

ANNUAL REPORT

OF THE

METEOROLOGICAL

AND THE

SEISMOLOGICAL OBSERVATIONS

MADE AT THE

INTERNATIONAL LATITUDE OBSERVATORY

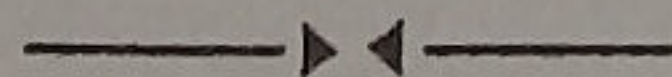
OF MIZUSAWA

FOR

THE YEAR 1954.



LATITUDE $39^{\circ} 8' N.$, LONGITUDE $141^{\circ} 8' E.$,
HEIGHT ABOVE MEAN SEA LEVEL 61 METERS.



PUBLISHED BY THE INTERNATIONAL LATITUDE OBSERVATORY
OF MIZUSAWA.

—
1955

551.226
167/71

ERRATA (1954)

Page	Date	Column	Error	Correction
	Back page of	Weather symbols	Soft hail	Soft hail
	Introduction	"	Small hail	Small hail
	"	"	Lunnar Corona	Lunar Corona
	"	"	Strato-Comulus	Strato-cumulus
1			METEOROLOGICAL	METEOROLOGICAL
7	26 6 ^h	AMOUNT OF CLOUD	0	3
7	6 22 ^h (U)	FORMS OF CLOUD	sc	cs
7	8 A. M.	REMARKS	H, *,	H, *, ☒
10	5 10 ^h	DIRECTION AND VELOCITY (m.p.s.) OF THE WIND	0.8	7.8
21	10 A. M.	REMARKS	H, U, 0, 0	H, U, 0, Δ
22		AIR TEMPERATURE	AIR TEMPERATURE °D	AIR TEMPERATURE °C
23	11 A. M.	REMARKS	Δ, ◊, ●, T, ✕, ▼, ∇	Δ, ◊, ●, T, ✕, Δ, ∇
25			METEOROLOGICAL	METEOROLOGICAL
25	27 P. M.	REMARKS	*, 0, ∇, H	*, 0, ∇, H, ☒
27		Annual (Mean for 24 ^h)	30	3.0
27		VELOCITY (m.p.s.) OF WIND	No. of Days with Gale	No. of Days with Gale
28		DIRECTION AND INTENSITY (m.p.s.)...	WITE	WITH
30		TOTAL SOLAR AND SKY.....	SURFCE	SURFACE
31			METEOROLOGICAL	METEOROLOGICAL
31	November	NUMBER OF DAYS WITH Δ	—	1
31	Annual	" "	5	6
31	January	" " WITH Max. Temp <0°		8
31		GENERAL REMARKS	Sept. 2	Sept. 2
		Continuance of more than 5 Days.....		
32	June	Precipitation (Total) mm	39.8	39.3
"	"	" "	62.3	62.6
33		SEISMOLOGICAL OBSERVATIONS	Untelt	Unfelt
		Remarks		
33		Symbols and Notations	Sudden deginning	Sudden beginning
33		"	The sige	The sign
34		No.	40	50
34	No. 1	Epicenter and Remarks	41.8°N, 142.4° [60]	41.8°N, 142.4°E [60]
35	No. 96 Mar.		2	3
35	No. 58	Epicenter and Remarks	30°, 143°E [S]	30°N, 143E [S]
36	No. 111	" "	40.7°N, 143.4° [20]	40.7°N, 143.4°E [20]
37	No. 188	" "	29N, 139 [450—500]	29N, 139E [450—500]
38	No. 225	Maximum Range of Motion	-4	-2
39	No. 297	S(EW)	00 55	e 00 55
39	No. 304	Epicenter and Remarks	33.7N, 141.3 [50]	33.7N, 141.3E [50]
39	No. 314	S(NS)	110 36	? 110 36

Introduction

This annual report gives the results of the meteorological and seismological observations made at the International Latitude Station of Mizusawa during 1954 which may serve to investigate the meteorological effect on the latitude observations. The majority of the meteorological instruments are situated in the observation field about 10 meters north of the zenith telescope room. In this field there are the motor-driven aspiration psychrometer, maximum and minimum thermometers, thermograph, hygrograph, pluviograph, Hellman's chionograph, rain gauges, evapometer, L-tube earth thermometers, Simon's earth thermometers, snow measuring plates and Robitzsch actinograph. The Fortin's mercurial barometer, three barographs, and anemograph are set in the seismograph room where is placed about 100 meters NNE of the zenith telescope room: The Robinson's anemometer, recording wind vane and Jordan's sunshine recorder are fixed on the roof of the observing tower above the seismograph room. Observations are made generally six times a day, that is, at 2^h, 6^h, 10^h, 14^h, 18^h and 22^h of J.S.T. (9^h east from Greenwich). This distribution of time of observation seems to be convenient for the purpose of discussing the meteorological effect on the latitude variation, since the latitude observations are made on the average between 22^h and 2^h. The followings are to be noted as regards the meteorological observations.

Air Pressure.—The barometric readings in the unit of millibars are corrected for the freezing point of water and standard gravity (980.616 dynes). The observed gravity at Mizusawa is 980.16 dynes. These corrected values are defined as the station pressure. Moreover those reduced to mean sea level (M.S.L. Pressure) are given in the next columns.

Air Temperature.—The dry-bulb thermometer of the motor-driven aspiration psychrometer is adopted as standard. The variability of daily mean air temperature is defined as follows.

$$V = \frac{\sum_{i=1}^n |t_i - t_{i-1}|}{n}$$

where $| |$ denotes the absolute value, t_i the daily mean air temperature of i -th day and n the number of the days in a month.

Wind.—The wind velocity in this report means the ten minutes' mean velocity before the time of observation and then that multiplied by the constant C determined by the following formula. $\log C = 0.341 - 0.2151 \log (V + 10)$, where V represents the wind velocity. This formula was derived experimentally from the wind-tunnel at the Central Meteorological Observatory of Japan.

Relative Humidity and Vapour Pressure.—The motor-driven aspiration psychrometer is used. Sprung's psychrometric formula is applied to derive the vapor pressure (in mb).

Cloud.—The cloud forms are observed separately according to the high (H), middle (M) and low (L) clouds. They are denoted according to the International Classification. (Ten genera of cloud forms)

Duration of Sunshine.—It is recorded with Jordan's sunshine recorder and given in the unit of hour.

Total Solar and Sky Radiation on the Horizontal Surface.—It is measured by the Robitzsch actinograph and the instrumental constant K corresponding to 1 cm of displacement of the pen is 0.550 gr. cal/cm². min.

Amount of Evaporation.—It is observed with the evapometer with 20 cm diameter at 10^h once a day. The bracket represents the day with precipitation.

Earth Temperature.—The earth-surface thermometer, L-type thermometers of 0.05, 0.1, 0.2

OCT 10 1957 1561 130

X-13422

and 0.3 meters depth and Simon's earth thermometers of 0.5, 1.0, 2.0, 3.0, 5.0 and 6.0 meters depth are employed.

Clear and Cloudy Days.—The cloud amount is less than 2 exclusive for the former and more than 8 inclusive for the latter.

Sunless Days.—It means the days not recorded on Jordan's sunshine recorder throughout whole day.

Horizontal Visibility.—Maximum visible distances are divided into the International Classification (0-9). The frequencies of each class in a month observed six times every day are given as for the four cardinal points.

The heights of the meteorological instruments are as follows :

Barometer.—63.7 m above mean sea level.

Air Temperature Thermometer.—1.3 m above the ground.

Anemometer.—16.5 m above the ground.

Anemoscope.—16.6 m above the ground.

Rain Gauge.—0.6 m above the ground.

On recording the meteorological phenomena, the following weather symbols are used :

●	Rain	□	Hoar frost	☾	Zodiacal light
*	Snow	⌒	Ice columns	☄	Red sky
☉	Drizzle	⌒	Air hoar	○	Clear
▲	Grain of ice	^	Soft rime	⊙	Fine (partly cloudy)
△	Granular snow	▲	Hard rime	⊕	High cloud overcast
↔	Ice needles	⊙	Glaze	⊗	Middle cloud overcast
≡	Fog	☒	Snow coverage	⊙	Low cloud overcast
≡	Fog in the neighbourhood	⚡	Thunder and lightning	⊙	Earthquake
≡	Ice fog	⚡	Lightning	w	Undulatus
=	Mist, damp haze	⊥	Thunder	⊍	Mammatus
∞	Haze	○	Pure air	⊖	Lenticularis
≡	Haze in the neighbourhood	⊙	Solar corona	Ci	Cirrus
▽	Showers	☾	Lunlar corona	Cs	Cirro-stratus
⊗	Soft hall	≡	Iridescence	Cc	Cirro-cumulus
△	Small hall	⊕	Solar halo	Ac	Alto-cumulus
▲	Hail	☾	Lunar halo	As	Alto-stratus
☄	Dust storm	☾	Rainbow	Sc	Strato-comulus
☄	Blowing snow	☒	Yellow sand	Ns	Nimbo-stratus
☄	Drifting snow	⊥	Freezing	Cu	Cumulus
☄	Snow storm	ε	Dust devil	Cb	Cumulo-nimbus
▲	Dew	⌒	Land-spout	St	Stratus
☄	Gale	☾	Aurora		

The seismological instruments in use are two Omori's horizontal seismographs.

