# WELLFLEET MARINA BUILDING NEEDS STUDY Wellfleet, MA

# DRAFT SEPTEMBER 29, 2014













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# **SECTION 1**





# Building Conditions Assessment Executive Summary

#### **EXECUTIVE SUMMARY**

The scope of the project is two parts; Phase One: Building Conditions Assessment and Phase Two: Alternatives. The goal is to recommend alternatives to the current situation while taking into consideration future needs and routine upgrades balanced against the cost and need for replacement and long term viability of the group of buildings as a whole.

The scope of the Building Conditions Assessment includes review of 4 structures (the Shellfish Warden Building, Beach Sticker Building, Harbormaster Building, and Public Restroom Building). The assessment comprised of walkthrough nondestructive investigations of each building and a meeting with the key staff of each function to determine functional programs and general space needs.

Three of the four buildings lie within the coastal flood zone AE13 subject to rising water. The Shellfish Building lies within the coastal flood zone VE15 subject to hazard wave action (based on FEMA map 25001C0242J Effective July 16, 2014.) Each will require significant upgrades to structural systems if repairs or alterations are undertaken. Mechanical and electrical systems require significant upgrades for any modifications. Each building has accessibility deficiencies which need correction if modifications are undertaken, particularly lack of accessible toilets and entrances. Any work, when in excess of 50 percent of the building value will require that the buildings fully comply with the code requirements for construction in flood zones.

As a whole the buildings are in fair to poor condition. (Based on a Good/Fair/Poor scale) This assessment takes into consideration both functional needs of the spaces and physical conditions. Strong consideration should be given to replace the structures, and in the case of the Shellfish Building, removing the structure from the VE flood zone.



## **Shellfish Building:**

The building is in Poor condition and has been recently condemned due to mold. Generally the building is open to the weather and will require complete replacement if any continued use of the site is considered for future development. In addition the building is in coastal VE15 flood zone and is not in conformance with flood zone construction. According the Town Assessor, the building value is \$81,400. Therefore any work in excess of fifty percent (50%) of that value (\$40,700) will require elevation of the structure's lowest horizontal structure to two feet (2') above the base flood elevation. A new structure in the same location would likewise need to be elevated. With surrounding grade elevations at approximately 9', the finish floor would need to be approximately 8' above grade.

## **Beach Sticker building:**

The building is in poor condition due to the structural, mechanical electrical and functional deficiencies. Currently the building houses both the Shellfish Warden (temporarily relocated upon condemnation of the shellfish building) and the Beach Sticker office. While the beach sticker function, only seasonal, is served adequately, the needs of the Shellfish Warden are not due to lack of office/meeting space, storage space and heat. With immediate structural repair of the roof, mechanical and electrical upgrades, continued maintenance, ADA upgrades and relocation of the shellfish warden the building could continue to serve the programmatic function of the Beach Sticker Office. However the building will continue to be subject to flooding and damage from wind storms, and require exterior envelope repair in the immediate future. According to the Town Assessor, the current building value is \$72,900. Therefore, work in excess of fifty percent (50%) of that value (\$36,450) will require elevation of the floor to at least one foot (1') above base flood elevation. With surrounding grade elevations at approximately 9', the finish floor would need to be approximately 5' above grade.

## **Harbor Master Building:**

The building is in fair condition. The structure appears to suit the functional needs of the Harbor Master without the need for major modification. The building does require structural upgrades and other routine repairs. The roof should be replaced, and structural upgrades made to the garage roof and two story roof immediately as a matter of asset protection. The handicap ramp should also be upgraded. The windows and doors should be placed on a repair list and addressed within the next few years, followed by routine replacement of the IT and





# Building Conditions Assessment Executive Summary

electrical systems. According to the Town Assessor, the current building value is \$18,700. Therefore, work in excess of fifty percent (50%) of that value (\$9,350) will require elevation of the floor to at least one foot (1') above base flood elevation. With surrounding grade elevations at approximately 10-11', the finish floor would need to be approximately 3-4' above grade.

## **Restroom Building:**

Generally the building is in fair condition. The building is not handicap accessible (although a single handicap accessible unisex toilet was added to the structure at some point the layout is not compliant with the standard in place) and the finishes and fixtures require replacement. This will trigger structural upgrades which will likely result in an entire upgrade for the building. According to the Town Assessor, the current building value is \$8,900. Therefore, any work in excess of fifty percent of that value (\$4,450) will require that the floor be elevated to at least one foot (1') above base flood elevation. With surrounding grade elevations at approximately 10-11', the finish floor would need to be approximately 3-4' above grade.

## **Recommendations: (Phase Two)**

Given the overall scope of repairs and upgrades of the group of buildings, the fact that some efficiency would be gained by not duplicating needs, and the fact that each of the buildings lie within flood zones, strong consideration should be given to replacing each of the Marina functions. The scope of replacement is the purpose of the initial RFP and is detailed the Recommendations and Direction section of this report. Conceptual options for replacement will be investigated in Phase 2.





# **SECTION 2**



#### STATEMENT OF OBJECTIVES

**Phase One: Building Conditions Assessment** 

## **Existing Conditions**

The purpose of this report is to provide a general description of the existing conditions and qualitative assessment of the existing building as part of a project feasibility study being conducted by the town relative to the consolidation of public operations at the Marina.

This report is intended to characterize, in narrative form, with supplementary photo documentation, the condition of the existing site and structures relative to the project program feasibility study prepared by the architect. A brief description of the extent and scope of work required to repair and improve the compromised sections of the structure and infrastructure are included for general reference.

## **Proposed Program Needs**

This report also includes a preliminary assessment of the departmental functional space or program needs. The program is a narrative statement of the services each department renders and translates that into a space assessment which can be used to inform the design of a building or site where the function of the department is met.

## **Phase Two: Conceptual Design report**

Following the acceptance of this preliminary report the design team will investigate options available to the town to meet the Programmatic needs of the each of the departments. The RFP called for several options to be investigated.

Option One: Combine all functions into one building at the marina.

Option Two: Combine Harbor and Shellfish facilities at marina.

Option Three: New Shellfish Building on the existing site take no action on other functions.

Option Four: Relocate Beach Sticker off site, move Shellfish to Beach sticker location.

Option Five: Relocate Beach Sticker off site: Harbor and Shellfish at the Beach Sticker site



# Building Conditions Assessment Methodology

#### **METHODOLOGY**

The Design teams conducted a visual nondestructive evaluation and general conditions assessment of each of the four buildings; The Shellfish Warden Building, The Beach Sticker Building, The Harbormaster Building, and Public Restroom Building located at the Wellfleet Marina.

Each structure was visited by senior personnel of the Design team who are registered architects and engineers, each with 20+ years of experience designing and evaluating buildings.

#### The assessment included:

- Visual inspection of all reasonably accessible spaces
- Visual inspections of electrical services and distribution
- Visual inspection of plumbing fixtures and distribution
- · Visual inspection of the grounds and general site surrounding each facility
- Visual inspection of mechanical systems
- Visual inspection of architectural finishes
- Visual inspection of structural components
- Review of documentation provided by the owner on the day of visual inspection
- Review of related publically available mapping and GIS resources
- Interviews with building users
- Observations of public interaction with the staff and structures
- Generalized code evaluation based on visual deficiencies.

## The assessment did not include:

- Destructive, moisture or materials testing or investigation
- Computations or calculations to determine suitability of engineering components
- Review of existing in place material warranties
- Measurements suitable for final design/construction purposes
- Comprehensive code analysis





# **SECTION 3**



#### **EXISTING CONDITIONS**

## **HARBOR MASTER BUILDING - NARRATIVE**

#### **Description of the Building**







The building consists of a two story office space with a two stall attached garage. It is a wood framed structure with weathered white cedar shingle siding, painted wood trim and asphalt single roof. The two story portion of the building has approximately 390 square feet of area with eight feet ceiling height per floor. The garage portion of the building has approximately 400 square feet of area with nine feet ceiling height, and attached to the east end of the garage is a small storage shed approximately 90 square feet. The total building area is 1270 square feet. The ground floor is concrete slab on grade, and the foundation is CMU. There is an existing concrete ramp from grade to the first floor office main entrance door. The exterior doors are wood panel the windows are vinyl replacement double hung. The structure is not served by plumbing. The function of the Harbormaster appears to be met in this building.

## CONDITIONS ASSESSMENT REPORT -ARCHITECTURAL

The exterior envelope of the building requires replacement. Wood shingles are cupping worn and beginning to break due to age. The lack of gutters and down spouts is causing excessive wear at roof wall intersections and premature aging of wall and roof finishes. The roof shingles are past their useful life and should be replaced immediately. Stained ceiling plaster on the second floor above the stair is indicative of a roof leak and should be removed and replaced immediately to further prevent damage. The windows have recently been replaced with vinyl, however are set in the existing frames which are damaged and potentially allowing water to penetrate the system. The overhead garage doors appear to be in functional condition. The exterior access ramp does not comply with accessibility standards as the railing is not sufficiently anchored and the landing is too small. The slope of the ramp was not confirmed. The interior finishes appear to be serviceable.

#### **Architectural Recommendations:**

If the building remains, schedule routine renewal of exterior envelope.





## **CONDITIONS ASSESSMENT REPORT -CIVIL**

#### Introduction

Coastal Engineering Company, Inc. performed a site conditions assessment of the building infrastructure in the area of the study. The site assessment included an inspection of the existing grading at the site, inspection of the existing storm water runoff management system for the building and surrounding areas, and a review of existing SDS systems. The purpose of our site evaluation was to perform a general inspection of the existing site and to determine requirements for future development.

#### **Field observations**

The harbormaster building is situated on the Town owned property identified as Parcel 114 on Assessor Map 21. Located at the Town of Wellfleet Marina, the building is nearly surrounded with pavement. Ground surface elevation at the harbormaster building is EL10 ft. to EL11 ft. (NAVD 1988). The new FEMA Flood Insurance Rate Maps (FIRMs) which became effective on July 16, 2014 show that the upland portion of the property where the building is situated is within a flood hazard area mapped as Zone AE (EL13).

We observed several storm water catch basins in the vicinity of the building. The pavement around the catch basin grates showed no evidence of flooding or ponding during storm events, indicating that the storm water drainage systems are functioning.

The building has no water service or sanitary sewage system.

