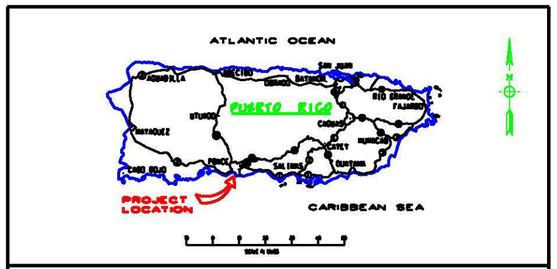
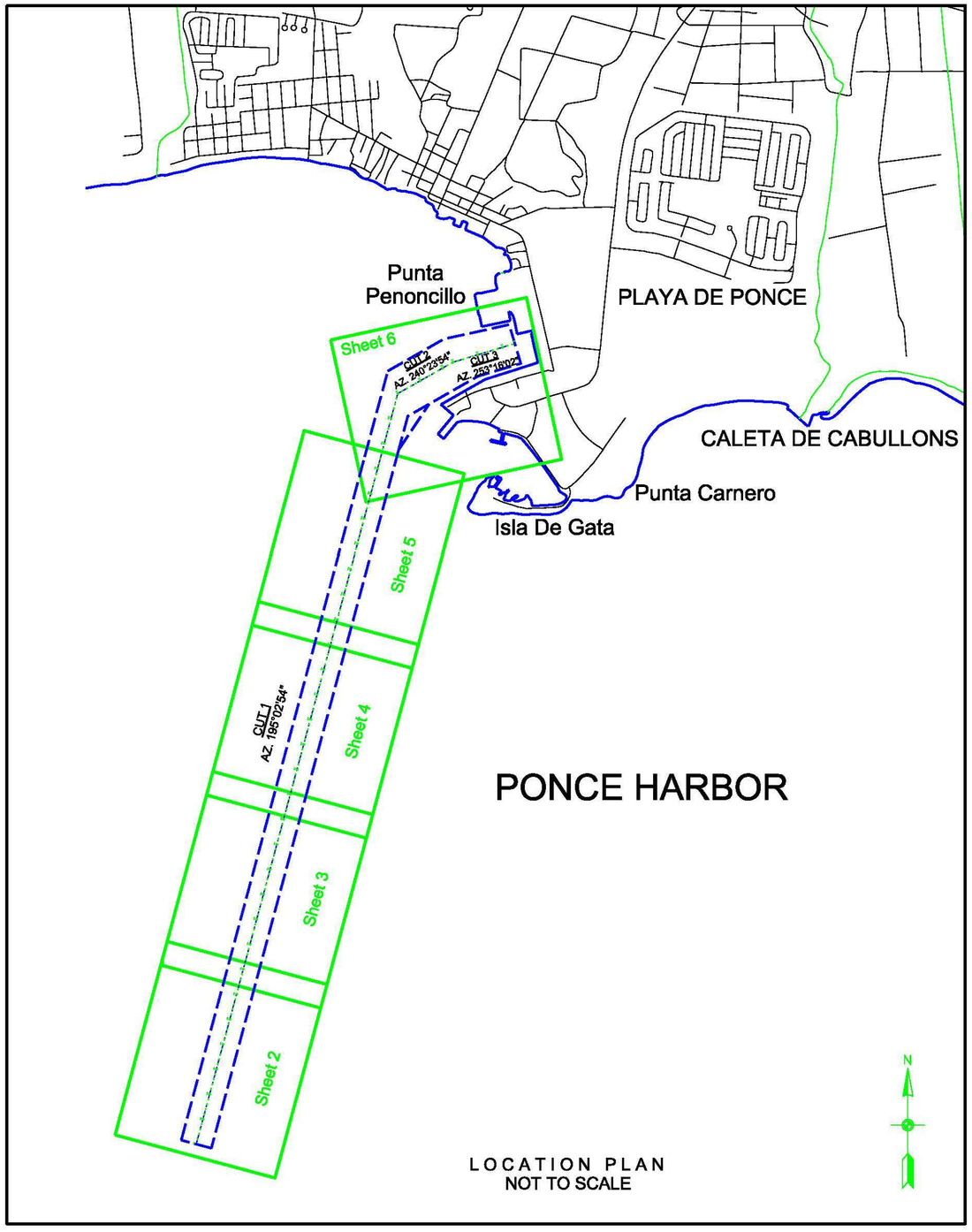
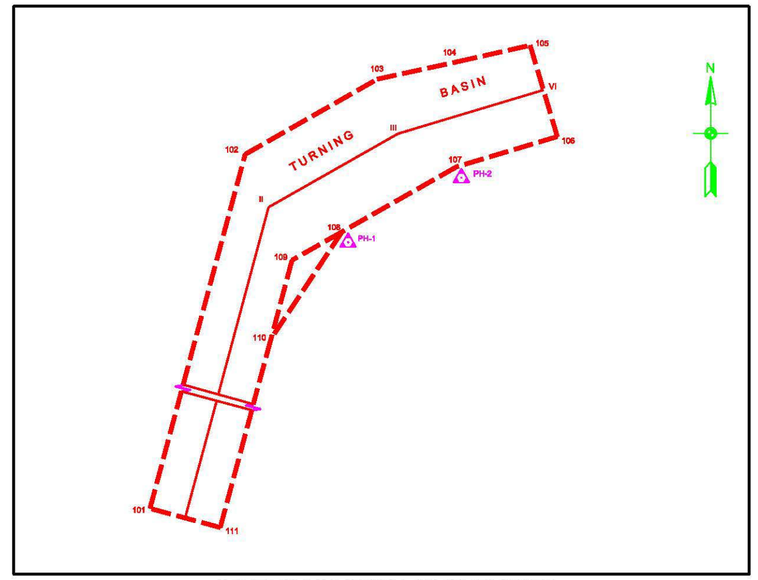
PONCE HARBOR, PUERTO RICO
HYDROGRAPHIC EXAMINATION SURVEY



