

Green Evaluation

Washington Suburban Sanitary District Consolidated Public Improvement Bonds of 2019

Transaction Overview

The district was created in 1918 and operates as a public corporation of the State of Maryland under the Public Utilities Article. It includes water and sewerage systems and provides water supply and sewage disposal facilities for Montgomery and Prince George’s counties in Maryland. The net proceeds of the green bonds will be used to finance the planning, design, and construction of improvements to a water filtration plant in order to reduce solids discharges, and the planning, design, and construction of replacement pre-filter chlorination and filter air scour systems of such water filtration plant; planning, design, and construction or rehabilitation of large-diameter water transmission mains and large system valves and small water mains and other appurtenances including meter and vaults; and costs of issuance of the green bonds. The bonds will be labeled green bonds, and all project costs fall within the scope of our Green Evaluation.

Entity: Washington Suburban Sanitary District
Subsector: Utilities
Location (HQ): U.S.
Financing value: \$50,460,000
Amount evaluated: 100%
Evaluation date: Dec. 4, 2019
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Green Evaluation Overview

Transaction's Transparency

- Use of proceeds reporting
- Reporting comprehensiveness

80

Transaction's Governance

- Management of proceeds
- Impact assessment structure

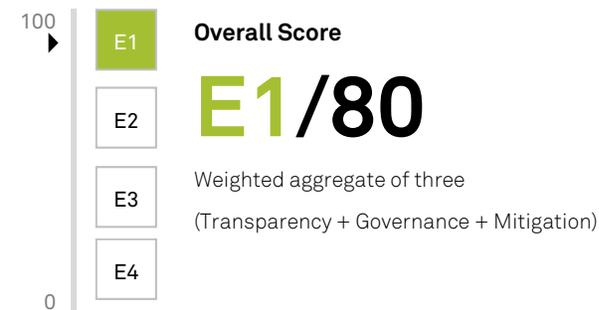
88

Mitigation

Sector	→ Net Benefit Ranking	→ Hierarchy Adjustments	
Water	Reducing water losses in water distribution network Wastewater treatment with no energy recovery	Improving delivery of existing freshwater supplies Increasing freshwater availability and quality through system enhancements	80

Adaptation

NA



Project Description

The district will use proceeds of the bond to improve the water system throughout the service area. The projects were necessitated by aging infrastructure, a consent decree, and the desire to improve water sustainability and reduce pollution. In addition, they are expected to improve efficiencies in operations.

The first identified project is a component of the Potomac Water Filtration Plant (WFP) Consent Decree Program. The district is required to undertake short-term operational changes and capital improvements at the Potomac WFP to reduce solids discharged to the river and achieve quality requirements established by the state and incorporated in a new discharge permit. This project will address water quality and pollution prevention and conservation of terrestrial and aquatic biodiversity. The second project is the Potomac WFP pre-filter chlorination and air scour improvements. Between 2006 and 2017, the Potomac WFP experienced 14 separate incidents of catastrophic filter underdrain failure. The improvements to the system will support more reliable water supply and treatment, contributing to sustainable water management. The third project identified for green funding is the water pipe and valve rehabilitation program, which is expected to reduce water loss and support sustainable water management. Our Green Evaluation includes the positive environmental impact from the increase in available water (reduction in water loss). Other positive environmental impacts of the projects outside the scope of our Green Evaluation include reducing pollution.

Scoring Summary

This transaction achieves an overall Green Evaluation score of E1/80, which is the strongest Green Evaluation score on our scale of E1 (highest) to E4 (lowest). We determined this score by taking a weighted average of the transaction's very strong Governance (88) and solid Transparency (80) assessments and its strong Mitigation score (80). In our view, the projects' expected reductions in water loss and solids reductions compared with baseline will have a significant environmental impact, while the district's green bond framework provides for a high level of disclosure surrounding these environmental impacts.

Rationale

The Mitigation score (80) reflects our view that the projects improve water reliability and quality while reducing solids and operational inefficiencies. The financing receives a strong net benefit ranking due to the relatively high water stress in the DC/Maryland area.

The very strong Governance score (88) reflects the fact that the district will demonstrate--with required external verification--that all proceeds of the series 2019 bonds were spent on environmentally beneficial projects as prioritized in the green bond framework. While the third-party verification agent has not been selected, procurement is underway and use of a third-party verifier is a tenet of the framework. The district has a defined green bond framework to determine project eligibility. The framework requires that the project meet criteria in one or more of the following areas: green buildings,

pollution prevention and control, renewable energy, water quality, and climate change adaptation. The district has a formal process that also identifies how projects align with its 30-year asset management plan. Management assesses the business case studies, which prioritize need, options, and preferred solution. Finally, the proposed projects then go through a formal vetting process for review and final approval. The district's chief financial officer is responsible for certifying that proceeds of green bond issuance are used according to established procedures. Green bond proceeds will be held in a segregated account and used exclusively to fund new projects or refinance a portion of a previous bond issuance that funded eligible green projects.

