

DOCKET NO. D-1988-089 CP-2

DELAWARE RIVER BASIN COMMISSION

Discharge to a Tributary of Special Protection Waters

**Pennsylvania American Water Company
Saw Creek Wastewater Treatment Plant
Lehman Township, Pike County, Pennsylvania**

PROCEEDINGS

This docket is issued in response to an Application submitted to the Delaware River Basin Commission (DRBC or Commission) by Reilly Associates on behalf of Pennsylvania American Water Company (PAWC or docket holder) on July 30, 2014 (Application), for renewal of the docket holder's existing Saw Creek wastewater treatment plant (WWTP) and its discharge, as well as approval to construct a belt filter press. National Pollutant Discharge Elimination System (NPDES) Permit No. PA0060640 for this facility was issued by the Pennsylvania Department of Environmental Protection (PADEP) on February 3, 2011, effective March 1, 2011. The PADEP issued Water Quality Management (WQM) Permit No. 5214401 for the belt filter press on May 5, 2014.

The Application was reviewed for inclusion of the project in the Comprehensive Plan and approval under Section 3.8 of the *Delaware River Basin Compact*. The Pike County Planning Commission has been notified of pending action. A public hearing on this project was held by the DRBC on December 9, 2014.

A. DESCRIPTION

1. Purpose. The purpose of this docket is to renew approval of the docket holder's existing 0.75 million gallons per day (mgd) WWTP and its discharge. This docket also approves the construction of a belt filter press that is designed to handle liquid sludge from this WWTP and two other WWTPs (Blue Mountain Lake and Marcel Lake) owned by the docket holder that are located in the Basin.

2. Location. The WWTP will continue to discharge treated effluent to Saw Creek at River Mile 226.9 – 3.6 – 0.9 (Delaware River – Bush Kill – Saw Creek) via Outfall No. 001, within the drainage area to the Middle Delaware Special Protection Waters (SPW), in the Lehman Township, Pike County, Pennsylvania as follows:

| OUTFALL NO. | LATITUDE (N) | LONGITUDE (W) |
|-------------|--------------|---------------|
| 001 | 41° 06' 05" | 75° 02' 23" |

3. Area Served. The docket holder's WWTP will continue to serve portions of Lehman and Middle Smithfield Townships, Pike County, Pennsylvania. Additionally, liquid sludge will be accepted from other areas of Monroe and Pike Counties, both located in Pennsylvania, from two of the docket holder's other WWTPs located within the Basin. For the purpose of defining the Area Served, Section B (Type of Discharge) and D (Service Area) of the docket holder's Application are incorporated herein by reference, to the extent consistent with all other conditions contained in the DECISION Section of this docket.

4. Physical Features.

a. Design Criteria. The docket holder will continue to operate its existing 0.75 mgd WWTP. Construction of the belt filter press will provide handling equipment to accept liquid sludge from the Saw Creek, Blue Mountain Lake, and Marcel Lake WWTPs, which will be dewatered, then disposed of off-site.

b. Facilities. The existing WWTP consists of an equalization tank, four (4) sequencing batch reactor (SBR) tanks, three (3) sludge holding tanks, and a chlorine contact/post aeration tank.

The modified WWTP will consist of an equalization tank, four (4) SBR tanks, three (3) sludge holding tanks, a belt filter press, and a chlorine contact/post aeration tank.

The docket holder's wastewater treatment facility discharges to waters classified as SPW and is required to have available emergency power. The existing WWTP has a generator installed capable of providing emergency power.

The docket holder's wastewater treatment facility is not staffed 24 hours per day, and shall have a remote alarm system that continuously monitors plant operations in accordance with the Commission's SPW requirements. The existing WWTP has a remote alarm system installed that continuously monitors plant operations.

The docket holder's existing wastewater treatment facility has prepared and implemented an emergency management plan (EMP) in accordance with Commission SPW requirements.

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

Wasted sludge will continue to be hauled off-site by a licensed hauler for disposal at a state-approved facility until the belt filter press is installed. After such time the filter cake will be hauled off-site for disposal at a state-approved facility.

c. **Water withdrawals.** The potable water supply in the project service area is supplied by the docket holder’s distribution system, which was last approved by the Commission on March 12, 2014 via Docket No. D-1997-034 CP-2.

d. **NPDES Permit / DRBC Docket.** NPDES Permit No. PA0060640 was issued by the PADEP on February 3, 2011 (effective March 1, 2011) and includes final effluent limitations for the project discharge of 0.75 mgd to surface waters classified by the PADEP as a high quality, cold water fishery (HQ-CWF). 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 A-1: DRBC Parameters Included in NPDES Permit

| OUTFALL 001 (WWTP) | | |
|---|---|-----------------------------|
| PARAMETER | LIMIT | MONITORING |
| pH (Standard Units) | 6 to 9 | As required by NPDES Permit |
| Total Suspended Solids | 30 mg/l | As required by NPDES Permit |
| Dissolved Oxygen | 5.0 mg/l (minimum at all times) | As required by NPDES Permit |
| CBOD ₅ (at 20° C) | 25 mg/l (85% minimum removal) | As required by NPDES Permit |
| Ammonia Nitrogen (5-1 to 10-31) (11-1 to 4-30) | 3.0 mg/l 9.0 mg/l | As required by NPDES Permit |
| Fecal Coliform (5-1 to 9-30) (10-1 to 4-30) | 200 colonies per 100 ml as a geo. avg. 2000 colonies per 100 ml as a geo. avg. | As required by NPDES Permit |

