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Center for Drinking Water Quality
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CERTIFIED MAIL

PWS# RI1592023
Robert Marshall
Prudence Island Water District
P.O. Box 93
Prudence Island, RI 02872

September 5, 2019

7018 0360 0000 0150 8434

LEVEL 2 ASSESSMENT TRIGGER NOTICE

Prudence Island Water District (Licensee) is licensed by the Rhode Island Department of Health, Center for Drinking Water Quality (RIDOH) as Public Water System #RI1592023 to operate a Community public water system. As a licensed public water supply system, the Licensee is required to comply with the provisions of R.I. Gen. Laws § 46-13-1 *et seq.* and the *Rules and Regulations Pertaining to Public Drinking Water* 216-RICR-50-05-1 (the Regulations) promulgated thereunder, and the Safe Water Drinking Act, 42 U.S.C. §300f *et seq.* and 40 CFR parts 141-143. Licensee has triggered a Level 2 Assessment.

Section: Section 1.16.4 of the Regulations

Trigger Date: August 27, 2019

Trigger Description: The Licensee collecting fewer than 40 samples per month has two (2) or more total coliform-present (TC+) routine/repeat samples in the same month. If this triggers a second (or more) Level 1 Assessment within a rolling 12-month period, the PWS must have a Level 2 Assessment performed. Additionally, Indian Spring #4 (WL009) also was also TC+.

Action Required: Level 2 Assessment pursuant to Section 1.16.4(A)(7) of the Regulations.

- Level 2 Assessment & Well Disinfection Procedure Due Date: September 26, 2019
    - Will Capron, the Licensee certified operator will be allowed to conduct the assessment for this treatment technique trigger using the attached Level 2 Assessment form. This form must be submitted by the September 26th deadline listed above. This assessment must be submitted with a Due Diligence report detailing what has happened between the July 30th and August 27th samples that may have caused this trigger. Due to the proximity of the previous trigger and the recently submitted Level 2 Assessment conducted by Northeast Water Solutions that is still under review, RIDOH is granting Prudence Island Water District's operator to conduct this assessment without hiring a certified Level 2 Assessor, but this will not always be the case.
    - The well caps must be removed (if applicable) to inspect the interior of the wells as a requirement of the Level 2 Assessment. After removing the well caps, the wells, water storage tank, and the distribution system will need to be disinfected according to the Well Disinfection Procedure (enclosed). It is in the best interest of the PWS to overflow the "Big Blue" storage tank with

disinfected water. This will allow chlorinated water to contact the inside walls of the tank. This will also require the Licensee to use field dechlorination methods which can be found in AWWA C655-18. Flushing is also required to get chlorinated water inside of the storage tank. A daily chlorination log will be required as part of this procedure as well as collection of chlorine residual readings. A chlorine residual of 0.2 mg/l must be maintained at the ends of the distribution network and at the storage tank during the disinfection process. Please notify all consumers that water cannot be used for any purpose while chlorine is present during the necessary contact time for disinfection. After flushing out the chlorine from the system completely, please use EPA approved chlorine test strips/kit to ensure no chlorine is left in the system before allowing water to be used for consumptive purposes.

- If you have multiple storage tanks, wells, treatment systems, etc., print and complete a section for each unit (label accordingly). For example, if you have two wells, print two Section 6s, label (i.e. "Alpha Well-WL001" & "Beta Well – WL003"), and complete the questions for each (even if well is used for emergency purposes only or if well is disconnected but not abandoned).

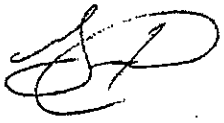
- A daily disinfection log must be submitted as part of the Level 2 Assessment form. It must be submitted to this office by September 30, 2019.

Failure to comply with due dates above will result in a treatment technique violation and may result in the imposition of administrative penalties.

Please remember to check your current sampling schedule regularly on our Drinking Water Watch website (www.health.ri.gov/waterinfo) to stay up to date on your sampling requirements. You can search by your system name or by your public water system license number, which can be found on page 1 of this packet. **Drinking Water Watch also has the list of facility codes and other information about your water system that is required for the Level 2 Assessment.**

Your cooperation regarding this matter is essential. If this Department can be of assistance, or if you have any questions regarding the assessment, please contact Garth Hoxsie-Quinn at (401) 222-3436 or garth.hoxsiequinn@health.ri.gov. If you have questions regarding monitoring and reporting requirements, contact the Coliform Rule Manager at (401) 222-6867.

