west virginia department of environmental protection

Division of Water and Waste Management
601 57th Street, SE
Charleston, WV 25304
Phone: 304-926-0495 / Fax: 304-926-0463

Harold D. Ward, Cabinet Secretary
dep.wv.gov

MEMORANDUM

To: Water Development Authority

From: Katheryn Emery, P.E., Program Manager
Sewer Technical Review Committee

Date: July 20, 2026

Subject: City of Mannington
IJDC Application - 2026S-2790
Manhole Rehab and Sewer Line Extension

---

1. This committee has reviewed the preliminary application and engineering report submitted for the above referenced project in accordance with Chapter 31, Article 15A. It has been determined that the proposed project is:

   a. √ Consistent with the intent of the Infrastructure and Jobs Development Act and is the most cost-effective, environmentally sound alternative for solving the water needs in this area.

   b. __ Not consistent with the Act and may not be the most cost effective, environmentally sound alternative for solving the wastewater needs in this area.

   c. __ Same as (a) above except that certain issues need to be addressed prior to design and construction as the attached comments indicate.

2. Our recommendation is that:

   a. √ The Funding Committee needs to review the proposed sources of funding to determine the best mix of grant and/or loan funds in accordance with applicable guidelines.

   b. __ The Funding Committee should recommend that the Council approve the proposed project and its funding plan.

c. ___ The Funding Committee does not need to review the funding assumptions on this project because of deficiencies in the engineering report. The proposed project should be tabled for the consultant to address technical comments.

d. ___ This project should be referred to the Consolidation Committee.

3. Other remarks:

The proposed project includes an extension to 40 residences in the Sunshine Road and Flaggy Meadow Drive areas. Additionally, I/I sources will be addressed with the installation of a spray liner and new frames and watertight lids at 90 manholes within the City's existing collection system.

The proposed total cost for this project is $3,000,000 and the City intends to pursue a $1,500,000 CWSRF Loan (2.75% for 20 years, 0.25% admin fee), and a $1,500,000 CWSRF Principal Forgiveness Loan. The current monthly rate for 3,400 gallons is $40.74 (0.93% MHI) with a project rate increase to $45.57 (1.03% MHI).

<u>Preliminary Project Ratings:</u>
Public Health Benefits: 5
Compliance with Standards: 10

Arvin Singh, EdD, MBA, MPH, MS, FACHDM, FACHE
Secretary of Health

Mark E. McDaniel, DO, FAAFP
Acting Commissioner & State Health Officer

MEMORANDUM

TO: Meredith J. Vance, Director
Environmental Engineering Division

FROM: Patrick Murphy, P.E.
Environmental Engineering Division

DATE: June 30, 2026

SUBJECT: City of Mannington
IJDC Application - **2026S-2790**
Plant Upgrade
Marion County

Recommendation: This preliminary application and Preliminary Engineering Report has been reviewed and is technically feasible.

Project Scope: No project scope was addressed within the PER; however, under Alternative 2, the project proposes the rehabilitation of approximately 90 manholes along the main interceptor and a sanitary sewer extension to the Sunshine Road and Flaggy Meadow Drive areas.

The total project cost is **$3,000,000.00**

Need for the Project: The need for this project is to reduce inflow and infiltration in an economical manner while also extending sanitary sewer service to nearby residential areas that currently rely on individual septic systems.

Concerns: No concerns noted

Permits: A permit **<u>will be</u>** required from the WV Bureau for Public Health prior to construction. Other permits and/or consultations that may be anticipated for this project include: WVDEP, WVDOT, WVDNR, USF&W, WVSHPO, and USCOE.

west virginia department of environmental protection

Division of Water and Waste Management
601 57th Street SE
Charleston, WV 25304
Phone: 304-926-0495 / Fax: 304-926-0463

Harold D. Ward, Cabinet Secretary
dep.wv.gov

MEMORANDUM

TO: Katheryn Emery, P.E., Program Manager, DWWM

FROM: Justin Moffitt, P.E., DWWM

DATE: July 13, 2026

SUBJECT: City of Mannington
IJDC Application - 2026S-2790
Manhole Rehab and Sewer Line Extension

RECOMMENDATION

The Preliminary Engineering Report (PER) and IJDC Application prepared by The Thrasher Group, Inc. for the above referenced project has been reviewed and is technically feasible.