LOCATION MAP



LOCATION PLAN
NOT TO SCALE



CONTROL LOCATION & CHANNEL LIMITS
NOT TO SCALE

CONTROL COORDINATES			
POINT NAME	NORTHING	EASTING	NGS UNADJUSTED PRVD02 ELEV
PH-1 USE	705412.51	590885.72	5.55
PH-2			5.71

CHANNEL CENTER LINE COORDINATES			
CUT	NORTHING	EASTING	STATION
CUT-1	691212.65	586333.81	0+00
CUT-1	705698.26	590228.32	150+00
CUT-2			0+00
CUT-2	706304.16	591294.83	12+27
CUT-3			0+00
CUT-3	706663.95	592491.59	12+50

CHANNEL LIMIT COORDINATES		
POINT NUMBER	NORTHING	EASTING
101	691290.54	586044.10
102	706134.74	590035.01
103	706752.98	591123.25
104	706897.25	591788.02
105	707031.33	592381.87
106	706280.68	592606.05
107	706031.04	591775.70
108	705496.27	590834.38
109	705261.78	590421.62
110	704615.26	590247.80
111	691134.76	586623.53

SURVEY NOTES:

1. REFER TO SURVEY NO. 13-002.
2. DEPTHS DEPICTED BY THIS SURVEY ARE REFERENCED TO MEAN LOWER LOW WATER (MLLW), TIDAL EPOCH 1983-2001, AS REPORTED BY THE NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION (NOAA). NOAA'S VDATUM MODEL WAS USED AND IS COMPUTED AS 0.27 FEET BELOW PRVD02.
3. ALL ELEVATIONS ARE BELOW THE CHART DATUM UNLESS PRECEDED BY A (+) SIGN.
4. TIDAL REDUCTIONS WERE MADE USING RTK GPS AND CALIBRATED TO THE COMPUTED MLLW HEIGHT OF THE BENCH MARK SPECIFED BELOW:

   COE "PH-1" FOR ENTIRE PROJECT
5. PLANE COORDINATES ARE BASED ON THE LAMBERT CONIC PROJECTION FOR PUERTO RICO AND THE U.S. VIRGIN ISLANDS, NORTH ZONE, AND REFERENCED TO NORTH AMERICAN DATUM OF 1983 (NAD83).
6. ALL AZIMUTHS ARE GRID; RECKONED CLOCKWISE FROM SOUTH.
7. ALL STATIONING REFERS TO THE CENTERLINE OF THE CHANNEL.
8. THIS SURVEY WAS PERFORMED USING REAL-TIME KINEMATIC (RTK) GPS POSITIONING WITH THE FOLLOWING REFERENCE BASE LOCATION:

   REFERENCE BASE LOCATED AT "PH-1" (OPUS PID# TV0001)
9. VERTICAL MEASUREMENTS WERE MADE USING A ROSS MODEL 835 SMART SOUNDER WITH DUAL-FREQUENCY TRANSDUCER. SOUNDINGS SHOWN ARE IN HIGH-FREQUENCY (200KHZ).

