U.S. ARMY CORPS OF ENGINEERS
GEOTECHNICAL BORING DATA

13KM

PROJECT NAME Victoria Ship Channel

LOG OF BORING NO. 90-40

LOCATION / STATION 130+00

DATE / TIME STARTED 05/14/90 @ 10:00 am
DATE / TIME COMPLETED " " 11:15 "

TIDE ELEVATION + 2.00' MLT DATUM

WATER DEPTH 2.50' -.50

DEPTH FROM WATER SURFACE
TO BOTTOM OF BORING 27.00'

WEATHER Clear & Sunny

DRILL RIG MANUFACTURE
MODEL NO. CF-5

DRILLER Dempsey Seaman
LOGGER Arid Lazaridis

DRILLER'S / LOGGER'S COMMENTS —

BORING NO. 90-40 DATE: BEGIN 06/14/90 COMPLETE 06/14/90
JOB NO. 146404 LOGGER Aris PAGE 2/3
PROJECT Victoria Ship Channel
LOCATION/STATION/ELEVATION: Sta. 160+00 / El. +2.0 MLT

DEPTH: AUGERED _____ WASHED 24.5' CORED _____

GROUNDWATER READINGS

TIME	DEPTH	TIME	DEPTH	TIME	DEPTH
FIRST					

DEPTH, FEET	SAMPLE	SAMPLE NO.	PEN./TORVANE SPT.-BLOW COUNT	CONSISTENCY	COLOR	MINOR	MAJOR	MODIFICATION
0		1	0.50	Soft	L&D/Gray	Silty	CLAY	- 7" sample
		2	0.50	"	"	"	"	- w/ calcareous nodules
5		3	1.50	Stiff	L/Gray & Tan		CLAY	- w/ calcareous nodules & shells
		4	1.50	"	"		"	- w/ calcareous nodules, shells & gray sandy clay layer
		5	2.50	V/Stiff	"		"	- w/ calcareous nodules
10		6	2.00	"	Tan	Silty	"	"
		7	2.50	"	"		"	- w/ calcareous nodules & shells
15		8	3.00	"	"		"	"
		9	2.00	Stiff	"		"	"
		10	2.00	"	"		"	"
20		11	1.75	"	"		"	- w/ calcareous nodules & shells; 9" sample
		12	0.50	Soft	"	Silty	"	- w/ calcareous nodules
25								Bottom of Boring