The requirements in EFFLUENT TABLE A-2 are not listed in the NPDES Permit, but are Commission basin-wide and/or SPW specific parameters that must be met as a condition of this docket approval. Commission staff have requested PADEP include these parameters in their next Permit. Monitoring shall begin January 1, 2015 for each parameter (See DECISION Condition II.d.).

EFFLUENT TABLE A-2: DRBC Parameters Not Included in NPDES Permit

| OUTFALL 001 (WWTP) | | |
|-------------------------|------------------|------------|
| PARAMETER | LIMIT | MONITORING |
| Total Dissolved Solids* | Monitor & Report | Quarterly |
| Phosphorus | Monitor & Report | Monthly |
| Nitrate + Nitrite as N | Monitor & Report | Monthly |
| Total Kjeldahl Nitrogen | Monitor & Report | Monthly |

* See DECISION Condition II.u.

e. **Cost.** The overall cost of the belt filter press project is estimated to be \$1,418,038.

f. **Relationship to the Comprehensive Plan.** Issuance of this docket will incorporate the docket holder’s 0.75 mgd Saw Creek WWTP into the Comprehensive Plan (See DECISION Condition I.b.).

B. FINDINGS

The purpose of this docket is to renew approval of the docket holder's existing 0.75 mgd WWTP and its discharge. This docket also approves the construction of a belt filter press that is will provide handling equipment to accept liquid sludge from the Saw Creek, Blue Mountain Lake, and Marcel Lake WWTPs, which will be dewatered, then disposed of off-site.

In 1992, the DRBC adopted SPW requirements, as part of the DRBC *Water Quality Regulations (WQR)*, designed to protect existing high water quality in applicable areas of the Delaware River Basin. One hundred twenty miles of the Delaware River from Hancock, New York downstream to the Delaware Water Gap has been classified by the DRBC as SPW. This stretch includes the sections of the river federally designated as "Wild and Scenic" in 1978 -- the Upper Delaware Scenic and Recreational River and the Delaware Water Gap National Recreation Area -- as well as an eight-mile reach between Milrift and Milford, Pennsylvania which is not federally designated. The SPW regulations apply to this 120-mile stretch of the river and its drainage area.

On July 16, 2008, the DRBC approved amendments to its *WQR* that provide increased protection for waters that the Commission classifies as SPW. The portion of the Delaware River and its tributaries within the boundary of the Lower Delaware River Management Plan Area was approved for SPW designation and clarity on definitions and terms were updated for the entire program.

Article 3.10.3A.2.e.1). and 2). of the Commission's *WQR* states that projects subject to review under Section 3.8 of the Compact that are located in the drainage area of SPW must submit for approval a Non-Point Source Pollution Control Plan (NPSPCP) that controls the new or increased non-point source loads generated within the portion of the docket holder's service area which is also located within the drainage area of SPW. The service area of the docket holder is located within in the drainage area to the SPW. Since this project does not entail additional construction and expansion of facilities/service area (i.e., there are not any new or increased non-point source loads associated with this approval), the NPSPCP requirement is not applicable at this time. Accordingly, DECISION Conditions II.q. and II.w. have been included in this docket.

According to the United States Geological Survey (USGS) Streamstats program Saw Creek at docket holder's WWTP discharge has an estimated seven-day low flow with a recurrence interval of ten years (Q_{7-10}) of 1.0 mgd (1.56 cfs). The ratio of this low flow to the hydraulic design wastewater discharge from the 0.045 mgd IWTP is 1.33 to 1.

The nearest surface water intake of record for public water supply is located on the Delaware River approximately 46.8 River Miles downstream of the docket holder's WWTP, and is operated by the City of Easton.

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 are in compliance 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 *WQR*.

C. DECISION

I. Effective on the approval date for Docket No. D-1988-089 CP-2 below:

a. Docket No. D-88-89 is terminated and replaced by Docket No. D-1988-089 CP-2; and

b. The project and the appurtenant facilities described in Section A "Physical Features" of this docket shall be added to the Comprehensive Plan.

