EHYDRO IMPLEMENTING A BIS

Prepared by Shanks Gavin

For NOAA's Open House on Nautical Cartography

07 July 2017

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TALKING POINTS

- Define eHydro
- Advertise where to access the repository
- Define the authoritative datasets
- Status update of survey details
- Show sample map
- Describe how the BIS is expected to be used
- Expectations moving forward

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What is eHydro?

Enterprise Hydrographic Data Repository

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EHYDRO
To Catalog, Organize and Disseminate navigation related data efficiently and effectively.

eHydro Implementing a BIS 2017

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NAVIGATION WEBSITE

The navigation website utilizes web map services hosted by ACE-IT at the CPC.

As the source layers are updated so are the pages, maps, and applications on the site.

http://navigation.usace.army.mil

NCF FEATURES MANAGED

- Channel Project Areas
- Reaches
- Quarters (4/4, 3/4, & Full width)
- Centerlines
- Station lines

Full width

Louisville (LRL)

Inside quarters dissolved

4 Quarters

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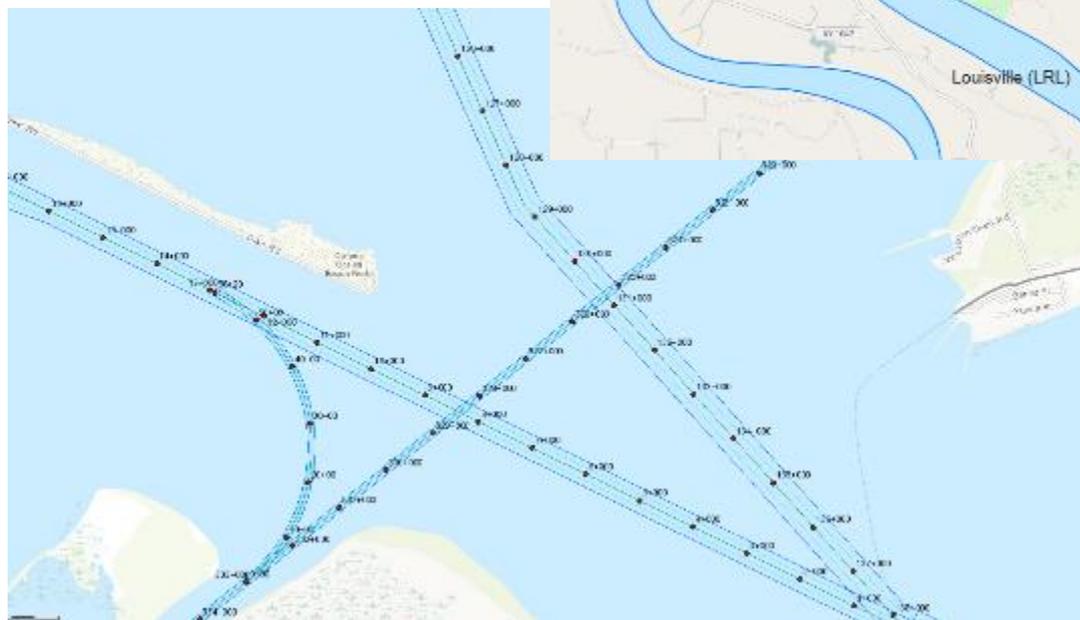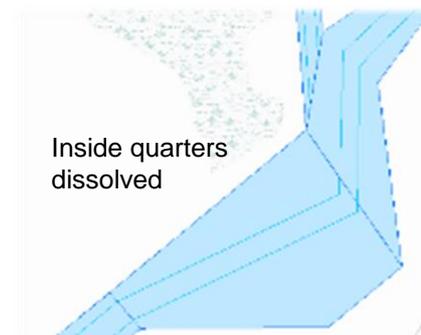
NCF GEOMETRY
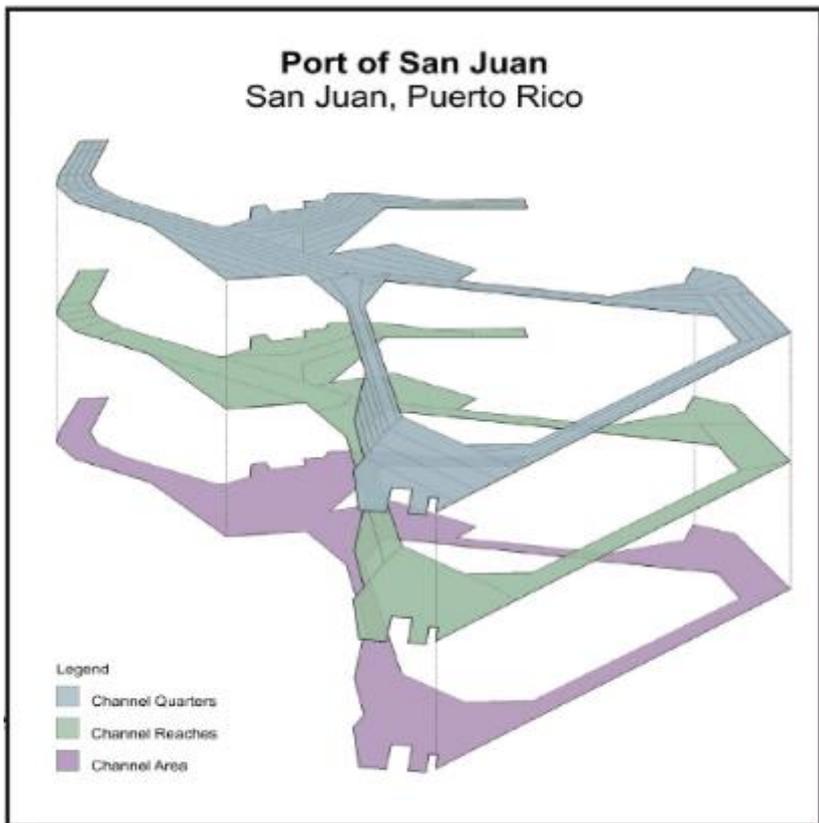
Coastal

