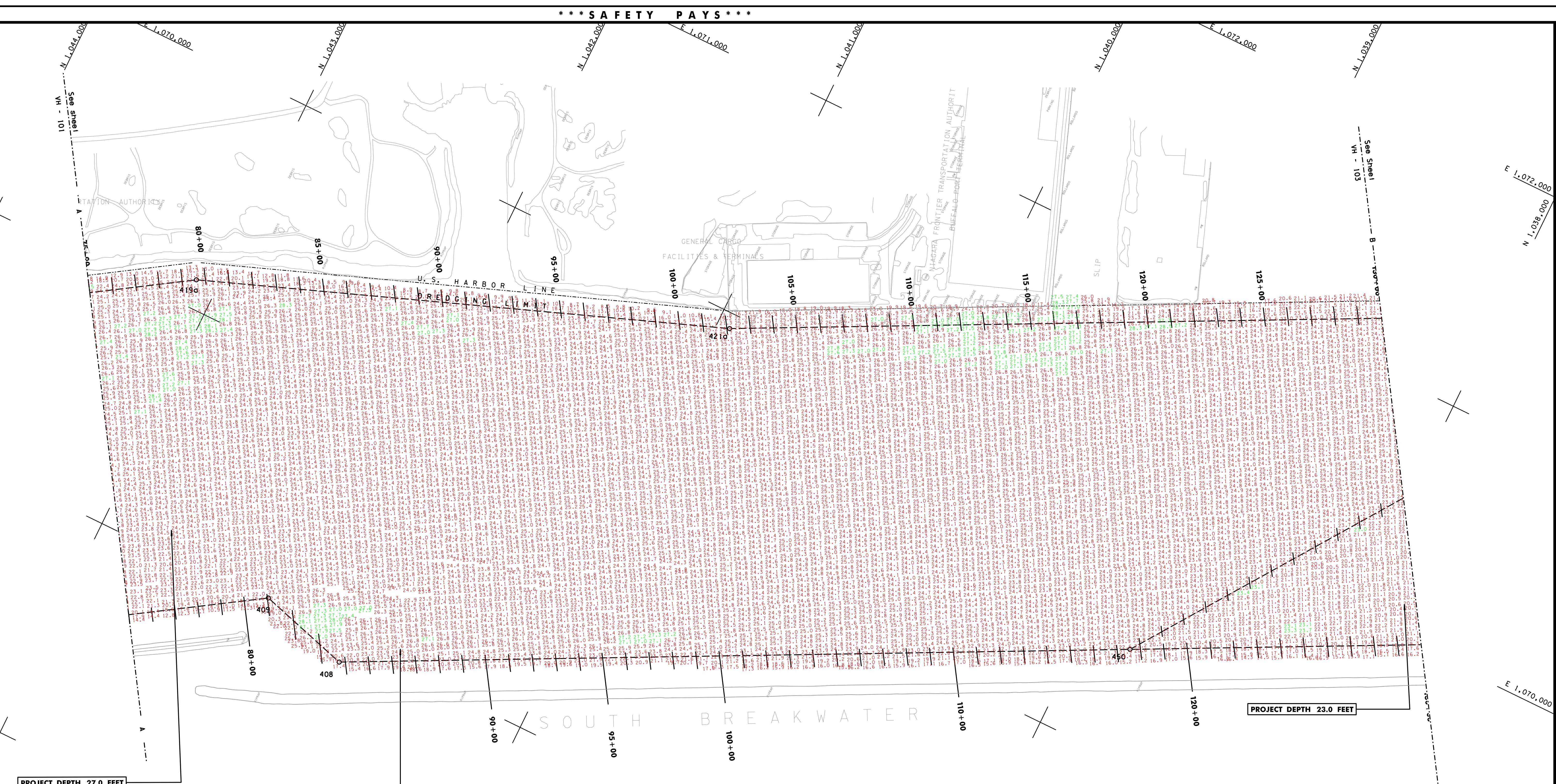


Drawn by:	PAN
Checked by:	ACK
Reviewed by:	Ronan H. Fager III PLS
Approved:	Raymond N. Lewis Chief, NYPA Navigation and Maintenance Section
Date:	April 19, 2012

To view a color version of this map, point a web browser to <http://www.itp.usace.army.mil/monarch/drawings/survey/survey.html>. This drawing was prepared using a CAD system. Scaling may be distorted.

