



Connecticut Department of
Energy & Environmental Protection
Bureau of Water Protection & Land Reuse
Land & Water Resources Division

LWRD License Application Form D

Certificate of Permission

All sections of the LWRD application, when applicable, must be posted to the DEEP LWRD FTP site as instructed on Part VII of the LWRD Transmittal Form. See [LWRD Application Instructions](#) for general guidance.

Application Number (as assigned in CPPU e-mail): **202207043**

Applicant Name (same name used on Part III of the LWRD Transmittal Form): **District of Chapman Beach**

Part I: Pre-Submission Consultations

The application process requires preliminary coordination and input from other agencies/groups depending on the activity and the location. Consultations with other agencies must occur prior to application submission. Please allow 6-8 weeks for the necessary coordination. For this application, the applicant should start with these consultations, as applicable (See Part VII for further guidance).

Attachments:

- | | | | |
|----|-------------------|----|--|
| 20 | NDDB | 23 | Fisheries |
| 21 | Wildlife- osprey | 24 | Aquaculture |
| 22 | Dredging Projects | 26 | Shellfish Commission (for beach
nourishment/groin replacement only) |

Part II: Notifications

If your town has a Harbor Management Commission, submit a copy of this completed application by certified mail to the Commission and submit the certified mail receipt as Attachment 6 following this form.

Part III: Site and Resource Information

1. SITE ADDRESS

Address: **Chapman Ave.**

City/Town: **Westbrook** State: **CT**

Zip Code: **06498**

Part III: Site and Resource Information (continued)

2. MUNICIPAL ZONING

Is the proposed work consistent with municipal zoning requirements?

☒ Yes ☐ No If no, explain:

3. WATERBODY/WATERCOURSES/WETLANDS

List names of all waters impacted by the proposed activity: **Long Island Sound**

4. INDIAN LANDS

Is the activity that is the subject of this application located on federally recognized Indian lands? ☐ Yes ☒ No

5. AQUIFER PROTECTION AREAS

Is the site located within a mapped Level A or Level B Aquifer Protection Area, as defined in CGS section 22a-354a through 22a-354bb?

☐ Yes ☒ No If yes, check one: ☐ Level A or ☐ Level B

If Level A, are any of the regulated activities, as defined in RCSA section 22a-354i-1(34), conducted on this site? ☐ Yes ☐ No If yes, and your business is **not** already registered with the Aquifer Protection Program, contact the aquifer protection agent or DEEP to take appropriate action.

For more information on the Aquifer Protection Area Program, contact the program at 860-424-3019 or visit the website at www.ct.gov/deep/aquiferprotection. See LWRD Application Instructions for further guidance.

6. CONSERVATION OR PRESERVATION RESTRICTIONS

Will the activity which is the subject of this application be located within a conservation or preservation restriction area? ☐ Yes ☒ No

If yes, provide proof of written notice of this application to the holder of such restriction, and/or or a letter from the holder of such restriction verifying that this application is in compliance with the terms of the restriction, as Attachment 8.

7. LICENSE HISTORY

Indicate the number and date of issuance of any previous state permits or certificates issued by DEEP or USACE which authorized work at the site, and the names to whom they were issued.

<i>License/Permit/COP Authorization Number and Name of Agency</i>	<i>Date Issued</i>	<i>Name of Permittee/ Certificate Holder</i>	<i>Brief Description of Work Authorized</i>
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There are no known permits for the existing concrete and stone groins which have apparently existed since the late 1950s based on an embedded seashell date stamp on Groin D.

8. SOIL AND/OR GROUNDWATER REMEDIATION

Does the site work include soil and/or groundwater remediation? ☐ Yes ☐ No

If yes, please provide reference documentation including a) plan views of the site showing the area of contamination and b) a summary of remediation with chemical analysis, clean-up status, and remediation program identification, as Attachment 9.

Part III: Site and Resource Information (continued)

9. ENFORCEMENT HISTORY

Is this application associated with a formal or informal enforcement action that is pending with DEEP?

☐ Yes ☒ No

If yes, please provide the enforcement action reference number and name of the DEEP staff contact:

Enforcement Action #:

DEEP Division/Program:

DEEP Staff Contact:

If the property was the subject of any historical enforcement actions known to the applicant, explain:

10. Regulatory Limit – See Reference Guide for Regulatory Jurisdiction for further explanation if necessary. Indicate the landward extent of the State's regulatory jurisdiction by checking one box:

☒ **Coastal Jurisdiction Line (CJL)** – for CJL information, refer to the Coastal Jurisdiction Fact Sheet and Chart.

☐ **Mean High Water (MHW)** – for projects located upstream of a tide gate, dam or weir (structure must be shown on project plans).

☐ **Tidal Wetland Boundary** – To be used if tidal wetlands are located landward of CJL or MHW. Include one foot above local extreme high water, if applicable.

11. Tidal Elevations

Provide site elevations for CJL, MHW, Mean Low Water (MLW) and the High Tide Line (HTL)* in NAVD88. For general elevation reference and conversion, please refer to USACE Tidal Flood Profiles; CO-OPS Map - NOAA Tides & Currents; or, Online VDatum: Vertical Datums Transformation.

CJL = 3.2 MHW = 1.7 MLW = -2.3 HTL = 3.2

*The HTL is necessary for USACE jurisdiction and required as part of the USACE application.

Part III: Site and Resource Information (continued)

12. Coastal Resource Impact Table

Check the applicable boxes below to identify coastal resources to be impacted by the proposed activity at the project site. Describe the impacts, as applicable. For definitions, refer to the Connecticut Coastal Management Manual.

Resource Type	square feet			Describe Impacts
	Permanent impact	Temporary impact	Mitigation	
<input checked="" type="checkbox"/> Beaches/Dunes below HTL below CJL	-500	500FT	NONE	See attached narrative (4a).
<input type="checkbox"/> Tidal Wetlands	0	0	0	See attached narrative (4a).
<input checked="" type="checkbox"/> Nearshore waters	-500	0	NONE	See attached narrative (4a).
Resource Type	Describe Impacts (temporary and permanent)			
<input type="checkbox"/> Benthic Habitat	See attached narrative (4a).			
<input type="checkbox"/> Intertidal Flats	See attached narrative (4a).			
<input type="checkbox"/> Submerged Aquatic Vegetation (SAV)	See attached narrative (4a).			
<input checked="" type="checkbox"/> Rocky Shorefront	See attached narrative (4a).			
<input checked="" type="checkbox"/> Finfish	See attached narrative (4a).			
<input type="checkbox"/> Wildlife	See attached narrative (4a).			
<input type="checkbox"/> Shellfish Areas	See attached narrative (4a).			
<input checked="" type="checkbox"/> Coastal Hazard Area	See attached narrative (4a).			
<input type="checkbox"/> Bluffs/Escarpments	See attached narrative (4a).			
<input type="checkbox"/> Islands	See attached narrative (4a).			
<input checked="" type="checkbox"/> Coastal Flooding	See attached narrative (4a).			
<input type="checkbox"/> Water Circulation Patterns	See attached narrative (4a).			
<input type="checkbox"/> Drainage Patterns	See attached narrative (4a).			
<input type="checkbox"/> Visual Quality	See attached narrative (4a).			
<input type="checkbox"/> Water Quality	See attached narrative (4a).			

Part IV: Project Information

1. Describe, briefly, the *existing* structures within state regulatory jurisdiction, and their conditions and uses at the site of the proposed work. **Provide photographs showing resources and existing site conditions as Attachment 10.**

The site is a beach and barrier seawall modified escarpment bordering the upland homes. The escarpment is developed with houses and beach cottages which have existed for decades. The site is classified as a beach, located on Long Island Sound which is classified as nearshore waters and subject to some freshwater mixing with ebbing tides from the Indian River and Cold Spring Brook. The area to the north of the beach is all developed with homes, infrastructure, seawalls and groins and would best be characterized as developed shorefront. Main beach is heavily used for open water dependent recreation and is groomed daily or weekly as necessary to maintain cleanliness (seaweed detritus and litter). Beneath the sandy beach is a rocky shorefront.

- 2a. Describe the proposed regulated work and activities in a detailed narrative, including the number and dimensions of structures and the volume and area of fill or excavations. See LWRD Application Instructions for required information.

This proposed project is to remove four stone and concrete groins, and construct four new composite concrete and wood groins, Groin B 76LF, Groin C 90LF, Groin D 88LF, Groin E 83LF in place to the same length and uniform sloping height up to the seawalls and installing end marker piles for boater safety and stairs at the MHW line on each for up and over public access and relocating stone to alongside the groins as scour protection at and waterward of the High Tide line and CJL, stone areas vary.

- b. Describe the construction activities involved for the project in detail, including methods, sequencing, equipment, and any alternative construction methods that might be employed. For coastal dredging projects, identify the type of equipment with bucket and barge capacity and, for upland disposal, provide containment facility details (See Reference for Coastal/Tidal Dredging).

The existing concrete will be broken apart then collected at low tide and removed from the site by loaders and hauling trucks using land access. Stone will be salvaged, the new wood groins will be built with sheathing and piles driven using a marine construction barge with a deck mounted crane and bolted together with wood wales for alignment and clamping. Brace piles and wales will be on both sides of the groins along the wood section and a marker pile will be driven at the end of each groin. Wehre ledge on rock preclude wood penetration, the concrete groin sections will be built, foot first based on rock then the cantilever wall up to the uniformly sloping top elevation shown all using land access.

- c. Describe any erosion and sedimentation or turbidity control installation and maintenance schedule and plans in detail. Such plans should be prepared in accordance with the 2002 Connecticut Guidelines for Soil Erosion and Sediment Control, as revised, established pursuant to CGS section 22a- 328.

This project will retain the current groin configuration of this longstanding beachfront and will create only localized turbidity but will not stir up or erode the bottom sediments and will not adversely affect water flow and circulation. The project will not change the longstanding drainage patterns of the site. There will be little turbidity as a result of the project since most of the demolition and concrete work will be done on hard, sand bottom sediments at low tide conditions. There will be no pile jetting and the piles and wood sheets will be driven at higher tides. All concrete work will be done from or on land; the wood groin sections will have to be built from water because of limited site access for pile driving equipment. Shoreline erosion control measures are not anticipated to be necessary. This project will not change longshore sediment transport patterns in the area; the sediments are mainly stone gravel and coarse sand.

- d. Anticipated date of project initiation: **Winter/Spring 2022**

Indicate the length of time needed to complete the project and identify any anticipated time restrictions: **It is anticipated that this proposed project will take approximately 6-8 weeks to complete, weather and tides permitting. The project construction may be staged over the life of the permits.**

3. After all measures to eliminate or minimize adverse resource impacts have been incorporated in the proposed project, describe why any adverse impacts that remain should be deemed acceptable by the Land & Water Resources Division. For projects involving stormwater management, low-impact development practices should be incorporated to the greatest extent practicable. Explain any reasons for not using a low-impact development practice. See LWRD Application Instructions for further guidance.

Please see 5a for alternatives.

4. The proposed work is associated with which of the following uses? (Check all that apply)
☒ Other – explain: **Community Beach**

Part IV: Project Information

3. After all measures to eliminate or minimize adverse resource impacts have been incorporated in the proposed project, describe why any adverse impacts that remain should be deemed acceptable by the Land & Water Resources Division. For projects involving stormwater management, low-impact development practices should be incorporated to the greatest extent practicable. Explain any reasons for not using a low-impact development practice. See LWRD Application Instructions for further guidance.

There are no known adverse impacts that would have to be either eliminated or minimized to make the project acceptable by LWRD, USACOE and Town. No mitigative measures are considered necessary for this project to be acceptable by the DEEP. The groin footprints will be reduced by more than 10%. In water work will minimally disrupt existing sediments and concrete groin replacement can take place in dry conditions. The project will be done in water.

Part IV: Project Information (continued)

5. If the site is a marina or yacht club, provide the following:
- Number of boat slips and moorings: (should be consistent with plans submitted as Attachment 14)
 - Type of marine sanitation service provided at the facility.
 - ☐ Check here to confirm that at least one plan view notes the location of upland support including adequate parking, a marina office, and restrooms.
 - Check the applicable services provided:

<input type="checkbox"/> boat repair/maintenance	<input type="checkbox"/> winter storage
<input type="checkbox"/> gas/fuel hook-up	<input type="checkbox"/> electric hook-up
<input type="checkbox"/> fishing amenities	<input type="checkbox"/> boating and/or equipment sales
6. If local/municipal review has or will require a Coastal Site Plan Review for activities at this site, please explain the associated upland work. **No Coastal Site Plan review is required for this project.**
7. If modifications are proposed to a pre-1995 flood and erosion control structure (FECS), please confirm:
- | | |
|-------------------------------------|---|
| N/A | Confirm |
| <input type="checkbox"/> | <input checked="" type="checkbox"/> FECS modifications will not support an increase in upland fill |
| <input type="checkbox"/> | <input checked="" type="checkbox"/> Seawall height increase is less than 12.0" and justified in Part IV, question 3. |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> If FECS consists of riprap or revetment, no more than 10% volume of new stone is proposed |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> No more than 12"-18" of new waterward encroachment for bulkhead replacement/repair with appropriate justification for the encroachment in Item 3, above. New encroachment should be measured from the outermost bulkhead whaler or piling. |
8. ☐ Check here if the proposed work is related to a pre-1939, pre-1987 (installed above MHW), and/or pre-1995 structure, and provide photographs, including dates, to document the date of installation as Attachment 11 following this form.

Part V: Engineering Support Documentation and Certification

Certain types of projects require documentation of engineering design. If you answer yes to one of the questions below, you must submit a completed *Engineering Report Cover Sheet* (DEEP-LWRD-APP-001R) as Attachment 18 along with the relevant engineering report(s).

1. Does the proposed activity include engineered structures such as bridges, culverts, stormwater management systems, detention basins, and/or flood & erosion control structures?
- ☐ Yes ☒ No

2. Is the proposed activity located in a FEMA-designated Riverine or Coastal Floodplain?

☒ Yes ☐ No

If yes, provide documentation in the Engineering Report which demonstrates that the project is in compliance with FEMA's National Flood Insurance Program requirements and the local flood ordinance for the municipality.

NOTE – Only the following activities in the Coastal Floodplain require engineering: buildings, flood and erosion control structures; public access facilities; and, tide regulating structures. See Engineering Report Cover Sheet for further guidance.

3. Is the proposed activity located in a FEMA-designated Floodway ☐ Yes ☒ No

If yes, the Engineering Report must include a statement signed by a registered professional engineer that there is no-rise. This documentation must be supported by technical data that is derived from a standard step-backwater computer model utilizing source data from the Flood Insurance Rate Map (FIRM) or Flood Boundary and Floodway Map (FBFM). If a No-rise Certification form is available through the municipality, please include it in the Engineering Report. For further information on No-Rise Certification, see No-Rise Certification for Floodways | FEMA.gov

The *Engineering Report Cover Sheet* shall be signed and sealed by a Professional Engineer licensed in the State of Connecticut. Supporting documentation as identified in the checklist may consist of engineering studies and other documentation, as appropriate, in order to describe the hydrologic and hydraulic effects of the proposed actions.

