

North River Commission

Representing the Towns of – Hanover, Hanson, Marshfield, Norwell, Pembroke & Scituate
188 Broadway, PO Box 760, Hanover, MA 02339 Office Hours 9am – 1pm, Tuesday & Thursday,
Phone: [781-659-7411](tel:781-659-7411) Website: www.northrivercommission.net Email: northrivercom@gmail.com

Minutes July 22, 2021 - Meeting #563

Present: Hanson, Jennifer Heine (M), Marshfield, Chris Head (M), Marshfield, Maryanne Leonard (A), Norwell, Robert Molla (A), Pembroke, Bill Boulter (M), Pembroke, Gino Fellini (A), Scituate, Joseph Norton (M)

Not Attending: Hanover, Dan Jones (M), Hanover, John O'Leary (A), Norwell, Tim Simpson (M), Scituate, Adria Gallagher (A)

7:00 - Call to Order

1. Minutes approved for June 24, 2021 meeting.
2. Administrators Report - Administrator Gary Wolcott (GW) reported on...
 - Recent correspondence- a. **50 Collier Road, Scituate** RFD Determination of Allowed Use forwarded. b. **70 Kings Landing, Norwell** RFD Determination of Allowed Use forwarded. c. **49 Collier Road, Scituate** RFD Determination that construction of structure greater than 35 ft in height was Not an Allowed Use forwarded. d. **89 Neal Gate Street, Scituate.** Notification received that construction was beginning on the approved dock project. e. Homeowner at **87 Edmund Road, Marshfield** communicated that he would like to be placed on the September Agenda to discuss a resolution of the shed project on-site. f. Received an inquiry about whether a 3-person "personal watercraft" was an Allowed Use on the North River. The Commission reviewed the Protective Order, Section 7 Prohibited Uses, Sub-Section (Q) lists as a Prohibited Uses amphibious craft, jet ski and similar craft as may be prohibited by the commission. The Commission confirmed that a 3-person "personal watercraft" was, in fact, a jet ski or similar craft and thus was prohibited.
 - Recent municipal filings of Corridor properties - Projects previously reviewed, currently under review or expected to come under review by the North River Commission - River Marsh 40B project, Water Street, Pembroke-Pembroke ZBA continued to August, date TBD, 45 Cedar Point, Norwell with the Conservation Commission for the dock project we determined was an "Allowed Use", 85 Washington Street, Pembroke - Cell Tower hearing with Planning Board continued to August, date TBD., 52 Moorland Road, Scituate with Conservation Commission.
 - Real estate transactions in the Corridor - 48 Collier Road, Scituate, 77 Damon's Point Road, Marshfield - Welcome letters sent to the new property owners.

7:15 - Informal Discussion - 102 River Road, Hanover - Callanan - Nancy Callanan, Homeowner & Keith Walo of Harbor Mooring, a dock Contractor were present to discuss a dock repair project of an existing dock with an expiring Waterways Interim Amnesty Approval that is expiring. Mr. Walo would like some guidance on what type of dock would meet the Scenic and Recreational Order. GW shared the photo of the dock in mid-reconstruction and recapped the DEP Waterways Interim Amnesty Approval Permit that the applicant has. Mr. Norton asked for clarification of what the Permit allows, what the reconstruction consists of and whether the existing supports were functional. Mr. Walo described the understructure of the permitted deck as failing and that the previous owner had propped the deck up by various methods. He described the 2' x 12' ramp and 8' x 12' float that he constructed as the same size and configuration of the permitted structures that are permitted to be maintained and reconstructed. He indicated that the current cement slab is underwater at high tide and that he proposes to raise the slab 30" by reforming the understructure or removing the entire structure and rebuilding using pilings to support a reconstructed,