PROJECT CONDITION	SCALE OF FEET
MIDDLE SECTION - OUTER HARBOR	50' = 200'
SOUNDINGS 2011	

Sheet reference number:
VH - 102
Sheet 2 of 3



SITE SPECIFIC NOTES:

1. PROJECT DEPTHS AND SOUNDINGS ARE REFERRED TO LOW WATER DATUM OF 569.2 FEET IGLD 1985.
2. HORIZONTAL CONTROL IS REFERRED TO NORTH AMERICAN DATUM 1983 NEW YORK STATE PLANE COORDINATE SYSTEM - WEST ZONE.
3. PROJECT DEPTH IS 27.0 FEET EXCEPT IN AREA DESIGNATED TO HAVE A PROJECT DEPTH OF 23.0 FEET.
4. THE FILES USED IN THE PREPARATION OF THIS DRAWING ARE ON DISK: HARBOR 2011
BFH1PCVH1012-3.DGN
BFH1PCV-HP.DGN

5. SOUNDINGS WERE TAKEN BY THE BUFFALO DISTRICT ARMY CORPS OF ENGINEERS BY D. BANNING AND PARTY ON MAY 26, 2011 THROUGH NOVEMBER 31, 2011. USING GPS POSITIONING, POS-MV VER.4 AND ASTECH BR2C BEACON USED: YOUNGWOOD 100 KHZ SEABAT 7101 MULTIBEAM SONAR HEAD: 1.50 KHZ BEAMS 210 DEGREE ARC HEAVE PITCH AND ROLL: APPLANIX POS-MV VER. 4 VELOCITY PROFILER: RESON SVP 15 HYPACK SURVEY SOFTWARE SURVEY LAUNCH CROFTY

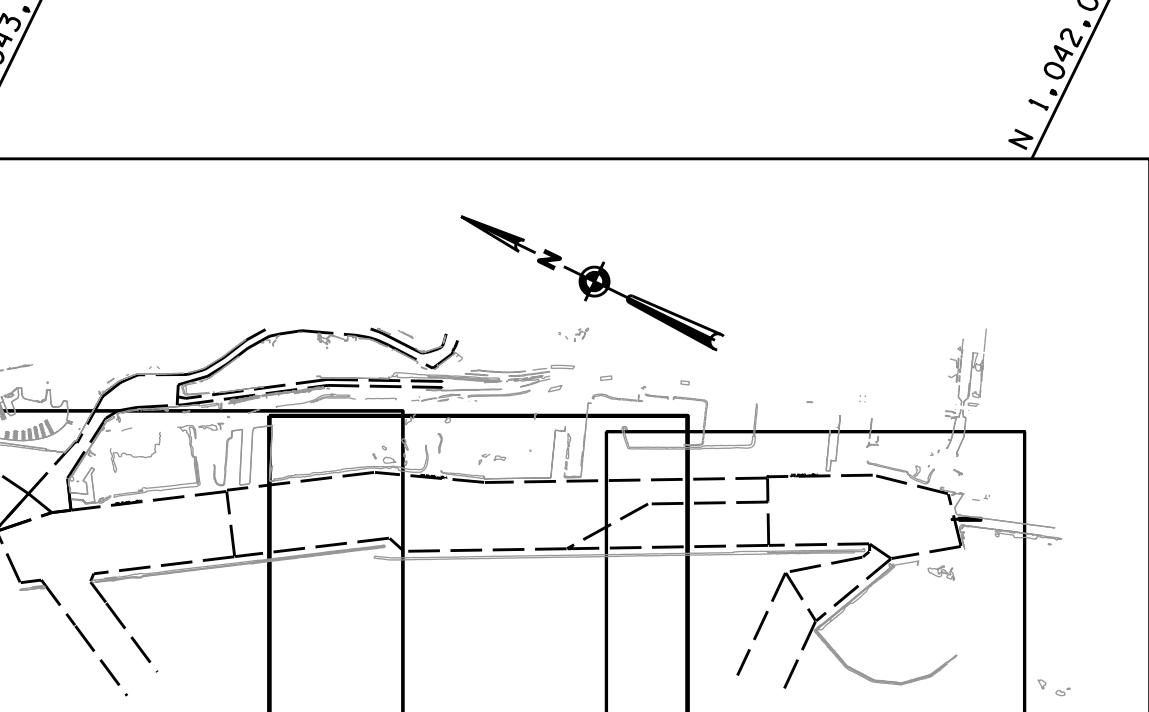
6. THE SOUNDING INFORMATION DEPICTED ON THE MAP REPRESENTS THE RESULTS OF SURVEYS MADE ON THE DATE INDICATED AND CAN ONLY BE CONSIDERED AS INDICATING THE GENERAL CONDITION AT THAT TIME.

