

**Kentucky Infrastructure Authority
Projects for
January 2020 Capital Projects Meeting**

- Fund A Loan**

<u>Loan #</u>	<u>Borrower</u>	<u>Amount Requested</u>	<u>Loan Total</u>	<u>County</u>
A20-003	Lincoln County Sanitation District (Construction)	\$ 3,018,100	\$ 3,406,500	Lincoln
A20-033	City of Sebree	\$ 910,828	\$ 910,828	Webster
A20-049	Northern Madison County Sanitation District	\$ 730,000	\$ 730,000	Madison

- Fund F Loan**

<u>Loan #</u>	<u>Borrower</u>	<u>Amount Requested</u>	<u>Loan Total</u>	<u>County</u>
F20-013	Estill County Water District	\$ 2,399,450	\$ 2,399,450	Estill
F20-019	City of Somerset	\$ 7,027,878	\$ 7,027,878	Pulaski

EXECUTIVE SUMMARY		Reviewer	Ashley Adams	
KENTUCKY INFRASTRUCTURE AUTHORITY		Date	December 5, 2019	
FUND A, FEDERALLY ASSISTED WASTEWATER		KIA Loan Number	A20-003	
REVOLVING LOAN FUND		WRIS Number	SX21137023	
BORROWER	LINCOLN COUNTY SANITATION DISTRICT LINCOLN COUNTY			
BRIEF DESCRIPTION This project is the second phase of a project to bring sanitary sewer to a section of Lincoln County that has seen rapid growth in residential development over the recent past and is currently unserved by sanitary sewer. This phase will bring service to virtually all the subdivisions on the east side of US 127 from Hustonville on the south to Junction City on the north which includes about 363 homes. Planning and design for this project was funded by previous KIA loan A19-048 which will be rolled into the new construction loan.				
PROJECT FINANCING		PROJECT BUDGET		
Fund A Loan	\$3,018,100	RD Fee %	Actual %	
KIA P&D Loan A19-048	388,400	Administrative Expenses		\$80,000
CDBG	1,000,000	Legal Expenses		45,000
ARC	500,000	Land, Easements		75,000
Local Funds	50,000	Planning		20,000
		Eng - Design / Const	6.9%	6.4%
		Eng - Insp	3.6%	3.4%
		Construction		3,750,000
		Contingency		562,500
TOTAL	\$4,956,500	TOTAL		\$4,956,500
REPAYMENT	Rate	0.50%	Est. Annual Payment	\$91,296
	Term	30 Years	1st Payment	6 Mo. after first draw
PROFESSIONAL SERVICES	Engineer	AGE Engineering Services		
	Bond Counsel	Rubin & Hayes		
PROJECT SCHEDULE	Bid Opening	Jan-20		
	Construction Start	Apr-20		
	Construction Stop	Feb-21		
DEBT PER CUSTOMER	Existing	\$5,420		
	Proposed	\$6,736		
OTHER DEBT	See Attached			
OTHER STATE-FUNDED PROJECTS LAST 5 YRS	See Attached			
RESIDENTIAL RATES		<u>Users</u>	<u>Avg. Bill</u>	
	Current	585	\$54.12	(for 4,000 gallons)
	Additional	363	\$54.12	(for 4,000 gallons)
REGIONAL COORDINATION	This project is consistent with regional planning recommendations.			
CASHFLOW	Cash Flow Before Debt Service	Debt Service	Cash Flow After Debt Service	Coverage Ratio
Audited 2017	(17,559)	0	(17,559)	n/a
Audited 2018	35,471	84,485	(49,014)	0.4
Audited 2019	204,937	128,401	76,536	1.6
Projected 2020	183,331	122,645	60,686	1.5
Projected 2021	184,698	122,341	62,357	1.5
Projected 2022	304,155	214,026	90,129	1.4
Projected 2023	301,708	213,913	87,795	1.4
Projected 2024	299,213	213,800	85,413	1.4

Reviewer: Ashley Adams
Date: December 5, 2019
Loan Number: A20-003

**KENTUCKY INFRASTRUCTURE AUTHORITY
WASTEWATER REVOLVING LOAN FUND (FUND A)
LINCOLN COUNTY SANITATION DISTRICT
PROJECT REVIEW
SX21137023**

I. PROJECT DESCRIPTION

The Lincoln County Sanitation District is requesting a Fund A loan in the amount of \$3,018,100 for the construction of the US 127 Corridor Sanitary Sewer project. Prior KIA planning and design loan A19-048 will be rolled into this loan for a total of \$3,406,500. This project is the second phase of a project to bring sanitary sewer to a section of Lincoln County that has seen rapid residential growth over the past few years but remains unserved by sanitary sewer. This second phase will complete service to virtually all subdivisions on the east and west side of US 127 from the Norfolk Southern Railroad, north to KY Hwy 1194 which includes approximately 363 homes both older and recently built.

Lincoln County Sanitation District currently serves approximately 412 customers with more expected to connect in the Phase 1 service area in the future along with the additional 363 Phase 2 customers. The District was established on May 10, 2011 by the Lincoln County Fiscal Court. It is governed by five directors who are appointed by the County Judge Executive and approved by the fiscal court. Connection to the public wastewater system is mandatory within four months of the date that a property owner is notified that service is available. The District has received national recognition from US EPA for their accomplishments with Phase 1 of this project including an Honorable Mention for the 2018 PISCES award.

II. PROJECT BUDGET

	Total
Administrative Expenses	\$ 80,000
Legal Expenses	45,000
Land, Easements	75,000
Planning	20,000
Engineering Fees - Design	248,400
Engineering Fees - Construction	27,600
Engineering Fees - Inspection	148,000
Construction	3,750,000
Contingency	562,500
Total	\$ 4,956,500

III. PROJECT FUNDING

	<u>Amount</u>	<u>%</u>
Fund A Loan	\$ 3,018,100	61%
KIA P&D Loan A19-048	388,400	8%
CDBG	1,000,000	20%
ARC	500,000	10%
Local Funds	50,000	1%
Total	\$ 4,956,500	100%

IV. KIA DEBT SERVICE

Construction Loan + P&D Loan A19-048	\$ 3,406,500
Less: Principal Forgiveness	1,000,000
Amortized Loan Amount	\$ 2,406,500
Interest Rate	0.50%
Loan Term (Years)	30
Estimated Annual Debt Service	\$ 86,483
Administrative Fee (0.20%)	4,813
Total Estimated Annual Debt Service	\$ 91,296

V. PROJECT SCHEDULE

Bid Opening	January 2020
Construction Start	April 2020
Construction Stop	February 2021

VI. CUSTOMER COMPOSITION AND RATE STRUCTURE

A) Customers

	<u>Current</u>	<u>Proposed</u>	<u>Total</u>
Residential	535	355	890
Commercial	50	8	58
Industrial			
Total	585	363	948

B) Rates

	<u>Current</u>	<u>Prior</u>
Date of Last Rate Increase	09/01/19	06/14/14
Minimum	\$ 27.68	\$ 25.00
Per 1,000 Gallons	6.61	6.50
Cost for 4,000 gallons	\$ 54.12	\$ 51.00
Increase %	6.1%	
Affordability Index (Rate/MHI)	1.7%	

VII. DEMOGRAPHICS

Based on current Census data from the American Community Survey 5-Year Estimate 2013-2017, the Utility’s service area population was 1,726 with a Median Household Income (MHI) of \$43,298 according to American Community Survey data. However, the District conducted a door-to-door income survey and demonstrated that the project area MHI was below the threshold of 80% of Kentucky’s MHI (\$37,228). The median household income for the Commonwealth is \$46,535. As a result of the income survey, the project will qualify for a 0.5% interest rate and a 30 year loan term.

Year	Population		County Unemployment Rate
	County	% Change	
1980	19,053		6.6%
1990	20,045	5.2%	12.3%
2000	23,361	16.5%	6.6%
2010	24,742	5.9%	5.6%
Current	24,413	-1.3%	
Cumulative %		28.1%	

VIII. 2019 CAPITALIZATION GRANT EQUIVALENCIES

- 1) Green Project Reserve - This project does not qualify for Green Project Reserve (GPR) funding.
- 2) Additional Subsidization – This project qualifies for additional subsidization. Principal forgiveness of 50% of the assistance amount, not to exceed \$1,000,000 will be credited to the loan balance upon release of liens on all contracts and disbursement of the final draw request by KIA to the borrower.