The strong Transparency score (80) reflects the district's commitment to produce an annual report detailing how the green bond proceeds were used to finance the selected projects, a description of the selected projects, and details of the environmental benefits resulting from the project. Key performance indicators (KPIs) the district intends to measure include the percent of river solids removed from the Potomac for the WFP project, a reduction in the amount of water used for filter backwash process for the system improvement project and miles of large-diameter water mains replaced annually and water loss reduction for the pipe and valve replacement project. Annual disclosure for projects receiving green bond proceeds will be at the project level and expenditures will be reported at the project level. Such information will be posted to the Electronic Municipal Market Access (EMMA) website of the Municipal Securities Rulemaking Board, accessible at www.emma.msrb.org. This report will be posted along with other district filings, which will be made on or before the date eight months after the close of the fiscal year. The district commits to provide reporting on KPIs in the "Environmental Stewardship" section of its website as well, which we view positively. While the district hasn't engaged in green framework reporting before, it has a history of successfully tracking capital and construction milestones associated with its implementation of the Potomac Consent Decree program.

Key Strengths And Weaknesses

In our view, water-related mitigation projects focus on using water resources and networks more efficiently and improving the quality of water treatment for various end uses and the environment. The district's explicitly prioritized investments in reducing water loss, improving operational efficiencies to reduce water use in treatment, and reduction in solids to improve quality and reduce pollution. These priorities were chosen commensurate with environmental principles and the district's asset and climate management plans, which is an important factor in our evaluation. Of importance, most projects in this sector address regional water stress, which is a relative measure of supply and demand for potable water uses that contributes to our high mitigation score.

We view the financing's governance framework, assessed at 88, as very strong. The district will demonstrate--with external verification--that all proceeds of the series 2019 bonds were spent on environmentally beneficial projects as prioritized in its Green Bond Framework. The district has a defined Green Bond framework to determine project eligibility. Green bond proceeds will be held in a

segregated account and used exclusively to fund new projects or refinance a portion of a prior bond issuance that funded eligible green projects.

We view the transparency score as solid, assessed at 80. The district commits to measure performance and adherence to the district's green bond framework on an ongoing annual basis for the life of the projects. Management will produce an annual report detailing how the green bond proceeds were used to finance the selected projects, a description of the selected projects, and details of the environmental benefits resulting from the project. The annual disclosure for projects receiving green bond proceeds will be at the project level and expenditures will be reported at the project level. However, the performance indicators, such as solids reductions and water used in filtration, do not directly map to the metrics tracked by many investors, and therefore, are more difficult to compare with similar investments made in other systems.

A Green Evaluation is a point-in-time assessment and is not monitored.

Sector level scores

Sector	Location	Technology	Use of Proceeds (Mil. \$)	Use of Proceeds treatment	Net Benefit Ranking
Water	Prince George's County, Md.	Water distribution network improvements	34.918	Estimated	70
Water	Prince George's County, Md.	Wastewater treatment potable water no energy recovery	6.917	Estimated	80
Water	Prince George's County, Md.	Wastewater treatment potable water no energy recovery	8.625	Estimated	78
			\$50.460		

Water

Green Evaluation Process

80

Transparency

88

Governance

80

Mitigation

Weighted aggregate of three
(Transparency + Governance + Mitigation)

E1/80

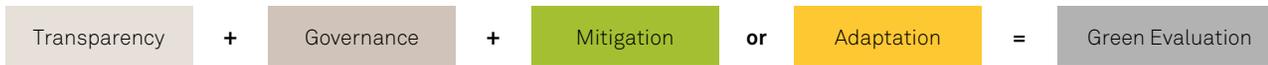
Overall Score

Technology	Baseline Water Stress	Net Benefit Ranking	→ Water Stress and Hierarchy Adjustment	Environmental Impact Score	Proceeds (Mil. \$)
	High  Low DC-Maryland				
Recycling wastewater for water (agricultural uses)					
Recycling wastewater for water (other uses)					
Wastewater treatment with no energy recovery		80		95	8,000
Wastewater treatment with energy recovery		78	Increasing freshwater availability through system enhancements	95	9,975
Unspecified					
Reducing water losses in water distribution network		70	Improving delivery of existing freshwater supplies	73	40,385
Unspecified					
Water desalination to supply municipal water			Increasing freshwater availability with significant negative environmental impact		
Unspecified					
Conservation measure in residential buildings					
Conservation measure in commercial buildings					
Conservation measure in industrial buildings					
Smart metering in residential buildings					
Unspecified			Reducing demand on potable water supplies		

Increasing Water Sustainability

Our Green Evaluation Approach

Weighted aggregate of three:



Common approach used amongst opinion providers

Unique to S&P Global Ratings



eKPI – Environmental Key Performance Indicator

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