

**FEBRUARY STATISTICS RECORDED  
AT LERWICK OBSERVATORY**

	<b>February 2008</b>	<b>Averages 1971-2000</b>
Mean maximum temperature	6.9°C	5.4°C
Mean minimum temperature	3.5°C	1.4°C
Daily mean temperature	5.2°C	3.1°C
Mean sea-level pressure	1008.5 hPa (mb)	1010.2 hPa (mb)
Total rainfall	96.9 mm	107.8 mm
Wet days => 1 mm	17 days	17.8 days
Sunshine	43.1 hours	52.3hours
Air frosts	3 days	7.7 days
Ground frosts	8 days	14.9 days
Snow/sleet	8 days	12.2 days
Days with gale	8 days	6.1 days
Maximum daily mean temp.	7.8°C on 17th, 18th	
Minimum daily mean temp.	-1.8°C on 2nd	
Highest maximum	9.8°C on 9th	
Lowest day maximum	-0.4°C on 2nd	
Highest night minimum	7.1°C on 18th	
Lowest minimum	-4.4°C on 2nd	
Lowest grass minimum	-6.2°C on 2nd	
Wettest day	14.2 mm on 29th	
Sunniest day	6.8 hours on 14th	
Highest mean hourly wind	42 knots on 21st	
Highest gust	68 knots on 21st	

**VERY MILD AND DULL, BUT DRIER THAN NORMAL**

The month divided into three more or less equal parts. 1<sup>st</sup> to 9<sup>th</sup> was an unsettled, cyclonic period, with depressions tracking northeast past Scotland, bringing changeable conditions as they trailed associated frontal systems across Shetland.

The period from the 10<sup>th</sup> to the 19<sup>th</sup> was dominated by high pressure as an anticyclone - initially developing over Scandinavia - maintained a ridge back across the North Sea and Scotland as it migrated south into central Europe, before eventually declining east.

While the 20<sup>th</sup> to the 29<sup>th</sup> was again dominated by low pressure, until the 25<sup>th</sup> - with low pressure over Iceland and high pressure across southern Europe – this was ‘zonal’, with a strong SW to W’ly airflow across northern Scotland. From the 26<sup>th</sup> this became cyclonic and somewhat cooler as Atlantic depressions followed their normal track northeast between Scotland and Iceland.

This was Shetland’s second mildest February – shared with 1939 - since 1930. Februarys with daily mean temperatures above 5°C have been 1932, 5.1°C; 1934, 5.4°C; 1939, 5.2°C and 1998, 5.4°C.

By comparison, in this period, Lerwick’s coldest two months – both also Februarys - have had a daily mean temperature below freezing. The first was 1947, with a daily mean of -0.4°C, a mean maximum -1.5°C and mean minimum of -2.2°C. Air frosts were recorded on 25 days. The other was 1969, with a daily mean of -0.2°C, a mean maximum 2.3°C and mean minimum of -2.6°C, with air frosts recorded on 22 days.

The month began with an intense depression of 955 hPa centred just to the east of Orkney, bringing very cold and wintry conditions with frequent hail and snow showers and N to NW’ly gales. By

evening most places had several centimetres of lying snow. The 2<sup>nd</sup> was particularly cold with the temperature failing to rise above freezing throughout the day in Lerwick. Winds steadily eased and backed W'ly as the filling low moved away across Scandinavia. Snow showers continued for much of the day, before dying out during the evening. Temperatures fell quickly above snow-covered ground – 6cm on Fair Isle – after dark, and a hard overnight frost was widespread during the evening.

Winds freshened and backed SW'ly overnight, as the next low tracked northeast towards Faeroe driving fronts northeast, which brought heavy overnight rain that rapidly removed the snow cover. The 3<sup>rd</sup> was generally cloudy with patchy rain or drizzle and strong to gale S'ly winds as fronts became slow-moving near Shetland. These were eventually pushed away on the 4<sup>th</sup> as the deep low approached northwest Scotland and brighter, showery conditions edged in from the west.