Inland
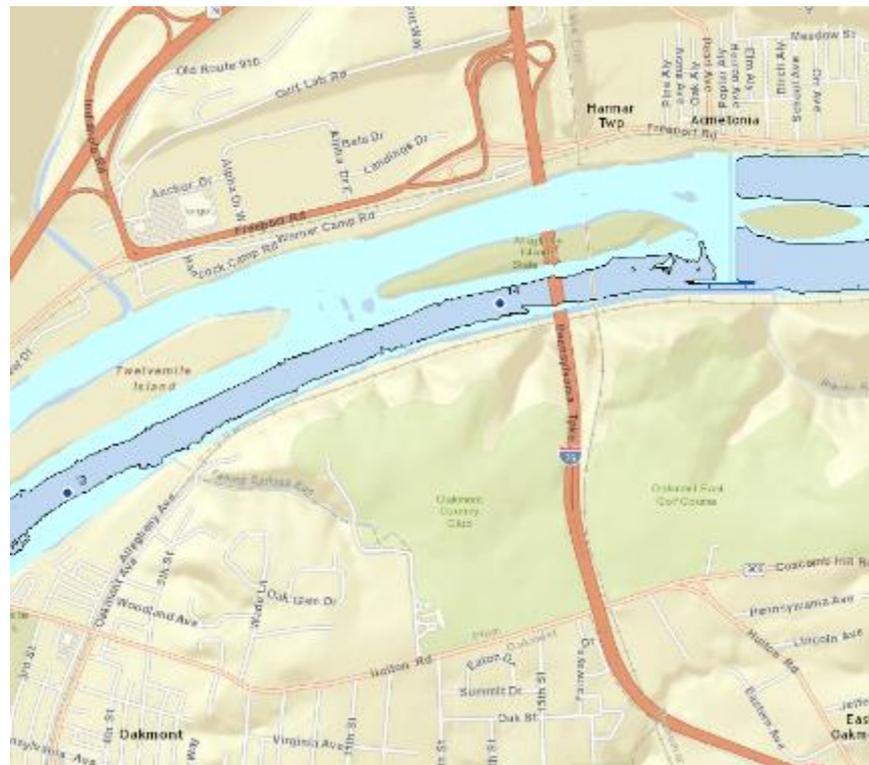
SURVEY STATUS

Operational Surveys are
defined as a survey
start date less than 60
days from 30 JUN 2017

