

MONTHLY WEATHER REPORT OF THE METEOROLOGICAL OFFICE

SUMMARY OF OBSERVATIONS COMPILED FROM RETURNS OF OFFICIAL STATIONS AND VOLUNTEER OBSERVERS

PUBLISHED BY HIS MAJESTY'S STATIONERY OFFICE. To be purchased directly from H.M. STATIONERY OFFICE at the following addresses: YORK HOUSE, KINGSWAY, LONDON W.C.2; 120 GEORGE STREET, EDINBURGH 2; 39-41 KING STREET, MANCHESTER 2; 1 ST. ANDREW'S CRESCENT, CARDIFF; 80 CHICHESTER STREET, BELFAST; or through any bookseller.

VOL. 59. No. 3.

ISSUED BY THE AUTHORITY OF THE METEOROLOGICAL COMMITTEE

Price 1s. 0d. net, Post-free 1s. 1d.

Annual Subscription, including Annual Summary and Introduction, 15s. 0d. post-free.

MARCH, 1942.—Dull; cold, becoming milder.

The month was distinguished by an unusual scarcity of sunshine, particularly in the Midlands. It was cold during the first half of the month and considerable snowfall was experienced in some districts from the 4th-6th or 7th.

During the opening days of the month an anticyclone moved east-south-east from Iceland to southern Scandinavia, while a depression south of Ireland moved south-east and a trough associated with a depression near Iceland approached the British Isles. Cold weather prevailed, with little rainfall except in the west. On the 3rd a vigorous trough of low pressure moved in over our western districts; there was a temporary rise in temperature and rain occurred in most districts, falls being heavy in the south-west. From the 4th to 6th the anticyclone over Scandinavia moved slowly north-west and very cold easterly winds were experienced over the British Isles; meanwhile an almost stationary trough of low pressure, which eventually moved south-west, lay over our western districts; snow fell over a wide area and the falls were considerable, with fairly deep drifts in some districts. On the 8th and 9th a shallow depression initially off the north of Ireland moved away north-east; precipitation occurred in most parts on the 8th except in the southern half of England and rainfall was fairly heavy locally in the west. On the 10th a wedge of high pressure extended south-east over Scotland from an anticyclone north of Iceland and on the 11th the anticyclone moved south-east to the North Sea. This system maintained mainly fair weather in the north, while rain in the southern half of the country was associated with a trough of low pressure which moved slowly north over our southern districts.

On the 13th a large depression centred north-east of the Azores moved slowly north-east, and from the 14th to 19th conditions over the United Kingdom were governed by this large low pressure system on the Atlantic and associated troughs which moved north-east over the British Isles. Mainly mild, unsettled weather, with occasional rain, prevailed and local thunderstorms occurred from the 17th-19th. By the 19th colder air, with east winds, had spread back over most of the country. Subsequently pressure rose over the southern districts of the British Isles and by the 22nd a belt of high pressure extended east to west across the country from an anticyclone over southern Scandinavia. Anticyclonic conditions persisted until the 24th, when a deep Icelandic depression moving east caused a little slight rain in Scotland and a gale in the Shetlands on the 24th and 25th. Day temperatures rose considerably during the period 23rd to 25th and 60°F. was exceeded at numerous places. Thereafter conditions continued mainly fair apart from scattered rain or showers until the 29th, when a complex Atlantic depression again approached our western seaboard. Some rain occurred in the west and north-west on the 29th and on the following days rain was experienced over the country generally.

Pressure and Wind.—Mean pressure exceeded the average in the north and east and was below the average in the south-west, the deviation at 7h. ranging from +7.4 mb. at Sumburgh in the Shetland Islands to -3.0 mb. at the Scilly Isles. Winds from some easterly point were excessive: in Scotland there was a seven days excess of east and south-east winds. Gales were comparatively few and none was markedly severe, though a mean hourly velocity of 50 m.p.h. was registered at Lerwick on the 25th. Gales were, however, recorded locally from the 2nd-6th, 8th, 12th-13th, 16th and 24th-25th. Among the highest speeds recorded in gusts were 72 m.p.h. at Lerwick on the 25th and 60 m.p.h. at Bell Rock Lighthouse on the 8th.

