A LIST
OF
MACRO-LEPIDOPTERA
OCCURRING IN THE
NEIGHBOURHOOD OF FOLKESTONE.

BY
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A LIST OF
MACRO-LEPIDOPTERA,
Occurring in the Neighbourhood of Folkestone.

BY H. GUARD KNAGGS, M.D., F.L.S.,

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"Entomologist's Monthly Magazine."

AS might be expected from the peculiarity of its geological strata (Lower Chalk and Upper Gault to the east, and the various layers of Lower greensand to the west of the town), the shelter afforded by hills and valleys with which the neighbourhood is so picturesquely embellished, the varied nature of its Flora, and above all its proximity to the coast of France, Folkestone offers a mine of wealth to the working Entomologist; indeed, there are few districts throughout the United Kingdom which have yielded such an imposing array of novel and rare species, as has done this El Dorado of the British Lepidopterist. By way of illustration let me enumerate a few of the delicacies for which this locality is so justly famed.

First and foremost *Sesia chrysidiformis* may be mentioned. This glorious clearwing once based its claim as a Britisher on the authority of a single specimen in the cabinet of Francillon, but not having turned up for many years, was erased from our lists, until Mr. Brewer, a Coleopterist, to whom Lepidopterists have every reason to feel grateful, gladdened our eyes with the sight of a specimen (in 1856) which he had consigned to the undignified depths of his 'bacca box! and thanks to this clue and the practical manner in which collecting is conducted now-a-days, it was not long before the coveted prize found a resting place in most of our collections. The perfect insect flies for a few hours in the morning sun, disappears towards noon, and re-appears on the wing in the

afternoon sunshine. It should be sought for in the Warren on scantily covered flowery chalk banks facing the sea. Its flight, when the insect is not disturbed, somewhat resembles that of a Burnet, but being of a small size, it is easily passed over until the eye becomes familiar with its appearance.

The discovery of its larva, which feeds on the roots of Sorrel and Dock, was made a few years since simultaneously by Mr. E. G. Meek, in the Warren, and M. P. Mabile, in Corsica. The oblong blackish eggs are deposited on the leaves and stalks of its food plants.

Next we have a Bombyx, or rather Pseudo-bombyx, *Closs-tera anachoreta*, a handsome addition to our moth fauna of which I was myself the fortunate discoverer. My first acquaintance with the species was made in the larval state; eleven caterpillars, found feeding on Ontario Poplar in one of the plantations along the Lower Sandgate road, producing as many moths; a single female of which became literally the "mother of thousands," so that the "Anchorite" is now in every cabinet. Several other collectors have subsequently taken the larva.

Then comes a Noctua, *Leucania albipuncta*, discovered here in 1868, by the Messieurs Briggs, of St. John's, Oxon, who were lucky in securing a couple of examples at sugar; the insect may be known from its congener, *L. lithargyria*, to which it bears considerable resemblance, by its smaller size, its less concolorous appearance, and the greater conspicuity of its white discoidal dot. It is on the wing early in August.

The fourth Folkestone Moth, *Tapinostola Bondii*, a bone-dust-white insect, with wings expanding about an inch and a quarter, presents a curious little historiette of its own. It is certainly astounding that so conspicuous a species should have been flitting freely every afternoon towards dusk in the fashionable month of July, under our very noses, and yet have escaped detection up to 1858, and it is still more surprising that in the eleven years following but two fresh localities, namely Lyme Regis and Mount Parnassus, should have been discovered for a fly so locally abundant in its habitats. Of course it was very hard to believe that a Noctua, of which I had secured and distributed some thousand individuals among brother collectors, could possibly be new to science, and it was therefore not to be wondered at that our

great authorities should try every means to sink the name which I had bestowed upon it in honour of my esteemed friend, Frederick Bond. First it was proposed that it would prove to be the *Nonagria concolor* of Guenée, then that it might be an aberrant form of *Miana arcuosa*, and lastly that it was the *N. extrema* of Hübner; this latter theory for a time held ground, until Professor Zeller showed that the figure of *extrema*, by Hübner, and the description by Treitschke, could not, by any twisting, be made to fit my insect. After that *Bondii* found itself unmolested for a time; recently, however, Colonel Macchio, of the Austrian army, having found the insect on Mount Parnassus, came to the conclusion, after comparing it with the Royal collection at Vienna, that it really was the *extrema* of Hübner after all. Still later, however, Dr. Staudinger, of Dresden, has carefully examined both Hübner's and Treitschke's types, and his unimpeachable decision is that *Bondii* is a good new species; and that it is the *concolor* of Guenée, which is identical with *extrema*; so that at last *Bondii* survives, notwithstanding the severity of the tests which have been applied to it.

The perfect insect appears from the end of June to the end of July, and inhabits the slopes below St. Mary's Church; it is on the wing before dusk, and after a short flight of twenty minutes or half-an-hour, settles down on the leaves and stems of its food plants, where it may be observed by the aid of a lantern, singly and in pairs, and boxed in the usual manner.

The caterpillar feeds in the root end of the stems of a local coast grass, known to botanists as *Festuca arundinacea*, wherein it changes to a chrysalis. The eggs which are pale yellowish, are deposited between the leaf sheaths and stems of the food; the little larvæ are at first hairy, but become smooth after piercing a layer or two of the plant on their way to the pith.