Totals @ a Glance	Coastal	Inland	USACE Totals
Operational Surveys (<60 Days)	694	77	771
Total Surveys (<=30 Days)	480	117	597
Total Surveys (<=60 Days)	1086	186	1272
Total Surveys (<=120 Days)	2043	269	2312
Total Surveys (All Times)	22221	709	22930
Total Channel Area (Polygons)	1724	79	1803

| DISTRICT	OPS_SURVEYS_60_DAYS	TOTAL_SURVEYS_60_DAYS	TOTAL_SURVEYS
LRB	0	0	20
LRC	1	7	29
LRE	0	0	223
LRL	23	68	334
MVN	403	415	10337
MVP	52	77	77
MVR	38	46	316
MVS	0	46	46
NAB	1	7	469
NAE	0	5	46
NAN	0	8	8
NAO	6	28	333
NAP	3	11	112
NWP	119	138	3736
NWS	12	13	359
POA	1	8	55
POH	0	0	20
SAC	4	9	187
SAJ	0	33	139
SAM	17	69	680
SAS	2	3	46
SAW	73	112	1483
SPK	0	0	19
SPL	2	16	61
SPN	0	0	183
SWG	43	121	3890

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DATA PRODUCTS
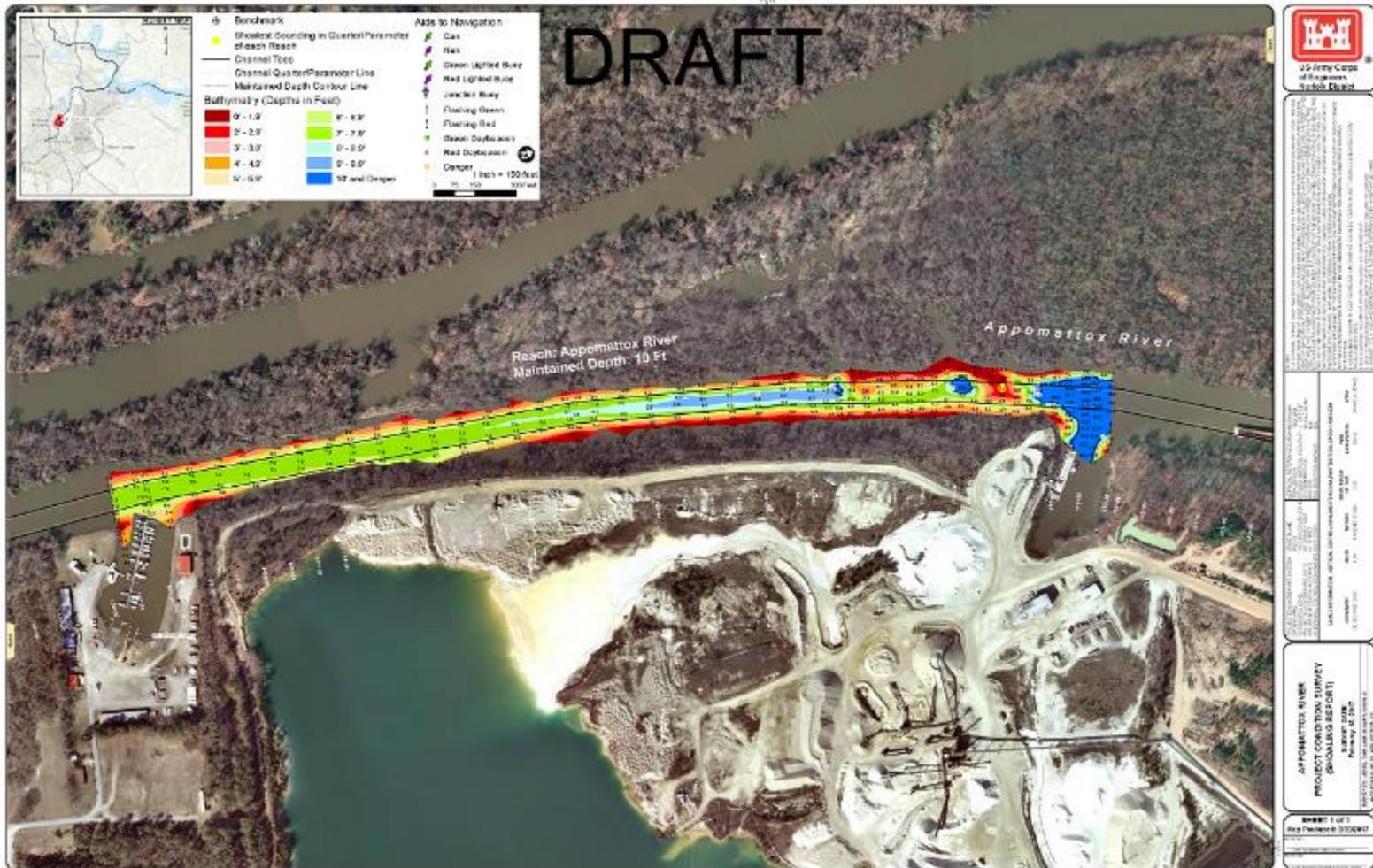
eHydro Project Specific MXD