VESSEL	DATE OF SURVEY	AREA SURVEYED
SB-38	7 & 9 NOV 2012	CUT-1, 2, 3 & MUNICIPAL PIER

10. AIDS TO NAVIGATION WERE LOCATED DURING THIS SURVEY.
11. THE INFORMATION DEPICTED ON THIS MAP REPRESENTS THE RESULTS OF SURVEYS MADE ON THE DATES INDICATED ABOVE AND CAN ONLY BE CONSIDERED AS INDICATING THE GENERAL CONDITIONS AT THAT TIME. THIS CHART IS SOLELY FOR THE DISTRIBUTION OF AVAILABLE DEPTHS AT THE TIME OF THE SURVEY AND IS NOT TO BE USED FOR NAVIGATION.
12. SURVEY ACCURACY PERFORMANCE STANDARDS, QUALITY CONTROL, AND QUALITY ASSURANCE REQUIREMENTS WERE FOLLOWED DURING THIS SURVEY IN ACCORDANCE WITH USACE EM 1110-2-1003, HYDROGRAPHIC SURVEYING, 1 JAN 02.

US Army Corps of Engineers
Jacksonville District

No.	BYM	ZONE	DESCRIPTION

DESIGNED BY: | DATE: NOV 2012
DWN BY: E.M.W. | CKD BY: | SOLICITATION NO.:
SUBMITTED BY: | CONTRACT NO.:
PLOT SCALE: | PLOT DATE: | FILE NUMBER:
FILE NAME: 13-002-PONCEHBR-VH001.DGN

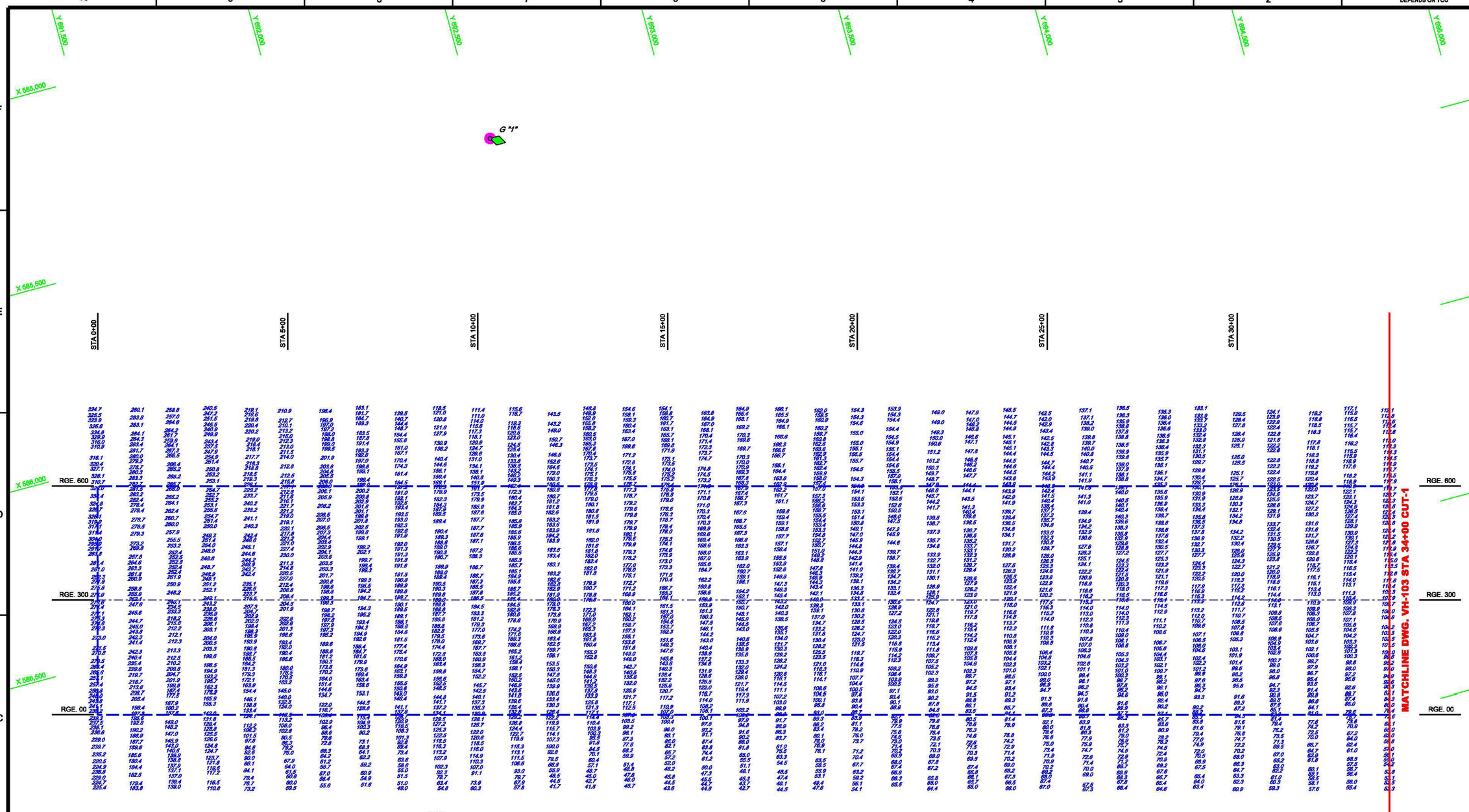
DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS
JACKSONVILLE DISTRICT
JACKSONVILLE, FLORIDA