The next is a *Noctua*, evidently from the very peculiar pectinated form of its antennæ, new to the British list; but unfortunately the only example I secured of it (on the fence near the Junction station early in June, 1861), is in such a dilapidated state, that to identify it is impossible. It appears to belong to the genus *Pachetra*, and from the structure of its antennæ one would suspect it to be a visitor at light. Col-

lectors would therefore do well to be on the look out for it at street lamps, after 11 p.m. in the Autumn, or else after hibernation, early in May.

We now come to a singular slender-bodied moth, *Aplasta ononaria*, the extraordinary larval structure of which is utterly subversive of our notions of a geometric caterpillar. A single specimen of this curious species was discovered by my friend Mr. Bernard Piffard, in the Warren, amongst *Ononis arvensis*, in August, 1867. On the continent, in the neighbourhood of Paris, the insect is attached to *Ononis spinosa*. It is double-brooded, and ought to be sought for in May as well as in August and September. Its habit is to fly up as we trample through, or disturb with our beating-stick, the Rest-harrow. To obtain the larva, which is plump, hairy, and very sluggish, our French friends mow off tufts of the food plant and shake them over a sheet of paper. Two other examples have been secured by Mr. F. Standish, in July of the present season, 1869.

Spilodes palealis. Folkestone claims the honour of first yielding this delicately beautiful pearl. Several years ago it was met with rather plentifully in the Warren during June and July, but of late has become rare—indeed seems to have disappeared. The species has also been taken at Herne Bay and other watering-places, and one year a stray specimen actually found its way as far inland as Forest Hill. The larva feeds on the umbels of the Wild Carrot and *Peucedanum*, in August and September.

Lemiodes pulveralis. For the additon of this new British genus and species to the Folkestone list of delicacies, we are indebted to the Messrs. Meek, who have this season (1869), secured three examples in the Warren; Mr. Edward Meek had a few weeks previously, however, met with a single individual of the, then, unknown in the Isle of Wight, so that unfortunately our pet locality has not been the first to yield the novelty. Stephens, many years since, gave it as an inhabitant of Great Britain; but, as he omitted it from his Museum Catalogue, and it has not since “entered in the lists,” the present captures must be regarded in the light of a new discovery. The ordinal position of this *Pyralis* in our cabinets will be after the genus *Scopula*. Its time of appearance is August.

Scoparia ingrattella is the last novel "Macro" here to be recorded. This species is abundant in the Warren in June and the beginning of July. It may be known from its close ally *S. dubitalis* (*pyralella*) by its larger size, somewhat broader forewings, and by black markings being faint or altogether absent. It should be killed on the spot of capture, otherwise there will be little left to recognise on reaching our home quarters.

Although it is not intended in the present list to include the Micro-Lepidoptera, it might not be out of place to notice some of the chief novelties and rarities of that section.

Firstly, we have *Nyctegretes achatinella*, one of the *Phycidæ*, an old Folkestone spécialité which has since, or I am much mistaken, occurred in Norfolk.

In the next place *Crambus rorellus* was discovered some ten years since by my friend, Mr. Joseph Sidebotham, of Manchester, on the Lower Sandgate Road, where he secured eight or ten specimens. Previous to these captures a single specimen was said to have occurred, but as no locality had been given for it, and the species did not turn up again, the insect had been eliminated from our lists. This striking *Crambus* has since been met with, by Mr. E. Meek, in the Warren.—The time of appearance is early in June.

Of Tortrices, the chaste, *Sciaphila cinctana*, discovered twelve years ago by the Rev. Tress Beale, near Alkham, is most conspicuous for its beauty. It has not, to my knowledge, ever occurred in any other British locality. Of late years it has been freely bred by London collectors, who have been assiduous in their search for the larva which feeds on *Echium vulgare*. The perfect insect emerges in June or July, and may be met with in a wood, on the left after passing the village of Alkham, amongst the plants named above as its food. It will be well for Tortrix hunters to bear in mind that the favoured time for the flight of their special group is about 6 p.m.

Catoptria conterminana is another Tortrix which Folkestone bears the credit of being the first to yield. Its discovery fell to the share of my friend, Mr. Bond, who secured it on one of the slopes at the commencement of the Warren. It has since been taken by Mr. Machin, at Statford-by-Bow. I have

met with the insect to the west of the town early in July. Abroad, it is said, to feed on Aster.

Feeding on that singular plant, the *Hippophaë rhamnoides*, in the Warren, is a *Spilonota* allied to *Sp. ocellana*, which I have serious intentions of describing shortly under the name *Sp. hippopaäna*. The species is very abundant.

Referring to the Tineina, it might be remarked that I was fortunate enough to secure, on the Lower Sandgate Road, a little larva on a leaf of *Achillea millifolium*, which duly produced a Bucculatrix new to the country, *B. artemisiella*. The capture was made early in June, some years since, on one of the most boisterous days I ever remember to have experienced even at Folkestone. Of course, its occurrence on a Yarrow leaf was purely accidental; but full-fed Bucculatrix larvæ have the peculiarity of leaving their food plant to spin up their seed-like cocoons elsewhere.

Thus, the reader will observe, Folkestone has produced at least a dozen new British species. Besides these, however, many rarities have occurred, and as a taste of the richness of this district may be gathered from the enumeration of a few of them, I purpose taking a special glance before proceeding to the list itself.

