

Application Type Renewal
Facility Type Sewage
Major / Minor Major

NPDES PERMIT FACT SHEET ADDENDUM

Application No. PA0053147
APS ID 832443
Authorization ID 1327056

Applicant and Facility Information

Applicant Name	<u>Upper Saucon Sewage Treatment Authority</u>	Facility Name	<u>Upper Saucon Township WWTP</u>
Applicant Address	<u>5500 Camp Meeting Road</u> <u>Center Valley, PA 18034-9444</u>	Facility Address	<u>4774 Saucon Creek Road</u> <u>Center Valley, PA 18034</u>
Applicant Contact	<u>Patrick Lambert</u>	Facility Contact	<u>Patrick Lambert</u>
Applicant Phone	<u>(610) 282-1171</u>	Facility Phone	<u>(610) 282-1171</u>
Client ID	<u>309424</u>	Site ID	<u>270952</u>
SIC Code	<u>4952</u>	Municipality	<u>Upper Saucon Township</u>
SIC Description	<u>Trans. & Utilities - Sewerage Systems</u>	County	<u>Lehigh</u>
Date Published in PA Bulletin	<u>March 8, 2025</u>	EPA Waived?	<u>No</u>
Comment Period End Date	<u>April 7, 2025</u>	If No, Reason	<u>Major Facility</u>
Purpose of Application	<u>Renewal of NPDES permit.</u>		


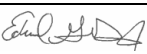
Internal Review and Recommendations

Public notification of draft permit issuance was published in the PA Bulletin on March 8, 2025. Comments were received from the permittee's consultant (Hanover Engineering) during the 30-day public comment period. The comments are related to the Bis(2-Ethylhexyl)Phthalate limitations and a single response is provided below. Another draft permit will be issued due to the changes made to the permit.

Hanover Engineering Comment:

"The proposed Average Monthly Concentration for Bis(2-Ethylhexyl)Phthalate proposed to take effect three years after the Permit Effective Date is lower than the capability of Suburban Testing Labs who performs all testing for the Upper Saucon Wastewater Treatment Plant (WWTP). The effluent concentration results for 2024 and 2025 to date typically range from <0.00283 to <0.00297 mg/L. The lowest value of 0.00283 mg/L occurred six times since September 26, 2024. All 26 sample results are higher than the proposed effluent limit. We understand that the achievable reporting concentration depends in part on the characteristics of the wastewater. The Authority would need additional time to send samples to other laboratories over a several-month period to determine if it is possible to test effluent samples at concentrations lower than 0.0022 mg/L limit.

The proposed Average Monthly Concentration limit of 0.0022 mg/L for Bis(2-Ethylhexyl)Phthalate also is significantly lower than the capability to test WWTP influent. The turbidity of influent samples generally requires a 5:1 dilution before analysis due to turbidity. We reviewed Authority influent data for 2024 and 2025 to date. The results range from <0.0142 to <0.0147 mg/L when 5:1 dilution is required. The results ranged from 0.00291 to 0.00294 mg/L for two samples when no dilution was required. The turbidity factor will make it difficult to sample the various sewersheds to identify sources of Bis (2-Ethylhexyl)Phthalate if necessary.

Approve	Return	Deny	Signatures	Date
X			 Brian Burden, E.I.T. / Project Manager	May 5, 2025
X			 Edward Dudick, P.E. / Environmental Engineer Manager	May 5, 2025

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We believe the Bis(2-Ethylhexyl)Phthalate occurrence is related to the sample tube. As noted in an April 16, 2019 email from Chris Cope of the Authority to James Berger of PADEP, the Authority has "switched to a Phthalate-free sample tube and also protected this tubing from UV sunlight to avoid a potential plasticizer breakdown within the tubing". Sunlight protection is provided by placing the tubing inside a hose. In addition, the Authority has replaced the tubing every 6 months to further minimize the release of Bis(2-Ethylhexyl) Phthalate. Please note the Authority completed a comprehensive review of possible Bis(2-Ethylhexyl)Phthalate sources in 2016 and could not identify any. The Authority recently increased the frequency of changing the tubing to four times per year and will monitor the effect of this change."

Response:

The revised monthly average and daily maximum limitations for Bis(2-Ethylhexyl)Phthalate are both below DEP's target QL of 5.0 µg/L. The following template Part C condition is added to the permit to address this scenario:

VII. WQBELs BELOW QUANTITATION LIMITS


- A. *The parameter(s) listed below are subject to water quality-based effluent limits (WQBELs) in Part A of this permit that are necessary to comply with state water quality standards, but may be less than quantitation limits (QLs), as defined in 25 Pa. Code § 252.1, that are generally achievable by conventional analytical technology. The permittee shall analyze the parameter(s) using methods that will achieve the QL(s) as listed below. For the purpose of compliance, a statistical value reported on the DMR that is less than the QL(s) (i.e., "non-detect") will be considered to be in compliance.*

<u>Parameter Name</u>	<u>Quantitation Limit</u>
Bis(2-Ethylhexyl)Phthalate	5.0 µg/L

- B. *The permittee shall, where determined to be feasible by the permittee, achieve a QL less than the QL identified above to improve the level of confidence that state water quality standards are being met in the receiving waters.*
- C. *The permittee shall manage non-detect values and report statistical results to DEP in accordance with published DMR guidance (3800-BK-DEP3047). Where a mixed data set exists containing non-detect results and "detected" values (i.e., results greater than or equal to the QL), the QL shall be used for non-detect results to compute average statistical results.*

The previously issued permit included average monthly and IMAX limitations for this pollutant, as did the earlier draft permits issued during this renewal process. This draft permit includes average monthly and daily maximum concentration and mass-based limitations to be consistent with Table 5-3 (Methods of Expressing Effluent Limits for Sewage Discharges) of DEP's *Technical Guidance for the Development and Specification of Effluent Limitations and Other Permit Conditions in NPDES Permits* (document No. 362-0400-001). The IMAX limitations are removed from the permit. Note: The IMAX limitation that was in effect for the first three years of the renewed permit term is now a daily maximum limitation. The daily maximum limitation in effect for the final two years of the permit term was taken directly from the Toxics Management Spreadsheet. The minimum measurement frequency for the first three years of the permit is changed from "Upon Request" to "1/week" in accordance with the recommended frequency in Table 6-3 (Self-Monitoring Requirements for Sewage Discharges) of DEP's *Technical Guidance for the Development and Specification of Effluent Limitations and Other Permit Conditions in NPDES Permits*. The "Upon Request" requirement was mistakenly carried over from the previously issued permit.

Measures taken by the Authority to reduce concentrations in the effluent as discussed in the comment should be mentioned in the Minimization Plan required in Part C.VI. If the Authority determines sampling of the influent or sewershed sampling will be required to characterize the incoming wastewater, then the difficulties encountered when sampling wastewater with high turbidity and the Authority's plan to accurately characterize the incoming wastewater should be discussed in the Minimization Plan.

Internal Review and Recommendations	
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