CSAT: CORPS SHOALING ANALYSIS TOOL

- Fed by eHydro survey data
- Analysis by Reach from Channel Framework
- Expectation of 5 years of data
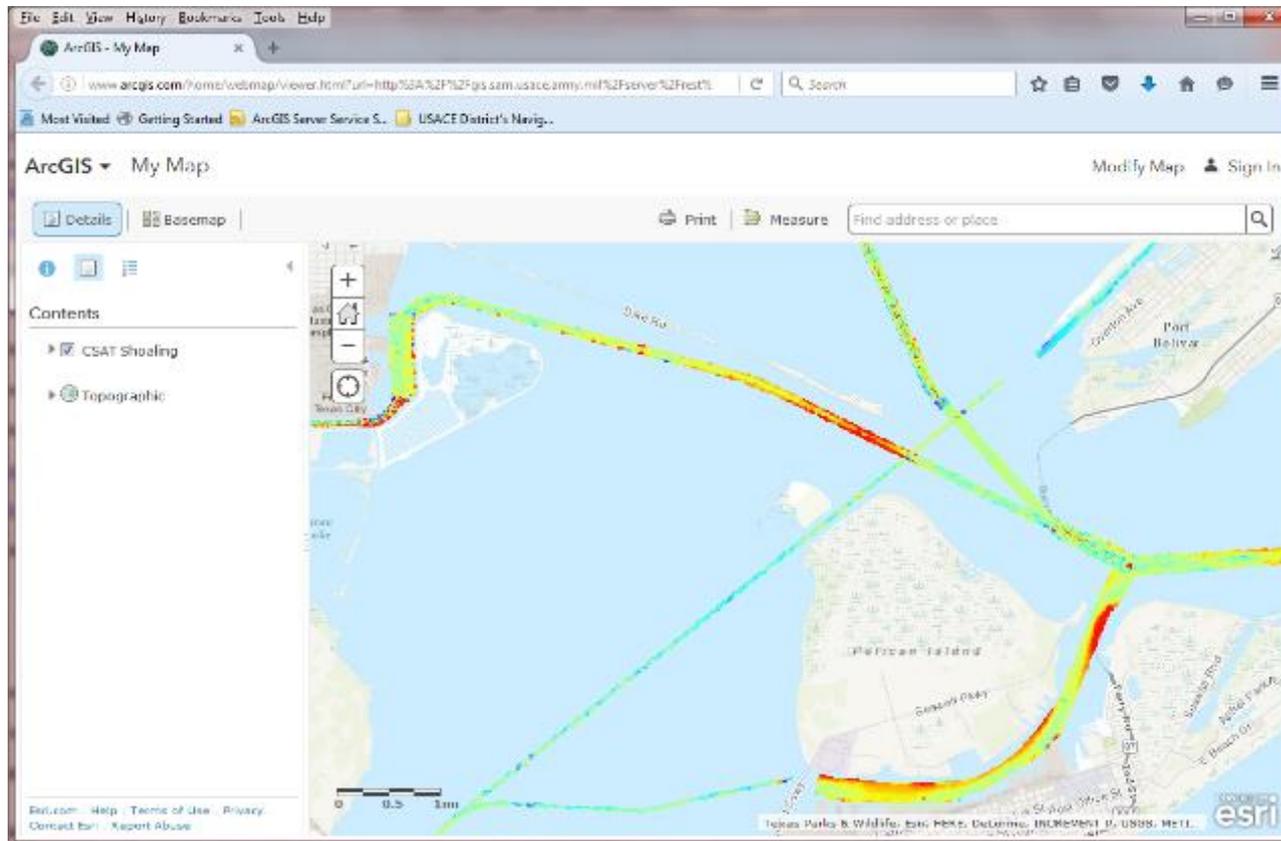
# CSAT ESTIMATED VOLUME TABLES

