RESULTS

OF THE

MAGNETICAL AND METEOROLOGICAL OBSERVATIONS

MADE AT

THE ROYAL OBSERVATORY, GREENWICH,

IN THE YEAR

1916

UNDER THE DIRECTION OF

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ASTRONOMER ROYAL.

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1915. p. E 58 (upper), col. 13, 3^h, *for* 89 *read* 90.
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,, 15, ,, 4·3 ,, 3·8.
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p. E 70 (upper) col. 4, 17^h, ,, 81 *read* 82.
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(lower), col. 20, for the year, *for* 0·270 *read* 0·289.
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GREENWICH MAGNETICAL AND METEOROLOGICAL OBSERVATIONS, 1916.

INTRODUCTION.

In the present volume a brief account is given of the instruments and methods of reduction now in use. Fuller information, principally of a historical nature, may be found in the Introductions to the volumes for 1909 and previous years.

§ 1. *Personal Establishment and Arrangements.*

During the year 1916 the personal establishment in the Magnetical and Meteorological Department of the Royal Observatory consisted of Walter William Bryant, Superintendent, aided generally by four Computers. The Computers employed during the year were:—H. R. Wright, S. W. Palmer, G. F. Wells, E. H. Tibbitts, Miss E. D. Lang, and three Belgian refugees—T. Van Dingenen, R. Dagonnier, and G. Brenez.

§ 2. *General Description of the Buildings and Instruments of the Magnetical and Meteorological Observatory.*

For detailed historical information regarding the old buildings and instruments, reference should be made to the Introductions to earlier volumes of these observations.

The old instruments for photographic registration of changes in the atmospheric pressure and vertical magnetic force are situated in an underground chamber (known as the Magnet Basement); this chamber is kept at a nearly uniform temperature by means of gas stoves. The small variations of temperature are recorded on a Richard thermograph.

In a wooden building (called the Magnet House) above this chamber are placed the standard barometer and a Thomson electrometer for photographic registration of the variations of atmospheric electricity. A platform erected above the roof of the Magnet House is used for nephoscope observations of cloud in connection with International Balloon Ascents.

Near the Magnet House are the earth thermometers, the photographic dry and wet-bulb thermometer apparatus, and a set of dry-bulb, wet-bulb, and maximum and minimum thermometers in a Stevenson screen.

The Magnet House is built of non-magnetic material, but during the years 1891–1898 considerable masses of iron were introduced into its neighbourhood by the building of certain additions to the Observatory. Hence the instruments which were formerly placed in the Magnet House, for absolute determinations of magnetic declination, dip, and horizontal force, were transferred to the Magnetic Pavilion. This building is constructed of non-magnetic materials, and stands in an enclosure in Greenwich Park, 350 yards to the east of the Observatory, on a site carefully chosen for its freedom from abnormal magnetic conditions. In the enclosure there are two sets of thermometers used for ordinary eye observations, thermometers for solar and terrestrial radiation, and two rain-gauges.

The anemometers, three rain-gauges, and the sunshine recorder are fixed above the roof of the Octagon Room (the ancient part of the Observatory).

For a detailed description of the New Magnetograph House, which was completed in 1914, reference should be made to the Greenwich Observations for 1915.

The New Magnetograph House stands 50 feet north-west of the Magnetic Pavilion in which the absolute magnetic observations are made. The recording instruments are situated in a small inner chamber 15 feet long, 12 feet wide, and 8 feet high. This chamber is supported on small concrete piers and surrounded by an outer chamber, whose walls of non-conducting material are nearly 2 feet thick. Between the walls of the two chambers is an air space of from 2 to 3 feet. The inner chamber is electrically heated by about 50 suitably insulated low-temperature non-magnetic metallic resistance strips, each consuming 25 watts. The current used is alternating, and is therefore without effect upon the magnetic registration.

The temperature is controlled by a thermostat placed in the centre of the

room, at the same level as the magnetic instruments. This actuates a relay, which switches the electric current into or out of the heating circuits.

The centres of the three instrument piers are situated as follows: For the north force instrument, 2 feet south and 2 feet 6 inches east of the north-west angle of the room; for the declination instrument, 5 feet 6 inches south and 5 feet east of the same angle; for the vertical force instrument, 2 feet north and 3 feet west of the south-east angle. The two piers which support the recording mechanism occupy the north-east and south-west corners of the room, their longer sides being in the direction of the meridian. The clocks can be wound and the recording drums inserted or removed through shuttered openings in the wall of the inner chamber. The temperature in the chamber is read daily from a thermometer attached to the north force instrument, by means of a small telescope, projecting into the room.

The Magnetograph House contains also the photographic and standard barometers. The former is mounted on the south wall of the instrument room, $5\frac{1}{2}$ feet from the south-east corner of the room. The standard barometer is situated in the passage way, being supported on a board screwed to the north-west corner pillar of the inner room.

The north force and declination instruments record on the north-east drum; the vertical force instrument and the barometer record on the other drum. Both drums are horizontal and are 10 inches long by $5\frac{1}{2}$ inches in diameter. Their normal period of revolution is 30 hours and the scale 15 mm. to the hour. The registering beams of light are focussed on the drum by an adjustable cylindrical lens. Two horizontal straight filament lamps mounted at suitable heights on the east and west walls of the chamber provide the time registration for the photographic sheets. The lamps are illumined for a period of one second centred at each exact hour of Greenwich time, the current being controlled by a relay connected to the Mean Solar clock in the Clock Room of the Observatory. The effect is to produce narrow dark hour lines right across the photographic records.

The new declination and north force variometers were in use as standards throughout the year 1916, though records were continued with the old instruments for comparative purposes until 1916 September. The old vertical force instrument was retained as standard until 1917 March, when it was replaced by a quartz fibre instrument, designed by Prof. W. Watson, and for a time used at Eskdalemuir. The photographic barometer was transferred to the new Magnetograph House on 1916 September 25. Until 1917 March 28, hourly readings of the standard

barometer were taken throughout the day and night. The standard barometer was transferred to the new Magnetograph House on 1917 April 3.

The photographic wet and dry bulb thermometers were transferred to the Magnetic Enclosure on 1917 February 21, and after this date all the magnetic and meteorological photographic registers were developed in the dark room of the new Magnetograph House.

§ 3. *Subjects of Observation in the year* 1916.

The observations comprise determinations of absolute magnetic declination, horizontal force, and dip; continuous photographic record of the variations of declination, horizontal force, and vertical force; eye observations of the ordinary meteorological instruments, including the barometer, dry and wet-bulb thermometers, radiation and earth thermometers; continuous photographic record of the variations of the barometer, dry and wet-bulb thermometers, and electrometer (for atmospheric electricity); continuous automatic record of the direction, pressure, and velocity of the wind, and of the amount of rain; registration of the duration of sunshine; general record of ordinary atmospheric changes of weather, including numerical estimation of the amount of cloud, special cloud observations in connection with the International Balloon ascents, and occasional phenomena.

Since 1885, Greenwich civil time, reckoning from midnight to midnight, and counting from 0 to 24 hours, has been employed throughout the magnetical and meteorological sections, except in regard to the sunshine registers (see p. E xxii).

§ 4. *Magnetic Instruments.*

DECLINATION MAGNET FOR ABSOLUTE DETERMINATIONS.—Since 1899 January 1, regular observations of declination have been made in the Magnetic Pavilion. The hollow cylindrical magnet Elliot No. 75 is used in conjunction with a telescope by Troughton and Simms, placed on a pier about 2 feet south of the magnet. The magnet is about 4 inches long, and at one end is an engraved glass scale for collimation. The telescope is 21 inches long, and the aperture of its object-glass is 2 inches; its horizontal circle is 16·6 inches in diameter, divided to 5′ and read by verniers to 5″. It has no vertical circle. The eye-piece has one fixed horizontal wire and one vertical wire, moved by a micrometer screw, the value of one revolution of which is 1′ 34″·2. The adopted collimation reading was $100^{r}\cdot140$.

The vertical axis of the telescope is adjusted by means of a fixed level, one division of which corresponds to 1″·15. The level correction for inequality of the pivots of the axis of the telescope was found in 1898 to be $-6^{div.}\cdot0$ or $-6''\cdot9$.

Since 1913 September the magnet has been suspended by a tungsten fibre of 0·02 mm. diameter, and about 25 cm. length. The effect of 90° of torsion is to turn the magnet through about 4′. The torsion is found to change little or not at all; it is checked at intervals, and a correction on this account is made when necessary. The collimation error is eliminated by reversing the magnet in the middle of each month, so that half the observations are made with the scale direct and half with the scale reversed (by turning the magnet through 180° in its carrier, about the longitudinal axis).

The reading of the azimuth circle corresponding to the astronomical meridian is determined by observations of Polaris, taken once a week whenever practicable.

Declination observations have been made at least thrice weekly throughout 1916.

ABSOLUTE HORIZONTAL FORCE INSTRUMENT.—This instrument is of the Kew pattern, and rests on a slate slab in the Magnetic Pavilion. A full account of its construction and use is given in earlier volumes, and will not be repeated here.

Observations of the absolute horizontal magnetic force have been made twice weekly since 1915 February. Before 1912 February they were made twice monthly, and from 1912 February to 1915 February weekly. Observations of the moment of inertia of the deflecting magnet are made monthly.

DIP INDUCTOR.—The dip inductor is used in conjunction with a Broca mirror galvanometer, with electric light and scale. Observations are made in four positions to eliminate any small errors arising from slight asymmetry in the instrument. After the first adjustment, the ring is reversed about a horizontal axis and a second adjustment obtained: the instrument is then reversed in azimuth and two further adjustments made. The circles for the measurement of inclination and azimuth are each 8 inches in diameter, and are read by means of screw micrometers to one second of arc. The levels on the base can likewise be read to one second. A detailed description of the dip inductor will be found in the volume for 1915.

The dip inductor has been adopted as the standard dip instrument from the beginning of 1914. The observations are made thrice weekly.

THE DECLINATION VARIOMETER. — This instrument consists essentially of a magnet and mirror suspended by a fine phosphor bronze fibre 30 cm. long. The torsion head to which the top of the fibre is attached is adjusted so that there shall be no torsion in the mean position of the magnet. A quarter revolution of the torsion head deflects the magnet through 8′.

The magnet consists of nine short pieces of steel 4·5 cm. long and of 1 mm. diameter, supported in an aluminium holder. The mounting of the movable mirror attached to this holder is also of aluminium. It can be turned relative to the magnet, so that the beam of light can be suitably adjusted in azimuth. The fixed mirror for base-line registration is situated beneath the magnet and mirror system. Both mirrors are of silvered glass, 2·5 cm. long and 1 cm. wide, and possess the necessary adjustments for tilt and orientation. The magnet is surrounded by copper blocks, rendering the instrument almost dead-beat.

The instrument rests on three foot-screws, which provide adjustment for level. It is completely enclosed by a tall brass cylinder with lid, resting on the concrete pier; this protects the instrument from dust, draughts, and accidental displacements. The lens which focuses the beam of light passing from lamp to mirror and mirror to drum is mounted in the side of this cylinder, the mirror chamber of the instrument itself being closed by a plane glass window.

The distance from the mirrors to the centre of the slit of the drum box is such that the scale value at the middle of the photographic sheets is 0′·585 per millimetre; at the present time (1915–20) this angle represents 3·17 γ, in terms of force. Since the beam of light, when directed towards the centre of the slit, makes an angle 11°·42′ with the normal to the drum, the scale value is not the same right across the sheet, the percentage difference of scale between the centre and edges being 0·5. This is allowed for, when necessary, in measuring the photographic traces.

The photographic sheets are changed generally at about 11 a.m. The time scale is 15 mm. per hour. The base-line value is determined from the absolute declination observations.

THE NORTH FORCE VARIOMETER. —The general construction of this instru-

ment resembles that of the declination variometer. The suspension is of quartz, however, 20 cm. long, and the magnet system contains a single magnet similar to those in the declination instrument. In other respects the magnet and mirror systems of the two instruments are identical.

The torsion head is adjusted so that the magnetic axis of the magnet system is kept in the (geographical) east-west direction. The angle between this direction and the line joining the mirror to the middle of the slit of the drum is 7° 30′. The mirror was adjusted relative to the magnetic axis so that the angle between the latter and the normal to the mirror agreed with the above angle to within a few minutes of arc. The magnet can consequently be maintained in the right direction by keeping the beam of light directed towards the middle of the photographic sheet.

The instrument is enclosed in a brass cylinder, in which is mounted the focussing lens, as in the case of the declination variometer. Through apertures in this casing also project two arms, one to the north and the other to the south of the instrument, to which they are attached. These are designed to support a deflecting magnet for the determination of the scale value of the variometer. The deflecting magnet is similar to those in the magnet system itself, but is cased in brass so as to be preserved from rust and made convenient for handling; its external diameter and length are 5 mm. and 7 cm. respectively. Deflections are made at two distances along both north and south arms, and in each position the magnet is used with its axis directed to the north and also to the south Thus eight deflections are involved in each determination of scale value. The deflected positions are recorded on the photographic sheet, and the measurement is performed subsequently. The two adopted distances of the deflecting magnet from the magnet system are 27 cm. and 32 cm. The deflecting forces at these two distances are determined monthly by deflecting the absolute horizontal force magnet in the same way; the moment of the latter being known, the angle of deflection enables the deflecting force to be calculated readily in absolute measure. It is found that the magnetic moment of the deflecting magnet is slowly diminishing; the deflecting forces at the above two distances were 252·7 γ and 153·5 γ in the mean of 1916, and the present rates of diminution of their values are 4·4 γ and 2·8 γ per year.

The scale value determinations for the north force instrument are made once weekly (prior to 1916 August they were made less frequently). Since the instrument was installed the scale value has been found to be slowly diminishing. It

has been treated as constant throughout each month, the difference from month to month being very small (less than ·01 γ per mm.). The adopted scale value for the month of 1916 January was 3·01 γ per mm., and for 1917 January was 3·09 γ per mm.

The base-line value of the instrument is determined by means of the absolute horizontal force observations, together with the absolute and photographic declination determinations. The base line is steadily changing (though at a decreasing rate), owing to the gradual diminution of the moment of the magnet system. The mean rate of change of base-line value during 1916 was 0·87 γ, and the mean annual decrease in this rate of change is 0·15 γ. The progressive change of base-line value is allowed for in the reductions.

The instrument is kept at a constant temperature, and therefore the records require no temperature correction in general. When the instrument was first set up, however, its temperature correction was determined by electrically heating the interior of the outer casing by heating coils wrapped round the outside of the latter. It was found that a rise of temperature through $t°$ C. increased the base-line value of the instrument by 5·7 $t\gamma$, no term depending on t^2 being involved. During the periods when the thermostat was out of order and under repair, the observations were corrected for temperature according to this determination.

VERTICAL FORCE VARIOMETER.—The magnet used in this instrument is $1\frac{1}{2}$ feet long, and lozenge-shaped, being broad at the centre and pointed at the ends. The steel knife-edge, which is 8 inches long, and passes through an aperture in the magnet, rests on two agate planes. The magnet is placed unsymmetrically on the knife edge, being nearer to its southern end. The axis of vibration was originally in the magnetic meridian, but is now a few degrees distant, on account of the secular change of declination.

Two steel screw stalks, carrying adjustable screw weights, are attached to the magnet, one being vertical in order to vary the sensitiveness, the other horizontal in order to adjust the balance of the magnet, which should rest in a nearly horizontal position. The magnet and supporting frame are enclosed in a wooden box with suitable glass-covered apertures. The temperature within the box is indicated by a thermometer, the bulb of which projects well into the interior of the box.

The photographic arrangements are described in previous volumes. The cylinder carrying the photographic sheet is vertical, and also receives the record

of the variations of barometric pressure. The time scale is the same as for the other magnetic registers.

The scale coefficient of the instrument is determined by the method of vibrations. When the magnet is approximately horizontal, and transverse to the magnetic meridian, the variation of the vertical force, in terms of the whole vertical force, which will produce a small angular motion θ (measured in radians) = cotan dip $\times \left(\frac{T^1}{T}\right)^2 \times \theta$; T and T^1 are the times of vibration of the magnet in the vertical and horizontal planes respectively.

Observations of T are made once a week by means of the telescope and scale provided for eye readings of the position of the magnet. The mean of 9 observations made during January and February 1916 gave the value $17^s{\cdot}380$, in close agreement with the adopted value for 1915, so that the scale values determined in 1915 were used for these two months. During the remainder of the year, the mean of 39 observations gives the value $17^s{\cdot}780$.

The time of vibration in the horizontal plane (T^1) was determined once every three years, as the observation required the removal of the magnet from its box. The magnet, with all its attached parts, was suspended from a tripod, with its broad side horizontal. The arc of vibration was kept small. Observations on 1912 January 1 gave for the time of vibration in the horizontal plane $16^s{\cdot}484$. This value has been adopted for the year 1916.

Since the distance between the concave mirror of the magnet and the surface of the cylinder is 100·2 inches, the length on the cylinder, in inches, which corresponds to a change of 0·01 part of the whole vertical force = $2 \times 100{\cdot}2 \times \tan \text{dip} \times \left(\frac{T}{T^1}\right)^2 \times 0{\cdot}01$. Taking $T = 17^s{\cdot}780$, $T^1 = 16^s{\cdot}484$, and dip = 66° 52′ 7″, this length is found to be 5·460 inches. The cardboard scale, which is used for measuring the curves for the ten months, is constructed with this as unit. The 1915 scale, based on a length of 5·220 inches, was used for January and February.

The temperature in the magnet basement is subject to slow changes during the course of a year, and the vertical force records require correction on this account. The correction is applied to the mean daily and the monthly mean hourly values, using the mean daily and monthly mean hourly values of the

temperature as recorded on a Richard thermograph, corrected by comparison with reading of a thermometer with its bulb projecting into the magnet box itself.

The correction (which is constant over the normal temperature range) is $-9{\cdot}20\ \gamma$ per 1° Fahrenheit.

THE QUARTZ-THREAD VERTICAL FORCE VARIOMETER.—For a detailed description of this instrument reference may be made to the *Philosophical Magazine*, vol. vii., sixth series, p. 393, 1904. The base of the instrument consists of a metal casting with uprights at the two ends, carrying attachments for the ends of the quartz fibre which supports the magnet system. The latter consists of two magnets, 8 cms. long and 1 mm. in diameter, which are attached by small platinum stirrups to two rods of fused quartz; these are fused to a quartz plate, the upper surface of which is optically worked and platinised to form a plane mirror. The quartz rods are drawn out at their other ends into fibres of about 0·008 to 0·010 cm. diameter; one of these is attached to a coiled quartz spring. The quartz spring and the other fibre are soldered to small brass rods fitting into clamps at the two ends of the metal base. The thread is under sufficient tension to stretch the spring through about two millimetres. A right-angled prism is supported in a frame above the mirror, so as to reflect the light in a horizontal direction; a single lens placed in front of it focusses the light on the recording drum. The prism frame is adjustable in azimuth in order to enable the trace to be brought to any desired part of the sheet. An adjustable mirror beneath the quartz fibre and adjacent to the mirror of the magnet system serves to give a base line.

The sensitiveness of the instrument is varied by adjusting the centre of gravity of the movable system. For this purpose a small vertical quartz arm is fixed to one of the rods attached to the mirror and a small piece of brass can slide on this arm, being fixed into any desired position by means of a little shellac. The sensitiveness adopted until the end of 1919 was $3{\cdot}6\ \gamma$ per mm. on the sheet. At the beginning of 1920 this was increased to $2{\cdot}0\ \gamma$ per mm.

The variometer was not at first compensated for temperature changes and was found to possess a temperature coefficient of $25\ \gamma$ per 1° C. The gradual change in the thermostat control temperature necessitated compensation; the adjustment was made by means of a small stirrup sliding on one of the magnets, and the chamber was alternately heated and cooled until, with a range in temperature of 8° C., there was no measurable displacement of the photographic trace.

SCALE VALUE OF VERTICAL FORCE VARIOMETER.—The scale value of the instrument is determined by the method of deflections, which in this case are produced electro-magnetically. The deflecting coil consists of two equal parallel circular rings of wire separated by a distance equal to their own radii. The wire is laid in V-grooves on a vulcanised fibre framework which rests permanently on the instrument pier. The leads and connections between the two separate rings are laid side by side. With such an arrangement a very uniform magnetic field is produced at the centre of the coil, when an electric current circulates in the same direction round the two circles. The diameter of each circular turn of wire is 55·6 cm., and the distance between their two centres is 27·7 cm. If x, ρ represent axial and radial co-ordinates, measured in cms. from the centre of the coil as origin, the value of the axial force magnetic force at (x, ρ), due to a current of strength A ampères, is—

$$3370A[1-0{\cdot}0080\frac{x^2-\frac{1}{2}\rho^2}{R^2}-1{\cdot}732\frac{x^4-3x^2\rho^2+\frac{3}{8}\rho^4}{R^4}- \ . \ . \ .]$$

where R is 31·06 cms., being the distance from the centre of the coil to a point on the circumference of either ring. The coil is placed so that its centre plane is horizontal, and with its centre as nearly as possible coincident with the vertical force magnets; there is no horizontal magnetic field produced by the coil in the plane of the magnets, and the vertical force produced is constant to within 0·5 per cent. throughout the space occupied by the magnets. Within this limit of error, also, an inclination of the magnets to the horizontal even by several degrees would not affect the vertical force to which they would be subject; and the horizontal forces on them, besides being inappreciable, would have a force and not a couple resultant.

In this making scale value determinations, the current is supplied by a small portable battery, and is measured by an ammeter. The current strength used is 100 milliampères, which produces a deflecting force of 337 γ, and a movement of the trace on the photographic sheets through about 92 mm. The scale value is found to be uniform across the sheets.

The scale value determinations are made weekly. The scale value was found to be constant. The adopted value is 3·66 γ per mm.

The base line value is determined from the dip observations, in conjunction with the recorded values of north force and declination. It is at present slowly decreasing.

§ 5. *Magnetic Reductions.*

The results given in the magnetic section refer to the civil day, commencing at midnight.

Before the photographic records of magnetic declination, horizontal or north force, and vertical force are discussed, they are divided into two groups—one including all days on which the traces show no particular disturbance, and which, therefore, are suitable for the determination of diurnal inequality; the other comprising days of unusual and violent disturbance, when the traces are so irregular that it appears impossible to treat them except by the exhibition of every motion of each magnet through the day. Following the principle of separation hitherto adopted, there are no days in the year 1915 which are classed as days of great disturbance. Days of lesser disturbance are January 11, March 8–10, April 25, April 28–29, August 27, and October 6–8. When two days are mentioned, it is to be understood that the reference is usually to one set of photographic sheets extending from noon to noon, and including the last half and the first half respectively of two consecutive civil days.

The mean ordinates for each complete form are measured by the aid of a transparent celluloid scale, and from the tables of these measures, for each calendar month, are obtained the mean monthly values for each hour of the day, and the mean daily value of the element for each day of the month. The daily mean is taken from the 24 mean ordinates. Tables I. to XV. contain the results for declination, north force, and vertical force. For each element the mean daily value and daily range are given for every day of the year, together with the monthly and annual mean diurnal inequalities for all days and for quiet and disturbed days (as selected by the International Committee). In the formation of diurnal inequalities it is unimportant whether a day omitted be a complete civil day, or the parts of two successive civil days making together a whole day, although in the latter case the results are not available for daily values. No days were omitted on account of great disturbance in the formation of these Tables.

By means of two stoves placed in the Basement, the temperature has been kept nearly constant throughout the year, the endeavour being to keep it as near to 67° as possible. The results in Tables III. and XII. to XV. are corrected for temperature, the corrections applied (which are mentioned in the description of the

vertical force instrument) being founded on the daily and hourly values of temperature given in Tables IIIA. and IIIB., as mentioned on p. E xiv.

The variations of declination are given in arc and those of north force and vertical force in C.G.S. measure.

The magnetic diurnal inequalities of declination, north force, and vertical force, for each month and for the year, as given in Tables IV., VIII., and XII., have been treated by the method of harmonic analysis, and the results are given in Table XVI.

In Table XVII. the absolute determinations of horizontal force are given, both as observed and also as reduced to the mean value for the month. The latter was effected by application of the difference between the north force ordinate at the time of observation and the mean value for the month, as obtained from the photographic register, taking into account also the change of declination.

As regards magnetic dip, the result of each observation of dip with the dip inductor is given in Table XVIII.; these have not been reduced to the mean value for the month, but a correction has been applied on account of the diurnal variation of dip (as deduced from Tables VIII. and XII.) in forming the monthly mean values of dip given in Table XIX.

Table XIX. contains an annual summary of the magnetic elements, giving the mean monthly values, the monthly mean diurnal ranges, and sums of hourly deviations from mean.

In Tables VI., X., and XIV. are given mean diurnal inequalities of declination, horizontal force, and vertical force derived from five quiet days each month. In Tables VII., XI., and XV. are given similar inequalities derived from five disturbed days each month, both sets of days being selected by the International Committee.

Reduced copies of the magnetograms for certain disturbed days (mentioned on p. E xii) have been printed in each volume since 1882. The list of these days since the year 1889 has been selected in concert with M. Mascart, or his successor M. Angot, so that the two Observatories of Val Joyeux (formerly of the Parc Saint

Maur) and Greenwich should publish the magnetic registers for the same days of disturbance with a view to the comparison of the results. As far as possible the days of greater disturbance are those selected by the International Committee.

The plates are followed by a brief description of other significant magnetic motions (superposed on the ordinary diurnal movement) recorded during the year.

With regard to the plates, on each day three distinct registers are usually given, viz. : declination, north force, and vertical force ; the vertical force curves are affected, slightly as compared with the amount of motion on disturbed days, by the small recorded changes of temperature of the magnet. The recorded hourly temperatures are inserted on the plates, and the temperature-corrections of the magnet are given at page E xiii. Briefly, an increase of temperature of 1° F. throws the vertical force curve downward by about 9·2 γ.

At the foot of each plate, scales, in C.G.S. measure, are given for each of the magnetic registers.

The subjoined table gives the values of Magnetic Elements determined at the Royal Observatory, Greenwich :—

Year.	Declination West.	Horizontal Force,† C.G.S. Unit.	Dip.‡	Year.	Declination West.	Horizontal Force,† C.G.S. Unit.	Dip.‡
	° ′		° ′		° ′		° ′
1841	23.16·2	..	..	1879	18.40·5	0·1805	67.37·0
1842	23.14·6	..	..	1880	18.32·6	0·1805	67.35·7
1843	23.11·7	..	69. 0·6	1881	18.27·1	0·1807	67.34·7
1844	23.15·3	..	69. 0·3	1882	18.22·3	0·1806	67.34·2
1845	22.56·7	..	68.57·5	1883	18.15·0	0·1812	67.31·7
1846	22.49·6	0·1731	68.58·1	1884	18. 7·6	0·1814	67.29·7
1847	22.51·3	0·1736	68.59·0	1885	18. 1·7	0·1817	67.28·0
1848	22.51·8	0·1731	68.54·7	1886	17.54·5	0·1818	67.27·1
1849	22.37·8	0·1733	68.51·3	1887	17.49·1	0·1819	67.26·6
1850	22.23·5	0·1738	68.46·9	1888	17.40·4	0·1822	67.25·6
1851	22.18·3	0·1744	68.40·4	1889	17.34·9	0·1823	67.24·3
1852	22.17·9	0·1745	68.42·7	1890	17.28·6	0·1825	67.23·0
1853	22.10·1	0·1748	68.44·6	1891	17.23·4	0·1827	67.21·5
1854	22. 0·8	0·1749	68.47·7	1892	17.17·4	0·1829	67.20·0
1855	21.48·4	0·1756	68.44·6	1893	17.11·4	0·1831	67.17·9
1856	21.43·5	0·1759	68.43·5	1894	17. 4·6	0·1831	67.17·4
1857	21.35·4	0·1769	68.31·1	1895	16.57·4	0·1834	67.16·1*
1858	21.30·3	0·1762	68.28·3	1896	16.51·7*	0·1835*	67.15·1*
1859	21.23·5	0·1761	68.26·9	1897	16.45·8*	0·1838	67.13·5*
1860	21.14·3	..	68.30·1	1898	16.39·2*	0·1840	67.12·1
1861	21. 5·5	0·1773	68.24·6	1899	16.34·2	0·1843	67.10·5
		0·1759	68.15·8	1900	16.29·0	0·1846	67. 8·8
1862	20.52·6	0·1763	68. 9·6	1901	16.26·0	0·1850	67. 6·4
1863	20.45·9	0·1764	68. 7·0	1902	16.22·8	0·1852	67. 3·8
1864	..	0·1767	68. 4·1	1903	16.19·1	0·1852	67. 1·2
1865	20.33·9	0·1767	68. 2·7	1904	16.15·0	0·1854	66.57·6
1866	20.28·0	0·1773	68. 1·3	1905	16. 9·9	0·1854	66.56·3
1867	20.20·5	0·1777	67.57·2	1906	16. 3·6	0·1854	66.55·6
1868	20.13·1	0·1779	67.56·5	1907	15.59·8	0·1855	66.56·2
1869	20. 4·1	0·1782	67.54·8	1908	15.53·5	0·1854	66.56·3
1870	19.53·0	0·1784	67.52·5	1909	15.47·6	0·1854	66.54·1
1871	19.41·9	0·1786	67.50·3	1910	15.41·2	0·1855	66.52·8
1872	19.36·8	0·1789	67.47·8	1911	15.33·0	0·1855	66.52·1
1873	19.33·4	0·1793	67.45·8	1912	15.24·3	0·1855	66.51·8
1874	19.28·9	0·1797	67.43·6	1913	15.15·2	0·1853	66.50·5
1875	19.21·2	0·1797	67.42·4	1914	15. 6·3	0·1853	66.51·2
1876	19. 8·3	0·1799	67.41·0	1915	14.56·5	0·1851	66.52·0
1877	18.57·2	0·1800	67.39·7	1916	14.46·9	0·1850	66.52·8
1878	18.49·3	0·1802	67.38·2				

* Corrected for the effect of the iron in the new buildings (see p. E ii).

† The values of the Horizontal Force from 1861 differ from those given in previous volumes, on account of the correction mentioned on p. E iv, 1914 volume.

‡ These values of the dip differ slightly in some instances from those given in previous volumes, on account of the correction mentioned on p. E v, 1912 volume.

In 1861 the new Unifilar Apparatus for absolute Horizontal Force and the Airy Dip-Circle were introduced, both sets of apparatus being used in that year. In 1864 the excavation of the Magnetic Basement caused the suspension of complete Declination Observations. From 1914 the Dip was determined with the Inductor.

§ 6. *Meteorological Instruments.*

STANDARD BAROMETER.—The standard barometer, mounted in 1840 on the southern wall of the western arm of the Upper Magnet Room, is Newman No. 64. Its tube is $0^{in.}\cdot565$ in diameter, and the depression of the mercury due to capillary action is $0^{in.}\cdot002$, but no correction is applied on this account. The cistern is of glass, and the graduated scale and attached rod are of brass; at its lower end the rod terminates in a point of ivory, which in observation is made just to meet the reflected image of the point as seen in the mercury. The scale is divided to $0^{in.}\cdot05$, subdivided by vernier to $0^{in.}\cdot002$. The height of the barometer above the mean level of the sea is 159 feet.

The barometer is read at 9^h, 12^h (noon), 15^h, 21^h (civil reckoning) every day. Each reading is corrected by application of an index-correction, and reduced to the temperature 32°. The readings thus found are used to determine the value of the instrumental base line on the photographic record.

PHOTOGRAPHIC BAROMETER.—The barometric record is made on the same cylinder as is used for magnetic vertical force. A siphon barometer fixed to the northern wall of the Magnet Basement is employed, the bore of the upper and lower extremities of the tube being about 1·1 inch, and that of the intermediate portion 0·3 inch. A metallic plunger, floating on the mercury in the shorter arm of the siphon, is partly supported by a counterpoise acting on a light lever, leaving a definite part of its weight to be supported by the mercury. The lever carries at its other end a vertical plate of aluminium, having a small horizontal slit, whose distance from the fulcrum is about eight times that of the point of connexion with the float, and whose vertical movement is therefore about four times that of the ordinary barometric column. The light of a gas lamp, passing through this slit and falling on a cylindrical lens, forms a spot of light on the paper. The barometer can, by screw action, be raised or lowered so as to keep the photographic trace in a convenient part of the sheet. A base line is traced on the sheet, and the record is interrupted at each hour by the clock, and occasionally by the observer, in the same way as for the magnetic registers. The length of the time scale is also the same.

The barometric scale, determined by experimentally comparing the measured movement on the paper with the observed movement of the standard barometer, is such that one inch of barometric movement is equivalent to $4^{in.}\cdot16$ on the paper.

The base lines on the barometric sheets are determined from the observations of the standard barometer. Hourly measurements are made from the sheets as in the case of the magnetic registers. As the diurnal change of temperature in the Basement is very small, no appreciable differential effect is produced on the photographic register by the expansion of the column of mercury.

THE NEW PHOTOGRAPHIC BAROMETER.—In consequence of the use of a horizontal drum for the new vertical force instrument, it became necessary to modify the lever mechanism of the photographic barometer on its removal to the Magnetograph House in 1916. On account of the optical magnification associated with a moving mirror at some distance from the instrument, the new mechanism had to be such as would reduce the motion of the plunger to a smaller amount at the end of the lever which carried the mirror. In the actual arrangement two levers are used, the one connected to the arm of the plunger resting in the free surface of the mercury, being 12 inches long from plunger to pivot. A pin with a rounded conical point is screwed into this lever at a distance of 1 inch from the pivot. On this pin rests the plane under-surface of a shorter lever, which is 4 inches long from its pivots to this pin, and is set at right angles to the first lever. Both levers are approximately horizontal in their mean position. On the short lever is mounted the moving mirror of the instrument. This mirror is 2·5 cm. long and 1 cm. wide, and is mounted horizontally in a suitable frame attached to the lever, just above its pivots. The first lever lies east and west, so that the axis about which the mirror turns is in the same direction. The motion of the beam of light is transformed so as to be horizontal by a fixed right-angled prism supported above the mirror. A lens of suitable focus is mounted in a vertical plane in front of the prism, and brings the beam of light from the straight filament lamp, which also illuminates the vertical force variometer, to a focus on the drum. A base-line mirror, similar to the moving mirror, is mounted in a vertical plane behind the lower half of this lens. Provision is made for all necessary adjustments of level and azimuth and tilt of the base line and moving beams of light.

The barometer is mounted on the south wall of the instrument chamber, at a distance of 3 feet from the vertical force instrument. The levers and optical parts are screwed to a brass plate supported on a small shelf by the side of the barometer. The instrument is 12 feet from the recording drum, and consequently the scale value of the record is 3 cm. on the sheet for 1 cm. change of height of the mercury column of the standard barometer. In the photographic barometer both arms are, near the surface of the mercury, of the same bore, so that the plunger moves through only half the change of height of the standard barometer.

The photographic sheets being 24 cm. wide, the whole range of barometric motion can be included without changing the zero, as was formerly necessary, when the scale value was 4 to 1 in place of 3 to 1 as now.

The metal parts of the instrument are all of brass or aluminium, except the cast-iron plunger disc (which is 24 mm. in diameter and 4 mm. thick) and four small pivot screws, which are of steel. These are sufficiently far from the vertical force instrument to ensure that they do not affect its records. The weight of the plunger and lever mechanism is relieved by a balance weight on the far side of the pivot, so that the plunger rests on the mercury surface without appreciably depressing it. There is some evidence of a slight difference of behaviour according to whether the barometer is rising or falling.

The scale value of the instrument is actually determined experimentally by comparison with the readings of the standard photographic barometer. Readings of the latter are taken four times daily, and from them the base-line value of the barometer is adopted, having regard to the tendency referred to in the preceding paragraph.

DRY- AND WET-BULB THERMOMETERS.—The standard dry- and wet-bulb thermometers and maximum and minimum self-registering thermometers, both dry and wet, are mounted on a revolving frame planned by Sir George Airy. This, together with details of the thermometers and the corrections applicable to them, may be found fully described in the volumes for 1912 and previous years.

Since 1899 January 4 this stand has stood in an open position in the Magnetic Pavilion enclosure.

The corrections to be applied to the thermometers in ordinary use are determined, usually once each year for the whole extent of scale actually employed, by observations at 32° in pounded ice and by comparison with the standard thermometer No. 515, kindly supplied to the Royal Observatory by the Kew Committee of the Royal Society.

The dry-bulb thermometer used throughout the year was Negretti and Zambra, No. 45354. The correction −0°·4 has been applied to the readings of this thermometer. The wet-bulb thermometer used throughout the year was Negretti and Zambra, No. 94737. The correction −0°·2 has been applied to the readings of this thermometer.

The dry- and wet-bulb thermometers are read at 9^h, 12^h (noon), 15^h, 21^h (civil reckoning) every day. Readings of the maximum and minimum thermometers are taken at 9^h, 15^h, and 21^h every day. Those of the dry- and wet-bulb thermometers are employed to correct the indications of the photographic dry- and wet-bulb thermometers.

PHOTOGRAPHIC DRY-BULB AND WET-BULB THERMOMETERS.—The apparatus which has been in use since 1887 was designed by Sir William Christie, and from 1899 to 1917 stood in the same position in the Magnet Ground. It is placed in a shed, 8 feet square, standing upon posts about 8 feet high, and open to the north. The apparatus is screened from the direct rays of the sun, without impeding the circulation of the air. The recording mechanism is similar in general plan to that already described in connection with the magnetometers in the Magnet Basement, the illumination being by gaslight. The traces consist of broad bands, due to the free passage of light to the drum, above the mercury column in the dry-bulb, and through an air-bubble in that of the wet-bulb, crossed by fine lines caused by the shadows of the graduations on the thermometer tubes. The two traces fall on the same part of the cylinder as regards time scale. The stems of the thermometers are placed close together, each being covered by a vertical metal plate having a fine vertical slit, so that light passes through only at such parts of the bore of the tube as do not contain mercury. Further details of the thermometers and recording arrangements may be found in the volume for 1912. The scale value of the records is approximately 10° per inch.

RADIATION THERMOMETERS.—These thermometers are placed in the Magnetic Pavilion enclosure, in an open position about 50 feet south-west of the building. The thermometer for solar radiation is a self-registering mercurial maximum thermometer on Negretti and Zambra's principle, with its bulb blackened, and the thermometer enclosed in a glass sphere from which the air has been exhausted. The thermometer employed was Negretti and Zambra, No. 165157. The thermometer for radiation to the sky was a self-registering spirit minimum thermometer, Negretti and Zambra, No. 140216. The thermometers are laid on short grass and freely exposed to the sky; they require no correction for index-error.

EARTH THERMOMETERS.—These four thermometers, the bulbs of which are sunk to depths of 25·6, 12·8, 6·4, and 3·2 feet below the surface, are fully described in earlier volumes. The shortest thermometer is read daily at noon, the readings being given (subject to an unknown small index correction) in the daily results. The other thermometers are read weekly on Monday at noon, but the results are

not published, as the daily readings previously printed for many years seem to offer all the information which these thermometers are likely to afford. A discussion by Professor Everett of the observations up to 1859 was given in an appendix to the volume for 1860.

OSLER'S ANEMOMETER.—This self-registering anemometer, devised by A. Follett Osler, for continuous registration of the direction and pressure of the wind and of the amount of rain, is fixed above the north-western turret of the ancient part of the observatory. The direction of the wind is registered by means of a large vane ($9^{ft.}$ $2^{in.}$ in length), connected by gearing with a rack-work carrying a pencil; the latter marks on a flat horizontally moving sheet of paper. The vane is 25 feet above the roof of the Octagon Room, 60 feet above the adjacent ground, and 215 feet above the mean level of the sea. A fixed mark on the north-eastern turret, in a known azimuth, as determined by celestial observation, is used for examining at any time the position of the direction plate over the registering table, to which reference is made by means of a direction pointer when adjusting a new sheet on the travelling board.

A circular pressure plate with an area of 192 square inches is attached two feet below the vane; moving with the latter, it is always kept directed against the wind. A light wind causes the plate to compress slender springs, the motion being registered on the horizontal sheet by a pencil connected with the plate by a flexible brass chain, which is always in tension. Higher wind pressures bring stiffer springs into play behind the plate, and the two sets of springs are adjusted by screws and clamps so as to afford fixed scales on the sheet, the scale for light winds being double that for heavy winds. The scale is determined experimentally in lbs. per square foot from time to time.

The recording sheet is changed daily at noon. The time scale, ordinarily the same as that of the magnetic registers, can be increased 24-fold by altering the gearing.

A self-registering rain gauge of peculiar construction forms part of the apparatus; this is described under the heading "Rain Gauges" in previous volumes.

ROBINSON'S ANEMOMETER.—This instrument, for registration of the horizontal movement of the air, is mounted above the roof of the Octagon Room. It was brought into use in 1866, and is of smaller size than that now usual, the four

hemispherical cups being 5 inches in diameter, the centre of each cup being 15 inches distant from the vertical axis of rotation. The cups are 21 feet above the roof of the Octagon Room, 56 feet above the adjacent ground, and 211 feet above the mean level of the sea. A motion of the recording pencil through 1 inch corresponds to horizontal motion of the air through 100 miles. The time scale is the same as for the magnetic registers, and the sheet is changed daily at noon.

In preceding volumes the values of wind velocity V given in the tables are three times the actual velocity v of the cups. From some tests of the Browning instrument, made by Mr. W. H. Dines at Hersham in 1889, on his whirling machine, it would appear that the relation between V and v is more correctly given by

$$V=4{\cdot}0+2{\cdot}0\ v,$$

and that the instrument fails to record wind velocities less than 4 miles per hour. The values of the wind velocity given by the formula $V=3\ v$ would thus be too high when V exceeds 12. Since the two formulæ agree, however, for $V=12$, the mean values of the wind velocity (which seldom differ much from 12) will be approximately correct in either case; therefore, for the sake of continuity and simplicity, the formula $V=3\ v$ will continue to be used. In this volume, however, the greatest hourly measures (p. E 74) are given according to both formulæ, and the least hourly measures omitted.

RAIN GAUGES.—During the year 1916 three rain gauges were employed, placed at different elevations above the ground, for which see page E 74 of the Meteorological Results.

The gauge No. 1 forms part of the Osler Anemometer apparatus, and is self-registering, the record being made on the sheet on which the direction and pressure of the wind are recorded. The apparatus is fully described in earlier volumes.

Gauges Nos. 2 and 3 are no longer read, and Nos. 4, 5, and 7 have been removed.

Gauge No. 6 is an 8-inch circular gauge placed with the receiving surface 5 inches above the ground in the Magnetic Pavilion enclosure, about 10 feet north-west of the thermometer stand. No. 8 is a new gauge of the same diameter, but of the modified Snowdon pattern adopted by the Meteorological Office, having its receiving surface 1 foot above the ground. It was brought into use 1908 January 1, being fixed SW by W from No. 6 with a clear space of 6 feet between the rims.

No. 6 is the Standard gauge, No. 8 is used as a check on the readings of No. 6. No. 6 is read daily, usually at 9^h, 15^h, and 21^h Greenwich civil time, and No. 8 at 9^h only as a rule.

The present height of the Standard gauge above mean sea-level is 5 feet 9 inches less than in its old position in the Observatory Grounds, before its removal to the Pavilion Enclosure.

The gauges are also read at midnight on the last day of each calendar month.

ELECTROMETER.—The electric potential of the atmosphere is measured by means of a Thomson self-recording quadrant electrometer, made by White, of Glasgow. It is situated in the Upper Magnet Room, in connection with Lord Kelvin's water-dropping apparatus, and with the usual arrangements for photographic registration. The time scale is the same as for the magnetic registers, the hourly break of trace being made by the driving-clock itself.

SUNSHINE RECORDER.—The instrument in use is of the Campbell-Stokes pattern, with 4-inch glass globe. The recorded durations are those of *bright* sunshine, no register being obtained when the sun shines faintly through fog or cloud, or is very near the horizon. The hourly results relate to *apparent* time.

Until 1896 the instrument was placed above the Magnetic Observatory, since when it has been situated on the stage, above the Octagon Room, which carries the Robinson Anemometer, about 50 feet above the ground. The glass globe formerly used was replaced in 1897 by a new one presented in 1881 by the late Mr. Campbell, as the records from 1894–1896 showed a notable falling off, pointed out by Mr. Marriott, due to deterioration of the glass of the old globe.

§ 7. *Meteorological Reductions.*

The results given in the Meteorological Section refer to the civil day, commencing at midnight.

All results in regard to atmospheric pressure, temperature of the air and of evaporation with deductions therefrom, are derived from the photographic records, excepting that the maximum and minimum values of air temperature are those given by eye observation of the ordinary maximum and minimum thermometers at 9^h, 15^h, and 21^h (civil reckoning), reference being made, however, to the photo-

graphic register when necessary to obtain the values corresponding to the civil day from midnight to midnight. The hourly readings for the elements mentioned are measured direct from the photographic curves, and reduced so as to be based fundamentally, both as regards scale and zero, on the readings of the standard barometer and dry- and wet-bulb thermometers.

The barometer results are not reduced to sea-level, neither are they corrected for the effect of gravity, by reduction to the latitude of 45°.

The mean daily temperature of the dew-point and degree of humidity are deduced from the mean daily temperatures of the air and of evaporation by use of Glaisher's *Hygrometrical Tables.* The table of factors for this purpose may be found in the Introductions for 1910 and previous years.

In the same way the mean hourly values of the dew-point temperature and degree of humidity in each month (pages E 69 and E 70) have been calculated from the corresponding mean hourly values of air and evaporation temperatures (pages E 68 and E 69).

The excess of the mean temperature of the air on each day above the average of 65 years, given in the " Daily Results of the Meteorological Observations," is found by comparing the numbers contained in column 6 with a table of average daily temperatures found by smoothing the accidental irregularities of the daily means deduced from the observations for the sixty-five years 1841–1905. In this series the mean daily temperature from 1841 to 1847 depends usually on 12 observations daily, in 1848 on 6 observations daily, and from 1849 to 1905 on 24 hourly readings from the photographic record. The smoothed numbers are given in Table VII., *Reduction of the Greenwich Meteorological Observations,* Part IV., and also in the Introduction for 1910.

The daily register of rain contained in column 16 is that recorded by the gauge No. 6, whose receiving surface is 5 inches above the ground. This gauge is read at 9^h, 15^h, and 21^h Greenwich civil time. The continuous record of Osler's self-registering gauge shows whether the amounts measured at 9^h are to be placed to the same, or to the preceding civil day; and in cases in which rain fell both before and after midnight, also gives the means of ascertaining the proper proportion of the 9^h amount which should be placed to each civil day. The number of days of rain given in the footnotes, and in the abstract tables, pages E 67 and E 74, is formed from the records of this gauge. In this numeration only those days are counted on which the fall amounted to or exceeded $0^{in.}{\cdot}005$.

The indications of atmospheric electricity are derived from Thomson's Electrometer.

No particular explanation of the anemometric results seems necessary. It may be understood generally that the greatest pressures usually occur in gusts of short duration. The " Mean of 24 Hourly Measures " was in former years the mean of 24 measures of pressure taken *at* each hour; but commencing with 1887 January 1, it is the mean of measures, each one of which is the average pressure during the hour of which the nominal hour is the middle point.

The mean amount of cloud given in the footnotes on the right-hand pages E 43 to E 65, and in the abstract table, page E 67, is the mean found from observations made at 9^h, 12^h (noon), 15^h, and 21^h of each civil day.

For understanding the divisions of time under the headings " Clouds and Weather " and " Electricity," the following remarks are necessary :—In regard to Clouds and Weather, the day is divided by columns into two parts (from midnight to noon, and from noon to midnight), and each of these parts is subdivided into two or three parts by colons (:). Thus, when there is a single colon in the first column, it denotes that the indications before it apply (roughly) to the interval from midnight to 6^h, and those following it to the interval from 6^h to noon. When there are two colons in the first column, it is to be understood that the twelve hours are divided into three nearly equal parts of four hours each. And similarly for the second column. In regard to Electricity, the results are included in one column; in this case the colons divide the whole period of 24 hours (midnight to midnight).

As regards the notation for clouds and weather, the following are the symbols which denote actual phenomena :—

a,	*aurora*	h,	*haze*	s,	*stratus*
ci,	*cirrus*	ha,	*halo*	sc,	*scud*
cl,	*clouds*	hl,	*hail*	sh, shs,	*shower* (*s*)
co,	*corona*	l,	*lightning*	sl,	*sleet*
cu,	*cumulus*	m,	*mist*	sm,	*storm*
d,	*dew*	n,	*nimbus*	sn,	*snow*
f,	*fog*	prh,	*parhelion*	sq, sqs,	*squall* (*s*)
fr,	*frost*	prs,	*paraselene*	t,	*thunder*
g,	*gale*	r,	*rain*	w,	*wind*
glm,	*gloom*				

The following are qualifying symbols used in conjunction with the above :—

c,	*continued*	li,	*light*	so,	*solar*
fq,	*frequent*	lu,	*lunar*	st,	*strong*
fr,	*frozen*	m,	*misty*	th,	*thin*
gt,	*great*	oc,	*occasional*	tk,	*thick*
ho,	*hoar*	p-cl,	*partially cloudy*	v,	*variable*
hy,	*heavy*	slt,	*slight*	vv,	*very variable*

These symbols are used in combination: thus c-hy-r denotes continued heavy rain; t-sm, thunderstorm; p-cl, partially cloudy; m-r, misty rain; and so on. In regard to clouds, cl is omitted when the type is specified: thus ci-cu denotes cirro-cumulus clouds.

Howard's nomenclature is used for clouds, and the figure indicates the proportion of sky covered by cloud, an overcast sky being represented by 10.

The following is the notation employed for electricity :—

N,	*negative*	m,	*moderate*	s,	*strong*
P,	*positive*	w,	*weak*	v,	*variable*
ss,	*very strong*	ww,	*very weak*	vv,	*very variable*

Zero potential is indicated by 0, and a dash (—) indicates accidental failure of the apparatus.

F. W. DYSON.

ROYAL OBSERVATORY, GREENWICH
1921 *March* 17.

ROYAL OBSERVATORY, GREENWICH.

RESULTS

OF

MAGNETICAL OBSERVATIONS,

1916.

TABLE I.—HOURLY MEANS OF MAGNETIC DECLINATION.

January.

14°+Tabular Quantities.

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	Mean.
1	50·5	50·5	51·0	51·1	50·9	50·8	50·7	50·7	50·9	52·1	53·4	54·2	55·0	54·3	53·2	53·2	52·1	52·0	51·8	51·3	51·1	51·2	51·1	51·1	51·8	
2*	51·0	51·0	50·9	51·0	51·0	51·0	51·0	51·0	51·0	51·5	52·3	54·0	54·2	53·6	52·4	52·1	52·0	52·3	52·2	51·3	51·0	51·0	51·1	51·4	51·7	
3	51·2	51·2	51·9	51·9	52·2	51·8	51·8	51·0	50·9	51·9	53·7	55·8	56·1	54·5	52·7	52·1	53·0	52·3	49·5	51·8	51·3	51·1	50·4	47·0	52·0	
4	48·2	48·8	50·0	50·9	51·2	51·0	50·8	51·0	51·5	52·3	54·0	55·1	55·7	54·6	54·7	54·8	52·5	51·9	51·7	51·2	50·9	50·0	50·4	50·3	51·8	
5	49·0	47·0	49·0	50·5	51·2	52·2	51·0	51·0	51·0	52·0	52·5	53·3	53·8	53·7	53·0	52·8	53·6	52·8	50·2	51·7	50·5	49·8	49·5	49·5	51·3	
6	51·0	51·0	51·0	51·2	51·5	51·2	51·0	50·8	50·7	50·9	51·8	52·8	53·3	53·5	53·3	53·3	52·6	52·7	53·0	51·0	50·0	50·5	50·0	48·5	51·5	
7	48·8	50·1	51·0	51·1	51·5	51·0	51·2	51·1	51·1	51·4	51·9	52·7	53·7	53·8	53·0	53·2	53·9	52·7	52·0	51·2	50·8	50·8	50·8	50·8	51·7	
8*	51·0	51·2	51·4	51·5	51·7	51·5	51·3	51·0	51·0	51·5	51·8	52·5	54·0	53·4	52·6	52·1	52·3	52·1	51·7	51·2	50·7	50·7	50·7	50·7	51·7	
9	51·0	51·0	51·3	51·7	51·2	51·5	51·3	51·1	51·2	51·2	51·5	52·1	53·0	53·0	52·2	52·4	54·0	53·8	52·4	51·8	51·0	50·8	49·9	50·3	51·8	
10**	50·5	50·1	50·9	51·5	51·9	51·5	51·5	51·5	51·7	52·0	53·0	53·0	52·8	52·0	52·0	53·8	56·6	59·1	56·8	55·8	50·0	52·1	47·3	46·7	52·3	
11**	47·5	49·0	51·0	51·3	50·9	50·0	51·8	55·0	57·0	56·8	55·1	55·0	54·4	54·0	52·7	51·2	51·0	52·0	43·3	43·3	41·5	32·6	37·0	43·5	49·5	
12**	45·2	50·0	47·5	51·5	48·4	50·6	51·2	51·9	52·0	53·0	54·4	53·9	53·0	53·0	52·4	52·2	52·2	52·3	51·7	51·0	47·3	40·0	44·5	46·1	50·3	
13	49·0	50·0	55·7	60·7	53·5	51·2	51·5	50·0	50·0	50·8	52·3	53·7	55·0	54·4	53·0	51·0	50·5	50·0	50·3	50·0	47·7	46·0	49·4	50·7	51·5	
14	51·5	51·3	51·8	51·2	51·0	51·0	51·0	50·8	51·0	51·2	52·5	53·7	54·4	54·0	52·7	51·5	51·5	51·7	51·7	51·6	50·9	49·8	50·5	50·9	51·6	
15*	51·2	51·3	51·7	51·5	50·5	50·3	50·5	50·4	50·4	50·8	51·6	54·0	54·8	54·8	53·0	52·0	51·8	51·8	51·0	51·4	51·0	50·1	50·3	50·8	51·5	
16	51·0	51·2	51·0	51·0	50·8	50·7	50·7	50·7	50·7	51·6	52·5	53·7	54·5	55·5	53·5	52·2	51·8	50·2	50·3	50·7	48·5	48·7	50·2	50·8	51·4	
17*	50·2	51·0	52·3	50·8	50·8	51·0	51·0	50·6	50·6	50·5	50·7	51·3	52·6	53·0	52·0	52·0	52·0	51·8	51·6	51·2	51·0	50·8	50·7	51·0	51·3	
18	50·8	51·7	50·8	49·7	50·0	51·0	51·0	50·7	50·2	50·0	51·0	52·0	53·0	53·0	52·2	52·1	52·0	52·0	51·3	47·7	50·0	51·0	50·7	50·7	51·0	
19*	50·8	51·0	50·8	50·8	50·8	50·8	50·6	50·4	50·3	50·3	50·6	52·0	53·0	52·5	51·8	51·8	52·0	52·0	51·8	51·3	50·0	50·0	50·5	50·5	51·1	
20**	51·1	51·0	51·3	51·8	52·0	51·3	50·7	51·5	51·0	51·0	50·5	51·0	53·1	54·3	57·0	57·9	53·2	51·6	46·2	47·7	50·0	49·1	46·0	45·5	51·1	
21	46·6	48·0	49·5	49·8	50·8	50·0	50·8	50·8	50·3	50·0	51·0	52·5	53·9	55·0	53·8	52·9	53·6	53·2	53·2	51·0	49·7	50·2	50·0	50·0	51·1	
22	50·5	50·4	50·7	50·7	49·0	49·0	50·5	50·8	51·0	51·2	54·4	56·8	56·4	59·0	58·2	52·8	55·0	53·3	53·0	52·5	48·0	51·5	48·7	46·3	52·1	
23**	42·0	40·0	43·5	44·2	45·6	46·9	52·0	52·4	50·5	50·0	50·2	53·0	55·8	55·2	55·0	52·5	52·8	46·8	50·0	51·3	50·7	47·0	48·4	51·3	49·5	
24	50·4	49·4	50·2	50·2	50·0	50·2	50·8	50·7	51·7	52·5	52·3	52·8	53·0	53·5	52·7	52·0	52·0	52·2	51·8	51·1	50·8	49·9	50·0	49·5	51·2	
25	50·0	49·7	51·0	51·5	50·3	50·0	51·3	51·8	53·1	54·8	53·9	55·2	56·4	56·2	55·0	51·2	52·2	46·8	45·7	51·1	50·7	49·8	49·0	48·5	51·5	
26	50·5	52·7	51·0	48·7	48·8	50·0	50·3	50·5	51·0	52·0	54·0	54·7	55·3	55·0	54·0	51·2	51·3	51·7	49·5	49·2	51·1	51·0	49·7	50·1	51·4	
27	49·5	49·9	50·0	50·0	49·2	50·0	50·0	50·3	51·0	51·5	52·3	53·7	55·1	54·4	53·0	52·0	52·0	52·5	52·5	52·2	51·5	50·0	50·0	49·8	51·4	
28	49·0	49·2	49·8	49·1	49·7	50·0	49·8	49·7	49·7	50·0	51·4	53·0	53·8	54·0	52·5	52·0	52·0	52·0	51·8	52·0	49·7	48·5	50·2	51·0	50·8	
29	50·4	50·0	54·5	48·2	48·9	49·5	50·0	50·0	50·0	50·5	51·6	53·1	54·5	55·5	54·1	52·0	51·7	51·0	51·2	51·6	51·0	49·7	47·5	49·9	51·1	
30	50·8	51·0	51·0	50·8	50·2	51·0	51·1	50·2	49·7	49·7	51·1	51·9	53·2	53·2	52·7	52·0	51·5	51·4	51·7	51·7	50·8	48·9	49·2	51·0	51·1	
31	50·9	51·0	51·0	50·8	50·8	50·9	50·8	50·8	50·2	50·0	50·5	51·3	52·0	53·8	54·0	53·0	52·2	52·0	49·7	51·1	50·3	49·4	48·5	49·8	51·0	
Mean	49·7	50·0	50·8	50·9	50·5	50·6	50·9	51·0	51·1	51·5	52·3	53·4	54·2	54·2	53·4	52·5	52·5	51·9	51·0	50·9	50·0	49·1	49·1	49·5	51·3	
Mean*	50·8	51·1	51·4	51·1	51·0	50·9	50·9	50·7	50·7	50·9	51·4	52·8	53·7	53·5	52·4	52·0	52·0	52·0	51·7	51·3	50·7	50·5	50·7	50·9	51·5	
Mean**	47·4	48·0	48·8	50·1	49·8	50·1	51·4	52·5	52·4	52·6	52·6	53·2	53·9	53·7	53·8	53·5	53·2	52·4	49·6	49·8	47·9	44·2	44·6	46·6	50·5	

February.

14°+Tabular Quantities.

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	Mean.
1*	50·8	50·8	51·0	50·7	50·5	49·8	50·0	49·5	49·0	50·0	50·7	52·1	53·8	54·4	53·0	52·0	51·5	51·1	50·6	50·7	50·3	50·0	50·0	51·1	51·0	
2	50·0	50·8	50·1	50·8	50·7	50·2	50·0	49·9	49·2	49·3	50·5	52·1	54·0	54·5	54·2	52·2	51·3	50·8	51·0	50·9	50·2	49·9	49·4	49·2	50·9	
3	49·0	51·0	50·7	50·8	50·9	50·2	50·0	49·8	49·2	49·0	50·8	52·0	53·0	53·7	53·0	52·1	51·5	51·0	50·5	50·3	50·0	50·0	50·0	50·0	50·8	
4	50·2	50·8	51·0	51·0	50·9	50·5	50·2	49·9	48·9	48·5	50·3	52·5	53·8	54·3	54·0	53·5	54·2	54·5	54·0	53·1	50·2	49·8	49·1	49·6	51·5	
5	50·0	50·2	51·0	51·0	50·8	50·8	50·0	49·7	48·8	48·7	50·9	52·0	54·9	55·8	54·4	55·0	54·8	52·7	53·5	50·7	55·6	48·7	48·4	46·5	51·5	
6*	49·4	48·5	50·0	50·0	50·0	50·0	49·2	49·4	49·2	49·8	51·0	52·5	54·1	55·2	54·2	53·0	52·9	52·1	51·5	50·0	49·5	47·5	47·7	48·3	50·6	
7	48·3	48·7	49·4	49·5	49·9	49·8	50·0	49·8	49·8	50·0	50·0	50·7	51·7	52·8	53·2	53·2	52·7	52·0	51·5	51·2	51·0	50·4	49·9	49·7	50·6	
8**	49·1	48·3	48·2	48·7	49·0	49·1	49·8	49·9	50·0	49·7	51·9	55·0	56·5	59·3	56·1	54·8	53·2	51·5	51·4	50·3	43·8	42·0	48·8	48·0	50·6	
9	49·7	50·3	50·0	50·1	50·5	50·5	50·1	49·7	48·2	48·0	50·1	52·5	54·4	55·5	54·5	53·8	53·0	50·5	51·0	50·0	48·9	49·5	49·5	49·1	50·8	
10	48·3	50·4	50·5	50·5	50·3	50·3	50·5	49·5	48·5	48·5	50·5	52·0	53·2	54·0	53·8	52·8	52·8	52·5	52·0	51·5	50·0	48·7	49·7	49·6	50·9	
11	48·8	48·6	50·0	50·1	50·8	50·7	50·0	50·0	49·0	48·2	50·7	51·3	53·2	54·2	54·8	54·0	52·9	52·0	51·3	51·8	49·8	49·8	49·7	50·0	50·9	
12**	50·1	50·5	50·5	51·2	50·5	49·5	49·5	49·5	48·5	48·2	50·1	54·1	56·0	56·9	55·3	52·6	53·1	52·9	50·2	48·6	46·5	50·0	49·8	50·5	51·0	
13	50·1	50·1	52·4	50·9	49·8	49·7	49·4	49·2	48·8	48·2	49·7	51·2	52·9	53·2	53·0	52·1	51·7	51·0	50·9	50·6	50·0	49·7	45·3	47·2	50·3	
14	48·4	48·7	49·0	49·6	50·3	50·5	50·0	50·0	50·0	48·7	49·2	51·2	53·8	54·5	53·5	52·0	50·0	50·3	50·9	50·8	50·0	49·5	48·5	49·0	50·4	
15	49·9	50·0	50·1	51·4	50·2	51·5	49·9	50·0	49·5	48·9	49·9	52·5	54·4	55·0	54·0	52·7	51·7	51·3	51·0	51·0	50·2	49·8	48·7	49·5	51·0	
16*	50·1	50·2	50·6	51·1	50·3	49·5	49·5	49·4	48·8	48·5	50·2	51·8	52·7	52·7	52·1	51·7	51·2	51·0	50·7	50·6	50·3	50·0	50·0	50·0	50·5	
17**	50·0	50·0	50·0	50·0	50·0	50·0	50·0	49·5	49·0	48·5	48·2	49·9	52·0	52·9	53·2	52·6	51·9	51·4	49·4	50·0	51·1	50·5	49·9	49·2	50·4	
18**	48·0	42·0	42·3	46·5	49·0	47·5	48·2	48·4	48·6	49·3	51·8	51·0	53·5	56·7	54·0	53·5	50·8	51·5	51·7	46·0	46·0	46·0	48·5	49·2	49·2	
19	49·5	47·5	48·5	48·2	49·0	48·0	48·0	48·1	48·3	48·3	48·8	53·8	55·0	56·3	55·5	53·6	53·5	51·0	51·2	50·1	48·8	46·8	49·1	50·0	50·3	
20	50·0	50·0	49·7	50·0	50·8	49·0	49·0	48·5	48·0	48·3	49·6	52·5	53·7	54·0	54·0	53·7	52·0	50·2	51·0	48·4	47·2	48·5	47·5	48·7	50·2	
21*	49·0	49·5	50·1	50·5	50·4	50·0	49·8	49·1	48·7	47·7	46·8	48·3	51·0	53·4	55·7	55·0	52·1	51·2	50·5	50·0	50·0	49·5	49·5	49·5	50·3	
22	49·5	48·8	48·5	49·2	48·3	51·0	48·5	48·2	47·3	47·5	48·7	52·5	55·0	56·0	55·2	54·4	52·5	51·2	51·0	50·0	49·6	49·3	49·2	49·2	50·4	
23	50·0	50·0	50·0	50·5	50·0	49·5	49·0	49·0	48·1	47·8	49·4	51·0	53·2	55·2	55·3	52·8	51·8	51·2	50·9	50·5	47·9	44·4	44·2	47·0	49·9	
24	39·5	43·2	48·5	49·0	49·4	49·5	48·5	48·5	47·8	48·0	49·2	51·8	53·8	54·1	53·7	52·3	51·2	50·8	50·6	49·7	50·3	50·0	49·7	49·7	49·5	
25*	49·5	49·4	49·4	49·5	49·5	49·4	50·3	49·4	48·3	47·5	48·0	48·8	52·0	53·2	53·8	52·5	51·2	50·5	50·5	50·8	50·8	49·8	49·0	49·4	50·1	
26	49·3	49·3	48·9	49·0	49·0	49·1	49·5	49·5	48·7	48·0	49·4	52·0	54·0	55·0	55·4	54·5	53·0	50·2	53·0	51·5	50·8	50·0	47·9	46·0	50·5	
27**	47·0	49·0	49·7	49·8	50·2	50·0	50·0	49·3	48·3	48·0	49·5	51·8	53·5	55·0	54·0	53·6	52·7	52·5	51·0	41·7	44·6	48·7	49·3	49·8	50·0	
28	49·5	48·8	49·4	49·7	49·8	49·3	50·0	50·3	48·6	48·0	49·6	51·2	52·8	54·0	54·0	53·0	51·9	51·0	50·7	50·3	50·2	48·9	49·0	49·3	50·4	
29	49·7	49·8	49·8	49·7	49·7	49·5	49·5	49·1	48·0	48·0	49·0	51·2	54·0	55·5	55·5	53·9	51·9	50·7	50·8	50·4	50·0	49·8	49·7	49·0	50·6	
Mean	49·0	49·5	49·6	50·0	50·0	49·8	49·6	49·4	48·7	48·5	49·8	51·8	53·7	54·7	54·2	53·2	52·2	51·1	51·2	50·1	49·4	48·9	48·9	49·1	50·5	
Mean*	49·6	49·7	50·2	50·4	50·1	49·7	49·8	49·4	48·8	48·7	49·3	50·7	52·7	53·8	53·8	52·8	51·8	51·2	50·8	50·4	50·2	49·4	49·2	49·7	50·5	
Mean**	48·8	48·0	48·1	49·2	49·7	49·2	49·5	49·3	48·9	48·7	50·3	52·4	54·3	56·2	54·5	53·4	52·3	52·0	50·7	47·3	46·4	47·4	49·3	49·3	50·2	

TABLE I.—HOURLY MEANS OF MAGNETIC DECLINATION—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h
March.	14°+Tabular Quantities.																								Mean.
1*	49·2	49·2	49·2	49·5	49·7	49·4	49·1	48·5	47·5	47·4	48·0	50·0	52·7	54·2	54·0	53·1	51·8	51·0	50·3	50·0	50·0	48·7	48·8	48·8	50·0
2	49·8	49·7	49·7	50·0	49·7	49·5	49·3	48·7	47·5	46·6	46·8	49·5	53·7	55·7	55·0	54·0	52·5	51·7	51·0	51·0	51·2	50·5	48·0	45·3	50·3
3	44·5	43·4	46·2	45·0	45·3	47·1	47·9	52·0	50·2	49·1	50·5	54·0	58·1	60·5	56·6	56·2	53·0	51·0	47·5	49·0	49·3	47·5	38·7	42·9	49·4
4	43·3	46·1	48·0	48·2	48·5	48·5	48·9	48·8	48·3	48·5	50·8	53·0	55·0	55·0	54·0	53·0	50·9	50·9	50·8	50·2	50·0	49·0	48·5	49·3	49·9
5	47·3	47·8	47·5	48·7	47·5	48·0	48·0	48·0	47·7	48·5	51·0	55·0	58·0	58·1	57·5	57·0	55·9	54·0	51·5	50·0	46·7	43·4	42·6	44·8	50·2
6	44·6	45·9	49·0	49·3	49·1	48·5	48·5	48·0	46·7	47·7	48·7	53·2	56·7	55·8	55·5	54·3	53·5	50·7	46·8	48·0	45·2	40·5	43·0	42·0	48·8
7	42·2	41·5	44·0	40·0	44·1	45·7	46·0	46·0	45·9	47·2	50·7	54·2	56·2	56·0	55·1	53·5	52·8	52·1	51·8	51·8	52·2	52·0	50·5	49·7	49·2
8**	49·0	47 4	47·7	47·7	48·1	48·2	48·7	48·0	47·8	47·7	51·2	54·0	60·1	63·1	63·2	61·7	54·5	51·7	51·5	51·1	42·3	46·4	50·0	50·5	51·3
9**	50·0	47·6	39·7	49·0	52·0	51·2	50·1	45·2	46·7	52·0	54·0	53·4	58·7	58·5	55·2	57·0	51·3	37·6	36·8	38·2	46·3	46·2	48·1	46·0	48·8
10**	37·0	37·4	50·2	49·0	48·3	48·9	48·7	47·0	46·5	46·2	48·7	50·9	53·7	55·0	57·7	55·4	54·0	36·9	46·1	50·4	47·6	47·0	45·7	49·0	48·2
11	49·0	48·0	48·8	49·4	48·7	48·7	48·8	47·8	47·0	48·1	49·2	52·1	54·7	56·7	56·0	55·0	53·5	52·2	51·6	49·8	49·7	48·5	49·5	49·0	50·5
12	48·6	51·7	51·5	50·0	48·4	48·3	48·8	48·7	48·1	46·7	47·7	50·2	52·7	54·0	54·3	53·1	51·7	51·0	50·0	49·8	49·2	47·0	48·6	48·8	50·5
13*	49·0	48·7	48·5	48·8	48·7	48·7	48·5	47·7	46·6	46·8	48·2	48·4	52·7	53·7	53·8	52·4	51·2	50·5	50·1	49·5	49·4	49·3	49·1	49·1	49·6
14	49·0	48·8	48·9	49·9	49·0	47·2	47·5	47·2	47·0	48·0	49·8	51·7	52·8	53·0	53·3	52·9	51·1	50·7	51·0	49·8	49·5	48·0	47·0	46·8	49·6
15*	47·5	48·0	48·2	48·7	48·5	47·5	47·8	46·5	47·0	47·5	49·0	51·0	53·0	54·0	53·5	52·0	50·6	49·8	49·7	50·0	49·5	49·7	47·3	47·5	49·3
16	48·5	49·0	48·7	48·4	48·3	48·0	47·3	47·0	46·8	47·2	49·0	51·0	53·2	54·0	53·7	52·8	51·2	50·3	50·0	49·5	46·2	48·0	48·3	47·7	49·3
17	41·7	39·9	39·0	39·0	51·4	57·4	53·8	55·2	50·0	48·3	48·9	51·5	52·7	53·0	53·0	51·9	51·1	49·0	47·7	47·7	44·5	40·2	41·5	44·7	48·0
18	48·3	48·0	47·3	46·0	49·0	45·2	45·9	46·4	46·7	47·7	51·0	55·1	57·0	57·5	55·6	54·0	52·5	50·2	49·0	47·9	47·6	44·3	45·4	48·5	49·4
19	48·0	48·3	51·0	47·0	46·5	46·4	46·5	47·0	46·8	50·0	53·0	56·5	57·0	56·0	55·5	53·5	51·8	49·5	41·1	47·0	44·0	45·7	45·3	46·2	49·2
20	47·0	47·5	50·3	48·5	47·2	47·8	47·3	46·5	46·2	48·8	52·2	54·0	58·1	59·5	57·5	55·5	53·4	51·0	44·0	43·0	40·0	46·7	48·0	48·0	49·5
21	53·0	44·7	42·7	41·0	41·7	47·0	46·5	44·8	46·8	47·3	50·7	53·9	56·7	57·0	53·4	51·3	50·5	49·8	47·5	46·8	46·7	48·0	47·9	46·3	48·4
22	46·0	46·9	47·0	47·5	47·1	46·5	46·0	45·0	44·8	46·0	49·6	52·3	53·5	54·2	53·5	52·5	50·5	50·0	48·2	47·0	48·5	48·2	48·0	46·5	48·6
23*	46·0	47·7	48·3	48·2	48·5	48·2	46·7	44·8	44·2	45·0	47·0	52·2	56·0	57·0	56·3	54·0	52·0	51·2	50·1	50·0	49·5	48·1	43·7	45·5	49·2
24	46·8	47·8	48·3	47·5	48·0	47·8	46·4	45·0	44·0	45·9	49·7	55·3	59·5	61·0	62·0	65·6	63·8	58·6	51·2	51·2	43·1	47·5	47·0	45·1	51·2
25	42·1	45·6	47·0	46·2	47·0	46·7	46·7	46·7	46·2	46·7	50·7	54·0	56·6	56·7	55·8	53·0	51·2	51·0	51·0	44·7	41·2	38·2	36·3	41·9	47·6
26	44·7	47·0	47·8	49·0	47·0	46·2	47·2	46·0	45·0	47·2	49·8	54·7	56·2	56·0	54·0	52·0	50·0	48·4	49·2	49·0	49·0	49·0	48·8	48·5	49·2
27*	49·1	48·0	48·1	47·9	48·0	47·6	47·0	45·0	44·5	46·0	48·7	52·9	54·5	54·0	52·8	51·0	49·5	49·2	49·8	49·8	49·5	49·1	49·1	48·8	49·2
28	48·5	48·2	48·0	48·0	47·7	47·0	46·0	44·0	44·0	45·6	48·8	52·0	53·2	54·7	54·0	52·5	51·0	50·3	50·3	50·0	49·6	49·1	49·0	48·9	49·2
29**	48·7	47·7	47·9	48·2	49·9	47·4	45·8	43·5	45·4	49·0	54·9	59·4	60·0	57·8	54·8	56·0	51·9	50·3	50·9	51·5	46·0	40·8	36·6	39·8	49·3
30**	33·8	42·7	45·7	46·7	45·0	46·2	49·0	49·0	49·0	54·0	59·7	58·8	56·3	56·3	54·7	52·8	47·5	47·4	49·5	48·0	46·5	44·4	47·8	48·5	49·1
31	48·5	48·5	48·5	48·0	48·0	47·0	46·2	51·0	52·0	49·0	51·2	55·3	59·0	59·7	60·0	55·0	53·0	49·8	47·0	48·7	48·8	46·5	44·7	43·3	50·4
Mean	46·5	46·7	47·2	47·4	47·9	48·0	47·8	47·3	46·9	47·5	50·3	53·2	55·8	56·4	55·5	54·3	52·2	49·9	48·8	48·7	47·4	46·7	46·2	47·0	49·4
Mean*	48·2	48·3	48·5	48·6	48·7	48·3	47·8	46·5	46·0	46·5	48·2	50·9	53·8	54·6	54·1	52·5	51·0	50·3	50·0	49·9	49·6	49·0	47·6	47·9	49·5
Mean**	43·7	44·6	46·2	48·1	48·7	48·4	48·5	46·5	47·1	49·8	53·7	55·3	57·8	58·1	57·1	56·6	51·8	44·8	47·0	47·8	45·7	45·0	45·6	46·8	49·4
April.	14°+Tabular Quantities.																								Mean.
1	48·4	46·2	43·2	45·3	47·2	44·8	45·8	45·0	46·0	46·2	50·0	54·8	57·8	59·0	55·0	53·8	50·4	47·9	47·5	44·2	47·8	46·9	45·0	46·9	48·6
2	47·0	50·0	50·2	48·9	48·3	47·7	46·0	43·7	43·0	45·9	50·0	53·9	55·5	55·5	54·4	52·2	50·5	49·0	47·3	47·5	48·5	49·5	49·3	49·0	49·3
3	48·8	49·8	48·8	48·0	47·5	47·0	46·0	44·0	43·8	46·0	49·7	53·2	55·1	55·0	54·0	52·0	49·8	49·0	48·4	47·7	48·7	48·9	48·4	48·6	49·5
4*	47·0	47·0	46·6	47·0	47·0	46·9	45·4	42·8	41·0	42·3	46·0	51·0	55·4	58·0	57·0	54·2	52·4	51·0	50·1	49·7	48·1	48·2	48·2	48·1	48·7
5*	47·8	47·0	46·8	47·0	47·2	47·0	46·3	44·2	42·7	43·7	47·2	51·5	55·0	57·3	57·0	55·3	53·5	52·0	51·4	51·0	50·0	49·4	48·8	48·2	49·4
6	48·0	47·9	48·0	48·5	49·0	49·7	48·7	44·8	42·9	43·0	45·7	50·5	55·0	57·7	58·7	55·0	52·3	50·5	49·2	49·3	49·0	49·0	48·2	47·8	49·6
7	48·5	48·4	48·5	49·0	49·0	48·1	47·0	44·0	42·8	44·5	47·9	51·0	54·2	56·0	55·2	52·2	50·0	48·7	46·7	48·6	48·5	48·5	46·7	46·0	48·7
8	43·4	44·5	46·3	49·9	47·2	47·2	45·8	44·0	43·0	43·9	48·3	53·9	58·0	60·0	55·4	53·5	51·0	49·2	48·7	49·2	49·0	48·9	48·5	48·4	49·0
9	48·2	48·1	48·0	47·9	48·0	47·6	45·5	43·6	43·0	44·7	48·2	51·0	54·9	55·8	54·5	53·0	51·0	50·0	49·3	49·5	49·5	49·2	49·0	48·7	49·1
10*	48·2	48·6	47·4	47·2	47·2	47·0	46·0	44·4	43·8	45·3	47·9	51·8	54·6	56·0	55·2	53·0	51·0	49·5	48·7	49·0	49·0	49·2	49·0	48·8	49·1
11	48·5	48·1	47·7	47·8	47·5	46·9	45·2	43·7	43·0	44·7	47·3	52·4	55·7	56·0	53·8	51·1	49·4	48·5	48·1	47·9	46·5	46·6	46·0	48·0	48·7
12	47·9	47·7	46·5	47·0	47·6	48·0	46·0	44·0	43·5	45·2	48·8	52·3	55·3	55·0	53·0	52·0	50·5	49·8	49·0	48·6	48·0	47·0	48·0	48·2	48·7
13*	48·3	49·0	48·0	47·5	47·3	46·5	45·0	44·7	44·3	46·2	49·2	51·8	54·0	55·0	54·0	51·8	50·0	49·2	49·2	49·3	49·1	47·8	48·6	49·0	48·9
14	48·7	48·2	47·6	47·8	47·1	46·4	45·2	44·5	43·7	44·9	47·0	50·8	54·0	55·0	54·0	53·0	51·9	49·8	48·4	48·9	49·3	46·3	43·5	47·2	48·4
15	49·8	46·3	46·1	47·2	46·7	46·0	44·9	44·2	45·2	48·0	51·3	55·3	57·5	58·2	57·6	55·3	52·9	46·8	43·7	44·3	46·8	48·2	49·8	51·9	49·3
16	53·7	48·4	41·3	43·4	46·9	48·3	47·3	46·1	46·4	47·9	50·6	54·6	58·0	58·6	56·6	55·6	52·1	49·9	45·8	49·2	48·6	49·3	49·0	49·5	49·9
17	49·3	49·0	49·0	48·8	48·5	48·2	47·1	44·7	43·2	45·5	49·0	53·0	55·5	56·4	55·0	51·6	50·0	49·0	47·4	45·4	47·0	47·8	47·2	46·8	48·9
18	46·9	46·0	46·0	46·1	46·0	48·0	50·5	48·5	50·9	49·2	51·5	55·2	57·3	58·4	57·7	57·5	55·2	52·7	49·6	48·0	46·5	46·2	44·0	43·1	50·0
19	47·0	47·5	47·2	46·5	46·5	45·5	44·6	43·7	42·7	43·7	48·0	52·0	54·0	56·0	56·0	54·0	52·0	50·8	49·7	49·7	49·3	49·0	48·9	47·5	48·8
20	47·0	46·3	45·8	45·5	46·0	45·8	44·7	42·8	42·0	43·8	46·9	51·1	54·9	55·0	54·8	53·0	52·6	51·0	49·8	44·7	45·0	45·7	47·0	47·6	47·8
21	47·0	50·0	49·2	47·5	47·2	46·6	45·0	43·2	43·3	45·2	48·5	51·8	56·0	57·0	56·0	53·1	51·6	49·9	48·7	48·5	48·0	47·0	48·2	48·1	49·0
22	48·2	48·6	50·5	47·5	45·5	46·0	46·0	44·8	44·3	44·0	46·1	50·8	52·8	53·9	53·4	52·0	50·5	48·8	47·8	48·3	48·2	47·3	47·5	47·5	48·3
23	47·1	47·2	47·0	47·0	47·5	48·3	48·2	49·0	48·6	47·8	48·9	49·9	53·2	54·5	53·0	51·5	50·7	49·8	48·1	48·4	49·0	48·9	48·4	48·1	49·2
24*	47·7	47·3	48·0	47·5	46·3	46·0	45·0	42·5	42·0	43·2	49·2	51·2	52·0	52·0	51·6	51·2	50·7	49·0	48·6	49·0	49·0	48·7	47·9	47·0	48·0
25**	47·0	47·0	47·0	46·5	45·7	46·0	46·8	44·4	43·9	44·0	48·0	52·8	53·8	57·6	59·5	60·7	58·5	50·9	45·3	39·1	44·3	44·4	38·2	42·0	48·1
26**	46·5	38·1	40·7	40·9	44·0	45·8	44·7	46·3	46·0	47·8	50·2	54·0	54·9	54·4	54·1	51·5	50·5	50·3	49·7	48·8	46·0	44·2	47·0	47·7	47·7
27**	51·4	45·2	46·0	48·0	47·9	47·0	46·8	45·4	46·0	48·0	50·9	54·0	56·0	60·5	55·8	54·0	53·0	52·1	47·7	46·5	43·7	44·1	45·9	45·5	49·2
28**	44·5	44·5	45·0	45·2	42·7	46·8	47·7	44·6	45·2	47·7	49·9	54·0	57·6	56·8	55·8	51·9	50·0	49·0	48·7	43·7	37·7	44·3	47·8	44·8	47·7
29**	42·7	41·7	43·1	47·2	37·9	52·3	46·3	50·3	46·0	50·0	53·7	53·5	57·3	57·8	53·9	51·8	51·0	48·1	48·5	48·7	47·7	48·2	47·0	46·9	48·8
30	46·0	46·0	44·0	46·4	43·2	40·7	39·0	38·5	40·3	44·2	49·2	53·2	55·6	57·0	55·8	52·2	50·2	46·9	46·0	49·0	49·0	48·1	47·8	47·7	47·3
Mean	47·7	47·0	46·7	47·0	46·5	46·9	45·9	44·5	44·1	45·5	48·8	52·5	55·4	56·5	55·3	53·3	51·5	49·6	48·2	47·7	47·6	47·6	47·3	47·5	48·8
Mean*	47·8	47·8	47·4	47·2	47·0	46·7	45·6	43·7	42·8	44·1	47·9	51·5	54·2	55·7	55·0	53·1	51·5	50·1	49·6	49·6	49·0	48·7	48·5	48·2	48·9
Mean**	46·4	43·3	44·4	45·6	43·6	47·6	46·5	46·2	45·4	47·5	50·5	53·7	55·9	57·4	55·8	54·0	52·6	50·1	48·0	45·4	43·9	45·0	45·2	45·4	48·3

