



Incorporating Moth Records from Old Lists

Historical species lists for an area or county are a valuable resource. They help to document the changes in the range, distribution and abundance of our moths. Species they describe as commonplace may now be scarce or even lost. Conversely, species we now take for granted may receive no mention or be considered rarities. Such information can be fascinating. It also gives us a better perspective when assessing modern trends.

However, working with old lists brings particular difficulties. If the observers are long dead, we cannot query records with them or ask for further information. Unless properly labelled and correctly determined specimens still exist in collections, identification must be taken on trust. Other potential uncertainties affect dates, numbers and locality. Whilst there may be no easy solutions, at least it helps to be aware of the problems. This article attempts to describe the various pitfalls and suggest ways of avoiding them.

Correct identification of species

Even today, misidentifications are all too frequent despite the wealth of modern field guides and helpful internet sites. We all make the occasional mistake! How much harder it must have been when the literature was far less extensive or easily available than it is today. Our knowledge of diagnostic features and of distributions has also improved. In the circumstances, the old observers did remarkably well. Even their apparent errors may simply reflect changes to the taxonomic status or the scientific names of species since their list was compiled.

Taxonomic changes

Over the years, moths formerly regarded as a single species have been split into two or more. Examples include the black and white minors *Oligia* and the ear moths *Amphipoea*. Usually it is impossible to tell which species is referred to in any work produced before the split was made or became widely recognised in Britain. Various taxonomic changes are listed in Appendix 1.

Scientific name changes

South stabilised the English names of British moths in his 1907-09 *Moths of the British Isles*. Scientific names are a different matter. More often than not, the generic and/or the specific name has changed since Victorian times, sometimes more than once. Interpreting the names used in old lists may require a fair bit of detective work. Who, offhand, would know that *Mamestra genistae* was a former name of Light Brocade, now *Lacanobia w-album*?

At least an unfamiliar or outdated scientific name stands out, so with a bit of research the identity of the species concerned can usually be resolved. A far more dangerous pitfall lurks where familiar current names have been switched between species. For example, *Spilosoma lubricipeda* once referred to the Buff Ermine, not the White Ermine as now. Unless the English name is given too, or we know the history of the names concerned, we may not realise what has happened. Appendix 2 lists various similar instances.

Locality

Needless to say, we should not expect to find six-figure grid references in old lists. Indeed, the localities given are often vague or even misleading. Sometimes this was done deliberately, to prevent rival collectors or dealers from knowing the correct location in an age when rare specimens had a commercial value.

In other cases, the named locality did duty for a wide surrounding area, for example Aviemore and Rannoch in Scotland, or the New Forest in England. It may even be impossible to allot the record to a particular vice-county. If a more precise location is listed, we may be able to determine the 10km square with varying degrees of certainty. However, there may be instances where an old record is interesting and important enough to merit inclusion in the NMRS database even if its details are imprecise. According to Victorian lists, Burnet Companion once extended as far north as Perthshire and Aberdeenshire, but as its distribution map in *MBGBI* vol. 10 shows, no exact localities can be plotted. One solution in such cases might be to select a 'nominal' 10km square, provided it was made clear in the 'comments' column that this had been done.

It should also be borne in mind that eggs and caterpillars of desirable species were frequently sold or exchanged. Regrettably, some collectors labelled the progeny with the locality where they were reared, not that from where the parent moth originated (if it was even known). Such confusion has affected Kentish Glory, for example (*MBGBI* vol.7.2).

Date

Lists summarising records for a site, area or county rarely give precise dates, especially for the commoner species. Instead, lists often cover a range of years, with the exact time-span not stated. If a record is of particular interest, it may be reasonable to select a nominal year from the period covered, or use the date of publication of the list. Again, make it clear in the 'comments' column what you have done.

Obviously there are times when this solution is less than satisfactory. In Buchanan White's list for Perthshire published in 1871, he gives two localities for the Frosted Yellow but implies it had not been seen for many years. Yet such valuable records deserve inclusion in any national database.