CONTNUED: ☐ YES ☒ NO

Project : CHANNEL TO VICTORIA
VICTORIA, TEXAS

SUMMARY OF LABORATORY TEST RESULTS

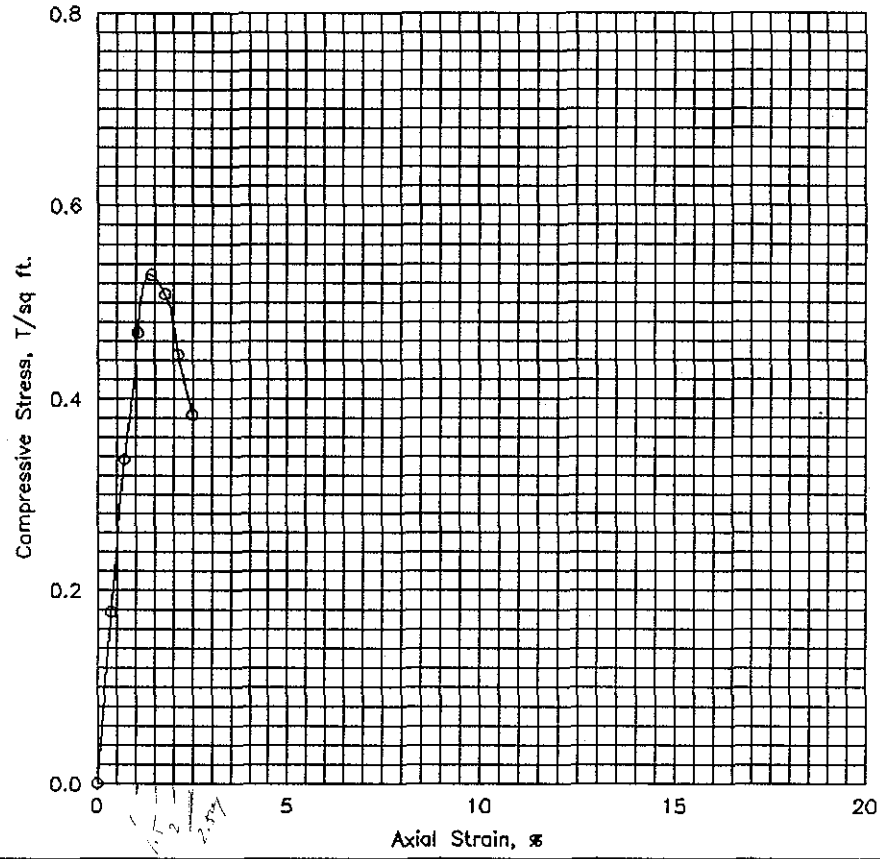
Boring No. 90-40

S #	Depth (ft)	P P (tsf)	SPT Blows per Foot	Visual Classification	U S C	M c (%)	Dry Unit Wt (pcf)	Wet Unit Wt (pcf)	LL (%)	PL (%)	Mechanical Analysis % Passing #4	#10	#40	#100	#200	Torvane Shear Strength (tsf)	q u (tsf)
1	0 - 2			Black and gray, CLAYEY SAND, very loose, with clay seams and shell fragments	SC	27.6											
2	2 - 4			Black and gray, CLAYEY SAND, very loose, with clay seams and shell fragments	SC	14.1	114.4	130.5	43	18	93.5	90.5	87.0	58.4	32.5	0.15	
3	4 - 6	1.50		Light gray and tan, SANDY CLAY, stiff with calcareous nodules	CL	22.6											
4	6 - 8	1.50		Tan and light gray, SANDY CLAY, stiff, with calcareous nodules	CL	20.3	107.9	129.8	38	17	84.7	84.5	83.7	82.3	73.7		0.53
5	8 - 10	2.50		Tan and light gray, SANDY CLAY, very stiff, with sand pockets	CL	18.1											
6	10 - 12	3.50		Tan and light gray, CLAY, very stiff, with trace sand	CL	22.2	102.6	125.3	42		97.2	96.6	96.1	95.8	94.7		
7	12 - 14	3.50		Tan and light gray, CLAY, very stiff, with calcareous nodules	CH	26.5											
8	14 - 16	3.50		Tan, CLAY, very stiff, with calcareous nodules	CL	21.3											
9	16 - 18	3.00		Tan and light gray, CLAY, very stiff, with calcareous nodules	CL	18.2											
10	18 - 20	3.00		Tan and light gray, SANDY CLAY, very stiff	CL	20.7											
11	20 - 22	3.00		Light gray and tan, SANDY CLAY, very stiff, with sand pockets	CL	19.0											
12	22.5-24.5	2.50		Tan and light gray, SANDY CLAY, very stiff	CL	20.1											

S # : Sample Number, P P : Pocket Penetrometer Reading, U S C : Unified Soil Classification, M c : Moisture Content
q u : Unconfined Compressive Strength, W O H : Weight of hammer

Job No. 14G404

Failure Sketches



☐ Controlled stress
☒ Controlled strain

Test No.			1			
Type of Specimen			Undisturbed			
Initial	Water content	w_0	20.3 %	%	%	%
	Void ratio	e_0				
	Saturation	S_0	%	%	%	%
	Dry density, lb/cu ft	γ_d	107.9			
Time to failure, min		t_f	1.55			
Unconfined compressive strength, T/sq ft		q_u	.53			
Undrained shear strength, T/sq ft		S_u	.26			
Sensitivity ratio		S_t				
Initial specimen diameter, in.		D_0	2.810			
Initial specimen height, in.		H_0	5.610			

Classification Tan and light gray, Sandy CLAY, firm, with calcareous nodules

LL	38	PL	17	PI	21	G_s	

Remarks

Project CHANNEL TO VICTORIA, TEXAS

Area Channel to Victoria in San Antonio Bay, Texas

Boring No. 90-40 | Sample No. 4

Depth El 6-8 ft | Date 7/30/90

UNCONFINED COMPRESSION TEST REPORT

ENG FORM 1 JUN 65 3659

Geotest Engineering, Inc.