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
05-26														
	1	0-2	0.10	Brown and gray FAT CLAY; sand pockets	CH	76.5								
	2	2-4	0.09	Olive gray LEAN CLAY with SAND; sand seams	CL	26.4		36	17	19				
	3	4-6		Gray and brown LEAN CLAY; sand seams	CL	23.4	101.9					0.98	5.5	Multi-Shear
	4	6-8		Brown and gray LEAN CLAY; sand seams	CL	19.2								
	5	8-10		Brown and gray LEAN CLAY	CL	20.4	108.8	29	17	12		0.95	4.8	Bulge
	6	10-12		Gray and brown LEAN CLAY; sand seams	CL	19.2								
	7	13-15		Reddish-brown and gray FAT CLAY	CH	36.0								
05-27														
	1	2.5-4		Gray FAT CLAY	CH	74.4								
	2	4.5-6		Gray FAT CLAY	CH	53.8								
	3	6.5-8		Tan and gray CLAYEY SAND; sand pockets	SC						45.6			
	4	8.5-10		Gray and tan CLAYEY SAND; sand pockets with trace of shells	SC						30.7			
	5	13.5-15		Reddish-brown and light gray FAT CLAY	CH	34.5								
05-28														
	1	0-2		Gray FAT CLAY with SAND	CH									
	2	3.5-5		Gray FAT CLAY; traces of shells	CH	80.1								
	3	6-8	0.06		CH	99.7		90	25	65	87.2			
	4	8.5-10		Gray and brown FAT CLAY; sand pockets and few shells	CH									
	5	13.5-15		Brown FAT CLAY; few calcareous nodules	CH	21.0		53	19	34				
05-29														
	1	0-2		Gray SILTY SAND; traces of shells	SM						18.8			
	2	3.5-5		Gray FAT CLAY; traces of shells	CH									
	3	6.5-8		Brown and gray SANDY LEAN CLAY; few shells	CL						53.4			
	4	8.5-10		Reddish-brown and gray FAT CLAY; sand pockets and traces of shells	CH						80.8			
	5	13.5-15		Brown SILTY SAND	SM									
05-30														
	1	0-2		Gray FAT CLAY	CH	102.4								
	2	2-4	0.04	Olive gray FAT CLAY; traces of shell	CH	118.2		102	27	75				
	3	4-6	0.09	Olive gray FAT CLAY; some shell	CH	38.0								
	4	6.5-8		Gray CLAYEY SAND; calcareous nodules	CL						68.4			
	5	8.5-10		Tan and gray POORLY GRADED SAND with SILT	SP-SM						11.2			
	6	13.5-15		Tan SILTY SAND	SM									
05-31														
	1	0-2		Gray FAT CLAY	CH	76.8								
	2	2-4	0.05	Brown and gray FAT CLAY; traces of shells	CH	85.5								
	3	4-6	0.05	Brown and gray FAT CLAY; traces of shells	CH	115.5		107	26	81				
	4	6-8		Gray and tan FAT CLAY with SAND; traces of ferrous nodules	CH	20.5								
	5	8-10		Gray and tan LEAN CLAY; organics and traces ferrous nodules	CL	18.8	108.5	38	19	19		0.52	3.2	Vertical Shear