IX. FINANCIAL ANALYSIS

Financial information was obtained from the audited financial statements for the years ended June 30, 2017 through June 30, 2019. Percentage references in the History section below are based on whole dollar amounts and not the rounded amounts presented.

HISTORY

Revenues for the first full year of operations totaled \$326,000. Prior analysis estimated revenues in the neighborhood of \$308,000 as a conservative estimate. Billing began for all customers, regardless of whether they were connected, as of FY 2019. Treatment expense to the City of Danville totaled \$38,000 which was lower than anticipated. Other operating expenses for the District totaled \$83,000 leaving approximately \$205,000 in cash available for debt service.

The balance sheet reflects a current ratio of 1.0, debt to equity ratio of 0.7, 94.1 days sales in accounts receivable, and 1.6 months operating expenses in unrestricted cash. Accounts receivable for FY 2019 reflects several months of A/R at year-end as a new billing contract was being negotiated at the time therefore skewing the days sales in accounts receivable calculation.

PROJECTIONS

Projections are based on the following assumptions:

- 1) Revenues will increase 6% for an already approved rate increase. Revenues were projected flat in the forecast thereafter to remain conservative and demonstrate the District's capacity to tolerate inflation and other expense fluctuations. However, each year the District will evaluate rates and adjust for inflation based on their ordinance effective June 30, 2019.
- 2) Expenses will increase 2% annually for inflation. During FY2020 and beyond expenses will increase for additional contract billing services which are subject to change annually.
- 3) Accounts receivable will normalize in 2020 based on current performance observations and a new billing contract.
- 4) Phase two revenues and expenses are anticipated in FY 2022 including approximately \$188,597 in additional revenues and around \$42,000 in added expenses excluding debt service.
- 5) Debt service coverage is 1.4 in 2022 when principal and interest repayments begin.

Based on the pro forma assumptions, the utility shows adequate cash flow to repay the KIA Fund A loan.

REPLACEMENT RESERVE

The replacement reserve will be 5% (\$170,000 total) of the final amount borrowed (prior to principal forgiveness, if any) to be funded annually (\$8,500 yearly) each December 1 for 20 years and maintained for the life of the loan.

X. DEBT OBLIGATIONS

	<u>Outstanding</u>	<u>Maturity</u>
Revenue Bonds Series 2016	\$ 338,000	2055
KIA Loan (A13-020)	2,832,787	2047
KIA P&D Loan (A19-048 i/a/o \$388,400)		TBD
Total	\$ 3,170,787	

XI. CONTACTS

Legal Applicant	
Entity Name	Lincoln County Sanitation District
Authorized Official	Bill Payne (Chairman)
County	Lincoln
Email	brpayne77@att.net
Phone	859-583-9626
Address	102 E Main Stanford, KY 40484

Applicant Contact	
Name	Jim Adams
Organization	Lincoln County Fiscal Court
Email	jadams@lincolnky.com
Phone	606-365-2534
Address	102 E Main Stanford, KY 40484

Project Administrator	
Name	Karyn Leverenz
Organization	Bluegrass ADD
Email	kleverenz@bgadd.org
Phone	859-369-8021
Address	699 Perimeter Dr. Lexington, KY 40517

Consulting Engineer	
PE Name	Luther Galloway
Firm Name	AGE Engineering Services
Email	lgalloway@ageengineering.com
Phone	606-365-8362
Address	165 Foster Lane Stanford, KY 40484

XII. RECOMMENDATIONS

KIA staff recommends approval of the loan with the standard conditions.

**LINCOLN COUNTY SANITATION DISTRICT
FINANCIAL SUMMARY (JUNE YEAR END)**

	<u>Audited 2017</u>	<u>Audited 2018</u>	<u>Audited 2019</u>	<u>Projected 2020</u>	<u>Projected 2021</u>	<u>Projected 2022</u>	<u>Projected 2023</u>	<u>Projected 2024</u>
Balance Sheet								
Assets								
Current Assets	477,669	82,463	102,707	67,110	79,913	117,938	135,497	152,580
Other Assets	7,672,096	7,559,497	7,410,238	9,727,691	12,046,480	11,796,224	11,544,102	11,290,073
Total	8,149,765	7,641,960	7,512,945	9,794,801	12,126,393	11,914,163	11,679,599	11,442,654
Liabilities & Equity								
Current Liabilities	324,588	100,561	101,599	102,177	103,454	195,533	196,321	197,121
Long Term Liabilities	3,240,623	3,170,786	3,075,083	4,682,156	6,288,052	6,098,719	5,908,698	5,717,977
Total Liabilities	3,565,211	3,271,347	3,176,682	4,784,333	6,391,506	6,294,252	6,105,019	5,915,098
Net Assets	4,584,554	4,370,613	4,336,263	5,010,468	5,734,887	5,619,911	5,574,580	5,527,556
Cash Flow								
Revenues	0	113,716	326,087	342,391	345,815	534,412	534,412	534,412
Operating Expenses	17,559	78,245	121,150	159,060	161,117	230,258	232,704	235,199
Other Income	0	0	0	0	0	0	0	0
Cash Flow Before Debt Service	(17,559)	35,471	204,937	183,331	184,698	304,155	301,708	299,213
Debt Service								
Existing Debt Service	0	84,485	128,401	122,645	122,341	122,730	122,617	122,504
Proposed KIA Loan	0	0	0	0	0	91,296	91,296	91,296
Total Debt Service	0	84,485	128,401	122,645	122,341	214,026	213,913	213,800
Cash Flow After Debt Service	(17,559)	(49,014)	76,536	60,686	62,357	90,129	87,795	85,413
Ratios								
Current Ratio		0.8	1.0	0.7	0.8	0.6	0.7	0.8
Debt to Equity		0.7	0.7	1.0	1.1	1.1	1.1	1.1
Days Sales in Accounts Receivable		99.5	94.1	38.8	38.7	38.7	38.7	38.7
Months Operating Expenses in Unrestricted Cash		7.3	1.6	2.4	3.4	3.5	4.5	5.4
Debt Coverage Ratio		N/A	1.6	1.5	1.5	1.4	1.4	1.4

EXECUTIVE SUMMARY KENTUCKY INFRASTRUCTURE AUTHORITY FUND A, FEDERALLY ASSISTED WASTEWATER REVOLVING LOAN FUND		Reviewer Date KIA Loan Number WRIS Number	Michael Dant November 7, 2019 A20-033 SX21233027	
BORROWER	CITY OF SEBREE WEBSTER COUNTY			
BRIEF DESCRIPTION				
This project entails: replacing approximately 8,900 linear feet of existing 8-inch clay pipe, extending an 8 inch gravity sewer 101 linear feet to add five new customers, lowering a main that is currently exposed in a creek, and replacement of a retaining wall that protects a 12 inch main.				
PROJECT FINANCING		PROJECT BUDGET		
Fund A Loan	\$910,828	Administrative Expenses	\$50,000	
CDBG Grant	910,827	Legal Expenses	5,000	
	-	Land, Easements	5,000	
		Planning	81,425	
		Eng - Design / Const	47,215	
		Eng - Insp	72,315	
		Eng - Other	37,300	
		Construction	1,523,400	
TOTAL	<u>\$1,821,655</u>	TOTAL	<u>\$1,821,655</u>	
REPAYMENT	Rate Term	0.50% 30 Years	Est. Annual Payment 1st Payment 6 Mo. after first draw	
			\$34,554	
PROFESSIONAL SERVICES	Engineer Bond Counsel	Strand Associates, Inc. Rubin & Hays		
PROJECT SCHEDULE	Bid Opening Construction Start Construction Stop	Jun-20 Sep-20 Jan-21		
DEBT PER CUSTOMER	Existing Proposed	\$23 \$1,548		
OTHER DEBT	See Attached			
OTHER STATE-FUNDED PROJECTS LAST 5 YRS	See Attached			
RESIDENTIAL RATES	Current Additional	<u>Users</u> 587 5	<u>Avg. Bill</u> \$43.58 (for 4,000 gallons) \$43.58 (for 4,000 gallons)	
REGIONAL COORDINATION	This project is consistent with regional planning recommendations.			
CASHFLOW	Cash Flow Before Debt Service	Debt Service	Cash Flow After Debt Service	Coverage Ratio
Audited 2016	42,024	8,472	33,552	5.0
Audited 2017	19,642	8,472	11,170	2.3
Audited 2018	18,592	8,472	10,120	2.2
Projected 2019	13,138	8,474	4,664	1.6
Projected 2020	7,575	5,649	1,926	1.3
Projected 2021	54,120	17,277	36,843	3.1
Projected 2022	46,032	34,554	11,478	1.3
Projected 2023	40,129	34,554	5,575	1.2