PONCE HARBOR, PUERTO RICO
HYDROGRAPHIC EXAMINATION SURVEY
36-FOOT PROJECT
COVER SHEET AND LOCATION MAP
PLAN

DRAWING NO.
VH-101

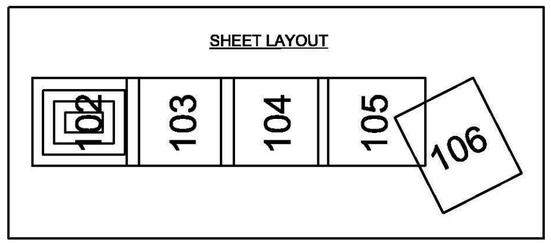
SHEET 1 OF 6

SAFTEY ON THIS JOB DEPENDS ON YOU



CUT 1
AZ. 195°02'54"

SHEET LAYOUT



AIDS TO NAVIGATION	PLANE COORDINATES		LATITUDE	LONGITUDE
	X	Y		
LIGHTED BUOY-1 (12/12)	585,428	692,526	17-56-00.07	66-38-12.64
LIGHTED BUOY-2 (12/12)	587,109	691,845	17-55-53.34	66-37-56.23

GRAPHIC SCALE
100' 0 100' 200'

NOTES:
1. REFER TO SURVEY NO. 13-002 .
2. SEE SHEET NO. 1 FOR SURVEY NOTES.

US Army Corps of Engineers
Jacksonville Distict

No.	BY	ZONE	DESCRIPTION

DATE: NOV 2012
SOLICITATION NO.:
CONTRACT NO.:
FILE NUMBER:
DESIGNED BY:
DWN BY: E.M.W.
CKD BY:
SUBMITTED BY:
PLOT DATE:
PLOT SCALE:
FILE NAME: TS-002-PONCEHRB-VH102.DGN

DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS
JACKSONVILLE DISTRICT
JACKSONVILLE, FLORIDA

PONCE HARBOR, PUERTO RICO
HYDROGRAPHIC EXAMINATION SURVEY
36-FOOT PROJECT
CUT-1
STA 0+00 TO STA 34+00
PLAN

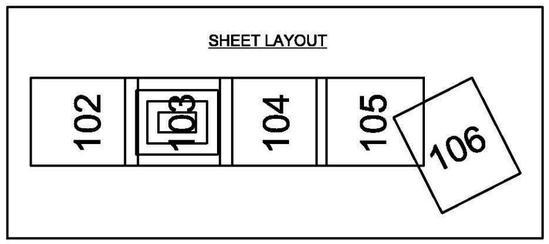
DRAWING NO.
VH-102

SHEET 2 OF 6

SAFTEY ON THIS JOB DEPENDS ON YOU

CUT 1
AZ. 195°02'54"

