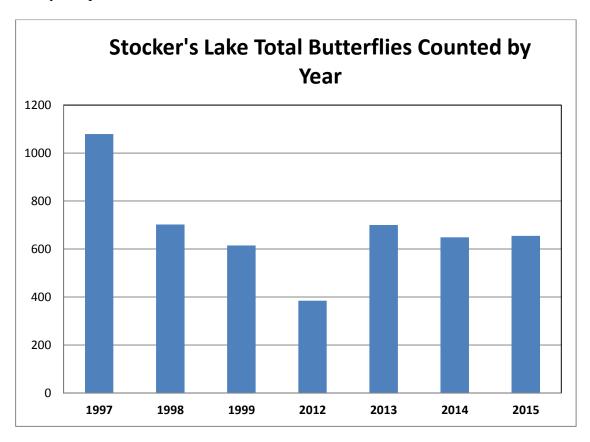
## **Butterflies at Stocker's Lake 2015**

## The recording scheme

As in previous years, a small but dedicated band of enthusiasts have been recording butterfly sightings. Each week, a recorder walks around the Lake recording all butterflies seen. The walk is divided into 12 sections, or transects, and where and how many of each species seen is noted down. This year, for the first time, the recorders entered their results directly onto the UK Butterfly Monitoring Scheme database, one of the world's largest butterfly and moth recording schemes with records countrywide. Thanks to our excellent team of butterfly recorders, Carol and Dick Beeden, Cliff and Jacky Buckton, Carrol Scott, and leader Barbara James, we have some interesting results.

## Total butterflies counted by year

Butterfly counts are now available for 7 years in 2 periods, 1997-1999 and 2012-2015, and the results indicate that the apparent trend has changed somewhat over the last 4 years. When counts were resumed in 2012, they appeared to show an alarming decline since the 1990s. At the time, 2013 was therefore considered to be a bumper year as it reversed the previous trend. However, since then the total number of individual butterflies counted each year has been fairly constant with 700 in 2013, 649 in 2014, and 655 in 2015. It is therefore looking more likely that 2012 was just a very bad year, and perhaps 1997 was exceptionally good. Differing survey methods may also distort the results. For instance, counts for 2012-15 include estimates for weeks when conditions were unsuitable. Future surveys will help to clarify this picture.

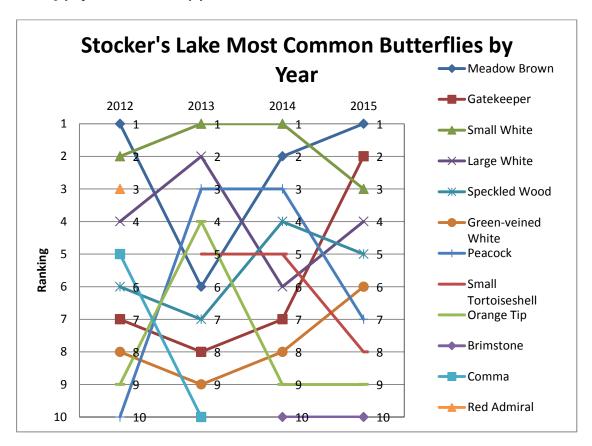


## *The national picture*

Butterfly Conservation's Big Butterfly Count held each summer states that in 2015 "Despite the wet and miserable conditions experienced across much of the UK in July and August, butterfly species did better than was feared. More than half of the 20 Count species recorded better numbers than in 2014". Peacock and Small Tortoiseshell counts fell by more than 50% compared to 2014, with Red Admiral and Speckled Wood falling by 25%.

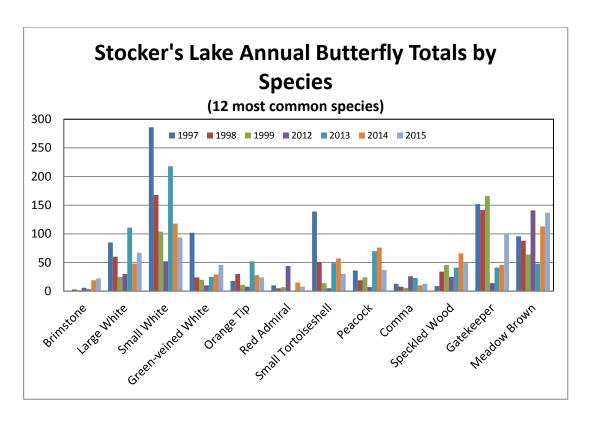
The 4 most common butterflies counted in England by order were Gatekeeper, Large White, Meadow Brown and Small White which at Stocker's Lake were ranked 2<sup>nd</sup>, 4<sup>th</sup>, 1<sup>st</sup> and 3<sup>rd</sup> respectively.

