

GMS Cymru newsletter for Spring 2014

Here are the spring results for the 2014 Garden Moth Scheme Cymru, Weeks 1-9. These are from 33 Welsh gardens, compared with 37 last year. As usual, I've put together a Top 20 based on the average number of moths of each species. In the first column I've put this year's rankings with last year's in brackets so you can see which have gone up in the charts and which have gone down. In terms of these rankings, there hasn't been much movement this year, and all of the top 5 occupy the same positions as last year, these being the 4 common Orthosias and the Early Grey. There have been a few changes, however, and Brindled Beauty has gone up 4 places, March Moth has gone down 4 places and Dotted Border has gone down 6. But when you look at the mean numbers, all of the species were much more numerous this year compared with last.

Rank	Common Name	Total	Mean per garden	
			2014	2013
1(1)	Hebrew Character	2038	61.8	16.4
2(2)	Common Quaker	1485	45.0	6.2
3(3)	Clouded Drab	994	30.1	5.6
4(4)	Small Quaker	873	26.5	5.2
5(5)	Early Grey	351	10.6	3.2
6(10)	Brindled Beauty	277	8.4	1.3
7(9)	Twin-spotted Quaker	222	6.7	1.5
8(6)	Oak Beauty	184	5.6	1.9
9(11)	Red Chestnut	136	4.1	1.0
10(13)	Early Thorn	117	3.5	0.6
11(14)	Chestnut	107	3.2	0.5
12(8)	March Moth	94	2.8	1.6
13(7)	Dotted Border	87	2.6	1.7
14(12)	Shoulder Stripe	80	2.4	0.6
15(19=)	Powdered Quaker	76	2.3	0.1
16(16)	Mottled Grey	62	1.9	0.2
17(19=)	Engrailed	42	1.3	0.1
18(19=)	Double-striped Pug	34	1.0	0.1
19(19=)	Streamer	32	1.0	0.1
20=(24=)	Lunar Marbled Brown	13	0.4	0.03
20=(15)	Satellite	13	0.4	0.2

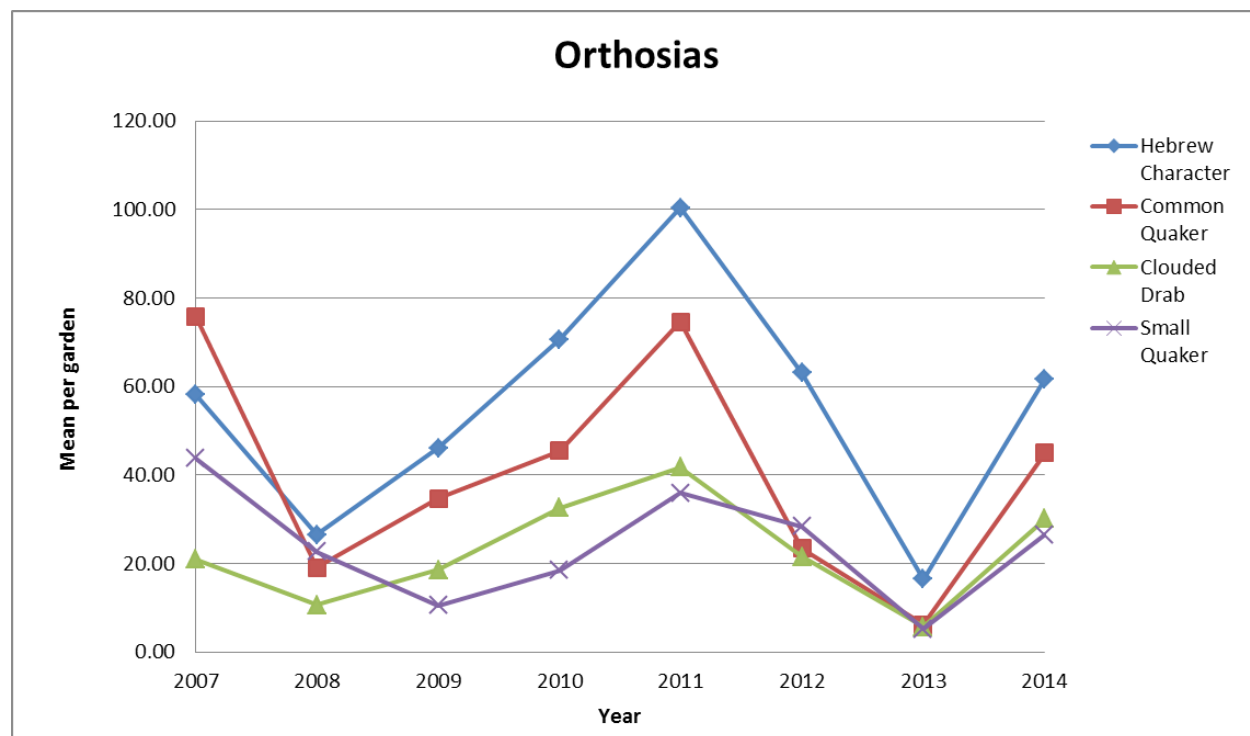
Since 2013 was such a poor year for spring species I haven't included anything on % rises and falls since last year as every species has risen a great deal and the numbers didn't seem to mean much to me. But as we now have 8 years' data it seems more interesting than ever to look back to 2007 in Wales and I've put together the table below showing how each of the Top20 has done in that time. In order to make things a bit clearer I've highlighted the highest number for each species in green and the lowest number in red.