Shoaling rate w/ last survey

Dredge Cut (ft)	Now (CY)	6 months (CY)	12 months (CY)	18 months (CY)	24 months (CY)	30 months (CY)	36 months (CY)
-45	195,320	271,020	373,070	492,200	624,890	771,020	931,220
-44	125,140	173,140	238,620	331,710	444,910	572,680	713,450
-43	76,249	109,860	153,260	210,570	293,080	399,730	522,310
-42	43,628	65,655	95,990	135,350	186,480	258,070	356,920
-41	24,409	37,093	56,313	83,402	119,100	165,270	227,370
-40	14,958	21,022	31,470	48,147	72,041	104,370	146,170
-39	10,060	13,343	18,250	26,832	41,017	61,922	91,020
-38	7,083	9,092	11,945	16,084	23,035	34,823	53,059
-37	5,194	6,480	8,241	10,728	14,312	19,888	29,576
-36	3,865	4,787	5,944	7,496	9,673	12,784	17,358
-35	2,806	3,555	4,412	5,465	6,843	8,751	11,457

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BIS
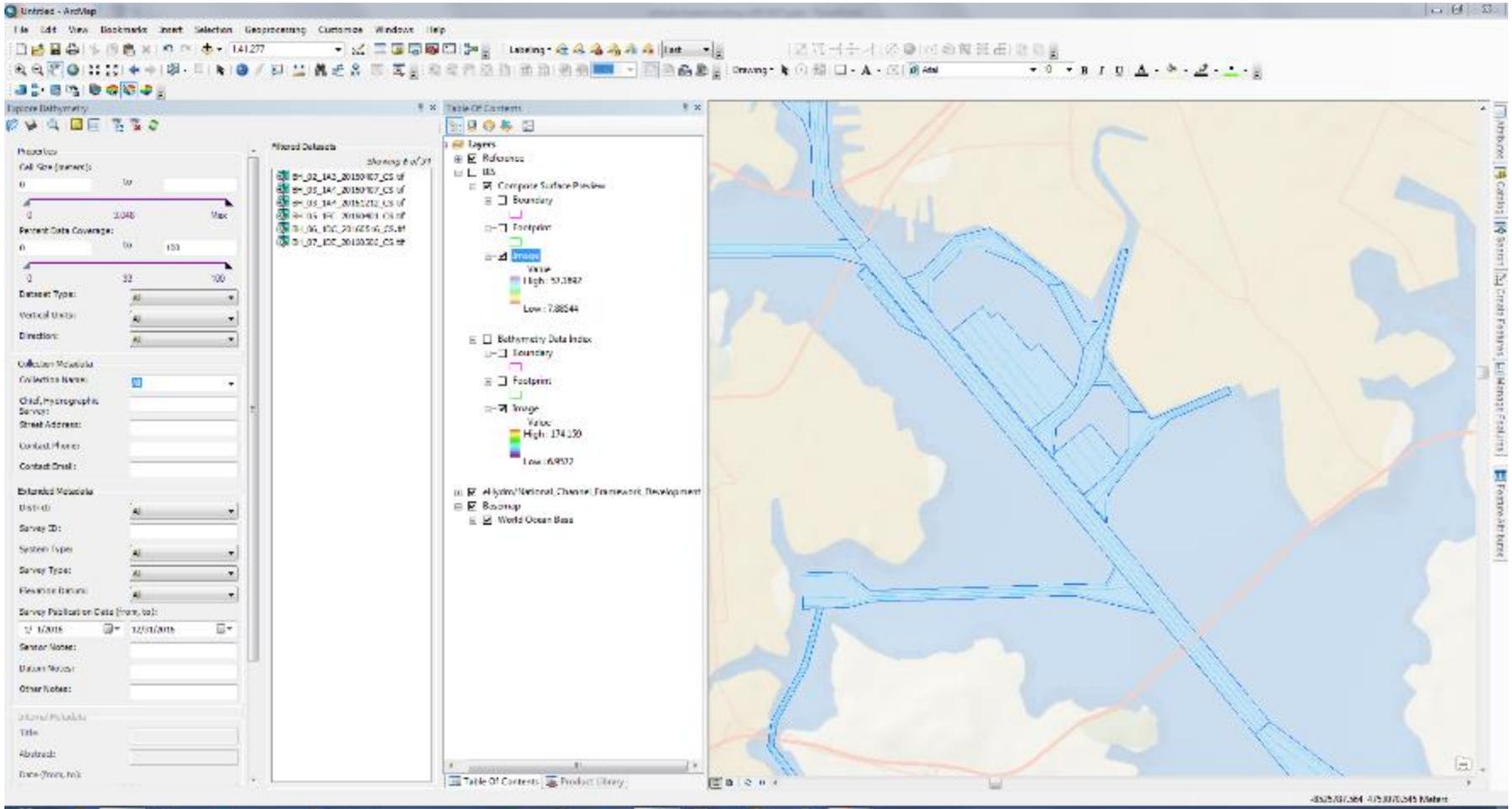
National Channel Framework