Constants of two seismographs are given as follows :

	NS-Component	EW-Component
Proper Period	16 sec.	36 sec.
Dynamical magnification	100	20
Mass of Weight	45.0 kg	17.6 kg
Horizontal distance of the center of the cylinder from the pivot	20 cm	75 cm
Vertical distance between the points of support and suspension	104 cm	104 cm

The pulsatory oscillations are observed only with EW-Component seismograph. The observations and computations are worked out by Messers, S. Sato, I. Kumagai, K. Suzuki and Miss. M. Segawa under the superintendence of Mr. C. Sugawa.

Oct. 1955.

Dr. T. Ikeda.

Director of the International Latitude Observatory
of Mizusawa.



METEOROLOGICAL OBSERVATIONS

DATE		TIME		TEMPERATURE		WIND		HUMIDITY		PRESSURE		VISIBILITY		WEATHER	
DAY	MONTH	HR	MIN	MAX	MIN	DIR	SPEED	REL	ABS	SEA	CEILING	STATE	CLD	AMOUNT	WIND
1	1	00	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	01	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	02	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	03	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	04	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	05	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	06	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	07	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	08	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	09	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	10	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	11	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	12	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	13	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	14	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	15	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	16	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	17	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	18	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	19	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	20	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	21	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	22	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	23	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	24	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	25	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	26	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	27	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	28	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	29	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	30	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B
1	1	31	00	10	5	000	0.0	70	1012.0	0	0	000	0	0	B

JANUARY, 1954.



Table with columns for Day, Vapour Pressure (mb), Amount of Cloud (0-10), and Forms of Cloud (2, 6, 10, 14, 18, 22). Rows 1-31 show daily data, and a summary row at the bottom shows monthly averages.

Table with columns for Day, Duration of Sunshine (in hours), Total Solar and Sky Radiation (Cal/cm²), Amount of Evaporation mm, Relative Humidity %, Precipitation mm, and Remarks. Rows 1-31 show daily data, and a summary row at the bottom shows monthly averages.

FEBRUARY, 1954.



Table with columns: Day, VAPOUR PRESSURE (mb), AMOUNT OF CLOUD (0-10), FORMS OF CLOUD (2, 6, 10, 14, 18, 22), and sub-columns for cloud types (U, M, L).

Table with columns: Day, Duration of Sunshine (in hours), Total Solar and Sky Radiation (Cal/cm²), Amount of Evaporation mm, RELATIVE HUMIDITY %, PRECIPITATION mm, and REMARKS.

MAY, 1954.



Main table with columns: Day, VAPOUR PRESSURE (mb), AMOUNT OF CLOUD (0-10), and FORMS OF CLOUD (2, 6, 10, 14, 18, 22). Rows 1-31 with sub-rows for hours.

Table with columns: Day, Duration of Sunshine (in hours), Total Solar and Sky Radiation (Cal/cm²), Amount of Evaporation mm, RELATIVE HUMIDITY %, PRECIPITATION mm, and REMARKS. Rows 1-31 with sub-rows for hours.

JUNE, 1954.



Table with columns: Day, VAPOUR PRESSURE (mb), AMOUNT OF CLOUD (0-10), FORMS OF CLOUD (2, 6, 10, 14, 18, 22). Rows 1-30 with daily data and a summary row at the bottom.

Table with columns: Day, Duration of Sunshine (in hours), Total Solar and Sky Radiation (Cal/cm²), Amount of Evaporation mm, RELATIVE HUMIDITY %, PRECIPITATION mm, REMARKS. Rows 1-30 with daily data and a summary row at the bottom.

JULY, 1954.



Table with columns: Day, VAPOUR PRESSURE (mb), AMOUNT OF CLOUD (0-10), FORMS OF CLOUD (2, 6, 10, 14, 18, 22). Rows 1-31.

Table with columns: Day, Duration of Sunshine, Total Solar and Sky Radiation, Amount of Evaporation, RELATIVE HUMIDITY, PRECIPITATION, REMARKS. Rows 1-31.

AUGUST, 1954.



Table with columns: Day, VAPOUR PRESSURE (mb), AMOUNT OF CLOUD (0-10), FORMS OF CLOUD (2, 6, 10, 14, 18, 22). Rows 1-31.

Table with columns: Day, Duration of Sunshine, Total Solar and Sky Radiation, Amount of Evaporation, RELATIVE HUMIDITY %, PRECIPITATION mm, REMARKS. Rows 1-31.

SEPTEMBER, 1954.



Table with columns: Day, VAPOUR PRESSURE (mb) [2, 6, 10, 14, 18, 22, Mean], AMOUNT OF CLOUD (0-10) [2, 6, 10, 14, 18, 22, Mean], FORMS OF CLOUD [2, 6, 10, 14, 18, 22] with sub-columns H, M, L for each cloud amount.

Table with columns: Day, Duration of Sunshine (in hours), Total Solar and Sky Radiation (Cal/cm²), Amount of Evaporation mm [Open Air, in the Shelter], RELATIVE HUMIDITY % [2, 6, 10, 14, 18, 22, Mean], PRECIPITATION mm [22-2, 2-6, 6-10, 10-14, 14-18, 18-22, Total], REMARKS [A. M., P. M.]

OCTOBER, 1954.



Table with columns: Day, STATION PRESSURE (1000mb +), S.L. PRESSURE (1000mb +), AIR TEMPERATURE °C. Rows include daily data from Day 1 to 31 and a summary row for Mean.

Table with columns: Day, AIR TEMPERATURE °C (Max, Min, Mean, Range), DIRECTION AND VELOCITY (m.p.s.) OF THE WIND (2, 6, 10, 14, 18, 22, Mean 6 obs, 24 h). Rows include daily data from Day 1 to 31 and a summary row for Mean.

OCTOBER, 1954.



Table with 15 columns: Day, Vapour Pressure (mb) with sub-columns for 2, 6, 10, 14, 18, 22, Mean; Amount of Cloud (0-10) with sub-columns for 2, 6, 10, 14, 18, 22, Mean; and Forms of Cloud with sub-columns for 2, 6, 10, 14, 18, 22, each containing H, M, L.

Summary row for the cloud observation table, showing average values for Vapour Pressure, Amount of Cloud, and Forms of Cloud across the 31 days.

Table with 13 columns: Day, Duration of Sunshine (in hours), Total Solar and Sky Radiation (Cal/cm²), Amount of Evaporation mm (Open Air, in the Shelter), RELATIVE HUMIDITY %, PRECIPITATION mm (22-2, 2-6, 6-10, 10-14, 14-18, 18-22, Total), and REMARKS (A. M., P. M.).

Summary row for the lower table, showing average values for Duration of Sunshine, Total Solar and Sky Radiation, Amount of Evaporation, Relative Humidity, and Precipitation.

DECEMBER, 1954.



Table with columns: Day, VAPOUR PRESSURE (mb), AMOUNT OF CLOUD (0-10), FORMS OF CLOUD (2, 6, 10, 14, 18, 22). Rows 1-31.

Summary row for Vapour Pressure and Amount of Cloud: 5.5 5.3 5.6 5.8 5.7 5.5 5.5 7.2 6.7 7.5 8.0 7.0 6.2 7.1

Table with columns: Day, Duration of Sunshine, Total Solar and Sky Radiation, Amount of Evaporation, RELATIVE HUMIDITY, PRECIPITATION, REMARKS. Rows 1-31.



1954.

Month	AIR PRESSURE (STATION) 1000 mb+						AIR PRESSURE (Mean Sea Level) 1000 mb+															
	2	6	10	14	18	22	Mean	Max.	Date	Min.	Date	2	6	10	14	18	22	Mean	Max.	Date	Min.	Date
January	9.4	9.6	10.4	8.3	9.1	9.1	9.3	20.7	15	992.6	10	17.5	17.7	18.4	16.2	17.2	17.2	17.4	29.0	15	0.3	10
February	9.4	9.5	10.0	8.3	9.5	10.1	9.5	21.6	25	988.0	12	17.4	17.6	17.9	16.3	17.4	18.1	17.5	29.5	25	995.7	12
March	10.8	11.7	11.9	10.0	10.8	11.4	11.1	24.2	10	996.0	29	18.8	19.7	19.8	17.9	18.8	19.4	19.1	32.4	10	3.9	29
April	8.0	8.4	8.2	6.5	7.0	8.4	7.7	20.2	5	988.3	18	15.8	16.2	15.8	14.1	14.6	16.1	15.4	28.2	5	995.6	18
May	4.7	5.6	5.2	3.7	4.1	4.9	4.7	16.7	27	975.2	9	12.4	13.3	12.7	11.2	11.6	12.6	12.3	24.6	27	982.4	9
June	5.1	5.5	5.3	4.2	4.5	5.6	5.0	14.1	23	992.3	20	12.7	13.1	12.8	11.7	12.0	13.1	12.6	21.9	23	999.7	20
July	3.3	3.9	3.9	3.0	3.3	4.5	3.7	12.3	19	993.0	1	10.7	11.4	11.3	10.4	10.7	12.0	11.1	19.9	19	0.0	1
August	4.0	4.6	4.6	3.2	3.5	4.5	4.1	16.0	25	987.2	19	11.4	12.1	11.9	10.4	10.7	11.8	11.4	23.4	25	994.3	19
September	5.7	6.2	6.3	4.5	5.2	6.3	5.7	17.1	30	981.0	26	13.1	13.6	13.6	11.8	12.6	13.8	13.1	24.7	30	989.1	26
October	11.3	11.9	11.9	10.1	10.9	11.5	11.3	21.6	26	992.4	30	19.1	19.6	19.6	17.6	18.5	19.2	19.0	29.5	26	0.0	30
November	12.0	12.3	13.2	11.6	12.8	13.1	12.5	27.3	27	989.1	11	19.9	20.3	21.0	19.3	20.6	20.9	20.3	35.4	27	996.8	11
December	11.6	12.0	12.6	10.8	11.9	11.8	11.8	28.4	7	995.6	20	19.6	19.9	20.5	18.7	19.8	19.8	19.7	36.6	7	3.2	20
Annual	7.9	8.4	8.6	7.0	7.7	8.4	8.0	28.4	XII7	975.2	v9	15.7	16.2	16.3	14.6	15.4	16.2	15.7	36.6	XII7	982.4	v9

