealis* (Ochreous Pearl) were taken at Saltwood, with another of the latter species there on the 16th July.

Two *Udea prunalis* (Dusky Pearl) were recorded at Hythe in July, with one at Saltwood in August, and up to nine *Dolicharthria punctalis* (Long-legged China-mark) at Hythe in June/July. The only *Aglossa pinguinalis* (Large Tabby) was at Saltwood on the 14th July, whilst up to six *Galleria mellonella* (Wax Moth) were recorded there in July/August, with two at Hythe in the latter month.

Other notable pyralids included an *Anerastia lotella* (Sandhill Knot-horn) at Hythe on the 21st July, single *Cryptoblabes bistriga* (Double-striped Knot-horn) at Saltwood on the 11th June and the 21st August, an *Acrobasis repandana* (Warted Knot-horn) at Folks' Wood on the 18th July, with two further records from Saltwood on the 23rd July and the 10th August, three *Acrobasis consociella* (Broad-barred Knot-horn) at Saltwood in July/August and an *Acrobasis suavella* (Thicket Knot-horn) at Folkestone Warren on the 10th July, with two at Saltwood in August.



Cynaeda dentalis at Hythe (Ian Roberts)



Anerastia lotella at Hythe (Ian Roberts)

Single *Pempelia genistella* (Gorse Knot-horn) were trapped at Saltwood on the 20th July and Hythe on the 23rd July, with two *Moitrelia obductella* (Kent Knot-horn) at Abbotscliffe on the 21st August and a *Sciota hostilis* (Scarce Aspen Knot-horn) at Saltwood on the 13th July. Single *Dioryctria abietella* (Dark Pine Knot-horn) were at Saltwood on the 12th June and the 3rd August, with *Dioryctria schuetzeella* (Spruce Knot-horn) there on the 10th July and *Dioryctria sylvestrella* (New Pine Knot-horn) there on the 6th July.

A *Pempeliella ornatella* (Ornate Knot-horn) was taken at Folkestone Warren on the 10th July, with an *Ancylosis oblitella* (Saltmarsh Knot-horn) there on the 1st July and a *Vitula biviella* (Pine-blossom Knot-horn) at Saltwood on the 25th July..



Moitrelia obductella at Abbotscliffe (Ian Roberts)



Pempeliella ornatella at Abbotscliffe (Ian Roberts)

Immigrant macro moths

The macro moth highlights of this vintage year included the second area record of **Dusky Marbled Brown** at Saltwood on the 1st July (following the first at the same site last year) and the sixth and seventh area records of **Pale-Shouldered Cloud** at Hythe on the 26th June and Saltwood on the 10th July. The former was only the fourth modern British record (all of which have come from South-east Kent since 2003), and the latter were the 13th and 14th British records – half of these have now occurred locally (five in the last three years), suggesting that it might be established in the local area.



Dusky Marbled Brown at Saltwood (Paul Howe)



Pale-Shouldered Cloud at Hythe (Ian Roberts)

Whilst not quite as rare in a national context, occurrences of **Small Marbled** at Saltwood on the 12th July, **Splendid Brocade** at Saltwood on the 15th July, **Porter's Rustic** at Hythe on the 28th August, **Red-headed Chestnut** (of the form *glabra*) at Hythe on the 3rd November and **Sombre Brocade** at Hythe on the 3rd October all appear to be the first local records, whilst the latter was the first county record.



Small Marbled at Saltwood (Paul Howe)



Porter's Rustic at Hythe (Ian Roberts)

An **Olive Crescent** at Folks' Wood on the 18th July also appears to be a new species for the area, though whether it originated as an immigrant or from an undiscovered population is not yet known. There were five records of **Dusky Hook-tip** – three at Saltwood in August, one at Hythe on the 28th August and one at Folks' Wood on the 11th September – which suggests that this otherwise rare immigrant may now be locally established, with 15 area records (all but one of which has been trapped in the last four years).

Other rare migrants included a **Dewick's Plusia** at Saltwood on the 11th May, a **Striped Hawk-moth** at Hythe on the 5th June, a **Golden Twin-spot** at Hythe on the 8th September and single **Ni Moths** at Saltwood on the 12th and 16th June, and Hythe on the 14th June.



