DOCKET NO. D-1970-081 CP-5

DELAWARE RIVER BASIN COMMISSION

Borough of Bridgeport Wastewater Treatment Plant Upper Merion Township, Montgomery County, Pennsylvania

PROCEEDINGS

This docket is issued in response to an application submitted to the Delaware River Basin Commission (DRBC or Commission) on June 25, 2024 (Application), for renewal of the docket holder's existing wastewater treatment plant (WWTP) and its discharge. The Pennsylvania Department of Environmental Protection (PADEP) issued National Pollutant Discharge Elimination System (NPDES) Permit No. PA0020397 for this discharge.

The Application was reviewed for continuation of the project in the Comprehensive Plan and approval under Section 3.8 of the *Delaware River Basin Compact*. The Montgomery County Planning Commission has been notified of pending action. A public hearing on this project was held by the DRBC on November 6, 2024.

A. DESCRIPTION

- **1. Purpose**. The purpose of this docket is to renew the approval of the docket holder's existing 0.9 million gallons per day (mgd) WWTP and its discharge.
- **Location**. The docket holder's WWTP is located on River Road in Upper Merion Township, Montgomery County, Pennsylvania. The WWTP will continue to discharge treated effluent to the Schuylkill River at River Mile 92.47 22.6 (Delaware River Schuylkill River).

The location of the WWTP outfall in the Schuylkill River Watershed as follows:

OUTFALL NO.	LATITUDE (N)	LONGITUDE (W)
001	40° 06' 08"	75° 19' 33"

Specific location information has been withheld for security reasons.

- **Area Served.** The docket holder's WWTP will continue to serve portions of Upper Merion Township and the Borough of Bridgeport in Montgomery County, Pennsylvania. For the purpose of defining the Area Served, the Type of Discharge and the Service Area sections from the docket holder's Application are incorporated herein by reference, to the extent consistent with all other conditions contained in Section C. DECISION of this docket.
- **<u>Design Criteria</u>**. The docket holder's existing 0.9 mgd WWTP utilizes a trickling filter treatment process, disinfection and dichlorination.

Facilities. The WWTP facilities consist of a bar screen and grit chamber at the pumping station, two (2) primary clarifiers, two (2) primary trickling filters, two (2) secondary trickling filters, two (2) secondary clarifiers, two (2) chlorine contact tanks with de-chlorination chambers, a sludge holding tank, and a belt filter press.

Wastewater from the Main Pumping Station (River Road Pumping Station) and septage receiving station are sent to the primary clarifier influent distribution box. This distribution box also receives recirculated flow from the first stage, roughing trickling filters, secondary clarifier sludge return, and in plant recycle flows. After the primary clarifier influent box, flow is split evenly to the two (2) 45-foot diameter primary clarifiers; combined primary clarifier effluent is then distributed to one of two parallel trickling filter trains which each contain an 84-foot diameter primary trickling filter followed by an 84-foot diameter secondary trickling filters. A portion of effluent from the primary trickling filters is recirculated through the roughing filter, which then goes to the primary clarifier influent distribution box; the remaining flow continues to the secondary trickling filters. The effluent from the two (2) secondary trickling filters is distributed to the two (2) 45-foot diameter secondary clarifiers. A portion of the secondary clarifier effluent flow is recirculated back to the secondary trickling filters and the remaining flow is sent to the chlorine contact tank for disinfection and dechlorination. The mixer and baffle box create a high energy zone where the chlorine solution is quickly mixed with the secondary clarifier effluent before it enters the two parallel contact tanks.

An automatic sampler collects a composite sample at the end of the flash mix zone before it enters the chlorine contact tanks. This composite sample is used for most of the effluent reporting, including CBOD5, suspended solids and ammonia-nitrogen. The chlorinated effluent from each of the two parallel chlorine contact tanks combines in a common effluent channel where sodium bisulfite is added to reduce the chlorine residual. The dechlorinated effluent then flows through a designated sampling manhole located inside the WWTP fence. Grab samples are collected from the sampling manhole and analyzed for fecal coliform, chlorine residual, pH, and dissolved oxygen to evaluate efficiency of the two parallel chlorine contact tanks. Sludge from the primary clarifiers and scum from the primary clarifiers and secondary clarifiers are sent to the sludge holding tanks. Sludge is treated with lime and dewatered in a belt filter press. Dewatered solids are disposed of at a landfill. Secondary sludge is returned to the primary clarifier distribution box.

The project facilities are not located in the 100-year floodplain.

Wasted sludge will continue to be hauled off-site for disposal in accordance with the NPDES Permit No. PA0020397.

Water Withdrawals. The potable water supply in the project service area is provided by the Pennsylvania American Water Company (PAWC), which withdraws water from the Schuylkill River upstream from the Borough of Bridgeport WWTP. The PAWC water withdrawal is described in detail in Docket No. D-1966-100 CP-2, which was approved on September 14, 2016.