TABLE I.—HOURLY MEANS OF MAGNETIC DECLINATION—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h
May.								14°+Tabular Quantities.																	Mean.
1	47·4	47·0	46·2	45·2	44·5	42·5	41·0	40·4	42·3	46·0	50·0	55·0	56·7	56·0	52·9	50·0	48·0	47·8	47·8	47·9	46·9	45·4	48·0	47·1	47·6
2	47·9	50·8	46·4	42·0	43·2	43·2	42·6	41·8	44·8	46·5	49·6	53·2	55·8	56·7	55·5	53·8	52·7	52·0	51·1	49·0	48·3	48·2	48·7	48·0	48·8
3	47·8	48·4	47·4	48·4	48·9	43·3	42·0	41·0	42·0	48·0	49·8	54·6	55·2	54·6	51·8	49·0	47·0	46·7	47·0	47·7	48·0	48·4	48·1	47·4	48·0
4	46·5	46·0	46·0	45·4	44·8	43·8	42·3	41·8	43·2	46·0	48·7	51·8	53·4	54·7	53·9	51·8	49·6	48·5	48·0	48·0	48·0	48·0	48·0	47·8	47·7
5	47·5	47·0	46·8	46·7	47·6	48·2	42·2	39·9	41·0	42·9	45·4	52·0	53·5	54·3	54·7	53·4	52·8	49·5	49·0	49·0	49·0	46·6	44·7	46·7	47·9
6	46·8	46·0	46·2	47·4	47·6	47·7	50·9	48·5	50·0	49·5	51·3	53·8	55·2	56·0	53·0	51·4	48·8	47·7	47·9	48·0	48·0	47·7	46·8	47·0	49·3
7	47·0	46·9	46·3	46·0	45·0	44·0	42·8	42·1	42·8	44·6	46·8	49·0	51·0	52·0	51·8	51·2	50·7	50·2	48·3	48·1	43·2	46·0	46·2	43·7	46·9
8	48·8	43·4	41·2	42·2	45·6	48·7	45·5	44·5	44·5	45·0	47·4	50·2	52·0	52·2	51·3	50·5	49·5	48·2	48·0	47·9	47·3	46·8	47·0	44·5	47·2
9	44·2	44·9	43·7	47·8	48·0	46·8	46·9	46·5	45·0	46·2	47·5	49·3	51·0	51·0	51·0	49·7	48·3	47·5	47·0	47·3	47·4	47·7	47·4	47·0	47·4
10	46·5	46·4	46·1	45·7	45·0	44·0	43·0	42·4	43·7	45·0	47·9	50·2	51·5	52·0	51·7	50·5	48·9	48·0	47·7	48·3	48·0	46·8	46·7	46·3	47·2
11	46·3	49·0	44·7	41·2	42·0	45·8	45·0	41·9	42·8	44·2	48·9	50·8	54·2·	54·4	52·2	53·2	50·0	48·2	45·1	46·4	47·2	47·5	44·2	44·7	47·1
12	42·5	46·8	47·5	45·0	44·7	45·2	42·2	42·0	42·7	45·7	49·5	51·9	53·2	53·5	53·1	52·1	50·0	48·2	47·8	47·3	47·3	47·5	47·5	46·8	47·5
13*	47·0	46·6	46·0	45·0	44·8	45·0	43·7	43·0	43·6	45·7	48·8	51·0	52·2	53·0	52·0	50·0	48·8	47·5	47·0	47·4	47·0	44·2	42·8	44·0	46·9
14*	44·8	47·3	45·0	44·5	45·0	44·1	42·2	43·3	44·7	45·2	49·1	53·2	56·0	56·0	53·4	51·0	49·7	48·6	47·3	46·8	47·0	47·5	47·5	47·8	47·8
15*	47·8	47·0	47·0	46·2	44·2	42·7	41·2	41·0	41·2	43·7	47·2	53·0	55·2	55·8	54·2	52·0	49·8	47·7	46·8	46·8	47·8	47·5	46·8	47·2	47·5
16	49·2	47·3	46·8	45·2	43·7	41·9	41·0	41·0	42·5	46·0	50·5	52·5	54·0	53·6	52·5	51·6	51·0	49·5	47·8	47·8	46·8	45·8	46·0	45·5	47·4
17	46·7	46·7	46·7	47·5	46·8	44·9	41·7	41·4	43·3	46·0	49·0	53·2	54·0	54·0	52·0	51·0	49·5	48·3	47·0	46·9	47·3	47·9	47·3	47·3	47·7
18*	47·0	47·0	47·0	46·7	45·7	44·0	43·2	44·4	45·6	47·4	50·3	53·8	54·7	55·5	54·0	52·2	50·9	49·0	48·0	47·3	47·4	47·3	47·0	47·0	48·4
19	47·1	47·2	48·0	48·0	46·9	45·0	45·5	45·0	44·7	46·1	48·3	49·6	52·2	52·9	52·2	52·9	52·7	50·6	49·5	48·3	47·4	47·2	43·0	46·2	48·2
20	45·8	46·1	46·0	46·0	45·0	44·0	43·8	43·5	43·0	44·0	47·3	50·0	51·8	52·8	52·1	50·8	49·9	48·9	48·1	48·1	47·8	47·4	47·3	47·8	47·4
21**	47·0	47·0	44·7	47·0	48·0	47·2	44·7	42·8	42·3	44·9	47·4	50·0	53·7	54·0	54·0	57·7	58·7	56·0	52·0	42·8	44·6	45·0	46·2	47·4	48·6
22**	47·1	34·0	37·9	45·8	45·8	45·2	45·8	46·0	43·7	46·2	47·4	48·5	49·7	53·2	53·2	52·7	53·0	52·0	51·8	49·0	47·2	48·4	47·6	44·8	47·3
23**	43·5	40·9	44·5	42·2	41·8	47·6	50·0	50·0	46·2	45·0	43·7	49·4	55·1	55·0	54·0	52·2	51·2	48·0	46·0	46·2	47·3	45·0	45·3	43·3	47·2
24	45·8	46·0	46·0	49·0	47·7	41·9	40·5	41·2	43·1	46·1	49·0	50·5	52·8	53·1	52·1	51·1	51·2	48·7	48·5	50·0	48·3	46·8	46·9	47·3	47·6
25	47·6	49·8	45·7	44·7	43·8	42·8	43·2	44·0	45·8	48·2	51·7	55·2	56·2	55·8	54·9	52·3	51·5	49·6	46·3	47·4	46·1	47·0	44·9	46·0	48·4
26	48·6	49·8	46·5	44·7	43·2	40·7	39·9	41·2	43·1	45·2	50·0	54·8	55·6	54·2	52·6	50·8	48·7	46·0	45·0	46·9	47·2	46·7	46·7	47·1	47·3
27*	46·3	46·8	44·3	44·9	43·1	42·3	40·5	39·8	42·2	43·8	49·0	54·1	55·0	53·0	51·0	49·0	47·7	47·1	47·0	46·6	44·7	46·1	48·0	46·6	46·6
28	46·0	46·0	45·5	45·1	44·0	41·8	41·7	42·0	34·2	46·7	49·7	53·4	55·2	54·1	52·7	50·7	50·0	49·2	47·0	46·4	47·8	47·7	47·2	45·9	47·5
29	45·8	46·6	46·5	42·9	41·8	40·1	39·7	40·2	42·2	45·2	48·2	51·1	52·5	53·8	53·0	51·9	51·0	49·4	49·0	48·4	47·7	45·9	47·1	46·3	46·9
30**	46·1	45·1	45·0	44·5	43·8	41·8	40·7	41·7	44·1	46·9	51·1	53·4	55·3	56·0	55·3	52·4	51·8	49·4	48·5	48·5	49·4	47·5	47·2	47·2	48·0
31**	47·2	49·5	47·8	48·2	49·2	45·0	44·3	41·7	44·4	48·2	49·2	51·6	54·0	54·2	53·7	50·4	50·0	49·2	47·6	48·3	49·0	48·5	46·0	46·8	48·5
Mean	46·6	46·4	45·7	45·5	45·2	44·2	43·2	42·8	43·4	45·8	48·7	51·9	53·8	54·1	53·0	51·6	50·4	48·9	47·9	47·6	47·3	47·0	46·6	46·4	47·7
Mean*	46·6	46·9	45·9	45·5	44·6	43·6	42·2	42·3	43·5	45·2	48·9	53·0	54·6	54·7	52·9	50·8	49·4	48·0	47·2	47·0	46·8	46·5	46·4	46·5	47·5
Mean**	46·2	43·3	44·0	45·5	45·7	45·4	45·1	44·4	44·1	46·2	47·8	50·6	53·6	54·5	54·0	53·1	52·9	50·9	49·2	47·0	47·5	46·9	46·5	45·9	47·9
June.								14°+Tabular Quantities.																	Mean.
1	47·3	47·5	47·2	46·6	49·2	46·8	47·0	42·8	43·9	44·1	48·1	52·9	54·7	55·0	54·9	52·3	49·2	47·2	46·0	46·1	46·8	47·0	47·2	47·3	48·2
2*	47·3	47·5	47·5	46·4	44·7	43·0	43·0	42·7	43·3	44·4	48·1	51·7	54·0	56·0	54·9	51·3	49·1	47·3	46·4	46·4	46·7	47·1	47·2	47·2	47·6
3*	47·8	47·2	47·2	47·2	46·7	44·8	43·3	42·0	42·0	43·8	48·0	52·3	54·8	55·8	55·5	52·6	50·2	48·2	46·9	46·1	46·4	46·8	47·1	47·4	47·9
4	47·2	47·5	47·2	46·6	44·6	42·4	41·5	42·1	42·5	42·5	48·7	52·4	54·1	54·0	54·0	52·6	50·2	48·2	47·7	47·3	47·2	47·8	46·7	46·1	47·6
5	46·8	46·8	46·8	46·3	46·4	45·5	42·8	41·2	41·7	44·4	47·2	50·2	53·2	53·1	53·0	51·3	50·3	49·2	48·4	48·0	47·8	47·5	46·8	45·3	47·5
6	46·2	45·9	46·6	46·8	45·2	44·8	44·2	43·0	42·9	43·5	46·8	50·2	52·7	53·4	54·2	53·0	51·9	50·4	49·5	48·0	46·1	46·1	47·0	45·8	47·7
7	42·0	42·0	43·0	44·0	43·4	45·3	43·5	41·8	42·2	44·5	49·0	52·5	55·4	56·2	56·2	54·0	51·4	50·0	49·0	48·7	46·7	45·8	47·7	50·4	47·7
8**	44·4	44·2	45·5	44·5	47·2	45·4	44·0	41·4	42·0	44·4	47·3	52·2	54·6	55·4	57·0	49·0	51·0	51·0	49·7	48·9	48·1	47·2	45·0	46·1	47·7
9	45·0	47·3	47·2	41·5	42·6	42·9	42·1	41·4	43·6	44·5	47·4	49·7	51·0	52·0	51·7	51·7	50·2	48·8	47·0	46·7	46·7	46·8	46·2	46·5	46·7
10*	46·2	46·8	46·7	46·3	44·7	42·9	41·8	42·1	42·9	44·2	45·2	49·6	51·6	53·1	53·4	52·4	51·4	50·0	49·0	49·2	47·4	47·2	47·1	46·7	47·4
11	46·5	46·0	46·5	46·5	45·5	43·5	42·2	41·5	42·4	44·5	49·0	52·0	53·1	54·2	54·1	53·0	52·0	50·3	49·4	49·0	48·0	48·7	46·9	46·0	47·9
12	46·2	47·3	44·8	44·9	44·2	45·2	44·0	41·9	41·2	45·0	49·9	52·9	55·0	55·9	54·2	52·7	51·9	49·8	47·8	47·8	46·8	48·0	47·3	48·4	48·1
13	46·4	44·2	45·7	46·3	49·9	48·2	43·4	44·1	41·9	43·8	47·9	49·3	51·8	53·1	53·5	51·1	48·2	47·2	46·2	46·3	47·0	47·0	45·5	45·3	47·2
14	46·2	46·4	47·1	46·0	43·0	41·2	40·7	41·1	42·1	44·2	47·3	49·9	52·0	52·5	52·2	52·0	51·0	48·7	47·2	47·2	47·4	47·1	48·0	47·6	47·0
15*	46·2	45·8	45·4	45·2	45·1	46·2	44·0	42·9	41·9	42·4	46·0	49·0	51·2	52·2	51·9	51·0	49·7	48·7	47·8	47·2	47·0	46·7	47·0	46·4	46·9
16*	47·1	46·9	46·4	46·4	44·8	42·9	42·1	42·0	42·3	44·3	48·0	50·7	52·9	54·0	53·3	52·0	50·5	49·1	48·2	48·0	47·2	47·3	47·0	47·0	47·5
17	46·8	46·8	46·2	45·5	44·0	42·5	42·0	43·5	43·0	43·9	46·2	49·3	53·4	54·0	54·2	53·8	51·9	50·0	49·0	48·1	47·2	47·0	47·0	46·4	47·6
18**	47·0	46·7	46·0	46·0	46·0	44·2	42·4	42·1	43·2	45·3	48·0	50·2	53·1	55·0	55·0	55·2	53·9	51·8	49·8	48·3	47·3	45·8	44·0	43·8	47·9
19**	45·2	45·2	47·1	49·7	45·0	42·0	41·3	41·0	41·2	43·3	46·0	49·7	53·0	54·0	55·1	55·1	53·7	50·1	49·8	47·1	46·8	44·9	44·4	40·7	47·1
20	40·8	39·9	41·5	42·4	43·0	45·2	44·9	46·5	43·7	45·5	47·9	50·5	51·6	54·2	54·2	53·0	52·2	50·7	49·7	49·0	48·2	47·2	46·2	44·8	47·2
21	45·4	45·7	45·1	45·7	45·1	43·2	42·6	44·8	44·3	44·8	47·5	49·2	51·4	53·0	53·3	52·0	50·9	50·3	49·2	48·9	45·0	46·1	48·0	48·0	47·5
22**	56·5	46·3	45·2	44·5	43·2	43·0	42·5	42·5	42·5	43·0	46·2	50·0	53·8	56·3	57·2	55·7	54·0	54·2	48·1	46·2	45·1	44·0	40·3	36·7	46·9
23**	36·1	37·1	43·9	47·5	45·5	42·6	41·0	42·0	43·2	44·4	47·8	51·5	54·0	54·7	54·1	52·0	52·2	51·0	49·0	47·8	47·1	46·8	47·0	47·2	46·9
24	46·8	45·2	42·9	43·0	42·4	40·5	41·0	42·4	43·7	45·0	47·7	50·9	52·7	54·2	54·0	52·7	51·0	50·7	49·0	48·0	48·0	47·7	47·4	45·8	47·2
25	44·7	45·0	45·2	43·9	41·8	39·8	38·8	41·1	42·0	42·4	44·5	47·5	50·0	51·8	52·1	51·1	50·0	49·7	47·8	47·8	47·6	45·3	47·2	48·1	46·1
26	47·2	45·7	46·0	45·6	44·3	41·0	40·0	40·5	42·0	46·0	49·5	52·9	55·2	56·5	55·9	53·3	51·0	48·8	47·0	42·5	46·0	46·2	47·2	47·7	47·4
27	46·3	46·1	45·8	45·3	43·8	42·4	41·0	40·8	41·0	42·4	45·2	49·0	51·8	53·0	54·0	52·0	51·5	48·8	48·1	48·1	48·2	47·8	47·7	47·7	46·9
28	46·8	47·3	49·8	48·7	45·7	43·1	42·4	42·2	42·1	43·8	46·0	49·2	51·8	52·6	53·0	52·0	50·5	48·8	46·8	46·0	47·1	47·4	47·6	47·2	47·3
29	49·3	46·4	44·5	43·9	42·8	41·7	41·8	42·4	42·5	44·3	47·3	49·3	51·3	52·2	51·9	50·9	49·3	48·0	47·3	47·0	47·2	45·0	45·8	44·1	46·5
30	43·5	44·2	44·2	43·8	43·7	42·9	42·0	42·0	43·5	44·8	47·1	51·2	53·1	53·6	52·4	52·0	50·8	49·3	48·1	46·1	45·8	45·5	44·7	45·2	46·6
Mean	45·7	45·6	45·8	45·6	44·8	43·5	42·4	42·3	42·6	44·2	47·4	50·6	52·9	54·0	54·0	52·4	51·0	49·5	48·2	47·4	47·0	46·7	46·5	46·1	47·3
Mean*	46·9	46·8	46·6	46·3	45·2	44·0	42·8	42·3	42·5	43·8	47·1	50·7	52·9	54·2	53·8	51·9	50·2	48·7	47·7	47·2	46·9	47·0	47·1	46·9	47·5
Mean**	45·8	43·9	45·5	46·4	45·4	43·4	42·2	41·8	42·8	44·1	47·1	50·7	53·7	55·1	55·7	53·4	53·0	51·6	49·3	47·7	46·9	45·7	44·1	44·9	47·5

TABLE I.—HOURLY MEANS OF MAGNETIC DECLINATION—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h
July.										14°+Tabular Quantities.															Mean.
1**	44·0	43·9	42·6	40·2	43·1	41·9	41·0	43·8	47·1	43·5	46·1	47·6	50·5	51·2	52·8	53·4	51·8	49·8	46·1	46·1	44·5	46·4	47·3	47·8	46·4
2	46·8	45·8	45·7	45·0	43·8	42·0	42·0	41·5	42·6	44·8	46·9	48·9	51·0	52·5	51·4	50·2	50·1	48·8	48·0	47·0	46·0	46·0	46·0	45·8	46·2
3	45·2	45·3	46·1	43·1	41·9	41·9	41·2	42·2	42·9	44·9	47·4	49·7	50·2	51·5	53·2	51·7	50·0	48·2	47·0	45·5	45·2	46·9	45·8	44·4	46·3
4	44·8	44·2	45·0	42·2	41·2	39·5	38·4	38·2	39·2	42·0	45·0	48·5	52·1	54·2	55·1	54·2	52·7	51·0	47·8	46·6	43·8	43·7	42·7	44·2	45·7
5	46·0	45·7	45·2	44·5	47·1	45·5	43·8	41·8	42·8	43·8	46·3	48·3	51·1	52·7	53·0	52·7	50·0	49·1	49·5	47·0	44·7	47·5	47·0	46·8	47·1
6	46·2	45·3	45·2	47·2	42·8	40·3	40·2	40·8	40·3	41·2	46·3	48·0	50·3	50·3	51·0	51·3	49·7	47·2	48·2	48·0	47·3	42·5	42·2	45·0	45·7
7	45·3	46·0	46·0	45·2	44·0	42·3	41·0	40·2	41·0	42·9	45·8	48·3	50·0	50·7	51·0	49·2	48·3	48·7	47·9	46·0	47·2	46·2	45·7	46·0	46·0
8**	45·2	45·0	44·3	44·5	45·1	44·3	43·0	41·3	40·2	40·8	43·2	47·4	50·0	50·4	50·8	50·3	50·9	51·8	50·1	43·0	48·0	39·0	41·0	45·0	45·2
9**	44·0	42·5	42·7	45·9	50·0	51·0	49·8	46·8	41·0	41·0	45·1	46·5	19·5	50·2	51·5	49·2	49·8	49·9	48·3	47·5	46·3	46·3	43·8	44·8	46·8
10	47·9	45·7	45·8	47·2	45·0	43·3	42·0	41·2	42·1	45·5	45·4	47·0	49·0	50·7	50·8	50·0	48·9	46·0	48·0	47·8	45·8	41·2	46·0	46·1	46·2
11	47·4	50·0	51·0	46·6	46·2	42·0	42·3	41·8	41·7	42·5	45·3	48·4	50·5	51·8	51·3	50·7	47·8	45·8	46·5	46·7	47·0	46·8	48·7	45·1	47·1
12	43·2	44·0	45·3	45·9	43·6	43·0	41·8	42·0	43·1	44·5	47·1	49·7	50·3	51·2	51·4	49·2	48·3	46·8	44·7	45·8	46·0	46·2	46·2	43·2	45·9
13	43·8	44·7	44·8	45·0	44·8	43·5	42·8	42·0	42·6	45·4	56·9	56·0	48·1	49·5	49·8	48·8	47·9	46·1	46·1	45·8	45·2	43·3	46·4	46·0	46·5
14	45·0	45·7	46·0	45·0	45·2	43·2	41·8	41·0	42·0	44·4	47·0	50·1	52·8	53·4	52·9	50·9	48·9	47·0	46·0	45·3	45·3	46·2	46·1	46·1	46·5
15	46·1	46·0	45·7	45·2	44·7	42·8	43·0	42·8	43·4	44·7	47·7	49·7	51·6	53·1	51·9	49·2	46·8	45·0	45·0	45·7	44·7	45·5	46·2	46·8	46·4
16	46·9	47·0	47·1	44·9	43·0	39·9	39·4	38·7	39·5	41·7	46·0	50·3	53·3	54·8	54·8	53·1	50·8	48·1	47·1	44·2	43·4	45·8	46·1	46·1	46·3
17**	44·1	40·7	41·7	42·9	42·0	41·2	40·7	39·8	40·2	43·3	46·0	49·0	51·0	52·1	51·1	49·7	47·8	47·5	47·1	46·5	42·7	42·8	40·9	44·9	44·9
18	46·3	48·3	45·8	46·6	44·8	42·9	43·0	42·4	44·0	44·3	45·3	48·0	49·8	51·8	53·0	52·0	50·9	49·9	47·8	45·9	45·8	40·8	42·7	44·0	46·5
19	44·9	43·5	44·8	43·0	41·0	40·8	40·0	40·4	40·8	40·5	42·5	47·4	52·7	53·8	55·0	54·0	51·3	48·7	46·5	43·8	45·0	46·0	45·2	45·0	45·7
20	43·4	39·4	41·0	44·7	43·5	43·8	41·4	41·5	39·4	40·3	43·0	46·5	50·0	50·0	50·3	50·4	49·5	48·1	47·2	46·2	44·8	44·7	45·5	45·5	45·0
21	45·1	45·0	44·7	44·0	43·1	41·5	41·2	40·2	40·0	41·5	43·1	46·5	49·5	49·0	48·6	48·6	47·7	47·1	46·3	45·8	45·6	45·2	45·4	45·0	45·0
22	44·9	44·7	44·5	44·2	44·0	42·7	41·9	40·9	40·0	42·1	45·4	48·6	51·2	52·6	52·2	51·2	49·5	48·1	47·7	47·1	46·0	46·2	46·0	44·5	46·1
23**	44·0	46·4	44·8	45·2	46·1	45·4	41·8	40·9	39·0	43·8	46·5	49·4	51·0	51·5	52·0	50·2	47·5	48·0	47·0	46·2	46·0	44·0	42·4	44·0	45·6
24	44·9	44·9	48·7	47·6	46·9	44·0	41·0	44·2	43·0	43·5	47·8	50·4	51·0	52·0	50·7	49·4	48·4	47·4	46·2	45·8	45·9	45·9	45·8	45·0	46·8
25	46·9	43·4	44·0	43·2	42·2	41·4	40·2	39·8	40·3	42·3	46·3	49·1	52·0	52·7	52·2	50·8	48·3	46·4	45·4	45·5	46·0	46·0	46·0	47·3	45·7
26	49·0	44·9	44·1,	46·0	46·3	43·2	41·3	40·5	42·2	43·9	47·1	51·0	52·3	52·1	51·2	49·5	47·8	45·9	44·5	44·8	45·1	46·0	45·8	45·7	46·3
27	45·4	46·0	47·4	45·2	43·0	41·1	40·8	40·3	41·8	45·5	49·1	51·3	53·0	53·2	52·8	50·0	48·0	46·1	45·1	45·0	45·0	45·7	45·8	45·7	46·3
28	45·0	44·8	44·9	44·9	44·2	41·9	40·9	41·0	43·2	44·8	47·7	51·8	54·4	53·0	52·3	50·0	48·2	47·0	46·2	45·3	45·2	45·2	46·1	46·1	46·4
29	45·8	44·9	44·5	44·2	42·8	42·0	41·1	40·7	43·2	46·2	48·1	51·0	53·2	53·8	53·0	51·4	48·7	46·7	44·9	45·1	45·9	46·2	46·5	45·4	46·5
30	45·9	45·5	45·4	45·0	44·5	41·3	40·1	40·7	41·8	44·0	48·0	49·7	51·9	52·5	52·1	52·0	51·1	48·9	47·5	46·1	45·7	45·1	46·7	45·9	46·0
31	45·0	44·6	44·4	43·8	42·7	40·7	40·0	39·2	40·7	43·3	45·9	48·0	50·2	51·8	51·2	50·6	48·1	47·0	45·9	44·9	44·5	45·3	45·8	45·3	45·3
Mean	45·4	45·0	45·1	44·8	44·1	42·8	41·7	41·2	41·6	43·3	46·4	49·1	51·1	52·0	52·0	50·8	49·2	47·8	46·9	45·9	45·1	45·0	45·3	45·5	46·1
Mean*	45·5	45·5	45·7	44·9	43·7	42·0	41·4	41·0	42·5	44·8	47·7	50·4	52·4	52·9	52·0	50·0	48·0	46·7	45·8	45·5	45·6	45·8	46·1	46·0	46·4
Mean**	44·3	43·7	43·2	43·7	45·3	46·8	43·3	42·5	41·5	42·5	45·4	48·0	50·4	51·1	52·2	50·6	49·6	49·4	47·7	45·9	43·5	43·7	43·1	45·3	45·9
August.										14°+Tabular Quantities.															Mean.
1*	45·2	45·0	44·9	44·5	43·8	43·0	41·8	41·7	41·2	42·8	50·3	52·7	53·8	54·2	53·0	50·5	48·1	46·9	45·8	45·5	45·7	45·4	45·0	44·9	46·5
2	44·8	44·9	45·5	47·1	43·8	41·2	38·7	36·8	38·8	40·8	47·3	50·2	54·2	55·0	54·7	52·0	50·8	48·4	47·0	46·4	46·7	45·3	42·2	43·3	46·1
3	43·5	46·1	43·7	44·8	45·6	42·9	41·8	41·8	42·4	43·9	46·0	48·8	50·5	52·2	51·0	50·1	49·0	47·7	47·0	46·0	45·1	45·1	45·0	44·9	46·0
4	44·8	44·8	44·9	42·7	42·5	42·0	41·7	40·7	40·8	42·8	45·2	48·1	49·1	49·7	49·8	48·7	47·0	45·7	46·2	46·7	46·9	46·8	46·0	45·0	45·3
5	43·8	44·0	44·6	45·3	43·5	42·8	43·4	43·0	43·0	43·8	45·3	48·5	51·8	53·1	54·0	47·1	48·1	47·4	47·4	47·8	47·8	46·8	44·0	39·7	46·1
6**	39·2	41·8	45·7	45·8	45·1	46·8	48·2	44·1	46·3	47·8	48·0	48·7	52·4	51·9	52·5	50·1	50·0	45·3	44·1	44·9	40·8	44·6	46·2	46·9	46·5
7	49·2	46·0	45·1	45·8	43·5	42·0	44·0	43·2	42·9	44·3	45·3	48·8	52·0	52·0	50·8	48·9	47·1	45·2	42·0	44·0	43·2	44·8	45·8	45·8	45·9
8	45·8	48·4	48·8	47·3	42·2	43·9	43·0	40·6	41·2	43·7	45·0	46·5	50·0	50·8	49·9	46·7	46·7	43·8	45·3	45·0	46·0	46·0	45·7	47·8	45·8
9	45·0	45·2	45·9	43·1	43·2	44·0	42·5	42·0	43·0	44·0	46·5	49·0	50·3	50·3	50·4	49·0	47·0	46·5	44·6	44·8	46·0	45·2	44·2	45·8	45·7
10	45·5	43·2	43·4	45·0	44·0	42·1	43·8	42·8	44·5	44·5	46·4	48·8	49·2	49·2	48·8	47·0	45·9	45·2	45·8	45·8	44·2	45·9	45·9	45·5	45·5
11	46·5	46·0	44·0	43·4	42·8	42·0	41·9	41·2	41·8	43·5	45·1	47·5	49·2	49·4	48·6	46·5	45·0	45·0	45·0	46·0	46·4	44·6	41·2	43·8	44·8
12	44·5	43·2	45·2	45·8	41·9	41·0	40·2	39·7	39·7	41·2	45·5	49·8	52·7	53·6	51·5	48·4	46·3	45·3	45·1	46·0	46·0	45·1	45·0	44·6	45·3
13	47·2	47·0	46·1	42·6	41·0	41·2	39·9	39·0	39·9	43·0	46·8	49·4	52·5	51·0	49·9	48·9	46·0	46·1	45·4	45·8	45·8	45·7	44·0	43·3	45·4
14	44·3	44·1	46·2	46·4	43·1	40·5	39·8	39·2	41·0	43·0	47·3	50·1	54·0	54·0	52·5	49·3	45·0	44·0	44·3	44·7	45·0	45·0	44·8	44·8	45·5
15*	44·7	44·1	44·0	44·0	43·4	41·8	41·0	40·8	43·0	46·0	47·8	48·8	50·5	51·5	51·0	49·3	47·4	45·7	44·4	44·4	44·7	44·7	44·6	44·6	45·5
16**	44·5	44·5	44·4	43·9	43·6	41·8	40·8	40·2	41·0	43·0	46·4	50·0	52·2	53·7	52·8	50·0	47·8	45·5	45·0	45·0	45·0	44·7	44·2	44·1	45·6
17*	43·8	44·3	43·8	42·8	42·3	40·8	39·0	39·4	40·2	42·8	47·7	49·7	50·8	50·3	49·8	48·3	47·4	46·7	46·7	46·7	45·8	42·8	42·3	42·2	44·9
18	43·1	42·9	45·3	44·7	43·7	41·5	40·7	39·7	41·0	43·8	47·2	50·4	53·2	53·4	52·8	50·9	48·5	46·9	45·7	46·1	46·1	45·8	45·0	44·6	45·9
19	44·2	43·8	44·5	43·5	43·2	41·5	39·9	38·6	40·0	44·2	47·4	50·2	52·0	53·6	51·8	50·0	48·2	48·0	43·3	43·5	44·8	43·2	42·0	41·6	45·1
20	41·3	42·8	41·2	42·5	45·0	40·4	42·8	41·5	42·4	44·2	46·8	49·1	49·2	49·4	49·5	47·9	44·8	44·1	44·0	43·6	40·3	41·9	44·2	44·9	44·3
21	45·1	44·8	44·0	43·1	42·2	41·1	40·1	40·0	41·6	44·9	47·2	49·6	51·0	50·5	49·9	49·2	47·6	46·0	42·3	44·9	45·1	45·9	45·9	45·9	45·3
22**	45·9	42·3	42·8	42·8	41·5	41·4	40·8	41·2	43·5	45·8	47·7	50·2	51·7	50·7	50·0	47·8	45·4	45·5	40·3	40·8	38·2	36·1	38·5	41·8	44·1
23**	43·4	49·5	44·8	43·1	44·4	43·5	43·4	42·8	42·1	42·8	44·5	46·9	49·5	50·8	50·0	48·0	47·5	39·1	43·1	45·8	46·0	44·9	39·0	36·3	44·6
24	37·6	39·7	44·2	46·8	46·6	45·0	42·8	40·0	41·5	44·1	47·0	49·3	51·7	51·5	49·7	46·6	44·0	43·6	42·8	43·2	44·0	44·5	44·7	45·0	44·8
25*	45·2	44·3	44·0	43·7	42·0	41·0	40·5	41·2	42·0	44·5	47·1	49·4	50·8	49·0	47·3	45·7	44·1	44·0	44·7	45·1	45·2	44·8	44·7	43·7	44·7
26**	42·8	42·4	41·9	41·2	40·0	39·8	39·8	42·3	43·0	45·7	48·3	51·5	52·2	52·0	49·6	48·0	47·2	47·1	44·9	45·0	48·2	45·0	38·5	39·2	44·8
27**	34·8	39·0	43·3	36·7	47·0	42·5	38·1	37·2	39·0	40·3	43·2	45·2	47·6	49·0	49·0	48·0	45·5	44·5	44·8	45·8	44·6	42·7	42·7	44·9	43·1
28	44·2	42·7	42·2	44·2	44·5	41·9	40·9	40·0	40·5	40·7	47·9	51·2	50·3	49·7	47·0	44·6	43·7	44·5	45·7	45·8	45·5	44·6	42·5	43·4	44·5
29	43·9	44·7	47·5	40·7	40·0	40·0	38·5	39·5	41·0	44·0	47·2	49·3	49·2	49·8	48·8	48·1	43·0	43·3	45·2	45·5	42·2	42·5	41·0	41·0	43·9
30	44·1	45·0	45·0	43·8	43·3	43·8	42·0	41·8	42·5	44·3	47·3	48·8	50·2	51·1	49·8	47·4	45·8	44·0	42·9	43·8	44·1	46·4	45·0	44·9	45·2
31	43·1	44·0	43·8	43·0	43·3	43·1	40·7	39·6	41·8	45·3	48·7	51·0	52·0	51·2	49·8	48·0	46·0	45·0	45·0	45·0	44·5	42·8	42·4	43·8	45·1
Mean	43·9	44·2	44·5	43·9	43·3	42·1	41·4	40·7	41·7	43·7	46·8	49·3	51·2	51·4	50·5	48·4	46·7	45·4	44·9	45·1	44·8	44·5	43·6	43·8	45·2
Mean*	44·7	44·4	44·2	43·8	43·0	41·7	40·6	40·7	41·5	43·8	47·9	50·1	51·6	51·7	50·8	48·8	47·0	45·8	45·3	45·3	45·3	44·5	44·2	43·9	45·4
Mean**	41·2	43·0	43·7	41·9	43·6	42·8	42·1	41·5	42·8	44·5	46·3	48·5	50·7	50·9	50·2	48·4	47·1	44·3	44·6	44·5	43·6	42·7	41·0	41·8	44·7

TABLE I.—HOURLY MEANS OF MAGNETIC DECLINATION—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h
September.								14°+Tabular Quantities.																	Mean.
1*	43·9	44·0	44·9	44·0	43·6	41·2	40·2	40·3	41·7	44·3	46·8	49·2	51·1	51·2	49·6	47·2	45·9	44·9	43·8	44·2	44·2	44·0	43·9	42·9	44·9
2	43·2	43·2	43·0	42·7	42·2	41·8	40·1	40·3	42·5	45·5	49·8	51·8	53·0	52·2	51·1	50·2	46·4	44·3	44·2	45·1	43·2	36·7	38·6	36·2	44·5
3**	32·8	35·2	42·5	43·8	43·4	44·3	42·2	43·0	45·1	46·1	49·0	52·0	54·6	54·7	50·2	48·7	47·1	44·0	43 3	37·1	37·0	38·5	38·2	43·7	44·0
4**	45·4	45·2	46·5	45·1	43·8	45·0	49·5	48·0	45·4	46·9	47·0	48·8	49·0	47·8	47·0	45·9	45·4	45·9	46·0	43·5	37·5	36·4	37·5	33·0	44·6
5	39·7	40·5	43·8	43·8	48·7	44·8	46·8	43·3	43·1	48·1	48·1	50·2	50·0	49·5	47·2	46·0	45·0	45·2	44·0	44·0	43·0	43·8	43·1	43·0	45·2
6	43·2	43·8	43·4	43·3	43·2	42·5	42·0	41·9	42·0	42·8	45·8	48·7	49·7	50·1	49·1	48·5	46·8	46·0	40·0	44·0	45·0	43·1	40·8	41·4	44·5
7	45·8	42·8	42·6	42·8	42·3	42·0	40·8	40·2	43·0	45·5	47·9	49·4	50·8	50·8	50·5	48·8	47·7	43·0	44·2	44·2	45·0	44·2	44·4	44·5	45·2
8	44·0	44·0	43·8	43·4	43·2	42·8	43·9	45·2	46·0	47·0	49·4	50·0	48·8	49·8	49·0	48·0	46·8	45·0	45·2	45·2	43·3	43·9	44·0	44·4	45·7
9	44·2	44·2	44·1	43·9	43·3	43·0	42·7	41·8	41·8	43·4	46·0	48·9	51·0	52·0	50·2	48·8	46·1	43·9	45·8	45·9	45·2	45·2	45·2	45·1	45·5
10	44·4	44·2	43·1	43·0	42·0	41·5	41·5	44·1	44·0	44·7	48·0	50·2	51·0	50·1	49·4	48·0	46·7	46·7	45·9	43·0	42·7	44·1	43·2	36·8	44·9
11	42·0	41·9	41·9	45·7	44·0	42·5	41·2	41·0	42·8	45·8	49·9	52·1	51·8	50·4	50·0	48·7	44·1	42·2	41·0	43·2	45·2	41·7	37·8	38·0	44·4
12**	39·2	42·4	39·8	41·8	47·9	44·8	43·5	45·5	43·0	44·8	48·0	50·4	51·0	48·8	48·0	44·3	39·8	43·2	40·9	38·2	43·2	37·9	41·0	47·0	43·9
13	46·8	44·7	43·0	43·0	42·2	42·0	42·8	43·2	43·8	45·0	46·9	49·1	52·8	49·0	48·0	45·1	43·1	44·0	44·7	45·0	43·4	41·8	41·9	44·4	44·8
14	44·7	44·3	44·0	43·9	43·9	43·0	42·0	41·0	41·2	42·9	46·1	50·0	52·0	52·1	50·0	48·0	45·3	44·8	45·0	42·6	41·5	43·2	43·8	42·8	44·9
15	44·0	44·4	44·0	43·9	44·0	43·5	42·0	40·8	41·5	44·9	50·2	54·7	54·9	55·1	54·4	50·5	48·5	45·0	44·7	44·7	44·2	43·9	43·2	44·0	46·3
16	47·5	47·0	45·0	44·0	43·0	46·0	43·7	42·4	43·8	45·4	50·0	51·8	53·0	54·2	51·1	49·3	46·8	40·7	40·1	44·0	44·2	43·8	44·1	44·0	46·0
17	45·0	47·4	43·8	42·4	44·2	45·4	41·9	42·5	44·1	47·0	49·7	51·6	52·4	54·0	49·7	46·5	44·4	39·8	38·8	42·4	43·8	44·3	44·1	45·0	45·4
18	43·9	44·0	45·2	44·7	44·0	44·0	44·6	43·1	43·0	44·6	48·5	51·8	53·0	52·7	48·0	45·2	42·9	43·7	43·0	43·5	42·6	42·2	43·9	44·1	45·3
19*	44·7	44·1	45·4	43·5	42·5	42·7	41·8	41·1	41·6	43·2	46·7	48·9	50·0	49·0	48·6	46·8	45·7	44·9	44·7	44·3	44·5	44·7	44·5	44·1	44·9
20*	44·5	44·0	43·8	43·3	43·4	43·0	42·2	41·0	41·7	43·7	48·0	49·5	50·9	49·5	48·0	46·0	45·0	44·8	45·1	44·9	44·8	44·7	44·8	44·5	45·0
21*	44·3	44·7	43·4	42·9	42·9	42·0	41·5	41·4	42·1	45·0	45·8	48·3	50·8	50·8	48·8	47·0	46·0	46·0	46·0	45·4	45·0	44·9	44·8	43·9	45·1
22	43·1	43·0	42·9	42·1	42·2	42·2	41·5	40·8	41·1	42·7	44·7	47·0	47·9	48·2	47·9	47·6	47·3	47·3	46·8	46·2	46·0	43·3	41·0	39·0	44·2
23	38·0	40·2	40·3	41·2	39·1	42·0	42·2	41·8	42·0	43·0	46·1	47·2	48·6	48·0	47·0	45·9	45·9	45·9	45·4	44·9	44·5	44·2	44·0	44·0	43·8
24	44·0	44·2	44·5	43·8	44·0	44·0	43·5	42·9	43·2	44·7	47·2	48·2	48·7	50·0	49·0	47·4	44·1	45·7	45·1	45·2	45·0	44·8	42·4	42·9	45·2
25	43·7	43·5	44·0	42·4	41·8	41·4	42·5	42·0	42·4	43·9	46·4	51·0	49·8	49·8	47·8	47·5	47·2	46·8	46·1	45·0	41·2	43·4	44·8	43·9	44·9
26	41·8	41·0	41·5	41·5	42·7	43·0	42·4	42·2	42·5	43·7	45·3	49·8	49·4	48·0	47·0	46·9	46·9	46·7	44·0	39·1	43·0	42·9	41·0	33·2	43·6
27**	34·9	43·4	42·3	41·0	41·1	41·4	41·0	43·8	48·1	48·7	49·2	49·8	50·9	50·3	48·1	47·0	45·3	35·2	41·8	44·8	43·0	43·0	43·2	45·0	44·3
28	44·2	45·2	44·5	44·0	44·1	43·4	42·4	41·8	42·1	42·7	45·4	48·0	49·0	48·5	47·3	46·1	45·0	45·0	44·7	44·0	43·9	44·0	43·0	42·7	44·6
29*	41·9	40·7	41·1	42·5	42·8	43·0	42·8	42·0	41·0	41·3	43·9	47·8	50·7	50·2	48·3	46·8	45·8	45·2	44·9	44·2	44·0	43·8	43·8	43·8	44·3
30**	44·0	43·8	43·8	43·8	43·7	43·6	43·0	41·7	39·8	42·5	47·7	51·2	55·7	54·2	52·0	48·9	41·8	40·7	45·2	44·9	38·0	38·1	33·0	28·1	43·7
Mean	43·0	43·4	43·4	43·2	43·3	43·1	42·6	42·3	42·8	44·6	47·4	49·9	51·1	50·7	49·1	47·4	45·5	44·2	44·0	43·8	43·2	42·7	42·3	41·8	44·8
Mean*	43·9	43·5	43·7	43·2	43·0	42·4	41·7	41·2	41·6	43·5	46·2	48·7	50·7	50·1	48·7	46·8	45·7	45·2	44·9	44·6	44·5	44·4	44·4	43·8	44·9
Mean**	39·3	42·0	43·0	43·1	44·0	43·8	43·8	44·4	44·3	45·8	48·2	50·4	52·2	51·2	49·1	47·0	43·9	41·8	43·4	41·7	39·7	38·8	38·6	39·4	44·1
October.								14°+Tabular Quantities.																	Mean.
1**	37·4	38·9	44·2	42·0	39·4	39·4	40·2	41·1	41·8	44·7	46·7	49·0	51·3	50·2	53·2	49·0	48·2	46·6	43·5	39·4	38·0	42·4	43·0	44·6	43·9
2	41·6	42·2	40·2	45·1	47·2	43·8	43·8	43·0	43·9	43·8	43·0	50·0	50·2	49·0	48·5	48·0	41·8	39·9	37·9	44·3	44·9	43·9	44·0	44·4	44·3
3	43·0	43·3	43·9	43·1	43·0	42·8	43·1	42·1	41·8	43·0	46·2	48·8	48·7	49·4	49·0	47·8	42·1	43·9	44·9	44·2	44·0	43·0	43·3	44·1	44·5
4*	44·0	44·2	43·8	43·0	43·0	42·7	42·2	41·3	40·8	41·4	42·7	46·5	46·5	47·9	47·0	46·7	45·9	45·3	44·8	42·2	42·2	43·7	43·2	43·2	43·9
5	43·7	43·1	42·0	42·4	42·7	42·7	42·4	41·8	41·2	41·9	44·9	47·8	50·8	51·3	49·4	50·8	50·1	48·0	46·9	42·9	40·3	37·2	36·8	36·2	44·1
6**	37·4	36·5	43·2	46·4	42·9	43·0	46·2	47·7	51·8	50·5	51·2	54·2	56·8	57·9	62·0	55·4	50·7	50·0	46·3	33·7	28·2	36·3	33·0	38·0	45·8
7**	43·9	36·0	31·7	46·5	43·5	41·8	43·0	44·8	45·2	46·4	47·8	49·2	51·0	50·6	45·0	48·0	37·2	42·5	43·5	35·5	38·0	37·9	43·2	40·5	43 0
8**	41·3	39·8	45·0	45·9	44·9	46·0	45·0	45·8	44·0	43·1	44·5	47·8	47·6	49·0	43·6	46·3	44·2	41·9	38·9	37·4	42·3	41·9	44·8	42·8	43·9
9	44·5	43·8	43·8	43·6	46·0	46·8	45·3	44·0	42·8	44·0	45·4	47·9	48·1	49·3	48·0	45·3	40·9	41·9	42·2	40·2	43·5	43·8	43·0	42·0	44·4
10	44·7	42·2	42·9	42·3	43·0	43·8	42·8	42·0	42·0	43·5	47·8	47·8	49·8	49·6	48·6	44·7	44·0	43·3	41·7	41·5	43·3	42·1	42·4	43·0	44·2
11	41·8	41·4	41·8	43·8	42·8	46·4	46·0	44·8	42·4	44·2	46·0	49·1	51·3	50·5	48·7	47·9	40·6	44·1	42·3	38·9	42·1	43·2	43·0	42·0	44·4
12	42·0	42·6	47·2	43·2	43·2	42·8	43·9	44·9	41·8	41·3	45·0	46·6	48·3	49·9	48·0	46·0	45·4	39·8	44·0	43·5	43·5	43·2	42·5	35·4	43·9
13**	38·5	42·9	42·9	44·5	49·2	44·1	42·2	43·7	46·0	46·2	49·3	52·0	53·0	52·7	51·8	53·2	54·7	50·5	42·6	40·0	41·8	34·1	26·1	39·9	45·1
14	43·0	44·9	44·9	47·0	43·9	42·5	41·4	40·8	43·3	44·1	47·9	47·9	46·8	46·4	45·3	43·8	42·0	41·8	42·4	42·8	43·0	43·1	42·8	42·1	43·9
15	42·8	43·2	45·1	45·6	46·2	48·5	47·1	43·4	40·8	40·5	44·2	48·7	49·2	48·2	46·9	44·9	43·1	42·8	43·0	43·2	43·2	43·3	43·8	44·1	44·6
16*	44·2	44·2	44·1	43·9	43·8	43·3	42·5	40·8	39·1	39·0	41·1	43·7	46·3	46·9	46·8	45·0	43·1	43·7	43·8	44·0	43·9	43·7	43·0	43·0	43·4
17*	43·4	44·3	44·0	43·9	43·3	43·0	43·2	41·6	40·1	40·8	43·3	47·1	49·4	50·0	49·1	46·9	45·0	45·0	44·4	44·2	44·1	44·1	44·2	44·2	44·5
18*	44·2	44·4	44·4	44·4	44·4	44·0	43 5	41 8	40 7	41·7	44·5	48·0	50·4	50·9	49·2	47·8	46·2	45·8	45·c	44·8	44·5	44·2	44·1	44·1	45·1
19	44·1	44·1	44·1	44·2	44·6	44·2	44·0	42·7	41·1	40·9	46·4	46·8	49·1	49·8	48·8	47·5	46·2	45·0	45·6	44·0	44·8	44·3	44·1	44·0	45·1
20	43·7	43·3	43·0	43·3	43·9	43·8	43·1	42·0	40·9	41·8	45·1	48·2	49·0	49·7	48·1	48·0	48·2	47·7	47·1	47·2	44·8	45·0	43·0	40·4	45·0
21	41·9	41·0	40·8	43·0	44·8	43·1	44·7	42·0	41·1	42·0	44·8	48·8	48·3	52·0	51·0	50·8	49·0	49·5	46·4	44·1	41·4	37·3	42·8	44·0	44·8
22	43·1	43·5	45·2	43·3	41·7	46·0	44·1	40·6	41·0	42·8	45·7	48·8	50·8	50·0	48·5	47·0	45·8	45·1	42·7	37·2	42·0	42·2	42·2	43·1	44·2
23	45·3	47·2	44·5	42·0	42·2	42·5	42·0	43·7	43·0	42·8	45·3	47·2	48·1	48·2	44·7	41·1	37·5	42·8	43·9	43·8	43·0	42·9	43·8	43·2	43·8
24	43·8	44·0	45·0	44·5	43·7	42·0	41·8	41·5	41·4	42·7	45·5	48·7	51·0	49·2	48·5	47·2	46·3	45·4	45·0	38·0	38·8	39·9	41·5	42·8	44·1
25	44·0	44·0	43·8	43·0	45·7	42·8	42·3	41·8	40·8	42·6	46·1	49·8	49·8	48·7	47·8	46·6	45·3	43·3	43·4	42·3	43·1	45·0	44·0	44·1	44·6
26	44·1	44·1	44·2	44·4	44·2	43·8	43·5	42·6	41·5	42·0	44·2	46·5	47·8	48·0	47·8	46·8	45·8	45·1	44·8	44·2	44·0	41·8	39·8	38·9	44·1
27	42·0	43·2	43·9	44·0	44·0	43·8	43·7	42·7	41·1	42·2	44·1	47·2	48·2	48·5	47·7	45·8	45·2	45·2	44·0	44·2	43·0	42·7	42·9	43·5	44·3
28*	43·9	44·0	44·0	44·3	44·3	44·1	43·9	42·7	41·5	42·2	45·5	48·0	49·1	49·3	48·2	47·0	46·0	45·3	44·8	43·3	42·3	41·4	40·5	41·0	44·4
29	41·5	42·0	42·5	43·0	43·5	44·0	44·5	44·0	43·5	43·0	44·0	46·0	48·0	49·0	48·5	48·0	47·5	47·0	46·0	44·0	41·5	36·2	40·0	42·7	44·2
30	43·0	43·5	44·3	46·0	46·5	44·9	44·3	45·0	43·5	43·0	42·0	43·6	46·4	48·7	48·0	47·7	46·8	45·5	45·1	44·5	42·0	43·0	42·8	42·9	44·7
31	43·5	44·4	43·9	43·7	43·5	43·8	43·8	43·1	43·0	42·8	44·0	46·5	48·0	49·1	49·0	47·8	46·5	45·8	44·8	44·8	44·0	43·1	42·8	42·0	44·8
Mean	42·8	42·8	43·4	44·0	44·0	43·7	43·6	42·9	42·0	42·6	45·3	48·0	49·3	49·7	48·6	47·4	45·2	44·9	43·9	42·1	42·1	41·8	41·8	42·1	44·3
Mean*	43·9	44·2	44·1	43·9	43·8	43·4	43·1	41·6	40·4	41·0	43·4	46·7	48·3	49·0	48·1	46·7	45·2	45·0	44·6	43·7	43·4	43·4	43·0	43·1	44·3
Mean**	39·7	38·8	41·4	45·1	44·0	42·9	43·3	44·6	45·8	46·2	47·9	50·4	51·9	52·1	51·1	50·4	47·0	46·3	43·0	37·2	37·7	38·5	38·0	41·2	44·3

TABLE I.—HOURLY MEANS OF MAGNETIC DECLINATION—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h
November.										14°+Tabular Quantities.															Mean.
1*	42·8	41·5	42·8	43·7	43·3	45·2	45·0	43·7	42·3	42·0	44·3	46·3	47·7	48·2	48·1	47·2	46·2	46·3	46·0	45·0	43·9	41·8	39·5	43·0	44·4
2	42·5	43·0	43·0	43·1	44·0	44·7	44·0	42·5	41·5	41·8	44·0	47·0	49·0	49·7	49·0	47·4	46·6	47·6	46·2	44·6	38·0	43·7	36·2	40·4	44·1
3	41·7	43·0	42·7	43·0	43·2	43·2	43·0	42·0	41·2	42·2	48·0	53·7	54·0	53·5	47·0	47·0	48·2	46·5	44·5	43·7	41·6	38·8	36·8	35·6	44·3
4**	39·0	40·4	47·0	43·1	43·5	43·2	43·7	41·6	42·2	43·8	47·8	51·1	49·5	49·4	49·1	47·0	45·7	45·2	42·4	33·4	39·0	36·0	35·3	37·0	43·1
5**	41·8	43·5	44·5	45·0	46·5	46·2	44·5	43·5	44·7	45·2	48·4	50·0	50·0	48·4	47·5	44·0	40·5	43·7	32·2	41·0	40·5	35·2	41·5	43·0	43·8
6**	39·2	38·0	41·5	43·0	42·7	44·7	45·8	46·0	43·2	44·2	45·3	47·7	49·0	46·5	46·5	44·3	30·9	42·0	41·5	40·8	42·1	40·8	40·9	43·7	42·9
7	43·1	42·0	43·3	45·5	45·0	45·0	43·2	42·1	42·0	43·0	47·0	48·0	47·8	48·3	45·2	43·0	44·0	43·5	42·9	42·0	40·5	41·0	41·5	44·0	43·8
8	46·2	44·5	42·7	44·5	43·5	44·1	42·2	41·8	42·2	43·8	46·5	48·5	49·0	49·0	47·4	42·2	42·5	39·0	41·2	43·6	42·5	40·6	38·2	40·2	43·6
9	42·3	43·7	43·0	44·5	42·7	41·9	43·1	42·0	42·3	42·8	46·6	48·1	48·7	48·0	47·1	45·0	45·0	39·0	38·4	41·5	40·6	41·2	38·8	39·3	43·1
10	41·0	40·0	41·2	42·5	42·4	42·7	42·8	41·7	40·8	41·9	44·8	47·2	49·0	49·4	47·9	47·0	45·0	43·0	41·7	43·1	42·8	42·5	42·2	42·8	43·6
11	43·2	43·7	44·0	45·4	44·7	42·5	42·0	41·8	41·7	42·8	46·4	47·8	48·0	48·2	46·8	45·8	45·0	44·1	41·2	40·1	42·0	41·9	42·0	39·0	43·8
12**	37·0	40·9	41·5	40·7	43·9	46·7	46·7	46·8	42·5	44·1	45·7	47·2	47·5	53·0	51·2	46·4	44·9	44·2	47·0	48·7	42·0	40·4	42·2	41·9	44·7
13	41·0	42·6	41·0	41·5	41·3	42·2	42·0	43·0	42·0	42·0	44·0	46·1	46·0	45·2	44·7	45·1	45·0	46·5	44·6	43·5	43·1	42·5	42·9	42·8	43·3
14*	42·3	42·2	42·7	43·0	43·0	43·0	42·8	43·0	43·0	43·3	44·7	46·0	46·5	47·7	45·0	45·2	45·0	45·2	45·0	41·7	42·2	43·2	42·5	42·8	43·8
15	42·2	45·8	42·8	43·0	42·0	42·8	42·5	42·2	42·0	43·8	44·2	47·8	47·8	46·8	46·3	46·2	45·0	44·2	43·8	43·8	43·2	42·0	41·9	42·0	43·9
16	42·5	42·5	43·0	43·0	43·9	43·1	42·5	42·2	41·8	42·1	43·4	45·0	45·7	46·5	47·4	47·9	44·5	46·0	45·0	42·2	40·0	40·6	41·5	42·7	43·5
17	43·0	42·8	43·0	44·0	43·0	42·7	43·2	43·0	42·0	43·0	43·7	46·0	45·7	46·8	47·0	45·9	44·8	44·8	44·0	43·7	43·3	43·4	39·8	37·7	43·6
18	42·0	42·5	43·0	42·7	42·7	42·2	42·2	44·0	44·0	44·7	46·8	46·5	45·3	47·0	46·0	45·2	44·7	43·2	43·2	43·8	43·2	42·2	33·3	39·0	43·3
19	41·9	42·3	42·6	42·0	43·0	42·2	42·5	42·7	42·3	43·7	44·7	45·4	46·4	47·8	46·4	45·7	45·8	45·8	43·0	41·4	41·4	43·0	42·5	42·5	43·6
20*	43·0	42·5	43·0	43·0	43·0	43·5	43·1	43·2	43·1	43·8	45·5	46·0	46·9	45·9	45·2	44·8	44·9	44·8	44·0	41·8	42·4	42·2	42·0	43·5	43·8
21*	41·9	41·2	40·5	42·0	42·7	42·8	42·5	42·7	42·5	43·0	44·0	44·8	45·1	45·2	45·1	44·8	44·8	42·8	42·1	43·8	43·0	42·5	42·1	39·2	42·9
22	36·5	39·2	41·2	42·4	42·1	42·4	43·0	42·9	45·0	44·2	45·7	45·8	46·1	46·2	46·1	45·4	44·0	43·8	43·3	43·1	43·0	43·0	41·6	41·2	43·2
23	40·5	41·5	42·8	43·8	41·5	42·2	42·7	42·7	42·7	43·8	46·0	47·0	47·9	49·7	49·0	48·9	46·0	43·0	44·3	40·2	41·5	41·1	41·0	38·8	43·7
24*	38·4	40·5	42·3	42·7	43·0	42·7	43·0	43·0	42·7	43·0	44·4	45·8	47·0	47·0	46·4	45·8	44·8	44·5	44·5	43·8	43·2	43·2	42·4	42·6	43·6
25	42·7	42·7	43·1	43·8	43·1	43·0	43·0	43·0	43·0	43·8	45·0	45·4	46·0	47·0	46·8	46·8	47·0	46·3	44·9	43·0	41·4	34·1	30·0	37·0	42·9
26	40·7	42·1	42·6	43·7	44·0	43·2	43·7	44·5	43·5	44·6	45·0	47·3	48·6	48·2	47·0	47·0	46·0	40·8	39·7	38·8	39·4	41·7	40·1	41·7	43·5
27**	42·6	45·6	39·9	39·8	41·0	39·3	41·3	42·8	43·7	44·8	45·8	46·8	46·5	46·4	46·5	45·5	46·0	42·7	46·6	43·8	44·5	43·8	40·8	42·0	43·7
28	37·7	43·0	43·6	43·2	42·9	44·4	43·3	43·8	43·5	44·5	44·0	46·0	46·2	46·0	43·4	43·4	44·0	44·0	42·3	43·0	42·8	39·9	41·0	42·6	43·3
29	42·0	43·5	45·8	45·5	43·0	43·3	44·0	44·7	44·7	45·5	45·0	47·0	48·3	48·3	48·7	45·9	40·3	42·0	43·7	42·3	39·2	39·0	40·5	43·6	43·9
30	43·0	42·8	45·0	45·9	43·5	44·4	45·5	45·2	45·0	45·3	44·0	50·0	49·9	45·5	44·2	44·0	44·0	45·2	45·4	41·5	40·0	40·0	38·2	34·2	43·8
Mean	41·5	42·3	42·8	43·3	43·1	43·3	43·3	43·1	42·8	43·5	45·4	47·2	47·7	47·8	46·8	45·7	44·4	44·0	43·2	42·4	41·7	41·0	40·0	40·9	43·6
Mean*	41·7	41·6	42·3	42·9	43·0	43·4	43·3	43·1	42·7	43·0	44·6	45·8	46·6	46·8	46·0	45·6	45·1	44·7	44·3	43·2	42·9	42·6	41·7	42·2	43·7
Mean**	39·9	41·7	42·9	42·3	43·5	44·0	44·4	44·1	43·3	44·4	46·6	48·6	48·5	48·7	48·2	45·4	41·6	43·6	41·9	41·5	41·6	39·2	40·1	41·5	43·7
December.										14°+Tabular Quantities															Mean.
1**	42·3	41·2	44·0	45·8	44·9	44·0	46·5	45·7	48·3	47·3	45·3	48·8	50·5	49·4	50·1	42·0	40·0	40·6	38·0	37·9	34·8	38·2	35·2	39·5	43·4
2**	45·8	44·1	45·2	45·3	43·0	45·7	47·0	47·0	45·2	47·0	47·5	48·0	48·0	46·7	40·5	46·1	44·2	35·6	41·8	40·8	43·1	42·0	43·0	43·1	44·4
3**	44·6	45·7	40·7	43·5	44·0	44·5	44·1	45·0	45·4	47·1	47·9	45·7	48·0	48·1	44·5	44·5	43·0	42·8	45·1	43·5	42·5	42·6	42·8	41·4	44·5
4	42·0	41·0	44·0	43·0	42·2	43·2	44·0	45·0	44·0	44·5	44·3	44·7	45·5	44·5	43·3	43·2	40·8	44·0	43·0	43·1	43·0	43·0	43·0	41·4	43·4
5	42·4	42·2	42·7	43·5	44·5	44·1	43·7	43·5	42·7	43·0	44·8	45·2	46·5	46·3	46·1	44·3	44·3	43·5	42·9	39·7	42·0	41·2	40·8	39·2	43·3
6*	41·0	42·8	43·4	42·9	43·7	43·2	44·0	43·3	42·9	42·4	46·1	46·9	47·7	47·0	46·2	45·2	44·8	43·8	43·3	43·6	43·1	39·6	42·0	43·1	43·7
7	43·8	43·8	43·8	43·7	43·9	44·0	42·7	42·8	42·5	43·0	44·2	45·0	45·2	45·2	45·9	46·0	44·0	43·2	41·4	39·5	38·3	41·3	42·5	44·0	43·3
8	44·0	44·0	44·0	44·0	43·0	45·8	44·8	45·0	44·0	44·0	45·0	46·5	46·3	47·3	46·2	45·6	44·8	44·0	43·0	42·9	42·4	42·5	43·0	43·0	44·4
9	43·1	45·0	44·0	43·7	43·2	43·0	42·8	43·2	43·5	43·9	46·0	46·5	49·0	48·0	47·7	46·7	44·0	41·0	43·7	40·8	42·0	41·8	42·4	42·9	44·1
10*	43·0	42·7	43·0	43·9	43·0	42·9	43·0	43·0	42·9	43·7	44·8	46·0	46·8	47·0	46·5	43·8	43·0	44·2	43·2	43·0	42·5	41·6	41·0	43·0	43·6
11	43·8	43·5	44·0	43·9	44·0	44·0	44·0	43·8	43·0	43·7	44·4	45·1	47·3	47·5	47·2	47·3	46·0	44·2	43·5	43·0	42·5	42·2	41·8	39·7	44·1
12	40·1	41·0	44·2	42·0	40·1	40·5	42·8	43·1	43·0	42·9	44·4	46·0	47·5	46·2	45·8	46·0	46·3	45·4	46·0	45·7	43·3	38·8	37·5	37·4	43·2
13	39·7	39·0	39·0	38·0	39·9	42·7	43·3	43·5	44·2	45·0	45·0	45·0	45·1	46·0	46·1	46·4	45·0	44·5	44·5	43·4	41·0	41·3	42·0	42·8	43·0
14	41·9	42·7	43·0	43·8	43·0	42·2	42·0	43·5	43·2	44·8	45·4	45·9	45·2	45·7	46·0	46·2	46·7	45·0	44·5	43·9	42·8	42·7	41·8	41·8	43·9
15**	41·2	42·0	43·3	42·8	44·5	48·5	43·9	43·2	43·8	45·0	45·0	46·8	47·0	47·4	45·9	46·2	40·4	45·5	45·4	41·9	27·0	37·6	41·0	41·2	43·2
16	41·0	40·0	41·5	42·7	43·9	46·0	43·8	43·5	43·8	45·0	46·1	47·2	46·1	46·5	44·0	43·0	43·0	44·8	44·0	43·2	43·1	42·0	40·5	40·0	43·5
17	40·8	42·0	43·1	42·9	42·5	45·1	44·5	43·8	43·3	44·0	45·0	45·8	46·0	46·1	45·9	45·6	45·6	40·0	42·2	43·1	39·8	42·0	43·2	43·0	43·5
18	43·0	43·3	42·0	43·8	44·0	44·0	43·8	43·8	43·9	44·4	45·0	45·5	45·7	45·9	46·0	45·7	46·0	45·0	44·5	44·0	43·7	43·3	39·4	41·5	44·1
19	41·2	43·0	43·0	43·0	43·0	44·0	43·8	43·9	44·8	45·0	45·1	45·5	46·2	45·0	44·8	44·9	44·8	44·7	44·0	44·0	43·7	40·7	41·7	43·8	43·8
20	43·0	42·5	42·7	41·3	40·0	42·5	43·0	44·3	45·8	45·0	46·0	46·0	45·8	45·3	44·9	45·0	45·0	44·3	44·8	44·0	45·0	43·2	42·8	43·2	43·8
21*	41·8	42·8	41·0	42·2	42·4	43·5	44·0	43·5	43·5	44·1	45·0	46·0	46·0	45·0	44·0	44·0	44·0	43·8	43·7	43·5	42·3	42·2	43·2	43·1	43·5
22*	42·7	43·0	43·1	43·3	43·5	43·5	43·0	42·8	42·8	43·8	44·1	44·8	44·8	44·0	43·2	44·0	44·0	43·7	43·5	43·0	43·0	42·8	42·8	42·8	43·4
23*	42·7	43·0	43·0	43·0	43·7	43·5	43·0	42·5	42·5	42·9	44·0	45·0	45·1	44·0	43·8	44·0	44·0	43·2	43·2	43·1	42·8	43·0	43·0	43·0	43·4
24	42·7	42·8	43·2	43·1	43·7	43·5	43·0	42·3	42·2	42·4	43·6	44·7	46·0	44·5	44·0	44·0	44·0	43·8	42·9	42·5	42·0	43·0	43·0	43·0	43·3
25	43·3	43·8	43·8	44·0	43·8	43·4	43·0	42·3	42·9	43·7	44·8	44·2	44·8	44·2	45·0	45·0	46·0	46·0	46·5	41·0	42·0	41·0	41·5	42·2	43·7
26	42·9	42·5	42·6	42·3	43·0	43·0	42·5	42·6	43·0	44·9	45·8	46·8	47·0	46·0	45·5	45·0	44·8	44·3	43·8	43·8	42·8	40·6	41·0	43·7	43·8
27**	42·9	41·8	42·5	43·5	43·2	43·5	43·0	43·5	43·5	45·0	45·7	46·3	48·2	47·0	47·4	46·2	49·2	46·2	44·6	43·2	42·7	42·5	42·0	39·5	44·3
28	38·7	41·0	39·7	41·9	41·0	41·8	43·7	43·0	45·8	47·3	47·5	47·7	47·0	45·8	44·7	45·8	45·0	45·0	43·2	42·9	39·9	40·2	39·1	41·0	43·4
29	42·0	41·0	38·5	42·2	42·3	43·0	43·0	43·7	44·0	44·5	45·2	46·0	45·8	45·8	44·8	44·0	44·0	43·8	43·5	42·7	42·0	39·5	40·4	38·2	42·9
30	40·5	42·1	42·7	42·2	42·7	43·0	43·0	43·0	43·5	44·3	45·6	46·9	47·0	46·0	44·0	44·0	43·7	41·3	41·3	42·8	33·1	37·1	40·6	41·0	42·7
31	42·0	39·6	39·9	42·2	41·7	42·0	42·5	42·0	41·9	43·0	44·0	45·8	48·0	46·7	46·3	46·1	45·0	40·8	41·0	42·5	41·7	31·7	37·8	41·0	42·3
Mean	42·3	42·4	42·6	43·0	42·9	43·7	43·6	43·6	43·7	44·4	45·2	46·0	46·6	46·1	45·4	45·0	44·4	43·6	43·4	42·6	41·3	41·0	41·3	41·8	43·6
Mean*	42·2	42·9	42·7	43·1	43·3	43·3	43·4	43·0	42·9	43·4	44·8	45·7	46·1	45·4	44·7	44·2	44·0	43·7	43·4	43·2	42·7	41·8	42·4	43·0	43·6
Mean**	43·4	43·0	42·3	44·2	43·9	45·2	44·9	44·9	45·2	46·3	46·3	47·1	48·3	47·7	45·7	44·8	43·4	42·1	43·0	41·5	38·0	40·6	40·8	40·9	43·9

TABLE II.—HOURLY MEANS OF NORTH COMPONENT OF MAGNETIC FORCE.

January.

17,000γ + Tabular Quantities.

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1	892	889	889	886	889	892	892	892	889	883	877	877	880	886	889	892	893	896	896	896	899	896	896	896	890
2*	893	893	893	896	899	902	899	899	893	887	887	887	890	893	896	896	890	893	893	893	896	899	896	896	894
3	896	896	897	900	900	903	903	900	897	885	879	879	882	891	891	894	891	891	900	897	897	894	891	894	894
4	894	891	894	894	894	897	900	900	897	888	882	879	886	892	883	862	877	889	895	895	892	895	898	901	891
5	900	899	895	897	899	899	898	895	896	900	899	..	..	..	..	..	..	..	..	..	..	..	..	..	..
6	..	..	..	..	..	..	..	..	..	..	..	862	868	873	876	876	878	889	887	883	892	889	883	887	..
7	890	887	887	890	890	893	893	893	891	888	885	879	879	882	882	879	879	885	888	891	891	891	888	888	887
8*	888	888	888	891	891	894	897	897	891	885	879	873	876	882	888	885	885	888	892	892	889	889	889	892	888
9	895	895	895	898	901	901	904	904	901	895	889	886	889	895	889	883	862	877	886	892	895	895	898	895	893
10**	892	895	895	892	896	899	899	899	896	890	890	896	902	905	905	911	896	863	872	869	905	866	875	887	892
11**	884	872	872	881	890	902	896	881	866	854	860	854	860	854	876	885	885	891	846	843	891	936	825	846	873
12**	858	852	843	864	867	867	867	861	858	858	861	861	864	864	870	873	876	876	873	864	879	885	873	873	866
13	874	865	850	844	865	886	874	868	868	862	844	859	865	865	868	868	874	874	877	883	889	904	874	880	870
14	877	874	874	877	880	883	880	880	874	868	863	863	866	875	884	878	881	884	884	884	881	881	887	881	878
15*	884	881	884	884	884	884	890	887	878	869	863	857	863	872	878	884	884	884	882	882	884	883	885	885	880
16	882	882	882	882	885	888	888	888	858	879	873	864	864	864	867	876	879	882	882	876	888	879	882	885	879
17*	885	882	885	888	888	891	891	889	883	877	874	874	874	874	877	880	880	883	883	883	886	886	886	886	883
18	886	883	886	892	892	892	892	892	889	883	877	874	874	880	880	880	877	884	884	893	890	890	887	887	885
19*	887	890	890	890	890	893	893	893	887	884	881	881	884	890	893	887	887	887	884	887	890	893	890	887	888
20**	890	893	899	903	903	897	894	891	906	909	906	903	894	876	834	834	870	876	882	885	876	876	885	888	886
21	897	876	879	879	879	885	888	885	885	879	870	867	867	874	871	880	874	877	880	886	895	889	886	886	880
22	886	889	883	886	895	901	892	889	895	883	859	868	862	859	850	877	877	883	886	880	868	877	883	887	880
23**	914	911	878	884	887	896	884	878	869	866	860	857	851	851	851	866	869	893	893	872	872	881	869	872	876
24	878	875	875	878	878	881	887	886	875	870	870	858	867	879	882	882	882	882	885	888	888	885	885	885	879
25	885	885	888	885	885	891	885	891	891	870	867	852	846	852	861	855	855	873	879	862	877	877	883	886	874
26	886	883	886	883	886	886	886	886	874	868	865	862	871	874	877	880	886	886	889	895	889	886	886	883	881
27	886	883	883	883	883	893	896	890	887	878	869	866	869	872	884	887	887	887	884	884	887	896	890	884	884
28	884	884	881	881	887	890	893	890	881	872	869	869	872	881	884	888	888	888	888	891	900	882	885	891	884
29	891	888	900	894	894	894	894	894	888	879	870	867	870	870	873	879	879	876	888	888	888	888	891	888	885
30	888	889	889	889	892	889	895	889	886	877	877	877	880	880	883	886	886	886	886	889	883	886	895	895	886
31	889	889	889	892	892	898	901	901	889	880	874	866	863	869	872	878	884	890	893	890	890	902	890	887	886
Mean	887	887	884	885	888	895	895	889	888	875	873	871	873	876	877	879	884	884	882	884	888	888	884	886	883
Mean*	887	887	888	890	890	893	894	893	886	880	877	874	877	881	884	886	885	887	887	887	890	890	889	889	886
Mean**	888	885	877	885	889	892	888	882	879	877	863	874	874	870	867	874	879	880	873	867	885	889	865	875	878

February.

17,000γ + Tabular Quantities.