Procris globulariæ. To the two habitats already known for this local species, Mr. Ulyett has added Folkestone, he having met with it in some numbers on Castle Hill in June, 1869. At the same time and place he also captured several *P. geryon*.

Acidalia rubricata was taken in the Warren, beyond the old "Pelter" Brig, by my friend, Mr. J. B. Lynch, at a time when only one other locality (York) was recorded for the species. Since then it has been turned up elsewhere by the Hon. Thomas de Grey and Mr. Bond.

A. rusticata. A few years ago I beat a specimen of this local wave out of a maple tree in the Warren, thereby adding a third to its other two localities. The caterpillar generally feeds on whitethorn.

A. ornata. A lovely "wave" occurring abundantly in the Warren. It is double-brooded, and frequents Marjoram and Thyme. The only other locality given for it in Mr. Stainton's Manual is Box Hill.

A. strigilata would seem to be almost peculiar to the hollows

in the Warren, for although Darenth Wood and Carlisle have been given as localities for it, the insect was certainly of extreme rarity prior to its discovery in this neighbourhood. The imago emerges in July, and may be either beaten out by day or taken on the wing at dusk in its favourite haunts; in this way a goodly number of captures have rewarded hard work. The larva, as far as my experience goes, feeds on the Traveller's Joy, *Clematis vitalba* (upon which I have reared the perfect insect from the egg) and not upon *Stachys sylvatica* as generally supposed.*

Eupithecia subciliata. My friend Mr. McLachlan and I once secured a number of examples of this curious and local Pug in the grounds of Saltwood Castle, and also in Sandling Park, amongst lichen-covered maple trees. Notwithstanding the acquisition of ova, the larva still remains a mystery; but we have no doubt that it will be found to live upon maple.

Xylophasia scolopacina. Mr. McLachlan captured a fine dark example at Saltwood. The species had never previously been met with so far south.

Agrophila sulphuralis. Mr. Sidebotham some years ago secured a few of this pretty little Noctua on the Lower Sandgate road, where its food plant, the Lesser Convolvulus grows in abundance. Hitherto it had only occurred in Suffolk, and, long long ago, near Cambridge.

Odontia dentalis. This quaint looking insect seems confined to Brighton, Deal, and Folkestone. The caterpillar feeds in the stems and roots of *Echium vulgare*, but spins its cocoon among the dead leaves lying on the ground, where it may be detected without much difficulty.

Pionea margaritalis. Cambridge, Ranworth, and Sandown, are its known habitats, but I met with an example in the enclosure beyond the turnpike on the Lower Sandgate Road. The caterpillar feeds on seeds of Wild Mustard.

Simaëthis vibrana. Ten years ago I took a fine specimen of this sparkling little gem on the Lower Sandgate Road. This was the fourth known British example, and I have not heard of any recent capture. It is said to affect *Inula dysenterica*.

* Seeing that this truly local "Wave" has occurred singly in its other two habitats, the species may be set down as a Folkestone spécialité, for there is no other known locality where one would stand even the faintest chance of meeting with it.

Melissoblates bipunctanus (*anella*). The only locality given for this is Deal, where it used to be taken by the late Peter Bouchard. Mr. Lynch and I have, however, met with a few examples to the west of Folkestone.

Homæosoma sinuella is most abundant in the lower Sandgate Road, although Brighton is the only locality given for it in the Manual. I believe it occurs also in the Isle of Wight.

Gymnancycla canella. The only places mentioned for this rarity are Hastings and Folkestone.

Pempelia ornatella. This pretty knot-horn is not scarce on the slopes towards Sandgate, in the Warren, and at Alkham. The only other known British locality is Mickleham.

Sericoris euphorbiana. This species was unique until a few specimens were secured in the Warren :—during the last year or two, in consequence of a deeply interesting and suggestive paper in the “Entomologists’ Monthly Magazine,” by Professor Zeller, of Stettin it has been freely bred from Spurge—and it has also been taken in some numbers flying in the sun in the vicinity of its food.

S. fuligana (*abscissana*). The localities given in the Manual are “near London, in Norfolk, and Folkestone.” It is stated to occur amongst Flea-bane (*Inula*). The species, in the Warren, frequents thistles.

Stigmonota Leplastriana. Deal, Dover, and Folkestone are apparently the only localities for this local species. It frequents the Wild Cabbage.

Dicrorampha flavidorsana. This novelty to which I had recently applied the above name, from an examination of specimens captured at Halsemere and Devonshire, appears to be an inhabitant of Folkestone also ; an example or two having been captured by my friend, Mr. Howard Vaughan.

Catoptria microgrammana is a curiously marked little Tortrix, recorded as having occurred at Deal, and also doubtfully stated to have been taken on one occasion near London ! It is common enough in June at Folkestone, where it frequents the Rest-harrow, which freely clothes some of the slopes in the Warren, and upon which it doubtless feeds.

Cochylis alternana (*gigantana*). A tolerably common specimen amongst Knapweed (*Centaurea*), but its distribution is apparently confined to Deal, Dover, and Folkestone.

So that besides the dozen novelties before-mentioned, we possess a score of rarities and species so excessively local as to have only one or two other recorded localities.

Two other points and we will proceed to the list.