Reviewer: Linda Bridwell
Date: November 7, 2019
Loan Number: A20-033

**KENTUCKY INFRASTRUCTURE AUTHORITY
WASTEWATER REVOLVING LOAN FUND (FUND A)
CITY OF SEBREE, WEBSTER COUNTY
PROJECT REVIEW
SX21233027**

I. PROJECT DESCRIPTION

The City of Sebree (the “City”) is requesting a Fund A loan in the amount of \$910,828 for the Sebree Sanitary Sewer Replacement project. This project will include replacing approximately 8,900 linear feet of existing 8-inch clay pipe, extending an 8 inch gravity sewer 101 linear feet to add five new customers, lowering a main that is currently exposed in a creek, and replacement of a retaining wall that protects a 12 inch main.

The City serves 592 customers sanitary service in Webster County.

II. PROJECT BUDGET

	Total
Administrative Expenses	\$ 50,000
Legal Expenses	5,000
Land, Easements	5,000
Planning	81,425
Engineering Fees - Design	20,000
Engineering Fees - Construction	27,215
Engineering Fees - Inspection	72,315
Engineering Fees - Other	37,300
Construction	1,523,400
Total	\$ 1,821,655

III. PROJECT FUNDING

	Amount	%
Fund A Loan	\$ 910,828	50%
CDBG Grant	910,827	50%
Total	\$ 1,821,655	100%

IV. KIA DEBT SERVICE

Construction Loan	\$	910,828
Less: Principal Forgiveness		0
Amortized Loan Amount	\$	910,828
Interest Rate		0.50%
Loan Term (Years)		30
Estimated Annual Debt Service	\$	32,733
Administrative Fee (0.20%)		1,822
Total Estimated Annual Debt Service	\$	34,554

V. PROJECT SCHEDULE

Estimated Bid Opening Date	June, 2020
Estimated Construction Start	September, 2020
Estimated Construction Completion	January, 2021

VI. CUSTOMER COMPOSITION AND RATE STRUCTURE

A) Customers

Customers	Current	Proposed	Total
Residential	505	5	510
Commercial	82	0	82
Industrial	0	0	0
Total	587	5	592

B) Rates

	Inside City		Outside City	
	Proposed	Current	Proposed	Current
Date of Last Rate Increase	05/05/20	05/04/15	05/05/20	05/04/15
Minimum (2,000 gallons)	\$25.78	\$21.85	\$25.78	\$21.85
Over 2,000	8.90	7.54	8.90	7.54
Surcharge			20.00	20.00
Cost for 4,000 gallons	\$43.58	\$36.93	\$63.58	\$56.93
Increase %	18.0%		11.7%	
Affordability Index (Rate/MHI)	1.6%		2.3%	

VII. DEMOGRAPHICS

Based on current Census data from the American Community Survey 5-Year Estimate 2013-2017, the Utility's service area population was 1,471 with a Median Household Income (MHI) of \$33,171. The median household income for the Commonwealth is \$46,535. Based on the MHI of the service area of the utility, the project will qualify for a 30 year loan at a non-standard 0.50% interest rate.

Year	Population		County		County Unemployment	
	City	% Change	County	% Change	Date	Rate
1980	1,516		14,832		June 2005	5.5%
1990	1,510	-0.4%	13,955	-5.9%	June 2010	9.6%
2000	1,558	3.2%	14,120	1.2%	June 2015	5.4%
2010	1,603	2.9%	13,621	-3.5%	June 2019	4.6%
Current	1,501	-6.4%	13,180	-3.2%		
Cumulative %		-1.0%		-11.1%		

VIII. 2019 CAPITALIZATION GRANT EQUIVALENCIES

- 1) Green Project Reserve - This project does not qualify for Green Project Reserve (GPR) funding.
- 2) Additional Subsidization – This project does not qualify for additional subsidization.

IX. FINANCIAL ANALYSIS

Financial information was obtained from the audited financial statements for the years ended June 30, 2016 through June 30, 2018 for the sewer fund. The non-cash impact of GASB 68, Accounting and Financial Reporting for Pensions, has been removed from fiscal 2016-2018 operating expenses and GASB 75, Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions, has been removed from 2018 operating expenses. Percentage references in the History section below are based on whole dollar amounts and not the rounded amounts presented.

HISTORY

The City has experienced nearly flat revenues between 2016 and 2018, while experiencing an increase in operating expenses of \$24,591 or 9.9%. This has resulted in an overall reduction in cash available for debt service over the same period. The debt coverage ratio was 5.0 in 2016, and dropped to a current 2.2 based on the reduction in cash.

Balance sheet current ratio ranged from 0.8 to 2.0 over this period, with a debt to equity of 0.2, and 1.7 months operating expenses in unrestricted cash.

PROJECTIONS

Projections are based on the following assumptions:

- 1) Revenues for volume and growth will remain flat until 2021, and will grow with a projected 18% rate increase.
- 2) Expenses are projected to increase 2% annually for inflation.
- 3) Debt service coverage is 1.2 in 2022 when principal and interest repayments begin in full.

Based on the pro forma assumptions, the utility shows adequate cash flow to repay the KIA Fund A loan.

REPLACEMENT RESERVE

The replacement reserve will be 5% (\$46,000 total) of the final amount borrowed to be funded annually (\$2,300 yearly) each December 1 for 20 years and maintained for the life of the loan.

X. DEBT OBLIGATIONS

	Outstanding	Maturity (Fiscal Year)
Sewer Note Payable 3/4/2015	\$ 13,785	2020

XI. CONTACTS

Legal Applicant	
Entity Name	City of Sebree
Authorized Official	Oscar O'Nan (Mayor)
County	Webster
Email	cityofsebree@gmail.com
Phone	270-835-7501
Address	36 S Spring St. PO Box 245 Sebree, KY 42455

Applicant Contact	
Name	Emery Thomas
Organization	City of Sebree
Email	emerymary@bellsouth.net
Phone	270-835-7501
Address	36 S. Spring Street Sebree, KY 42455-245

Project Administrator

Name	Skyler Stewart
Organization	Green River Area Development District
Email	skylerstewart@gradd.com
Phone	270-926-4433
Address	300 Gradd Way Owensboro, KY 42301

Consulting Engineer

PE Name	Mark Christopher Askin
Firm Name	Strand Associates, Inc.
Email	mark.askin@strand.com
Phone	502-583-7020
Address	325 W. Main St., Ste. 710 Louisville, KY 40202

XII. RECOMMENDATIONS

KIA staff recommends approval of the loan with the standard conditions and the following special conditions:

- 1) The City of Sebree shall pass a sewer rate ordinance, no later than December 31, 2019, to increase sewer revenues by a projected 18% overall, effective no later than July 1, 2020.