Month	AIR TEMPERATURE °C										VAPOUR PRESSURE mb										
	2	6	10	14	18	22	Mean	Mean			Absolute		2	6	10	14	18	22	Mean		
								Max.	Min.	Range	Max.	Date								Min.	Date
January	-3.4	-3.9	-1.2	0.8	-1.1	-2.7	-1.9	1.9	-5.6	7.5	8.2	2	-11.8	1	4.1	4.0	4.3	4.5	4.3	4.2	4.2
February	-3.1	-3.9	1.1	4.0	0.8	-1.3	-0.4	5.4	-5.1	10.5	13.5	28	-17.9	2	4.5	4.3	5.1	5.4	5.1	4.8	4.9
March	0.0	-0.7	3.8	6.0	3.2	1.1	2.2	7.3	-2.0	9.3	16.9	27	-7.8	6	5.3	5.0	5.6	6.0	5.9	5.9	5.6
April	5.9	5.8	12.2	14.7	10.9	8.1	9.6	15.9	3.6	12.3	23.4	17	-3.4	5	8.4	8.3	9.5	9.7	9.8	9.1	9.1
May	9.4	10.5	16.0	17.9	15.0	11.6	13.4	19.5	7.7	11.8	25.8	19	1.2	1	10.8	11.2	12.4	12.8	12.5	11.9	11.9
June	12.4	12.9	16.8	18.1	16.1	13.8	15.0	19.2	11.3	7.9	25.2	30	3.2	10	13.8	13.9	14.9	15.6	15.3	14.4	14.7
July	16.8	16.8	20.4	22.4	20.3	17.8	19.1	23.5	15.7	7.7	29.2	28	9.9	13	18.1	18.3	19.6	20.6	19.8	18.7	19.2
August	21.1	21.3	25.4	27.9	24.6	22.2	23.8	28.8	20.1	8.8	33.6	15	15.2	30	23.6	23.9	25.2	26.0	25.6	24.5	24.8
September	18.2	18.0	22.5	24.1	20.8	19.0	20.4	25.2	16.6	8.5	30.6	15	9.2	20	20.3	20.0	21.9	22.6	21.6	20.6	21.2
October	8.5	7.7	13.1	15.7	12.0	9.8	11.1	16.9	6.5	10.4	23.0	2	1.2	11	10.6	10.0	11.1	11.7	11.5	10.9	10.9
November	4.1	3.5	8.0	10.7	6.6	4.7	6.3	11.8	1.6	10.2	18.0	9	-4.5	19	7.0	6.8	7.7	7.8	7.5	7.3	7.3
December	-0.2	-0.8	1.7	3.4	1.4	0.3	1.0	4.9	-2.8	7.7	15.2	9	-17.2	31	5.5	5.3	5.6	5.8	5.7	5.5	5.5
Annual	7.5	7.3	11.7	13.8	10.9	8.7	10.0	15.0	5.6	9.4	33.6	VIII15	-17.9	II2	11.0	10.9	11.9	12.4	12.0	11.5	11.6

Month	PRECIPITATION mm							RELATIVE HUMIDITY %										
	2	6	10	14	18	22	Sum	Maximum				2	6	10	14	18	22	Mean
								24 h	Date	4 h	Date							
January	10.2	5.7	7.6	2.8	8.6	10.9	45.8	11.8	29	6.5	28	87	89	78	70	77	85	81
February	2.4	5.0	7.7	1.3	0.4	0.2	17.0	8.2	27	3.7	27	88	89	75	65	76	84	79
March	9.5	9.1	9.5	13.8	21.3	20.1	83.3	27.8	28	8.5	11	85	87	69	65	75	87	78
April	2.5	1.9	14.9	22.5	34.9	8.1	84.8	41.5	12	20.5	12	86	86	66	58	73	81	75
May	16.0	8.0	2.0	11.2	21.4	24.0	82.6	18.5	3	11.2	3	90	86	67	63	72	85	77
June	38.3	46.0	51.3	19.8	28.9	34.9	219.2	54.7	7	16.5	7	94	92	78	76	83	90	85
July	35.3	24.6	30.6	8.2	7.5	27.8	134.0	35.7	6	24.0	6	94	94	81	75	82	91	86
August	12.0	3.0	2.7	0.8	0.3	1.0	19.8	10.0	20	9.8	20	94	93	77	69	82	91	84
September	21.1	27.4	30.3	19.4	29.6	24.5	152.3	30.6	28	14.0	2	94	95	79	74	86	92	87
October	22.8	11.7	16.2	13.6	3.2	20.0	87.5	20.5	21	18.3	4	92	93	73	65	81	89	82
November	3.6	8.9	2.4	10.2	13.1	9.2	47.4	27.3	19	13.0	19	85	86	71	60	76	85	77
December	20.4	18.4	13.5	6.4	22.8	13.9	95.4	18.0	8	11.5	8	88	88	79	72	81	85	82
Annual	194.1	169.7	188.7	130.0	192.0	194.6	1069.1	54.7	VI7	24.0	VII6	90	90	74	68	79	87	81

1954.



Month	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Annual
-------	------	------	------	------	-----	------	------	------	-------	------	------	------	--------

MONTHLY MAXIMUM DAILY RANGE (WITH DATE) OF AIR TEMPERATURE (°C)

Max. Date	14.1 1	21.5 2	16.2 19.23	23.0 11	18.5 13	15.8 1	13.7 14	15.0 6	13.8 20	16.4 11	17.2 7	16.2 31	23.0 IV 11
-----------	-----------	-----------	---------------	------------	------------	-----------	------------	-----------	------------	------------	-----------	------------	---------------

VARIABILITY OF DAILY MEAN AIR TEMPERATURE (°C)

Mean	1.8	1.8	1.7	2.4	1.9	1.3	1.3	1.4	1.5	1.3	2.2	2.6	1.8
------	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

FREQUENCY OF VARIATION

Rise	2°^	4°	6°	8°	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Annual
	2°	12	6	16	7	15	14	13	11	9	10	7	6	126			
4°	3	8	2	5	6	3	3	5	4	3	6	3	51				
6°	1	1	2	4	—	1	—	—	1	—	—	2	12				
8°	—	—	—	—	—	—	—	—	—	—	1	1	2				
Sum	16	15	20	16	21	18	16	16	14	13	14	12	191				

Fall	2°^	4°	6°	8°	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Annual
	2°	8	8	5	7	4	9	11	9	11	15	9	10	106			
4°	7	5	5	4	4	3	4	6	5	3	5	5	56				
6°	—	—	1	3	1	—	—	—	—	—	2	2	9				
8°	—	—	—	—	1	—	—	—	—	—	—	2	3				
Sum	15	13	11	14	10	12	15	15	16	18	16	19	174				

Stationary	—	—	—	—	—	—	—	—	—	—	—	—	—
------------	---	---	---	---	---	---	---	---	---	---	---	---	---

MONTHLY MAXIMUM (WITH DATE) MINIMUM (WITH DATE) AND RANGE OF VAPOUR PRESSURE (mb)

Max. Date	7.0 10	11.7 28	12.0 27	17.9 18	19.0 25	25.9 30	31.5 29	31.9 15	30.9 15	21.2 4	12.2 25	12.8 2	31.9 VIII 15
Min. Date	2.2 1	1.4 2, 3	3.0 6, 13	4.2 4	4.9 10	7.5 10	12.3 14	17.3 25, 31	11.4 20	6.9 25	4.3 19	1.3 31	1.3 XII 31
Range	4.8	10.3	9.0	13.7	14.1	18.4	19.2	14.6	19.5	14.3	7.9	11.5	20.6

MONTHLY MINIMUM (WITH DATE) OF RELATIVE HUMIDITY (%)

Min. Date	47 2	43 2, 5	35 26	25 23	33 21	35 8	56 14	50 6	53 17, 26	43 15	41 6	47 21	25 IV 23
-----------	---------	------------	----------	----------	----------	---------	----------	---------	--------------	----------	---------	----------	-------------

VELOCITY (m.p.s.) OF WIND

CLOUD AMOUNT (0-10)