First—it is very singular that several species, whose food plant is absent, or all but absent, should occur in the Warren; for example *Gonepteryx rhamni*, without Buckthorn (*Rhamnus catharticus* or *frangula*); *Vanessa polychloros* can find but little elm near the old lime kilns; *Lycæna argiolus* without holly, but it probably feeds here on ivy; *Acronycta auricoma* and *Phorodesma bajularia* with only a few sprigs of oak to support them; *Cucullia asteris*, with hardly a handful of *Solidago* scattered about its locality; and *Endotrichia flammealis*, where no brake fern that I can find grows.

The other point is the singular richness of the locality in Plume moths; no fewer than eighteen out of the twenty-nine British species inhabiting the neighbourhood of Folkestone. They are as follow:—

- Pterophorus Bertrami*. Not uncommon amongst Yarrow; Lower Sandgate-road, June and July.
- „ *trigonodactylus*. Amongst Coltsfoot. Warren; June.
- „ *acanthodactylus*. Not uncommon amongst Rest-harrow slopes in the Warren; June and July.
- „ *parvidactylus*. Common amongst the Hawkweed slopes in the Warren; June and July.
- „ *pilosellæ*. Scarce, amongst Hawkweed; June.
- „ *phæodactylus*, abundant amongst Rest-harrow; June and July.
- „ *bipunctidactylus*. Warren; July.
- „ *fuscus*. Abundant in Warren; June and July.
- „ *lithodactylus*. Not scarce amongst Flea-bane; end of June and July.
- „ *pterodactylus*. Sandgate road; August.
- „ *tephradactylus*. Warren, scarce; July.
- „ *osteodactylus*. Warren, rare; July.
- „ *microdactylus*. Abundant amongst Hemp Agri-mony; May and June.

- Pterophorus galactodactylus*. Not scarce amongst Burdock on slopes below Royal Oak ; July.
- „ *baliodactylus*. Common in Warren amongst Marjoram ; July.
- „ *tetradactylus*. Not scarce in Warren amongst Thyme ; July.
- „ *pentadactylus*. Common in the outskirts of the town amongst Convolvulus ; May, June, and July.
- Alucita polydactyla*. Common inland, amongst Honeysuckle ; August and again after hybernation.*

DIURNI. †

- Leucophasia sinapis*. The Wood White may be met with not uncommonly at Raindean Wood, about three-and-a-half miles on the road to Canterbury. The spring brood is on the wing in May.
- Pieris brassicæ*, } all occur in the neighbourhood as might be
 „ *rapæ*, } anticipated.
 „ *napi*, }
- „ *Daphidice* used to be captured towards Dover in the days of Leplastrier ; but has not I believe, put in an appearance of late years.
- Anthocaris cardamines*. In the Warren during May, but more abundantly inland.
- Gonepteryx rhamni*. In the Warren, but sparingly, in May ; more abundantly inland.
- Colias Edusa*. Common enough in certain seasons. The variety *Helice* has been captured here on several occasions ; August and September.

* Since the foregoing notes were written another great rarity has occurred at Folkestone. T. H. Briggs, Esq. was fortunate enough on October 1st, 1869, to disturb and capture a specimen of *Deiopeia pulchella* on “the hills at the back of Folkestone.” This was in a turnip field ; the usual locality is among stubble ; there was, however, a field of barley stubble at no great distance to windward. Strict searching did not produce another specimen.

† *Papilio Machaon* has been met with year after year on the East Cliff, Dover, beyond the Castle ; but has not, to my knowledge, occurred in the immediate vicinity of Folkestone, though its favourite food (Fennel) is not scarce.

Colias Hyale. Very abundant on the Lower Sandgate road, in 1868; August.

Argynnis Aglaia. Abundant on the downs which run inland from the east of Folkestone; July. Black examples are rare.

„ *Adippe*. A few specimens flying in company with the foregoing.

„ *Lathonia*. Two or three examples have been secured in the Warren. It used not to be scarce in some seasons in lucerne fields, at the back of Dover Castle.

„ *Euphrosyne*. Taken inland; first brood May and June.

Melitæa Artemis. Raindean Wood; end of May and June.

„ *Cinxia*. The undercliff, Lower Sandgate road, where its food plant (*Plantago lanceolata*) abounds; June. It has not been observed of late years.

Vanessa polychloros. In the Warren; July and August—first noticed and captured in 1869.

„ <i>urticæ</i> ,	} occur in greater or less abundance in the Warren and other places.
„ <i>Io</i> ,	
„ <i>Atalanta</i>	
„ <i>cardui</i>	

Arge Galathea. Very abundant, both to the east and west of the town; July and August.

Satyrus Ægeria. Common inland, borders of woods; May and August.

„ *Megæra*. Common in lanes inland; May and August.

„ *Semele*. Common in the Warren and East Downs; August.

„ *Janira*. Abundant everywhere.

„ *Tithonus*. Taken inland and in the Warren. July.

„ *Hyperanthus*. Very abundant on the Warren; July. Some very curious varieties wanting the ringlets on the under surface have been taken.

Chortobius Pamphilus. Very abundant in the Warren from June to September.

Thecla rubi. On the Warren, near “the long pond;” June.

Polyommatus Phlæas. Common on the Warren and Downs; August.

Lycæna Agestis. Common on the Warren; May and August.

