

River Advisory Committee Meeting
Thursday, June 15, 2023
3 PM
Town Offices, Nowak Room
Final Minutes

1. Call Meeting to Order

Members present: Richard Huber (Chair), Lionel Ingram, Carl Wikstrom, Rod Bourdon, Select Board Rep Niko Papakonstantis, Conservation Commission Rep. Trevor Mattera, and PEA Rep. Warren Biggins. Paul Vlasich, the Interim Public Works Director and Town Engineer, and Kristen Murphy, the Conservation and Sustainability Planner, were also present.

Members Absent: Dan Jones, Terrie Harman

The meeting was called to order by Mr. Huber at 3:00 PM.

1. Approval of Minutes

a. May 18, 2023 Meeting Minutes

Corrections: Mr. Huber said on page 1, it says Thursday May 17 but it should be May 18. On page 2, SRF Funding, it should spell out "State Revolving Fund." On page 5, it says the adjournment was at 8 PM, but it should be 4:10 PM.

Mr. Papakonstantis moved to approve the May 18, 2023 River Advisory Committee minutes as amended. Mr. Ingram seconded. Mr. Wikstrom abstained, as he was not present at the May 18 meeting. The motion passed 6-0-1.

2. Update on River Issues

a. Healthy Water Clean Lawns

Mr. Vlasich introduced Kristen Murphy to discuss the town's fertilizer reduction efforts.

Ms. Murphy said this is a reinvigoration of the existing Healthy Lawns Clean Water program. Stormwater pollution happens when rain hits a solid surface and runs off. It will flow across driveways, roads, and landscaped areas and pick up pollutants. The majority of our storm drains outlet in a water body like a wetland or stream. It typically reaches the Squamscott River. She showed a map of "impaired" rivers, which do not meet water quality standards. We have a substantial issue with water quality in our town. We are in the Great Bay and Hampton/Seabrook Watershed. We have two permits in Exeter through the EPA, one for the Wastewater Treatment Plant (the total nitrogen control plan), and the MS4 [municipal separate storm sewer system] permit, which addresses stormwater pollution.

There are two types of pollution: point source, which is a single location that's the source of that pollution, and non-point source which is more diffuse, such as septic systems and agricultural or lawn runoff. PREP [the Piscataqua Region Estuaries Partnership], which Trevor Mattera works with, has put together a "State of our Estuaries" report, which shows that the levels of nitrogen in Great Bay exceed what we

would consider a healthy system. The point source numbers are lower than they've ever been as a result of the upgrades Exeter and other communities have made on wastewater treatment, but the non-point source numbers show we still have some work to do. Non-point sources come from atmospheric deposition, human waste such as septic systems or pet waste, and chemical fertilizer. We have strict regulations on stormwater development for new construction, as well as protective buffers around wetlands and bodies of water. We manage our catch basins to remove the sediment and do street sweeping to keep pollutants out of our water. We have a wide network of pet waste collection stations; in the first quarter of 2023, we picked up 1.3 tons of pet waste. We partnered with the Exeter Squamscott Local Advisory Committee to send notices to all septic owners in Exeter to advise them about maintenance.

Mr. Wikstrom said traditional septic does little for nitrogen. Is there a program to get people to upgrade? Ms. Murphy said we've talked about it but it's not fully formed. There's a goal to create some sort of incentive to upgrade.

Ms. Murphy said we offer a rain barrel program at Public Works. We've partnered with other communities to plant rain gardens. Plants take up the nutrients and reduce the amount of water washing over pavements. Chemical fertilizer is about 16% of the non-point sources of nitrogen pollution. We have a zoning ordinance that prohibits the use of fertilizer within the Exeter shoreland districts and wetlands. We had an outreach effort where we provided a Swasey Parkway lawncare techniques demonstration. We invited large turf owners in Exeter to talk about the rules and compliance.

Healthy Lawns Clean Water Program is on the town website and has a Facebook page, but we're trying to reinvigorate the program. We're launching a lawncare pledge to follow five steps to reduce fertilizer and get a lawn sign to challenge your neighbors to join in. There are five steps to the program. 1) Plant natives: add native plants to the edges to reduce mowing and nutrient inputs, as well as provide habitats for wildlife. 2) Mow higher: set the mower to 3" or higher, which builds a stronger root system. 3) Leave clippings: this is a free high-quality fertilizer. 4) Test your soil: UNH Cooperative extension offers soil testing for organic matter and PH. Most lawns need PH adjustment rather than fertilizer. 5) Water wisely: a lawn only needs 1" or less of water each week from both rain and irrigation.

