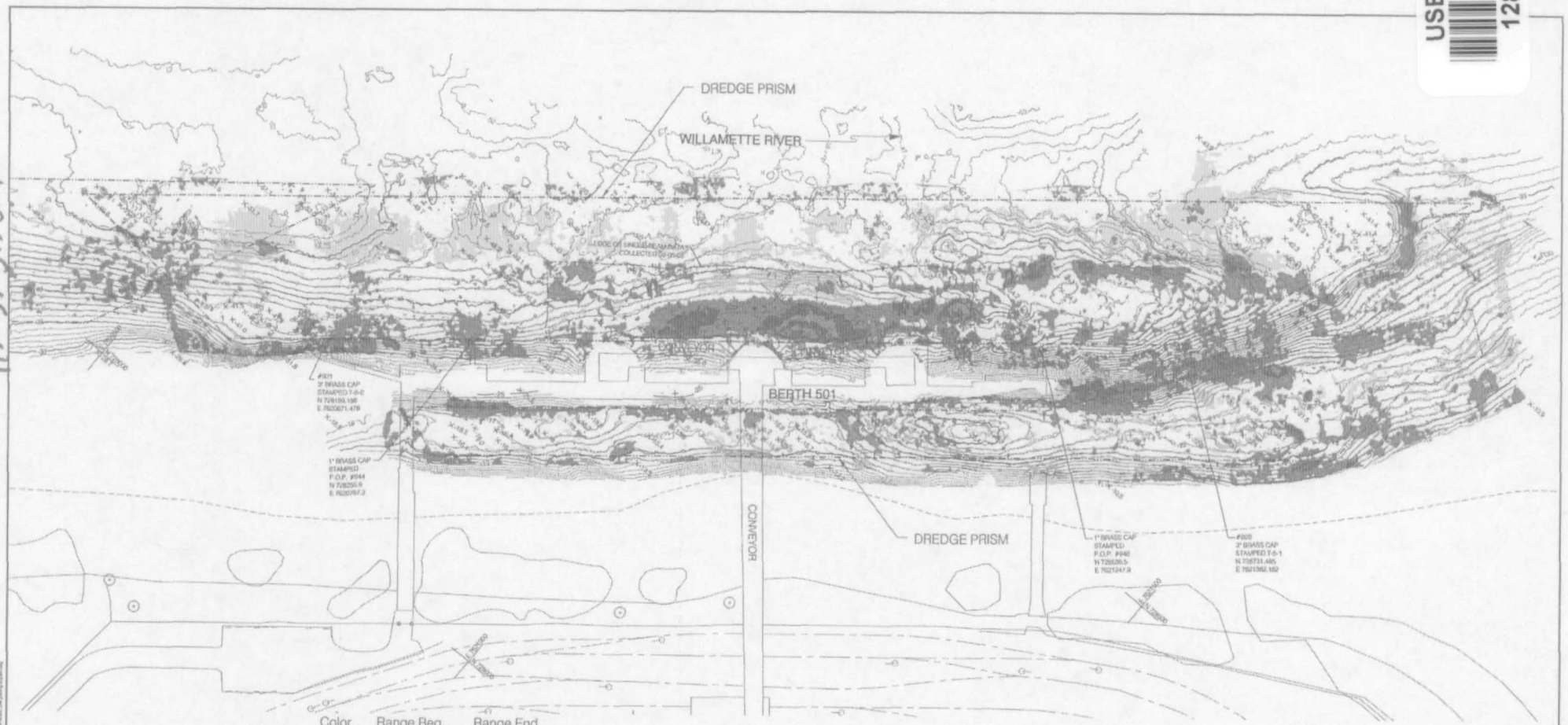
USEPA SF
1286405

PO RSF
11.3.31.5.1



LEGEND:

-10 MAJOR CONTOUR (CONDITION)

MINOR CONTOUR (CONDITION)

-40 MAJOR CONTOUR (2ND POST)

MINOR CONTOUR (2ND POST)

NOTE:
THIS DRAWING IS A COMPARISON BETWEEN THE PRE-GRADING SURVEY (THE 2005 CONDITION HYDROSURVEY) TAKEN 5-27-2005 AND 6-23-2005 AND THE POST-GRADING HYDROSURVEY TAKEN 7-12-2005 AND 8-5-2005.