- 7. NPDES Permit / DRBC Effluent Requirements. NPDES Permit No. PA0020397 issued by the PADEP includes final effluent limitations for the project discharge of 0.9 mgd to surface waters classified by the PADEP as supporting Warm Water Fishes (WWF) and Migratory Fishes (MF). EFFLUENT TABLE C-1 included in Section C. DECISION Condition C.1. of this docket, contains effluent requirements for DRBC parameters that must be met as a condition of this approval.
- **Relationship to the Comprehensive Plan**. The 0.5 mgd Borough of Bridgeport WWTP was included in the Comprehensive Plan as part of Addendum #1, adopted in July 1962. The project was upgraded by Docket No. D-1970-081 CP, approved by the Commission on June 24, 1970. The project WWTP was expanded from 0.77 mgd to 0.9 mgd plant, as described in Docket No. D-1970-081 CP-2, approved by the Commission on May 10, 2007. The approval was continued in Docket Nos. D-1970-081 CP-3 and D-1970-081 CP-4, approved on September 12, 2013 and September 11, 2019, respectively. Issuance of this docket (D-1970-081 CP-5) will continue the WWTP in the Comprehensive Plan.

B. <u>FINDINGS</u>

The docket holder applied to renew approval of their existing 0.9 mgd WWTP and its discharge. No modifications to the WWTP are proposed.

Near the project site, the Schuylkill River has an estimated seven-day low flow with a recurrence interval of ten years (Q_{7-10}) of 60.8 mgd (94.07 cfs). The ratio of this low flow to the hydraulic design wastewater discharge from the 0.9 mgd WWTP is approximately 132 to 1.

The nearest surface water intake of record for public water supply is located on the Schuylkill River, approximately 8 River Miles downstream of the docket holder's WWTP, and is operated by the City of Philadelphia.

The project does not conflict with the Comprehensive Plan and is designed to prevent substantial adverse impact on the water resources related environment, while sustaining the current and future water uses and development of the water resources of the Basin.

The effluent limits in the NPDES Permit conform with Commission effluent quality requirements, where applicable.

The project is designed to produce a discharge meeting the effluent requirements as set forth in the Commission's *Water Quality Regulations (WQR)*.

C. DECISION

Effective on the approval date for Docket No. D-1970-081 CP-5 below, the project described in Docket No. D-1970-081 CP-4 is removed from the Comprehensive Plan to the extent that it is not included in Docket No. D-1970-081 CP-5; Docket No. D-1970-081 CP-4 is

terminated and replaced by Docket No. D-1970-081 CP-5; and the project and the appurtenant facilities described in Section A "DESCRIPTION" of this docket shall be continued in the Comprehensive Plan. The project and appurtenant facilities as described in Section A of this docket are approved pursuant to Section 3.8 of the *Compact*, subject to the following conditions:

Monitoring and Reporting

1. The docket holder shall comply with the requirements contained in the EFFLUENT TABLES below. The docket holder shall submit the required monitoring results electronically to the DRBC Project Review Section via email aemr@drbc.gov on the Annual Effluent Monitoring Report Form located this web address: https://www.nj.gov/drbc/programs/project/docket-app-info.html#3. The monitoring results shall be submitted annually, absent any observed limit violations, by January 31. If a DRBC effluent limit is violated, the docket holder shall submit the result(s) to the DRBC within 30 days of the violation(s) and provide a written explanation that states the action(s) the docket holder has taken to correct the violation(s) and protect against any future violations. The following average monthly effluent limits are among those listed in the NPDES Permit and meet or are more stringent than the effluent requirements of the DRBC.

EFFLUENT TABLE C-1: DRBC Parameters Included in NPDES Permit

OUTFALL 001 (Discharge to the Schuylkill River)		
PARAMETER	LIMIT	MONITORING
pH (Standard Units)	6 to 9 at all times	As required by NPDES permit
Dissolved Oxygen	5.0 minimum	As required by NPDES permit
Total Suspended Solids	30 mg/l	As required by NPDES permit
Total Suspended Solids Influent	Monitor and Report	As required by NPDES permit
CBOD ₅ (at 20° C)	25 mg/l	As required by NPDES permit
CBOD₅ Influent	Monitor and Report	As required by NPDES permit
BOD ₅ Influent	Monitor and Report	As required by NPDES permit
Total Dissolved Solids*	1,000 mg/l	As required by NPDES permit
Total Nitrogen	Monitor and Report	As required by NPDES permit
Ammonia Nitrogen	20 mg/l	As required by NPDES permit
Total Phosphorus	Monitor and Report	As required by NPDES permit
Fecal Coliform	200 colonies per 100 ml as a geo. avg.	As required by NPDES permit

^{*} See DECISION Condition C.3.