higher deck. Mr. Head asked whether a cost analysis indicated that a total reconstruction would be more prudent than an attempt to shore up the current structure. Mr. Walo stated that reforming and pouring cement to raise the deck would be easier to permit with DEP Waterways and Army Corps of Engineers since it wouldn't be considered a "change of use." Mr. Fellini asked if there were existing footings in the water? Mr. Walo indicated that the bottom slab and side forms were in the water and holding and that the forms along the front (waterside) had failed. Mr. Molla suggested removing the cinder blocks that had been placed to raise the deck and replacing them with wooden piling extensions to support the dock. Mr. Walo replied that that wouldn't be possible in some areas where the existing forms had failed. Mr. Boulter asked about the history of the site, mentioning a boat ramp that existed during the time the property was in earlier ownership. Mr. Walo referenced the plan with the Amnesty Approval which noted the presence of a boat slip. Mr. Boulter asked for clarification about the Amnesty Approval Permit, whether we were looking at the Application for Approval or the Approval itself. The Commission has a copy of the actual approval. Members discussed and agreed that the current structure would fail at some point. Mr. Fellini asked if the bottom slab was reinforced. Mr. Walo indicated that the slab was likely sunken into the mud and that he was unaware of whether it had been reinforced by rebar or the like. Ms. Leonard asked for confirmation that the structural integrity of the current structure was unknown and it was given. Mr. Norton asked Ms. Callanan what she wanted to do. She is unsure as the more information she acquires from DEP, the Commission and others the more confused she has become about what might be permitted. She relayed her discussions with the State and the Hanover Conservation Commission and expects to be permitted within a year. Mr. Boulter suggested that removing the current structure and starting fresh with a new design and construction would be preferable. He suggests that, in his experience with masonry, the current structure no matter how reinforced and reconstructed will crumble in time and fall in the river. Mr. Molla agreed. The members discussed what type of separation to the surface would be required for a dock at this location, if there was a different calculation used by the state in a non-marsh vegetation location than the one used for structures over marshes. Mr. Walo is hesitant to change the particulars of the project so as not to remove the analysis from a "maintain or reconstruct" paradigm. Mr. Head asked for a consensus on what to recommend to the homeowner. He summarized that either elevating the existing platform and shoring up the support of the platform or removing entirely the current structure and rebuilding with pilings in the same footprint as exists would be acceptable to the Commission. Mr. Walo will consider the options discussed and also proceed with DEP Waterways and Army Corp of Engineers to attempt to build a structure that will be acceptable to all the approving authorities.

Plans referenced: "Interim Approval Plan - Pier, Ramp, Float, Bulkhead, Wall, Slip in North River at Hanover, County of Plymouth, State - MA, Application by Anthony Massimino, Trustee, Massimino-Hanover Realty Trust, 102 River Road, Hanover, MA 02339, Dated: 9-19-95."

Documents referenced: Photograph of dock repair in progress dated June 6, 2021.

7:30 - Request for Determination - off Indian Head River Drive, Hanover - Donnelly - Brian Donnelly, a PhD candidate at Northeastern University presented a proposal for a scientific study/experiment on marshland off Indian Head River Drive in Hanover that is owned by the town. He has obtained approval from the town to conduct his study. Mr. Donnelly presented a synopsis of his proposed study. His goal is to establish the effects of a pulse/press disturbance on microbial community structure, nitrogen cycling and carbon storage in tidal freshwater wetlands. His hypotheses are that 1. Press disturbances in the form of increased salinity and temperature will cause a. a sustained increase in incomplete DNF (the production of N₂O) due to an inhibition of the nosZ gene, b. a decrease in DNF and c. an increase in DIC production, 2. Pulse disturbances from increased salinity and temperature will cause a. an initial increase in incomplete DNF and a decrease in DNF followed by a resurgence of DNF and a decrease in incomplete DNF post-disturbance and b. an initial increase in DIC production followed by a subsequent decrease in DIC production post-disturbance, 3. Multiple stressor treatments will cause the greatest increases in N₂O production and DIC production and 4. Under press disturbance scenarios, the total microbial community