Sincerely,



Garth Hoxsie-Quinn
Engineering Technician IV
Rhode Island Department of Health
Center for Drinking Water Quality

cc: Leeanne Black, RIDOH
Amy Parmenter, RIDOH
Karen Vale-Vasilev, RIDOH
Carlene Newman, RIDOH
William Capron, Designated Operator

Level 2 (Population >1,000) Assessment Form

System Name: **PWSID #:**

PWS Address:
(Street)
(City)
(ZIP)

SYSTEM TYPE (CIRCLE
C: Community
NTNC: Non-Transient, Non-Community
T: Transient

Source Water Facility Codes: Population Served:
(Please revise if above information is incorrect)

[redacted]

(If main-in, please identify sampler at time of Assessment)

Date Assessment Completed _____

(Please answer each question provided regarding the Water System by circling/highlighting "Y", "N" or If not applicable "N/A". If Sanitary Defects are found, circle/highlight "Y" for that item; indicate issue and corrective action(s) taken including date on a separate page if not enough space is available. All Sanitary Defects identified as "Y" must be commented on in the Final Report)

Questions and Answers regarding Water System (Select "Y", "N", "N/A")				Sanitary Defects? (Y/N)		Issue Description	Corrective Action Taken (Including Date)
1. Have any of the following occurred within the system prior to the collection of positive Total Coliform sample(s) or positive E-Coli sample(s)?							
a. Has the system lost pressure to less than 20 psi?	Y	N	N/A	Y	N		
b. Has the system experienced pressure drops lower than the usual operating pressure? If yes, when? Indicate normal operating pressure.	Y	N	N/A	Y	N		
c. Was there any fire fighting event, flushing operation, sheared hydrant, etc. ? If yes, when?	Y	N	N/A	Y	N		
d. Have there been any pipe or water main breaks? If yes, when?	Y	N	N/A	Y	N		
e. Have there been any plumbing/fixture repairs or additions? If yes when, and what was the repair or addition?	Y	N	N/A	Y	N		
f. Were there any operation and maintenance activities that could have introduced total coliforms?	Y	N	N/A	Y	N		
g. Was there vandalism and/or unauthorized access to facilities?	Y	N	N/A	Y	N		
h. Is the system secured to deter unauthorized access?	Y	N	N/A	Y	N		
i. Is there any evidence of intentional contamination in the distribution system?	Y	N	N/A	Y	N		
j. Are there or were there any visible indicators of unsanitary conditions or potential sources of contamination?	Y	N	N/A	Y	N		
k. Well house/pump station: Are there any sanitary defects in the pump station? Are pump(s) operable?	Y	N	N/A	Y	N		
l. Last pump maintenance/service date. (Respond if applicable)	Date:					Maintenance Performed?	

m. Other comments on records and maintenance?							
n. Have any inactive or backup wells recently been placed into service? (e.g. , auxiliary systems)?	Y	N	N/A	Y	N		
o. Have there been any new wells introduced into the system?	Y	N	N/A	Y	N		
p. Are any fire hydrants, meters, or blow offs located in an area with a high water table or in pits?	Y	N	N/A	Y	N		
q. List any identified cross-connections.	Y	N	N/A	Y	N		
r. Are backflow prevention devices at high risk sites preset, operational and maintained?	Y	N	N/A	Y	N		
s. Are there any sites with low or inadequate chlorine residual or sites where it is difficult to maintain a residual?	Y	N	N/A	Y	N		
t. Have there been any analytical results or any additional samples collected, including source samples which were positive(not for compliance)?	Y	N	N/A	Y	N		
u. Were any other water quality parameters measured and were any results out of the ordinary?	Y	N	N/A	Y	N		
v. Have there been any community illness suspected of being waterborne (e.g., Does HEALTH indicate that an outbreak has occurred.)	Y	N	N/A	Y	N		
w. Did the water system receive any TCR monitoring violations in the past 12 months? If yes , when.	Y	N	N/A	Y	N		
x. Has the system been required to perform disinfection practices after correcting deficiencies that introduced Total Coliform bacteria in the past 12 months? If yes, describe when & the disinfection procedure.	Y	N	N/A	Y	N		
y. What was the most recent date on which satisfactory total coliform samples were taken?	Date:						
z. Other comments on the distribution system.							

