NPDES Permit No. IL0072788 Notice No. SMT:24072301.smt

Public Notice Beginning Date: March 12, 2025

Public Notice Ending Date: April 11, 2025

National Pollutant Discharge Elimination System (NPDES)
Permit Program

Draft Reissued NPDES Permit to Discharge into Waters of the State

Public Notice/Fact Sheet Issued By:

Illinois Environmental Protection Agency Bureau of Water Division of Water Pollution Control Permit Section 2520 West Iles Avenue Post Office Box 19276 Springfield, Illinois 62794-9276 217/782-0610

Name and Address of Discharger:

Name and Address of Facility:

Southwater, Inc. 27183 Sandy Creek Road Tamms, Illinois 62988 Southwater Water Treatment Plant 27183 Sandy Creek Road Tamms, Illinois 62988 (Alexander County)

The Illinois Environmental Protection Agency (IEPA) has made a tentative determination to issue a NPDES permit to discharge into the waters of the state and has prepared a draft permit and associated fact sheet for the above named discharger. The Public Notice period will begin and end on the dates indicated in the heading of this Public Notice/Fact Sheet. The last day comments will be received will be on the Public Notice period ending date unless a commentor demonstrating the need for additional time requests an extension to this comment period and the request is granted by the IEPA. Interested persons are invited to submit written comments on the draft permit to the IEPA at the above address. Commentors shall provide his or her name and address and the nature of the issues proposed to be raised and the evidence proposed to be presented with regards to those issues. Commentors may include a request for public hearing. Persons submitting comments and/or requests for public hearing shall also send a copy of such comments or requests to the permit applicant. The NPDES permit and notice number(s) must appear on each comment page.

The application, engineer's review notes including load limit calculations, Public Notice/Fact Sheet, draft permit, comments received, and other documents are available for inspection and may be copied at the IEPA between 9:30 a.m. and 3:30 p.m. Monday through Friday when scheduled by the interested person.

If written comments or requests indicate a significant degree of public interest in the draft permit, the permitting authority may, at its discretion, hold a public hearing. Public notice will be given 45 days before any public hearing. Response to comments will be provided when the final permit is issued. For further information, please call Shu-Mei Tsai at 217/782-0610.

The applicant is engaged in the production of potable water for municipal use (SIC 4941). Plant operation results in an average discharge of 0.038 MGD of lime softening wastewater, particulate filter backwash, and clarifier sludge blowdown from outfall 001 and 400 gpd of sanitary wastewater from outfall 002.

Application is made for existing discharges which are located in Alexander County, Illinois. The following information identifies the discharge point, receiving water and stream classifications:

<u>Outfall</u>	Receiving Water	<u>Latitude</u>		<u>Longitude</u>		Water Classification	Integrity <u>Rating</u>
001	Unnamed Ditch Tributary to Sandy Creek	37° 13' 01"	North	89° 18' 55"	West	General Use	Not Rated
002	Unnamed Ditch Tributary to Sandy Creek	37° 13′ 04"	North	89° 18' 55"	West	General Use	Not Rated

To assist you further in identifying the location of the discharge please see the attached map.

The subject facility discharges to the unnamed tributary of Sandy Creek at a point where 0 cfs of flow exists upstream of the outfall during critical 7Q10 low-flow conditions. The unnamed tributary of Sandy Creek is not listed as a biological significant stream in the 2008 Illinois Department of Natural Resources Publication *Integrating Multiple Taxa in a Biological Stream Rating System* or given an integrity rating in that document. The unnamed tributary of Sandy Creek, tributary to Waterbody Segment IL_IXD-01, is not listed on the 2020/2022 Illinois Integrated Water Quality Report and Section 303(d) List since it has not been assessed. The unnamed tributary of Sandy Creek is not subject to enhanced dissolved oxygen standards. The facility discharges from Outfall 002 less than 0.1 mile from the unnamed tributaries confluence with Sandy Creek.

Sandy Creek is a General Use Water with 0 cfs of flow during 7Q10 low-flow conditions. Sandy Creek is not listed as a biologically significant stream in the 2008 Illinois Department of Natural Resources Publication *Integrating Multiple Taxa in a Biological Stream Rating System* or given an integrity rating in that document. Sandy Creek, Waterbody Segment IL_IXD-01, is listed on the 2020/2022 Illinois Integrated Water Quality Report and Section 303(d) List as fully supporting aesthetic quality and aquatic life uses. Fish consumption and primary contact uses have not been assessed. This segment of Sandy Creek is not subject to enhanced dissolved oxygen standards.

