

PUBLIC HEARING ON THE
DRAFT INTEGRATED FEASIBILITY REPORT AND EIS
NEW HAVEN HARBOR NAVIGATION IMPROVEMENT PROJECT

OCTOBER 24, 2018

6:31 P.M.

CITY OF NEW HAVEN HALL OF RECORDS
200 ORANGE STREET
NEW HAVEN, CONNECTICUT

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APPEARANCES :

MARK HABEL: CHIEF, NAVIGATION AND ENVIRONMENTAL STUDIES SECTION, PLANNING DIVISION, U.S. ARMY CORPS OF ENGINEERS, NEW ENGLAND DISTRICT

JUDI SHEIFFELE: EXECUTIVE DIRECTOR, NEW HAVEN PORT AUTHORITY

EVAN MATTHEWS: EXECUTIVE DIRECTOR, CONNECTICUT PORT AUTHORITY

JOHN KENNELLY: CHIEF, PLANNING DIVISION, U.S. ARMY CORPS OF ENGINEERS, NEW ENGLAND DISTRICT

BARBARA BLUMERIS: PROJECT MANAGER, WATER RESOURCES PLANNING SECTION, PLANNING DIVISION, U.S. ARMY CORPS OF ENGINEERS, NEW ENGLAND DISTRICT

TODD RANDALL: MARINE ECOLOGIST, ENVIRONMENTAL RESOURCES SECTION, PLANNING DIVISION, U.S. ARMY CORPS OF ENGINEERS, NEW ENGLAND DISTRICT

1 (The hearing commenced at 6:31 p.m.)

2 MR. HABEL: Good evening, and welcome to
3 the public hearing for the New Haven Harbor
4 Navigation Improvement Project.

5 My name is Mark Habel. I'm Chief of the
6 Navigation and Environmental Studies Section for
7 the United States Army Corps of Engineers,
8 New England District. I will be your moderator and
9 facilitator tonight.

10 Before we begin, I would like to thank
11 you for getting involved in this review process for
12 the New Haven Harbor Navigation Improvement Project
13 Study.

14 The New Haven Harbor deepening study is
15 being undertaken by the Corps of Engineers in
16 partnership with the project sponsor, the New Haven
17 Port Authority, and with the Connecticut Port
18 Authority.

19 Our hearing officer tonight is John
20 Kennelly, Chief of the Planning Division for the
21 Corps in New England.

22 Also here from the Corps New England
23 District are Barbara Blumeris, our Project Manager,
24 and Todd Randall, who helped write the
25 Environmental Impact Statement; Lisa Winter, from

1 our Coastal Engineering Unit.

2 Should you need copies of the public
3 notice, hearing procedures, or other pertinent
4 information, it is available at the registration
5 table in the back of the room.

6 Following this introduction, the project
7 sponsors will give brief remarks. Judi Sheiffele
8 is the Executive Director of the New Haven Port
9 Authority. And following Judi will be Evan
10 Matthews, the Executive Director of the Connecticut
11 Port Authority.

12 Our hearing officer, John Kennelly, will
13 then address the hearing. John will be followed by
14 Barbara Blumeris, who will provide information on
15 the Draft Integrated Feasibility Report and
16 Environmental Impact Statement for the New Haven
17 Harbor Study. And Barbara will be followed by Todd
18 Randall, who will provide an overview of the
19 environmental investigations conducted during this
20 study.

21 At the conclusion of these briefings, I
22 will then review the Corps of Engineers
23 responsibilities in this process and explain the
24 hearing procedures.

25 Following that, I will open the floor to

1 public comment, utilizing the Corps of Engineers
2 hearing protocol.

3 One additional reminder: We are here
4 tonight to receive your comments, not to enter into
5 any discussion of those comments or to reach any
6 conclusions. Any questions should be directed to
7 the record and not to the individuals on the panel.

8 And now, ladies and gentlemen, I would
9 like to call on the representative from our
10 non-federal study sponsor, Judi Sheiffele,
11 Executive Director of the New Haven Port Authority.
12 Judi?

13 MS. SHEIFFELE: Thanks, Mark.

14 My name is Judi Sheiffele, and, as Mark
15 has told you, I am the Executive Director of the
16 New Haven Port Authority.

17 The subject of tonight's hearing is to
18 hear the Draft Feasibility Report and Environmental
19 Impact Statement on the Navigational Improvement
20 Project which would involve the deepening and
21 widening of the federal channel in New Haven.

22 Deepening the channel from its current
23 authorized depth of 35 to 40 feet is a major
24 infrastructure improvement that when constructed
25 will improve the safety and increase the efficiency

1 of the movement of vessels through the Port of
2 New Haven.

3 Over the past three years, the
4 Connecticut and New Haven Port Authorities have
5 worked with the Army Corps of Engineers to assess
6 the conditions in New Haven Harbor and make a
7 determination as to whether a deepening is
8 warranted. Tonight the Corps will be presenting
9 the draft findings.

10 And in closing, I would like to thank you
11 you all for coming, your interest in this project,
12 and we look forward to hearing your comments.

13 MR. HABEL: Thank you, Judi.

14 Ladies and gentlemen, I would like to
15 introduce Evan Matthews, Executive Director for the
16 Connecticut Port Authority.

17 MR. MATTHEWS: Thank you, Mark. My name
18 is Evan Matthews. And I'm the Executive Director
19 of the Connecticut Port Authority, headquartered in
20 Old Saybrook, Connecticut.

21 We have enjoyed partnering with the
22 New Haven Port Authority to fund this study. I
23 want to thank the Army Corps for conducting this
24 hearing and moving the project forward. We have
25 used the resources of the CPA in recent weeks to

1 try to encourage involvement in this process
2 because we believe public input leads to better
3 results.