																									Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1*	887	887	887	890	887	896	896	899	890	878	872	869	866	875	881	887	887	890	893	896	893	894	891	894	887
2	891	891	891	888	891	897	900	897	894	888	882	876	873	873	879	885	882	888	891	891	894	894	891	891	888
3	888	891	888	888	891	894	894	895	892	886	874	871	871	874	880	883	889	892	895	895	895	892	889	892	888
4	892	892	892	892	895	898	904	901	898	889	877	874	880	886	892	892	877	884	878	872	878	887	887	890	888
5	890	890	890	893	893	896	902	905	902	902	887	875	878	875	887	890	872	884	878	875	875	884	896	896	888
6*	884	887	881	885	885	888	891	891	891	888	879	870	870	873	879	885	882	885	891	894	894	891	891	888	885
7	885	885	885	885	891	894	897	900	900	894	891	885	879	880	883	886	889	895	895	898	898	898	898	901	891
8**	901	892	892	898	904	910	910	907	901	895	886	874	853	853	865	874	871	862	862	853	868	880	883	899	883
9	881	881	884	884	884	890	890	887	884	878	872	866	869	869	878	881	878	878	884	881	893	890	890	890	882
10	896	893	884	884	887	893	893	893	890	882	873	858	864	867	873	879	879	885	891	891	894	897	894	891	885
11	894	891	888	891	891	891	903	900	897	891	882	876	870	870	873	873	882	888	888	883	880	886	889	889	886
12**	889	889	892	889	892	895	898	901	898	889	889	865	859	859	868	877	877	874	886	871	892	892	886	883	884
13	886	886	886	898	892	896	896	896	899	890	878	872	872	872	875	878	884	887	890	893	893	890	926	905	889
14	887	890	890	881	887	887	899	899	890	887	878	872	872	872	869	882	882	891	894	894	894	891	894	888	886
15	888	891	888	891	891	891	903	897	897	891	882	876	876	876	882	885	888	888	891	888	891	894	894	891	889
16*	888	889	886	892	892	895	898	898	898	889	877	874	880	883	886	886	886	889	895	898	898	898	895	895	890
17**	895	895	895	895	895	898	901	904	901	895	883	878	878	884	890	884	875	872	884	884	890	893	893	908	890
18**	917	884	875	881	884	887	890	896	881	869	878	878	875	875	872	875	875	881	878	872	886	882	882	885	882
19	891	900	894	885	885	888	891	897	888	885	879	864	861	855	864	870	867	873	879	885	891	900	885	885	882
20	885	888	888	885	888	894	897	901	892	883	880	877	871	880	880	883	877	886	880	880	895	889	889	886	886
21*	886	886	886	886	889	892	895	895	895	889	883	877	877	880	877	874	883	890	893	893	893	893	893	893	887
22	896	893	893	893	899	893	896	899	887	875	863	863	863	860	866	869	875	881	884	887	887	890	887	887	883
23	884	887	887	885	891	897	894	894	891	882	873	864	867	876	873	873	882	885	891	891	876	873	873	882	882
24	903	876	876	876	882	882	885	888	885	879	870	864	858	865	871	877	883	883	889	889	889	886	886	889	880
25*	886	886	886	886	889	889	889	889	889	886	883	877	877	877	880	883	892	895	895	895	892	892	892	890	887
26	890	887	890	890	890	890	896	896	896	890	881	875	875	878	881	878	881	881	884	893	896	893	899	911	888
27**	890	890	890	893	893	893	896	899	899	894	879	873	870	870	879	885	882	864	864	879	894	876	885	888	885
28	894	888	885	885	888	891	891	885	879	876	864	858	858	867	867	870	879	888	888	892	892	895	892	892	882
29	883	889	886	889	889	892	895	892	889	880	871	862	859	862	868	874	880	886	889	892	889	892	892	895	883
Mean	891	889	887	888	890	893	896	897	893	886	878	871	870	872	876	880	881	884	886	886	890	890	891	892	886
Mean*	886	887	885	888	888	892	896	894	893	886	879	873	874	878	881	883	886	890	893	895	894	894	892	892	887
Mean**	898	890	889	891	893	897	899	901	896	885	878	874	872	868	875	879	876	871	875	872	886	885	886	893	885

TABLE II.—HOURLY MEANS OF NORTH COMPONENT OF MAGNETIC FORCE—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	
March.	17,000γ+Tabular Quantities.																									Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1*	890	887	887	890	890	894	897	897	891	878	875	869	866	863	869	881	888	891	894	894	897	894	894	894	886	
2	894	894	894	894	897	900	903	903	903	894	884	878	870	873	879	882	889	895	901	910	916	910	904	904	895	
3	907	892	889	895	898	901	901	892	901	889	867	858	852	858	867	889	873	882	879	883	890	886	902	896	886	
4	920	883	899	871	877	880	880	877	877	871	862	859	862	868	877	880	877	880	883	886	886	886	886	886	880	
5	893	893	881	878	884	884	887	884	878	866	854	848	848	854	869	860	860	866	872	866	875	903	887	878	874	
6	884	884	878	881	881	887	887	891	887	879	870	864	867	861	876	879	882	879	879	867	879	888	867	873	878	
7	867	873	876	870	879	876	879	882	879	864	855	846	855	864	873	876	880	880	886	886	886	880	877	880	874	
8**	883	889	883	893	899	899	902	899	914	914	908	880	899	871	838	805	835	835	835	841	838	853	847	851	871	
9**	848	845	863	900	863	851	836	809	791	776	773	794	815	800	839	848	860	906	894	860	830	833	857	897	841	
10**	903	857	830	839	845	854	870	858	855	846	840	834	837	843	861	852	837	849	852	858	864	855	858	864	853	
11	870	864	867	864	873	882	882	885	879	873	858	852	843	847	853	862	874	880	886	880	880	892	896	883	872	
12	883	880	883	883	886	886	889	880	880	877	865	859	859	862	859	865	865	874	880	880	884	890	881	881	877	
13*	878	878	878	878	881	884	887	887	881	872	860	854	854	860	866	866	875	878	878	884	887	887	887	887	876	
14	887	884	887	894	891	894	894	882	882	879	879	879	882	885	885	885	882	891	888	885	885	885	885	885	886	
15*	885	882	882	882	885	888	888	888	879	873	868	865	865	871	877	880	883	880	883	883	889	889	902	895	882	
16	886	883	886	886	886	889	889	892	889	886	877	877	880	883	883	883	886	887	890	890	900	900	900	896	888	
17	915	918	924	918	872	869	806	836	863	863	866	851	845	851	860	866	875	857	869	866	884	900	872	884	872	
18	879	870	870	867	867	870	873	873	864	858	846	846	843	882	858	867	867	861	864	876	894	879	873	867	867	
19	873	867	876	882	879	876	873	865	865	862	859	856	859	868	874	868	865	865	905	871	868	895	895	871	872	
20	877	886	871	874	874	877	877	877	871	859	835	838	847	844	863	863	863	872	878	890	918	878	878	881	871	
21	881	884	893	899	890	869	872	875	848	854	854	851	854	848	869	881	884	878	884	887	884	879	897	888	875	
22	885	879	882	882	888	891	888	879	867	858	849	843	852	864	873	876	879	885	894	894	888	885	888	888	877	
23	885	885	885	885	886	886	886	880	871	859	853	841	841	850	862	865	874	880	880	886	892	901	908	892	876	
24	886	883	886	886	886	892	895	892	889	874	865	860	863	869	866	881	866	860	872	881	875	869	869	872	877	
25	899	872	875	881	884	887	887	884	878	869	857	851	848	860	866	875	881	890	891	858	849	873	879	873	873	
26	876	867	870	870	873	879	882	879	879	870	861	840	822	840	855	867	873	882	885	885	885	882	882	882	870	
27*	879	883	880	880	886	889	892	889	880	862	850	844	841	847	862	874	883	886	886	886	889	886	886	886	876	
28	886	886	886	886	886	889	889	886	881	866	857	851	854	866	872	884	893	896	902	905	905	902	902	899	885	
29**	899	902	899	899	902	918	909	896	887	875	854	839	824	824	842	846	819	843	873	864	867	867	873	849	870	
30**	870	870	852	858	858	864	855	831	843	837	825	822	831	846	837	840	846	882	876	879	885	913	898	877	858	
31	877	877	874	877	874	880	874	841	847	862	859	820	817	823	841	850	853	865	883	883	883	892	901	898	865	
Mean	885	881	880	882	881	883	882	877	874	867	858	841	851	856	864	868	870	876	881	880	882	885	885	882	874	
Mean*	883	883	882	883	886	888	890	888	880	869	861	855	853	858	867	873	881	883	884	887	891	891	895	891	879	
Mean**	881	873	865	878	873	877	874	859	858	850	840	834	841	837	843	838	839	863	866	860	857	864	867	868	859	
April.	17,000γ+Tabular Quantities.																									Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1	887	871	878	875	871	888	869	885	860	851	848	848	845	854	876	882	872	885	891	915	900	894	909	900	877	
2	897	881	883	888	886	889	896	892	879	863	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	
3	..	..	..	..	..	..	..	..	..	..	861	865	873	877	884	882	882	887	887	894	890	892	890	899	..	
4*	902	893	884	887	887	887	887	881	868	853	847	844	841	847	887	868	878	884	887	890	896	893	890	890	878	
5*	890	890	891	891	891	891	891	888	882	872	857	851	854	863	872	885	888	894	897	900	903	906	903	903	886	
6	897	897	897	897	897	897	900	894	885	864	846	840	837	855	870	864	883	889	892	892	892	892	895	898	882	
7	895	889	889	889	889	898	901	892	889	864	855	846	855	864	873	883	896	893	890	890	893	896	908	917	885	
8	902	908	884	899	890	896	908	896	896	874	862	859	847	832	847	856	874	877	881	887	887	890	887	885	880	
9	885	885	882	882	885	885	888	888	875	866	878	842	848	854	859	878	882	888	891	894	891	891	894	891	880	
10*	891	891	891	891	894	897	898	895	883	870	855	849	852	858	864	876	886	895	895	895	895	895	892	892	883	
11	892	892	892	892	892	895	898	892	883	873	864	849	852	856	868	880	887	893	896	899	893	902	893	890	884	
12	890	893	899	896	896	899	905	902	893	880	871	865	868	868	874	887	893	887	893	893	897	897	897	897	889	
13*	900	897	894	894	894	897	897	894	888	878	869	866	866	869	872	875	878	884	891	897	900	906	897	897	888	
14	897	900	900	901	901	904	904	898	889	864	855	864	870	876	882	892	898	901	901	907	907	913	916	916	894	
15	910	916	907	910	913	916	919	904	895	879	856	844	853	859	856	865	877	908	887	868	862	868	880	877	885	
16	880	883	899	902	871	868	865	865	856	841	835	835	835	841	859	868	874	875	903	888	884	891	878	875	869	
17	872	869	869	869	872	869	869	866	866	851	833	842	857	869	872	878	891	893	903	918	888	884	884	897	874	
18	898	892	885	889	898	892	892	855	861	855	843	843	846	852	849	849	861	879	889	895	892	889	892	904	875	
19	882	882	889	892	889	889	889	886	877	868	853	850	847	859	868	880	896	902	905	902	902	896	896	902	884	
20	899	902	899	899	905	911	908	899	886	868	856	847	844	853	872	881	906	897	915	906	906	906	900	900	890	
21	900	891	900	900	900	903	900	894	872	860	851	842	848	857	872	881	884	894	897	900	900	904	901	901	885	
22	898	901	898	898	919	907	910	898	885	876	861	849	852	864	873	882	892	898	901	898	898	901	904	904	890	
23	901	898	901	901	902	905	899	880	877	871	865	859	862	859	868	877	886	896	889	893	896	896	896	896	886	
24*	896	896	896	899	893	893	893	896	886	874	862	857	863	866	884	894	897	906	900	900	906	909	909	909	891	
25**	906	906	909	909	894	900	903	897	872	872	872	875	872	863	878	890	887	921	895	870	861	849	864	837	883	
26**	865	886	895	870	860	859	858	861	857	851	843	847	845	859	867	873	877	882	888	895	900	895	887	890	871	
27**	891	893	884	872	885	882	889	867	865	846	844	852	856	856	853	865	885	884	912	909	903	917	905	892	880	
28**	891	889	875	908	874	889	871	853	841	839	838	831	817	845	849	875	876	886	897	925	923	892	895	925	875	
29**	930	913	842	848	842	839	821	800	803	805	785	775	799	842	868	866	864	876	900	904	896	901	901	888	855	
30	898	901	896	897	910	899	898	882	867	851	841	838	843	855	864	867	881	907	916	897	898	897	895	893	883	
Mean	894	894	890	891	890	891	890	886	873	861	852	847	849	857	868	876	886	895	897	897	895	895	895	895	881	
Mean*	896	893	891	892	892	893	893	891	881	869	858	853	855	861	876	880	885	893	894	896	900	902	898	898	885	
Mean**	897	897	881	881	871	874	868	856	848	843	836	836	838	853	863	874	878	890	898	901	897	891	890	886	873	

TABLE II.—HOURLY MEANS OF NORTH COMPONENT OF MAGNETIC FORCE—*continued.*

May — 17,000γ+Tabular Quantities.

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1	892	893	893	893	893	885	881	873	867	850	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
2	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
3	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
4	..	..	..	..	..	..	..	..	..	..	855	862	867	870	882	894	894	897	899	895	893	892	892	892	..	..
5	892	895	892	892	885	885	892	882	864	852	843	849	855	867	882	895	901	882	898	895	898	901	913	904	884	
6	901	904	901	904	907	895	882	885	864	861	830	827	830	846	855	861	876	888	895	899	893	893	886	886	878	
7	883	883	886	886	886	886	880	877	868	862	856	850	847	850	862	883	886	899	883	893	905	886	889	889	878	
8	883	886	893	886	874	877	883	877	874	862	856	853	844	844	856	868	880	893	894	903	900	900	897	900	878	
9	897	900	897	881	894	900	875	887	881	872	863	860	854	857	869	878	890	900	900	900	897	897	897	897	885	
10	897	900	900	897	900	900	900	894	878	869	863	857	863	863	872	881	887	901	910	913	910	904	895	904	890	
11	898	898	904	895	898	882	891	898	885	876	846	855	861	843	852	873	879	898	910	904	904	901	910	904	886	
12	904	888	901	904	901	879	891	885	876	861	858	867	867	867	876	876	874	896	899	899	895	895	902	902	886	
13*	892	889	886	883	880	877	886	883	871	859	859	862	868	877	880	880	892	902	899	902	905	899	902	889	884	
14*	896	883	899	889	886	883	889	880	871	871	868	865	868	862	874	884	893	897	903	900	897	897	893	893	885	
15*	893	893	887	887	893	893	897	887	878	866	857	848	851	860	872	884	893	900	906	900	900	900	897	890	885	
16	897	890	890	890	897	897	887	881	878	866	842	842	854	860	870	876	888	891	907	910	922	928	916	907	887	
17	907	907	901	901	898	888	891	891	879	870	861	855	852	855	870	882	882	888	901	898	901	901	894	894	886	
18*	891	894	891	894	891	891	888	879	867	864	867	857	864	874	868	871	883	902	905	905	902	902	902	899	886	
19	899	895	895	899	899	895	899	889	877	874	874	877	874	874	877	880	877	899	908	908	908	926	911	902	892	
20	895	892	892	892	892	895	892	889	880	871	865	862	863	869	878	884	893	900	903	903	900	896	896	909	888	
21**	906	909	900	890	893	906	906	893	875	857	851	848	854	851	869	887	884	912	909	906	884	869	872	872	884	
22**	893	890	893	863	866	845	854	842	838	808	814	821	827	803	815	855	858	852	876	891	885	888	891	888	857	
23**	894	891	870	901	858	858	867	839	846	833	843	833	824	836	858	873	882	882	919	910	894	910	913	873	872	
24	879	876	876	867	891	882	876	855	833	839	847	853	859	862	871	883	895	920	892	886	889	889	886	880	874	
25	877	880	880	889	877	871	871	862	856	853	847	840	844	862	877	883	898	902	914	902	898	895	895	883	877	
26	883	871	874	880	880	880	871	859	856	857	854	860	851	860	866	875	887	896	899	899	896	893	896	890	877	
27*	884	887	884	884	887	884	884	872	863	863	860	854	851	866	881	890	890	893	896	895	906	893	890	887	881	
28	884	884	884	884	884	881	881	869	861	870	858	964	873	882	891	897	919	916	907	913	904	897	897	894	887	
29	891	891	897	894	897	897	885	857	858	858	858	855	855	870	873	888	897	888	888	910	916	922	913	907	886	
30**	910	910	904	894	900	900	898	889	883	877	871	862	895	880	901	868	889	895	905	914	911	911	911	901	895	
31**	898	908	905	911	877	856	883	874	856	840	865	874	868	865	865	923	911	926	898	898	886	892	889	883	886	
Mean	893	892	892	890	890	887	882	877	867	860	855	854	856	859	870	881	885	897	901	902	904	899	898	894	883	
Mean*	891	889	889	887	887	886	889	880	870	865	862	859	860	868	875	882	890	899	902	901	902	898	897	892	884	
Mean**	900	902	894	892	884	873	882	867	860	843	849	848	854	847	862	881	885	893	901	904	892	894	895	883	879	

June — 17,000γ+Tabular Quantities.

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1	883	880	880	880	871	866	866	860	860	857	851	841	835	860	872	887	893	896	896	896	896	896	890	890	875	
2*	887	887	890	890	896	896	890	884	875	869	863	857	860	876	876	888	897	900	900	904	904	900	894	894	887	
3*	894	894	894	894	891	894	891	885	876	867	858	858	852	861	876	888	894	894	897	900	900	901	898	898	886	
4	898	898	898	898	901	901	898	886	877	868	868	862	859	868	880	880	886	892	901	898	904	901	901	898	888	
5	898	898	895	898	898	906	909	896	884	860	860	869	875	869	890	896	899	902	909	906	906	906	906	902	893	
6	902	899	896	902	906	906	902	896	887	881	878	872	869	867	885	894	903	907	916	916	922	919	903	900	897	
7	903	900	894	897	897	900	910	903	891	879	864	870	858	867	891	888	885	894	903	916	910	914	908	904	894	
8**	901	901	895	901	889	914	907	892	877	868	856	862	852	865	895	917	911	914	914	908	892	898	895	892	892	
9	892	886	889	892	886	878	875	872	853	853	857	857	860	863	872	887	895	905	909	905	902	909	893	890	883	
10*	893	890	890	893	899	899	893	887	881	872	869	869	863	876	882	882	894	900	906	906	903	906	906	903	890	
11	903	903	903	906	910	910	903	891	879	870	864	870	876	882	885	894	900	903	900	913	919	920	920	907	897	
12	911	914	914	911	914	904	898	904	898	889	871	877	880	883	901	898	926	889	898	904	911	907	911	920	901	
13	920	911	904	904	898	899	905	899	887	866	860	853	863	856	875	893	912	915	912	908	902	902	912	905	894	
14	899	899	899	905	905	905	890	881	884	881	863	869	872	882	882	891	894	900	909	913	909	909	909	906	894	
15*	906	906	903	903	900	891	900	897	885	885	867	854	864	870	870	888	900	903	909	913	913	910	907	904	894	
16*	910	907	904	901	904	910	901	892	883	871	862	871	880	883	886	892	895	898	904	907	907	907	907	907	895	
17	907	904	904	904	910	911	896	881	878	884	893	884	872	881	893	887	905	911	918	918	911	908	908	908	899	
18**	908	908	915	908	911	915	911	905	887	884	887	887	884	873	888	912	912	906	916	916	919	928	925	903	905	
19**	900	900	894	891	900	897	891	891	885	876	867	860	857	842	885	912	909	931	925	912	906	907	910	910	894	
20	910	904	910	898	895	883	889	883	875	855	845	..	..	..	..	..	..	..	..	..	..	..	..	..	..	..
21	..	..	..	..	..	..	..	..	..	..	..	849	861	865	875	893	904	917	908	898	895	887	871	872		
22**	875	875	878	878	884	884	881	875	862	859	850	850	853	867	882	888	894	922	934	909	888	879	894	870	881	
23**	879	870	873	851	891	879	867	839	836	833	830	827	827	836	851	879	876	873	882	885	891	883	877	877	863	
24	880	877	874	880	880	880	871	861	852	846	840	837	837	846	855	865	871	886	886	886	889	889	889	895	870	
25	895	886	898	901	904	905	893	869	862	865	853	844	844	856	862	878	893	933	908	908	902	905	890	896	886	
26	893	887	893	887	899	899	887	878	859	844	829	835	838	857	857	879	897	903	903	818	894	885	882	885	879	
27	879	882	885	888	891	885	879	870	870	870	860	860	860	870	894	882	906	888	882	882	885	889	889	886	880	
28	889	886	880	883	892	892	871	864	867	861	855	843	861	871	877	874	883	877	889	898	895	889	889	886	878	
29	886	886	886	886	889	890	884	875	862	853	850	847	844	847	853	868	878	890	896	899	927	917	928	896	881	
30	896	896	899	896	896	890	881	865	841	838	841	841	847	851	869	876	869	882	900	894	891	885	876	928	877	
Mean	893	891	891	891	894	893	888	879	870	864	857	853	857	863	875	885	892	897	901	901	900	899	897	895	884	
Mean*	898	897	896	896	898	898	895	889	880	873	864	862	864	873	878	888	896	899	903	906	905	905	902	901	890	
Mean**	893	891	891	888	895	898	891	880	869	864	858	857	855	857	880	902	900	909	914	906	899	899	900	890	887	

TABLE II.—HOURLY MEANS OF NORTH COMPONENT OF MAGNETIC FORCE—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h
July.											17,000γ+Tabular Quantities.														Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1**	918	884	899	893	893	875	850	813	819	832	807	826	816	816	826	816	826	844	853	862	869	857	857	854	850
2	860	860	860	863	870	860	848	845	836	833	833	833	830	842	839	851	873	877	877	877	864	864	861	861	855
3	858	861	858	864	864	852	852	846	834	825	866	825	831	844	353	847	862	875	884	875	875	865	869	859	853
4	869	872	869	869	872	872	862	859	844	827	833	833	830	845	851	866	876	891	894	894	900	882	879	866	865
5	863	870	876	866	854	874	871	861	852	843	846	846	840	843	855	877	883	883	895	886	898	864	867	864	866
6	867	868	875	865	887	878	850	847	850	841	825	835	841	841	850	850	868	890	878	881	875	882	870	854	862
7*	860	857	860	863	866	866	860	848	839	833	830	826	830	836	848	866	873	883	877	892	867	864	858	858	857
8**	861	861	861	864	861	870	870	864	858	843	837	834	840	847	850	862	881	905	921	881	865	844	859	859	863
9**	868	868	862	856	847	859	850	838	850	839	808	826	808	823	845	839	851	863	863	866	857	857	866	851	848
10	848	857	860	851	854	852	855	855	843	849	827	837	834	837	837	843	846	870	873	873	870	886	870	864	854
11	861	862	865	874	844	850	856	841	838	831	831	825	822	835	847	856	859	881	878	871	865	872	875	872	855
12	866	860	860	857	863	866	857	848	826	814	823	820	836	842	848	851	866	876	876	873	867	867	870	880	854
13	873	861	861	861	864	855	843	833	840	837	843	824	840	844	859	859	865	881	884	881	881	871	877	874	859
14	871	862	868	865	862	868	859	844	831	829	829	832	839	832	866	866	869	869	869	872	872	872	869	866	857
15*	866	866	866	866	866	867	861	855	840	830	827	833	840	852	858	864	870	870	873	870	879	873	873	873	860
16	873	874	874	877	880	883	877	868	856	850	844	837	837	847	856	856	859	874	880	890	887	875	878	878	867
17**	891	888	875	875	869	869	875	875	863	848	842	845	863	872	875	881	894	892	904	907	919	895	886	882	879
18	892	892	898	882	876	861	867	849	833	843	839	846	852	866	872	878	884	900	897	900	909	918	903	891	877
19	891	891	891	897	894	894	891	872	866	864	861	852	849	846	858	876	882	885	901	901	889	885	889	898	880
20	910	895	879	873	882	899	877	868	865	862	859	850	850	850	859	865	874	886	890	899	899	896	886	883	877
21	880	881	881	884	891	891	875	872	872	869	869	866	866	854	854	869	875	884	894	891	887	885	879	876	877
22	876	876	875	876	879	879	870	873	867	858	849	849	852	858	861	867	870	880	896	899	905	908	896	893	876
23**	893	896	896	890	899	911	923	911	886	859	859	850	853	854	863	832	869	854	894	900	894	890	890	884	881
24	884	881	878	881	881	878	878	869	872	852	830	852	855	848	845	852	867	876	888	891	888	885	885	888	871
25	882	876	876	882	876	879	877	865	856	853	846	849	856	859	862	862	868	883	886	892	883	883	880	883	872
26	886	884	881	872	875	887	884	872	857	860	866	850	850	800	869	866	872	875	884	884	887	885	882	879	874
27*	879	876	876	876	882	885	879	867	858	842	845	851	864	870	873	873	876	879	883	883	886	883	877	877	872
28*	877	880	880	883	883	883	877	862	856	862	859	856	846	866	872	872	881	884	884	881	881	878	878	878	873
29*	878	875	878	878	881	878	875	850	838	839	845	848	848	845	848	854	861	867	879	882	882	882	882	885	866
30	885	882	882	882	882	882	880	877	859	852	849	852	852	859	868	877	871	874	883	883	889	892	883	886	874
31	886	881	884	884	881	875	875	875	866	850	844	841	841	844	853	863	869	878	884	888	884	876	873	873	869
Mean	876	874	874	873	873	874	869	859	851	844	839	840	842	848	855	860	869	878	885	884	883	879	877	874	866
Mean*	872	871	872	873	876	876	870	856	847	841	841	842	846	854	860	865	872	877	879	882	879	876	874	874	866
Mean**	886	879	879	877	974	877	874	860	855	844	831	836	836	842	852	846	864	872	887	882	881	869	871	866	864
August.											17,000γ+Tabular Quantities.														Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1*	874	874	877	877	880	877	877	871	856	843	840	840	846	856	862	865	872	881	888	894	894	894	891	894	872
2	894	897	903	900	918	924	909	918	847	811	826	842	833	830	824	845	864	867	873	876	864	855	864	861	869
3	864	861	864	861	852	852	859	853	840	825	825	831	834	831	843	846	856	868	874	877	874	871	871	865	854
4	865	869	866	869	866	869	869	863	860	854	841	835	835	841	854	860	869	875	887	884	879	885	888	885	865
5	885	879	867	870	870	876	867	867	904	858	851	851	858	848	851	871	865	868	889	874	886	886	886	908	871
6**	883	877	871	871	889	849	871	862	822	831	823	835	826	823	807	838	841	853	875	875	884	869	869	866	855
7	866	878	860	857	869	864	842	824	830	802	824	821	830	842	848	854	867	876	889	885	879	873	870	867	855
8	868	874	859	871	874	855	846	855	855	825	834	843	849	825	834	859	871	877	874	875	872	869	872	875	859
9	875	856	866	866	859	853	856	850	841	835	838	841	853	860	867	864	870	882	879	882	879	876	882	870	862
10	870	873	873	864	870	873	854	854	857	849	843	843	852	855	858	862	868	865	868	871	874	874	868	868	863
11	871	871	868	868	869	869	869	863	856	847	847	850	853	853	856	869	872	881	884	890	893	872	872	870	867
12	867	867	873	879	879	873	870	860	876	845	845	842	845	851	851	867	873	876	883	880	880	877	883	880	868
13	877	877	871	880	874	865	865	855	849	834	834	831	843	847	853	862	862	869	866	872	875	875	884	896	863
14	869	872	862	869	878	875	866	859	851	839	833	842	839	839	836	851	857	873	870	870	867	867	867	863	859
15*	867	867	867	868	868	868	861	855	843	837	834	840	846	846	855	858	864	871	874	877	874	874	875	872	861
16*	872	872	872	872	875	878	872	862	856	847	838	838	840	847	853	862	872	876	882	882	882	882	879	879	866
17*	876	876	876	873	870	876	873	860	851	842	836	836	846	858	861	871	877	880	877	880	883	886	883	880	868
18	883	877	874	880	880	880	874	862	847	841	841	838	838	847	853	865	875	884	887	887	884	878	875	875	868
19	878	878	882	885	885	885	882	872	860	842	833	839	836	826	845	860	866	882	879	882	885	895	907	886	870
20	880	883	883	883	889	892	867	852	843	837	837	837	837	840	843	843	853	878	884	881	884	878	871	871	864
21	865	865	865	868	871	859	868	862	853	850	850	854	842	848	848	854	866	869	879	882	879	879	875	882	864
22**	882	872	866	869	866	883	864	855	849	840	849	846	852	852	861	858	864	858	910	904	914	840	837	861	864
23**	849	844	862	859	844	871	874	859	841	838	834	838	838	825	828	838	865	893	859	856	863	879	882	854	854
24	857	848	845	845	851	860	851	826	823	817	814	808	814	829	842	855	880	858	861	867	867	864	858	858	845
25*	858	861	858	858	861	858	855	846	840	830	828	831	841	853	856	859	862	868	868	868	868	865	865	862	855
26**	862	859	862	859	865	866	863	851	848	842	835	842	854	863	866	869	875	872	860	903	906	906	854	860	864
27**	851	808	765	798	783	749	780	786	771	752	752	771	795	820	832	835	832	829	838	836	846	839	836	839	806
28	839	839	846	830	830	839	843	833	824	821	821	815	833	843	844	844	850	853	856	853	853	853	856	847	840
29	844	847	837	850	837	850	844	831	822	798	807	820	838	841	845	851	845	857	857	854	878	866	866	854	843
30	851	848	841	851	842	836	839	821	818	809	809	818	830	836	842	842	855	864	855	858	867	864	870	868	843
31	856	856	856	856	850	847	847	834	819	813	813	819	828	843	850	856	856	859	863	863	863	863	863	857	847
Mean	868	865	862	865	865	863	861	852	842	831	830	833	839	843	847	856	863	870	874	875	877	873	872	870	858
Mean*	869	870	870	870	871	871	868	859	849	840	835	837	844	852	857	863	869	875	878	880	880	880	879	877	864
Mean**	865	852	845	851	849	844	852	844	833	823	819	826	833	837	839	850	855	861	868	875	883	867	856	856	849

TABLE II.—HOURLY MEANS OF NORTH COMPONENT OF MAGNETIC FORCE—*continued.*

September 17,000γ+Tabular Quantities. Mean.

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1*	858	855	855	855	855	858	852	839	830	824	824	821	824	836	850	850	856	862	868	868	868	865	878	865	851
2	862	859	862	862	862	865	868	856	837	828	829	832	838	841	848	845	848	851	869	869	872	913	879	872	857
3**	879	863	848	854	863	854	855	821	799	805	802	812	824	799	833	852	846	855	861	864	858	849	855	852	842
4**	858	858	850	850	862	840	831	837	819	806	816	822	825	834	834	850	856	868	871	877	874	884	866	854	848
5	875	844	841	835	832	838	829	841	801	810	807	814	829	826	841	841	851	854	864	858	864	861	864	858	841
6	855	858	858	855	858	861	858	849	845	842	839	836	839	839	834	840	843	850	868	871	868	868	868	859	853
7	853	862	859	859	859	859	859	846	828	834	838	826	835	835	826	826	841	851	857	866	869	866	863	860	849
8	860	860	860	857	860	860	855	842	833	818	802	811	839	842	839	842	845	848	858	864	864	864	861	858	848
9	858	858	859	859	859	856	849	849	849	843	840	840	837	840	837	843	846	862	862	865	865	862	866	866	853
10	866	866	872	872	869	869	857	844	844	847	854	854	860	863	866	869	872	872	879	882	876	882	882	937	869
11	873	870	873	861	861	867	858	848	839	842	833	839	845	842	831	843	852	856	856	859	862	883	899	865	857
12**	865	871	871	849	840	859	828	828	825	825	823	826	838	841	853	844	869	850	857	878	869	847	850	841	848
13	853	860	847	850	850	850	848	817	811	811	814	824	833	839	851	858	851	848	858	861	858	867	861	858	845
14	854	854	859	859	859	859	855	846	831	821	821	825	821	843	852	855	852	859	855	862	868	865	869	872	851
15	863	866	863	863	866	866	860	856	847	819	798	795	813	832	835	835	841	856	848	857	870	870	870	867	848
16	867	867	867	870	867	854	870	848	820	805	808	802	823	823	840	843	858	852	877	862	862	862	868	868	849
17	871	880	880	871	849	855	849	828	818	803	801	813	819	829	816	838	841	850	853	850	859	866	878	859	845
18	856	859	859	859	859	866	848	848	845	833	823	808	811	820	839	851	857	851	864	867	864	873	864	864	850
19*	860	864	858	858	865	861	861	852	840	834	834	834	834	843	846	849	852	858	865	868	868	868	869	869	855
20*	872	866	866	869	869	872	872	866	853	844	835	838	841	850	853	853	859	866	867	873	873	870	873	873	861
21*	870	870	873	870	870	876	873	867	851	848	848	851	851	854	861	864	871	871	874	877	877	880	874	871	866
22	871	871	874	874	874	874	874	871	868	861	861	862	859	865	872	872	878	881	884	887	884	875	884	884	873
23	869	869	869	873	884	865	859	860	857	854	842	839	845	851	851	860	870	870	873	876	879	882	885	879	865
24	882	882	883	880	877	880	874	861	852	843	840	843	846	852	852	858	858	874	874	874	874	883	883	874	867
25	867	874	871	877	874	874	867	861	852	846	846	846	852	855	864	864	861	852	865	868	881	872	872	875	864
26	896	890	865	865	865	872	868	862	856	853	853	853	853	859	863	863	869	860	873	876	876	869	879	891	868
27**	885	879	839	857	860	863	863	848	808	814	829	833	836	836	840	846	840	880	861	858	874	886	864	861	853
28	858	861	861	858	861	870	861	850	850	841	834	828	834	844	850	856	859	859	862	865	865	865	871	871	856
29*	868	871	860	863	866	866	866	866	860	842	829	832	842	851	854	857	860	863	866	869	869	869	869	866	859
30**	869	869	872	872	876	876	876	876	863	845	835	829	792	804	826	835	838	851	839	852	877	911	920	877	858
Mean	866	866	862	862	862	863	858	849	838	831	829	830	835	840	845	850	855	859	864	867	870	873	873	869	855
Mean*	866	865	862	863	865	867	865	858	847	838	834	835	838	847	853	855	860	864	868	871	871	870	873	869	858
Mean**	871	868	856	856	860	858	851	842	823	819	821	824	823	823	837	845	850	861	858	866	870	875	871	857	850

October 17,000γ+Tabular Quantities. Mean.

	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1**	856	868	850	856	872	865	859	844	828	816	809	809	809	806	807	838	823	848	863	876	876	863	863	888	846
2	873	869	860	845	848	863	851	854	832	838	832	810	814	832	845	848	856	876	877	849	858	867	861	864	851
3	864	858	858	861	861	864	864	858	852	836	811	811	818	821	821	833	858	861	877	864	867	870	862	862	850
4*	862	865	862	862	862	862	865	862	853	844	837	831	834	831	844	850	850	856	859	865	871	868	868	865	855
5	862	865	866	866	869	869	869	866	854	845	841	832	841	845	838	841	838	845	860	869	860	891	891	885	859
6**	866	879	857	860	882	876	861	842	818	827	790	777	780	787	790	768	812	802	802	821	842	824	824	808	825
7**	870	839	824	811	818	836	836	796	799	796	788	797	794	797	825	871	837	837	853	884	881	871	840	847	831
8**	856	840	840	840	840	862	850	843	822	837	843	794	803	819	835	829	823	844	866	872	851	869	866	857	842
9	857	851	844	844	838	841	851	860	844	820	816	820	816	829	841	844	851	863	845	873	864	855	861	861	845
10	864	855	852	855	855	852	855	855	845	839	824	817	821	827	827	827	827	839	842	861	867	855	856	871	845
11	865	856	853	853	859	862	865	853	837	822	815	815	818	815	825	818	837	831	853	893	837	843	850	853	843
12	850	846	847	860	851	857	854	841	832	813	807	813	823	826	826	823	819	835	854	832	844	844	857	878	839
13**	851	832	841	841	847	857	852	827	864	796	786	796	805	805	811	827	817	820	814	824	830	814	848	805	826
14	817	820	824	820	827	833	839	820	805	805	790	787	806	908	812	821	831	837	837	840	843	843	843	843	823
15	843	843	840	846	853	846	846	840	828	812	800	800	800	818	829	835	841	844	847	847	847	847	847	844	835
16*	844	847	847	847	850	854	854	847	835	826	819	816	819	832	838	841	844	850	855	855	855	855	855	855	843
17*	851	851	855	855	858	861	858	855	845	833	827	820	823	827	836	839	836	851	858	858	861	858	862	859	847
18*	859	859	859	859	862	862	862	856	846	824	818	815	824	831	837	846	856	859	862	862	862	862	862	859	849
19	859	856	860	860	863	866	866	863	853	841	835	835	835	847	853	860	860	869	869	869	872	872	869	860	858
20	860	863	863	863	863	868	882	879	870	851	833	836	839	851	851	858	854	858	867	873	867	867	864	870	861
21	873	873	870	864	861	873	864	858	858	845	840	837	840	840	818	834	852	846	862	871	890	893	874	865	858
22	865	865	871	865	871	865	877	874	859	831	834	834	827	827	853	856	862	862	856	872	875	878	894	884	861
23	881	872	863	866	866	866	866	863	856	853	841	832	841	850	853	856	860	856	848	857	876	873	873	887	860
24	864	864	864	864	864	870	867	864	857	848	842	842	829	864	848	851	857	861	864	870	876	861	877	865	860
25	862	862	865	865	862	874	868	862	852	843	837	827	818	843	840	852	852	862	855	865	868	865	865	865	855
26	865	865	866	866	866	866	866	863	856	847	841	859	856	844	856	863	866	869	872	872	872	869	872	873	863
27	859	869	863	866	866	869	870	867	857	842	836	836	839	845	851	854	860	864	867	867	873	873	870	864	860
28*	864	867	867	867	870	873	876	873	864	854	843	846	837	843	855	858	861	868	868	868	871	874	877	877	863
29	874	874	871	871	868	868	865	868	868	868	865	865	861	861	859	856	853	850	847	844	844	890	862	859	863
30	859	859	862	862	866	872	872	869	862	853	844	834	834	838	841	847	847	856	860	863	873	873	867	867	857
31	863	867	867	867	867	870	870	863	854	848	842	835	832	835	839	845	848	848	854	857	863	860	861	868	855
Mean	860	858	856	856	858	862	861	854	845	835	826	822	823	830	835	841	844	850	855	861	862	863	863	861	849
Mean*	856	858	858	858	860	862	863	859	849	841	830	826	826	831	841	845	847	856	860	862	864	863	865	863	852
Mean**	860	852	844	842	852	859	852	830	826	814	803	795	798	803	814	827	822	830	840	855	856	848	848	841	834

TABLE II.—HOURLY MEANS OF NORTH COMPONENT OF MAGNETIC FORCE—*continued.*

	0h	1h	2h	3h	4h	5h	6h	7h	8h	9h	10h	11h	Noon.	13h	14h	15h	16h	17h	18h	19h	20h	21h	22h	23h	24h	
November	17,000γ+Tabular Quantities.																									Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1*	871	868	864	858	861	855	864	864	861	855	843	840	843	843	846	849	852	843	849	861	864	868	868	868	857	
2	861	861	862	862	962	862	872	878	865	853	844	837	844	847	847	850	847	847	862	859	878	859	856	862	857	
3	862	862	862	862	865	875	878	862	841	834	797	804	798	807	820	835	835	845	851	857	866	873	863	847		
4**	857	851	851	851	851	845	848	845	835	826	801	792	810	829	929	826	835	848	848	885	826	835	830	836	837	
5**	827	836	836	839	843	843	852	827	814	808	799	777	789	821	827	824	824	843	874	861	849	874	852	877	834	
6**	852	849	849	846	846	839	843	833	825	819	822	822	812	812	825	815	847	837	831	834	853	850	847	840	835	
7	847	850	844	840	840	844	840	840	834	812	797	800	815	828	831	834	840	850	851	851	854	854	851	851	838	
8	854	860	851	845	848	854	854	851	838	829	826	823	826	829	835	829	838	860	863	848	851	860	854	860	845	
9	860	854	854	854	855	861	858	846	833	830	824	824	836	839	839	842	855	842	861	855	855	849	883	874	849	
10	864	864	855	867	861	852	855	855	849	836	830	827	833	830	822	834	850	856	856	862	859	856	856	856	850	
11	856	856	856	856	856	865	862	856	837	825	815	812	818	825	834	840	847	850	865	868	853	856	859	878	848	
12**	872	860	857	866	863	854	844	851	838	823	816	801	807	804	794	829	854	866	882	869	854	854	854	857	845	
13	854	841	838	835	841	848	851	851	851	848	845	842	839	842	845	845	842	839	852	852	852	852	852	852	846	
14*	852	849	852	849	852	852	855	852	845	839	833	833	839	836	833	845	849	855	845	864	853	853	856	856	848	
15	853	856	859	850	859	859	862	859	846	834	837	837	821	840	846	846	853	859	859	865	859	859	859	871	852	
16	856	856	856	859	856	862	866	866	863	857	851	847	847	851	851	841	854	857	860	872	882	869	860	863	858	
17	860	860	860	860	866	872	866	869	872	869	860	857	854	857	860	860	861	867	870	870	867	870	870	873	865	
18	867	867	867	867	873	880	876	876	861	855	845	830	845	848	852	852	858	864	867	873	870	870	883	858	863	
19	859	859	862	862	859	865	862	865	865	859	853	846	849	853	849	859	862	856	846	874	871	865	868	862	860	
20*	859	862	865	868	871	868	868	868	868	862	850	841	854	857	863	863	866	869	863	860	854	863	863	869	862	
21*	863	863	863	857	857	869	869	866	866	857	857	854	857	857	860	860	860	854	869	863	867	870	870	873	862	
22	879	861	861	858	864	867	870	870	839	855	855	851	845	848	848	851	861	864	870	867	867	873	870	870	861	
23	864	861	864	867	867	864	868	871	871	862	852	846	846	843	840	837	840	849	849	846	849	856	859	865	856	
24*	859	859	856	852	852	856	859	856	852	849	846	846	846	849	852	852	857	853	853	857	853	857	857	853	853	
25	853	857	853	853	863	866	866	863	863	863	860	857	853	850	847	844	832	841	841	847	853	878	894	853	856	
26	854	854	854	854	858	858	851	854	858	858	851	851	151	845	848	851	854	867	876	873	876	854	873	867	858	
27**	864	864	858	851	861	876	873	867	861	858	855	855	862	868	868	868	868	862	883	859	862	862	865	865	864	
28	849	843	840	849	846	849	855	855	855	852	849	852	852	852	852	855	859	862	865	865	866	884	866	860	855	
29	856	860	853	860	866	875	866	856	856	856	850	835	835	822	822	828	850	860	850	866	875	869	856	863	853	
30	856	856	850	853	866	860	867	854	842	836	832	823	811	820	823	823	814	817	829	829	854	854	861	857	841	
Mean	858	857	855	855	858	860	861	858	851	844	838	832	83·5	838	840	842	849	853	858	860	859	861	862	862	852	
Mean*	861	860	860	857	859	860	863	861	858	852	846	843	848	848	851	854	857	855	856	861	858	862	863	864	856	
Mean**	854	852	850	851	853	851	852	845	835	827	819	809	816	827	829	832	846	851	864	862	849	855	850	855	843	
December	17,000γ+Tabular Quantities.																									Mean.
	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ	γ
1**	857	848	845	851	857	857	860	848	817	829	832	823	814	814	826	826	833	827	861	843	855	852	855	846	841	
2**	840	840	843	843	858	865	855	846	833	821	793	821	824	824	843	836	830	840	852	846	853	853	856	862	841	
3**	859	850	862	850	847	853	859	841	816	831	844	828	831	806	812	841	841	844	853	859	859	897	866	850	846	
4	854	863	854	854	860	860	860	860	854	838	835	835	838	832	842	838	851	848	857	863	860	867	870	870	853	
5	863	863	860	857	858	864	868	868	864	861	852	843	846	852	852	849	849	855	858	858	861	855	858	871	858	
6*	868	861	861	861	864	868	864	861	859	841	837	837	340	847	847	853	859	865	865	862	862	875	865	862	858	
7	862	862	862	862	865	869	869	865	865	862	856	853	854	857	863	860	863	866	860	860	851	848	854	857	860	
8	857	860	860	863	866	866	882	866	857	851	848	841	845	841	835	841	849	855	855	861	864	861	861	861	856	
9	858	861	867	864	867	871	867	861	852	852	852	846	842	839	849	846	842	855	852	852	856	862	862	862	856	
10*	859	862	865	859	865	872	868	862	853	843	840	843	843	847	850	850	850	853	865	865	862	862	862	865	857	
11	869	866	866	866	866	869	869	873	863	857	857	854	854	848	844	844	854	860	866	866	866	866	863	860	861	
12	860	860	860	876	876	880	867	864	858	845	842	867	858	855	852	852	852	855	858	845	855	877	864	855	860	
13	858	855	861	874	867	858	855	858	858	856	859	859	859	856	850	850	859	862	862	865	862	862	865	862	860	
14	865	862	859	862	865	865	868	859	862	868	871	865	865	866	866	863	857	854	854	860	869	872	872	872	864	
15**	866	866	863	863	860	869	869	863	860	860	860	841	816	826	854	838	851	852	858	864	873	842	845	858	856	
16	861	880	858	861	864	855	861	861	858	848	839	833	848	848	845	858	858	858	864	861	861	865	868	862	857	
17	865	859	859	865	868	856	868	862	859	856	853	849	849	853	856	856	849	859	849	840	856	853	853	859	856	
18	859	860	860	857	860	860	866	863	863	863	860	857	857	854	844	850	854	863	866	866	866	866	875	869	861	
19	869	863	863	866	866	867	870	864	861	861	861	861	861	861	864	864	867	870	870	870	867	864	867	864	865	
20	867	867	873	873	876	867	867	861	861	862	859	859	859	862	859	862	862	865	868	862	862	862	856	862	864	
21*	862	859	865	865	865	862	865	865	859	852	852	856	859	866	869	866	866	869	869	869	866	866	866	863	863	
22*	863	863	866	866	866	869	869	869	866	863	860	863	863	866	866	863	863	867	870	870	870	867	870	867	866	
23*	864	864	867	870	870	870	873	876	873	867	861	861	864	870	864	861	864	867	867	870	870	868	868	865	867	
24	868	868	868	871	874	880	880	887	884	877	874	874	874	877	874	871	871	871	868	865	859	862	862	862	872	
25	862	863	869	869	872	875	875	875	872	869	866	866	872	866	866	866	863	860	844	841	835	844	850	853	862	
26	853	860	860	863	863	864	867	864	864	857	854	854	857	864	867	867	867	870	870	873	867	857	848	861	862	
27**	864	861	854	864	870	876	873	873	867	855	849	858	855	852	830	808	811	827	849	862	862	865	862	855	854	
28	862	852	849	852	865	871	871	865	852	840	849	852	849	841	856	853	856	853	856	856	881	869	847	853	856	
29	853	853	856	853	863	859	863	853	850	853	850	844	841	850	850	850	853	854	854	854	854	845	845	848	852	
30	848	845	851	857	860	857	857	860	857	839	820	823	826	839	845	842	839	839	835	842	860	865	846	852	846	
31	861	855	846	846	852	855	858	849	843	843	843	833	824	824	833	833	840	852	852	849	849	865	868	843	846	
Mean	861	860	860	861	864	865	867	863	857	852	849	848	848	849	851	850	852	856	859	859	861	859	860	858	857	
Mean*	863	862	865	865	866	868	868	867	862	853	850	852	854	859	859	859	860	864	867	867	866	868	866	864	862	
Mean**	857	853	853	854	858	864	863	854	839	839	837	834	828	825	833	830	833	838	855	855	860	862	857	854	848	

TABLE III.—MEAN VERTICAL MAGNETIC FORCE for each CIVIL DAY.

(Each result is the mean of 24 hourly ordinates from the photographic registers, expressed in C.G.S. units. The values are corrected for Temperature.)

1916.

Day of Month.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.
	43,000γ+											
d												
1	283 γ	285 γ	241 γ	278 γ	263 γ	283 γ	226 γ	252 γ	289 γ	283 γ	262 γ	193 γ
2	274	278	233	285	267	277	240	247	288	290	263	185
3	287	282	239	282	250	272	233	254	295	293	269	180
4	277	286	228	293	255	267	233	255	295	288	266	177
5	283	284	239	280	272	265	238	248	287	291	263	171
6	277	282	233	279	267	264	240	247	300	303	270	168
7	290	283	233	280	269	260	246	243	294	297	269	164
8	275	270	249	276	271	261	253	240	295	298	267	166
9	270	264	236	276	256	261	259	238	292	297	278	179
10	276	254	254	277	254	261	255	242	288	298	263	168
11	278	258	240	200	248	255	250	232	284	301	262	175
12	278	254	236	264	257	265	256	244	283	296	269	194
13	278	256	249	286	266	244	255	249	283	293	270	200
14	272	260	249	268	274	234	261	251	294	310	265	192
15	263	248	269	275	275	244	253	253	276	304	268	197
16	263	258	249	272	265	243	230	250	266	292	262	343
17	260	251	265	274	267	242	247	247	269	275	253	349
18	273	248	280	287	285	228	244	247	266	262	256	348
19	261	251	280	271	278	238	252	252	275	265	255	348
20	271	250	283	272	288	234	248	242	252	264	249	351
21	269	242	292	264	308	245	253	256	246	234	246	354
22	273	238	293	278	294	253	254	249	241	241	244	358
23	261	231	276	293	298	239	260	253	238	232	239	359
24	267	228	274	281	298	261	255	257	244	246	236	356
25	269	231	256	300	289	272	253	261	232	243	241	362
26	262	230	262	284	299	263	251	257	237	255	241	364
27	260	229	252	306	303	265	256	247	235	247	233	371
28	267	287	249	284	295	277	264	268	248	246	229	370
29	264	363	269	286	285	273	271	270	251	241	234	364
30	266	..	246	307	296	284	268	275	259	139	233	379
31	260	..	267	..	306	..	274	269	..	239	..	380
Means	271	245	256	279	277	258	251	251	267	270	255	273

TABLE IIIA.—MEAN TEMPERATURE for each CIVIL DAY within the box inclosing the VERTICAL FORCE MAGNET.

1916.

Day of Month.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.
d	°	°	°	°	°	°	°	°	°	°	°	°
1	67·2	67·4	67·7	66·7	68·1	68·2	68·1	70·8	65·2	66·2	67·8	64·5
2	68·1	68·2	66·5	67·3	63·9	67·7	67·6	70·8	65·3	65·9	68·2	65·0
3	67·4	68·3	65·3	67·7	66·4	67·5	68·3	70·6	65·0	66·2	67·7	64·2
4	68·3	67·4	64·4	68·0	68·2	67·0	66·5	70·2	64·4	67·4	67·7	62·8
5	67·8	67·4	64·5	66·6	65·7	67·1	66·0	68·9	63·5	67·6	68·0	62·7
6	68·3	67·9	64·4	66·4	66·6	66·9	65·7	69·3	64·4	68·3	67·1	63·1
7	67·2	67·1	64·1	65·8	68·2	66·1	65·5	68·3	65·9	66·8	67·6	64·3
8	68·0	67·5	65·0	65·6	66·5	66·6	65·4	68·0	66·4	66·3	67·5	64·9
9	67·8	67·2	64·9	66·7	66·9	65·9	64·8	68·8	66·7	66·5	66·0	64·6
10	68·1	67·5	65·2	67·4	68·7	65·7	64·4	69·4	66·6	67·2	65·8	65·2
11	67·6	66·7	65·1	63·8	70·0	65·1	63·7	69·7	66·3	67·6	68·3	64·9
12	68·0	67·3	66·6	67·9	68·7	64·2	63·7	70·2	66·3	69·6	67·8	64·7
13	67·7	68·2	67·0	65·0	68·0	67·8	64·1	70·1	67·3	70·2	67·5	64·7
14	67·4	67·3	67·1	65·4	64·4	70·8	63·7	70·0	64·7	68·2	67·6	63·5
15	68·6	68·3	67·9	65·9	64·9	67·7	65·1	68·7	64·5	65·9	66·6	62·7
16	67·9	68·0	69·0	65·9	67·2	66·9	67·7	68·1	66·4	64·2	65·3	62·7
17	68·5	66·9	65·8	68·4	68·9	67·1	68·3	68·2	66·2	66·2	63·2	61·5
18	67·4	67·5	66·3	66·5	66·2	68·0	66·5	67·1	66·8	67·9	59·7	61·1
19	68·2	68·8	67·4	68·5	66·8	68·2	66·6	66·1	65·5	67·0	62·6	60·3
20	68·2	67·7	68·7	67·6	65·5	68·0	67·0	66·2	64·7	65·5	64·8	59·9
21	68·1	67·0	67·4	69·1	65·9	68·3	67·6	65·3	64·8	66·4	65·4	61·6
22	67·7	66·6	65·6	66·2	66·8	69·0	67·8	66·9	64·7	64·4	64·5	62·0
23	67·9	66·1	67·8	64·5	65·8	70·0	66·3	67·9	65·2	66·9	65·8	61·8
24	67·9	65·6	67·1	66·9	66·0	67·2	65·7	67·1	65·1	66·0	67·7	61·1
25	67·5	64·6	66·7	67·3	67·2	66·3	66·0	68·5	66·4	64·9	68·0	60·3
26	67 8	64·8	66·7	65·9	65·2	68·2	66·8	68·8	67·2	63·0	65·8	60·7
27	68·3	65·5	68·0	65·5	63·4	68·0	68·0	66·7	68·2	64·2	64·4	59·0
28	68·3	65·5	68·4	67·6	64·5	66·3	68·6	66·6	68·0	67·0	63·2	58·1
29	68·3	66·2	66·8	67·0	66·7	66·6	68·9	66·4	68·0	67·3	64·8	61·9
30	67·9	..	68·4	67·1	66·2	67·7	69·3	64·9	66·9	67·6	65·9	63·4
31	68·2	..	66·6	..	67·5	..	69·0	64·0	..	67·6	..	64·0
Means	67°·92	67°·05	66°·53	66°·67	66°·61	67°·34	66°·54	68°·15	65°·89	66°·65	66°·08	62°·62

TABLE IIIB.—MONTHLY and ANNUAL MEAN TEMPERATURE at each HOUR of the DAY within the box inclosing the VERTICAL FORCE MAGNET.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
	°	°	°	°	°	°	°	°	°	°	°	°	°
Midnight	68·1	67·3	66·6	66·9	66·9	67·6	66·9	68·6	66 1	66·8	66·3	62·7	66·73
1h	68·0	67·2	66·5	66·9	66·8	67·5	66·8	68·5	66·0	66·8	66·3	62·7	66·67
2	68·0	67·1	66·4	66·7	66·6	67·4	66·7	68·4	65·9	66·7	66·2	62·7	66·57
3	67·9	67·1	66·3	66·6	66·5	67·3	66·6	68·3	65·8	66·7	66·1	62·6	66·48
4	67·8	66·9	66·2	66·4	66·4	67·2	66·5	68·2	65·8	66·6	66·0	62·6	66·28
5	67·7	66·8	66·2	66·3	66·2	67·1	66·4	68·0	65·7	66·5	66·0	62·5	66·28
6	67·1	66·7	66·1	66·2	66·1	67·0	66·3	67·9	65·6	66·4	65·9	62·5	66·15
7	67·7	66·7	66·1	66·1	66·0	67·0	66·2	67·8	65·6	66·4	65·8	62·5	66·16
8	67·7	66·7	66·1	66·1	65·9	66·9	66·1	67·7	65·5	66·3	65·8	62·5	66·11
9	67·6	66·7	66·1	66·1	65·9	66·9	66·1	67·6	65·5	66·3	65·7	62·5	66·08
10	67·7	66·8	66·2	66·2	65·9	66·9	66·1	67·7	65·6	66·3	65·8	62·5	66·14
11	67·6	66·8	66·2	66·3	66·2	67·1	66·3	67·7	65·7	66·5	65·7	62·6	66·23
Noon	67·8	67·0	66·4	66·6	66·7	67·2	66·4	67·9	65·7	66·6	65·9	62·5	66·39
13h	67·8	67·0	66·5	66·7	66·9	67·3	66·4	67·9	65·8	66·7	65·9	62·6	66·46
14	67·8	67·0	66·6	66·9	67·0	67·4	66·4	68·0	65·9	66·7	66·0	62·6	66·52
15	68·0	68·1	66·9	67·1	67·0	67·5	66·6	68·1	66·0	66·7	66·1	62·7	66·73
16	68·1	67·2	66·8	67·2	67·1	67·5	66·6	68·2	66·0	66·8	66·2	62·8	66·71
17	68·1	67·2	66·9	67·3	67·1	67·6	66·7	68·2	66·0	66·8	66·2	62·8	66·74
18	68·1	67·2	66·9	67·2	67·1	67·7	66·8	68·3	66·1	66·8	66·3	62·9	66·78
19	68·1	67·3	66·9	67·2	67·1	67·7	66·9	68·4	66·1	66·8	66·3	62·8	66·80
20	68·1	67·2	66·9	67·2	67·0	67·7	67·0	68·5	66·2	66·9	66·3	62·8	66·82
21	68·1	67·2	66·8	67·1	67·0	67·8	67·1	68·6	66·2	66·9	66·3	62·7	66·82
22	68·1	67·2	66·8	66·7	67·0	67·8	67·0	68·5	66·2	66·8	66·3	62·7	66·76
23	68·1	67·2	66·7	67·1	66·9	67·7	67·0	68·5	66·2	66·8	66·3	62·7	66·77

TABLE IV.—MONTHLY and ANNUAL MEAN DIURNAL INEQUALITIES of MAGNETIC DECLINATION WEST.

(*The results in each month are diminished by the smallest hourly value.*)

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
	′	′	′	′	′	′	′	′	′	′	′	′	′
Midnight	0·6	0·5	0·3	3·6	3·8	3·4	4·2	3·2	1·2	1·0	1·5	1·3	1·08
1h	0·9	1·0	0·5	2·9	3·6	3·3	3·8	3·5	1·6	1·0	2·3	1·4	1·18
2	1·7	1·1	1·0	2·6	2·9	3·5	3·9	3·8	1·6	1·6	2·8	1·6	1·37
3	1·8	1·5	1·2	2·9	2·7	3·3	3·6	3·2	1·4	2·2	3·3	2·0	1·46
4	1·4	1·5	1·7	2·4	2·4	2·5	2·9	2·6	1·5	2·2	3·1	1·9	1·21
5	1·5	1·3	1·8	2·8	1·4	1·2	1·6	1·4	1·3	1·9	3·3	2·7	0·88
6	1·8	1·1	1·6	1·8	0·4	0·1	0·5	0·7	0·8	1·8	3·3	2·6	0·41
7	1·9	0·9	1·1	0·4	0·0	0·0	0·0	0·0	0·5	1·1	3·1	2·6	0·00
8	2·0	0·2	0·7	0·0	0·6	0·3	0·4	1·0	1·0	0·2	2·8	2·7	0·02
9	2·4	0·0	1·3	1·4	3·0	1·9	2·1	3·0	2·8	0·8	3·5	3·4	1·16
10	3·2	1·3	4·1	4·7	5·9	5·1	5·2	6·1	5·6	3·5	5·4	4·2	3·56
11	4·3	3·3	7·0	8·4	9·1	8·3	7·9	8·6	8·1	6·2	7·2	5·0	5·98
Noon	5·1	5·2	9·6	11·3	11·0	10·6	9·9	10·5	9·3	7·5	7·7	5·6	7·64
13h	5·1	6·2	10·2	12·4	11·3	11·7	10·8	10·7	8·9	7·9	7·8	5·1	8·04
14	4·3	5·7	9·3	11·2	10·2	11·7	10·8	9·8	7·3	6·8	6·8	4·4	7·22
15	3·4	4·7	8·1	9·2	8·8	10·1	9·6	7·7	5·6	5·6	5·7	4·0	5·90
16	3·4	3·7	6·0	7·4	7·6	8·7	8·0	6·0	3·7	3·4	4·4	3·4	4·51
17	2·8	2·6	3·7	5·5	6·1	7·2	6·6	4·7	2·4	3·1	4·0	2·6	3·31
18	1·9	2·7	2·6	4·1	5·1	5·9	5·7	4·2	2·2	2·1	3·2	2·4	2·54
19	1·9	1·6	2·5	3·6	4·8	5·1	4·7	4·4	2·0	0·3	2·4	1·6	1·94
20	0·9	0·9	1·2	3·5	4·5	4·7	3·9	4·1	1·4	0·3	1·7	0·3	1·31
21	0·0	0·4	0·5	3·5	4·2	4·4	3·8	3·8	0·9	0·0	1·0	0·0	0·91
22	0·0	0·4	0·0	3·2	3·8	4·2	4·1	2·9	0·5	0·0	0·0	0·3	0·65
23	0·4	0·6	0·9	3·4	3·6	3·8	4·3	3·1	0·0	0·3	0·9	0·8	0·87
Means	2′·20	2′·02	2′·79	4′·67	5′·28	5′·04	4′·93	4′·54	2′·98	2′·53	3′·63	2′·58	2′·63

TABLE V.—DIURNAL RANGE of DECLINATION, on each CIVIL DAY, as deduced from the TWENTY-FOUR HOURLY MEASURES of ORDINATES of the PHOTOGRAPHIC REGISTERS.

1916.

Day of Month.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.
	′	′	′	′	′	′	′	′	′	′	′	′
1	4·5	5·4	6·8	15·8	16·3	12·2	13·2	13·0	11·0	15·8	8·7	15·3
2	3·3	5·3	10·4	12·5	14·9	13·3	11·0	18·2	16·8	12·3	13·5	12·4
3	9·1	4·7	21·8	11·3	14·2	13·8	12·0	10·4	21·9	7·6	18·4	7·4
4	7·5	6·0	11·7	17·0	12·9	12·6	16·9	9·1	16·5	7·1	17·7	4·7
5	6·8	9·3	15·5	14·6	14·8	12·0	11·2	14·3	10·5	15·1	17·8	7·3
6	5·0	7·7	16·2	15·8	10·0	11·3	11·1	13·3	10·1	33·8	18·1	8·1
7	5·1	4·9	16·2	13·2	9·9	14·4	10·8	10·0	10·6	19·3	7·8	7·7
8	3·3	17·3	20·9	17·0	11·0	15·6	13·8	10·2	7·2	11·6	10·8	4·9
9	4·1	7·5	21·9	12·8	7·3	10·6	10·5	8·4	10·2	8·4	10·3	8·2
10	12·4	5·7	20·7	12·2	9·6	11·6	9·6	7·1	14·2	8·3	9·4	6·0
11	24·4	6·6	9·7	13·0	13·2	12·7	10·1	8·2	14·3	12·4	9·2	7·8
12	14·4	10·4	7·6	11·8	11·5	14·7	9·6	13·9	13·1	14·5	16·0	10·1
13	14·7	7·9	7·2	10·7	10·2	11·6	14·9	13·5	11·0	28·6	5·1	8·4
14	4·6	6·1	6·5	11·5	13·8	11·8	12·4	14·8	11·1	7·1	6·0	4·9
15	4·7	6·3	7·5	14·5	14·8	10·3	10·3	10·7	14·3	8·7	5·9	20·4
16	7·0	4·2	7·8	17·3	13·0	12·0	16·1	13·5	14·1	7·9	7·9	7·2
17	2·8	5·0	18·4	13·2	12·6	12·2	14·3	11·8	15·2	9·9	9·3	6·3
18	5·3	14·7	13·2	15·3	12·3	13·1	12·2	13·7	10·8	10·2	13·7	6·6
19	3·0	9·5	15·9	13·3	9·9	14·4	15·0	15·0	8·9	8·9	6·4	5·5
20	12·4	6·8	19·5	12·2	9·8	14·3	11·0	9·2	9·9	9·3	5·1	6·0
21	8·4	8·9	16·0	13·8	16·4	10·7	9·9	11·0	9·4	14·7	6·0	5·0
22	12·7	8·7	9·4	9·9	19·2	20·5	12·6	15·6	9·2	13·6	9·7	2·1
23	15·8	11·1	13·3	7·5	14·2	18·6	13·0	14·5	10·6	10·7	10·9	2·6
24	4·1	14·6	22·5	10·0	12·6	13·7	9·0	14·1	7·6	13·0	8·6	4·0
25	9·6	6·3	20·4	22·5	13·4	13·3	12·9	10·3	9·8	7·5	17·0	5·5
26	6·6	9·4	11·2	16·8	15·7	16·5	11·8	13·7	16·6	9·1	9·8	6·4
27	5·9	13·3	10·0	16·8	15·2	13·2	12·9	14·2	16·0	7·4	7·5	9·7
28	5·5	6·0	10·7	19·9	13·5	10·9	13·5	11·2	7·2	8·8	13·2	9·0
29	8·0	7·5	23·4	16·1	14·1	10·5	13·1	11·3	10·0	12·8	9·7	7·8
30	4·3		25·9	18·5	12·7	11·6	12·4	9·1	27·6	6·7	15·8	13·9
31	5·5		16·7		12·5		12·6	12·4		7·1		16·3
Means	7′·8	8′·2	14′·7	14′·2	13′·0	13′·1	12′·2	12′·1	12′·5	11′·9	10′·9	8′·0

The mean of the twelve monthly values is 11′·55.

TABLE VI.—MONTHLY and ANNUAL MEAN DIURNAL INEQUALITIES of MAGNETIC DECLINATION WEST from HOURLY ORDINATES, on FIVE SELECTED QUIET DAYS, in each MONTH.

Each result is the mean of the corresponding hourly ordinates from the photographic registers, on five quiet days in each month, selected by the International Committee for comparison with results at other Observatories. The results in each case are diminished by the smallest hourly value. The days included are :—

January 2, 8, 15, 17, 19.	April 4, 5, 10, 13, 24.	July 7, 15, 27, 28, 29.	October 4, 16, 17, 18, 28.
February 1, 6, 16, 21, 25.	May 13, 14, 15, 18, 27.	August 1, 15, 16, 17, 25.	November 1, 14, 20, 21, 24.
March 1, 13, 15, 23, 27.	June 2, 3, 10, 15, 16.	September 1, 19, 20, 21, 29.	December 6, 10, 21, 22, 23.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
	′	′	′	′	′	′	′	′	′	′	′	′	′
Midnight	0·3	0·9	2·2	5·0	4·4	4·6	4·5	4·1	2·7	3·5	0·1	0·4	2·20
1h	0·6	1·0	2·3	5·0	4·7	4·5	4·5	3·8	2·3	3·8	0·0	1·1	2·27
2	0·9	1·5	2·5	4·6	3·7	4·3	4·7	3·6	2·5	3·7	0·7	0·9	2·27
3	0·6	1·7	2·6	4·4	3·3	4·0	3·9	3·2	2·0	3·5	1·3	1·3	2·12
4	0·5	1·4	2·7	4·2	2·4	2·9	2·7	2·4	1·8	3·4	1·4	1·5	1·74
5	0·4	1·0	2·3	3·9	1·4	1·7	1·0	1·1	1·2	3·0	1·8	1·5	1·16
6	0·4	1·1	1·8	2·8	0·0	0·5	0·4	0·0	0·5	2·7	1·7	1·6	0·60
7	0·2	0·7	0·5	0·9	0·1	0·0	0·0	0·1	0·0	1·2	1·5	1·2	0·00
8	0·2	0·1	0·0	0·0	1·3	0·2	1·5	0·9	0·4	0·0	1·1	1·1	0·04
9	0·4	0·0	0·5	1·3	3·0	1·5	3·8	3·2	2·3	0·6	1·4	1·6	1·10
10	0·9	0·6	2·2	5·1	6·7	4·8	6·7	7·3	5·0	3·0	3·0	3·0	3·50
11	2·3	2·0	4·9	8·7	10·8	8·4	9·4	9·5	7·5	6·3	4·2	3·9	5·96
Noon	3·2	4·0	7·8	11·4	12·4	10·6	11·4	11·0	9·5	7·9	5·0	4·3	7·68
13h	3·0	5·1	8·6	12·9	12·5	11·9	11·9	11·1	8·9	8·6	5·2	3·6	8·08
14	1·9	5·1	8·1	12·2	10·7	11·5	11·2	10·2	7·5	7·7	4·4	2·9	7·25
15	1·5	4·1	6·5	10·3	8·6	9·6	9·0	8·2	5·6	6·3	4·0	2·4	5·81
16	1·5	3·1	5·0	8·7	7·2	7·9	7·0	6·4	4·5	4·8	3·5	2·2	4·62
17	1·5	2·5	4·3	7·3	5·8	6·4	5·7	5·2	4·0	4·6	3·1	1·9	3·83
18	1·2	2·1	4·0	6·8	5·0	5·4	4·8	4·7	3·7	4·2	2·7	1·6	3·32
19	0·8	1·7	3·9	6·8	4·8	4·9	4·5	4·7	3·4	3·3	1·6	1·4	2·95
20	0·2	1·5	3·6	6·2	4·6	4·6	4·6	4·7	3·3	3·0	1·3	0·9	2·68
21	0·0	0·7	3·0	5·9	4·3	4·7	4·8	3·9	3·2	3·0	1·0	0·0	2·34
22	0·2	0·5	1·6	5·7	4·2	4·8	5·1	3·6	3·2	2·6	0·1	0·6	2·15
23	0·4	1·0	1·9	5·4	4·3	4·6	5·0	3·3	2·6	2·7	0·6	1·2	2·22
Means	0′·96	0′·81	3′·45	6′·06	5′·26	5′·18	5′·34	4′·84	3′·65	3′·89	2′·11	1′·75	3′·16

TABLE VII.—MONTHLY and ANNUAL DIURNAL INEQUALITIES of MAGNETIC DECLINATION WEST from HOURLY ORDINATES, on FIVE SELECTED DISTURBED DAYS in each MONTH.

Each result is the mean of the corresponding hourly ordinates from the photographic registers, on five disturbed days in each month, selected by the International Committee for comparison with results at other Observatories. The results in each case are diminished by the smallest hourly value. The days included are :—

January 10, 11, 12, 20, 23.	April 25, 26, 27, 28, 29.	July 1, 8, 9, 17, 23.	October 1, 6, 7, 8, 13.
February 8, 12, 17, 18, 27.	May 21, 22, 23, 30, 31.	August 6, 22, 23, 26, 27.	November 4, 5, 6, 12, 27.
March 8, 9, 10, 29, 30.	June 8, 18, 19, 22, 23.	September 3, 4, 12, 27, 30.	December 1, 2, 3, 15, 27.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
	′	′	′	′	′	′	′	′	′	′	′	′	′
Midnight	3·2	2·4	0·0	3·1	2·9	4·0	2·8	0·2	0·7	2·5	0·7	5·4	0·77
1h	3·8	1·6	0·9	0·0	0·0	2·1	2·2	2·0	3·4	1·6	2·5	5·0	0·53
2	4·6	1·7	2·5	1·1	0·7	3·7	1·7	2·7	4·4	4·2	3·7	4·3	1·38
3	5·9	2·8	4·4	2·3	2·2	4·6	2·2	0·9	4·5	7·9	3·1	6·2	2·36
4	5·6	3·3	5·0	0·3	2·4	3·6	3·8	2·6	5·4	6·8	4·3	5·9	2·53
5	5·9	2·8	4·7	4·3	2·1	1·6	5·3	1·8	5·2	5·7	4·8	7·2	2·73
6	7·2	3·1	4·8	3·2	1·8	0·4	1·8	1·1	5·2	6·1	5·2	6·9	2·34
7	8·3	2·9	2·8	2·9	1·1	0·0	1·0	0·5	5·8	7·4	4·9	6·9	2·15
8	8·2	2·5	3·4	2·1	0·8	1·0	0·0	1·8	5·7	8·6	4·1	7·2	2·23
9	8·4	2·3	6·1	4·2	2·9	2·3	1·0	3·5	7·2	9·0	5·2	8·3	3·48
10	8·4	3·9	10·0	7·2	4·5	5·3	3·9	5·3	9·6	10·7	7·4	8·3	5·48
11	9·0	6·0	11·6	10·4	7·3	8·9	6·5	7·5	11·8	13·2	9·4	9·1	7·67
Noon	9·7	7·9	14·1	12·6	10·3	11·9	8·9	9·7	13·6	14·7	9·3	10·3	9·53
13h	9·5	9·8	14·4	14·1	11·2	13·3	9·6	9·9	12·6	14·9	9·5	9·7	9·98
14	9·6	8·1	13·4	12·5	10·7	13·9	10·7	9·2	10·5	13·9	9·0	7·7	9·21
15	9·3	7·0	12·9	10·7	9·8	11·6	9·1	7·4	8·4	13·2	6·2	6·8	7·81
16	9·0	5·9	8·1	9·3	9·6	11·2	8·1	6·1	5·3	9·8	2·4	5·4	5·96
17	8·2	5·6	1·1	6·8	7·6	9·8	7·9	3·3	3·2	9·1	4·4	4·1	4·37
18	5·4	4·3	3·3	4·7	5·9	7·5	6·2	3·6	4·8	5·8	2·7	5·0	3·38
19	5·6	0·9	4·1	2·1	3·7	5·9	4·4	3·5	3·1	0·0	2·3	3·5	1·70
20	3·7	0·0	2·0	0·6	4·2	5·1	2·0	2·6	1·1	0·5	2·4	0·0	0·46
21	0·0	1·0	1·3	1·7	3·6	3·9	2·2	1·7	0·2	1·3	0·0	2·6	0·07
22	0·4	2·9	1·9	1·9	3·2	2·3	1·6	0·0	0·0	0·8	0·9	2·8	0·00
23	2·4	2·9	3·1	2·1	2·6	3·1	3·8	0·8	0·8	4·0	2·3	2·9	1·01
Means	6·3	3·8	5·7	5·0	4·6	5·7	4·4	3·7	5·5	7·2	4·4	5·9	3·63

TABLE VIII.—MONTHLY and ANNUAL MEAN DIURNAL INEQUALITIES of MAGNETIC NORTH FORCE.

(The results are expressed in C.G.S. units and in each case diminished by the smallest hourly value.)

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
Midnight	16 γ	21 γ	34 γ	47 γ	39 γ	40 γ	37 γ	38 γ	37 γ	38 γ	26 γ	13 γ	31·7 γ
1h	16	19	30	47	38	38	35	35	37	36	25	12 .	30·2
2	13	17	29	43	38	38	35	32	33	34	23	12	28·4
3	14	18	31	44	36	38	34	35	33	34	23	13	28·9
4	17	20	30	43	36	41	34	35	33	36	26	16	30·1
5	24	23	32	44	33	40	35	33	34	40	28	17	31·4
6	24	26	31	43	28	35	30	31	29	39	29	19	29·9
7	18	27	26	39	23	26	20	22	20	32	26	15	24·0
8	17	23	23	26	13	17	12	12	9	23	19	9	16·4
9	4	16	16	14	6	11	5	1	2	13	12	4	8·2
10	2	8	7	5	1	4	0	0	0	4	6	1	2·7
11	0	1	0	0	0	0	1	3	1	0	0	0	0·0
Noon	2	0	0	2	2	4	3	9	6	1	3	0	2·2
13h	5	2	5	10	5	10	9	13	11	8	6	1	6·6
14	6	6	13	21	16	22	16	17	16	13	8	3	12·6
15	8	10	17	29	27	32	21	26	21	19	10	2	18·0
16	13	11	19	39	31	39	30	33	26	22	17	4	23·2
17	13	14	25	48	43	44	39	40	30	28	21	8	28·9
18	11	16	30	50	47	48	46	44	35	33	26	11	32·6
19	13	16	29	50	48	48	45	45	38	39	28	11	33·7
20	17	20	31	48	50	47	44	47	41	40	27	13	34·9
21	17	20	34	48	45	46	40	43	44	41	29	11	34·3
22	13	21	34	48	44	44	38	42	44	41	30	12	33·8
23	15	22	31	48	40	42	35	40	40	39	30	10	32·2
Means.	12·4	15·7	23·2	34·8	28·7	31·4	26·8	28·2	25·8	27·2	19·9	9·0	23·1

TABLE IX.—DIURNAL RANGE of MAGNETIC NORTH FORCE, on each CIVIL DAY, as deduced from the TWENTY-FOUR HOURLY MEASURES of ORDINATES of the PHOTOGRAPHIC REGISTERS.

(The results are corrected for Temperature and are expressed in C.G.S. units.)

1916.

Day of Month.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.
1	21 γ	33 γ	34 γ	70 γ	.. γ	61 γ	111 γ	53 γ	56 γ	81 γ	31 γ	46 γ
2	15	27	46	..	..	46	43	113	84	66	41	72
3	24	24	55	..	..	48	77	52	81	66	81	91
4	39	30	61	61	..	45	73	52	78	40	93	38
5	..	33	55	55	70	49	58	59	74	59	100	28
6	..	24	31	64	80	55	65	83	37	115	41	38
7	15	21	39	70	58	58	65	68	43	96	56	22
8	24	57	109	76	58	65	86	52	62	77	40	47
9	42	27	133	52	46	56	61	46	28	56	59	32
10	48	39	73	49	55	42	59	31	92	53	46	32
11	111	33	52	52	67	55	59	46	68	78	66	29
12	42	42	30	40	46	55	65	40	55	71	88	38
13	60	54	33	40	46	68	59	64	56	78	19	25
14	24	30	15	61	40	49	43	46	50	56	31	18
15	33	27	37	76	58	59	52	43	74	53	50	82
16	24	24	22	67	85	48	53	43	74	38	41	47
17	18	36	118	85	55	46	76	49	80	41	18	28
18	18	48	51	61	40	55	83	49	65	47	53	31
19	12	45	49	58	52	89	55	80	34	37	28	9
20	75	30	82	70	46	..	61	55	37	49	31	21
21	27	18	51	61	64	..	40	40	31	75	18	16
22	51	39	51	70	91	83	58	77	28	66	40	9
23	63	33	67	58	95	64	92	68	46	49	34	15
24	30	45	36	52	86	58	52	71	43	47	13	28
25	45	18	51	85	74	89	46	40	34	56	62	40
26	33	36	63	57	48	88	37	71	43	31	31	25
27	30	36	51	73	55	46	43	102	77	37	31	69
28	30	36	54	108	61	55	37	40	43	40	43	40
29	33	36	100	155	67	83	46	80	43	46	53	22
30	18		91	78	52	89	43	61	127	38	56	40
31	39		84		86		47	49		28		44
Means.	36·0	33·8	58·8	65·5	62·2	60·9	59·5	58·8	58·1	57·1	46·5	36·2

The mean of the twelve monthly values is 52·8 γ.

TABLE X.—MONTHLY and ANNUAL MEAN DIURNAL INEQUALITIES of MAGNETIC NORTH FORCE from HOURLY ORDINATES, on FIVE SELECTED QUIET DAYS, in each MONTH.

Each result is the mean of the corresponding hourly ordinates from the photographic registers, on five quiet days in each month, selected by the International Committee for comparison with results at other Observatories. The results in each case are diminished by the smallest hourly value. The days included are :—

January 2, 8, 15, 17, 19.	April 4, 5, 10, 13, 24.	July 7, 15, 27, 28, 29.	October 4, 16, 17, 18, 28.
February 1, 6, 16, 21, 25.	May 13, 14, 15, 18, 27.	August 1, 15, 16, 17, 25.	November 1, 14, 20, 21, 24.
March 1, 13, 15, 23, 27.	June 2, 3, 10, 15, 16.	September 1, 19, 20, 21, 29.	December 6, 10, 21, 22, 23.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
Midnight	13 γ	13 γ	30 γ	43 γ	32 γ	36 γ	31 γ	34 γ	32 γ	30 γ	18 γ	13 γ	27·0 γ
1h	13	14	30	40	30	35	30	35	31	32	17	12	26·5
2	14	12	29	38	30	34	31	35	28	32	17	15	26·2
3	16	15	30	39	28	34	32	35	29	32	14	14	26·4
4	16	15	33	39	28	36	35	36	31	34	16	16	27·8
5	19	19	35	40	27	36	35	36	33	36	17	18	29·1
6	20	23	37	40	30	33	29	33	31	37	20	18	29·2
7	19	21	35	38	21	27	15	24	24	33	18	17	24·2
8	12	20	27	28	11	18	6	14	13	23	15	12	16·5
9	6	13	16	16	6	11	0	5	4	15	9	3	8·6
10	3	6	8	5	3	2	0	0	0	4	3	0	2·7
11	0	0	2	0	0	0	1	2	1	0	0	2	0·0
Noon	3	1	0	2	1	2	5	9	4	0	5	4	2·9
13h	7	5	5	8	9	11	13	17	13	5	5	9	8·8
14	10	8	14	23	16	16	19	22	19	15	8	9	14·8
15	12	10	20	27	23	26	24	28	21	19	11	9	19·1
16	11	13	28	32	31	34	31	34	26	21	14	10	23·6
17	13	17	30	40	40	37	36	40	30	30	12	14	28·2
18	13	20	31	41	43	41	38	43	34	34	13	17	30·6
19	13	22	34	43	42	44	41	45	37	36	18	17	32·6
20	16	21	38	47	43	43	38	45	37	38	15	16	33·0
21	16	21	38	49	39	43	35	45	36	37	19	18	32·9
22	15	19	42	45	38	40	33	44	39	39	20	16	32·4
23	15	19	38	45	33	39	33	42	35	37	21	14	30·8
Means	12·3	14·5	26·3	32·0	25·2	28·2	24·6	29·3	24·5	25·8	13·5	12·2	22·2

TABLE XI.—MONTHLY and ANNUAL MEAN DIURNAL INEQUALITIES of MAGNETIC NORTH FORCE from HOURLY ORDINATES, on FIVE SELECTED DISTURBED DAYS in each MONTH.

Each result is the mean of the corresponding hourly ordinates from the photographic registers, on five disturbed days in each month, selected by the International Committee for comparison with results at other Observatories. The results in each case are diminished by the smallest hourly value. The days included are :—

January 10, 11, 12, 20, 23.	April 25, 26, 27, 28, 29.	July 1, 8, 9, 17, 23.	October 1, 6, 7, 8, 13.
February 8, 12, 17, 18, 27.	May 21, 22, 23, 30, 31.	August 6, 22, 23, 26, 27.	November 4, 5, 6, 12, 27.
March 8, 9, 10, 29, 30.	June 8, 18, 19, 22, 23.	September 3, 4, 12, 27, 30.	December 1, 2, 3, 15, 27.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
Midnight	25 γ	30 γ	47 γ	61 γ	57 γ	38 γ	55 γ	46 γ	52 γ	65 γ	45 γ	32 γ	41·9 γ
1h	22	22	39	61	59	36	48	33	49	57	43	28	37·2
2	14	21	31	45	51	36	48	26	37	49	41	28	31·4
3	22	23	44	45	49	33	46	32	37	47	42	29	33·2
4	26	25	39	35	41	40	43	30	41	57	44	33	33·6
5	29	29	43	38	30	43	46	25	39	64	42	39	34·7
6	25	31	40	32	39	36	43	33	32	57	43	38	33·2
7	19	33	25	20	24	25	29	25	23	35	36	29	22·7
8	16	28	24	12	17	14	24	14	4	31	26	14	14·5
9	14	17	16	7	0	9	13	4	0	19	18	14	6·7
10	0	10	6	0	6	3	0	0	2	8	10	12	0·5
11	11	6	0	0	5	2	5	7	5	0	0	9	0·0
Noon	11	4	7	2	11	0	5	14	4	3	7	3	1·7
13h	7	0	3	17	4	2	11	18	4	8	18	0	3·5
14	4	7	9	27	19	25	21	20	18	19	20	8	12·2
15	11	11	4	38	38	47	15	31	26	32	23	5	19·2
16	16	8	5	42	42	45	33	36	31	27	37	8	23·3
17	17	3	29	54	50	54	41	42	42	35	42	13	31·0
18	10	7	32	62	58	59	56	49	39	45	55	30	37·6
19	4	4	26	65	61	51	51	56	47	60	53	30	38·3
20	22	18	23	61	49	44	50	64	51	61	40	35	39·0
21	26	17	30	55	51	44	38	48	56	53	46	37	37·6
22	2	20	33	54	52	45	40	37	52	53	41	32	34·2
23	12	25	34	50	40	35	35	37	38	46	46	29	31·4
Means	15·2	16·6	24·5	36·8	35·5	31·9	33·2	30·3	30·4	38·8	34·1	22·3	24·9

[To be substituted for page E 20 in "Magnetic Results for the Year 1916."]

TABLE XII—MONTHLY AND ANNUAL MEAN DIURNAL INEQUALITIES OF VERTICAL MAGNETIC FORCE.
(*The results are expressed in C.G.S units and in each case are diminished by the smallest hourly value.*)

1916.