Color	Range Beg.	Range End
	-5.00	-2.75
	-2.75	-2.25
	-2.25	-1.75
	-1.75	-1.25
	-1.25	-0.75
	-0.75	-0.25
NONE	-0.25	0.25
	0.25	0.75
	0.75	1.25
	1.25	1.75
	1.75	5.00

BERTH 501 PLAN
SCALE: 1" = 50'
1
C-1

AREA	EXISTING	DESIGN	CUT (CY)	FILL (CY)
B501_barge	cond survey	-15crd	24	14,599
B501_barge	cond survey	-16crd	144	12,123
B501_barge	cond survey	-17.43crd	833	9,103
B501_barge	post survey	-15crd	28	14,805
B501_barge	post survey	-16crd	142	12,365
B501_barge	post survey	-17.43crd	825	9,312

AREA	EXISTING	DESIGN	CUT (CY)	FILL (CY)
B501 deepwater	cond survey	-40crd	286	44,966
B501 deepwater	cond survey	-41crd	641	38,515
B501 deepwater	cond survey	-42.43crd	1,897	30,039
B501 deepwater	post survey	-40crd	282	45,000
B501 deepwater	post survey	-41crd	573	38,496
B501 deepwater	post survey	-42.43crd	1,905	29,986
B501 deepwater	2nd post survey	-40crd	231	45,129
B501 deepwater	2nd post survey	-41crd	408	38,501
B501 deepwater	2nd post survey	-42.43crd	1,576	29,937

NO	DATE	BY	REVISIONS	CKD	APPVD	NO	DATE	BY	REVISIONS	CKD	APPVD

PORT OF PORTLAND
PORTLAND, OREGON

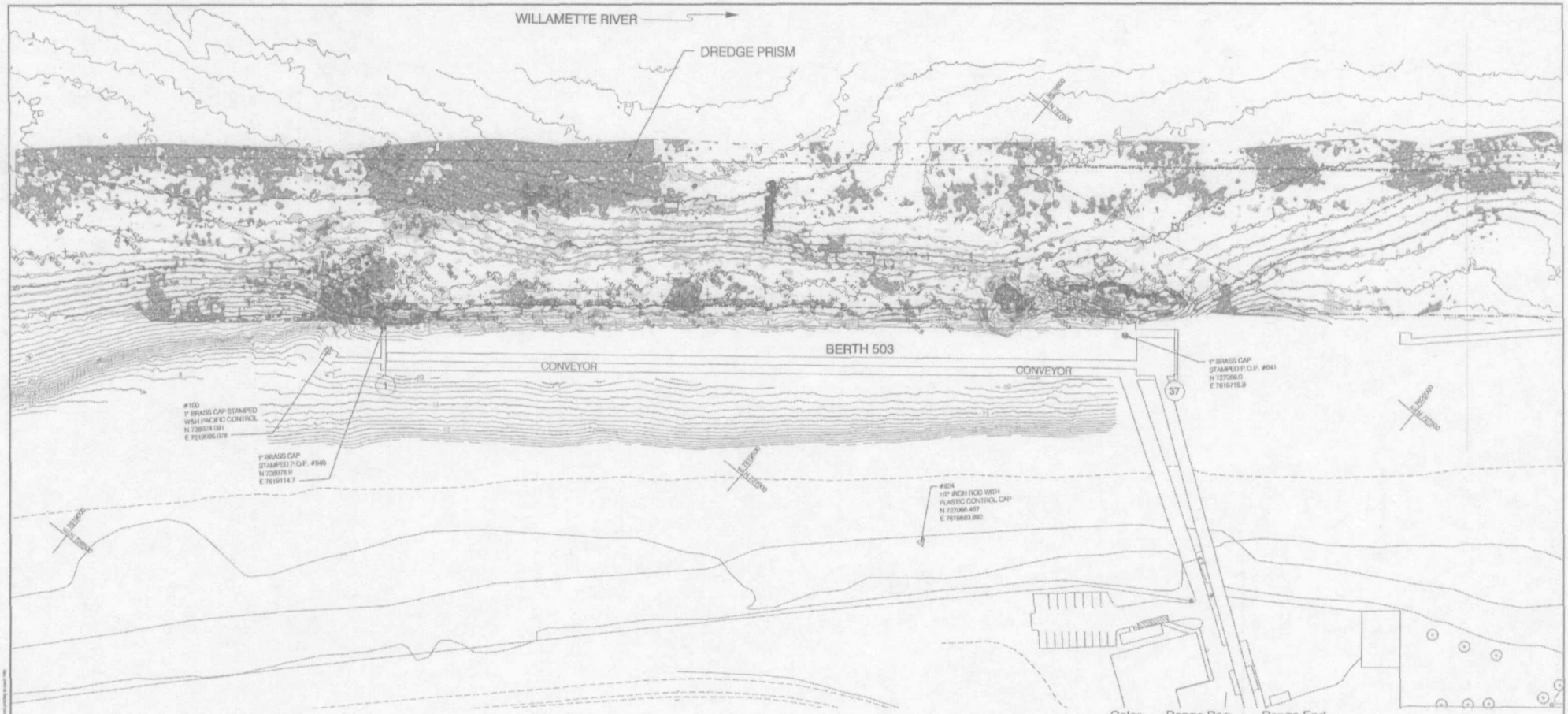
DESIGNED BY
DRAWN BY M. DETTMER
CHECKED BY M. HERMANS
DATE JUL 2006
ISSAPHICAL SCALE BAR