Sombre Brocade at Hythe (Ian Roberts)



Red-headed Chestnut at Hythe (Ian Roberts)



Olive Crescent at Folks' Wood (Ian Roberts)



Dusky Hook-tip at Folks' Wood (Ian Roberts)



Dewick's Plusia at Saltwood (Paul Howe)



Striped Hawk-moth at Hythe (Ian Roberts)



Ni Moth at Hythe (Ian Roberts)



Golden Twin-spot at Hythe (Ian Roberts)

Similarly to last year there was a notable influx of **Red-necked Footman** into southern England but in 2015 it was on a much more spectacular scale, with two at both Hythe and Saltwood on the 30th June being followed by a total of at least 40 (2 at Hythe, 7 at Saltwood and **31+** at Folkestone Warren) on the 1st July, one at Saltwood the next night, seven at Saltwood on the 3rd July and one at Folkestone Warren on the 10th July. For the second year running a rather pale Latticed Heath was trapped well away from the usual haunts at Hythe (on the 11th May), and may also have been an immigrant.

Some of the more regular migrants were recorded in exceptional numbers, including record influxes of **Bordered Straw**, **Scarce Bordered Straw** and **Small Mottled Willow**. The annual and monthly totals of these and other immigrants are shown in figure 2:

	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	2015	2014	2013
Convolvulus H-m.			1			1				2	2	7
Humming-bird H-m.			3	3	7	2				15	11	7
The Vestal					55	15				70	1	4
The Gem					2		3	4		9	6	4
Four-spot. Footman			1	5	1					7	7	12
Silver Y		12	53	403	127	75	31	32	17	750	373	862
Bordered Straw		4	33	5	17	4				63	0	0
Sc. Bordered Straw				3	9	17	8	2		39	5	12
Tree-lichen Beauty					5					5	12	6
Sm. Mottled Willow			11	15	13	3				42	0	0
The Delicate				1		4	3			8	3	1
Pearly Underwing			1		4	21	5	5	3	39	16	1
Dark Sword-grass		1		9	18	22	14	13		77	84	243
Total		18	111	500	258	164	64	56	20	1126	520	1159

Figure 2: Regular migrant macro moths in the Folkestone and Hythe area in 2015 (no records of migrants in Jan - Mar)

The first **Bordered Straw** was trapped at Hythe on the 16th May, with one at Saltwood the following night and two at Hythe on the 27th May, preceding widespread records in June, with occurrences at Hythe Roughts, Hythe, Saltwood, Seabrook, Folkestone Warren, Abbotscliffe and Samphire Hoe, including a count of four at Hythe on the 13th June. Relatively few were noted in July but there was another wave of sightings in August, including several darker, presumably locally-bred individuals, with a few stragglers into September and the last at Hythe on the 19th.

Three **Scarce Bordered Straws** were noted at Hythe in July, from the 11th, with three at Hythe and six at Saltwood in late August, five at Saltwood and up to 12 at Hythe in September (including four at the latter site on the 12th), one at Saltwood and seven at Hythe in October and two at Saltwood in November, with the last on the 8th.

Small Mottled Willows were recorded between the 5th June and the 25th September, with up to 15 at Hythe and up to 27 at Saltwood, including a remarkable four at the latter site on the 12th September.



Bordered Straw (pale) at Hythe (Ian Roberts)



Bordered Straw (dark) at Hythe (Ian Roberts)



Scarce Bordered Straws at Hythe (Ian Roberts)



Small Mottled Willow at Hythe (Ian Roberts)



Red-necked Footman at Hythe (Ian Roberts)

There were only two records of **Convolvulus Hawk-moth**, but the first at Seabrook on the 26th June was particularly early, whilst the other at Saltwood on the 24th September was more typical. There were single **Hummingbird Hawk-moths** at Saltwood on the 10th June, Seabrook on the 12th June and Saltwood again on the 29th June, before three were seen at Folks' Wood on the 11th July. The seven in August included singles at four sites on the 30th, and two were noted in September, at Samphire Hoe on the 6th and Hythe on the 7th.