PROJECT DESCRIPTION

The City of Mannington (City) owns, operates and maintains a municipal wastewater collection and treatment system designed to serve a population equivalent of approximately 2,500 persons. The system conveys flow to a 0.25 million gallons per day (MGD) oxidation ditch wastewater treatment plant (WWTP). The City operates under NPDES Permit No. WV0024953 and discharges clean water into Buffalo Creek.

This project proposes the rehabilitation of approximately 90 manholes along the main interceptor and a sanitary sewer extension to the Sunshine Road and Flaggy Meadow Drive areas. The rehabilitation work will consist of spraying the manholes with a non-structural liner to seal any cracks and openings and installing new frames and watertight lids to eliminate sources of inflow and infiltration (I&I). The extension will install approximately 5,750 linear feet of new sewers and one new lift station to provide service to approximately 40 residential customers in the Sunshine and Flaggy Meadow areas.

The proposed total cost for this project is $3,000,000 and the City intends to pursue a $1,500,000 CWSRF loan (2.75% for 20 years, 0.25% admin fee), and a $1,500,000 CWSRF Principal Forgiveness loan. The current monthly rate for 3,400 gallons is $40.74 (0.93% MHI) with a project rate increase to $45.57 (1.03% MHI).

NEED FOR PROJECT

This project seeks to reduce I&I in an economical manner while also extending sanitary sewer service to nearby residential areas that currently rely on individual septic systems. Reduction of I&I will continue the City's progress towards compliance with its NPDES permit and Notices of Violation. In addition to addressing I&I concerns, several unincorporated and outlying areas, including Flaggy Meadow Drive and Sunshine Road, remain unserved by public sewer and rely on septic systems and other decentralized wastewater disposal methods. Many of these systems are aging and have the potential to discharge inadequately treated wastewater to the surrounding environment. Implementing the proposed project is necessary to protect public health, improve environmental conditions in the Buffalo Creek watershed, and support the City's efforts to meet regulatory requirements.

DEFICIENCIES/COMMENTS

- PER did not provide average plant flow information.
- Using the Combined Application, the Design and Total Engineering fees appear to be within the ASCE curve.

Preliminary Project Ratings:
Public Health Benefits: 5
Compliance with Standards: 10

Public Service Commission
of West Virginia

201 Brooks Street, P.O. Box 812
Charleston, West Virginia 25323

Phone: (304) 340-0300
Fax: (304) 340-0325

June 30, 2026

Brad Sergent, Chair
Water Development Authority, Acting Executive Director
Katheryn Emery, P.E., Program Manager
CWSRF & DWTRF, Division of Water and Waste Management, WVDEP
Meredith Vance, Director
Environmental Engineering Division, WVBPH

Re: Public Service Commission Staff Review Comments
Application No. 2026S-2790
Mannington, City of – Manhole Rehabilitation
& Sewer Extension (Flaggy Meadow Drive & Sunshine Road)
Infrastructure Preliminary Application

As requested, the Technical Staff of the Public Service Commission of West Virginia has completed its review of the above-referenced Infrastructure application. In light of Technical Staff's comments enclosed herewith, we are recommending the application be:

__X__ Forwarded to the Funding Committee

_____ Forwarded to the Consolidation Committee

_____ Returned to the Applicant

Please advise if you have any questions.

Sincerely,

Brandon Crace

Brandon Crace
Engineering Division

Enclosures

PUBLIC SERVICE COMMISSION STAFF
TECHNICAL REVIEW

DATE: June 30, 2026

PROJECT SPONSOR: **MANNINGTON, CITY OF – (SEWER)**

PROJECT SUMMARY: The City of Mannington is proposing to rehabilitate existing manholes and extend sewer service to approximately 40 potential customers along Flaggy Meadow Drive and Sunshine Road.

PROPOSED FUNDING:

CWSRF Principal Forgiveness	$1,500,000
CWSRF Loan (2.75%, .25% AF, 20 yrs.)	$1,500,000
Total	$3,000,000

CURRENT RATES:

$40.75	3,400 gallons
$47.25	4,000 gallons

PROPOSED RATES:

$45.57	3,400 gallons
$52.84	4,000 gallons

Application No. 2026S-2790

RECOMMENDATION:
__X__ Forward to the Funding Committee
____ Forward to the Consolidation Committee
____ Return to the Applicant

FINANCIAL: William Nelson

1. Current rates ($40.75 for 3,400 gallons) are below the rates attributable to 1.25% ($56.88), 1.5% ($68.26), 1.75% ($79.63) and 2.0% ($91.01) of the Median Household Income (MHI). Increasing current rates to 1.25%, 1.5%, 1.75%, and 2.0% of the MHI would provide additional revenues of $194,851, $332,272, $469,693, and $607,114 respectively.

