

CLIMATOLOGICAL TABLE—Summary of the Records of Temperature, Rainfall, and Sunshine for December 1964—continued

Station	Height of Station Above M.S.L.	Air Temperatures in Degrees (Fahrenheit)								Rainfall in Inches					Bright Sunshine
		Means of		Mean of A and B	Difference From Normal	Absolute Maximum and Minimum				Total Fall	No. of Rain Days	Difference From Normal	Maximum Fall		
		A Max.	B Min.			Maximum	Date	Minimum	Date				Amount	Date	
	Ft.	°F.	°F.	°F.	..	°F.		°F.		In.			In.		Hrs.
Milton ..	60	69.0	49.4	59.2	..	77.4	29	36.2	5	3.06	17	..	0.65	2	..
Balclutha ..	20	67.0	48.7	57.8	..	74.0	30	35.8	6	3.49	15	..	0.47	2	176
Raoul Island ..	126	..	..	..	..	..	..	..	..	..	..	..	..	..	..
Chatham Island ..	157	62.9	52.7	57.8	+2.8	68.3	21	41.4	2	1.24	10	-1.1	0.41	22	191
Campbell Island ..	49	54.0	43.6	48.8	..	63.9	29	31.4	28	2.43	21	..	0.45	6	83
Scott Base, Antarctica ..	45	..	..	24.6	..	35.6	..	2.3	..	..	..	..	..	..	..

Supplementary data, sunshine: Foxton, 211 hrs.

LATE RETURNS

Te Aroha, Nov 1964 ..	40	67.4	52.2	59.8	-1.4	75.0	20, 27	40.0	11	2.50	17	-1.6	0.45	1	..
Kuripapanga, Nov 1964 ..	1,600	64.6	46.8	55.7	+2.3*	80.0	27	30.3	14	2.61	10	-1.9*	1.60	1	..
Onawe, Akaroa, Nov 1964 ..	150	65.2	48.2	56.7	-0.4	82.0	26	40.0	10, 12, 13	3.80	14	+1.3*	0.75	21	152
Temuka, Nov 1964 ..	80	62.4	46.2	54.3	..	81.7	26	34.2	10	3.33	13	..	1.09	21	..
Benmore, Otematata, Nov 1964 ..	920	66.1	45.3	55.7	..	75.8	26	31.4	12	1.80	12	+0.5	0.66	21	..
Gore, Nov 1964 ..	230	62.5	44.2	53.4	-0.1	75.0	19	37.0	23	4.70	22	+1.5*	0.86	26	149
Pebble Hills, Nov 1964 ..	138	61.3	47.2	54.2	+0.7*	72.0	1, 19, 20	40.0	7, 12, 13, 14, 23, 30	5.01	21	+1.4*	1.04	8	..

NOTE—An asterisk beside the difference from normal indicates that the figures are based on provisional normals. Rainfall normals refer to the standard period 1921–50. Where observations are not available for the whole period, or where the site of the rain-gauge has been changed, the normals are partly interpolated.

NOTES ON THE WEATHER FOR DECEMBER 1964

General: December was a warm month. In the North Island the warm temperatures with adequate rainfall produced unusually good pasture growth, which was especially appreciated by the dairy farmers. However, the persistent unsettled weather over the North Island in the middle of the month held up haymaking and shearing. In Canterbury and neighbouring areas of Otago and Marlborough rainfall was inadequate and conditions were much too dry.

During the last week, from Christmas Day to the end of the month, most of the country was favoured with good holiday weather—settled, sunny, and warm.

A small local tornado caused some damage at Matangi, near Cambridge, on the 18th.

Rainfall: Rainfall was mainly above average in the North Island and below average in the South Island. The greatest surplus was recorded in the central high country of the North Island, with more than double the average value. The greatest deficiency was recorded in North Canterbury and Banks Peninsula, with less than half the average value.

The month was notable for excessive thunderstorm activity, with some heavy short-period downpours. An exceptional downpour occurred at Rolleston, near Christchurch, in the early morning of the 21st, when 5 inches of rain was reported to have fallen in less than three hours.

