Government Meteorological Observatory.

METEOROLOGICAL Observations at Kelburn, Wellington, for the Month of April, 1931. Observations taken at Altitude of Observatory, 415 ft.

	Date.		Pressure, in Inches, at Sea-level and Standard Gravity.	Temperature (*F.) from Observations at 9 a.m.						m.	Wind.			(100	Ноцгв	at
				In Screen.					Grass.	::	Beaufort Scale.		Anemo- meter.	Points Inch).	! i	(Symbols)
				At 9 a.m.			Maxi- mum.	Mini- mum.		adlatio mum.	'a		3. 24 B.	d	Sunshi Fenths.	
		Dry.		Wet.	Humid- ity.	Dry.	Dry.	Minimum on	Solar Radiation : Maximum.	Direction.	Force.	Run in Hours,	Rainfall, Points	Bright Sunshine and Tenths.	Weather	
			29.900	60.4	53.0	58	66.0	52-1	48.3	 119·8	NW	2	178	Trace	9.7	ъ
			29.803	59.7	57.8	89	$62 \cdot 2$	58.0	57.1	74.3	MNW	4	420	55	0.0	0
	••		29.384	60.9	60.3	96	$62 \cdot 4$	58.0	57.3	69.0	N	7	730	89	0.0	or
	• •		29.727	53.4	53.2	99	61.4	51.6	51.6	122-1	SE	3	445	Trace	6.1	on
	• •		30.202	57.5	53.2	74	61.4	49.0	44.2	120.4	N	3	71	••	6.1	0
	• •		30.162	56-3	52.0	73	62.8	53.4	50.8	115.8	NNW	5	350	·	6.3	a
	• •		30.184	56.7	52-7	75	61.4	49.2	43-1	97.1	Calm		127	161	0.0	0
	• •		29.826	58⋅8	58-6	99	$62 \cdot 3$	52.7	52.0	107.3	Calm		72	21	0.0	QI
	• •		29.763	62.2	58.3	78	$63 \cdot 1$	57.0	56·1	113.9	NW	4	339	1	7.6	Ъ
	••		29.629	56.4	54.2	86	57.0	54.3	51.8	74.5	SSE	3	242	69	0.0	0]
	••		29.468	50.3	48.0	84	50.6	49.8	47.4	64.3	S	7	308	60	0.0	or
		• •	29.917	50.3	45.5	66	$54 \cdot 1$	46.3	45.5	114.7	SSE	5	545	3	6.5	0
			30.154	52.9	46.0	55	$54 \cdot 4$	46.1	42.0	110.2	SSE	4	168	9	9.8	b
	• •		30.505	48.9	45.3	74	$53 \cdot 1$	44.0	42.0	106-9	SSE	5	414		5.4	0
			30.498	53.1	50.2	80	60.7	43.1	35.3	119-2	N	1	99		8.4	c
			30.372	55.1	52.8	85	59.4	51.0	47.8	115.2	NW	4	166		7.0	c
			30.219	58· 4	54.9	79	61.3	54.1	51.1	115.8	NW	5	342		8.9	b
	• •		30.175	59.0	55.9	81	61.9	54.2	51.2	121.1	NW	5	259		7-4	ъ
	• •		30.097	60.6	57.1	80	66.3	55.0	50.4	102-1	NNW	2	318	56	0.2	c
	••		30-022	51.8	51.3	97	54.2	50-9	50.5	100.3	S	5	105	2	0.0	0
	• •		30.344	54·1	49.8	72	56.1	48.7	46·1	113.3	SE	4	258		9.8	b
	••		30.410	51.4	48.0	76	55.3	48.0	44.5	114.7	SE	4	175		6.8	0
	• •	• •	30.318	51.0	48.0	79	56-8	41.2	31.7	122-1	SE	2	98		9.9	b
		• •	30.060	56.8	52.3	72	62.8	42.4	36.8	118-0	N	2	123	1	. 5.2	b
			30.097	51.7	46.8	67	57.6	45.8	43.8	117.4	ENE	1	126		7.0	bo
	••		29.871	55.6	50.5	68	63.9	48-0	43.0	122.1	NNW	2	123		6.8	0
			30.249	52.5	49.1	77	60.0	48.2	44.8	112-1	SE	2	113	• •	8.4	be
			30-229	55.0	5l∙4	76	$62 \cdot 4$	50.1	45.1	117.1	NNW	3	142		6.1	0
	••		30.353	52.4	50.8	89	$56 \cdot 1$	47.2	39-9	80.7	Calm		54	2	0.0	of
	••		29.991	54.0	52-6	91	$55 \cdot 4$	51.0	50-6	67.0	NW .	2	182	30	0.0	0
7	Means, &c.		30.064	55.2	52.0	79	59·4	 50·0	46.7	105-6	<u> </u>	3.2	236	559	149.4	

