

Macro-moths 2012

Melissa & Andy Banthorpe

Introduction

As can be seen from the Meteorology report, March was warmer than usual and very dry but April was then cold and wet. This was followed by a cool, wet May and a generally cool, wet summer. Many recorders reported that it was the poorest year for moths that they had ever experienced – a pattern repeated over most of the UK. At least three field trips had to be cancelled due to poor weather, which either made light-trapping impossible or access to sites very difficult. On a moth group meeting at Chicksands Wood on 29th September, the moths were outnumbered by moth-ers, with only three individuals of one species, Common Marbled Carpet *Chloroclysta truncata*, deigning to land on the sheet with nothing in the traps.

The inclement weather during the year was rather annoying as we were hoping to see what effect the odd weather patterns of 2011 would have on the phenology of moths in 2012 – we shall now have to wait until the end of 2013 to see what the cumulative effect is.

During the year we ran lights in the field at the following places – Chicksands Wood, Flitton Moor, King's Wood Heath & Reach, The Lodge (RSPB Sandy), Marston Thrift, Marston Vale Country Park (MVCP) and Upper Alders.

We are assisted in recording by a network of people regularly running light traps in their gardens. These are at Ampthill, Bedford (two sites), Beeston, Biggleswade (three sites), Bromham (two sites), Carlton, Clifton, Clophill, Dunstable, Eaton Ford, Heath & Reach, Kempston, Leighton Buzzard, Liddington, Lower Stondon, Luton (two sites), Markyate, Potton (three sites), Renhold, Sandy, Stotfold, Studham, Toddington, Turvey, Upper Caldecote, Upper Stondon, Wilden (two sites) and Wrestlingworth. Some individuals also run portable traps in good habitat in their own locality, which adds to the coverage. In addition, with the kind assistance of Chris Shorthall and Ian Woiwod we have access to the records from the Rothamsted Insect Survey (RIS) traps in the county. These are situated at Cockayne Hatley and Eaton Bray.

There were no new county records this year, the first blank year since 1994.

The recording boundary for moths in Bedfordshire is that of the Watsonian Vice-county 30. For more details of this see the article in the 2009 Journal (Banthorpe 2010).

Review

The following list includes species of interest recorded in VC30 during 2012 but it should be noted that we are keen to receive records for all species including those regarded as very common, as without these records the dataset is incomplete and we will not be able to track future changes in abundance and distribution.

A list of the macro-moths of VC30 with their current status is on the Beds Moth Group website www.vc30moths.org.uk or available from the Recorders on request. This is amended at least once a year. In addition during early 2013 a table of expected first and last dates for species in the county was prepared and is available from the website or Recorders as above.

Hepialidae**15 Orange Swift** *Hepialus sylvina* (L.) and **17 Common Swift** *H. lupulinus* (L.)

While checking the date ranges of historic records it has become apparent that identification of the two species has become confused at times. Common Swift flies earliest, from early May to early July, with Orange Swift following on from early August to mid-September. Records of Common Swift before May and after 15th July, and Orange Swift before mid-July and after 20th September, need supporting evidence – at least a good photograph.

Zygaenidae**171 Narrow-bordered Five-spot Burnet** *Zygaena lonicerae* (L.)

For the second year running the yellow form *citrina* was found at the roundabout on Whipsnade Heath. A singleton was netted on 10th July and two individuals were photographed on 13th July, one very fresh and one worn. The worn individual was likely to be that recorded on 10th (DGi).

Sesiidae

It was a very poor year for clearwing records and only four species were recorded in 2012 as follows:

369a Raspberry Clearwing *Pennisetia hylaeiformis* (Lasp.)

Recorded at two previously known sites this year. At Biggleswade a female was found alive in a water butt and four males came to a pheromone lure on 1st Aug, with six also to lure on 7th Aug (RCR). At Studham a single male came to lure on 18th Aug (CRBB).

370 Hornet Moth *Sesia apiformis* (Clerck) [Nb]

One mated pair at Harold-Odell Country Park on 19th July (JM) were the only adults recorded in 2012. There was also only one record of exit holes, at Begwary, on a roadside Black Poplar hybrid on 8th May (AMB).