2. Using Scenario 1, the preferred funding package consisting of a CWSRF Principal Forgiveness Loan of $1,500,000, and a CWSRF Loan of $1,500,000 at 2.75%, .25% Admin. Fee for 20 years, proposed rates ($45.57 for 3,400 gallons) will provide a cash flow surplus of $35,868 and debt service coverage of 166.00%.

3. Using the Scenario 2 alternate loan package of $3,000,000 (in uncommitted funds) at 5% for 40 years (paid back over 38 years), proposed rates ($51.50 for 3,400 gallons) will provide a cash flow surplus of $23,053 and debt service coverage of 142.66%.

4. NOTES TO COMMENTS:

   A. Staff's detailed adjustments are listed on Attachment A for Scenario 1 (Preferred Funding Package) and Attachment B for Scenario 2 (Loan Package).

   B. Staff prepared the attached Cash Flow Analysis utilizing information from the Annual Report for the Fiscal Year Ended June 30, 2025, and the applicant's Rule 42 Exhibit submitted with the application.

   C. Staff notes the Applicant's cash flow analyses include going level rates of $43.19 (3,400 gallons) and proforma rates of $45.57 (3,400 gallons). The City, on May 2, 2022, adopted by ordinance, a three-step rate increase with step 1 rates becoming effective 45 days following adoption and the step 2 or going level rates becoming effective upon the start date of the project and the step 3 or proforma rates becoming effective upon the date the project is substantially complete. Staff included these rates in its analyses.

   D. Staff notes the Applicant's Annual Report for the Fiscal Year Ended June 30, 2025, listed Interest and Dividend Income of $9,494, which was omitted from the Preferred and Loan Cash Flow Analyses. Staff analyses include this income.

   E. Senate Bill 234, effective June 12, 2015, required water and sewer utilities that are political subdivisions of the state to maintain a cash working capital reserve in an amount of no less than one-eighth (1/8) of actual annual operation and maintenance expenses. It should be noted that the cash flows provided by the project sponsor include funding for the 1/8 cash working capital reserve. Staff accepted that amount in its analyses. However, this amount may be reviewed by the Commission in future filings in accordance with Public Service Commission General Order 183.11.

F. Senate Bill 234 (2015) required, pursuant to WV Code 24-2-4b (b), that municipally operated utilities shall consider a reasonable plant-in-service depreciation expense for rates and charges. The project sponsor should take this into consideration when preparing its Rule 42. Municipals that do not provide for a reasonable depreciation expense risk delays in Certificate of Convenience and Necessity filings if rates are determined to not be sufficient.

G. The City of Mannington should carefully evaluate its revenue requirements before passing a rate ordinance in order to ensure that rates are sufficient to provide a reasonable surplus and meet coverage requirements. Calculations to support the revenue projections should also be provided.

ENGINEERING: Brandon Crace

1. Pursuant to House Bill 2742 passed in the 2025 Legislative Session, this project will not require a Certificate of Convenience and Necessity from the PSC.

2. Scope: The City of Mannington is proposing to rehabilitate existing manholes and extend sewer service to approximately 40 potential customers along Flaggy Meadow Drive and Sunshine Road. The proposed project scope includes: mobilization, pre-construction video, erosion and sediment control, traffic control, rehabilitation of 90 manholes, 1500 LF of 4-inch gravity sewer pipe, 4250 LF of 6-inch gravity sewer pipe, 1500 LF of 8-inch gravity sewer pipe, 50 LF of 2-inch forcemain pipe, new Sunshine Lift Station (complete), 27 new manholes, 46 customer cleanouts, 3 terminal cleanouts, 250 LF of 12-inch steel casing (bore & jack), 1775 LF of gravel trench/driveway restoration, 800 LF of asphalt trench/driveway restoration, 350 LF of concrete trench/driveway restoration, 800 LF of full width asphalt overlay, 3375 LF of restoration of disturbed areas, power to lift station, tie into existing forcemain, and necessary appurtenances. The estimated construction cost is $2,275,000 (includes 15.04% construction contingency), and the estimated total project cost is $3,000,000.

Need: The PER indicates that the City of Mannington conducted I&I/flow monitoring in 2024, and recently inspected sewer mains and manholes along Buffalo Creek with a CCTV. The CCTV inspection revealed "…that a significant source of I&I is entering the system through manholes along the main interceptor located along Buffalo Creek." The City also identified approximately 40 unserved potential sewer customers along Flaggy Meadow Drive and Sunshine Road, who currently utilize private on-site septic systems for sewer treatment.