### **Evaluation**

As noted above, the project site lies within a FEMA flood hazard zone, which is also classified as "land subject to coastal storm flowage" under the state Wetland Protection Act. As such, the project site is within a wetland resource area and any proposed work on the site will require the filing of a Notice of Intent with the Wellfleet Conservation Commission and MassDEP. The existing stormwater drainage systems at the subject property appear to be functioning and no evidence of failure was observed. However, any work at the property that requires the filing of a Notice of Intent will necessitate review of the stormwater drainage systems for compliance with the Massachusetts Stormwater Regulations, and upgrades to the existing stormwater drainage systems may be required.

## Recommendations

Take measures to protect the building from flooding hazards.





#### CONDITIONS ASSESSMENT REPORT -STRUCTURAL

#### **Introduction**

Coastal Engineering Company, Inc. performed a general structural inspection and conditions assessment at each of the reference buildings identified in the project Scope of Services. The field investigation included a visual inspection of each building foundation and framing in accessible areas. Areas inspected typically included:

- 1) Foundation walls
- 2) Roof framing
- 3) Exterior building
- 4) Exterior roof lines

## **Field Observations**





The building is a wood frame structure with conventional stick built walls and roof and a concrete slab on the ground floor. The roof structure in the office was not accessible, but judging from the rest of the building, presumed to be conventional wood frame construction. The foundation is CMU.

The building sets close to the grade, with less than two inches clearance to the adjacent grade in some areas. A concrete ramp leads up to the Harbormaster's reception area, which then steps down to the garage floor slab. The roof in the garage area is field built roof trusses spanning the short building directions. The roof rafters are not secured to the wall plate with hurricane straps or hardware required by current standards for buildings in coastal high wind areas. Framing augmentation will likely be required to meet current high wind load standards.

Exterior building lines appear plumb and true, with no apparent signs of defect in the wall framing at any of the existing door and window openings. Walls are assumed to be 2x4 wall construction as evident by the generally shallow depth sills observed in the door and window frames.



# Wellfleet Marina Wellfleet, MA



## Building Conditions Assessment Harbor Master-Existing Conditions

## **Evaluation**

The roof framing in the garage appears to be undersized given the spans and open nature of the garage structure. Framing augmentation will likely be required to meet current high wind load standards. This would include the installation of hurricane ties at rafter ends to improve building performance in resisting high wind loading designated for the region. This would include installing hurricane ties at each rafter tail and at the rafter to ridge board connection.

The exterior handicap ramp is in fair condition, however the railings are not well constructed or anchored to concrete base.

#### Recommendations

There are no major structural repairs required for this building at this time, however, the exterior handicap ramp rails needs to replace with new materials solidly attached to the structure. The garage roof structure should be augmented to secure field built truss connections.

Long term recommendation to improve the building's resistance to high wind forces includes installation of metal hurricane ties and anchors at roof framing members. In order to be effective, the hurricane ties need to be installed to anchor each roof rafter through the double plate and into the exterior stud wall framing. As this cannot be easily done from inside the roof attic, it is recommended that this be done when the exterior siding is replaced.



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## **EXISTING CONDITIONS SYSTEMS REPORT - MEP/FP**

## **Fire Protection Systems:**

The building does not presently have any installed fire protection systems.

## **Plumbing Systems:**

There is no plumbing system presently in the building.

## **HVAC - Heating, Ventilation and Air Conditioning:**

The building is presently served with one hot air furnace. The system is on a single zone. The furnace BTU output is approximately 80,000 and fueled by propane. The equipment is in good condition and was recently installed.

The combustion venting is direct vent to the exterior.







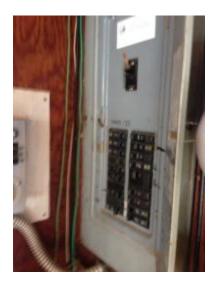




## **Electrical:**

Presently, the Electrical Systems serving the Harbormaster Building are feed from underground wiring from exterior distribution equipment installed approximately six years ago. The service is rated at 200A, 120/208volt, single phase.

There is a portable generator at isolated panel with plug for generator.









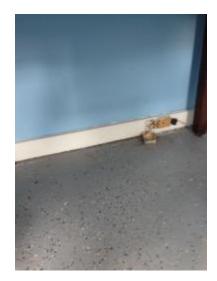




# Power Devices (receptacles):

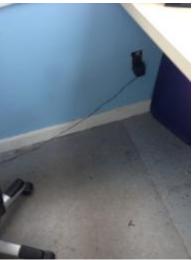
The existing wiring in the building is Romex similar to residential construction.

Receptacles generally are residential wall type.











Lighting fixtures generally are wraparound fluorescent. These are in fair condition.





## **Incoming Telephone and Security Systems:**

The incoming underground Telephone service is underground. There is a Comcast cable modem and network switch present.

The data wiring is run loosely on the second floor.







# Building Conditions Assessment Harbor Master-Existing Conditions

## **GENERAL RECOMMENDATIONS:**

The building is in Fair condition, and serviceable. The structure does require reinforcement for wind storm loading and is subject to flooding. Raising the building to avoid the flooding hazard will likely prove economically infeasible and result in replacement.

- Upgrade electrical distribution from residential to commercial grade
- Upgrade IT wiring for permanent use
- Replace entire exterior envelope, doors, windows, siding roofing and trim.
- Anchor roof to wall and wall to foundation
- Take measures to protect the building from flood hazard:
  - o Flood proofing below 4 feet, or raise structure.
  - o Drainable wall construction to prevent moisture damage and mold
- ADA upgrades
  - o Ramp
  - o Doors
  - o Hardware
  - o signage
- · Add staff toilets
- Addressable fire alarm
- Permanent electrical back up generation system
- Renew interior finishes





#### **EXISTING CONDITIONS**

## **PUBLIC RESTROOM BUILDING - NARRATIVE**

#### **Description of the Building**







The building is one story. The floor area is approximately 490 square feet with separate men's and women's restroom facilities which are not handicapped accessible, and a unisex accessible restroom. The unisex accessible toilet room addition to the south of the main building was not inspected during this visit as the door was locked. Based on the exterior dimensions and previous study plans the room is not accessible. Further the ramp and landings are not accessible. The facility serves as the public and staff toilets for the marina based town departments.

Construction is wood strapped CMU exterior walls with weathered white cedar shingle siding, painted wood trim. The roof is wood framed with asphalt shingles. The floor is concrete slab on grade, and the foundation is CMU. There is an existing concrete ramp from grade to the unisex restroom. The exterior doors are metal and the windows are fixed wood sash.

The building as a whole appears to be in fair condition.

## **EXISTING CONDITIONS ASSESSMENT REPORT - ARCHITECTURAL**

The facility is not handicap accessible and should be modified to meet code. Currently the only accessible toilet facilities at the marina are a temporary toilet located outside the Beach Sticker building.

The exterior envelope is worn and in need of repair. Roof shingles are in fair condition with 7-10 years of service life remaining. Cedar shingle siding is aging beginning to cup and break. Trim broads and paint is in fair condition. Windows and doors are in fair condition, and not handicap accessible.

The interior finishes are worn and at the end of their useful life. Plumbing and electrical fixtures are also at the end of their useful life.







## **EXISTING CONDITIONS ASSESSMENT REPORT - CIVIL**

#### Introduction

Coastal Engineering Company, Inc. performed a site conditions assessment of the building infrastructure in the area of the study. The site assessment included an inspection of the existing grading at the site, inspection of the existing storm water runoff management system for the building and surrounding areas, and a review of existing SDS systems

The purpose of our site evaluation was to perform a general inspection of the existing site and to determine requirements for future development.

## **Field observations**

The public restroom building is serviced by a Title 5 sewage disposal system which is augmented with a  $16' \times 16'$  recirculating sand filter. The site and sewage plan prepared by Felco, Inc., dated 3-4-96, shows a system design flow of 700 gallons per day (gpd). The capacity of the system's 3,500 gallon septic tank and  $70'L \times 20'W$  leaching field is limited by the leaching field to 1,036 gpd. Our investigation found no design calculations for the recirculating sand filter so we cannot draw any conclusions as to the capacity of the sand filter. Correspondence in the Board of Health files and a discussion with the Health Agent indicates that there have been problems with the recirculating sand filter operation.

Water use records for the years 2012 and 2013 show that for the months of May through October, water usage of the public restroom building has averaged 420 gpd. In instances where water usage is used for design of a sewage disposal system, MassDEP requires that average daily flows to be doubled to estimate peak daily flow, which is the basis of sewage disposal system design. Doubling of the observed average daily flow results in an estimated peak daily flow of 840 gpd. In that the water meter readings span the six months from May through October, and knowing that a large portion of the water use occurs in the months of July and August, it is possible that the existing sewage disposal system could be hydraulically overloaded on peak summer days.

The building is situated on the Town owned property identified as Parcel 114 on Assessor Map 21. Located at the Town of Wellfleet Marina, the buildings are nearly surrounded with pavement. Ground surface elevation at the building is approximately EL10 ft. to EL11 ft. (NAVD 1988). The new FEMA Flood Insurance Rate Maps (FIRMs) which became effective on July 16, 2014 show that the upland portion of the property where the buildings are situated is within a flood hazard area mapped as Zone AE (EL13).

We observed several stormwater catch basins in the vicinity of the buildings. The pavement around the catch basin grates showed no evidence of flooding or ponding during storm events, indicating that the stormwater drainage systems are functioning.



# Wellfleet Marina Wellfleet, MA



## Building Conditions Assessment Restrooms -Existing Conditions

The buildings have been serviced by municipal water supply since 2011 when the Town extended the municipal water system to the property. A discussion of each building's sanitary sewage system follows.

#### **Evaluation**

The sewage disposal system serving the public restroom building, and harbormaster building because it has no sewage disposal system of its own, appears to be functioning. Water meter readings indicate that the system may be hydraulically overloaded on peak summer days in July and August, but lower flows during the shoulder season and very low flows in the winter months probably help the system to recover. Health Department files indicate the recirculating sand filter has had problems over the years and its design and construction should be reviewed as part of any sewage disposal system modification.

#### Recommendations

Once a program for the three buildings and their uses is established, conceptual designs for new or upgraded sewage disposal systems can be made. Given the sensitivity of the harbor to nitrogen loading it is recommended that any system include components that provide enhanced nitrogen removal. The nitrogen removal component may be a recirculating sand filter or other MassDEP-approved system.