Convolvulus Hawk-m. at Seabrook (Chris Turnbull)



Hummingbird Hawk-m. at Redoubt (Brian Harper)



Hummingbird Hawk-moth at Samphire Hoe (Phil Smith)

There was an exceptional arrival of **Vestal** in late August with two at Seabrook, two at Saltwood and four at Hythe on the 29th, three at Saltwood and a record **17** at Hythe on the 30th, and one near the Hythe Redoubt, 11 at Saltwood and 15 at Hythe (day total of **27**) on the 31st. Smaller numbers were noted in September to the 20th. After single **Gem** at Saltwood on the 13th and 30th August, there was a small arrival in late October/early November, with one at Saltwood and up to five at Hythe, including two on the 27th October.



Vestal at Hythe (Ian Roberts)



Gem at Hythe (Ian Roberts)

Four-spotted Footman were recorded from Saltwood on the 28th June, Folkestone Warren on the 1st July, Seabrook on the 10th July and Saltwood on three dates in July and on the 5th August, whilst there were five occurrences of **Tree-lichen Beauty**, all in August, at Saltwood on the 10th, 19th and 21st, and at Hythe on the 16th (2). The **Delicate** was noted on eight occasions; at Saltwood on the 26th July, on two dates in September and on three dates in October, and at Hythe on two dates in September.

After a single Pearly Underwing at Saltwood on the 16th June, decent numbers were recorded from late August, with ones and twos on 32 dates until the last on the 17th December (a particularly late occurrence). Dark Sword-grass was one of the few migrants to appear in fewer numbers than last year, with a single at Saltwood on the 12th May preceding regular records from the 12th July to the 13th November. Again records related to ones and twos, apart from three at Hythe on the 16th August and Saltwood on the 1st September.



Silver Y at Saltwood (Paul Howe)



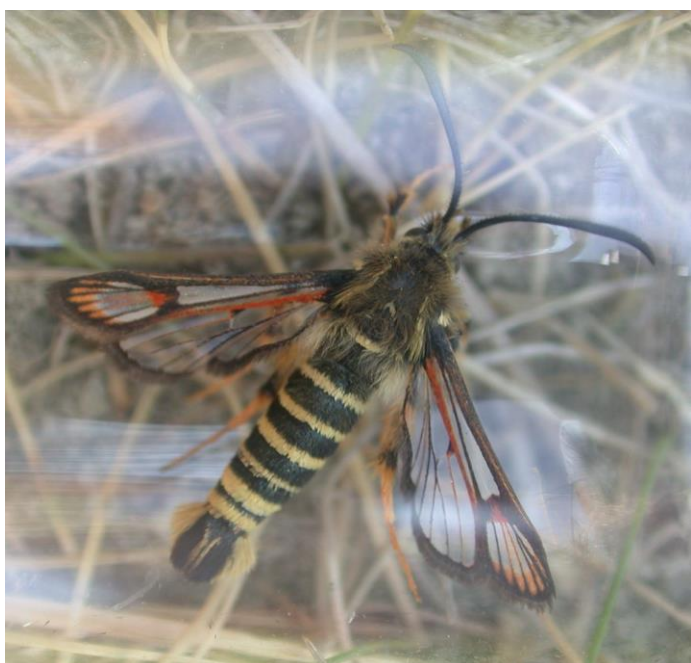
Dark Sword-grass at Hythe (Ian Roberts)

Silver Ys were noted in decent numbers from the 11th May, with a notable immigration in mid-July, including 39 on the 13th (six at Hythe and 33 at Saltwood) and 68 on the 15th (12 at Saltwood and 56 at Hythe). Records were unusually protracted with new arrivals noted as late as the 22nd December.

Resident macro moths

There were single records of Ghost Moth from Bargrove Wood on the 18th June and Seabrook on the 24th June, whilst a male Gold Swift was trapped at the former site on the same date and two Narrow-bordered Five-spot Burnets were found at Abbotscliffe on the 25th June. Three Six-belted Clearwings were located at Hythe Ranges on the 11th July, whilst two Fiery Clearwings were noted in Folkestone Warren on the 25th June. A single Fox Moth was taken at Samphire Hoe on the 12th June and a Scalloped Hook-tip was at Saltwood on the 9th-10th August.