Customer Density: Based upon the provided sewer pipe quantities (7,250 LF), the proposed sewer line extends approximately 1.37 mile to serve 40 potential customers. This is approximately equivalent to 29 customers per mile.

Cost per Customer: Based upon the estimated total project cost is $3,000,000, and having approximately 933 (893 existing + 40 potential) customers, the cost per customer will be approximately $3,216. However, the cost per customer in terms of proposed borrowing is $1,608, as the proposed funding is 50% grant.

3. Project Alternatives: The PER indicates that 3 Alternatives were considered: Alternative #1 – Sewer Replacement and Extension, Alternative #2 – Manhole Rehabilitation and Extension, and Alternative #3 – Do Nothing. The PER indicates that Alternative #2 was selected as the "…CCTV review indicated that the mainline pipe is generally in good condition and much of the I&I is entering through existing manholes along the interceptor.", the selected alternative is more economical with similar I&I reductions anticipated,

4. Consolidation: There are no consolidation opportunities presented by this project.

5. Operation and Maintenance (O&M) Expenses: The PER did include a detailed breakdown of anticipated changes to O&M expenses. The PER indicates that O&M expenses are anticipated to increase $5,928 annually. The increase is related to additional treatment expenses, sludge removal expenses, chemicals, materials and supplies, contract services, and purchased power.

6. Engineering Agreement: The application includes information to determine compliance with West Virginia Code §5G-1-1, *et seq*. Total technical services (engineering) costs for the project are $467,500, which is equal to 20.55% of the construction cost of $2,275,000 (includes 15.04% construction contingency).

7. Deficiencies/Comments:
   - The PER did not include evidence (letters, requests for service, user sign ups, etc.) of project support from the potential sewer customers.

CITY OF MANNINGTON - SEWER
CASH FLOW ANALYSIS
YEAR ENDED: June 30, 2025
APPLICATION NO. 2026S-2790
June 30, 2026

PREFERED FUNDING PACKAGE
SCENARIO 1

		Rule 42 Going Level Per Application Before Project	Rule 42 Proforma Per Application with Project	Staff Adjustments		Per Staff Analysis
		1	2	3		4
		$	$	$		$
AVAILABLE CASH						
Operating Revenues		478,644	519,611	-		519,611
Other Operating Revenue		12,143	13,116	-		13,116
SB 234 Annual Working Cash Collections		38,287	39,287	-		39,287
Interest Income & Other Misc.		-	-	9,494	(1)	9,494
Total Cash Available		529,074	572,014	9,494		581,508
OPERATING DEDUCTIONS						
Operating Expenses		306,296	314,293	(89)	(2)	314,204
Taxes		5,054	5,054	-		5,054
Total Cash Requirements Before Debt Service		311,350	319,347	(89)		319,258
Cash Available for Debt Service	(A)	217,724	252,667	9,583		262,250
DEBT SERVICE REQUIREMENTS						
Principal & Interest	(B)	188,376	157,229	751	(3)	157,980
Other Debt				-		-
Reserve Account @ 10%		5,947	15,723	75	(4)	15,798
Renewal & Replacement Fund (2.5%)		13,223	35,000	(21,682)	(5)	13,318
Total Debt Service Requirement		207,546	207,952	(20,857)		187,096
SB 234 Cash Working Capital		38,287	39,287	-		39,287
Remaining Cash		(28,109)	5,428	30,440		35,868
Percent Coverage	(A) / (B)	115.58%	160.70%			166.00%
Average rate for 3,400 gallons		$ 43.19	$ 45.57	$ -		$ 45.57
Average rate for 4,000 gallons		$ 50.08	$ 52.84	$ -		$ 52.84

CITY OF MANNINGTON - SEWER
CASH FLOW ANALYSIS
YEAR ENDED: June 30, 2025
APPLICATION NO. 2026S-2790

Attachment A
PREFERED FUNDING PACKAGE
SCENARIO 1

Staff Adjustments

	Adjustment Description		$	Increase <Decrease>
(1)	**Interest Income & Other Miscell.**	**Per Staff Analysis**	**9,494**	**9,494**
		Per Application with Project	**-**	
(2)	**Operating Expenses**	**Per Staff Analysis**	**314,204**	**(89)**
		Per Application with Project	**314,293**	
(3)	**Principal & Interest**	**Per Staff Analysis**	**157,980**	**751**
		Per Application with Project	**157,229**	
(4)	**Reserve Account @ 10%**	**Per Staff Analysis**	**15,798**	**75**
		Per Application with Project	**15,723**	
(5)	**Renewal & Replacement Fund (2.5%)**	**Per Staff Analysis**	**13,318**	**(21,682)**
		Per Application with Project	**35,000**	

(1) i.e. Staff used information from the Annual Report for the Fiscal Year Ended June 30, 2025 for "Dividend Income". positive cash balance.

