

October 6, 2025

Kaitlyn Mentzer - clubmanager@eugeneyachtclub.org
Eugene Yacht Club
P.O. Box 2751
Eugene, OR 97402

Sent by email only

Re: **Ultraviolet Disinfection and Storage Tank (PR#2025-126)**
Eugene Yacht Club (PWS ID#94237)
Conditional Approval

Dear Kaitlyn Mentzer:

Thank you for your submittal to the Oregon Health Authority's Drinking Water Program (DWP) of plan review information for the UV disinfection system for Eugene Yacht Club. On September 25, 2025, our office received a schematic, photos, specifications, and a plan review fee of \$825.

The project includes the installation of Viqua D4 system and a 500-gallon Norwesco vertical poly storage tank. The UV reactor unit does not meet the specifications of NSF Standard 55 Class A.

The plans are approved subject to the following conditions:

1. If a UV system is installed to address total coliform detections in the groundwater source, the UV unit must meet NSF Standard 55 Class A. The Viqua D4 does not meet the specifications of NSF Standard 55 Class A, it is NSF Standard 55 Class B, meaning the strength of the UV reactor is not as powerful as the Class A version. Therefore, the UV reactor installed may not be useful for treating total coliform in the water. Please see attached to this letter a list of UV reactors that are currently NSF Standard 55 Class A certified, that meet the requirements of Oregon Administrative Rules (OAR) 333-061-0050 (5)(I). Additionally, you may visit the DWS's website of currently approved models:
<https://www.oregon.gov/oha/PH/HEALTHYENVIRONMENTS/DRINKINGWATER/PLANREVIEW/Documents/UVReactors-VerifiedModels.pdf>

2. One coliform bacteria sample must be taken from the well head's raw water sample tap every calendar year. If the water system has already collected a raw water coliform sample for 2025, the result can be submitted in lieu of taking a sample.
3. Internal ladders of durable material shall be provided where the only access manhole is located on the roof (OAR 333-061-0050(6)(a)(K)). This could be accomplished by having a designated step ladder that can be disinfected prior to use located on-site.
4. Following construction of new facilities, those facilities must be cleaned and flushed with potable water and disinfected according to AWWA Standards C651 through C654 before they are placed into service (OAR 333-061-0050(10)). Please confirm the storage tank and incidental piping was cleaned and disinfected before put into use. Also, a special coliform sample should have been taken, so please submit the results.
5. A drain shall be provided at the lowest point in the bottom of the storage tank and overflow of sufficient diameter to handle the maximum flow into the tank shall be provided at or near the top of the sidewall. The outlets ends of the drain and overflow shall be equipped with an angle-flap or equivalent protection (OAR 333-061-0050(6)(a)(M)). The plans and photos submitted didn't show any drain or overflow piping.

Until we receive verification that the conditions have been met and final approval has been issued, the storage tank is not approved for use. Upon completion of the project, the engineer must verify in writing that construction was completed according to the submitted plans. If substantial changes are made, a set of as built drawings must be submitted. Documentation demonstrating how the above conditions were met should reference Plan Review # 2025-126 and can be emailed to me at rebecca.a.templin@oha.oregon.gov.

In addition to the above requirements, I have the following comments:

- If the water system experiences *E. coli* detections at the groundwater source, then additional disinfection equipment installation may be required. Please note that UV disinfection does not provide residual disinfection in a distribution system. In the event that coliform bacteria is repeatedly detected in the distribution system at the Eugene Yacht Club, chlorination will be required to maintain an adequate residual in the distribution system.
- The manufacturer notes that lamp replacement should take place periodically (check manufacturer's recommendations for frequency). DWS recommends updating the

water system's operation and maintenance manual to include a maintenance schedule.

If you have any questions or concerns, or would like this in an alternate format, please contact me at (541) 650-4868, or email me at rebecca.a.templin@oha.oregon.gov. Your cooperation is appreciated.

Sincerely,



Rebecca Templin, PE
Regional Engineer
OHA-Drinking Water Services

cc: Nicholas Alviani, OHA Drinking Water Services - Nicholas.J.Alviani2@oha.oregon.gov
Matt Luedtke, Lane County Environmental Health - matthew.luedtke@lanecountyor.gov

Enclosures:

- Alternative Treatment Technology Units Meeting Validation Test Criteria – Ultraviolet Reactors