379 Red-belted Clearwing *Synanthedon myopaeformis* (Borkh.) [Nb]

There were two records this year – one to lure at The Lodge (RSPB Sandy) on 28th June (RIB) and one found resting on Lemon Balm in a garden in Biggleswade on 4th Aug (LB).

382 Six-belted Clearwing *Bembecia ichneumoniformis* ([D. & S.]) [Nb]

Both records in 2012 came from sweeping adults from the foodplant at chalk-based sites – four at Houghton Regis ChP on 10th July (AMB & MGB) and one at Totternhoe Old Quarry on 22nd July (AMB).

Lasiocampidae**1633 Small Eggar** *Eriogaster lanestris* (L.) [Nb]

An adult was trapped at Bromham on 30th Apr (MaH & MiH) and a web was seen at Yelnow New Wood on 2nd June (HAS). This is the first time an adult has been recorded since 1998, when one was trapped at Oakley on 28th Mar by A.J.G.David. There is only one other record of an adult in the database, which is mentioned in the Victoria County History (1904).

Saturniidae**1643 Emperor Moth** *Saturnia pavonia* (L.)

Both records involved singletons this year – a male was attracted to a captive bred female at Shefford on 23rd March (AMH), and a female was trapped at Bromham on 23rd April (MaH & MiH).

Drepanidae**1645 Scalloped Hook-tip** *Falcaria lacertinaria* (L.)

This species is not particularly common in the county but there were only three records this year compared to 13 in 2011 and 12 in 2010. The records for 2012 are as follows: two at King's Wood Heath & Reach 26th May (AMB & MGB), one at The Lodge (RSPB Sandy) 23rd July (JW) and one at Clophill 18th Aug (RC).

Thyatiridae**1657 Common Lutestring** *Ochropacha duplaris* (L.)

This is an uncommon moth in the county and only two were recorded in 2012. These were trapped at Flitton Moor on 25th July (AMB & MGB).

1660 Frosted Green *Polyploca ridens* (Fabr.)

There was just one record in 2012 of a singleton to light at Marston Thrift on 1st May (AMB & MGB). For comparison there were six records in both 2011 and 2010.

Geometridae**1661 Orange Underwing** *Archiearis parthenias* (L.)

There were three records this year: The Lodge (RSPB Sandy) on 21st Mar (1) (WG); and Potton Wood on 26th Mar (10) (SE) and 28th Mar (2 males) (AMB). Those in Potton Wood are the first to be confirmed at this site since 1997 and occurred during a period of very warm weather when many *Archiearis parthenias/notha* were coming down to muddy areas along the main ride. This meant that it was relatively easy to net them to confirm identification.

1662 Light Orange Underwing *Archiearis notha* (Hb.) [Nb]

There were two records this year both from Potton Wood: 26th Mar (2) (SE) and 28th Mar (21) (AMB). It is easier to confirm this species as males have feathered antennae, a feature not present in the females or either sex of *A. parthenias*.

1662x Orange/Light Orange Underwing *Archiearis* sp.

If the critical identification features cannot be seen to separate the two species, records will be assigned to the aggregate group. Undetermined species were seen at Chicksands Wood; White Lane, Odell; Potton Wood and The Lodge (RSPB Sandy).

1716 Vestal *Rhodometra sacraria* (L.) [Migrant]

One came to light at Biggleswade on 18th Aug (LB) and was seen by the Recorders.

1720 Gem *Orthonama obstipata* (Fabr.) [Migrant]

The only record of this migrant in 2012 was a single female, which turned up in the Cockayne Hatley RIS trap on 23rd Oct (IPW, det MGB).

1731 Chalk Carpet *Scotopteryx bipunctaria* (Prout) [Nb]

Encouragingly there were nine records of this chalk specialist in the year, from both daytime recording and light-trapping. The daytime records were as follows – Houghton Regis ChP 10th July (8) (AMB & MGB); Upper Sundon Chalk Quarry 19th July (1) and 23rd July (2) (LC); and Totternhoe Old Quarry 22nd July (6) (AMB). Light-trap records were as follows – Heath & Reach 23rd July and 3rd Aug (2) (MH); Markyate 23rd (2) and 24th July (DGi); and Upper Caldecote 19th Aug (KBU, LARB & MB). The records at Heath & Reach continue a run from

2010 onwards so the moths must be resident close-by. The Upper Caldecote record is a long way from any chalk exposures, and similarly to the Heath & Reach records may be associated with successional habitat recovery after sand/gravel extraction.