(2) Staff's calculation included a difference in an Administrative Fee associated with the CWSRF loans.

(3) The difference in P&I is related to Staff's calculation of a loan of $1,500,000, for 20 years at 2.75%.

(4) Staff assumed a 10% reserve on the new debt.

(5) Staff used 2.5% of the projection of "Operating & Other Revenues" as the basis of the renewal & replacement fund.

CITY OF MANNINGTON - SEWER
CASH FLOW ANALYSIS
YEAR ENDED: June 30, 2025
APPLICATION NO. 2026S-2790
June 30, 2026

LOAN PACKAGE
SCENARIO 2

		Max Rate Going Level Per Application Before Project	Max Rate Proforma Per Application with Project	Staff Adjustments		Per Staff Analysis
		1	2	3		4
		$	$	$		$
AVAILABLE CASH						
Operating Revenues		478,644	592,268	-		592,268
Other Operating Revenue		12,143	14,802	-		14,802
SB 234 Annual Working Cash Collections		38,287	39,287	-		39,287
Interest Income & Other Misc.		-	-	9,494	(1)	9,494
Total Cash Available		529,074	646,357	9,494		655,851
OPERATING DEDUCTIONS						
Operating Expenses		306,296	314,293	(2,069)	(2)	312,224
Taxes		5,054	5,054	-		5,054
Total Cash Requirements Before Debt Service		311,350	319,347	(2,069)		317,278
Cash Available for Debt Service	(A)	217,724	327,010	11,563		338,573
DEBT SERVICE REQUIREMENTS						
Principal & Interest	(B)	188,376	235,976	1,349	(3)	237,325
Other Debt				-		-
Reserve Account @ 10%		5,947	15,723	8,009	(4)	23,732
Renewal & Replacement Fund (2.5%)		13,223	35,000	(19,823)	(5)	15,177
Total Debt Service Requirement		207,546	286,699	(10,465)		276,234
SB 234 Cash Working Capital		38,287	39,287	-		39,287
Remaining Cash		(28,109)	1,024	22,028		23,053
Percent Coverage	(A) / (B)	115.58%	138.58%			142.66%
Average rate for 3,400 gallons		$ 43.19	$ 51.50	$ -		$ 51.50
Average rate for 4,000 gallons		$ 50.08	$ 59.72	$ -		$ 59.72

CITY OF MANNINGTON - SEWER
CASH FLOW ANALYSIS
YEAR ENDED: June 30, 2025
APPLICATION NO. 2026S-2790

Attachment B
LOAN PACKAGE
SCENARIO 2

Staff Adjustments

	Adjustment Description		$	Increase <Decrease>
(1)	**Interest Income & Other Miscell.**	**Per Staff Analysis**	**9,494**	**9,494**
		Per Application with Project	**-**	

i.e. Staff used information from the Annual Report for the Fiscal Year Ended June 30, 2008 for "Interest Income".
positive cash balance.

(2)	**Operating Expenses**	**Per Staff Analysis**	**312,224**	**(2,069)**
		Per Application with Project	**314,293**	

Staff's calculation includes a reduction to eliminate the Administrative Fee associated with a loan.

(3)	**Principal & Interest**	**Per Staff Analysis**	**237,325**	**1,349**
		Per Application with Project	**235,976**	

The difference in P&I is related to Staff's calculation of a loan of $3,000,000 for 40 years (paid back over 38 years) at 5%.

(4)	**Reserve Account @ 10%**	**Per Staff Analysis**	**23,732**	**8,009**
		Per Application with Project	**15,723**	

Staff assumed a 10% reserve on the new debt.

(5)	**Renewal & Replacement Fund (2.5%)**	**Per Staff Analysis**	**15,177**	**(19,823)**
		Per Application with Project	**35,000**	

Staff used 2.5% of the projection of "Operating & Other Revenues" as the basis of the renewal & replacement fund.