Butterfly species counted by year



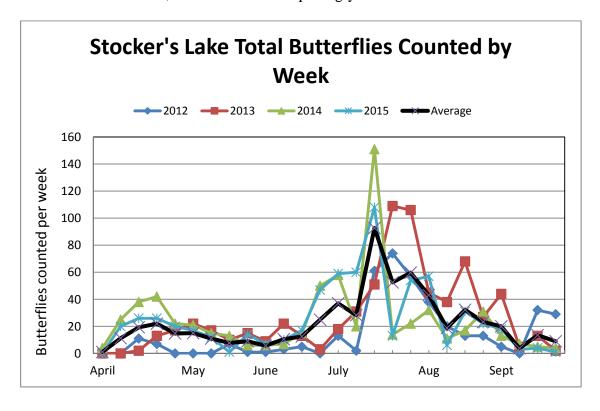
The above chart shows the top 10 butterfly species counted at Stocker's Lake in 2015, and how their ranking has changed since 2012. The 2 obvious winners since 2013 are Meadow Brown and Gatekeeper, both of which rely on unimproved grass for food. However, there is no sign of a recovery in Skippers which require tall, uncut grass and were common in the 1990s but have now virtually disappeared. Green-veined White is another winner while Red Admiral and Comma have become scarce since 2012. Annual data for these species are shown below.

Other good news this year was a first sighting of Painted Lady since 1997, and 5 records of Marbled White.

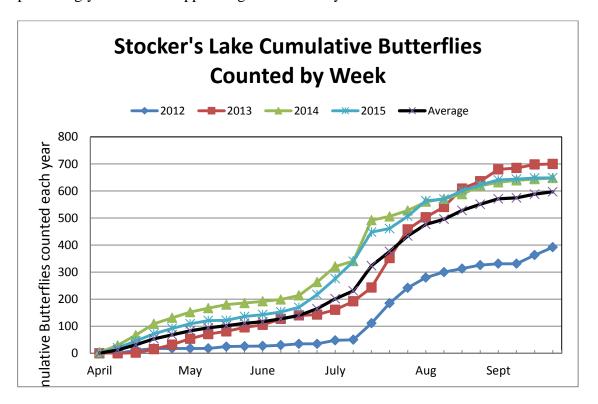


2012-14 weekly data

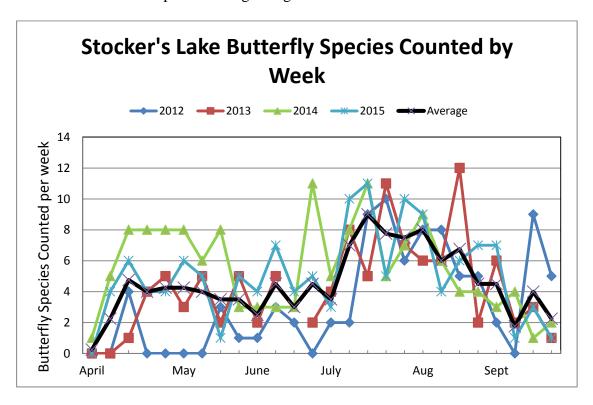
As weekly counts have now been ongoing for 4 years, we have detailed data for this period. The chart below shows the total number of butterflies counted each week between April and September for each year as well as the average for the whole period. This shows that there is a peak in April, followed by a much larger one in July which gradually declines into August. Given the wet summer, 2015 turned out surprisingly well.



When presented cumulatively, it is obvious that 2012 had a very poor spring and early summer, that late summer was good in 2013, and that 2014 and 2015 started off very promisingly but were disappointing from mid-July onwards.



As one would expect, the number of species counted each week follow broadly similar trends, and these show that during the summer peak period it would normally be possible to see between 5 and 11 species during a single walk around the Lake.



We will be continuing our weekly counts again in 2016, and hoping for a bumper year.



Painted Lady feeding on Buddleia



Brimstone



Comma