SHEET LAYOUT



AIDS TO NAVIGATION	PLANE COORDINATES		LATITUDE	LONGITUDE
	X	Y		
LIGHTED BUOY-4 (12/12)	588,210	695,528	17-56-40.78	66-37-43.88

GRAPHIC SCALE
100' 0 100' 200'

NOTES:
1. REFER TO SURVEY NO. 13-002 .
2. SEE SHEET NO. 1 FOR SURVEY NOTES.

US Army Corps of Engineers
Jacksonville Distict

No.	BYM	ZONE	DESCRIPTION

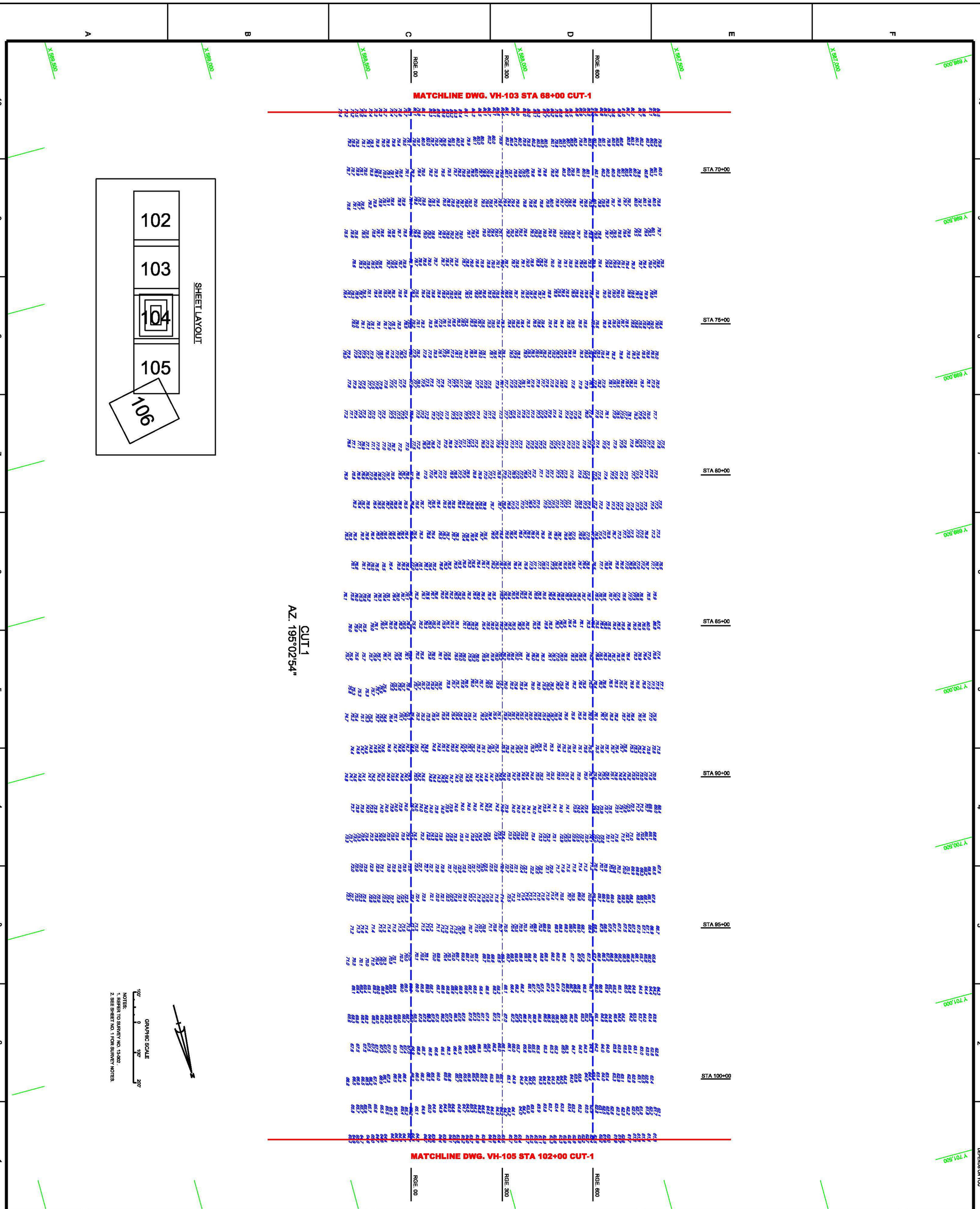
DATE: NOV 2012
SOLICITATION NO.:
CONTRACT NO.:
FILE NUMBER:
DESIGNED BY:
DWN BY: E.M.W.
CKD BY:
SUBMITTED BY:
PLOT SCALE:
PLOT DATE:
FILE NAME: T:\SAJ2-PONCE\HYDRO\VH103.DGN

DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS
JACKSONVILLE DISTRICT
JACKSONVILLE, FLORIDA

PONCE HARBOR, PUERTO RICO
HYDROGRAPHIC EXAMINATION SURVEY
36-FOOT PROJECT
CUT-1
STA 34+00 TO STA 68+00
PLAN

DRAWING NO.
VH-103

SHEET 3 OF 6



PONCE HARBOR, PUERTO RICO

HYDROGRAPHIC EXAMINATION SURVEY
36-FOOT PROJECT

CUT-1
STA 68+00 TO STA 102+00

PLAN

DRAWING NO.
VH-104

SHEET 4 OF 6

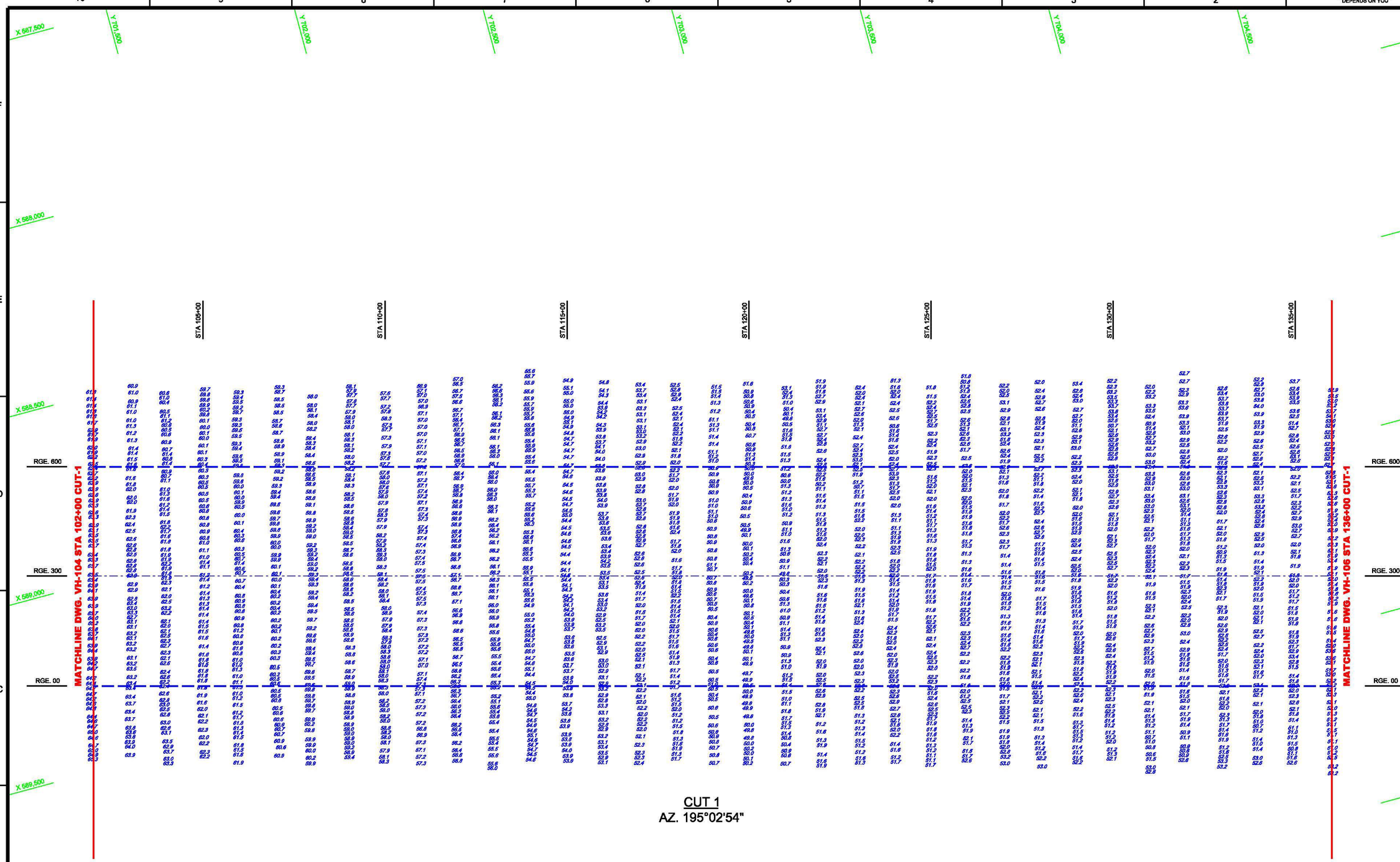
DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS
JACKSONVILLE DISTRICT
JACKSONVILLE, FLORIDA