4 From the Port Authority's perspective,
5 this project is entirely consistent with our
6 overall goals outlined in the Port Authority's
7 Connecticut maritime strategy, which is available
8 on our website, which was released in August.

9 And that strategy puts an emphasis on
10 maximizing the potential of Connecticut's three
11 deep-water ports. Obviously, New Haven is one of
12 those ports. As you'll hear in some of the
13 analysis later on, it's one of the larger ports
14 complexes in the state.

15 New Haven is particularly important in
16 that strategy and long overdue for navigational
17 improvements.

18 I'm sure that there are many ideas on how
19 to improve the draft plan you have published. We
20 look forward to hearing the public's input in
21 person at these two hearings -- we were in West
22 Haven last night -- and online, and I'm confident
23 that you will take those public comments into
24 account as the plan is finalized. Thank you very
25 much.

1 MR. HABEL: Thank you, Evan.

2 Ladies and gentlemen, John Kennelly.

3 MR. KENNELLY: Good evening. I would
4 like to welcome you tonight to this public hearing
5 regarding the New Haven Harbor Navigation
6 Improvement Project Study.

7 I would also like to thank you for your
8 involvement, for involving yourself in this study,
9 and for providing us with your views and comments.

10 By conducting this public hearing, we,
11 the Corps of Engineers, continue to fulfill our
12 requirement to seek public comment and input
13 relative to the New Haven Harbor Navigation
14 Improvement Study.

15 While no decision will be made tonight,
16 we welcome your comments on the New Haven Harbor
17 Navigation Improvement Project Study. Your
18 comments will be considered in our development of
19 the Final Integrated Feasibility Report and
20 Environmental Impact Statement.

21 Please feel free to provide comments that
22 you would like to enter into the record.

23 Additionally, we will receive written
24 comments tonight and through November 15th, 2018.

25 I assure you that all of your comments, written or

1 oral, will be addressed during this process, will
2 be treated equally on the record, and will be
3 considered in the development of the final report.

4 It is crucial to the public process that
5 your voice be heard, and we're here to listen to
6 your comments, to understand your concerns, and to
7 provide you an opportunity to put your thoughts on
8 the record should you care to do so.

9 The primary purpose of this hearing is to
10 solicit the public's comments and input. However,
11 the hearing will begin with the project team
12 providing background information on the Integrated
13 Feasibility Report and Environmental Impact
14 Statement, including details on the existing
15 deep-draft navigation problems, alternatives
16 evaluated, information on the Tentatively Selected
17 Plan, and information on the dredge material and
18 placement sites.

19 These presentations, at the beginning of
20 each public hearing, will assist the public and
21 agency reviewers in understanding the documents and
22 the evaluation process which was followed; thus,
23 aiding the public as they review the draft report.

24 In addition to providing comments at the
25 public hearing, the public may provide written

1 comments at any time during the public review
2 period. I would like to emphasize this is your
3 hearing, and we need you to assist us in this
4 public review process.

5 We want your comments on the draft report
6 so that we can consider all of the comments that we
7 receive, those made here tonight, as well as those
8 submitted during the public review period, in
9 preparing the Final Integrated Feasibility Report
10 and the EIS. Thank you.

11 MR. HABEL: Thank you, John.

12 Ladies and gentlemen, Barbara Blumeris.

13 MS. BLUMERIS: Good evening. Tonight
14 Todd and I will present summary information on the
15 planning process to reach the Tentatively Selected
16 Plan.

17 The slides that we share tonight will be
18 posted on our project website on Thursday. The
19 project website is included in the Fact Sheet, on
20 the back of the Fact Sheet. So you can see here's
21 the link to the project website. And they'll be
22 posted on that site

23 This first slide illustrates the Corps
24 planning process. We're about in the middle of the
25 process right now, starting on the reviews. So we

1 have public review right now to November 15th. We
2 also at the same time are conducting concurrent
3 reviews with the agency technical review. That's
4 an internal team of four reviewers, and then an
5 independent external review by our panel of
6 reviewers.

7 Next slide. The non-federal sponsors are
8 here with us tonight. And they are cost-sharing
9 this particular effort, 50 percent federal,
10 50 percent non-federal.

11 To conduct the study, we needed
12 congressional authorization. And this slide
13 provides the authorization that was provided by
14 Congress in 2007 to conduct this feasibility study.

15 In 2015, we entered into that
16 cost-sharing agreement with the Port Authority, and
17 we started in earnest in 2016 on the effort.

18 The purpose of the study is to
19 investigate improvements needed to provide a safe,
20 reliable, efficient, and environmentally
21 sustainable waterborne transportation system into
22 New Haven. We're going to be determining whether
23 the navigation improvements to the existing federal
24 project at New Haven Harbor are warranted and in
25 the federal interest.

1 This is the slide that shows the existing
2 federal project.

3 New Haven is centrally located on the
4 north shore of Long Island Sound, as you can see in
5 the small insert map to the right. The Harbor is a
6 very important maritime commercial resource for the
7 state of Connecticut.

8 The current federally-authorized
9 New Haven Harbor Navigation Project includes a
10 deep-draft channel, turning basin, maneuver area.

11 So this is the existing project. So we
12 currently have a deep-draft channel that comes in
13 from Long Island Sound into terminals at the head
14 of the harbor. Those are shown in purple. And
15 that deep-draft channel is authorized at minus
16 35 feet mean lower low water. So that means at low
17 tide, there's 35 feet of water available for ships
18 to sail into the Harbor.