7. THE TOPOGRAPHIC INFORMATION IS BASED ON AERIAL PHOTOGRAPHY ACQUIRED FROM 1998 THROUGH 2004.

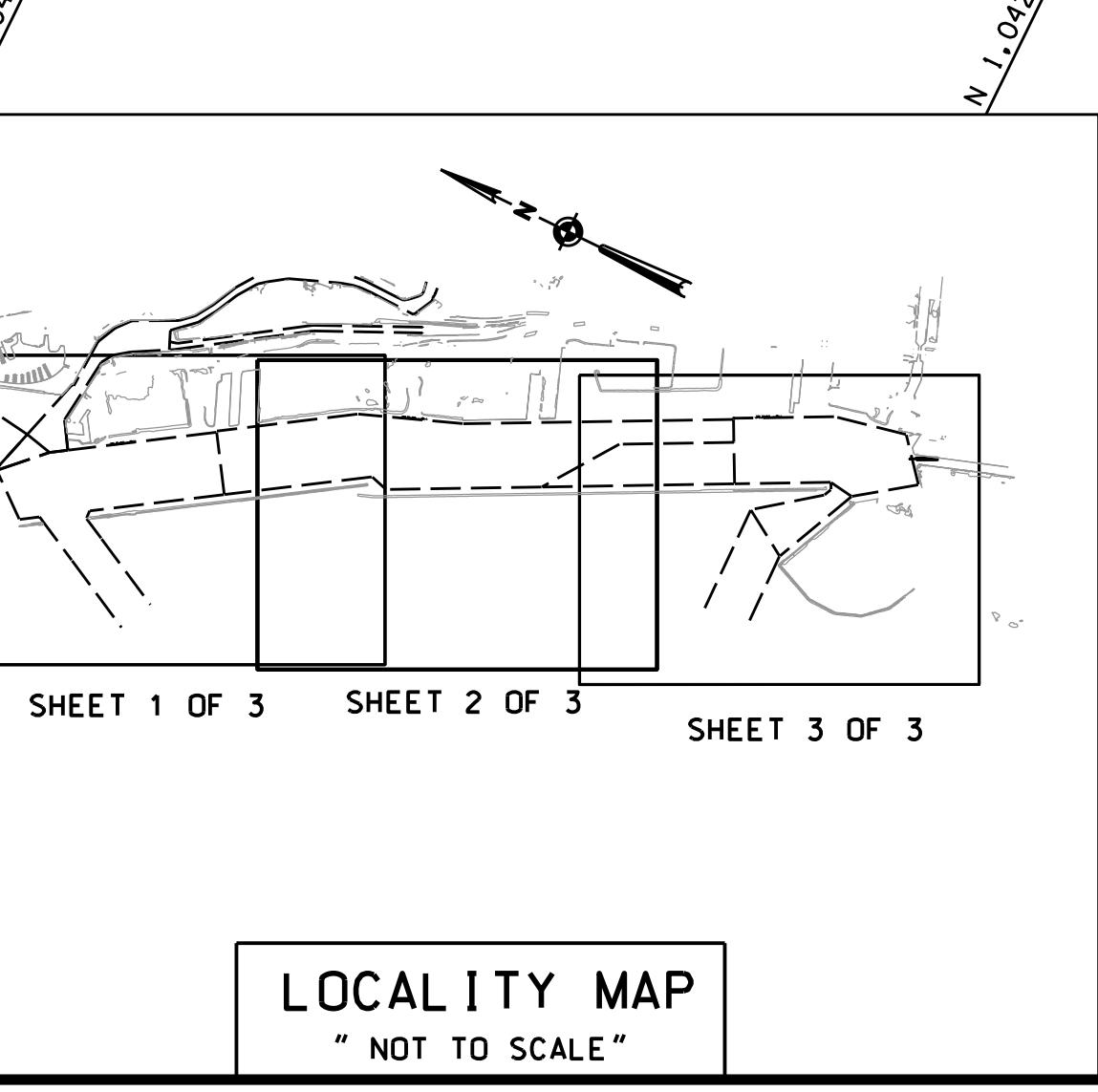
8. THIS SURVEY WAS PREPARED IN ACCORDANCE WITH THE STANDARDS OUTLINED IN CORPS OF ENGINEERS HYDROGRAPHIC SURVEY MANUAL EM 1110-2-1003.