Hour	VELOCITY (m.p.s.) OF WIND									CLOUD AMOUNT (0-10)															
	2			6			10			14			18			22			Maximum	Mean for 24 h	No. of Days With Cale.				Mean
Month	2	6	10	14	18	22	Vel.	Dir.	Date	2	6	10	14	18	22	m.p.s. 10-15	m.p.s. 15-29	m.p.s. ≥29			Sum	2	6	10	
January	2.6	2.6	2.8	3.8	3.2	2.5	11.8	WNW	11	3.0	2	—	—	2	6.5	7.1	8.1	8.2	5.3	6.1	6.9				
February	2.6	1.8	2.3	3.5	3.6	3.2	19.7	W	12	3.0	4	1	—	5	6.9	7.0	7.0	7.6	6.0	5.9	6.7				
March	2.9	3.0	3.8	5.2	4.1	2.7	19.0	W	13	3.6	9	1	—	10	5.9	6.4	7.2	7.5	7.8	6.6	6.9				
April	2.6	3.0	4.2	6.8	4.8	3.5	19.4	WSW	19	4.1	9	2	—	11	5.8	6.8	6.7	6.7	7.0	5.4	6.4				
May	2.6	2.1	5.0	6.2	5.3	2.8	20.5	W	10	4.0	8	3	—	11	7.3	8.1	8.5	8.1	7.3	6.6	7.6				
June	2.0	1.8	3.4	4.7	4.7	3.3	11.3	SSE	3	3.3	2	—	—	2	9.1	9.4	9.1	9.1	9.0	8.1	9.0				
July	1.3	1.3	2.4	4.4	4.2	2.7	11.5	WSW	1	2.7	1	—	—	1	8.6	9.6	8.8	9.5	8.8	8.1	8.9				
August	1.4	1.1	2.8	3.8	3.8	2.3	11.7	SSE	19	2.5	1	—	—	1	7.3	9.5	8.6	6.4	7.6	7.5	7.8				
September	1.3	1.5	2.6	4.7	3.1	2.0	20.5	SSE	26	2.6	5	1	—	6	8.5	9.0	7.8	8.1	7.5	8.1	8.2				
October	1.5	1.6	2.4	3.5	2.8	1.6	12.7	WNW	4	2.3	4	—	—	4	6.6	8.1	7.1	7.1	6.4	6.6	7.0				
November	1.8	1.7	1.9	3.8	2.1	1.5	14.2	NW	11	2.1	4	—	—	4	5.2	7.3	6.0	5.5	4.9	5.9	5.8				
December	3.5	3.2	2.7	3.3	2.5	3.7	14.7	W	23	3.1	14	—	—	14	7.2	6.7	7.5	8.0	7.0	6.2	7.1				
Annual	2.2	2.1	3.0	4.5	3.7	2.7	20.5	W SSE	V10 IX26	30	63	8	—	71	7.1	7.9	7.7	7.7	7.1	6.8	7.4				

1954.

NUMBER OF OBSERVATIONS OF THE WIND FROM

Dir Month	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	Calm
January	20	7	6	6	3	3	5	5	6	1	4	6	12	23	29	37	13
February	11	2	9	5	11	6	5	5	3	4	2	3	11	15	17	27	32
March	14	2	4	2	3	3	7	17	6	3	2	7	12	17	18	38	31
April	9	6	4	1	5	2	9	27	9	—	—	12	12	16	14	32	22
May	12	6	5	1	2	5	5	48	17	7	4	4	14	12	11	10	23
June	7	—	1	1	1	3	19	41	16	5	2	8	7	3	10	35	21
July	7	6	2	2	2	4	14	40	33	6	5	1	4	3	6	20	31
August	8	2	3	—	2	2	20	58	20	3	1	3	2	1	6	13	42
September	8	—	2	2	3	1	12	39	15	3	1	3	4	3	10	17	57
October	20	3	4	5	4	5	11	10	10	1	1	4	10	15	14	25	44
November	18	6	5	8	2	2	3	16	3	2	2	1	6	12	21	28	45
December	23	4	11	2	4	1	6	10	6	2	2	—	12	26	14	38	25
Annual	157	44	56	35	42	37	116	316	144	37	26	52	106	146	170	320	386

MONTHLY MEAN VELOCITY (m.p.s.) OF THE WIND FROM

Dir Month	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW
January	3.6	2.1	1.8	1.4	1.2	1.4	1.4	3.2	2.7	0.9	1.5	2.1	3.6	4.2	3.2	3.7
February	4.0	3.7	2.0	1.8	1.5	1.6	2.5	3.9	4.0	3.0	3.3	2.3	3.4	3.4	4.0	5.1
March	3.9	2.5	2.0	1.5	1.2	1.6	2.7	4.3	4.2	4.1	4.6	6.4	6.8	4.4	4.6	4.4
April	3.0	1.9	3.1	2.2	1.5	1.1	3.4	6.9	4.5	—	—	6.3	3.9	4.9	4.6	5.8
May	3.0	1.7	1.7	2.2	1.5	1.7	4.6	5.8	4.1	2.8	3.8	1.7	7.5	5.3	3.9	4.8
June	2.3	—	1.3	1.1	1.5	5.7	4.1	4.2	3.5	2.1	2.9	3.0	1.8	3.4	3.2	4.4
July	2.6	1.6	2.6	1.4	1.2	1.7	2.7	4.1	3.9	3.4	3.0	7.6	1.3	1.7	2.6	2.8
August	2.1	2.2	1.7	—	0.9	1.9	3.2	4.2	2.9	1.2	0.9	1.5	0.9	3.8	2.9	2.8
September	2.0	—	1.4	1.7	1.7	5.5	4.6	5.2	2.6	4.3	2.0	3.7	1.7	3.5	2.8	2.7
October	2.7	0.7	2.3	1.2	1.1	2.7	2.9	3.0	2.6	3.2	1.3	3.9	2.4	4.5	3.4	2.9
November	2.4	2.9	1.3	1.9	1.8	0.8	2.4	2.6	3.2	2.3	1.2	1.1	3.5	4.0	2.9	3.3
December	2.9	3.5	2.9	1.1	1.4	1.1	1.2	4.5	4.6	3.4	1.9	—	3.2	5.2	3.6	3.7
Annual	3.0	2.2	2.1	1.6	1.4	2.1	3.2	4.6	3.5	2.9	2.6	4.1	4.0	4.4	3.5	4.0

DIRECTION AND INTENSITY (m.p.s.) OF THE RESULTANT WIND COMPUTED WITH THE VELOCITY

Hours Month	2	6	10	14	18	22	General							
January	N 57° W	1.5	N 34° W	1.9	N 33° W	1.5	N 35° W	3.0	N 48° W	2.5	N 25° W	1.5	N 39° W	1.9
February	N 56° W	0.9	N 35° W	0.9	N 22° W	1.2	N 35° W	2.5	N 33° W	1.6	N 31° W	1.7	N 34° W	1.5
March	N 44° W	1.9	N 35° W	1.6	N 50° W	1.9	N 79° W	2.6	N 70° W	1.6	N 64° W	0.8	N 58° W	1.7
April	N 17° W	1.1	N 27° W	1.6	N 75° W	1.1	S 70° W	3.0	S 64° W	1.2	N 44° W	0.8	N 74° W	1.1
May	N 78° W	1.4	N 54° W	1.1	S 23° W	1.6	S 23° W	0.9	S 7° W	2.7	S 25° E	1.5	S 22° W	1.3
June	N 31° W	0.3	N 36° W	0.8	S 1° W	0.6	S 2° E	1.3	S 20° E	1.7	S 9° E	1.2	S 3° E	0.6
July	S 10° E	0.4	S 14° E	0.3	S 1° W	0.6	S 10° E	2.7	S 7° E	2.7	S 17° E	1.5	S 10° E	1.4
August	S 21° E	1.0	S 14° E	0.6	S 29° E	1.2	S 19° E	2.3	S 20° E	2.3	S 31° E	1.8	S 23° E	1.5
September	S 6° E	0.5	N 23° W	0.2	S 33° E	1.1	S 20° E	2.9	S 15° E	1.8	S 2° E	1.1	S 17° E	1.2
October	N 22° W	0.4	N 26° W	0.8	N 46° W	1.5	N 72° W	1.3	N 67° W	0.5	N 11° W	0.5	N 45° W	0.8
November	N 6° W	1.2	N 11° W	1.0	N 40° W	1.1	N 62° W	2.0	N 31° W	0.7	N 7° W	0.7	N 32° W	1.0
December	N 63° W	1.3	N 44° W	2.3	N 23° W	1.3	N 43° W	2.5	N 32° W	1.5	N 35° W	1.4	N 40° W	1.7
Annual	N 53° W	0.6	N 36° W	0.9	N 68° W	0.5	S 67° W	1.0	S 42° W	0.6	S 63° W	0.1	N 83° W	0.5

1954.



