

Report on detailed soil survey and Land Use of Bn2a subwatershed of Upper Bhavani catchment and Ka5 subwatershed of Kundah catchment, Mannarghat taluk of Palghat district, Kerala State.

ABSTRACT

1. Surveyed area : Bn2a subwatershed of Upper Bhavani catchment and Ka5 subwatershed of Kundah catchment, Mannarghat taluk of Palghat district, Kerala State.
2. Total area mapped and reported: 2349 hectares
3. Period of work : May 1985 to June 1985
4. Soil Series mapped and area in hectares covered under each

Sl.No.	Soil series name	Area in hectares			Percentage
		Bn2a	Ka5	Total	
1.	Arali	11 (0.9)	13 (1.1)	24	1.0
2.	Doddagatti	13 (1.0)	7 (0.6)	20	0.9
3.	Gilsi	296 (24.3)	199 (17.6)	495	21.1
4.	Palaiyur	639 (52.4)	701 (62.1)	1340	57.1
5.	Sirakadaru	16 (1.3)	3 (0.3)	19	0.8
6.	Thekpannai	28 (2.3)	48 (4.3)	76	3.2
7.	Vadvani	151 (12.4)	83 (7.4)	234	9.9
8.	Miscellaneous	66 (5.4)	75 (6.6)	141	6.0
Total		1220	1129	2349	100.0

5. Land capability classes:

Class	Area in hectares			Gross Percentage	Soil series
	Bn2a	Ka5	Total		
II	22 (1.8)	17 (1.5)	39	1.6	1. Arali 2. Doddagatti
III	42 (3.4)	13 (1.2)	55	2.3	1. Doddagatti 2. Gilsi 3. Sirakadaru
IV	69 (5.7)	43 (3.8)	112	4.8	1. Gilsi 2. Sirakadaru 3. Thekpannai

Class	Area in hectares			Gross percentage	Soil series
	Bn2a	Ka5	Total		
VI	239 (19.6)	129 (11.4)	368	15.7	1. Gilsai 2. Sirakaderu 3. Thekpannai 4. Vadvani
VII	782 (64.1)	852 (75.5)	1634	69.6	1. Gilsai 2. Palaiyur 3. Vadvani
Misc.	66 (5.4)	75 (6.6)	141	6.0	
Total	1220	1129	2349	100.0	

6. <u>Specific Problematic area</u>	<u>Bn2a</u>	<u>Ka5</u>	<u>Total</u>
1. Moderate erosion on slope above 3% on moderately deep and deeper soil	*964	*921	*1885
2. Severe erosion	*942	*952	*1894
3. Stoniness	* 44	* 56	* 100
4. Rockiness	*905	*814	*1719
5. Shallowness	*179	*131	* 310
Total problematic area	1140	1040	2180

* Indicates more than one problem. But accounted only once in the total problematic area.