Hour Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
Midnight	2γ	9γ	12γ	12γ	16γ	13γ	9γ	5γ	5γ	2γ	4γ	3γ	6·0γ
1h	1	7	8	9	12	13	6	3	4	0	0	3	3·8
2	0	6	6	9	11	15	6	0	4	0	0	2	3·2
3	0	6	6	9	14	16	8	1	6	0	0	1	3·9
4	1	8	8	12	15	17	9	2	6	2	1	1	5·1
5	2	8	7	14	15	17	9	4	6	4	1	1	5·6
6	3	6	7	16	14	17	8	8	7	4	1	0	5·9
7	2	6	11	17	13	18	10	11	11	6	1	0	7·1
8	3	6	11	15	12	16	9	11	9	9	4	2	7·2
9	6	6	8	12	9	12	6	7	6	8	4	3	5·6
10	5	2	4	4	3	5	2	3	0	5	3	4	1·6
11	4	0	0	0	0	0	0	2	0	4	6	5	0·0
Noon	5	1	4	1	1	2	0	2	1	7	9	9	1·8
13h	7	5	9	7	6	7	4	8	6	10	12	10	5·9
14	9	8	16	14	13	13	11	15	11	16	15	12	11·1
15	8	12	22	19	21	20	16	20	15	23	16	13	15·4
16	8	14	29	24	27	25	20	24	18	24	17	14	18·7
17	7	15	32	28	29	25	22	24	17	22	16	16	19·4
18	7	14	31	30	30	25	23	22	16	19	15	11	18·5
19	6	13	27	28	27	25	22	19	14	16	14	12	16·9
20	6	13	24	26	25	23	21	17	13	12	11	11	15·2
21	6	13	21	25	22	21	16	14	11	10	11	11	13·4
22	4	12	18	22	21	18	14	11	7	6	8	10	10·9
23	4	10	15	19	19	15	13	9	4	1	6	9	8·6
Means	4·4	8·3	14·0	15·5	15·6	15·8	11·0	10·1	8·2	8·8	7·3	6·8	8·8

TABLE XIII.—DIURNAL RANGE of VERTICAL MAGNETIC FORCE, on each CIVIL DAY, as deduced from the TWENTY-FOUR HOURLY MEASURES of ORDINATES of the PHOTOGRAPHIC REGISTERS.
(*The results are corrected for Temperature and expressed in C.G.S. units.*)

1916.

Day of Month.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.
1	11γ	12γ	20γ	52γ	24γ	34γ	83γ	—γ	28γ	92γ	17γ	63γ
2	13	12	22	26	25	29	22	—	—	33	16	38
3	15	12	29	27	41	—	31	25	37	28	42	36
4	17	16	37	31	24	26	26	16	37	12	43	28
5	20	28	29	33	45	44	44	38	61	20	36	14
6	11	12	38	31	38	41	41	51	—	120	61	12
7	13	15	60	29	36	28	23	46	22	118	29	25
8	10	35	105	32	35	47	54	41	15	79	29	29
9	12	24	199	25	29	26	58	26	20	36	25	—
10	25	19	60	21	23	20	—	23	27	31	28	20
11	35	(30)	17	50	37	28	41	29	48	43	23	18
12	33	25	34	25	26	28	40	32	63	53	47	22
13	21	24	16	13	32	38	18	31	42	76	12	16
14	22	13	25	36	31	22	32	28	18	15	12	20
15	13	15	22	51	23	21	33	27	47	20	19	32
16	15	12	22	53	45	18	(40)	23	28	—	17	20
17	7	33	73	27	31	23	20	22	55	—	—	20
18	13	25	39	51	32	33	34	28	27	—	—	13
19	7	29	41	26	34	38	27	41	18	20	23	23
20	29	23	42	22	33	38	25	32	12	11	24	21
21	18	21	36	28	85	31	25	21	19	21	17	16
22	29	26	27	25	74	47	26	—	16	19	12	17
23	—	16	35	30	46	52	30	—	17	43	34	13
24	—	18	78	23	50	38	27	39	17	23	17	11
25	32	23	53	111	39	37	24	—	22	28	18	—
26	10	28	38	88	30	32	26	—	25	18	29	—
27	8	33	14	69	30	31	27	223	53	22	32	37
28	11	29	16	89	28	32	—	22	32	12	39	21
29	34	22	86	127	26	37	—	43	19	21	22	18
30	9		72	43	45	33	28	21	66	22	48	25
31	18		41		105		28	22		21		18
Means	17·6	21·8	46·0	43·1	38·8	32·8	33·3	38·0	31·8	37·7	27·5	23·1

The mean of the twelve monthly value is 32·6γ.

TABLE XIV.—MONTHLY and ANNUAL DIURNAL INEQUALITIES OF VERTICAL MAGNETIC FORCE from HOURLY ORDINATES, on FIVE SELECTED QUIET DAYS, in each MONTH.

Each result is the mean of the corresponding hourly ordinates from the photographic registers, on five quiet days in each month, selected by the International Committee for comparison with results at other Observatories. The results in each case are diminished by the smallest hourly value. The days included are :—

January 2, 8, 15, 17, 19.	April 4, 5, 10, 13, 24.	July 7, 15, 27, 28, 29.	October 4, 16, 17, 18, 28.
February 1, 6, 16, 21, 25.	May 13, 14, 15, 18, 27.	August 1, 15, 16, 17, 25.	November 1, 14, 20, 21, 24.
March 1, 13, 15, 23, 27.	June 2, 3, 10, 15, 16.	September 1, 19, 20, 21, 29.	December 6, 10, 21, 22, 23.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
Midnight	4 γ	19 γ	16 γ	45 γ	41 γ	27 γ	21 γ	22 γ	21 γ	5 γ	13 γ	10 γ	18·0 γ
1h	2	16	13	44	37	26	20	23	18	5	9	10	16·3
2	0	12	12	40	34	24	20	20	17	5	7	6	14·1
3	0	9	12	38	34	24	18	21	18	4	4	0	12·9
4	0	8	11	37	32	22	18	19	16	5	3	5	12·4
5	1	7	11	38	31	18	15	17	12	5	2	5	11·2
6	3	4	9	36	27	15	13	13	12	5	0	2	9·3
7	3	3	12	38	21	16	12	16	13	5	2	2	9·6
8	2	3	13	35	17	16	8	13	11	6	4	6	8·9
9	5	3	8	30	15	11	2	5	6	5	6	9	6·4
10	5	2	5	4	6	1	0	0	1	0	5	13	1·2
11	3	0	0	0	0	0	1	0	0	0	8	15	0·0
Noon	7	4	3	19	7	4	5	6	1	4	11	17	5·0
13h	9	4	7	24	14	5	13	12	4	8	14	16	8·5
14	10	4	11	28	22	11	19	18	10	13	16	16	12·5
15	8	5	20	36	27	29	26	23	14	16	17	18	17·6
16	10	8	24	43	32	24	32	27	17	19	20	20	20·7
17	11	10	29	46	33	22	34	29	16	18	22	20	21·9
18	11	10	30	39	33	21	34	28	16	17	23	18	21·0
19	11	9	29	44	34	21	35	27	16	16	25	18	21·4
20	13	10	27	41	32	22	36	28	18	15	24	15	21·1
21	15	9	27	41	30	22	38	25	17	15	24	16	21·0
22	17	9	26	41	29	22	38	22	17	13	24	11	20·1
23	17	9	26	41	26	21	36	20	13	12	21	14	19·0
Means	7·0	7·4	15·9	34·5	25·6	17·7	20·6	18·1	12·7	9·0	12·7	11·8	13·8

TABLE XV.—MONTHLY and ANNUAL MEAN DIURNAL INEQUALITIES OF VERTICAL MAGNETIC FORCE from HOURLY ORDINATES, on FIVE SELECTED DISTURBED DAYS, in each MONTH.

Each result is the mean of the corresponding hourly ordinates from the photographic registers, on five disturbed days in each month, selected by the International Committee for comparison with results at other Observatories. The results in each case are diminished by the smallest hourly value. The days included are :—

January 10, 11, 12, 20, 23.	April 25, 26, 27, 28, 29.	July 1, 8, 9, 17, 23.	October 1, 6, 7, 8, 13.
February 8, 12, 17, 18, 27.	May 21, 22, 23, 30, 31.	August 6, 22, 23, 26, 27.	November 4, 5, 6, 12, 27.
March 8, 9, 10, 29, 30.	June 8, 18, 19, 22, 23.	September 3, 4, 12, 27, 30.	December 1, 2, 3, 15, 27.

1916.

Hour, Greenwich Civil Time.	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	For the Year.
Midnight	7 γ	16 γ	21 γ	12 γ	14 γ	15 γ	12 γ	27 γ	4 γ	4 γ	4 γ	6 γ	7·1 γ
1h	5	14	11	2	5	14	0	14	0	0	0	6	1·2
2	5	12	9	0	0	15	3	10	3	1	0	6	0·6
3	1	12	7	1	4	12	7	0	5	2	3	2	0·0
4	0	12	4	6	1	11	9	3	5	9	3	3	0·8
5	1	13	0	9	2	14	6	14	4	17	4	1	2·4
6	1	10	1	12	6	17	2	32	6	18	4	0	4·4
7	2	9	9	17	9	19	4	43	9	21	4	2	7·6
8	2	9	12	19	5	17	4	49	9	27	6	4	8·9
9	6	7	11	20	3	10	4	48	7	32	5	4	8·4
10	8	0	7	10	4	3	2	44	3	33	5	5	5·6
11	8	0	9	10	3	0	4	46	3	34	11	5	6·4
Noon	11	5	16	19	9	6	6	47	9	41	18	8	11·5
13h	15	12	34	34	16	15	8	57	20	49	20	14	19·8
14	20	17	51	46	28	24	16	63	24	62	26	21	28·5
15	19	23	67	57	40	33	24	70	30	81	26	27	36·7
16	18	29	80	63	51	36	27	73	35	80	29	31	41·3
17	18	33	86	73	57	40	29	76	35	71	25	30	43·1
18	22	35	77	64	63	41	33	75	32	62	22	24	41·1
19	26	35	60	60	52	42	34	68	28	54	22	20	37·1
20	24	34	55	53	42	39	30	63	23	43	21	16	32·2
21	24	31	54	44	37	33	22	55	16	35	17	11	26·9
22	16	29	41	40	34	26	20	42	5	22	13	7	19·9
23	17	27	31	30	26	20	20	38	3	21	6	6	15·7
Means	11·5	17·7	31·4	29·2	21·8	20·9	13·6	44·0	13·3	34·1	12·2	10·8	17·0

TABLE XVI.—VALUE of the COEFFICIENTS and PHASE ANGLES in the PERIODICAL EXPRESSION.

$$V^t = m + a_1 \cos t + b_1 \sin t + a_2 \cos 2t + b_2 \sin 2t + a_3 \cos 3t + b_3 \sin 3t + a_4 \cos 4t + b_4 \sin 4t$$
$$= m + c_1 \sin (t + \alpha_1) + c_2 \sin (2t + \alpha_2) + c_3 \sin (3t + \alpha_3) + c_4 \sin (4t + \alpha_4),$$

in which t represents the time from the middle of the hour commencing at Greenwich mean midnight converted into arc at the rate of 15° to each hour, and V^t the annual or monthly mean hourly value of the magnetic element at time t, as given in Tables II., VI., and X.

The coefficients a, b, c are given in units of 1 γ (0·00001 C.G.S. unit) for N.F. and V.F., and in minutes of arc ($1' = 5{\cdot}39\,\gamma$) for declination.

If the inequalities are expressed relative to time reckoned from apparent midnight, the new phase angles α'_1, α'_2, α'_3, α'_4 may be obtained from α_1, α_2, α_3, α_4 by adding respectively α, 2α, 3α, 4α, the value of α for each month being as follows :—

Jan. + 2°·19′.	Apr. + 0° ·4′.	July + 1°·21′.	Oct. − 3°·28′.
Feb. + 3°·29′.	May − 0°·52′.	Aug. + 0°·59′.	Nov. − 3°·47′.
Mar. + 2°·12′.	June + 0° ·4′.	Sept. − 1°·11′.	Dec. − 1° ·6′.

Month, 1916.	a_1	b_1	a_2	b_2	a_3	b_3	a_4	b_4	c_1	α_1	c_2	α_2	c_3	α_3	c_4	α_4
	DECLINATION WEST.															
January	−1′·84	−0′·11	+0′·42	+0′·65	−0′·28	+0′·16	+0′·23	+0′·12	1′·84	266°·5	0′·77	32°·8	0′·32	299°·7	0′·26	61°·9
February	−1·67	−0·92	+0·59	+1·34	−0·53	−0·42	+0·35	+0·21	1·91	241·0	1·46	12·8	0·68	231·9	0·41	58·4
March	−3·56	−1·31	+1·36	+1·69	−0·91	−0·64	+0·40	+0·09	3·79	249·9	2·17	38·9	1·11	234·6	0·41	76·9
April	−2·84	−2·17	+2·17	+1·81	−1·15	−0·81	+0·50	−0·09	3·57	232·6	2·83	50·2	1·41	234·8	0·51	99·8
May	−2·68	−2·51	+2·20	+1·16	−0·99	−0·04	+0·22	−0·14	3·67	226·9	2·49	62·2	0·99	267·6	0·26	123·6
June	−2·64	−3·08	+1·99	+1·72	−0·90	−0·25	+0·02	−0·05	4·06	220·6	2·63	49·3	0·93	254·6	0·05	157·7
July	−2·23	−2·60	+2·03	+1·72	−0·70	−0·13	+0·12	−0·17	3·43	220·6	2·66	49·7	0·71	259·2	0·21	143·9
August	−2·50	−1·85	+2·22	+1·10	−1·18	+0·10	+0·08	+0·14	3·11	233·6	2·48	63·6	1·18	274·8	0·16	29·9
September	−3·12	−0·66	+1·83	+0·83	−1·10	+0·13	+0·33	+0·09	3·19	258·1	2·01	65·6	1·11	276·8	0·34	75·1
October	−2·54	−0·40	+1·27	+1·56	−0·84	−0·31	+0·48	−0·10	2·57	261·1	2·01	39·9	0·90	250·0	0·49	102·0
November	−2·56	+0·08	+0·74	+1·05	−0·64	+0·16	+0·35	+0·10	2·56	271·7	1·28	35·1	0·66	284·2	0·36	73·9
December	−1·98	+0·31	+0·45	+0·57	−0·13	+0·12	+0·33	−0·09	2·00	278·9	0·73	38·6	0·18	313·9	0·34	104·6
For the Year	−2·51	−1·27	+1·44	+1·27	−0·78	−0·16	+0·29	+0·01	2·81	233·2	1·92	48·6	0·80	258·4	0·29	88·4
	NORTH FORCE.															
January	+ 6·0	+ 1·3	− 4·4	0·0	+ 0·6	− 2·4	+ 0·6	+ 0·6	6·1	77·8	4·4	269·6	2·5	166·8	0·8	45·4
February	+ 7·7	+ 3·3	− 5·4	− 2·3	+ 2·6	− 2·3	− 0·2	+ 0·9	8·4	66·5	5·9	246·4	3·5	130·7	0·9	280·9
March	+13·6	− 0·1	− 6·4	− 0·2	+ 1·9	− 1·9	− 0·5	+ 0·7	13·6	90·2	6·4	268·1	2·7	135·2	0·9	304·6
April	+17·7	− 2·4	−10·6	+ 2·3	+ 3·0	− 2·1	+ 0·7	+ 0·7	17·9	97·6	10·8	282·4	3·7	125·6	1·0	42·6
May	+18·2	− 9·2	− 8·7	+ 2·5	+ 0·9	− 0·5	+ 0·5	0·0	20·4	116·7	9·1	286·0	1·0	116·8	0·5	90·0
June	+17·0	− 8·5	− 9·9	+ 3·5	+ 0·8	− 1·1	+ 0·1	− 1·1	19·0	116·5	10·5	289·7	1·4	142·9	1·1	172·6
July	+16·7	− 7·9	− 8·5	+ 3·1	− 1·0	− 0·1	+ 1·7	+ 0·4	18·5	115·3	9·0	290·1	1·0	267·0	1·7	78·2
August	+16·1	− 9·2	− 7·3	+ 2·7	− 0·9	− 2·2	+ 1·6	− 0·1	18·5	119·8	7·8	290·3	2·4	202·8	1·6	95·1
September	+17·7	− 6·6	− 4·9	+ 2·2	− 1·0	− 3·3	+ 1·1	0·0	18·9	110·4	5·4	294·7	3·4	196·9	1·1	90·0
October	+16·6	− 1·2	− 7·8	− 0·2	+ 0·7	− 3·5	+ 1·0	+ 0·7	16·6	94·2	7·8	268·5	3·6	169·0	1·2	54·1
November	+11·2	− 0·2	− 6·0	− 1·4	+ 1·0	− 2·3	+ 0·9	+ 0·3	11·2	91·0	6·2	256·9	2·5	155·6	0·9	72·3
December	+ 6·5	+ 2·5	− 3·8	− 0·3	− 0·5	− 1·4	+ 0·9	+ 0·1	7·0	69·1	3·8	265·1	1·5	199·5	0·9	85·1
For the Year	+13·8	− 3·2	− 7·0	+ 1·0	+ 0·7	− 2·0	+ 0·7	+ 0·3	14·2	103·0	7·1	278·2	2·1	160·6	0·8	66·5
	VERTICAL FORCE.															
January	− 2·1	− 2·7	− 0·3	− 0·3	+ 0·3	− 0·6	− 0·4	− 0·4	3·4	218·0	0·4	228·1	0·7	157·5	0·4	261·3
February	+ 2·3	− 6·7	− 3·2	+ 0·4	+ 1·2	− 1·5	− 1·1	− 0·4	7·1	161·0	3·2	276·9	1·9	141·5	1·2	252·2
March	+ 1·4	−10·8	− 6·3	+ 0·2	+ 2·9	− 0·2	− 0·5	− 0·1	10·9	172·7	6·3	271·7	2·9	94·7	0·5	262·1
April	+ 3·2	− 7·0	− 7·6	− 1·1	+ 2·4	− 1·5	− 0·7	+ 0·2	7·7	155·4	7·7	261·4	2·8	122·9	0·7	287·0
May	+ 4·8	− 7·7	− 6·9	+ 0·8	+ 2·3	− 0·6	− 0·7	− 0·7	9·1	147·9	6·9	276·7	2·4	105·3	1·0	222·6
June	+ 3·9	− 4·4	− 7·1	+ 1·0	+ 2·0	− 0·7	− 1·5	+ 0·6	5·9	138·2	7·2	277·9	2·1	108·2	1·6	291·0
July	+ 2·6	− 6·9	− 5·8	0·0	+ 1·5	− 0·4	− 0·8	0·0	7·4	159·4	5·8	270·0	1·6	105·0	0·8	270·0
August	− 1·7	− 8·2	− 5·6	− 0·2	+ 3·1	− 1·3	− 1·3	+ 0·4	8·4	192·0	5·6	268·4	3·4	113·3	1·4	285·5
September	− 0·3	− 4·6	− 4·9	+ 1·2	+ 1·8	− 0·8	− 1·0	+ 1·0	4·6	183·1	5·0	284·1	2·0	112·8	1·4	315·2
October	− 4·7	− 7·6	− 4·4	+ 1·5	+ 2·1	− 0·4	− 1·2	+ 0·1	8·9	211·9	4·6	289·1	2·1	100·7	1·2	273·6
November	− 3·1	− 7·5	− 1·1	+ 0·7	+ 0·3	− 0·9	− 0·3	− 0·1	8·1	202·5	1·3	301·2	0·9	163·2	0·3	255·6
December	− 1·5	− 6·8	− 0·1	+ 0·3	+ 0·1	− 0·6	− 0·4	− 0·6	7·0	192·5	0·3	349·3	0·6	174·1	0·7	215·9
For the Year	+ 0·4	− 6·7	− 4·4	+ 0·4	+ 1·7	− 0·8	− 0·8	0·0	6·7	176·5	4·4	274·8	1·9	116·0	0·8	272·7

TABLE XVII.—RESULTS of DETERMINATIONS of the ABSOLUTE VALUE of HORIZONTAL MAGNETIC FORCE in the YEAR 1916, from Observations made with the GIBSON INSTRUMENT in the MAGNETIC PAVILION.

Greenwich Civil Time, 1916.	In C.G.S. Units. Value of Horizontal Force as observed.	In C.G.S. Units. Value of Horizontal Force deduced to Mean of Month.	Observer.
	d h	·18000+	·18000+	
Jan.	4. 12	506	510	B
	7. 12	502	512	B
	11. 11	477	512	B
	14. 13	484	509	B
	18. 13	496	507	B
	21. 12	487	505	B
	25. 13	468	510	B
	28. 12	493	511	B
Feb.	1. 12	494	517	B
	4. 12	501	514	B
	8. 11	493	510	B
	11. 11	494	507	B
	15. 12	500	517	B
	18. 12	500	517	B
	22. 12	486	515	B
	25. 12	494	505	B
	29. 12	483	515	B
Mar.	3. 12	484	514	B
	7. 12	483	512	B
	10. 12	445	491	B
	14. 12	495	517	B
	17. 12	468	501	B
	21. 12	477	508	B
	24. 11	476	501	B
	28. 12	473	500	B
	31. 12	427	511	B
April	4. 13	474	527	B
	7. 12	460	505	B
	11. 11	463	505	B
	14. 12	486	512	B
	18. 12	479	528	B
	20. 12	469	518	B
	25. 15	537	546	B
	28. 12	444	523	B
May	2. 12	482	509	B
	5. 12	474	510	B
	9. 12	475	506	B
	12. 12	483	503	B
	16. 12	482	519	B
	19. 11	503	516	B
	23. 14	488	526	B
	26. 11	479	512	B
	30. 11	492	513	B
June	2. 11	472	507	B
	6. 11	488	497	B
	8. 14	521	541	B
	13. 11	467	498	B
	16. 15	510	515	B
	20. 11	448	500	B
	22. 10	473	509	B
	27. 14	531	536	B
	30. 11	473	525	B
July	4. 14	513	527	B
	7. 11	467	492	B
	11. 11	463	494	B
	14. 11	476	496	B
	17. 12	477	477	B
	22. 11	482	486	B
	25. 11	476	479	B
	28. 11	490	493	B
Aug.	1. 11	478	505	B
	4. 14	491	505	B
	8. 11	470	488	B
	11. 13	491	501	B
	15. 12	481	503	B
	18. 11	478	507	B
	22. 11	482	498	B
	25. 11	474	505	B
	29. 11	459	496	B
Sept.	1. 14	483	499	B
	5. 11	448	500	B
	8. 11	455	506	B
	12. 11	465	502	B
	15. 11	442	511	B
	19. 11	470	496	B
	22. 11	493	489	B
	26. 14	497	491	B
	29. 15	493	496	B
Oct.	3. 11	444	491	B
	6. 16	467	522	B
	10. 12	452	495	B
	13. 12	461	523	B
	17. 15	479	499	B
	20. 15	496	498	B
	24. 14	480	488	B
	27. 15	487	489	B
	31. 15	475	489	B
Nov.	3. 15	459	493	B
	7. 15	475	490	B
	10. 13	474	496	B
	14. 15	477	490	B
	17. 12	488	488	B
	21. 12	479	478	B
	24. 15	489	493	B
	28. 12	472	471	B
Dec.	1. 12	451	514	B
	5. 12	471	484	B
	8. 12	479	494	B
	12. 13	487	493	B
	15. 12	453	490	B
	19. 12	489	487	B
	22. 12	500	494	B
	27. 12	490	503	B
	29. 13	482	497	B

TABLE XVIII.—RESULTS of OBSERVATIONS of MAGNETIC DIP made with the DIP INDUCTOR in the YEAR 1916.

Greenwich Civil Time, 1916.	Magnetic Dip.	Observer.	Greenwich Civil Time, 1916.	Magnetic Dip.	Observer.	Greenwich Civil Time, 1916.	Magnetic Dip.	Observer.	Greenwich Civil Time, 1916.	Magnetic Dip.	Observer.
d h	° ′		d h	° ′		d h	° ′		d h	° ′	
Jan. 1. 13	66. 52·2	J	April 4. 12	66. 52·6	B	July 4. 15	66. 51·5	C	Oct. 3. 11	66. 55·8	B
4. 13	66. 50·8	B	6. 15	66. 52·7	B	6. 12	66. 53·1	B	5. 11	66. 52·8	B
6. 11	66. 51·9	B	7. 11	66. 53·1	B	7. 11	66. 54·0	B	6. 15	66. 0·6	B
7. 11	66. 52·5	B	11. 16	66. 52·1	B	11. 11	66. 54·1	B	10. 12	66. 55·3	B
11. 12	66. 54·1	B	13. 13	66. 52·9	B	13. 12	66. 53·4	B	12. 16	66. 54·1	B
13. 13	66. 52·7	B	14. 13	66. 51·2	B	14. 11	66. 52·8	B	13. 12	66. 55·3	B
14. 15	66. 52·6	B	18. 13	66. 52·5	B	17. 11	66. 53·4	B	16. 14	66. 53·3	B
18. 12	66. 52·1	B	19. 13	66. 53·0	B	19. 4	66. 52·5	C	18. 13	66. 54·0	B
19. 15	66. 51·3	B	20. 17	66. 50·9	B	22. 11	66. 53·8	B	20. 15	66. 52·4	B
21. 21	66. 51·2	B	25. 14	66. 51·5	B	24. 11	66. 50·9	B	23. 14	66. 52·9	B
25. 12	66. 54·6	B	26. 13	66. 53·7	B	27. 15	66. 51·2	C	26. 16	66. 51·8	B
26. 15	66. 52·3	B	28. 12	66. 55·2	B	28. 11	66. 51·0	B	27. 15	66. 52·4	B
28. 12	66. 52·2	B							31. 16	66. 52·8	B
			May 2. 12	66. 52·1	B	Aug. 1. 11	66. 52·5	B			
Feb. 1. 13	66. 52·4	B	4. 13	66. 52·0	B	3. 15	66. 52·5	B	Nov. 2. 10	66. 53·1	B
3. 13	66. 52·4	B	5. 13	66. 52·1	B	6. 10	66. 50·8	C	3. 16	66. 53·1	B
4. 13	66. 50·6	B	9. 12	66. 52·7	B	8. 11	66. 53·6	B	7. 16	66. 54·2	B
8. 12	66. 51·7	B	10. 12	66. 53·3	B	9. 10	66. 53·3	B	8. 17	66. 54·6	B
10. 13	66. 52·4	B	12. 13	66. 52·0	B	11. 12	66. 52·3	B	10. 13	66. 54·1	B
11. 12	66. 51·6	B	16. 13	66. 53·8	B	15. 11	66. 52·7	B	14. 17	66. 52·4	B
15. 13	66. 50·5	B	18. 13	66. 50·8	B	17. 12	66. 52·8	B	16. 15	66. 52·7	B
17. 13	66. 51·1	B	19. 13	66. 50·8	B	19. 11	66. 53·2	B	17. 19	66. 51·8	B
18. 12	66. 51·5	B	23. 15	66. 52·0	B	22. 10	66. 52·9	B	20. 23	66. 52·0	B
22. 16	66. 51·6	B	25. 12	66. 52·3	B	23. 11	66. 53·9	B	22. 7	66. 51·5	B
23. 12	66. 52·2	B	26. 11	66. 51·1	B	25. 11	66. 54·2	B	24. 16	66. 51·4	B
25. 11	66. 51·8	B	30. 12	66. 50·4	B	29. 11	66. 54·6	B	28. 12	66. 53·1	B
29. 12	66. 53·3	B				30. 12	66. 54·5	B	30. 8	66. 52·6	B
Mar. 1. 12	66. 51·2	B	June 1. 15	66. 52·1	B						
3. 13	66. 53·0	B	2. 12	66. 52·7	B	Sept. 1. 14	66. 53·0	B	Dec. 1. 12	66. 55·1	B
7. 12	66. 52·9	B	6. 10	66. 52·5	B	5. 11	66. 55·0	B	5. 16	66. 53·8	B
9. 13	66. 54·6	B	8. 15	66. 51·4	B	7. 11	66. 53·8	B	7. 19	66. 53·0	B
10. 13	66. 54·5	B	9. 8	66. 54·9	B	8. 11	66. 56·0	B	8. 12	66. 53·2	B
14. 13	66. 50·5	B	13. 11	66. 53·9	B	12. 11	66. 53·9	B	12. 13	66. 51·3	B
15. 12	66. 52·5	B	14. 21	66. 50·1	B	14. 19	66. 52·9	B	14. 14	66. 52·5	B
17. 13	66. 54·2	B	16. 16	66. 51·2	B	15. 11	66. 56·2	B	15. 11	66. 52·1	B
21. 12	66. 53·2	B	20. 12	66. 54·7	B	19. 11	66. 53·7	B	19. 12	66. 51·8	B
22. 11	66. 54·6	B	21. 10	66. 53·6	B	21. 12	66. 52·2	B	21. 14	66. 51·7	B
24. 12	66. 51·3	B	22. 11	66. 53·2	B	22. 11	66. 51·8	B	22. 12	66. 52·4	B
28. 13	66. 52·8	B	27. 14	66. 50·9	B	26. 14	66. 51·2	B	27. 12	66. 51·8	B
30. 13	66. 54·5	B	28. 12	66. 53·4	B	28. 11	66. 54·2	B	28. 12	66. 52·7	B
31. 13	66. 54·8	B	30. 11	66. 53·1	B	29. 14	66. 52·0	B	29. 12	66. 53·4	B

The initials B, C, and J are those of Messrs. Bryant, Chapman, and Jones.

TABLE XIX.—ANNUAL SUMMARY of the MAGNETIC ELEMENTS.

Month, 1916.	Mean Value of				Monthly Mean Diurnal Range of			Sum of Hourly Deviations from Mean of		
	Westerly Declination.	North Force C.G.S.	Vertical Force C.G.S.	Dip.	Declination.	North Force.	Vertical Force.	Declination.	North Force.	Vertical Force.
	° ′			° ′	′	γ	γ	′	γ	γ
January	14. 51·3	·17883	·43271	66. 52·4	5·1	24	9	28·5	113	53
February	14. 50·5	·17886	·43245	66. 51·8	6·2	27	19	35·1	151	124
March	14. 49·4	·17874	·43256	66. 53·2	10·2	34	32	64·7	220	190
April	14. 48·8	·17881	·43279	66. 52·6	12·4	50	28	65·6	311	153
May	14. 47·7	·17883	·43277	66. 51·9	11·3	50	30	62·8	204	159
June	14. 47·3	·17884	·43258	66. 52·7	11·7	48	25	69·5	131	126
July	14. 46·1	·17866	·43251	66. 52·6	10·8	46	23	60·1	311	135
August	14. 45·2	·17858	·43251	66. 53·1	10·7	47	24	55·2	298	161
September	14. 44·8	·17855	·43267	66. 53·6	9·3	44	18	55·4	293	106
October	14. 44·3	·17849	·43270	66. 54·1	7·9	41	24	47·2	145	145
November	14. 43·6	·17852	·43255	66. 53·0	7·8	30	17	39·6	193	128
December	14. 43·6	·17859	·43273	66. 52·7	5·6	15	16	29·5	119	113
The Year	14. 46·9	·17869	·43263	66. 52·8	9·1	38·0	22·1	51·1	207·4	132·8

ROYAL OBSERVATORY, GREENWICH.

MAGNETIC DISTURBANCES.

1916.

MAGNETIC DISTURBANCES in DECLINATION, NORTH FORCE, and VERTICAL FORCE, recorded at the ROYAL OBSERVATORY, GREENWICH, in the YEAR 1916.

The following notes give a brief description of all magnetic movements (superposed on the ordinary diurnal movement) exceeding 3′ in Declination, 20γ in North Force, or 12γ in Vertical Force, as taken from the photographic records of the respective Magnetometers. The movements in North and Vertical Force are expressed in C. G. S. units. When any one of the three elements is not specifically mentioned, it is to be understood that the movement, if any, was insignificant. Any failure or want of register is specially indicated.

The term "wave" is used to indicate a movement in one direction and return; "double wave" a movement in one direction and return with continuation in the opposite direction and return; "two successive waves" consecutive wave movement in the same direction; "oscillations" a number of movements in both directions. The extent and direction of the movement are indicated in brackets, + denoting an increase, and − a decrease of the magnetic element. In the case of oscillations the sign ± denotes positive and negative movements of generally equal extent.

Magnetic movements which do not admit of brief description in this way are exhibited on accompanying plates.

The time is Greenwich Civil Time (commencing at midnight, and counting the hours from 0 to 24).

1916.

January

$3^d\ 17\frac{3}{4}^h$ to $19\frac{1}{4}^h$ Irregular wave in Dec. (− 4′). $22\frac{1}{2}^h$ to $23\frac{1}{4}^h$ Decrease in Dec. (− 6′).

$4^d\ 14\frac{1}{2}^h$ to $17\frac{1}{4}^h$ Irregular wave in N.F. (− 34).

$5^d\ 0\frac{1}{2}^h$ to 1^h Decrease in Dec. (− 5′), followed by slow recovery till 5^h. $18\frac{1}{4}^h$ to $19\frac{1}{2}^h$ Wave in Dec. (− 3′).

$9^d\ 16^h$ to $17\frac{1}{4}^h$ Wave in N.F. (− 25).

$10^d\ 14\frac{3}{4}^h$ to 20^h Slow wave in Dec. (+ 7′), with superposed wave (− 3′) from 18^h to $18\frac{1}{2}^h$. $15\frac{1}{2}^h$ to 19^h Decrease in N.F. (− 53), with irregular wave (− 29) superposed from $16\frac{3}{4}^h$ to $18\frac{1}{4}^h$. 17^h to 24^h Slow wave in V.F. (+ 20). 20^h to $20\frac{1}{4}^h$ Decrease in Dec. (− 3′), followed till $20\frac{3}{4}^h$ by a sharp wave (− 8′), followed till 22^h by a double wave (− 4′, + 4′), each portion double-crested. 20^h to $21\frac{1}{2}^h$ Irregular sharp triple-crested wave in N.F. (+ 78). $21\frac{3}{4}^h$ to $22\frac{3}{4}^h$ Truncated wave in N.F. (+ 27). $10^d\ 23\frac{1}{2}^h$ to $11^d\ 0\frac{1}{4}^h$ Sharp wave in N.F. (+ 39).

$11^d\ 4^h$ to $12^d\ 4^h$. See Plate I.

$12^d\ 8\frac{1}{2}^h$ to $8\frac{3}{4}^h$ Very sharp movements in Dec. (± 3′) and N.F. (± 17) during oscillations from 4^h to 11^h. $20\frac{1}{2}^h$ to $22\frac{1}{4}^h$ Irregular double-crested wave in Dec. (− 13′), followed till $22\frac{3}{4}^h$ by a decrease (− 8′), recovering irregularly by 24^h. $20\frac{1}{2}^h$ to $23\frac{1}{2}^h$ Three successive waves in N.F. (+ 52, + 35, + 26).

$13^d\ 1\frac{1}{2}^h$ to 5^h Irregular waves in Dec. (+ 12′) and N.F. (− 40). $20\frac{1}{2}^h$ to $21\frac{1}{2}^h$ Sharp wave in Dec. (− 9′). $20\frac{1}{2}^h$ to 22^h Wave in N.F. (+ 58).

$14^d\ 20\frac{3}{4}^h$ to $21\frac{1}{2}^h$ Rounded wave in Dec. (− 3′).

$16^d\ 20^h$ to $21\frac{1}{2}^h$ Irregular wave in Dec. (− 5′). $20\frac{1}{2}^h$ to $21\frac{1}{4}^h$ Wave in N.F. (+28).

$18^d\ 1\frac{1}{2}^h$ to $2\frac{1}{4}^h$ Wave in Dec. (+ 3′), very steep at commencement. 14^h to $14\frac{1}{2}^h$ Decrease in V.F. (− 13). 19^h to 20^h Wave in Dec. (− 4′).

$20^d\ 13\frac{1}{2}^h$ to $16\frac{1}{2}^h$ Slow waves in Dec. (+ 6′), N.F. (− 64), and V.F. (+ 13). $18\frac{1}{4}^h$ to $19\frac{3}{4}^h$ Waves in Dec. (− 8′) and N.F. (+ 23). $22\frac{1}{2}^h$ to $23\frac{3}{4}^h$ Waves in Dec. (− 7′) and N.F. (+ 26).

$21^d\ 20\frac{3}{4}^h$ to $21\frac{3}{4}^h$ Wave in Dec. (− 5′), steep at commencement.

$22^d\ 14\frac{1}{2}^h$ to $15\frac{1}{4}^h$ Decrease and increase in N.F. (− 17, + 35). $14\frac{3}{4}^h$ to $16\frac{1}{4}^h$ Flat-crested wave in Dec. (− 5′). 20^h to $20\frac{3}{4}^h$ Truncated wave in Dec. (− 6′). $22^d\ 23\frac{1}{2}^h$ to $23^d\ 2^h$ Irregular wave in N.F. (+ 66).

$23^d\ 0^h$ to $2\frac{1}{2}^h$ Irregular double-crested wave in Dec. (− 8′). 0^h to 3^h Wave in V.F. (− 18). $3\frac{1}{2}^h$ to $7\frac{1}{4}^h$ Three successive irregular waves in N.F. (+ 20, + 30, + 20). $4\frac{3}{4}^h$ to $5\frac{3}{4}^h$ Irregular wave in Dec. (− 4′) $6\frac{1}{4}^h$ to $7\frac{1}{2}^h$ Wave in Dec. (+ 5′). $23^d\ 10\frac{1}{4}^h$ to $24^d\ 11^h$ Loss of V.F. register. $16\frac{1}{2}^h$ to $17\frac{1}{2}^h$ Wave in N.F. (+ 24), followed till $18\frac{3}{4}^h$ by a truncated wave (+ 60), steep at commencement. $17\frac{1}{4}^h$ to $18\frac{3}{4}^h$ Sharp wave in Dec. (− 10′). $20\frac{1}{2}^h$ to $20\frac{3}{4}^h$ Sharp decrease in Dec. (− 3′), followed till $21\frac{3}{4}^h$ by a double wave (+ 5′, −5′). $20\frac{1}{2}^h$ to $22\frac{1}{4}^h$ Double-crested wave in N.F. (+ 32). $23\frac{1}{4}^h$ to 24^h Waves in Dec. (+ 6′) and N.F. (− 24).

1916.

January

25d 6¼h to 9¼h Double wave in N.F. (+ 20, − 20). 8½h to 10h Wave in Dec. (+ 6′). 15h to 16h Wave in Dec. (− 5′). 16½h to 17¼h Wave in Dec. (− 6′). 17h to 17¾h Wave in N.F. (+ 25), followed till 19h by another wave (+ 50), steep at commencement. 17½h to 18¾h Steep wave in Dec. (− 13′).

26d 1½h to 2¾h Double-crested wave in Dec. (+ 5′). 18½h to 19½h Wave in Dec. (− 6′).

28d 20h to 21h Wave in N.F. (+ 27). 20¼h to 21½h Flat-crested wave in Dec. (− 4′).

29d 1½h to 3¼h Sharp double-crested wave in Dec. (+ 12′). 2h to 3¾h Irregular wave in N.F. (+ 22). 2½h to 4h Wave in V.F. (− 12).

31d 18h to 18¾h Wave in Dec. (− 3′). 21h to 22½h Wave in N.F. (+ 22).

February

3d 1h to 1½h Wave in Dec. (+ 3′).

5d 12h to 13¾h Wave in Dec. (+ 5′). 15½h to 17¼h Wave in N.F. (− 23). 19¼h to 19¾h Decrease in Dec. (− 5′), continued till 20¾h by a wave (− 5′). 22½h to 23h Sharp increase and decrease in N.F. (+ 30, − 15).

8d 12¾h to 14¼h Wave in Dec. (+ 5′), in N.F. small. 16h to 23h Slow wave in V.F. (+ 20). 17h to 19h Wave in N.F. (+ 23). 19½h to 22¼h Irregular wave in Dec. (− 11′).

10d 0¾h to 1½h Wave in Dec. (+ 3′).

12d 19h to 21½h Double wave in N.F. (+ 21, − 21). 19½h to 21¾h Wave in Dec. (− 7′).

13d 2¼h to 3½h Wave in Dec. (+ 7′). 21¾h to 23½h Wave in Dec. (− 9′). 21¾h to 24h Double-crested wave in N.F. (+ 62).

15d 2¾h to 3¾h Wave in Dec. (+ 3′). 4½h to 5¾h Wave in Dec. (+ 3′).

16d 12h to 13½h Wave in V.F. (+ 15).

17d 17¼h to 18h Wave in N.F. (− 20). 17½h to 18½h Truncated wave in Dec. (− 5′). 17d 23½h to 18d 1h Wave in N.F. (+ 44). 17d 23¾h to 18d 0½h Decrease in Dec. (− 8′).

18d 1½h to 3½h Irregular increase in Dec. (+ 9′). 1½h Steep decrease in N.F. (− 22). 13h to 14¾h Double-crested wave in Dec. (+ 5′). 14½h to 15h Wave in N.F. (− 20). 16¼h to 17½h Wave in Dec. (− 6′). 19¼h to 20½h Double wave in N.F. (− 22, + 18). 19½h to 20¼h Steep truncated wave in Dec. (− 8′).

19d 0¾h to 2h Wave in Dec. (− 4′). 21h to 22h Irregular waves in Dec. (− 4′) and N.F. (+ 30), both steep at commencement.

20d 19¾h to 20¾h Wave in Dec. (− 10′) steep at commencement. 20h Sharp increase in N.F. (+ 32).

22d 4½h to 5¾h Wave in N.F. (− 22). 5h to 6h Truncated wave in Dec. (+ 6′). 5½h to 6h Irregular decrease in V.F. (− 15).

23d 21h to 21½h Decrease in Dec. (− 5′). 23d 23½h to 24d 1¾h Double wave in Dec. (+ 8′, − 10′), the last portion slower. 23d 23¾h to 24d 0¼h Decrease in V.F. (− 20).

24d 0h to 1¼h Wave in N.F. (+ 42).

26d 16¾h to 18h Wave in Dec. (− 6′). 23h to 24h Wave in N.F. (+ 24).

27d 19h to 21h Two successive waves in Dec. (− 19′, − 4′): the first steep. 19¾h to 20¼h Very steep wave in N.F. (+ 100); small sharp movement in V.F.

March

3d 0½h to 2h Wave in Dec. (− 6′). 7¼h to 8¼h Wave in Dec. (+ 4′). 10¾h to 11h Increase in Dec. (+ 4′). 11¾h to 12h Increase in Dec. (+ 4′). 14¾h to 16½h Flat-crested wave in N.F. (+ 28). 17½h to 18½h Two successive waves in N.F. (− 23, − 23). 17¾h to 18¾h Double-crested wave in Dec. (− 5′). 22¾h to 23¼h Irregular decrease in Dec. (− 12′). 22h to 23¼h Irregular wave in N.F. (+ 36), followed till 4d 1¼h by another irregular wave (+ 58). 23h to 24h Wave in Dec. (+ 8′). 3d 23½h to 4d 0¾h Decrease in V.F. (− 29).

4d 1¾h to 3h Wave in N.F. (+ 34). 2h to 3h Double wave in Dec. (+ 3′, − 3′). 2h to 4h Wave in V.F. (− 15), steeper at commencement. 23h to 23¾h Wave in Dec. (+ 3′).

5d 21h to 21½h Decrease in Dec. (− 5′). 21¼h to 22¼h Wave in N.F. (+ 37).

6d 12¼h to 13¼h Double-crested wave in Dec. (+ 5′). 20½h to 21h Steep decrease in Dec. (− 13′). 20½h to 22¼h Double-crested wave in N.F. (+ 35). 21¼h to 21½h Increase in Dec. (+ 8′).

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March

7d 1½h to 2¼h Wave in N.F. (− 27). 1¾h to 3¼h Steep wave in Dec. (+ 13′); wave in V.F. (− 25). 3¾h to 4¾h Wave in Dec. (+ 7′), followed till 5¼h by an increase (+ 5′).

8d 6h to 10d 6h. See Plate I.

10d 14¼h to 15h Wave in Dec. (+ 5′) with superposed sharp fluctuations (± 2′); double wave in N.F. (+ 50, − 20) with superposed fluctuations (± 20). 15h to 20h Irregular wave in V.F. (−49). 15¾h Sharp decrease in Dec. (− 6′) and N.F. (− 45), the latter immediately followed by a sharp increase (+ 29), the former by a wave (+ 5′), till 16½h. 16h to 17h Wave in N.F. (− 25), followed till 18½h by a double wave (− 55, + 47), the first portion steep, the last very irregular. 17¼h to 18½h Steep wave in Dec. (− 22′). 19½h to 20½h Two successive sharp waves in N.F. (+ 34, + 53). 19¾h to 20¼h Sharp double wave in Dec. (+ 7′, − 8′). 20¾h to 21½h Wave in Dec. (− 3′). 21¾h to 22½h Wave in Dec. (− 3′). 10d 23¾h to 11d 0½h Wave in N.F. (+ 32).

11d 3½h to 4h Wave in Dec. (+ 3′). 21¼h to 23h Two successive waves in N.F. (+ 20, + 24), the first double-crested.

12d 1¼h to 2½h Irregular wave in Dec. (+ 6′). 14h to 14¾h Double waves in Dec. (+ 3′, − 4′) and N.F. (+ 20, − 26), the first portion truncated, the rest sharp. 21¼h to 22½h Wave in Dec. (− 4′); in N.F. small.

14d 3½h to 4½h Wave in Dec. (+ 4′).

16d 20h to 21¼h Wave in Dec. (− 5′).

17d 0¼h to 0½h Sharp decrease in Dec. (− 6′) and increase in N.F. (+ 30). 0¾h to 1¼h Wave in Dec. (+ 5′). 1h to 3h Irregular decrease in V.F. (− 36). 2h to 2¾h Wave in N.F. (+ 22). 3½h to 4¼h Increase in Dec. (+ 13′), continued till 6¾h by a quadruple-crested wave (+ 12′), followed till 8½h by a wave (+ 11′). 3¾h to 4¼h Decrease in N.F. (− 25), continued till 5½h by two successive waves (− 47, − 24). 5¾h to 7¼h Irregular wave in N.F. (− 75). 10¼h Sharp wave in Dec. (− 3′). 11½h to 11¾h Decrease in N.F. (− 23). 15¾h to 16¾h Wave in N.F. (+ 35), followed till 18½h by successive movements (− 20, + 15, − 17, + 26, − 17, + 23, − 14). 15¾h to 21½h Wave in V.F. (+ 30) with superposed small fluctuations. 19½h to 20½h Wave in Dec. (− 7′), followed till 24h by an irregular wave (− 9′), with smaller ones (± 2′) superposed. 19¾h to 22½h Irregular triple-crested wave in N.F. (+ 50), followed till 24h by a similar smaller wave (+ 21).

18d 3¼h to 4½h Wave in Dec. (+ 5′). 3¼h to 4½h Wave in N.F. (− 20). 11½h to 12½h Wave in Dec. (+ 3′). 20½h to 21¼h Steep wave in N.F. (+ 75). 20¾h to 21½h Wave in Dec. (+ 10′), decrease in V.F. (− 17).

19d 1¾h to 2¾h Wave in Dec. (+ 4′). 11½h to 12¼h Truncated wave in Dec. (+ 3′). 18h to 19h Irregular waves in Dec. (− 9′) and N.F. (+ 56). 18½h to 22¼h Wave in V.F. (+ 13). 21¼h to 23½h Wave in N.F. (+ 52). 21½h to 22½h Wave in Dec. (− 4′).

20d 0½h to 2¼h Double-crested wave in N.F. (+ 24). 2h to 3h Wave in Dec. (+ 3′). 13½h to 20½h Wave in V.F. (+ 32). 17½h to 18¾h Truncated wave in N.F. (− 20). 18h to 18¼h Decrease in Dec. (− 4′), continued till 19h by a wave (− 5′). 19¾h to 21h Successive sharp movements in Dec. (− 17′, + 13′, − 4′, + 7′) and N.F. (+ 85, − 70, + 23, − 36).

21d 0h to 1¼h Wave in Dec. (+ 7′), continued till 1¾h by a decrease (− 7′). 0¼h to 1¼h Irregular decrease in V.F. (− 24). 4½h to 5¼h Decrease in N.F. (− 32). 4¾h to 5½h Increase in Dec. (+ 6′). 7¾h to 9¾h Wave in N.F. (− 30). 13¼h to 14h Wave in N.F. (− 20). 15h to 16¾h Wave in V.F. (− 15). 18¾h to 19¼h Truncated wave in Dec. (− 4′). 22h to 22¼h Wave in Dec. (+ 4′). 22h to 23¼h Wave in N.F. (+ 20). 22h to 22¼h Decrease in V.F. (− 12).

22d 9¼h to 9½h Decrease in V.F. (− 16). 18½h to 18¾h Sharp decrease in Dec. (− 4′) and increase in N.F. (+ 20).

23d 21¾h to 23h Wave in Dec. (− 4′).

24d 14¾h to 16¾h Very irregular wave in Dec. (+ 7′). 14¾h to 16h Wave in N.F. (+ 40), followed till 17½h by an irregular double wave (+ 28, − 40), the second portion steep. 15¼h to 21½h Irregular wave in V.F. (+ 48). 17¾h to 18h Sharp decrease in Dec. (− 7′), continued till 18½h by a wave (− 3′). 17¾h to 18½h Rounded wave in N.F. (− 21). 19½h to 20h Successive very sharp movements in Dec. (− 4′, + 6′, − 11′): sharp double wave in N.F. (+ 24, − 20). 24d 23¾h to 25d 0½h Double-crested wave in Dec. (− 6′). 24d 23¾h to 25d 1h Double-crested wave in N.F. (+ 43), decrease in V.F. (− 22).

25d 18½h to 19½h Irregular decrease in N.F. (− 55), followed till 20¼h by a wave (+ 24). 19h to 21h Wave in V.F. (+ 18). 19½h to 20h Sharp decrease in Dec. (−11′), followed till 21h by a truncated wave (+ 5′). 21¼h Sharp decrease in Dec. (− 3′). 21¼h to 23h Two successive sharp waves in N.F. (+ 48, + 50). 21¼h to 21¾h Sharp decrease in V.F. (− 36). 22h to 22¾h Sharp wave in Dec. (− 11′), followed till 24h by a double wave (− 3′, + 7′). 23h to 24h Wave in V.F. (+ 12). 25d 23½h to 26d 0½h Wave in N.F. (+ 35).

26d 0h to 2h Increase in V.F. (+ 20). 11½h to 14h Wave in N.F. (− 30).

1916.

March

29d 6½h to 7½h Wave in N.F. (− 20). 6¾h to 7h Sharp wave in Dec. (+ 5′). 10¾h to 11½h Wave in N.F. (− 23). 13h to 14h Sharp movements in N.F. (+ 50, − 40, + 30), followed till 18½h by a double wave (− 50, + 22), the first portion very irregular. 13¼h to 13½h Sharp wave in Dec. (− 3′). 13¾h to 14½h Truncated wave in Dec. (− 5′), steep at commencement. 14¼h to 18½h Irregular wave in V.F. (+ 48). 15¼h to 16h Wave in Dec. (+ 4′). 20h to 20½h Sharp decrease in Dec. (− 8′). 20¼h to 20¾h Wave in N.F. (+ 20). 21h to 21¾h Wave in N.F. (+ 28). 21½h to 22h Sharp decrease in Dec. (− 10′). 29d 22½h to 30d 0¼h Decrease in V.F. (− 33). 22¾h to 23½h Wave in Dec. (+ 4′), followed by a sharp increase (+ 6′). 29d 22¾h to 30d 0½h Irregular double wave in N.F. (− 24, + 55), the second movement very steep, the third irregular. 29d 23¾h to 30d 2½h Irregular double wave in Dec. (− 14′, + 4′).

30d 0¼h to 5h Irregular wave in V.F. (− 34), with smaller ones superposed. 0½h to 3h Irregular triple wave in N.F. (+ 22, − 20, + 18), the second portion truncated. 4¼h to 5¼h Wave in N.F. (+ 22). 6¾h to 7¼h Wave in Dec. (+ 3′). 14½h to 15¼h Wave in N.F. (− 20). 15h to 19¼h Wave in V.F. (+ 32). 16½h to 17¾h Double wave in N.F. (− 28, + 28). 21½h to 22¾h Wave in N.F. (+ 73), very steep at commencement. 21½h to 22¼h Decrease in V.F. (− 27). 22h to 23h Wave in Dec. (− 5′).

31d 6¾h to 8¼h Irregular wave in N.F. (− 40). 7¼h to 9h Irregular wave in Dec. (+ 7′). 11¼h to 12¾h Wave in N.F. (− 37). 13¼h to 15h Wave in Dec. (+ 5′). 14h to 16h Wave in V.F. (+ 16). 14½h to 15¼h Double-crested wave in N.F. (+ 28). 21¼h to 21½h Wave in Dec. (− 3′). March 31d 22h to April 1d 0¾h Irregular decrease in V.F. (− 43). 22¾h to 23½h Wave in Dec. (− 4′), followed till April 1d 1h by a double wave (− 5′, + 6′). March 31d 23¼h to April 1d 0¾h Successive movements in N.F. (− 24, + 15, − 20, + 24, − 43), followed till 1½h by a wave (+ 22).

April

1d 2h to 3½h Wave in N.F. (+ 37). 2½h to 3h Wave in Dec. (− 3′). 4½h to 6¼h Wave in Dec. (− 3′); flat-crested wave in N.F. (+ 22). 12½h to 13½h Wave in Dec. (+ 3′). 16¼h to 17h Wave in N.F. (− 21). 16½h to 17½h Wave in Dec. (− 4′). 18¾h to 20¼h Wave in Dec., (− 5′), in N.F. (+ 28). 21¾h to 23½h Wave in N.F. (+ 26).

6d 13½h to 15h Truncated waves in Dec. (+ 4′) and N.F. (+ 28).

7d 22h to 23¾h Truncated wave in Dec. (− 4′); irregular wave in N.F. (+ 25). 7d 23¾h to 8d 1h Wave in Dec. (− 6′).

8d 0h to 1½h Irregular wave in N.F. (− 25), followed till 3½h by a wave (− 40). 2½h to 4h Wave in Dec. (+ 6′). 3¾h to 6h Slow wave in N.F. (− 25). 12½h to 14h Wave in N.F. (− 50). 12¾h to 14½h Wave in Dec. (+ 4′). 14½h to 15½h Truncated wave in N.F. (− 24).

11d 21½h to 22¼h Wave in N.F. (+ 20).

13d 19½h to 14d 10¾h Loss of Dec. and N.F. registers.

14d 20h to 15d 11h Loss of Dec. and N.F. registers.

15d 0h to 0¾h Decrease in V.F. (− 14). 16¼h to 22¼h Irregular wave in V.F. (+ 40). 15d 12¾h to 17d 12¼h Loss of Dec. and N.F. registers.

16d 0h to 4¾h Slow wave in V.F. (− 28). 15h to 22h Wave in V.F. (+ 22).

17d 18¼h to 20h Truncated wave in N.F. (+ 35). 18¾h to 19¾h Wave in Dec. (− 4′).

18d 7h to 8½h Wave in N.F. (− 34). 12½h to 13½h Wave in Dec. (+ 4′). 22h to 24h Double-crested wave in Dec. (− 5′). 22¾h to 24h Wave in N.F. (+ 35), steep at commencement: wave in V.F. (− 12).

20d 15¾h to 17h Sharp wave in N.F. (+ 45). 17¾h to 19h Irregular wave in N.F. (+ 20). 19h to 20¾h Wave in Dec. (− 8′).

21d 1¼h to 2¾h Flat-crested wave in Dec. (+ 4′).

22d 2¼h to 3½h Wave in N.F. (− 25). 2¾h to 4h Irregular decrease in Dec. (− 7).

25d 3h to 26d 3h. See Plate II.

26d 6¼h to 6¾h Wave in Dec. (− 3′). 26d 23½h to 27d 1½h Truncated wave in Dec. (+ 8′).

27d 0h to 0½h Wave in N.F. (− 20). 3h to 4¼h Increase in V.F. (+ 29). 13¼h to 14½h Irregular wave in Dec. (+ 8′). 13¼h to 13¾h Sharp double wave in N.F. (+ 25, − 23). 13¼h to 16h Wave in V.F. (+ 12). 15¼h to 16h Wave in N.F. (+ 25). 16¼h Sudden increase in N.F. (+ 26). 17h to 21h Wave in V.F. (+ 20). 17¼h to 18h Decrease in Dec. (− 8′). 17½h to 18¼h Wave in N.F. (− 45). 19h to 21h Double wave in N.F. (− 20, + 36), the first portion irregularly truncated, and including a sudden increase (+ 26) at 20½h. 20¼h to 21¼h Three successive waves in Dec. (− 7′, − 3′, − 3′). 22½h to 23½h Wave in Dec. (− 4′).

28d 1½h to 5½h Very irregular triple wave in N.F. (− 28, + 20, − 28). 1¾h to 3¾h Two successive waves in Dec. (+ 4′, + 4′). 2½h to 4¼h Irregular decrease in V.F. (− 36). 4¾h to 7¾h Slow irregular wave in Dec. (+ 7′).

28d 11h to 29d 11h. See Plate II.

1916.

April

29d 12h to 14h Irregular truncated wave in Dec. (+ 7′). 12½h to 13¼h Double-crested wave in N.F. (— 23). 16¼h to 17½h Irregular wave in N.F. (— 28), continued till 18h by an increase (+ 28).

30d 3½h to 3¾h Wave in Dec. (+ 4′), the first movement very sudden. 16½h to 17h Increase in N.F. (+ 28). 17h to 19h Wave in Dec. (— 6′). 17¼h to 19h Truncated wave in N.F. (+ 28).

May

1d 0h to 3h Slow truncated wave in V.F. (— 12). 12h to 12¼h Wave in Dec. (+ 3′). 12¼h to 12¾h Wave in N.F. (— 30). 22¼h Sudden increase in N.F. (+ 20), followed by small waves.

2d 1h to 1¾h Wave in Dec. (+ 6′). 5h to 8½h Arched wave in N.F. (+ 35). 14¾h Sudden increase in N.F. (+ 20). 18h to 18¾h Very sharp double wave in N.F. (— 26, + 28), each portion sharply double-crested, followed till 19h by a sharp decrease (— 50) : small sharp waves in Dec.

3d 3¼h to 5h Irregular wave in Dec. (+ 7′). 3d 23½h to 4d 0¼h Wave in Dec. (— 3′). 3d 23½h to 4d 0½h Wave in N.F. (+ 20).

5d 4½h to 5¾h Rounded wave in N.F. (— 30). 14h to 14½h Waves in Dec. (+ 4′) and N.F. (+ 40), both with sudden commencement. 15h to 17h Two successive waves in N.F. (+ 37, + 52).

6d 5¾h to 7h Waves in Dec. (+ 5′) and N.F. (— 37). 12¾h to 13½h Wave in Dec. (+ 4′). 14½h to 15½h Irregular wave in N.F. (+ 28).

7d 17½h to 18¾h Wave in N.F. (— 25). 19¾h to 20h Decrease in Dec. (— 7′). 20h to 21½h Irregular wave in N.F. (+ 29). 7d 22¾h to 8h 0¾h Double wave in Dec. (— 4′, + 5′).

8d 0h to 0½h Decrease in V.F. (— 12). 4½h to 6h Wave in Dec. (+ 4′).

9d 1h to 1½h Sharp wave in Dec. (+ 7′) : decrease in V.F. (— 14). 4h to 6½h Slow wave in N.F. (+ 35).

11d 0½h to 3h Irregular double-crested wave in Dec. (+ 9′). 1h to 4h Wave in V.F. (— 20). 4½h to 7h Irregular wave in Dec. (+ 7′). 5h to 6½h Wave in N.F. (— 40). 9½h to 12h Wave in N.F. (— 36). 12½h to 15¾h Irregular double-crested wave in N.F. (— 40). 17¾h to 18½h Wave in N.F. (+ 20). 18h to 19¾h Wave in Dec. (— 4′). 22h to 22¾h Wave in Dec. (— 5′). 22h to 23h Truncated wave in N.F. (+ 23).

12d 1h to 3h Irregular wave in Dec. (+ 7′). 1h to 2½h Wave in N.F. (— 28). 4¼h to 6½h Wave in N.F. (— 30). 5h to 5¾h Wave in Dec. (+ 4′). 16h to 17h Wave in N.F. (— 24).

14d 1h to 2¼h Wave in N.F. (— 22). 1¼h to 2½h Wave in Dec. (+ 4′).

16d 19½h Sudden increase in N.F. (+ 24). 22h to 23¼h Irregular double wave (+ 24, — 26), with superposed sharp movements, and including a sudden decrease (— 30) at 22¾h.

19d 14h to 14¼h Very sharp wave in N.F. (+ 20). 21h to 22½h Waves in Dec. (— 7′) and N.F. (+ 30), both sharp at commencement.

20d 23h Sharp increase in N.F. (+ 18); in Dec. small.

21d 13h to 13¾h Wave in N.F. (— 26). 15¼h to 16¼h Truncated wave in N.F. (+ 50), followed till 16¾h by an increase (+ 32). 15½h to 17h Irregular flat-crested wave in Dec. (+ 5′). 17h Sharp wave in N.F. (— 30). 17h to 20½h Wave in V.F. (+ 42). 17½h to 18¼h Wave in Dec. (+ 4′), followed till 18½h by a sharp wave (+ 4′), continued till 18¾h by a decrease (— 7′), and till 19½h by an irregular wave (— 7′). 17¾h to 19h Irregular double wave in N.F. (+ 33, — 35). 19½h Sharp decrease in N.F. (— 25). 23h to 23¾h Wave in N.F. (— 34), steep at end. 23½h to 24h Wave in Dec. (+ 6′), steep at commencement : decrease in V.F. (— 32).

22d 0¼h to 3½h Double wave in Dec. (+ 5′, — 20′). 0¼h to 3h Three successive waves in N.F. (+ 44, + 20, + 53). 0¼h to 4h Flat-crested wave in V.F. (— 28). 5h to 7¾h Two successive waves in N.F. (— 29, — 25). 6¼h to 7¾h Wave in Dec. (+ 8′). 8½h to 9h Decrease in N.F. (— 50). 12½h to 15h Irregular double-crested wave in N.F. (— 42). 13¼h to 14½h Wave in Dec. (+ 5′). 16½h to 20h Wave in V.F. (+ 25). 17¼h to 18h Wave in N.F. (— 30). 19¼h to 20h Double-crested wave in N.F. (+ 34). 19½h Sharp decrease in Dec. (— 5′). 22¾h to 24h Decrease in V.F. (— 19).

23d 0h to 0½h Rapid movements in Dec. (+ 5′, — 10′), followed till 1½h by a wave (+ 7′). 0¼h to 2½h Irregular double-crested wave in N.F. (+ 48), followed till 5¼h by a similar wave (+ 64), again followed till 7¾h by a double wave (+ 24, — 36). 0¼h to 0¾h Decrease in V.F. (— 13). 2h to 4h Double-crested wave in Dec. (+ 8′). 17¾h to 20h Truncated wave in N.F. (+ 48). 18¾h to 19½h Wave in Dec. (— 3′). 21¼h to 23h Double-crested wave in N.F. (+ 45), continued till 24h by a wave (— 20). 22h to 23h Double wave in Dec. (+ 4′, — 3′), followed till 23¾ by a wave (— 5′).

24d 3h to 5½h Flat-crested wave in Dec. (+ 6′). 3h to 4h Wave in N.F. (— 28). 7h to 10h Wave in N.F. (— 36). 14h to 15¼h Loss of Dec. and N.F. registers. 17h to 17¾h Waves in Dec. (— 4′), N.F. (+ 45), and V.F. (+ 12).

25d 0½h to 2h Double-crested wave in Dec. (+ 5′). 15¾h to 16½h Wave in N.F. (— 25). 19¼h to 20½h Double-crested wave in N.F. (+ 27). 22½h to 22¾h Wave in Dec. (+ 3′).

28d 18½h to 19½h Wave in Dec. (— 3′).

1916.

May

30d 12½h to 13h Waves in Dec. (+ 3′) and N.F. (+ 48). 13¼h to 16h Irregular quadruple wave in N.F. (+ 30, − 30, + 98, − 30), the third portion very steep. 13½h to 14¼h Irregular wave in Dec. (+5′), followed till 15¼h by a double wave (+ 4′, − 3′). 14¼h to 14½h Increase in V.F. (+ 20). 20½h to 21h Two successive very sharp waves in N.F. (+ 20, + 30).

31d 1h to 2½h Wave in Dec. (+6′). 1¼h to 2½h Wave in N.F. (+ 25). 1½h to 2¼h Decrease in V.F. (− 22). 3¾h to 4½h Double-crested wave in Dec. (+ 3′), followed till 5¾h by a double wave (+ 3′, − 4′). 3¾h to 6h Triple wave in N.F. (− 15, + 14, − 30). 4h to 5¾h Truncated wave in V.F. (− 18). 14h to 16h Increase in V.F. (+ 40), followed till 19¾h by a very disturbed wave (+ 36). 14¾h to 15¼h Very sharp increase in N.F. (+ 82). 16¼h to 17h Truncated wave in N.F. (− 29). 17½h to 19h Double wave in N.F. (+ 34, − 28). 17¾h to 18½h Wave in Dec. (+ 4′). 19½h to 21¼h Flat-crested wave in N.F. (− 32).

June

2d 20h to 3d 10h Loss of V.F. register.

6d 21¾h to 22¼h Sharp double wave in N.F. (+ 26, − 22). 6d 23¼h to 7d 0½h Wave in N.F. (− 31). 6d 23¾h to 7d 0¼h Sharp wave in Dec. (+ 6′).

7d 14h to 16h Double wave in N.F. (+ 22, − 22). 7d 23h to 8d 0¼h Double-crested wave in Dec. (+ 7′). 7d 23h to 8d 3h Wave in V.F. (− 26).

8d 1¼h to 5¼h Wave in N.F. (− 32). 4½h to 6¾h Two successive waves in Dec. (+ 7′, + 6′). 12h to 13¼h Wave in N.F. (− 25). 13½h to 14¼h Wave in Dec. (− 4′). 13½h to 15h Irregular double wave in N.F. (− 28, + 37), followed till 20h by a succession of irregular waves (+38, + 24, + 22, + 25). 14h to 16¼h Wave in V.F. (+ 20). 14¾h to 15¼h Sharp decrease in Dec. (− 11′). 18½h to 19¾h Wave in Dec.(− 5′).

9d 1½h to 2½h Wave in Dec. (+ 3′).

12d 16h to 17¼h Wave in N.F. (+ 55). 18¾h to 19½h Wave in N.F. (+ 22). 23¼h to 24h Wave in Dec. (+ 4′).

13d 3¾h to 6h Double-crested wave in Dec. (+ 7′). 11½h to 12¾h Truncated wave in N.F. (+ 22).

17d 15h to 17h Irregular double wave in N.F. (− 21, + 21).

18d 12¼h to 13¾h Wave in N.F. (− 40). 21½h to 23h Truncated wave in N.F. (+ 23)

19d 2¼h to 4h Wave in Dec. (+ 6′). 2½h to 4h Wave in N.F. (− 20). 14h to 15h Irregular increase in N.F. (+ 50), followed till 16h by a wave (+ 25). 16h to 22h Slow wave in V.F. (+ 21). 17h to 19h Irregular double-crested wave in N.F. (+ 30). 20½h to 21¼h Truncated wave in Dec. (+ 4′). 20¾h to 21½h Wave in N.F. (− 20). 19d 23½h to 20d 0¼h Waves in Dec. (− 6) and N.F. (+ 40).

20d 2h to 2¾h Wave in N.F. (+ 20). 5h to 5¾h Wave in Dec. (+ 4′). 15h to 16½h Double-crested wave in N.F. (+ 45). 22¼h to 23½h Wave in Dec. (+ 4′).

21d 16¾h to 18¼h Double-crested wave in N.F. (+ 25). 20¼h to 20½h Sharp waves in Dec. (− 4′), and N.F. (− 24). 21¾h Sudden decrease in N.F. (− 24).

22d 14¾h Very sharp wave in N.F. (− 30). 16½h to 16¾h Sharp increase in N.F. (+ 32). 16¾h to 19½h Two successive irregular double-crested waves in N.F. (+ 38, + 42). 18h to 18¾h Decrease in Dec. (− 7′), followed till 19½h by a wave (+ 4′). 22¼h to 23¾h Irregular triple wave in Dec. (− 4′, + 3′, − 5′), superposed on a decrease (− 5′). 22¼h to 23¼h Irregular decrease in V.F. (− 35). 22½h to 23¼h Sharp wave in N.F. (+ 50).

23d 0h to 1¼h Truncated wave in N.F. (+ 22). 0¼h to 1½h Sharp wave in Dec. (− 12′). 0¼h to 1¼h Wave in V.F. (− 12). 2¾h to 6h Irregular wave in V.F. (− 22). 3h to 4½h Wave in Dec. (+ 7′). 3h to 5h Rounded double wave in N.F. (− 28, + 20).

25d 16½h to 18¼h Irregular wave in N.F. (+ 50). 21¼h to 21¾h Wave in Dec. (− 4′). 21¼h to 22½h Wave in N.F. (+ 32). 23¼h to 24h Wave in N.F. (+ 22). 25d 23¼h to 26d 0¼h Wave in Dec. (− 3′).

26d 2¾h to 3¾h Wave in Dec. (− 3′). 13h to 14h Wave in N.F. (+ 21). 18¼h to 20¼h Irregular truncated wave in N.F. (+ 39). 18¾h to 20h Wave in Dec. (− 7′). 21½h to 22¼h Wave in N.F. (+ 23).

27d 14h to 15½h Wave in N.F. (+ 37). 16h to 17½h Wave in N.F. (+ 35).

28d 10¾h to 12h Wave in N.F. (− 24). 15h to 16h Wave in N.F. (− 20).

29d 0¼h to 1½h Wave in Dec. (+ 5′). 10h to 12h Loss of Dec. and N.F. registers. 20½h Sudden increase of Dec. (+ 3′), and N.F. (+ 52), followed till 21h by irregular decreases (− 7′) and (− 36) respectively. 21½h to 22¾h Wave in Dec. (+ 7′). 23h to 23¼h Increase in Dec. (+ 4′). 29d 23¼h to 30d 0¼h Wave in N.F. (− 28).

30d 23½h Sudden increase in Dec. (+ 4′) and N.F. (+ 55), followed respectively till 24h by a decrease (− 5′) and a wave (− 21). June 30d 23¼h to July 1d 4h Very irregular wave in V.F. (− 72).

July

1d 0h to 1¼h Sharp irregular double wave in Dec. (− 12′, + 12′), followed till 1½h by sharp movements (+ 3′, − 10′). 0¼h to 2h Very irregular double wave in N.F. (+ 37, − 48), followed till 3h by an irregular wave (− 35). 2h to 3h Truncated wave in Dec. (+ 7′). 6h to 10h Loss of V.F. register. 7h to 8¾h Wave in N.F. (− 55). 7¼h to 8¾h Wave in Dec. (+ 7′). 9h to 10½h Double-crested wave in N.F. (− 40). 10h to 12h Irregular wave in Dec. (+ 7′). 14h to 15h Truncated wave in N.F. (+ 23). 17¼h to 18h Two successive sharp waves in N.F. (+ 25, + 23). 18½h to 21¼h Three seccessive waves in N.F. (+ 28 + 30, + 25), the last truncated.

1916.

July

2d 16½h Sudden increase in N.F. (+ 25).

4d 11h to 11½h Wave in N.F. (+ 24), steep at commencement. 15½h to 16½h Wave in N.F. (+ 44), followed till 16¾h by an increase (+ 26). 17¼h to 18½h Truncated wave in N.F. (+ 24). 19½h to 21¼h Wave in Dec. (— 8′). 20h to 21¼h Wave in N.F. (+ 36).

5d 3h to 5¼h Wave in N.F. (— 35). 3½h to 5h Wave in Dec. (+ 4′). 12h to 13h Irregular double wave in N.F. (+ 18, — 20). 16¾h to 17½h Wave in Dec. (— 5′). 16¾h to 17h Decrease in N.F. (— 32). 17¼h to 19h Rounded wave in N.F. (+ 28), followed till 19¾h by a truncated wave (+ 20). 20h to 20¾h Wave in Dec. (— 6′). 20¼h to 21¼h Wave in N.F. (+ 40).

6d 3¼h to 4¼h Wave in Dec. (+ 5′). 15¾h to 18¼h Two successive waves in N.F. (+ 26, + 36). 21¼h to 22¾h Irregular waves in Dec. (— 6′) and N.F. (+ 36).

7d 19½h to 19¾h Sharp increase in N.F. (+ 25), followed till 20¾h by slower decrease (— 50).

8d 16¾h to 17½h Triple-crested wave in N.F. (+ 36), followed till 19h by an irregular double-crested wave (+ 48), followed till 19¼h by a sharp wave (+ 25). 18h to 21h Wave in V.F. (+ 26), followed till 22h by a sharp wave (— 42) superposed on a slower wave (— 13), till 23h, with its peak at 22¼h. 19¼h to 19½h Sharp decrease in Dec. (— 9′), followed till 20¾h by an irregular wave (— 13′), followed till 22¾h by a wave (— 7′), with waves superposed at 21¼h (+ 3′), 21½h (— 3′), 22h (— 7′). 19¾h to 20¼h Sharp wave in N.F. (— 45). 20½h to 21h Wave in N.F. (— 30), followed till 22h by an irregular sharp wave (— 80), followed till 22¾h by sharp movements (— 25, + 15, — 30). 8d 22¾h to 9d 0¼h Wave in Dec. (+ 3′).

9d 0h to 4h Slow irregular wave in V.F. (— 13). 3¼h to 8h Slow irregular wave in Dec. (+ 12′). 3¼h to 5¼h Wave in N.F. (— 28). 6¾h to 8¼h Wave in N.F. (— 28). 12h Sharp decrease in N.F. (— 35). 14h to 14½h Wave in N.F. (+ 20), followed till 16h by a triple wave (+ 23, — 35, + 30), the first portion truncated. 14¾h to 15¾h Double wave in Dec. (+ 4′, — 3′). 15h to 17h Wave in V.F. (+ 15).

10d 0h to 1¼h Wave in Dec. (+ 7′). 8½h to 11h Wave in N.F. (— 33). 14½h to 23h Loss of V.F. register. 16¾h to 18¼h Two successive waves in N.F. (+ 27, + 28). 17¼h to 18h Wave in Dec. (— 4′). 21h to 22h Waves in Dec. (— 8′) and N.F. (+ 40), both steep at commencement.

11d 1h to 7h Wave in V.F. (— 33). 3h to 4h Wave in Dec. (— 3′). 3½h to 4¼h Decrease in N.F. (— 45). 22¼h to 23h Wave in Dec. (+ 4′).

12d 15¾h to 16½h Wave in N.F. (+ 20).

13d 11h to 12h Wave in N.F. (— 25). 20½h to 22¼h Wave in Dec. (— 4′).

14d 12½h to 14½h Wave in N.F. (— 30).

17d 12¼h to 13½h Wave in N.F. (+ 27). 13½h to 15¾h Wave in Dec. (+ 7′). 14¾h to 16½h Double wave in N.F. (— 35, + 25). 20h to 21h Rounded wave in N.F. (+ 20). 21½h to 23h Wave in Dec. (— 4′).

18d 0h to 2½h Triple wave in Dec. (— 3′, + 4′, — 3′), followed till 3¼h by a wave (— 4′). 0h to 3h Irregular decrease in V.F. (— 26). 2¼h to 3½h Wave in N.F. (+ 35). 11¾h to 12½h Wave in N.F. (— 20). 17¼h to 18¾h Wave in N.F. (+ 32). 21½h to 22½h Waves in Dec. (— 8′) and N.F. (+ 42), both steep at commencement.

19d 17½h to 18¾h Wave in N.F. (+ 21). 19d 23h to 20d 4h Wave in V.F. (— 16).

20d 0½h to 3h Wave in Dec. (— 6′). 4½h to 6¼h Wave in N.F. (+ 23).

22d 21¾h to 22¼h Sharp wave in N.F. (— 23), followed till 22½h by a decrease (— 20), continued till 22¾h by a wave (— 20).

23d 5h to 5¼h Oscillatory increase in Dec. (+ 4′), followed till 6h by an oscillatory decrease (— 10′). 8h to 9h Wave in Dec. (— 5′). 12¾h to 13h Sharp wave in N.F. (+ 20). 13½h to 13¾h Wave in N.F. (— 20). 14h to 14½h Wave in N.F. (— 23). 14½h to 15¼h Wave in Dec. (+ 4′). 14¾h to 16¼h Double wave in N.F. (+ 28, — 44).

24d 2h to 2¾h Irregular wave in Dec. (+ 3′). 2½h to 3½h Decrease in V.F. (— 16).

25d 0h to 0¾h Wave in Dec. (+ 6′): small double wave in N.F. 0h to 3h Wave in V.F. (— 15), steep at commencement.

26d 0h to 2¾h Slow double wave in Dec. (+ 4′ — 3′). 0h to 1h Decrease in V.F. (— 12).

28d 11h to 29d 9¾h Loss of V.F. register.

August

1d 10¼h to 2d 10h Loss of V.F. register.

2d 2¾h to 4½h Irregular wave in Dec. (+ 5′). 3½h to 4h Irregular increase in N.F. (+ 30). 6d to 9h Decrease in N.F. (— 92), continued till 10¼h by a wave (— 40). 7¾h to 9h Irregular wave in Dec. (+ 5′). 11¼h to 12½h Wave in N.F. (+ 25). 15¾h to 16½h Wave in N.F. (+ 20). 18¾h Sudden decrease in N.F. (— 20), followed till 19¾h by a wave (+ 22). 21½h to 21¾h Decrease in Dec. (— 4′).

3d 1h to 2¼h Wave in Dec. (+ 3′). 14½h to 15h Steep wave in N.F. (+ 20). 16h Steep wave in N.F. (+ 21).

4d 22¼h to 22½h Wave in N.F. (+ 24).

1916.

August

5d 2¾h to 3¾h Wave in Dec. (+ 4′). 12h to 12¾h Wave in N.F. (+ 20). 15h to 17h Wave in Dec. (− 8′). 15h to 16¼h Double-crested wave in N.F. (+ 30). 17¾h to 19h Double-crested wave in N.F. (+ 24). 23h to 23¾h Wave in Dec. (− 3′). 5d 23¼h to 6d 0¾h Wave in N.F. (+ 45). 23½h to 24h Decrease in V.F. (− 16).

6d 2¼h to 2½h Sharp decrease in Dec. (− 6′). 3¾h to 5½h Truncated wave in N.F. (+ 40). 5¼h to 7h Wave in Dec. (+ 5′). 5¾h to 8h Truncated wave in N.F. (+ 50). 8¼h to 8½h Wave in Dec. (+ 4′). 11½h to 15½h Three successive waves in N.F. (− 35, − 42, − 55), the last two double-crested. 12¾h to 13h Sharp wave in Dec. (+ 6′). 12¾h to 13½h Increase in V.F. (+ 25). 17h to 19h Wave in V.F. (+ 19). 17½h to 17¾h Decrease in Dec. (− 6′). 17½h to 18h Increase in N.F. (+ 45). 20h to 21h Wave in Dec. (− 8′). 20½h to 21¼h Wave in N.F. (+ 30). 6h 23½h to 7d 1¼h Double-crested wave in Dec. (+ 6′).

7d 0h to 2h Decrease in V.F. (− 26), continued till 4h by a wave (− 14). 2h to 3h Wave in Dec. (− 3′). 2¼h to 4h Wave in N.F. (− 40). 9¾h to 10¾h Wave in N.F. (+ 23). 14½h to 15¾h Two successive waves in N.F. (+ 20, +20). 16¾h to 17½h Wave in N.F. (+ 27). 18h to 18¾h Wave in N.F. (+ 20). 20h to 21h Two successive waves in Dec. (− 3′, − 3′), and N.F. (− 20, − 20).

8d 1¼h to 2¼h Wave in Dec. (+ 5′). 1½h to 3h Decrease in V.F. (− 21). 2½h to 4h Wave in N.F. (− 35). 3¾h to 5¼h Wave in Dec. (− 5′). 9¼h to 10¼h Wave in N.F. (− 25). 12¾h to 14½h Irregular wave in N.F. (− 24). 14¾h to 15½h Wave in N.F. (+ 20), followed till 15¾h by a sharp decrease (− 45). 15h to 19h Slow wave in V.F. (+ 17). 15¼h to 16¼h Wave in Dec. (− 4′). 17½h to 18¼h Waves in Dec. (− 5′) and N.F. (+ 42). 8d 23¼h to 9d 0¼h Wave in Dec. (+ 5′), steep at commencement. 23½h to 24h Decrease in V.F. (− 12).