A Satin Lutestring was at Seabrook on the 14th June, with single Poplar and Common Lutestring at Bargrove Wood on the 18th June, and a Common and five Satin Lutestrings at Folks' Wood on the 19th July. A Rest Harrow was found by day in Folkestone Warren on the 25th June, with three attracted to light there on the 1st July. Single Grass Emeralds were trapped at Hythe on the 22nd June and the 2nd July, whilst there were up to nine Large Emeralds at Saltwood between mid-July and early August, with four at Folks' Wood on the 18th July.



Six-belted Clearwing at Hythe Ranges (Ian Roberts)

Rest Harrow at Folkestone Warren (Ian Roberts)

Following the exceptional series of records of up to 21 Sussex Emeralds at Hythe last year a search of the food plant was undertaken near Hythe Ranges in early June and a single larva was located. This RDB1 (endangered) species is otherwise only known from Dungeness and Kingsdown. Trapping at Hythe produced an even larger total, with up to 47 noted, including a record peak of six on the 13th July, but none were recorded at Saltwood this year.

The Mocha was again recorded from Lympe Park Wood, where one was found on the 13th May, and a Clay Triple-lines was taken at Saltwood on the 9th May. A single Sub-angled Wave was trapped at Folkestone Warren on the 10th July, a Large Twin-spot Carpet was at Folks' Wood on the 18th July and five Chalk Carpets were taken at Abbotscliffe on the 21st August. Wood Carpets were found at Folkestone Warren on the 1st and 10th July (2), whilst there were Galium Carpets at Folkestone Warren on the 19th June, Hythe on the 28th June and Samphire Hoe on the 10th September (3).

Single Streamers were at Saltwood on the 15th-16th April, Hythe on the 24th April and Seabrook on the 4th May, with the Phoenix at Saltwood on three dates in June/July and four Blue-bordered Carpets (two at Hythe and two at Saltwood) in July.

Two White-banded Carpets were trapped at Seabrook on the 5th August, which is the third consecutive year that the species has been recorded from this site, strongly suggesting that is resident in the area.

Scallop Shells were taken at Saltwood on the 26th June and Folkestone Warren on the 1st July.

A Rivulet was at Saltwood on the 22nd May, with Small Rivulets at Saltwood on the 13th July and Hythe on the 17th July and singles of Sandy Carpet at Saltwood on the 24th May and the 1st July.

Notable amongst the pugs were a Triple-spotted Pug at Saltwood on the 12th June, Grey Pugs at Saltwood on the 3rd and 17th June, and Folkestone Warren on the 19th June, a Plain Pug at Hythe on the 30th July, an Ochreous Pug at Saltwood on the 23rd May, Ash/Angle-barred Pugs at Saltwood on the 8th June and the 10th August, Larch Pugs at Saltwood on the 17th June and the 29th July and a Sloe Pug there on the 27th June.



Sussex Emerald near Hythe Ranges (Ian Roberts)



Mocha at Lympe Park Wood (Ian Roberts)



Sub-angled Wave at Folk. Warren (Ian Roberts)



Galium Carpet at Folk. Warren (Ross Newham)



Streamer at Seabrook (Ade Jupp)

Single Dingy Shells were recorded at Folkestone Warren on the 1st July and Saltwood on the 13th July, and a Waved Carpet was taken at Folks' Wood on the 18th July, whilst a White Spot was attracted to light at Folkestone Warren on the 19th June. A Lilac Beauty was trapped at Saltwood on the 4th July with a Large Thorn there on the 1st October, and single Lunar Thorns there on four dates in late July/early August.

Scalloped Hazels were taken at Saltwood on the 8th and 21st May, and the 10th June and Orange Moths were again present in good numbers at Folkestone Warren, with three trapped on the 1st July and ten on the 10th July. A Spring Usher was recorded at Saltwood on the 9th February and Scarce Umbers were at Hythe on the 6th and 9th November, whilst a Brindled White-spot was trapped at Folks' Wood on the 18th July and single Bordered Whites were at Saltwood on the 24th May and the 1st July.