Part VI: Certificate of Permission Eligibility

Check all applicable boxes to confirm eligibility.

Pursuant to Connecticut General Statutes (CGS) Section 22a-363b(a) and (b):

Previously Authorized Structures or Activities

- ☐ A. Substantial maintenance or repair of existing structures, fill, obstructions or encroachments authorized pursuant to CGS section 22a-33 or 22a-361 or installed prior to June 24, 1939, CGS section 22a-363b(c).
- ☐ B. Maintenance dredging of areas which have been dredged and continuously maintained and serviceable as authorized pursuant to CGS section 22a-33 or 22a-361.
- ☐ C. Minor alterations or amendments to permitted activities consistent with the original permit.
- ☐ D. Placement or reconfiguration of piers, floats, docks, and moorings within existing waterward boundaries of recreational marinas or yacht clubs which have been authorized pursuant to CGS section 22a-33 or 22a-361.

Pre-1995 Structures or Activities

- ☒ E. Retention of activities completed prior to January 1, 1995.
- ☒ F. Minor alterations to activities completed prior to January 1, 1995.
- ☒ G. Substantial maintenance of any structures, fill, obstructions or encroachments in place prior to January 1, 1995, and continuously maintained and serviceable since such time.

Pre-1987 Structures

- ☒ H. Substantial maintenance or repair of structures, fill, obstructions or encroachments placed landward of the mean high waterline and waterward of the coastal jurisdiction line, completed prior to October 1, 1987, and continuously maintained and serviceable since said date.

Other Activities

- ☐ I. The removal of derelict structures or vessels.
- ☐ J. Placement of temporary structures for water-dependent uses as defined in CGS section 22a-93.
- ☐ K. Open water marsh management, tidal wetland restoration, resource restoration or enhancement activity, as defined in CGS subsection (a) of section 22a-361, including beach nourishment, and conservation activities undertaken by or under the supervision of the Department of Energy & Environmental Protection.

Pursuant to CGS Sec. 22a-363h:

- ☐ L. Living shoreline projects with consent from LWRD staff.

Part VII: Supporting Documents

The following attachments correspond to Form D. If the Attachment name is followed by "REQUIRED", the attachment must be submitted with every application. When submitting any supporting documents, please label the documents as indicated in this part (e.g., Attachment 6, etc.) and be sure to include the same applicant name used on Page 1 of this application form. Please check the box next to the attachments listed to indicate that they have been submitted, and provide the applicable attachments following this form. NOTE: Attachment numbering is NOT consecutive as the attachments relate to multiple LWRD program applications.

Attachment I.D.	Attachment Description
<input checked="" type="checkbox"/> Attachment 6	Harbor Management Notification If your town has a <u>Harbor Management Commission</u> , submit the certified mail receipt as proof that this completed application was sent by certified mail to the Commission.
<input type="checkbox"/> Attachment 8	Conservation or Preservation Restriction Information, if applicable.
<input type="checkbox"/> Attachment 9	Remediation Documentation , if applicable.
<input checked="" type="checkbox"/> Attachment 10	Photographs showing existing conditions of the site REQUIRED
<input checked="" type="checkbox"/> Attachment 11	Photographic Documentation of pre 1939, pre-1987 (above MHW) and/or pre-1995 installation.
<input checked="" type="checkbox"/> Attachment 14	Project Plans , use <u>Project Plan Checklist</u> for requirements REQUIRED
<input checked="" type="checkbox"/> Attachment 18	<u>Engineering Report Cover Sheet</u> (DEEP-LWRD-APP-001R)
<input checked="" type="checkbox"/> Attachment 20	Natural Diversity Data Base (NDDB) Completed NDDB Determination #: 202109458 If the proposed activity is within an NDDB area, complete and submit a <u>Request for NDDB State Listed Species Review Form</u> (DEEP-APP-007) to the address specified on the form, prior to submitting this application. For NDDB maps and more information, visit the DEEP website at www.ct.gov/deep/nddbrequest or call the NDDB staff at 860-424-3011. Please note NDDB review generally takes 4 to 6 weeks and may require the applicant to produce additional documentation, such as ecological surveys, which must be completed prior to submitting this permit application. A copy of the NDDB Final Determination response letter that has not expired must be submitted as Attachment 20. Include a copy of any mitigation measures or management plan developed for this activity and approved by NDDB. Please DO NOT include a copy of the NDDB Review Request/Application. Be aware that you must renew your NDDB Determination if it expires before project work commences.
<input type="checkbox"/> Attachment 21	DEEP Wildlife Division – Osprey Consultation If the proposed activity will occur within 300 feet of an osprey platform, please note that work will be prohibited between May 1 st and July 31 st unless a DEEP waiver is obtained. If this seasonal prohibition conflicts with the proposed work schedule, please contact the DEEP Wildlife Division's Wildlife Diversity Program staff at deep.wildlife@ct.gov or 860-424-3011 for technical assistance before submitting your application. If you are seeking a seasonal prohibition waiver, documentation of the waiver issued by Wildlife Diversity Program staff must be submitted as Attachment 21. For known nesting locations, reference the Osprey Map at: https://www.google.com/maps/d/viewer?mid=1GyxnB-UAGxmseleCH9ZJ4UdH1ug&usp=sharing or https://www.ctaudubon.org/citizen-science .

Part VI: Supporting Documents (continued)

- | | | |
|-------------------------------------|----------------------|--|
| <input type="checkbox"/> | Attachment 22 | Dredging Consultation Form
(REQUIRED for dredging activities only.)
If dredging is proposed, please refer to <u>Reference for Coastal/Tidal Dredging</u> and submit a completed <u>Dredging Consultation Form</u> . |
| <input type="checkbox"/> | Attachment 23 | Fisheries Consultation Form
If your project involves maintenance dredging, beach nourishment (may be required for groin replacement), or cofferdam installation, submit a completed <u>Fisheries Consultation Form</u> (DEEP-FISH-APP-007). Note: Fisheries consultation is not required for disposal only of dredge sediment at one of the open water sites (generally NY dredge projects). |
| <input type="checkbox"/> | Attachment 24 | Department of Agriculture/Bureau of Aquaculture Consultation
If your project involves maintenance dredging or beach nourishment (may be required for groin replacement), submit a completed <u>Department of Agriculture/Bureau of Aquaculture Consultation Form</u> . Consultation is not required for towns north of: Orange and Derby/Ansonia on the Housatonic River system; Lyme and Essex on the Connecticut River; and Norwich and Preston on the Thames River. |
| <input type="checkbox"/> | Attachment 26 | Shellfish Commission Consultation Form
If your town has a <u>Shellfish Commission</u> and your project includes beach nourishment (may be required for groin replacement), submit a completed <u>Shellfish Commission Consultation Form</u> . |
| <input checked="" type="checkbox"/> | Attachment 41 | <u>Applicant Compliance Information Form</u> (DEEP-APP-002) REQUIRED |
| <input checked="" type="checkbox"/> | Attachment 42 | <u>Applicant Background Information Form</u> (DEEP-APP-008) REQUIRED |
| <input checked="" type="checkbox"/> | Attachment 43 | Other Information: Any other applicable information the applicant deems relevant or is required by DEEP. |

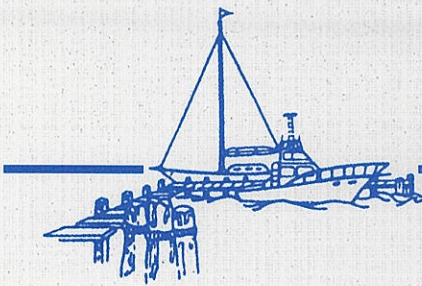
EXECUTIVE SUMMARY

Table of Contents

- Attachment 6: Harbor Management Notification
- Attachment 8: Conservation or Preservation Restriction
(if applicable)
- Attachment 9: Remediation Documentation
(if applicable)
- Attachment 10: Photographs of existing site conditions
- Attachment 11: Photographic Documentation
(Pre-1939, pre-1987 (above MHW) and /or pre-1995 installation)
- Attachment 14: Project Plans (including vicinity map an tax assessors map)
- Attachment 18: Engineering Report
(if applicable)
- Attachment 20: Natural Diversity Database (NDDB)
- Attachment 21: DEEP Wildlife Division- Osprey Consultation
(if applicable)
- Attachment 22: Dredging Consultation Form
(if applicable)
- Attachment 23: Fisheries Consultation Form
(if applicable)
- Attachment 24: Department of Agriculture/ Bureau of Aquaculture Consultation
(if applicable)
- Attachment 41: Applicant Compliance Information Form
- Attachment 42: Applicant Background Information Form
- Attachment 43: Other Information

ATTACHMENT 6

HARBOR MANAGEMENT NOTIFICATION



Docko, Inc. *Serving the waterfront community since 1987*

P.O. Box 421, Mystic, CT 06355 (860) 572-8939 Fax: (860) 572-7569, email: office@docko.com

June 28, 2022

Mr. Harry Plaut
Westbrook Harbor Management Commission
Town Hall
866 Boston Post Road
Westbrook, CT 06498

Re: CT DEEP COP

Dear Mr. Plaut:

It is required by the State of Connecticut Department of Energy & Environmental Protection, Land and Resource Division that we provide to the Harbor Management Commission of the Town, a copy of the Certificate of Permission application and application drawings.

Please feel free to call our office if you have any questions.

Very truly yours,
DOCKO, INC.

Christina Lopes
Project Administrator

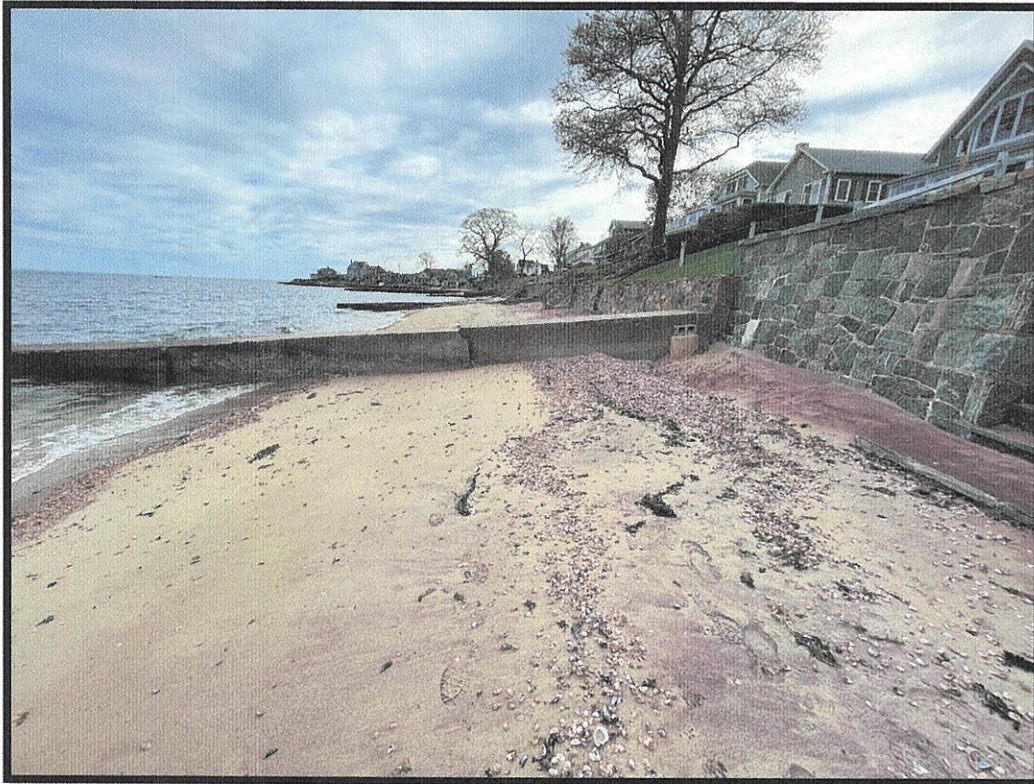
JM: cl
cc: CT DEEP/LWRD
File: 21-07-3189

ATTACHMENT 10

PHOTOGRAPHS OF EXISTING SITE CONDITIONS

CHAPMANS BEACH ASSOCIATION







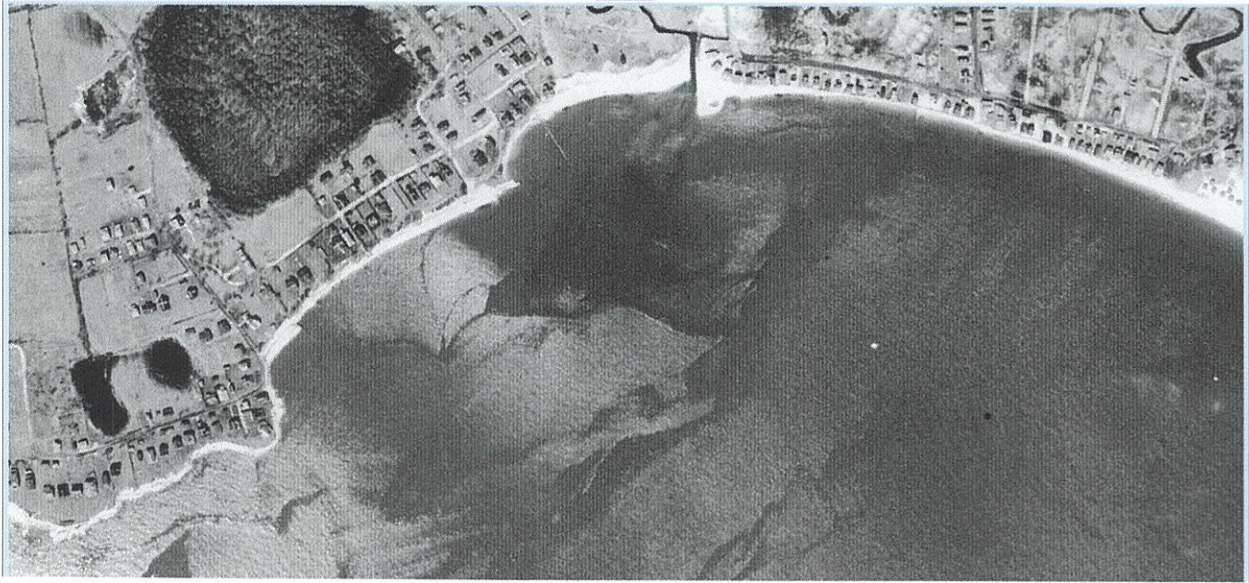
ATTACHMENT 11

PHOTOGRAPHIC DOCUMENTATION

(Pre-1939, pre-1987 (above MHW) and /or pre-1995 installation)