CITY OF SEBREE
FINANCIAL SUMMARY (JUNE YEAR END)

	<u>Audited</u> <u>2016</u>	<u>Audited</u> <u>2017</u>	<u>Audited</u> <u>2018</u>	<u>Projected</u> <u>2019</u>	<u>Projected</u> <u>2020</u>	<u>Projected</u> <u>2021</u>	<u>Projected</u> <u>2022</u>	<u>Projected</u> <u>2023</u>
Balance Sheet								
Assets								
Current Assets	27,514	41,105	70,315	74,981	76,907	119,550	131,028	136,603
Other Assets	1,121,547	1,031,090	942,087	822,735	2,549,413	2,408,895	2,268,377	2,127,859
Total	<u>1,149,061</u>	<u>1,072,195</u>	<u>1,012,402</u>	<u>897,716</u>	<u>2,626,320</u>	<u>2,528,445</u>	<u>2,399,405</u>	<u>2,264,462</u>
Liabilities & Equity								
Current Liabilities	34,054	36,611	34,389	26,498	26,798	27,098	27,398	27,698
Long Term Liabilities	79,643	84,479	121,317	5,591	916,419	916,419	916,419	916,419
Total Liabilities	<u>113,697</u>	<u>121,090</u>	<u>155,706</u>	<u>32,089</u>	<u>943,217</u>	<u>943,517</u>	<u>943,817</u>	<u>944,117</u>
Net Assets	<u>1,035,364</u>	<u>951,105</u>	<u>856,696</u>	<u>865,627</u>	<u>1,683,103</u>	<u>1,584,928</u>	<u>1,455,588</u>	<u>1,320,345</u>
Cash Flow								
Revenues	290,125	289,058	291,284	291,284	291,284	343,503	343,503	343,503
Operating Expenses	248,101	269,416	272,692	278,146	283,709	289,383	297,471	303,374
Other Income	0	0	0	0	0	0	0	0
Cash Flow Before Debt Service	<u>42,024</u>	<u>19,642</u>	<u>18,592</u>	<u>13,138</u>	<u>7,575</u>	<u>54,120</u>	<u>46,032</u>	<u>40,129</u>
Debt Service								
Existing Debt Service	8,472	8,472	8,472	8,474	5,649	0	0	0
Proposed KIA Loan	0	0	0	0	0	17,277	34,554	34,554
Total Debt Service	<u>8,472</u>	<u>8,472</u>	<u>8,472</u>	<u>8,474</u>	<u>5,649</u>	<u>17,277</u>	<u>34,554</u>	<u>34,554</u>
Cash Flow After Debt Service	<u>33,552</u>	<u>11,170</u>	<u>10,120</u>	<u>4,664</u>	<u>1,926</u>	<u>36,843</u>	<u>11,478</u>	<u>5,575</u>
Ratios								
Current Ratio	0.8	1.1	2.0	2.8	2.9	4.4	4.8	4.9
Debt to Equity	0.1	0.1	0.2	0.0	0.6	0.6	0.6	0.7
Days Sales in Accounts Receivable	10.8	2.8	40.6	40.6	40.6	40.6	40.6	40.6
Months Operating Expenses in Unrestricted Cash	0.9	1.7	1.7	1.8	1.9	3.4	3.8	3.9
Debt Coverage Ratio	5.0	2.3	2.2	1.6	1.3	3.1	1.3	1.2

EXECUTIVE SUMMARY		Reviewer	Meili Sun	
KENTUCKY INFRASTRUCTURE AUTHORITY		Date	December 5, 2019	
FUND A, FEDERALLY ASSISTED WASTEWATER		KIA Loan Number	A20-049	
REVOLVING LOAN FUND		WRIS Number	SX21151022	
BORROWER	NORTHERN MADISON COUNTY SANITATION DISTRICT MADISON COUNTY			
BRIEF DESCRIPTION				
This project proposes to install approximately 7,701 LF of gravity sewers, thirty-five manholes, two submersible pump stations, and approximately 4,700 LF of 4" diameter force main to collect and transport wastewater from seventy residential customers and one commercial establishment to the existing Northern Madison County Sanitation District system. The flow will ultimately be treated at the District's regional wastewater treatment plant.				
PROJECT FINANCING		PROJECT BUDGET		
Fund A Loan	\$730,000	Administrative Expenses	RD Fee %	Actual %
Local Fund	198,000	Legal Expenses		
		Planning		
		Eng - Design / Const	9.3%	9.2%
		Eng - Insp	6.2%	6.1%
		Construction		
		Contingency		
		Other		
TOTAL	\$928,000	TOTAL		\$928,000
REPAYMENT	Rate	2.50%	Est. Annual Payment	\$48,065
	Term	20 Years	1st Payment	6 Mo. after first draw
PROFESSIONAL SERVICES	Engineer	Nesbitt Engineering, Inc		
	Bond Counsel	Rubin & Hays		
PROJECT SCHEDULE	Bid Opening	Mar-20		
	Construction Start	Apr-20		
	Construction Stop	Nov-20		
DEBT PER CUSTOMER	Existing	\$6,629		
	Proposed	\$5,481		
OTHER DEBT	See Attached			
RESIDENTIAL RATES		<u>Users</u>	<u>Avg. Bill</u>	
	Current	993	\$61.03	(for 4,000 gallons)
	Additional	71	\$61.03	(for 4,000 gallons)
REGIONAL COORDINATION	This project is consistent with regional planning recommendations.			
CASHFLOW	Cash Flow Before Debt Service	Debt Service	Cash Flow After Debt Service	Coverage Ratio
Audited 2016	557,038	519,168	37,870	1.1
Audited 2017	624,032	541,680	82,352	1.2
Audited 2018	755,995	569,042	186,953	1.3
Projected 2019	751,436	593,888	157,548	1.3
Projected 2020	746,670	603,527	143,143	1.2
Projected 2021	739,893	607,187	132,707	1.2
Projected 2022	734,700	630,831	103,869	1.2
Projected 2023	729,286	630,430	98,856	1.2

Reviewer: Meili Sun
 Date: December 5, 2019
 Loan Number: A20-049

**KENTUCKY INFRASTRUCTURE AUTHORITY
 WASTEWATER REVOLVING LOAN FUND (FUND A)
 NORTHERN MADISON COUNTY SANITATION DISTRICT, MADISON COUNTY
 PROJECT REVIEW
 SX21151022**

I. PROJECT DESCRIPTION

The Northern Madison County Sanitation District (“District”) is requesting a Fund A loan in the amount of \$730,000 for the Boone Village Wastewater Collection System project. The project proposes to install approximately 7,701 LF of gravity sewers, thirty-five manholes, two submersible pump stations, and approximately 4,700 LF of 4" diameter force main to collect and transport wastewater from 70 residential customers and 1 commercial establishment to the existing District system. The flow will ultimately be treated at the District’s regional wastewater treatment plant. The purpose of this project is to eliminate sewage overflow caused by septic tanks and improve public health.

Upon completion of this project, the District will add 71 new customers to the 1,000 existing customers in Madison County.

II. PROJECT BUDGET

	<u>Total</u>
Administrative Expenses	\$ 20,000
Legal Expenses	5,000
Planning	5,000
Engineering Fees – Design	55,000
Engineering Fees – Construction	13,000
Engineering Fees – Inspection	45,000
Construction	675,000
Contingency	67,500
Other	42,500
Total	\$ 928,000

III. PROJECT FUNDING

	<u>Amount</u>	<u>%</u>
KIA Fund A Loan	\$ 730,000	79%
Local Funds	198,000	21%
Total	\$ 928,000	100%

IV. KIA DEBT SERVICE

Construction Loan	\$ 730,000
Principal Forgiveness	0
Amortized Loan Amount	<u>\$ 730,000</u>
Interest Rate	2.50%
Loan Term (Year)	<u>20</u>
Estimated Annual Debt Service	\$ 46,605
Administrative Fee (0.20%)	<u>1,460</u>
Annual Debt Service	\$ 48,605

V. PROJECT SCHEDULE

Bid Opening	March 2020
Construction Start	April 2020
Construction Stop	November 2020

VI. CUSTOMER COMPOSITION AND RATE STRUCTURE

A) Customers

	Current	Proposed	Total
Residential	957	70	1,027
Commercial	36	1	37
Total	<u>993</u>	<u>71</u>	<u>1,064</u>

B) Rates

	Sewer	
	Current	Prior
Date of Last Rate Increase	01/01/19	01/01/18
First 280 Cubic Feet	\$41.75	\$41.75
Per 100 Cubic Feet	7.57	7.43
Cost for 5,453 gallons	<u>\$61.03</u>	<u>\$60.68</u>
Increase %	0.6%	
Affordability Index (Rate/MHI)	1.2%	1.2%

Beginning in January, 2014, all rates shall be adjusted annually to reflect the District's increase in cost for operations. This annual adjustment shall be equal to average percentage change in the Consumer Price Index for all urban consumers (U.S. City Average) published by the U.S. Department of Labor, Bureau of Labor Statistics.