19 This project was authorized in 1946 by
20 Congress, and constructed in 1950. So in 2018,
21 that deep-draft channel will be 68 years old, and
22 due for an improvement, as ship sizes have
23 increased over the last 60 years.

24 Now, the next slide talks about the type
25 of commodities coming in, as well as the total

1 tonnage.

2 In terms of total tonnage, this is the
3 second largest port in New England, and the largest
4 port in Connecticut. In 2016, the total freight
5 traffic was 8.8 million metric tons, representing
6 about 24 percent of all waterborne commerce in
7 New England, and about 81 percent of all waterborne
8 commerce in Connecticut.

9 The Northeast maintains a large refinery
10 production/demand deficit, and must rely heavily on
11 imported volumes of petroleum products in order to
12 meet demand.

13 The port is a crucial import location for
14 refined petroleum products, which supplies demand
15 within Connecticut as well as the broader Northeast
16 region.

17 The majority of the landside acreage in
18 the Port of New Haven is devoted to energy-related
19 uses. This represents a long-term land use and
20 economic asset for the economy in the state of
21 Connecticut.

22 Next slide. Petroleum products have
23 historically constituted about 70 percent of
24 channel tonnage. Data from 2016 is shown on this
25 pie chart, with the petroleum products in blue.

1 You can see that, based on this one year, that,
2 yes, petroleum constitutes the most.

3 But we also have other important things
4 coming into the port, including dry bulk and break
5 bulk, including salt, sand, cement. And also we
6 have steel, rebar, and steel billets, steel rail.

7 But then we also have an export, which is
8 the scrap metal, which you probably may have
9 noticed as you drive on the highway, there's a huge
10 pile of scrap metal. And this is an export.
11 There's approximately 1 million tons of scrap metal
12 produced annually within the state, and
13 approximately half of that amount is exported
14 through the Port of New Haven.

15 Next slide. This, shows our port
16 terminals. Magellan, Motiva, and Gateway, one of
17 the larger terminals. So this is just a slide
18 showing the location of the facilities in the
19 harbor.

20 Next slide.

21 There are several problems with the
22 existing channel. One is the insufficient depth of
23 the main channel and the turning basin. And then
24 also there's a problem at the bend. So there's a
25 bend between the two breakwaters that protect the

1 inner harbor, and the ships have to transect this
2 bend.

3 The existing channel bend from the
4 entrance channel to the interior is about 35
5 degrees, with the outer portion with a bend to the
6 west. Large ships coming in on the flood are set
7 further west because the current runs east to west.
8 This pushes them towards the steep outer bank of
9 the curve.

10 To compensate for this, pilots approach
11 the bend on the far right side of the channel. As
12 they come out of the bend, they go hard over full
13 ahead to make the turn to not have the stern hit
14 the west bank. This makes straightening the ship
15 toward the next set of buoys very difficult since
16 moving forward and turning at a high speed.

17 So the two problems here that we're
18 trying to address are the channel depth as well as
19 the bend in the channel.

20 Next slide. As I mentioned, the channel
21 is authorized to minus 35 feet mean lower low
22 water. So this provides unrestricted draft of
23 31 feet, which requires 4 foot of underkeel
24 clearance. That means 4 feet of water below the
25 bottom of the ship. Ships greater than 31 feet are

1 restricted. So they either have to come in on high
2 tide or they have to lighter outside of the
3 anchorage. This creates transportation
4 inefficiency and results in additional
5 transportation costs of bringing the cargo into the
6 port.

7 Without an improvement project, shippers
8 will continue to be limited to the size of the
9 vessels they can call to port, leaving them unable
10 to achieve the economies of scale of larger
11 vessels, and ships would begin to bypass the port
12 as they cannot bring their larger ships in and
13 unload the cargo at the current dimensions of the
14 channel.

15 Next slide. Once we identified the
16 problem, we wanted to identify alternatives to
17 correct the problem.

18 So one of the issues is the depth. So we
19 looked at a range of depths from 37 to 42 feet to
20 increase the efficiency of ships coming in. We
21 also looked at widening the channel. As the ships
22 get larger, they're a little bit more width. So we
23 increased the width of the inner harbor by a
24 hundred foot and the width of the outer harbor by a
25 hundred foot, 50 feet on either side.

1 We also looked at increasing the bend
2 width, as I mentioned, to go from 560 to 700 feet.
3 This slide shows the quantities associated with
4 each of those alternatives. And quantities are
5 important because they drive the cost of the
6 alternative.

7 So this is the amount of material that
8 would have to be removed from the sea floor dredge in
9 order to create that deeper channel, create those
10 water channel widths, and to create that bend.
11 Costs were estimated for the federal base plan
12 placement as well as for beneficial use plan
13 placement, which Todd Randall will talk about in a
14 few minutes.

15 Next slide, please. So we have the cost
16 side of the equation, how much is it going to cost
17 to build this. So we have to estimate the benefits
18 side of the equation. And that's the
19 transportation cost savings that will be realized
20 over the 50-year period of the analysis. So that
21 is the amount of cost reduction for ships to bring
22 in the cargo into the port.

23 So without the project, it costs -- on an
24 average annual equivalent basis, it costs 64
25 million, approximately, to bring in the cargo to

1 the Harbor. So with each of these alternatives, it
2 will cost less to bring that same amount of cargo
3 in. And that is the result of the fact that they
4 no longer have to lighter, no long have to wait for
5 the tide, but they can also move some of the cargo
6 to a slightly larger ship, and receive the
7 economies of scale of that larger ship.

