

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 through any Bookseller or directly from H.M. STATIONERY OFFICE at the following addresses: IMPERIAL HOUSE, KINGSWAY, LONDON, W.C. 2, and 28, ABINGDON STREET, LONDON, S.W. 1; YORK STREET, MANCHESTER; 1, ST. ANDREW'S CRESCENT, CARDIFF OR 120, GEORGE STREET, EDINBURGH.

Vol. 40, No. 9.

ISSUED BY THE AUTHORITY OF THE METEOROLOGICAL COMMITTEE.

Price 9d. Net, Post free, 10d.

Annual Subscription, including
Annual Summary and Introduction,
10s. post free.

SEPTEMBER, 1923: COOL. SUNNY IN SOUTH-EAST, WET IN NORTH.

General.—During the early part of the month fair, warm, sunny weather prevailed generally in the southerly parts of the British Isles. Comparatively high maximum temperatures were recorded and the duration of sunshine was above normal. In northerly and westerly regions an improvement on the rough and unsettled conditions of the end of August also occurred, but some heavy rain fell at times, the weather being influenced by depressions passing from Iceland towards northern Norway. Towards the end of the second week the tracks of depressions lay more to the south and the weather became unsettled over the whole country. Strong or high winds were experienced on the western and northern coasts on the 11th and 12th. On the 13th unsettled weather spread to the south-east. Thunderstorms developed locally on the two following days, and high winds occurred up to the 26th at various exposed portions of the coast. Northerly winds from the Iceland region caused a decided fall of temperature on the 15th and from then to almost the end of the month the weather was cool. Snow was reported on mountains in Scotland on the 20th. Towards the close of the month the anticyclone over France spread northward, giving quite warm but somewhat misty weather. In several parts of the country the highest temperatures of the month were recorded on the last day, and night temperatures were unusually high at this time.

The general character of the month is illustrated by the following remarks taken from observers' notes and returns:—Bude.—Wet and wild weather from 16th to 23rd, end of month warm and damp. Hodsock Priory (Nottingham).—During the first fortnight the bulk of the harvest was secured in good condition. The next ten days were unsettled with a good deal of rain. Sunshine exactly double that of September, 1922. Rather more ground frosts than usual. Isleworth.—A fair month. Meltham (Yorks.).—The first month since August, 1895, without any east wind. Skegness.—An average month. Southport.—The fifth consecutive month with an excessive prevalence of westerly winds. The mean daily range of temperature was again remarkably small. Arisaig (Inverness).—An abnormally wet and unsettled month with much wind. Ullapool (Ross and Cromarty).—Cold and wet, little sunshine, snow down to the 2,000 ft. line on the 20th and 21st. Dublin.—A disappointing month with only three days of summer weather.

Pressure and Winds.—The mean pressure of the month was everywhere below normal except in the Channel Isles and Scilly, where there was a slight excess. The departure of monthly means of pressure at fixed hours from the normal varied from -8.4mb. at Wick to +0.8mb. at Scilly. The isobars of mean pressure trended roughly from W. to E. over the whole of our islands and the pressure gradient was steeper than that of the normal map.

Depressions were again numerous. Four primary and five secondary depressions actually crossed some portion of the British Isles. The lowest pressures of the month were experienced in Ireland N. in connection with the depression (Track R) on the 25th. The lowest pressures generally were experienced on the evening of the 17th in connection with the depression (Track L). The highest pressures were those of the Channel Isles and Scilly on the 5th and England S.E. on the 29th.

The strongest winds of the month were those of the 11th-12th, 17th, 20th-21st and 23rd-25th on each of which dates gale force was reported locally. The highest registered gusts were three of 61 m.p.h. on the 27th, at Edinburgh, Holyhead and Weaver Point respectively. Pendennis Castle and Scilly each recorded 2 days of gale but the greatest duration of wind of gale strength, 7 hrs., was experienced at Southport on the 20th.

Temperature.—The mean temperature of Districts 1-10 was 54°F. That of each District was below normal. The greatest deficiencies were experienced in Scotland E. and in the Channel Isles and Scilly, -1.9°F., with mean temperatures of 50°F. and 57°F. respectively. The least deficiency was in England E., -0.6°F., with a mean temperature of 56°F. The coldest period was the 16th-22nd and the warmest the week ending on the 29th. During the first week of the month the mean daily range was 20°F.-25°F. Night temperatures were unusually high at the end of the month and the minimum of 64°F. on the night of the 29th-30th at Kew was the highest ever recorded there during the month of September.