Mr. Ingram asked if we have an understanding of the quality of septic tanks in town. Ms. Murphy said no. We first needed to figure out which properties have septic tanks, which we did by comparing it against our sewer lists, but we don't have information like when they were installed or how they've been maintained. In the past 15 years, we've collected information on new septic systems.

b. Squamscott River Siphons Project

Paul Vlasich gave an update on the siphons project; Kevin Garvey of Wright Pierce Engineers was also present. Mr. Vlasich said there's potential for a special Town Meeting coming up for additional funding for the siphons project. In 2020, we had a Town Warrant for the siphons project and the Webster Pump Station. It was important to upgrade both the siphons and the pump station at the same time because the siphons handle the flow from the pump station and they were both at capacity. The majority of

the \$1.6M cost was to add a third barrel to our siphons system to add capacity. The siphons currently handle just under a half million gallons per day. He showed a map of the current sewer system. The plan in 2020 was to put one additional siphon barrel across the river and to the pump station. We asked the consultant to get a contractor in to inspect and clean the existing siphons, but they couldn't see through them because of corrosion. It became not just about adding capacity but also ensuring the existing flows can still make it across the river. The Engineers went back to the drawing board and designed a three barrel system, with two 10 inch pipes and a 12 inch. According to the Army Corps permits for the new design, we had to be at a depth of 16 feet below the river, so we decided to directional drill. We started getting estimates that we did not have the money for. We had to come up with a contingency plan if the siphons failed. There was just enough capacity in nearby pipes to handle this flow on a short-term basis. At this point, we needed an extra 1.2M, which we got from Congressional Directed Spending, State ARPA, and town ARPA, so we went out to bid the project. We had a contractor Granese and Sons, and a subcontractor ECI [Engineers Construction, Inc.] from Vermont for the directional drilling. The plan was to drill from the Swasey Parkway side and pull a polyethylene pipe through, in about a week or so. In the first attempt, they hit something at 100 feet; they moved over and tried again, and hit something at 100 feet. We now know it was a ledge outcropping. If you're drilling through ledge, you have to have a two drill rig system: one to do the initial drilling, and one to go back to find the hole in the ledge. He showed pictures of the equipment and drill rigs. About halfway across the river, the drill shaft broke, so we paused construction to determine what to do. We looked into mapping the ledge profile with a seismic machine to try to find a corridor without ledge, but there was too much air in the soil to get useful data. The consultants devised a two barrel system with two 12 inch pipes, and we got DES [Department of Environmental Services] approval. The dollar figure on that was \$2.5M. The Select Board approved, with \$2.1M from Sewer Reserves and an additional \$400,000 from ARPA. That's for one pipe. During the negotiations with the contractor, we got a fixed price for the second barrel, and we need additional funding of \$2.3M. We have a request for a Town Meeting to finance it. There's also a possibility for an increase in the Clean Water SRF [State Revolving Fund] funding.

Mr. Ingram said there have been so many surprises, how confident are we that this plan will work? Mr. Vlasich said 100%.

Mr. Papakonstantis said he shares the confidence that Mr. Vlasich has. He has kept the Board and the town informed. We're petitioning the court for approval to have a special Town Meeting. There would be an evening Deliberative Session on July 11, likely at the Town Hall, and then an election at the Tuck Center on August 15. This will require 60% because it's a bond article, and it really needs to get approved.

Mr. Mattera said he lives in Westside Drive, and the public participation on the Westside Drive project that Mr. Vlasich has been getting is appreciated.

3. Other Business

- a. There was no other business discussed at this meeting.

4. Public Comment

- a. There was no public comment at this meeting.

5. Review Committee Calendar

- a. Mr. Huber asked if the Committee should meet next month. Mr. Vlasich said PREP is offering to give presentations on their study, and he arranged to have them present on Exeter-specific contributions. This would not be a meeting, it would be a presentation that the Board is invited to attend. We would not need a quorum. We don't need an August meeting unless there's a discovery from our consultants on Pickpocket Dam. Mr. Papakonstantis said we should put an August meeting on the books and then we can cancel it if needed.

6. Adjournment

Mr. Ingram moved to adjourn. Mr. Papakonstantis seconded. All were in favor and the meeting adjourned at 4:31 PM.

Respectfully Submitted,
Joanna Bartell
Recording Secretary