Provenance

This can be tricky. Besides all the potential areas of confusion already mentioned, we must attempt to weigh up the reliability of the observers concerned. Of course, this still applies today, but with old lists there is an extra dimension caused by etiquette. In Victorian or Edwardian times it would have been difficult for a recorder to query or reject records from an observer of equal or higher social standing. Fortunately, there were ways of expressing doubt in the most polite and subtle terms. For those with experience of old lists, extravagant flattery such as "my indefatigable and highly meritorious friend" or "the following species are included on the good authority and unquestionable reputation of" only serves to cast suspicion on the (often unlikely) records that follow.

Perhaps the best way to get a 'feel' of any list is to note, not just the species it includes, but those that are missing. This applies to modern lists too. Almost any sizeable list will contain a few unexpected species. However, warning bells should ring when the presence of unlikely species is coupled with the absence of much commoner ones that could easily be mistaken for them.

Appendix 1. Taxonomic splits

Species	<i>date separated (approx.)</i>
Lead Belle & July Belle	late 1930s
November, Pale November & Autumnal Moth	early 20 th century
Tawny Speckled Pug & Bordered Pug	considered conspecific in 19 th century
Treble-bar & Lesser Treble-bar	1923, but confusion until 1960s
Deep-brown Dart & N. Deep-brown Dart	ca. 1955, but split is still debated
Copper & Svensson's Copper Underwing	1967
Marbled, Rufous and Tawny Minor	three species known by 1932
Common & Lesser Common Rustic	1980s
Saltern, Large, Crinan & Common Ear	ca. 1910
Gold Spot & Lempke's Gold Spot	1966

In many cases, it took some time for the split to be widely recognised and accepted in Britain. Also, observers continued to rely on outdated identification guides such as South (1907-09) that did not include the newly separated species.

Appendix 2. Confusing scientific name switches

<i>Specific name</i>	<i>present species</i>	<i>previous species</i>
<i>abietaria</i>	Cloaked Pug	Satin Beauty
<i>albipunctata</i>	Birch Mocha	White-spotted Pug
<i>alternata</i>	Common Carpet	Sharp-angled Peacock
<i>bicolorata</i>	Broad-barred White	Blue-bordered Carpet
<i>bombycina</i>	Pale Shining Brown	Glaucous Shears
<i>chrysorrhea</i>	Brown-tail	Yellow-tail
<i>ferrugata</i>	Dark-barred Twin-spot C.	Red Twin-spot Carpet
<i>hepatica</i>	Pale Pinion	Silvery Arches, Clouded Brindle
<i>janthina</i>	Langmaid's Yellow Und.	Lesser Broad-bd. Yellow Und.
<i>lubricipeda</i>	White Ermine	Buff Ermine
<i>luridata</i>	July Belle	Brindled White-spot
<i>marginata</i>	Clouded Border	Bordered Sallow
<i>orbona</i>	Lunar Yellow Underwing	Lesser Yellow Underwing
<i>pendularia</i>	Dingy Mocha	Birch Mocha
<i>polyodon</i>	Purple Cloud	Dark Arches
<i>porphyrea</i>	True Lover's Knot	Pearly Underwing
<i>prasinana</i>	Scarce Silver-lines	Green Silver-lines
<i>pusillata</i>	Juniper Pug	Dwarf Pug
<i>straminata</i>	Plain Wave	Dotted Border Wave
<i>strigula</i>	Small Black Arches	True Lover's Knot
<i>togata</i>	Pink-barred Sallow	Cloaked Pug
<i>triplasia</i>	Dark Spectacle	Spectacle
<i>umbratica</i>	Shark	Brown Rustic
<i>variata</i>	(non-British)	Grey Pine C.; later Spruce Carpet

In most cases, which species the name refers to will be obvious from its positioning if the list is in taxonomic order (although this has also changed over the years), or from the genus that accompanies it. The species most likely to cause problems are Dingy Mocha & Birch Mocha, Green Silver-lines & Scarce Silver-lines, Spectacle & Dark Spectacle.

This list does not claim to be comprehensive. Note also that there may be other sources of confusion involving names no longer in use. For example, *advena* has been applied to both Pale Shining Brown and Northern Drab.