The discharges from the facility shall be monitored and limited at all times as follows:

Outfall 001: Lime Softening Wastewater, Particulate Filter Backwash, and Clarifier Sludge Blowdown (DAF= 0.038 MGD)

	LOAD LIMITS lbs/day <u>DAF (DMF)</u>			CONCEN <u>LIMIT</u>			
PARAMETER	30 DAY AVERAGE	DAILY MAXIMUM	REGULATION	30 DAY AVERAGE	DAILY MAXIMUM	REGULATION	
Flow (MGD)						35 IAC 309.146	
рН						35 IAC 302.204	
Total Residual Chlorine					0.05	35 IAC 302.208 40 CFR 125.3	
Iron (Total)	0.63	1.26	40 CFR 122.45(f)	2.0	4.0	35 IAC 304.124	
Total Suspended Solids	4.75	9.5	40 CFR 122.45(f)	15.0	30.0	35 IAC 304.124	
Chloride				Monitor Only	Monitor Only	35 IAC 309.146	
Dissolved Oxygen				Monitor Only	Monitor Only	35 IAC 309.146	
Outfall 002: Sanitary Wastewater (DAF= 0.0004 MGD)							
Flow (MGD)						35 IAC 309.146	
рН						35 IAC 302.204	
Total Suspended Solids	0.04	0.08	40 CFR 122.45(f)	12	24	35 IAC 304.120	
BOD ₅	0.03	0.07	40 CFR 122.45(f)	10	20	35 IAC 304.120	

					NTRATION <u>TS mg/L</u>		
PARAMETER	30 DAY AVERAGE	DAILY MAXIMUM	REGULATION	30 DAY AVERAGE	DAILY MAXIMUM	REGULATION	
Outfall 002 Continued:							
Total Residual Chlorine					0.05	35 IAC 302.208 40 CFR 125.3	
Fecal Coliform					Monitor Only	35 IAC 309.146	
Ammonia Nitrogen (as N)				Monitor Only	Monitor Only	35 IAC 302.212 (a) 35 IAC 302.212(b)(3)	
Dissolved Oxygen				Monitor Only	Monitor Only	35 IAC 309.146	

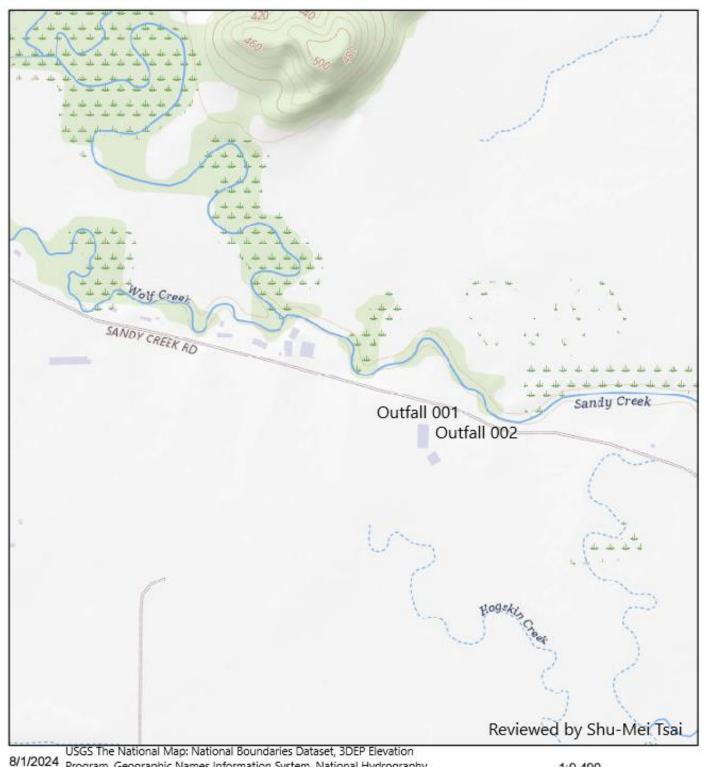
Load Limit Calculations:

A. Load limit calculations for the following pollutant parameters were based on a design average flow of 0.0004 MGD based on 40 CFR 122.45 and using the formula of design average flow (MGD) X concentration limit (mg/l) X 8.34 = the average or maximum load limit (lbs/day): BOD₅ and Total Suspended Solids.