8 So the next step is we take those two
9 things, the cost of the project and average annual
10 equivalent, and then we compare it against the
11 benefits of the project, the average annual
12 equivalent, and we get the total net benefits for
13 the project. So you can see in the fourth column
14 the total net benefits.

15 And we looked for the project that
16 maximizes the net benefits. So in this case, the
17 project that maximizes the net benefits is the
18 40-foot project. And that has a BCR of 1.9. So
19 that's a benefit-to-cost ratio, and it's a positive
20 project which shows federal interest in this
21 alternative.

22 After we selected the Tentatively
23 Selected Plan, which is the 40-foot project, we did
24 a refinement on that using the ship simulation down
25 at our facility in Vicksburg, Mississippi. So we

1 created a computer model of the channel and the
2 coastal hydraulics, and we were able to then
3 simulate the ships coming into the port.

4 And we had two pilots come down and drive
5 those ships so they could test the different
6 scenarios. So they could test the width of the
7 channel, test the bend, test the turning basin
8 under various conditions.

9 As a result of that, we came up with some
10 design refinements on the plan. We verified the
11 inner and outer harbor channel widths. But we did
12 determine that the bend needed to be greater than
13 700 feet, up to 800 foot wide. So we added an
14 additional hundred feet on the bend widening.

15 And we also determined that the turning
16 basin we had turned to the north in the original
17 plan, but because when we tested it in the model,
18 we found that the existing location was optimum,
19 and that all we needed to actually do was widen it
20 200 feet to the north. So this results in a
21 refinement of the quantities, which, as you know,
22 is important 'cause it drives the cost.

23 So the quantity of ordering materials is
24 similar, but the quantity of rock went up from
25 about 30-something thousand cubic yards to 43,000

1 cubic yards. So you can see that's going to be a
2 little bit of an additional cost.

3 Next slide. So this is a summary of the
4 Tentatively Selected Plan, the 40-foot plan, with
5 those refinements. So the cost went up slightly,
6 so that means our benefits go down a little bit.
7 Our BCR went down slightly to 1.6.

8 But we will be looking at these numbers,
9 both the costs and benefits over the next few
10 months, and we will be refining this design as we
11 go forward. So those numbers might change again as
12 we check some of the different parameters. And so
13 you might see slightly different numbers in the
14 final report. But the good news is this is still a
15 positive project.

16 So the TSP will result in more efficient
17 transportation of the commodities into the port.
18 It will increase the safety and maneuverability for
19 the larger ships.

20 Next slide. This slide shows the cost
21 share for the non-federal and federal share. Total
22 project cost, including the beneficial use site, is
23 \$71 million. And cost shared, you can see the
24 numbers broken down. Federal cost share will be
25 75 percent, and the non-federal will be 25 percent.

1 So that's highlighted in yellow.

2 Once construction is completed, the
3 non-federal sponsor will be required to pay an
4 additional 10 percent of the cost of the general
5 navigation features.

6 The federal government would be
7 responsible for a hundred percent of the navigation
8 project maintenance, as it is today. So we
9 currently maintain the channel about every 10
10 years.

11 In the construction of the salt marsh
12 site, beneficial use site is included in that cost,
13 and it would be cost shared at 65/35 with the
14 non-federal sponsor.

15 So that's the Tentatively Selected Plan.
16 And now we'll welcome Todd up to talk about the
17 placement alternatives.

18 MR. RANDALL: Thanks, Barbara. Thanks,
19 everybody, for coming tonight. I'm just going to
20 talk about the placement alternatives that we have
21 for this 4.2 million cubic yards of material that
22 we have coming out of New Haven.

23 We had a meeting back in January of this
24 year, where we essentially ran through these
25 alternatives. Two alternatives have been added to

1 this list: The West River borrow pit, which was
2 identified in our January meeting, and then a
3 potential confined aquatic disposal cell. And
4 we'll talk about this in a couple minutes.

5 Next slide, please. Before we go into
6 detail on all the placement sites, I'll go through
7 a brief discussion of how the sediment that are
8 going to be dredged are characterized.

9 Using the study's initial design that
10 Barbara had talked about previously, a sample and
11 analysis plan was developed that was intended to
12 characterize the sediment using that largest
13 project footprint. So an expanded turning basin
14 and 42-foot depth is what we sampled for. Because
15 you'll see chemistry takes a long time to sample,
16 to analyze, and then to make sense of the results.

17 Next slide, please. Sediment
18 classification and determining sediment suitability
19 for alternative placement options is determined by
20 a tiered process of sampling, testing, evaluating,
21 and modeling. These processes are all aimed at
22 determining the risk of contaminants to human
23 health and ecological health.

24 Next slide. Sediment classification is
25 basically done with a tiered process. As you can

1 see here in the pyramid, tier 1 is basically
2 examining the history of harbor testing, looking at
3 the industry that's in the Harbor. So basically
4 evaluating existing data. Tier 2 is the actual
5 physical sampling and testing to determine the
6 physical nature of the sediment, is it sand, is it
7 silt, and what the chemistry is. It should be
8 noted that chemical concentrations alone are not a
9 driver of -- a reliable tool for determining a
10 sediment's toxicity. That really comes in tier 3
11 and tier 4.

12 Tier 3 involves performing water column
13 testing of the sediments, water column chemistry,
14 performing toxicity on testing on benthic
15 organisms, the critters that actually live in the
16 sediments, and then bioaccumulation testing on
17 organisms that are exposed to the sediments for a
18 period of time. These are the real drivers that
19 determine the toxicity. And then also performing
20 sub-lethal bioaccumulation tests and risk models
21 that basically evaluates ecological -- potential
22 for ecological risk and human health risk.