Two Barred Reds were trapped at Saltwood on the 29th June, with singles there on three nights in July. An Annulet was attracted to light at Abbotscliffe on the 21st August, whilst a Straw Belle was found by day there on the 25th June and a Yellow Belle was taken at Hythe on the 5th June. It was a good year for Pine Hawk-moth with six noted from the 6th July to the 3rd August, records being evenly split between Hythe and Saltwood.



Scarce UMBER at Hythe (Ian Roberts)



The ANNULET at Abbotscliffe (Ian Roberts)

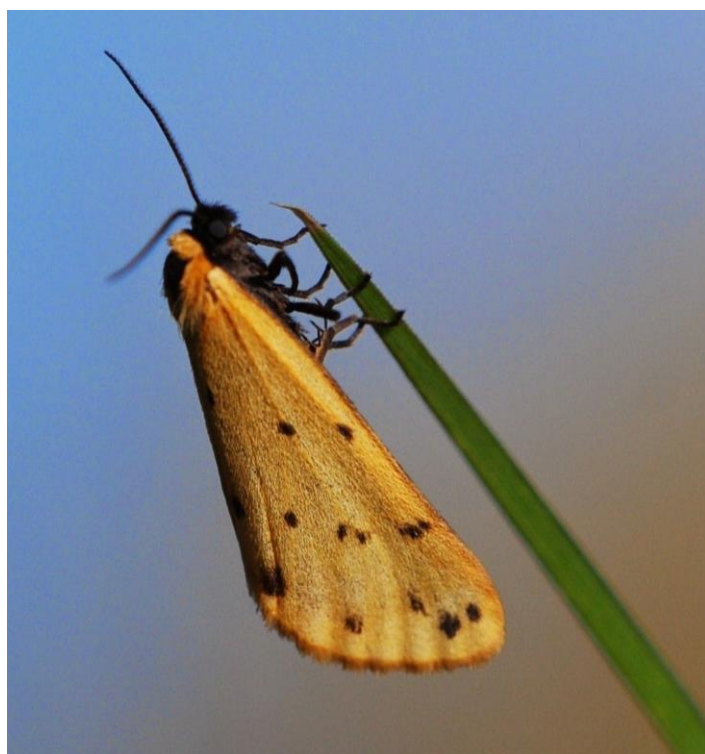
At least two Puss Moths were recorded at Hythe in May/June and a Poplar Kitten was trapped at Saltwood on the 26th May, whilst Marbled Browns were at the latter site on the 7th May and 24th June, and Lunar Marbled Browns were taken there on the 25th April and 10th May. There were single Chocolate-tips on two dates in May at both Saltwood and Seabrook, with another at the former site on the 13th August. Two Black Arches were taken at Folks' Wood on the 18th July, with up to nine at Saltwood in August.

Dew Moths were noted at Abbotscliffe between the 8th May and the 25th June, with a peak of 30 on the 13th May. A single Hoary Footman was at Saltwood on the 20th July, whilst up to nine Pigmy Footman of the *pallifrons* form were recorded at Hythe in July, with another at Saltwood on the 22nd July, and were presumably wanderers from Hythe Ranges. Cream-spot Tigers were again noted at Samphire Hoe, with larvae present in April and a peak of at least nine adults there on the 12th June, whilst Clouded Buff were recorded from two sites, with counts of six at Crete Road West on the 20th June and three at Folkestone Warren on the 25th June. A Water Ermine was at Samphire Hoe on the 12th June.

Jersey Tigers continue to increase, with another record year in which up to 114 were recorded (more than double the previous highest total last year) between the 17th July and the 10th September, and a peak count of 11 at Saltwood on the 21st August. Three Kent Black Arches were at Folkestone Warren on the 10th July, with singles at Hythe on the 11th July, Folks' Wood on the 18th July and Saltwood on the 11th August.