Not surprisingly, for most species 2013 was the worst year of the 8, apart from March Moth, Dotted Border and Satellite. This year's results show that 2014 was the best for just one species, Brindled Beauty, but for all the others it was a fairly "average" year.

Common Name	Total	Average per garden
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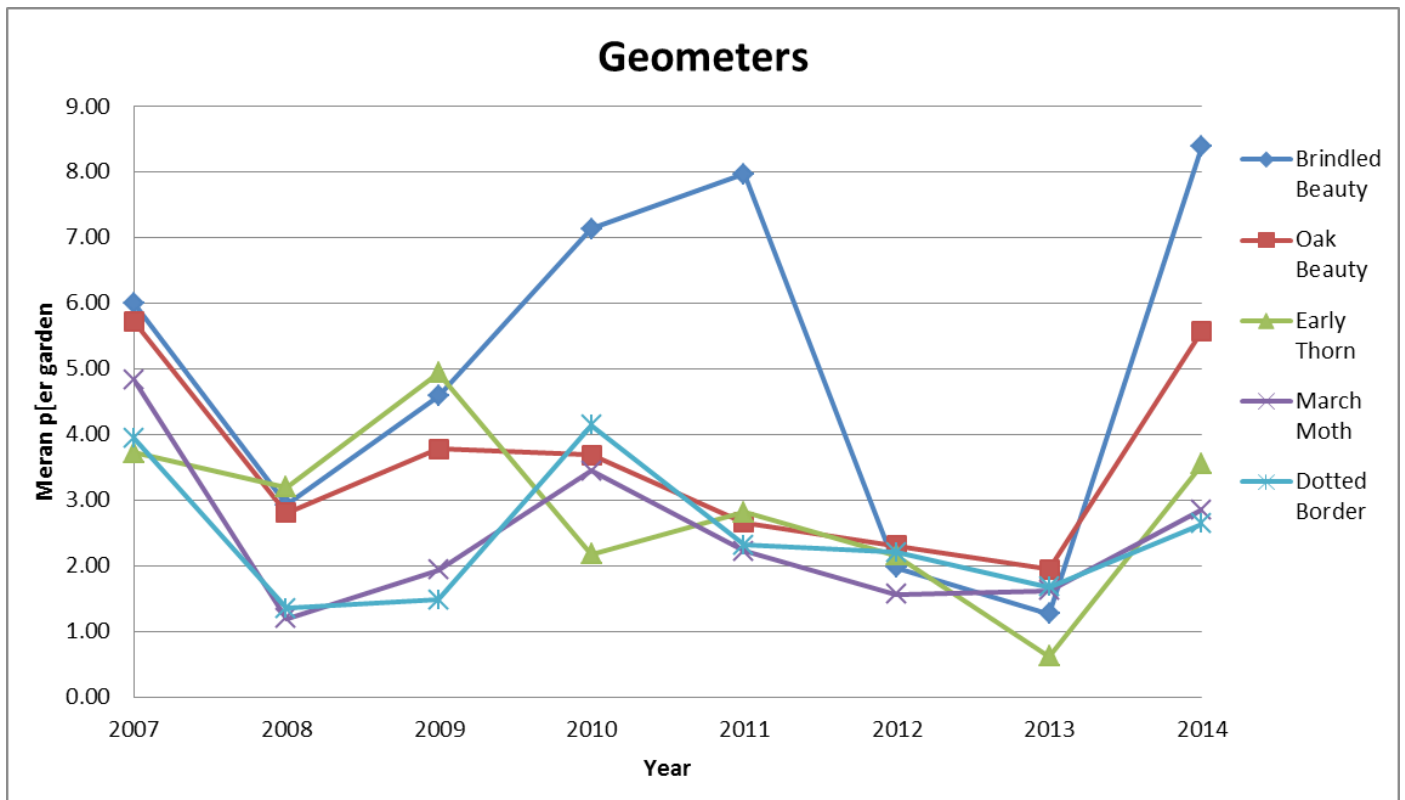
		2014	2013	2012	2011	2010	2009	2008	2007
Hebrew Character	2038	61.76	16.43	63.03	100.34	70.69	46.10	26.50	58.11
Common Quaker	1485	45.00	6.16	23.38	74.59	45.52	34.68	19.12	75.72
Clouded Drab	994	30.12	5.62	21.59	41.72	32.55	18.55	10.62	20.89
Small Quaker	873	26.45	5.22	28.38	35.91	18.41	10.45	22.69	43.72
Early Grey	351	10.64	3.22	12.85	11.53	11.93	9.03	6.96	18.22
Brindled Beauty	277	8.39	1.27	1.97	7.97	7.14	4.58	2.92	6.00
Twin-spotted Quaker	222	6.73	1.54	12.46	14.50	7.69	3.94	2.65	8.33
Oak Beauty	184	5.58	1.95	2.31	2.66	3.69	3.77	2.81	5.72
Red Chestnut	136	4.12	1.00	2.69	5.19	3.83	3.61	3.08	10.22
Early Thorn	117	3.55	0.62	2.15	2.81	2.17	4.94	3.19	3.72
Chestnut	107	3.24	0.54	4.38	5.00	6.52	2.26	1.42	2.39
March Moth	94	2.85	1.62	1.56	2.22	3.45	1.94	1.19	4.83
Dotted Border	87	2.64	1.68	2.21	2.31	4.14	1.48	1.35	3.94
Shoulder Stripe	80	2.42	0.59	2.85	4.13	3.31	1.42	4.19	6.78
Powdered Quaker	76	2.30	0.08	1.31	3.38	0.72	0.65	0.69	0.94
Mottled Grey	62	1.88	0.22	1.15	3.97	4.38	3.03	N/A	N/A