9d 0¾h to 2¼h Wave in N.F. (− 20). 13¾h to 14½h Wave in Dec. (+ 24′). 9d 23½h to 10d 0¾h Wave in Dec. (+ 5′).

11d 0½h to 1½h Wave in Dec. (+ 3′). 19¾h Very sharp wave in N.F. (+ 20). 20h to 21¼h Two successive waves in N.F. (+ 26, + 26), the first double-crested. 22½h to 23¼h Waves in Dec. (− 4′), and N.F. (+ 24).

12d 2¾h to 4h Rounded wave in Dec. (+ 5′).

13d 23h to 24h Double-crested wave in N.F. (+ 28).

14d 2¼h to 4h Wave in Dec. (+ 6′).

19d 16h to 17½h Irregular double wave in N.F. (− 20, + 25). 16½h to 22¾h Slow wave in V.F. (+ 32). 21½h to 23h Wave in Dec. (− 7′), followed till 23½h by a decrease (− 7′). 21¾h to 22¾h Wave in N.F. (+ 40).

20d 0h to 4¼h Wave in V.F. (− 26), followed till 6h by a wave (− 24). 0½h to 2¼h Two successive waves in Dec. (+ 4′, + 5′), the second double-crested. 0½h to 1¼h Double-crested Wave in N.F. (− 26). 3h to 3¾h Wave in Dec. (+ 3′), followed till 5¼h by a sharper wave (+ 8′). 4¼h to 6¼h wave in N.F. (+ 37). 16¼h to 17h Increase in N.F. (+ 35).

21d 17½h to 18½h Wave in N.F. (− 33). 18h to 18¾h Wave in Dec. (− 4′). 21d 23½h to 22d 3h Wave in V.F. (− 13).

22d 18½h Sudden increase in N.F. (+ 58): small sharp wave in Dec. 18¾h to 19¼h Decrease in Dec. (− 6′). 22d 18¾h to 23d 9¾h Loss of V.F. register. 19¾h to 20¾h Very sharp double wave in Dec. (− 26′, +16′), followed till 23h by an irregular double wave (+ 6′, − 7′), with waves superposed on the last movement (− 3′) at 21¾h and (− 4′) at 22½h. 19¾h to 20h Sharp decrease in N.F. (− 50′), followed till 20¾h by a very sharp double wave (+ 150, − 32). 21h to 22¾h Two successive irregular waves in N.F. (− 50, −40). 22d 23h to 23d 0¼h Irregular wave in N.F. (+ 26).

23d 0¾h to 2h Wave in Dec. (+ 11′). 1¼h to 2½h Wave in N.F. (− 25). 3¼h to 5½h Wave in N.F. (− 36). 16h to 18½h Two successive waves in N.F. (+38, + 80), the second double-crested. 17h to 19h Wave in Dec. (− 14′), the first portion steep, the rest irregular: wave in V.F. (+ 16). 21h to 21¾h Wave in Dec. (+ 4′), followed till 23h by two successive sharp waves (− 8′, − 8′), followed till 23¾h by a sharp double-crested wave (− 7′). 21h Very sharp wave in N.F. (− 27). 21¼h to 22h Wave in N.F. (− 23), followed till 22½h by two successive sharp waves (− 45, − 36). 22h Sharp decrease in V.F. (− 23), followed till 24h by a double-crested wave (− 18). 23h Sharp decrease in N.F. (− 35), followed till 23¾h by a wave (− 27).

24d 15¾h to 17h Wave in N.F. (+ 39). 21h to 21½h Wave in N.F. (+ 20).

25d 0½h to 26d 15h Loss of V.F. register.

26d 19h to 27d 19h. See Plate II.

27d 20½h to 21½h Double wave in N.F. (− 17, + 16). 20¾h to 22½h Two successive waves in Dec. (− 4′, − 3′).

28d 2h to 3½h Wave in N.F. (+ 21). 2¼h to 3¾h Wave in Dec. (− 4′). 21¾h to 22½h Wave in N.F. (+ 20).

29d 1h to 3½h Truncated wave in Dec. (+ 7′). 2h to 4h Wave in V.F. (− 19). 2½h to 4h Domed wave in N.F. (+ 37). 9¼h to 10h Wave in N.F. (− 23). 15½h to 18h Wave in V.F. (+ 21). 16¼h to 18h Wave in Dec. (− 11′), steep at commencement. 16¼h to 17½h Wave in N.F. (+ 28), with sharp wave (− 30) superposed from 16½h to 16¾h. 20h to 21½h Wave in Dec. (− 4′). 20h to 21¼h Wave in N.F. (+ 23). 22¼h to 23½h Wave in N.F. (+ 24). 22½h to 24h Wave in Dec. (− 5′).

30d 17¾h to 19h Wave in N.F. (− 21). 20½h to 22h Double wave in Dec. (− 4′, + 3′).

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September $2^d\ 13^h$ to $3^d\ 4^h$ Loss of V.F. register. $2^d\ 20\frac{3}{4}^h$ to 22^h Sharp wave in Dec. (— 12′), followed till $3^d\ 2\frac{1}{2}^h$ by a very irregular wave (— 13′). 21^h to $21\frac{1}{4}^h$ Very sharp wave in N.F. (+ 70), followed till 23^h by a wave (+ 21).

$3^d\ 0\frac{1}{2}^h$ to $1\frac{1}{4}^h$ Wave in N.F. (+ 24). $7\frac{1}{4}^h$ to $7\frac{3}{4}^h$ Decrease in N.F. (— 45). $12\frac{1}{4}^h$ to $13\frac{3}{4}^h$ Serrated wave in Dec. (+ 7′). 13^h to $15\frac{1}{2}^h$ Wave in V.F. (+ 18). $13\frac{1}{4}^h$ to 14^h Sharp wave in N.F. (— 50). $16\frac{1}{4}^h$ to $17\frac{1}{2}^h$ Double-crested wave in N.F. (— 30). $19\frac{1}{2}^h$ to 20^h Waves in Dec. (— 7′) and N.F. (+ 36). $21\frac{1}{2}^h$ to $22\frac{3}{4}^h$ Wave in Dec. (— 5′). $21\frac{3}{4}^h$ to $22\frac{1}{2}^h$ Wave in N.F. (+ 27).

$4^d\ 3\frac{3}{4}^h$ to 6^h Wave in N.F. (+ 37). $5\frac{1}{4}^h$ to $8\frac{3}{4}^h$ Wave in Dec. (+ 7′). $19\frac{3}{4}^h$ to $20\frac{1}{4}^h$ Sharp decrease in Dec. (— 16′), followed till $20\frac{1}{2}^h$ by a sharp increase (+ 9′). 21^h to $23\frac{1}{4}^h$ Sharp movements in Dec. (— 9′, + 8′, — 4′, + 13′, — 12′, + 3′, — 6′, + 3′, — 4′), and in N.F. (— 50, + 60, — 21, + 50, — 54, + 25, — 46, + 35, — 28). 21^h to 22^h Strongly serrated decrease in V.F. (— 42).

$5^d\ 0^h$ to $0\frac{3}{4}^h$ Irregular increase in Dec. (+ 14′), followed till 2^h by a wave (— 14′). 0^h to $1\frac{1}{2}^h$ Wave in V.F. (— 20), followed till 3^h by a double-crested wave (— 14). $0\frac{1}{4}^h$ to 1^h Sharp wave in N.F. (+ 55). $2\frac{3}{4}^h$ to $3\frac{1}{2}^h$ Wave in N.F. (+ 33). 4^h to $5\frac{1}{4}^h$ Wave in Dec. (+ 7′). $4\frac{1}{2}^h$ to $5\frac{3}{4}^h$ Wave in N.F. (+ 30). $5\frac{3}{4}^h$ to $7\frac{1}{4}^h$ Double-crested wave in Dec. (+ 5′). $6\frac{1}{4}^h$ to $9\frac{1}{4}^h$ Double wave in N.F. (+ 27, — 25). $5^d\ 20\frac{3}{4}^h$ to $6^d\ 9^h$ Loss of V.F. register.

$6^d\ 18^h$ to $19\frac{1}{4}^h$ Wave in Dec. (— 9′). $18\frac{1}{4}^h$ to $19\frac{1}{2}^h$ Wave in N.F. (+ 29). 22^h to 23^h Wave in Dec. (— 4′). $6^d\ 23\frac{3}{4}^h$ to $7^d\ 1^h$ Wave in Dec. (+ 5′).

$7^d\ 0^h$ to 2^h Wave in V.F. (— 12). 13^h to 14^h Wave in N.F. (+ 24). $17\frac{1}{2}^h$ to 18^h Wave in Dec. (— 4′), with very sharp peak: truncated wave in N.F. (+ 20), steep at both ends.

$8^d\ 10^h$ to $11\frac{1}{2}^h$ Wave in N.F. (— 36).

$9^d\ 16\frac{3}{4}^h$ to 18^h Wave in Dec. (— 3′). 17^h to $17\frac{1}{4}^h$ Increase in N.F. (+ 26).

$10^d\ 16^h$ to $16\frac{1}{2}^h$ Wave in N.F. (+ 28). $16\frac{3}{4}^h$ to $17\frac{3}{4}^h$ Wave in N.F. (+ 28). $22\frac{3}{4}^h$ to 24^h Irregular wave in Dec. (— 12′), steep at commencement. $10^d\ 22\frac{3}{4}^h$ to $11^d\ 0\frac{1}{2}^h$ Steep wave in N.F. (+ 100). $10^d\ 23^h$ to $11^d\ 2^h$ Wave in V.F. (— 24).

$11^d\ 3\frac{1}{2}^h$ to $4\frac{1}{2}^h$ Truncated wave in Dec. (+ 4′). 16^h to $17\frac{1}{2}^h$ Wave in N.F. (+ 50). $21\frac{1}{4}^h$ to 22^h Decrease in V.F. (— 18). $21\frac{1}{2}^h$ to 22^h Sharp decrease in Dec. (— 14′), followed till $22\frac{1}{4}^h$ by an increase (+ 5′), continued till $22\frac{3}{4}^h$ by a wave (+ 5′). $21\frac{1}{2}^h$ to $22\frac{3}{4}^h$ Irregular wave in N.F. (+ 66).

$12^d\ 0^h$ to $2\frac{1}{2}^h$ Wave in V.F. (— 20). $0\frac{1}{4}^h$ to 2^h Irregular double-crested wave in N.F. (+ 27). $0\frac{3}{4}^h$ to $1\frac{1}{2}^h$ Wave in Dec. (+ 5′). $2\frac{1}{4}^h$ to $3\frac{1}{4}^h$ Wave in Dec. (— 4′). $2\frac{1}{4}^h$ to 6^h Triple wave in N.F. (+ 30, — 40, + 35). $3\frac{3}{4}^h$ to 5^h Wave in Dec. (+ 8′), followed till 6^h by a smaller wave (+ 4′). $4\frac{1}{4}^h$ to 7^h Serrated wave in V.F. (— 16). $6\frac{3}{4}^h$ to 8^h Wave in Dec. (+ 5′). $15\frac{1}{2}^h$ to $17\frac{1}{2}^h$ Wave in Dec. (— 10′). $15\frac{1}{2}^h$ to 17^h Double wave in N.F. (— 26, + 36), the intermediate movement steep. $15\frac{3}{4}^h$ to 17^h Wave in V.F. (+ 13). $18\frac{3}{4}^h$ to $20\frac{1}{4}^h$ Quadruple wave in Dec. (— 4′, + 4′, — 9′, + 3′), followed till 21^h by a wave (+ 9′). $19\frac{1}{4}^h$ to $19\frac{1}{2}^h$ Decrease in N.F. (— 30), followed till $22\frac{3}{4}^h$ by an irregular triple wave (+ 98, — 23, + 24), the first portion very steep. $19\frac{3}{4}^h$ to $21\frac{1}{2}^h$ Irregular double-crested wave in V.F. (— 16). $12^d\ 22\frac{1}{2}^h$ to $13^d\ 1\frac{3}{4}^h$ Irregular wave in Dec. (+ 10′). $12^d\ 23\frac{3}{4}^h$ to $13^d\ 3^h$ Wave in V.F. (— 15).

$13^d\ 11\frac{1}{2}^h$ to $13\frac{1}{2}^h$ Wave in Dec. (+ 5′). $13\frac{1}{2}^h$ to 18^h Wave in V.F. (— 24).

$14^d\ 19\frac{1}{2}^h$ to $20\frac{1}{4}^h$ Wave in Dec. (— 4′).

$16^d\ 0^h$ to $1\frac{1}{4}^h$ Wave in Dec. (+ 3′). 4^h to 6^h Wave in N.F. (— 32). $4\frac{3}{4}^h$ to 6^h Wave in Dec. (+ 4′). $13\frac{1}{4}^h$ to $14\frac{1}{4}^h$ Wave in N.F. (— 30). 17^h to 18^h Wave in N.F. (— 32). $17\frac{1}{2}^h$ to 19^h Wave in Dec. (— 10′).

$17^d\ 0\frac{3}{4}^h$ to 2^h Wave in Dec. (+ 9′). 1^h to 2^h Decrease in V.F. (— 30). 4^h to $5\frac{1}{2}^h$ Wave in N.F. (— 22). $11\frac{3}{4}^h$ to $14\frac{3}{4}^h$ Loss of V.F. register. $13\frac{1}{2}^h$ to $15\frac{1}{4}^h$ Wave in N.F. (— 40). $16\frac{1}{2}^h$ to 17^h Wave in N.F. (+ 20). 17^h to 19^h Slow irregular wave in Dec. (— 7′). 22^h to $22\frac{1}{2}^h$ Sharp wave in Dec. (— 7′). $22\frac{1}{4}^h$ to $22\frac{3}{4}^h$ Wave in N.F. (+ 30).

$22^d\ 20\frac{3}{4}^h$ to 22^h Wave in N.F. (— 20).

$23^d\ 1^h$ to $1\frac{1}{2}^h$ Wave in Dec. (+ 4′). $23^d\ 17\frac{1}{2}^h$ to $24^d\ 10^h$ Loss of Dec. and N.F. registers.

$24^d\ 21\frac{3}{4}^h$ to $22\frac{1}{2}^h$ Waves in Dec. (— 3′) and N.F. (+ 29).

$25^d\ 15^h$ to 17^h Loss of Dec. and N.F. registers. $19\frac{3}{4}^h$ to $20\frac{1}{2}^h$ Wave in Dec. (— 4′). 20^h to $21\frac{1}{4}^h$ Truncated wave in N.F. (+ 21).

$26^d\ 0\frac{1}{4}^h$ to 1^h Wave in Dec. (— 4′), followed till $2\frac{1}{2}^h$ by a slower wave (— 3′). $0\frac{1}{2}^h$ to 2^h Wave in N.F. (+ 49). 1^h to 4^h Wave in V.F. (— 12). $19\frac{1}{2}^h$ to $21\frac{1}{2}^h$ Wave in Dec. (— 8′). $19\frac{3}{4}^h$ to $21\frac{1}{4}^h$ Truncated wave in N.F. (+ 23). $22\frac{1}{4}^h$ to $23\frac{3}{4}^h$ Two successive waves in N.F. (+ 26, + 35), followed till $27^d\ 1^h$ by a double wave (— 25, + 20). $22\frac{1}{2}^h$ to $23\frac{3}{4}^h$ Triple-crested wave in Dec. (+6′): decrease in V.F. (— 34).

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September 27^d 0^h to 1^h Wave in Dec. (— 7′), followed till 3$\frac{1}{2}^h$ by an irregular double wave (— 5′, + 5′), the first portion double-crested. 1$\frac{3}{4}^h$ to 3$\frac{1}{2}^h$ Wave in N.F. (— 50). 8^h to 11^h Wave in N.F. (— 45). 12$\frac{3}{4}^h$ to 13$\frac{1}{4}^h$ Wave in Dec. (+ 3′). 16$\frac{1}{2}^h$ to 18$\frac{3}{4}^h$ Double wave in N.F. (— 20, + 65). 16$\frac{3}{4}^h$ to 19^h Irregular wave in Dec. (— 15′). 20$\frac{3}{4}^h$ to 22^h Two successive waves in N.F. (+ 23, + 36).

30^d 11$\frac{1}{2}^h$ to 13$\frac{3}{4}^h$ Wave in N.F. (— 60). 15$\frac{3}{4}^h$ to 18$\frac{1}{4}^h$ Wave in Dec. (— 9′). 16$\frac{1}{2}^h$ to 18$\frac{1}{4}^h$ Wave in N.F. (+ 30) 20^h Sharp decrease in Dec. (— 7′). 21^h to 23$\frac{1}{4}^h$ Irregular double-crested wave in N.F. (+ 75). 21^h to 24^h Decrease in V.F. (— 45). 21$\frac{1}{4}^h$ to 22^h Wave in Dec. (— 6′). 23^h to 23$\frac{3}{4}^h$ Decrease in Dec. (— 9′), followed till October 1^d 0$\frac{1}{4}^h$ by a sharp increase (+ 15′).

October 1^d 0^h to 1$\frac{3}{4}^h$ Flat-crested wave in V.F. (— 19), followed till 3^h by a wave (— 21). 0$\frac{1}{4}^h$ to 1^h Wave in N.F. (— 30). 1^h to 1$\frac{1}{4}^h$ Decrease in Dec. (— 8′), followed till 1$\frac{3}{4}^h$ by a sharp increase (+ 21′), followed till 2$\frac{1}{2}^h$ by a slower decrease (— 7′), and till 3$\frac{1}{2}^h$ by a wave (+ 5′). 1$\frac{1}{4}^h$ to 1$\frac{3}{4}^h$ Wave in N.F. (+ 25). 4$\frac{1}{2}^h$ to 5$\frac{1}{4}^h$ Wave in N.F. (+ 24). 11$\frac{3}{4}^h$ to 14$\frac{1}{4}^h$ Increase in V.F. (+ 40). 13$\frac{3}{4}^h$ to 15$\frac{1}{4}^h$ Wave in Dec. (+ 8′). 14$\frac{1}{2}^h$ to 17$\frac{1}{2}^h$ Irregular quadruple wave in N.F. (— 36, + 24, — 20, + 20). 16$\frac{3}{4}^h$ to 17$\frac{1}{2}^h$ Wave in Dec. (— 5′). 18$\frac{1}{2}^h$ to 19^h Decrease in Dec. (— 6′). 18$\frac{3}{4}^h$ to 20^h Truncated wave in N.F. (+ 36), followed till 21$\frac{1}{4}^h$ by a double-crested wave (+ 25). 20^h to 21^h Sharp double-crested wave in Dec. (— 6′). 22$\frac{1}{2}^h$ to 23^h Decrease in V.F. (— 26). 23$\frac{1}{2}^h$ Sharp increase in Dec. (+ 6′). 1^d 23$\frac{1}{2}^h$ to 2^d 0$\frac{1}{4}^h$ Wave in N.F. (+ 43).

2^d 0^h to 1$\frac{1}{4}^h$ Double-crested wave in Dec. (— 5′). 1^h to 3^h Wave in N.F. (+ 27). 1$\frac{3}{4}^h$ to 5^h Slow irregular double wave in Dec. (— 4′, + 4′). 8$\frac{1}{4}^h$ to 9$\frac{1}{4}^h$ Wave in N.F. (— 30). 13$\frac{1}{2}^h$ to 14^h Wave in N.F. (— 20). 16^h to 19$\frac{1}{2}^h$ Irregular wave in Dec. (— 19′). 16$\frac{1}{4}^h$ to 18$\frac{1}{2}^h$ Two successive waves in N.F. (+ 27, + 51), the second truncated.

3^d 16$\frac{1}{4}^h$ to 17$\frac{1}{4}^h$ Wave in Dec. (— 8′). 16$\frac{1}{2}^h$ to 17$\frac{1}{2}^h$ Wave in N.F. (+ 34).

5^d 21^h to 22$\frac{1}{4}^h$ Wave in N.F. (+ 50), with sharp wave (+ 23) superposed at 21$\frac{3}{4}^h$. 21^h to 22^h Irregular decrease in V.F. (— 17). 23^h to 24^h Wave in N.F. (+ 40).

6^d 0$\frac{1}{2}^h$ to 1$\frac{1}{2}^h$ Wave in Dec. (+ 4′). 2^h to 4^h Waves in Dec. (+ 9′) and N.F. (— 40).

6^d 6^h to 8^d 6^h. See Plate III.

8^d 7$\frac{1}{2}^h$ to 10^h Irregular serrated wave in N.F. (— 36), followed till 13$\frac{3}{4}^h$ by a similar wave (— 50). 11^h to 13$\frac{1}{2}^h$ Wave in V.F. (+ 12), followed till 17^h by another wave (+ 24). 14^h to 15$\frac{1}{2}^h$ Irregular wave in Dec. (—9′). 14$\frac{1}{4}^h$ to 15$\frac{3}{4}^h$ Irregular wave in N.F. (+ 49). 17$\frac{1}{4}^h$ to 17$\frac{1}{2}^h$ Increase in N.F. (+ 24). 18^h to 18$\frac{1}{2}^h$ Sharp waves in Dec. (— 7′) and N.F. (+ 28). 19$\frac{1}{4}^h$ to 21^h Double wave in Dec. (— 5′, + 4′), the first portion truncated. 19$\frac{1}{4}^h$ to 20^h Truncated wave in N.F. (+ 33). 21$\frac{3}{4}^h$ to 22$\frac{1}{2}^h$ Waves in Dec. (+ 4′) and N.F. (+ 27). 22$\frac{3}{4}^h$ to 23$\frac{1}{4}^h$ Wave in Dec. (+ 3′).

9^d 14$\frac{1}{2}^h$ to 14$\frac{3}{4}^h$ Decrease in Dec. (— 5′) : increase in N.F. (+ 27). 14$\frac{1}{2}^h$ to 18$\frac{1}{2}^h$ Wave in V.F. (+ 20). 16^h to 17$\frac{1}{2}^h$ Irregular double wave in N.F. (— 25, + 48), the middle portion very steep. 16$\frac{1}{2}^h$ to 17$\frac{1}{4}^h$ Sharp wave in Dec. (— 11′). 19$\frac{1}{4}^h$ to 20^h Sharp waves in Dec. (— 7′) and N.F. (+ 55).

10^d 0^h to 1$\frac{1}{2}^h$ Double-crested wave in N.F. (+ 24). 0$\frac{1}{4}^h$ to 1^h Truncated wave in Dec. (+ 4′) : decrease in V.F. (— 12). 14$\frac{1}{2}^h$ to 15^h Decrease in Dec. (— 5′). 14$\frac{3}{4}^h$ to 15$\frac{1}{2}^h$ Increase in V.F. (+ 15). 19$\frac{3}{4}^h$ to 20$\frac{1}{4}^h$ Sharp wave in N.F. (+ 26). 10^d 23$\frac{1}{2}^h$ to 11^d 0$\frac{1}{2}^h$ Wave in N.F. (+ 23).

11^d 5^h Sharp increase in Dec. (+ 6′). 5$\frac{1}{4}^h$ to 5$\frac{3}{4}^h$ Increase in N.F. (+ 24) : irregular decrease in V.F. (— 14). 13^h to 19$\frac{1}{2}^h$ Irregular slow wave in V.F. (+ 30). 15$\frac{1}{4}^h$ to 17^h Double wave in N.F. (— 25, + 35), the middle portion very steep. 16^h to 18^h Wave in Dec. (— 10′), steep at commencement. 18$\frac{1}{2}^h$ to 20^h Sharp wave in Dec. (— 10′), with sharp waves (— 3′, — 3′) superposed at 19$\frac{1}{2}^h$ and 19$\frac{3}{4}^h$, followed till 20$\frac{1}{4}^h$ by another sharp wave (— 5′). 18$\frac{3}{4}^h$ to 20^h Sharp double-crested wave in N.F. (+ 55), followed till 20$\frac{1}{2}^h$ by a wave (+ 25).

12^d 1$\frac{3}{4}^h$ to 3$\frac{1}{4}^h$ Truncated wave in Dec. (+ 6′). 1$\frac{3}{4}^h$ to 3$\frac{1}{2}^h$ Double wave in N.F. (— 25, + 21). 2^h to 3^h Decrease in V.F. (— 12). 11$\frac{1}{4}^h$ to 12$\frac{3}{4}^h$ Loss of Dec. and N.F. registers. 14$\frac{1}{4}^h$ to 15$\frac{1}{4}^h$ Loss of Dec. and N.F. registers. 15^h to 20^h Wave in V.F. (+ 45). 17^h to 18$\frac{1}{4}^h$ Irregular double-crested wave in Dec. (— 10′). 17$\frac{1}{2}^h$ Sharp increase in N.F. (+ 35), followed till 19$\frac{1}{2}^h$ by a serrated wave (— 40). 12^d 22$\frac{1}{2}^h$ to 13^d 0$\frac{3}{4}^h$ Double-crested wave in Dec. (— 9′). 12^d 22$\frac{3}{4}^h$ to 13^d 0$\frac{1}{2}^h$ Double-crested wave in N.F. (+ 45). 22$\frac{3}{4}^h$ to 24^h Decrease in V.F. (— 20).

13^d 0^h to 5^h Slow wave in V.F. (+ 13). 3$\frac{1}{4}^h$ to 5$\frac{1}{2}^h$ Wave in Dec. (+ 9′). 4^h to 8$\frac{1}{4}^h$ Flat-crested wave in N.F. (+ 40). 14^h to 20^h Irregular wave in V.F. (+ 36). 14$\frac{3}{4}^h$ to 15$\frac{3}{4}^h$ Loss of Dec. and N.F. registers. 15$\frac{3}{4}^h$ to 17$\frac{1}{2}^h$ Two successive irregular waves in N.F. (— 28, — 33), followed till 19^h by an irregular decrease (— 40). 16$\frac{1}{2}^h$ to 18^h Two successive waves in Dec. (— 3′, — 6′). 19^h to 19$\frac{3}{4}^h$ Sharp double-crested wave in Dec. (— 9′), followed till 20^h by a sharp decrease (— 14′), followed till 21^h by another sharp double-crested wave (+ 15′). 19^h to 20$\frac{3}{4}^h$ Two successive irregular double-crested waves in N.F. (+ 60, + 75), followed till 21^h by an increase (+ 30). 20^h to 21^h Wave in V.F. (— 14), followed till 24^h by a truncated wave (— 35). 22^h to 23^h Very sharp double-crested waves in Dec. (— 19′), and N.F. (+ 80).

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14d 3h to 4h Wave in Dec. (+ 4′) : in N.F. small. 7½h to 8¼h Decrease in N.F. (— 50). 7¾h to 8½h Increase in Dec. (+ 7′). 8½h to 9¼h Waves in Dec. (— 6′) and N.F. (+ 28), very sharp at 8¾h. 11h to 12½h Wave in N.F. (— 24).

15d 2¼h to 3¾h Wave in Dec. (+ 3′).

16d 18¼h to 18d 10½h Loss of V.F. register.

20d 11¾h to 12¼h Sharp waves in Dec. (+ 8′) and N.F. (+ 25).

21d 5h to 6½h Rounded wave in N.F. (+ 20). 11¼h to 12h Wave in Dec. (+ 6′). 14h to 14¼h Wave in Dec. (+ 4′). 14h to 15h Wave in N.F. (— 37). 16¾h to 17¾h Rounded waves in Dec. (+ 3′) and N.F. (— 24). 20¾h to 22¼h Triple-crested wave in Dec. (— 8′) : double-crested wave in N.F. (+ 35).

22d 4¾h to 6¼h Wave in N.F. (— 30). 5h to 6½h Double-crested wave in Dec. (+ 6′). 11¾h to 13½h Two successive waves in Dec. (+ 5′, + 4′). 18¾h to 20h Wave in Dec. (— 11′), the second movement irregular. 19h to 20¼h Double-crested wave in N.F. (+ 34). 21¾h Sharp increase in N.F. (+ 25). 23¾h to 24h Increase in Dec. (+ 6′). 22d 23¾h to 23d 1h Irregular wave in N.F. (+ 22).

23d 0h to 4h Wave in V.F. (— 17), the first portion irregular. 0½h to 1½h Double wave in Dec. (— 4′, + 4′). 14¼h to 16¼h Loss of Dec. and N.F. registers. 16¼h to 17¼h Increase in Dec. (+ 8′). 20h to 21h Wave in N.F. (+ 25). 20¼h to 21h Wave in Dec. (+ 4′).

24d 12h to 13h Double-crested wave in Dec. (+ 4′). 12¾h to 14h Wave in N.F. (— 30). 19¼h to 20¾h Wave in Dec. (— 9′), followed till 21¾h by a smaller wave (— 4′). 19½h to 20¼h Wave in N.F. (+ 22). 21¾h to 23¾h Wave in V.F. (— 14). 22¼h to 23¼h Wave in N.F. (+ 45), very steep at commencement.

25d 4h to 5h Wave in Dec. (+ 4′). 11½h to 13h Wave in N.F. (— 30). 18½h to 19½h Wave in Dec. (— 4′).

26d 21½h to 22h Decrease in Dec. (— 4′). 26d 23¾h to 27d 1½h Wave in N.F. (— 23).

28d 19¼h to 29d 19¼h Loss of Dec. and N.F. registers.

29d 6h to 10¼h Loss of V.F. register. 20¾h to 21½h Sharp waves in Dec. (— 7′) and N.F. (+ 50) : decrease in V.F. (— 18).

30d 6½h to 14h Loss of Dec. and N.F. registers.

31d 0¾h to 1¼h Wave in Dec. (+ 3′). 1½h to 2¾h Wave in Dec. (— 3′).

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1d 0¼h to 0¾h Wave in Dec. (+ 5′), steep at commencement. 21½h to 24h Double wave in Dec. (— 8′, + 4′). 21½h to 22½h Wave in N.F. (+ 20).

2d 19¾h to 21¼h Sharp wave in Dec. (— 13′) : irregular wave in N.F. (+ 43). 21¾h to 23½h Wave in Dec. (— 10′). 11½h Very sharp wave in Dec. (+ 3′). 11½h to 12h Wave in N.F. (— 23). 12h to 12½h Truncated wave in Dec. (+ 4′). 13h to 13¾h Wave in Dec. (+ 5′). 13¼h to 15¼h Irregular double wave in N.F. (— 25, + 30), followed till 15½h by an increase (+ 20). 13¾h to 16½h Wave in V.F. (+ 20). 14h to 15½h Two successive irregular waves in Dec. (— 8′, — 3′). 22h to 22¾h Wave in N.F. (+ 20). 2d 22h to 3d 5h Flat-crested wave in V.F. (— 24). 2d 23¾h to 3d 0¾h Wave in Dec. (+ 5′).

3d 0¾h to 1¼h Wave in Dec. (+ 3′), followed till 3¾h by a slow wave (+ 9′). 0¾h to 1¾h Wave in N.F. (— 20). 10h to 13h Flat-crested wave in N.F. (— 35). 11½h to 12¼h Wave in Dec. (+ 4′). 18¾h to 19¼h Sharp decrease in Dec. (— 19′), followed till 19½h by a sharp increase (+ 10′). 18¾h to 20h Sharp wave in N.F. (+ 80), followed till 20¾h by a double wave (+ 19, — 21). 19¾h to 20½h Two successive sharp waves in Dec. (+ 7′, + 8′). 21h to 22¼h Double wave in Dec. (+ 4′, — 5′). 21¾h to 22¼h Sharp wave in N.F. (+ 42). 22¼h to 24h Double-crested wave in V.F. (— 25). 22½h to 23½h Sharp triple wave in Dec. (— 3′, + 4′, — 6′) : irregular double-crested wave in N.F. (+ 30).

5d 7½h to 8¾h Wave in N.F. (— 35). 10¾h to 11¼h Wave in Dec. (— 4′). 11¼h to 13h Serrated wave in N.F. (— 40). 15½h to 16¼h Wave in N.F. (— 32). 15¾h to 16¾h Wave in Dec. (— 6′). 18¼h to 19¾h Sharp wave in Dec. (— 22′), with irregular return. 18¼h to 19½h Sharp wave in N.F. (+ 90), with pause from 18¾h to 19h on return. 21h to 22¼h Waves in Dec. (— 8′) and N.F. (+48). 5d 23h to 6d 0¼h Two successive waves in Dec. (+ 7′, + 5′). 5d 23h to 6d 1¼h Double wave in N.F. (+ 45, — 30), the first portion irregular, the second sharper. 5d 23¼h to 6d 0¾h Irregular decrease in V.F. (— 32).

6d 1h to 1¾h Wave in Dec. (— 3′). 15¾h to 17½h Sharp wave in Dec. (— 22′). 15¾h to 17h Sharp double wave in N.F. (— 35, + 52). 16h to 17¼h Wave in V.F. (+ 15). 19¾h to 21½h Sextuple wave in Dec. (+ 3′, — 3′, + 3′, — 7′, + 6′, —5,′ + 3′). 20h to 23h Irregular wave in V.F. (— 22). 20¼h to 21h Two successive sharp waves in N.F. (+ 40, + 50), followed till 22¼h by a slower wave (+ 27). 6d 22½h to 7d 0¼h Two successive waves in Dec. (+ 5′, + 6′).

7d 14¼h to 16h Serrated wave in Dec. (— 6′). 14¾h to 15¼h Wave in N.F. (+ 20). 16¾h to 17¼h Wave in Dec. (— 3′). 17h Sharp increase in N.F. (+ 22).

8d 0h to 0¾h Wave in Dec. (+ 4′). 14¾h to 16h Truncated wave in N.F. (— 21). 15h to 16½h Flat-crested wave in Dec. (— 4′). 17¼h to 18½h Sharp wave in Dec. (— 10′). 17½h to 18½h Irregular wave in N.F. (+ 38). 21¾h to 24h Two successive waves in Dec. (— 5′, — 3′), the first movement irregular. 22¾h to 23½h Wave in N.F. (— 21).

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November 9^d 17^h to 18^h Wave in N.F. (— 30). 17$\frac{1}{4}^h$ to 19$\frac{1}{4}^h$ Irregular wave in Dec. (— 10′). 22$\frac{1}{4}^h$ to 23^h Sharp wave in Dec. (— 9′). 22$\frac{1}{2}^h$ to 23$\frac{3}{4}^h$ Sharp wave in N.F. (+ 70).

10^d 0^h to 1^h Wave in Dec. (+ 4′). 5$\frac{1}{2}^h$ to 6$\frac{1}{2}^h$ Domed wave in N.F. (— 23).

11^d 18$\frac{1}{2}^h$ to 19$\frac{1}{2}^h$ Sharp wave in Dec. (— 10′). 18$\frac{3}{4}^h$ to 20^h Wave in N.F. (+ 40). 23$\frac{1}{4}^h$ to 23$\frac{1}{2}^h$ Sharp decrease in Dec. (— 7′). 11^d 23$\frac{1}{4}^h$ to 12^d 0$\frac{1}{4}^h$ Wave in N.F. (+ 30). 23$\frac{1}{4}^h$ to 23$\frac{3}{4}^h$ Irregular decrease in V.F. (— 15).

12^d 3^h to 4^h Wave in Dec. (— 4′). 12$\frac{1}{2}^h$ to 14$\frac{1}{4}^h$ Serrated double wave in N.F. (+ 35, — 45), followed till 15^h by a serrated wave (— 23). 13^h to 14^h Serrated truncated wave in Dec. (+ 6′), followed till 14$\frac{1}{2}^h$ by a serrated wave (+ 8′). 17^h to 20^h Serrated wave in V.F. (— 20), followed till 21^h by a sharper wave (+ 12), and by sharp fluctuations till 22^h. 18^h to 19$\frac{3}{4}^h$ Wave in Dec. (+ 12′), with very sharp fluctuations superposed. 18^h to 18$\frac{3}{4}^h$ Truncated wave in N.F. (+ 30), with superposed fluctuations, followed till 19$\frac{1}{4}^h$ by a very sharp double wave (+ 55, — 40) with sharp superposed fluctuations, followed till 20^h by four successive sharp waves (— 42, — 57, — 30, — 52) with sharp superposed fluctuations. 20^h to 21$\frac{1}{4}^h$ Decrease in Dec. (— 7′), with sharp superposed fluctuations: wave in N.F. (— 30), with sharp superposed fluctuations, followed till 22$\frac{1}{4}^h$ by a sharp wave (— 40) with superposed fluctuations. 23^h to 23$\frac{1}{2}^h$ Sharp wave in Dec. (+ 9′). 23^h to 23$\frac{1}{4}^h$ Sharp wave in N.F. (+ 32). 23^h to 23$\frac{3}{4}^h$ Wave in V.F. (— 12). 12^d 23$\frac{1}{2}^h$ to 13^d 0$\frac{1}{2}^h$ Truncated wave in N.F. (+ 40), followed till 13^d 1$\frac{1}{2}^h$ by an irregular wave (+ 23). 12^d 23$\frac{3}{4}^h$ to 13^d 0$\frac{1}{4}^h$ Wave in Dec. (— 4′).

13^d 0$\frac{3}{4}^h$ to 1$\frac{3}{4}^h$ Double-crested wave in Dec. (+ 5′).

14^d 19^h to 20^h Irregular wave in Dec. (— 4′). 19^h to 20$\frac{1}{4}^h$ Truncated wave in N.F. (+ 43).

15^d 1^h to 2$\frac{1}{2}^h$ Wave in Dec. (+ 7′). 1$\frac{1}{2}^h$ Sharp increase in N.F. (+ 20). 1$\frac{3}{4}^h$ to 2$\frac{1}{4}^h$ Decrease in V.F. (— 13). 12$\frac{1}{4}^h$ to 13^h Wave in N.F. (— 30). 22$\frac{3}{4}^h$ to 23$\frac{3}{4}^h$ Wave in N.F. (+ 28).

16^d 15$\frac{3}{4}^h$ to 16^h Decrease in Dec. (— 5′). 19$\frac{1}{2}^h$ to 20$\frac{1}{2}^h$ Wave in Dec. (— 6′). 19$\frac{3}{4}^h$ to 21$\frac{1}{4}^h$ Wave in N.F. (+ 46′), steep at commencement.

17^d 17$\frac{1}{4}^h$ to 18^d 6$\frac{3}{4}^h$ Loss of V.F. register. 22^h to 24^h Irregular double-crested wave in Dec. (— 7′). 23$\frac{1}{2}^h$ to 24^h Wave in N.F. (+ 20).

18^d 11$\frac{3}{4}^h$ to 13^h Rounded wave in Dec. (— 3′). 22^h to 24^h Wave in Dec. (— 12′), steep at commencement. 22$\frac{1}{4}^h$ to 23$\frac{1}{2}^h$ Wave in N.F. (+ 50), steep at commencement.

19^d 19$\frac{1}{4}^h$ to 20$\frac{1}{2}^h$ Double-crested wave in Dec. (— 6′). 19$\frac{1}{2}^h$ to 20^h Sharp increase in N.F. (+ 50), with slower partial return (— 27).

20^d 23^h to 24^h Wave in Dec. (+ 4′).

21^d 17^h to 18$\frac{1}{2}^h$ Two successive waves in Dec. (— 3′, — 3′). 18^h Sharp increase in N.F. (+ 24).

22^d 0$\frac{1}{2}^h$ to 1$\frac{1}{2}^h$ Decrease in N.F. (— 27). 1^h to 1$\frac{3}{4}^h$ Increase in Dec. (+ 5′). 8^h to 9$\frac{1}{2}^h$ Wave in N.F. (— 38). 8$\frac{1}{4}^h$ to 9$\frac{1}{2}^h$ Wave in Dec. (+ 6′).

23^d 17^h to 18$\frac{1}{4}^h$ Wave in Dec. (— 5′). 17^h to 19^h Double-crested wave in N.F. (+ 23). 18$\frac{1}{2}^h$ to 20$\frac{1}{2}^h$ Irregular wave in Dec. (— 5′). 19^h to 19$\frac{1}{2}^h$ Increase in N.F. (+ 20). 21$\frac{3}{4}^h$ to 22^h Decrease in Dec. (— 5′), followed till 23$\frac{1}{2}^h$ by a wave (+ 6′).

25^d 15$\frac{1}{2}^h$ to 17$\frac{1}{4}^h$ Wave in N.F. (— 24). 20$\frac{1}{4}^h$ to 21^h Wave in N.F. (+ 30), followed till 23$\frac{1}{2}^h$ by a larger wave (+ 80). 21^h to 21$\frac{1}{2}^h$ Decrease in Dec. (— 7′). 21$\frac{3}{4}^h$ to 24^h Sharp wave in Dec. (— 16′).

26^d 0^h to 0$\frac{1}{2}^h$ Increase in Dec. (+ 6′). 17$\frac{1}{4}^h$ to 18^h Sharp wave in Dec. (— 6′), followed till 18$\frac{1}{2}^h$ by a decrease (— 4′). 17$\frac{1}{2}^h$ to 19$\frac{1}{2}^h$ Irregular double-crested wave in N.F. (+ 33), the second crest truncated, followed till 21^h by a wave (+ 37). 19$\frac{1}{2}^h$ to 20$\frac{1}{2}^h$ Wave in Dec. (— 7′). 22^h to 24^h Wave in Dec. (— 4′). 22$\frac{1}{2}^h$ Sudden increase in N.F. (+ 27), followed by an irregular return till 23^h.

27^d 0^h to 0$\frac{1}{2}^h$ Decrease in Dec. (— 5′), followed till 2$\frac{1}{4}^h$ by an irregular double-crested wave (+ 11′). 0$\frac{1}{2}^h$ to 1$\frac{1}{4}^h$ Serrated wave in N.F. (+ 20). 0$\frac{3}{4}^h$ to 3^h Irregular truncated wave in V.F. (— 21). 4$\frac{1}{4}^h$ to 4$\frac{1}{2}^h$ Increase in N.F. (+ 22). 15$\frac{3}{4}^h$ Sudden decrease in Dec. (— 27). 17$\frac{3}{4}^h$ to 19$\frac{1}{4}^h$ Truncated wave in Dec. (— 9′): wave in N.F. (+ 46). 22^h to 23^h Irregular decrease in Dec. (— 5′), followed till 28^d 0$\frac{1}{4}^h$ by a sharp wave (— 11′). 22$\frac{3}{4}^h$ to 24^h Irregular wave in N.F. (+ 33).

28^d 0^h to 1$\frac{1}{4}^h$ Irregular decrease in V.F. (— 25). 0$\frac{3}{4}^h$ to 1^h Increase in Dec. (+ 7′). 1^h to 1$\frac{1}{2}^h$ Wave in N.F. (— 24). 3^h to 4$\frac{1}{2}^h$ Wave in N.F. (+ 24). 21^h to 21$\frac{1}{2}^h$ Decrease in Dec. (— 5′), followed till 23$\frac{3}{4}^h$ by two successive waves (+ 5′, + 6′). 21^h to 22$\frac{1}{2}^h$ Irregular wave in N.F. (+ 42), followed till 23$\frac{1}{2}^h$ by a wave (+ 22).

29^d 16^h Sharp increase in Dec. (— 5′): increase in N.F. (+ 26). 16$\frac{1}{4}^h$ to 17$\frac{1}{4}^h$ Double-crested wave in Dec. (— 5′). 18^h to 19^h Wave in Dec. (+ 3′). 18$\frac{1}{2}^h$ to 19^h Wave in N.F. (— 23). 19$\frac{1}{4}^h$ to 20$\frac{1}{2}^h$ Irregular decrease in V.F. (— 28), followed till 21^h by an increase (+ 12). 19$\frac{1}{2}^h$ to 20$\frac{3}{4}^h$ Irregular double wave in Dec. (+ 6′, — 5′). 19$\frac{3}{4}^h$ to 20$\frac{1}{2}^h$ Sharp double-crested wave in N.F. (+ 36). 23^h to 23$\frac{1}{2}^h$ Increase in Dec. (+ 5′). 29^d 23$\frac{1}{2}^h$ to 30^d 0$\frac{1}{4}^h$ Wave in N.F. (+ 23).

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November 30^d $2\frac{1}{2}^h$ to $3\frac{1}{2}^h$ Wave in Dec. (+ 4′). $12\frac{3}{4}^h$ to 14^h Irregular wave in Dec. (− 5′). $13\frac{1}{4}^h$ to 16^h Three successive waves in N.F. (+ 20, + 28, + 20), the first slow. $14\frac{1}{2}^h$ to 16^h Double wave in Dec. (+ 3′, − 5′), the second portion double-crested. 19^h to $19\frac{1}{2}^h$ Wave in Dec. (− 5′) : increase in N.F. (+ 24). 21^h to 23^h Wave in Dec. (− 15′), steep at commencement. $21\frac{1}{4}^h$ to $22\frac{1}{4}^h$ Wave in N.F. (+ 43), steep at commencement.

December 1^d 2^h to $2\frac{1}{2}^h$ Increase in Dec. (+ 6′). $7\frac{1}{2}^h$ to 8^h Decrease in N.F. (− 36). 8^h to $8\frac{1}{2}^h$ Increase in Dec. (+ 5′). $11\frac{3}{4}^h$ to $13\frac{1}{2}^h$ Truncated wave in Dec. (+ 5′), with wave (− 5′) superposed from $12\frac{1}{2}^h$ to 13^h. 12^h to 14^h Wave in N.F. (− 48), with wave (+ 30) superposed from $12\frac{3}{4}^h$ to $13\frac{1}{4}^h$. 12^h to $14\frac{1}{2}^h$ Wave in V.F. (+ 12), followed till $18\frac{3}{4}^h$ by a slow double-crested wave (+ 20). $14\frac{1}{2}^h$ to $15\frac{1}{2}^h$ Wave in N.F. (+ 28), followed till $17\frac{1}{2}^h$ by a serrated wave (+ 45), followed till $19\frac{1}{2}^h$ by an irregular triple-crested wave (+ 63). $15\frac{1}{2}^h$ to 17^h Wave in Dec. (− 13′), followed till $19\frac{3}{4}^h$ by a succession of irregular waves (− 4′, − 6′, − 3′, − 6′, − 3′). 19^h to 22^h Irregular decrease in V.F. (− 26). $20\frac{1}{4}^h$ to $21\frac{1}{4}^h$ Double-crested wave in Dec. (− 8′) : wave in N.F. (+ 39). $20\frac{1}{2}^h$ to 22^h Double wave in Dec. (+ 4′, − 4′), the second portion double-crested.

2^d 0^h Sharp increase in Dec. (+ 10′), followed till $0\frac{1}{2}^h$ by slower partial return (− 5′). 0^h to $0\frac{3}{4}^h$ Wave in N.F. (− 20). $1\frac{1}{4}^h$ to $3\frac{1}{4}^h$ Wave in V.F. (+ 12). $2\frac{3}{4}^h$ to $3\frac{1}{4}^h$ Wave in Dec. (+ 7′). 3^h to $3\frac{1}{2}^h$ Wave in N.F. (− 22). $8\frac{1}{2}^h$ to $9\frac{1}{4}^h$ Serrated wave in Dec. (− 4′). $9\frac{1}{2}^h$ to $11\frac{1}{2}^h$ Wave in N.F. (− 30). $13\frac{1}{2}^h$ to $15\frac{1}{4}^h$ Irregular wave in Dec. (− 10′). 14^h to $14\frac{1}{2}^h$ Increase in N.F. (+ 32). 17^h to $18\frac{1}{4}^h$ Wave in Dec. (− 12′). 17^h to 19^h Double wave in N.F. (− 22, + 38). 19^h to $20\frac{1}{2}^h$ Irregular double-crested wave in Dec. (− 10′), followed till $21\frac{3}{4}^h$ by two successive sharp waves (− 6′, − 6′). $19\frac{1}{2}^h$ to 22^h Three successive waves in N.F. (+ 40, + 40, + 23).

3^d 0^h to $2\frac{1}{2}^h$ Wave in V.F. (− 20). 1^h to $3\frac{1}{2}^h$ Irregular double wave in Dec. (+ 4′, − 4′). 2^h to $3\frac{1}{2}^h$ Wave in N.F. (+ 30). $7\frac{3}{4}^h$ to $9\frac{1}{2}^h$ Wave in N.F. (− 40). $13\frac{1}{2}^h$ to $14\frac{1}{2}^h$ Wave in N.F. (− 55). $13\frac{3}{4}^h$ to 14^h Decrease in Dec. (− 7′). 21^h to 22^h Double wave in Dec. (− 5′, + 4′), followed till $23\frac{1}{2}^h$ by another double wave (+ 4′, − 3′). 21^h to 23^h Wave in N.F. (+ 30), with sharper wave (+ 54) superposed from 21^h to $21\frac{3}{4}^h$.

4^d 0^h to 3^h Wave in V.F. (− 16). $0\frac{3}{4}^h$ to $2\frac{1}{4}^h$ Rounded wave in N.F. (+ 23). 1^h to 2^h Wave in Dec. (− 3′). $15\frac{1}{2}^h$ to 17^h Irregular wave in Dec. (− 6′). $15\frac{1}{2}^h$ to $16\frac{3}{4}^h$ Wave in N.F. (+ 25). 18^h to $19\frac{1}{2}^h$ Wave in Dec. (− 4′).

5^d $18\frac{3}{4}^h$ to $20\frac{1}{4}^h$ Double-crested wave in Dec. (− 5′). 5^d 23^h to 6^d $0\frac{1}{2}^h$ Wave in N.F. (+ 27).

6^d 21^h to $22\frac{1}{4}^h$ Rounded wave in Dec. (− 4′) : wave in N.F. (+ 27).

7^d $19\frac{1}{4}^h$ to $19\frac{3}{4}^h$ Wave in Dec. (+ 4′). $19\frac{1}{2}^h$ to $20\frac{1}{4}^h$ Wave in N.F. (+ 25).

8^d $5\frac{1}{4}^h$ to $6\frac{1}{2}^h$ Wave in Dec. (+ 5′). $5\frac{1}{2}^h$ to $7\frac{1}{4}^h$ Wave in N.F. (+ 30). 8^d 19^h to 9^d $10\frac{3}{4}^h$ Loss of V.F. register.

9^d $1\frac{1}{4}^h$ to 2^h Wave in Dec. (+ 3′). $16\frac{1}{4}^h$ to 18^h Double wave in N.F. (− 20, + 23). $16\frac{3}{4}^h$ to $17\frac{3}{4}^h$ Wave in Dec. (− 8′).

10^d 3^h to $4\frac{1}{2}^h$ Flat-crested wave in Dec. (+ 4′).

12^d $2\frac{1}{4}^h$ to $4\frac{1}{4}^h$ Double wave in Dec. (+ 8′, − 3′). 21^h to $22\frac{1}{2}^h$ Wave in N.F. (+ 49).

13^d 0^h to 1^h Wave in Dec. (+ 5′). $2\frac{1}{2}^h$ to $3\frac{1}{2}^h$ Waves in Dec. (− 5′) and N.F. (+ 35).

14^d $22\frac{1}{2}^h$ to $23\frac{1}{2}^h$ Wave in N.F. (+ 33).

15^d $4\frac{1}{2}^h$ to $6\frac{1}{4}^h$ Truncated wave in Dec. (+ 7′). 5^h to 7^h Waves in N.F. (+ 24) and V.F. (− 12). 13^h to $15\frac{1}{2}^h$ Rounded wave in N.F. (+ 40). $15\frac{1}{2}^h$ to $16\frac{3}{4}^h$ Truncated wave in Dec. (− 9′). 16^h to 17^h Wave in N.F. (+ 30). $19\frac{1}{2}^h$ to $19\frac{3}{4}^h$ Steep decrease in Dec. (− 17′). $19\frac{3}{4}^h$ to $21\frac{1}{4}^h$ Steep wave in N.F. (+ 88). 20^h to $20\frac{1}{2}^h$ Wave in Dec. (− 5′), continued till $21\frac{1}{4}^h$ by a sharp increase (+ 11′).

16^d 1^h to $1\frac{1}{2}^h$ Wave in Dec. (− 4′). 1^h to 2^h Wave in N.F. (+ 34). 14^h to 15^h. Wave in N.F. (− 24). $14\frac{1}{2}^h$ Sharp decrease in Dec. (− 5′). $17\frac{1}{2}^h$ to $18\frac{1}{4}^h$ Wave in Dec. (− 4′). 16^d 23^h to 17^d $0\frac{1}{4}^h$ Flat-crested wave in N.F. (− 20).

17^d 17^h to $18\frac{1}{4}^h$ Wave in Dec. (− 9′). $17\frac{1}{4}^h$ to $18\frac{1}{2}^h$ Truncated wave in N.F. (+ 32). 20^h to $21\frac{1}{4}^h$ Wave in Dec. (− 7′). $20\frac{1}{4}^h$ to 21^h Wave in N.F. (+ 22).

18^d $22\frac{1}{2}^h$ to $23\frac{1}{2}^h$ Sharp waves in Dec. (− 9′) and N.F. (+ 37).

19^d $20\frac{3}{4}^h$ to $22\frac{1}{2}^h$ Irregular wave in Dec. (− 5′).

24^d $18\frac{1}{2}^h$ to $19\frac{1}{2}^h$ Wave in Dec. (− 4′).

25^d $18\frac{1}{4}^h$ to 19^h Wave in Dec. (+ 4′). 25^d $18\frac{1}{2}^h$ to 26^d $10\frac{1}{2}^h$ Loss of V.F. register. 20^h to $20\frac{3}{4}^h$ Truncated wave in Dec. (+ 4′). 20^h to $21\frac{1}{4}^h$ Wave in N.F. (− 30).

26^d $21\frac{1}{4}^h$ to $21\frac{3}{4}^h$ Wave in Dec. (− 3′). 26^d $23\frac{3}{4}^h$ to 27^d $0\frac{1}{4}^h$ Wave in Dec. (+ 4′) : in N.F. small.

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December 27^d $14\frac{1}{2}^h$ to $15\frac{1}{2}^h$ Irregular wave in Dec. (+ 5′). $14\frac{1}{2}^h$ to $15\frac{3}{4}^h$ Increase in V.F. (+ 20). $14\frac{3}{4}^h$ to 15^h Sharp decrease in N.F. (— 40). 16^h to $17\frac{1}{4}^h$ Irregular flat-crested wave in Dec. (+ 4′).

28^d 1^h to 2^h Waves in Dec. (+ 5′) and N.F. (— 22). $3\frac{1}{2}^h$ to $4\frac{1}{2}^h$ Wave in Dec. (+ 6′). $12\frac{3}{4}^h$ to $13\frac{3}{4}^h$ Rounded wave in N.F. (— 20). $20\frac{1}{2}^h$ to 21^h Sharp wave in Dec. (— 6′), followed till 22^h by a double wave (— 3′, + 5′). $20\frac{1}{2}^h$ to $21\frac{3}{4}^h$ Truncated wave in N.F. (+ 50). 28^d $23\frac{1}{2}^h$ to 29^d $0\frac{1}{2}^h$ Wave in N.F. (+ 22).

29^d $1\frac{1}{4}^h$ to $3\frac{1}{4}^h$ Slow irregular wave in Dec. (— 7′). $21\frac{1}{4}^h$ to $22\frac{1}{2}^h$ Domed wave in N.F. (— 24). $22\frac{1}{4}^h$ to $22\frac{3}{4}^h$ Wave in Dec. (+ 3′).

30^d 18^h to 19^h Wave in Dec. (— 4′). 20^h to $21\frac{1}{2}^h$ Wave in Dec. (— 12′). $20\frac{3}{4}^h$ Sharp increase in N.F. (+ 45), followed till $22\frac{1}{4}^h$ by irregular slow return.

31^d 1^h to 3^h Wave in Dec. (— 6′). $17\frac{1}{2}^h$ to 18^h Waves in Dec. (— 5′) and N.F. (+ 20). 21^h to $23\frac{1}{2}^h$ Waves in Dec. (— 13′) and N.F. (+ 48).

Explanation of the Plates.

The magnetic motions figured on the Plates are those for days of disturbance selected by the International Commitee—January $11^d\ 4^h$ to $12^d\ 4^h$; March $8^d\ 6^h$ to $10^d\ 6^h$; April $25^d\ 3^h$ to $26^d\ 3^h$; April $28^d\ 11^h$ to $29^d\ 11^h$; August $26^d\ 19^h$ to $27^d\ 19^h$; October $6^d\ 6^h$ to $8^d\ 6^h$.

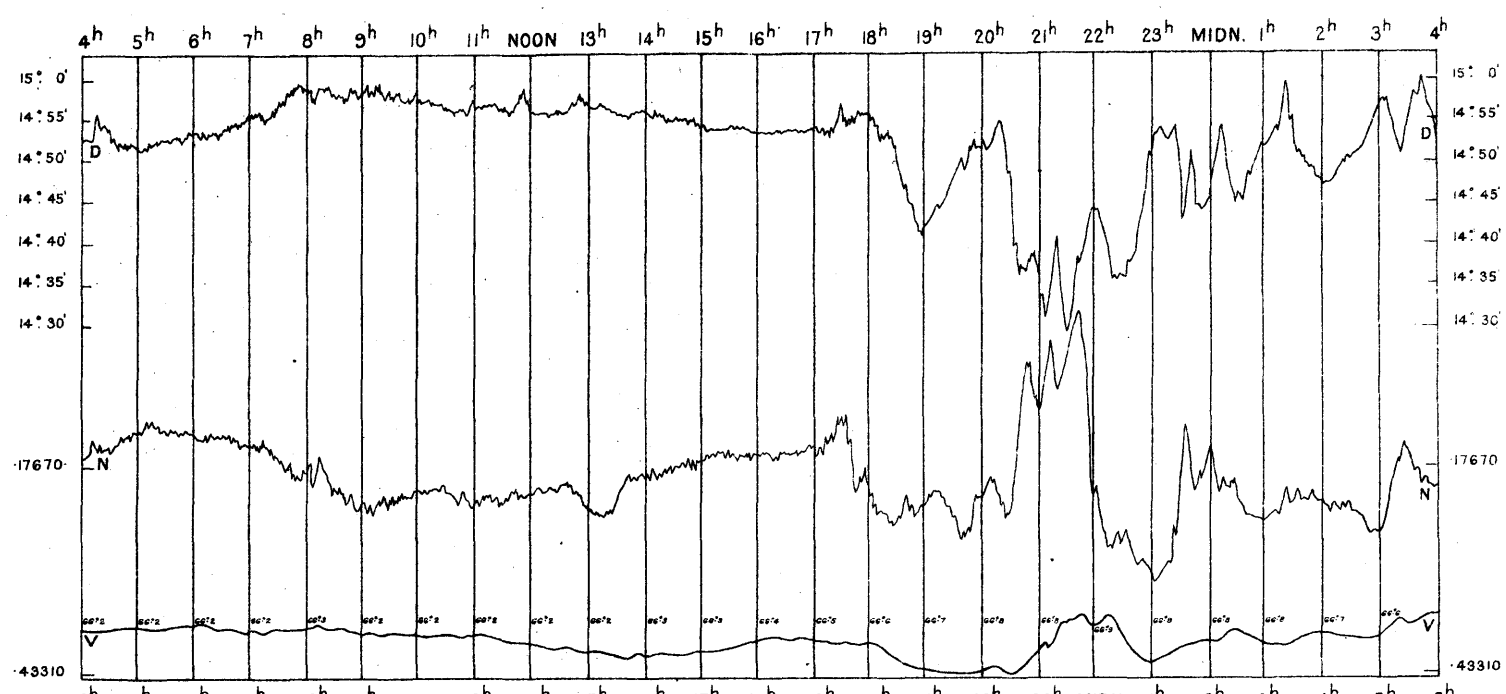
The time is Greenwich Civil Time (commencing at midnight, and counting the hours from 0 to 24).

The magnetic declination, north force, and vertical force are indicated by the letters D., N., and V. respectively; the declination (west) is expressed in minutes of arc, the unit for north and vertical force is 1 γ (0·00001 C.G.S.), the corresponding scales being given on the sides of each diagram. Equal changes of amplitude in the several registers correspond nearly to equal changes of absolute magnetic force, 0·001 of a C.G.S. unit being represented by $0^{in.}\cdot69 = 17^{mm.}\cdot4$ in the declination curve, by $0^{in.}\cdot71 = 18^{mm.}\cdot0$ in the north force curve, and by $0^{in.}\cdot60 = 15^{mm.}\cdot3$ in the vertical force curve.

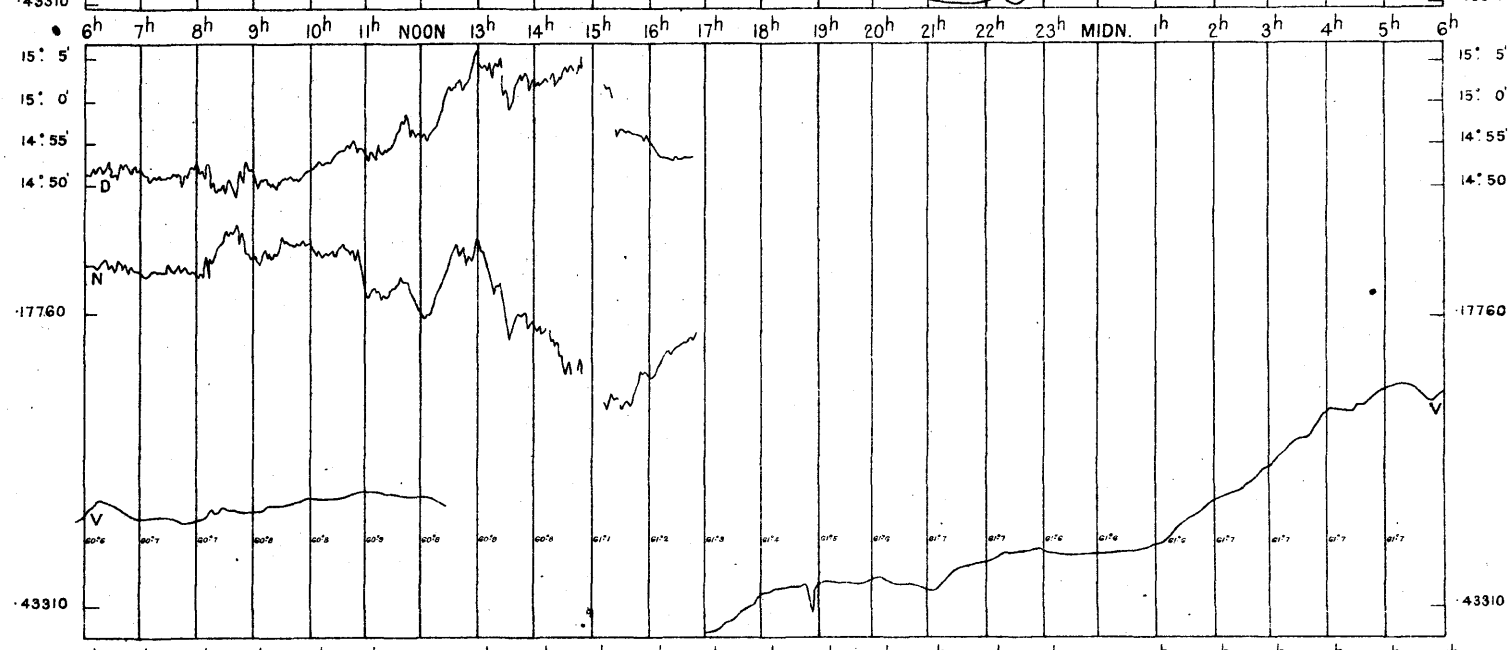
Upward motion indicates increase of declination and of north force, and decrease of vertical force.

MAGNETIC DISTURBANCES RECORDED AT THE ROYAL OBSERVATORY, GREENWICH, 1916.

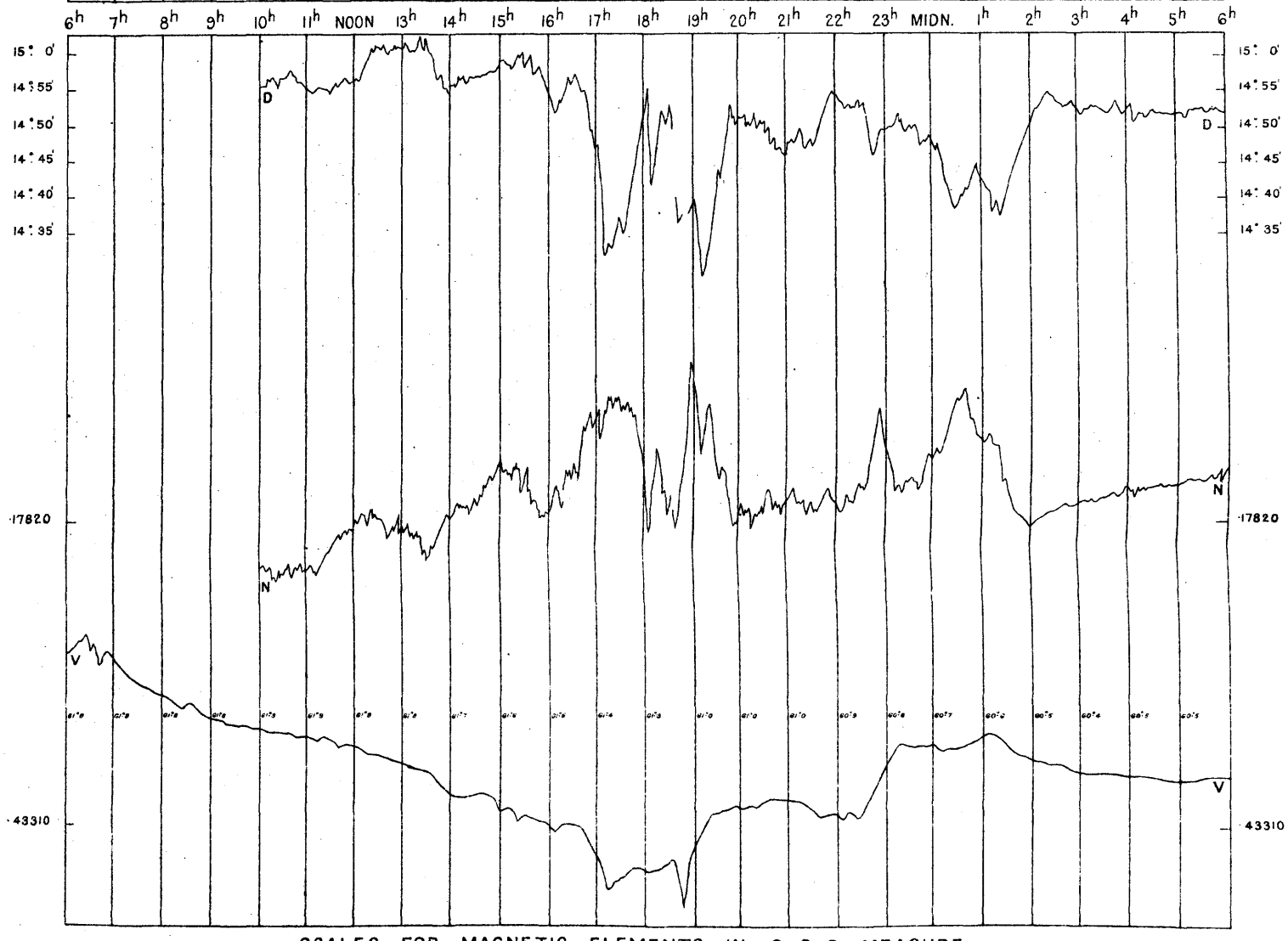
JANUARY 11 - 12



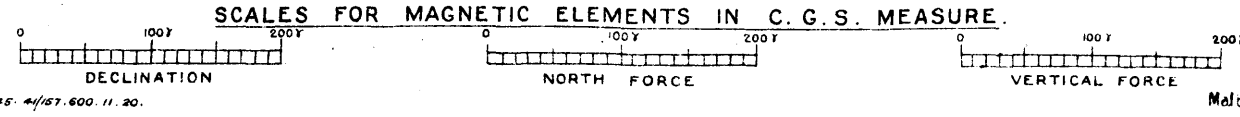
MARCH 8 - 9



MARCH 9 - 10



SCALES FOR MAGNETIC ELEMENTS IN C. G. S. MEASURE.

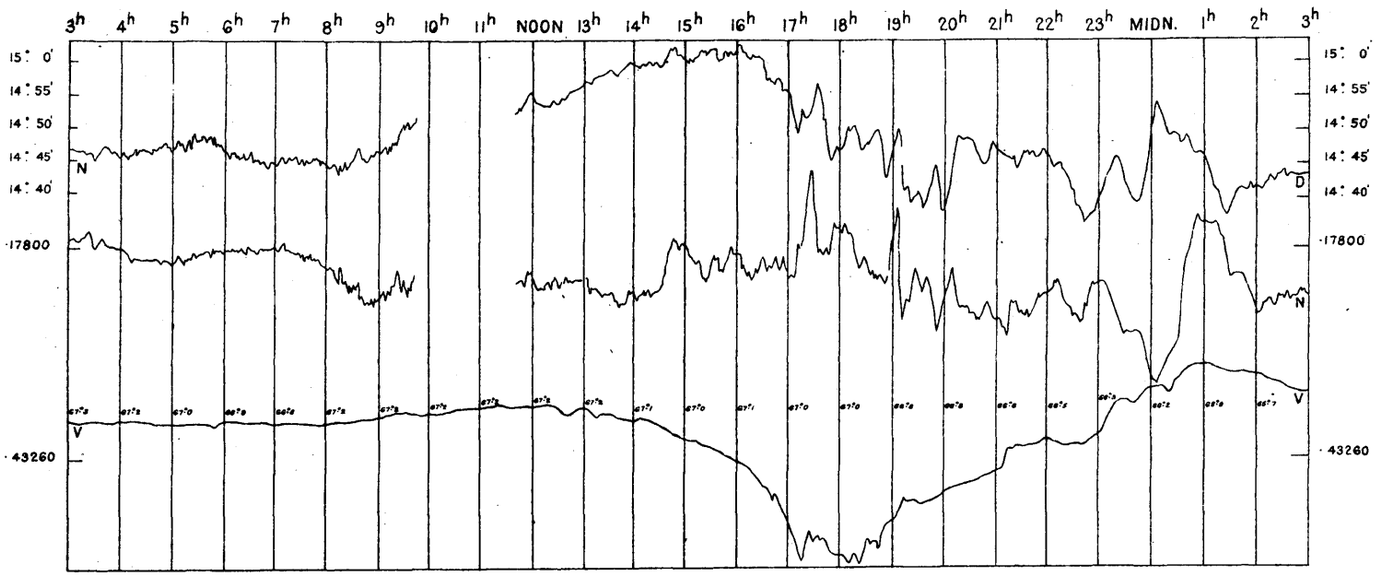


3956·18545· 4//157.600. 11. 20.

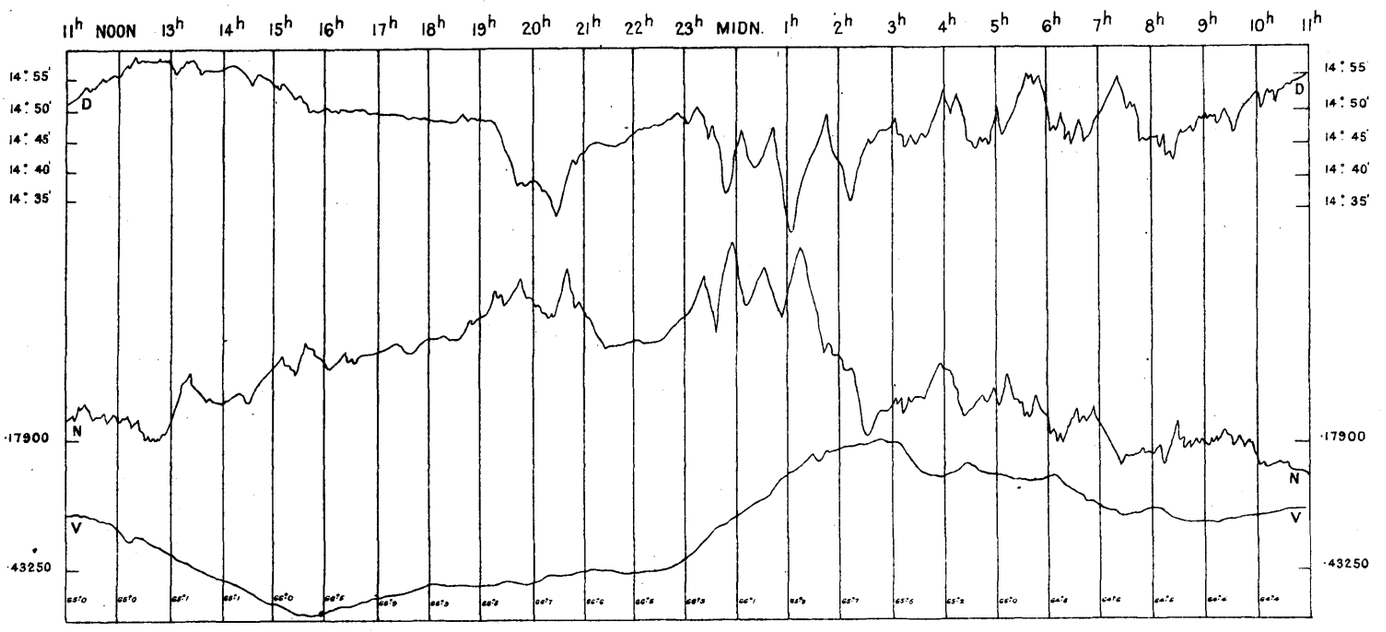
Malby&Sons Lith

MAGNETIC DISTURBANCES RECORDED AT THE ROYAL OBSERVATORY, GREENWICH, 1916.

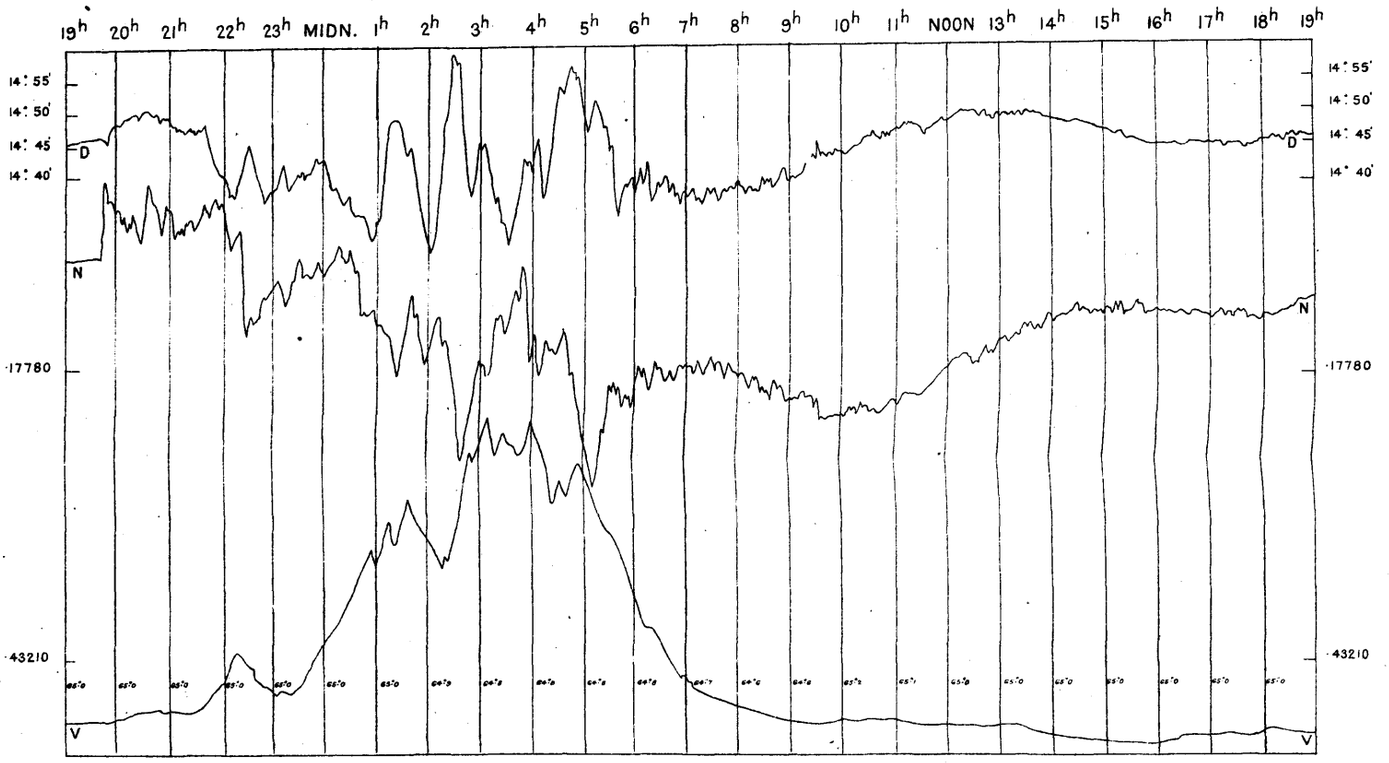
APRIL 25 - 26



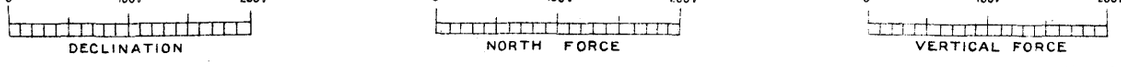
APRIL 28 - 29



AUGUST 26-27



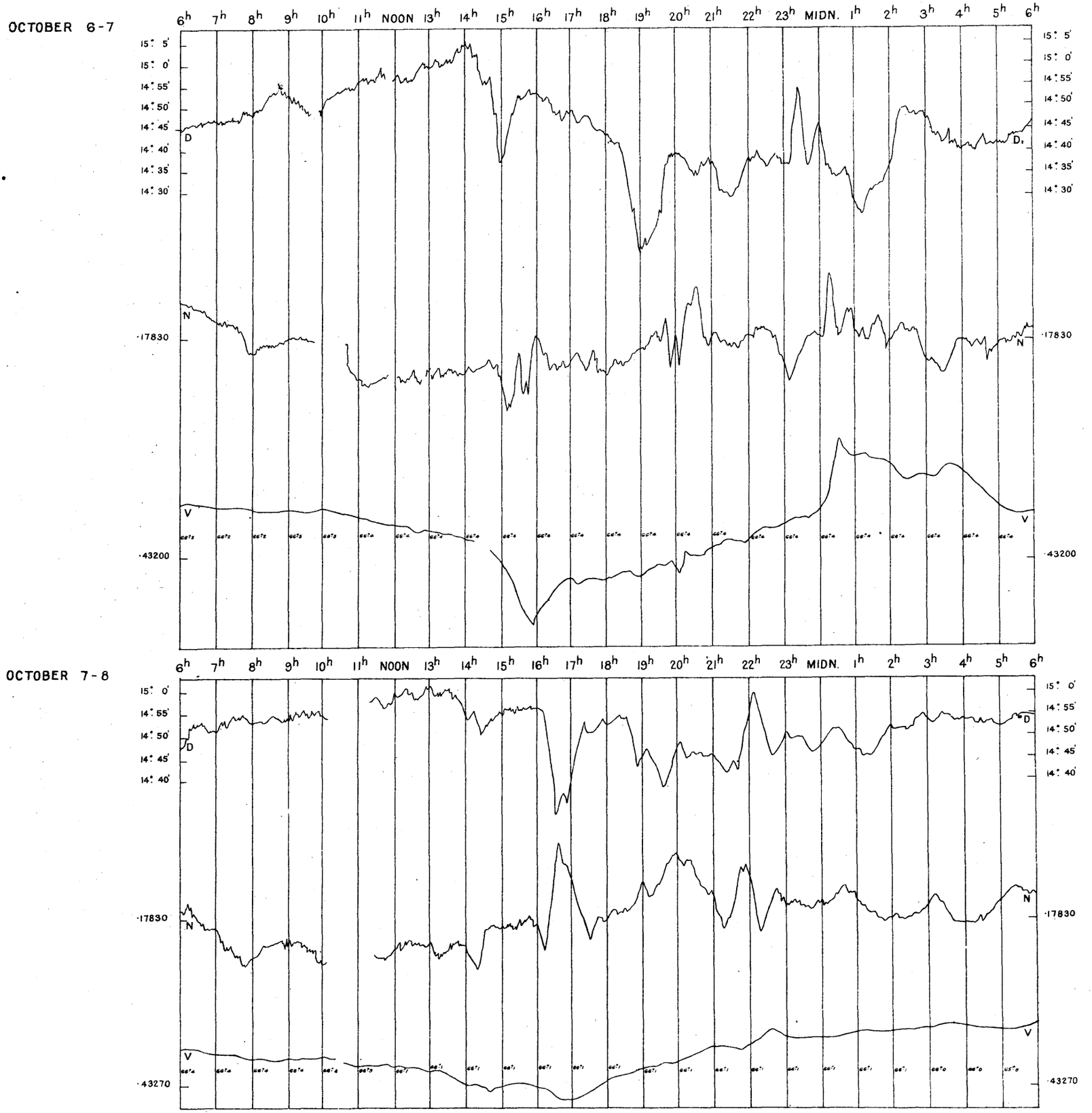
SCALES FOR MAGNETIC ELEMENTS IN C.G.S. MEASURE.