The sewage disposal system plan for the public restroom building shows that soils suitable for subsurface sewage disposal are present near the restroom building and that adequate separation between the bottom of the soil absorption system and high water table can be provided. Based on the plan information, we anticipate that a Title 5 sewage disposal system with a capacity to handle the anticipated sewage flows could be designed for the restroom building, harbormaster building, and beach sticker building. If project timing permits, we advise that daily water meter readings be taken at the restroom building and beach sticker building during the months of July and August 2015 to obtain the best possible information on peak water usage for system design.

The existing storm water drainage systems should be investigated and need for improvements or upgrades determined when the building program is more clearly defined.





## **CONDITIONS ASSESSMENT REPORT -STRUCTURAL**

#### Introduction

Coastal Engineering Company, Inc. performed a general structural inspection and conditions assessment at each of the reference buildings identified in the project Scope of Services. The field investigation included a visual inspection of each building foundation and framing in accessible areas. Areas inspected typically included:

- 1) Foundation walls
- 2) Roof framing
- 3) Exterior building
- 4) Exterior roof lines

#### **Field Observations**



The existing building is a one story, public restroom building, approximately 490 sq ft, with separate men's and women's facilities on either side of the building. The building has concrete block walls and a wood frame roof; the ground floor is a slab on grade within a concrete masonry unit (CMU) foundation.

The roof structure was not fully accessible, however, from a small hole in the ceiling, it was determined that the structure was 2x wood frame. The exterior of the building is traditional white cedar shingles and pine trim on furring strips attached to the CMU wall structure. Exterior building roof lines appear plumb and true, and with except for a slight sag in the roof overhang, there was no apparent sign of excessive deflection or sagging in the roof structure. The existing roof structure should be adequate to sustain new roofing at the time of replacement, provided the old roofing materials are removed. The building sets close to the grade, with less than four inch clearance to the adjacent grade. A small platform landing that steps to the bathroom entrance door is in poor condition.

## **Evaluation**

Overall the building is in fair condition, and except for the normal wear and tear inside the public restroom, a viable structure. The exterior wood deck landing at the restroom door openings is in poor condition and should be replaced with a new deck that is properly secured to the foundation with support posts and railings anchored to a new concrete pier foundation. The slight sag in the roof





## **Building Conditions Assessment Restrooms - Existing Conditions**

overhang is not an immediate concern, and can likely be corrected when it comes time to replace the roof.

#### Recommendations

There are no major structural repairs required for this building at this time, however, the exterior deck landing at the door entrance needs to be replaced.

Long term recommendation to improve the building's resistance to high wind forces includes installation of metal hurricane ties and anchors at roof framing members. In order to be effective, the hurricane ties need to be installed to anchor each roof rafter through the double plate and into the exterior stud wall framing. As this cannot be easily done from inside the roof attic, it is recommended that this be done when the exterior siding is replaced. This would include installing hurricane ties at each rafter to ridge board connection as well.

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## **EXISTING CONDITIONS SYSTEMS REPORT - MEP/FP**

## **Plumbing Systems:**

## Fixtures:

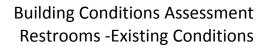
The water closets are floor mounted with flusho-meter vitreous china. Urinals are wall hung vitreous china with manually operated flush valves. Lavatories wall hung vitreous china or countertop mounted vitreous china. Faucets are generally center-set faucets.













## **Electrical:**

The lighting consists of recessed down lights. The fixtures appear to have retrofit LED lamps. Fixtures are in fair condition. There is a single GFCI outlet adjacent to sink and mounted at approximately 5 ft. above floor. The maximum height for receptacles used for convenience is 48" above finished floor.









## Building Conditions Assessment Restrooms -Existing Conditions

### **GENERAL RECOMMENDATIONS:**

The overall condition of the facility is fair to poor. The structure appears to be sound and viable for reuse of major renovation. The non-handicap accessible configuration of the facility and end of life finishes receive a poor rating. In the short term the facility should be scheduled for a comprehensive renovation. Due to the size of required handicap toilet facilities it is likely the facility will lose fixtures. Given that the facility serves the entire marina staff and the public this may not be desirable and will likely trigger an addition.

Review usage requirements and make required upgrades to the SDS. Incorporate the current system into any new designs or abandon.

- Upgrade electrical distribution from residential to commercial grade
- Replace all plumbing and electrical fixtures
- Addressable fire alarm
- Replace entire exterior envelope, doors, windows, siding roofing and trim.
- Anchor roof to wall and wall to foundation
- Take measures to protect the building from flood hazard:
  - o Flood proof below 4 feet or raise structure
  - Drainable wall construction to prevent moisture damage and mold
- ADA upgrades
  - o Ramp
  - o Doors
  - o Hardware
  - o Signage
  - Toilet and shower facilities
- Renew interior finishes
- Install heating system so the facility can functionally serve year round staff needs



#### **EXISTING CONDITIONS**

## **BEACH STICKER BUILDING - NARRATIVE**

#### **Description of the Building**







The building is one story wood framed structure with weathered white cedar shingle siding, painted wood trim and asphalt single roof. The ground floor has approximately 1,200 square feet of area with eight feet ceiling height. The main space on the ground floor is used for beach sticker sales and public information center, with a small private office currently used by shellfish operations. The remaining space is used for storage and a single user employee toilet area. There is an unfinished attic storage space with a full shed dormer spanning the entire ground floor accessible by a pull-down ladder in the storage area, and an exterior gable end door with a hoist beam. The ground floor is concrete slab on grade, and the foundation is CMU. There is an attached wood framed deck at existing floor level with a ramp at the south end of the building which provides handicapped access to the ground floor at the existing glass sliding door. The exterior doors are wood panel the windows are wood double hung and awnings. The structure appears to be in poor condition.

## **EXISTING CONDITIONS ASSESSMENT REPORT -ARCHITECTURAL**

The exterior elements of the building are worn and require replacement. The cedar shingles are cupped and beginning to crack. The Asphalt roof shingles are worn, dog eared and missing in a several locations. Some windows have been replaced recently; however belie the underlying need for frame repair or replacement. Windows on the dormer are nonfunctioning. The sliding glass door sill is not handicap accessible. Wood trim has been painted recently. In several areas the wood trim is rotting particularly at the roof edge board ends near the gutters. The rubber roof membrane covering the dormer is face nailed to the western eave fascia. The interior finishes have been freshly painted in the public spaces. Interior doors are of residential grade and door hardware is inaccessible. The building contains a single user toilet room, which is not handicap accessible. In addition to the left of the base of the toilet a hole in the concrete slab has been filled with spray foam. The ceiling throughout the building is 2x4 acoustic ceiling tile it appears to be in fair condition. Floor is painted concrete. Several patches or successive pours of concrete can be seen through the paint.





## **EXISTING CONDITIONS ASSESSMENT REPORT -CIVIL**

## Introduction

Coastal Engineering Company, Inc. performed a site conditions assessment of the building infrastructure in the area of the study. The site assessment included an inspection of the existing grading at the site, inspection of the existing storm water runoff management system for the building and surrounding areas, and a review of existing ISDS systems

The purpose of our site evaluation was to perform a general inspection of the existing site and to determine requirements for future development [sic]

## **Field observations**

The beach sticker office is situated on the Town owned property identified as Parcel 114 on Assessor Map 21. Located at the Town of Wellfleet Marina, the building is are nearly surrounded with pavement except for the west side. Ground surface elevation at the harbormaster and public restroom buildings is approximately EL10 ft. to EL11 ft. (NAVD 1988), and ground surface elevation at the beach sticker building is approximately EL9 ft. (NAVD 1988). The new FEMA Flood Insurance Rate Maps (FIRMs) which became effective on July 16, 2014 show that the upland portion of the property where the buildings are situated is within a flood hazard area mapped as Zone AE (EL13).

We observed several storm water catch basins in the vicinity of the buildings. The pavement around the catch basin grates showed no evidence of flooding or ponding during storm events, indicating that the stormwater drainage systems are functioning.

The building has been serviced by municipal water supply since 2011. The building is serviced by a 2,000 gallon "tight tank" that was installed in June 2013. According to the MassDEP approval letter dated June 14, 2011 the tight tank was approved as "an interim measure while the Town of Wellfleet is developing a facilities plan for the marina area". Condition #12 of the approval states that the tight tank shall not be used after June 14, 2016.

#### **Evaluation**

As noted above, the project site lies within a FEMA flood hazard zone, which is also classified as "land subject to coastal storm flowage" under the state Wetland Protection Act. As such, the project site is within a wetland resource area and any proposed work on the site will require the filing of a Notice of Intent with the Wellfleet Conservation Commission and MassDEP. The existing stormwater drainage systems at the subject property appear to be functioning and no evidence of failure was observed.





## Building Conditions Assessment Beach Sticker - Existing Conditions

However, any work at the property that requires the filing of a Notice of Intent will necessitate review of the storm water drainage systems for compliance with the Massachusetts Storm water Regulations, and upgrades to the existing storm water drainage systems may be required.

The MassDEP approval letter for the tight tank serving the beach sticker building established a sunset date of June 14, 2016 for the tight tank's use. At the time of the approval, MassDEP was the final approving authority for tight tanks. In February 2014 new Title 5 regulations were issued that allow a local board of health to approve the use of a tight tank to serve a publicly owned and operated seasonal structure where it is not feasible to connect to a sewer or to construct a system in compliance with 310 CMR 15.000 (Title 5). Based on our understanding of the new Title 5 regulations it may be possible for the Wellfleet Board of Health to issue a new approval for the tight tank and allow its use to continue at this seasonally used building, if they determine that it is not feasible to construct a system in compliance with Title 5. Such a finding might be difficult in that a Title 5 sewage disposal system plan prepared by Felco, Inc., dated 8-9-2008, is in the files at the health department.

#### Recommendations

The sewage disposal system plan for the public restroom building shows that soils suitable for subsurface sewage disposal are present near the restroom building and that adequate separation between the bottom of the soil absorption system and high water table can be provided. Based on the plan information, we anticipate that a Title 5 sewage disposal system with a capacity to handle the anticipated sewage flows could be designed for the restroom building, harbormaster building, and beach sticker building. If project timing permits, we advise that daily water meter readings be taken at the restroom building and beach sticker building during the months of July and August 2015 to obtain the best possible information on peak water usage for system design.