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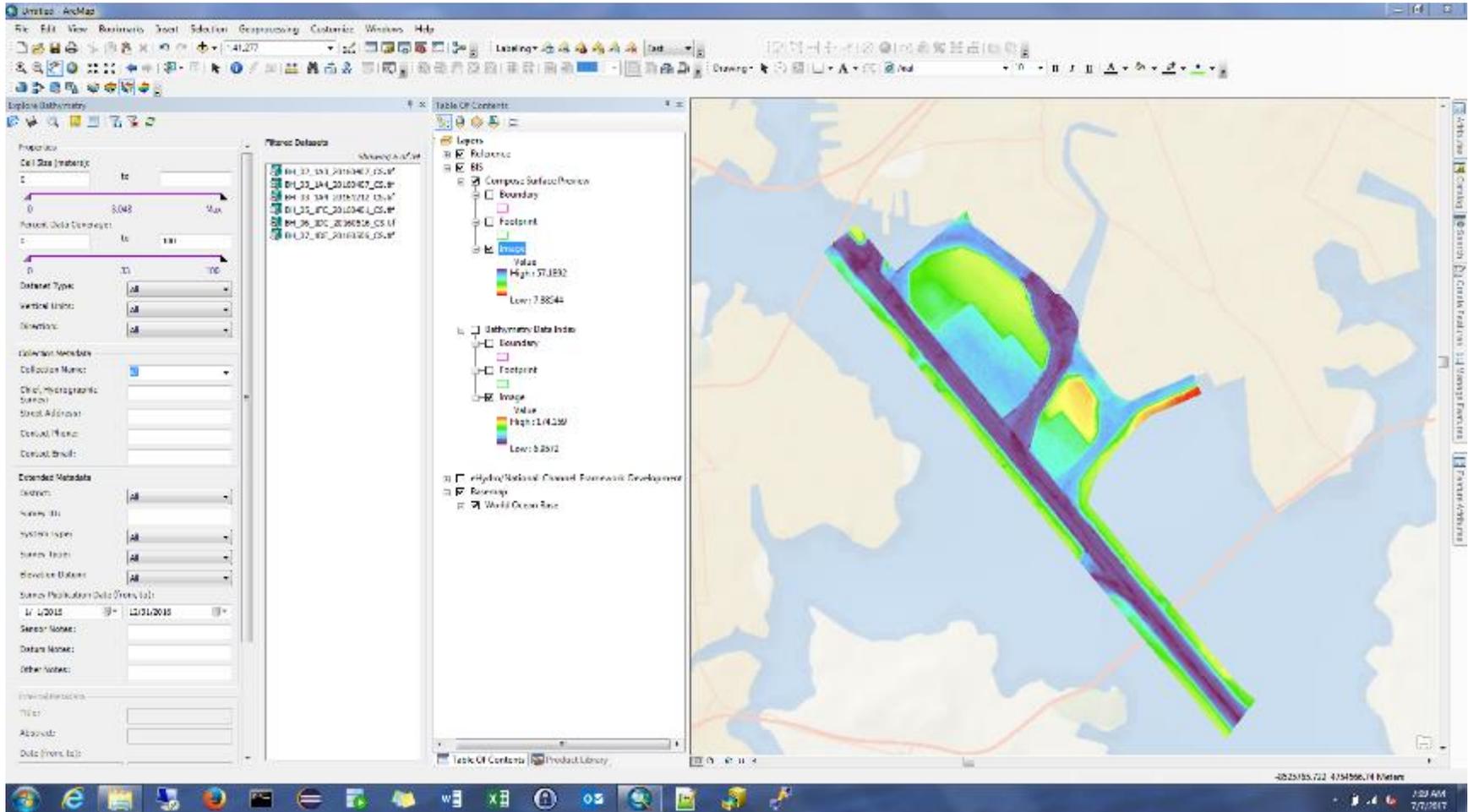
eHydro Composite Survey 2016 (Baltimore Harbor)