1749 Dark Spinach *Pelurga comitata* (L.)

Amazingly there were six records of this scarce species in 2012, the first multiple records since two in 2006. There had previously only been seven records post 2000 as follows – 2003, 2006 (2), 2007, 2008, 2009 and 2011. The 2012 records are – Biggleswade 22nd July (SCB); Bromham 8th Aug (MaH & MiH); Lower Stondon 11th Aug (AMB & MGB); and Bromham (PA), Leighton Buzzard (AW), and Studham (CRBB) all on 18th Aug.

1820 Pinion-spotted Pug *Eupithecia insigniata* (Hb.) [Nb]

This is a smart pug, and it was great to have a record of this rare species in the county in 2012 with one coming to light at Biggleswade on 8th May (PM). It was the 12th county record and the first seen since 2006, when one was trapped at Turvey Abbey.

1826 Triple-spotted Pug *Eupithecia trisignaria* H.-S.

A female came to MV light in Chicksands Wood on 24th Aug (AMB & MGB, gendet AMB). It was first caught at this site in 2010.

1841 Yarrow Pug *Eupithecia millefoliata* Rössler [Nb]

A male to light at Upper Caldecote on 10th Aug was the first adult recorded in the 10km square TL14 and the 12th county record (KBU, LARB & MB, gendet AMB).

1912 August Thorn *Ennomos quercinaria* (Hufn.)

Again there was only one record this year, from a Luton garden on 25th July (AG), the same site as 2011's sole record.

Sphingidae

1972 Convolvulus Hawk-moth *Agrius convolvuli* (L.) [Migrant]

One was found and photographed at Grange Nursing Home at Luton on 18th Sept (MDW, via ADW). The species had not been recorded since one turned up in Sandy in 2009.

1979 Lime Hawk-moth *Mimas tiliae* (L.)

The earliest ever record of an adult of this species in the county was of one found on floodlit astroturf at Sandy Upper School this year, during a RSPB five-a-side football match on 19th Mar (WG). The next adult record in the year being at Bromham on 21st May (MaH & MiH).

1980 Eyed Hawk-moth *Smerinthus ocellata* (L.)

In England this species is usually univoltine, and its normal flight period in the county is from mid-May to mid-July. It was therefore surprising to have one come to light at Biggleswade on 14th Oct (LB, photo seen by AMB & MGB). It is a very late record and the previous latest date recorded in the county to this is 5th Aug in 2006. The next latest record in 2012 was 17th July.

1984 Humming-bird Hawk-moth *Macroglossum stellatarum* (L.) [Migrant]

There were 11 records this year compared to 50+ in 2011. The first record of 2012 was at Blunham on 28th June (JTRS) and the last was at Radwell on 24th Oct (JP). As far as the Recorders are aware all sightings were of singletons.

1991 Elephant Hawk-moth *Deilephila elpenor* (L.)

Of note, around 200 larvae were found feeding on *Fuchsia* plants in a garden in Upper Stondon in Aug this year (JS & PS).

Notodontidae

1995 Puss Moth *Cerura vinula* (L.)

A mated pair found in a garden in Kempston on 28th May during the day (MMi) was the only record this year, compared to 17 records in 2011.

Arctiidae

2057 Garden Tiger *Arctia caja* (L.)

A sighting of two in a Bidwell garden on 23rd July (DG) during the day was the only record this year.

2067 Jersey Tiger *Euplagia quadripunctaria* (Poda) [Nb]

One seen flying in a Kempston garden on 22nd Aug (MJP) was only the third county record of this species.

2068 Scarlet Tiger *Callimorpha dominula* (L.)

A singleton was trapped at Leighton Buzzard on 4th July (AW) and one was reported flying during the day at Aspley Heath on 21st July (JGr).

Noctuidae

2091 Dark Sword-grass *Agrotis ipsilon* (Hufn.) [Migrant]

There were just two records this year – Cockayne Hatley RIS trap 13th Nov (IPW) and Turvey Abbey 18th July (BrJM). In comparison, in 2011 there were 11 records, in 2010 16 records and in 2009 14 records.