TERMINAL 5

BERTHS 501 AND 503 UNDERWATER GRADING
ISOPACH PRE-GRADING VS POST-GRADING
BERTH 501 PLAN

SUBMITTED BY MARCEL HERMANS
PROJECT ENGINEER

TYPE PD
DRAWING NO T5 2005-2 1/2 (C-1)



BERTH 503 PLAN (1 / C-2)
SCALE: 1" = 50

LEGEND:

- -10 MAJOR CONTOUR (CONDITION)
- MINOR CONTOUR (CONDITION)
- -40 MAJOR CONTOUR (POST)
- MINOR CONTOUR (POST)

NOTE:

THIS DRAWING IS A COMPARISON BETWEEN THE PRE-GRADING SURVEY (THE 2005 CONDITION HYDROSURVEY) TAKEN 5-25-2006 AND THE POST-GRADING HYDROSURVEY TAKEN 7-12-2005.

AREA	EXISTING	DESIGN	CUT (CY)	FILL (CY)
B503	cond survey	-40crd	15	31,741
B503	cond survey	-41crd	290	25,739
B503	cond survey	-42.43crd	1,802	18,273
B503	post survey	-40crd	11	32,079
B503	post survey	-41crd	241	26,031
B503	post survey	-42.43crd	1,783	18,596

Color	Range Beg.	Range End
	-5.00	-2.75
	-2.75	-2.25
	-2.25	-1.75
	-1.75	-1.25
	-1.25	-0.75
	-0.75	-0.25
NONE	-0.25	0.25
	0.25	0.75
	0.75	1.25
	1.25	1.75
	1.75	5.00

NO.	DATE	BY	REVISIONS	CKD	APPVD	NO.	DATE	BY	REVISIONS	CKD	APPVD

PORT OF PORTLAND
PORTLAND, OREGON

2005-0003 (DESIGN NUMBER) 5.00-03 (PROJECT NUMBER)

DESIGNED BY
DRAWN BY M. DETTMER
CHECKED BY M. HERMANS
DATE JUL 2006
GRAPHICAL SCALE BAR 0 1/2" 1" 2"

TERMINAL 5

BERTHS 501 AND 503 UNDERWATER GRADING
ISOPACH PRE-GRADING VS POST-GRADING
BERTH 503 PLAN

SUBMITTED BY MARCEL HERMANS (PROJECT MANAGER)

TYPE PD | DRAWING NO. T5 2005-2 | 2/2 | (C-2)

PORSP 11.3.3.1.5.1

Port of Portland

USEPA SF
1286406

THE PORT OF PORTLAND COMMISSION

JOHN C. CALDWELL — PRESIDENT
WILLIAM E. LOVE — VICE PRESIDENT
G. JOHNNY PARKS — SECRETARY
BLAKE HERING — TREASURER
LLOYD BABLER JR.
JOSEPH M. EDGAR
JOHN A. ELORRIAGA
WILLIAM M. FAST
LEONARD FORSGREN

LLOYD E. ANDERSON, EXECUTIVE DIRECTOR
I. JAMES CHURCH, DEPUTY EXECUTIVE DIRECTOR
ROBERT L. NORDLANDER, DIRECTOR, ENGINEERING SERVICES
CAPT. PETER NORWOOD, DIRECTOR, MARINE