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BIS

Complete view (NCF & BIS)

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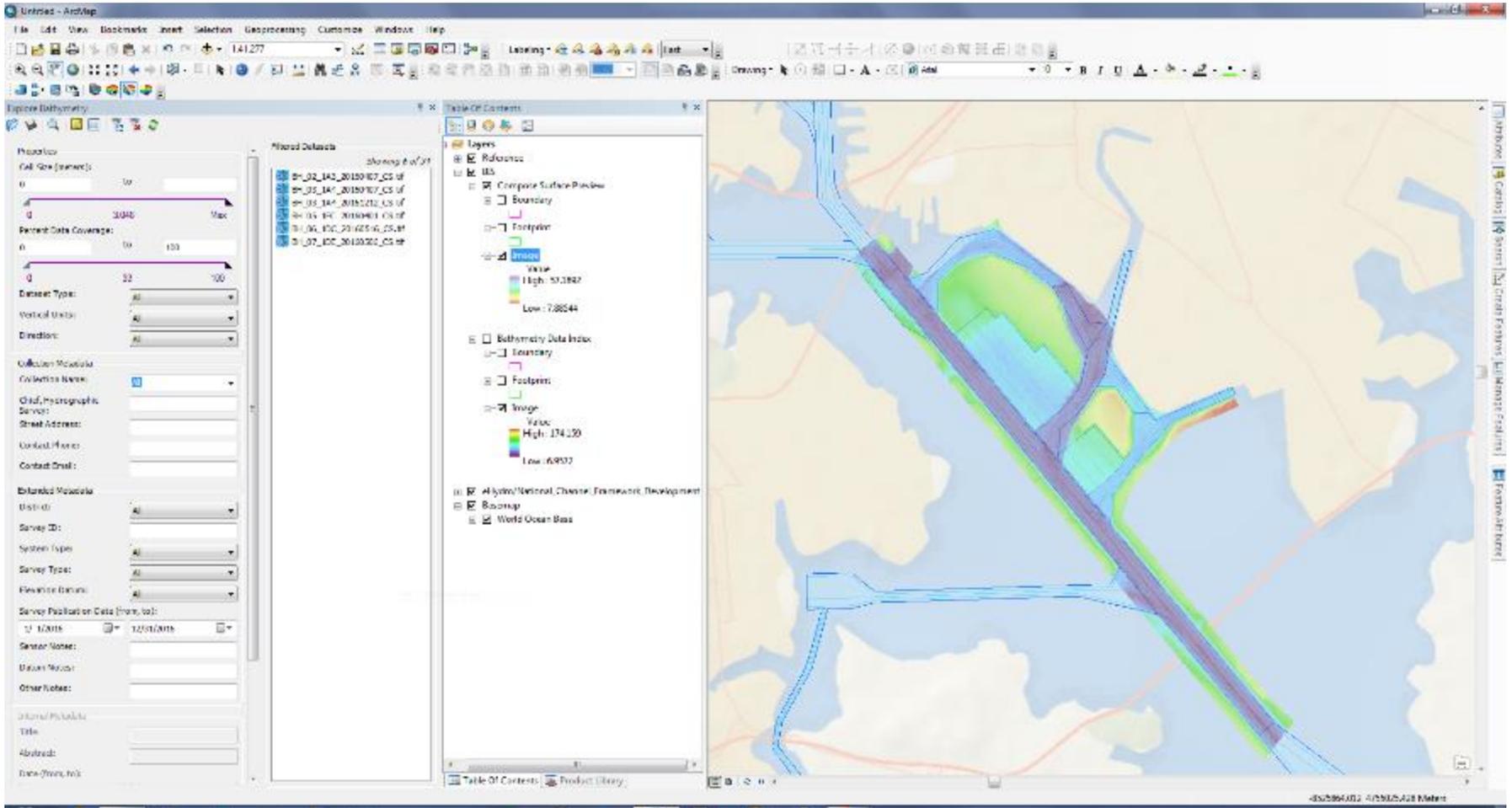
EXPECTATIONS

- Complete Proof of Concept on USACE network
- Implement an enterprise version of the BIS
- Expand BIS into web services for public consumption
- Coordinate with other agencies for future uses

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THANK YOU!

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