CHAPMAN BEACH |

1934



1957

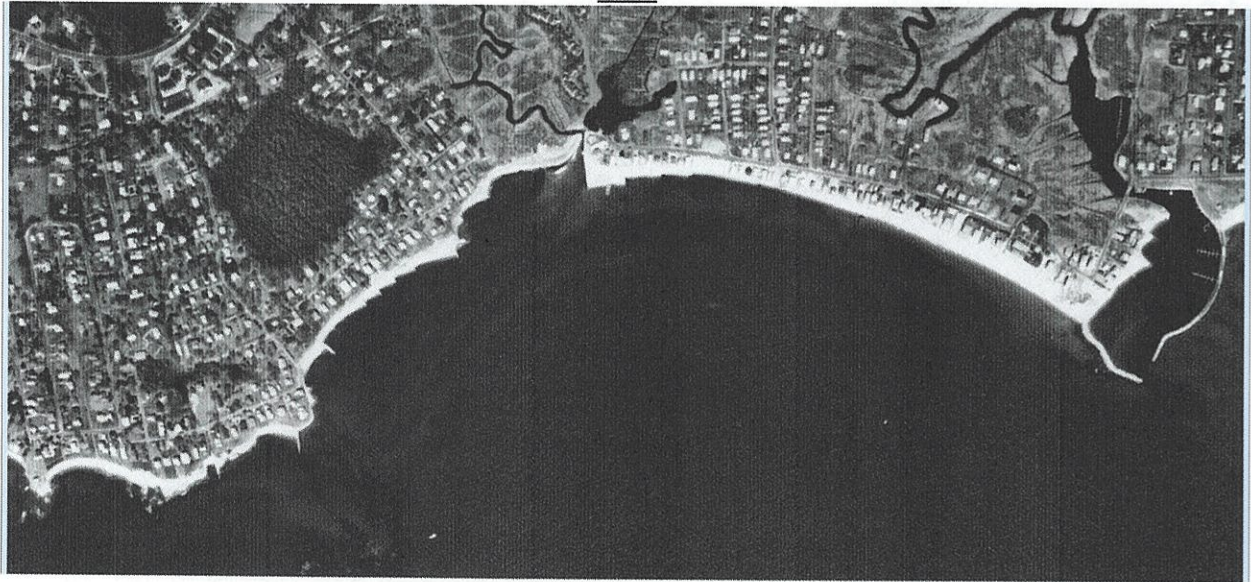


CHAPMAN BEACH |

1970



1990



CHAPMAN BEACH |

1995



2003



CHAPMAN BEACH |

2010



2015



CHAPMAN BEACH |

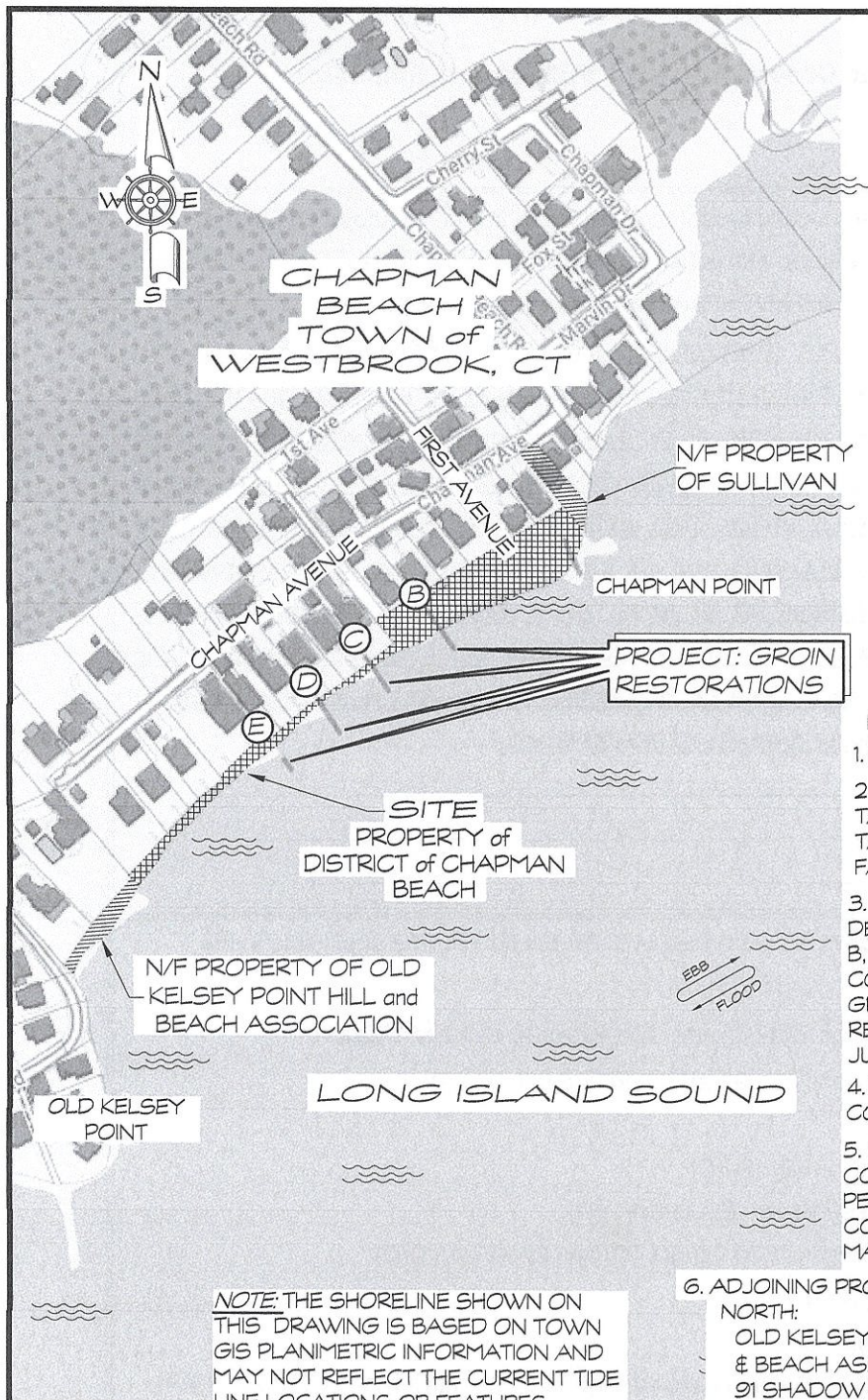
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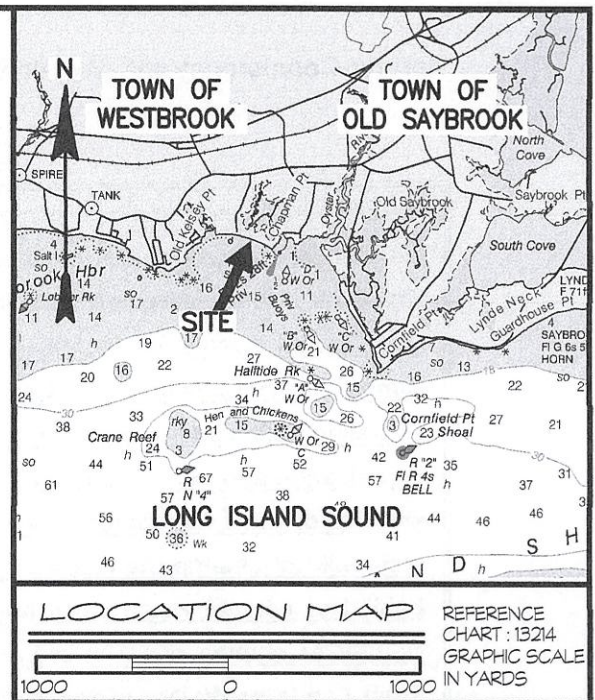
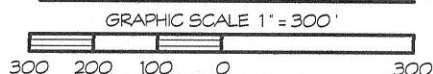
ATTACHMENT 14

PROJECT PLANS

(Including vicinity & tax assessors map)



OVERALL PLAN



NOTES:

1. ELEVATION DATUM IS NAVD '88.
2. TIDE DATA IS TAKEN FROM 2022 NOAA TIDE TABLES REFERENCE : DUCK ISLAND ROADS. CJL IS TAKEN FROM THE COASTAL JURISDICTIONAL LINE FACT SHEET : WESTBROOK
3. PROJECT DESCRIPTION: REMOVE AND REPLACE FOUR DETERIORATED CONCRETE AND STONE GROINS; GROIN B, GROIN C, GROIN D AND GROIN E WITH NEW COMPOSITE CONCRETE AND WOOD PILE AND TIMBER GROINS, LANDWARD AND WATERWARD OF THEIR RESPECTIVE MEAN HIGH WATER AND COASTAL JURISDICTION LINES.
4. PROJECT PURPOSE: TO RESTORE LONGSTANDING CONCRETE BEACH PROTECTION GROINS.
5. THESE APPLICATION DRAWINGS REPRESENT A COMPILATION OF SURVEYS FOR ENVIRONMENTAL PERMIT PURPOSES. THEY ARE NOT CONSTRUCTION CONTRACT DOCUMENTS. A TOWN BUILDING PERMIT MAY BE REQUIRED.

6. ADJOINING PROPERTY OWNERS:

NORTH:

OLD KELSEY POINT HILL
& BEACH ASSOCIATION
91 SHADOW BROOK ESTATES
SOUTH HADLEY, MA 01075

EAST:

KENNETH J & KEITH JOHN SULLIVAN
21 GOLF ST
NEWINGTON, CT 06111

PROJECT: **GROIN RESTORATIONS**

LOCATION: CHAPMAN BEACH - TOWN OF WESTBROOK
NEW LONDON COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND
DATE: JANUARY 8, 2009
APPLICANT: DISTRICT OF CHAPMAN BEACH

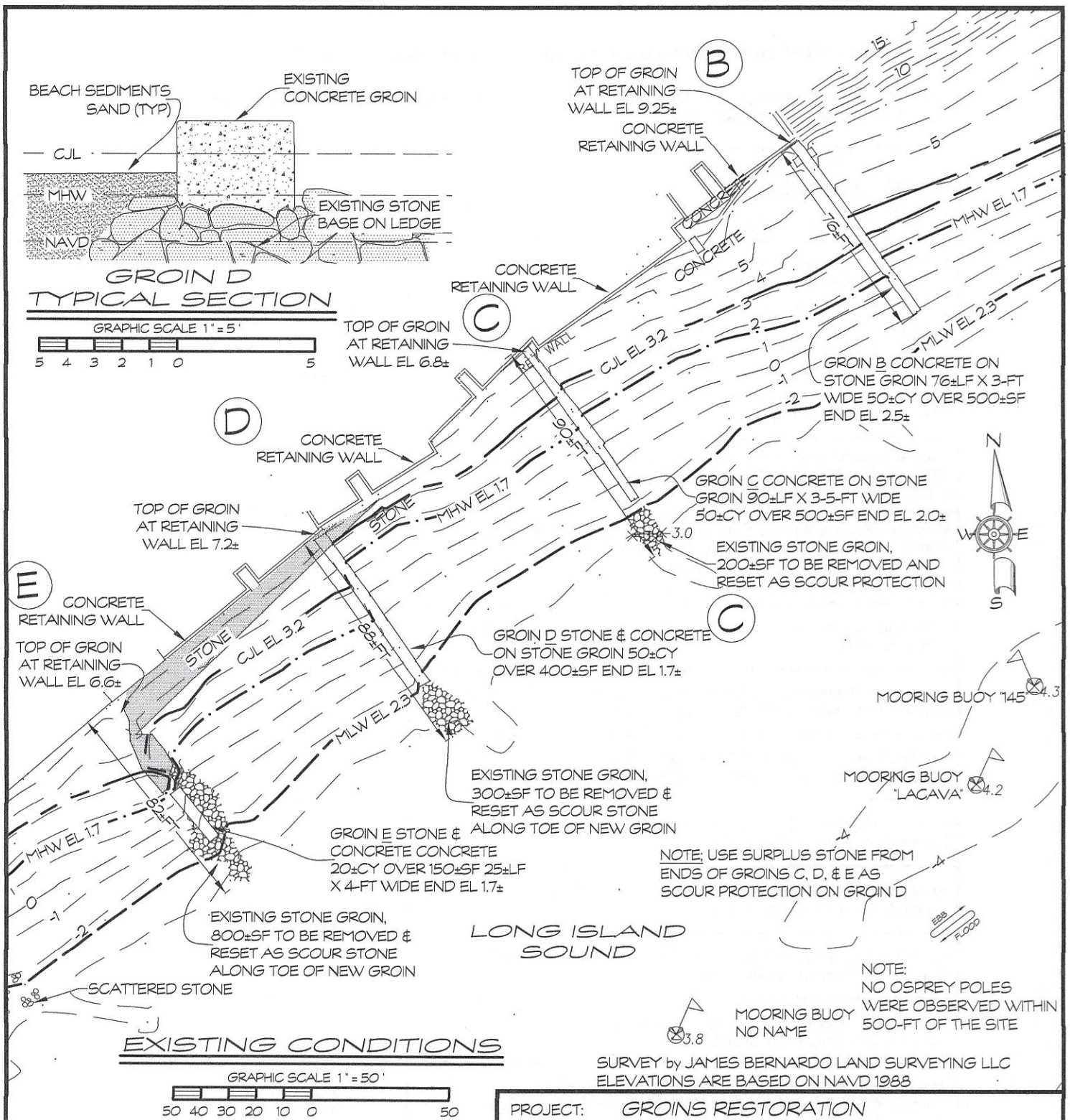
AGENT: SHEET 1 OF 5

DOCKO, INC.