2105 Dotted Rustic *Rhyacia simulans* (Hufn.)

This moth has cyclical swings between high and low population numbers. Recently it has been in a low but the occurrence of six records in 2012 gives hope that it may be on the rise again. Until the summer of 2012, it was thought that the only records from 2000 onwards were from Eaton Ford and Cockayne Hatley in 2000, Bison Hill in 2005 and Turvey Abbey in 2006. However, checking of photographs meant that one record from Leighton Buzzard on 12th July 2010 (AW) can now be added to the list.

This is a moth that, in southern Britain, emerges in late June to July, aestivates, and then reappears in late August to September. It may be that the cold, damp summer of 2012 encouraged more flight in July – records, or lack of them, from subsequent years may confirm this.

The 2012 records to light-traps were as follows – Lower Stondon 9th July (AMB & MGB), Leighton Buzzard 10th July (AW), Luton 15th July (AG), Biggleswade 25th July (SCB) and Biggleswade 30th July (LB). In addition, wings from two individuals were found amongst detritus collected from under a Brown Long-eared Bat roost at Maulden on 14th Sept (SR, det MGB). This is usually collected once a year in the autumn so the exact date of the records is unknown.

2142 Beautiful Yellow Underwing *Anarta myrtilli* (L.)

A singleton to a garden light-trap in Heath & Reach on 25th May (MH) was a pleasant surprise, and confirmation that the species is still present in the area, as it was last found nearby at Shireoak in 1979. This heathland site has suffered from tree incursion over the intervening years but recent

management, including felling, is opening up the ground flora to light once more. Of interest two larvae were found on Rammamere Heath in 2011, which is near Shireoak and Heath & Reach but just over the border in VC24 (Buckinghamshire) (M.Albertini pers comm.).

In addition to the adult record, two larvae were found during a Beds Invertebrate Group field meeting to the old heath at The Lodge (RSPB Sandy) on 11th Sept (RE).

An unverified old record from The Lodge (RSPB Sandy) has come to our attention recently, and regards an adult noted on the old heath on 24th July 2003 (NR). This pre-dates confirmed records from 2010 and 2011.

2171 Marbled Coronet *Hadena confusa* (Hufn.)

One trapped at Wrestlingworth Gravel Pit NR on 25th June (IPW) was the only record this year.

2183 Blossom Underwing *Orthosia miniosa* ([D. & S.])

The third county record of this species was trapped at Bromham on 23rd Mar (MaH & MiH).

2190 Hebrew Character *Orthosia gothica* (L.)

Amongst the 275+ records received of this species one was of an aberrant form, which was identified by Martin Honey (from the Natural History Museum, London) as ab. *circumscripta* Hasebroek, 1915. The individual was trapped at Biggleswade on 22 Mar (SCB).

2194 White-point *Mythimna albipuncta* ([D. & S.]) [Migrant]

There were only nine records in the database until two singletons turned up at light-traps in 2012, at Upper Caldecote on 9th June (MB) and Bromham on 19th June (MaH & MiH), which were the first since 2010.

2211 Wormwood *Cucullia absinthii* (L.) [Nb]

Singletons were recorded at Bedford on 17th July (DR) and Upper Caldecote on 24th July (MB).

2214 Chamomile Shark *Cucullia chamomillae* ([D. & S.])

There were two recorded this year – Biggleswade 8th May (LB) and Potton 9th May (WG) – and are the first since one was recorded in 2010.

2223 Toadflax Brocade *Calophasia lunula* (Hufn.) [RDB]

There were eight records of adults this year but more importantly a single larva was found in a Luton garden on 1st Oct (HJG & JG). This is the first larval record of the species for the county.

2260 Dotted Chestnut *Conistra rubiginea* ([D. & S.])

Four singletons were recorded during the year at: Clifton 21st Mar (ARO); Upper Caldecote 22nd Mar (MB); Cockayne Hatley RIS trap 28th Mar (IPW); and Home Wood, Northill 28th Mar (LB & MB). These are the 9th to 12th county records, the first having been recorded in 2007.

2317 White-spotted Pinion *Cosmia diffinis* (L.) [RDB]

Singletons appeared at the same two sites as last year – Biggleswade 8th Aug (LB) and Upper Caldecote 14th Aug (KBU & MB).