#### **EXISTING CONDITIONS ASSESSMENT REPORT -STRUCTURAL**

#### Introduction

Coastal Engineering Company, Inc. performed a general structural inspection and conditions assessment at each of the reference buildings identified in the project Scope of Services. The field investigation included a visual inspection of each building foundation and framing in accessible areas. Areas inspected typically included:

- 1) Foundation walls
- 2) Roof framing
- 3) Exterior building
- 4) Exterior roof lines

#### **Field Observations**





## Building Conditions Assessment Beach Sticker - Existing Conditions







The building is a one story building, approximately 1,200 sq. ft. The structure is a wood frame structure with conventional stick built walls and roof, with a concrete slab on the ground floor. The foundation is CMU. The roof is a simple gable with a full dormer and continuous center ridge running the length of the building. Roof framing consists of 2x6 rafters and 2x6 ceiling joist spaced @ 16" on center on both sides of the sloped roof. The ceiling joists at the dormer section are cut into the interrupted rafter on the back side roof slope, forming a weak link in the framing. As a result, the roof ridge has a noticeable sag in the exterior roof line. Attempt has been made to remedy the situation as evident by a short 2x4 knee wall installed to prop up the front building sloping rafters. Roof rafters bear on a double plate in the exterior wall. It was noted that no hurricane ties were installed at any of the rafters. Ceiling joist above the main floor are supported on a continuous girder that bears on center bearing posts equally spaced at about thirteen foot centers inside the building.

As a result of the deficient framing described above, the exterior building lines appear uneven with obvious signs of defection in the roofing. Walls are assumed to be 2x4 wall construction as evident by the generally shallow depth sills observed in the door and window frames. The exterior porch deck outside the living room is of marginal construction; the framing sits close to the ground with loose laid concrete block used to support the deck rail posts. The support posts are not anchored to the foundation and the ledger board supporting the deck joist is not properly connected to the building frame.

Outside, the building sets close to the grade, with less than two inches clearance to the adjacent grade in some areas. A concrete ramp leads up to the visitors information area, with steps that lead to the parking grade at the front door entrance.

#### **Evaluation**

Except for the deficiencies observed in the roof framing, the overall the building is in fair structural condition. The exterior wood deck landing at the restroom door openings is in poor condition and will need to be replaced soon with a new deck that is properly secured to the foundation with support posts and railings properly anchored to a concrete foundation. The attic floor cannot be used for any useable function, and should not be used for storage of any heavy materials. Attic space access is limited to the





## Building Conditions Assessment Beach Sticker - Existing Conditions

pull down stairs, so if the space were to be converted to any other use, a proper stair access, as well as framing augmentation will be required.

The sag in the roof is indicative of overstress and improper framing when the dormer roof was constructed. The framing will need to be corrected when it comes time to replace the roof, if not before. Installation of hurricane ties at rafter ends should be done at that time to improve building resistance to high wind forces in long term. This would include installing hurricane ties at each rafter tail and at the rafter to ridge board connection.

#### **Recommendations**

The roof structure should be reinforced or augmented to stabilize the structure. If the attic is to be used for functional space, the entire roof should be removed and replaced with a properly designed structure. The attic floor would also need to be reinforced. The foundation should be able to sustain an office type floor load, however, mechanical anchorage to the foundation would be required to meet current wind loading requirements. If building improvements were to exceed 50% the value of the building, then the structure would also need to be elevated above the Base Floor Elevation. If this were the case, then new foundations would be required to meet FEMA flood zone standards. Elevating the structured would require ramps up to the floor deck to meet accessibility requirements, New ramps and decks will also require new foundations and hurricane tie down anchors.

Long term recommendation to improve the building's resistance to high wind forces includes installation of metal hurricane ties and anchors at roof framing members. In order to be effective, the hurricane ties need to be installed to anchor each roof rafter through the double plate and into the exterior stud wall framing. As this cannot be easily done from inside the roof attic, it is recommended that this be done when the exterior siding is replaced.



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## **EXISTING CONDITIONS SYSTEMS REPORT - MEP/FP**

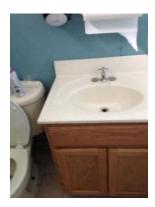
## **Fire Protection Systems:**

The building does not presently have any installed fire protection systems. There is a carbon monoxide detector present.

#### **Plumbing Systems:**

There is a single toilet room with floor mounted tank type water closet and a vanity type sink. The fixtures are of residential style and grade and are not code compliant.





#### **HVAC - Heating, Ventilation and Air Conditioning:**

The building does not have HVAC. There is a portable floor mounted air conditioning that in corner office. Local fans are used for circulating air.







## **Electrical:**

The electrical service serving the Beachsticker Building is fed from overhead. The service is rated at 100A, 120/240volt, single phase. The electrical panel is in poor condition.

## **Power Devices (receptacles):**

The existing wiring in the building is Romex similar to residential construction.

Receptacles generally are residential wall type. Extension cords are being used throughout.





## **Lighting Fixtures:**

Lighting fixtures generally are recessed fluorescent. The fixtures are in fair condition.







# Building Conditions Assessment Beach Sticker - Existing Conditions

## **Incoming Telephone and Security Systems:**

There is incoming overhead Telephone service.

The data wiring is not run to patch panels. There is a security system present manufactured by Napco. Motion sensors are present in open space.











# Building Conditions Assessment Beach Sticker - Existing Conditions

#### **General Recommendation:**

The structure is in poor condition. The program of the Shellfish Warden is not meet in the building. The structure is about 2 feet below the flood elevation and requires structural repair and upgrades to meet wind storm loads. The building should be replaced individually or incorporated into a larger waterfront services facility.

The building requires major upgrades:

- Sewage disposal is only permitted for seasonal use
- Title 5 sewage regulations require a new system after 2016
- Secure loose roof membrane immediately
- Repair damaged roof structure immediately
- Replace main electrical panel and service entrance
- Upgrade electrical distribution from residential to commercial grade
- Upgrade IT wiring for permanent use
- Replace entire exterior envelope, doors, windows, siding roofing and trim.
- Anchor roof to wall and wall to foundation
- Take measures to protect the building from flood hazard:
  - o Flood proof below 4 feet or raise structure
  - o Drainable wall construction to prevent moisture damage and mold
- ADA upgrades
  - o Ramp
  - o Doors
  - Hardware
  - o Signage
  - o Service counters
  - o toilets
- Staff/public toilets
- Addressable fire alarm
- Renew interior finishes



#### **EXISTING CONDITIONS**

## **SHELLFISH BUILDING - NARRATIVE**

#### **Description of the Building**





The building is one and a half story wood framed structure with weathered white cedar shingle siding and painted wood trim and asphalt single roof. The ground floor has approximately 730 square feet of area with eight feet ceiling height, and there is an unfinished attic space spanning the entire ground floor with usable floor space limited by the roof line. The ground floor is concrete slab on grade, and the foundation is CMU. There is an attached storage shed on the west side, and a wood framed awning over the rear door. The exterior doors are wood panel, and the windows are wood double hung. The building as a whole is in very poor condition and was recently condemned due to mold.

#### **EXISTING CONDITIONS SYSTEMS REPORT – ARCHITECTURAL/STRUCTURAL**

Generally the building is open to the weather and exhibits water damage throughout the structure. All architectural finishes are damaged and beyond their useful life. Doors and windows are broken and beyond repair. Based on the age of the structure and visible features the structure of the building would require an excessive amount of repair making any restoration attempt economically infeasible. In addition the amount of repair; essentially replacing every feature of the building would trigger structural code upgrades requiring the building to be above the flood elevation, in turn requiring the building to be replaced.



#### **EXISTING CONDITIONS SYSTEMS REPORT – CIVIL**

The building is surrounded by sand and dune grass. The building has no pavement or parking areas directly associated with the structure. The condition of the sewage disposal system is not known. The water service is provided by the town.

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#### **EXISTING CONDITIONS SYSTEMS REPORT - MEP/FP**

## **Fire Protection Systems:**

The building does not presently have any installed fire protection systems.

#### **HVAC - Heating, Ventilation and Air Conditioning:**

The building is presently served with one hot air furnace. The system is on a single zone. The furnace is not operational and beyond repair

The combustion venting is to the exterior. The ductwork is in poor condition.













## **Electrical:**

The electrical serving the Shellfish Building is underground. The service is rated at 100A the equipment is in fair condition.





## **Power Devices (receptacles):**

The existing wiring in the building is Romex similar to residential construction.

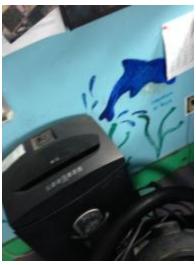
Receptacles generally are residential wall type. Extension cords have been used in past.











## **Lighting Fixtures:**

Lighting fixtures generally are recessed fluorescent in the office area and fluorescent strips in storage area. Lighting fixtures are in poor condition.





# Building Conditions Assessment Shellfish Bldg. - Existing Conditions





#### **GENERAL RECOMMENDATION:**

Remove the building from service/demolish. Incorporate the functions of the structure into a combined waterfront services building.





# **SECTION 4**





#### PROPOSED PROGRAM NEEDS

## SHELLFISH WARDEN - 1000 square feet

#### General:

The Shellfish Warden oversees the administration and monitoring of public and commercial shell fishing beds within the town. The Warden staff consists of three full time employees whose shifts vary with tidal and weather conditions. The staff require a permanent facility to perform paper work and meet with the public/commercial fishermen, and a storage space approximately a two car garage. The Warden does not issue permits. The office is run year round. All spaces require access to toilets.