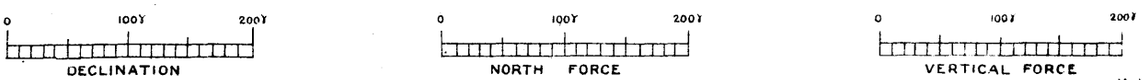
•9855-16545-41/157

Malby & Sons, Lith.

MAGNETIC DISTURBANCES RECORDED AT THE ROYAL OBSERVATORY, GREENWICH, 1916.



SCALES FOR MAGNETIC ELEMENTS IN C.G.S. MEASURE.



3955·16545·41/157

Malby & Sons, Lith

ROYAL OBSERVATORY, GREENWICH.

RESULTS

OF

METEOROLOGICAL OBSERVATIONS.

1916.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Jan. 1	..	29·496	56·8	47·7	9·1	52·0	+13·4	48·1	44·1	7·9	14·3	2·4	75	65·8	41·3	45·60	0·064	wwP : wP
2	..	29·810	54·6	43·6	11·0	50·1	+11·7	48·3	46·4	3·7	10·3	1·4	87	53·8	36·4	45·74	0·252	wP : wwP
3	Greatest Dec. S.	29·950	52·9	43·2	9·7	49·5	+11·2	46·6	43·5	6·0	10·8	1·4	80	64·0	35·4	45·99	0·173	wwP : wP : wP
4	Perigee	29·930	54·1	43·3	10·8	50·1	+11·8	48·3	46·4	3·7	7·0	2·0	87	62·0	36·9	46·32	0·215	wP : wwP : wwP
5	New	30·064	48·6	42·2	6·4	45·0	+ 6·8	43·1	40·9	4·1	7·1	2·2	86	53·9	35·2	46·36	0·000	wwP : wP : wP
6	..	30·008	55·1	44·4	10·7	51·1	+13·0	49·1	47·0	4·1	4·7	2·6	86	62·1	37·8	46·42	0·002	wwP
7	..	29·677	52·6	41·3	11·3	48·2	+10·2	45·6	42·8	5·4	8·9	2·5	82	55·1	35·0	46·50	0·089	wwP : wP
8	..	29·962	45·5	38·5	7·0	42·6	+ 4·7	39·3	35·3	7·3	8·2	4·1	76	52·5	32·0	46·65	0·000	wwP : mP : mP
9	..	30·282	44·9	31·1	13·8	39·7	+ 1·8	38·5	37·0	2·7	4·4	0·8	90	49·4	24·9	46·42	0·002	wP
10	..	30·241	51·8	42·4	9·4	46·6	+ 8·7	44·6	42·3	4·3	7·2	1·5	86	70·1	35·9	46·11	0·010	wP
11	..	30·109	52·6	40·4	12·2	47·2	+ 9·3	44·9	42·4	4·8	7·9	2·4	84	67·9	34·9	46·00	0·027	wP
12	First Quarter	30·062	48·8	38·0	10·8	43·9	+ 6·0	42·1	39·9	4·0	5·6	2·1	86	59·9	30·6	46·00	0·010	wP
13	..	29·749	49·5	38·5	11·0	43·4	+ 5·4	38·7	33·1	10·3	13·9	2·1	67	58·2	31·7	45·90	0·018	wwP : mP : mP
14	..	30·058	41·4	32·9	8·5	37·8	− 0·2	34·8	29·7	8·1	10·7	3·8	76	50·2	27·8	45·80	0·000	wP : mP : mP
15	..	29·937	49·1	38·0	11·1	45·2	+ 7·1	42·2	38·7	6·5	9·7	2·7	78	58·4	32·2	45·50	0·000	wP : mP : wP
16	..	29·996	46·3	37·2	9·1	42·5	+ 4·2	40·9	39·0	3·5	8·3	1·7	87	54·1	30·5	45·20	0·000	wP : ..
17	Apogee: Greatest Dec. N.	29·759	50·6	39·7	10·9	45·9	+ 7·4	44·5	42·9	3·0	5·1	1·2	90	56·5	30·0	45·10	0·045	.. : wP : wwP
18	..	29·710	51·3	44·3	7·0	49·3	+10·7	48·1	46·8	2·5	4·5	1·4	92	58·8	34·3	45·41	0·008	wwP : wwP : wP
19	..	29·803	53·1	41·2	11·9	47·1	+ 8·4	45·7	44·2	2·9	5·6	0·2	90	57·1	32·8	45·55	0·111	wwP
20	Full	29·868	51·1	41·1	10·0	45·2	+ 6·4	41·6	37·5	7·7	12·8	3·3	75	63·8	35·0	45·55	0·023	wwP : wP : mP
21	..	29·936	55·2	43·1	12·1	50·2	+11·4	47·6	44·9	5·3	8·0	2·6	83	62·1	38·2	45·70	0·092	wwP
22	..	30·116	52·3	37·8	14·5	49·1	+10·3	45·7	42·1	7·0	13·2	1·4	76	66·0	29·9	45·70	0·017	wwP : wP
23	..	30·257	51·3	29·1	22·2	41·4	+ 2·5	39·7	37·5	3·9	10·0	0·9	88	73·1	24·5	45·97	0·002	wP : ..
24	..	30·069	48·8	39·2	9·6	45·0	+ 6·1	41·9	38·3	6·7	14·5	2·5	77	59·2	31·0	45·80	0·010	wwP : wP : wP
25	..	30·163	49·3	37·4	11·9	43·4	+ 4·3	39·8	35·6	7·8	11·1	4·9	75	69·4	31·2	45·71	0·000	wP
26	..	30·068	50·3	43·7	6·6	46·4	+ 7·1	43·4	40·0	6·4	8·9	2·1	80	64·8	39·7	45·55	0·000	wP
27	..	30·061	51·6	46·3	5·3	48·9	+ 9·4	47·7	46·4	2·5	4·1	1·4	92	62·0	41·1	45·58	0·042	wwP : wP : wwP
28	Last Quarter	30·146	52·3	46·2	6·1	49·4	+ 9·8	48·3	47·1	2·3	4·9	0·8	92	62·7	43·1	45·60	0·012	wwP
29	..	30·178	54·3	37·6	16·7	46·4	+ 6·7	44·6	42·6	3·8	9·4	0·9	87	81·1	29·1	45·80	0·000	wwP : wwP : wP
30	..	30·299	43·9	37·4	6·5	41·6	+ 1·9	40·5	39·2	2·4	4·7	0·4	92	52·8	29·0	46·01	0·000	wwP : wP : wP
31	Greatest Dec. S.	30·374	42·4	37·0	5·4	39·7	0·0	38·7	37·4	2·3	4·3	1·4	92	47·9	31·0	45·95	0·000	wP
Means	..	30·004	50·4	40·1	10·3	45·9	+ 7·3	43·6	41·0	4·9	8·4	2·0	83·7	60·5	33·5	45·85	Sum 1·224	..
Number of Column for Reference		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 30in.004, being 0in.210 *higher* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 56°·8 on January 1; the lowest in the month was 29°·1 on January 23; and the range was 27°·7.
The mean of all the highest daily readings in the month was 50°·4, being 7°·3 *higher* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 40°·4, being 6°·4 *higher* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 10°·3, being 0°·9 *greater* than the average for the 65 years, 1841–1905.
The mean for the month was 45°·9, being 7°·3 *higher* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Jan. 1	0·6	7·8	S	SW : WSW	35·0	3·01	917	10, sh : 10, cu.-n, oc.-slt.-r., w	8, oc.-slt.-r, w: 9, w : p.-cl, cu, w
2	0·0	7·9	WSW : SW : S	SSW : SW	8·0	1·01	564	1, : 10, s, n, r	10, r, oc.-slt.-r : 10, r, m.-r
3	5·9	7·9	SW : WSW : W	W : SW : SSW	6·6	0·71	516	10, m.-r, r: p.-cl : 3, cu	3, cu : 1 : p.-cl
4	0·0	7·9	SSW	SSW : WSW	8·0	1·12	576	7 : 10 : 9, cu, cu.-n	9, cu.-n, w : 9 : 10, r
5	0·5	7·9	SW : SSW	SW : SSW	3·1	0·27	391	1 : 1 : p.-cl, th.-cl	p.-cl, s, cu : 2 : 6
6	0·0	8·0	SSW : SW	SW	5·1	0·64	565	8, slt.-r : 10 : 10, n, cu, s	10, s, cu, n : 10
7	0·0	8·0	SW : SSW	W : WSW	7·7	1·02	619	10, w : 10, oc.-r, w	8, slt.-sh : p.-cl : 1
8	0·1	8·0	WSW : W	WNW : NW	2·4	0·28	376	p.-cl : p.-cl, cu	p.-cl, cu : p.-cl, th.-cl: 0
9	0·0	8·0	NW : SW : S	SW : Calm	1·0	0·01	184	0 : 1, ho.-fr., m : 8, m, ci, s	9, s, m : 7
10	1·9	8·1	SW	SW : WSW	2·6	0·26	414	10, sh : v.-cl, cu	9, cu-n, s : p.-cl : p.-cl, th.-cl
11	0·6	8·1	WSW : W	WNW : NNE : N	5·1	0·41	439	p.-cl : 10 : v.-cl, cu, s	9, fq.-slt.-r : 9
12	0·8	8·1	Calm : SSW	SW : WSW	5·1	0·30	342	10 : 10, slt.-shs, n	9, cu, n : 9 : 10, cu.-n, slt-r
13	1·7	8·2	WSW : WNW	NW	15·0	1·78	667	v.-cl,oc.-r: v.-cl : 8, w	7, cu, cu.-n, w: 1, w : 3, w
14	0·3	8·2	NW : W : SW	W : SW	3·0	0·23	321	1, ho.-fr : 1, m, ho.-fr. : 9, cu, s, m	9, s.-cu : 1 : v.-cl, cu
15	0·1	8·2	SW : WSW	WSW : SW	4·2	0·46	479	10 : 9, cu.-n	9, cu, cu.-n : 1, s.-cu, ci.-cu
16	0·0	8·3	WSW : SW	SW : SSW	1·1	0·09	262	1 : 9, s, n	10, m.-r : 10, m.-r
17	0·0	8·3	SSW : S	SSW	1·9	0·14	271	10 : 10, fq.-slt.-r, cu.-n	10, th.-r : 10, th.-r
18	0·0	8·3	SSW : SW	WSW : SW : SSW	1·3	0·08	242	10, oc.-slt.-r : 10, cu, s, n	8, cu.-n, s.-cu, slt.-m : 8, m, lu.-ha
19	0·2	8·4	SSW	SSW : S	10·1	1·05	569	1, hy.-d : 1, hy.-d : 6, cu.-n	10, cu.-n, oc.-slt.-r, w : 10, r, w
20	3·6	8·4	SSW : SW	SW : WSW : SSW	9·9	0·76	565	7, w : p.-cl : 7, cu.-n, s, r, w	6, th.-cl, w: 10 : 10, th.-cl
21	0·2	8·5	S : SSW	SSW : S	6·7	0·88	611	10, r, w : 10, slt.-r	9, cu.-n, w : 8, w
22	2·4	8·5	SSW : SW	SW : SSW	6·5	0·62	482	10 : 10, m.-r : 9, cu.-s, so.-ha	p.-cl, cu.-n, p.-so.-ha : 1 : 0, h, d
23	6·3	8·6	Calm : SSE	SSE : S	5·1	0·20	300	0, h, ho.-fr : 1, cu.-s, ho.-fr	1 : 10
24	3·7	8·6	S : WNW	WNW : WSW : SSW	3·2	0·26	345	10, th.-cl : 9, cu.-n	3, cu, th.-cl : 1, slt.-h
25	4·5	8·7	SSW : S	SSW	3·3	0·34	406	v.-cl, th.-cl : 3 : p.-cl, th.-cl	8, cu : 9 : 9
26	0·1	8·7	SSW	SSW : S	2·0	0·25	349	10 : 8, cu, cu.-n	9, cu, cu.-n : 8
27	0·0	8·8	SSW	SSW	1·8	0·12	272	v.-cl : 10, s, cu.-n, oc.-m.-r	10, oc.-slt.-r: 10 : 10, m.-r
28	0·0	8·8	SSW : Calm : SW	S : Calm	0·3	0·00	144	10, oc.-m.-r : 10, n, slt.-m, oc.-th.-r	9, cu.-n : 9, slt.-m
29	6·8	8·9	S	SSW : Calm	0·5	0·01	177	p.-cl : 9 : 6, s.-cu, ci	p.-cl, th.-cl, ci.-s : 1, ho.-fr
30	0·0	8·9	S : Calm	Calm	0·3	0·00	82	10, m.-r : 10, n, s : 10, n	10, n, slt.-m : 10
31	0·0	9·0	Calm	Calm : SE	0·1	0·00	75	10 : 10, s	10, s.-cu : 9
Means	1·30	8·3	..	..	..	0·53	404		
Number of Column for Reference	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 43°·6, being 6°·4 *higher* than
The mean *Temperature of the Dew Point* for the month was 41°·0, being 5°·5 *higher than*
The mean *Degree of Humidity* for the month was 83·7, being 4·3 *less* than
The mean *Elastic Force of Vapour* for the month was 0in.257, being 0in.051 *greater* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 2grs.9, being 0gr.5 *greater than*
The mean *Weight of a Cubic Foot of Air* for the month was 550 grains, being 4 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 7·3.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·156. The maximum daily amount of *Sunshine* was 6·8 hours on January 29.

The highest reading of the *Solar Radiation Thermometer* was 81·1 on January 29; and the lowest reading of the *Terrestrial Radiation Thermometer* was 24°·5 on January 23.

The *Proportions of Wind* referred to the cardinal points were N. 1, E. 0, S. 16, W. 11. Three days were calm.

The *Greatest Pressure of the Wind* in the month was 35·0 lbs. on the square foot on January 1. The mean daily *Horizontal Movement of the Air* for the month was 404 miles; the greatest daily value was 917 miles on January 1; and the least daily value was 75 miles on January 31.

Rain (0in.005 or over) fell on 18 days in the month, amounting to 1in.224, as measured by gauge No. 6 partly sunk below the ground; being 0in.657 *less* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Feb. 1	..	30·248	41·0	32·2	8·8	38·1	− 1·5	35·9	32·9	5·2	12·9	1·2	82	54·7	30·7	45·80	0·001	wP
2	Perigee	29·917	44·1	28·7	15·4	38·8	− 0·7	37·5	35·8	3·0	5·9	2·0	90	49·9	29·4	45·60	0·002	wP
3	New	29·425	49·0	44·0	5·0	46·0	+ 6·5	44·0	41·7	4·3	6·5	1·9	86	52·0	42·5	45·33	0·317	wwP : wwP : wwN
4	..	28·966	50·1	41·2	8·9	45·6	+ 6·1	43·4	40·9	4·7	10·8	1·5	84	81·3	32·4	45·22	0·423	wwN : wwP : wP
5	..	29·535	48·5	39·6	8·9	42·3	+ 2·7	39·8	36·7	5·6	12·0	1·4	82	70·3	30·5	45·26	0·071	wwP : mP : mP
6	..	29·745	51·3	40·2	11·1	47·1	+ 7·5	44·9	42·5	4·6	7·5	1·8	85	56·6	32·3	45·22	0·040	wP : wwP : wP
7	..	29·763	47·1	36·9	10·2	42·5	+ 3·0	38·8	34·3	8·2	15·9	4·8	74	74·0	30·9	45·20	0·000	wwP : wP : wP
8	..	29·596	45·6	32·2	13·4	38·1	− 1·2	35·3	31·5	6·6	10·5	2·8	77	76·3	27·5	45·14	0·000	wP : mP : mP
9	..	29·410	41·6	28·4	13·2	34·9	− 4·2	32·3	28·1	6·8	9·9	1·3	75	61·1	23·9	44·80	0·000	wP : mP : mP
10	First Quarter	29·667	44·1	33·2	10·9	38·0	− 0·9	35·1	31·1	6·9	11·0	2·9	76	65·7	26·2	44·36	0·004	mP
11	..	29·314	43·9	37·0	6·9	39·3	+ 0·5	38·2	36·8	2·5	6·4	0·9	91	51·8	33·3	43·90	0·314	wwP : wP
12	..	29·875	45·6	37·1	8·5	40·2	+ 1·4	37·0	32·9	7·3	12·1	3·6	75	70·1	29·0	43·70	0·000	wP : mP : mP
13	Apogee : Greatest Dec. N.	29·922	53·4	41·8	11·6	47·2	+ 8·2	44·7	41·9	5·3	11·4	1·3	83	86·0	32·1	43·55	0·146	wwP : wP : mP
14	..	29·682	50·8	35·6	15·2	44·8	+ 5·5	41·5	37·7	7·1	15·7	1·1	76	68·2	30·4	43·70	0·132	.. : .. : wP
15	..	29·406	52·1	32·6	19·5	42·1	+ 2·7	40·0	37·4	4·7	11·5	0·4	84	74·6	30·5	43·76	0·552	v, wP : mP : wwP
16	..	29·189	53·0	36·7	16·3	45·5	+ 6·0	43·0	40·1	5·4	18·5	3·1	82	85·8	32·2	43·70	0·016	wwP : mP
17	..	29·484	47·3	37·2	10·1	41·1	+ 1·5	37·3	32·6	8·5	14·8	4·7	72	77·1	30·5	43·79	0·000	wP : mP : mP
18	..	29·464	51·6	36·4	15·2	43·5	+ 4·0	42·2	40·6	2·9	6·4	0·5	90	55·5	30·5	43·74	0·181	wP
19	Full	29·621	49·9	35·5	14·4	45·0	+ 5·5	42·2	38·9	6·1	10·9	2·8	79	58·2	29·1	43·65	0·011	wP : mP : mP
20	..	29·990	44·1	27·0	17·1	36·8	− 2·7	35·0	32·5	4·3	8·9	0·0	85	78·0	25·0	43·80	0·000	mP : mP : wP
21	..	29·982	40·3	33·2	7·1	36·5	− 3·1	34·4	31·3	5·2	12·0	2·8	82	50·8	27·6	43·70	0·000	wP : mP
22	..	29·937	39·1	32·1	7·0	34·5	− 5·2	32·8	30·0	4·5	8·8	2·1	83	62·0	26·5	43·46	0·017	mP : .., wP
23	..	29·835	37·2	30·3	6·9	33·1	− 6·7	31·9	29·5	3·6	9·6	1·0	87	59·4	27·4	43·10	0·298	wP : wP : v, wP
24	..	29·629	35·8	27·8	8·0	31·4	− 8·6	30·5	28·4	3·0	8·2	0·0	87	52·2	26·7	42·80	0·313	wP : wP : mP
25	..	29·500	36·0	25·4	10·6	30·4	− 9·7	29·8	28·2	2·2	4·7	0·0	90	49·1	27·5	42·40	0·264	mP : mP : wP
26	Last Quarter	29·325	35·5	31·6	3·9	33·1	− 7·1	32·6	31·6	1·5	5·5	0·3	94	52·0	31·4	42·03	0·310	wwP : wP : wP
27	Greatest Dec. S.	29·173	37·8	32·6	5·2	35·0	− 5·3	33·9	32·2	2·8	4·7	0·0	89	68·5	29·7	41·70	0·105	wwP : wP
28	..	29·299	41·8	30·7	11·1	34·8	− 5·5	33·6	31·7	3·1	7·1	0·0	88	66·1	28·2	41·32	0·339	wwP : wP : v
29	Perigee	29·109	45·2	35·5	9·7	40·4	+ 0·1	38·8	36·8	3·6	11·0	0·0	88	86·9	32·9	40·89	0·042	wwP : wP : wP, wwN
Means	..	29·586	44·9	34·2	10·7	39·5	0·0	37·5	34·8	4·8	10·0	1·6	83·3	65·3	29·9	43·81	Sum 3·898	..
Number of Column for Reference	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29$^{in.}$·586, being 0$^{in.}$·216 *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 53°·4 on February 13; the lowest in the month was 25°·4 on February 25; and the range was 28°·0.
The mean of all the highest daily readings in the month was 44°·9, being 0°·3 *lower* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 34°·2, being *equal to* the average for the 65 years, 1841–1905.
The mean of the daily ranges was 10°·7, being 0°·3 *less* than the average for the 65 years, 1841–1905.
The mean for the month was 39°·5, being *equal to* the average for the 65 years, 1841–1905

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	P.M.	Pressure on the Square Foot. Greatest.	Mean of 24 Hourly Measures.	Robinson's. Horizontal Movement of the Air.	Clouds and Weather. A.M.	P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Feb. 1	0·1	9·0	Calm : E	E : Calm	0·4	0·01	116	9, oc.-slt.-r : 9, cu.-n	9, cu.-n : 9
2	0·0	9·1	Calm : S : SSW	SSW	2·3	0·18	330	0 : 10, oc.-slt.-r	10, n : 10, n
3	0·0	9·2	SSW : S	SSW : S	15·0	1·46	639	10, oc.-m.-r : 10, r	10, n, w : 10, r, w
4	4·4	9·2	S : SSW	SSW : SSE : Calm	16·0	1·17	485	10, r, w : 9, cu.-n, r, w	v.-cl, cu, ci.-s, shs : v.-cl : v.-cl
5	6·0	9·3	S : WSW : W	W : SW : SSW	1·5	0·15	313	10, fq.-r : 10 : p.-cl, cu, h	2, cu, h : 1
6	0·0	9·3	SSW : S	SSW : SW	6·8	0·88	583	p.-cl : 10 : 10, n, w	10, n, r, w : 0, w
7	5·5	9·4	SW : SSW : WSW	WSW : SW	7·2	0·61	528	0, w : 0 : v.-cl, cu, w	6, cu : 2, th.-cl
8	2·9	9·5	SW	WSW : W	1·6	0·21	346	v.-cl, ho.-fr : 1, ho.-fr : p.-cl, ci.-s, oc.-so.-ha	v.-cl, th.-cl, cu : v.-cl, lu.-ha, ho.-fr
9	3·6	9·5	WSW : SW	W : N : NW	1·3	0·09	253	1, ho.-fr : 1	1, cu, h : v.-cl, h, ho.-fr : 1, ho.-fr, h
10	3·1	9·6	W : WNW : NW	NW : WSW : S	1·0	0·12	278	0, ho.-fr : v.-cl, h : p.-cl, h	2, cu, h, so.-ha : 10, th.-cl, gt.-lu.-ha : 10, th.-cl
11	0·0	9·6	SE : ESE : ENE	NW : NNW	5·5	0·46	373	10, m.-r : 10, n, r	10, slt.-r, glm : 10 : 10
12	4·5	9·7	NNW : NW	NW : W : S	4·0	0·29	348	10 : 7, cu	1 : 10, ci.-s, oc.-lu.-ha : 2
13	3·7	9·8	SSW : SW : WSW	SW : SSW	2·9	0·21	375	8, r : 9 : 8, ci.-s	6, sh : v.-cl, lu.-ha : 10, r
14	2·8	9·8	S : W : SW	SW : W : SSW	10·0	1·15	646	10, oc.-r : 6 : 6, cu.-n	8, r, w : p.-cl, w : p.-cl, lu.-ha
15	3·2	9·9	Variable	WSW : S : SW	13·6	0·47	529	10, r, sn : 10, r, sn : v.-cl	7, cu.-s., n, w, so.-ha : 10, r, w : 10, r, w
16	4·3	9·9	SW : WSW : SSW	WSW : W : SW	32·0	2·64	955	10, m.-r, w 10, m.-r, w v.-cl, fq.-r, w	v.-cl, cu.-n, w : v.-cl, w, lu.-ha
17	5·3	10·0	WSW : W	WNW : W : WSW	6·7	0·78	628	v.-cl, w : v.-cl, w	6, cu, ci.-s : p.-cl, th.-cl, lu.-ha : 1
18	0·0	10·1	WSW : SSW : S	SW : WSW : W	4·5	0·22	445	v.-cl, oc.-lu.-ha : 10, r : 10, n, c.-r	10, cu.-n, oc.-shs : 10, w, m.-sh
19	0·0	10·1	W : WNW : NW	NNE : N	2·8	0·22	371	10, m.-r : 9 : 8, n, ci.-s	8, cu.-n, fq.-r : v.-cl : p. cl
20	1·0	10·2	Calm : NE : E	E	0·8	0·03	172	1, h, hy.-d, lu.-ha, ho.-fr : 1, h, f, ho.-fr, so.-ha	6, ci.-cu, s.-cu, so.-ha : 8 : v.-cl
21	0·0	10·2	E : ENE : NE	ENE : NE : NNE	1·2	0·07	248	10, th.-cl, lu.-ha : 10 : 10, s, n, h	10, th.-cl, s, n : v.-cl
22	1·4	10·3	N : NNW	NNW : N	4·5	0·34	345	8, ho.-fr : 6, oc.-slt.-sn : v.-cl, cu	7, sn.-shs : 3, ho.-fr
23	2·1	10·4	NNW : N	N : NNE : NE	7·8	0·47	459	6, sn.-sh : 6 : v.-cl, oc.-sn	10, fq.-sn : 10, fq.-sn
24	3·3	10·4	NNE : NE : E	NE : Calm	0·7	0·03	228	10, oc.-sn : 10, n, sn	p.-cl, cu, h : v.-cl, h : 10
25	0·4	10·5	Calm : N	N : NNE : NE	3·8	0·16	352	10 : 10, s, n	10, sn : 10, sn
26	0·1	10·6	NNE : NE	ENE : NE	2·9	0·13	335	10, sn : 10, sn	10, cu.-n : 10, fq.-sn : 10, sn
27	0·9	10·7	NE : ENE : E	Variable	1·8	0·04	257	10, slt.-sn : 10, slt.-sn : 9, cu.-n, sn	10, fq.-sn : 10 : 10
28	0·1	10·7	SSW : S : Calm	ESE : ENE : NE	0·7	0·00	209	v.-cl : p.-cl, slt-sn : v.-cl, s, so.-ha	v.-cl, cu, s : 10, sn : 10, sn, r
29	2·8	10·8	E : SE : S	SE : E : NE	3·0	0·07	281	9 : 9 : v.-cl, cu.-n	10, s.-cu : 10, fq.-r : 10, slt.-r
Means	2·1	9·9	..	..	..	0·44	394		
Number of Column for Reference	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 37°·5, being 0°·2 *lower* than
The mean *Temperature of the Dew Point* for the month was 34°·7, being 0°·7 *lower* than
The mean *Degree of Humidity* for the month was 83·3, being 2·2 *less* than
The mean *Elastic Force of Vapour* for the month was 0in.202, being 0in.005 *less* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 2grs.4, being *equal* to
The mean *Weight of a Cubic Foot of Air* for the month was 549 grains, being 4 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 7·1.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·214. The maximum daily amount of *Sunshine* was 6·0 hours on February 5.

The highest reading of the *Solar Radiation Thermometer* was 86°·9 on February 29; and the lowest reading of the *Terrestrial Radiation Thermometer* was 23°·9 on February 9.

The *Proportions of Wind* referred to the cardinal points were N. 6, E. 4, S. 9, W. 8. Two days were calm.

The *Greatest Pressure of the Wind* in the month was 32·0 lbs. on the square foot on February 16. The mean daily *Horizontal Movement of the Air* for the month was 394 miles; the greatest daily value was 955 miles on February 16; and the least daily value was 116 miles on February 1.

Rain (0in.005 or over) fell on 19 days in the month, amounting to 3in.898, as measured by gauge No. 6 partly sunk below the ground; being 2in.418 *greater* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100.)	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Mar. 1	..	29·105	46·3	33·1	13·2	40·0	− 0·4	38·8	37·2	2·8	9·2	1·1	89	90·8	26·0	41·00	0·016	wwP : wP
2	..	29·062	37·7	30·8	6·9	34·5	− 5·9	33·8	32·7	1·8	4·3	0·3	93	42·9	24·6	41·05	0·000	wP
3	..	29·117	37·3	33·9	3·4	36·1	− 4·4	34·7	32·7	3·4	8·7	2·0	88	46·9	30·0	41·10	0·250	wP
4	New	29·576	41·2	32·0	9·2	35·4	− 5·3	33·2	29·8	5·6	10·4	2·7	79	83·2	27·1	41·06	0·001	wP, mP : .., wP
5	..	29·750	41·1	28·6	12·5	34·3	− 6·6	32·4	29·2	5·1	11·5	2·0	81	69·4	23·1	41·02	0·000	wP : mP : mP
6	..	29·640	39·0	31·6	7·4	33·8	− 7·2	32·4	29·9	3·9	10·3	2·0	87	72·8	28·0	40·76	0·035	wP : mP : mP
7	..	29·564	35·8	30·2	5·6	33·3	− 7·7	32·6	31·3	2·0	4·8	7·2	92	47·8	28·5	40·60	0·360	wP
8	..	29·519	39·7	29·2	10·5	33·8	− 7·3	32·9	31·3	2·5	7·1	0·0	79	87·0	24·2	40·41	0·182	wP
9	..	29·726	41·2	24·3	16·9	34·2	− 6·8	31·8	27·7	6·5	10·4	0·0	77	73·8	20·1	40·30	0·000	wP : mP : wP
10		29·596	35·7	33·6	2·1	34·7	− 6·2	33·4	31·2	3·5	5·6	1·7	87	43·8	25·4	40·02	0·036	wP
11	First Quarter: Greatest Dec. N.	29·251	37·5	33·0	4·5	35·9	− 5·1	35·2	34·1	1·8	3·6	0·3	91	41·0	31·5	39·90	0·070	wwP : wP : wP
12	Apogee	29·209	50·4	36·3	14·1	40·8	− 0·3	39·4	37·6	3·2	7·1	0·2	89	92·3	35·4	39·96	0·020	wwP
13	..	29·345	41·6	37·3	4·3	39·1	− 2·2	38·8	38·4	0·7	2·6	0·2	98	46·5	37·1	40·10	0·315	wwP : v, wP : wwP
14	..	29·554	48·7	38·7	10·0	41·7	+ 0·2	41·1	40·4	1·3	3·4	0·2	95	88·6	39·3	40·30	0·030	wwP : wwP : wP
15	..	29·466	47·5	37·1	10·4	42·1	+ 0·4	41·6	41·0	1·1	4·3	0·0	96	56·1	37·4	40·69	0·212	wwP
16	..	29·424	53·9	43·1	10·8	47·2	+ 5·3	46·0	44·7	2·5	5·5	0·4	92	82·8	38·8	41·01	0·180	wwP : wwP : wwP, wwN
17	..	29·687	50·0	41·6	8·4	45·0	+ 3·0	43·6	42·0	3·0	5·4	0·4	89	61·8	33·4	41·42	0·060	wwP : wP : wP
18	..	29·715	53·4	41·1	12·3	46·1	+ 4·1	45·0	43·8	2·3	6·5	0·7	92	94·0	32·0	41·90	0·012	wP : wwP : wwP
19	Full	29·581	57·0	40·1	16·9	47·3	+ 5·4	45·8	44·2	3·1	8·8	0·2	90	84·7	30·1	42·31	0·011	wwP
20	..	29·457	55·0	43·7	11·3	47·7	+ 5·8	46·6	45·4	2·3	6·1	0·6	92	78·1	37·8	42·67	0·136	wwP
21	..	29·278	46·9	37·0	9·9	41·4	− 0·5	40·9	40·3	1·1	2·7	0·8	96	49·2	36·9	42·90	0·459	wwP : wP : wwN
22	..	29·375	39·6	33·5	6·1	37·3	− 4·7	35·9	34·0	3·3	5·3	0·7	88	56·0	33·2	43·30	0·345	wwN : wwP : wP, ..
23	..	29·367	37·3	31·9	5·4	33·7	− 8·5	32·3	29·8	3·9	10·2	1·7	86	65·2	31·8	43·12	0·027	.. : mP : mP
24	..	29·304	42·1	31·6	10·5	35·5	− 6·9	32·9	28·9	6·6	14·0	0·9	76	80·1	26·3	42·30	0·001	wP : mP : mP
25	Greatest Dec. S.	29·380	50·0	31·0	19·0	40·1	− 2·6	37·0	33·0	7·1	13·0	0·7	75	92·2	25·9	42·46	0·021	mP : mP : wP
26	Perigee : Last Quarter	29·243	48·6	34·1	14·5	39·7	− 3·3	35·9	31·0	8·7	16·9	1·8	71	99·1	30·0	42·21	0·250	wwP : wP : wP, v
27	..	29·258	49·3	32·7	16·6	38·6	− 4·7	35·4	31·2	7·4	17·1	1·1	75	97·0	29·6	42·20	0·817	wP : wP : wN
28	..	28·903	46·0	31·4	14·6	37·8	− 5·9	36·5	34·8	3·0	7·7	0·0	89	93·5	31·8	41·76	0·284	wwN : wwN, wwP : v, wP
29	..	29·767	44·3	28·9	15·4	35·6	− 8·5	33·0	29·0	6·6	15·8	4·9	76	90·2	26·5	41·70	0·000	wP : mP : mP
30	..	30·059	53·7	31·6	22·1	43·4	− 1·1	40·6	37·3	6·1	12·6	2·3	79	89·5	26·0	41·51	0·000	wP
31	..	30·241	53·7	37·1	16·6	45·5	+ 0·6	42·1	38·1	7·4	13·6	1·6	76	79·1	27·7	41·54	0·000	wP : mP
Means	..	29·468	45·2	34·2	11·0	39·1	− 2·8	37·5	35·3	3·9	8·5	1·1	85·9	73·6	30·2	41·37	Sum 4·130	..
Number of Column for Reference	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29^{in}·468, being 0^{in}·278 *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 57°·0 on March 19; the lowest in the month was 24°·3 on March 9; and the range was 32°·7.
The mean of all the highest daily readings in the month was 45°·2, being 4°·6 *lower* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 34°·2, being 0°·9 *lower* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 11°·0, being 3°·7 *less* than the average for the 65 years, 1841–1905.
The mean for the month was 39°·1, being 2°·8 *lower* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Mar. 1	2·7	10·8	E : S	SSW : Calm	0·3	0·00	153	10, slt.-r : 10 : 10, n, slt.-r	p.-cl, cu : 0, h
2	0·0	10·9	Calm : NNE : N	NNE : NE	1·0	0·01	171	0,f,ho.-fr: f, ho.-fr : f	10, oc.-th.-r, n, m : 10, li.-r
3	0·0	11·0	NE : NNE : N	NNE : N	4·8	0·42	501	10 : 10,fq.-slt.-r,sn: 10, fr.-slt.-r.oc.-sn	10, fq.-slt.-r: 7, fq.-slt.-r: 3, cu.-n
4	5·6	11·0	N	N	3·9	0·30	364	1 : v.-cl, cu	v.-cl, cu, sn.-shs, r: 0, ho.-fr
5	1·6	11·1	N : NW : WSW	N	2·7	0·10	237	0, ho.-fr : 6, cu, ho.-fr	9, oc.-sl, r : v.-cl
6	2·8	11·1	NNW : N	N : NNW : NNE	3·9	0·17	285	10, oc.-slt.-sn : 7, cu	9, fq.-sn, cu.-n : 7
7	0·0	11·2	NE : NNE : NNW	NNE : NE	3·5	0·23	342	9, oc.-sn : 10, n, sn	10,oc.-slt.-sn: 10, slt.-r, sn: 10, slt.-r, sn
8	0·9	11·3	N : NNE : E	ESE : Calm	0·9	0·09	199	10, sn, oc.-r : 10, li.-sn	9, cu.-n : 0, ho.-fr
9	3·2	11·4	Calm : NE	NE : NNE	1·1	0·11	232	0, ho.-fr : p.-cl, th.-cl, so.-ha	9, cu.-n : 9, th.-cl : 10
10	0·0	11·4	NE	NE	4·7	0·46	436	10 : 10 : 10, n, fq.-slt.-sn	10, sl : 10, n, fq.-slt.-sl
11	0·0	11·5	NE	ENE : NE	2·1	0·27	328	10, slt.-r : 10, slt.-r	10,n,oc.-slt.-r: 10 : 10, oc.-m.-r
12	2·4	11·6	NE : ENE : E	E : ENE	5·0	0·42	326	10, oc.-slt.-r : 10, oc.-slt.-r: 10,sh, fr.-r	v.-cl, cu : 9 : 10
13	0·0	11·6	ENE : NE	ENE : E	3·1	0·33	334	10, m.-r : 10 : 10, n, r	10, n : 10, n, sh : 10, m, r
14	0·2	11·7	Calm : E	E	2·0	0·09	192	10, fq.-r, slt.-m : 10, s	10 : 10, fq.-m.-r, m : 10, m.-r, m
15	0·0	11·8	NE	ENE : ESE : Calm	2·5	0·23	263	10, m.-r : 10, r, m	10, fq.-r : 9, slt.-r : 10, r
16	0·3	11·8	Calm : NE : ENE	Calm : N : NW	0·6	0·02	145	10, r : 10, oc.-r : 10	9, cu, s.-cu : 10, r : 10, r
17	0·0	11·9	NW	Variable	0·3	0·00	125	10, fq.-r : 10, n	10, s : 10
18	2·2	12·0	ENE : E	NE : E : Calm	0·9	0·05	162	10 : 10, n, s	7, cu, ci : v.-cl, m : 1, m
19	0·1	12·0	Calm : ENE	E : ENE : Calm	2·7	0·06	149	7 : 10, m.-r : 9, cu, n	v.-cl, s.-cu, p.-so.-ha: 9 : 9, m, r
20	0·0	12·1	Calm : NNE : NNW	NNE : NNW : N	0·8	0·05	146	10, r : 10, m, r : 10, m, r	10, n, r : 10 : 10, r
21	0·0	12·2	N : NNE	NNE	2·1	0·29	354	10, r : 10, m.-r	10, slt.-r : 10, r : 10, n, r
22	0·0	12·2	NNE	NNE	4·5	0·57	475	10, r : 10, n, r	10, slt.-r : 10 : 10, slt.-r, sn
23	0·0	12·3	NNE	N : Calm	1·8	0·10	173	10, slt.-sn : 10, slt.-sn	10, n, fq.-sn : 10, sn : 10, slt.-sn
24	2·3	12·4	Calm : NNW : N	Variable	2·0	0·04	161	10 : 9, cu.-n	8, cu : p.-cl, slt.-sn : 1, h
25	8·3	12·4	SW : SSW	SSW	10·0	0·72	519	0, ho.-fr : 1 : v.-cl, cu, th.-cl	6, cu, th.-cl, slt.-r: 8 : 10, w, r
26	7·9	12·5	SSW : SW	SW	8·0	0·97	601	10, r, w : p.-cl, w : 1, cu, w	v.-cl, w, r, fr.-r,sn: v.-cl
27	5·7	12·6	SW	Variable	3·8	0·39	415	1 : 1,slt.-ho.-fr: v.-cl, s.-cu, so. ha	v.-cl,cu,s,n: 10, r, sn : 10, sn, sl, r
28	0·5	12·6	SSE : S	SSE : NNW : N	23·2	1·92	573	10, sh, w : 10, cu.-n, fq.-r	0, n, oc.-slt.-r: 10,slt.-r, sn : 10, sn, w
29	8·5	12·7	NW : W : WSW	WNW : WSW : S	3·1	0·23	338	3 : 2 : p.-cl, s.-cu,th.-cl	1, th.-cl, h : 0
30	1·0	12·8	S : SSW	SSW	1·0	0·07	268	7 : 10 : 9, cu.-n	8, cu.-n : 7 : 1
31	0·6	12·8	SSW	SW : WNW : Calm	0·8	0·03	170	10 : 9, cu	8, cu : 0, m
Mean	1·8	11·8	..	..	..	0·28	295		
Number of Column for Reference	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 37°·5, being 1°·9 ***lower*** than
The mean *Temperature of the Dew Point* for the month was 35°·3, being 1°·0 ***lower*** than
The mean *Degree of Humidity* for the month was 85·9, being 5·4 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in.206, being 0in.008 ***less*** than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 2grs.4, being 0gr.1 *less* than
The mean *Weight of a Cubic Foot of Air* for the month was 547 grains, being 2 grains ***less*** than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 8·2.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·155. The maximum daily amount of *Sunshine* was 8·5 hours on March 29.

The highest reading of the *Solar Radiation Thermometer* was 99°·1 on March 26; and the lowest reading of the *Terrestrial Radiation Thermometer* was 20°·1 on March 9.

The *Proportions of Wind* referred to the cardinal points were N. 11, E. 8, S. 4, W. 4. Four days were calm.

The *Greatest Pressure of the Wind* in the month was 23·2 lbs. on the square foot on March 28. The mean daily *Horizontal Movement of the Air* for the month was 295 miles; the greatest daily value was 601 miles on March 26; and the least daily value was 125 miles on March 17.

Rain (0in.005 or over) fell on 23 days in the month, amounting to 4in.130, as measured by gauge No. 6 partly sunk below the ground; being 2in.610 *greater* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Apr. 1	..	30·168	58·1	32·0	26·1	44·8	− 0·5	41·2	36·4	8·4	15·1	1·7	73	105·0	26·4	41·90	0·000	wP
2	New	30·006	59·8	34·6	25·2	47·0	+ 1·3	43·7	40·0	7·0	15·8	0·2	77	112·2	26·5	42·28	0·000	wP
3	..	29·840	67·8	34·3	33·5	50·6	+ 4·6	45·9	41·1	9·5	21·4	0·5	70	96·5	27·9	42·55	0·000	wP : mP : mP
4	..	29·782	51·8	40·5	11·3	45·5	− 0·7	41·1	36·0	9·5	15·1	2·7	68	84·3	31·4	42·82	0·000	wP : mP
5	..	29·872	53·4	37·0	16·4	43·0	− 3·3	39·6	35·5	7·5	12·7	3·2	75	109·7	29·5	43·20	0·000	wP : mP : wP
6	..	29·904	47·2	37·3	9·9	41·2	− 5·1	38·6	35·4	5·8	10·8	2·1	80	79·4	28·4	43·30	0·083	wP : mP : wP
7	..	29·811	48·0	33·7	14·3	39·6	− 6·7	37·6	35·0	4·6	10·7	1·6	84	83·7	26·4	43·40	0·260	v : mP : wP
8	Greatest Dec. N.	29·950	54·8	31·1	23·7	43·0	− 3·1	38·7	33·5	9·5	18·0	1·3	69	98·7	24·5	43·40	0·000	mP : mP : wP
9	Apogee	29·982	56·9	34·1	22·8	45·9	− 0·1	41·2	35·8	10·1	16·6	3·8	68	103·7	26·8	43·31	0·000	wP
10	First Quarter	29·990	57·3	36·0	21·3	47·6	+ 1·7	42·0	35·8	11·8	19·0	5·9	64	102·8	26·1	43·40	0·000	wP : mP
11	..	29·646	53·1	39·5	13·6	46·6	+ 0·8	41·8	36·5	10·1	18·1	1·7	69	90·0	32·0	43·50	0·108	wP : mP
12	..	29·414	56·5	38·3	18·2	47·5	+ 1·6	45·2	42·6	4·9	8·3	1·5	84	82·5	31·0	43·81	0·180	wP
13	..	29·312	55·9	40·1	15·8	45·7	− 0·4	42·2	38·1	7·6	16·1	3·6	75	111·9	35·3	44·00	0·032	wP : v, mP
14	..	29·558	54·0	38·4	15·6	44·9	− 1·5	40·2	34·7	10·2	20·8	3·5	67	112·4	32·8	44·20	0·083	wP : mP : mP
15	..	29·841	53·0	37·6	15·4	43·0	− 3·8	38·0	32·0	11·0	18·7	3·6	65	103·0	30·5	44·20	0·017	mP
16	..	29·883	53·0	34·3	18·7	43·3	− 3·9	40·6	37·4	5·9	12·7	0·0	80	94·3	31·9	44·20	0·060	mP : wP : wP
17	..	29·340	56·6	44·8	11·8	49·5	+ 1·9	45·6	41·5	8·0	13·9	0·8	74	100·0	40·5	44·31	0·089	wP : .. : wwP
18	Full	29·114	51·5	42·2	9·3	46·0	− 2·0	43·2	40·0	6·0	9·3	3·4	80	89·0	38·4	44·50	0·222	wP : wwP, wwN : wwP
19	..	29·068	54·2	40·1	14·1	44·5	− 3·8	41·9	38·8	5·7	10·9	0·9	80	106·5	37·0	44·71	0·100	wwP
20	..	29·133	52·9	39·5	13·4	44·0	− 4·5	41·2	37·9	6·1	12·7	0·9	78	103·4	30·9	44·73	0·012	wwP : wwP : wwP
21	Perigee : Greatest Dec. S.	29·270	56·1	34·7	21·4	45·2	− 3·5	41·4	37·0	8·2	16·3	2·0	73	120·1	27·1	44·61	0·000	..
22	..	29·326	50·5	39·2	11·3	44·8	− 3·9	42·0	38·7	6·1	11·8	0·9	79	78·0	32·1	44·70	0·000	..
23	..	29·772	58·5	35·4	23·1	47·8	− 0·8	43·7	39·2	8·6	14·4	2·4	73	107·9	28·0	45·00	0·000	.. : wwP : wwP
24	Last Quarter	29·944	56·7	42·3	14·4	50·0	+ 1·4	46·5	42·8	7·2	11·6	2·2	77	126·5	35·0	45·20	0·000	wwP
25	..	30·008	68·5	46·8	21·7	56·3	+ 7·7	49·4	43·2	13·1	23·9	7·3	61	127·0	32·1	45·55	0·000	wwP
26	..	29·963	70·9	43·2	27·7	55·8	+ 7·2	51·0	46·5	9·3	20·1	2·4	71	123·7	31·8	46·00	0·000	wwP
27	..	29·903	72·2	45·1	27·1	59·0	+10·3	54·7	50·8	8·2	16·0	0·6	75	101·5	34·2	46·60	0·000	wwP : .. : wwN
28	..	29·937	71·0	49·8	21·2	59·3	+10·5	53·6	48·6	10·7	20·8	2·4	68	125·0	39·5	47·20	0·000	.. : .. : wwP
29	..	29·941	70·0	43·6	26·4	57·0	+ 8·0	48·9	41·4	15·6	24·8	3·8	57	131·0	33·0	47·81	0·000	.. : wwP
30	..	29·822	69·3	43·0	26·3	55·6	+ 6·5	50·3	45·3	10·3	20·6	1·3	69	128·9	39·9	48·29	0·000	.. : wwP : .., wwP
Means	..	29·717	58·0	39·0	19·0	47·8	− 0·5	43·7	39·3	8·5	15·9	2·3	72·8	104·6	31·6	44·42	Sum 1·246	..
Number of Column for Reference	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The main reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was $29^{in.}·717$, being $0^{in.}·031$ *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 72°·2 on April 27; the lowest in the month was 31°·1 on April 8; and the range was 41°·1.
The mean of all the highest daily readings in the month was 58°·0, being 0°·8 *higher* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 39°·0, being *equal to* the average for the 65 years, 1841–1905.
The mean of the daily ranges was 19°·0, being 0°·8 *greater* than the average for the 65 years, 1841–1905.
The mean for the month was 47°·8, being 0°·5 *higher* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's. Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Apr. 1	9·8	12·9	Calm : N	NE : E	0·7	0·07	160	o : 1, m, h, cu	1 : 1
2	10·7	13·0	ENE : Calm : E	E : Calm	2·8	0·15	221	o : o, ho.-fr	o : o
3	7·1	13·0	Calm : S	W : SW	0·3	0·00	114	o : f, th.-cl.	o, h : o, m, h
4	2·8	13·1	SW : NW	NW : NNW	2·3	0·09	265	o, slt.-h : 10, th.-cl : 9, cu.-n	7, cu : 6 : 6, m, slt.-sh
5	7·1	13·1	NW : NNW	NNW : N	4·6	0·42	300	6 : p.-cl : p.-cl, th.-cl	v.-cl, cu : v.-cl, cu, th.-cl
6	0·4	13·2	NNW : N : NNE	NE : E	1·1	0·16	221	9, sl.-sh : 9, cu.-s, n, slt.-sh	8, cu : 10, r
7	2·8	13·3	N : NNW	NNW : Calm	0·5	0·05	156	10, r : 10, r, sn : 10, n	p.-cl, cu, n, h : v.-cl, h : p.-cl, h
8	9·3	13·3	Calm : NNW : N	NNW : Calm	0·5	0·06	135	1, ho.-fr : o, h	o, h : o, m
9	5·4	13·4	SSW : Calm : NW	NW : NNW	1·8	0·15	238	o, ho.-fr : 6 : 7, cu	6, cu : 6, lu.-ha : 1, m
10	10·7	13·5	NNW : N	NW : SW : S	1·8	0·11	199	o, ho.-fr : 1, th.-cl	o, h : p.-cl : 8, cu
11	3·4	13·5	SSW : SW : NW	NW : W : SW	8·2	0·71	408	8 : 9, cu, fq.-shs	6, cu : v.-cl : 1, lu.-ha
12	1·9	13·6	SW : SSW	WSW	6·4	0·80	534	10 : 10, cu.-n, fq.-r	10, fq.-slt.-shs : v.-cl, w : v.-cl, s.-cu
13	4·9	13·7	WSW : SW : W	W : WNW : WSW	10·0	1·09	545	o, : 6, cu, w	v.-cl, cu, shs, w : v.-cl, w
14	9·3	13·7	WSW : W : WNW	W : NW : SW	8·3	1·17	586	10, r : 6, cu	6, r, sn, fr.-r, w : 6, shs, cu
15	7·6	13·8	SW : WSW : NW	NW : N : W	11·0	0·84	429	p.-cl : 8, cu.-n, hy.-sh	7, cu.-n : v.-cl : 1, cu, ci
16	0·7	13·9	SW : Calm	SSW : S	3·8	0·24	316	1 : 10, th.-cl, ho.-fr : v.-cl, so.-ha, cu, s	10, cu.-n, fq.-slt.-r : 10, fq.-slt.-r
17	4·0	13·9	SSW : SW	SSW	17·0	1·27	619	10, r : 9 : 8, cu, sh	8, w, oc.-slt.-r: 6, fq.-slt.-r: 10, s, cu, w
18	0·5	14·0	SW	W : WSW : SW	9·9	1·36	633	10, fq.-slt.-r, w : 10, cu.-n, fq.-slt.-r	9, cu.-n, s, fq.-slt.-r: 9, fq.-slt.-r
19	1·1	14·0	SW	SW : W	5·8	0·64	503	9, w : 10, w : 10, cu.-n, slt.-shs	p.-cl, cu.-n, sh : 10, n, r
20	2·1	14·1	SW : SSW	SSW : SW	2·7	0·24	336	10, oc.-slt.-r : 10, cu.-n, oc.-slt.-r	6, cu, ci : 2 : o
21	6·1	14·2	SSW : SW	SSW : SSE : Calm	0·6	0·03	166	o : 1 : v.-cl, cu	7, cu : 10
22	0·0	14·2	Calm : NNE : NW	N : NW : W	3·2	0·29	243	10 : 10, cu.-n	10, cu.-n, sh: 7 : 10, cu.-n
23	6·9	14·3	WSW : SW	WSW : SW : SSW	2·0	0·17	307	o : 1 : 1, cu	6, cu : v.-cl : o
24	1·2	14·3	SSW : S	SSW : S : SSE	4·3	0·45	377	o : 6 : 10, cu.-n, s	10, cu.-n : 9 : o
25	11·3	14·4	SSE : S	SSW : S : Calm	2·2	0·14	224	o : p.-cl, cu, th.-cl	p.-cl, th.-cl: p.-cl, th.-cl: 1
26	8·9	14·5	Calm : E	E	2·0	0·12	186	1, th.-cl : 1, ci.-s, so.-ha	1, s, h, so.-ha o, h : o, h
27	5·4	14·5	Calm	Calm E	0·2	0·00	71	3, m : o, m	3, s, ci : p.-cl : 1, th.-cl, h
28	10·7	14·6	NNW : N	NE : ENE	3·0	0·23	258	1, h : 1, s.-cu, h, so.-ha	o : o
29	13·2	14·6	Calm : ENE	ENE : NNE	7·4	0·56	317	o : o	o : o
30	12·2	14·7	NNE : NE	NE : E	4·3	0·23	309	o : v.-cl : o, h	o : o
Means	5·9	13·8	..	..	..	0·39	313		
Number of Column for Reference	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 43°·7, being 0°·2 *lower* than
The mean *Temperature of the Dew Point* for the month was 39°·3, being 0°·8 *lower than*
The mean *Degree of Humidity* for the month was 72·8, being 3·0 *less* than
The mean *Elastic Force of Vapour* for the month was 0in·240, being 0in·008 *less* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 2grs·8, being 0gr·1 *less* than
The mean *Weight of a Cubic Foot of Air* for the month was 542 grains, being 1 grain *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by o and an overcast sky by 10) was 5·1.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·428. The maximum daily amount of *Sunshine* was 13·2 hours on April 29.

The highest reading of the *Solar Radiation Thermometer* was 131°·0 on April 29; and the lowest reading of the *Terrestrial Radiation Thermometer* was 24°·5 on April 8.

The *Proportions of Wind* referred to the cardinal points were N. 7, E. 4, S. 7, W. 8. Four days were calm.

The *Greatest Pressure of the Wind* in the month was 17·0 lbs. on the square foot on April 17. The mean daily *Horizontal Movement of the Air* for the month was 313 miles; the greatest daily value was 633 miles on April 18; and the least daily value was 71 miles on April 27.

Rain (0in·005 or over) fell on 12 days in the month, amounting to 1in·246, as measured by gauge No. 6 partly sunk below the ground; being 0in·320 *less* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER.	TEMPERATURE.							Difference between the Air Temperature and Dew Point Temperature.			Degree of Humidity (Saturation = 100).	TEMPERATURE.			Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
			Of the Air.					Of Evaporation.	Of the Dew Point.					Of Radiation.		Of the Earth 3 ft. 2 in. below the Surface of the Soil.		
		Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Mean of 24 Hourly Values.	Deduced Mean Daily Value.	Mean.	Greatest.	Least.		Highest in Sun's Rays.	Lowest on the Grass.			
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
May 1	..	29·726	68·0	45·4	22·6	55·3	+ 6·0	50·7	45·1	10·2	16·3	2·6	72	139·4	36·4	48·70	0·000	wP
2	New	29·698	51·0	46·2	4·8	48·6	− 0·9	47·2	45·6	3·0	6·1	0·2	90	66·8	45·4	48·95	0·451	v, wP : wwP, wwN : wwP
3	..	29·576	59·1	46·8	12·3	51·6	+ 1·8	49·6	47·7	3·9	8·3	0·0	86	92·5	39·3	49·20	0·014	wwP
4	..	29·410	69·8	45·0	24·8	57·5	+ 7·5	53·8	50·4	7·1	17·5	0·4	77	124·5	35·0	49·45	0·004	wwP
5	Greatest Dec. N.	29·198	74·6	48·3	26·3	60·7	+10·4	56·7	53·4	7·3	15·8	1·0	76	122·6	43·5	49·70	0·070	wwP
6	..	29·228	63·0	48·1	14·9	54·6	+ 4·1	52·0	49·5	5·1	13·9	0·0	82	112·2	43·0	49·95	0·015	wwP
7	Apogee	29·357	57·5	45·1	12·4	51·1	+ 0·4	47·9	44·6	6·5	12·3	1·4	78	103·2	37·7	50·27	0·103	wwP
8	..	29·490	48·2	36·7	11·5	44·3	− 6·7	42·0	39·3	5·0	7·7	0·5	82	72·4	29·4	50·44	0·192	..
9	..	29·563	55·4	35·5	19·9	45·4	− 5·8	44·3	43·1	2·3	3·4	0·0	91	76·6	27·9	50·30	0·225	.. : .. : ..
10	First Quarter	29·812	60·3	38·9	21·4	48·2	− 3·3	43·8	39·0	9·2	17·1	1·2	71	122·7	32·0	50·10	0·000	.. : .. : ..
11	..	29·881	58·1	41·1	17·0	49·8	− 2·0	47·7	45·5	4·3	9·2	0·9	86	93·5	30·4	49·77	0·000	.. : .. : ..
12	..	29·784	65·0	49·2	15·8	55·4	+ 3·3	53·0	50·7	4·7	10·8	0·8	85	113·0	36·3	49·80	0·004	.. : .. : ..
13	..	29·673	56·6	47·2	9·4	50·8	− 1·6	49·0	47·1	3·7	6·8	0·0	87	87·4	42·5	50·00	0·414	.. : .. : ..
14	..	29·689	61·0	42·2	18·8	51·3	− 1·3	47·8	44·2	7·1	12·0	0·4	77	105·0	35·1	50·29	0·038	.. : .. : ..
15	..	29·602	66·4	48·4	18·0	56·8	+ 4·0	53·2	49·9	6·9	19·2	0·2	77	122·8	42·0	50·30	0·038	.. : wwP : wwP
16	..	29·931	64·7	41·4	23·3	54·0	+ 1·0	50·4	46·9	7·1	16·1	1·5	76	117·0	31·5	50·50	0·002	wwP
17	Full	30·112	72·2	50·7	21·5	59·4	+ 6·3	55·9	52·8	6·6	14·3	0·8	79	127·2	42·1	50·80	0·000	wwP
18	..	30·219	75·9	46·2	29·7	61·3	+ 8·0	55·7	50·9	10·4	22·8	1·7	70	132·8	35·1	51·20	0·000	wwP
19	Perigee : Greatest Dec. S.	30·243	73·0	49·1	23·9	60·2	+ 6·7	55·9	52·1	8·1	17·2	0·2	75	137·0	46·8	51·70	0·000	wwP
20	..	30·126	78·1	45·1	33·0	63·2	+ 9·4	56·2	50·4	12·8	25·0	0·6	63	140·6	38·0	52·30	0·003	wP : wwP : wP
21	..	30·023	81·5	51·1	30·4	66·7	+12·5	59·9	54·4	12·3	23·4	2·9	65	140·1	44·1	52·90	0·000	wP : wwP : wwP
22	..	29·954	73·5	51·0	22·5	61·2	+ 6·6	56·4	52·2	9·0	16·4	4·9	73	135·0	37·3	53·50	0·004	wP
23	..	29·949	69·1	44·3	24·8	56·0	+ 1·1	50·7	45·7	10·3	17·2	2·7	69	126·7	30·0	54·10	0·000	wP
24	Last Quarter	29·669	71·0	45·1	25·9	58·1	+ 2·8	53·0	48·4	9·7	21·2	1·2	70	137·0	40·3	54·30	0·00	wP : wwP
25	..	29·492	66·3	49·0	17·3	56·0	+ 0·5	52·8	49·8	6·2	15·4	0·8	80	131·0	38·0	54·50	0·081	wP : wP : ..
26	..	29·716	68·0	44·6	23·4	55·0	− 0·8	49·2	43·6	11·4	23·9	1·3	66	144·9	37·4	54·70	0·000	.. : wP : wP
27	..	29·693	68·7	38·7	30·0	54·6	− 1·4	48·9	43·4	11·2	20·5	2·9	67	136·9	40·8	54·80	0·000	mP : wP
28	..	29·710	71·2	41·2	30·0	56·3	+ 0·1	50·2	44·6	11·7	22·6	1·5	66	141·4	33·6	54·90	0·000	wP
29	..	29·814	75·1	45·1	30·0	59·1	+ 2·7	51·9	45·5	13·6	25·2	1·5	61	150·2	29·1	55·00	0·000	wP : wP : wP, mP
30	..	29·874	68·2	46·6	21·6	55·2	− 1·5	52·3	49·5	5·7	13·7	1·4	82	116·8	37·2	55·27	0·430	wP
31	New	29·980	71·1	44·2	26·9	57·0	− 0·1	52·0	47·4	9·6	21·7	0·2	70	131·3	33·6	55·50	0·000	wP
Means	..	29·748	66·5	45·1	21·4	55·3	+ 2·3	51·3	47·5	7·8	15·9	1·2	75·8	119·4	37·1	51·72	Sum 2·088	..
Number of Column for Reference.	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29$^{in.}$·748, being 0$^{in.}$·046 *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 81°·5 on May 21; the lowest in the month was 35°·5 on May 9; and the range was 46°·0.
The mean of all the highest daily readings in the month was 66°·5, being 2°·6 *higher* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 45°·1, being 1°·4 *higher* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 21°·4, being 1°·2 *greater* than the average for the 65 years, 1841–1905.
The mean for the month was 55°·3, being 2°·3 *higher* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	P.M.	Pressure on the Square Foot. Greatest.	Mean of 24 Hourly Measures.	Robinson's. Horizontal Movement of the Air.	Clouds and Weather. A.M.	P.M.
	hours.	hours			lbs.	lbs.	miles.		
May 1	12·0	14·8	NNE : NE	NE : ENE	4·3	0·50	345	v.-cl, slt.-sh : 1, cu, th.-cl	p.-cl, ci, cu, s: 8 : 8, oc.-t.-l
2	0·0	14·8	ENE : NE	NE : Calm	4·0	0·31	273	10,fq.-shs,oc.-t.-l: 10, fq.-r, cu.-n	10, n, fq.-r : 10, oc.-slt.-r: 10
3	0·1	14·9	Calm : SW	SW : Calm	0·9	0·05	161	10, oc.-m.-r : 10, cu.-n	10, cu.-n : 10 : 1
4	2·5	14·9	Calm : NE : E	E : SSE : Calm	2·0	0·11	165	p.-cl, h, slt.-sh: 9, slt.-sh: 10, th.-cl, slt.-r, so.-ha	6, cu, th.-cl, h : 6, cu, s.-cu
5	1·5	15·0	Calm : NNE	NNE : NW : N	1·6	0·10	230	10,th.-cl,r: v.-cl : 8, cu	8, cu, slt.-r : 10, fq.-slt.-r, hy.-sh
6	2·9	15·1	Calm : SSW : S	S : SSW	4·2	0·45	331	10, fq.-slt.-r: 9 : 9,cu.-n,oc.-slt.-r	7, cu.-s : 10, l
7	4·0	15·1	S : SSW	S : SSW	3·6	0·37	320	10, slt.-sh: 9 : 10, cu.-n, r	10, cu.-n, r : p.-cl. : 3
8	0·0	15·2	S : SW	SW	4·5	0·61	423	10, oc.-r : 10, cu.-n, c.-r	10,c.-r,cu.-n: 8 : 0
9	0·0	15·2	Calm : SE : S	S : SW : WNW	3·8	0·21	304	8 : 10, slt.-r : 10, cu.-n, c.-r	10, fq.-r : 10, r : 10
10	8·6	15·3	W : WSW	WSW : SSW	2·0	0·16	248	p.-cl : 0 : p.-cl, cu, th.-cl	v.-cl, cu, th.-cl : v.-cl, lu.-ha
11	0·3	15·3	SSW : S	SSW : S	0·9	0·06	180	v.-cl : 9, cu.-n	9,cu.-n, slt.-sh : 9, cu.-n, s
12	0·2	15·4	Calm : SSW	SW : SSW	0·6	0·04	156	10 : 10, cu.-n	9, cu.-n : 10, th.-r : 10, r
13	0·0	15·4	SSW : Calm : NNW	NW : WNW : NNW	3·2	0·20	241	10, r : 10, r : 10, cu.-n, th.-r	10, fq.-slt.-r : 10, cu.-n, s, oc.-r
14	3·3	15·5	NW : Calm : W	WSW : SW	3·0	0·21	308	p.-cl : p.-cl : 10, cu	10, cu.-n : 10 : 10, r, m.-r
15	5·8	15·5	SW : W	NW : W	4·1	0·53	424	10, r : 9, cu.-n, oc.-r	9, cu, n : 7 : 0, h
16	3·0	15·6	SW	SSW : SW	2·1	0·14	237	1 : p.-cl : 9, s.-cu, sh	9, s.-cu,cu,slt.-shs: p.-cl
17	10·5	15·6	SW : Calm	SSW : Calm	0·3	0·01	120	10, slt.-m: 10, m : 1, h, cu	0 : 0
18	12·6	15·7	Calm : NE	NE : ESE : E	0·8	0·07	148	0, slt.-m, hy.-d : 0, h	0, h : 0, h
19	12·9	15·7	Calm E	E : Calm	1·0	0·10	172	0, slt.-h : 0, h : p.-cl, ci.-cu, th.-cl	p.-cl, th.-cl : 1, cu
20	14·6	15·8	Calm : SSW	SSW : Calm	1·5	0·09	173	0, hy.-cl : 1, cu, th.-cl	p.cl,cu,th.-cl,so.-ha: 1, s, th.-cl.
21	13·7	15·8	Calm : SSW : SW	S	1·7	0·13	190	1 : 1	0 : 1
22	1·9	15·9	SSW : WSW	WNW : NW	2·6	0·19	257	p.-cl,th.-cl: 9 : 7, cu, s.-cu,th.-cl	9, th.-r : 6 : 1
23	5·8	15·9	NW : SSW : W	WSW : SW : Calm	1·2	0·05	179	1 : th.-cl, h : 6, cu	7, cu, s, so.-ha : 1, s, l
24	8·7	16·0	Calm : SE : ESE	ESE Calm	1·1	0·06	157	v.-cl : 1, th.-cl,so.-ha: 8, so.-ha	v.-cl : v.-cl, th.-cl
25	6·5	16·0	ESE : SSW	SSW : SW : W	3·1	0·21	270	7 : 10, r : 9, cu.-n, oc.-slt.-r	6, cu : v.-cl : p.-cl,th.-cl,h
26	13·3	16·0	W : WSW	SW : S	0·8	0·08	181	p.-cl, th.-cl: p.-cl, so.-ha th.-cl,: 6, cu, th.-cl	6, cu : 1, h
27	8·6	16·1	Calm SE	SE : SSE	0·6	0·03	108	1 : 3 : v.-cl, cu,so.-ha	6, th.-r.-sh: 6
28	12·8	16·1	Calm : SW	SW : SSW	1·9	0·08	179	1 : 0 : v.-cl, cu, n	6, cu : v.-cl : 0
29	13·1	16·1	SW : Calm	SW : Calm	1·0	0·06	139	0 : 1 : 6, cu	7, cu : 3, s.-cu, h
30	3·6	16·2	Calm : N : E	SE : S : Calm	1·5	0·05	115	1, h : 8 : 6, cu, s, h, p.-so.-ha	9, t.-sm, cu,s,glm : 6, cu.-n, s, slt.-sh
31	8·8	16·2	Calm : SW : W	WSW : W	1·8	0·10	194	9, th.-cl, m: 10, th.-cl, m: v.-cl, cu, h	p.-cl, s.-cu, so.-ha: p.-cl
Means	6·2	15·6	..	..	..	0·17	223		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 51°·3, being 2°·3 *higher* than
The mean *Temperature of the Dew Point* for the month was 47°·5, being 2°·5 *higher* than
The mean *Degree of Humidity* for the month was 75·8, being 1·6 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in·329, being 0in·030 *greater* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 3grs·7, being 0gr·3 *greater* than
The mean *Weight of a Cubic Foot of Air* for the month was 535 grains, being 3 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 6·0.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·397. The maximum daily amount of *Sunshine* was 14·6 hours on May 20

The highest reading of the *Solar Radiation Thermometer* was 150°·2 on May 29; and the lowest reading of the *Terrestrial Radiation Thermometer* was 27°·9 on May 9.

The *Proportions of Wind* referred to the cardinal points were N. 3, E. 4, S. 10, W. 8. Six days were calm.

The *Greatest Pressure of the Wind* in the month was 4·5 lbs. on the square foot on May 8. The mean daily *Horizontal Movement of the Air* for the month was 223 miles; the greatest daily value was 424 miles on May 15; and the least daily value was 108 miles on May 27.

Rain (0in·005 or over) fell on 12 days in the month, amounting to 2in·088, as measured by gauge No. 6 partly sunk below the ground; being 0in·173 *greater* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER.	TEMPERATURE.							Difference between the Air Temperature and Dew Point Temperature.			Degree of Humidity (Saturation = 100).	TEMPERATURE.			Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
			Of the Air.					Of Evaporation.	Of the Dew Point.					Of Radiation.		Of the Earth 3 ft. 2 in. below the Surface of the Soil.		
		Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Mean of 24 Hourly Values.	Deduced Mean Daily Value.	Mean.	Greatest.	Least.		Highest in Sun's Rays.	Lowest on the Grass.			
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
June 1	Greatest Dec. N.	29·873	63·6	51·1	12·5	55·8	— 1·6	52·6	49·6	6·2	12·2	2·4	81	110·8	40·1	55·51	0·003	wP
2	..	29·821	66·0	44·8	21·2	54·6	— 3·2	48·5	42·6	12·0	21·0	1·9	65	138·0	27·2	55·59	0·000	wP : mP : mP
3	Apogee	29·816	61·7	42·8	18·9	50·7	— 7·4	46·4	41·9	8·8	16·9	3·4	72	134·0	29·5	55·64	0·000	mP
4	..	29·540	56·0	39·7	16·3	49·0	— 9·3	46·9	44·6	4·4	10·7	0·0	85	107·0	26·2	55·50	0·101	.. : .. : ..
5	..	29·214	61·8	47·3	14·5	54·1	— 4·3	50·5	46·2	7·9	11·5	0·6	76	126·0	42·3	55·30	0·127	wP, wP : v, wP
6	..	29·442	59·7	44·6	15·1	51·2	— 7·1	47·6	43·7	7·5	13·1	1·1	77	125·4	35·7	55·10	0·093	wP : v : v, wP
7	..	29·501	60·1	40·0	20·1	49·0	— 9·2	45·9	42·6	6·4	10·7	2·0	78	125·3	29·7	54·90	0·241	wP : v, wP
8	First Quarter	29·556	64·5	40·4	24·1	50·8	— 7·3	46·9	42·8	8·0	18·5	1·1	75	131·6	32·9	54·79	0·020	wP
9	..	29·653	65·9	42·3	23·6	51·6	— 6·4	47·1	42·5	9·1	19·3	1·1	72	135·3	31·5	54·62	0·007	wP
10	..	29·912	61·1	46·2	14·9	50·2	— 7·9	47·9	45·5	4·7	12·6	0·0	84	126·1	34·9	54·60	0·443	wP : v : v, wP
11	..	29·979	59·7	43·9	15·8	50·9	— 7·3	47·6	44·2	6·7	12·2	0·0	79	119·0	45·1	54·51	0·113	wP : v, wP
12	..	29·789	50·1	43·7	6·4	46·6	— 11·8	44·4	41·9	4·7	5·9	0·7	85	85·5	42·7	54·40	0·150	wP, wwN : mP : wP
13	..	29·647	56·6	45·6	11·0	49·9	— 8·6	47·6	45·2	4·7	7·0	1·9	85	100·8	45·0	54·25	0·040	wP : wP, .. : .., wP
14	..	29·873	53·6	46·1	7·5	48·7	— 10·0	46·3	43·7	5·0	7·7	1·9	83	70·1	37·3	53·90	0·000	wP
15	Full: Greatest Dec. S.	29·955	60·9	44·7	16·2	51·0	— 7·8	47·6	44·1	6·9	14·6	3·3	78	124·0	42·0	53·71	0·000	wP : mP : wP
16	Perigee	30·087	61·9	44·2	17·7	51·8	— 7·1	47·0	42·1	9·7	16·1	3·2	70	135·9	35·4	53·70	0·000	wP : mP, wP : wP
17	..	29·998	64·4	38·9	25·5	51·8	— 7·2	48·2	44·6	7·2	15·0	2·0	76	135·7	28·2	53·70	0·000	mP : wP
18	..	29·832	61·6	45·6	16·0	52·5	— 6·7	49·7	46·9	5·6	13·2	3·0	81	119·0	46·1	53·80	0·000	wP
19	..	29·811	57·0	45·3	11·7	52·3	— 7·2	49·4	46·4	5·9	11·0	2·5	80	97·3	32·6	54·12	0·000	wP
20	..	29·948	65·3	44·2	21·1	56·2	— 3·7	48·5	41·3	14·9	21·6	1·1	57	138·1	31·8	54·41	0·000	wP : mP, wP : mP
21	..	29·982	69·0	50·5	18·5	57·8	— 2·5	52·6	47·9	9·9	17·2	3·8	70	133·4	44·8	54·61	0·000	wP
22	Last Quarter	29·836	71·3	45·2	26·1	59·4	— 1·2	55·1	51·3	8·1	15·9	1·5	75	138·6	32·0	55·03	0·000	wP : wP, wwP : wwP, wP
23	..	29·719	69·5	53·5	16·0	60·0	— 0·9	57·2	54·8	5·2	10·3	1·2	83	117·0	44·9	55·40	0·040	wP : wwP
24	..	29·708	67·3	52·1	15·2	57·9	— 3·3	55·2	52·8	5·1	13·6	1·0	83	134·0	41·9	55·90	0·032	wP : wP : .., wP
25	..	29·793	73·3	50·3	23·0	59·4	— 2·0	55·1	51·3	8·1	18·0	0·0	75	148·0	42·5	56·21	0·000	wP : wwP : wwP
26	..	29·652	66·1	49·1	17·0	55·9	— 5·6	53·5	51·3	4·6	13·1	1·0	85	121·1	41·2	56·40	0·027	wP
27	..	29·549	70·0	51·1	18·9	58·3	— 3·3	55·6	53·1	5·2	13·6	0·6	83	131·0	47·5	56·70	0·120	wP
28	Greatest Dec. N.	29·593	66·2	53·0	13·2	57·3	— 4·3	54·5	52·0	5·3	11·8	1·8	82	128·6	51·9	56·81	0·110	wP
29	..	29·698	66·9	49·2	17·7	56·1	— 5·5	51·8	47·0	9·1	16·0	0·0	73	126·5	45·7	57·00	0·200	wP
30	New	29·691	69·2	50·1	19·1	58·2	— 3·3	54·5	51·2	7·0	22·1	0·4	78	131·1	42·2	56·99	0·010	wP
Means	..	29·749	63·3	46·2	17·2	53·6	— 5·8	50·1	46·5	7·1	14·1	1·5	77·5	123·1	38·3	55·10	Sum 1·877	..
Number of Column for Reference.		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29$^{in.}$·749, being 0$^{in.}$·066 *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 73°·3 on June 25; the lowest in the month was 38°·9 on June 17; and the range was 34°·4.
The mean of all the highest daily readings in the month was 63°·3, being 7°·4 *lower* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 46°·2, being 3°·7 *lower* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 17°·2, being 3°·6 *less* than the average for the 65 years, 1841–1905.
The mean for the month was 53°·6, being 5°·8 *lower* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's. Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
June 1	0·5	16·2	SW : SSW	SSW : SW	4·0	0·44	368	p.-cl : 9 : 9, cu.-n, so.-ha	10, cu.-n, oc.-slt.-r : 10, cu.-n, oc.-slt.-r
2	9·8	16·3	NW : SW : W	W : WNW	2·6	0·23	262	1 : 1 : 8, cu, th.-cl	8, s.-cu, so.-ha : 8 : p.-cl, s.-cu
3	7·0	16·3	NW : N	N : W	2·2	0·14	179	v.-cl. : v.-cl, cu	8, oc.-slt.-r : : 7, cu.-n, oc.-slt.-r
4	3·7	16·3	SSW	SSW	8·0	0·73	436	p.-cl : p.-cl : 10, cu.-n, slt.-r	10, r, w : 10, n, r, w
5	8·8	16·4	SW	SW	9·4	0·91	493	9, fq.-r : v.-cl : v.-cl, fq.-r	8, oc.-r, slt.-t.-sm : v.-cl : v.-cl, cu.-n
6	6·7	16·4	SW : WSW	WNW : SW	4·5	0·34	309	1 : 8, oc.-slt.-r : 10, t.-sm	8, cu.-n, fq.-shs : v.-cl, shs : 3
7	9·6	16·4	SW : SSW	SSW : SW	4·0	0·34	279	1 : v.-cl, cu, slt.-sh	8, cu.-n, shs. t.-sm : v.-cl : 1, ci.-cu
8	6·3	16·4	SW	SSW : SW : Calm	1·6	0·19	226	1 : p.-cl : v.-cl, cu	v.-cl, cu, shs, fr.-r : 6 : p.-cl
9	6·5	16·4	Calm : NNW : W	WSW : W	3·2	0·18	226	9 : 8 : 7, cu	6, cu.-n, oc.-shs : p.-cl, ci.-cu
10	3·2	16·5	W : Calm : NW	W : Variable : Calm	8·2	0·18	158	10 : 9 : v.-cl, slt.-shs, t	9, cu.-n, r : 8, w., r
11	3·6	16·5	SW : W : NW	WNW : NNW	2·3	0·15	214	7 : 9, cu.-n	10, ci.-cu, n, oc.-shs, so.-ha : 10, n
12	0·0	16·5	NNW : W : NW	NW : WSW	2·5	0·26	294	10, slt.-shs : 10, n, fq.-r	10, w, fq.-r : 10, slt.-r
13	2·3	16·5	NW : NNW	NNW : N	9·0	1·20	502	10 : 10, r : 10, cu.-n	9, oc.-r : 10
14	0·0	16·5	NNW : N	NNW : WSW	5·8	0·35	318	10 : 10, n	10, n : p.-cl
15	5·5	16·5	NW : SW : N	NNE	3·2	0·38	319	10 : 10, cu.-n	v.-cl : v.-cl : 6, s, h
16	8·6	16·5	NNE : NE	ENE : E	3·0	0·35	305	10 : 10 : 7, cu	p.-cl : p.-cl : 1
17	13·2	16·6	NNE : NE	ENE : E : ESE	1·8	0·22	250	1 : 7 : 1, cu, w	0, w : 0 : 10
18	6·2	16·6	NE : NNE	N : Calm	1·1	0·13	183	10 : 10, n	p.-cl : v.-cl : 10, s.-cu
19	0·2	16·6	NNW : NW : W	N : NE : Calm	2·5	0·18	216	10 : 10, cu.-n	10, n : 10 : v.-cl
20	7·7	16·6	SSW : WSW : N	NW : NNW	2·1	0·21	254	9 : 10 : p.-cl, cu	8, cu : 8, cu
21	2·5	16·6	W	W : SW	1·9	0·13	221	9 : 9, cu	7, cu : 7 : 2
22	4·1	16·6	SW : SSW	SSW : S : SSE	2·1	0·13	209	1 : 1 : 9, n	9, sh : 9, s.-cu
23	0·3	16·6	Calm : S : SSW	S : SSW	1·6	0·08	194	10, sh : 10 : 8, oc.-slt.-r	8, cu, r : v.-cl, r : 6, s, n
24	6·4	16·6	SSW	SW : WSW	6·5	0·44	331	9, sh : 8 : 9, r, cu	6, cu, sh : 1, cu, n
25	12·0	16·6	SW : WSW : W	W : WSW : SW	1·9	0·18	266	1 : v.-cl : p.-cl, cu	6, cu : v.-cl : 1
26	0·1	16·5	SW : WSW	SW : Calm	1·3	0·09	181	1 : 9 : 10, cu.-n	10, n, oc.-slt.-r : 10, oc.-slt.-r
27	1·7	16·5	Calm : NW : N	N : NE : Calm	1·1	0·09	150	10, oc.-m.-r : 10 : 7, ci.-cu, cu	7, ci.-cu, cu : 10, hy.-shs : 10, r
28	1·1	16·5	NNE : N	NNW : W	2·4	0·14	218	10, oc.-slt.-r : 10, n	10, oc.-shs : 10, oc.-slt.-shs
29	3·2	16·5	NW : W : WSW	WSW : W : SW	3·8	0·40	347	10 : 9, cu, ci.-s	7, cu : 10, n, r
30	7·6	16·5	SW : WSW : WNW	NW : W	6·1	0·63	411	10, r : 10 : 9, slt.-sh	6, cu, w : v.-cl : 1, ci, s
Means	4·9	16·5	..	..	..	0·32	277		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 50°·1, being 4°·8 *lower* than
The mean *Temperature of the Dew Point* for the month was 46°·5, being 4°·4 *lower* than
The mean *Degree of Humidity* for the month was 77·5, being 3·9 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in.·317, being 0in.·056 *less* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 3grs.·6, being 0gr.·6 less than
The mean *Weight of a Cubic Foot of Air* for the month was 536 grains, being 5 grains *greater* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 7·3.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·300. The maximum daily amount of *Sunshine* was 13·2 hours on June 17.