SHEET NO.	DESCRIPTION
1.	VICINITY MAP, PROJECT & SPOIL SITES
2.	PLAN
3.	TYPICAL SECTIONS
4.	TYPICAL SECTIONS
5.	TYPICAL SECTIONS

TERMINAL №5
BERTH 503
DREDGING PROJECT

PROJECT MANAGER

MANAGER, PORT CONSTRUCTION

DIRECTOR, ENGINEERING SERVICES

DIRECTOR, MARINE

AS CONSTRUCTED

PROJECT NO. 29695

DRAWING NO. T5 82-14

T5 BERTH 503 DREDGING PROJECT

NO	DATE	BY	REVISIONS	CK'D	APP'V'D	NO	DATE	BY	REVISIONS	CK'D	APP'V'D
1	10-82	SK	AS CONSTRUCTED								

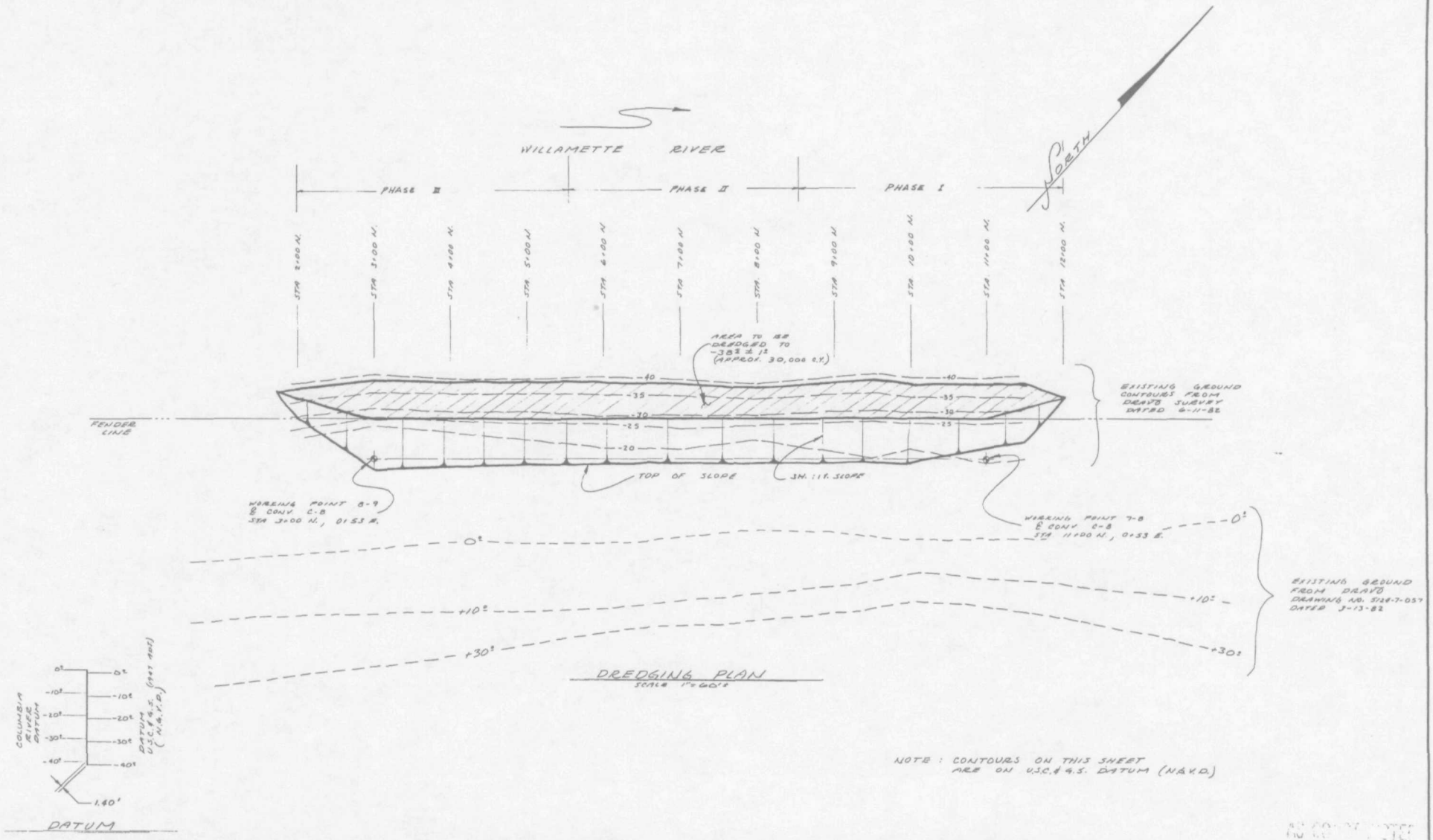
THE PORT OF PORTLAND
PORTLAND, OREGON