Mean earth temperature at 1 ft., 57°; and at 3 ft., 58·3°. Number of rain days, 14.

DIRECTION OF WIND. Gale (force Forces N.W. 8 or more). Calm. N.E. S.W. 4 14 3 1 $6\frac{1}{2}$ ł 1 ž l 81

from the south on the 11th. During the former, wind reached a velocity in one gust of 81 miles per hour. Temperature and sunshine below, and cloudiness above, average. Total bright sunshine, 149.4 hours, 45 per cent. of the possible, and nine sunless days. Rainfall at Katori Reservoir, near Kelburn, was 38 per cent. above the mean of previous years. Lightning was seen on the 11th and 12th, and fog was in evidence on six days. Mean dew-point at 9 a.m., 49°; and mean vapour pressure, 0.346 in. Note.—The month was remarkable for two big storms, the first from the north on the 2nd and 3rd, and the second SUMMARY FOR THE MONTH OF APRIL, 1931.

Though the weather for the greater part of the month was fine and mild, with an absence of strong winds, there were three stormy periods in April, and a fourth was commencing at the end of the month. Two of these storms were

of unusual severity.

Temperatures were again below normal. In the North Island the departures were mainly slight, but in the South Island they were considerable. There was a prevalence of southerly winds, and widespread frosts occurred though, except in the South, they were not severe. Most of the heavier rainfalls were accompanied by mild temperatures, and in most districts there has been a rapid growth of grass, and stock are in good condition. It is only from parts of South Canterbury and Otago, where the dry and cold weather has been unfavourable to stock and pastures, that adverse reports have been received.

Over the greater part of the North Island the rainfall was considerably above normal, but deficiencies occurred in the extreme north, in parts of the Thames, Coromandel, and western Bay of Plenty districts, and about Hawke's Bay and Poverty Bay. In the South Island, Golden Bay, Marlborough, and the extreme northern part of Canterbury had considerably above the average, but over the remainder low rainfalls were experienced, especially in Otago and South Canterbury.

The first of the storms referred to above occurred on the 2nd and 3rd. A deep and complicated depression moved from the Tasman Sea on to New Zealand. The variation in pressure in front of it was very rapid, and consequently conditions favoured strong northerly winds. Actually these reached gale force over a wide area, extending from the extreme north to beyond Christchurch. About Cook Strait the most severe northerly gale for many years was recorded. Rain was practically general, but in the Tararua Mountains and where the ranges of northern Nelson and Marlborough faced the wind directly the falls were of unprecedented magnitude. Unfortunately, the total fall was registered at few stations owing to the gauges overflowing or being washed away. Some of the total registrations for the 2nd and 3rd were over 8.75 in. at Collingwood, over 24.05 at Bainham, 16.84 at Karamea, 10.21 at Millerton, 15.15 at Tiroroa, 11.17 at Otira, and 13.55 in. at Yncyca Bay in the Marlborough Sounds. Record floods occurred in the Hutt and Otaki Rivers due to the rain in the mountains. At Nelson and New Plymouth extraordinarily high tides occurred on the morning of the 3rd. Much damage was done, and two lives were lost. An interesting phenomenon was the accumulation of foam on the coast of Westland. In places it was heaped as high as 8 ft. was done, and two lives were lost. An In places it was heaped as high as 8 ft.