VII. DEMOGRAPHICS

Based on current Census data from the American Community Survey 5-Year Estimate 2013-2017, the Utility's service area population was 4,958 with a Median Household Income (MHI) of \$61,653. The median household income for the Commonwealth is \$46,535. A 20 year loan term at 2.50% interest rate will be applied to this loan as the project's MHI does not qualify for the non-standard rate.

Year	Population		County Unemployment	
	County	% Change	Date	Rate
1980	53,352		June 2005	5.6%
1990	57,508	7.8%	June 2010	8.6%
2000	70,872	23.2%	June 2015	4.9%
2010	82,916	17.0%	June 2019	4.7%
Current	88,376	6.6%		
Cumulative %		65.6%		

VIII. 2019 CAPITALIZATION GRANT EQUIVALENCIES

Additional Subsidization – This project does not qualify for additional subsidization.

IX. FINANCIAL ANALYSIS

Financial information was obtained from the audited financial statements for the years ended June 30, 2016 through June 30, 2018. The non-cash element of GASB 68, Accounting and Financial Reporting for Pensions and GASB 75, Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions is not applicable as the District does not participate in the County Employees Retirement System (CERS). Percentage references in the History section below are based on whole dollar amounts and not the rounded amounts presented.

HISTORY

Total sewer revenues went up 5.3% from \$1.32 million in 2016 to \$1.39 million in 2018 due to population growth and annual CPI rate adjustments. Operating expenses decreased 16.6% as a result of high utilities cost and non-recurring repair, maintenance, and equipment expenses reported in 2016. Prior to 2017, the District paid the Richmond Utilities \$150,000 annually to treat sewage from the Greens Crossing. The utilities cost had been cut in half after the District's Muddy Creek Wastewater Treatment Plant assumed the treatment services since 2017. The debt coverage ratio was 1.1, 1.2, and 1.3 for 2016, 2017, and 2018 respectively.

The balance sheet reflected a current ratio of 1.0, debt to equity ratio of 0.5, 75.2 days sales in accounts receivable, and 4.4 months of operating expenses in unrestricted cash.

PROJECTIONS

Projections are based on the following assumptions:

- 1) Sewer revenue will increase based on the Consumer Price Index.
- 2) When the project is completed in FY 2021, the District will add 71 new customers to the sewer services.
- 3) Expenses will go up 2% each year for inflation.
- 4) Debt service coverage is 1.2 in 2021 when principal and interest repayments begin.

Based on the pro forma assumptions, the utility shows adequate cash flow to repay the KIA Fund A loan.

REPLACEMENT RESERVE

The replacement reserve will be 5% (\$36,000 total) of the final amount borrowed to be funded annually (\$1,800 yearly) each December 1 for 20 years and maintained for the life of the loan.

X. DEBT OBLIGATIONS

	Outstanding	Maturity
KIA Loan A06-03	\$ 161,649	2028
KIA Loan A06-05	5,055,356	2030
KIA Loan A209-15 (ARRA)	158,051	2030
KIA Loan C15-001	\$ 1,177,887	2037
City of Richmond Loan	30,000	2020
Total	\$ 6,582,943	

XI. CONTACTS

Legal Applicant	
Name	Northern Madison County Sanitation District
Address	201 Aqueduct Dr, Suite B-9, PO Box 674 Richmond, KY 40475
County	Madison
Authorized Official	James D Rowe, Chairman
Phone	(859) 623-0736
Email	jrowe@roadrunner.com

Project Contact - Applicant	
Name	Elliott Turner
Organization	Northern Madison County Sanitation District
Address	201 Aqueduct Dr, Suite B-9, PO Box 674 Richmond, KY 40475
Phone	(859) 626-0431
Email	nmcscdelliott@bellsouth.net

Project Administrator	
Name	Patrick Kirby
Organization	Ceda, Inc
Address	PO Box 855 Richmond, KY 40476
Phone	(859) 624-3396
Email	patrick@cedainc.net

Consulting Engineer	
Name	Paul D Nesbitt
Firm	Nesbitt Engineering, Inc
Address	227 North Upper Street Lexington, KY 40507
Phone	(859) 233-3111
Email	pnesbitt@nei-ky.com

XII. RECOMMENDATIONS

KIA staff recommends approval of the loan with the standard conditions.

**NORTHERN MADISON COUNTY SANITATION DISTRICT
FINANCIAL SUMMARY (JUNE YEAR END)**

	<u>Audited</u> <u>2016</u>	<u>Audited</u> <u>2017</u>	<u>Audited</u> <u>2018</u>	<u>Projected</u> <u>2019</u>	<u>Projected</u> <u>2020</u>	<u>Projected</u> <u>2021</u>	<u>Projected</u> <u>2022</u>	<u>Projected</u> <u>2023</u>
Balance Sheet								
Assets								
Current Assets	431,646	395,759	522,900	556,111	586,439	614,681	637,154	658,626
Other Assets	19,315,861	18,878,443	18,694,000	18,244,174	17,782,825	18,219,726	17,705,557	17,187,378
Total	19,747,507	19,274,202	19,216,900	18,800,285	18,369,264	18,834,407	18,342,712	17,846,004
Liabilities & Equity								
Current Liabilities	496,393	546,386	537,189	569,437	592,879	599,910	607,033	613,578
Long Term Liabilities	6,819,879	6,327,906	6,124,543	5,627,784	5,108,683	5,313,651	4,782,596	4,246,096
Total Liabilities	7,316,272	6,874,292	6,661,732	6,197,221	5,701,562	5,913,561	5,389,629	4,859,674
Net Assets	12,431,235	12,399,910	12,555,168	12,603,064	12,667,702	12,920,846	12,953,083	12,986,330
Cash Flow								
Revenues	1,322,929	1,341,794	1,394,211	1,402,443	1,410,724	1,419,055	1,427,436	1,435,867
Operating Expenses	767,197	719,043	639,540	652,331	665,378	680,486	694,060	707,905
Other Income	1,306	1,281	1,324	1,324	1,324	1,324	1,324	1,324
Cash Flow Before Debt Service	557,038	624,032	755,995	751,436	746,670	739,893	734,700	729,286
Debt Service								
Existing Debt Service	519,168	541,680	569,042	593,888	603,527	583,154	582,766	582,365
Proposed KIA Loan	0	0	0	0	0	24,033	48,065	48,065
Total Debt Service	519,168	541,680	569,042	593,888	603,527	607,187	630,831	630,430
Cash Flow After Debt Service	37,870	82,352	186,953	157,548	143,143	132,707	103,869	98,856
Ratios								
Current Ratio	0.9	0.7	1.0	1.0	1.0	1.0	1.0	1.1
Debt to Equity	0.6	0.6	0.5	0.5	0.5	0.5	0.4	0.4
Days Sales in Accounts Receivable	86.9	70.9	75.2	75.2	75.2	75.2	75.2	75.2
Months Operating Expenses in Unrestricted Cash	1.4	2.2	4.4	4.9	5.3	5.7	5.9	6.2
Debt Coverage Ratio	1.1	1.2	1.3	1.3	1.2	1.2	1.2	1.2