#### Reception 200 sf:

- Seating area
- Counter area to Wardens office

#### Warden's office 200 sf:

- (1) Dedicated workspace for Warden
- (1) Dedicated work area for additional staff
- Small conference table for (4)
- (2) four drawer file cabinets
- Personal office storage for employees

#### **Storage Garage 500 sf:**

- Organized as a two pick-up truck garage
- Work bench
- Small tool storage
- Exterior wash down area
- Limited heat

- Single user Handicap Accessible toilet
- Custodian sink and supply cabinet





# BEACH STICKER OFFICE – 925 square feet (replicating current space) General:

The Beach sticker office is a seasonal operation administering the issuance of beach access passes, shellfish licenses during the summer season, beach fire permit and transfer station permits. Typically the office is the first point of contact for tourists as such the Chamber of Commerce has a staffed presence in the space. The office is a service function similar to a bank transaction counter. A line forms and customers approach the desk to purchase stickers. The office is staffed by 4 full time employees (three 'tellers' and an administrator). In addition to the transaction counter a work area and separate administration desk are required. All of the spaces require access to toilets. The operation is contained in a house with an enclosed waiting area.

#### Reception: - 400 sf

Open floor area for waiting lines

#### Transaction Counter and Work areas: - 400 sf

- Transaction counter with three stations (one handicap accessible: low)
  - Equipped with computer and point of sale card readers, Cash drawers, Form storage, Supplies storage
- Administrator's work area
  - Desk for processing related paper work
  - Computer and point of sale card reader
- Work counter for processing paperwork
  - Flat area for processing paperwork
- Storage room 80 sf. Off season storage of materials
  - Area for (4) four drawer file cabinets, Storage of forms and supplies

#### Chamber of Commerce Kiosk - 25 sf

- Display area for local businesses 5 sf (maintained by the Chamber of Commerce)
- Seating area for representative, staffed three days a week
- Computer access

- Single user Handicap Accessible toilet
- Custodian sink and supply cabinet





## BEACH STICKER OFFICE – 500 square feet (alternate program) General:

The Beach sticker office is a seasonal operation administering the issuance of beach access passes, shellfish licenses during the summer season, beach fire permit and transfer station permits. The office is a service function similar to a bank transaction counter. A line forms and customers approach the desk to purchase stickers. The office is staffed by 4 full time employees (three 'tellers' and an administrator). In addition to the transaction counter a work area and separate administration desk are required. All of the spaces require access to toilets.

This alternate program assumes the lines are formed outside similar to an ice cream stand or exterior bank ATM. Further study of the process could further reduce the square footage needs.

#### Transaction Counter and Work areas: - 400 sf

- Transaction counter with three stations (one handicap accessible: low)
  - Equipped with computer and point of sale card readers, Cash drawers, Form storage, Supplies storage
- Work counter for processing paperwork
  - Flat area for processing paperwork
- Administrator's work area
  - Desk for processing related paper work
  - Computer and point of sale card reader
- Storage room 80 sf. Off season storage of materials
  - o Area for (4) four drawer file cabinets, Storage of forms and supplies

- Single user Handicap Accessible toilet
- Custodian sink and supply cabinet





# Building Conditions Assessment Proposed Program Needs

HARBORMASTER: 1,400 square feet

#### General:

The harbor master oversees the daily operation of the boat launch, marina, transient moorings and slips, and annual renewal/renting of moorings and slips. The department is staffed with 1 full time and two part time year round employees and 4-5 seasonal employees. The existing location suits most needs very well. The office requires three permanent office type work stations and one transaction work station. Observation deck (second story) is required for general and emergency observation of the Harbor. Interior gear storage room and a Garage/work room generally the size of a (2) truck garage. All areas require access to toilets.

Reception: 100 sf

Waiting area for the public adjacent to the transaction desk

Transaction desk and work area: 200 sf

- Transaction desk area to collect launch and marina fees (first part time employee permanent work station)
- Work area equipped with a computer and point of sale card reader
- (2) four drawer file cabinets
- Work area equipped with a computer and desk (second part time employee permanent work station)

Harbor Master: 400 sf

- Work desk equipped with a computer
- 6 person conference work table
- VHF radio location
- Preferred to be located on second level with clear view of harbor/wharf/marina.

Storage Garage: 500 sf

- Organized as a two pick-up truck garage
- Work bench
- Small tool storage
- Exterior wash down area
- Limited heat

Interior Storage area: 100 sf





# Building Conditions Assessment Proposed Program Needs

• Adjacent to the transaction desk and work area

- Single user Handicap Accessible toilet
- Custodian sink and supply cabinet





# Building Conditions Assessment Proposed Program Needs

**PUBLIC RESTROOMS: 905 square feet** 

General:

The public restroom facility serves the needs of the public both at the marina and casual visitors, and the Harbormaster staff. If the replacement of the building is determined to be required a comprehensive code and historical data study should be conducted to determine the size of the facility and the sewage system.

For the purposes of this report the program is based on a simple upgrade of the facility to meet handicap, flood zone and hurricane wind loading. The size (number of fixtures) is determined by the existing fixture count plus one fully handicap compliant shower and toilet stall for each sex. Access to potable water is typically co-located with toilet rooms. The building may also require storage of cleaning materials and supplies along with a water heater and ease of access to a fixture chase (similar to the existing building.

#### Women's Room: 400 sf

- (3) Toilet stalls
- (2) Lavatories
- (1) Shower
- (1) Handicap accessible shower
- (1) Handicap accessible toilet stall with (1) lavatory with in the stall.

#### Men's Room: 400 sf

- (1) Toilet stall
- (1) Urinal
- (1) Handicap accessible urinal
- (2) Lavatories
- (1) Shower
- (1) Handicap accessible shower
- (1) Handicap accessible toilet stall with (1) lavatory with in the stall.

#### **Public Drinking Fountain: 5 sf**

Adjacent to the two toilet rooms

#### Storage and chase space 100 sf

- (1) janitors sink
- Storage for cleaning materials, supplies and





# **SECTION 5**





#### RECOMMENDATIONS AND DIRECTION

#### **GENERAL RECOMMENDATION FOR ALL STRUCTURES**

**Flood Plain:** Each of the buildings resides in the flood plain. As such they are subject to flooding during storm events, not limited to Hurricanes. Consideration should be given to protecting existing buildings from flooding. New buildings should be raised and set on foundations above the flood plain.

**Structural wind resistance**: Each of the buildings lack proper roof/wall attachment required to resist code required wind loading. As such the buildings are subject to failure in high wind events, not limited to hurricanes. Incremental repair of the deficiencies is possible however removal of siding roofing and interior finishes is also required. The work could be scheduled at the same time as exterior finish replacements.

**Exterior envelope:** The exterior skin of each of the buildings is past or nearing the end of its useful life and should be scheduled to be replaced in the near future. Deteriorated roof shingles and siding are visible on each building. Windows and doors are worn and require repair. Trim boards are in need of replacement and rotting in corners and eave locations.

**Mechanical/Electrical/Plumbing/IT:** Generally the systems of the buildings are of residential grade. Apart from the heating system in the Harbormaster building the systems are due for replacement.

#### **Shellfish Building:**

The structure has recently been condemned for the wide spread presence of mold. The building is open to the weather as evidenced by two holes in the roof and broken window glazing. The building should be removed from the site. The site could be considered a possible location for a new building to serve some of the marina functions or preferably a less intensive use that does not require extensive parking or access to features other than the beach.

#### **Beach Sticker Building:**

The building is in the flood plain, is not designed to resist wind storm loads and has structural deficiencies in the roof which require attention. The exterior finishes, windows and doors are past their useful life. The building relies on temporary toilets for staff and patrons. The building systems are past their past their useful life. The building has a temporary Title 5 permit which





## Building Conditions Assessment Recommendations

requires the town to remedy the SDS by 2016. The building should be fully renovated, replaced with a new structure or combined with other waterfront uses into a code compliant facility.

#### **Harbormaster Building:**

In addition to general recommendations above, the building is in the flood plain and is not designed to resist wind storm loads. The exterior finishes are nearing the end of their useful life. The staff depends on the public toilets for facilities which are not accessible. The program fits well into the structure. The structure should be scheduled to be, renovated, replaced with a new structure or combined with other waterfront uses into a code compliant building.

#### **Public Restrooms Building:**

In addition to general recommendations above, the building sits within the flood plain and is not designed to resist wind storm loads. The exterior finishes are nearing the end of their useful life. The building and toilets are not handicap accessible. The interior finishes and fixtures are past their useful life. The building should be replaced with a new structure or combined with other waterfront uses into a code compliant structure.

#### **DIRECTION: PHASE 2**

The RFQ highlighted several options for the future of the waterfront structures. The existing shellfish building is not considered a viable structure and will be demolished under any scheme that directly involves the location. Given the scope of necessary renovations to each structure it is likely that the building code will require complete code compliance. Therefore total replacement if comprehensive renovations are required. The list below defines each approach and provides a brief explanation of the issues confronting each option.

- 1. Combine all three (Harbormaster/Shellfish/Beach Sticker) with Public Restrooms into one building at the marina. **3,800** sf
  - a. Allows all programs to share common spaces and utilities resulting in a more efficient plan and reducing initial construction costs as well as long term maintenance and operation costs.
  - b. Resolves all outstanding code deficiencies.
  - c. Would incorporate separate public restrooms and staff toilets.
  - d. Would require demolition of all existing buildings.
  - e. Would result in elevated structure.







- 2. Combine Harbor and Shellfish Facilities with Public Toilets at marina. 2,000 sf
  - a. Allows some programs to share common spaces and utilities resulting in a more efficient floor plan and thereby reducing initial construction costs and long term maintenance and operation costs.
  - b. Leaves Beach Sticker in existing facility and requires no action until SDS permit expires in 2016. At this point, relocate the function off site, or upgrade SDS system.
  - c. Proximity to public toilets at Beach Sticker is unresolved and may require continued use of temporary toilet facilities (seasonal).
- **3.** Build a new Shellfish Building on the existing site take no action on other functions.

## 1,000 sf

- a. Adequate off street parking for staff and visitors would need to be provided, as well as handicap access to the building.
- b. Requires new structure and SDS system
- c. Requires demolition of shellfish building.
- d. New building, if positioned closer to the road, could be constructed in the AE13 zone vs. VE15 zone currently, reducing overall height and access issues.
- 4. Relocate Beach Sticker Operations from the Marina, move Shellfish to Beach Sticker location: 1,000 sf
  - a. Off site location of Beach Sticker unresolved.
  - b. Renovate existing or provide new size appropriate structure and SDS system.
  - c. Leave harbor master and public restrooms in existing facilities and take no action.
- 5. Relocate Beach Sticker Office off site: Combine Harbormaster and Shellfish on the Beach Sticker site: 2.000 sf
  - a. Off site location of Beach Sticker unresolved.
  - b. Requires demolition of all existing structures and new structure and SDS system.