23 This tiered methodology allows us to
24 assess the actual effects of the sediment's
25 chemistry to biological organisms and through

1 modeling to human and ecological health.

2 For the New Haven Harbor project, all the
3 testing results that I discussed can be found in
4 Technical Supporting Document 1 on our website,
5 which we'll leave up at the end and, as Barbara
6 pointed out, is on your Fact Sheet.

7 And if you just want a simple breakdown
8 of the chemistry results and toxicity tests, I'll
9 refer you to Appendix J, which is the suitability
10 determination for the material. Both of those
11 documents are on the Corps website.

12 Next slide. Dredge material which is
13 found to be toxic or poses significant risk to the
14 environment or human health is deemed unsuitable.
15 Such materials must be managed to isolate them from
16 the environment or undergo some kind of treatment
17 to reduce their level of contaminants to the point
18 that other uses or placement options may become
19 acceptable.

20 Only materials that are deemed to be
21 nontoxic and low risk are suitable and may be
22 placed unconfined in open water. So we have
23 suitable and unsuitable material.

24 This slide just shows the decision-making
25 process in flowchart form. Sediment proposed for

1 dredging is tested. If it fails the toxicity test,
2 the tier 3 testing that I talked about before, it's
3 deemed unsuitable. Bioaccumulation tests, if it
4 passes the toxicity, are performed. And then the
5 models are prepared. And if there is significant
6 risk found, it's deemed unsuitable.

7 Next slide. So here's the initial
8 New Haven Harbor footprint that we have and the
9 samples that we took. As you can see, we had in
10 the inner harbor, there were six transects that
11 were represented by 17 stations.

12 These transects cover the areas that we
13 were looking to improve, the widening and the
14 deepening alternatives, as well as that expanded
15 turning basin to the north. I'll show you another
16 picture in just a second and we'll discuss that
17 turning basin.

18 Next slide. And then in the outer harbor
19 we had six stations that were represented by those
20 two transects that you can see there with the green
21 dots.

22 Next slide. Here's just a quick graphic
23 that illustrates how the samples are obtained. A
24 coring device is vibrated down through the sediment
25 to the proposed depth you want to get to. The core

1 is then sampled for the chemistry and physical
2 parameters. And then gallons of all of this
3 sediment are collected to prepare those water
4 column tests and toxicity tests.

5 Next slide. So if we go back to that
6 tiered evaluation concept, the chemistry data for
7 each sample -- I'm sorry -- the chemistry data for
8 New Haven, which, again, I said can be found in
9 Technical Supporting Document 1, or Appendix J,
10 basically dictated that we move into biological
11 testing.

12 And so here are the results of the
13 biological testing for New Haven. Using the tiered
14 testing approach, the first decision point is the
15 whole sediment toxicity test. That's what you'll
16 see in the second and third columns there.

17 This test uses two different species that
18 are representative of native fauna. And as you can
19 see, all the transects passed for the amphipod
20 *Leptocheirus*. That's the second column. However,
21 in the third column, there was composite 6, failure
22 for the *Americamysis*. That's a kind of shrimp. So
23 that, according to our hierarchy, would kick it
24 into unsuitable material.

25 The water column testing, which is in

1 column 7, basically met the required standards for
2 all but transects 6 and 7. So again, back to the
3 hierarchy testing, transects 6 and 7 failed that.
4 They are deemed unsuitable.

5 So today, as it stands right now,
6 transect 1 and 2, which were in the outer harbor,
7 and then transects 3, 4, and 5, which are in the
8 kind of mid-harbor region, and then transect 8,
9 which is all the way up in the top at the head of
10 navigation, are considered to have suitable
11 material, and transects 6 and 7 are considered to
12 have unsuitable material.

13 So if we zoom in and examine the two
14 transects that are currently unsuitable, we see
15 they encompass both the channel area to the east
16 and that expanded turning basin that was expanded
17 to the west and to the north in our initial design.

18 So if you see, the map on the right shows
19 that the existing location of this widened -- so
20 that's the existing location of the turning basin,
21 right? But the expanded footprint actually
22 overlaps into what is currently a 16-foot anchorage
23 area right there.

24 So the reason I'm bringing this to your
25 attention is as the project progressed, we had

1 in-depth discussion with the pilots, as well as
2 running the ship simulation model, it was
3 determined that that expanded turning basin wasn't
4 needed.

5 So as a result, the footprint of the
6 turning basin is being reduced. And essentially
7 it's being pulled out of that 16-foot anchorage
8 area. And the reason that's relevant is because
9 that 16-foot anchorage area hasn't been dredged
10 since the 1950s. So we think that may be a driver
11 of the failures.

12 Next slide, please. So we have made the
13 Corps go back out and resample in those areas with
14 a reduced footprint. Here is an overlay of the
15 reduced turning basin design and the additional
16 sampling that we're doing in green. These
17 sediments will be evaluated with that tiered
18 testing.

19 So as of today, our conclusions indicate
20 that we may have unsuitable material to manage.
21 And as such, we've included a CAD cell in the
22 placement alternatives I'll discuss in just a
23 second.

24 But it should be noted that should the
25 data from the sampling of this reduced footprint

1 show the material to be suitable because it's been
2 pulled out of that old 16-foot anchorage, a CAD
3 cell may not be needed.

4 So what is a CAD cell? Basically, a CAD
5 cell is short for a confined aquatic disposal cell.
6 And it's a way to sequester unsuitable material.

7 If a CAD cell is required, this schematic
8 shows the general process behind the creation of
9 one. You find an area where you have suitable
10 material and dig that out, and then fill the cell
11 with the unsuitable material. And then following
12 the filling, you cap it with a layer of suitable
13 material.