- Lycæna Alexis*. Common ; May and July.
 „ *Adonis*. Abundant on the Downs to the East ; May and August.
 „ *Corydon*. Abundant on the Warren ; August.
 „ *Alsus*. Warren and East Downs ; May and August.
 „ *Argiolus*. Both broods occur sparingly on the Warren, where it, doubtless, feeds on ivy.
Syricthus alveolus. On the Warren ; May and August.
Thanaos Tages. Abundant on the Warren ; May and August.
Hesperia sylvanus. Abundant in the Warren ; May & August.
 „ *comma*. I have met with this skipper on the Cliffs towards Dover.
 „ *linea*. Abundant, chiefly in moist places, in the Warren ; June and July.
-

NOCTURNI.

- Smerinthus ocellatus*. Warren ; June.
 „ *populi*. Not uncommon at light ; June.
Acherontia Atropos. Larvæ in potatoe field, in some seasons plentiful, a few imagos ; September.
Sphinx convolvuli. A few in the town gardens ; September.
 „ *ligustri*. Larvæ on Privet ; August. Imago flying at dusk ; June.
Deilephila galii. Larva on Bedstraw in Warren ; September.
 „ *lineata*. Fine specimen taken in Warren, 1869.
Chærocampa celerio. “English’s Guide.”
 „ *porcellus*. Warren. Larvæ on *Galium* ; August. Moth at Viper’s Bugloss (*Echium*) ; June.
Macroglossa stellatarum. Abundant in certain seasons in the summer months.
 „ *bombyliiformis*. A few in gardens ; May, or early in June.
Sesia chrysidiformis. Not scarce at present in Warren, flying in the sunshine ; June and July.
 „ *ichneumoniformis*. Not scarce. It occurs both to the east and west of the town ; July.
 „ *tipuliformis* used to occur freely in the gardens attached to the old “White House,” no doubt common in town gardens ; June.

- Sesia bembeciformis*. A fine female example was taken in the Warren whilst in the act of depositing her eggs on Sallow leaves ; July.
- Zenzera Æsculi*. A few stray examples at light ; July.
- Hepialus hectus*. Warren, in moist places ; June.
- „ *sylvinus*. Not uncommon in Warren ; July and August. Larvæ feeds in roots of Dock.
- „ *humuli*. Abundant ; June.
- „ *lupulinus*. Common ; end of May and June.
- Procris geryon*. Castle Hill ; June.
- „ *statices*. Castle Hill ; June.
- „ *globulariæ*. Castle Hill ; June.
- Zygæna trifolii*. Near the Cherry Gardens ; May.
- „ *filipendulæ*. Most abundant in Warren ; June & July.
- Setina irrorella*. Common in Warren towards the shore ; June and July.
- Lithosia rubricollis*. Raindean Wood ; June.
- „ *complanata*. Not uncommon in Warren ; July. Larvæ on *Lotus corniculatus* ; May.
- „ *complanula*. Warren, a few specimens ; July.
- Deiopeia pulchella*. Taken in 1869, at Uphill.
- Euchelia Jacobææ*. Warren ; June and July. Larvæ abundant on Ragwort.
- Euthemonia russula*. Not scarce in Warren ; June.
- Chelonia plantaginis*. Lady-wood ; end of May.
- „ *caja*. Common everywhere.
- „ *villica*. Not scarce ; June.
- Arctia fuliginosa*. Warren. Fine peculiar dusky varieties.
- „ *lubricepeda*. Common.
- „ *menthrastris*. Common at light.
- Liparis chrysorrhea*. Warren ; August.
- „ *auriflua*. Common in Warren ; August.
- „ *salicis*. Common to west of town amongst Poplar.
- Orgyia antiqua*. Warren ; in July and August.
- Bombyx neustria*. Dover Road, Sandgate Road, &c. ; July and August.
- „ *quercûs*. Common in Warren ; July.
- „ *rubi*. Larvæ on East Hills in August and September.
- „ *trifolii*. Cocoons under stones in Warren ; in August.
- I do not know to what other species these can be referred.

- Odonestis potatoaria*. Swarming in larval state in Warren in May.
Lasiocampa quercifolia. Warren ; June.
Saturnia carpini. Warren and Lower Sandgate Road. Larvæ
 on Bramble ; August.

GEOMETRÆ.

- Ourapteryx sambucata*. Warren ; common in July.
Rumia cratægata. Warren ; common in June.
Venilia maculata. Warren ; common in May and June.
Angerona prunaria. Warren, not scarce ; July.
Pericallia syringaria. Warren, not scarce ; July. Larvæ in
 privet ; May.
Selenia illunaria. At Sallow bloom.
Crocallis elinguaris. In the Warren, and at light in the town.
Hemerophela abruptaria. In the town amongst lilac.
Cleora lichenaria. Saltwood, amongst lichen-covered trees ;
 July.
Boarmia repandata. Warren ; June and July.
 „ *rhomboidaria*. Common in the neighbourhood ; June.
Tephrosia punctulata. Horndean Wood ; beginning of June.
Gnophos obscurata. Warren, common ; July.
Geometra papilionaria. Warren, not scarce ; July.
Iodis vernaria. Common amongst *Clematis* ; July.
 „ *lactearia*. Warren ; June.
Phorodesma bajularia. A few examples in Warren ; July.
Hemithea thymiaria. Common in Warren ; June and July.
Ephyra porata. Horndean Wood ; May.
 „ *punctaria*. Lady Wood ; May.
 „ *omicronaria*. In Woods amongst Maple ; May.
 „ *pendularia*. Horndean Wood ; May.
Asthena luteata. Warren, scarce amongst Maple ; June.
 „ *candidata*. Warren and Woods ; May and June.
Acidalia rubricata. Warren ; July. Beyond the old "Pelter."
 „ *scutulata*. Common in Warren ; June.
 „ *bisetata*. Abundant. Warren ; June and July.
 „ *rusticata*. A single example beyond Rakemere Pond ;
 July.
 „ *dilutaria*. Abundant along lower Sandgate Road ;
 June and July.

