

CLIMATOLOGICAL TABLE—Summary of the Records of Temperature, Rainfall, and Sunshine for February 1978—continued
LATE RETURNS AND CORRECTIONS—continued

Station	Height of Station Above M.S.L.	Air Temperatures in Degrees Celsius								Rainfall in Millimetres				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
	Metres	°C	°C	°C	°C	°C		°C		mm		mm	mm		Hrs
Moutere Hills No. 2, June 1977	101	12.1	5.5	8.8	..	15.8	28	1.5	20	93	10	..	31	28	..
Moutere Hills No. 2, July 1977	101	11.6	5.7	8.7	..	14.5	15	2.4	12	109	12	..	38	1	..
Moutere Hills No. 2, August 1977	101	12.1	5.5	8.8	..	16.2	25	1.5	6	103	10	..	29	8	..
Moutere Hills No. 2, September 1977	101	13.0	5.3	9.2	..	17.8	29	1.5	3	38	9	..	13	13	..
Moutere Hills No. 2, October 1977	101	16.0	7.9	12.0	..	23.9	29	3.7	26	140	13	..	37	7	..
Moutere Hills No. 2, November 1977	101	17.3	9.0	13.2	..	26.3	28	4.1	1	42	13	..	18	21	..
Moutere Hills No. 2, December 1977	101	18.9	10.9	14.9	..	23.9	6	5.5	11	108	11	..	49	11	..
Balmoral Forest, January 1978	198	25.0	11.7	18.4	+2.1	31.8	11	6.8	10	24	8	-22	9	19	..
Craigieburn Forest, January 1978	914	21.3	8.5	14.9	+1.8	26.8	25	-0.7	1	57	9	-45	35	19	..
Christchurch, January 1978	7	22.4	13.1	17.8	+1.0	31.4	16	7.1	13	37	6	-14	24	19	..
Lincoln, December 1977	11	21.1	8.4	14.8	-0.1	30.9	4	3.8	21	49	9	-9	18	21	218
Lincoln, January 1978	11	22.8	12.5	17.7	+1.4	31.8	16	5.8	2	43	8	-13	23	19	230
Adair, January 1978	85	22.0	11.6	16.8	+1.4	32.8	16	6.2	1	38	8	-20	12	19	..
Cherry Farm Hospital, January 1978	6	20.4	10.9	15.7	+1.3	30.5	16	4.0	9	28	6	-30	15	18	..
Moa Creek, January 1978	427	24.5	8.5	16.5	+1.8	30.4	24	-0.9	9	33	5	-20	23	18	..
Otautau, January 1978	55	21.0	..	..	..	30.0	27	..	..	26	7	-65	14	11	198
Stewart Island, December 1977	3	16.0	7.4	11.7	..	24.2	28	3.2	11	102	23	..	20	29	..
Raoul Island, November 1977	38	21.9	16.4	19.2	+0.4	24.2	25	13.0	3	23	12	-58	8	26	180
Raoul Island, December 1977	38	23.9	18.9	21.4	+0.9	26.7	22	15.7	16	129	13	+40	32	3	140
Raoul Island, January 1978	38	24.4	20.0	22.2	+0.6	26.1	21	16.3	4	25	7	-66	13	11	175
Totokoitu, Rarotonga, January 1978	9	27.9	22.9	25.4	..	30.0	2	20.0	8	291	24	..	85	27	..
Scott Base, Antarctica, January 1978	16	-4.5	-12.3	-8.4	-3.3	-0.6	5	-18.3	31	..	..	..	..	..	..

The "normal" refers to the present site of the instruments. Standard period for normals is 1941-1970. No normals are available for stations with only short records.

*Indicates that the sunshine recorder is not located at the station but is in the near vicinity.

A rain day is a day with rainfall equal to or greater than 0.1 mm.

Where the extremes of temperature and rainfall have occurred more than once during the month, the date of the first occurrence is given.

NOTES ON THE WEATHER FOR FEBRUARY 1978

General—During February pressures were higher than normal over the whole of New Zealand, with a predominance of winds from a westerly quarter over the South Island, and easterly to the north of the country. The only areas with rainfall totals appreciably above normal were parts of Poverty Bay and Hawke's Bay, the rest of the country experiencing dry conditions for the second successive month. Some areas had substantial rainfalls during the month, but these were mainly of very short duration and did little to relieve the drought conditions. Over the major part of the country this was a warm, dry, sunny month. Farmers throughout most of New Zealand reported that grass growth had been poor during the month and hay was being fed to stock in many areas. Stock had started to lose condition by the end of the month and dairy production in some places was about 60 percent of normal. On the 17th water spouts estimated to be 100 metres high were observed in the Awanui Harbour, Northland.

Rainfall—The only areas with rainfall above normal for the month were parts of Northland, Poverty Bay, and Hawke's Bay. Some stations had totals of between 50 and 100 percent above normal and Gisborne recorded more than 200 percent above. Some parts of Taranaki, Manawatu, Marlborough, and Canterbury had less than 10 percent of their normal rainfall for the month. Severe flooding occurred in Gisborne on the 5th when an exceptionally heavy thunderstorm passed over the area. Between 6 a.m. and 6 p.m. more than 140 mm of rain was recorded at Gisborne Aerodrome. At Taupo on the morning of the 5th, hail 13 mm in diameter was reported to have completely destroyed many gardens in the area.

During the evening of the 16th many suburbs of Auckland were flooded when more than 10 mm was recorded in a period of 2 hours. The southern motorway was littered with stranded cars and many homes were flooded.

At Cromwell, the 14 months from January 1977 to February 1978 inclusive were the driest since records began in 1950. In each of these months the rainfall totals were below normal. For the year 1977 only 67 percent of normal was recorded and for the 14-month period 64 percent.

Temperatures—Apart from some areas in Northland, Southland, and coastal Otago temperatures were above normal by at least 1°C throughout the majority of New Zealand. In parts of Waikato, Bay of Plenty, Central Districts, Manawatu, and Canterbury mean temperatures were above normal by more than 2°C. The warmest days were the 10th and 13th, with cold spells on the 5th, 16th/17th, and 25th/27th.

Sunshine—Sunshine was above normal throughout the country, the largest departures being in Westland and Canterbury. Many stations had 30 percent more sunshine than normal. At Christchurch and Hokitika the highest February totals since the stations began in 1949 and 1964 respectively, were recorded. The total sunshine recorded at Wellington in January and February this year is the highest since records began in 1907.

WEATHER SEQUENCE

The anticyclone that had moved onto the country at the end of January persisted until 3 February. Pressures were low to the north of New Zealand and a trough of low pressure brought isolated rain to many areas as it crossed the country on the 4th and 5th. Some heavy falls were recorded in Taranaki, Hawke's Bay, Wellington, Poverty Bay, and on the Kaikoura coast. Temperatures were very warm in Wairarapa, Wellington, and on the east coast of the South Island at the beginning of the month. A small depression of tropical origin had started to move south, and by the 4th was lying off the Queensland coast. An anticyclone moved onto New Zealand later on the 5th with pressures falling near Tasmania.