Temperatures: Temperatures were above average—by 2–3 degrees in the South Island and by 1–2 degrees in the North Island. The warmest spells were from the 11th to the 17th and the last week.

Sunshine: Sunshine was 20–50 hours below average in Central Otago and the Southern Lakes district; and 10–30 hours below average in Nelson, Manawatu and Wanganui. Northland, Auckland and Waikato together with the Canterbury plains and coast and coastal Otago were favoured with 20–50 hours above average.

Weather Sequence: During the first three days an anticyclone was centred to the north and pressures were low to the south. A trough of low pressure passed slowly north-eastward over the country, and a small secondary depression formed on it. Rain commenced in the west and south of the South Island and spread over nearly the whole of this island; it also extended to the Wellington and Taranaki Provinces and Waitomo. A weaker trough on the 4th affected mainly the West Coast and Southland. On the following day the

weather was fair, under the influence of an anticyclone centred east of Auckland.

From the 6th to the 8th another trough of low pressure associated with a depression to the south crossed the country, while a small depression on it moved over the North Island. General rain was reported, heavy on the West Coast on the 6th and 7th and in the Manawatu-Wanganui-Taranaki area on the 7th. Fair weather prevailed again on the 9th and 10th, with an anticyclone centred at first over the country and later to the east.

During the period from the 11th to the 17th an anticyclone was centred far to the east, and a series of depressions covered the Tasman Sea. Warm moist northerly air brought unsettled conditions with rain especially in northern and western districts. Some thunderstorms were reported, with several intense downpours flooding city streets, as in Wanganui on the 15th, Invercargill on the 16th, and Napier on the 17th. There was very little rain in Canterbury and Otago during this period.

The weather remained very unsettled but a little cooler over the period from the 18th to the 21st as a trough of low pressure crossed New Zealand and a small depression formed over the South Island and drifted north-eastward. Thunderstorms were still reported, especially in the Waikato-Rotorua area; and on the 21st one near Lincoln in Canterbury was accompanied by an exceptional downpour. However, parts of Canterbury and Otago received very little rain.

The weather had cleared in many districts by the 22nd. From this date to the 24th a tropical storm passed to the east of the country, and a weak southerly change brought unseasonably cool temperatures, with snow on Mount Egmont. Some rain was reported, mainly in southern and eastern districts.

During the last week, from Christmas Day to the end of the month, most of the country was favoured with good holiday weather—settled, sunny, and warm. An anticyclone was centred at first over New Zealand and later to the east. However, at times weak troughs brought some rain to Southland, Westland, and Otago; and from the 28th onwards the moist northerly airstream brought considerable rain to the North Island high country, with lighter falls in Bay of Plenty. Thunderstorms affected some areas on the last three days, including Palmerston North, where a downpour was reported.

R. G. SIMMERS, Director.

(N.Z. Met. S. Misc. Pub. 107.)

Reserve Bank of New Zealand

PURSUANT to section 33 of the Reserve Bank of New Zealand Act 1964, the Reserve Bank, acting with the approval of the Minister of Finance, hereby gives notice that as at the close of business on Thursday, 14 January 1965, and until further notice, balances to be maintained in the Reserve Bank by each trading bank shall be equal to an amount which, when added to that bank's holdings of Reserve Bank notes as disclosed in that bank's latest available weekly return of Banking Statistics under the Statistics Act 1955, will be not less than the aggregate

of: 30 per cent of that bank's demand liabilities in New Zealand plus 3 per cent of that bank's time liabilities in New Zealand (excluding wool retention deposits) as shown in the last preceding monthly return furnished by that bank in accordance with section 46 of the Reserve Bank of New Zealand Act 1933.

The balances to be maintained as aforesaid shall be exclusive of any balance held by a trading bank in its wool retention or special fund account at the Reserve Bank.

12 January 1965.

A. R. LOW, Deputy Governor.