REGISTERED PROFESSIONAL ENGINEER 9677 OREGON JULY 12, 1982 HOWARD T. KIDD

DESIGNED BY H.T. KIDD
DRAWN BY D.Y. HARLOW
CHECKED BY H.L. BRINGTON
DATE JULY 1982
SCALE AS SHOWN

TERMINAL NO. 5
BERTH 503
DREDGING PROJECT
VICINITY MAP, PROJECT & DISPOSAL SITES

SUBMITTED BY
Leonard P. Marchant
DRAWING NO. 75-82-14 1/5



NO	DATE	BY	REVISIONS	CK'D	APP'V'D	NO	DATE	BY	REVISIONS	CK'D	APP'V'D
1	10-82	SR	AS CONSTRUCTED								

THE PORT OF PORTLAND
PORTLAND, OREGON

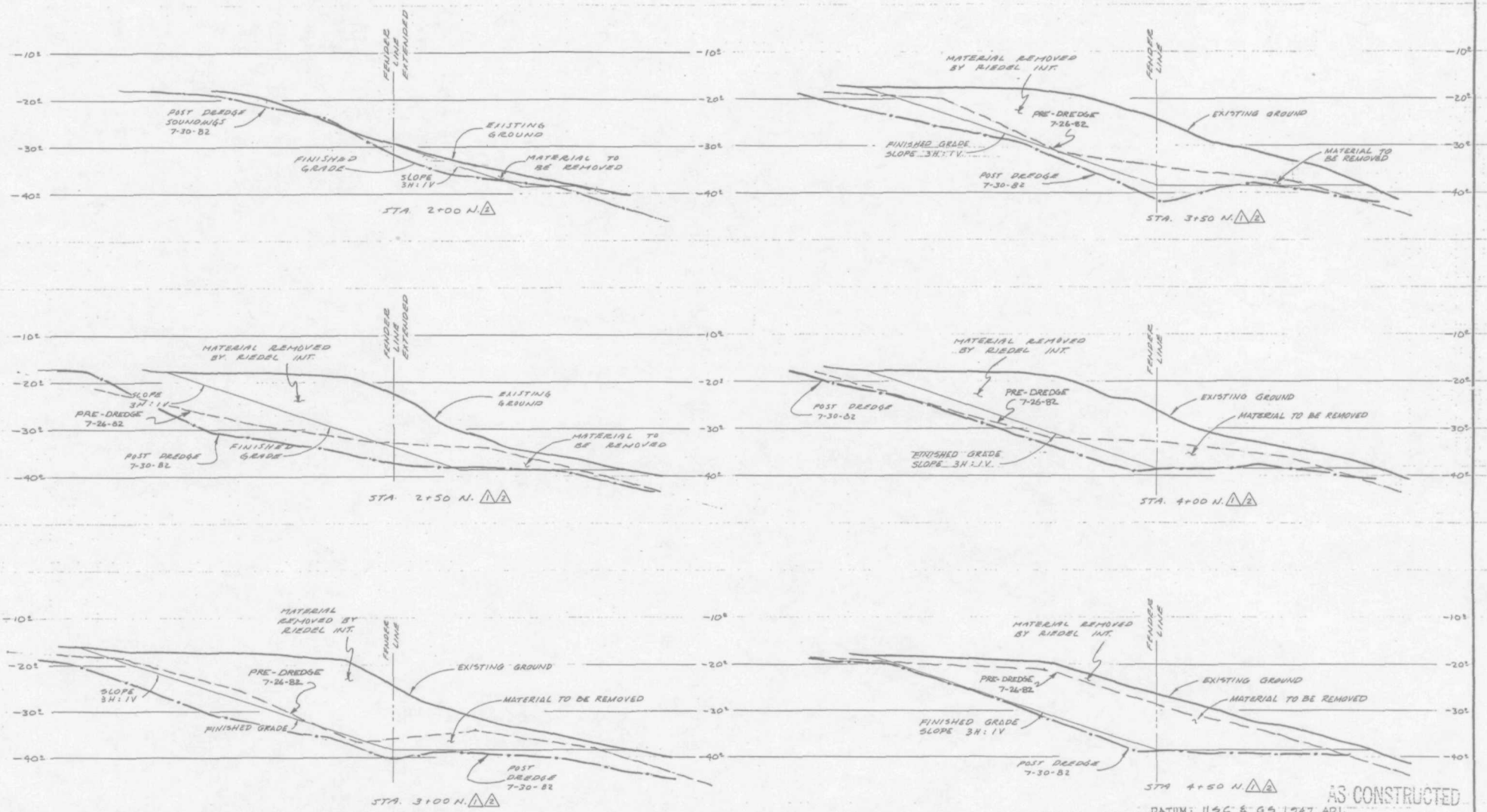
REGISTERED PROFESSIONAL ENGINEER 9677 OREGON JULY 14, 1978 HOWARD T. KIDO

DESIGNED BY H.T. KIDO
DRAWN BY D.V. MARLOW
CHECKED BY M.L. BYINGTON
DATE JULY, 1982
SCALE 1"=60'±

TERMINAL NO. 5
BERTH 503
DREDGING PROJECT
PLAN

SUBMITTED BY [signature] PE NO. 5256 DESIGN MANAGER

DRAWING NO. TS-82-14 2/5



AS CONSTRUCTED

DATUM: USC & GS 1947 ADJ.

NO	DATE	BY	REVISIONS	CK'D	APP'V'D	NO	DATE	BY	REVISIONS	CK'D	APP'V'D
3	10-82	SR	AS CONSTRUCTED								
2	4/1/82	DVW	ADDED POST DREDGE GROUND LINE 7-10-82								
1	7-26-82	CLW	ADDED PRE-DREDGE INFO								