Single Langmaid's Yellow Underwings were identified at Saltwood on the 21st July and the 13th August, whilst a Purple Clay was trapped there on the 12th July and up to six Green Arches were recorded there in June/July. Red Chestnuts were at Hythe (2) and Saltwood on the 7th April, with a further single at both sites in April. Grey Arches were noted in Folkestone Warren on the 1st and 10th July, whilst single White Colons were taken at Saltwood on the 14th June and on two dates in August.

A Beautiful Brocade was trapped at Saltwood on the 10th July, with a Broom Moth there on the 30th June, whilst at Samphire Hoe singles of Dog's Tooth and Hedge Rustic were recorded on the 10th September. A total of seven Small Ranunculus were taken at Hythe between the 10th and 30th July. A Pine Beauty was at Saltwood on the 2nd April, whilst other early spring moths of note there in April included a Lead-coloured Drab on the 14th, single Powdered Quakers on the 12th and 21st and up to four Twin-spotted Quakers.



Dew Moth at Abbotscliffe (Ross Newham)



Clouded Buff at Crete Road West (Ian Roberts)

Two Southern Wainscots were identified at Saltwood on the 2nd August, whilst an Obscure Wainscot was trapped there on the 4th June as were single Sharks on the 18th June and the 10th July. A Minor Shoulder-knot was taken at Folks' Wood on the 18th July. Up to nine Merveille du Jour were recorded at Saltwood between the 17th October and the 2nd November, with a single Brindled Green there on the 23rd October and a Brown-spot Pinion on the 19th September.

A Suspected was recorded at Saltwood on the 19th August and there Dusky-lemon Sallows at Saltwood on the 7th October and at Hythe the following night, with an Alder Moth at Saltwood on the 12th June. Three Svensson's Copper Underwings were identified at Saltwood in August and singles of The Olive were noted from Saltwood on the 23rd July, Hythe on the 16th August and Saltwood on the 21st August, whilst there were Dingy Shears at Saltwood on the 6th July and Hythe on the 9th July. A Lunar-spotted Pinion was at Saltwood on the 14th July.

A Reddish Light Arches was trapped at Saltwood on the 16th July, with singles of Clouded-bordered Brindle there on the 15th June and at Folkestone Warren on the 1st July, and four records of Clouded Brindle at Saltwood in June/July. Saltwood also produced a Confused on the 14th July, a Small Clouded Brindle on the 16th July and a Small Dotted Buff on the 11th June. There were singles of Saltern Ear at Hythe on the 25th July and Saltwood on the 11th August and three records of Frosted Orange at Saltwood in September/October, with a Bulrush Wainscot there on the 15th August.

After two at Samphire Hoe on the 10th September there was another notable influx of Large Wainscot from October to mid-November, with up to 54 recorded (11 at Saltwood and 43 at Hythe), and a peak of six (1 at Saltwood and 5 at Hythe) on the 22nd October. This species tends to have 'irruption' years with the total for the last five years being 55 (2015), 38 (2014), 6 (2013), 2 (2012) and 61 (2011). Single Fen Wainscots were trapped at Saltwood on three dates in August, with a Small Rufous there on the 31st July.

There was an excellent total of up to 19 Clancy's Rustics, which was the best figure since 2006, and no doubt included many primary immigrants (there was just a single record last year and only two in 2013). Records occurred between the 17th September and the 22nd October, with 5 at Saltwood and 14 at Hythe. A single Cream-bordered Green Pea was taken at Saltwood on the 13th July.

Scarce Silver-lines were recorded from Saltwood on four dates in July, with Gold Spots at Hythe on the 21st and 28th August, Beautiful Golden Ys at Folkestone Warren on the 1st July and Saltwood on the 12th July, and Plain Golden Ys at Folkestone Warren on the 10th July and Saltwood on the 15th July.



Gold-spot at Hythe (Ian Roberts)



Clancy's Rustic at Hythe (Ian Roberts)

Bloxworth Snout continues to be locally established with a total of 24 recorded (two at Saltwood and 22 at Hythe) between the 15th May and the 14th December, whilst two Pinion-streaked Snouts were trapped at Hythe Roughs on the 5th June. Plumed Fan-foot is also probably resident, with eight (four at both Hythe and Saltwood) noted between the 16th July and the 21st August, but sadly the Four-spotted was not recorded from Hythe Roughs this year and appears to have a very poor year nationally.