# **SECTION 6**





# **APPENDICES**





Turowski2 Architecture
P.O. Box 1290
313 Wareham Road
Marion, MA 02738

CONSULTANT:

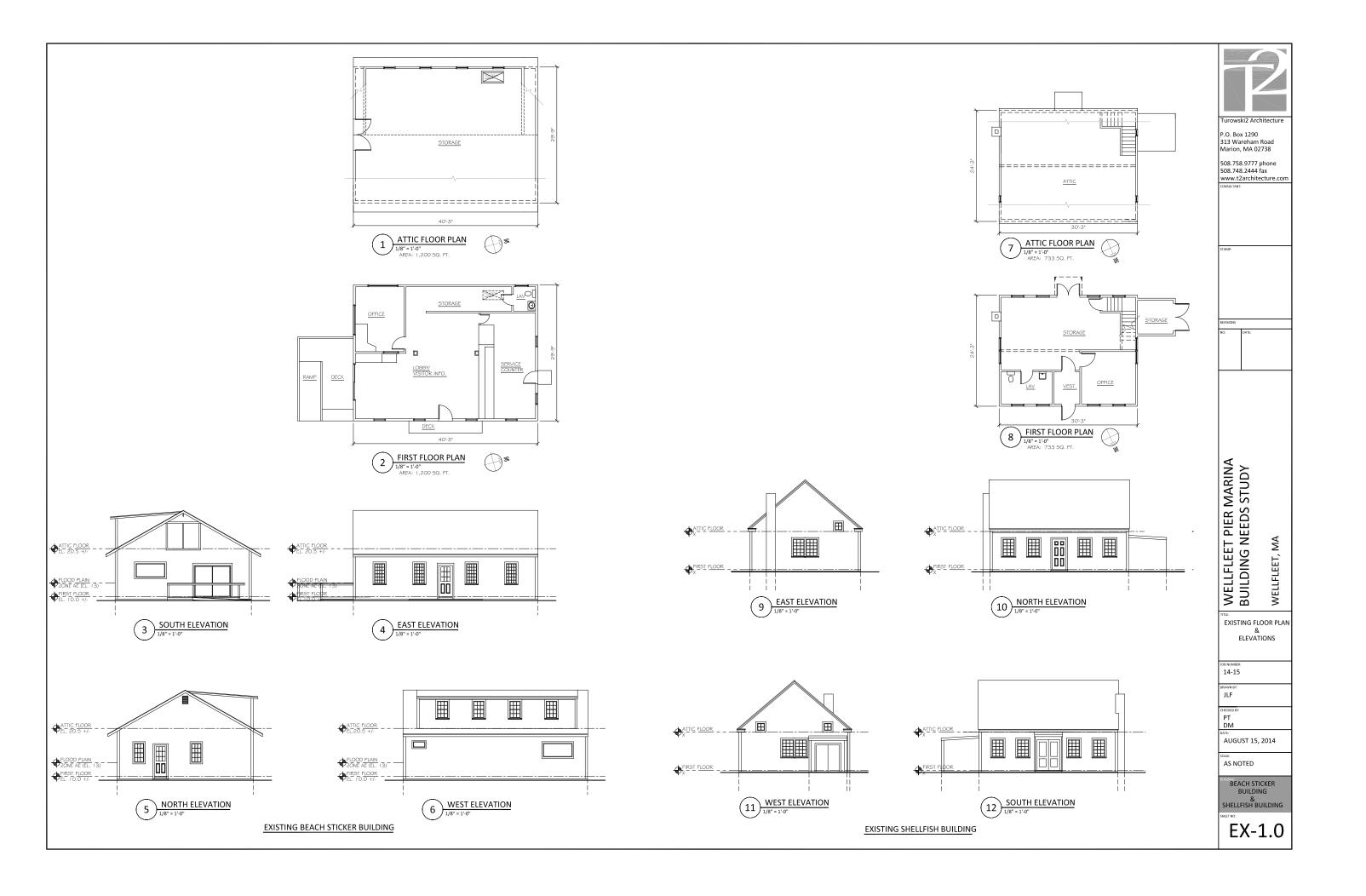
TOWN OF WELLFLEET
WELLFLEET MARINA BUILDING NEEDS STUDY

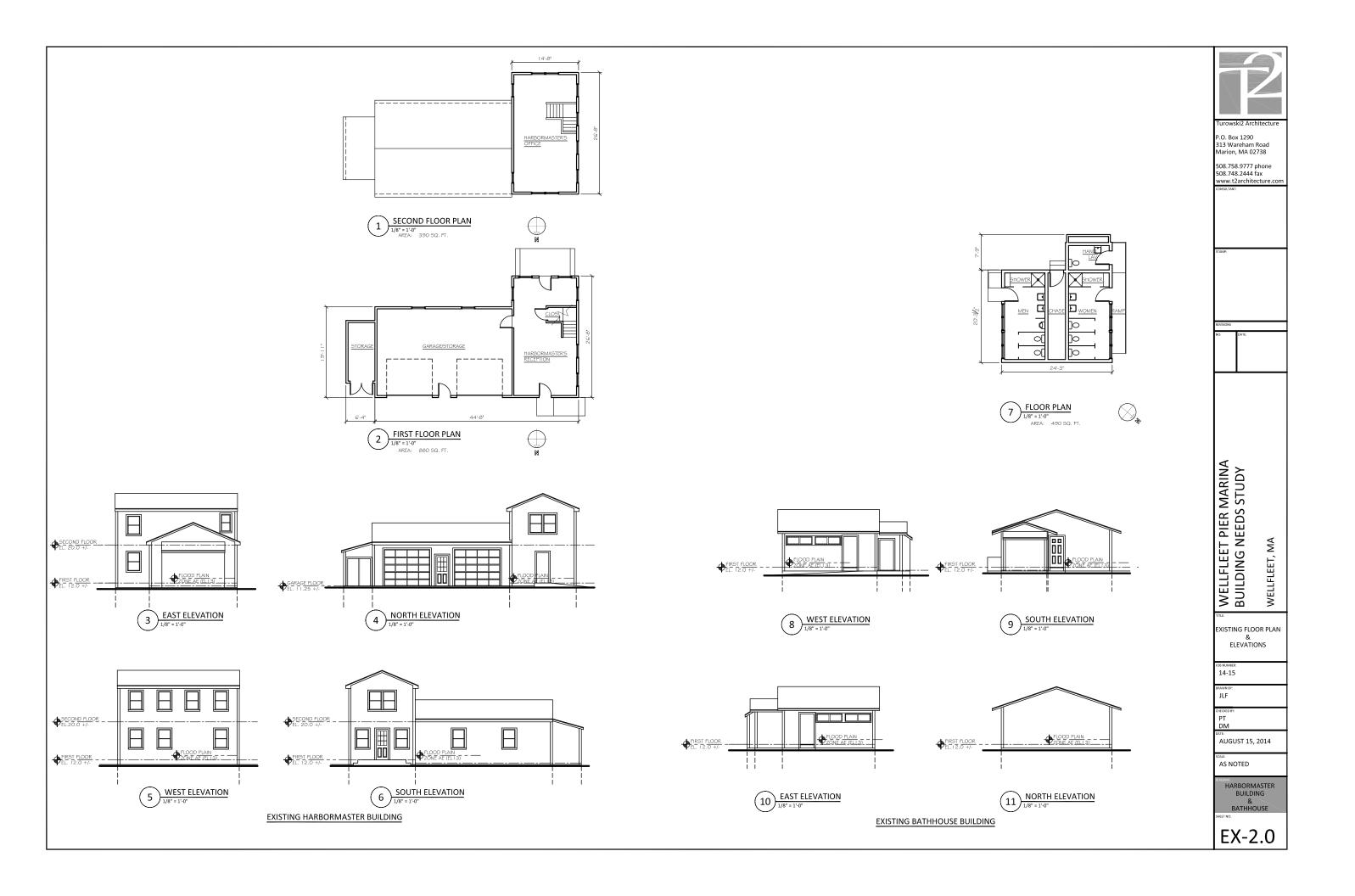
**EXISTING SITE CONDITIONS** 

DATE: JOB NUMBER: SCALE: 19/29/2014 14-15 1:200

SHEET NO:

EX-0.0





# Request for Qualifications Designer Services for Wellfleet Marina Buildings Needs Study

## I. General Scope of Work

Pursuant to G.L. c. 7C, s 44-58 and the Town's Designer Selection Procedures, the Town of Wellfleet ("Town") is requesting designers to submit applications stating their qualifications to provide designer services in connection with the following project: Wellfleet Marina Buildings Needs Study located at Kendrick Ave., Wellfleet. It is anticipated that this design project will be completed by December, 2014.

Submittals will be accepted until 2:00 PM. EST on Thursday, May 1, 2014 at the offices of the Town Administrator, 300 Main Street, Wellfleet, MA 02667. Six (6) copies of the application must be submitted in a sealed envelope marked "Designer Services for Wellfleet Marina Buildings Needs Study." All written applications will be evaluated and a short list of finalists will be developed. The finalists will be interviewed and a final selection made after the completion of the interview process.

The successful firm to this RFQ will be required to furnish the necessary personnel, materials, services, equipment, facilities (except as otherwise specified herein) to perform evaluations and additional efforts as specified in the detailed Scope of Services issued hereunder as Attachment 1 for design services for the Town.

Questions concerning this RFQ must be submitted in writing to: Harry Terkanian, 300 Main Street, Wellfleet, MA 02667, email: harry.terkanian@wellfleet-ma.gov before 2:00 PM, Tuesday, April 29, 2014. Questions may be delivered, mailed, emailed, or faxed. Written responses will be mailed, emailed, or faxed to all bidders on record as having requested the RFQ. The selection process is governed by MGL Ch. 7C, § 49(a).

The minimum qualifications and comparative evaluation criteria are set forth below. Each applicant must be an architect registered in Massachusetts and must have experience in the design of municipal buildings.