NUMBER OF DAYS WITH PRECIPITATION (Separated by Amount)

Month	Jan.	Feb.	Mar.	April	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Annual
<0.1mm	1	7	2	—	1	2	2	8	2	3	4	5	37
0.1— 1	5	8	11	4	5	5	7	7	4	7	6	8	77
1— 3	4	1	6	5	5	1	4	2	6	3	2	3	42
3— 5	3	1	1	1	3	2	—	1	—	1	1	3	17
5— 10	2	1	1	1	4	4	5	—	—	2	1	4	25
10— 15	1	—	1	2	1	3	2	1	2	—	—	—	13
15— 20	—	—	1	—	1	1	—	—	2	2	—	3	10
20— 25	—	—	—	—	—	2	—	—	1	1	—	—	4
25— 30	—	—	1	—	—	1	1	—	1	—	1	—	5
30— 35	—	—	—	—	—	—	—	—	1	—	—	—	1
35— 40	—	—	—	—	—	—	1	—	—	—	—	—	1
40— 45	—	—	—	1	—	—	—	—	—	—	—	—	1
45— 50	—	—	—	—	—	—	—	—	—	—	—	—	—
50— 60	—	—	—	—	—	1	—	—	—	—	—	—	1
60— 70	—	—	—	—	—	—	—	—	—	—	—	—	—
70— 80	—	—	—	—	—	—	—	—	—	—	—	—	—
80— 90	—	—	—	—	—	—	—	—	—	—	—	—	—
90—100	—	—	—	—	—	—	—	—	—	—	—	—	—
100≤100	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	16	18	24	14	20	22	22	19	19	19	15	26	234

EARTH TEMPERATURE °C

Month	Surface						Mean	Depth (m)									
	2	6	10	14	18	22		0.05	0.1	0.2	0.3	0.5	1.0	2.0	3.0	5.0	6.0
January	-0.1	-0.2	0.5	1.4	0.3	0.0	0.3	0.6	0.8	1.6	2.4	3.5	6.2	11.1	12.8	13.2	13.1
February	0.2	0.0	1.2	2.7	1.0	0.6	0.9	0.6	0.5	1.2	1.7	2.5	4.7	9.5	11.7	12.7	12.9
March	2.3	1.8	6.9	9.3	5.0	3.3	4.8	4.7	4.6	4.5	4.5	4.5	5.2	8.5	10.7	12.1	12.6
April	8.2	7.8	14.2	17.2	12.3	9.8	11.6	11.0	11.1	10.3	9.7	9.0	8.1	8.6	10.2	11.5	12.2
May	12.4	12.2	17.6	19.5	16.2	13.9	15.3	14.9	15.1	14.2	13.6	12.6	11.2	9.7	10.2	11.2	11.9
June	15.1	15.1	19.1	20.7	18.1	16.2	17.4	17.1	17.3	16.7	16.1	15.5	13.9	11.2	10.7	11.1	11.7
July	19.1	19.1	23.7	24.9	22.1	20.0	21.5	21.0	21.2	20.4	19.6	19.2	16.3	12.6	11.5	11.3	11.7
August	23.5	23.3	28.4	31.5	26.6	24.3	26.3	25.5	25.6	24.6	23.7	22.2	19.4	14.1	12.5	11.7	11.8
September	21.0	20.6	24.7	26.3	23.0	21.6	22.9	22.6	22.8	22.4	22.2	21.7	20.2	15.6	13.6	12.2	12.1
October	12.0	11.3	16.8	17.9	14.3	12.7	14.2	14.5	14.9	15.3	15.8	16.4	17.4	16.1	14.4	12.8	12.4
November	5.7	5.4	10.3	11.7	7.6	6.3	7.8	8.3	8.7	9.2	10.0	11.1	13.1	14.9	14.5	13.3	12.7
December	1.8	1.4	3.4	4.7	2.6	2.0	2.7	3.2	3.5	4.4	5.3	6.6	9.3	13.1	13.8	13.4	12.9
Annual	10.1	9.8	13.9	15.6	12.4	10.9	12.1	12.0	12.2	12.1	12.1	12.1	12.1	12.1	12.2	12.2	12.3

Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Annual
------	------	------	------	-----	------	------	------	-------	------	------	------	--------

MONTHLY TOTAL DURATION OF SUNSHINE (in hours)

95.5	129.6	156.8	183.2	190.7	84.4	89.6	160.3	109.5	131.2	142.8	93.9	1567.5
------	-------	-------	-------	-------	------	------	-------	-------	-------	-------	------	--------

RATE OF SUNSHINE (%)

32	43	42	46	43	19	20	38	29	39	47	32	35
----	----	----	----	----	----	----	----	----	----	----	----	----

AMOUNT OF EVAPORATION (mm)

OPEN AIR

1.7	2.2	2.2	4.2	4.3	2.9	3.6	4.7	3.2	2.3	2.0	1.5	2.9
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

IN THE SHELTER

1.0	1.1	1.1	1.5	1.7	1.1	1.1	1.5	1.2	1.0	1.0	1.0	1.2
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----

1954.



NUMBER OF OBSERVATIONS OF THE HORIZONTAL VISIBILITY FROM

Dir.	Class	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Sum
N	0	—	—	—	—	—	—	—	—	—	—	—	—	—
	1	—	—	—	—	—	—	—	—	1	1	4	—	6
	2	—	1	2	—	—	—	2	2	3	2	2	—	14
	3	3	—	—	—	—	—	—	1	—	1	—	1	7
	4	4	2	10	2	2	1	6	—	2	2	—	7	38
	5	5	6	4	7	6	15	16	10	16	6	2	11	104
	6	14	8	20	9	11	29	28	31	26	11	7	14	208
	7	26	28	32	29	40	45	48	46	45	38	25	41	443
	8	100	99	76	84	87	48	58	56	52	74	87	83	904
	9	34	24	42	49	40	42	27	41	34	51	53	29	466
E	0	—	—	—	—	—	—	—	—	—	—	—	—	—
	1	—	—	—	—	—	—	—	—	1	1	4	—	6
	2	—	1	2	—	—	—	2	2	3	2	2	—	14
	3	3	—	—	—	—	—	1	—	—	1	—	1	6
	4	4	2	10	2	2	1	6	—	3	2	—	7	39
	5	5	5	4	7	6	15	16	10	15	7	2	9	101
	6	13	6	16	8	9	28	27	28	25	10	5	14	189
	7	24	25	29	26	40	46	46	48	43	37	20	43	427
	8	101	99	82	87	89	49	62	59	57	75	94	81	935
	9	36	30	43	50	40	41	26	39	33	51	53	31	473
S	0	—	—	—	—	—	—	—	—	—	—	—	—	—
	1	—	—	—	—	—	—	—	—	1	1	4	—	6
	2	—	1	2	—	—	—	2	2	3	2	2	—	14
	3	3	—	—	—	—	—	—	1	—	—	—	1	5
	4	4	2	10	2	2	1	6	—	2	2	—	7	38
	5	5	5	4	7	6	15	16	10	15	7	2	10	102
	6	13	7	17	8	9	29	27	29	29	11	7	14	200
	7	24	26	31	26	41	45	46	47	46	36	23	42	433
	8	104	28	79	87	88	49	62	59	54	76	89	82	927
	9	33	29	43	50	40	41	26	39	30	51	53	30	465
W	0	—	—	—	—	—	—	—	—	—	—	—	—	—
	1	—	—	—	—	—	—	—	—	1	1	4	—	6
	2	—	1	2	—	—	—	2	2	3	2	2	—	14
	3	3	—	—	—	—	—	—	1	—	—	—	1	5
	4	4	2	10	2	2	1	6	—	2	2	—	7	38
	5	5	5	5	6	6	15	16	10	14	6	2	11	101
	6	17	9	18	9	11	28	29	32	31	12	9	18	223
	7	27	26	33	27	42	49	49	46	44	39	21	45	448
	8	100	99	77	87	85	50	61	59	55	75	91	79	918
	9	30	26	41	49	40	37	22	37	30	49	51	25	437

TOTAL SOLAR AND SKY RADIATION ON THE HORIZONTAL SURFACE (gr. cal/cm². hour)

	3—5	5—6	6—7	7—8	8—9	9—10	10—11	11—12	12—13	13—14	14—15	15—16	16—17	17—18	18—19	19—20	Sum
January	—	—	0.0	2.3	10.7	17.3	24.4	26.8	24.7	20.2	15.6	6.9	1.4	0.0	—	—	150.3
February	—	—	0.1	6.1	18.9	27.3	33.9	36.6	35.5	30.7	23.2	13.7	4.3	0.2	—	—	230.5
March	—	0.0	3.5	15.8	27.0	37.5	43.8	45.3	40.8	36.5	27.2	18.1	9.1	1.5	0.0	—	306.1
April	0.0	1.3	10.1	21.2	32.2	41.3	45.6	49.0	49.7	46.0	35.5	24.2	13.4	4.7	0.3	0.0	374.5
May	0.1	5.3	15.9	26.2	35.4	41.5	45.2	46.6	46.6	41.9	35.1	26.7	17.6	8.0	1.2	0.0	393.3
June	0.1	3.1	10.2	20.1	29.7	35.6	38.1	38.3	38.6	36.3	29.1	23.4	15.6	8.4	2.1	0.1	328.8
July	—	1.5	8.2	17.2	27.5	37.1	43.5	43.0	40.9	38.3	31.7	24.8	15.8	8.1	2.4	0.0	340.0
August	—	1.0	9.3	19.1	29.7	39.6	44.0	47.0	51.7	49.5	42.7	31.4	18.4	7.1	0.7	—	391.2
September	—	0.0	3.7	13.9	25.4	33.8	42.0	44.2	41.8	34.9	25.2	16.6	7.8	1.7	0.1	—	291.0
October	—	—	1.9	12.0	25.1	35.2	40.9	42.8	38.9	32.4	24.2	13.5	3.7	0.4	0.0	—	271.0
November	—	—	0.3	7.5	18.0	27.5	35.1	37.9	33.2	35.2	18.5	6.2	1.1	0.1	—	—	210.5
December	—	—	—	1.3	8.7	17.5	25.1	30.2	26.2	18.6	12.2	4.7	0.5	—	—	—	145.0
Annual	0.2	12.2	63.2	162.7	288.3	391.2	461.6	487.7	468.6	410.4	320.2	210.2	108.6	40.2	6.8	0.1	3432.2

1954.



