HB 924

Department of Legislative Services

Maryland General Assembly
2023 Session

FISCAL AND POLICY NOTE
First Reader

House Bill 924 (Delegate Grammer)
Environment and Transportation

Sewage Treatment Plants - Effluent Discharges, Discharge Permits, and Property Tax Credit for Impacted Dwellings

This bill requires the Maryland Department of the Environment (MDE) to (1) monitor effluent discharged from sewage treatment plants (wastewater treatment plants or WWTPs) that have a discharge permit to process at least 50 million gallons per day (gpd) of effluent; (2) evaluate whether the effluent and any nutrients in the effluent impact midge populations, as specified; (3) upon certain findings by MDE, place an inspector at an affected WWTP and have the inspector stay on site for at least 180 days and until certain conditions are met, as specified; (4) post specified information on its website relating to WWTPs where inspectors have been placed; and (5) submit an annual report to the General Assembly on the above activities. The bill also alters provisions relating to the issuance of a discharge permit by MDE. Finally, the bill authorizes a local government to grant a property tax credit for a dwelling that is (1) determined to have been adversely impacted by midge populations and (2) located within one mile of a WWTP. **The bill takes effect June 1, 2023.**

Fiscal Summary

State Effect: No effect in FY 2023. General fund expenditures increase *significantly* beginning in FY 2024. Although a reliable estimate of the increase in costs cannot be made at this time, general fund expenditures likely increase by millions of dollars annually, as discussed below. State revenues are not affected.

Local Effect: Local property tax revenues may decrease, potentially significantly, beginning in FY 2024 to the extent the property tax credit is granted. Local expenditures may increase to administer the property tax credit.

Small Business Effect: Minimal or none.

Analysis

Bill Summary:

Monitoring and Evaluation Requirements

MDE must (1) monitor effluent discharged from WWTPs that have a discharge permit to process at least 50 million gpd and (2) evaluate whether the effluent and any nutrients in the effluent impact midge populations in the surrounding land and water areas, including whether the effluent contributes to the growth of phytoplankton.

Requirement to Place Inspector

MDE must place an inspector at a WWTP that MDE finds has (within the last 24 months) (1) released effluent or bacteria beyond the limits of the plant's discharge permit; (2) failed to maintain basic operation and maintenance of the plant; or (3) for a WWTP plant that requires a wastewater capacity plan, failed to submit an updated wastewater capacity plan to MDE.

If an inspector is placed at a WWTP in accordance with the bill, the inspector must remain on site at the WWTP until (1) discharge monitoring reports show that effluent released from the WWTP has been within the scope of the plant's discharge permit for 180 days; (2) the WWTP is in compliance with basic operation and maintenance requirements; and (3) for a WWTP that requires a wastewater capacity plan, an updated plan has been submitted to MDE.

Every other week, MDE must post on its website (1) a status update for each WWTP at which an inspector is placed in accordance with the bill and (2) steps taken to address the deficiencies that triggered the requirement for an inspector under the bill. Beginning in 2024, by October 1 each year, MDE must report to the General Assembly on the activities conducted pursuant to these provisions.

Additional Requirements Relating to the Issuance of Discharge Permits

Before issuing a discharge permit to a WWTP, MDE must conduct an analysis of the availability and viability of new pollution control technologies that may not have been available or utilized in other plants since a previous permit was granted.

A discharge permit issued to a WWTP with a design capacity of 50 million gpd or greater must limit (1) total nitrogen discharged from the plant at 3.0 mg/L and total phosphorus discharged from the plant at 0.3 mg/L as measured on an annual average basis and (2) the

daily total bacterial discharged from the plant to below the statistical threshold values for *Enterococci* and *E. coli* established under specified State regulations.

Local Property Tax Provisions

The bill authorizes local governments to grant, by law, a property tax credit against the county or municipal property tax imposed on a dwelling that is (1) determined to have been adversely impacted by midge populations and (2) located within one mile of a WWTP. The amount of the tax credit must equal up to 100% of any property tax imposed on the dwelling. The local government may provide, by law, for (1) the duration of the tax credit; (2) additional eligibility criteria for the tax credit; and (3) any other provision necessary to carry out the tax credit.

Current Law: A person must generally hold an MDE discharge permit before constructing, installing, modifying, extending, altering, or operating a system, facility, outlet, or establishment if its operation could cause or increase the discharge of pollutants into the waters of the State. MDE's Wastewater Permits Program (within the Water Management Administration) issues permits to protect Maryland's water resources by controlling industrial and municipal wastewater discharges. Surface water discharges are regulated through combined State and federal permits under the National Pollutant Discharge Elimination System. Groundwater discharges are regulated through State-issued groundwater discharge permits.

A wastewater capacity management plan is a planning and engineering tool used to monitor the relationship between plant capacity and population/economic growth. It contains information on sewage system capacity and capacity demand created by existing and ongoing growth and development. Section 9-512 of the Environment Article requires State and municipal permit issuance authorities to ensure there is adequate sewer capacity before issuing building permits or approving subdivision plats.