14 So with that one in mind, I'll go through
15 all the placement alternatives that were carried
16 forward in the study.

17 The base plan consists of two borrow
18 pits, one at the entrance of the West River, and
19 one borrow pit in Morris Cove. Now, these two
20 alternatives will be used to place only suitable,
21 silty material. The plan would be to fill these
22 pits to the elevation that are within 1 to 2 feet
23 of their surrounding elevations.

24 Some of the silty sand that we have from
25 the outer harbor can be placed in an area behind

1 the east breakwater, represented by that blue
2 triangle. That's just a conceptual area. The
3 material wouldn't take up that whole area.

4 But the idea there would be to raise the
5 bottom elevation slightly and create a slightly
6 sandier bottom than currently exists to create a
7 better substrate for oyster habitat.

8 As Barbara noted, there's going to be
9 some blasted rock coming out from between the east
10 and middle breakwater. That material would be
11 placed just to the south of the west breakwater,
12 where Lisa is circling, basically to create a rock
13 reef for habitat.

14 And then the remainder of the suitable
15 material, which, again, is mostly silt, would be
16 placed at the central Long Island Sound disposal
17 site. It's not shown on this map, I'll give it on
18 the next one, but just a little bit south of
19 New Haven Harbor.

20 There is also an additional beneficial
21 use alternative within the plan that's beyond the
22 federal base plan. This involves using the silty
23 material to create approximately 70 acres of salt
24 marsh and tidal creeks in the vicinity of Sandy
25 Point in West Haven. There were a lot of questions

1 last night as to where that line is. It's
2 basically from -- if you know the West Haven boat
3 ramp out to Sandy Point, the area essentially in
4 front of the sewage treatment plant.

5 And then also as I noted during the
6 sediment characterization and CAD cell discussion,
7 a potential CAD cell has been planned in the event
8 that we need to manage unsuitable material. And
9 the proposed cell is located just to the west of
10 the channel in the vicinity of Sandy Point, where
11 Lisa just pointed to.

12 Next slide, please. This is just a
13 closer look at the base plan placement sites.
14 About a million cubic yards will be placed
15 throughout these sites in the Harbor, and the
16 remainder will be placed out at central Long Island
17 Sound to cover up historic disposal mounds that
18 were placed out there before sediment testing
19 requirements came into being.

20 And should a CAD cell be required, the
21 material that would be excavated from that, the
22 suitable material, would be placed at one of these
23 alternatives, and the unsuitable material would be
24 placed in the CAD cell.

25 Next slide. The beneficial use placement

1 site above the base plan, it's the salt marsh that
2 I was talking about. About 840,000 cubic yards of
3 silt could fit in there.

4 From this perspective, it's basically --
5 well, like I said, from the boat ramp out to Sandy
6 Point. And we would keep that sandy beach feature
7 and the little marsh and lagoon feature. And it
8 would be meant to basically complement that
9 sanctuary.

10 Next slide. This slide is a summary of
11 projected measures that, once we get through the
12 process, we could use the protect resources in
13 New Haven Harbor. Construction windows for
14 dredging and blasting would be used to minimize
15 impacts to essential fish habitat, shellfish,
16 anadromous fish resources, and marine mammals.

17 The Corps also performed a series of
18 cultural resource studies in the project area, and
19 didn't uncover anything within the project's
20 footprint that would need to be protected from a
21 historical perspective.

22 Next slide. This is the details of the
23 coordination efforts that are ongoing for the
24 project. And so these are all documented in the
25 EIS.

1 In terms of the public involvement with
2 the project, we had the scoping meetings in January
3 2017, public information meetings in 2018, and are
4 now into the public review process of the EIS.

5 The website is there in green, but in the
6 very last slide it will be in big letters.

7 Next slide. Finally, here is the
8 projected schedule. As I noted, we're currently in
9 the 45-day review period for the draft EIS and
10 Feasibility Report. The comments are due,
11 requested by November 15th.

12 Following the review of the comments, the
13 agency and the sponsors will come to a decision
14 point and move towards a final report. And then
15 this final report will be circulated again for
16 comment.

17 So on behalf of Barbara and the whole
18 New Haven team, thanks for your interest in the
19 project, and thanks in advance for your review of
20 the documents. I'll turn it back over to Mark.

21 MR. HABEL: Okay. Thank you, Barbara,
22 and thank you, Todd.

23 The hearing tonight will be conducted in
24 a manner so that all who desire to express their
25 views will be given an opportunity to speak. To

1 preserve the right of all to express their views, I
2 ask that there be no interruptions.

3 When you came in, copies of the Fact
4 Sheet and procedures to be followed at this hearing
5 were available. If you did not receive these, both
6 are available at the registration table. I will
7 not read either of them, but they will be entered
8 into the record.

9 The record of this hearing will remain
10 open, and written comments may be submitted
11 tonight, sent by email or by email through
12 November 15th, 2018.

13 All written comments will receive equal
14 consideration with oral statements made this
15 evening. And both oral and written comments will
16 be considered in the development of a Final
17 Integrated Feasibility Report and Environmental
18 Impact Statement.

19 We need your participation throughout the
20 entire process. And I thank you for contributing
21 your comments and thoughts tonight. A transcript
22 of this hearing is being made to ensure a detailed
23 review of all comments. A copy of that transcript
24 will be available at the Corps Concord,
25 Massachusetts headquarters for review, posted on

1 the Corps website for your use, or you may make
2 arrangements with the stenographer for a copy at
3 your own expense.

4 Anyone who does not comment today but
5 wishes to send written comments may do so. Please
6 forward those comments to the Corps project
7 manager, Barbara Blumeris, at the Corps New England
8 district office located in Concord, Massachusetts.