NUMBER OF DAYS WITH

Month	●	*	△	▽	⊠	≡	Clear	Cloudy	Sunless	☂	☁	Min. Temp. <0°	Mean Temp. <0°	Max. Temp. <0°	Min. Temp. ≥25°	Mean Temp. ≥25°	Max. Temp. ≥25°	Max. Temp. ≥30°
January	15	13	2	—	—	—	1	13	5	2	13	30	25	—	—	—	—	—
February	11	7	—	—	—	1	2	12	2	5	6	24	15	1	—	—	—	—
March	22	15	—	—	—	—	—	10	4	10	5	24	9	1	—	—	—	—
April	14	—	1	—	—	—	4	13	3	11	7	6	—	—	—	—	—	—
May	19	—	—	—	2	—	—	17	4	11	1	—	—	—	—	—	—	2
June	20	—	—	—	—	—	—	25	11	2	—	—	—	—	—	—	—	1
July	20	—	—	—	2	4	—	24	9	1	—	—	—	—	—	—	—	12
August	11	—	—	—	—	2	—	14	1	1	—	—	—	—	—	11	28	11
September	17	—	—	—	—	4	—	17	6	6	—	—	—	—	—	2	16	1
October	16	—	—	—	—	6	1	12	5	4	4	—	—	—	—	—	—	—
November	11	1	—	—	1	5	1	6	5	4	9	7	1	—	—	—	—	—
December	21	12	2	—	—	1	2	15	6	14	11	26	12	4	—	—	—	—
Annual	197	48	5	—	5	23	11	178	61	71	56	117	62	14	—	13	59	12

Note 1: In the 2nd column, the number of days on which the amount is 0.1 mm or more are reckoned, but in the 3rd 4th 5th columns, the amount is not considered.

Not 2: In the 7th column, day with ≡° are not included.

GENERAL REMARKS

	First Day (last year) 1952	Last Day (this year) 1953	First Day (this year) 1953
Min. Air Temp. below 0°:	Oct. 27	Apr. 28	Nov. 7
Mean Air Temp. below 0°:	Nov. 20	Mar. 15	Nov. 19
Max. Air Temp. above 0°:	Jan. 12	Mar. 11	Dec. 25
Max. Air Temp. above 25°:		Sept. 26	May 19
Mean Air Temp. above 25°:		Sept. 14	Aug. 2
Max. Air Temp. above 30°:		Sept. 15	Aug. 3
Hoar Frost:	Oct. 15	May 1	Oct. 9
Snow:	Nov. 11	Mar. 29	Nov. 11
Snow on Ground.	Nov. 19	Mar. 30	Nov. 11

Max. Continuance of Days with Min. Temp. below 0° is 30 Days: from Jan. 11 to Feb. 9
 Max. Continuance of Days with Mean Temp. below 0° is 19 Days: from Jan. 21 to Feb. 8
 Max. Continuance of Days with Max. Temp. above 30° is 7 Days: from Aug. 13 to Aug. 19
 Max. Continuance of Days without precipitation is Days: from

Continuance of more than 5 Days with precipitation are:

7 Days: from Jan. 26	to Feb. 1	7 Days: from July 26	to Aug. 1
14 ,, from Mar. 4	to Mar. 17	6 ,, from Aug. 28	to Sept. 2
6 ,, from Apr. 30	to May. 5	7 ,, from Oct. 27	to Nov. 2
7 ,, from June 2	to June 8	13 ,, from Dec. 22	to Jan. 3 (1955)
7 ,, from July 6	to July 12		

1954.

FIVI-DAY MEANS

Month	Five-day Period	Air Pressure mb	Air Temperature °C	Vapour Pressure mb	Relative Humidity %	Amount of Clouds (0-10)	Velocity of Wind m.p.s.	Precipitation (Total) mm
January	1-5	21.3	-0.7	4.5	79	6.6	2.3	5.6
	6-10	16.4	-0.3	5.1	85	5.7	2.4	2.6
	11-15	21.4	-2.1	4.2	81	7.1	2.8	3.1
	16-20	20.7	-0.5	4.9	83	6.5	2.4	6.0
	21-25	14.7	-2.7	3.5	72	7.6	4.0	0.1
	26-30	7.2	-4.7	3.5	85	8.0	3.6	23.7
February	31-4	13.2	-7.3	2.8	85	2.9	1.4	4.9
	5-9	17.0	-1.9	4.1	79	5.5	1.9	0.3
	10-14	15.1	1.4	5.1	74	6.9	4.6	4.1
	15-19	18.2	0.1	4.5	74	9.0	4.2	0.3
	20-24	20.1	-0.8	4.7	82	7.9	2.7	1.1
	25-1	20.0	6.3	8.1	84	8.5	3.2	11.0
March	2-6	19.4	0.6	4.9	76	7.5	4.0	7.3
	7-11	25.8	-0.6	4.7	82	7.4	3.1	24.2
	12-16	19.2	0.1	3.9	79	7.2	3.7	5.2
	17-21	19.1	3.2	5.0	78	6.7	3.1	2.9
	22-26	19.3	4.0	5.5	69	4.9	3.8	3.6
	27-31	12.5	5.6	7.5	82	7.6	3.5	40.1
April	1-5	19.1	8.1	7.3	68	3.4	3.2	—
	6-10	15.0	10.0	9.7	76	6.1	4.2	8.9
	11-15	10.9	7.7	7.9	76	7.6	5.6	42.5
	16-20	10.4	11.2	10.6	77	7.3	4.9	14.2
	21-25	21.5	10.2	10.0	79	6.5	3.3	3.8
	26-30	15.8	10.4	9.4	75	7.6	3.5	15.4
May	1-5	11.6	11.7	10.9	80	8.2	3.4	28.4
	6-10	8.1	12.3	11.1	77	7.9	5.8	22.3
	11-15	13.1	13.0	11.4	75	7.3	4.6	4.2
	16-20	12.1	14.9	13.2	78	6.4	2.8	2.3
	21-25	11.7	14.6	12.9	78	9.2	3.6	20.7
	26-30	17.1	13.8	11.6	74	6.2	3.9	2.8
June	31-4	12.5	15.9	14.3	81	8.3	3.9	39.8
	5-9	12.6	12.3	12.0	84	7.4	3.3	62.3
	10-14	10.4	13.9	13.4	85	9.6	2.7	16.6
	15-19	11.1	14.6	14.7	89	9.6	3.1	36.9
	20-24	14.2	14.2	13.7	84	9.4	3.9	48.4
	25-29	16.3	17.6	17.9	89	9.5	3.0	6.1
July	30-4	6.3	19.8	20.1	87	9.0	2.9	33.3
	5-9	9.5	16.6	17.1	90	9.8	2.4	43.1
	10-14	12.0	16.3	16.1	87	7.8	2.9	19.3
	15-19	15.1	19.2	19.0	88	9.7	2.1	6.8
	20-24	13.9	19.2	17.8	80	8.2	3.2	0.0
	25-29	7.5	22.6	24.0	88	8.5	3.0	13.4
August	30-3	17.5	23.9	26.0	88	8.5	3.6	31.6
	4-8	10.6	24.1	25.0	84	7.8	2.2	0.1
	9-13	8.2	22.8	23.0	83	7.5	2.3	0.7
	14-18	5.3	26.3	28.4	84	7.6	2.2	0.3
	19-23	8.0	24.6	26.2	85	6.9	2.9	10.8
	24-28	17.4	22.4	22.6	83	9.2	2.9	0.5
September	29-2	14.2	20.3	21.3	89	8.9	1.2	34.1
	3-7	13.4	20.2	20.9	88	7.7	2.0	0.2
	8-12	13.9	24.0	25.7	86	7.4	3.2	15.3
	13-17	9.0	24.2	26.3	87	8.0	3.6	15.7
	18-22	13.3	17.9	17.7	85	7.4	2.8	38.2
	23-27	12.3	19.3	18.5	82	8.5	2.6	21.8
October	28-2	19.6	15.4	15.3	88	8.6	1.6	32.1
	3-7	17.2	12.4	11.6	79	7.3	3.9	36.4
	8-12	19.2	8.8	9.3	82	6.6	1.6	4.2
	13-17	20.0	10.4	10.0	81	4.6	1.9	1.9
	18-22	21.9	12.0	11.9	86	8.8	1.8	22.5
	23-27	24.8	10.8	10.5	82	6.5	1.7	1.8
November	28-1	8.8	10.3	10.1	81	7.9	2.8	20.8
	2-6	17.4	8.9	7.9	71	4.7	3.1	1.5
	7-11	12.1	7.4	8.2	80	6.0	2.2	13.6
	12-16	18.9	5.4	6.0	68	5.3	2.9	1.4
	17-21	21.4	3.9	6.5	81	5.3	2.0	30.8
	22-26	27.0	6.9	8.4	84	6.6	1.7	0.0
December	27-1	27.7	4.4	7.2	84	7.4	1.2	0.0
	2-6	25.1	3.2	6.3	79	7.4	2.5	6.5
	7-11	24.6	4.4	7.4	85	8.1	2.1	41.6
	12-16	18.4	1.1	5.5	84	6.8	2.2	7.2
	17-21	19.6	0.4	5.0	81	4.8	2.5	5.6
	22-26	10.9	-1.1	4.7	83	8.1	4.9	28.6
	27-31	18.6	-3.3	3.7	79	7.1	4.7	5.9
Mean		15.7	10.1	11.6	81	7.4	3.0	13.3

SEISMOLOGICAL OBSERVATIONS



Remarks:—

1. The seismic intensity is divided into the following eight classes according to the scale of the Central Meteorological Observatory of Japan (1949).