EXECUTIVE SUMMARY		Reviewer	Meili Sun	
KENTUCKY INFRASTRUCTURE AUTHORITY		Date	December 5, 2019	
FUND F, FEDERALLY ASSISTED DRINKING WATER		KIA Loan Number	F20-013	
REVOLVING LOAN FUND		WRIS Number	WX21065009	
BORROWER	ESTILL COUNTY WATER DISTRICT #1 ESTILL COUNTY			
BRIEF DESCRIPTION				
This project will implement improvements designed to help reduce unaccounted for water in the system. It will install flow metering and backflow prevention devices, develop a hydraulic model, and relocate or replace 6 substandard existing river crossings.				
The scope of work also includes purchase and installation of new residential meters throughout the service area. The Estill County Water District currently serves approximately 3,800 residential and commercial customers in Estill County.				
PROJECT FINANCING		PROJECT BUDGET		
Fund F Loan	\$2,399,450	RD Fee %	Actual %	
ARC Grant	500,000			
				Administrative Expenses \$65,000
				Legal Expenses 25,000
				Land, Easements 10,000
		Eng - Design / Const 7.4%	5.9%	148,500
		Eng - Insp 4.3%	4.2%	106,000
		Eng - Other		20,000
		Construction		2,300,000
		Contingency		199,950
		Other		25,000
TOTAL	\$2,899,450	TOTAL		\$2,899,450
REPAYMENT	Rate	0.50%	Est. Annual Payment	\$53,791
	Term	30 Years	1st Payment	6 Mo. after first draw
PROFESSIONAL SERVICES	Engineer	Bell Engineering		
	Bond Counsel	Rubin & Hays		
PROJECT SCHEDULE	Bid Opening	Apr-20		
	Construction Start	May-20		
	Construction Stop	Oct-20		
DEBT PER CUSTOMER	Existing	\$1,138		
	Proposed	\$1,112		
OTHER DEBT	See Attached			
RESIDENTIAL RATES		Users	Avg. Bill	
	Current	3,815	\$46.18 (for 4,000 gallons)	
	Additional	0	\$46.18 (for 4,000 gallons)	
REGIONAL COORDINATION	This project is consistent with regional planning recommendations.			
CASHFLOW	Cash Flow Before Debt Service	Debt Service	Cash Flow After Debt Service	Coverage Ratio
Audited 2016	105,355	273,816	(168,461)	0.4
Audited 2017	95,300	253,314	(158,014)	0.4
Audited 2018	191,584	252,039	(60,455)	0.8
Projected 2019	204,619	204,819	(200)	1.0
Projected 2020	301,599	204,020	97,579	1.5
Projected 2021	278,349	233,513	44,836	1.2
Projected 2022	260,754	212,433	48,321	1.2
Projected 2023	242,807	212,433	30,374	1.1

Reviewer: Meili Sun
Date: December 5, 2019
Loan Number: F20-013

**KENTUCKY INFRASTRUCTURE AUTHORITY
DRINKING WATER STATE REVOLVING FUND (FUND F)
ESTILL COUNTY WATER DISTRICT #1, ESTILL COUNTY
PROJECT REVIEW
WX21065009**

I. PROJECT DESCRIPTION

The Estill County Water District #1 (“ECWD”) is requesting a Fund F loan in the amount of \$2,399,450 for the System Improvement and Meter Replacement project. This project will implement improvements designed to help reduce unaccounted for water in the system. It will install flow metering and backflow prevention devices, develop a hydraulic model, and relocate or replace five substandard existing creek crossings. The ECWD has taken an active approach to minimizing unaccounted for water loss through pump stations and telemetry upgrades, valve replacements, installation of test meter assemblies within the system, utilization of leak detection services, and purchase of a hydraulic model for the system. The scope of work also includes purchase and installation of new residential meters throughout the service area. On site testing indicates that the current meters are rapidly reaching the end of the useful life and inaccurate in measuring low "trickle" flows.

The ECWD is a PSC regulated system serving approximately 3,800 residential and commercial customers in Estill County. All rate changes related to retail and water purchase are subject to PSC approval.

II. PROJECT BUDGET

	<u>Total</u>
Administrative Expenses	\$ 65,000
Legal Expenses	25,000
Land, Easements	10,000
Engineering Fees – Design	106,950
Engineering Fees – Construction	41,550
Engineering Fees – Inspection	106,000
Engineering Fees – Other	20,000
Construction	2,300,000
Contingency	199,950
Other	25,000
Total	<u>\$ 2,899,450</u>

III. PROJECT FUNDING

	Amount	%
KIA Fund F Loan	\$ 2,399,450	83%
ARC Grant	500,000	17%
Total	\$ 2,899,450	100%

IV. KIA DEBT SERVICE

Construction Loan	\$ 2,399,450
Principal Forgiveness	1,000,000
Amortized Loan Amount	\$ 1,399,450
Interest Rate	0.50%
Loan Term (Year)	30
Estimated Annual Debt Service	\$ 50,293
Administrative Fee (0.25%)	3,499
Annual Debt Service	\$ 53,791

V. PROJECT SCHEDULE

Bid Opening	April 2020
Construction Start	May 2020
Construction Stop	October 2020

VI. CUSTOMER COMPOSITION AND RATE STRUCTURE

A) Customers

Customers	Current
Residential	3,600
Commercial	215
Total	3,815

B) Rates

	Current	Prior	Prior	Prior
Date of Last Rate Increase	08/22/19	08/20/18	11/07/17	09/18/17
Minimum 2,000 Gallons	\$21.58	\$21.58	\$21.18	\$18.98
Next 3,000 Gallons	10.53	10.53	10.33	9.26
Next 5,000 Gallons	10.31	10.31	10.11	9.06
Water Loss Control Program Surcharge	3.54			
Cost for 4,000 gallons	\$46.18	\$42.64	\$41.84	\$37.50
Increase %	8.3%	1.9%	11.6%	
Affordability Index (Rate/MHI)	1.8%	1.7%	1.7%	1.5%

VII. DEMOGRAPHICS

Based on current Census data from the American Community Survey 5-Year Estimate 2013-2017, the Utility's service area population was 9,378 with a Median Household Income (MHI) of \$30,080. The median household income for the Commonwealth is \$46,535. The ECWD's disadvantaged community status will qualify the project for a 30 year term at 0.5% interest rate and \$1,000,000 in principal forgiveness.

Year	Population		County Unemployment	
	County	% Change	Date	Rate
1980	14,495		June 2005	6.7%
1990	14,614	0.8%	June 2010	12.7%
2000	15,307	4.7%	June 2015	6.1%
2010	14,672	-4.1%	June 2019	5.6%
Current	14,382	-2.0%		
Cumulative %		-0.8%		

VIII. 2019 CAPITALIZATION GRANT EQUIVALENCIES

Additional Subsidization – This project qualifies for additional subsidization. Principal forgiveness of 50% of the assistance amount, not to exceed \$1,000,000 will be credited to the loan balance upon release of liens on all contracts and disbursement of the final draw request by KIA to the borrower.

IX. FINANCIAL ANALYSIS

Financial information was obtained from the audited financial statements for the years ended December 31, 2016 through December 31, 2018. ECWD omitted to report GASB 68 - Accounting and Financial Reporting for Pensions and GASB 75 - Other Postemployment Benefit in 2016 and 2017. The non-cash impact of pension and OPEB liabilities had been removed from 2018 operating expenses. Percentage references in the History section below were based on whole dollar amounts and not the rounded amounts presented.

HISTORY

Total revenues went up 20.3% from \$1.57 million in 2016 to \$1.89 million in 2018 due to the surcharges collected for water loss control program while operating expenses increased 16.0% from \$1.47 million to \$1.70 million during the same period. A total of \$74,200 non-recurring expenses associated with past-due audit fees, legal fees for PSC approval of water loss surcharge, and unplanned maintenance and repair work had been removed from the projections in order to more objectively present ECWD's financial position. The debt service, replacement, and depreciation reserve accounts were underfunded by \$310,000 as of October 31, 2019. The debt coverage ratio was 0.4, 0.4, and 0.8 for 2016, 2017, and 2018 respectively.

The balance sheet reflected a current ratio of 1.2, debt to equity ratio of 1.8, 42.4 days sales in accounts receivable, and 0.7 months of operating expenses in unrestricted cash.

PROJECTIONS

Projections are based on the following assumptions:

- 1) The monthly water loss surcharge will be discontinued once the goal of the water loss control program is achieved with the help of this loan. However, the revenue decrease will be offset by the savings of water purchase cost.
- 2) ECWD will set aside \$45,000 annually for 7 years to replenish the underfunded reserve accounts, subject to KIA annual administrative compliance monitoring.
- 3) Expenses will increase 2% each year for inflation.
- 4) Debt service coverage is 1.2 in 2022 when full year principal and interest repayments begin.

Based on the pro forma assumptions, the utility shows adequate cash flow to repay the KIA Fund F loan.

REPLACEMENT RESERVE

The replacement reserve will be 5% (\$120,000 total) of the final amount borrowed (prior to principal forgiveness, if any) to be funded annually (\$6,000 yearly) each December 1 for 20 years and maintained for the life of the loan.