The 5<sup>th</sup>, despite a complex area of low pressure north of Shetland producing a few showers, was bright and Lerwick, with 4.2 hours, was the sunniest place in the UK. As the low transferred east on the 6<sup>th</sup>, strong SW'ly winds veered WNW'ly and showers turned wintry. Winds backed S'ly overnight and increased gale or severe gale as an Atlantic depression pushed fronts east. The rain and gales cleared early on the 7<sup>th</sup> to leave a mild, mostly dry day with a strong SW'ly wind. On the 8<sup>th</sup> a wave low, developing on a trailing cold front, ran quickly northeast past northwest Scotland. Although this brought little rain, S'ly winds increased gale or severe gale for a time during the evening, with gusts to 65 mph. Winds then eased overnight as the low tracked north past Shetland, to leave a dry day on the 9<sup>th</sup> with hazy sunshine and moderate S'ly winds.

An anticyclone developing over the North Sea on the 10<sup>th</sup> drifted into Scandinavia on the 11<sup>th</sup>, maintaining settled - though increasingly hazy - conditions across northeast Scotland as light S to SE'ly winds steadily increased strong. An Atlantic front – initially blocked by the high on the 12<sup>th</sup> - brought patchy rain and misty conditions on the 13<sup>th</sup> as the high drifted south. A new area of high pressure, developing over the Norwegian Sea, brought a drier and brighter day on the 14<sup>th</sup>, with Lerwick again the sunniest place in the UK. Settled, dry – though often cloudy - conditions were maintained during the next few days, as the high drifted across southwest Norway and Denmark into Germany, a light E or SE'ly wind across Shetland veering S to SW'ly and freshening as it did so. Despite rather overcast conditions in Shetland on the 16<sup>th</sup>, many would have been aware of the dramatic sunset, observed across most of the UK as well as Europe, when the cloudy skies here took on a fiery red tint. As the receding anticyclone maintained a ridge northwest across Scotland, the 19<sup>th</sup> was another dry day with light winds. It was also clearer and offered good views of a dramatic sunrise and sunset.

The ridge declined east on the 20<sup>th</sup>, with a cold front bringing overnight rain as SW'ly winds strengthened. Rain cleared to showers early on the 21<sup>st</sup>, these turning wintry later as SW to W'ly winds increased gale to severe gale-force. A gust of 91 mph was recorded at Sella Ness. The 22<sup>nd</sup> was a brighter though colder day with gale or severe gale-force W'ly winds. Showers were frequent, wintry with hail and sleet, and locally thundery. Rain replaced showers overnight and winds backed strong to gale S'ly as fronts crossed from the west early on the 23<sup>rd</sup>. Dull at first, with outbreaks of sometimes heavy rain or drizzle, it became drier and brighter later as fronts cleared east.

The 24<sup>th</sup> was a brighter day with fresh or strong W'ly winds and patchy rain or showers – some with hail - as further Atlantic fronts moved east across Shetland. The 25<sup>th</sup> was cloudy with outbreaks of rain, SW'ly winds increasing strong to gale as a deep depression in mid-Atlantic drove fronts east. Rain cleared to showers and brighter conditions on the 26<sup>th</sup>, as the deep low tracked east to the north of Shetland, and strong to gale-force S'ly winds veered W'ly. As this low continued east into Scandinavia, a colder day with strong to gale W'ly winds brought wintry showers of rain, sleet and hail on the 27<sup>th</sup>. The showers died out overnight, with rain followed by more showers on the 28<sup>th</sup> as

further fronts crossed from the west. In turn these died out overnight, as strong to gale W'ly winds backed S'ly ahead of yet more fronts driven east by a deep Atlantic depression. This brought wet and windy conditions for much of the 29<sup>th</sup>, with heavy rain clearing to brighter, showery conditions during the evening as the low tracked northeast over Faeroe, and the gale or severe gale-force S'ly winds eased and veered W'ly.

**Dave Wheeler**

**Initial Statistical details for Scotland as a whole (1961-1990 average) for February:**

**Mean Temperature** – 4.2°C (2.2°C above average). Warmest February since 1998, when 6.3 °C was recorded.

**Rainfall** – 162.4 mm (154% of average).

**Sunshine** – 84.2 hours (131% of average).

**Data from the UK Met Office**