Untelt	0	
		1. Slight
		2. Weak
		3. Rather strong
Felt		4. Strong
		5. Very strong
		6. Disastrous
		7. Very disastrous

2. The time adopted in the seismological observations is Japanese Central Standard Time 9 east from Greenwich.

3. Symbols and Notations.

i: Sudden beginning of motion.

e: Gradual beginning of motion.

?: Doubtful phase.

+: Out of order of the instrument.

⊕: Out of the range of the instrument.

[]: Depth of focus in the unit of km.

[S]: Shallow-focused earthquakes.

A.S.: After-shock

4. The sign of maximum amplitude: + towards E and N.
- towards W and S.



EARTHQUAKES, 1954.

Table with 15 columns: No., Date 1953, P (E, W, N, S), S (E, W, N, S), L (E, W, N, S), Maximum Range of Motion (E, W, N, S), Duration of Total Earthquake (m, s), Intensity, Epicenter and Remarks.

EARTHQUAKES, 1954.



No.	Date 1954	P				S				L				Maximum Range of Motion		Duration of Total Earth- quake	Intensity	Epicenter and Remarks
		E	W	N	S	E	W	N	S	E	W	N	S	E	W			
166	June 1	e 10	h 38	m 51	—	—	—	—	—	—	—	—	—	—	—	—	—	39.7°N, 142.1°E [40-50]
167	1	e 17	51	45	—	—	—	—	—	—	—	—	—	—	—	—	—	43.5N, 149E [80]
168	2	19	24	18	—	—	—	—	—	—	—	—	—	—	—	—	—	43.5N, 149E [80]
169	4	e 9	47	17	—	—	—	—	—	—	—	—	—	—	—	—	—	43.5N, 149E [80]
170	5	1	41	36	—	—	e 42	06	—	—	—	—	—	—	—	—	—	43.5N, 149E [80]
171	5	22	15	18	15	18	15	53	15	52	—	—	—	—	—	—	—	36.0N, 139.9E [50-60]
172	7	1	58	39	58	38	65	00	65	00	—	—	—	—	—	—	—	3S, 136.5E
173	7	7	00	32	e 00	35	01	39	01	38	—	—	—	—	—	—	—	32.2N, 140.8E [70]
174	7	e 19	23	03	e 23	03	e 24	21	? 24	22	—	—	—	—	—	—	—	32.2N, 140.8E [70]
175	9	6	03	42	—	—	04	02	e 04	01	—	—	—	—	—	—	—	37.5N, 141.5E [40]
176	11	7	40	18	40	19	42	06	42	08	—	—	—	—	—	—	—	29.3N, 139.8E [380]
177	12	16	06	26	06	26	06	37	06	36	—	—	—	—	—	—	—	29.3N, 139.8E [380]
178	14	e 22	59	12	—	—	59	32	59	33	—	—	—	—	—	—	—	3S, 136.5E
179	15	e 22	34	32	—	—	36	21	e 36	20	—	—	—	—	—	—	—	32.2N, 140.8E [70]
180	16	0	05	29	—	—	05	45	e 05	45	—	—	—	—	—	—	—	47.5N, 146.5E [500]
181	19	e 10	59	47	e 59	48	e 62	11	? 62	01	—	—	—	—	—	—	—	36.4N, 141.1E [30]
182	20	e 1	57	54	—	—	58	15	58	16	—	—	—	—	—	—	—	36.4N, 141.1E [30]
183	20	6	46	50	—	—	47	20	e 47	18	—	—	—	—	—	—	—	29N, 139 [450-500]
184	22	17	17	09	—	—	17	25	17	25	—	—	—	—	—	—	—	29N, 139 [450-500]
185	23	e 4	51	55	—	—	52	12	—	—	—	—	—	—	—	—	—	37.2N, 141.4E [80]
186	23	e 17	57	56	—	—	58	44	—	—	—	—	—	—	—	—	—	37.2N, 141.4E [80]
187	25	e 23	50	10	—	—	50	36	—	—	—	—	—	—	—	—	—	37.2N, 141.4E [80]
188	26	8	25	44	e 25	47	27	32	27	34	—	—	—	—	—	—	—	37.2N, 141.4E [80]
189	28	9	—	—	—	—	05	32	—	—	—	—	—	—	—	—	—	37.2N, 141.4E [80]
190	29	23	58	57	—	—	59	21	59	22	—	—	—	—	—	—	—	37.2N, 141.4E [80]
191	July 30	3	23	50	—	—	24	42	24	46	—	—	—	—	—	—	—	6.5N, 106E [100]
192	1	20	—	—	—	—	33	45	—	—	—	—	—	—	—	—	—	46N, 154E [100]
193	2	11	—	—	—	—	51	26	e 54	51	—	—	—	—	—	—	—	46N, 154E [100]
194	2	e 13	—	—	—	—	e 50	26	—	—	—	—	—	—	—	—	—	46N, 154E [100]
195	4	e 1	20	13	—	—	e 20	34	—	—	—	—	—	—	—	—	—	46N, 154E [100]
196	4	e 7	41	02	40	59	e 45	33	e 45	46	—	—	—	—	—	—	—	6.5N, 106E [100]
197	5	e 5	09	42	—	—	e 09	59	—	—	—	—	—	—	—	—	—	46N, 154E [100]
198	6	17	07	16	07	15	09	12	09	13	—	—	—	—	—	—	—	46N, 154E [100]
199	6	19	17	29	—	—	18	43	—	—	—	—	—	—	—	—	—	46N, 154E [100]
200	6	e 20	16	26	—	—	17	08	—	—	—	—	—	—	—	—	—	46N, 154E [100]
201	6	20	—	—	—	—	25	40	—	—	—	—	—	—	—	—	—	34.2N, 141.6E [60]
202	9	3	54	45	e 54	47	55	38	55	36	—	—	—	—	—	—	—	34.2N, 141.6E [60]
203	10	0	39	53	e 39	51	40	53	40	51	—	—	—	—	—	—	—	43.0N, 147.0E [40]
204	10	3	29	44	29	42	30	21	30	20	—	—	—	—	—	—	—	43.0N, 147.0E [40]
205	13	e 2	35	02	e 35	03	36	54	36	54	—	—	—	—	—	—	—	40.7N, 139.3E [300]
206	13	17	27	46	—	—	28	10	—	—	—	—	—	—	—	—	—	40.7N, 139.3E [300]
207	15	12	—	—	—	—	e 18	23	—	—	—	—	—	—	—	—	—	39.5N, 144.5E [60]
208	16	21	42	24	e 42	27	42	57	42	56	—	—	—	—	—	—	—	39.5N, 144.5E [60]
209	18	15	39	32	—	—	43	24	—	—	—	—	—	—	—	—	—	55N, 161.5E
210	18	18	08	37	08	37	09	14	09	13	—	—	—	—	—	—	—	35.5N, 141.1E [40]
211	18	19	39	04	39	04	39	36	39	37	—	—	—	—	—	—	—	36.4N, 140.9E [40]
212	18	21	47	48	e 47	46	48	17	48	16	—	—	—	—	—	—	—	36.4N, 140.9E [40]
213	18	23	21	13	—	—	21	48	21	50	—	—	—	—	—	—	—	35.5N, 141.0E [50]
214	19	0	54	25	e 54	26	54	47	54	48	—	—	—	—	—	—	—	35.6N, 141.0E [40]
215	19	11	57	13	e 57	13	57	36	e 57	38	—	—	—	—	—	—	—	35.6N, 140.9E [40]
216	21	17	43	33	e 43	32	44	30	e 44	31	—	—	—	—	—	—	—	38.5N, 143E [40]
217	21	22	08	48	e 08	50	09	03	09	04	—	—	—	—	—	—	—	38.5N, 143E [40]
218	21	22	51	50	51	51	52	44	52	44	—	—	—	—	—	—	—	33.7N, 141.2E [40]
219	24	19	45	07	—	—	45	24	e 45	25	—	—	—	—	—	—	—	33.7N, 141.2E [40]
220	25	13	57	19	—	—	57	29	57	30	—	—	—	—	—	—	—	33.7N, 141.2E [40]

EARTHQUAKES, 1954.



