## Minutes

## Herring River Restoration Committee (HRRC) Cape Cod National Seashore Headquarters Wellfleet, MA May 15, 2014 9:00 am-4:00 pm

**Members Present:** Tim Smith, Steve Spear, Steve Block, Eric Derleth, Charleen Greenhalgh (in the afternoon session)

**Others Present:** Margo Fenn, Martha Rheinhardt, John Portnoy, Harry Terkanian (by phone), Kirk Bosma, Nils Wiberg, Stu Harris, Jill Gannon, Dave Smith, John Morrisey, Paul Pilcher, Mark Vincent, Paul Lindberg, Richard Pauley, Ron Fissette

Workshop Session with Wellfleet Town Officials regarding the Chequessett Neck Road (CNR) Bridge and Tide Gate Design: During the morning session, members of the Herring River Restoration Committee (HRRC), representatives of Friends of Herring River (FHR) and the engineering firm of Fuss & O'Neill (F&O) held a workshop with key Wellfleet town officials to review the draft 25% design plans for the proposed Chequessett Neck Road bridge and tide gates. Fuss & O'Neill is under contract with FHR to develop the 25% design plans by the end of June 2014. These plans will be submitted to the MA Department of Transportation (DOT) for review.

Nils Wiberg of Fuss & O'Neill gave an overview presentation of the bridge design and led the group in a discussion of different design elements and considerations including:

- -Storm water management
- -Pedestrian safety barriers
- -Gate operator alternatives
- -Gate frames and stem heights
- -Removable gate panel considerations
- -Guardrails
- -Walkway surface materials
- -Handrail alternatives
- -Overhead utility alternatives
- -Temporary bypass bridge design
- -Construction staging areas
- -Boating safety
- -Fish Passage Consultations
- -Cultural Resource Investigations

While not all these elements need to be decided upon at the 25% design stage, HRRC and FHR are seeking town guidance on these design elements so that any needed changes can be incorporated prior to submission to MA DOT. The town officials had a number of questions about the design. The following is a summary of the discussion:

**Storm water management:** Wellfleet officials asked if the storm water design for the bridge

could accommodate the runoff from the adjacent road surfaces. Nils Wiberg explained that the system would be sized to handle the surface water catchment area. Mark Vincent noted that it might make sense to intercept some of the runoff before it reaches the bridge by installing catch basins on Chequessett Neck Road.

**Pedestrian safety barriers:** Town officials preferred to use low-maintenance materials for these barriers (poured concrete rather than timber barriers). Harry Terkanian suggested that if possible, the crosswalks should be aligned with the openings in the pedestrian barriers. This might require reconfiguration of the parking spaces.

**Gate operators:** Town officials generally preferred the portable generator option for gate operators, noting that bringing 3-phase power to the site would be very expensive. While the town owns a portable generator, another would be needed for this purpose.

**Guardrails:** Town officials suggested that steel-backed timber guardrails be used along the entire embankment.

**Bypass bridge design:** Town officials were generally supportive of a one-way bypass with traffic signals. They noted that it would be better to have pavement sensors to trigger the signal changes.

**Overhead utilities:** Town officials were supportive of putting the utility lines underground (i.e. in conduit under the bridge deck). Mark Vincent also expressed interest in learning how much it would cost to bury the lines along the roadway before they reach the bridge.

**Construction staging areas:** The group discussed several options for staging areas. Town officials said that they would like to make a site visit to evaluate the alternative locations. One possibility would be to combine the traffic island and adjacent CCNS parking area along Griffin Island Road.

**Boating safety:** Town officials suggested that safety booms and signage would be needed to prevent small boats from trying to go through the CNR bridge. Harry Terkanian suggested that there should be a restricted zone on either side of the bridge, and that there should be provisions for portaging around it.

Gate frames and stem heights: The group agreed that it would preferable to have stem covers to protect the gate stems and provide a consistent height and appearance. The group did not favor flags or sail masts, but rather said to keep it as simple as possible.

**Walkway surface materials:** Town officials expressed a preference for simple, smooth surfaces in order to minimize maintenance costs.

**Handrails:** Town officials expressed a preference for stainless steel handrails, again to minimize maintenance costs.

Members of the Board of Selectmen wanted to consult the rest of the Board about these design

recommendations. The group agreed that the Selectmen would discuss this at its May 27, 2014 meeting and provide any further comments to the HRRC following that meeting.

John Morrissey asked if Fuss & O'Neill could make a public presentation on the proposed bridge design sometime during the summer. The group discussed possible venues for such a presentation, including the Friends of Herring River Annual Meeting on August 19, 2014.

Adaptive Management Workshop: In the afternoon, the HRRC continued its Adaptive Management workshop. The group reviewed a table outlining each of the adaptive management objectives and ways to predict (i.e. model) and monitor (i.e. measure) potential outcomes for these objectives. This discussion expanded upon the work begun at the March 13, 2014 modeling workshop. Dave Smith agreed to write up the results of this discussion and distribute a revised table to HRRC members. Kirk Bosma noted that there would be a second modeling workshop in May or June. It would be very helpful to have the revised table prior to that workshop. Tim Smith offered to arrange a webinar for those who wish to participate in the workshop but cannot attend in person.

Dave Smith reviewed the schedule for upcoming work on the Adaptive Management Plan. The goal is to complete a prototype plan during FY2014. Work on the full AM Plan would begin in FY 2015. The following is a rough outline of upcoming work:

- 2014: -Develop a prototype AM Plan
  - -Incorporate existing predictive modeling
  - -Evaluate existing monitoring
- 2015: -Incorporate details into AM framework
- -Analyze the sensitivity of decisions to uncertainty and variations in stakeholder risk tolerance
  - -Complete design of the AM monitoring program
- 2016: -Complete the set-up phase for the AM Plan
  - -Develop decision-support tools
  - -Prepare final report

Dave Smith and Jill Gannon agreed to prepare a summary of the Adaptive Management workshop and distribute it to HRRC members.

**Mill Creek Dike Design:** Fuss & O'Neill is finishing its report on conceptual design options for the Mill Creek dike. This report needs to be completed before the end of June to meet the RAE-NOAA grant extension through the Conservation Law Foundation. This matter will be discussed further at the June 19, 2014 HRRC meeting.

**Hydrodynamic Modeling:** Steve Spear reported that he had met with Kirk Bosma to discuss some modeling issues and would write up a report on their discussions for the rest of the Committee.