THE PORT OF PORTLAND
PORTLAND, OREGON

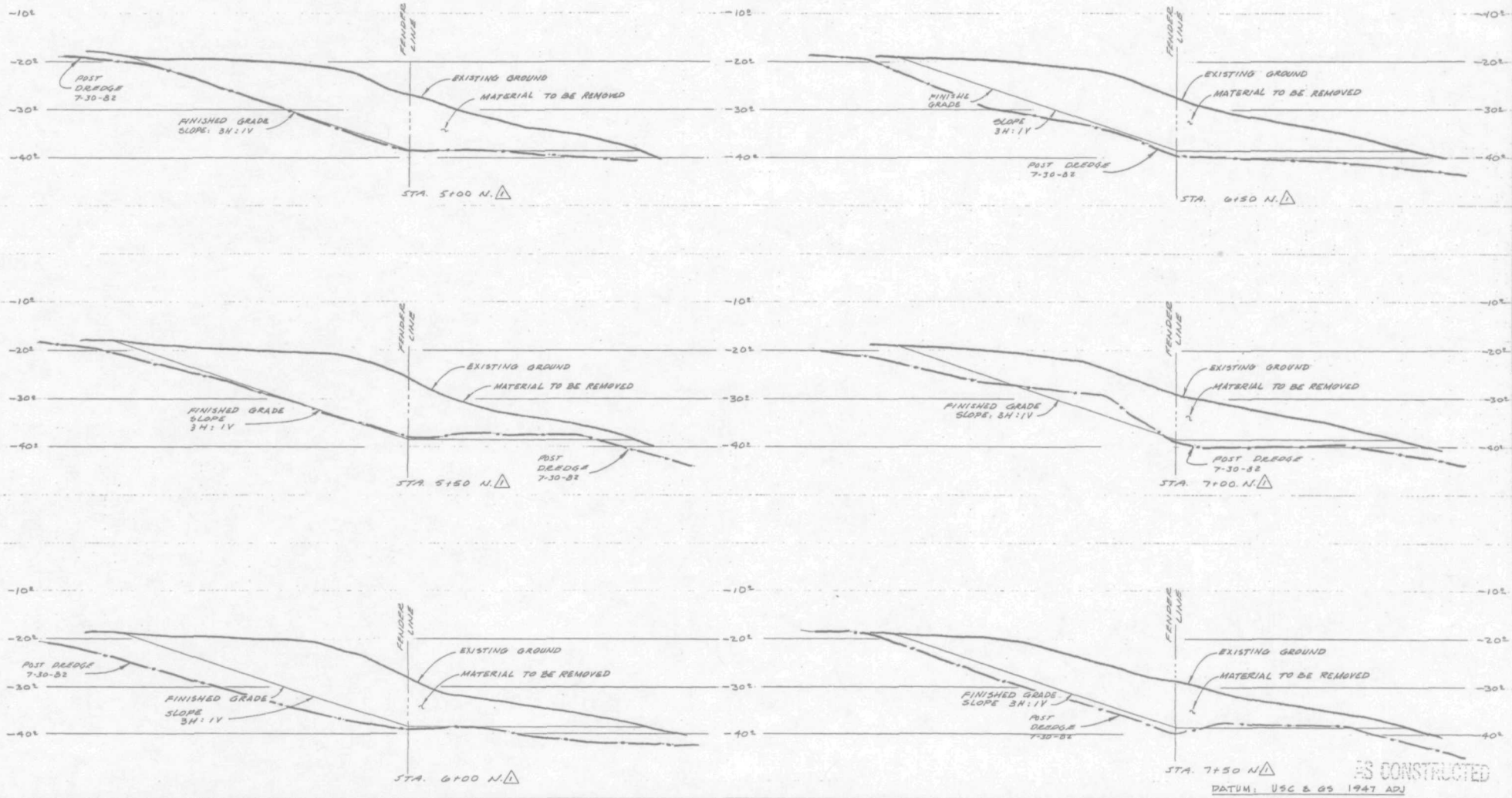
REGISTERED PROFESSIONAL ENGINEER 9677 OREGON JULY 14, 1978 HOWARD T. KIDO

DESIGNED BY H. T. KIDO
DRAWN BY D. V. MARLOW
CHECKED BY M. L. BYINGTON
DATE JULY 1982
SCALE 1" = 10'-0" H.&V.

TERMINAL NO. 5
BERTH 503
DREDGING PROJECT
TYPICAL SECTIONS

SUBMITTED BY
R.E. No 5556 DESIGN MANAGER

DRAWING NO. TS 82-14 3/5 3



AS CONSTRUCTED

DATUM: USC & GS 1947 ADJ

NO	DATE	BY	REVISIONS	CK'D	APP'V'D
2	10-82	SR	AS CONSTRUCTED	WAG	RJK
1	4/5/82	DIN	ADDED POST DREDGE GROUND LINE 7-30-82		WAG

THE PORT OF PORTLAND
PORTLAND, OREGON

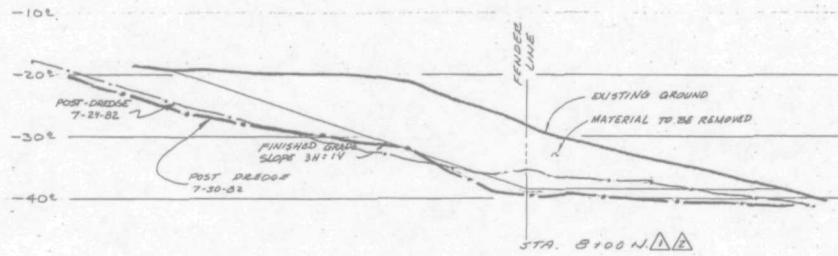
REGISTERED PROFESSIONAL ENGINEER 9877 OREGON JULY 14, 1978 HOWARD T. KIDD

DESIGNED BY H. T. KIDD
DRAWN BY D. V. MARLOW
CHECKED BY M. L. BYINGTON
DATE JULY 1982
SCALE 1" = 10'-0"