CHANNEL CORNER COORDINATES		
POINT NORTHLING EASTING		
410	1048720.94	1063820.19
409	1042216.78	1068025.78
408	1067911.38	1041822.32
407	1067333.27	1042304.12
406	1067632.27	1072126.00
428	1033100.00	1072126.73
427	1033177.64	1071930.82
S1	1034440.60	1068632.15
S2	1033440.74	1068649.61
405a	1034480.70	1071001.39
404	1033471.91	1070367.28
400	1031431.54	1073091.49
424	1032153.98	1073959.64
422	1033732.71	1073623.05
452	1035693.21	1072628.20
497	1035184.96	106805.91
421a	1034842.43	1068936.57
419a	1033094.46	1069117.25
598	1045639.70	1067435.89
595	1045686.12	1067414.89
592	1048347.21	1064061.84
593	1047426.03	1064657.47
591	1047416.07	1064479.46
590	1044943.33	1066266.11
N1	1045685.32	1062678.24
N2	1045338.58	1063399.58
602	1046931.23	1064227.46
601	1046302.20	1063517.62
415a	1049250.63	1064633.67
418	1049333.64	1064777.65
1610	1048433.97	1065638.72
417	1048768.97	1065421.53
428	1049377.02	1065561.77
426	1049656.72	1064591.13
426a	1049629.05	1064687.23
451	1035045.91	1071352.43
598	1035455.71	1072160.04
599	1037685.12	1071028.75
450	1038790.77	1069450.79

SOUNDING COLOR LEGEND	
■	DEPTHS 0.1' OR MORE ABOVE PROJECT DEPTH
■	DEPTHS AT OR BELOW PROJECT DEPTH



LOCALITY MAP
"NOT TO SCALE"



LEGEND OF SYMBOLS	
17+00	CHANNEL STATIONING
○417	CHANNEL CORNER
H.L.F	HARBOR LINE CORNER
---	FEDERAL CHANNEL
-----	HARBOR LINE
○C	CAN BOUY
○N	NUN BOUY
○L	LIGHTED BOUY
○F	FIXED LIGHT
○A	LIGHT HOUSE
W	LIGHT COLOR WHITE
R	LIGHT COLOR RED
G	LIGHT COLOR GREEN
FL	FLASHING LIGHT
F	FIXED LIGHT
Oc	OCCULTING LIGHT
Iso	EQUAL INTERVAL
AL	ALTERNATING
S	LIGHT CYCLE SECONDS

SHEET 1 OF 3 SHEET 2 OF 3 SHEET 3 OF 3

E 1,064,000 N 1,051,000