Keith B. Nelson, PE
Mystic, CT 06355
860 572 8939
EMAIL: office@docko.com



DWG 21-07-3189



PROJECT: **GROINS RESTORATION**

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK
MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND
DATE: SEPTEMBER 2, 2021
APPLICANT: DISTRICT OF CHAPMAN BEACH

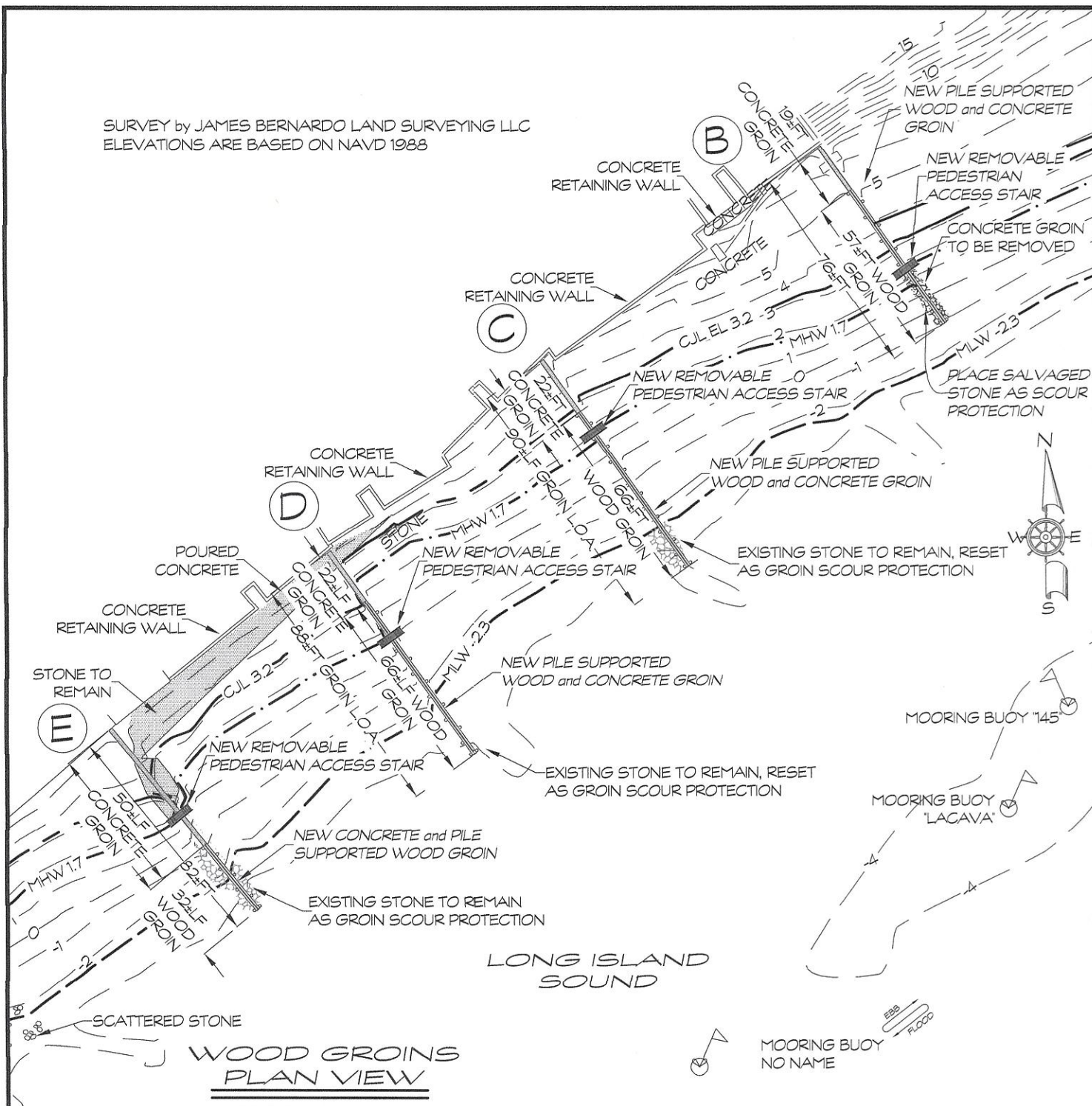
AGENT: SHEET 2 OF 5
DOCKO, INC.

Keith B. Neilson, PE
Mystic, CT 06355
860 572 8939
EMAIL: office@docko.com



DWG 21-07-3189

SURVEY by JAMES BERNARDO LAND SURVEYING LLC
ELEVATIONS ARE BASED ON NAVD 1988



PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK
MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

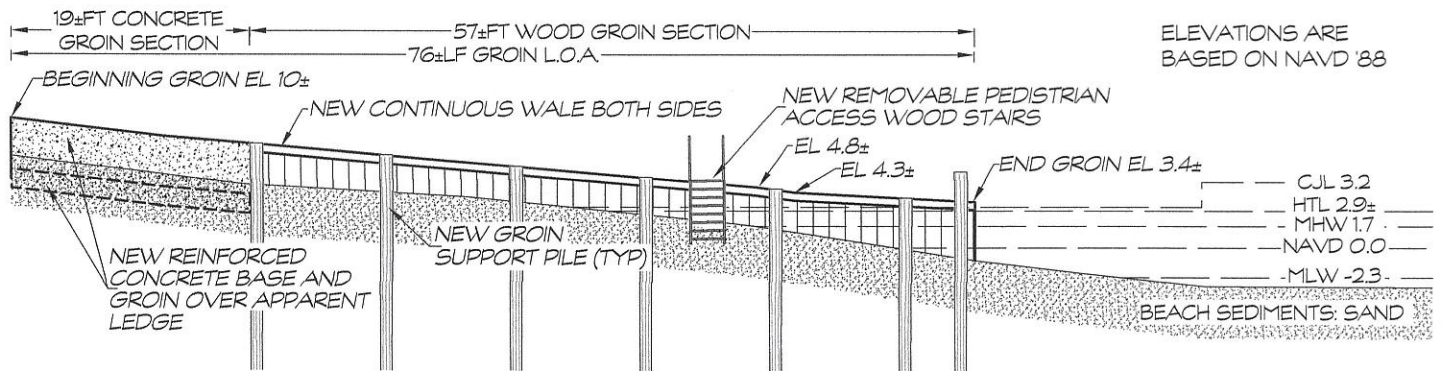
AGENT: SHEET 3 OF 5

DOCKO, INC.

Keith B. Neilson, PE
Mystic, CT 06355
860 572 8939 FAX 860 572 7569
EMAIL: office@docko.com

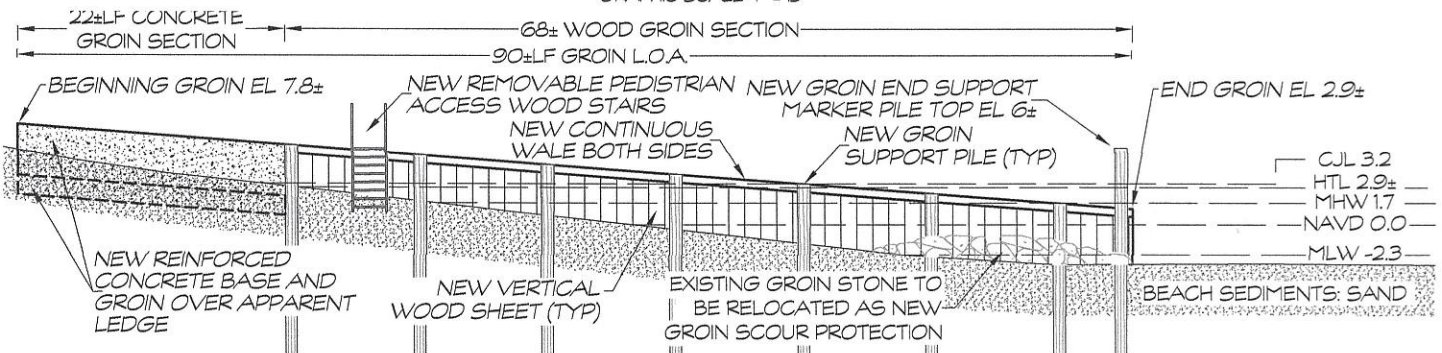


DWG 21-07-3189



GROIN B PROFILE

GRAPHIC SCALE 1" = 15'



GROIN C PROFILE

GRAPHIC SCALE 1" = 15'



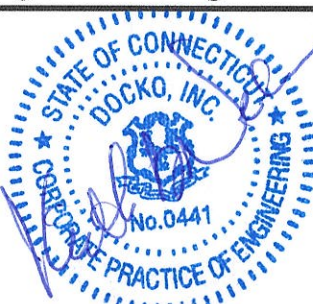
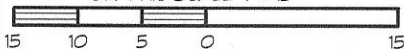
GROIN D PROFILE

GRAPHIC SCALE 1" = 15'



GROIN E PROFILE

GRAPHIC SCALE 1" = 15'



PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK
MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

AGENT: SHEET 4 OF 5

DOCKO, INC.

Keith B. Nelson, PE

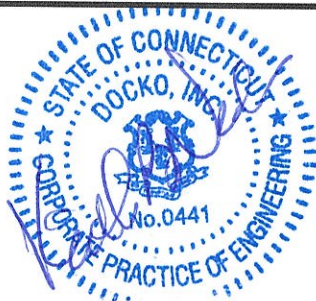
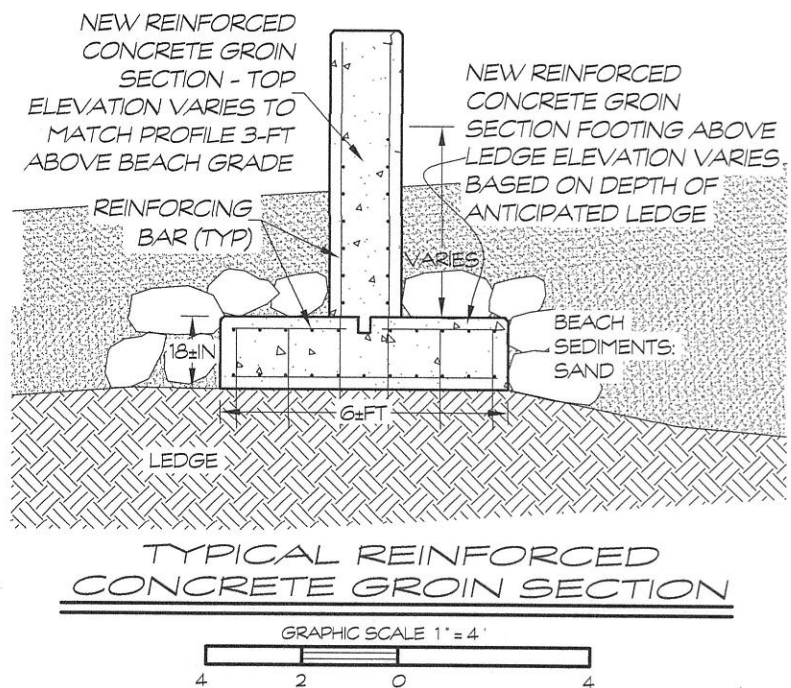
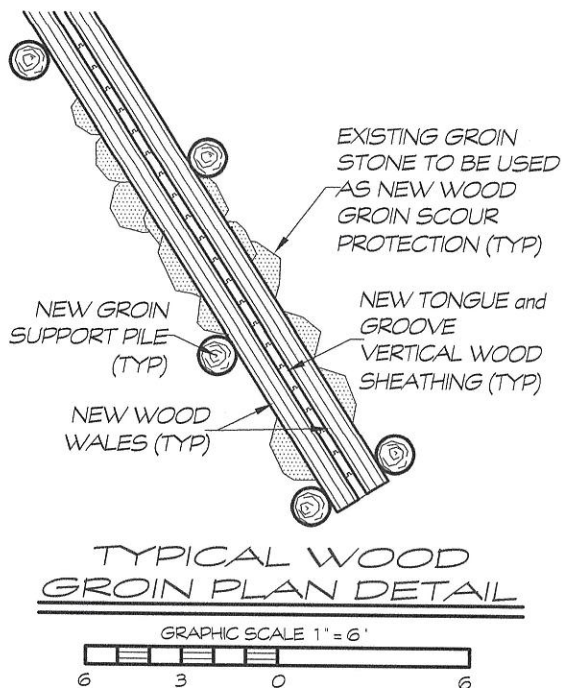
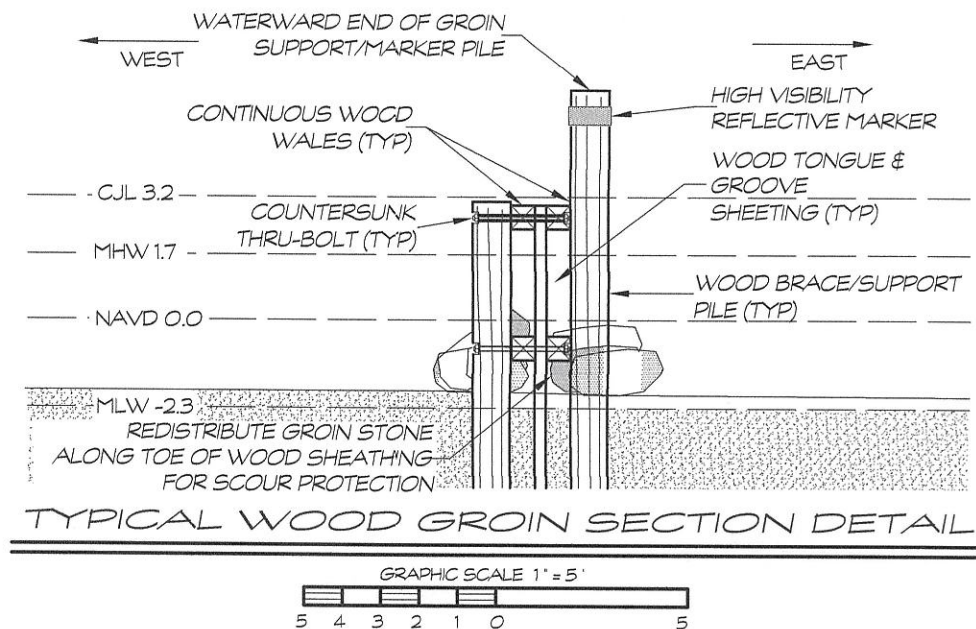
Mystic, CT 06355

860 572 8939 FAX 860 572 7569

EMAIL: office@docko.com



DWG 21-07-3189



PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK
MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

AGENT: SHEET 5 OF 5

DOCKO, INC.