DESIGNED BY:		DATE: NOV 2012
DWN BY: F.M.W.	CKD BY:	SOLICITATION NO.:
SUBMITTED BY:		CONTRACT NO.:
PLOT SCALE:	PLOT DATE:	FILE NUMBER:
FILE NAME: 13-002-PONCEHBR-VH104.DGN		

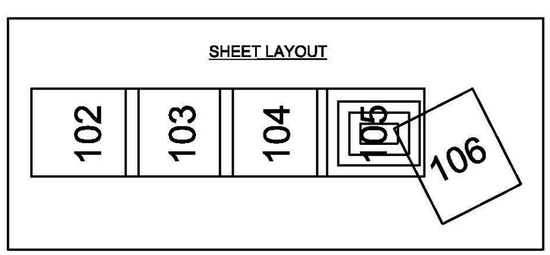
No.	SYM	ZONE	DESCRIPTION

US Army Corps of Engineers
Jacksonville District

SAFTEY ON THIS JOB DEPENDS ON YOU



CUT 1
AZ. 195°02'54"



AIDS TO NAVIGATION	PLANE COORDINATES		LATITUDE	LONGITUDE
	X	Y		
LIGHTED BUOY-6 (12/12)	590,473	703,346	17-57-47.39	66-37-20.51

R "6"

GRAPHIC SCALE
100' 0 100' 200'

NOTES:
1. REFER TO SURVEY NO. 13-002 .
2. SEE SHEET NO. 1 FOR SURVEY NOTES.

US Army Corps of Engineers
Jacksonville District

No.	BY/M	ZONE	DESCRIPTION

DATE: NOV 2012
SOLICITATION NO.:
CONTRACT NO.:
FILE NUMBER:
DESIGNED BY:
DWN BY: E.M.W.
CKD BY:
SUBMITTED BY:
PLOT DATE:
PLOT SCALE:
FILE NAME: 13-002-HONCUR-BR-VH106.DGN