The Town will evaluate all applications submitted, eliminate any applications that do not meet the Minimum Criteria, develop a 'short list' of approximately three applicants, and schedule interviews with those applicants. The contract will be awarded in accordance with the Designer Selection Statute. The Designer's fee will be negotiated. The Designer will execute a CONTRACT prepared by Town Counsel as attached in Attachment 2. The Designer will also be required to execute a Certificate of Non-Collusion and Certificate of Tax Compliance and to submit a completed DCAMM Standard Designer Application Form, all as required by law.

#### II. Background

The Town of Wellfleet is blessed with an extensive coastline on two sides that includes several beautiful beaches and an active pier and marina. It also has a strong shellfish industry, primarily oysters, for both commercial and private consumption.

Oversight of the operations of the marina (including slips, moorings, commercial fishing vessels, seasonal tourist vessels, wastewater pump out, and fueling services) and the pier (including parking, bathrooms with showers, restaurants, pedestrians, and boat storage) is administered by the Harbormaster. The Harbormaster is assisted by one year round full time employee, two part time year-round employees, and several seasonal employees. The Harbormaster is guided by an appointed 5-member Marina Advisory Committee. The operations office for the Harbormaster is a two story office, attached workshop/garage and an unattached bathroom/shower facility. See attached site map and building plan for the Harbormaster Office.

During the summer months (June-August) the Town sells beach parking permits to year-round and seasonal residents, as well as weekly and monthly cottage renters. A building at the pier is used for this purpose. The "Beach Sticker Building" is a fairly large two story building located at 255 Commercial Street at the Town's Marina. Seasonally about 3-5 employees are tasked to sell beach stickers to the seasonal visitors 7 days a week. During busy summer days there are large lines for beach stickers. The building also provides space for a seasonal Chamber of Commerce desk. The second floor is essentially not used. The building is not utilized the rest of the year. See attached site map and building plan for the Beach Sticker Building.

The availability of shellfish (oysters and clams) is principally on the west coast "bay side" of Wellfleet. Several inlets provide ample area for natural and cultivated shellfish habitat. Regulating the wide-ranging shellfish operations including an extensive commercial aquaculture and access to public shellfish is the responsibility of the Shellfish Warden and 2 full time staff. The Shellfish Department is guided by an appointed and active Shellfish Advisory Committee. The Shellfish Department utilizes a deteriorated building located at 35 Kendrick Avenue. It is near the pier and Mayo Beach, approximately 300 from the Beach Sticker Office and 900 feet from the Harbormaster Office. The "Shellfish Building" is used as an office for the Shellfish Warden and staff. From the Shellfish Building it is possible to see a significant portion of the aquaculture leases in front of May Beach and some of the vessels used for shellfish purposes. There is frequent visitation by fishermen with their trucks and similar vehicles. See attached site map and building plan for the Shellfish Building. In recent months the Shellfish Department has been relocated to the Beach Sticker Building and a temporary partition erected to separate their space from beach sticker sales operations.

## **III. Project Description**

The Designer will develop a program, alternatives, conceptual plans and cost estimates for a facility or facilities to address the program needs of the Marina buildings that house the Harbor, Shellfish, and Beach Sticker operations. The major priority is to address the facility needs of the Shellfish Department.

## IV. Challenges

- ➤ All three buildings are located in the FEMA flood plain and this will complicate any redevelopment in this area.
- > Operational use by one department has the opportunity of conflict with other uses. For example,
- > The competing and parochial interests of each department may also result in challenges to a shared-use facility solution.
- It may not be necessary to have one or more services provided at the marina. However any off-site solution has to address the programmatic needs of the affected department.

#### V. Available Information

The following information is available:

- Dec., 2013 Marina Building Location Plan
- April, 2003 Shellfish Building (referred to as Mayo Beach Bathhouse) location plan
- ➤ April, 2003 Shellfish Building (referred to as Mayo Beach Bathhouse) 1<sup>st</sup> floor existing condition plan
- > April, 2011 Beach Sticker Office site plan
- April, 2003 Shellfish Building (referred to as Mayo Beach Bathhouse) Study, Bourne Consulting Engineering
- Microbial Inspection Report of the Wellfleet Shellfish Building, 35 Kendrick Ave.

# VI. Scope of Services

A detailed Scope of Services is included as part of this RFQ as Appendix 1. The Designer will perform the following services in connection with the Project:

- Provide a program for the 3 Marina Buildings
- Provide a concept plan for the selected alternative
- Provide an estimate of construction costs.

# VII. Minimum Qualifications of Designer

The Designer must meet the following minimum qualifications:

- 1. Demonstrate a minimum of five (5) years of experience in the design of public buildings in Massachusetts.
- 2. Completed a minimum of one (1) needs study within the past eight (8) years involving multiple public buildings and a variety of alternatives.
- 3. Completed the full architectural design and provided construction administration for a minimum of three (3) municipal buildings in Massachusetts in the past ten (10) years.
- 4. Possess knowledge of and experience in legal requirements of Massachusetts public building projects.

- 5. Possess all necessary current licenses and registrations to qualify under Massachusetts law to perform the function of the designer of the project.
- 6. Provide evidence of insurance for general liability (\$1 million combined single limit), automobile (\$1 million combined single limit), worker's compensation (statutory) and professional services liability (\$1 million minimum.).

## VIII. Requirements for Application

Responding Designers are to address each of the following requirements in a clearly labeled section of their response and in the same order.

- 1. Name and address of applicant.
- 2. Brief resume of principals and of the staff to be assigned to the Project. Identify the key personnel and the specific responsibility each will be assigned for this project and the % of time to be committed to the project by each of these key members of the project team.
- 3. Names of engineers and other consultants and subcontractors that will be used for the project. Describe the specific tasks and the % of time to be completed by outside firms.
- 4. List of projects which would best illustrate qualifications for the Project. References must be included. The designer is to include all relevant projects involving marina type structures. Describe the project, whether it was completed on time and within budget.
- 5. Statement of the scope and type of services proposed for Project. Describe how the designer will work with town officials, town committees, and town employees.
- 6. Work plan and schedule which reflects timetable for completion of Project.
- 7. Statement of any legal or administrative proceedings pending or concluded adversely to the applicant within the past five (5) years which relate to the applicant's performance of this type of work.
- 8. Appropriate certificates of insurance.

#### IX. Evaluation Process

- 1. All statements of qualifications shall be received and evaluated in conformance with the requirements of MGL Chapter 7C Sections 44-57.
- 2. The Procurement Officer shall review each "Statement of Qualifications" to determine whether it meets the minimum requirements as set forth in the RFQ. Any application which fails to meet any of the minimum qualifications will be rejected as non-responsive. The Procurement Officer shall state in writing his reasons for disqualifying any designer.
- 3. After evaluating the minimum requirements, remaining designers shall be evaluated based solely on the comparative evaluation criteria specified in this RFQ (Shown in Appendix 2).
- 4. In analyzing responses to the evaluative criteria, the Town shall consider the qualifications of the designer as the sole determining factors in the determination of the designer, and make any investigations deemed relevant to the selection process. The minimum criteria shall be compliance with specifications and criteria set forth therein; quality of the services proposed, investigations into qualifications, prior relevant experience, and past performance. The Town will confirm claims of past experience. The comparative evaluation criteria are set forth in the qualifications specifications section of this document.
- 5. The Town may choose to interview all the design finalists.
- 6. The contract will be awarded to the most advantageous designer as determined by the Town. The Town reserves the right, upon basis of such evaluations, to reject any designer and all designers or to select a designer if the investigations indicate that such action is in the Town's best interest.

#### X. General Provisions

- 1. The Town of Wellfleet reserves the right to reject any and all applications and to waive any informality whenever such rejection or waiver is in the best interests of the Town of Wellfleet.
- 2. The Town of Wellfleet will not be responsible for any expenses incurred in the preparation or submission of applications by the applicants. Each application should provide a concise explanation of the applicant's capacity to satisfy the requirements of this RFQ. Emphasis should be placed on clarity of content.
- 3. The application, and any subsequent contract for services, shall be governed by applicable Massachusetts law.
- 4. Upon submission, all applications, plans and specifications will become the property of the Town of Wellfleet and will be subject to disclosure in accordance with the Massachusetts Public Records Law.
- 5. The selected Designer will be required to comply with all applicable federal state and local laws, ordinances and regulations.
- 6. The Town of Wellfleet is and Affirmative Action/Equal Opportunity Employer. The Town encourages applications from qualified MBE/DBE/WBE firms.

#### XI. Fees for Services

The fees for services will be negotiated with the successful design firm selected. The fees for services will not exceed \$25,000 for all services (including indirect and out of pocket expenses) as delineated in the Scope of Services (Attachment A).

The selected designer will be required to provide the following information as part of the fee proposal:

## Professional Personnel Rate Sheet

Each designer shall provide a rate sheet showing the hourly rate for all Professional Personnel positions to be assigned to the project.

## **Project Hours**

The designer shall provide a table showing the estimated project hours for each professional position for each task listed in the scope of services. Designer will provide a detailed listing of the staff hours and cost per hour for each staff position.

#### Reimbursables

Listed on the rate sheet shall be the rates to be charged for all reimbursables necessary for the project such as telephone, mileage, printing, photocopying, postage, etc.

## Additional Fees for Services

Provide the hourly fee for attending an additional meeting in Wellfleet. Indicate whether the meeting fee would include travel time and reimbursable expenses such as mileage.

#### Attachment A

### Scope of Services

1. Review Information and Facilitate Stakeholder Meeting Review the existing information, facilities, and history. Identify and interview stakeholders (see attached list). Facilitate a group meeting of stakeholders at which participants will identify goals and objectives for the three operations.

## 2. Program Development

Develop a program for each of the operations; shellfish administration, harbor administration, and beach sticker administration taking into consideration the goals, long-term program needs, and existing constraints. The Designer will take into consideration projected changes, if any, in the size of the staff, technology innovations, and anticipated changes in the mission of each department.

## 3. Identify and Evaluate Alternatives

The Designer shall prepare a report detailing alternatives and a recommended solution, assuming different approaches for providing the building facilities for the three programs. These are some of the identified alternatives:

- Combine all three programs into one building at the Marina.
- Combine Harbor and Shellfish facilities at the Marina. Keep beach sticker sale operations separate; either at the existing building or some other on or off site location.
- Combine shellfish operations and beach sticker sale operations at the present Beach Sticker Building at the Marina and renovate it. Keep Harbormaster operations at their present building. Demolish the Shellfish Building.
- Build a new or renovated Shellfish Building for the shellfish operations at the existing location. Do nothing with the other two buildings at this time.
- Relocate beach sticker operations from the Marina. Move Shellfish operations to the former Beach Sticker Building and renovate it. Demolish the Shellfish Building and keep the harbor operations at their present location.
- Combine Harbormaster Office and Shellfish facilities at the Beach Sticker Building. Relocate beach sticker sale operations off site. Demolish the Shellfish Building.