The extreme temperatures for the month were:—(England and Wales) 78°F. at Ascot on the 9th, 29°F. at Rhayader on the 3rd; (Scotland) 73°F. at Aberdeen, Smeaton and Liberton (Edinburgh) on the 30th, 27°F. at Eskdalemuir and West Linton on the 3rd; (Ireland) 75°F. at Newcastle (Wicklow) on the 6th and at Glasnevin (Dublin) on the 29th and 30th, 34°F. at Markree (Sligo) on the 18th and at Kilkenny and Phoenix Park (Dublin) on the 24th. A number of ground frosts occurred, the lowest temperature recorded over grass being 18°F. at Rhayader on the 3rd.

Precipitation.—With the exception of portions of the eastern and south-eastern coastal areas of Great Britain and Ireland and one or two very small areas elsewhere, precipitation exceeded the normal. In a few restricted regions over twice the normal amount of rain fell, the largest of these being one which included parts of Argyllshire, Renfrew and Ayr, including the Clyde area. Over the greater part of England and Ireland precipitation was between 100 per cent. and 150 per cent. of the normal.

In western and southern Scotland the month was the third wet one in succession and the July-September period at Rothesay was the wettest for at least 100 years, and at Cargen (Dumfries) the wettest for at least 60 years. Greenock experienced the wettest September for at least 50 years.

The general precipitation in the British Isles expressed as a percentage of the average was 138; the values for the several countries were:—England and Wales 126, Scotland 156, Ireland 146.

The first week of the month was the driest generally and the week 16th-22nd the wettest. The last three days were also dry. The largest daily falls at stations enumerated in this Report were 39mm. at Porton on the 14th, 37mm. at Mallarany on the 27th, 36mm. at Onich on the 11th and at Seskin on the 17th. A considerable number of stations had falls of 25mm. or more. Among other heavy falls 63mm. at Basset Down (Wilts.) on the 13th and 57mm. at Dungeon Ghyll (Cumberland) on the 17th may be mentioned.

Snow fell on mountain tops in Scotland on the 20th and Ben Lomond was capped for the first time this season.

The greatest number of days of thunder recorded was 4, at several stations. At a few stations 3 days of hail occurred. There were no notable thunderstorms but local ones were reported, mainly in the second half of the month. On the 22nd ball lightning struck the Manchester Corporation Golf Links at Heaton Park.

Sunshine.—With the exception of Ireland N. the duration of sunshine was above normal in all Districts. The largest mean daily excess occurred in England S.E. (+1.45 hr.) and the deficiency in Ireland N. was -0.14 hr. The duration of sunshine reached 55 per cent. of the possible in England S.E. and was only 29 per cent. of the possible in Scotland N. and Ireland N.

The first week of the month was the sunniest generally, and a number of daily records exceeding 12 hours were obtained. Records exceeding 11 hours were, however, obtained at many places later in the month. England S.E. was again the sunniest District and the daily averages for the three monthly period July-September were very high. Taking the two stations that were specified in the August Report, Eastbourne had an average of 8.5 hrs. for the 92 days, while Tunbridge Wells had an average of 7.9 hrs. for the same period.

Fog.—The number of days of fog reported varied from 0 to 6, the latter number occurring at Sparkhill (Birmingham) and Biggin Hill (Kent). Owing to the altitude of Biggin Hill (600 ft.) probably the station was enveloped in low cloud on all or most of these occasions. Much mist and fog prevailed during the last two days of the month along the south coasts of England and Ireland and resulted in many accidents to shipping in the English Channel and St. George's Channel.

Miscellaneous Phenomena.—Solar and lunar halos were frequently seen. The solar halos observed at Armagh and Dublin (City) on the 16th and at Oxford on the 18th were each accompanied by a parhelion. Aurora was seen in Orkney on the 2nd and 9th and in Shetland on the 10th, also at Dublin (City) on the 18th, and a lunar rainbow at Ross-on-Wye on the 25th.