Keith B. Neilson, PE

Mystic, CT 06355

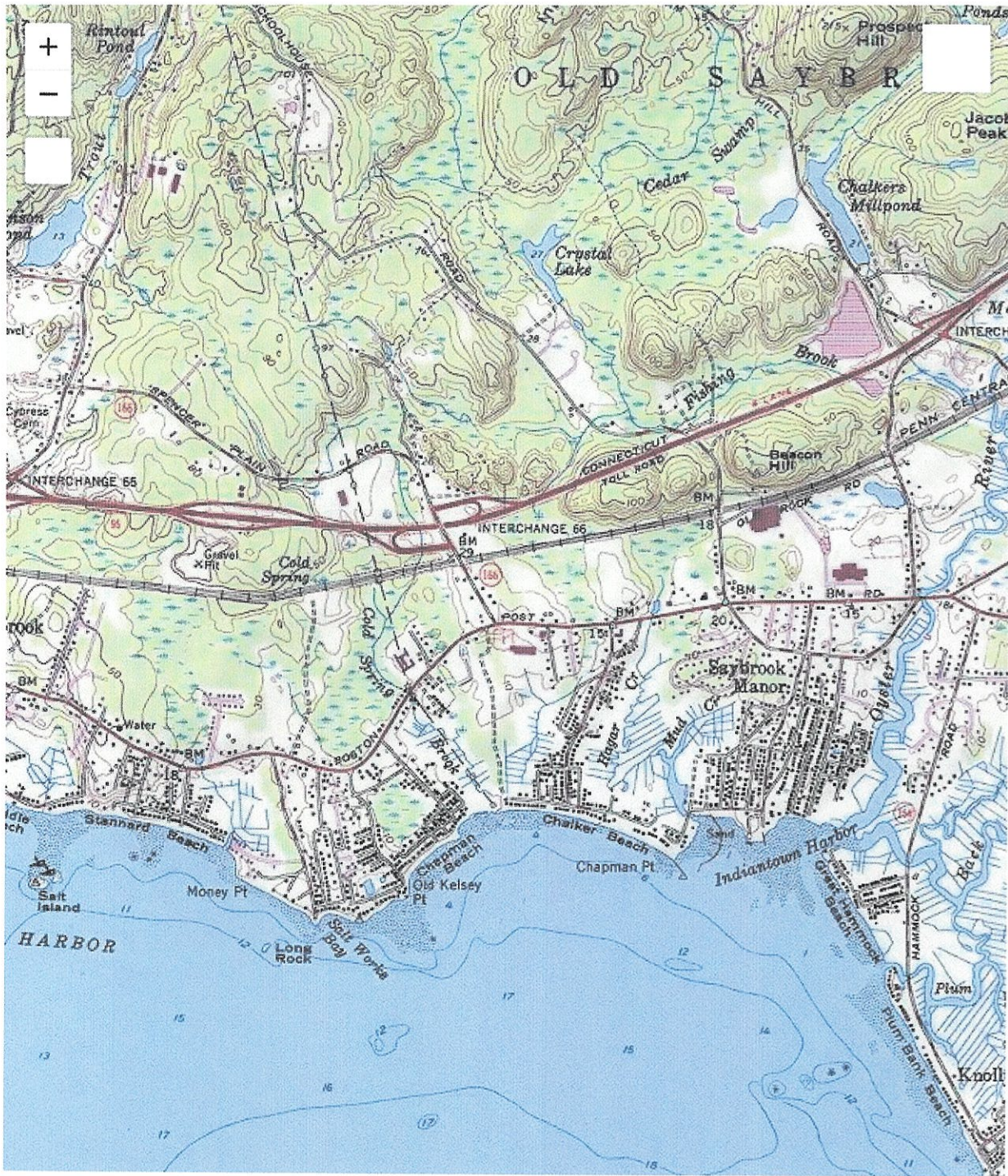
860 572 8939 FAX 860 572 7569

EMAIL: office@docko.com



DWG 21-07-3189

Westbrook Topo Map in Middlesex County Connecticut




 [Print this map](#)

Map provided by TopoZone.com

Chapman Beach

Write a description for your map.

Legend

 Chapman Beach

Google Earth

600 ft

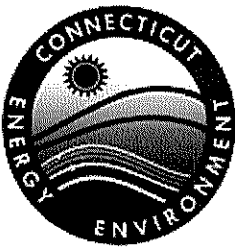


 Chapman Beach

ATTACHMENT 18

ENGINEERING REPORT COVER SHEET

(DEEP-LWRD-APP-001R)



**Connecticut Department of
Energy & Environmental Protection**
Bureau of Water Protection & Land Reuse
Land & Water Resources Division

LWRD License Application Engineering Report Cover Sheet

This Cover Sheet is a checklist of requirements that need to be completed and submitted with the engineering report. Please complete this checklist by identifying where each requirement listed is addressed in the engineering report (report title and page numbers). If an item is not applicable, place "NA" in the box. The engineer report must fully describe the design of the proposed facilities or other actions and the hydraulic and hydrologic effects thereof. This Cover Sheet is required to be signed and sealed by a professional engineer licensed in the State of Connecticut.

Stormwater Management

Engineering Report section title and page number	Requirement Description
Not a stormwater Management Project.	Description of the design storm frequency intensity, volume and duration
Not a stormwater Management Project.	Watershed maps, existing and proposed
Not a stormwater Management Project.	Computations for Tc
Not a stormwater Management Project.	Imperviousness calculations
Not a stormwater Management Project.	NRCS runoff curve numbers, volumetric runoff coefficients
Not a stormwater Management Project.	Computations used to determine peak runoff rates, and velocities for each watershed area (24-hour storm): <ul style="list-style-type: none"> • Stream Channel Protection: 1-year, 2-year frequency ("over-control" of 2-year storm) • Conveyance Protection: 10-year frequency • Peak Runoff Attenuation: 2-year, 10-year, 25 year, and 100-year frequency • Emergency Outlet Sizing: safely pass the 100-year frequency or larger storm
Not a stormwater Management Project.	Hydrograph routing calculations
Not a stormwater Management Project.	Description, schematics, and calculations for drainage and stormwater management systems
Not a stormwater Management Project.	Infiltration rates, geotechnical information, test pit data, perc test data, conductivity testing data
Not a stormwater Management Project.	Documentation of sources
Not a stormwater Management Project.	Electronic files in native format for any computer modelling generated for analysis.

Stormwater Management

Engineering Report section title and page number	Requirement Description
Not a stormwater Management Project.	Detention basin analysis including timing and duration of expected outflow, stream stability analysis and hydrograph summation
Not a stormwater Management Project.	Erosion & sedimentation calculations for any engineered measures
Not a stormwater Management Project.	Calculations for any engineered water quality treatment measures

Floodway/Floodplain Assessment

Engineering Report section title and page number	Requirement Description
Not a floodway/floodplain assessment project.	Description of existing and proposed conditions upstream and downstream of the proposed activity
Not a floodway/floodplain assessment project.	For any bridge or culvert placement or replacement with a drainage area of 100 acres or more, plan sheets showing the existing and proposed inundation area for the 2, 10, 25, 50, and 100 year discharges, carried to convergence
Not a floodway/floodplain assessment project.	Flood Contingency Plan
Not a floodway/floodplain assessment project.	A description and analysis of the floodplain modifications required to restore any flood conveyance and flood storage capacity
Not a floodway/floodplain assessment project.	Demonstration that backwater from the proposed activity will not impact an existing dam, dike, detention, or similar structure
Not a floodway/floodplain assessment project.	Backup data and complete hydraulic analysis for proposed modifications to the floodplain including location plan and plot for sections, profile sheet, summary sheet
Not a floodway/floodplain assessment project.	Description, schematics, and calculations for bridges and culverts

Structures within a Coastal Flood Hazard Area

Engineering Report section title and page number	Requirement Description
See attached engineering report.	Longshore sediment transport impact report
This is not a public access structure.	Wind, wave, load analysis for significant public access structures (Only for Flood Management Certification)
This is not a flood and erosion control structure.	Wind, wave, load analysis for flood and erosion control structures (e.g. seawalls, bulkheads, revetments, berms, jetties, etc.)
This is not a tide regulating/influencing structure.	Hydrologic / Hydraulic impact report for tide regulating / influencing structures (e.g. culverts, tidegates, flood berms / levees, etc.)

Professional Certification

For any engineering report submitted as part of the LWRD License application, the following certification must be signed and sealed by a professional engineer licensed to practice in Connecticut and submitted with the Engineering Report Cover Sheet.

"I certify that in my professional judgement, each requirement listed in the Engineering Report Cover Sheet has been addressed in the engineering report submitted as part of the LWRD permit application and that the information is true, accurate and complete to the best of my knowledge and belief.

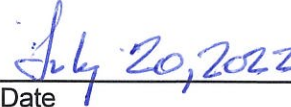
This certification is based on my review of the engineering report.

I understand that a false statement made in the submitted information may, pursuant to Section 22a-6 of the General Statutes, be punishable as a criminal offense under Section 53a-157b of the General Statutes, and may also be punishable under Section 22a-438 of the General Statutes."

This certification is made with respect to the application by District of Chapman Beach located in Westbrook for Groin Restoration.



Signature of Professional Engineer



Date

Keith B. Neilson, P.E.

Name of Professional Engineer (print or type)



Corporate P.E. No. 441

P.E. Number (if applicable)

Affix P.E. Stamp Here
(if applicable)



Introduction:

The Chapmans Beach project is located in a flood prone area located along the shoreline of Long Island sound. Attached is a copy of the Flood Insurance Rate Map published by FEMA for the area which shows the various statistical flood elevations. The groins suffer from differential settlement stresses, aging concrete with stress fractures and loss of sand at the base width occasionally reveal the old stone groins structure which now serve as support stone beneath the concrete. It is desired that each of the four concrete groins will be replaced. See attached photos.

Longshore sediment transport impact:

The longshore sediment transport system is shore parallel in the vicinity of Chapmans Beach. The beach itself is located in a recess of the shoreline shielded from prevailing southwesterly winds and wind induced waves except for those that diffract around Old Kelsey Point arriving from the southwest. These waves have a shoreline parallel tendency although they are converging on the beach. Shoreline sediment transport is shore parallel at the site. In the prevailing wind conditions, breaking waves splash over and runback in an easterly direction will tend to carry fine-grained sediment out into the deeper water just offshore.

During significant coastal storms the sediment transport system will be shore normal with winds coming in from the southeast and there is no shielding in that direction.

Alternative Analysis: The original project proposal was to encapsulate the existing concrete groin structures with a foot of new concrete on both longitudinal sides and a new cap of the same thickness but that proposal was deemed to expansive and not approvable by the DEEP.

The alternatives considered were:

- Repair the existing groins in place, a tough choice due to the age
- Encapsulate the groin in concrete with roughly a foot of concrete both sides and tope
- Repair the going with full length wood or alternatively, concrete
- Construct composite groins partly wood and partly concrete. Best option for coat and minimizing work effort and beach access down time

The repair option really only foretells the inevitable and has been discarded. The second was deemed ineligible for a COP by the DEEP. It was determined that full length structure would be best, either concrete or wood preferably, as a long a ledge does not preclude driving the piles or sheets. The NDDB Determination for this project anticipates no adverse impact on State listed species.

The existing groins to be modified or restored in this case are all shore normal oriented north/south and of relatively short length compared to the east groin which is approximately 200 feet long and oriented to the south southwesterly. The four groins to be restored are less than 100 feet in length and project perpendicular to the prevailing shoreline. Each groin stops in about 1 to 2 feet of water at mean low water conditions. The groins are square in section consisting of 3 to 5 foot wide and high, cast in place concrete, with minor extensions at the south end which are made of stone. The existing concrete groins appear to have been cast on triangular cross section linear stone groins. In some cases the downstream side of the groin reveals the bottom of the ap so undermining is occurring indicating a loss of beach sand.

The proposed project is to remove the existing stone and concrete groins in part or in total and to build wood pile and timber groins where possible, meaning where ledge does not preclude adequate embedment of the pile and timber sheeting. The upper reaches of the groins on the beach is where it is believed that ledge will be encountered, these groins will be built of concrete in the form of the cantilever inverted "T" retaining wall with a buried footing and vertically projecting wall approximately 18 inches thick to match the profile top elevations. If possible, these footings will be pinned to ledge.

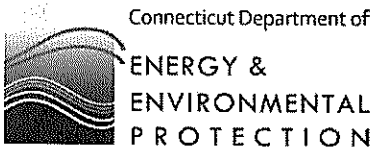
The exposed section of the groins will be diminished to 18 inches to 24 inches thick for wood (not including piles) from the exposed 3-5 foot-wide existing structures. The lateral limits of the structure will be reduced even further where the wood pile and timber section replace each groin's stone outer limits. The overall projection of each concrete and stone groin into Long Island Sound will not change. The height of these groins will be similar to the existing height although subsided sections will be raised to make a uniform

sloping top surface continuous from wood to concrete to the existing seawall at the upper reach of the beach. The stone beneath the groins at the end of the concrete groins will be disassembled and be a set as scour protection stone immediately adjacent to the wood groins to maximize the life of the timbers. This collection and redistribution of stone will reduce the area of beach coverage significantly, 30%-40% from 2850+/-SF to 1650+/-SF thus restoring over 1000SF of usable beach while retaining the same beach sand preservation characteristics of the existing site.

Up and over steps or gaps in the structures at the MHW line will be maintained in the groin configuration to allow for public beach access continuity. The slot will be at the joint between the new wood and new or old concrete groins or removable stairs will be attached to the wood. Light weight metal framed steps could also be used in this case and would make remove easier. There will be no change to the groin performance based on this approach. Concrete maintenance or capping may be required in 20 years however, the 18 inch wall thickness will leave an extra inch of sacrificial concrete surface beyond the reinforcement to retain structural integrity. The wood groin will have to be rebuilt in about 20 years depending on storm severity but the reuse of the stone for scour protection will perpetuate a long service life

ATTACHMENT 20

NATURAL DIVERSITY DATA BASE (NDDB)



79 Elm Street • Hartford, CT 06106-5127

www.ct.gov/deep

Affirmative Action/Equal Opportunity Employer

September 13, 2021

Keith Neilson PE
Docko Inc
PO Box 421
Mystic CT 06355
office@docko.com

Project: Restoration of 6 concrete and stone groins at Chapman Beach, off Chapman Ave, Westbrook, CT
NDDB Determination No.: 202109458

Dear Mr. Neilson,

I have reviewed Natural Diversity Database (NDDB) maps and files regarding the area of work provided for the proposed restoration of six concrete and stone groins at Chapman Beach off Chapman Avenue in Westbrook, Connecticut. I do not anticipate negative impacts to State-listed species (RCSA Sec. 26-306) resulting from your proposed activity at the site based upon the information contained within the NDDB. The result of this review does not preclude the possibility that listed species may be encountered on site and that additional action may be necessary to remain in compliance with certain state permits. Contact NDDB to report the presence of any listed species and for more detailed guidance. This determination is good for two years. Please re-submit a new NDDB Request for Review if the scope of work changes or if work has not begun on this project by September 13, 2023.

Natural Diversity Data Base information includes all information regarding critical biological resources available to us at the time of the request. This information is a compilation of data collected over the years by the Department of Energy and Environmental Protection's Natural History Survey, cooperating units of DEEP, landowners, private conservation groups and the scientific community. This information is not necessarily the result of comprehensive or site-specific field investigations. Consultations with the NDDB should not be substitutes for on-site surveys necessary for a thorough environmental impact assessment. Current research projects and new contributors continue to identify additional populations of species and locations of habitats of concern, as well as, enhance existing data. Such new information is incorporated into the database as it becomes available.

Please contact me if you have further questions at (860) 424-3378, or karen.zyko@ct.gov . Thank you for consulting the Natural Diversity Database.

Sincerely,

A handwritten signature in cursive script, appearing to read "Karen Zyko".

Karen Zyko
Environmental Analyst



Connecticut Department of
Energy & Environmental Protection
Bureau of Natural Resources
Wildlife Division

CPPU USE ONLY

App #: _____

Doc #: _____

Check #: No fee required

Program: Natural Diversity Database
Endangered Species

Hardcopy _____ Electronic _____

Request for Natural Diversity Data Base (NDDB) State Listed Species Review

Please complete this form in accordance with the [instructions](#) (DEEP-INST-007) to ensure proper handling of your request.