- Acidalia incanaria*. Common everywhere.
- „ *ornata*. Common amongst Marjoram, in Warren ; May and August.
- „ *promutata*. Not scarce; lower Sandgate road. Flying and at light.
- „ *immutata*. A few examples in Warren ; June.
- „ *remutata*. Common, Warren and Woods ; June.
- „ *strigilata*. Warren, not very scarce ; July.
- „ *imitaria*. Warren, not scarce ; July.
- „ *aversata*. Common, Warren, &c. ; June and July.
- „ *inornata*. Warren, not common ; July.
- „ *emarginata*. Warren ; June.
- Timandra amataria*. Warren ; June.
- Cabera pusaria*. Warren and Woods.
- „ *exanthemaria*. Warren, in moist places ; June.
- Corycia temerata*. Woods in neighbourhood ; May and June.
- Macaria notata*. Horndean Wood ; June.
- Halia wavaria*. Common in town gardens.
- Strenia clathrata*. Lucerne fields in neighbourhood ; common in beginning of June.
- Panagra petraria*. East hills ; May and June.
- Aplasta ononaria*. Three specimens amongst *Ononis*, in Warren ; July and August.
- Fidonia atomaria*. East Downs ; June.
- Aspilates strigilaria*. East Downs ; June.
- „ *citraria*. Warren, rather scarce ; May and August.
- „ *gilvaria*. Abundant in Warren, amongst coarse grass ; July and August.
- Sterrha sacraria*. Specimens recorded in 1865.
- Abraxas grossulariata*. Abundant both in town and country ; in latter case it feeds on Sloe.
- „ *ulmata*. In Warren ; June.
- Ligdia adustata*. Warren ; June.
- Lomaspilis marginata*. Warren and Woods ; May.
- Larentia didymata*. Warren ; July.
- „ *pectinitaria*. Common in Warren ; June.
- Emmelesia affinitata*. Lady-wood ; June.
- „ *albutata*. Warren, amongst *Rhinanthus crista-galli* ; June.
- Eupithecia venosata*. Larvæ in capsules of *Silene inflata* Warren ; July.

- Eupithecia centaureata*. Common in gardens and at light; July.
- „ *succenturiata*. Warren, not common; July.
- „ *subfulvata*. Warren, not common; July.
- „ *subumbrata*. Not common, Warren; June.
- „ *plumbeolata*. Warren; June.
- „ *isogrammata*. Abundant amongst *Clematis*, Warren, &c.; June and July.
- „ *castigata*. Warren; May.
- „ *pimpinellata (denotata)*. Warren, scarce; in Spring.
- „ *campanulata*. Warren. The larva feeds in Canterbury Bell.
- „ *subnotata*. Gardens and waste places; July.
- „ *vulgata*. Common; “all about.”
- „ *expallidata*. Warren, single example; July.
- „ *absynthiata*. Common. Larva on flowers of various plants; August and September.
- „ *subciliata*. Saltwood and Sandling, amongst lichen-covered maples; July.
- „ *exiguata*. Warren; June.
- „ *pumilata*. Warren and East Hills; May and August.
- „ *rectangulata*. Warren; June and July.
- „ *coronata*. Warren, amongst *Clematis*; August. The species is double-brooded.
- Ypsipetes impluviata*. Warren; May.
- „ *elutata*. Warren; July. Many beautiful varieties have occurred near the Rakemere Pond.
- Melanthia ocellata*. Warren and Woods; common in June.
- Melanippe procellata*. Warren; June and July. Abundant amongst *Clematis*.
- „ *subtristrata*. Warren; June. Not so common as the following.
- „ *rivata*. Warren. Common; July.
- „ *montanata*. Warren. Common; August, also in May.
- „ *galiata*. Common in Warren in June.
- „ *fluctuata*. Common in the town.
- Anticlea derivata*. At Sallow bloom.
- Coremia propugnata*. Warren; beginning of June.
- „ *ferrugata*. Warren; beginning of June.
- „ *unidentaria*. Warren; beginning of June. A species distinct from the foregoing.

- Camptogramma bilineata*. Common everywhere.
 „ *fluviata*. Warren; one specimen in July.
Phibalapteryx tersata. Common amongst *Clematis*; June and July.
 „ *lignata*. “A lot” were taken at Dover two years ago.
 „ *vitalbata*. Not uncommon amongst *Clematis*; in June.
Scotosia certata. East Downs, not scarce; May.
 „ *undulata*. Lady-wood; June.
Cidaria corylata. Warren, common; June.
 „ *immanata*. Warren; July.
 „ *achatinata*. Warren; July, in moist places.
 „ *fulvata*. Common in Warren; July.
 „ *pyraliata*. Warren, not scarce; July.
Pelurga comitata. Waste places, not scarce; July.
Eubolia cervinata. Lower Sandgate road; larvæ abundant on Mallows in June.
 „ *mensuraria*. Abundant everywhere; August.
 „ *palumbaria*. East Downs; June.
 „ *bipunctaria*. Too abundant everywhere.
 „ *lineolata*. Warren; July.
Anaëtis plagiata. Warren; June—August.

