

Report on Detailed Soil Survey and Land Use of Td1d, Td1f, Td1h, Td2f, Td2j, Td2k and Td2r Subwatersheds, Tungabhadra Catchment, Gadag and Mundargi Taluks, Dharwad District, Karnataka.

i. ABSTRACT

1. Surveyed area : Td1d, Td1f, Td1h, Td2f, Td2j, Td2k and Td2r subwatersheds of Tungabhadra Catchment, Gadag and Mundargi taluks of Dharwad district, Karnataka.
2. Total area mapped and reported : 20267 hectares.
3. Kind of survey : Detailed Soil Survey
4. Period of survey : December 1989 to April 1990
5. Agro-climatic region : Southern Plateau and Hills Region (No. 10).
6. Agro-climatic zone : Northern Dry Zone (No. 3)
7. Climatic zone : Semi-arid Tropical
8. Soil series mapped and subwatershedwise area under each series :

Sl. No.	Soil Series	(Area in hectares)							Total	Percentage
		Td1d	Td1f	Td1h	Td2f	Td2j	Td2k	Td2r		
1.	Arlihalli	149	15	-	492	343	52	268	1319	6.5
2.	Bennihalli	255	379	-	38	144	5	25	846	4.2
3.	Byalwadagi	-	-	-	288	-	-	-	288	1.4
4.	Dambol	-	-	-	-	47	83	-	130	0.7
5.	Devalapur	-	-	-	43	25	-	-	68	0.3
6.	Dyampur	356	294	564	403	967	272	248	3104	15.3
7.	Gujunur	-	-	-	180	80	57	-	317	1.6
8.	Kuknur	57	60	122	-	-	-	127	366	1.8
9.	Lakshmapur	102	122	188	-	-	-	42	454	2.3
10.	Mainahalli	606	688	608	981	825	523	657	4888	24.1
11.	Narayanpur	-	-	-	-	87	-	-	87	0.4
12.	Sompur	86	330	70	124	-	3	408	1021	5.0
13.	Thimmapur	395	984	1344	623	775	1086	736	5943	29.3
14.	Wadagenahalli	-	-	18	-	50	-	-	68	0.3
Sub total		2006	2872	2914	3172	3343	2081	2511	18899	93.2
Misc. lands		112	194	159	196	366	203	138	1368	6.8
Grand Total		2118	3066	3073	3368	3709	2284	2649	20267	100

9. Area under different land capability classes

Sl. No.	Land capability class	Area in hectares	Percentage	Name of the soil Series
1.	II	6386	31.4	Bylawadagi, Dambol, Devalapur, Dyampur, Gujunur, Kuknur, Lakshmapur, Thimmapur
2.	III	10360	51.1	Arlihalli, Devalapur, Dyampur, Gujunur, Mainahalli, Thimmapur, Wadagenahalli
3.	IV	1954	9.7	Bennihalli, Mainahalli, Sompur
4.	VI	199	1.0	Bennihalli, Narayanpur, Sompur
	Misc. lands	1368	6.8	-
Total		20267	100.0	

Miscellaneous lands include the area under village sites, river, streams, road, railway lines etc.

10. Salient features and specific problematic areas :

a) The surveyed area covers an area of 20267 hectares, comprises 22 villages under Gadag and Mundargi Taluks of Dharwad district, Karnataka.

b) Fourteen soil series are met within the surveyed area but only Dyampur, Mainahalli and Thimmapur series are relatively extensive.

c) Area having very deep soils and above 1% slope affected by severe erosion is 17 hectares (0.1%).

d) Area having very deep soils and above 3% slope affected by moderate erosion is 2408 hectares (11.9%).

e) Area having moderately deep to deep soils and above 1% slope affected by severe erosion is 199 hectares (1.0%).

f) Area having moderately deep to deep soils and above 3% slope affected by moderate erosion is 7051 hectares (34.8%).

g) Area under very deep soils having moderate condition of salinity is 317 hectares (1.6%).

h) Area having root zone limitations due to shallow rooting depth is 1794 hectares (8.9%).