Temperature.—Mean temperature was below the average in all districts except England, S.W. and Northern Ireland. The deviation for the districts ranged from -2.3°F. in England, E. to +0.5°F. in England, S.W. Mean temperature was unusually low on the east coast, the deviation from the average being -4.5°F. at Yarmouth

and -4.2°F. at Lowestoft. The first twelve days were cold, mean temperature during the first week being particularly low; screen minimum temperatures were notably low between the 6th and 12th, especially on the 8th, when -3°F. was registered at Braemar, 5°F. at Balmoral, 8°F. at Tarland, and, in England, 15°F. at Milford, Surrey. There was a rise in temperature on the 14th, and on the whole the third week was decidedly mild. The highest day temperature, however, occurred at many places between the 23rd and 25th, but the range of temperature was fairly large during this spell.

The extremes for the month were:—(England and Wales) 66°F. at Bala on the 24th, 15°F. at Milford (Surrey) on the 8th; (Scotland) 63°F. at Stonehaven on the 24th, -3°F. at Braemar on the 8th; (Northern Ireland) 63°F. at Armagh on the 24th, 22°F. at Hillsborough and Armagh on the 7th.

Precipitation.—The general precipitation expressed as a percentage of the average for the period 1881-1915 was 101 over England and Wales, 68 over Scotland and 127 over Northern Ireland. In Scotland, north of a line drawn from Oban to Aberdeen, rainfall, with few exceptions, was less than half the average; more than 150 per cent. of the average occurred locally in the district skirting the Solway Firth, while somewhat more than the average occurred locally in Perthshire, the Clyde area and a few places elsewhere. In Northern Ireland rainfall was excessive except in the extreme north and the percentage of the average at individual stations ranged from 91 at Londonderry and Garvagh to 183 at Seaford. In England and Wales the distribution was variable; less than 50 per cent. was received in a coastal strip from Berwick-on-Tweed to Skegness, while more than 150 per cent. occurred locally near the east coast from Lowestoft to Shoeburyness, at a few places on the Sussex coast and at Plymouth.

Daily falls of more than 1 in. occurred at numerous places on the 3rd, 4th, 8th and 16th, and locally on some other days, and among the largest daily falls were 2.42 in. at Ardarroch, near Garelochhead on the 4th and 2.45 in. at Princetown on the 16th. In a heavy rain-storm at Hoarwithy, Herefordshire, on the 18th, 1.10 in. fell in 55 minutes.

Widespread snow occurred from the 4th-7th and in some areas the falls were considerable. Perth had 9-10 inches of undrifted snow with drifts of 2 to 3 feet deep, while at Corroir in Glen Leven snow was drifted to a depth of 8 feet at the end of the first week. At Bingley, Yorkshire, there were drifts of three feet on the 6th and 7th, and level snow was 12 inches deep at Huddersfield on the 5th and 10 inches deep at Bellingham on the 6th and 7th, at Houghall on the 6th and Chopwellwood on the 7th.

Thunderstorms occurred locally between the 17th and 19th and at one or two places on the 31st.

Sunshine.—Sunshine was notably deficient, particularly in the Midland Counties. The deficiency was general and an excess was recorded only at one or two stations on the north coast of Cornwall. At Sheffield it was the dullest March since records began in 1898, at Cheltenham the total was the lowest since comparable records were first taken in 1907 and at Totland Bay, Isle of Wight, March sunshine has only once been less, that is in 1916. In many districts March continued a sequence of dull months and over a large part of England the total sunshine of the first three months of 1942 was the lowest recorded for a similar period for many years.

Fog.—Fog occurred frequently; it was reported at the morning observation hour on more than 10 days at a large number of stations, and on 22 days at Greenock, 21 days at Ushaw and 18 days at Huddersfield and Usk.

Miscellaneous Phenomena.—Aurora was observed in Scotland on 8 nights. Solar halos were noted at Oxford on 12 days.