Enhanced nutrient reduction (ENR) technology is technology that is installed at a WWTP to reduce the amount of nutrients discharged in the plant's effluent; ENR technology is capable of reducing the nitrogen and phosphorus concentrations in wastewater effluent to concentrations of not more than 3.0 mg/L of total nitrogen and not more than 0.3 mg/L of total phosphorus, as calculated on an annually averaged basis. Chapter 428 of 2004 established the Bay Restoration Fund in an effort to fund ENR upgrades to Maryland's 67 major publicly owned WWTPs (those with a design capacity of 500,000 gpd or more). As of January 12, 2023, all but two major publicly owned WWTPs in the State have been fully upgraded to ENR, and ENR upgrades to minor WWTPs are underway.

COMAR 26.08.02.03-3(A) establishes water quality criteria specific to designated uses. The bacteria indicator criteria magnitudes for *E. coli* and *Enteroccoci* are bacteriological

criteria for Class I Waters – water contact recreation and protection of nontidal warmwater aquatic life.

MDE is not required to monitor effluent discharged from WWTPs with respect to any impact the effluent may have on midge populations.

State Expenditures: General fund expenditures for MDE increase significantly, on an ongoing basis, beginning in fiscal 2024 to hire (1) two natural resources planners to take water samples and monitor sites for impacts on midge populations at WWTPs that have a discharge permit to process at least 50 million gpd of effluent, conduct related analyses, and write the required annual report relating to these activities; (2) *numerous* environmental compliance specialists (inspectors) to fulfill the bill's requirement that MDE place an inspector that must remain on site at a WWTP that triggers the bill's inspector requirement until certain conditions are met (but for at least 180 days); (3) several program managers to supervise the new inspectors; and (4) a handful of other employees (including administrators and environmental specialists) to collect data, post information, write reports, and generally implement the bill. This analysis assumes that although the bill takes effect June 1, 2023, there is no impact in fiscal 2023.

MDE advises that there are 173 WWTPs with municipal discharge permits that have reported effluent violations in the last two years. MDE estimates that at least 5 environmental compliance specialists are needed to provide full-time inspector coverage at an affected WWTP. Assuming no more than 40% of the aforementioned plants need inspector coverage at any one time, to cover 70 plants at a time, MDE estimates that, in order to implement the bill, it needs to hire 350 environmental compliance specialists, 35 supervisors, 8 environmental program managers, 8 administrative officers, 4 administrators, 3 natural resources planners, 2 environmental specialists, and 2 program managers at a total cost of $40.7 million in fiscal 2024, increasing to $41.5 million by fiscal 2028. This estimate assumes an implementation date of October 1, 2023 (and includes the costs to hire staff to conduct midge site monitoring and evaluation discussed above). The Department of Legislative Services (DLS) cannot independently verify this estimate at this time and notes that, ultimately, the number of inspectors needed depends on how many WWTPs trigger the bill's inspection requirements, which cannot be predicted in advance. DLS concurs, however, that the bill establishes significant new responsibilities for MDE and likely requires the department to hire hundreds of staff on an ongoing basis.

MDE notes that there are only two WWTPs in the State that discharge more than 50 million gpd (the Back River WWTP located in Baltimore County and the Patapsco WWTP located in Baltimore City, both owned by Baltimore City). While the bill's requirement for MDE to monitor effluent and evaluate whether the effluent and any nutrients in the effluent impact midge populations appear to apply only to those two WWTPs, the bill's requirement

for MDE to place an inspector at a sewage treatment plant under specified conditions does not appear to be limited to just those two WWTPs.

Local Fiscal Effect: Since the bill is silent as to the tax year the property tax credit may take effect, it is assumed that the property tax credit provisions are implemented beginning July 1, 2023. Therefore, local government revenues may decrease, potentially significantly, beginning in fiscal 2024 to the extent that the property tax credit is granted. The actual impact on local revenues depends on several factors, including (1) the number of affected dwellings; (2) the assessed value of affected dwellings; and (3) local property tax rates.

For example, Prince George's County estimates that they have 9,035 accounts for dwellings that are located within one mile of a WWTP. The county reports that if *all* of those dwellings are determined to have been adversely affected by midge populations, and the county passes a law to establish a 100% property tax credit, county revenues would decrease by $35.0 million in fiscal 2024, with the revenue loss increasing to $40.2 million by fiscal 2028.

Local expenditures may increase to administer the property tax credit. The amount of any expenditure increase depends on the type of tax credit authorized by a local government and the number of dwellings that qualify for the tax credit.

Additional Information

Prior Introductions: Similar legislation has not been introduced within the last three years.

Designated Cross File: None.

Information Source(s): Prince George's County; Maryland Association of Counties; City of Annapolis; Maryland Municipal League; Maryland Environmental Service; Maryland Department of the Environment; State Department of Assessments and Taxation; Department of Legislative Services

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