## 4. Prepare Conceptual Plan

Based on the alternative selected by the Town the Designer will develop a conceptual plan for the operations of the three programs. This may be one or more facilities at the marina or utilization of other off-site town buildings. The Designer will prepare a conceptual plan to scale showing the location of the various offices, program areas, and other spaces.

The Conceptual Plan will include;

- site plans, paving layouts, and traffic circulation
- floor plans, offices, programs spaces, and building circulation
- exterior elevations and rendering
- critical building sections and details
- Relevant right of way information such as easements, building set backs etc.
- Location of utilities and sizes

The Designer will attend three (3) meetings at which the initial conceptual plan will be presented including a public meeting before the Board of Selectmen.

## Deliverables:

Five (5) Copies of the Conceptual Plans, plus one copy on a CD or in PDF form. One copy of each of the sheets of the Conceptual Plans shall be mounted on boards for public presentation.

5. Prepare a Cost Estimate for the Marina Building Facility Upon approval of the Conceptual Plan by the Town the Designer will prepare a cost estimate for the proposed program and space. The cost estimate will provide detail for all systems and building components.

#### Deliverables

Twelve (12) copies of the Cost Estimates plus one copy in PDF form.



September 9, 2014

#### **WELLFLEET MARINA FEASIBILITY STUDY**

## MEETING MINUTES – Meeting 01 August 6, 2014

	Wellfleet Marina Building Committee (WMBC)		T2 Architecture (T2)	
Χ	Harry Terkanian, Town Adminstrator (HT)	Χ	Peter Turowski, (PT)	
Χ	Suzanne Grout Thomas, Beach Adminstrator (SGT)	Χ	Derrick Maloney, (DM)	
Χ	Michael Flanagan , Harbormaster (MF)			
Χ	Mark Vincent, DPW Director (MV)		Garcia Galuska DeSousa	
Χ	Andy Koch, Shellfish Warden (AK)		Carlos DeSousa (CD)	
			Coastal Engineering	
		Χ	John Bologna (JB)	

**Summary:** We met in the Harbormaster's office to introduce key members and review and discuss project goals, existing space uses and needs. After the meeting, T2 and consultants toured the three buildings and made existing condition observations.

Note: After Meeting Actions are in Italics

#	Item	Action
NEW BU	SINESS	
1.01	Project Team/Correspondence Contacts	
	Wellfleet Marina contacts:	
	Harry Terkanian, harry.terkanian@wellfleet-ma.gov	
	Suzanne Grout Thomas, suzanne.thomas@wellfleet-ma.gov	
	Michael Flanagan, marina@wellfleet-ma.gov	
	Mark Vincent, mark.vincent@wellfleet-ma.gov	
	Andy Koch, andrew.koch@wellfleet-ma.gov	
	Turowski2 Contacts:	
	Peter Turowski, pturowski@t2architecture.com	
	Derrick Maloney, dmaloney@t2architecture.com	
	Garcia Galuska DeSousa:	
	Carlos DeSousa, carlos.desousa@g-g-d.com	
	Coastal Engineering:	
	John Bologna, jbologna@coastalengineeringcompany.com	Record

	·						
1.02	Correspondence:						
	Meeting Minutes will be sent to all members.						
	No future meetings were scheduled. T2 will arrange a future meeting when						
	existing conditions reports are completed.						
1.03	General:						
	T2 reviewed needs with each department, and will tour spaces and take						
	measurements after the meeting.						
1.04	Shellfish:						
	The Shellfish office has been temporarily relocated to the Beach Sticker						
	Building due to mold issues at the Shellfish Building. The Shellfish Building is						
	unoccupied. Shellfish Warden Office requirements follow:						
	Three full time staff that work seven days a week – largely out on the						
	water performing aquaculture patrol. Hours are determined by tide,						
	and days are split by the tide.						
	One private office with a work station for the Warden and an						
	additional small work surface for when more than one person is in the						
	office. Small conference table (see below).						
	There should be a small entry area where information can be displayed						
	and where transactions can occur at a window from the office.						
	Sometimes the Warden will bring public into his office for private						
	meetings. A small meeting table would be good.						
	<ul> <li>Need storage and workspace – generally the size of a 2 car garage.</li> </ul>						
	This office does not issue shellfish permits. These are issued at the						
	Town Hall and/or at the Beach Sticker office during summer weeks.						
	The temporary office in the Beach Sticker office does not have heat,						
	and therefore unit heaters are used in the cold months.						
	Staff restroom is required, currently shared with Beach Sticker.						
1.06	Beach Sticker Building:						
	This office is particularly busy on cottage rental transition days (weekends or						
	early week). They experience up to 25 people in line at a time. They issue						
	11,000 stickers overall, about 50/50 resident and visitor. They also issue						
	shellfish permits in the summer (off season these are issued at the Town Hall)						
	as well as beach fire permits and transfer station permits – kind of a one stop						
	permit issuing office during the summer months. High foot traffic requires a						
	cueing line and also adequate traffic flow, parking and accessibility to and from						
	the building.						
	The office should accommodate three work stations at a counter with						
	computers similar to a bank. People cue in line and are called forward						
	to the next available clerk. A separate work station is needed to						
	accommodate the Beach Administrator.						

- There should be a work surface behind the service counter for supplies and where staff closeout at the end of the day.
- Three 4 drawer vertical file cabinets are required.
- Uninterrupted internet service is required because they process payments with credit cards (75% credit card payment).
- There is a single staff restroom currently, it is not HC accessible.
- A back hall serves as storage. A closed storage room for supplies would be desirable. Currently they close up the office for the winter and put all supplies out of view in the storage area.
- There is a Wellfleet Chamber of Commerce presence in this building.
  Formerly they used the office the Shellfish Warden is currently
  occupying. Generally they have staff presence on Saturdays, Sundays
  and Mondays. An enclosed office is not necessary but a counter or
  kiosk for Chamber staff to occupy would be desirable. Presently they
  have things (brochures and local interest information) set up in the
  corner, including a digital wall display.

#### **1.07** Harbormaster:

In general, this building was described as adequate in space and function.

- This office oversees the boat launch and collects launch/trailer fees daily. There is high traffic on the weekends in particular, with as many as 20 trailers cueing for launch.
- The office processes all mooring permits, slip permits, and fee associated waiting lists – including all renewal mailings. This work occurs outside the summer months.
- The Harbormaster oversees 50 transient moorings and 12 transient boat slips.
- There is no power at the docks or the slips.
- Pump out station is from the dock and pumped into tight tanks which are trucked and hauled by pump trucks at intervals required.
- The building is on a septic system.
- Emergency power is essential. Currently a portable generator is used. A
  more permanent solution would be preferred.
- This office is the main office for the Harbormaster, 2 permanent part time employees, and 4-5 seasonal employees
- The harbormaster requires and office with a work station and work/conference table. This office is located on the second floor currently which is ideal because it provides full observation to the harbor. Observation of the harbor activities from this office is needed in any new design.
- Permanent part time staff should each have a work station. Seasonal staff does not require a work station.

The building has cable, internet and WiFi through Comcast currently, linked to the Town Hall through a microwave link. VHF radio is utilized at this office. This building is heated. This office should include a counter for transactions and separation of work areas from the public. A small lobby should also be provided. 1.08: **Restrooms:** Toilets are located adjacent to the Harbormaster building. They are the only public toilets in the marina area. Currently restrooms are used by both marina users and also Mayo Beach users. Port-a-Johns have also been utilized in summer months. There are frequent events that draw 100 people or more to the marina, including concerts and square dancing. So, even though there is a study underway for the recreational building associated with the beach, which may include new toilet facilities, it was felt that an increase in fixtures would still be necessary at this location. The septic system was installed in the 1980's, and is undersized. The restroom facility fixtures were increased at some point in time with the addition of a handicap toilet facility. Composting toilets should be considered. 1.08 General: The Wellfleet DPW is charged with maintenance of all of the marina buildings, but the marina does much of the maintenance, particularly the bathrooms. A Water Enterprise Fund covers the Harbormaster and Beach Sticker Building but not the Shellfish building. It was stated that there is no known historic designation for any of the buildings. There seemed to be uncertainty about the Shellfish Building. Beach Sticker operation grosses approximately \$850K annually. Financing of any project that may come out of this study will likely be through borrowing or a bond – not through raising fees. 1.09 Other: The study will encompass looking at a variety of options for accommodating the needs of the Marina, with a priority focus on the finding a permanent home for the Shellfish Warden. Options may include combining some or all of the functions listed above through additions renovations or new building(s). All of the functions above are critical to be located at the waterfront with the exception of the Beach Sticker building which can be remote. HT states that there is some consideration of housing this seasonal

operation in a small wooden structure (former Early Childhood Center?) adjacent to the elementary school. After the meeting, T2 visited this building, but access to the interior was not provided and assessment of existing conditions was not included in the scope of this study. At first glance, the building appears to be oversized for this operation, presents some challenging accessibility issues (with the sloped site and limited parking immediately adjacent to the building) and is in generally poor condition.

- Parking is currently unregulated and with the various intensive service areas (boat launching and beach sticker) overlap, there are often conflicts.
- There is no natural gas at the site.
- There was some discussion about exploring solar power. CG states that there is not likely enough wind to support a turbine installation.
   Solar is a better option.

These minutes serve as a record of discussions at the meeting on the date noted above. Please notify T2 Architecture in writing no later than 7 days after receipt of these minutes or 1 day prior to the next scheduled meeting if any exceptions are taken. They will thereafter serve as formal record of discussions and decisions.

The next meeting was not scheduled. It will be scheduled after completion of the existing conditions report.

Respectfully Submitted,

Peter J. Turowski, AIA, NCARB

Distributed via email to: H. Terkanian, S. Grout Thomas, Michael Flanagan, Mark Vincent, Andy Koch, Carlos DeSousa, John Bologna, Dave Michniewicz