X. DEBT OBLIGATIONS

	Outstanding	Maturity
Citizens Guaranty Promissory Note	\$ 241,440	2029
RD Bonds 2018 Issue	4,100,693	2058
Total	\$ 4,342,133	

XI. CONTACTS

Legal Applicant	
Name	Estill County Water District #1
Address	76 Cedar Grove Road Irvine, KY 40336
County	Estill
Authorized Official	Blain Click
Phone	(606) 723-3795

Project Contact - Applicant	
Name	Audrea Miller
Representing	Estill County Water District #1
Address	76 Cedar Grove Road Irvine, KY 40336
Phone	(606) 723-3795
Email	a.miller@estillcountywater.com

Project Administrator	
Name	Karyn Leverenz
Organization	Bluegrass Area Development District
Address	699 Perimeter Drive Lexington, KY 40517
Phone	(859) 269-8021
Email	kleverenz@bgadd.org

Consulting Engineer	
Name	Robert Alan Bowman
Firm	Bell Engineering
Address	2480 Fortune Drive Stanford, KY 40484
Phone	(606) 365-2534
Email	abowman@hkbell.com

XII. RECOMMENDATIONS

KIA staff recommends approval of the loan with the standard conditions.

**ESTILL COUNTY WATER DISTRICT #1
FINANCIAL SUMMARY (DECEMBER YEAR END)**

	<u>Audited</u> <u>2016</u>	<u>Audited</u> <u>2017</u>	<u>Audited</u> <u>2018</u>	<u>Projected</u> <u>2019</u>	<u>Projected</u> <u>2020</u>	<u>Projected</u> <u>2021</u>	<u>Projected</u> <u>2022</u>	<u>Projected</u> <u>2023</u>
Balance Sheet								
Assets								
Current Assets	269,775	283,468	354,109	354,082	386,798	395,765	405,429	411,504
Other Assets	8,993,620	8,554,723	8,309,017	7,773,279	10,399,578	10,017,747	9,638,704	9,245,303
Total	9,263,395	8,838,191	8,663,126	8,127,361	10,786,376	10,413,512	10,044,133	9,656,807
Liabilities & Equity								
Current Liabilities	386,966	333,895	306,418	312,085	368,058	331,282	336,963	342,903
Long Term Liabilities	4,178,791	4,204,188	5,292,537	5,051,701	6,297,148	6,183,920	6,069,112	5,952,464
Total Liabilities	4,565,757	4,538,083	5,598,955	5,363,786	6,665,206	6,515,203	6,406,075	6,295,367
Net Assets	4,697,638	4,300,108	3,064,171	2,763,575	4,121,170	3,898,309	3,638,057	3,361,440
Cash Flow								
Revenues	1,572,899	1,611,195	1,892,791	1,894,661	2,008,553	2,008,553	2,008,553	2,008,553
Operating Expenses	1,466,506	1,514,590	1,701,479	1,690,314	1,707,226	1,730,476	1,748,071	1,766,018
Other Income	(1,038)	(1,305)	272	272	272	272	272	272
Cash Flow Before Debt Service	105,355	95,300	191,584	204,619	301,599	278,349	260,754	242,807
Debt Service								
Existing Debt Service	273,816	253,314	252,039	204,819	204,020	206,618	158,642	158,642
Proposed KIA Loan	0	0	0	0	0	26,896	53,791	53,791
Total Debt Service	273,816	253,314	252,039	204,819	204,020	233,513	212,433	212,433
Cash Flow After Debt Service	(168,461)	(158,014)	(60,455)	(200)	97,579	44,836	48,321	30,374
Ratios								
Current Ratio	0.7	0.8	1.2	1.1	1.1	1.2	1.2	1.2
Debt to Equity	1.0	1.1	1.8	1.9	1.6	1.7	1.8	1.9
Days Sales in Accounts Receivable	45.6	47.9	42.4	42.3	42.3	42.3	42.3	42.3
Months Operating Expenses in Unrestricted Cash	0.0	0.0	0.7	0.8	0.9	1.0	1.0	1.1
Debt Coverage Ratio	0.4	0.4	0.8	1.0	1.5	1.2	1.2	1.1

EXECUTIVE SUMMARY KENTUCKY INFRASTRUCTURE AUTHORITY FUND F, FEDERALLY ASSISTED DRINKING WATER REVOLVING LOAN FUND		Reviewer Date KIA Loan Number WRIS Number	Meili Sun December 5, 2019 F20-019 WX21199002	
BORROWER	CITY OF SOMERSET PULASKI COUNTY			
BRIEF DESCRIPTION				
<p>This project consists of two contracts. Contract 1 - Oak Hill Storage Tank Replacement, 5 MG Booster Station, and Water Main Extension will replace an existing one million gallon storage tank with a new tank of the same storage capacity. It will also build a new booster pump station with 5 million gallon capacity and SCADA, add Variable Frequency Drives at the water treatment plant, and install an eight inch water main near the Lake Cumberland Regional Hospital to balance pressure in the system. The KY Pipe Model estimates that Contract 1 will serve approximately 80% of Pulaski County.</p> <p>Contract 2 - Valley Oak Industrial Park Water System Improvements will construct a 1,000 gallon per minute water booster pumping station to facilitate filling of the Sugar Hill Water Storage Tank, install a new water mixing system in the same tank, reconfigure piping that feeds the tank, and build a Chlorination Booster Station to improve water quality for the Valley Oak Industrial Park and Southeastern Water Association.</p>				
PROJECT FINANCING		PROJECT BUDGET		
Fund F Loan	\$7,027,878	RD Fee %	Actual %	
		Administrative Expenses	\$90,000	
		Legal Expenses	25,000	
		Land, Easements	30,000	
		Planning	75,000	
		Eng - Design / Const	6.6% 6.6% 402,000	
		Eng - Insp	3.3% 3.6% 220,000	
		Eng - Other	93,000	
		Construction	5,575,000	
		Contingency	517,878	
TOTAL	\$7,027,878	TOTAL	\$7,027,878	
REPAYMENT	Rate Term	0.50% 30 Years	Est. Annual Payment 1st Payment 6 Mo. after first draw	
			\$270,133	
PROFESSIONAL SERVICES	Engineer Bond Counsel	Bell Engineering Rubin & Hays		
PROJECT SCHEDULE	Bid Opening Construction Start Construction Stop	Apr-20 Jun-20 Jun-21		
DEBT PER CUSTOMER	Existing Proposed	\$1,951 \$2,510		
OTHER DEBT	See Attached			
RESIDENTIAL RATES	Current Additional	<u>Users</u> 9,123 0	<u>Avg. Bill</u> \$17.16 (for 4,000 gallons) \$17.16 (for 4,000 gallons)	
REGIONAL COORDINATION	This project is consistent with regional planning recommendations.			
CASHFLOW	Cash Flow Before Debt Service	Debt Service	Cash Flow After Debt Service	Coverage Ratio
Audited 2016	3,966,394	1,255,139	2,711,255	3.2
Audited 2017	3,900,902	1,255,139	2,645,763	3.1
Audited 2018	3,801,394	1,333,667	2,467,727	2.9
Projected 2019	3,731,502	1,341,582	2,389,920	2.8
Projected 2020	3,660,212	946,612	2,713,600	3.9
Projected 2021	3,569,896	946,612	2,623,284	3.8
Projected 2022	3,495,726	1,081,678	2,414,048	3.2
Projected 2023	3,420,073	1,131,485	2,288,588	3.0

Reviewer: Meili Sun
Date: December 5, 2019
Loan Number: F20-019

**KENTUCKY INFRASTRUCTURE AUTHORITY
DRINKING WATER STATE REVOLVING FUND (FUND F)
CITY OF SOMERSET, PULASKI COUNTY
PROJECT REVIEW
WX21199002**

I. PROJECT DESCRIPTION

The City of Somerset (“City”) is requesting a Fund F loan in the amount of \$7,027,878 for the Storage Tank, Booster Stations, and Water Main Extension project, which is consisted of 2 contracts.