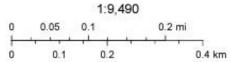
The following explain the conditions of the proposed permit:

The special conditions clarify: flow measurement and reporting, total residual chlorine, monitoring location, discharge monitoring reports, re-opener, water treatment additive usage, Class K Certification, and the requirement of renewal applications.

IL0072788 Southwater Inc. - Southwater Water Treatment Plant



USGS The National Map: National Boundaries Dataset, 3DEP Elevation
Program, Geographic Names Information System, National Hydrography
Dataset, National Land Cover Database, National Structures Dataset, and
National Transportation Dataset; USGS Global Ecosystems; U.S. Census Bureau
TIGER/Line data; USFS Road data; Natural Earth Data; U.S.



Illinois Environmental Protection Agency

Division of Water Pollution Control

2520 West Iles Avenue

Post Office Box 19276

Springfield, Illinois 62794-9276

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

Reissued (NPDES) Permit

Expiration Date: Issue Date: Effective Date:

Name and Address of Permittee: Facility Name and Address:

Southwater, Inc.

27183 Sandy Creek Road
Tamms, Illinois 62988

Southwater Water Treatment Plant
27183 Sandy Creek Road
Tamms, Illinois 62988

(Alexander County)

Discharge Number and Name: Receiving Waters:

001 Lime Softening Wastewater, Particulate Filter Backwash,

and Clarifier Sludge Blowdown

Unnamed Ditch Tributary to Sandy Creek

002 Sanitary Wastewater Unnamed Ditch Tributary to Sandy Creek

In compliance with the provisions of the Illinois Environmental Protection Act, Title 35 of Ill. Adm. Code, Subtitle C and/or Subtitle D, Chapter 1, and the Clean Water Act (CWA), the above-named permittee is hereby authorized to discharge at the above location to the above-named receiving stream in accordance with the standard conditions and attachments herein.

Permittee is not authorized to discharge after the above expiration date. In order to receive authorization to discharge beyond the expiration date, the permittee shall submit the proper application as required by the Illinois Environmental Protection Agency (IEPA) not later than 180 days prior to the expiration date.

Darin E. LeCrone, P.E. Manager, Permit Section Division of Water Pollution Control

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Effluent Limitations and Monitoring

From the effective date of this permit until the expiration date, the effluent of the following discharges shall be monitored and limited at all times as follows:

Outfall 001: Lime Softening Wastewater, Particulate Filter Backwash, and Clarifier Sludge Blowdown (DAF= 0.038 MGD)

		LOAD LIMITS lbs/day CONCENTRATION DAF (DMF) LIMITS mg/L		· · · · · · · · · · · · · · · · · · ·		
PARAMETER	30 DAY AVERAGE	DAILY MAXIMUM	30 DAY AVERAGE	DAILY MAXIMUM	SAMPLE FREQUENCY	SAMPLE TYPE
Flow (MGD)	See Special Co	ondition 1.			1/Month	Measured
рН	See Special Co	ondition 2.			1/Month	Grab
Total Residual Chlorine	See Special Co	ondition 3.		0.05	1/Month	Grab
Iron (Total)	0.63	1.26	2.0	4.0	1/Month	Grab
Total Suspended Solids	4.75	9.5	15.0	30.0	1/Month	Grab
Chloride			Monitor Only	Monitor Only	1/Month	Grab
Dissolved Oxygen			Monitor Only	Monitor Only	1/Month	Grab

Effluent Limitations and Monitoring

From the effective date of this permit until the expiration date, the effluent of the following discharges shall be monitored and limited at all times as follows:

Outfall 002: Sanitary Wastewater (DAF= 0.0004 MGD)

	LOAD LIMI ⁻ <u>DAF (I</u>	,	CONCENTRATION <u>LIMITS mg/L</u>			
PARAMETER	30 DAY AVERAGE	DAILY MAXIMUM	30 DAY AVERAGE	DAILY MAXIMUM	SAMPLE FREQUENCY	SAMPLE TYPE
Flow (MGD)	See Special Condition 1.				1/Month	Measure
рН	See Special Co	ondition 2.			1/Month	Grab
Total Suspended Solids	0.04	0.08	12	24	1/Month	Grab
BOD₅	0.03	0.07	10	20	1/Month	Grab
Total Residual Chlorine	See Special Condition 3.			0.05	1/Month	Grab
Fecal Coliform	See Special Co	ondition 4.		Monitor Only	1/Month	Grab
Ammonia Nitrogen (as N)			Monitor Only	Monitor Only	1/Month	Grab
Dissolved Oxygen	See Special Co	ondition 8.	Monitor Only	Monitor Only	2/Year	Grab