2349 Mere Wainscot *Chortodes fluxa* (Hb.) [Nb]

From work done on the county database it is apparent that there is some confusion in the identification of this and the following species (*C.pygmina*). Mere Wainscot is the earlier species, flying from early July to the second week of August, whereas Small Wainscot flies from early August to the third week of September. As can be seen there is some overlap in the flight dates, and it is probable that in the past

some records of Mere Wainscot were mis-identified as Small Wainscot. It should be noted that Mere Wainscot has whitish or light grey hind-wings whereas Small Wainscot's are darker grey. Potential confusion with the very rare (in Beds) Concolorous *C.extrema* (Hb.) should be considered.

2350 Small Wainscot *Chortodes pygmina* (Haw.)

See the discussion of potential identification confusion under the previous species. In 2012 there were, surprisingly, only two records – Great Hayes Wood, Podington on 9th Aug (HAS) and Halsey Wood, Sharnbrook on 8th Sept (HAS).

2375 Large Wainscot *Rhizedra lutosa* (Hb.)

There were two records this year – one at Bromham on 22nd Oct (PA) and one at Clifton on 23rd Oct (ARO).

It has come to light since the 2011 report was published, that the earliest date (28th July 2011) and the next earliest date (1st Aug 2008) for Large Wainscot were incorrect, due to mis-identification; the species having been confused with Bulrush Wainscot. The earliest date recorded for an adult Large Wainscot is now 31st Aug.

2385 Small Mottled Willow *Spodoptera exigua* (Hb.) [Migrant]

One was trapped at Upper Caldecote on 9th Aug (MB); the second-year running this species has been caught there.

2400 Scarce Bordered Straw *Helicoverpa armigera* (Hb.) [Migrant]

A larva found on shop-bought carnations in Luton on 7th Feb (DM & MM, det MGB) was the first larval record for the county and the only record of the species this year.

2410 Marbled White Spot *Protodeltote pygarga* (Hufn.)

A singleton to light at Upper Alders on 29th June (AMB & MGB) was the only record for 2012.

2423 Oak Nycteoline *Nycteola revayana* (Scop.)

There was only one record of a singleton, which was trapped this year at Turvey Abbey on 14th July (BrJM), compared to 12 records in 2011.

2437 Golden Plusia *Polychrysis moneta* (Fabr.)

In recent years this species has only been recorded from one place – a garden in Dunstable – however, none were recorded there this year but singletons appeared at two other sites: Bromham 15th July (MaH & MiH) and Markyate 8th Aug (DGi).

2441 Silver Y *Autographa gamma* (L.) [Migrant]

The first recorded Silver Y of the year was one at Bromham on 8th Jan (MaH & MiH) and the last was one on 26th Nov at Biggleswade (LB). The maximum count was 12 at Potton Wood on 3rd Sept (IPW). Of note, 41 individuals were accounted for in moth-wing fragments collected from underneath a bat roost at Maulden on 14th Sept (SR, det MGB).

2442 Beautiful Golden Y *Autographa pulchrina* (Haw.)

The number of records of this moth in recent years has shown quite a degree of fluctuation. There were only two records this year – Studham 25th June (CRBB) and Potton 18th July (WG) – compared to seven in 2011, eight in 2010, 20 in 2009, and back to three in 2008 and two in 2007.

[2465 Four-spotted *Tyta luctuosa* ([D. & S.]) [Na]

Yet again, there were no records of this species this year.]

2470 Small Purple-barred *Phytometra viridaria* (Cl.)

It is likely this species is over-looked in the county as it is rather inconspicuous. It is a day-flier, and late May to mid-June is the time to look out for it. A singleton on Sharpenhoe Clappers on 30th May (HJG) was the first record since 2009.

2480 Buttoned Snout *Hypena rostralis* (L.) [Nb]

Of note, two were found hibernating during checks for bats at Bromham Ice-house on 14th Jan, which represents the first record of hibernating adults in the county. A further five were subsequently found hibernating in the same place on 8th Dec (Beds Bat Group).

Migrant records are forwarded to the appropriate editor for inclusion in the Immigration of Lepidoptera to the British Isles Report for the *Entomologists Record and Journal of Variation*.

All records are held by the Bedfordshire and Luton Biodiversity Recording and Monitoring Centre and updated regularly. In addition the dataset is forwarded to the National Moth Recording Scheme when requested.

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Melissa and Andy Banthorpe are the Society's joint Recorders for Macro-moths, a position they have held in an honorary capacity since late 2006.