DREPANULÆ.

- Platypterix hamula*. Raindean Wood; May.
 „ *falcula*. At light.
Cilix spinula. Raindean Wood and Lady Wood; May and August.

PSEUDO-BOMBYCES.

- Dicranura bifida*. Bred from larvæ in plantations, Lower Sandgate road.
 „ *vinula*. Larvæ common in Warren and Lower Sandgate road; July and August.
Pygæra bucephala. Larvæ abundant in Lower Sandgate road. Moth also common.
Clostera anachoreta. Larvæ between leaves of Ontario Poplar, Lower Sandgate road; June.
Notodonta palpina. At light; June.
 „ *ziczac*. Larvæ, Lower Sandgate road; June.
Diloba cæruleocephala. At light.

NOCTUÆ.

- Thyatira batis*. Warren, at sugar ; June.
 „ *derasa*. Warren, at sugar ; July.
Bryophila perla. Abundant on old walls and palings ; July.
 „ *glandifera*, On old walls ; August. Two examples have occurred.
Acronycta megacephala. Larvæ in Poplar, Lower Sandgate road.
 „ *auricoma*. In larval state the other side of Abbot's Cliff ; September (?)
Leucania conigera. Common at sugar and flowers ; June and July.
 „ *lithargyria*. Common at sugar ; July.
 „ *albipuncta*. Three examples at sugar ; August, 1868.
 „ *impura*. At sugar, common.
 „ *pallens*. At sugar, common.
Tapinostola Bondii. Near St. Mary's Church, settled after dusk ; end of June to end of July.
Hydreia nictitans. At sugar ; West side of Town.
 „ *micacea*. At sugar.
Axylia putris. At sugar, Warren.
Xylophasia rurea. At sugar.
 „ *lithoxylea*. At sugar.
 „ *sublustris*. Common at sugar, Warren ; June and July.
 „ *polyodon*. Too abundant everywhere, at sugar.
 „ *scolopacina*. One example at Saltwood, by beating ; July.
Aporophyla Australis. "English's Guide." Ought to be taken by sugaring herbage in September.
Neuria saponariæ. At gas lamps, not scarce ; June.
Pachetra sp. (?) Fence near Junction station.
Cerigo cytherea. At sugar, common ; July.
Luperina testacea. One at rest and at light ; August.
Mamestra abjecta. At sugar ; July. Scarce.
 „ *furva*. At flowers of *Echium*, in Warren ; July.
 „ *brassicæ*. Very common.
 „ *persicariæ*. Common ; June.
Apamea basilinea. Common at sugar ; June.
 „ *oculea*. Abundant at sugar ; July.

- Miana strigilis*. Abundant at sugar ; June.
 „ *fasciuncula*. At sugar ; June and July.
 „ *literosa*. At sugar, not uncommon ; June.
 „ *furuncula*. Abundant, settled on flowers of grass after dusk, and at sugar ; June and July.
 „ *arcuosa*. Lady Wood ; July.
Grammesia trilinea. At sugar ; end of May.
Caradrina morpheus. Waste places, at sugar ; June.
 „ *alsines*. At flowers of *Teucrium*, &c., Warren ; July.
 „ *blanda*. At flowers of *Marjoram*, *Teucrium*, *Echium*, &c. ; July.
 „ *cubicularis*. At flowers, &c. ; June to August.
Rusina tenebrosa. Warren, at sugar ; June.
Agrotis puta. At sugar ; August.
 „ *suffusa*. At sugar ; September.
 „ *saucia*. Has been taken occasionally at sugar in September
 „ *segetum*. Common at sugar ; June.
 „ *exclamationis*. Common at sugar ; June.
 „ *corticea*. Common at sugar ; July. Some fine dark varieties have occurred.
 „ *cinerea*. Warren. Scarce ; June.
 „ *nigricans*. At sugar ; June.
 „ *lucernea*. At flowers of *Teucrium*, &c. ; July.
Triphæna ianthina. At sugar and flying at dusk ; July and August.
 „ *interjecta*. Flying wildly before dusk, common in Warren ; August.
 „ *orbona*. Common at sugar ; July.
 „ *pronuba*. Abundant at sugar.
Noctua plecta. At sugar ; June.
 „ *C. nigrum*. At sugar ; July.
 „ *brunnea*.
 „ *baja*. Common ; July.
 „ *xanthographa*. Abundant ; August.
Tæniocampa gothica At Sallow bloom.
 „ *rubricosa*. At Sallow bloom.
 „ *instabilis*. At Sallow bloom.
 „ *stabilis*. At Sallow bloom.
 „ *gracilis*. At Sallow bloom.
 „ *munda*. At Sallow bloom.