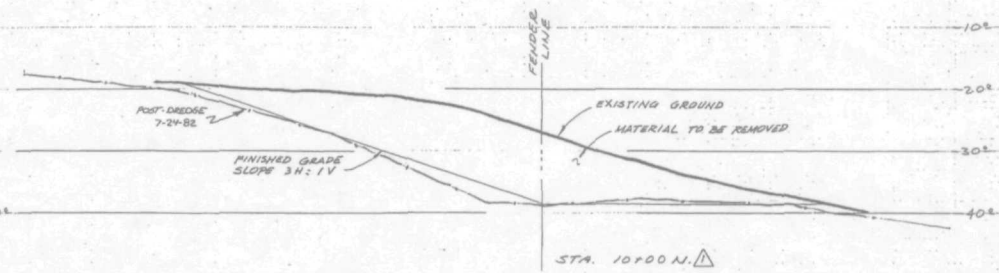
TERMINAL NO 5
BERTH 503
DREDGING PROJECT
TYPICAL SECTIONS

SUBMITTED BY [signature]
P.E. NO. 5556 DESIGN MANAGER

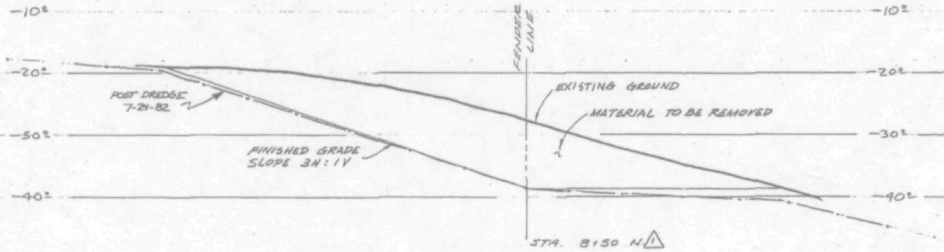
DRAWING NO. TS 82-14 4/5 2



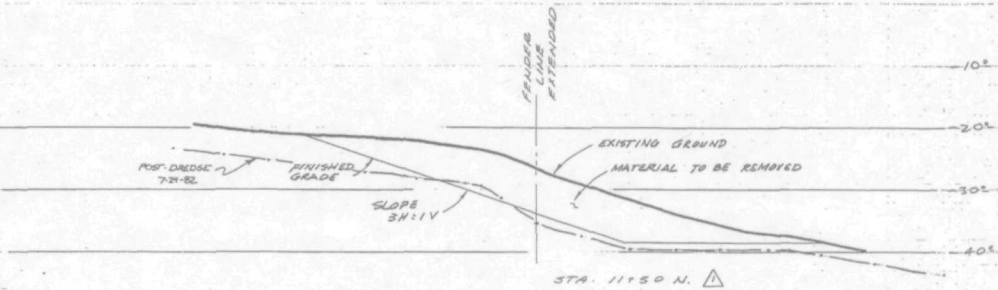
STA. 8+00 N. 1 2



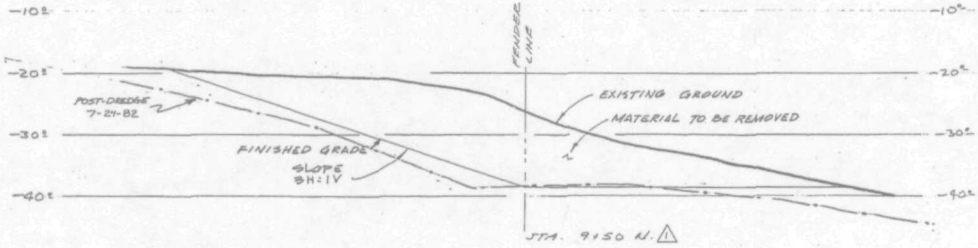
STA. 10+00 N. 1



STA. 8+50 N. 1



STA. 11+50 N. 1



STA. 9+50 N. 1

AS CONSTRUCTED

NO	DATE	BY	REVISIONS	CK'D	APP'V'D	NO	DATE	BY	REVISIONS	CK'D	APP'V'D
5	10-82	SR	AS CONSTRUCTED								
4	8/1/82	DVM	ADDED POST DREDGE GROUND LINE 7-30-82		LKC						
3	7-26-82	DLJ	ADDED POST-DREDGE INFO		LKC						

THE PORT OF PORTLAND
PORTLAND, OREGON

REGISTERED PROFESSIONAL ENGINEER 9877 OREGON JULY 14, 1978 HOWARD T. KIDO

DESIGNED BY	H. T. KIDO
DRAWN BY	D. V. MARLOW
CHECKED BY	M. L. BYINGTON
DATE	JULY 1982
SCALE	1" = 10'-0"

TERMINAL NO 5
BERTH 503
DREDGING PROJECT
TYPICAL SECTIONS

SUBMITTED BY: Howard P. Hilgenfeldt
DENG CHIEF DESIGN ENGINEER

DRAWING NO. TS 82-14 5/5 5