The highest reading of the *Solar Radiation Thermometer* was 148°·0 on June 25; and the lowest reading of the *Terrestrial Radiation Thermometer* was 26°·2 on June 4.

The *Proportions of Wind* referred to the cardinal points were N. 9, E. 1, S. 6, W. 12. Two days were calm.

The *Greatest Pressure of the Wind* in the month was 9·4 lbs. on the square foot on June 5. The mean daily *Horizontal Movement of the Air* for the month was 277 miles; the greatest daily value was 502 miles on June 13; and the least daily value was 150 miles on June 27.

Rain (0in.·005 or over) fell on 17 days in the month, amounting to 1in.·877, as measured by gauge No. 6 partly sunk below the ground; being 0in.·161 *less* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
July 1	Apogee	29·768	68·0	46·4	21·6	57·1	− 4·4	53·3	49·5	7·6	15·7	1·4	76	135·7	34·5	57·01	0·000	wP
2	..	29·651	72·1	46·5	25·6	57·9	− 3·7	53·6	49·7	8·2	17·5	1·3	74	140·0	34·5	57·19	0·000	wP : wP, wwP : wwP, wP
3	..	29·602	67·0	49·9	17·1	57·2	− 4·6	54·9	52·8	4·4	11·3	1·4	86	118·1	41·0	57·35	0·064	wP
4	..	29·592	70·6	46·1	24·5	58·4	− 3·7	55·1	52·1	6·3	12·7	0·0	80	118·2	36·2	57·49	0·000	wP
5	..	29·724	75·0	50·7	24·3	60·0	− 2·3	56·7	53·9	6·1	16·6	0·4	80	130·1	42·9	57·65	0·020	wP : wP : wP, ..
6	..	29·767	66·1	52·5	13·6	57·6	− 4·8	54·5	51·7	5·9	13·0	1·2	81	102·9	43·0	57·79	0·006	.. : wP
7	..	29·408	70·1	55·8	14·3	59·6	− 2·8	58·0	56·1	3·5	7·1	1·0	90	137·1	51·6	57·78	0·809	wwP
8	First Quarter	29·469	70·0	53·7	16·3	60·1	− 2·3	55·5	51·5	8·6	16·8	0·4	73	129·9	47·5	57·92	0·000	wwP : wP
9	..	29·707	71·5	47·2	24·3	57·8	− 4·6	53·2	49·0	8·8	18·5	0·8	72	150·0	37·6	58·08	0·000	wP : wwP
10	..	29·779	69·5	50·8	18·7	57·2	− 5·3	53·6	50·2	7·0	16·1	1·8	78	151·1	40·0	58·19	0·052	wP
11	..	29·895	69·8	53·1	15·7	58·1	− 4·6	53·6	49·8	8·3	17·0	3·2	74	131·4	47·2	58·19	0·000	wP
12	..	29·808	67·4	54·2	13·2	58·4	− 4·5	55·6	53·0	5·4	15·5	0·8	83	126·4	50·0	58·21	0·014	wwP
13	Greatest Dec. S.	29·683	63·9	56·1	7·8	59·2	− 3·9	58·0	56·9	2·3	6·0	0·0	93	91·1	53·8	58·28	0·214	wwP
14	..	29·825	66·1	51·9	14·2	57·0	− 6·3	54·2	51·6	5·4	13·4	0·0	82	130·1	45·6	58·39	0·001	wwP : wP : wP
15	Perigee : Full	29·996	63·7	47·3	16·4	55·7	− 7·7	51·8	48·1	7·6	12·9	0·4	76	105·0	38·8	58·31	0·000	wP : wP : .., wwP
16	..	29·913	64·7	51·1	13·6	58·1	− 5·3	56·9	55·8	2·3	4·8	0·0	91	82·9	44·1	58·20	0·162	wwP : .. : ..
17	..	29·863	64·1	57·2	6·9	60·5	− 2·9	59·1	57·9	2·6	3·9	0·0	92	75·9	57·5	58·20	0·009	wwP
18	..	29·922	69·6	50·6	19·0	58·5	− 4·8	54·3	50·5	8·0	16·6	0·4	75	140·3	40·6	58·33	0·017	wwP
19	..	29·923	73·8	50·6	23·2	60·4	− 2·8	55·4	51·1	9·3	19·4	1·2	71	128·2	40·6	58·30	0·000	wwP : wP : wP
20	..	30·006	74·2	49·9	24·3	62·0	− 1·2	57·6	53·8	8·2	17·2	1·2	75	137·2	39·9	58·51	0·000	wwP
21	Last Quarter	30·059	77·2	51·9	25·3	64·4	+ 1·2	59·7	55·8	8·6	17·5	0·4	74	139·8	42·8	58·79	0·000	wwP
22	..	30·054	69·5	51·4	18·1	60·4	− 2·7	57·3	54·6	5·8	14·0	0·8	82	135·2	40·5	59·04	0·031	wwP
23	..	30·042	59·0	49·1	9·9	54·3	− 8·7	52·4	50·5	3·8	6·1	1·2	87	80·0	37·8	59·27	0·000	wP : wwP
24	..	30·023	59·7	50·3	9·4	54·8	− 8·1	52·7	50·7	4·1	7·2	1·6	86	70·2	42·5	59·25	0·000	.. : wwP : wP
25	..	29·996	68·7	51·5	17·2	58·5	− 4·2	55·6	53·6	4·9	11·7	0·2	83	133·8	41·1	59·20	0·000	wwP
26	Greatest Dec. N.	29·964	72·2	47·5	24·7	60·5	− 2·0	57·1	54·2	6·3	13·7	0·0	80	140·0	38·0	59·19	0·000	wP : wwP : wwP
27	..	29·952	76·7	54·0	22·7	63·4	+ 1·0	60·2	57·5	5·9	16·4	0·2	81	143·0	43·9	59·31	0·000	wwP
28	Apogee	30·070	78·0	55·6	22·4	65·2	+ 2·9	61·1	57·8	7·4	18·1	0·0	78	125·7	46·5	59·62	0·000	wwP
29	..	30·167	79·3	56·0	23·3	66·4	+ 4·1	60·3	55·4	11·0	23·0	0·8	68	132·7	43·0	60·10	0·000	wwP : wP : wwP
30	New	30·090	82·4	51·1	31·3	66·8	+ 4·5	60·7	55·8	11·0	21·3	0·0	69	137·0	41·0	60·38	0·000	wwP
31	..	30·015	83·9	55·7	28·2	68·7	+ 6·5	62·1	56·9	11·8	21·5	1·5	65	127·9	46·6	60·69	0·000	wwP
Means	..	29·862	70·4	51·5	18·9	59·8	− 2·8	56·3	53·2	6·7	14·3	0·8	79·2	123·4	42·9	58·52	Sum 1·399	..
Number of Column for Reference.		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29^{in}·862, being 0^{in}·063 *higher* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 83°·9 on July 31; the lowest in the month was 46°·1 on July 4; and the range was 37°·8.
The mean of all the highest daily readings in the month was 70°·4, being 3°·8 *lower* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 51°·5, being 1°·8 *lower* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 18°·9, being 2°·0 *less* than the average for the 65 years, 1841–1905.
The mean for the month was 59°·8, being 2°·9 *lower* than the average for the 65 years 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
July 1	8·5	16·5	WSW : SW	SW : WSW	6·5	0·60	376	6, ci.-cu : 6, p.-so.-ha	6 : 8, w : 1, ci.-cu
2	9·8	16·5	WSW : W	W : WSW : SW	2·6	0·28	298	1 : 1 : v.-cl, cu	8 : 8
3	0·3	16·5	WSW : Calm	S : W : Calm	0·5	0·00	101	9 : 10, r, slt.-r, cu.-n	10, cu.-n, fq.-shs : 8, fq.-th.-r : 10
4	5·2	16·4	Calm : SW : NE	Calm : NE : WSW	0·4	0·01	74	3 : 7 : 8,cu, h, p.-so.-ha	v.-cl, cu, h : 8 : 1,h,cu, ci.-cu
5	3·8	16·4	Calm : NE : N	N : W : Calm	3·4	0·08	119	10, h : 10, h : 7, s, ci.-cu	p.-cl, h : v.-cl, sh : v.-cl, h
6	1·1	16·4	W : WSW	SW : SSW	1·4	0·14	238	10 : 7, so, ha: 10, cu.-n	10 : 9, n, s, oc.-slt.-r
7	4·3	16·4	S : SW	SW : WSW	1·9	0·18	215	10, m.-r, r : 10, cu.-n, r	9,cu.-n, oc.-r,t,l: 9,oc.-slt.-r : p.-cl, ci.-cu
8	6·1	16·4	SW : W : NW	NW : WNW : W	1·2	0·14	244	8, m.-r.-sh : 8, cu.-n	8 : 8
9	8·5	16·3	W : WSW	W : WSW	2·2	0·18	271	1 : 1 : v.-cl, cu	8, cu.-n : 8 : v.-cl, cu
10	5·1	16·3	WSW	WSW : W	4·4	0·27	296	10 : 10, slt.-r : v.-cl, cu.-n, slt.-r	v.-cl, oc.-shs : v.-cl : 9, cu.-n, s
11	1·3	16·3	W : WNW	WNW : W	3·2	0·30	358	10 : 10 : 8, cu.-n, cu	7, cu, ci.-cu: 9 : 10, cu.-n
12	2·7	16·2	W : WSW	SW : WSW	6·4	0·61	428	10 : 9 : p.-cl	10, oc.-r : 10, oc.-slt.-r, w: 10
13	0·0	16·2	WSW : W	W : WSW : SW	3·2	0·23	315	10, oc.-m.-r : 10, cu.-n, r	10, cu.-n, fq.-r : 10, fq.-r
14	1·9	16·2	NW : NNW	NNE : N	1·2	0·05	191	8 : 10 : 10, cu.-n	10,cu.-n,slt.-sh: 10, cu.-n : 8
15	2·4	16·1	N : W : NW	NW : Calm : W	2·2	0·13	236	6 : 3, h : 8, cu.-n	10, cu.-n : v.-cl : 9
16	1·0	16·1	W	WSW : W	2·0	0·12	274	v.-cl : 10, r	10, cu.-n, slt.-r : 10, n, m.-r
17	0·0	16·0	NW : N	N	0·6	0·01	143	10 : 10, m.-r : 10, s, slt.-r	10, s : 10, s
18	5·8	16·0	NNE : NE	NE : SE : S	2·5	0·16	247	10, slt.-r : 10, oc.-m.-r: 7, cu	p.-cl, cu : p.-cl : 1, ci.-cu,s,p.-so.-ha
19	11·2	16·0	NNE : W	NNW : N : Calm	1·1	0·05	155	10, slt.-sh 2, ci, n	8, ci, so.-ha: 1, cu : v.-cl, s
20	9·9	15·9	N : Calm : E	ESE : Calm	0·8	0·04	116	0, h : 0, h	0, h : 0 : 10
21	2·0	15·9	Calm : WE	NE : E	0·5	0·02	115	p.-cl : 6, h : 7, s, h	7, h : 8 : 10
22	7·5	15·8	E : NE	NE : Calm	1·0	0·10	190	10, sh : 10, slt.-glm, n	p.-cl, cu.-n : 1
23	0·0	15·8	NE	NNE : NE	0·9	0·10	176	10 : 10, n	10, n : 10
24	0·0	15·7	NE : NNE	NNE : Calm	0·7	0·05	128	10 : 10	10 : 9
25	7·2	15·7	Calm : NNE	NE : E : SE	0·6	0·02	121	10 : 10, cu.-n, s	v.-cl, cu.-n : 1 : 1, s
26	8·8	15·7	Calm : SE	E : SE : Calm	0·4	0·01	118	0, m : 10 : 0	0 : 0
27	9·2	15·6	Calm : E	E : SE : Calm	0·5	0·02	111	0 : 0, h : 0, cu, h	3, cu : p.-cl, s : 0, f
28	8·2	15·6	Calm N	N : NE : Calm	0·8	0·02	106	h, m : 10, h, th.-cl, m: 10, s, h	10,th.-cl, h : 0 : 0, h
29	12·3	15·5	N	N : Calm	0·7	0·03	117	0, h : 0, h	0 : 0, h
30	13·8	15·5	Calm : NW	NNW : Calm	0·7	0·01	128	0, h : 1, h	2, h : 0
31	7·7	15·4	Calm : N	NNE : Calm	1·9	0·06	132	0, h : 0, slt.-h	8, cu : 8 : 0
Means	5·3	16·0	..	..	..	0·13	198		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 56°·3, being 1°·6 *lower* than
The mean *Temperature of the Dew Point* for the month was 53°·2, being 0°·6 *lower* than
The mean *Degree of Humidity* for the month was 79·2, being 6·4 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in.406, being 0in.009 *less* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 4grs.5, being 0gr.1 *less* than
The mean *Weight of a Cubic Foot of Air* for the month was 531 grains, being 4 grains *greater* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 6·7.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·333. The maximum daily amount of *Sunshine* was 13·8 hours on July 30.

The highest reading of the *Solar Radiation Thermometer* was 151°·1 on July 10; and the lowest reading of the *Terrestrial Radiation Thermometer* was 34°·6 on July 1 and 2.

The *Proportions of Wind* referred to the cardinal points were N. 7, E. 3, S. 4, W. 9. Eight days were calm.

The *Greatest Pressure of the Wind* in the month was 6·5 lbs. on the square foot on July 1. The mean daily *Horizontal Movement of the Air* for the month was 198 miles; the greatest daily value was 428 miles on July 12; and the least daily value was 74 miles on July 4.

Rain (0in.005 or over) fell on 11 days in the month, amounting to 1in.399 as measured by gauge No. 6 partly sunk below the ground; being 1in.000 *less* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Aug. 1	..	30·011	83·8	58·3	25·5	70·2	+ 8·0	63·5	58·4	11·8	22·7	1·1	66	147·9	47·7	61·24	0·000	wwP
2	..	30·060	82·5	57·6	24·9	68·4	+ 5·7	62·3	57·5	10·9	19·2	1·7	68	130·2	45·0	61·65	0·000	wwP : wwP : wP
3	..	30·142	82·0	56·6	25·4	69·7	+ 7·6	60·8	53·9	15·8	23·7	6·1	57	138·9	45·0	61·98	0·000	wP : wP, wwP : wwP, wP
4	..	30·127	73·1	52·9	20·2	64·2	+ 2·1	57·6	52·1	12·1	20·2	4·2	64	123·5	41·7	62·19	0·000	wP
5	..	30·154	75·0	51·3	23·7	61·4	− 0·7	54·5	48·6	12·8	24·7	3·1	63	143·2	40·5	62·36	0·000	wP
6	First Quarter	30·061	76·2	50·8	25·4	62·5	+ 0·3	56·9	52·1	10·4	19·0	2·3	69	127·8	42·0	62·39	0·000	wP : wwP
7	..	30·081	71·8	51·6	20·2	58·4	− 3·8	53·7	49·5	8·9	19·3	3·2	73	143·8	45·0	62·12	0·000	wwP : wP : wwP : wP
8	..	30·083	70·8	49·6	21·2	59·4	− 2·9	55·6	52·2	7·2	15·9	1·3	78	146·5	39·8	62·20	0·000	wP : wwP
9	Greatest Dec. S.	29·997	81·8	57·4	24·4	67·1	+ 4·8	60·8	55·7	11·4	22·8	0·0	67	149·6	47·0	61·90	0·000	wwP
10	..	29·977	81·6	54·4	27·2	66·7	+ 4·4	60·5	55·6	11·1	24·2	2·7	68	134·0	45·9	62·11	0·000	wP : wP : wwP
11	..	29·936	77·3	57·1	20·2	66·8	+ 4·4	61·8	57·8	9·0	17·7	1·3	74	113·1	47·0	62·20	0·000	wP : wP : wwP
12	Perigee	29·755	83·5	57·4	26·1	69·0	+ 6·5	63·0	58·3	10·7	24·3	0·9	68	151·1	47·7	62·40	0·023	wwP
13	Full	29·596	76·8	58·1	18·7	66·8	+ 4·3	62·0	58·2	8·6	17·6	0·9	74	137·4	49·0	62·61	0·000	wwP
14	..	29·467	75·2	59·4	15·8	64·9	+ 2·4	61·7	59·0	5·9	12·6	2·6	81	133·2	54·6	62·70	0·388	wwP
15	..	29·458	68·2	56·6	11·6	60·8	− 1·6	57·5	54·7	6·1	12·2	1·1	81	118·8	51·0	62·70	0·089	wwP
16	..	29·549	71·4	54·3	17·1	61·6	− 0·7	57·3	53·6	8·0	14·5	0·4	76	136·5	48·7	62·60	0·060	wwP
17	..	29·529	70·6	55·1	15·5	60·8	− 1·3	58·2	56·0	4·8	12·1	0·0	84	135·1	51·0	62·50	0·388	wwP : wwP, wwN : wN
18	..	29·602	67·6	55·2	12·4	59·5	− 2·4	56·6	54·0	5·5	11·2	0·4	83	95·2	53·1	62·31	0·120	wwP : wP : wwP
19	..	29·674	68·4	54·1	14·3	59·7	− 2·0	56·1	52·9	6·8	13·9	0·0	79	120·3	46·7	62·15	0·081	wwP : wP : wP
20	Last Quarter	29·754	72·0	53·8	18·2	60·9	− 0·6	56·7	53·1	7·8	15·3	1·8	75	121·5	44·5	62·00	0·000	wP : wwP : wP
21	..	29·827	70·5	49·0	21·5	59·7	− 1·6	55·2	51·2	8·5	15·7	0·0	74	131·2	41·0	61·90	0·000	wP : wwP : wP
22	Greatest Dec. N.	29·884	68·5	47·9	20·6	59·6	− 1·5	56·2	53·2	6·4	13·3	0·2	80	115·8	38·9	61·70	0·000	wP : wwP : wwP
23	..	29·787	74·4	55·1	19·3	62·4	+ 1·5	59·5	57·1	5·3	15·3	0·4	83	148·2	50·1	61·61	0·006	wwP
24	Apogee	29·644	75·4	59·0	16·4	64·7	+ 3·9	61·1	58·1	6·6	15·8	2·3	79	143·0	52·6	61·60	0·000	wwP
25	..	29·464	70·0	59·0	11·0	63·5	+ 2·8	62·2	61·2	2·3	8·6	0·7	92	98·0	54·0	61·70	0·236	wwP
26	..	29·357	73·9	57·9	16·0	62·4	+ 1·7	59·9	57·8	4·6	17·7	0·6	85	135·1	52·8	61·94	0·429	wwP : v, wwP
27	..	29·422	71·0	56·1	14·9	60·8	+ 0·2	57·7	57·7	3·1	14·2	0·6	90	130·7	50·0	61·89	0·217	wwP : wwP : wwP
28	New	29·472	75·1	54·9	20·2	62·5	+ 2·1	59·7	57·3	5·2	15·1	0·0	83	135·0	48·7	61·95	0·001	wwP
29	..	29·335	60·0	56·1	3·9	58·6	− 1·7	57·6	56·7	1·9	6·9	0·2	93	70·2	53·9	61·71	0·820	wwP
30	..	29·384	59·3	49·1	10·2	54·2	− 5·9	52·9	51·6	2·6	7·6	0·4	91	82·2	43·3	61·68	0·577	wwP : wwP : wP
31	..	29·832	69·3	45·6	23·7	57·6	− 2·3	54·6	51·9	5·7	12·7	0·0	82	122·2	38·8	61·48	0·001	wwP
Means	..	29·756	73·5	54·6	18·9	62·7	+ 1·1	58·6	55·1	7·7	16·3	1·3	76·8	127·7	47·0	62·05	Sum 3·436	
Number of Column for Reference.	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was $29^{in.}·756$, being $0^{in.}·027$ ***lower*** than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 83°·8 on August 1; the lowest in the month was 45°·6 on August 31; and the range was 38°·2.
The mean of all the highest daily readings in the month was 73°·5, being 0°·8 ***higher*** than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 54°·6, being 1°·6 ***higher*** than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 18°·9, being 0°·8 ***less*** than the average for the 65 years, 1841–1905.
The mean for the month was 62°·7, being 1°·1 ***higher*** than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	Osler's. General Direction. P.M.	Osler's. Pressure on the Square Foot. Greatest.	Osler's. Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Aug. 1	12·0	15·4	Calm : E : S	SSW	1·2	0·07	178	o : v.-cl : v.-cl, cu	1 : o
2	6·6	15·3	WSW : W	NNW	1·3	0·05	175	o : 6,ci,ci.-s : p.-cl, ci, ci.-s, h, p.-so.-ha	p.-cl, h : 4, m
3	11·9	15·2	N : NNW	NW : NNW : N	1·9	0·19	220	2 : 1, h	1 : 1
4	8·2	15·2	N : NNE : NE	NNE : NE	2·5	0·28	277	o : o : 10	9, cu : o, h
5	12·1	15·1	NE : NNE	NNE : NE : Calm	1·3	0·12	186	6 : 7 : 1	1 : p.-cl : 1
6	7·5	15·1	Calm : SW : W	ESE : NE	2·0	0·08	179	1 : 6 : 8, h	8, h : 9, h
7	8·0	15·0	NE : ENE	E : ESE	1·2	0·12	210	10,m.-r.-sh: 10 : 8	1 : 1 : v.-cl
8	6·3	15·0	E : Calm	SE	1·0	0·07	168	p.-cl : 10 : 10, cu.-n	o : o : p.-cl
9	9·1	14·9	ESE : Calm	SE : ESE : Calm	1·6	0·07	164	10, tk.-m : p.-cl,ci,ci.-cu,so.-ha	1 : 1
10	4·4	14·9	Calm : E	E : SSW : Calm	0·5	0·01	89	v.-cl : 7, s : 3, h, tk.-m	p.-cl : 6 : 9, h
11	0·5	14·8	Calm : N : NE	Calm : SE	0·3	0·01	117	9, h : 6, ci.-cu, h	6,cu, h,so.-ha: 6, h : 9, h
12	2·8	14·8	Calm : S	SSW : SW	4·5	0·17	202	9 : 9, s	p.-cl, cu, ci : 10, cu.-n, oc.-shs
13	3·5	14·7	SW : SSW	SW : SSW	5·0	0·47	347	9 : 10 : 7, cu, oc.-li.-r	7, cu : 9, th.-cl, lu.-ha
14	3·2	14·6	SSW : SW	WSW : SW	7·3	0·37	355	10, slt.-sh : 10, w, n, oc.-hy.-r	v.-cl, cu, n,slt.-r: 10,oc.-hy.-r,w: v.-cl, cu.-n
15	3·7	14·6	SW	SW : SSW	3·7	0·34	357	v.-cl : v.-cl : 10,cu,ci.-s.,fq.-slt.-r	8, cu.-n, oc.-shs : 6, cu.-n, oc.-shs
16	7·8	14·5	SSW : SW	SW : SSW	4·0	0·25	322	7, lu.-ha : 8, cu.-n, ci.-cu, hy.-sh	8,slt.-r,w,cu.r: 8 : 7, cu.-n
17	3·0	14·5	S : Calm : SE	SSW : N	1·3	0·09	170	8 : 9, oc.-r : 8,cu.-n,fq.-t.-sms	9,cu.-n,fq.-hy.-shs: 10, r, oc.-t : 10, r, m.-r
18	0·4	14·4	N : NNW	WNW : Calm	1·5	0·07	168	10, th.-cl : 10, cu.-n, s	10, cu.-n, s, slt.-r : 10, cu.-n, hy.-r
19	5·6	14·3	N	N : NNW	1·2	0·10	199	10, hy.-r : 9, slt.-sh: p.-cl	6 : 9
20	4·9	14·3	W : WSW	WNW : NNW	3·0	0·19	296	v.-cl : 10, cu.-n	9, cu.-n, sh: p.-cl : o
21	10·1	14·2	WNW : N	N : NNW	1·4	0·15	245	o : o : 6, n	p.-cl, n : v.-cl
22	7·3	14·2	Calm : NE	NE : ESE : S	0·6	0·03	132	o : o, m, h : p.-cl	7 : 3 : v.-cl
23	1·5	14·1	S	SSW : SSE	1·1	0·03	184	7 : 10 : 7, cu	9, cu, slt.-r : 10 : 10
24	4·0	14·0	S : WSW	WSW : SW	2·3	0·19	267	10 : 9 : p.-cl, s, cu.-n	9,cu,slt.-sh: 9 : 9, cu
25	0·1	14·0	SW : SSW	SSW : S : SW	2·0	0·15	224	10 : 10, r	10, r : 10, fq.-r : v.-cl
26	5·7	13·9	SW : WSW : W	WSW : SW	5·2	0·43	328	9, oc.-r : 9 : 7, cu, oc.-r	8, cu.-n, t.-sms, w: 1
27	5·4	13·9	SW : WSW	WSW : W : SW	2·7	0·22	312	1 : v.-cl : 10, cu.-n, r	v.-cl, cu.-n, r : 10, fq.-r : 1
28	4·5	13·8	WSW : W	W : N : NE	1·1	0·08	245	o : 8 : 7, cu	v.-cl,slt.-sh: v.-cl : 9
29	0·0	13·7	ENE : E	E : ENE : NE	3·8	0·22	257	10 : 10 : 10, r	10, r : 10, m.-r : 10, fq.-r
30	0·8	13·7	NNE : N	N : Calm : WSW	8·1	0·83	406	10, hy.-r, oc.-li.-r, w : 10, oc.-slt.-r	10, r : o, m : o
31	6·2	13·6	WSW : SW	WSW : SW	1·9	0·14	268	o : 1 : 6, ci.-s, cu	9, cu.-n : 9 : v.-cl
Means	5·4	14·5	..	..	..	0·18	234		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 58°·6, being 1°·1 *higher* than
The mean *Temperature of the Dew Point* for the month was 55°·1, being 1°·1 *higher* than
The mean *Degree of Humidity* for the month was 76·8, being 0·5 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in·434, being 0in·016 *greater* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 4grs·8, being 0gr·2 *greater* than
The mean *Weight of a Cubic Foot of Air* for the month was 526 grains, being 2 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 6·3.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·372. The maximum daily amount of *Sunshine* was 12·• hours on August 5.

The highest reading of the *Solar Radiation Thermometer* was 151°·1 on August 12; and the lowest reading of the *Terrestrial Radiation Thermometer* was 38°·8 on August 31.

The *Proportions of Wind* referred to the cardinal points were N. 7, E. 4, S. 8, W. 8. Four days were calm.

The *Greatest Pressure of the Wind* in the month was 8·1 lbs. on the square foot on August 30. The mean daily *Horizontal Movement of the Air* for the month was 234 miles; the greatest daily value was 406 miles on August 30; and the least daily value was 89 miles on August 10.

Rain (0in·005 or over) fell on 13 days in the month, amounting to 3in·436, as measured by gauge No. 6 partly sunk below the ground: being 1in·092 *greater* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	TEMPERATURE. Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Sept. 1	..	29·869	71·1	52·9	18·2	61·7	+ 1·9	58·6	55·9	5·8	15·9	1·3	82	129·0	48·2	61·05	0·082	.. : wP
2	..	29·909	64·5	52·5	12·0	57·4	− 2·3	56·8	56·2	1·2	3·5	0·0	97	95·1	46·1	60·82	0·289	wwP
3	..	29·631	70·8	53·3	17·5	59·5	− 0·1	57·3	55·4	4·1	11·0	0·0	87	126·0	45·4	60·82	0·101	wwP : wwN : wwP
4		29·587	63·9	51·7	12·2	56·2	− 3·3	53·5	51·0	5·2	11·8	0·4	83	106·0	45·2	60·71	0·037	wwP : wP : wwP
5	First Quarter: Greatest Dec. S.	29·776	63·2	50·8	12·4	56·0	− 3·4	52·9	50·0	6·0	11·6	2·2	80	100·2	43·1	60·50	0·000	wwP : wP : wP, wwP
6	..	30·082	69·5	52·4	17·1	59·3	+ 0·1	56·4	53·9	5·4	14·4	0·6	82	125·5	42·1	60·32	0·000	wwP
7	..	30·195	69·8	51·3	18·5	59·2	+ 0·2	56·9	54·8	4·4	13·1	0·4	86	126·0	41·5	60·19	0·000	wwP
8	..	30·139	67·6	54·1	13·5	59·2	+ 0·4	56·7	54·4	4·8	10·7	2·1	85	111·4	45·8	60·19	0·000	wwP
9	Perigee	30·097	68·0	56·3	11·7	61·1	+ 2·5	58·4	56·1	5·0	11·7	2·1	83	100·6	48·3	60·22	0·000	wwP
10	..	30·012	60·9	55·9	5·0	58·1	− 0·3	55·9	53·9	4·2	7·7	0·6	85	87·0	51·5	60·31	0·000	wwP
11	Full	29·854	66·8	52·9	13·9	58·1	− 0·0	55·6	53·3	4·8	11·8	1·4	84	104·1	49·8	60·31	0·032	wwP : wwP : wP, ..
12	..	29·847	63·3	55·1	8·2	59·2	+ 1·3	57·8	56·5	2·7	6·4	1·3	92	76·8	49·2	60·24	0·008	.. : wwP : wwP
13	..	29·849	71·0	50·5	20·5	60·8	+ 3·0	57·7	55·1	5·7	13·0	1·5	82	106·2	42·7	60·28	0·028	wwP : wwP : wwP, wP
14	..	29·976	56·1	38·8	17·3	48·9	− 8·8	45·0	40·8	8·1	13·8	1·1	74	113·7	29·5	60·11	0·000	wP
15	..	29·949	62·1	37·4	24·7	50·7	− 6·9	47·9	45·0	5·7	14·6	1·8	81	118·8	28·1	59·86	0·000	wP
16	..	29·994	64·5	44·5	20·0	55·9	− 1·6	53·2	50·7	5·2	14·6	2·3	83	127·0	32·4	59·39	0·000	wP
17	..	30·019	66·4	43·1	23·3	54·0	− 3·2	51·6	49·2	4·8	11·2	0·4	84	119·1	31·5	59·20	0·147	wwP : wP, wwP : wwP
18	Greatest Dec. N.	29·523	61·2	48·0	13·2	54·2	− 2·7	50·5	46·9	7·3	13·0	0·0	76	106·0	40·7	58·98	0·130	wwP : wP : wP
19	Last Quarter	29·436	55·8	45·6	10·2	49·8	− 6·7	47·1	44·2	5·6	8·1	2·1	82	92·2	40·0	58·86	0·087	wwP, wP : wP, v : wP
20	..	29·871	53·8	47·3	6·5	50·5	− 5·7	47·4	44·1	6·4	9·9	2·5	79	73·0	41·0	58·51	0·000	wP
21	Apogee	30·027	59·0	40·5	18·5	49·9	− 6·0	46·3	42·5	7·4	12·4	0·9	76	120·7	32·2	58·09	0·001	wP
22	..	30·053	60·5	36·1	24·4	49·2	− 6·4	46·3	43·2	6·0	11·6	0·4	80	106·2	30·9	57·69	0·000	wP : wwP
23	..	29·888	65·8	41·3	24·5	52·3	− 3·1	49·0	45·6	6·7	13·9	0·6	78	124·4	33·0	57·42	0·000	wwP
24	..	29·853	65·5	39·2	26·3	51·9	− 3·4	49·4	46·9	5·0	14·1	0·2	84	116·2	32·1	57·17	0·000	wwP
25	..	29·818	67·4	43·2	24·2	55·1	− 0·1	53·4	51·8	3·3	10·4	0·0	88	114·3	34·0	57·04	0·000	wwP
26	..	29·803	70·5	51·6	18·9	59·6	+ 4·4	57·4	55·5	4·1	10·3	0·0	86	106·4	39·5	57·00	0·000	wwP
27	New	29·605	68·0	50·2	17·8	58·2	+ 3·1	57·0	55·9	2·3	7·8	0·0	92	116·9	37·0	57·19	0·005	wwP
28	..	29·588	68·2	49·5	18·7	57·5	+ 2·6	56·6	55·7	1·8	8·7	0·0	94	108·1	36·8	57·33	0·018	wwP
29	..	29·524	59·8	51·2	8·6	56·6	+ 1·9	55·3	54·2	2·4	4·2	0·8	91	70·0	47·2	57·44	0·089	wwP
30	..	29·841	61·2	48·9	12·3	54·2	− 0·2	50·8	47·5	6·7	9·8	3·2	78	110·2	46·5	57·52	0·000	wwP : wP
Means	..	29·853	64·5	48·2	16·3	55·8	− 1·4	53·3	50·9	4·9	11·0	1·0	83·8	107·9	40·4	59·16	Sum 1·064	..
Number of Column for Reference.	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-Bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29$^{in.}$·853, being 0$^{in.}$·042 *higher* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 71°·1 on September 1; the lowest in the month was 36°·1 on September 22; and the range was 35°·0.
The mean of all the highest daily readings in the month was 64°·5, being 2°·8 *lower* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 48°·2, being 0°·9 *lower* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 16°·3, being 1°·9 *less* than the average for the 65 years, 1841–1905.
The mean for the month was 55°·8, being 1°·5 *lower* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's. Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Sept. 1	5·2	13·5	SW : W	W : WNW : Calm	1·3	0·12	244	9 : 10, oc.-slt.-r : 7, oc.-m.-r, n, cu	p.-cl, cu : p.-cl. : 0, m, h
2	0·0	13·5	Calm : NE : E	E : Calm	0·3	0·00	101	10, r : 10, cu, n, fq.-shs	10, fq.-shs : 1 : v.-cl, th.-cl
3	3·8	13·4	Calm : S	SSW : SW	4·0	0·25	302	10, th.-cl : 10, fq.-r.-t, l	6 : v.-cl : 10
4	1·5	13·3	WSW : W	W : WNW : NW	5·6	0·59	483	10, sh : 9, w : 10, w	9 : 10, oc.-r : 0
5	2·7	13·3	NW : W : N	N : NNE	3·8	0·41	350	0 : 9, oc.-slt.-r : 10, cu.-n	9, cu.-n : 9
6	5·8	13·2	NNE : NE	N : NE : Calm	0·7	0·04	160	10, h : 8 : v.-cl	8 : 1 : v.-cl
7	7·6	13·2	Calm : NE	NE : ENE : E	1·2	0·05	134	10, m.-hy.-d : f.-hy.-d : p.-cl, cu	p.-cl, cu.-n : 1 : v.-cl
8	1·5	13·1	NE : ENE	NE : ENE : E	1·1	0·07	224	10 : 9	9 : p.-cl : p.-cl
9	1·9	13·0	NE : NNE	NE : NNE	1·1	0·06	248	10 : 10, s, cu.-n	8, cu.-n : 8 : 10
10	0·0	13·0	NE	NNE : NE : ENE	1·0	0·08	254	10 : 10, cu.-n, s	10, cu.-n, s : 10, cu.-n
11	0·3	12·9	NNE : Calm : W	W : WSW	1·0	0·01	205	10, sh : 10, cu.-n	10, cu.-n, th.-cl : 10, r
12	0·0	12·8	W : NW	SW : N : W	1·7	0·02	204	10 : 10, oc.-slt.-r	10, fq.-m.-r : 10 : 10
13	2·6	12·8	W : WSW	WNW : NNW : NW	5·0	0·23	360	v.-cl : v.-cl : 9	9 : 6, sh : 0
14	9·6	12·7	WNW : NNW : N	N : Calm	3·7	0·27	289	0 : 1, cu, s.-cu, w	2, cu : 1 : p.-cl, th.-cl, lu.-ha
15	4·5	12·6	Calm : SW : WSW	W : WSW	4·1	0·20	336	v.-cl : 7 : p.-cl, ci, s	7, cu : 10, shs
16	5·3	12·6	WNW : NNW : N	N : Calm	2·7	0·06	205	8 : 8, cu	8 : 8 : 3
17	2·9	12·5	Calm : W	WSW : SW	3·1	0·16	269	p.-cl : 8 : 9	9 : 10, r : 10, r
18	4·9	12·4	WSW : NNW	NW : WNW : WSW	4·3	0·42	422	10, r : 9, sh, p.-so.-ha	6 : 3, slt.-sh, w : v.-cl, slt.-sh
19	2·0	12·4	WSW : W : N	N : NNE	4·8	0·55	429	p.-cl : 10, oc.-slt.-r : 10, oc.-slt.-shs, hy.-sh	10, r, w : 0
20	0·5	12·3	N	N : NNE	2·6	0·33	316	p.-cl, w : 10 : 10	10 : 10
21	8·0	12·2	N : NNE : NE	NE : Calm	0·8	0·02	181	10 : 3, slt.-m : 1, cu, h	1, s.-cu : 0
22	1·9	12·2	Calm : SE	SE : Calm	0·3	0·00	106	0, f, m : 0, slt.-m : p.-cl, h, so.-ha	10 : p.-cl : p.-cl, h
23	5·8	12·1	Calm : SE	S : SE : Calm	0·4	0·00	120	p.-cl, h : v.-cl, h, m	7 : p.-cl : 2
24	6·0	12·1	Calm : SE	SE : SW : Calm	0·2	0·00	90	0 : 0, tk.-m	7, cu, cu.-n : 10 : 1
25	6·3	12·0	Calm : ENE : ESE	E : Calm	0·7	0·03	182	0, th.-m : f : 0, m	0 : 0, oc.-slt.-f
26	1·7	11·9	Calm : E	E	0·2	0·00	125	p.-cl : 9 : v.-cl, h	7 : p.-cl, h : 1, h
27	1·5	11·9	E : ESE	SE : SSW : S	2·2	0·10	244	0 : v.-cl : 9	10, slt.-shs : 3, slt.-r, t, l : 1
28	1·3	11·8	SE : Calm : E	ENE : E	0·4	0·01	165	6, f : 10, f : 10, f, s	9, s : 8 : v.-cl, slt.-sh
29	0·0	11·7	NNE : NE	NE : NNE	2·2	0·17	327	10 : 10, slt.-r	10, slt.-r : 10, oc.-m.-r : 10
30	3·5	11·7	NNE : NE	NNE : NE	2·1	0·21	299	10 : v.-cl : 7, cu	9 : 10
Means	3·3	12·6	..	..	..	0·15	246		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 53°·3, being 0°·8 *lower* than
The mean *Temperature of the Dew Point* for the month was 50°·9, being 0°·3 *lower* than
The mean *Degree of Humidity* for the month was 83·8, being 3·6 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in.·373, being 0in.·004 *less* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 4grs.·2, being *equal* to
The mean *Weight of a Cubic Foot of Air* for the month was 536 grains, being 3 grains *greater* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 6·8.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·261. The maximum daily amount of *Sunshine* was 9·6 hours on September 14.

The highest reading of the *Solar Radiation Thermometer* was 129°·0 on September 1; and the lowest reading of the *Terrestrial Radiation Thermometer* was 28°·1 on September 15.

The *Proportions of Wind* referred to the cardinal points were N. 9, E. 7, S. 2, W. 7. Five days were calm.

The *Greatest Pressure of the Wind* in the month was 5·6 lbs. on the square foot on September 4. The mean daily *Horizontal Movement of the Air* for the month was 246 miles; the greatest daily value was 483 miles on September 4; and the least daily value was 90 miles on September 24.

Rain (0in.·005 or over) fell on 13 days in the month, amounting to 1in.·064, as measured by gauge No. 6 partly sunk below the ground; being 1in.·084 *less* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1906.	Phases of the Moon	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Oct 1	..	30·023	60·9	45·6	15·3	51·7	− 2·4	48·7	45·7	6·0	14·2	2·3	80	115·8	36·8	57·46	0·000	wwP
2	..	29·869	56·9	45·7	11·2	51·8	− 1·9	51·3	50·8	1·0	5·4	0·0	96	68·0	36·9	57·30	0·343	wwP
3	Greatest Dec. S.	29·879	66·9	52·1	14·8	57·9	+ 4·6	57·4	57·0	0·9	8·6	0·2	98	96·2	49·7	57·15	0·061	wwP
4	First Quarter	29·681	67·4	56·0	11·4	60·8	+ 7·8	59·0	57·5	3·3	10·7	1·3	89	99·8	49·7	57·20	0·210	wwP
5	..	29·667	68·7	58·0	10·7	61·4	+ 8·6	58·1	55·3	6·1	11·3	1·5	81	110·1	52·3	57·34	0·040	wwP
6	Perigee	29·605	63·8	60·3	3·5	62·2	+ 9·7	60·6	59·2	3·0	7·1	1·9	90	75·0	56·4	57·50	0·006	wwP
7	..	29·590	64·1	53·3	10·8	57·7	+ 5·4	53·5	49·7	8·0	9·2	3·1	75	109·7	47·0	57·72	0·008	wwP : wP : wP, wwP
8	..	29·821	66·4	52·7	13·7	58·6	+ 6·6	55·4	52·6	6·0	8·9	3·2	80	96·9	46·3	57·79	0·000	wwP
9	..	29·895	67·5	54·2	13·3	59·7	+ 8·1	56·2	53·1	6·6	8·7	1·7	80	114·0	44·2	57·72	0·000	wwP
10	..	29·900	67·0	54·8	12·2	59·5	+ 8·2	57·6	55·9	3·6	10·2	1·5	89	106·1	44·8	57·73	0·038	wwP
11	Full	29·941	65·2	57·2	8·0	61·3	+10·4	58·2	55·6	5·7	7·9	3·0	82	90·4	51·3	57·76	0·000	wwP
12	..	29·997	66·7	57·6	9·1	60·7	+10·1	57·6	54·9	5·8	8·0	2·8	82	97·2	52·8	57·84	0·000	wwP
13	..	30·012	66·9	58·3	8·6	61·6	+11·3	60·3	59·2	2·4	7·3	1·7	92	82·3	55·0	57·97	0·061	wwP
14	..	29·802	65·5	58·4	7·1	60·6	+10·5	57·4	54·6	6·0	7·7	2·8	81	99·5	53·0	58·12	0·000	wwP
15	..	29·657	60·3	44·7	15·6	51·7	+ 1·8	47·3	42·8	8·9	12·6	1·7	72	100·5	36·9	58·09	0·008	wwP
16	Greatest Dec. N.	29·957	54·0	40·1	13·9	45·9	− 3·9	42·6	38·8	7·1	11·3	3·2	76	90·7	31·6	57·95	0·000	wwP : wP : wP
17	..	29·838	54·1	32·8	21·3	45·4	− 4·2	44·5	43·5	1·9	10·9	1·2	94	73·6	27·0	57·39	0·589	wwP, wP : wwN, wwP
18	..	29·759	56·2	49·1	7·1	52·3	+ 3·0	50·4	48·5	3·8	9·5	1·4	87	79·0	41·9	56·70	0·000	wwP : wP : wwP
19	Last Quarter: Apogee	29·858	55·2	44·2	11·0	51·4	+ 2·3	48·4	45·3	6·1	11·3	1·8	80	87·0	37·9	56·38	0·058	wwP : wP : wwP
20	..	30·088	48·4	32·1	16·3	42·9	− 5·9	40·0	36·5	6·4	9·8	3·9	79	68·9	25·8	56·07	0·002	wwP : wP : wP
21	..	29·908	48·1	28·6	19·5	36·7	−11·9	35·0	32·6	4·1	12·8	2·1	85	88·9	23·2	55·61	0·003	wP
22	..	29·710	48·6	29·5	19·1	40·3	− 8·0	38·0	35·0	5·3	10·8	3·6	82	98·3	22·5	55·00	0·003	wP
23	..	29·698	59·9	42·9	17·0	50·3	+ 2·2	48·1	45·8	4·5	9·8	1·5	85	93·6	33·0	54·30	0·023	wwP
24	..	29·503	55·9	44·5	11·4	49·3	+ 1·4	48·6	47·9	1·4	8·8	0·0	95	78·1	36·0	53·89	0·014	wwP
25	..	29·172	57·3	40·0	17·3	49·5	+ 1·8	47·7	45·8	3·7	11·4	1·5	87	80·8	32·4	53·69	0·141	wwP
26	New	29·557	54·8	36·3	18·5	43·6	− 4·0	41·0	37·9	5·7	12·9	1·1	80	82·2	27·3	53·61	0·001	wP
27	..	29·239	55·1	37·6	17·5	46·9	− 0·6	45·1	43·1	3·8	9·8	2·6	87	71·7	28·4	53·39	0·397	wP, wwP : wwP, v : v, wP
28	..	29·213	55·9	42·2	13·7	49·3	+ 1·9	45·7	41·9	7·4	16·3	1·9	76	87·2	34·3	53·00	0·061	wwP : wP : wP
29	..	29·184	54·9	38·7	16·2	47·1	− 0·2	45·9	44·6	2·5	10·0	0·4	91	68·9	30·7	52·80	0·158	wP : wwP : wwP
30	Greatest Dec. S.	29·190	60·5	46·1	14·4	52·0	+ 4·8	48·8	45·5	6·5	9·7	1·8	79	85·0	39·9	52·64	0·183	wwP
31	Perigee	29·461	56·7	46·1	10·6	50·8	+ 3·7	46·7	42·4	8·4	11·4	1·7	73	86·1	37·2	52·49	0·247	wwP : wP : wP, wwP
Means	..	29·699	59·7	46·4	13·2	52·6	+ 2·6	50·2	47·7	4·9	10·1	1·9	84·0	89·7	39·4	56·12	Sum 2·655	..
Number of Column for Reference.		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was $29^{in.}·699$, being $0^{in.}·022$ ***lower*** than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 68°·7 on October 5; the lowest in the month was 28°·6 on October 21; and the range was 40°·1.
The mean of all the highest daily readings in the month was 59°·7, being 2°·2 ***higher*** than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 46°·4, being 3°·2 ***higher*** than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 13°·2, being 1°·1 *less* than the average for the 65 years, 1841–1905.
The mean for the month was 52°·6, being 2°·6 ***higher*** than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Oct. 1	4·0	11·6	NE : Calm : E	ESE : Calm	0·3	0·00	155	10 : 10 : v.-cl	p.-cl : p.-cl : 0, h
2	0·0	11·5	Calm : S : SE	Calm : E	0·3	0·01	137	7 : 10, r : 10, r	10, r : 10, fq.-m.-r : 10, m.-r
3	0·4	11·5	ESE : SSE : SSW	SW : SSW	0·8	0·05	229	10, r : 10, slt.-r : 10, slt.-sh	10, s, oc.-slt.-r : p.-cl : 1
4	2·8	11·4	SSW : S : SW	SW : WSW	4·3	0·35	409	10 : 10, fq.-r : 8, cu.-s, oc.-r	9, cu : 7, oc.-slt.-r: v.-cl, cu.-n
5	5·2	11·3	SW : WSW : W	WSW : SW	3·7	0·46	459	9 : p.-cl : 8	9, so.-ha : 10, m.-r : 10, r
6	0·0	11·3	SW	SW	7·7	1·24	597	10, oc.-m.-r : 10, oc.-m.-r : 10, m.-r	10 : 10, fq.-m.-r : 10, r
7	7·2	11·2	WSW	WSW : W	7·0	0·89	601	9, w : v.-cl, w : 7, cu.-s, w	7, cu, w : 7, oc.-m.-r, w : 10, w
8	3·2	11·1	W : WSW	W : WSW	3·3	0·40	488	10, w : 9	6 : 8 : 9
9	4·0	11·1	WSW	WSW	3·2	0·32	402	10 : v.-cl : p.-cl	9 : 1 : v.-cl, th.-cl, oc.-lu.-ha
10	1·8	11·0	WSW : SW	SW : W : SW	4·6	0·53	445	10, oc.-r : 10, oc.-slt.-r: 10, oc.-m.-r	9 : 9 : 10
11	0·7	10·9	SW : WSW	WSW : W	5·1	0·72	513	10 : 9, cu, s	10, s : 9, lu.-ha : 9, th.-cl
12	1·9	10·9	WSW	WSW	5·2	0·69	543	p.-cl : 10 : 10 cu.-n	9, cu : 7 : 10, cu, ci.-cu
13	0·1	10·8	WSW : SW	WSW : SW	2·7	0·31	336	10 : 10, oc.-slt.-r: 10, slt.-r	10 : 10
14	1·1	10·7	SW	SW	7·5	1·19	585	10 : 10, s, m.-r.-sh	6, cu : 10 : 10, s, w
15	6·9	10·7	WSW : WNW : W	WNW : NW	6·2	0·93	500	9, slt.-r : p.-cl, lu.-ha : 7, cu	7, cu.-s, slt.-sh: 7, cu, s : p.-cl
16	4·3	10·6	N : W	WNW : N	1·1	0·15	258	0 : 0, h	6 : 8, sh : v.-cl
17	0·0	10·6	N : Calm : S	SSE : SSW : WSW	1·5	0·04	206	0 : 4, slt.-ho.-fr: 10, n	10, slt.-r : 10, r : 10, r
18	1·0	10·5	W : NW : N	N : NW : WSW	1·1	0·13	261	10, th.-cl : 10 : 10	10 : 10
19	6·5	10·4	WSW : NW : N	N : NNE : ENE	4·5	0·50	365	10, r : 1, cu, s, r	p.-cl, cu, n: 7, slt.-sh : p.-cl
20	0·0	10·4	ENE : ESE	E : Calm	2·8	0·15	212	v.-cl : 9 : 10, cu, s	10 : 0
21	7·0	10·3	Calm : SE	ESE : Calm	0·5	0·02	111	0, ho.-fr : 1, slt.-f, ho.-fr: p.-cl, h	p.-cl : 0 : 0, h
22	3·5	10·3	ESE : SE	ESE : SE	3·7	0·19	235	0 : p.-cl, th.-cl, ho.-fr : 9	8 : 10, shs : 10
23	6·2	10·2	S : SSW	SSW : S	3·9	0·22	300	1, slt.-r : p.-cl, th.-cl	p.-cl, ci.-s, slt.-sh, p.-so.-ha: 9
24	0·8	10·1	Calm : S	Calm : S	0·1	0·00	143	10 : 10 : p.-cl, p.-so.-ha	10, oc.-th.-r, cu, s: 10 : p.-cl
25	1·7	10·1	S : SSE	SW : Calm	3·8	0·04	287	v.-cl. : 10, r : 10, r	6, cu : 1 : 0
26	6·6	10·0	Calm : W	W : SW : Calm	0·3	0·01	239	0, h, hy.-d : 1, h	p.-cl, h : p.-cl : 0, ho.-fr
27	0·8	9·9	SSE : S : SSW	SSW	9·0	0·63	443	9 : 10, r, w : 10, hy.-shs, t	8, oc.-slt.-r: p.-cl, fq.-r, t, l: 9, oc.-slt.-r
28	6·3	9·9	SSW : SW	SW : SSW	5·5	0·80	488	6, slt-r : p.-cl : p.-cl	8, slt.-sh : p.-cl : 0
29	0·9	9·8	SSW : S : SSE	SSE : SSW : SW	1·6	0·10	351	1 slt.-r : 6 : 10, r, m.-r	10, r : p.-cl, m.-r : 10, fq.-slt.-r
30	4·5	9·8	WSW : SW : SSW	SW	10·0	0·74	608	p.-cl, r : 10, r : 3, ci.-cu, n, w, r	v.-cl, w, cu: v.-cl, hy.-sh, w: 8, r, w
31	7·1	9·7	SW : WSW : W	WSW : SW	9·8	1·03	592	10, r, w : 3, w	p.-cl, w : 1 : 7, r
Means	3·1	10·6	..	..	..	0·41	371		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 50°·2, being 2°·3 *higher* than
The mean *Temperature of the Dew Point* for the month was 47°·7, being 2°·0 *higher* than
The mean *Degree of Humidity* for the month was 84·0, being 1·0 *less* than
The mean *Elastic Force of Vapour* for the month was 0in.331, being 0in.024 *greater* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 3grs.7, being 0grs.2 *greater* than
The mean *Weight of a Cubic Foot of Air* for the month was 536 grains, being 4 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 7·0.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·293. The maximum daily amount of *Sunshine* was 7·2 hours on October 7.

The highest reading of the *Solar Radiation Thermometer* was 115°·8 on October 1; and the lowest reading of the *Terrestrial Radiation Thermometer* was 22°·5 on October 22

The *Proportions of Wind* referred to the cardinal points were N. 3, E. 3, S. 10, W. 13. Two days were calm.

The Greatest *Pressure of the Wind* in the month was 10·0 lbs. on the square foot on October 30. The mean daily *Horizontal Movement of the Air* for the month was 371 miles; the greatest daily value was 608 miles on October 30; and the least daily value was 111 miles on October 21.

Rain (0in.005 or over) fell on 19 days in the month, amounting to 2in.655, as measured by gauge No. 6 partly sunk below the ground; being 0in.127 *less* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100.)	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Nov. 1	..	29·666	58·5	42·3	16·2	50·1	+ 3·1	48·3	46·4	3·7	6·0	1·2	87	84·0	34·5	52·51	0·224	wwP
2	First Quarter	29·648	57·0	40·9	16·1	47·6	+ 0·8	46·4	45·0	2·6	7·4	1·1	92	87·9	33·0	52·29	0·077	wwP : wP, v : wP
3	..	29·399	53·2	38·2	15·0	47·0	+ 0·4	46·2	45·3	1·7	7·0	1·3	94	68·3	31·1	52·22	0·508	wwP : v
4	..	29·113	56·5	43·0	13·5	50·9	+ 4·5	48·9	46·8	4·1	9·3	1·6	87	87·0	35·0	52·00	0·372	wwP : wP, wwP : wwP
5	..	28·652	54·6	48·6	6·0	51·2	+ 5·1	49·1	46·9	4·3	5·3	1·6	86	68·5	45·2	51·81	0·439	wwP
6	..	29·227	51·6	43·2	8·4	47·1	+ 1·3	44·2	40·9	6·2	7·6	1·3	79	76·3	35·1	51·81	0·010	wwP : wP : wP
7	..	28·955	57·8	46·5	11·3	51·0	+ 5·6	49·5	48·0	3·0	4·9	1·2	90	81·0	41·3	51·78	0·507	wwP
8	..	28·944	52·1	41·5	10·6	47·4	+ 2·4	45·7	43·9	3·5	6·7	0·8	89	81·0	35·2	51·33	0·469	wwP : wP, wwP
9	Full	29·642	51·4	39·3	12·1	44·5	− 0·1	41·8	38·6	5·9	7·5	2·6	80	73·4	33·2	51·44	0·000	wwP : wP : wP
10	..	30·082	53·6	35·9	17·7	46·7	+ 2·4	45·3	43·7	3·0	7·7	0·0	90	71·2	28·5	51·22	0·000	wP : wwP
11	..	30·180	58·1	48·5	9·6	53·6	+ 9·6	52·7	51·8	1·8	4·6	1·2	94	72·8	42·6	51·03	0·000	wwP
12	Greatest Dec. N.	30·167	52·0	45·9	6·1	48·7	+ 5·0	48·2	47·6	1·1	3·2	0·8	96	58·1	38·4	51·12	0·008	wwP
13	..	30·131	51·2	39·8	11·4	45·6	+ 2·1	44·5	43·2	2·4	5·2	0·4	92	60·8	35·5	51·23	0·004	wwP : wP : wwP
14	..	30·208	51·0	39·2	11·8	45·2	+ 1·9	43·9	42·4	2·8	7·7	0·4	90	60·9	35·7	51·18	0·002	wwP : wwP : wP
15	..	30·196	47·6	35·8	11·8	42·4	− 0·7	39·8	36·7	5·7	9·6	1·1	81	70·0	28·3	51·08	0·001	wP
16	Apogee	30·022	40·1	32·0	8·1	36·0	− 6·8	33·4	29·5	6·5	7·0	1·8	77	67·2	24·9	50·69	0·000	wP
17	Last Quarter	29·536	37·8	30·5	7·3	33·8	− 8·8	30·6	24·8	9·0	14·0	1·5	68	66·1	23·9	50·21	0·000	wP : wP : ..
18	..	28·614	42·5	32·1	10·4	34·5	− 7·9	33·2	31·0	3·5	4·8	0·6	86	42·0	30·5	49·62	0·451	.. : wwP, wwN
19	..	28·486	43·5	35·3	8·2	38·2	− 4·1	37·7	37·0	1·2	3·2	1·1	96	42·5	35·1	48·75	0·681	wwP : wwP, wN : wP
20	..	28·911	46·9	36·3	10·6	42·5	+ 0·3	40·7	38·5	4·0	7·6	1·4	86	62·0	32·5	47·81	0·239	vN : wP : wP
21	..	29·320	49·1	33·2	15·9	39·6	− 2·5	38·5	37·1	2·5	5·0	1·7	91	58·0	25·3	47·60	0·068	wP
22	..	29·734	45·1	32·9	12·2	39·2	− 2·9	37·8	35·9	3·3	7·8	1·2	88	50·9	28·2	47·41	0·000	wP : mP : wP
23	..	30·023	55·9	40·1	15·8	48·5	+ 6·5	46·3	43·9	4·6	8·4	3·3	84	75·0	32·8	47·32	0·030	wP : wwP : wwP
24	..	29·885	57·5	44·8	12·7	52·0	+10·0	50·2	48·4	3·6	7·0	2·0	87	61·9	36·3	47·37	0·000	wwP
25	New	29·510	56·0	41·9	14·1	48·1	+ 6·2	46·1	43·9	4·2	9·7	1·0	86	72·9	33·9	47·64	0·120	wwP : wP, wwP
26	Greatest Dec. S.	29·431	46·0	35·5	10·5	40·6	− 1·2	38·2	35·2	5·4	9·9	3·3	82	58·1	28·6	47·96	0·000	wP
27	Perigee	29·908	41·6	28·8	12·8	36·5	− 5·2	34·5	31·6	4·9	8·6	3·9	83	56·1	22·9	47·81	0·000	wP : mP : mP
28	..	30·225	42·6	25·2	17·4	35·0	− 6·5	32·5	28·5	6·5	12·8	3·3	76	54·0	20·3	47·46	0·001	wP : mP : mP
29	..	30·162	44·9	39·2	5·7	42·2	+ 1·0	40·3	38·1	4·1	7·2	3·3	86	51·9	31·5	47·01	0·000	wwP : wwP, wP : wP
30	..	30·043	40·1	28·8	11·3	36·3	− 4·7	35·2	33·9	2·4	5·4	0·0	91	53·9	22·5	46·59	0·000	wP
Means	..	29·601	49·9	38·2	11·7	44·1	+ 0·6	42·3	40·2	3·9	7·3	1·5	86·5	65·8	32·1	49·84	Sum 4·254	..
Number of Column for Reference.		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29in.601, being 0in.157 *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 58°·5 on November 1; the lowest in the month was 25°·2 on November 28; and the range was 33°·3.
The mean of all the highest daily readings in the month was 49°·9, being 0°·9 *higher* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 38°·2, being 0°·3 *higher* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 11°·7, being 0°·6 *greater* than the average for the 65 years, 1841–1905.
The mean for the month was 44°·1, being 0°·6 *higher* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	General Direction. P.M.	Pressure on the Square Foot. Greatest.	Pressure on the Square Foot. Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	Clouds and Weather. P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Nov. 1	4·1	9·6	SW : SSW	SW : SSW	5·6	0·20	356	1 : 1 : 8, cu	10, hy.-r, cu.-n : 10, hy.-r, slt.-r : 10
2	3·3	9·6	SW : Calm : WSW	SW : SSW	4·8	0·03	198	4, h : p.-cl, m : 7, m, p.-so.-ha	v.-cl, r, r, so.-ha : 0 : 0
3	0·0	9·5	Calm : SSE : S	S : SSW	3·7	0·24	334	1 : 10 : 10, cu.-n	10, r : 10, r
4	4·4	9·4	SSW : S	SSW : S : SE	4·7	0·07	279	2 : 1 : 6, slt.-r	8, cu, s : 10, r : 10, fq.-r
5	0·0	9·4	SSE : S	S : SSW : SW	18·0	1·56	691	10, fq.-r : 10, m.-r, w	10, m.-r, w : 10, m.-r
6	6·9	9·3	WSW : W	W : SW : SSW	5·1	0·45	422	p.-cl : 2, ci : 2	v.-cl, slt.-r : 1 : 10, r
7	1·9	9·3	SSW : SW	SSW : SW	11·0	0·84	475	10, r, m.-r : 10, r, m.-r : 8, m.-r	9, shs, r : 10, r, t, l, lu.-ha : 10, fq.-r
8	2·7	9·2	SW : NNW : W	WSW : W	2·5	0·25	356	10, r : 10, r : 9, c, s	8, c, s, : 9, lu.-ha : 1
9	7·1	9·2	WSW : W	W : WSW	3·0	0·26	351	0 : 0	2 : 7, h : 9
10	0·0	9·1	W : WSW	SW	2·8	0·15	271	p.-cl : 8 : 9, cu, s	10 : 10, sh
11	1·8	9·1	SW : WSW : W	W : WSW	1·1	0·14	309	10 : 10, n, oc.-m.-r	3, oc.-m.-r : 2 : 8, ci, ci.-s, lu.-ha
12	0·0	9·0	W : WSW	W : Calm	0·9	0·05	231	8, lu.-ha, p.-lu.-ha : 10, h.	9, h : 8, h : 3, h, f
13	3·2	8·9	W : Calm	W : Calm	0·2	0·00	155	f : 10, f : 10, f, h	1, slt.-f, h : 2, f : th.-f
14	0·0	8·9	Calm : ESE : E	ENE : NE	0·9	0·05	174	10, f : 10, slt.-f : 10, oc.-m.-r	10, slt.-m.-r.-sh : 10 : 10
15	6·9	8·8	NE : Calm : ESE	E : ESE	2·5	0·12	209	10 : 3 : 1	1, cu, cu.-n : v.-cl : 7, cu, cu.-n
16	2·7	8·8	Calm : SSE : SE	SE : ESE	2·1	0·15	213	2, ho.-fr : 8 : 10	6 : 3 : v.-cl, ho.-fr
17	6·7	8·7	ESE	ESE : E	7·2	0·75	392	p.-cl, ho-fr. : 0, ho.-fr : 0	2 : p.-cl : 10
18	0·0	8·7	E	ENE : NE : NNE	8·7	0·71	426	10 : 10, sn	10, hy.-r, sn : 10, c.-r : 10, r
19	0·0	8·7	ENE : E : SW	SW : SSW : S	2·0	0·12	275	10, r : 10, slt.-r, m.-r	10, fq.-slt.-r : 10, slt.-r, sl, r
20	0·2	8·6	S : SSW : SW	SW	3·2	0·19	348	10, r : 10, r : 10, r, m.-r	10, slt.-m.-r : 1
21	1·8	8·6	Calm	Calm : WSW	0·1	0·00	146	0 : 7, r : p.-cl, tk.-m	6, m : 10, f : 6, h
22	0·9	8·5	WSW : W	WNW : W : SW	1·1	0·05	246	10 : 2, h	1 : 1, slt.-f
23	1·4	8·5	SSW : SW	SW : SSW	7·0	0·55	464	1, h : 9 : 7	10, p.-so.-ha : 10 : 10, m.-r, r
24	0·0	8·4	SSW : SW	SW : WSW	5·6	0·85	533	10, oc.-m.-r, w : 10, oc.-m.-r, s, cu	10, oc.-m.-r : 1 : 0
25	2·1	8·4	SSW : SW	SW : WSW : W	5·1	0·38	439	1 : 10, m.-r : 8, m.-r	8 : 9, sh, l : 3, r
26	2·4	8·3	W : WNW	W : NW : N	2·7	0·23	354	0 : p.-cl, m.-r, h	p.-cl : v.-cl, h : 0, h
27	3·0	8·3	N	N : Calm	2·8	0·11	231	1, h, ho.-fr : p.-cl, h	3 : 0, m, ho.-fr : 0, h, ho.-fr
28	6·1	8·2	WSW : Calm : SSW	SSW	0·9	0·04	257	0, h, ho.-fr : 0, h, ho, fr	2 : p.-cl : 6
29	0·0	8·2	SSW	SSW	2·3	0·16	303	10 : 10, slt.-sh, s, cu	10 : 10
30	0·0	8·1	SSW : Calm	SSW : Calm	0·1	0·00	145	10 : 10	10 : 0 : p.-cl, ho.-fr
Means	2·3	8·8	..	..	..	0·29	319		
Number of Column for Reference	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 42°·3, being 0°·4 ***higher*** than
The mean *Temperature of the Dew Point* for the month was 40°·2, being 0°·2 ***higher*** than
The mean *Degree of Humidity* for the month was 86·5, being 0·8 *less* than
The mean *Elastic Force of Vapour* for the month was 0in·249, being 0in·002 *greater* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 2grs·9, being 0gr·1 *greater* than
The mean *Weight of a Cubic Foot of Air* for the month was 544 grains, being 4 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 6·6.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·262. The maximum daily amount of *Sunshine* was 7·1 hours on November 9.

The highest reading of the *Solar Radiation Thermometer* was 87°·9 on November 2; and the lowest reading of the *Terrestrial Radiation Thermometer* was 20°·3 on November 28.

The *Proportions of Wind* referred to the cardinal points were N. 2, E. 3, S. 12, W. 11. Two days were calm.

The *Greatest Pressure of the Wind* in the month was 18·0 lbs. on the square foot on November 5. The mean daily *Horizontal Movement of the Air* for the month was 319 miles; the greatest daily value was 691 miles on November 5; and the least daily value was 145 miles on November 30.

Rain (0in·005 or over) fell on 15 days in the month, amounting to 4in·254, as measured by gauge No. 6 partly sunk below the ground; being 2in·034 *greater* than the average fall for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Phases of the Moon.	BAROMETER. Mean of 24 Hourly Values (corrected and reduced to 32° Fahrenheit).	TEMPERATURE. Of the Air. Highest.	Lowest.	Daily Range.	Mean of 24 Hourly Values.	Excess above Average of 65 Years.	Of Evaporation. Mean of 24 Hourly Values.	Of the Dew Point. Deduced Mean Daily Value.	Difference between the Air Temperature and Dew Point Temperature. Mean.	Greatest.	Least.	Degree of Humidity (Saturation = 100).	TEMPERATURE. Of Radiation. Highest in Sun's Rays.	Lowest on the Grass.	Of the Earth 3 ft. 2 in. below the Surface of the Soil.	Rain collected in Gauge No. 6, whose receiving surface is 5 inches above the Ground.	Electricity.
		in.	°	°	°	°	°	°	°	°	°	°		°	°	°	in.	
Dec. 1	..	29·959	38·5	28·1	10·4	32·9	− 8·0	32·5	31·7	1·2	4·7	1·2	98	42·0	23·0	46·50	0·000	wP : wP : wwP
2	First Quarter	29·883	40·0	36·3	3·7	38·4	− 2·5	36·8	34·6	3·8	4·8	1·0	87	44·0	32·9	46·31	0·000	wwP : wwP, wP : wP, wwP
3	..	29·821	36·6	33·3	3·3	35·1	− 6·0	33·7	31·6	3·5	5·3	1·8	86	40·0	26·8	46·10	0·000	wwP : wP : wP
4	..	29·801	38·2	29·9	8·3	34·7	− 6·6	32·4	28·7	6·0	8·8	2·6	77	44·3	21·7	45·82	0·000	wP : mP : mP
5	..	29·848	39·3	32·6	6·7	36·5	− 5·0	34·3	31·0	5·5	6·5	3·1	81	44·1	26·5	45·41	0·002	mP : mP, wP : wP
6	..	29·921	41·0	34·0	7·0	38·2	− 3·3	35·9	32·8	5·4	6·1	3·9	81	45·8	27·6	45·02	0·000	wP, mP : mP : wP
7	..	29·819	39·5	37·1	2·4	38·2	− 3·1	36·2	33·5	4·7	6·5	3·8	84	42·8	31·8	44·90	0·002	mP : mP : wP
8	..	29·600	44·0	28·1	15·9	39·2	− 1·8	38·3	37·1	2·1	5·5	0·6	92	50·2	24·8	44·81	0·051	wP
9	Full: Greatest Dec. N.	29·139	47·8	29·1	18·7	39·2	− 1·4	38·0	36·4	2·8	8·3	0·7	90	59·8	24·1	44·80	0·291	wwP : wwP : wP, wwP
10	..	29·015	42·9	33·6	9·3	37·2	− 3·2	36·3	35·0	2·2	5·7	1·2	92	63·0	26·8	44·70	0·160	wwP : wP : wwP
11	..	28·866	41·4	34·7	6·7	38·0	− 2·2	37·0	35·6	2·4	3·6	1·0	91	55·3	31·8	44·61	0·000	wwP
12	..	28·760	39·1	34·9	4·2	37·9	− 2·4	36·9	35·6	2·3	4·2	1·2	92	44·0	30·4	44·51	0·001	wwP
13	Apogee	28·973	38·1	26·9	11·2	34·3	− 6·2	33·3	31·5	2·8	4·6	1·4	89	38·0	22·8	44·39	0·000	wwP : wP : wP
14	..	29·072	34·5	27·5	7·0	32·0	− 8·7	31·7	31·0	1·0	3·7	0·0	96	36·0	25·8	44·31	0·020	wwP
15	..	29·178	37·1	32·1	5·0	34·6	− 6·2	33·8	32·5	2·1	3·0	0·9	92	36·7	29·8	43·92	0·090	wwP
16	..	29·486	33·9	27·5	6·4	31·0	− 9·7	30·7	29·9	1·1	2·4	0·0	95	34·0	27·8	43·65	0·000	wwP
17	Last Quarter	29·573	35·6	27·2	8·4	31·7	− 8·7	31·1	29·7	2·0	3·9	0·0	93	41·0	29·0	43·45	0·000	wwP
18	..	29·330	33·4	27·8	5·6	31·4	− 8·6	31·2	30·9	0·5	3·2	0·3	99	50·5	26·1	43·20	0·006	wwP
19	..	29·178	36·9	23·4	13·5	31·2	− 8·3	30·3	28·0	3·2	5·1	0·0	87	46·1	21·7	43·02	0·009	wwP
20	..	29·157	43·1	29·8	13·3	36·4	− 2·6	34·4	31·5	4·9	7·7	1·0	83	54·7	23·3	42·73	0·008	wwP
21	..	28·862	48·9	35·4	13·5	41·3	+ 2·6	40·1	38·5	2·8	5·3	1·6	91	48·9	30·0	42·52	0·601	wwP
22	..	29·210	44·4	32·3	12·1	38·4	− 0·0	37·3	35·8	2·6	5·8	1·4	91	54·0	26·2	42·51	0·002	wwP
23	Greatest Dec. S.	29·038	50·5	34·4	16·1	38·3	+ 0·1	36·8	34·7	3·6	8·1	0·4	87	48·0	28·9	42·52	0·583	wwP
24	New	29·644	45·8	35·1	10·7	39·6	+ 1·4	37·2	34·1	5·5	8·9	1·4	81	53·1	28·6	42·52	0·000	wwP
25	..	29·393	41·1	32·2	8·9	37·2	− 1·2	36·1	34·5	2·7	5·5	1·2	90	46·1	28·7	42·41	0·324	wwP
26	Perigee	29·661	40·0	27·7	12·3	34·5	− 4·1	33·6	32·1	2·4	4·2	1·4	91	38·5	23·8	42·33	0·012	wwP
27	..	29·943	31·3	26·1	5·2	28·3	−10·5	28·1	27·4	0·9	2·3	0·0	98	32·0	23·0	42·17	0·000	wwP
28	..	29·969	46·6	27·4	19·2	36·7	− 2·2	36·0	35·0	1·7	2·7	0·0	94	48·3	26·1	41·74	0·150	wwP, wP : wwP
29	..	29·684	54·9	49·6	5·3	52·9	+13·9	51·5	50·1	2·8	4·4	1·0	92	56·0	47·4	41·78	0·039	wwP
30	..	20·744	51·3	44·0	7·3	48·5	+ 9·6	46·1	43·5	5·0	8·2	1·7	83	63·3	38·8	42·19	0·110	wwP
31	First Quarter	29·918	52·7	44·9	7·8	50·0	+11·3	48·3	46·6	3·4	5·9	1·8	88	57·0	39·7	42·87	0·042	wwP
Means	..	29·466	41·6	32·4	9·2	37·2	− 2·7	36·0	34·2	3·0	5·3	1·2	89·4	47·0	28·2	43·80	Sum 2·503	..
Number of Column for Reference.	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18

The results apply to the civil day.

The mean reading of the Barometer (Column 2) and the mean temperatures of the Air and Evaporation (Columns 6 and 8) are deduced from the photographic records. The average temperature (Column 7) is deduced from the 65 years' observations, 1841–1905. The temperature of the Dew Point (Column 9) and the Degree of Humidity (Column 13) are deduced from the corresponding temperatures of the Air and Evaporation by means of Glaisher's Hygrometrical Tables. The mean difference between the Air and Dew Point Temperatures (Column 10) is the difference between the numbers in Columns 6 and 9, and the Greatest and Least Differences (Columns 11 and 12) are deduced from the 24 hourly photographic measures of the Dry-bulb and Wet-bulb Thermometers. The readings in Column 16 are taken daily at noon.

The values given in Columns 3, 4, 5, 14, and 15 are derived from eye-readings of self-registering thermometers.

The mean reading of the *Barometer* for the month was 29^{in}·466, being 0^{in}·319 *lower* than the average for the 65 years, 1841–1905.

TEMPERATURE OF THE AIR.

The highest in the month was 54°·9 on December 29; the lowest in the month was 23°·4 on December 19; and the range was 31°·5.
The mean of all the highest daily readings in the month was 41°·6, being 2°·6 *lower* than the average for the 65 years, 1841–1905.
The mean of all the lowest daily readings in the month was 32°·4, being 2°·6 *lower* than the average for the 65 years, 1841–1905.
The mean of the daily ranges was 9°·2, being *equal* to the average for the 65 years, 1841–1905.
The mean for the month was 37°·2, being 2°·7 *lower* than the average for the 65 years, 1841–1905.

MONTH and DAY, 1916.	Daily Duration of Sunshine.	Sun above Horizon.	Wind as Deduced from Self-Registering Anemometers. Osler's. General Direction. A.M.	P.M.	Pressure on the Square Foot. Greatest.	Mean of 24 Hourly Measures.	Robinson's Horizontal Movement of the Air.	Clouds and Weather. A.M.	P.M.
	hours.	hours.			lbs.	lbs.	miles.		
Dec. 1	0·0	8·1	Calm : SE	E	1·2	0·03	148	10 : 10, slt.-h	10, h : 1, th.-cl., h : 10
2	0·0	8·1	E : ENE	E : ENE	2·1	0·21	315	10 : 10	10 : 10
3	0·0	8·1	NNE : N : NNW	W : SW	0·5	0·00	189	10 : 10	10, h : 9, m : 3
4	2·7	8·0	SW : W : NW	NW : NNW	2·6	0·25	335	0, ho.-fr : 0, ho.-fr : 1	1 : p.-cl : 2, f
5	0·0	8·0	NW : NNW	N : NNE	3·4	0·31	339	1, h, ho.-fr: v.-cl, h : 10	7, m.-r.-shs: 7, lu.-ha : 9, th.-cl
6	0·0	8·0	NNE : N	N	1·9	0·20	267	v.-cl : 9	9, oc.-m.-r : 10, oc.-m.-r
7	0·0	8·0	N	Calm : SSW	0·7	0·01	141	10 : 10, h	10, h, th.-cl : 10, slt.-m.-r
8	0·0	7·9	SSW : SW : W	NW : SW : Calm	0·6	0·03	173	10, m.-r : 10, m.-r : 10	6 : 0, th.-f, ho.-fr
9	1·4	7·9	E : SE : S	S : SW : Calm	1·8	0·08	252	p.-cl, tk.-f, r : 10, r : 10, r, oc.-m.-r	7 : p.-cl : 3, ho.-fr
10	2·5	7·9	Calm : SE	SE : E	1·0	0·01	170	v.-cl, oc.-r: v.-cl, r : 9	6 : 10, fq.-m.-r : 10, oc.-slt.-r
11	0·0	7·9	Calm : E	E : Calm	0·4	0·00	126	10 : 10, th.-cl : 10	10 : 10, m.-r
12	0·0	7·9	Calm : E : N	N : NW : W	0·2	0·00	169	10, oc.-m.-r : 10, f, h	10, h, m, r.-sh : 10, h
13	0·0	7·8	WSW : SW	SW : Calm	0·2	0·00	160	10, h : 10, h	v.-cl, h : 10, h, f, ho.-fr
14	0·0	7·8	Calm : N	NNE : Calm	0·2	0·00	113	10, f, ho.-fr : 10, f, ho.-fr	10, slt.-f : 10, m.-r, sn
15	0·0	7·8	N : Calm	NW : Calm	0·3	0·00	213	10, sn : 10 : 10	10, slt.-sn.-sh : 10, h, fq.-m.-r : 10, h
16	0·0	7·8	SW : Calm	Calm	0·2	0·00	104	10, m : 10, f	10, f : 10, f
17	0·0	7·8	Calm : NNW	N	0·3	0·00	118	10, f : 10, f	10, f : 10, f
18	0·2	7·8	W : Calm : SSE	SSE : Calm	0·2	0·00	72	10 : 10	10, h : 10, h, sn.-sh : 7, h
19	0·2	7·8	Calm : SSE : S	SW : W : Calm	3·0	0·10	227	p.-cl, f, ho.-fr : v.-cl : 10, sn.-shs, r	9 : 0 : 1, h, ho.-fr
20	0·9	7·8	Calm : SSE : S	S : SSW	2·3	0·15	293	p.-cl, lu.-ha, ho.-fr : v.-cl, th.-cl, m.-r.-sh	9, so.-ha : 10, fq.-m.-r
21	0·0	7·7	SSW : S : SSE	S : WNW : SW	8·0	0·59	417	10, r, hy.-r : 10, r, m.-r	10, r, m.-r, w : p.-cl, slt.-sh
22	1·6	7·7	SSW : SW	SW : S	1·1	0·05	257	8 : 10, m.-r	8 : 0, ho.-fr : p.-cl, th.-cl, ho.-fr
23	0·0	7·8	E : Variable	WSW : SW	12·0	1·13	576	10, r : 10, r, m.-r, m	10, fq.-m.-r, w : 0
24	1·6	7·8	SW : SSW	SW : Calm : ESE	4·7	0·32	368	0, ho.-fr : 0, ho.-fr : v.-cl	6, th.-cl : 7, ho.-fr
25	0·4	7·8	E : Variable : W	W : WSW	4·0	0·26	341	7, r, sn : 10	10 : 0 : 0, ho.-fr
26	0·0	7·8	SW : Calm	Calm	0·1	0·00	110	0 : 9, m	10, f : 10, f : 0, f
27	0·0	7·8	Calm : WSW	SW : Calm : S	0·3	0·00	76	tk.-f, ho.-fr : tk.-f, ho.-fr	tk.-f, ho.-fr : tk.-f, ho.-fr
28	0·0	7·8	Calm : SSW	SSW	3·8	0·26	282	f, ho.-fr : v.-cl, ho.-fr, h: 6, h	9 : 10, r
29	0·0	7·8	SW	SW	8·0	0·94	626	10, slt.-r : 10 : 10, fq.-m.-r	10, r, m.-r, w: 10, r, m.-r : 10
30	4·0	7·8	SW : WSW	WSW : SW	4·0	0·38	489	10 : 10, r : v.-cl, cu.-n	v.-cl, cu.-n : v.-cl, lu.-ha : 8, ci.-cu
31	0·0	7·8	SW	WSW : W	4·7	0·45	555	10 : 10	7, r : 10, r
Means	0·5	7·9	..	..	..	0·19	259		
Number of Column for Reference.	19	20	21	22	23	24	25	26	27

The mean *Temperature of Evaporation* for the month was 36°·0, being 2°·5 *lower* than
The mean *Temperature of the Dew Point* for the month was 34°·2, being 2°·5 *lower than*
The mean *Degree of Humidity* for the month was 89·4, being 0·8 *greater* than
The mean *Elastic Force of Vapour* for the month was 0in.197, being 0in.021 *less* than
The mean *Weight of Vapour in a Cubic Foot of Air* for the month was 2grs.3, being 0gr.3 *less* than
The mean *Weight of a Cubic Foot of Air* for the month was 549 grains, being 3 grains *less* than
} the average for the 65 years, 1841–1905.

