

JUNE STATISTICS RECORDED AT LERWICK OBSERVATORY

	June 2009	Averages 1971-2000
Mean maximum temperature	13.6°C	12.2°C
Mean minimum temperature	8.0°C	7.4°C
Daily mean temperature	10.9°C	9.8°C
Mean sea-level pressure	1018.7 hPa (mb)	1013.6 hPa (mb)
Total rainfall	39.8 mm	58.6 mm
Wet days => 1 mm	12 days	11.3 days
Sunshine (electronic sensor)	239.8 hours	148.2 hours
Air frosts	0 days	0.0 days
Ground frosts	0 days	1.2 days
Snow/sleet	0 days	0.1 days
Days with gale	0 days	0.5 days
Maximum daily mean temp.	18.3°C on 29 th	
Minimum daily mean temp.	7.0°C on 5 th	
Highest maximum	21.7°C on 29 th & 30 th	
Lowest day maximum	9.6°C on 9 th	
Highest night minimum	14.9°C on 29 th	
Lowest minimum	4.2°C on 4 th & 5 th	
Lowest grass minimum	0.2°C on 14 th	
Wettest day	19.0 mm on 17 th	
Sunniest day	16.3 hours on 30 th	
Highest mean hourly wind	28 knots on 5 th	
Highest gust	42 knots on 5 th	

VERY SUNNY AND DRY. NEAR-AVERAGE TEMPERATURES UNTIL THE LAST VERY WARM WEEK, AND HOT LAST FEW DAYS

Apart from a couple of days during the first half of the month and shortly after mid-month - when shallow lows passed close to Shetland - June was a notably anticyclonic month with mean pressure well above average. With the main centre of high pressure between Greenland and Scandinavia, and low pressure to the west of Biscay, the normal pressure gradient over the Atlantic was reversed (negative North Atlantic Oscillation). As a result, there was an anomalous E'ly airflow across Shetland. June temperatures were on the whole near or even a little below average. However, during the last five days, very warm air - originating over North Africa and drawn over a warm Europe - was carried west over the Northern Isles from Scandinavia. Because of this, the Northern Isles experienced some unseasonably hot weather as the month ended and July began.

June 2009 was the hottest, driest and sunniest month in the UK since July 2006. Average maximum temperatures ranged from 22.3°C at Heathrow to 12.9°C in Fair Isle.

It was also very sunny, both Lerwick and Fair Isle having their highest June totals on record. While Lerwick's 239.8 hrs just beat the previous record of 239.7 hrs (set in 1935), Fair Isle's total of 299.7 hrs easily beat the previous high of 232.8 hrs (June 1992) - and was not far short of the all-time record 304.7 hrs (May 2008)!

June began with a large anticyclone extending from south of Iceland across the Northern Isles. A weakening front remained slow-moving close to Shetland on the 1st, bringing generally cloudy - though mainly dry - weather. With light SE'ly winds carrying warm, moist air across the cooler waters of the Fair Isle Channel, fog formed at times in this area. There were a few showers early on the 2nd as the front edged south, but following light NW'ly winds brought much clearer conditions,

During 3rd and 4th, though mostly dry and bright, NW'ly winds freshened as a depression slipped southeast into Scandinavia, The 5th - 6th were cool, showery days with fresh or strong N to NE'ly winds, as the low moved south over the Baltic. The 7th was drier, with sunny spells and easing N'ly winds, as the Baltic low filled and the East Greenland high extended southeastwards towards Shetland,

There were some mainly light showers on the 8th, but the 9th and 10th were mainly dry and sunny. Light N'ly winds backed NW'ly as a shallow low developed over the Norwegian Sea. There were more frequent showers and winds freshened for a time on the 11th, as the low moved south past Shetland.

Between the 12th and 16th, Shetland enjoyed mostly dry, bright weather with light and variable winds, as a small anticyclone drifted southeast over the Northern Isles. Under mostly clear skies, nights were cool. After a fine, dry start, occasionally heavy rain spread from the southwest later on the 17th, as SE'ly winds strengthened ahead of an occluding front, pushed northeast across Scotland by an Atlantic depression. With the low slow-moving to the west, early patchy rain on the 18th turned to bright spells and scattered showers, as winds veered fresh SSW'ly behind the front. On the 19th there was some showery rain - occasionally heavy and thundery - more especially over Orkney, where lightning strikes damaged digital equipment on Sanday. Winds, falling light cyclonic, later freshened W to NW'ly as the filling low drifted east over Orkney. Scattered showers and light NW'ly winds followed for the 20th as the low continued east.

A ridge, crossing the area from the west, brought a fine day on the 21st. W to NW'ly winds backed SW'ly as the ridge declined, bringing misty conditions with patchy drizzle and hill fog for the 22nd, as weak fronts trailed across Shetland. Patchy drizzle and fog cleared early on the 23rd, as an anticyclone over southern England ridged north.

From the 24th, as the anticyclone transferred northeast over the British Isles into Scandinavia, winds settled E'ly, bringing a marked change to very warm, dry and mostly sunny conditions. As high pressure persisted to the northeast or north of Shetland, no further rain fell during the remaining days of June.

While most places experienced high temperatures, patchy low cloud and sea fog affected some hills and coasts, mostly - though not exclusively - in the east. However, because of the dry air of the original airmass, fog was not the usual problem when very warm air is carried across the North Sea to the Northern Isles. On the 29th a maximum temperatures of 21.7°C was recorded at Lerwick. Scatsta - on the more sheltered west side - reported a temperature of 23°C for much of the day! Between 6-7pm, Fair Isle reached 19.4°C, the highest temperature of the year there. On the 30th the Observatory again reported a maximum of 21.7°C, a June record for Lerwick.

Dave Wheeler

Initial Statistical details for Scotland as a whole (1961-1990 average) for June 2009:

Mean Temperature – 12.0°C (1.0°C above average).

Rainfall – 73.8 mm (87% of average).

Sunshine – 211.7 hours (136% of average).

Data from the UK Met Office