There are no fees associated with NDDB Reviews.

Part I: Preliminary Screening & Request Type

Before submitting this request, you must review the most current Natural Diversity Data Base "State and Federal Listed Species and Significant Natural Communities Maps" found on the [DEEP website](#). These maps are updated twice a year, usually in June and December.

Does your site, including all affected areas, fall in an NDDB Area according to the map instructions:

☐ Yes ☐ No Enter the date of the map reviewed for pre-screening: June 2021

This form is being submitted for a :

☒ New NDDB request
☐ Renewal/Extension of a NDDB Request, **without** modifications and within **two years** of issued NDDB determination (no attachments required)

[CPPU Use Only - NDDB-Listed Species Determination # 1736]

☐ New **Safe Harbor Determination** (optional) must be associated with an application for a GP for the Discharge of Stormwater and Dewatering Wastewaters from Construction Activities

☐ Renewal/Extension of an existing Safe Harbor Determination

☐ With modifications

☐ Without modifications (no attachments required)

[CPPU Use Only - NDDB-Safe Harbor Determination # 1736]

Enter NDDB Determination Number for Renewal/Extension:

Enter Safe Harbor Determination Number for Renewal/Extension:

Part II: Requester Information

If the requester is a corporation, limited liability company, limited partnership, limited liability partnership, or a statutory trust, it must be registered with the Secretary of State. If applicable, the name shall be stated **exactly as it is registered with the Secretary of State. Please note, for those entities registered with the Secretary of State, the registered name will be the name used by DEEP. This information can be accessed at the Secretary of the State's database CONCORD. (www.concord-sots.ct.gov/CONCORD/index.jsp)*

If the requester is an individual, provide the legal name (include suffix) in the following format: First Name; Middle Initial; Last Name; Suffix (Jr, Sr., II, III, etc.).

If there are any changes or corrections to your company/facility or individual mailing or billing address or contact information, please complete and submit the Request to Change company/Individual Information to the address indicated on the form.

1. Requester*

Company Name: **Docko, Inc.**

Contact Name: **Keith Neilson, P.E.**

Address: **PO Box 421**

City/Town: **Mystic**

State: **CT**

Zip Code: **06355**

Business Phone: **860-572-8939**

ext.

E-mail: **office@docko.com

**By providing this email address you are agreeing to receive official correspondence from the department, at this electronic address, concerning this request. Please remember to check your security settings to be sure you can receive emails from "ct.gov" addresses. Also, please notify the department if your e-mail address changes

a) Requester can best be described as:

☐ Individual ☐ Federal Agency ☐ State agency ☐ Municipality ☐ Tribal

☒ *business entity (* if a business entity complete i through iii):

i) Check type ☒ corporation ☐ limited liability company ☐ limited partnership

☐ limited liability partnership ☐ statutory trust ☐ Other:

ii) Provide Secretary of the State Business ID #: **0194033** This information can be accessed at the Secretary of the State's database (CONCORD). (www.concord-sots.ct.gov/CONCORD/index.jsp)

iii) ☐ Check here if your business is **NOT** registered with the Secretary of State's office.

b) Acting as (Affiliation), pick one:

☐ Property owner ☐ Consultant ☐ Engineer ☐ Facility owner ☐ Applicant

☐ Biologist ☐ Pesticide Applicator ☐ Other representative:

2. List Primary Contact to receive Natural Diversity Data Base correspondence and inquiries, if different from requester.

Company Name:

Contact Person:

Title:

Mailing Address:

City/Town:

State:

Zip Code:

Business Phone:

ext.

**E-mail:

Part III: Site Information

This request can only be completed for one site. A separate request must be filed for each additional site.

1. SITE NAME AND LOCATION

Site Name or Project Name: **Chapman Beach**

Town(s): **Westbrook**

Street Address or Location Description:
Chapman Ave.

Size in acres, or site dimensions: **0.43 acres**

Latitude and longitude of the center of the site in decimal degrees (e.g., 41.23456 -71.68574):

Latitude: **41°16'38.12"N**

Longitude: **72°25'07.08"W**

Method of coordinate determination (check one):

☐ GPS ☐ Photo interpolation using CTECO map viewer ☒ Other (specify): **Google Earth**

2a. Describe the current land use and land cover of the site.

The land use at this site is "100, residential vacant", and used as such.

b. Check all that apply and enter the size in acres or % of area in the space after each checked category.

<input type="checkbox"/> Industrial/Commercial _____	<input type="checkbox"/> Residential _____	<input type="checkbox"/> Forest _____
<input type="checkbox"/> Wetland _____	<input type="checkbox"/> Field/grassland _____	<input type="checkbox"/> Agricultural _____
<input type="checkbox"/> Water _____	<input type="checkbox"/> Utility Right-of-way _____	
<input type="checkbox"/> Transportation Right-of-way _____	<input checked="" type="checkbox"/> Other (specify): Beach	

Part IV: Project Information

1. PROJECT TYPE:

Choose Project Type: Choose Type From Dropdown List , If other describe: **Groin Restoration.**

2. Is the subject activity limited to the maintenance, repair, or improvement of an existing structure within the existing footprint? ☒ Yes ☐ No If yes, explain.

This proposed project is to restore six concrete and stone groins which have existed since the late 1950's. they will be either encased in concrete or replaced with driven wood pile and timber groins.

Part IV: Project Information (continued)

3. Give a detailed description of the activity which is the subject of this request and describe the methods and equipment that will be used. Include a description of steps that will be taken to minimize impacts to any known listed species.

The groins need to be restored due to failing concrete and inadequate embedment in a couple of cases where one can see daylight beneath the structure. If encased, the groins will be covered by a foot of reinforced concrete on all sides. If replaced with wood, the concrete will be removed from the site, stone will set aside, new wood piles will be driven on one side of the center line and a wale attached. This will serve as a guide for driving the sheathing. Subsequently the opposite side wale would be installed with driven pile supports. Finally, the structure would be trimmed and the site cleaned up.

4. If this is a renewal or extension of an existing Safe Harbor request *with* modifications, explain what about the project has changed.

This proposed project is not a Safe Harbor request or modification.

5. Provide a contact for questions about the project details if different from Part II primary contact.

Name:

Phone:

E-mail:

Part V: Request Requirements and Associated Application Types

Check *one* box from either Group 1, Group 2 or Group 3, indicating the appropriate category for this request.

Group 1. If you check one of these boxes, complete Parts I – VII of this form and submit the required attachments A and B.

- ☐ Preliminary screening was negative but an NDDB review is still requested
- ☐ Request regards a municipally regulated or unregulated activity (no state permit/certificate needed)
- ☐ Request regards a preliminary site assessment or project feasibility study
- ☐ Request relates to land acquisition or protection
- ☐ Request is associated with a *renewal* of an existing permit or authorization, with no modifications

Group 2. If you check one of these boxes, complete Parts I – VII of this form and submit required attachments A, B, and C.

- ☒ Request is associated with a *new* state or federal permit or authorization application or registration
- ☐ Request is associated with modification of an existing permit or other authorization
- ☐ Request is associated with a permit enforcement action
- ☐ Request regards site management or planning, requiring detailed species recommendations
- ☐ Request regards a state funded project, state agency activity, or CEPA request

☐ **Group 3.** If you are requesting a **Safe Harbor Determination**, complete Parts I-VII and submit required attachments A, B, and D. Safe Harbor determinations can only be requested if you are applying for a GP for the Discharge of Stormwater and Dewatering Wastewaters from Construction Activities

If you are filing this request as part of a state or federal permit application(s) enter the application information below.

Permitting Agency and Application Name(s):

CT DEEP/LWRD Certificate of Permission

Related State DEEP Permit Number(s), if applicable: pending

State DEEP Enforcement Action Number, if applicable: n/a

State DEEP Permit Analyst(s)/Engineer(s), if known: _____

Is this request related to a previously submitted NDDB request? ☐ Yes ☒ No

If yes, provide the previous NDDB Determination Number(s), if known: _____

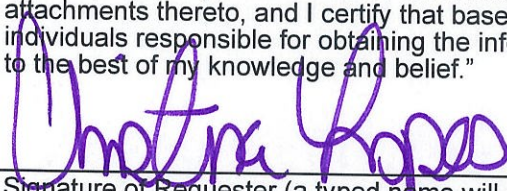
Part VI: Supporting Documents

Check each attachment submitted as verification that *all* applicable attachments have been supplied with this request form. Label each attachment as indicated in this part (e.g., Attachment A, etc.) and be sure to include the requester's name, site name and the date. **Please note that Attachments A and B are required for all new requests and Safe Harbor renewals/extensions with modifications.** Renewals/Extensions with no modifications do not need to submit any attachments. Attachments C and D are supplied at the end of this form.

<input type="checkbox"/> Attachment A:	Overview Map: an 8 1/2" X 11" print/copy of the relevant portion of a USGS Topographic Quadrangle Map clearly indicating the exact location of the site.
<input type="checkbox"/> Attachment B:	Detailed Site Map: fine scaled map showing site boundary and area of work details on aerial imagery with relevant landmarks labeled. (Site and work boundaries in GIS [ESRI ArcView shapefile, in NAD83, State Plane, feet] format can be substituted for detailed maps, see instruction document)
<input type="checkbox"/> Attachment C:	Supplemental Information, Group 2 requirement (attached, DEEP-APP-007C) <input type="checkbox"/> Section i: Supplemental Site Information and supporting documents <input type="checkbox"/> Section ii: Supplemental Project Information and supporting documents
<input type="checkbox"/> Attachment D:	Safe Harbor Report Requirements, Group 3 (attached, DEEP-APP-007D)

Part VII: Requester Certification

The requester *and* the individual(s) responsible for actually preparing the request must sign this part. A request will be considered incomplete unless all required signatures are provided.

<p>"I have personally examined and am familiar with the information submitted in this document and all attachments thereto, and I certify that based on reasonable investigation, including my inquiry of the individuals responsible for obtaining the information, the submitted information is true, accurate and complete to the best of my knowledge and belief."</p>	
 Signature of Requester (a typed name will substitute for a handwritten signature)	<u>9/7/21</u> Date
Christina Lopes Name of Requester (print or type)	Project Administrator Title (if applicable)
_____ Signature of Preparer (if different than above)	_____ Date
_____ Name of Preparer (print or type)	_____ Title (if applicable)

Note: Please submit the completed Request Form and all Supporting Documents to:

CENTRAL PERMIT PROCESSING UNIT
DEPARTMENT OF ENERGY & ENVIRONMENTAL PROTECTION
79 ELM STREET
HARTFORD, CT 06106-5127

Or email request to: deep.nddbrequest@ct.gov

Attachment C: Supplemental Information, Group 2 requirement

Section i: Supplemental Site Information

1. Existing Conditions

Describe all natural and man-made features including wetlands, watercourses, fish and wildlife habitat, floodplains and any existing structures potentially affected by the subject activity. Such features should be depicted and labeled on the site plan that must be submitted. Photographs of current site conditions may be helpful to reviewers.

The site has suffered from a progressive loss of sand caused most recently by climatic and storm conditions, most notably including Tropical Storm "Irene", Hurricane "Sandy", and several nor'easters as recently as this summer. Damage from Tropical Storm "Irene" was almost catastrophic allowing several thousand cubic yards of sand to be washed up onto private property and out into the streets where it was removed by the Town. Several houses were damaged in these storms as well as subsequent nor'easters.

- ☐ Site Photographs (optional) attached
☒ Site Plan/sketch of existing conditions attached

2. Biological Surveys

Has a biologist visited the site and conducted a biological survey to determine the presence of any endangered, threatened or special concern species ☐ Yes ☐ No

If yes, complete the following questions and submit any reports of biological surveys, documentation of the biologist's qualifications, and any NDDB survey forms.

Biologist(s) name: _____

Habitat and/or species targeted by survey: _____

Dates when surveys were conducted: _____

- ☐ Reports of biological surveys attached
☐ Documentation of biologist's qualifications attached
☐ NDDB Survey forms for any listed species observations attached

Section ii: Supplemental Project Information

1. Provide a schedule for all phases of the project including the year, the month and/or season that the proposed activity will be initiated and the duration of the activity.

It is anticipated this proposed project will begin in winter/spring of 2022 and will take approximately 2-3 months to complete, weather and tides permitting.

2. Describe and quantify the proposed changes to existing conditions and describe any on-site or off-site impacts. In addition, provide an annotated site plan detailing the areas of impact and proposed changes to existing conditions.

There are no anticipated adverse environmental impacts associated with this project. Sand will be stock piled on the upper beach, clear of the work area and clear of typical tidal conditions and waves to minimize erosion and turbidity potential, then restored after each groin is finished.

- ☐ Annotated Site Plan attached

Attachment D: Safe Harbor Report Requirements

Submit a report, as Attachment D, that synthesizes and analyzes the information listed below. Those providing synthesis and analysis need appropriate qualifications and experience. A request for a safe harbor determination shall include:

1. Habitat Description and Map(s), including GIS mapping overlays, of a scale appropriate for the site, identifying:

- wetlands, including wetland cover types;
- plant community types;
- topography;
- soils;
- bedrock geology;
- floodplains, if any;
- land use history; and
- water quality classifications/criteria.

2. Photographs - The report should include photographs of the site taken from the ground and also all reasonably available aerial or satellite photographs and an analysis of such photographs.

3. Inspection - A visual inspection(s) of the site should be conducted, preferably when the ground is visible, and described in the report. This inspection can be helpful in confirming or further evaluating the items noted above.

4. Biological Surveys - The report should include all biological surveys of the site where construction activity will take place that are reasonably available to a registrant. A registrant shall notify the Department's Wildlife Division of biological studies of the site where construction activity will take place that a registrant is aware of but are not reasonably available to the registrant.