Questions and Answers regarding Water System (Select "Y", "N", "N/A")				Sanitary Defects? (Y/N)		Issue Description	Corrective Action Taken (Including Date)
2. Environmental Events							
a. Has there been heavy rainfall?	Y	N	N/A	Y	N		
b. Has there been any rapid snow melt or flooding?	Y	N	N/A	Y	N		
c. Have there been changes in available source water (e.g., significant drop in water table, well levels, reservoir capacity, etc.)?	Y	N	N/A	Y	N		
d. Have there been any interruptions to electrical power?	Y	N	N/A	Y	N		
e. Have there been any extremes in heat or cold?	Y	N	N/A	Y	N		

Questions and Answers regarding Water System (Select "Y", "N", "N/A")				Sanitary Defects? (Y/N)		Issue Description	Corrective Action Taken (Including Date)
3. Sample site evaluation and Sample Protocol Followed & Reviewed							
a. What is the condition of the tap? **(Provide comments)**							
b. What is the location of the tap? **(Provide comments)**							
c. Does the system have an approved sample site plan?	Y	N	N/A	Y	N		
d. Is the tap listed as the "Primary(RTOR)" or "RPOR/RPOT" site in the system's approved sample site plan? **(Provide comments)**							
e. What is the regular use of the connection? **(Provide comments)**							
f. Have there been any plumping changes or construction? If yes, when and what was the repair or change?	Y	N	N/A	Y	N		
g. Have there been any plumbing breaks or failure? If yes, when?	Y	N	N/A	Y	N		
h. List any identified cross-connections after the service connection or in premise plumbing. **(Provide comments)**							
i. Were all of the backflow prevention devices present, operational and maintained?	Y	N	N/A	Y	N		
j. Were there any low pressure events or changes in water pressure after the service connection or in the premise plumbing? If yes when?	Y	N	N/A	Y	N		
k. Are there any treatment devices after the service connection or in premise? **(Circle response, if applicable)**	Y	N	N/A	Y	N	Point of Entry (POE):	Point of Use (POU):
l. Other comments on sample site?							
m. Was the sample taken from a faucet with no swivel?	Y	N	N/A	Y	N		
n Was the sample taken from a faucet with a separate cold water valve?	Y	N	N/A	Y	N		
o. Was the aerator removed?	Y	N	N/A	Y	N		
p. Were all exposed threads and faucet terminus disinfected with chlorine bleach?	Y	N	N/A	Y	N		
q. Was the tap flushed long enough to get a "fresh" representative distribution sample?	Y	N	N/A	Y	N		
r Were the sample bottles properly sanitized and recently acquired from the laboratory?	Y	N	N/A	Y	N		
s. Were the samples properly stored and transported to the lab with freezer packs?	Y	N	N/A	Y	N		

Questions and Answers regarding Water System (Select "Y", "N", "N/A")				Sanitary Defects? (Y/N)		Issue Description	Corrective Action Taken (Including Date)
4. Storage Facilities - Facility Description:							
a. Are the overflow and vents screened and in good condition?	Y	N	N/A	Y	N		
b. Is the facility secured to prevent unauthorized access?	Y	N	N/A	Y	N		
c. Does the access opening have the proper gasket and seat tightly?	Y	N	N/A	Y	N		
d. Is there any observed physical deterioration of the tank and could the physical condition of the tank be a source of contamination?	Y	N	N/A	Y	N		
e. Were there any observed leaks?	Y	N	N/A	Y	N		
f. Is the vent turned down and is there an air gap at the termination point?	Y	N	N/A	Y	N		
g. Does the drain/overflow line terminate at a minimum of 12" air gap?	Y	N	N/A	Y	N		
h. Is the pressure tank maintaining a minimum pressure > 20 psi? Please indicate the pressure range.	Y	N	N/A	Y	N		
i. Does the pump control switch at the tank activate every time there is demand on the system?	Y	N	N/A	Y	N		
j. Has there been any facility maintenance? (i.e. painting / coating? If yes, when?	Y	N	N/A	Y	N		
k. Is facility maintenance occurring per appropriate schedule?	Y	N	N/A	Y	N		
l. Has operation & maintenance been documented?	Y	N	N/A	Y	N		
m. Is there any evidence of intentional contamination at the storage tank?	Y	N	N/A	Y	N		
n. Does the tank "float" on the distribution system or are there separate inlet and outlet lines?	Y	N	N/A	Y	N		
o. What is the measured chlorine residual (total/free) of the water exiting the storage tank today?	Residual:						
p. Are there any unsealed openings in the storage facility such as access doors, vents or joints?	Y	N	N/A	Y	N		
q. Other comments on the storage system							