Figure 3 shows the number of species recorded in each month of 2015:

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
Micros	3	5	12	20	51	151	232	163	61	19	14	4	336
Macros		6	13	42	130	209	266	195	109	81	43	14	418
Total	3	11	25	62	181	360	498	358	170	100	57	17	754

Figure 3: Moth species at Folkestone and Hythe in 2015

The total of 336 species of micro moths marked a continued increase on the totals recorded in the previous three years (305 in 2014, 287 in 2013, 252 in 2012) as did the total of 418 macro species (385 in 2014, 370 in 2013, 339 in 2012). These numbers reflect a good season despite a slow start, particularly for immigrants, and to some extent increased coverage of Folkestone Warren and some woodland sites.

Figure 4 shows the total number of individual moths recorded in each month of 2015:

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
Micros	4	7	79	164	418	2438	7039	6300	1516	366	266	83	18680
Macros		21	179	984	1214	7251	13593	10876	8742	2778	553	69	46260
Total	4	28	258	1148	1632	9689	20632	17176	10258	3144	819	152	64940

Figure 4: Total moth numbers at Folkestone and Hythe in 2015

Despite the increased diversity, the total catch of macros was very similar to last year (0.5% less) and the total catch of micros was considerably less (by 17%). Generally speaking numbers were lower in the earlier part of the year (March to July) and higher in the latter part (August to December).

The 23rd July produced the largest catch of moths, with 1,294 individuals, whilst the 10th July saw the greatest variety with an exceptional 204 species recorded.

Butterflies

The highlight of the year was the second area record of **Large Tortoiseshell** at Saltwood on the 28th June (following one at Sugarloaf Hill, Folkestone in April 2007).

It was quite a poor year for Clouded Yellow, with just 12 recorded between the 28th April and the 18th October. Eight were seen at Samphire Hoe, with three at Hythe Ranges at one at Seabrook.

The first Painted Lady was at Lympe on the 2nd April, with two at Samphire Hoe later in the month, then regular sightings through May, June and July, with a peak of six at Samphire Hoe on the 29th July. A small influx in late August/early September included a peak of ten, again at Samphire Hoe, on the 6th September. The final sighting was at Abbotscliffe on the 4th October and the total of at least 61 was the second best since the record arrival of 2009.



Clouded Yellow at Samphire Hoe (Phil Smith)



Painted Lady at Abbotscliffe (Ian Roberts)

The totals for the year of the regular immigrant butterflies are shown in figure 5:

	Apr	Apr	May	Jun	Jul	Aug	Sep	Oct	Dec	2015	2014	2013
Clouded Yellow		1	1	2	1	1	3	2		12	20	68
Painted Lady		3	15	16	12	3	11	1		61	11	223
Total		4	16	18	13	4	14	3		73	31	289

Figure 5: Regular migrant butterflies in the Folkestone and Hythe area in 2015

The most significant records of resident species came from Folks' Wood, where recently cleared areas were found to be supporting **Silver-washed Fritillary** and **White Admiral**. At least four of the former were present in July, including a mating pair, and two singles of the latter were also seen in July.

A **White-letter Hairstreak** was seen along the canal near Hythe Roughts in early July and a single **Chalk Hill Blue** was seen at the eastern end of Abbotscliffe in September. At least six Small Blues were present at Samphire Hoe but none were found at the Crete Road West site this year, whilst it was another good season for Brimstone, with up to 12 noted between the 17th March and the 8th June, and sightings at Folkestone Downs, Crete Road West, Castle Hill, Seabrook, Saltwood and Hythe Roughts.