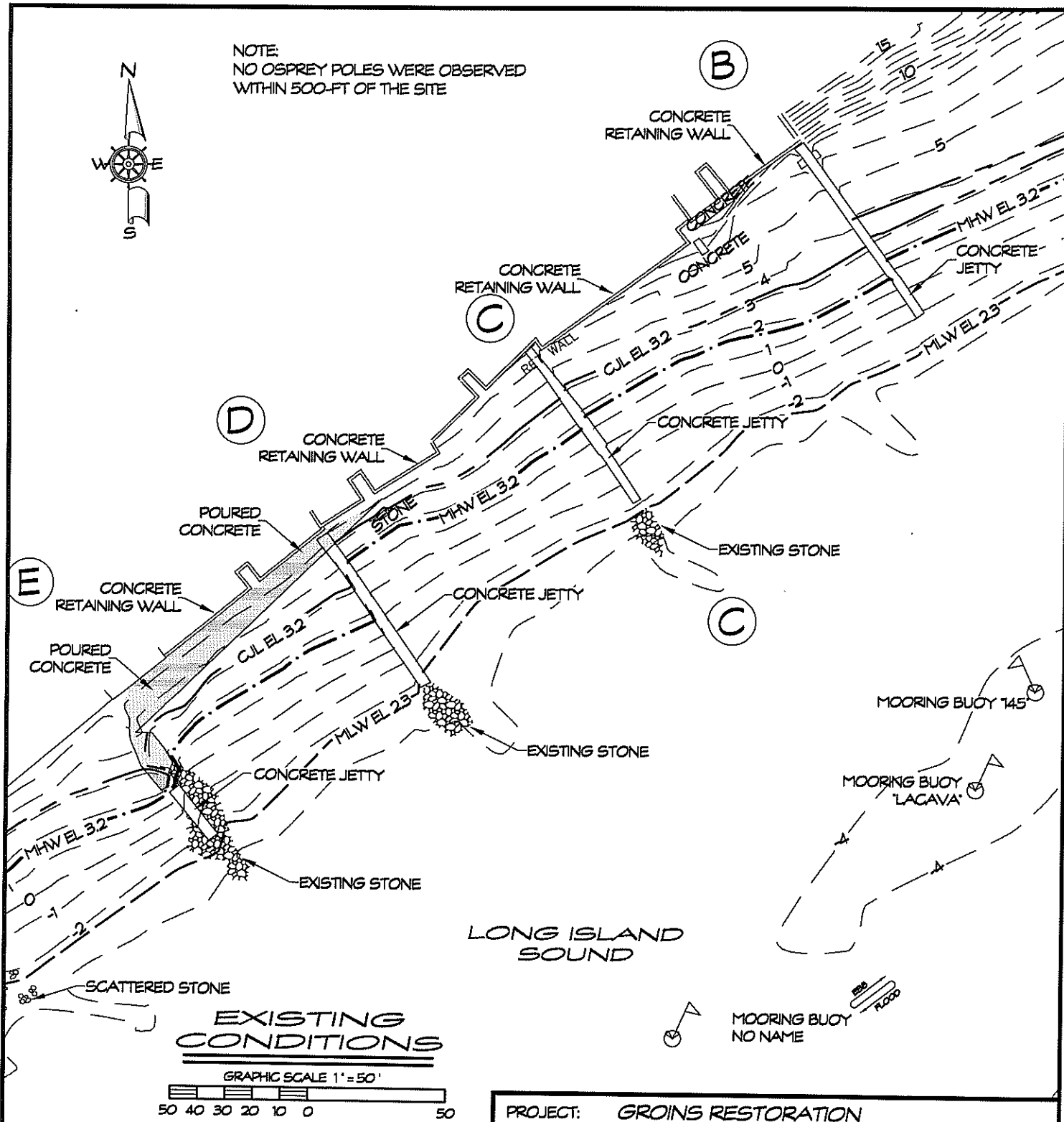
5. Based on items #1 through 4 above, the report shall include a Natural Resources Inventory of the site of the construction activity. This inventory should also include a review of reasonably available scientific literature and any recommendations for minimizing adverse impacts from the proposed construction activity on listed species or their associated habitat.

6. In addition, to the extent the following is available at the time a safe harbor determination is requested, a request for a safe harbor determination shall include and assess:

- Information on Site Disturbance Estimates/Site Alteration information
- Vehicular Use
- Construction Activity Phasing Schedules, if any; and
- Alteration of Drainage Patterns



NOTE:
NO OSPREY POLES WERE OBSERVED
WITHIN 500-FT OF THE SITE



DRAFT
9-3-21

PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK

MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

AGENT: SHEET 2 OF 4

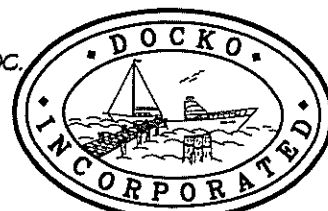
DOCKO, INC.

Keith B. Nelson, PE

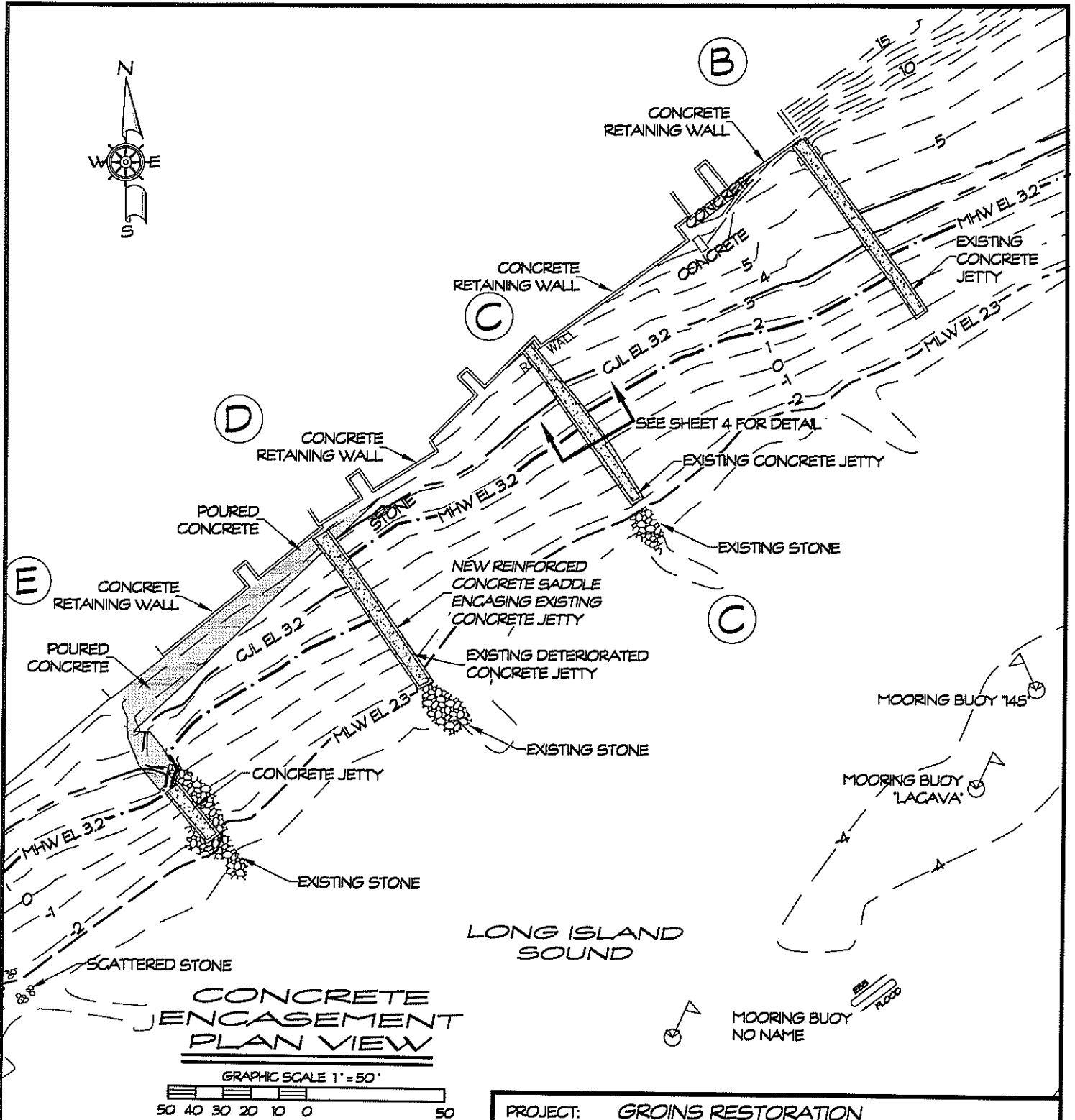
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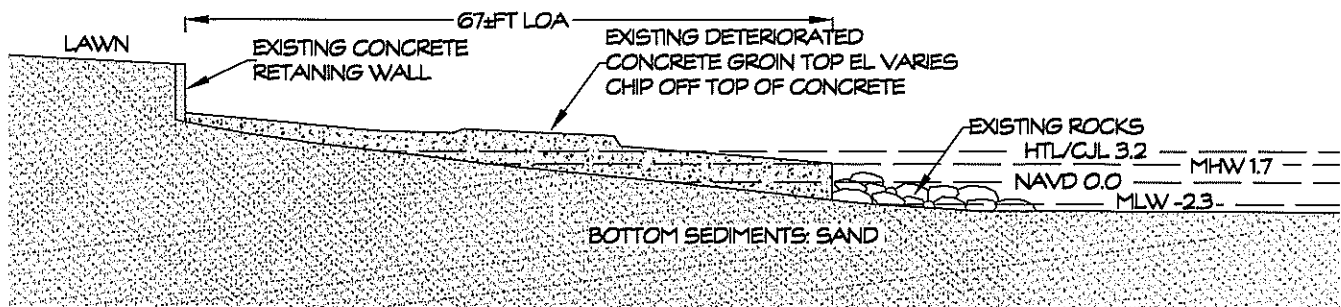
860 572 8939 FAX 860 572 7569

EMAIL: office@docko.com

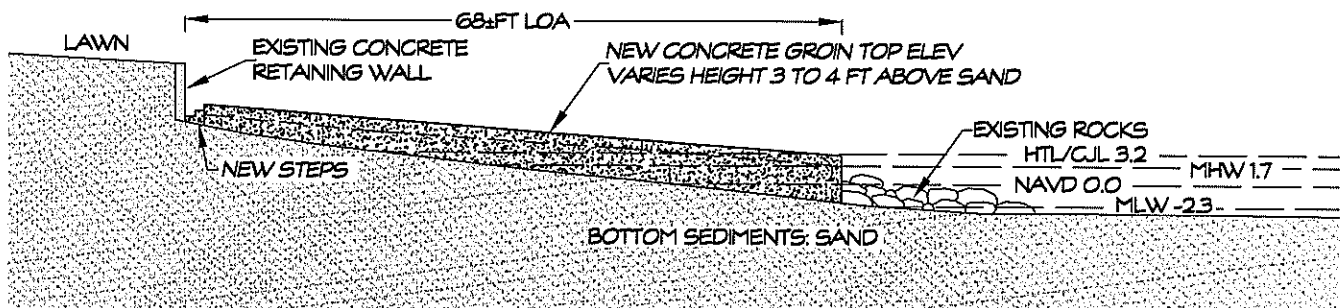


DWG 21-07-3189

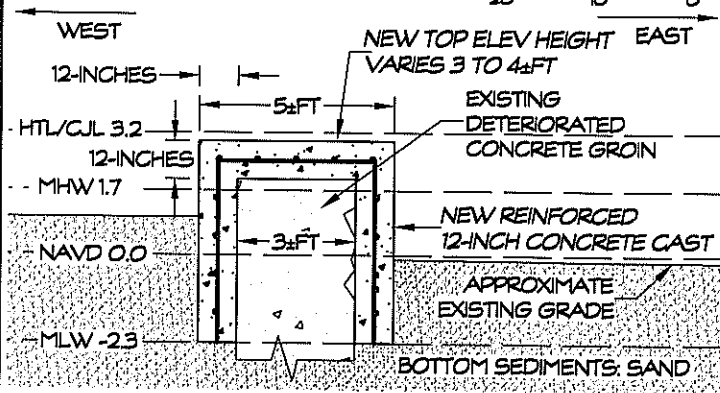
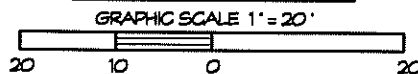




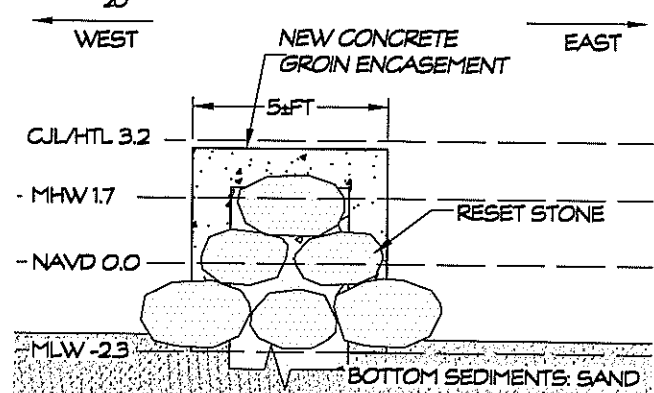
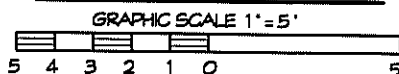
EXISTING GROIN C



PROPOSED GROIN C



CONCRETE SADDLE SECTION VIEW



CONCRETE SADDLE END VIEW



DRAFT
9-3-21

PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK

MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

AGENT: SHEET 4 OF 4

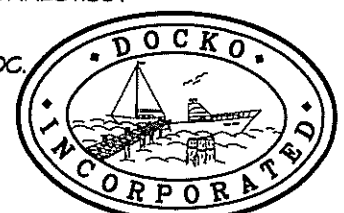
DOCKO, INC.