structure in tidal freshwater systems will shift towards a community resembling a brackish marsh microbial assemblage but a shift in the total microbial community composition will not be seen in pulse scenarios. Rather, the active microbial community will shift towards a brackish community only when the pulse treatment is being applied. Mr. Donnelly will construct 24 2' x 2' plots where he will employ seven treatments that manipulate temperature and salinity to test his theory. He will construct a temporary 2' x 12' boardwalk to ensure the survival of the native test species. Ms. Leonard asked about how the warming cables used would be powered. Mr. Donnelly will use solar power. Mr. Norton stated he believes this is an "allowed use." Mr. Head asked about how the marsh would recover. Mr. Donnelly indicated that marshes are resilient and would recover on its own. In other studies Mr. Donnelly cited there was no lingering detriment to the plant species observed. Mr. Head also asked about the nature of the proposed boardwalk. Mr. Donnelly described a series of trusses on the marsh that the boardwalk would sit upon. Mr. Fellini asked what type of vegetation there is in the access to the site and the area the boardwalk is proposed. Mr. Donnelly indicated there were cattails and swamp roses that would be cut back for access and the boardwalk sat on the marsh grass. Ms. Heine asked if the wood for the boardwalk would be pressure treated. It will not. Mr. Boulter asked for clarification that the boardwalk is only between the plots and not the full length of the access across the marsh from the abutting upland trails. The boardwalk will only be in the area around the plots. A motion was made and seconded that the proposed scientific study/experiment was an allowed use. The Commission unanimously voted that the project as described was an "Allowed Use." Plans/Documents referenced: Project Narrative/Description: "Influence of pulse and press disturbances on the structure and function of microbial communities in tidal freshwater wetlands." Plans: USGS, Oliver MassGIS Online Mapping Tool.

7:45 - Request for Determination - 111 Chittenden Lane, Norwell - Gordon - Ian MacFarlane of Grady Consulting, LLC, Engineer appeared for the homeowner/applicant Elizabeth Gordon. Mr. MacFarlane described the current conditions on the site, that an existing cesspit servicing a cottage was in failure and that they were proposing to pump and fill the cesspit, place a pump station in the location of the pit and pump the waste uphill to a septic tank associated with the primary dwelling on the site. Mr. Molla asked if the system for the main dwelling had the capacity to add the waste from the cottage and Mr. MacFarlane indicated that it did. Mr. Fellini asked if the pump station would have an overflow alarm and it will. Mr. Norton asked if the cottage had a year-round occupancy. Mr. MacFarlane is unsure but knows that the cottage is a rental dwelling. Mr. Fellini asked what is the length of the pipe from the cesspit to the septic tank. Mr. MacFarlane is uncertain but can provide it later as needed. Mr. Head asked if the project had been before the Board of Health and Conservation Commission yet. Mr. MacFarlane indicated that submittals have been made to both departments but that approval had not yet been obtained. Mr. Fellini asked if the proposed pump station was closer to the Natural Bank. Mr. MacFarlane explained that the pump station was proposed in the same location as the existing cesspit to avoid any further disruption to the area. Ms. Leonard inquired of the capacity of the pump station. Mr. MacFarlane explained how flotation devices in the pump chamber are triggered to operate once a determined level of volume was reached in the chamber. Mr. Fellini asked whether there was an indicator if the pump was not working and where it would be located. Mr. MacFarlane explained that there was an alarm that would be mounted in an electrical box on the outer wall of the cottage. There is a beacon atop the electrical box and an audible horn that sounds upon failure. A motion was made and seconded that the project as described is an "Allowed Use." The motion was passed unanimously.

Plans referenced: "Septic Repair Plan, #111R Chittenden Lane, Norwell, Massachusetts, Prepared For: Elizabeth W. Gordon, 111 Chittenden Lane, Norwell, MA 02061, Scale: 1"=20', Dated: 7-15-21, Last Revision Dated: 7-15-21, Grady Consulting, LLC, Richard J. Grady, P.E."

8:00 - General-Old Business

- **Fiscal Year 2021 Final Review** - GW reviewed expenditure of funds on updating the office equipment, including a new laptop, monitor, printer, iPad and other general office supplies.
- **River Marsh 40B Project** - The Commission reviewed the current status of the River Marsh 40B project on Water Street, Pembroke now under review of the Pembroke Zoning Board of Appeals.
- **Boat Patrol** - The Commission reviewed efforts to reinstate a boat patrol on the river.

Meeting adjourned 9:00 pm

Gary Wolcott, Administrator