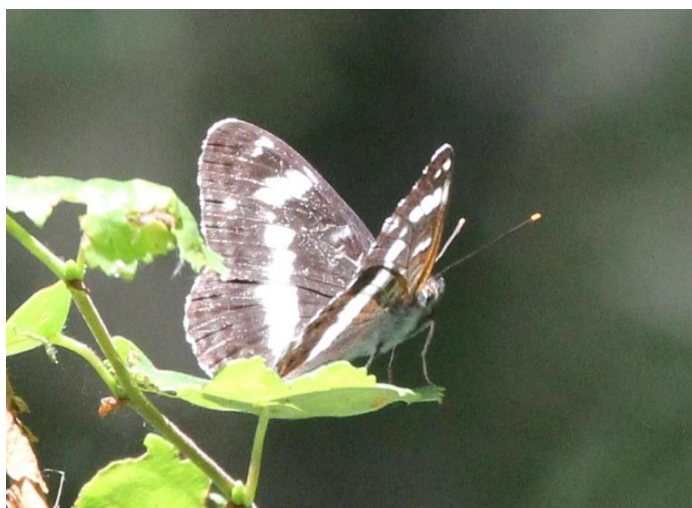
Adonis Blue, Dingy Skipper, Green Hairstreak and Wall butterflies were noted at their usual haunts at Samphire Hoe, along the cliffs between Round Down and Capel-le-Ferne, in Folkestone Warren, and along Folkestone Downs, with a couple of the latter also at Hythe Roughts.

A total of 33 species were recorded in 2015, one more than in the previous year. The first dates for these are provided as figure 6:

Small Skipper	25 Jun
Essex Skipper	07 Jul
Large Skipper	05 Jun
Dingy Skipper	21 Apr
Clouded Yellow	28 Apr
Brimstone	17 Mar
Large White	13 Apr
Small White	17 Mar
Green-veined White	07 Apr
Orange Tip	13 Apr
Green Hairstreak	04 May
White-letter Hairstreak	03 Jul
Small Copper	27 Apr
Small Blue	25 May
Common Blue	13 May
Chalk Hill Blue	11 Sep
Adonis Blue	08 May
Holly Blue	09 Apr
White Admiral	11 Jul
Red Admiral	04 Mar
Painted Lady	02 Apr
Small Tortoiseshell	27 Feb
Large Tortoiseshell	28 Jun
Peacock	01 Jan
Comma	17 Mar
Silver-washed Fritillary	11 Jul
Speckled Wood	10 Apr
Wall	24 Apr
Gatekeeper	07 Jul
Marbled White	25 Jun
Meadow Brown	20 Jun
Small Heath	13 May
Ringlet	29 Jun



Silver-washed Fritillary at Folks' Wd. (Brian Harper)



White Admiral at Folks' Wood (Ian Roberts)



Dingy Skipper at Abbotscliffe (Ross Newham)

Figure 6: First dates for butterflies at Folkestone and Hythe in 2015

The unusually mild autumn led to some notably late dates which included November records of Adonis Blue, Comma, Peacock and Red Admiral and December sightings of Small Tortoiseshell.



Silver-washed Fritillaries at Folks' Wood (Ian Roberts)



Speckled Wood at Samphire Hoe (Phil Smith)

Other insects

Dragonflies and damselflies remain relatively understudied but there were several records of note. The highlights were two male **Red-veined Darters** at Folkestone Reservoirs on the 27th June, up to two Banded Demoiselles at Fairmead Farm (Westenhanger) in late June/early July and several Migrant Hawkers at various sites between mid-August and early October.

A **Rambur's Pied Shieldbug** at Botolph's Bridge on the 14th June appears to be the first area record of this species which first colonised the UK in 2011. The seventh to 13th area records of **Southern Oak Bush-Cricket** were at Hythe between the 31st August and the 6th October, and this insect would appear to probably be locally resident now.



Rambur's Pied Shieldbug at Botolph's Bridge
(Brian Harper)



Banded Demoiselle at Fairmead Farm
(Brian Harper)

Mammals

Harbour Porpoises were seen occasionally offshore, particularly in spring, with most records from Samphire Hoe, Mill Point or Princes Parade. There were several reports of seals, not all identified to species, though those that were tended to be Common.

On land there were regular sightings of Brown Hare in the Donkey Street/Willop Basin area, with a peak count of four there on the 21st March, whilst Mink were noted at Botolph's Bridge, Nickolls Quarry and along the canal at Hythe Roughs.

Flora

The usual range of orchids were noted, including the Late Spider Orchids again present at Folkestone Downs in June.