Project No. 03-859-037 Client: United States Army Corps of Engineers

Project: Colorado River to Matagorda Bay; Contract DACW64-03-D-0008; Delivery Order 0037

Boring No.	Sample No.	Depth (feet)	Torvane Shear Test (tsf)	Soil Description	USCS	Water Content (%)	Dry Density (pcf)	Liquid Limit	Plastic Limit	Plast. Index	Finer than #200 Sieve (%)	Uconf. Compr. (tsf)	Failure Strain (%)	Failure Type
	6	10-12		Tan and gray LEAN CLAY; sand seams	CL	18.8								
	7	13.5-15		Tan SILTY SAND	SM									
05-32														
	1	0-2		Gray and tan FAT CLAY; few calcareous nodules	CH	61.3								
	2	2-4	0.06	Brown and gray FAT CLAY	CH	110.3		96	27	69				
	3	4-6	0.05	Brown and gray FAT CLAY	CH	95.1								
	4	6-8		Olive gray FAT CLAY; traces of shells	CH	34.0	87.0					0.21	13.0	Bulge
	5	8-10		Olive gray LEAN CLAY; sand pockets and few shells	CL	29.4	96.3	34	18	16		0.30	14.5	Bulge/Vertical Shr
	6	10-12		Tan and gray LEAN CLAY; sand seams	CL	22.3								
	7	12-14		Gray and tan LEAN CLAY; sand seams and traces of ferrous nodules	CL	18.7								
	8	14-15		Gray and tan FAT CLAY; sand seams	CH	23.7								
05-33														
	1	0-2		Gray CLAYEY SAND	SC						21.8			
	2	2.5-4		Gray CLAYEY SAND	SC						25.4			
	3	4-6		Olive and gray FAT CLAY with SAND; organics	CH	95.6								
	4	8.5-10		Tan SILTY SAND	SM						14.9			
	5	13.5-15		Tan POORLY GRADED SAND with SILT	SP-SM						10.4			
05-34														
	1	0.5-2		Brown and gray FAT CLAY	CH	89.9								
	2	2-4	0.06	Brown and gray FAT CLAY	CH	74.0								
	3	4-6	0.05	Olive gray LEAN CLAY; sand seams and traces of shells	CL	30.3		26	15	11				
	4	6-8	0.12	Olive gray FAT CLAY; sand seams and traces of shells	CH	29.6								
	5	8-10		Olive and gray FAT CLAY; silt seams	CH	33.7	92.7					0.15	14.5	Bulge
	6	10-12		Olive and gray FAT CLAY with SAND	CH	33.4								
	7	12.5-14		Gray FAT CLAY with SAND; little shells	CH	33.2								
	8	14-15		Brown and gray FAT CLAY; sand seams	CH	34.7								
05-35														
	1	2.5-4		Olive gray SILTY SAND; traces of shells	SM						22.2			
	2	4.5-6			CL			27	16	11	60.2			
	3	8.5-10			CL			27	15	12	65.5			
	4	10-12		Olive gray FAT CLAY; sand seams and traces of shells	CH	32.9	88.8					0.25	6.1	bulge
	5	12-14		Olive gray FAT CLAY; sand seams and traces of shells	CH	39.7	81.0					0.13	3.8	bulge
	6	14-16		Olive gray FAT CLAY: traces of shells	CH	36.8								
Grab Samples														
	A-58	Surface			CH	148.6		74	23	51	94.8			
	A-59	Surface			CH	152.6		85	24	61	95.1			
	A-60	Surface			CH	155.1		80	24	56	94.6			
	A-61	Surface			CH	186.2		91	25	66	89.2			
	A-62	Surface			CH	201.4		87	24	63	95.0			
	A-63	Surface			CH	145.2		65	22	43	87.7			

Our letters and reports are for the exclusive use of the CLIENT. This document shall not be reproduced, except in full, without our prior written approval.