No.	Date 1954	P				S				L				Maximum Range of Motion		Duration of Total Earth- quake	Intensity	Epicenter and Remarks		
		E	W	N	S	E	W	N	S	E	W	N	S	E	W				N	S
331	Nov. 5	h 19	m 47	s 48	e 47	m 57	e 48	m 29	e 48	m 30	—	—	—	—	+ 8	- 10	m 4	s 22	0	40.3°N, 145°E [60-80]
332	6	e 7	51	13	51	18	? 54	56	55	03	—	—	—	—	—	—	9	33	0	
333	6	? 22	16	05	? 16	05	? 20	00	? 19	57	—	—	—	—	—	—	11	52	0	
334	7	23	36	36	36	36	e 37	17	e 37	19	—	—	—	—	- 22	+ 40	6	21	0	
335	8	0	42	37	—	—	42	55	42	53	—	—	—	—	+ 10	+ 8	2	52	0	
336	9	e 0	49	41	—	—	50	21	e 50	23	—	—	—	—	- 4	- 5	3	06	0	42.1N, 142.4E [80] 41.5N, 142.1E [60]
337	9	e 20	36	17	e 36	23	36	53	36	53	—	—	—	—	+ 37	+ 35	6	02	0	
338	12	4	31	18	31	18	31	42	31	44	—	—	—	—	- 41	- 48	7	30	0	
339	14	15	—	—	—	—	08	30	—	—	—	—	—	—	—	—	—	—	0	
340	14	16	—	—	—	—	40	54	—	—	—	—	—	—	—	—	—	—	0	
341	15	20	31	49	31	49	32	44	32	45	—	—	—	—	- 23	- 30	7	50	0	33.8N 141.3E [40]
342	16	1	31	12	31	10	34	51	34	53	—	—	—	—	- 34	+ 65	12	27	0	
343	18	2	—	—	—	—	? 25	58	e 25	59	—	—	—	—	—	—	—	—	0	
344	18	e 14	23	36	e 23	40	25	37	25	38	—	—	—	—	- 14	- 20	11	17	0	
345	18	21	47	21	e 47	20	47	54	e 47	53	—	—	—	—	- 20	- 18	5	55	0	
346	19	3	14	35	e 14	36	15	02	e 15	04	—	—	—	—	+ 14	- 25	9	06	0	36.4N, 142.8E [60] 38.9N, 142.3E [60]
347	19	5	45	16	45	16	—	—	45	27	—	—	—	—	—	+2575	19	54	3	
348	19	6	07	41	—	—	07	51	—	—	—	—	—	—	+ 10	—	3	12	0	
349	19	12	15	54	15	54	16	04	16	05	—	—	—	—	± 23	- 18	3	19	0	
350	19	14	57	50	57	50	59	20	59	19	69	46	69	47	- 90	- 83	18	46	0	
351	21	e 15	52	47	—	—	e 53	02	—	—	—	—	—	—	—	—	1	18	0	37.8N, 142.1E [40] 36.5N, 141.2E [50]
352	23	0	13	20	13	20	e 13	38	13	37	—	—	—	—	+ 40	+ 43	6	27	0	
353	23	8	36	31	36	32	36	50	36	50	—	—	—	—	+ 11	+ 8	4	37	0	
354	23	e 19	21	51	e 21	53	e 25	33	e 25	37	—	—	—	—	—	—	10	47	0	
355	24	6	17	17	17	18	20	50	20	49	—	—	—	—	—	—	11	46	0	
356	24	19	—	—	—	—	27	53	27	55	—	—	—	—	- 5	—	—	—	0	43.2N, 146.6E [50] 38.8N, 142.1E [40] 40.4N, 142.5E [40]
357	25	20	27	42	? 27	41	36	43	36	45	—	—	e 44	19	+ 16	- 50	61	14	0	
358	25	21	06	40	06	41	07	33	07	36	—	—	—	—	+ 67	+ 68	—	—	0	
359	27	22	46	36	46	35	46	43	46	41	—	—	—	—	± 42	± 28	2	10	1	
360	30	12	19	53	19	51	20	10	20	11	—	—	—	—	+ 36	+ 50	5	43	0	
361	Dec. 3	7	55	46	e 55	46	e 56	05	e 56	05	—	—	—	—	- 6	—	2	03	0	42.0N, 142.5E [60] 5S, 152.5E
362	3	11	47	24	47	23	48	00	47	59	—	—	—	—	+ 45	- 43	6	14	0	
363	4	16	08	52	e 08	53	—	—	—	—	—	—	—	—	+ 6	- 13	8	57	0	
364	8	e 3	17	13	e 17	16	17	45	17	45	—	—	—	—	+ 6	- 8	6	52	0	
365	9	0	—	—	—	—	e 31	55	—	—	—	—	—	—	—	—	—	—	0	
366	12	14	—	—	—	—	e 12	20	—	—	—	—	—	—	—	—	—	—	0	36.1N, 140.1E [40] 39.5N, 118W
367	13	e 17	49	42	—	—	50	17	—	—	—	—	—	—	- 7	—	4	38	0	
368	15	e 5	52	32	—	—	e 52	52	—	—	—	—	—	—	—	—	1	49	0	
369	16	20	18	46	e 18	48	e 28	25	e 28	19	—	—	—	—	—	—	78	05	0	
370	16	21	—	—	—	—	e 22	21	e 22	19	—	—	—	—	—	—	—	—	0	
371	25	4	58	38	58	40	e 59	38	e 59	40	—	—	—	—	+ 24	- 38	30	05	0	37.8N, 142.1E [40] 36.5N, 141.2E [50]
372	25	15	—	—	—	—	e 04	27	—	—	—	—	—	—	- 6	—	—	—	0	
373	26	e 12	44	29	e 44	37	e 45	43	e 45	43	—	—	—	—	- 15	—	13	59	0	
374	28	? 10	09	12	? 09	14	? 11	47	? 11	29	—	—	—	—	—	—	8	41	0	
375	29	e 22	04	22	—	—	04	33	04	31	—	—	—	—	- 7	—	2	15	0	

PULSATORY OSCILLATIONS, 1954. (EW Component)



No.	Beginning			Ending			Maximum				Double Amplitude μ
	Date			Date			Date				
	Month	Day	Hour	Month	Day	Hour	Day	Hour	Day	Hour	
1	Jan.	2	17	Jan.	4	9	3	7	3	9	6
2		4	21		8	14	6	2	6	12	13
3		8	20		12	19	10	1	10	20	21
4		14	3		15	1	14	7	14	11	5
5		21	8		23	10	21	17	22	9	5
6		24	8		27	13	24	21	26	3	16
7		28	16	Feb.	2	12	29	7	29	20	10
8	Feb.	6	1		9	9	7	5	7	9	5
9		12	8		16	9	12	16	13	8	20
10		17	6		19	20	17	15	18	9	8
11		20	15		24	2	20	21	21	5	11
12		26	15	Mar.	3	10	27	15	1	3	33
13	Mar.	3	15		4	17	3	18	4	8	20
14		4	21		6	18	5	8	5	22	17
15		7	5		9	13	7	13	8	22	23
16		9	19		11	10	10	1	10	9	15
17		11	17		17	11	11	20	13	11	25
18		19	22		22	23	20	12	20	23	9
19		24	13		25	9	24	18	24	22	5
20		25	15		26	12	25	21	26	1	8
21		27	23		31	10	28	15	29	6	20
22	Apr.	1	15	Apr.	2	11	1	23	2	5	4
23		2	14		3	12	2	20	3	3	3
24		3	17		5	9	3	22	4	4	5
25		6	4		10	7	7	2	7	14	11
26		12	7		16	6	12	10	13	23	62
27		18	3		19	7	18	8	18	23	13
28		19	8		20	20	19	10	19	20	19
29		28	15	May	1	6	30	1	30	18	10
30	May	1	17		3	15	2	12	3	3	8
31		3	23		7	20	4	8	4	13	7
32		8	17		11	14	9	15	10	23	24
33		14	8		16	3	14	20	15	11	11
34		25	2		26	10	25	10	25	18	10
35	June	2	17	June	4	21	3	8	3	22	13
36		6	17		10	8	7	11	8	9	23
37		11	4		14	9	11	20	12	14	8
38		15	8		18	10	15	17	16	10	10
39		19	17		23	1	20	14	21	11	18
40		23	3		25	21	24	2	24	18	11
41	July	6	7	July	7	9	6	12	6	20	9
42		16	7		17	8	16	13	16	17	3
43		29	9		30	17	29	12	29	17	5
44	Aug.	16	10	Aug.	18	12	17	2	17	18	6
45		19	5		22	1	20	16	21	8	20
46	Sept.	3	1	Sept.	5	1	4	6	4	12	9
47		13	23		17	9	14	9	15	6	10
48		18	12		20	17	19	3	19	20	34
49		26	8		27	22	26	15	27	12	22
50		28	18		29	21	29	5	29	11	8
51	Oct.	1	9	Oct.	6	11	4	1	4	23	17
52		12	1		14	13	12	23	13	15	10
53		18	7		23	23	21	9	22	17	11
54		27	7		30	9	28	20	29	17	11
55		30	15	Nov.	1	21	31	7	31	22	5
56	Nov.	2	5		4	5	2	13	2	23	9
57		5	6		7	10	6	2	6	17	3
58		10	12		14	10	11	9	12	1	9
59		16	15		18	9	17	3	17	19	6
60		19	16		21	9	20	0	20	14	18
61		21	17	Dec.	24	2	22	8	22	20	5
62	Dec.	25	2		1	8	26	1	26	15	10
63		1	12		5	2	2	12	3	3	16
64		8	8		11	12	8	20	10	14	13
65		12	9		18	9	15	2	15	16	14
66		19	20		28	22	22	5	24	2	11
67		30	1	Jan. (1955)	1	14	30	20	31	9	6