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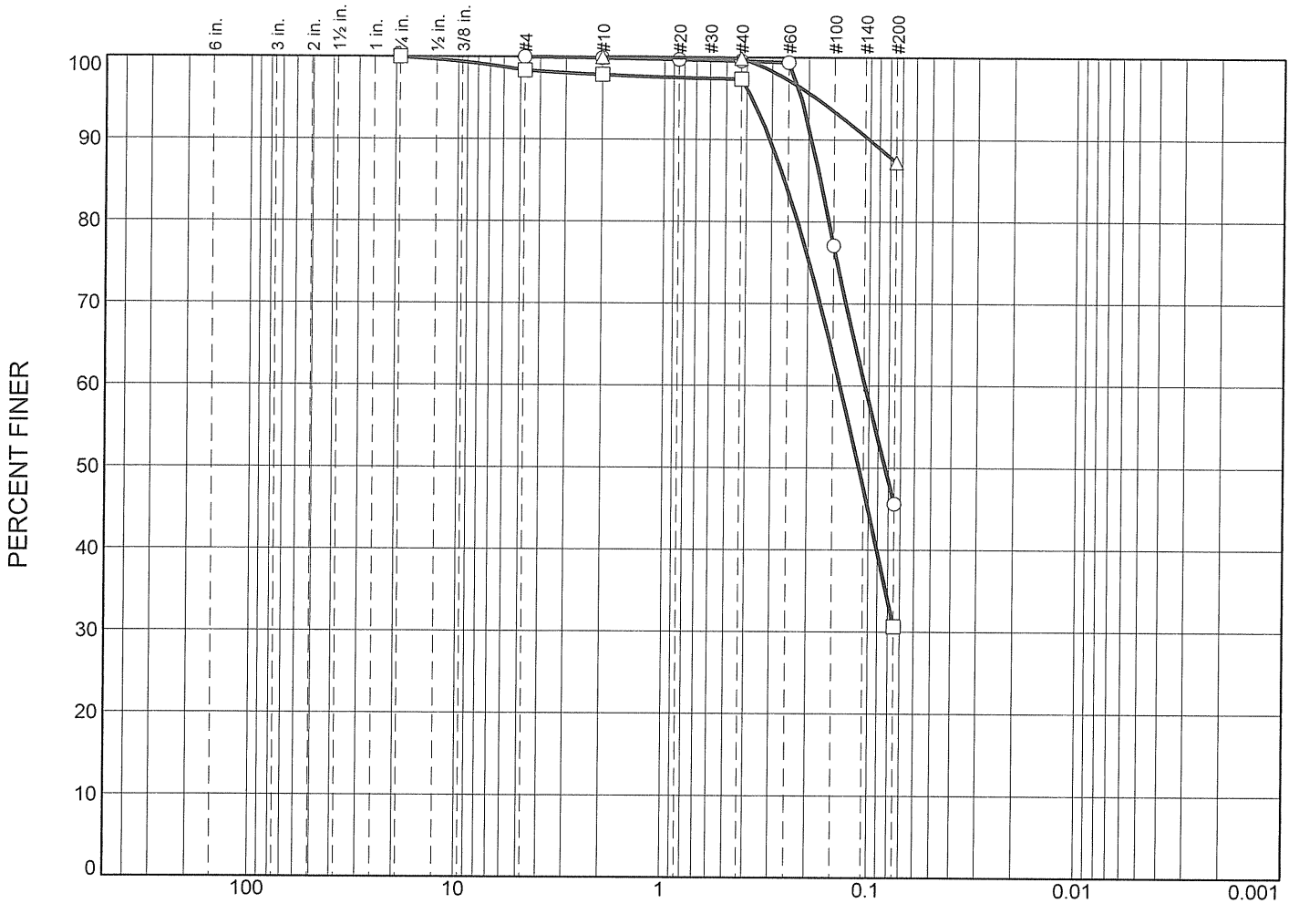
Particle Size Distribution Report (ASTM D 422)



	% +3"	% Gravel		% Sand			% Fines	
		Coarse	Fine	Coarse	Medium	Fine	Silt	Clay
○	0.0	0.0	0.0	0.1	0.3	54.0	45.6	
□	0.0	0.0	1.6	0.5	0.5	66.7	30.7	
△	0.0	0.0	0.0	0.0	0.1	12.7	87.2	

SOIL DATA

SYMBOL	SOURCE	SAMPLE NO.	DEPTH (ft.)	Material Description	USCS
○	05-27	3	6.5-8	Tan and gray CLAYEY SAND; sand pockets	SC
□	05-27	4	8.5-10	Gray and tan CLAYEY SAND; sand pockets with trace of shells	SC
△	05-28	3	6-8		CH

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