Special Conditions

<u>SPECIAL CONDITION 1</u>. Flow shall be measured in units of Million Gallons per Day (MGD) and reported as a monthly average and a daily maximum on the Discharge Monitoring Report. The monthly average shall consist of the summation of the daily flows divided by the number of days the facility discharged during that month.

<u>SPECIAL CONDITION 2</u>. The pH shall be in the range 6.5 to 9.0. The monthly minimum and monthly maximum values shall be reported on the DMR form.

<u>SPECIAL CONDITION 3</u>. Any use of chlorine to control slime growths, odors or as an operational control, etc. shall not exceed the limit of 0.05 mg/L (daily maximum) total residual chlorine in the effluent. Sampling is required on a daily grab basis during the chlorination process. Reporting shall be submitted on the DMR's on a monthly basis.

All samples for total residual chlorine shall be analyzed by an applicable method contained in 40 CFR 136, equivalent in accuracy to low-level amperometric titration. Any analytical variability of the method used shall be considered when determining the accuracy and precision of the results obtained.

<u>SPECIAL CONDITION 4</u>. Fecal coliform shall be reported as a daily maximum on the discharge monitoring report. A disinfection exemption was issued June 21, 2017. Therefore, fecal coliform monitoring is required for the purpose of providing data to verify the existing disinfection exemption.

<u>SPECIAL CONDITION 5</u>. Samples taken in compliance with the effluent monitoring requirements shall be taken at a point representative of the discharge, but prior to entry into the receiving stream.

<u>SPECIAL CONDITION 6</u> The Permittee shall record monitoring results on Discharge Monitoring Report (DMR) electronic forms using one such form for each outfall each month.

In the event that an outfall does not discharge during a monthly reporting period, the DMR Form shall be submitted with no discharge indicated.

The Permittee is required to submit electronic DMRs (NetDMRs) instead of mailing paper DMRs to the IEPA unless a waiver has been granted by the Agency. More information, including registration information for the NetDMR program, can be obtained on the IEPA website, https://epa.illinois.gov/topics/water-quality/surface-water/netdmr.html.

The completed Discharge Monitoring Report forms shall be submitted to IEPA no later than the 25th day of the following month, unless otherwise specified by the permitting authority.

Permittees that have been granted a waiver shall mail Discharge Monitoring Reports with an original signature to the IEPA at the following address:

Illinois Environmental Protection Agency Division of Water Pollution Control Attention: Compliance Assurance Section, Mail Code # 19 2520 West Iles Avenue Post Office Box 19276 Springfield, Illinois 62794-9276

<u>SPECIAL CONDITION 7</u>. If an applicable effluent standard or limitation is promulgated under Sections 301(b)(2)(C) and (D), 304(b)(2), and 307(a)(2) of the Clean Water Act and that effluent standard or limitation is more stringent than any effluent limitation in the permit or controls a pollutant not limited in the NPDES Permit, the Agency shall revise or modify the permit in accordance with the more stringent standard or prohibition and shall so notify the permittee.

<u>SPECIAL CONDITION 8</u>. Semi-annual samples shall be taken in January and July with analytical results submitted with the February and August DMRs.

<u>SPECIAL CONDITION 9</u>. The effluent, alone or in combination with other sources, shall not cause a violation of any applicable water quality standard outlined in 35 III. Adm. Code 302.

<u>SPECIAL CONDITION 10</u>. In the event that the permittee shall require the use of water treatment additives, the permittee must request a change in this permit in accordance with the Standard Conditions – Attachment H.

SPECIAL CONDITION 11. The use or operation of this facility shall be by or under the supervision of a Certified Class K operator.

Special Conditions

SPECIAL CONDITION 12. To receive the renewal authorization to discharge under this permit, the applicant must complete and submit Application Forms 1, and 2C for all existing discharge, a Form 2D for new wastewater discharge, and a Form 2F for stormwater discharge. Pursuant to 40 CFR 122.21(c)(1), permittees must submit a renewal application at least 180 days prior to expiration of the current permit.