For Official Use Only

No.: 47



technical bulletin

DEPARTMENT OF AGRICULTURE, GUJARAT STATE, AHMEDABAD-6

Ву

R. G. Desai (S. S. O.)

M. D. Patel (A. S. S. O.)

G. V. Patel (Asstt. Soil Chemist)

M. A. Patel & D. B. Patel (Agri. Sup.)

Detailed Soil Survey Report of VARSODA Ravine Reclamation Project District: Mehsana

CONTENTS

How to use and read Soil Survey report

			Page	No.
		Introduction	1	
		Object	1-2	
Section—I	General	description of the area	2-4	
		(a) Location and extent	2	
		(b) Physiography relief and drainage	2	
		(c) Formation of ravines	3	
		(d) Geology	3	
		(e) Hydrology	3	
		(f) Climate	3–4	
		(g) Natural vegetation	4	
Section—II(A) Agriculture and present land use practices				
		(a) Land use	5	
		(b) Agriculture	5	
		(c) Irrigation	5	
		(d) Crop rotation	5	
		(e) Pasture and grazing	5	
		(f) Manures and fertilizers	6	
Section—II(B) Socio-Economic conditions			6	
		(a) Occupation	6	
		(b) Communication and transport	6	
		(c) Health service and education facilities.	6	
		(d) Animal Husbandary and live stock	6	
Section—III	Soils of 1	the area	7-15	
•		(a) Method of Soil Survey	7	
		(b) Soil formation	7–8	
		(c) Soil classification	8	
		(d) Soil series	9	
		1. Lawarpur-I Series	9–10	
		2 Rangpur-I ,,	10	
		3. Lawarpur-II ,,	11	
		4. Rangpur-II ,,	11-12	
		5. Ratanpur-I ,,	12-13	
		6. Ratanpur-II ,	13	
		7. Firozpur "	14-15	
·		8 Sabarmati Ravine bed land	15	
		(e) Distribution of soils under different Soil series and phases.	15	

Section—IV	Soil Survey interpretation	16-29			
	(a) Land capability classification				
	 (b) Description of capabilites units (c) Ravine redamability classification (d) Soil and land use suitability (1) Irrigability classes 				
	(2) Soil suitability for hybrid bajra				
	(3) Hydrological soil groups				
	(4) Suitability for irrigated agriculture				
	(5) ,, pasture and forestry	28			
	(6) ,, Ravine reclamation	28			
	(7) " " Habitation	29			
Sectian—V	Specific problems and recommandations	29-30			
	Appendix—I The typifying pedons of soil series.				
	" —II Soil unit list				
	"—III List of explanation of symbols				
	Summary, Acknowledgement				
	References				