The mean amount of *Cloud* for the month (a clear sky being represented by 0 and an overcast sky by 10) was 8·3.

The mean proportion of *Sunshine* for the month (constant sunshine being represented by 1) was 0·064. The maximum daily amount of *Sunshine* was 4·0 hours on December 30.

The highest reading of the *Solar Radiation Thermometer* was 63°·3 on December 30; and the lowest reading of the *Terrestrial Radiation Thermometer* was 21°·7 on December 4 and 19.

The *Proportions of Wind* referred to the cardinal points were N. 5, E. 4, S. 8, W. 7. Seven days were calm.

The *Greatest Pressure of the Wind* in the month was 12·0 lbs. on the square foot on December 23. The mean daily *Horizontal Movement of the Air* for the month was 259 miles; the greatest daily value was 626 miles on December 29; and the least daily value was 72 miles on December 18.

Rain (0in.005 or over) fell on 16 days in the month, amounting to 2in.503, as measured by gauge No. 6 partly sunk below the ground; being 0in.676 *greater* than the average fall for the 65 years, 1841–1905.

HIGHEST and LOWEST READINGS of the BAROMETER, reduced to 32° Fahrenheit, as extracted from the PHOTOGRAPHIC RECORDS.

MAXIMA.		MINIMA.		MAXIMA.		MINIMA.		MAXIMA.		MINIMA.	
Greenwich Civil Time, 1916.	Reading.	Greenwich Civil Time, 1916.	Reading.	Greenwich Civil Time, 1916.	Reading.	Greenwich Civil Time, 1916.	Reading.	Greenwich Civil Time, 1916.	Reading.	Greenwich Civil Time, 1916.	Reading.
January		January		April		April		September		September	
d h m	in.	d h m	in.	d h m	in.	d h m	in.	d h m	in.	d h m	in.
1. 2. 0	29·597	1. 13. 45	29·332			4. 4. 10	29·743	2. 5. 0	29·939	4. 3. 0	29·521
2. 8. 15	29·925	2. 21. 0	29·726	5. 23. 30	29·979	7. 4. 45	29·739	7. 8. 0	30·222	11. 23. 15	29·777
3. 22. 15	30·164	4. 21. 45	29·763	10. 7. 0	30·085	11. 9. 15	29·575	12. 21. 55	29·900	13. 15. 15	29·800
5. 22. 30	30·194	7. 11. 35	29·574	11. 22. 0	29·718	12. 18. 10	29·255	14. 23. 0	30·062	15. 22. 20	29·854
9. 19. 0	30·327	11. 13. 50	30·027	15. 23. 45	30·007	18. 8. 20	29·056	16. 23. 5	30·125	19. 5. 55	29·240
12. 1. 5	30·238	13. 1. 45	29·653	18. 19. 50	29·161	19. 5. 45	29·045	22. 9. 20	30·086	27. 13. 25	29·531
14. 10. 15	30·119	15. 12. 55	29·887	21. 10. 45	29·297	22. 4. 0	29·197	27. 22. 45	29·674	29. 4. 45	29·450
16. 10. 55	30·039	18. 3. 20	29·623	25. 20. 50	30·040	27. 16. 25	29·866				
19. 8. 30	29·894	19. 20. 10	29·675	29. 7. 55	29·979						
20. 21. 40	30·068	21. 6. 50	29·883								
23. 0. 25	30·420	24. 4. 45	29·904	May		May		October		October	
25. 0. 20	30·227	27. 2. 15	30·000								
31. 10. 45	30·402					5. 20. 45	29·129	1. 9. 0	30·067	2. 15. 15	29·812
				8. 23. 30	29·678	9. 15. 30	29·457	3. 10. 10	29·900	5. 5. 0	29·578
				10. 22. 30	29·906	13. 10. 0	29·643	5. 20. 0	29·740	6. 18. 0	29·535
				14. 6. 55	29·721	15. 6. 55	29·487	9. 22. 30	29·950	11. 1. 35	29·855
				19. 8. 0	30·287	22. 8. 15	29·925	13. 10. 15	30·039	15. 0. 30	29·485
				23. 0. 40	30·016	25. 9. 30	29·421	16. 9. 30	30·020	18. 0. 0	29·609
February		February		26. 22. 0	29·755	27. 14. 45	29·654	18. 21. 30	29·875	19. 5. 0	29·770
				31. 21. 45	30·008			20. 8. 5	30·118	22. 23. 0	29·648
		4. 6. 15	28·830					23. 9. 0	29·734	25. 9. 40	29·072
5. 23. 50	29·851	6. 17. 30	29·656					26. 19. 0	29·681	28. 1. 15	29·017
7. 0. 15	29·794	9. 12. 10	29·336	June		June		29. 0. 0	29·378	29. 13. 5	29·059
10. 11. 40	29·727	11. 11. 55	29·129					30. 4. 25	29·283	30. 9. 15	29·125
12. 18. 30	30·015	13. 5. 50	29·888			5. 3. 15	29·166	30. 20. 50	29·231	31. 1. 20	29·077
13. 11. 0	29·959	14. 12. 40	29·588	10. 20. 25	30·015	13. 4. 20	29·583				
14. 19. 35	29·776	15. 5. 15	29·111	16. 10. 5	30·119	19. 5. 35	29·736				
15. 14. 5	29·508	16. 9. 30	29·026	21. 7. 30	30·011	24. 13. 45	29·693				
18. 0. 30	29·658	18. 19. 30	29·274	25. 8. 20	29·814	27. 5. 40	29·532	November		November	
21. 0. 15	30·013	27. 10. 0	29·131	29. 9. 45	29·720	30. 3. 30	29·566				
28. 9. 50	29·388	29. 4. 55	29·064					1. 5. 15	29·722	1. 14. 50	29·610
29. 10. 10	29·180							3. 0. 5	29·697	5. 14. 15	28·480
				July		July		6. 19. 0	29·412	8. 4. 35	28·687
								14. 21. 0	30·240	18. 23. 0	28·334
				1. 23. 45	29·855	3. 17. 0	29·574	23. 10. 0	30·067	24. 12. 30	29·805
				6. 0. 35	29·847	7. 18. 55	29·344	24. 21. 10	29·974	25. 22. 0	29·199
				11. 22. 15	29·937	13. 5. 15	29·618	28. 10. 15	30·263		
March		March		15. 14. 10	30·024	17. 3. 40	29·815				
				21. 8. 45	30·077	26. 19. 30	29·928				
		1. 0. 25	29·023	29. 9. 0	30·188	31. 16. 15	29·994				
1. 21. 0	29·182	3. 2. 50	28·978					December		December	
5. 21. 5	29·764	8. 8. 30	29·435								
9. 10. 30	29·754	12. 6. 0	29·146	August		August				4. 5. 35	29·778
14. 20. 55	29·610	16. 4. 50	29·362					6. 9. 0	29·954	12. 12. 0	28·695
17. 23. 5	29·781	21. 16. 15	29·250	3. 8. 35	30·182	4. 3. 45	30·082	17. 10. 15	29·608	19. 12. 35	29·116
22. 21. 35	29·441	24. 5. 45	29·234	4. 23. 0	30·201	14. 17. 35	29·426	19. 21. 15	29·229	21. 13. 10	28·516
25. 7. 10	29·464	26. 1. 30	29·160	16. 23. 0	29·579	17. 14. 55	29·490	22. 19. 55	29·406	23. 10. 5	28·668
27. 10. 10	29·375	28. 4. 45	28·736	22. 9. 55	29·908	26. 4. 20	29·304	24. 10. 50	29·742	25. 6. 40	29·107
31. 10. 45	30·270			28. 21. 55	29·535	30. 0. 20	29·068	28. 2. 20	30·103	30. 4. 40	29·598

The readings in the above table are accurate, but the times are occasionally liable to uncertainty, as the barometer will sometimes remain at its extreme reading without sensible change for a considerable interval of time. In such cases the time given is the middle of the stationary period.
The time is expressed in civil reckoning, commencing at midnight and counting from 0^h to 24^h.
The height of the barometer cistern above mean sea level is 159 feet: no correction has been applied to the readings to reduce to sea level.

HIGHEST and LOWEST READINGS of the BAROMETER in each Month for the YEAR 1916.

	January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.
	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.
Highest	30·420	30·350	30·270	30·236	30·287	30·119	30·188	30·201	30·222	30·118	30·263	30·103
Lowest	29 332	28·830	28·736	29·045	29·129	29·166	29·344	29·068	29·240	29·017	28·334	28·516
Range	1·088	1·520	1·534	1·191	1·158	0·953	0·844	1·133	0·982	1·101	1·929	1·587

The highest reading in the year was 30^{in}·420 on January 23. The lowest reading in the year was 28^{in}·334 on November 18. The range of reading in the year was 2^{in}·086.

MONTHLY RESULTS of METEOROLOGICAL ELEMENTS for the YEAR 1916.

MONTH 1916.	Mean Reading of the Barometer.	TEMPERATURE OF THE AIR. Highest.	Lowest.	Range in the Month.	Mean of all the Highest.	Mean of all the Lowest.	Mean of the Daily Ranges.	Monthly Mean.	Excess of Mean above Average of 65 Years.	Mean Temperature of Evaporation.	Mean Temperature of the Dew Point.	Mean Degree of Humidity. (Saturation = 100.)
	in.	°	°	°	°	°	°	°	°	°	°	
January ..	30·004	56·8	29·1	27·7	50·4	40·1	10·3	45·9	+ 7·3	43·6	41·0	83·7
February ..	29·586	53·4	25·4	28·0	44·9	34·2	10·7	39·5	0·0	37·5	34·8	83·3
March	29·468	57·0	24·3	32·7	45·2	34·2	11·0	39·1	− 2·8	37·5	35·3	85·7
April	29·717	72·2	31·1	41·1	58·0	39·0	19·0	47·8	− 0·5	43·7	39·3	72·8
May	29·748	81·5	35·5	46·0	66·5	45·1	21·4	55·3	+ 2·3	51·3	47·5	75·8
June.....	29·749	73·3	38·9	34·4	63·3	46·2	17·2	53·6	− 5·8	50·1	46·5	77·5
July	29·862	83·9	46·1	37·8	70·4	51·5	18·9	59·8	− 2·8	56·3	53·2	79·2
August....	29·756	83·8	45·6	38·2	73·5	54·6	18·9	62·7	+ 1·0	58·5	55·1	76·8
September..	29·853	71·1	36·1	35·0	64·5	48·2	16·3	55·8	− 1·4	53·3	50·9	83·8
October ...	29·699	68·7	28·6	40·1	59·7	46·4	13·2	52·6	+ 2·6	50·2	47·7	84·0
November .	29·601	58·5	25·2	33·3	49·9	38·2	11·7	44·1	+ 0·6	42·3	40·2	86·5
December .	29·466	54·9	23·4	31·5	41·6	32·4	9·2	37·2	− 2·7	36·0	34·2	89·4
Means	29·709	Highest 83·9	Lowest 23·4	Annual Range 60·5	57·3	42·5	14·8	49·5	− 0·2	46·7	43·8	81·5

MONTH, 1916.	Mean Elastic Force of Vapour.	Mean Weight of Vapour in a Cubic Foot of Air.	Mean Weight of a Cubic Foot of Air.	Mean Temperature at Noon of the Earth 3 ft. 2 in. below the surface of the Soil.	Mean Amount of Cloud (0–10).	RAIN. Number of Rainy Days (0·005 or over).	Amount collected in Gauge No. 6, whose receiving Surface is 5 inches above the Ground.	WIND. From Osler's Anemometer. Number of Hours of Prevalence of each Wind referred to different Points of Azimuth. N.	N.E.	E.	S.E.	S.	S.W.	W.	N.W.	Number of Calm or nearly Calm Hours.	Mean Daily Pressure on the Square Foot.	From Robinson's Anemometer. Mean Daily Horizontal Movement of the Air.
	in.	grs.	grs.	°			in.	h	h	h	h	h	h	h	h	h	lbs.	miles.
January ..	0·257	2·9	550	45·85	7·3	18	1·224	6	3	0	8	210	323	85	39	70	0·53	404
February ..	0·202	2·4	549	43·81	7·1	19	3·898	65	68	66	17	118	152	108	56	46	0·44	394
March	0·206	2·4	547	41·37	8·2	23	4·130	155	183	92	12	60	88	15	41	98	0·28	295
April	0·240	2·8	542	44·42	5·1	12	1·246	84	40	68	8	75	175	70	106	94	0·39	313
May	0·329	3·7	535	51·72	6·0	12	2·088	27	50	48	21	135	207	71	30	155	0·17	223
June	0·317	3·6	536	55·10	7·3	17	1·877	143	46	1	5	56	199	132	88	50	0·32	277
July	0·406	4·5	531	58·52	6·7	11	1·399	104	82	31	20	19	123	136	49	180	0·13	198
August ...	0·434	4·8	526	62·05	6·3	13	3·436	118	55	57	41	80	172	86	45	90	0·18	234
September	0·373	4·2	536	59·16	6·8	13	1·064	132	138	71	29	14	67	101	37	131	0·15	246
October...	0·331	3·7	536	56·12	7·0	19	2·655	30	12	36	52	103	246	180	29	56	0·41	371
November.	0·249	2·9	544	49·84	6·6	15	4·254	26	18	59	38	124	255	143	6	51	0·29	319
December.	0·197	2·3	549	43·80	8·3	16	2·503	74	31	60	26	98	172	82	39	162	0·19	259
Sums	..	..	..	..	..	188	29·774	964	726	589	277	1092	2179	1209	565	1183	..	..
Means	0·295	3·4	540	50·98	6·9	..	..	..	..	..	..	..	..	..	..	..	0·29	294

The greatest recorded pressure of the wind on the square foot in the year was 35·0 lbs. on January 1.
The greatest recorded daily horizontal movement of the air in the year was 955 miles on February 16.
The least recorded daily horizontal movement of the air in the year was 71 miles on April 27.

MONTHLY MEAN READINGS of the BAROMETER at every HOUR of the DAY, as deduced from the PHOTOGRAPHIC RECORDS.

Hour, Greenwich Civil Time.	1916. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Yearly Means.
	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.
Midnight	30·003	29·625	29·458	29·735	29·757	29·756	29·864	29·763	29·857	29·704	29·603	29·493	29·718
1h	30·002	29·615	29·457	29·729	29·755	29·753	29·863	29·760	29·853	29·701	29·602	29·485	29·715
2	30·003	29·603	29·454	29·724	29·750	29·750	29·861	29·758	29·848	29·698	29·600	29·480	29·711
3	30·002	29·586	29·449	29·719	29·747	29·747	29·858	29·755	29·842	29·696	29·597	29·472	29·706
4	29·995	29·572	29·446	29·713	29·743	29·744	29·858	29·753	29·838	29·694	29·595	29·458	29·701
5	29·989	29·566	29·448	29·715	29·747	29·746	29·861	29·754	29·837	29·694	29·594	29·447	29·700
6	29·988	29·564	29·452	29·717	29·751	29·749	29·866	29·759	29·843	29·696	29·594	29·441	29·702
7	29·993	29·572	29·459	29·724	29·754	29·754	29·870	29·764	29·849	29·699	29·594	29·439	29·706
8	30·001	29·581	29·463	29·725	29·755	29·754	29·873	29·767	29·855	29·705	29·603	29·445	29·711
9	30·009	29·586	29·468	29·725	29·753	29·753	29·874	29·768	29·861	29·708	29·611	29·450	29·714
10	30·014	29·586	29·472	29·724	29·752	29·754	29·873	29·769	29·866	29·710	29·616	29·453	29·716
11	30·012	29·587	29·470	29·722	29·749	29·753	29·871	29·765	29·860	29·709	29·610	29·450	29·713
Noon	30·006	29·585	29·472	29·718	29·743	29·752	29·868	29·760	29·858	29·703	29·601	29·442	29·709
13h	29·995	29·581	29·466	29·714	29·744	29·750	29·864	29·757	29·854	29·696	29·594	29·438	29·704
14	29·988	29·577	29·461	29·706	29·741	29·745	29·860	29·753	29·847	29·690	29·587	29·441	29·700
15	29·990	29·576	29·458	29·699	29·736	29·740	29·856	29·747	29·843	29·687	29·585	29·452	29·697
16	29·995	29·580	29·461	29·698	29·733	29·738	29·851	29·742	29·843	29·687	29·586	29·464	29·698
17	30·004	29·585	29·467	29·700	29·732	29·736	29·847	29·739	29·844	29·693	29·590	29·473	29·701
18	30·009	29·594	29·476	29·703	29·734	29·741	29·847	29·736	29·849	29·698	29·597	29·482	29·706
19	30·017	29·595	29·486	29·710	29·740	29·745	29·850	29·739	29·858	29·700	29·605	29·490	29·711
20	30·019	29·594	29·496	29·719	29·751	29·750	29·856	29·750	29·866	29·703	29·608	29·495	29·717
21	30·022	29·593	29·500	29·721	29·761	29·756	29·865	29·757	29·869	29·706	29·613	29·500	29·722
22	30·024	29·589	29·499	29·723	29·763	29·756	29·871	29·760	29·868	29·702	29·616	29·499	29·722
23	30·028	29·583	29·500	29·721	29·765	29·755	29·870	29·759	29·867	29·699	29·618	29·495	29·722
24	30·028	29·597	29·498	29·720	29·764	29·751	29·870	29·757	29·863	29·693	29·614	29·492	29·721
Means 0h.–23h.	30·005	29·586	29·468	29·717	29·748	29·749	29·862	29·756	29·853	29·699	29·601	29·466	29·709
Means 1h.–24h.	30·006	29·585	29·470	29·716	29·748	29·749	29·862	29·755	29·853	29·699	29·601	29·466	29·709
Number of Days employed.	31	29	31	30	31	30	31	31	30	31	30	31	..

MONTHLY MEAN TEMPERATURE of the AIR at every HOUR of the DAY, as deduced from the PHOTOGRAPHIC RECORDS.

Hour, Greenwich Civil Time	1916. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Yearly Means.
	°	°	°	°	°	°	°	°	°	°	°	°	°
Midnight	44·9	37·8	37·3	43·1	49·2	49·8	55·1	58·2	51·9	50·3	42·6	35·5	46·3
1h	44·6	37·9	37·0	42·2	48·5	48·9	54·4	57·4	51·6	50·1	42·3	35·5	45·9
2	44·3	37·9	36·6	41·4	47·8	48·1	53·7	56·8	51·4	49·8	41·9	35·6	45·4
3	43·9	37·8	36·3	40·9	47·0	47·6	53·1	56·2	51·1	49·4	41·5	35·5	45·0
4	43·6	37·7	36·1	40·3	46·5	47·3	52·4	55·7	50·9	49·2	41·2	35·6	44·7
5	43·8	38·0	36·0	40·3	46·8	47·7	52·4	55·6	50·9	49·1	41·5	35·6	44·8
6	44·1	38·1	36·1	41·4	48·7	49·2	53·4	56·6	51·6	49·4	42·0	35·5	45·5
7	44·4	38·0	36·5	43·8	51·9	51·2	55·3	58·6	52·8	50·3	42·5	35·8	46·8
8	44·7	38·3	37·5	46·7	55·8	53·6	58·4	61·8	54·6	51·5	43·2	36·4	48·5
9	45·2	39·0	38·8	49·3	58·7	55·4	61·1	64·7	56·8	53·1	44·4	37·1	50·3
10	46·3	40·0	39·8	51·5	60·6	56·5	63·0	66·6	58·6	54·8	45·7	37·6	51·7
11	47·6	41·4	41·3	52·9	61·7	57·9	64·6	68·2	60·4	56·2	46·9	38·7	53·2
Noon	48·3	42·8	42·5	54·0	62·3	58·6	65·6	69·4	61·6	57·0	47·8	39·5	54·1
13h	48·9	43·1	43·0	55·0	62·6	59·2	66·3	70·4	62·0	57·5	47·8	39·8	54·6
14	49·1	43·0	43·2	55·6	63·0	59·9	67·2	70·1	62·3	57·4	47·8	39·9	54·9
15	48·9	42·6	43·3	55·7	63·1	59·6	67·1	70·0	62·4	57·1	47·1	39·2	54·7
16	48·1	42·0	42·9	54·7	63·0	58·9	66·7	69·1	61·2	55·7	46·2	38·7	53·9
17	47·4	40·9	41·9	53·4	62·0	58·0	65·9	68·1	59·7	54·3	45·1	38·3	52·9
18	46·7	40·0	40·7	51·7	60·3	56·8	64·5	66·3	57·9	53·2	44·5	37·8	51·7
19	46·3	39·3	39·7	49·6	67·6	55·1	62·8	64·1	56·2	52·3	44·1	37·6	51·2
20	46·0	39·0	39·0	47·7	55·4	53·5	60·6	62·4	54·8	51·7	43·5	37·5	49·3
21	45·6	38·6	38·5	46·3	53·2	52·1	58·6	61·0	53·7	51·3	43·2	37·1	48·3
22	45·3	38·4	37·8	45·3	51·6	51·2	57·4	59·7	52·7	51·0	42·8	36·7	47·5
23	45·0	38·2	37·4	44·4	50·4	50·4	56·4	58·7	52·2	50·6	42·5	36·5	46·9
24	44·6	37·9	37·2	43·5	49·3	49·7	55·5	58·0	51·6	50·2	42·1	36·2	46·3
Means 0h.–23h.	46·0	39·5	39·1	47·8	55·3	53·6	59·8	62·7	55·8	52·6	44·1	37·2	49·5
Means 1h.–24h.	46·0	39·5	39·1	47·8	55·3	53·6	59·8	62·7	55·8	52·6	44·1	37·3	49·5
Number of Days employed.	31	29	31	30	31	30	31	31	30	31	30	31	..

MONTHLY MEAN TEMPERATURE of EVAPORATION at every HOUR of the DAY, as deduced from the PHOTOGRAPHIC RECORDS.

Hour, Greenwich Civil Time.	1916. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Yearly Means.
	°	°	°	°	°	°	°	°	°	°	°	°	°
Midnight	42·9	36·3	36·5	41·0	47·5	48·1	53·9	56·4	50·7	48·8	41·2	34·5	44·8
1h	42·7	36·3	36·3	40·2	46·9	47·3	53·3	55·9	50·4	48·5	41·0	34·5	44·4
2	42·5	36·3	35·8	39·5	46·4	46·7	52·7	55·3	50·2	48·1	40·6	34·6	44·1
3	42·0	36·3	35·6	38·9	45·8	46·2	52·2	55·0	50·0	47·6	40·2	34·5	43·7
4	41·8	36·3	35·5	38·3	45·5	45·8	51·6	54·6	49·9	47·4	40·0	34·6	43·4
5	42·0	36·6	35·3	38·2	45·9	46·2	51·4	54·3	49·9	47·4	40·3	34·7	43·5
6	42·2	36·8	35·3	38·9	47·5	47·3	52·1	54·9	50·3	47·8	40·8	34·6	44·0
7	42·5	36·7	35·6	40·8	49·7	48·9	53·4	56·1	51·4	48·6	41·3	35·0	45·0
8	43·0	37·1	36·4	43·4	52·3	50·3	55·3	58·0	52·7	49·6	42·2	35·4	46·3
9	43·5	37·5	37·3	45·5	53·8	51·0	56·9	59·7	54·4	50·8	43·1	36·1	47·5
10	44·3	38·1	38·0	46·7	54·7	51·5	57·8	60·7	55·4	51·8	43·8	36·5	48·3
11	45·0	39·0	38·7	47·2	55·3	52·2	58·6	61·3	56·4	52·3	44·7	37·4	49·0
Noon	45·4	39·6	39·5	47·6	55·7	52·6	59·1	61·8	57·0	52·8	45·1	37·9	49·5
13h	45·7	39·5	39·9	48·1	55·8	53·0	59·7	62·2	57·1	53·0	45·1	38·1	49·8
14	45·6	39·4	40·0	48·5	55·8	53·5	60·0	62·2	57·3	53·0	45·0	37·9	49·9
15	45·4	39·0	40·2	48·3	55·8	53·3	60·1	62·1	57·1	52·8	44·5	37·4	49·7
16	45·1	38·6	40·0	47·6	55·6	53·4	60·0	61·8	56·5	52·2	43·8	37·1	49·3
17	44·6	38·0	39·3	46·9	55·0	52·7	59·6	61·2	55·8	51·4	43·1	36·8	48·7
18	44·2	37·5	38·6	45·9	54·2	52·0	59·0	60·6	54·6	50·9	42·6	36·6	48·1
19	44·0	37·2	38·0	45·0	52·7	51·3	58·4	59·7	53·7	50·4	42·4	36·3	47·4
20	43·7	37·1	37·3	44·2	51·4	50·5	57·6	58·7	52·8	50·0	41·9	36·2	46·8
21	43·5	36·9	37·0	43·4	50·2	49·7	56·6	58·2	52·2	49·7	41·7	35·9	46·3
22	43·3	36·8	36·6	42·7	49·1	49·0	55·8	57·4	51·5	49·4	41·4	35·6	45·7
23	43·0	36·7	36·3	41·8	48·3	48·5	55·1	56·7	50·8	49·1	41·0	35·4	45·2
24	42·7	36·4	36·4	41·3	47·6	48·8	54·3	56·2	50·3	48·8	40·7	35·2	44·8
Means 0h.–23h.	43·7	37·5	37·5	43·7	51·3	50·0	56·3	58·5	53·3	50·1	42·4	36·0	46·7
Means 1h.–24h.	43·7	37·5	37·5	43·7	51·3	50·0	56·3	58·5	53·3	50·1	42·3	36·0	46·7
Number of Days employed.	31	29	31	30	31	30	31	31	30	31	30	31	..

MONTHLY MEAN TEMPERATURE of the DEW POINT at every HOUR of the DAY, as deduced by GLAISHER'S TABLES from the corresponding AIR and EVAPORATION TEMPERATURES.

Hour, Greenwich Civil Time.	1916. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Yearly Means.
	°	°	°	°	°	°	°	°	°	°	°	°	°
Midnight	40·6	34·3	35·4	38·5	45·7	46·3	52·7	54·8	49·5	47·2	39·1	32·9	43·1
1h	40·5	34·2	35·3	37·7	45·2	45·5	52·2	54·5	49·2	46·8	39·4	32·9	42·8
2	40·4	34·2	34·7	37·1	44·8	45·2	51·7	54·0	49·0	46·3	39·0	33·1	42·5
3	39·7	34·3	34·6	36·4	44·5	44·7	51·3	53·9	48·9	45·7	38·6	32·9	42·1
4	39·7	34·4	34·6	35·7	44·4	44·2	50·8	53·6	48·9	45·4	38·5	33·1	41·9
5	39·9	34·7	34·2	35·5	44·9	44·5	50·4	53·1	48·9	45·5	38·8	33·4	42·0
6	39·9	35·0	34·1	35·9	46·2	45·2	51·1	53·4	49·0	46·1	39·3	33·2	42·4
7	40·1	34·7	34·9	37·3	47·6	46·5	51·6	53·9	50·0	46·8	39·9	33·8	43·1
8	41·0	35·4	35·0	39·6	47·0	47·1	52·5	54·8	50·9	47·7	40·7	34·0	43·8
9	41·6	35·6	35·3	41·5	49·4	46·8	53·2	55·5	52·2	48·5	41·6	34·7	44·7
10	42·1	35·6	35·7	41·7	49·5	46·9	53·4	56·0	52·6	48·9	41·6	35·0	44·9
11	42·1	36·0	35·5	41·5	49·8	47·1	53·6	55·9	53·0	48·6	42·2	35·7	45·1
Noon	42·2	35·7	35·8	41·3	50·1	47·1	53·8	55·9	53·0	48·9	42·1	35·8	45·1
13h	42·3	35·2	36·2	41·5	49·9	47·6	54·4	55·9	52·9	48·9	42·1	35·9	45·2
14	41·9	35·1	36·2	41·8	49·7	47·9	54·3	56·1	53·1	49·0	41·9	35·3	45·2
15	41·6	34·6	36·5	41·3	49·6	47·7	54·5	56·0	52·6	48·8	41·6	35·0	45·0
16	41·8	34·4	36·5	40·7	49·3	47·6	54·6	56·1	52·4	48·9	41·1	34·9	44·9
17	41·5	34·3	36·1	40·5	49·0	47·9	54·5	55·8	52·3	48·6	40·8	34·7	44·7
18	41·3	34·3	36·0	40·0	48·9	47·6	54·4	56·0	51·7	48·6	40·3	35·0	44·5
19	41·6	34·5	35·8	40·1	48·2	47·7	54·7	56·0	51·3	48·5	40·4	34·5	44·4
20	41·1	34·6	35·1	40·3	47·6	47·5	55·0	55·5	50·9	48·3	40·0	34·4	44·2
21	41·1	34·6	35·0	40·1	47·2	47·3	54·8	55·6	50·7	48·1	39·9	34·2	44·1
22	41·0	34·6	35·0	37·7	46·6	46·7	54·3	55·4	50·3	47·7	39·7	34·1	43·6
23	40·7	34·5	34·8	38·8	46·2	46·5	53·9	54·9	49·4	47·5	39·4	33·8	43·4
24	40·5	34·4	35·3	38·7	45·8	46·2	53·2	54·6	49·0	47·3	39·0	33·7	43·1
Means 0h.–23h.	41·0	34·8	35·3	39·3	47·6	46·7	53·2	55·1	50·9	47·7	40·3	34·3	43·9
Means 1h.–24h.	41·1	34·8	35·3	39·3	47·6	46·7	53·3	55·1	50·9	47·7	40·3	34·3	43·9

MONTHLY MEAN DEGREE of HUMIDITY (Saturation = 100) at every HOUR of the DAY, as deduced by GLAISHER'S TABLES from the corresponding AIR and EVAPORATION TEMPERATURES.

Hour, Greenwich Civil Time.	1916. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Yearly Means.
Midnight	86	87	93	83	89	88	91	88	92	90	89	90	89
1h	86	87	94	85	88	90	92	90	92	89	90	90	89
2	86	87	93	86	90	90	93	90	91	88	91	91	90
3	85	87	94	85	92	91	93	92	92	88	90	90	90
4	86	88	95	84	93	90	95	93	93	88	91	91	91
5	86	88	94	83	93	90	94	91	93	88	91	92	90
6	85	89	93	81	92	87	91	88	91	89	91	91	89
7	86	89	94	77	86	84	87	84	91	88	90	92	87
8	87	90	91	78	79	78	81	78	87	87	91	92	85
9	88	88	88	74	71	73	76	73	84	84	90	91	82
10	86	85	86	69	68	70	71	69	80	80	87	91	79
11	82	82	80	65	66	67	68	64	76	76	85	90	75
Noon	80	77	78	62	65	67	67	61	74	74	82	87	73
13h	79	74	77	61	64	65	66	60	73	72	82	87	72
14	76	74	77	61	62	65	63	61	72	73	81	84	71
15	77	74	77	59	62	65	64	61	71	74	80	85	71
16	79	76	79	59	61	68	65	63	74	78	84	87	73
17	81	78	81	62	62	69	67	65	77	80	85	87	74
18	82	80	83	65	66	71	70	70	80	84	86	90	77
19	84	83	86	70	72	76	75	75	84	87	86	89	81
20	84	85	86	76	75	80	83	79	87	88	87	89	83
21	85	86	87	80	80	84	87	83	89	89	88	89	86
22	85	87	90	80	83	85	90	86	93	89	89	90	87
23	85	87	91	81	86	87	92	87	91	89	89	91	88
24	86	87	93	83	88	88	92	88	91	90	89	91	89
Means 0h.–23h.	84	84	87	74	77	78	80	77	84	84	87	89	82
Means 1h.–24h.	84	84	87	74	77	78	80	77	84	84	87	89	82

TOTAL AMOUNT of SUNSHINE registered in each HOUR of the DAY in each MONTH, as derived from the RECORDS of the CAMPBELL-STOKES SELF-REGISTERING INSTRUMENT for the YEAR 1916.

Month, 1916.	Registered Duration of Sunshine in the Hour ending 5h.	6h.	7h.	8h.	9h.	10h.	11h.	Noon.	13h.	14h.	15h.	16h.	17h.	18h.	19h.	20h.	Total registered Duration of Sunshine in each Month.	Corresponding aggregate Period during which the Sun was above the Horizon.	Proportion of Sunshine.	Mean Altitude of the Sun at Noon.
	h	h	h	h	h	h	h	h	h	h	h	h	h	h	h	h	h	h		°
January	..	..	..	..	1·0	3·7	4·8	6·7	7·3	7·4	7·5	1·9	..	..	..	..	40·3	258·0	0·156	18
February....	..	..	..	0·2	1·6	7·7	10·1	10·7	11·2	9·2	7·5	3·1	0·2	..	..	..	61·5	286·8	0·214	26
March	..	..	1·4	4·0	3·8	5·3	7·4	9·0	6·4	5·4	5·1	4·6	4·0	0·4	..	..	56·8	366·7	0·155	37
April	..	2·0	8·5	13·1	15·2	17·5	16·1	15·0	15·8	17·8	18·5	15·7	13·8	6·6	1·9	..	177·5	414·3	0·428	48
May	2·6	8·8	12·8	15·7	14·5	14·8	13·2	12·7	12·5	14·1	14·8	15·6	14·8	13·8	10·0	0·9	191·6	482·1	0·397	57
June.....	3·1	7·4	8·4	9·1	9·3	9·3	11·3	10·9	11·3	13·3	13·5	10·7	10·9	9·3	8·6	2·0	148·4	494·5	0·300	62
July	1·6	5·4	9·4	10·2	10·6	11·2	15·4	14·7	14·4	15·2	12·9	14·2	12·3	9·6	7·1	1·3	165·5	497·3	0·333	60
August.....	..	2·9	7·1	12·8	13·7	13·1	14·5	15·1	16·5	13·9	13·5	13·6	15·0	10·5	4·9	..	167·1	449·7	0·372	52
September ..	..	..	1·0	4·6	7·6	10·3	11·7	13·0	11·1	9·7	11·3	8·7	7·6	2·0	..	..	98·6	378·1	0·261	41
October	..	..	..	2·0	6·6	11·8	13·9	13·4	12·9	12·2	11·0	10·4	2·3	..	..	..	96·5	329·6	0·293	30
November ..	..	..	..	0·6	4·8	7·8	9·4	10·7	11·7	10·3	9·3	4·7	0·3	..	..	..	69·6	265·3	0·262	20
December ...	..	..	..	..	0·6	0·5	1·4	2·4	3·2	4·9	2·2	0·3	..	..	..	..	15·5	243·8	0·064	16
For the year	7·3	26·5	48·6	72·3	89·3	113·0	129·2	134·3	134·3	133·4	127·1	103·5	81·2	52·2	32·5	4·2	1288·9	4466·2	0·270	..

The hours are reckoned from *apparent* midnight.

READINGS of THERMOMETERS on the ORDINARY STAND in the MAGNETIC PAVILION ENCLOSURE, in the YEAR 1916.

(The readings of maximum and minimum thermometers apply to the twenty-four hours ending 21h.)

JANUARY.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground. Maximum.	Minimum.	9h	Noon.	15h	21h	Wet-Bulb Thermometer, 4 ft. above the Ground. 9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	56·8	47·8	52·1	54·5	55·3	51·7	50·4	53·0	49·3	45·5
2	54·4	43·6	48·1	49·6	54·0	54·4	46·8	48·9	52·8	52·6
3	54·6	43·2	49·8	51·8	50·8	43·5	46·5	46·3	45·5	41·7
4	54·1	43·3	50·1	53·9	53·1	52·4	48·8	51·6	50·4	50·9
5	53·0	42·2	43·2	46·8	48·6	44·2	41·5	44·1	44·9	43·0
6	55·1	43·2	52·1	54·1	54·6	53·2	50·8	52·2	52·4	51·3
7	53·3	43·0	49·9	49·3	49·0	43·1	49·1	47·2	45·1	39·8
8	45·5	39·9	41·8	44·7	45·5	41·6	39·0	41·2	41·3	39·5
9	44·9	31·1	32·7	42·6	44·0	44·4	32·7	40·8	42·7	42·8
10	51·8	42·4	45·5	49·4	50·5	45·9	44·6	46·7	47·5	44·2
11	52·6	41·9	47·8	52·3	51·9	43·0	45·5	48·5	49·1	39·7
12	48·5	38·0	41·6	45·8	48·5	47·3	40·9	44·8	46·0	45·3
13	49·5	39·0	43·1	44·9	42·8	39·3	38·8	39·8	36·2	34·7
14	41·4	32·9	34·0	38·6	41·4	39·1	32·7	35·9	37·1	36·7
15	49·1	38·0	46·6	47·9	49·1	42·9	42·4	43·6	44·6	41·4
16	46·3	37·2	41·0	44·6	45·2	44·5	39·7	41·7	43·2	42·7
17	49·9	39·7	43·0	46·6	47·9	49·9	41·8	45·3	47·3	49·3
18	51·3	44·7	49·7	51·0	50·1	46·1	48·5	48·8	48·3	45·0
19	53·1	41·2	46·6	49·0	48·6	53·1	45·0	46·2	46·8	51·0
20	53·1	41·1	44·5	45·1	45·6	42·1	41·8	42·3	40·1	38·7
21	55·2	41·3	50·5	53·3	54·6	52·7	48·7	50·9	51·6	49·9
22	52·9	41·3	51·6	51·6	50·6	41·3	49·8	46·1	44·4	39·6
23	51·3	29·1	38·1	48·4	49·6	46·2	36·8	44·6	45·1	44·8
24	48·8	39·2	47·1	46·4	46·1	39·2	44·5	40·8	39·5	36·7
25	49·3	37·4	42·2	47·6	47·7	44·6	39·6	43·0	42·6	40·8
26	50·3	43·7	44·8	49·1	49·0	46·3	42·5	45·2	45·6	44·9
27	51·6	46·3	48·2	49·3	51·3	50·2	46·5	48·4	49·5	48·8
28	52·3	46·2	48·5	51·3	51·6	49·4	47·5	49·1	49·4	48·6
29	54·3	40·8	46·3	52·9	52·2	41·6	44·8	48·7	47·9	41·1
30	43·9	37·4	42·0	43·6	43·2	42·1	41·2	41·8	41·7	40·7
31	42·4	37·9	39·0	40·3	42·4	37·9	38·1	39·1	40·8	37·4
Means	50·7	40·5	45·2	48·3	48·9	45·6	43·5	45·4	45·4	43·3

FEBRUARY.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground. Maximum.	Minimum.	9h	Noon.	15h	21h	Wet-Bulb Thermometer, 4 ft. above the Ground. 9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	41·0	36·1	39·3	40·4	39·6	36·1	37·1	37·2	36·6	33·0
2	44·1	28·7	40·3	42·9	44·0	42·6	39·3	41·5	41·1	41·2
3	49·0	41·5	45·8	48·1	48·7	45·5	44·8	46·1	45·5	43·7
4	50·1	41·2	44·8	49·7	46·5	42·6	42·9	44·5	43·2	41·8
5	48·5	39·7	40·8	44·6	47·6	40·2	39·2	40·8	41·8	38·1
6	51·3	39·6	48·7	50·8	51·3	45·6	47·6	49·0	50·2	41·6
7	47·1	37·9	45·3	45·3	45·3	38·0	41·9	39·0	39·2	35·8
8	45·6	33·9	36·4	41·8	42·6	35·6	34·6	37·8	38·0	33·8
9	41·6	28·4	31·5	40·6	41·6	35·1	30·5	35·8	36·5	32·6
10	44·1	33·2	36·7	42·6	43·4	38·5	34·8	37·5	38·2	35·8
11	43·9	37·0	41·0	43·8	41·0	37·0	40·2	43·6	39·4	36·0
12	45·6	37·1	38·4	43·6	44·4	40·3	35·7	38·5	38·8	37·0
13	53·4	37·4	47·6	50·3	52·5	45·6	45·6	45·7	46·9	43·3
14	50·8	36·1	46·9	50·3	45·4	36·2	43·6	46·1	38·4	33·6
15	50·1	32·6	35·6	45·3	47·4	50·1	34·4	41·3	42·2	49·1
16	53·0	36·8	50·1	47·0	45·4	36·8	46·8	41·2	38·6	35·4
17	47·3	36·7	39·7	46·4	45·1	38·5	37·0	40·6	39·5	35·8
18	51·6	36·4	37·2	42·1	50·4	51·6	37·0	41·9	49·4	49·3
19	51·6	38·3	47·4	48·8	43·4	38·5	43·8	46·0	41·3	37·1
20	44·1	27·0	33·0	41·4	42·6	37·6	33·0	38·4	38·8	35·7
21	40·3	33·3	36·7	40·3	39·4	35·6	35·5	37·3	35·4	34·0
22	39·1	32·1	34·6	37·6	37·6	33·8	32·7	34·5	34·3	32·8
23	37·2	30·3	33·7	36·5	32·2	31·0	33·0	33·2	32·0	30·4
24	35·8	27·9	30·8	33·6	34·6	28·2	30·4	32·1	32·1	28·2
25	36·0	25·4	29·1	33·0	32·5	33·1	28·1	31·8	31·8	32·8
26	35·5	31·6	31·6	34·3	33·2	34·6	31·0	33·8	31·8	33·8
27	37·8	33·1	34·7	36·0	36·4	34·1	34·5	34·7	35·0	33·1
28	41·8	30·7	35·5	41·0	37·6	33·6	33·8	37·4	36·3	33·3
29	45·2	32·2	38·4	44·3	43·0	42·1	37·3	39·8	40·0	41·6
Means	44·9	34·2	39·0	42·8	42·6	38·6	37·5	39·6	39·0	36·9

MARCH.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground. Maximum.	Minimum.	9h	Noon.	15h	21h	Wet-Bulb Thermometer, 4 ft. above the Ground. 9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	46·3	34·1	38·9	43·7	44·0	34·6	38·1	41·3	40·6	33·8
2	37·7	30·8	32·4	33·6	36·9	37·6	31·8	32·6	35·9	36·5
3	37·7	34·5	35·1	37·3	36·9	35·6	34·6	36·2	35·8	32·2
4	41·2	32·0	34·2	38·1	41·0	33·6	32·4	34·9	36·8	32·6
5	41·1	28·6	32·3	37·8	40·0	34·6	31·2	34·2	35·9	33·0
6	39·0	31·6	33·1	36·8	36·6	32·8	32·2	33·3	33·8	31·7
7	35·8	30·2	32·3	35·0	35·8	34·6	32·0	34·2	33·8	33·8
8	39·7	30·8	32·4	38·2	37·7	30·8	32·2	36·5	35·5	29·8
9	41·2	24·3	35·1	39·8	40·1	35·4	31·8	35·2	35·2	34·3
10	35·7	33·6	35·2	35·0	35·5	34·4	33·3	33·4	34·3	32·7
11	37·5	33·0	35·6	36·8	37·5	37·4	35·0	35·8	36·0	36·5
12	50·4	36·3	40·4	48·4	48·4	38·6	39·8	45·7	45·5	37·2
13	41·6	37·3	38·6	39·6	41·4	39·8	37·8	39·0	40·5	39·6
14	48·7	38·7	43·0	46·3	44·6	39·1	42·6	45·2	43·8	38·8
15	47·5	37·1	40·1	41·7	45·4	45·6	40·0	41·4	44·8	44·5
16	53·9	43·1	44·6	50·2	53·2	46·6	44·0	47·8	49·6	46·2
17	50·0	41·6	43·4	46·7	49·5	44·1	41·8	44·5	46·5	43·4
18	53·4	41·1	43·8	47·6	53·0	45·8	43·3	46·1	50·5	45·1
19	57·0	40·1	47·6	51·6	54·7	47·8	46·2	48·8	50·6	47·3
20	55·0	43·7	49·6	54·2	49·7	46·6	48·8	51·1	48·3	46·0
21	46·9	38·0	41·2	41·3	40·8	38·0	40·8	40·5	39·8	37·3
22	39·6	35·0	37·6	38·8	39·0	35·1	36·8	37·5	37·0	33·5
23	37·3	31·9	32·8	36·4	35·4	33·6	31·6	32·7	32·4	33·0
24	42·1	31·6	34·6	39·3	41·7	34·1	32·1	34·4	36·5	33·3
25	50·0	31·0	41·3	46·6	46·4	44·3	37·8	40·4	42·5	41·2
26	48·6	34·1	40·6	44·7	45·7	36·6	35·0	37·7	37·8	34·9
27	49·3	32·7	42·1	47·0	45·1	32·9	37·8	39·5	39·2	32·8
28	46·0	31·4	39·6	42·0	37·8	31·4	38·4	40·0	37·3	31·3
29	44·3	28·9	32·2	40·2	43·3	34·1	31·6	35·4	36·6	31·7
30	53·7	31·6	44·7	51·0	51·6	43·7	42·9	45·6	45·9	41·8
31	53·7	38·3	47·0	50·5	52·5	43·5	44·1	44·6	46·4	40·0
Means	45·2	34·4	38·8	42·5	43·3	38·2	37·3	39·5	40·2	37·0

APRIL

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground. Maximum.	Minimum.	9h	Noon.	15h	21h	Wet-Bulb Thermometer, 4 ft. above the Ground. 9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	58·1	32·0	47·5	54·6	57·4	43·0	44·0	47·2	50·4	41·1
2	59·8	34·6	49·4	57·3	59·8	44·3	46·5	51·0	51·8	43·4
3	67·8	34·3	46·6	60·0	67·8	53·0	45·8	53·6	55·4	48·2
4	52·0	40·5	44·6	47·3	51·8	43·8	41·6	41·8	43·8	39·5
5	53·4	37·0	44·4	48·6	49·6	41·1	41·0	43·1	43·7	38·7
6	47·2	37·3	41·0	44·6	47·0	40·8	39·0	40·2	42·2	39·0
7	48·0	33·7	39·0	41·6	46·3	38·0	38·1	39·2	41·7	36·9
8	54·8	31·1	43·4	51·3	54·8	40·6	39·8	42·8	45·2	38·5
9	56·9	34·1	48·8	54·8	53·6	46·1	45·2	47·4	46·1	41·3
10	57·3	36·0	46·7	52·6	57·0	49·6	42·2	44·2	46·8	45·0
11	53·1	41·5	47·3	47·8	52·1	44·6	45·1	41·6	43·3	39·2
12	56·5	38·3	46·1	50·3	54·3	49·0	45·0	49·1	52·5	46·6
13	55·9	41·1	48·9	53·8	46·6	41·6	44·3	45·6	42·9	39·5
14	54·0	39·4	46·1	50·0	52·4	39·9	41·4	41·8	44·8	38·0
15	53·0	37·6	45·1	48·1	45·8	43·5	39·5	41·3	40·0	39·7
16	53·0	34·3	46·2	50·5	45·9	45·2	41·8	45·2	44·0	45·0
17	56·6	45·0	51·6	50·6	55·6	45·8	47·8	46·6	44·2	43·2
18	51·5	44·0	46·6	47 7	48·8	44·7	42·8	45·3	47·6	41·4
19	54·2	40·1	45·3	46·0	48·8	43·8	42·2	43·6	46·2	42·8
20	52·9	39·8	42·1	43·8	49·6	43·1	40·0	41·3	44·0	41·0
21	56·1	34·7	48·5	51·8	53·4	45·1	43·8	44·8	45·7	42·8
22	50·5	39·2	44·1	47·0	47·8	46·8	42·7	43·4	43·2	43·1
23	58·5	35·4	53·1	55·1	55·4	47·8	48·3	48·6	49·8	45·8
24	56·7	42·3	53·3	53·6	56·0	49·7	48·6	48·3	51·3	46·9
25	68·5	48·2	60·4	65·2	66·4	50·4	53·7	56·0	54·1	47·8
26	70·9	43·2	59·4	69·3	69·3	52·3	54·0	58·0	59·4	50·8
27	72·2	45·1	62·1	68·8	71·4	57·2	57·1	61·3	61·4	55·2
28	71·0	50·0	61·5	70·6	68·6	54·6	56·6	61·9	56·8	48·8
29	70·0	43·6	63·6	68·4	68·2	52·0	55·7	54·8	54·0	44·0
30	69·3	43·0	57·6	67·4	68·8	52·8	52·7	57·3	58·3	49·0
Means	58·0	39·2	49·3	53·9	55·7	46·3	45·5	47·5	48·4	43·4

READINGS of THERMOMETERS on the ORDINARY STAND in the MAGNETIC PAVILION ENCLOSURE—*continued.*

(The readings of the maximum and minimum thermometers apply to the twenty-four hours ending 21h.)

MAY.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	68·0	45·4	59·1	66·0	65·1	51·4	55·0	56·0	56·0	47·3
2	52·2	46·2	48·3	48·7	49·2	49·6	46·6	47·4	48·3	48·8
3	59·1	46·8	50·9	53·9	56·6	52·1	49·0	50·8	52·5	51·0
4	69·8	45·0	56·0	64·1	67·6	60·8	53·3	59·6	61·8	55·8
5	74·6	50·4	64·4	72·4	71·6	50·6	59·0	62·8	63·8	49·8
6	63·0	48·1	59·1	58·7	60·4	51·8	56·3	55·4	53·8	49·7
7	57·5	46·0	54·7	53·0	51·3	46·3	50·3	51·0	48·8	45·0
8	48·2	42·1	44·3	43·2	45·2	45·6	41·1	41·9	43·7	41·6
9	55·4	35·5	48·8	50·3	53·7	43·3	48·0	49·8	51·9	41·0
10	60·3	38·9	50·8	55·8	53·9	47·6	45·5	47·4	47·2	44·8
11	58·1	41·1	51·3	51·7	53·6	52·5	47·1	49·2	51·4	51·4
12	65·0	49·2	56·3	61·6	61·6	52·9	54·2	56·6	57·0	51·8
13	56·6	48·6	53·1	53·0	51·9	50·2	51·9	50·0	49·3	46·0
14	61·0	42·2	54·6	56·3	56·6	50·9	50·4	50·8	51·3	49·8
15	66·4	50·2	57·6	61·6	62·6	53·8	55·1	56·3	55·8	49·6
16	64·7	41·4	60·1	59·6	60·0	54·3	52·7	53·8	54·2	52·8
17	72·2	51·3	58·8	67·6	71·1	56·4	54·7	61·8	62·8	55·0
18	75·9	46·2	67·9	73·7	74·4	57·0	60·5	63·9	61·7	54·8
19	73·0	49·1	64·6	69·8	72·1	55·0	59·7	62·0	61·5	52·8
20	78·1	45·1	69·8	76·6	77·5	60·9	62·1	64·5	63·2	54·6
21	81·5	51·1	75·3	79·5	79·3	61·6	64·8	66·8	66·8	57·8
22	73·5	55·1	67·5	67·8	64·0	55·4	62·5	61·1	59·5	49·6
23	69·1	44·3	60·7	65·6	64·4	51·8	52·5	55·9	54·9	50·0
24	71·0	45·1	62·4	65·4	69·4	57·8	56·3	57·2	57·4	55·5
25	66·3	49·0	57·2	61·8	63·7	53·4	56·7	57·0	55·6	49·8
26	68·0	44·6	57·9	62·6	65·3	51·8	50·4	52·3	53·5	47·3
27	68·7	38·7	60·9	65·1	63·4	54·4	53·9	55·8	54·3	48·8
28	71·2	41·2	64·3	63·7	69·1	52·8	55·3	54·8	57·9	48·7
29	75·1	45·1	64·2	71·4	72·3	56·4	53·3	59·2	58·8	50·4
30	68·2	46·6	60·9	64·6	59·4	52·5	55·7	58·5	56·6	51·6
31	71·1	44·2	57·6	65·3	68·8	58·1	54·0	55·8	58·0	53·0
Means	66·5	45·6	58·7	62·3	63·1	53·2	53·8	55·7	55·8	51·9

JUNE.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	63·6	51·1	59·1	61·9	58·8	55·0	54·6	55·5	53·2	53·5
2	66·0	44·8	58·7	59·8	61·7	52·4	52·3	50·0	49·4	47·5
3	61·7	42·8	52·2	58·6	55·6	48·0	46·6	49·8	48·5	45·3
4	56·0	39·7	53·3	51·4	50·7	52·7	47·7	48·7	49·7	51·8
5	61·8	47·3	55·5	58·0	55·6	52·5	50·3	53·0	52·3	49·2
6	59·7	46·3	55·8	51·4	56·8	46·7	51·0	47·5	49·8	45·1
7	60·1	40·0	53·6	54·1	47·6	49·2	48·7	49·3	46·0	45·3
8	64·5	40·4	56·8	59·8	61·2	47·3	50·6	52·2	53·2	46·0
9	65·9	42·3	54·6	60·6	60·9	49·8	48·8	51·0	51·6	46·8
10	61·1	46·2	53·3	52·5	59·1	47·1	50·0	48·6	51·9	46·7
11	59·7	43·9	52·8	55·1	59·3	49·2	49·2	49·8	52·0	46·5
12	50·1	43·7	46·6	47·8	48·1	46·3	44·3	45·1	45·3	45·1
13	56·6	45·6	51·5	52·3	53·5	49·6	48·6	48·8	50·0	47·7
14	53·6	46·1	47·9	50·0	51·6	47·1	45·5	47·4	48·0	44·8
15	60·9	46·0	50·6	52·6	58·3	46·2	48·0	47·5	51·0	43·0
16	61·9	44·2	50·1	59·9	61·7	49·2	45·5	52·3	53·0	46·9
17	64·4	38·9	53·5	59·9	63·8	50·9	48·6	53·1	56·8	49·5
18	61·6	45·6	47·6	53·0	60·1	54·9	46·7	49·3	53·9	52·8
19	57·0	49·2	52·7	55·1	54·3	50·1	50·3	52·8	50·5	46·8
20	65·3	44·2	57·6	61·4	62·0	57·6	47·4	50·5	52·8	51·5
21	69·0	50·5	58·0	62·7	65·8	56·6	51·6	55·3	57·5	53·5
22	71·3	45·2	61·6	70·7	66·8	61·5	56·7	61·8	59·7	57·3
23	69·5	55·4	64·7	65·1	62·5	56·6	60·4	61·7	59·8	55·0
24	67·3	52·1	60·3	62·4	65·1	55·5	55·8	58·5	58·7	53·6
25	73·3	50·3	62·6	65·1	69·6	57·6	56·5	57·0	60·2	55·3
26	66·1	49·1	59·6	63·6	61·7	52·9	55·7	57·1	57·6	52·5
27	70·0	51·1	60·0	65·2	66·7	56·3	56·2	59·5	59·3	56·2
28	66·2	53·0	57·8	62·6	57·6	57·6	55·0	56·1	56·1	54·8
29	66·9	49·2	56·6	62·2	65·1	51·5	52·8	53·5	57·6	51·0
30	69·2	51·0	57·6	62·6	65·4	55·9	54·9	55·4	54·7	50·7
Means	63·3	46·5	55·4	58·6	59·6	52·1	51·0	52·6	53·3	49·7

JULY.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	68·0	46·4	63·1	65·8	63·1	54·9	56·3	58·8	57·4	52·8
2	72·1	46·5	62·1	65·5	67·7	57·0	56·3	57·9	59·6	54·4
3	67·0	51·2	60·7	61·7	61·3	54·8	56·9	57·2	59·0	53·2
4	70·6	46·1	62·9	64·6	66·6	59·8	57·1	59·1	61·8	56·9
5	75·0	50·7	59·1	70·2	70·4	56·9	56·8	62·0	61·9	56·5
6	66·1	52·5	60·3	60·7	61·4	56·7	55·1	55·4	56·5	54·9
7	70·1	55·8	58·5	61·5	62·3	60·0	58·0	60·1	61·0	57·9
8	70·0	54·9	61·3	62·7	66·0	59·3	57·2	56·0	57·2	53·0
9	71·5	47·2	62·3	65·0	65·6	57·1	55·9	56·0	58·3	53·0
10	69·5	50·8	55·6	66·9	62·6	56·9	53·4	58·8	57·5	52·9
11	68·8	53·1	57·4	63·1	62·7	57·8	52·8	54·4	55·2	53·7
12	67·4	54·2	64·0	61·5	59·4	58·6	56·3	56·8	57·1	57·8
13	63·9	56·1	60·0	59·1	62·0	59·4	57·8	58·8	60·2	59·4
14	66·1	52·1	55·8	62·4	59·8	56·5	53·4	56·0	56·1	54·2
15	63·7	47·3	58·6	58·8	61·2	54·8	53·1	51·5	54·0	52·9
16	64·7	51·1	57·1	60·8	64·1	60·7	56·0	58·8	61·1	60·3
17	64·1	57·2	59·9	61·5	63·1	59·8	58·6	59·8	60·6	58·6
18	69·6	52·0	56·7	65·0	69·6	52·4	52·9	55·7	58·4	51·9
19	73·8	50·6	64·6	64·7	71·4	58·0	56·8	58·4	59·4	56·0
20	74·2	49·9	63·4	72·3	72·0	61·0	58·6	62·1	63·8	58·3
21	77·2	51·9	66·6	74·1	73·1	65·1	60·0	64·0	64·1	63·2
22	69·5	54·6	57·7	62·5	67·3	54·9	57·3	56·7	59·3	53·7
23	59·0	49·1	51·3	55·3	58·6	57·8	50·1	52·5	55·0	55·8
24	59·7	50·3	53·3	56·6	59·2	51·8	51·6	54·4	55·4	51·0
25	68·7	51·5	59·4	65·2	66·5	55·9	56·0	59·3	59·9	55·1
26	72·2	47·5	60·8	69·6	71·1	59·8	57·6	62·4	63·6	59·1
27	76·7	54·0	62·3	72·8	75·1	61·0	59·8	65·6	66·4	60·6
28	78·0	55·6	65·3	72·7	77·0	62·8	62·0	66·0	66·8	60·7
29	79·3	56·3	67·8	75·4	77·9	61·6	61·4	64·2	64·0	61·5
30	82·4	51·1	71·4	78·1	81·0	66·1	63·6	66·0	67·1	61·9
31	83·9	55·7	73·6	77·0	80·0	67·7	65·3	67·3	65·7	62·2
Means	70·4	51·7	61·1	65·6	67·1	58·6	56·9	59·1	60·1	56·6

AUGUST.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	83·8	58·3	76·1	80·7	81·4	66·6	66·9	68·5	68·5	62·0
2	82·5	57·6	69·7	75·4	78·6	66·3	63·2	65·5	66·9	62·2
3	82·0	56·6	70·5	78·2	80·6	71·0	60·9	64·7	66·5	62·2
4	73·1	58·4	67·0	69·7	70·5	58·9	61·1	62·8	61·9	50·9
5	75·0	51·3	61·0	68·9	74·6	58·4	54·3	57·7	59·8	54·0
6	76·2	50·8	70·8	74·9	71·9	58·6	61·1	62·9	63·9	55·9
7	71·8	51·6	54·6	64·4	70·4	55·8	50·8	56·6	59·6	54·0
8	70·8	49·6	58·9	65·7	70·7	57·9	55·2	59·1	62·1	57·3
9	81·8	57·6	71·1	79·9	79·1	61·4	64·1	66·8	65·2	58·9
10	81·6	54·4	67·8	77·8	79·0	65·6	63·0	63·0	66·0	60·8
11	77·3	57·1	66·9	73·4	75·6	65·9	61·8	64·8	65·5	63·7
12	83·5	57·4	70·1	81·2	79·1	67·8	63·0	67·0	64·1	63·9
13	76·8	58·1	68·1	74·8	75·1	64·3	62·5	65·1	64·8	61·5
14	75·2	61·4	65·3	67·5	69·7	61·6	62·9	65·2	63·2	59·3
15	68·2	56·8	66·6	65·1	62·6	58·8	59·4	59·4	58·8	57·3
16	71·4	54·3	67·9	68·2	67·8	58·5	60·4	60·6	60·1	56·5
17	70·6	55·1	64·1	68·6	66·5	57·6	61·0	62·4	61·7	56·1
18	67·6	55·2	61·4	62·3	66·0	57·1	57·8	57·9	59·3	55·8
19	68·4	54·1	59·2	65·6	65·4	60·0	55·2	58·8	57·6	56·9
20	72·0	53·8	62·2	65·4	69·8	59·8	58·8	59·8	62·5	54·7
21	70·5	49·0	60·8	64·6	67·2	62·0	56·4	57·3	59·2	56·3
22	68·5	47·9	61·7	66·5	67·8	58·0	56·8	60·0	60·8	57·2
23	74·4	55·1	64·1	73·5	67·5	60·8	60·6	65·2	62·6	58·6
24	75·4	59·0	67·6	71·1	69·4	63·8	62·5	63·3	63·5	62·1
25	70·0	61·3	65·1	68·3	64·6	62·4	63·0	64·1	63·2	61·8
26	73·9	58·1	67·4	70·4	64·6	60·0	62·8	61·4	61·4	59·2
27	71·0	56·1	67·1	60·2	65·1	58·9	61·8	59·4	61·8	58·5
28	75·1	54·9	62·3	70·8	69·6	60·7	59·8	64·1	63·8	58·0
29	60·7	56·1	59·1	59·6	59·6	60·0	58·5	59·3	59·3	59·8
30	59·8	51·2	52·1	54·5	55·3	52·7	51·3	52·9	51·6	51·4
31	69·3	45·6	60·4	65·8	65·6	59·8	54·8	60·1	61·0	57·5
Means	73·5	55·0	64·7	69·5	70·0	61·0	59·7	61·8	62·1	58·2

READINGS of THERMOMETERS on the ORDINARY STAND in the MAGNETIC PAVILION ENCLOSURE—*concluded.*

(The readings of the maximum and minimum thermometers apply to the twenty-four hours ending 21h).

SEPTEMBER.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	71·1	55·5	60·8	68·3	70·3	55·6	59·9	62·3	61·7	54·1
2	64·5	52·4	56·7	60·8	63·2	55·7	56·4	59·8	61·8	55·7
3	70·8	53·3	62·6	63·5	69·2	57·5	60·8	61·9	64·0	54·5
4	63·9	51·7	58·4	61·5	61·1	52·4	53·9	56·0	54·9	51·3
5	63·2	50·8	54·6	59·2	61·1	57·6	51·2	54·8	55·9	54·8
6	69·5	53·4	59·6	65·8	66·5	55·5	57·0	59·8	60·4	55·3
7	69·8	51·3	59·6	67·8	67·6	57·1	57·9	62·9	61·8	56·8
8	67·6	54·9	61·6	63·8	65·3	55·7	58·3	59·6	60·8	54·7
9	68·0	54·1	61·4	64·7	67·7	59·7	59·7	61·0	62·5	57·9
10	60·9	56·0	58·3	60·0	59·8	58·1	55·9	56·8	56·8	56·8
11	66·8	52·9	56·2	63·6	64·4	57·7	54·8	59·8	59·0	55·0
12	63·3	55·1	59·6	58·1	61·5	62·7	66·9	57·7	60·7	59·8
13	71·0	53·3	64·7	68·0	67·3	53·8	62·0	63·6	61·8	49·6
14	56·1	42·1	49·3	54·1	53·9	42·2	44·2	47·3	47·4	41·0
15	62·1	37·4	51·8	59·9	58·6	55·9	48·0	53·0	53·3	54·6
16	64·5	47·9	56·2	63·3	61·3	48·7	53·9	57·9	55·1	48·3
17	66·4	43·1	55·4	63·6	63·4	55·3	51·8	58·2	57·3	54·5
18	61·2	48·1	53·6	57·8	57·8	49·4	50·8	50·0	49·8	46·6
19	55·8	45·6	48·1	53·5	50·6	49·8	46·6	49·3	48·1	48·2
20	53·8	47·3	51·6	52·3	52·7	49·6	48·7	48·3	47·6	46·6
21	59·0	42·7	52·4	57·3	57·6	42·7	47·8	50·8	50·7	42·4
22	60·5	36·1	55·8	57·6	58·8	48·1	52·4	52·2	53·0	46·1
23	65·8	41·3	54·6	63·2	65·7	47·2	51·5	55·6	57·1	46·8
24	65·5	39·2	54·2	62·8	61·6	51·5	51·8	55·2	55·8	51·2
25	67·4	43·2	54·8	66·4	66·8	56·2	54·8	61·8	60·5	55·9
26	70·5	51·6	61·5	65·9	68·9	57·4	59·5	62·1	63·0	57·1
27	68·0	50·2	61·0	65·5	63·0	51·1	59·7	60·9	60·6	51·1
28	68·2	49·5	57·0	61·6	67·0	59·7	57·0	59·8	62·8	59·1
29	59·8	53·6	57·6	59·6	59·2	53·7	56·8	57·9	57·2	51·7
30	61·2	50·1	56·1	58·5	58·8	51·9	52·1	54·0	52·8	49·1
Means	64·5	48·8	56·8	61·6	62·4	53·7	54·4	57·0	57·1	52·2

OCTOBER.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	60·9	46·8	50·5	58·5	59·5	48·8	47·6	51·6	53·7	48·7
2	56·9	45·6	51·4	53·6	55·3	53·3	50·5	53·1	54·8	53·0
3	66·9	52·1	56·9	64·3	64·1	57·6	56·7	62·4	61·3	57·0
4	67·4	56·0	61·0	65·8	65·8	60·1	60·1	62·3	61·3	58·0
5	68·7	58·0	62·1	65·7	65·7	59·6	58·6	59·6	58·8	58·8
6	63·8	59·1	62·1	62·7	62·6	62·5	60·3	60·8	60·7	61·0
7	64·1	53·3	58·4	62·8	59·4	55·1	53·7	54·8	53·3	52·4
8	66·4	52·7	58·6	63·6	64·3	57·7	56·9	59·7	59·4	54·7
9	67·5	55·1	61·3	62·9	65·1	55·5	57·4	57·5	60·0	55·0
10	67·0	54·2	59·4	64·7	63·6	59·7	57·9	60·5	59·7	57·3
11	65·2	57·2	61·6	62·9	63·6	61·4	58·2	58·3	59·7	58·6
12	66·7	57·6	60·9	63·1	64·5	59·6	57·3	59·5	60·0	57·1
13	66·9	58·3	60·8	63·0	66·2	61·4	60·5	61·8	63·7	60·1
14	65·5	58·4	61·1	62·3	61·7	60·1	57·9	58·6	57·8	56·3
15	60·3	45·1	52·2	53·3	51·6	45·6	47·8	46·7	45·9	43·2
16	54·0	40·1	43·6	51·3	51·8	44·5	41·3	45·7	46·2	42·8
17	54·1	32·8	43·8	52·4	49·6	52·4	43·0	48·7	48·9	52·1
18	56·2	49·1	50·8	54·6	54·8	50·3	49·2	51·8	51·8	48·4
19	55·2	49·1	51·9	52·9	53·2	49·9	48·1	47·8	47·5	47·3
20	50·1	34·5	46·6	47·4	45·6	34·5	42·8	42·6	40·3	33·5
21	48·1	28·6	36·8	45·9	45·9	34·4	36·3	42·0	41·6	33·7
22	48·6	29·5	42·3	45·9	45·7	45·7	39·2	41·1	41·7	43·9
23	59·9	42·9	53·3	57·1	56·1	49·5	50·2	51·3	51·9	49·2
24	55·9	44·5	51·1	55·3	53·3	46·6	50·5	53·0	51·4	46·4
25	57·3	42·6	50·1	54·6	56·5	42·9	49·5	52·0	52·0	42·6
26	54·8	37·1	44·1	52·4	53·0	38·3	42·9	46·7	47·1	37·8
27	55·1	36·3	49·3	49·8	54·5	47·5	47·9	49·0	50·3	45·5
28	55·9	45·1	51·8	52·4	51·7	45·1	47·3	47·6	47·6	43·3
29	54·9	38·7	48·6	50·5	54·6	48·6	47·3	50·0	51·3	47·8
30	60·5	46·1	52·6	59·3	56·9	52·2	51·9	53·6	51·5	49·3
31	56·7	46·1	49·6	55·4	54·1	49·1	46·5	48·5	46·9	46·5
Means	59·7	46·9	53·1	57·0	57·1	51·3	50·8	52·9	52·8	49·7

NOVEMBER.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	58·5	42·3	53·6	57·1	55·3	50·1	51·3	53·3	52·6	49·8
2	57·0	40·9	46·0	56·0	53·2	44·5	45·7	51·8	50·9	43·8
3	53·2	38·2	49·4	51·6	50·2	49·1	47·8	49·0	49·4	48·5
4	56·5	43·0	49·7	52·7	54·8	56·0	47·8	51·0	49·6	55·6
5	55·5	48·6	51·7	50·5	49·6	50·2	48·8	48·9	48·6	48·7
6	51·6	43·2	46·4	50·3	50·0	44·9	43·8	45·0	45·2	42·7
7	57·8	44·2	51·4	56·6	54·6	51·8	50·6	53·8	52·9	50·6
8	52·1	43·6	47·6	48·9	50·4	43·6	45·8	45·5	47·0	42·5
9	51·4	39·3	42·6	49·8	49·6	45·0	40·5	45·2	44·5	42·9
10	53·6	35·9	44·4	52·8	51·9	51·7	43·2	49·3	50·0	51·0
11	58·1	49·9	53·9	55·7	57·0	50·0	53·5	54·8	55·1	49·4
12	52·0	46·0	48·8	51·3	51·6	46·1	48·7	50·6	50·8	46·1
13	51·2	40·8	43·2	49·4	49·8	43·3	43·1	47·4	48·2	41·4
14	51·0	39·2	49·7	50·1	47·7	44·9	49·5	48·8	46·0	42·2
15	47·6	36·3	43·6	46·1	44·1	39·3	42·4	42·3	40·1	37·3
16	40·1	32·0	37·5	40·1	37·4	34·9	34·9	36·2	33·9	31·3
17	37·8	30·5	34·3	37·6	34·1	33·7	31·6	32·4	30·8	30·5
18	37·6	32·1	34·6	33·8	34·9	37·6	32·1	33·4	34·5	37·2
19	43·5	35·3	36·1	35·6	35·7	36·7	35·8	35·0	35·0	36·2
20	46·9	36·3	41·7	45·6	45·4	44·4	40·7	43·2	42·5	41·3
21	49·1	33·2	43·0	43·7	42·1	37·9	42·3	41·5	40·5	37·7
22	45·1	32·9	37·0	44·1	44·6	41·0	36·7	42·1	41·3	39·3
23	55·9	40·1	50·3	53·0	50·6	49·3	48·6	50·1	47·7	47·2
24	57·5	47·6	53·0	56·4	56·4	48·6	51·9	54·6	54·6	46·0
25	56·0	41·9	53·6	55·7	52·7	42·8	52·6	52·1	49·4	40·7
26	46·0	36·6	39·7	44·1	44·7	37·4	38·0	41·0	40·8	35·8
27	41·6	33·3	36·0	39·9	40·7	33·5	34·7	37·6	37·7	31·2
28	42·6	25·2	32·2	41·7	42·0	39·7	31·2	37·0	37·8	36·7
29	44·9	38·6	43·6	44·1	43·2	40·1	42·2	42·0	41·3	38·4
30	40·2	28·8	38·2	38·8	37·7	28·8	37·0	37·6	35·9	28·7
Means	49·7	38·5	44·4	47·8	47·1	43·2	43·1	45·1	44·5	41·7

DECEMBER.

Days of the Month.	Dry-Bulb Thermometers, 4 ft. above the Ground.						Wet-Bulb Thermometer, 4 ft. above the Ground.			
	Maximum.	Minimum.	9h	Noon.	15h	21h	9h	Noon.	15h	21h
d	°	°	°	°	°	°	°	°	°	°
1	38·6	28·1	30·4	32·1	36·1	38·6	30·4	31·6	35·3	37·8
2	40·0	36·8	39·1	39·3	38·7	37·0	37·6	37·3	36·7	35·2
3	37·0	33·3	34·6	33·8	36·6	34·2	32·9	32·2	34·7	33·2
4	38·2	29·9	33·2	37·4	38·2	35·8	31·8	33·8	34·3	33·1
5	39·3	32·6	35·7	38·0	38·4	38·1	33·3	35·9	36·9	35·6
6	41·0	34·0	36·6	40·6	40·4	39·6	34·4	37·8	37·9	37·8
7	39·6	37·1	38·0	39·7	38·6	38·1	35·8	36·4	36·6	36·3
8	44·0	31·1	42·1	43·9	41·8	32·1	41·5	41·6	39·8	31·9
9	47·8	28·1	45·4	46·2	45·4	33·0	44·6	44·8	41·7	32·4
10	42·9	32·0	36·8	42·0	40·0	38·0	36·4	40·3	38·2	37·2
11	41·4	34·7	37·4	40·9	39·6	38·6	36·8	39·3	38·6	36·8
12	39·1	34·9	36·4	38·8	38·9	39·1	36·0	37·9	37·6	38·0
13	39·0	28·9	36·6	37·0	33·7	29·1	35·2	35·7	32·8	29·0
14	34·5	26·9	32·6	32·6	32·4	34·5	32·0	32·5	31·8	33·9
15	37·1	33·0	33·8	34·6	35·5	37·1	33·1	33·8	34·7	35·9
16	36·9	29·4	30·1	32·6	32·1	30·0	29·9	32·3	31·8	30·0
17	35·6	27·2	32·1	35·6	33·6	33·1	31·5	35·3	33·6	32·8
18	33·4	28·6	29·6	31·8	33·0	32·0	29·5	31·6	32·0	32·0
19	36·9	23·4	33·5	34·9	36·1	31·5	31·7	34·1	34·0	30·6
20	42·1	29·8	35·3	41·1	38·7	40·6	32·3	37·9	35·8	39·3
21	48·9	36·0	41·7	46·1	38·5	36·0	40·9	44·8	37·6	35·5
22	44·4	32·8	37·4	42·6	42·8	32·8	36·8	40·8	40·0	32·6
23	50·5	32·3	47·4	38·5	37·8	36·1	47·3	37·7	36·5	33·0
24	45·8	35·1	39·2	44·7	44·5	35·2	37·8	41·7	40·6	34·0
25	41·1	32·2	33·9	36·0	40·8	37·6	33·6	35·2	39·0	36·0
26	40·0	31·2	31·6	36·3	37·7	34·1	31·4	35·1	36·1	33·1
27	34·6	26·1	28·9	31·3	28·5	29·4	28·9	31·1	28·5	29·2
28	46·6	26·3	31·0	38·6	41·2	46·6	30·8	37·8	39·8	45·7
29	54·9	46·1	52·3	54·4	54·4	53·4	51·1	52·2	52·3	52·1
30	53·2	44·9	47·6	50·9	49·8	45·0	45·8	47·3	46·0	43·0
31	52·7	44·0	50·6	51·8	52·3	52·4	48·7	49·7	49·5	50·9
Means	42·2	32·5	37·1	39·5	39·2	37·1	36·1	37·9	37·4	35·9

AMOUNT of RAIN COLLECTED in each MONTH of the YEAR 1916.

Gauges partly sunk in the ground in the Magnetic Pavilion Enclosure.	Number of Gauge.	Monthly Amount of Rain collected in each Gauge. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Sums.	Height of Receiving Surface. Above the Ground.	Above Mean Sea Level.
		in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	in.	ft. in.	ft. in.
	6	1·224	3·898	4·130	1·246	2·088	1·877	1·399	3·436	1·064	2·655	4·254	2·503	29·774	0. 5	149. 6
	8	1·210	3·908	4·150	1·238	2·066	1·856	1·369	3·423	1·056	2·642	4·187	2·455	29·560	1. 0	150. 1
Number of Rainy Days (0in.005 or over).	6	18	19	23	12	12	17	11	13	13	19	15	16	188	..	..

MEAN HOURLY MEASURES of the HORIZONTAL MOVEMENT of the AIR in each MONTH, and GREATEST HOURLY MEASURES, as derived from the RECORDS of ROBINSON'S ANEMOMETER.

Hour ending.	1916. January.	February.	March.	April.	May.	June.	July.	August.	September.	October.	November.	December.	Mean for the Year.
h	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.	Miles.
1	15·6	15·0	11·2	10·8	7·4	9·9	7·3	8·7	8·9	14·3	11·7	8·8	10·8
2	14·8	16·2	11·5	10·7	7·0	10·0	7·2	8·6	8·7	14·0	12·3	9·5	10·9
3	15·7	16·2	11·5	10·9	7·5	9·4	6·9	8·6	8·7	13·3	12·4	9·7	10·9
4	15·8	16·6	11·1	11·3	7·0	9·9	7·2	8·2	9·2	13·5	11·7	10·0	11·0
5	16·6	16·6	11·5	11·0	7·3	9·5	6·9	8·3	8·9	13·8	11·9	9·7	11·0
6	16·8	17·1	12·2	11·3	7·1	9·5	6·9	8·6	9·3	14·0	12·0	9·8	11·2
7	15·9	16·7	12·2	11·7	6·6	10·2	7·5	9·0	9·2	14·1	13·0	10·3	11·4
8	16·1	16·0	12·4	12·8	7·6	10·6	7·7	8·9	9·3	14·9	13·9	9·6	11·7
9	15·9	15·3	12·5	13·6	8·8	11·0	8·5	9·6	10·1	15·6	14·3	9·5	12·1
10	16·2	14·8	13·0	14·1	9·6	12·3	8·6	10·1	9·6	16·5	15·4	10·2	12·5
11	17·7	16·9	13·5	15·6	10·4	13·2	7·0	10·6	10·4	17·9	15·4	10·8	13·3
Noon.	19·5	18·0	13·5	16·9	11·5	14·1	9·3	10·5	11·3	17·3	15·6	11·4	14·1
13	17·2	16·0	11·6	15·0	10·4	13·4	9·3	11·4	11·6	17·9	16·7	12·5	13·6
14	18·6	18·1	12·6	15·3	11·5	14·0	9·5	11·4	11·5	17·9	16·2	12·9	14·1
15	19·9	18·7	13·2	15·8	12·1	14·3	9·8	11·6	12·6	17·6	15·8	12·8	14·5
16	18·3	18·0	13·3	15·6	12·0	14·4	10·0	11·0	12·4	17·2	14·2	12·5	14·1
17	17·5	17·3	12·7	16·0	11·6	13·6	9·9	11·1	12·3	16·4	13·1	12·0	13·6
18	16·9	15·9	12·3	15·3	11·5	13·2	10·5	10·8	11·9	15·8	13·2	11·7	13·2
19	16·7	16·1	12·8	13·5	11·0	12·5	8·6	9·5	10·4	14·5	12·8	11·5	12·5
20	16·8	15·7	12·9	11·9	10·5	11·8	8·4	9·6	10·4	15·9	12·3	12·3	12·4
21	17·0	15·8	12·7	11·2	9·7	10·8	8·3	10·1	10·4	15·1	12·1	11·0	12·0
22	16·6	16·5	11·9	10·7	9·1	10·2	7·6	9·5	10·0	14·4	11·4	10·6	11·5
23	16·0	15·4	11·5	10·5	8·4	9·6	6·7	9·6	9·4	15·0	11·4	10·2	11·1
Midnight.	15·9	15·1	11·2	11·0	7·9	10·1	6·8	8·6	9·3	14·1	10·7	9·4	10·8
Means	16·8	16·4	12·3	13·0	9·3	11·6	8·2	9·7	10·2	15·5	13·3	10·8	12·3
Greatest Hourly Measures (1)	50	49	45	40	25	33	24	33	28	39	45	44	..
Greatest Hourly Measures (2)	37	37	34	31	21	26	20	26	23	30	34	33	..

(1.) Deduced from the motion of the cups by the formula $V = 3v$;
(2.) " " " " " " " $V = 2v + 4$;

where v is the hourly motion of the cups in miles. See Introduction.