9 When making a statement tonight, please
10 come forward to the microphone and state your name.
11 If you are speaking for or representing a position
12 of an organization, please say so.

13 Since there are only five people who
14 signed up to speak tonight, we will dispense with
15 the three-minute clock, but, again, I do ask you to
16 be brief and address any more lengthy comments in
17 writing to the Corps.

18 The first individual to provide comment
19 for the record tonight is Allison Dodge,
20 representing Congresswoman Rosa DeLauro. Allison?

21 One more thing, please. The microphone
22 we have over here is held up with some tape.
23 Please don't try to move it around. And despite
24 our turning all of the volumes down to zero, it's
25 still pretty loud. So if you'd step back a foot or

1 two, we'll see if that works. So Allison?

2 MS. DODGE: Good evening. My name is
3 Allison Dodge. I am the Outreach Coordinator for
4 Congresswoman Rosa DeLauro. She asked me to
5 deliver a statement on her behalf this evening.

6 Many thanks to the Army Corps of
7 Engineers for their work to complete the Draft
8 Integrated Feasibility Report and Environmental
9 Impact Statement for the New Haven Harbor
10 Navigation Improvement Project.

11 As I am sure you are aware, the deepening
12 of the federal navigation channel in the New Haven
13 Harbor is a priority of the New Haven Port
14 Authority, the City of New Haven, as well as the
15 various businesses that populate the port district.

16 As the highest volume commercial shipping
17 port on Long Island Sound, and the largest
18 deep-water port in the state of Connecticut,
19 New Haven Harbor is an integral component to the
20 regional economy and represents a key connection in
21 the transportation network that includes water,
22 rail, road, and pipelines.

23 Already today, many vessels destined for
24 the port must lighter their cargo before they can
25 enter because the navigation channel is simply too

1 shallow for some more modern ships. With
2 ever-advancing technologies and shipmaking design,
3 deepening the navigation channel is critical.

4 Having had the opportunity to review the
5 Integrated Feasibility Report and Environmental
6 Impact Study, I wanted to express my overall
7 support for the project's Tentatively Selected
8 Plan.

9 I was pleased to see that the Corps was
10 thoughtful in their approach to the disposal of
11 dredge materials, including the beneficial use plan
12 in addition to open water disposal.

13 However, I do have some concerns with the
14 inclusion of the repositioning of the Cross-Sound
15 Cable and the total project cost. I will be
16 submitting separate comments to the Corps on that
17 issue.

18 I have long advocated for this
19 infrastructure upgrade, and look forward to working
20 with the Corps, New Haven Port Authority, and the
21 Connecticut Port Authority to move this project
22 forward. Thank you.

23 MR. HABEL: Thank you, Allison.

24 Next up will be John Cox.

25 MR. COX: Good evening. My name is John

1 Cox. I live at 235 Townsend Avenue, across from
2 the seawall overlooking the borrow pit. I've been
3 involved in Army Corps of Engineers hearings and
4 meetings on this since the ill-fated Bridgeport
5 dredging proposal in 2010.

6 And I think most of us remember that,
7 where they were proposing to move the toxic waste
8 from Bridgeport into the Morris Cove borrow pit.

9 At the January public meeting held this
10 year, the Army Corps of Engineers acknowledged the
11 public's comments, and agreed that going forward
12 they would not make any similar proposals and would
13 only recommend that clean DEEP and EPA-approved
14 fill would go in there. And that was absolutely
15 what the community was looking for.

16 The current plan makes good on that
17 promise. And by eliminating the borrow pit, which
18 was basically an environmental mistake, created a
19 huge dead zone right in the middle of the cove,
20 what they're going to be doing is restoring life to
21 that area, which is now dead -- and that is a very
22 good thing -- by using the 600,000 cubic yards of
23 fill, with sediment from the dredging project.

24 I applaud this move on the part of the
25 Corps, and support your initiative. I think this

1 project is good for New Haven's economy, and it's
2 also good for the environment in Morris Cove. So
3 thank you very much.

4 MR. HABEL: Thank you, Mr. Cox.

5 Next up will be Charlie Jonas.

6 MR. JONAS: Good evening. I'm one of the
7 pilots that was at the Army Corps of Engineers
8 research and development facility down in
9 Vicksburg, Mississippi.

10 And I can't speak more highly of that
11 system that they have and the simulator. It's
12 really, really excellent. We tested the limits of
13 different drafts and different widths of the
14 channel. And of course, we came up with a draft
15 deeper than the Army Corps came up with, but that
16 was on our wish list.

17 New Haven Harbor has a channel depth
18 right now of 35 feet. To bring a ship in at low
19 tide, we have 2-foot underkeel clearance and we
20 have 2-foot squat for the ships. And that went
21 down to 31 feet at low water.

22 So the pilots, because of the width of
23 the channel, we do one-way transits. Also, when we
24 have the deeper draft ships come in, we add a foot
25 for every hour of tide to that 31 foot. The

1 maximum draft we bring in is 37 feet. Only two of
2 the facilities are authorized for 37 feet.

3 With the inbound deep draft ships, we
4 bring them in on a rising tide. And that's when we
5 have a strong westerly set. And the biggest
6 problem we have, as you heard, is making a turn at
7 the jetties, a 35-degree turn. We're getting set
8 to the left from the flood tide, and then the stern
9 of the ship gets close to the bank, which is a very
10 steep bank. It's 48 foot in some spots right
11 inside the channel, but right outside the channel
12 it's 22 feet. So we get a lot of suction in there
13 that keeps trying to turn the ship to starboard.

