

Fairfield Beach road Pump Station upgrade – Design only

Project cost \$300,000

Town Share – None

1. BACKGROUND – Fairfield Beach road pump station was constructed in 1959 and is the first pumping station built in town. The station has had the pumps replaced in 2016; control panel was done in the late 90's and a force main repair in 2010, due to corrosion and wear. The internal piping, electrical equipment and structural components for stairs and ladders are original. A storm water pumping station was added to the grounds as well, to alleviate road flooding during high tides and storms, powered by station electric service and generator.
2. PURPOSE - To upgrade and replace aged equipment and structural components of the station and force main to ensure continued and uninterrupted service to a critical part of sewer system near Long Island sound, to include protecting from flooding during major weather events.
3. DETAILED DESCRIPTION OF PROPOSAL – Upgrade electrical and mechanical equipment below the 3ft + 100-year base flood elevation, as well as checking the existing structure to withstand the 100-year flood event. Replace the mid- level floor structure with steel framing and grating, replace hatches and ladders to present day safety standards. Replace the 2 existing pumps, piping, valves and control system. Add a third pump to the system with an included pump by-pass provision that is accessible from ground level. Replace the stand-by generator with a new natural gas/propane fueled generator at an elevation to protect from flooding. Upgrade the wet well and dry well ventilation system. Replace the existing 14-inch force main with new.
4. RELIABILITY OF COST ESTIMATE – Cost estimate in 10 out of 10. This is for design only.
5. INCREASED EFFICENCY AND PRODUCTIVITY – Building will be up to code with the latest energy efficient pumps and controls. New piping and building upgrades will ensure long service life and protection from storms that could cause environmental impacts.
6. ADDITIONAL LONG RANGE COST – Maintenance of the station will be bore by the WPCA out of the operating budget.
7. ADDITIONAL USE OR DEMAND ON EXISTING FACILITIES – NONE
8. ALTERNATES TO THIS REQUEST – No other alternatives other than upgrade to existing structure and equipment.
9. SAFETY AND LOSS CONTROL – Safety will be improved to the building, equipment, personnel and the environment upon completion.
10. ENVIROMENTAL CONSIDERATIONS – Will be addressed in construction documents and plans to properly protect Long Island Sound.
11. INSURANCE – All selected participants will be required to carry the necessary insurance as directed by the Town of Fairfield
12. FINANCING – Funded by the WPCA fund balance.
13. OTHER CONSIDERATIONS – None
14. APPROVALS - WPCA June 15,2022

BOS _ TBD

BOF _ TBD

RTM_TBD