Keith B. Neilson, PE

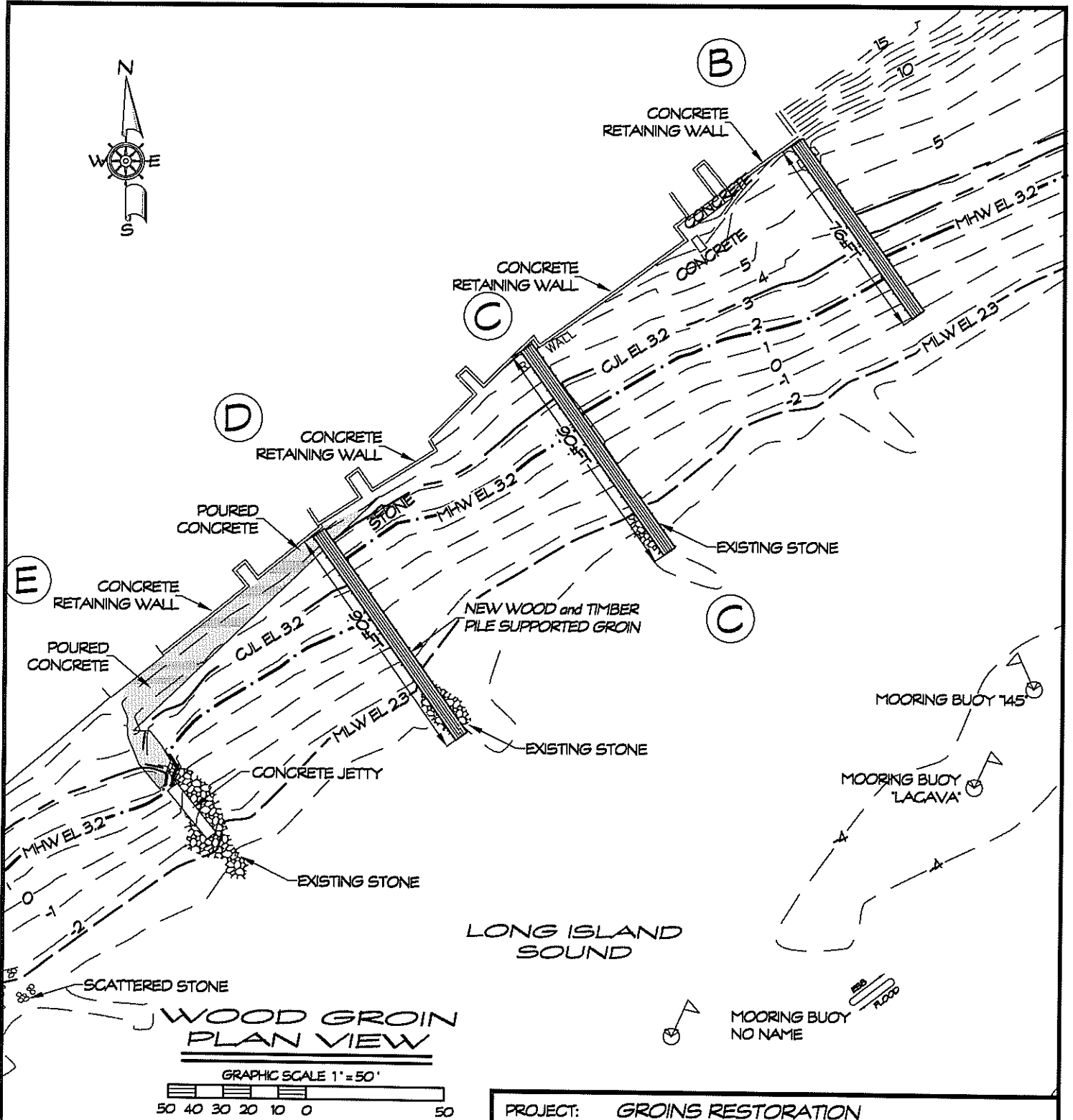
Mystic, CT 06355

860 572 8939 FAX 860 572 7569

EMAIL: office@docko.com



DWG 21-07-3189



DRAFT
9-3-21

PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK
MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

AGENT: SHEET 3 OF 4

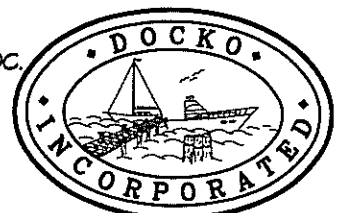
DOCKO, INC.

Keith B. Neilson, PE

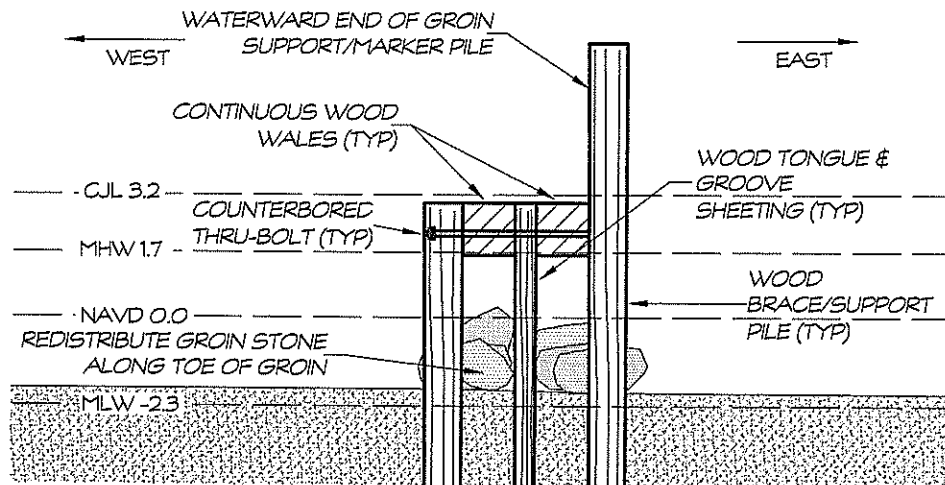
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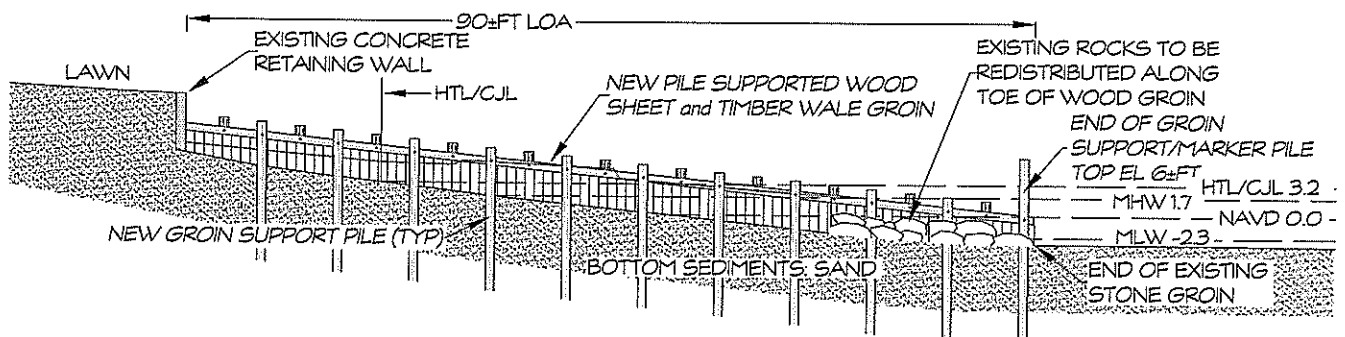
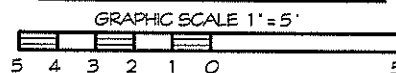
EMAIL: office@docko.com



DWG 21-07-3189



WOOD GROIN END VIEW DETAIL



REPLACEMENT WOOD GROIN - C



TIMBER GROIN

PROJECT: GROINS RESTORATION

LOCATION: CHAPMAN BEACH - TOWN of WESTBROOK
MIDDLESEX COUNTY, CONNECTICUT

WATERWAY: LONG ISLAND SOUND

DATE: SEPTEMBER 2, 2021

APPLICANT: CHAPMAN BEACH ASSOC.

AGENT: SHEET 4 OF 4

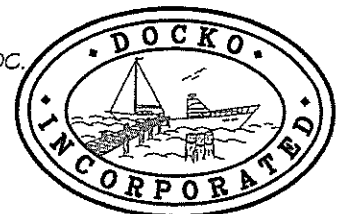
DOCKO, INC.

Keith B. Neilson, PE

Mystic, CT 06355

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EMAIL: office@docko.com



DWG 21-07-3189

Chapmans Beach

Legend

-  ? Chapman Beach
-  Chapman Beach

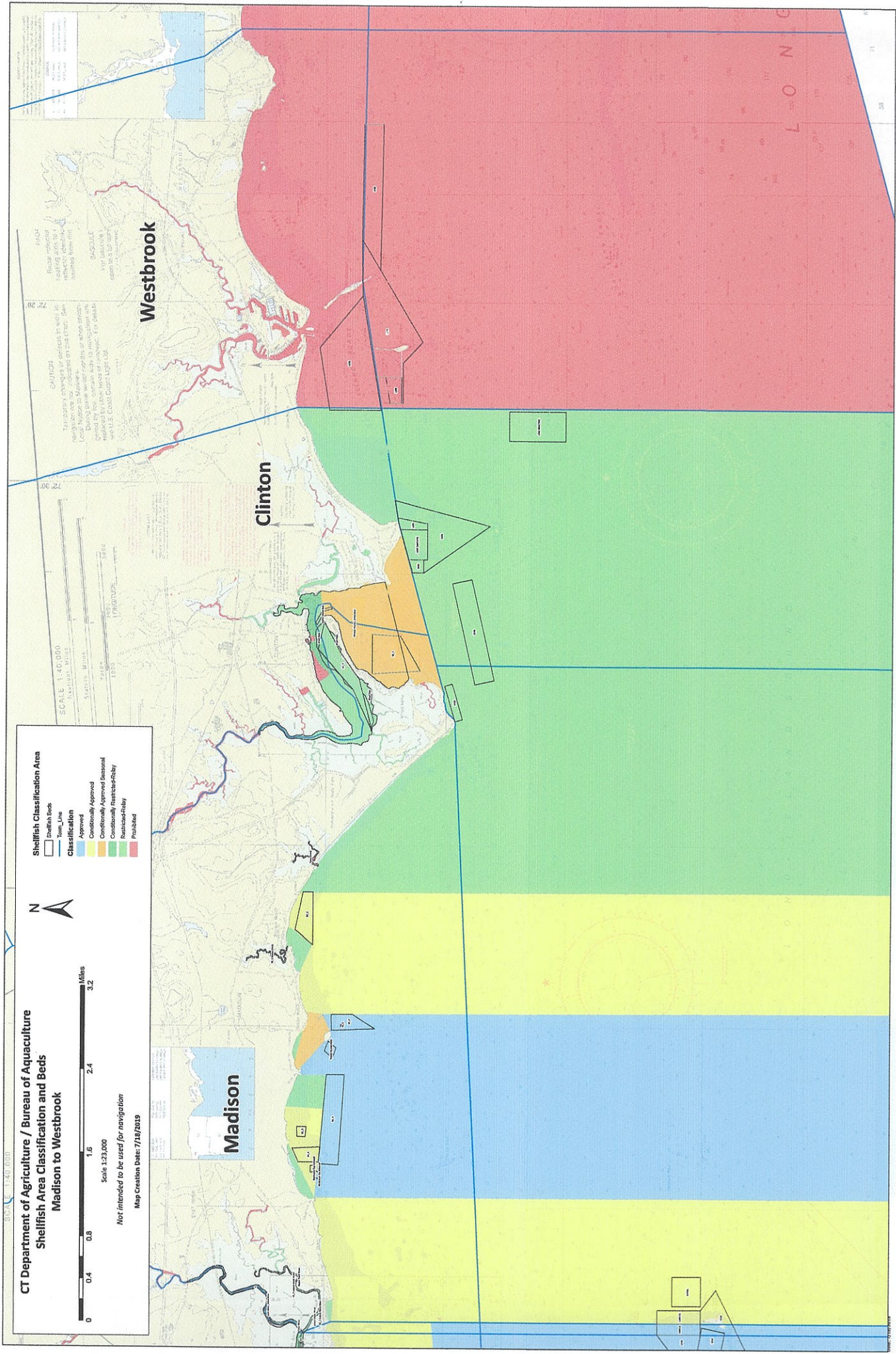
Chapman Beach  Chapman Beach

Google Earth

Old Kelsey Point

400 ft





**Property Information**

Property ID 180/069
Location CHAPMAN BEACH
Owner DISTRICT OF CHAPMAN BEACH

**MAP FOR REFERENCE ONLY
NOT A LEGAL DOCUMENT**

Town of Westbrook, CT makes no claims and no warranties, expressed or implied, concerning the validity or accuracy of the GIS data presented on this map.

Geometry update: October 2018
Data updated 11/19/2018

Print map scale is approximate.
Critical layout or measurement
activities should not be done using
this resource.

ATTACHMENT 23

FISHERIES CONSULTATION FORM

(DEEP-FISH-APP-007, if applicable)

ATTACHMENT 24

DEPARTMENT OF AGRICULTURE/BUREAU OF AQUACULTURE CONSULTATION

(if applicable)

ATTACHMENT 41

APPLICANT COMPLIANCE INFORMATION FORM

(DEEP-APP-002)



**Connecticut Department of
Energy & Environmental Protection**

Applicant Compliance Information

DEEP ONLY

App. No. _____

Co./Ind. No. _____

Applicant Name: District of Chapman Beach

Mailing Address: PO Box 356

City/Town: Westbrook

State: CT

Zip Code: 06498

Business Phone: 203-856-4466

ext.:

Fax:

Contact Person: Keith Neilson, P.E./Docko, Inc.

Phone: 860-572-8939 ext.

***E-mail: office@docko.com**

If you answer yes to any of the questions below, you must complete the Table of Enforcement Actions on the reverse side of this sheet as directed in the instructions for your permit application.

- A. During the five years immediately preceding submission of this application, has the applicant been convicted in any jurisdiction of a criminal violation of any environmental law?

☐ Yes ☒ No

- B. During the five years immediately preceding submission of this application, has a civil penalty been imposed upon the applicant in any state, including Connecticut, or federal judicial proceeding for any violation of an environmental law?

☐ Yes ☒ No

- C. During the five years immediately preceding submission of this application, has a civil penalty exceeding five thousand dollars been imposed on the applicant in any state, including Connecticut, or federal administrative proceeding for any violation of an environmental law?

☐ Yes ☒ No

- D. During the five years immediately preceding submission of this application, has any state, including Connecticut, or federal court issued any order or entered any judgement to the applicant concerning a violation of any environmental law?

☐ Yes ☒ No

- E. During the five years immediately preceding submission of this application, has any state, including Connecticut, or federal administrative agency issued any order to the applicant concerning a violation of any environmental law?

☐ Yes ☒ No

Table of Enforcement Actions

(1) Type of Action	(2a) Date Commenced	(2b) Date Terminated	(3) Jurisdiction	(4) Case/Docket/ Order No.	(5) Description of Violation

☐ Check the box if additional sheets are attached. Copies of this form may be duplicated for additional space.

Applicant Background Information (continued)

☒ **Voluntary Association**

☐ Check box if additional sheets are necessary. If so, label and attach additional sheet(s) to this sheet with the required information.

1. List authorized persons of association or list all members of association.

Name: **District of Chapman Beach**

Mailing Address: PO Box 356

City/Town: Westbrook

State: CT

Zip Code: 06498

Business Phone: 203-856-4466

ext.:

E-mail: beach0357@gmail.com

Name:

Mailing Address:

City/Town:

State:

Zip Code:

Business Phone:

ext.:

E-mail:

Name:

Mailing Address:

City/Town:

State:

Zip Code:

Business Phone:

ext.:

E-mail:

Name:

Mailing Address:

City/Town:

State:

Zip Code:

Business Phone:

ext.:

E-mail:

☐ **Individual or Other Business Type**

☐ Check the box, if additional sheets are necessary. If so, label and attach additional sheet(s) to this sheet with the required information.

1. Name:

Mailing Address:

City/Town:

State:

Zip Code:

Business Phone:

ext.:

E-mail:

2. State other names by which the applicant is known, including business names.

Name:

ATTACHMENT 42

APPLICANT BACKGROUND INFORMATION FORM

(DEEP-APP-008)

ATTACHMENT 43

OTHER INFORMATION