Engrailed	42	1.27	0.08	0.79	1.38	0.55	0.65	0.31	1.00
Double-striped Pug	34	1.03	0.08	0.67	1.53	0.69	1.29	1.62	6.89
Streamer	32	0.97	0.08	0.79	2.84	1.52	1.55	0.88	2.17
Lunar Marbled Brown	13	0.39	0.03	0.08	1.81	0.17	N/A	N/A	N/A
Satellite	13	0.39	0.24	0.64	0.59	0.79	0.26	0.19	0.06

I also thought it might be a good idea to plot some of these numbers on charts for some groups of species. Since the Top 4, Hebrew Character, Common Quaker, Clouded Drab and Small Quaker, are all Orthosias, do the numbers rise and fall together? The answer as shown by the first chart, is yes they do! All 4 show a peak in 2011 and troughs in 2008 and 2014 although there are variations between one species and another.



A group of moths that are less closely related to each other are the 5 geometers most numerous in the table, the Brindled Beauty, Oak Beauty, Early Thorn, March Moth and Dotted Border. The chart shows that apart from the Brindled Beauty these seem to vary less in numbers from year to year

than the Orthosias. Also, and again apart from the Brindled Beauty, they don't show a peak in 2011 but instead have high numbers in 2007 and 2014, although Early Thorn shows this less well than the others.



Finally, remember that I'm always keen to have contributions to my GMS Quarterly Newsletter, so please let me have anything in the next couple of weeks.

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