II. The project and appurtenant facilities as described in Section A "Physical Features" of this docket are approved pursuant to Section 3.8 of the *Compact*, subject to the following conditions:

a. Docket approval is subject to all conditions, requirements, and limitations imposed by the PADEP in its NPDES and WQM Permit, and such conditions, requirements, and limitations are incorporated herein, unless they are less stringent than the Commission's.

b. The facility and operational records shall be available at all times for inspection by the DRBC.

c. The facility shall be operated at all times to comply with the requirements of the Commission's *WQR*.

d. The docket holder shall comply with the requirements contained in the EFFLUENT TABLES in Section A.4.d. of this docket. The docket holder shall submit the required monitoring results electronically to the DRBC Project Review Section via email aemr@drbc.state.nj.us on the **Annual Effluent Monitoring Report Form** located at this web address: <http://www.state.nj.us/drbc/programs/project/application/index.html>. 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.

e. 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*.

f. 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.

g. 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.

h. Sound practices of excavation, backfill and reseedling shall be followed to minimize erosion and deposition of sediment in streams.

i. Within 10 days of the date that construction of the project has started, the docket holder shall notify the DRBC of the starting date and scheduled completion date.

j. Within 30 days of completion of construction of the approved project, the docket holder is to submit to the attention of the Project Review Section of DRBC a Construction Completion Statement (“Statement”) signed by the docket holder’s professional engineer for the project. The Statement must (1) either confirm that construction has been completed in a manner consistent with any and all DRBC-approved plans or explain how the as-built project deviates from such plans; (2) report the project’s final construction cost as such cost is defined by the project review fee schedule in effect at the time the application was made; and (3) indicate the date on which the project was (or is to be) placed in operation. In the event that the final project cost exceeds the estimated cost used by the docket holder to calculate the DRBC project review fee, the statement must also include (4) the amount of any outstanding balance owed for DRBC review. The outstanding balance will equal the difference between the fee paid to the Commission and the fee calculated on the basis of the project’s final cost, using the formula and definition of “project cost” set forth in the DRBC’s project review fee schedule in effect at the time application was made.

k. The WWTP modifications shall be completed within three years of approval of this docket or the docket holder shall demonstrate to the Executive Director that it has expended substantial funds (in relation to the cost of the project) in reliance upon this docket approval. If the modifications have not been completed within three years of Docket Approval and the docket holder does not submit a cost analysis demonstrating substantial funds have been expended, Commission approval of the modifications to the existing WWTP shall expire. If the approval of the modifications expire under this condition, the docket holder shall file a new application with the Commission and receive Commission approval prior to initiating construction of any modifications in the future.

l. The docket holder is permitted to treat and discharge wastewaters as set forth in the Area Served Section of this docket, which incorporates by reference Sections B (Type of Discharge) and D (Service Area) of the docket holder’s Application to the extent consistent with all other conditions of this DECISION Section.

m. 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.

n. 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).

o. Nothing in this docket approval shall be construed as limiting the authority of DRBC to adopt and apply charges or other fees to this discharge or project.

p. 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.

q. Prior to allowing connections from any new service areas or any new developments, the docket holder shall either submit and have approved by the Executive Director of the DRBC a NPSPCP in accordance with Section 3.10.3.A.2.e, or receive written confirmation from the Executive Director of the DRBC that the new service area is in compliance with a DRBC approved NPSPCP.

r. Unless an extension is requested and approved by the Commission in advance, in accordance with paragraph 11 of the Commission's Project Review Fee schedule (Resolution No. 2009-2), the docket holder is responsible for timely submittal of a docket renewal application on the appropriate DRBC application form at least 12 months in advance of the docket expiration date set forth below. The docket holder will be subject to late charges in the event of untimely submittal of its renewal application, whether or not DRBC issues a reminder notice in advance of the deadline or the docket holder receives such notice. In the event that 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 (or the later date established by an extension that has been timely requested and approved), the terms and conditions of the current docket will remain fully effective and enforceable against the docket holder pending the grant or denial of the application for docket approval.

s. 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.

t. 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.

u. The docket holder may request of 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.

v. The docket holder is prohibited from treating/pre-treating any hydraulic fracturing wastewater from sources in or out of the Basin at this time. Should the docket holder wish to treat/pre-treat hydraulic fracturing wastewater in the future, the docket holder will need to first apply to the Commission to renew this docket and be issued a revised docket allowing such treatment and an expanded service area. Failure to obtain this approval prior to treatment/pre-treatment will result in action by the Commission.

w. Prior to the docket holder initiating any substantial alterations or additions to the existing WWTP as defined in Section 3.10.3A2.a.16) of the Commission's *WQR*, an application must be submitted and approved by the Commission. Such an application shall be submitted prior to final design to ensure that the Commission can provide the docket holder with draft effluent limitations for SPW specific parameters as guidance for design as to not require duplication of work or cause a substantial expenditure of public funds without Commission approval. The docket holder is encouraged to contact the Commission staff during the planning stages to identify the potential effluent limitations required to meet the no measurable change parameters under SPW.

BY THE COMMISSION

DATE APPROVED: December 10, 2014

EXPIRATION DATE: February 28, 2021