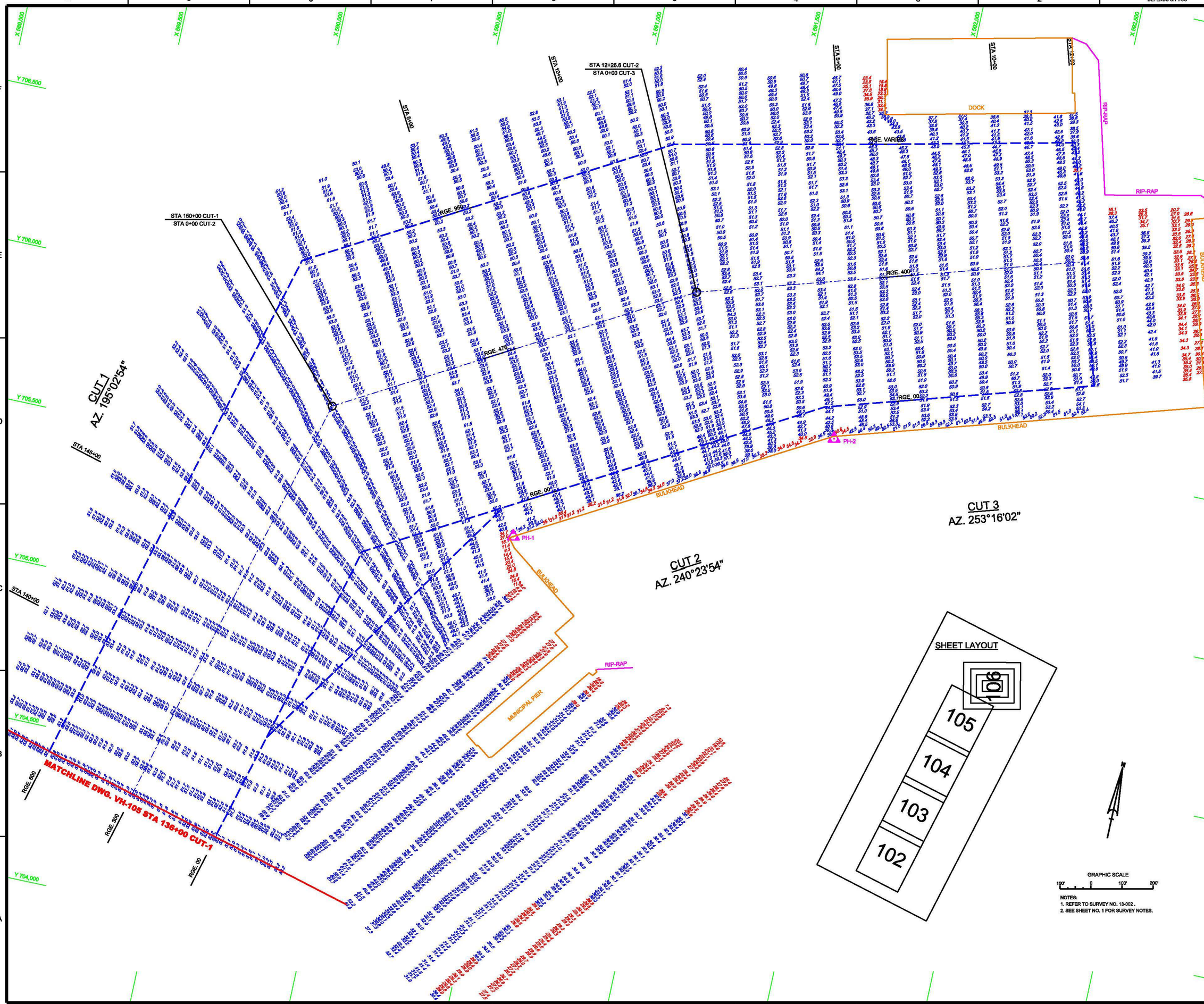
DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS
JACKSONVILLE DISTRICT
JACKSONVILLE, FLORIDA

PONCE HARBOR, PUERTO RICO
HYDROGRAPHIC EXAMINATION SURVEY
36-FOOT PROJECT
CUT-1
STA 102+00 TO STA 135+00
PLAN

DRAWING NO.
VH-105

SHEET 5 OF 6

SAFTEY ON THIS JOB DEPENDS ON YOU



SHEET LAYOUT

GRAPHIC SCALE

100' 0 100' 200'

NOTES:
1. REFER TO SURVEY NO. 13-002 .
2. SEE SHEET NO. 1 FOR SURVEY NOTES.

US Army Corps of Engineers
Jacksonville District

No.	BY/M	ZONE	DESCRIPTION

DATE: NOV 2012
SOLICITATION NO.:
CONTRACT NO.:
FILE NUMBER:
PLOT DATE:
PLOT SCALE:
SUBMITTED BY:
CKD BY:
DWN BY: E.M.W.
DESIGNED BY:
FILE NAME: T:\2012\CHICHER\VH106.DGN

DEPARTMENT OF THE ARMY
CORPS OF ENGINEERS
JACKSONVILLE DISTRICT
JACKSONVILLE, FLORIDA

PONCE HARBOR, PUERTO RICO

HYDROGRAPHIC EXAMINATION SURVEY
36-FOOT PROJECT

STA 136+00 CUT-1 TO STA 12+50 CUT-3

PLAN

DRAWING NO.

VH-106

SHEET 6 OF 6