- Tæniocampa cruda.* At Sallow bloom.
Orthosia lota. At sugar, Warren ; September.
Anchocelis pistacina. At ivy bloom and sugar.
Cerastis spadicea. Common at ivy bloom.
Scopelosoma satellitia. At sugar ; Autumn.
Xanthia cerago. At Sallow bloom.
Eremobia ochroleuca. On heads of *Centaurea* by day ; July.
Dianthæcia carpophaga.
 ,, *capsincola.* Warren, at flowers ; June, and in larval state.
 ,, *cucubali.* Larvæ common in capsules of *Silene inflata* ; July and August.
Hecatera dysodea. Flying at dusk, larva feeds on *Sonchus*.
 ,, *serena.* On palings in neighbourhood ; June.
Miselia oxyacanthæ. At sugar and ivy bloom.
Phlogophora meticulosa. Common everywhere.
Euplexia lucipara. At sugar, common.
Aplecta nebulosa. At sugar.
Hadena dentina. At sugar ; June and July.
 ,, *chenopodii.* Flying at dusk and at sugar ; June.
 ,, *oleracea.* Larvæ on Rest Harrow.
 ,, *genistæ.* At sugar, scarce ; beginning of June.
Xylocampa lithorhiza. May.
Calocampa exoleta. A larva taken.
Cucullia verbasci. Larvæ common on *Mullein* and *Water Betony*, in the Warren.
 ,, *asteris.* One specimen flying in sunshine, Warren ; June.
 ,, *umbratica.* At rest on herb stems, Warren ; June.
Heliothis marginata. Flying at dusk over Rest Harrow, at sugar, &c. ; June.
 ,, *peltigera* has been taken in Warren, but is scarce.
 ,, *armigera.* A worn specimen (hybernated) flying in June. It should be looked for in Autumn.
 ,, *dipsacea.* In Warren, not common ; July.
Agrophila sulphuralis. Enclosure beyond turnpike ; June.
Acontia luctuosa. Clover fields ; June and August. Not scarce.
Erastria fuscula. One specimen in Warren ; June.
Plusia orichalcea. "English's Guide." Its food plant, the Hemp Agrimony, is common enough. The insect should be sought for at flowers in August.

Plusia chrysitis. A few specimens in Warren ; August.

„ *gamma*. Too abundant.

Gonoptera libratrix. At ivy and sugar.

Amphipyra tragopogonis. At sugar ; July.

Mania Maura. At sugar, in out-houses, &c. ; August.

„ *typica*. Larvæ on nettles ; Autumn and spring.

Toxocampa pastinum. Warren ; June. Scarce.

Catocala nupta. At sugar ; July and August.

Euclidia mi. In Warren, common ; June.

„ *glyphica*. Warren, common ; June and July.

Phytometra ænea. Warren, common ; June.

DELTOIDES.

Hypæna proboscidalis. Too abundant in the Warren in the summer months.

„ *rostralis*. At sugar ; September.

Hypenodes costæstrigalis. One in the Warren.

Rivula sericealis. Common in the Warren ; July.

Herminea barbalis. In the Warren ; June.

„ *grisialis*. In Warren, common.

PYRALIDES.

Odontia dentalis. Warren, not scarce ; July and August.

Pupæ in dead leaves of *Echium* ; June and July.

Pyralis fimbrialis. Out-houses in July and August.

„ *farinalis*. Out-houses, not uncommon.

„ *glaucinalis*. At sugar a few specimens.

Cledeobia angustalis. Lower Sandgate road ; July.

Pyrausta punicealis. Warren, common, flying in sunshine ; summer months.

„ *purpuralis*. Warren, frequents Wild Thyme ; May and August.

„ *ostrinalis*. Warren, common ; July.

Herbula cespitalis. Common ; east and west of town.

Ennychia cingulalis. Near Sandgate. Scarce.

„ *anguinalis*. Warren, common over Thyme ; June.

Endotrichia flammealis. Warren, near Rakemere Pond. Scarce ; August.

Cataclysta lemnalis. Ponds in neighbourhood ; June.

Hydrocampa nympheata. Long Pond, common ; July.

„ *stagnalis*. Long Pond, not common ; July.

- Botys pandalis*. Warren ; June.
 „ *flavalis*. Warren, scarce ; July.
 „ *hyalinialis*. Warren, scarce ; July.
 „ *verticalis*. Warren, much too abundant.
 „ *lancealis*. Warren, not scarce ; July and August.
 „ *fuscalis*. Warren, scarce ; June.
 „ *urticalis*. Warren, common ; July.
Ebulea crocealis. Warren, rather common amongst *Inula* ;
 July.
 „ *verbascalis*. Warren, common ; June.
 „ *sambucalis*. Warren, very common ; June.
Pioneer forficilis. Warren and in gardens, common.
 „ *margaritalis*. Enclosure beyond turnpike one example ;
 June end.
Spilodes sticticalis. Not uncommon in certain seasons beyond
 the old “Pelter Brig;” July and August. Also
 occurs on Lower Sandgate road.
 „ *palealis*. Not uncommon ten or twelve years ago in
 the Warren, seems to have disappeared of late ;
 temp. July and August.
 „ *cinctalis*. A few in Warren ; July.
Scopula olivalis. Warren, common ; June and July.
 „ *prunalis*. Warren, common.
 „ *ferrugalis*. Warren, common ; August and Sep-
 tember.
Lemiodus pulveralis. Three specimens in Warren ; August.
Stenopteryx hybridalis. Warren and elsewhere. At times
 considerably too common.
Scoparia ambigualis. Warren ; June.
 „ *cembrae*. Warren ; June.
 „ *ingratella*. Abundant in Warren ; July.
 „ *lineola*. One specimen Lower Sandgate Road ; July.
 „ *mercurella*. Common.
 „ *cratægella*. Lower Sandgate Road ; July.
 „ *augustea*. Several taken in an out-house by Mr.
 Vaughan.

Additions or corrections to this list will be gladly received by H. Ulyett,
 Hon. Sec. Folkestone.