Questions and Answers regarding Water System (Select "Y", "N", "N/A")				Sanitary Defects? (Y/N)		Issue Description	Corrective Action Taken (Including Date)
5. Treatment Process. (If applicable)							
a. Were there any interruptions in the treatment process?	Y	N	N/A	Y	N		
b. Treatment devices operational and maintained?	Y	N	N/A	Y	N		
c. Was there any recent installation or repair of treatment equipment?	Y	N	N/A	Y	N		
d. Were there any recent changes in the treatment process (e.g., addition of a process, change in chemical or dosage)? If yes, when, what was the change?	Y	N	N/A	Y	N		
e. Were there any interruptions of treatment (lapses in chemical feed, turbidity excursions, disinfection)? If yes which part, when and for how long?	Y	N	N/A	Y	N		
f. What is the free chlorine residual measured immediately downstream from the point of application?	Residual:						
g. Did a review of the filter turbidity profiles reveal any anomalies? from the point of application?	Y	N	N/A	Y	N		
h. Were there any failures to meet C x T calculations?	Y	N	N/A	Y	N		
i. Were the flow rates above the rated capacity?	Y	N	N/A	Y	N		
j. Were there any anomalies on the settled water turbidities?	Y	N	N/A	Y	N		
k. Were any cross-connections found at the treatment process(i.e. at filter backwash)?	Y	N	N/A	Y	N		
l. List the type of treatment at the facility and whether it is Point of Entry (POE) or Point of Use (POU)							
m. Is treatment maintenance occurring per appropriate schedule?	Y	N	N/A	Y	N		
n. Has operation & maintenance been documented?	Y	N	N/A	Y	N		
o. Other comments on the treatment system.							

Questions and Answers regarding Water System (Select "Y", "N", "N/A")				Sanitary Defects? (Y/N)		Issue Description	Corrective Action Taken (Including Date)
6. Source - Well - (Indicate Well Description & Facility ID#):							
a. Is the sanitary seal/well cover intact with all bolts secured and gaskets in place?	Y	N	N/A	Y	N		
b. Is the electrical conduit to the submersible pump secured with no openings to the well?	Y	N	N/A	Y	N		
c. Is the well cap vented?	Y	N	N/A	Y	N		
d. Is the vent screened?	Y	N	N/A	Y	N		
e. Does the vent face downward?	Y	N	N/A	Y	N		
f. Does the vent and pump to waste terminate in an air gap?	Y	N	N/A	Y	N		
g. Has the cover been removed to inspect for insects, failed gaskets, and unscreened openings? If yes, describe what was found.	Y	N	N/A	Y	N		
h. Has the well been disinfected after any maintenance or visual inspection with the cover off?	Y	N	N/A	Y	N		
i. Are there any unprotected cross-connections at the well head?	Y	N	N/A	Y	N		
j. How is the well used? (Circle if applicable)	Primary Backup Emergency Not a PWS Not Drinking Water						
k. How far does the casing extend above grade?	Height:				Comments:		
l. Is the exposed portion of the casing structurally sound?	Y	N	N/A	Y	N		
m. Is the exposed portion of the casing showing evidence of deterioration?	Y	N	N/A	Y	N		
n. Is there evidence of standing water near the wellhead?	Y	N	N/A	Y	N		
o. Is the wellhead secured to prevent unauthorized access?	Y	N	N/A	Y	N		
p. Have there been any sewer spills, source water spills, or other disturbances in the vicinity of the well head?	Y	N	N/A	Y	N		
q. List other comments on the well system. (Are there aspects of well construction and operation that might have caused Total Coliform / E-Coli positives?							

Note: Form & Report to be completed based on data and documents available to the Administrative Contact or PWS operator in charge, maintained on file and returned to the Primacy Agency within 30 days of assessment "Trigger".

Additional Comments:

Print name of person completing form: _____ **Cert #:**_____ **Date:**_____

Signature: _____

Reserved for State

1. Assessment has been successfully completed
2. Likely reason for total coliform-positive occurrence is established
3. System has corrected the problem
4. Was a reset requested and / or granted? - Rationale
5. Name of State reviewer:

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