Other Conditions

2. Except as otherwise authorized by this docket, if the docket holder seeks relief from any limitation based upon a DRBC water quality standard or minimum treatment requirement, the docket holder shall apply for approval from the Executive Director or for a docket revision in accordance with Section 3.8 of the *Compact* and the *Rules of Practice and Procedure*.

- 3. The docket holder may request the Executive Director in writing the substitution of specific conductance for TDS. The request should include information that supports the effluent specific correlation between TDS and specific conductance. Upon review, the Executive Director may modify the docket to allow the substitution of specific conductance for TDS monitoring.
- **4.** This approval shall expire on the expiration date set forth below unless prior thereto the docket holder has applied to the Commission to renew or extend this approval.
- 5. The docket holder is responsible for timely submittal to the DRBC of a docket renewal application on the appropriate application form including the appropriate docket application filing fee (see 18 C.F.R. 401.43) at least 6 months in advance of the docket expiration date set forth below. The docket holder will be subject to late filed renewal surcharges in the event of untimely submittal of its renewal application, whether DRBC issues a reminder notice in advance of the deadline or the docket holder receives such notice. If a timely and complete application for renewal has been submitted and the DRBC is unable, through no fault of the docket holder, to reissue the docket before the expiration date below, the terms and conditions of the current docket will remain fully effective and enforceable pending the grant or denial of the application for docket approval.
- **6.** The docket holder is permitted to treat and discharge wastewater as set forth in the Area Served Section of this docket, which incorporates by reference the Type of Discharge and Service Area sections of the docket holder's Application to the extent consistent with all other conditions of this DECISION Section.
- 7. In accordance with the Commission's regulations at 18 C.F.R. Part 440, the docket holder is prohibited from discharging wastewater from high volume hydraulic fracturing ("HVHF") or HVHF-related activities to waters or land within the Basin. The docket holder is further prohibited from discharging hydraulic fracturing wastewater, whether treated or untreated, from sources within or outside the Basin, without obtaining the Commission's prior review and express approval in the form of a revised docket. Violation of this or any condition of this docket approval may result in enforcement, including the risk of financial penalties, pursuant to Section 14.17 of the *Delaware River Basin Compact* and Section 2.7.8 (18 CFR 401.98) of the Commission's *Rules of Practice and Procedure*. The facility and operational records shall be available at all times for inspection by the DRBC.
- **8.** The facility and operational records shall be available at all times for inspection by the DRBC.
- **9.** The facility shall be operated at all times to comply with the requirements of the Commission's WQR.
- 10. If at any time the receiving treatment plant proves unable to produce an effluent that is consistent with the requirements of this docket approval, no further connections shall be permitted until the deficiency is remedied.

- 11. Nothing herein shall be construed to exempt the docket holder from obtaining all necessary permits and/or approvals from other State, Federal or local government agencies having jurisdiction over this project.
- **12.** The docket holder shall discharge wastewater in such a manner as to avoid injury or damage to fish or wildlife and shall avoid any injury to public or private property.
- 13. No sewer service connections shall be made to newly constructed premises with plumbing fixtures and fittings that do not comply with water conservation performance standards contained in Resolution No. 88-2 (Revision 2).
- 14. The issuance of this docket approval shall not create any private or proprietary rights in the waters of the Basin, and the Commission reserves the right to amend, suspend or rescind the docket for cause, in order to ensure proper control, use and management of the water resources of the Basin.
- **15.** The docket holder shall be subject to applicable DRBC regulatory program fees, in accordance with duly adopted DRBC resolutions and/or regulations (see 18 CFR 401.43).
- 16. This approval is transferable by request to the DRBC Executive Director provided that the project purpose and area served approved by the Commission in this docket will not be materially altered because of the change in project ownership. The request shall be submitted on the appropriate form and be accompanied by the appropriate fee (see 18 CFR 401.43).
- 17. The docket holder shall request a name change of the entity to which this approval is issued if the name of the entity to which this approval is issued changes its name. The request for name change shall be submitted on the appropriate form and be accompanied by the appropriate fee (see 18 CFR 401.43).
- 18. The Executive Director may modify or suspend this approval or any condition thereof, or require mitigating measures pending additional review, if in the Executive Director's judgment such modification or suspension is required to protect the water resources of the Basin.
- 19. Any person who objects to a docket decision by the Commission may request a hearing in accordance with Article 6 of the *Rules of Practice and Procedure*. In accordance with Section 15.1(p) of the *Delaware River Basin Compact*, cases and controversies arising under the *Compact* are reviewable in the United States district courts.

BY THE COMMISSION

APPROVAL DATE: December 5, 2024

EXPIRATION DATE: December 5, 2029