TORRENTIAL RAIN IN DECEMBER AT THE AGRICULTURAL COLLEGE AND RESEARCH INSTITUTE, COIMBATORE DURING THE PERIOD 1937 TO 1962

December, being the last month in the northeast monsoon period, is generally not a typical rainy month. The 56 years' (1906 to 1961) average rainfall for this month is only 3.66 cm on 3 rainy days, a rainy day being a day with 2.54 mm and above of rain.

In a period of 56 years (1906 to 1961) the number of occasions of rainfall of 2·54 cm and above on a single day is only 22. In December 1962—upto 6th—one such occasion has been already recorded on 3rd. If the dates of these 23 occasions are examined, it is found that only two occasions have occurred in the third and fourth weeks. Generally heavy rains of 2·54 cm and above on a single day occur only in the first two weeks. Record rainfalls of 8·25, 10·74 and 8·03 cm have occurred in the early part of the first week of December.

At 1910 hrs on 3 December 1962 heavy downpour of rains commenced and lasted till 1950 hours unabated and subsequently with less intensity and intermittingly till 0100 hrs on 4 December 1962, recording a total rainfall of 8.03 cm. In the period of 57 years — 1906 to 1962 — only on two previous occasions rains heavier than 8.03 cm on a day were recorded first on 2 December 1922 (8.25 cm) and next on 2 December 1930 (10.74 cm). But the data on the intensity of rainfall on these occasions are not available as the Casella's self-recording raingauge has been installed in the observatory attached to the Agricultural College and Research Institute, Coimbatore only in 1937. In a period of 26 years (1937 to 1962) such a torrential rain as on 3 December 1962 with an average intensity of 1.27 mm per minute, has not been recorded previously as indicated in Table 1.

TABLE 1

S. No.	Year	Date	Rainfall (mm)	occurrence (hrs)	Intensity of rainfall (mm/min)
1	1938	27 Dec	10.2	1640 to 1845	+
2	1940	11 Dec	27.9	0515 to 0630	*
3	1941	17 Dec	14.7	2130 to 2215	0.33
4	1942	10 Dec	14.5	1945 to 2020	0.41
5	1942	21 Dec	18.3	1700 to 1725	0.73
6	1944	13 Dec	15.2	1430 to 1455	0.61
7	1944	13 Dec	27.7	1600 to 1630	0.92
S	1946	8 Dec	13.7	1935 to 2000	0.55
9	1952	10 Dec	9.4	0015 to 0045	0.31
10	1953	15 Dec	$12 \cdot 5$	2050 to 2120	0.42
11	1954	14 Dec	$25 \cdot 1$	2230 to 2330	0.42
32	1954	15 Dec	19.6	1845 to 1930	0.44
13	1959	1 Dec	$28 \cdot 2$	2145 to 2240	0.51
14	1962	3 Dec	50.8	1910 to 1950	1.27

^{*} Not calculated since the duration is more than one hour

Note—Only years of intensive rainfall in December, as recorded by self-recording raingauge, are given in this statement Such a heavy downpour of rain as on 3 December 1962 is not good for crops from an agriculturist's point of view. Grain setting in dry land cholam will be affected. Likewise pollination will be retarded in the long duration Samba paddy crop in wet lands. In short, in consideration of the present growth phase of the various crops standing in dry gardens and wet lands, the heavy rains of 8.03 cm recorded at 0830 hrs on 4 December 1962 have more malevolent than beneficial effects on crops in the Central Farm, attached to the Agricultural College and Research Institute at Coimbatore.

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