14 We can do it safely, but we're at the
15 limits with this draft and at this stage of the
16 tide that we're bringing ships in. But we're at
17 the limit. We can't do any deeper or any bigger
18 ships. The maximum length overall ship we can
19 bring is in now is 750 feet. And that's the limit.

20 So the pilots requested that -- this is
21 our wish list again -- 45-foot draft channel, which
22 we're not going to get. We'll get 40 feet, but we
23 can live with that. And to make the channel 300
24 feet wider. But we're looking at a hundred feet
25 wider.

1 And the big thing is the turn, making the
2 turn. We have to make two gradual turns instead of
3 one sharp turn. And then we also need the sloping
4 banks where they make the channel deeper to
5 eliminate the effects of bank cushioning.

6 So we're in favor of this. And now that
7 we know the limits that we're going to go to 40
8 feet, we can look at the width of the channel and
9 the bend there. So thank you.

10 MR. HABEL: Thank you, Mr. Jonas.

11 Next up is Renate Blau.

12 MS. BLAU: Renate Blau. I also live just
13 off of the seawall. I look down the road and there
14 it is. And I also overlook the borrow pit. And
15 I'm one of many neighbors who have been following
16 this process with a lot of anxiety about what goes
17 into that borrow pit, and hoping that the Corps
18 would come around to see our perspective of wanting
19 that water to stay clean and pristine and useful to
20 both the animals as well as for our recreational
21 purposes. And you've done that.

22 So I'm here to thank you. Thank you for
23 keeping an open mind, and traversing this long,
24 long period of time to the point where you can see
25 doing something that's both good for us and good

1 for New Haven Harbor as well. So thank you.

2 MR. HABEL: Thank you, ma'am.

3 And next is John Hilts.

4 MR. HILTS: Good evening. My name is
5 John Hilts. I'm a self-employed consultant who has
6 30 years of experience in marine construction
7 permitting for regulatory matters such as dredging.

8 Having read your study, one thing I
9 noticed was a lack of alternatives that were, you
10 know, presented for cost-effectiveness and also
11 lessen the environmental impact. I hope that
12 during the comment period, some of these might be
13 included for further review.

14 And in addition, I wish to note that by
15 my estimation, the project seems to benefit greatly
16 several private corporations who have terminals in
17 the New Haven Harbor, and I'd like to know further
18 the commitment on their part to remain in the
19 Harbor after this project is completed so that the
20 benefits in transit that we've seen on your slides
21 are realized as opposed to not being realized.
22 Thank you.

23 MR. HABEL: Thank you.

24 That was it for the people who signed a
25 card wishing to speak. Is there anyone else in the

1 audience who did not fill out a card, but wishes to
2 speak? Could you please come down to the podium --
3 or down to the microphone, state your name and town
4 of residence for the record.

5 MR. GILBERTSON: Good evening. Terry
6 Gilbertson, New Haven, Connecticut, 61 East Grand
7 Avenue in New Haven.

8 And I've had a chance to review your
9 rather remarkable and comprehensive report, and I
10 thank you all and the Corps for its very good work.

11 I can't help but notice and wish to bring
12 to your attention the Cross-Island Cable issue. On
13 page ES-6 of your report, you have a final -- first
14 cost construction cost of 65, \$66 million.
15 However, the cable enforcement action cost is
16 \$32 million.

17 And there may be those of us in this
18 room, I believe in 2000 might have even been in
19 this room, where we talked about the Cross-Island
20 Cable and how it was not supposed to have this
21 effect on this particular project.

22 Further, in your report, on other pages
23 in your report, you do identify the Cross-Island
24 Cable is responsible for the cost of relocation
25 down to 48 feet. It did not achieve -- for several

1 reasons, it did not achieve that. And I encourage
2 you to continue your efforts to enforce that
3 earlier 2002 permit.

4 I am concerned that we've added to the
5 construction cost of this project rather
6 remarkably, presuming that Cross-Island will not
7 perform in its duty. Cross-Island does not provide
8 any benefit whatsoever to the state of Connecticut.
9 And I encourage you to persist in our enforcement
10 efforts. Thank you.

11 MR. HABEL: Thank you. Is there anyone
12 else who wishes to speak tonight?

13 Okay. John, the floor is yours.

14 MR. KENNELLY: Thanks, Mark. We have
15 heard many thoughtful statements this evening.

16 All of the comments received tonight as
17 well as the written comments we receive during the
18 review period will be considered in the development
19 of the final integrated feasibility report and EIS.

20 Written statements may be submitted to
21 the Corps of Engineers until November 15th, 2018.
22 They will receive equal consideration with those
23 presented today.

24 We at the Corps of Engineers extend our
25 appreciation to all who took the time to involve

1 themselves in this public review process and the
2 City of New Haven for the use of this fine facility
3 tonight.

4 I'd like to thank you all for taking time
5 to provide us with your thoughts, your comments,
6 and your concerns. Goodnight.

7 (Whereupon, this public hearing was
8 concluded at 7:29 p.m.)

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I hereby certify that I am a Notary Public, in and for the State of Connecticut, duly commissioned and qualified to administer oaths.

I further certify that the record of the proceedings held in the matter was taken by me stenographically in the presence of counsel and reduced to typewriting under my direction, and the foregoing is a true and accurate transcript of said proceedings.

I further certify that I am neither of counsel nor attorney to either of the parties to said matter, nor am I an employee of either party to said matter, nor of either counsel in said matter, nor am I interested in the outcome of said cause.

Witness my hand and seal as Notary Public this 4th day of November 2018.

Janet C. Phillips
Notary Public

My Commission expires:
October 31, 2021

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