Contract 1 – Oak Hill Storage Tank Replacement, 5 MG Booster Station, and Water Main Extension will replace an existing one million gallon storage tank with a new one of the same storage capacity. It will also build a new booster pump station with 5 million gallon capacity and SCADA, add Variable Frequency Drives at the water treatment plant, and install an eight inch water main near the Lake Cumberland Regional Hospital to balance pressure in the system. Contract 2 – Valley Oak Industrial Park Water System Improvements will construct a 1,000 gallon per minute water booster pumping station to facilitate filling of the Sugar Hill Water Storage Tank, install a new water mixing system in the same tank, reconfigure piping that feeds the tank, and build a Chlorination Booster Station to improve water quality for the Valley Oak Industrial Park and Southeastern Water Association.

The City is a regional provider currently serving approximately 9,000 retail and 4 wholesale customers in Somerset and the surrounding area. Of the 4 wholesale customers, Southeastern Water Association and Western Pulaski County Water District are PSC regulated systems.

II. PROJECT BUDGET

	<u>Total</u>
Administrative Expenses	\$ 90,000
Legal Expenses	25,000
Land, Easements	30,000
Planning	75,000
Engineering Fees – Design	321,000
Engineering Fees – Construction	81,000
Engineering Fees – Inspection	220,000
Engineering Fees – Other	93,000
Construction	5,575,000
Contingency	517,878
Total	\$ 7,027,878

III. PROJECT FUNDING

	Amount	%
KIA Fund F Loan	\$ 7,027,878	100%

IV. KIA DEBT SERVICE

Construction Loan	\$ 7,027,878
Principal Forgiveness	0
Amortized Loan Amount	\$ 7,027,878
Interest Rate	0.5%
Loan Term (Year)	30
Estimated Annual Debt Service	\$ 252,564
Administrative Fee (0.25%)	17,570
Annual Debt Service	\$ 270,133

V. PROJECT SCHEDULE

Bid Opening	April 2020
Construction Start	June 2020
Construction Stop	June 2021

VI. CUSTOMER COMPOSITION AND RATE STRUCTURE

A) Customers

<u>Customers</u>	<u>Current</u>
Residential	6,870
Commercial	2,239
Industrial	14
Total	9,123

B) Rates

	Inside City		Outside City	
	Current	Prior	Current	Prior
Date of Last Rate Increase	07/01/17	07/01/15	07/01/17	07/01/15
Minimum 1,000 Gallons	\$8.10	\$7.94	\$14.07	\$13.80
Next 9,000 Gallons (per 100 Gallons)	\$0.30	\$0.30	\$0.53	\$0.52
Cost for 4,000 gallons	\$17.16	\$16.82	\$29.97	\$29.40
Increase %	2.0%		1.9%	
Affordability Index (Rate/MHI)	0.7%		1.2%	

VII. DEMOGRAPHICS

Based on current Census data from the American Community Survey 5-Year Estimate 2013-2017, the Utility's service area population was 17,537 with a Median Household Income (MHI) of \$28,906. The median household income for the Commonwealth is \$46,535. Being a disadvantaged community, the City qualifies for a 30 year loan term at 0.5% interest rate.

Year	Population		County		County Unemployment	
	City	% Change	County	% Change	Date	Rate
1980	10,649		45,803		June 2005	6.1%
1990	10,733	0.8%	49,489	8.0%	June 2010	9.8%
2000	11,352	5.8%	56,217	13.6%	June 2015	5.9%
2010	11,196	-1.4%	63,063	12.2%	June 2019	5.5%
Current	11,334	1.2%	63,974	1.4%		
Cumulative %		6.4%		39.7%		

VIII. 2019 CAPITALIZATION GRANT EQUIVALENCIES

Additional Subsidization – This project does not qualify for additional subsidization.

IX. FINANCIAL ANALYSIS

Financial information was obtained from the audited financial statements for the years ended June 30, 2016 through June 30, 2018. The non-cash impacts of GASB 68 - Accounting and Financial Reporting for Pensions and GASB 75 - Other Postemployment Benefit had been removed from operating expenses. Percentage references in the History section below are based on whole dollar amounts and not the rounded amounts presented.

HISTORY

Water revenues increased 3.6% from \$7.01 million in 2016 to \$7.27 million in 2018 due to a rate increase approved in FY 2018 and population growth. Operating expenses went up 14.2% during the same period as a result of higher personnel costs associated with new hires and pay raises as well as unplanned repair and maintenance work. The debt coverage ratio was 3.2, 3.1, and 2.9 for 2016, 2017, and 2018 respectively.

The balance sheet of business-type activity reflected a current ratio of 7.1, debt to equity ratio of 0.6, 33.9 days sales in accounts receivable, and 11.7 months of operating expenses in unrestricted cash.

PROJECTIONS

Projections are based on the following assumptions:

- 1) Revenues will increase slightly for population growth.
- 2) Expenses will go up 2% each year for inflation.
- 3) Debt service coverage is 3.2 in 2022 when principal and interest repayments begin.

Based on the pro forma assumptions, the utility shows adequate cash flow to repay the KIA Fund F loan.

REPLACEMENT RESERVE

The replacement reserve will be 5% (\$352,000 total) of the final amount borrowed (prior to principal forgiveness, if any) to be funded annually (\$17,600 yearly) each December 1 for 20 years and maintained for the life of the loan.

X. DEBT OBLIGATIONS

	<u>Outstanding</u>	<u>Maturity</u>
Series 2012 GO	\$ 385,000	2019
Series 2012A	8,384,500	2052
Series 2012B	4,658,000	2052
Cumberland Valley Note	320,745	2022
Kentucky Rural Water Note	4,035,000	2036
Total	\$ 17,783,245	

XI. CONTACTS

Legal Applicant	
Name	City of Somerset
Address	400 E Mount Vernon St, PO Box 989 Somerset, KY 42502
County	Pulaski
Authorized Official	Alan Keck, Mayor
Phone	(606) 679-6366
Email	akeck@cityofsomerset.com

Project Contact - Applicant	
Name	Dana Whitis, Manager
Organization	City of Somerset
Address	306 E Mount Vernon, PO Box 989 Somerset, KY 42501
Phone	(606) 425-5364
Email	dwhitis@cityofsomerset.com

Project Administrator	
Name	Judy Keltner
Organization	Lake Cumberland Area Development District
Address	2384 Lakeway Dr, PO Box 1570 Russell Springs, KY 42642
Contact	Russell Springs, KY 42642
Phone	(270) 866-4200
Email	judy@lcadd.org

Consulting Engineer	
Name	Kelly Gillespie
Firm	Bell Engineering
Address	2488 Fortune Drive, Suite 350 Lexington, KY 40509
Phone	(859) 278-5412
Email	kgillespie@hkbell.com

XII. RECOMMENDATIONS

KIA staff recommends approval of the loan with the standard conditions.

**CITY OF SOMERSET
FINANCIAL SUMMARY (JUNE YEAR END)**

	<u>Audited 2016</u>	<u>Audited 2017</u>	<u>Audited 2018</u>	<u>Projected 2019</u>	<u>Projected 2020</u>	<u>Projected 2021</u>	<u>Projected 2022</u>	<u>Projected 2023</u>
Balance Sheet								
Assets								
Current Assets	7,522,246	10,033,482	9,678,307	10,156,287	10,699,007	11,223,664	11,706,473	12,164,191
Other Assets	54,653,471	52,029,070	51,178,719	50,804,059	51,519,776	59,033,021	59,350,999	59,568,610
Total	62,175,717	62,062,552	60,857,026	60,960,346	62,218,783	70,256,685	71,057,473	71,732,801
Liabilities & Equity								
Current Liabilities	1,702,734	1,763,740	1,355,431	984,121	1,000,606	1,251,788	1,183,996	1,199,794
Long Term Liabilities	20,128,981	19,850,486	20,253,414	19,590,751	19,062,560	25,313,265	24,606,184	23,885,605
Total Liabilities	21,831,715	21,614,226	21,608,845	20,574,872	20,063,166	26,565,053	25,790,180	25,085,399
Net Assets	40,344,002	40,448,326	39,248,181	40,385,474	42,155,617	43,691,632	45,267,293	46,647,401
Cash Flow								
Revenues	7,012,247	7,053,228	7,269,316	7,269,316	7,269,316	7,269,316	7,269,316	7,269,316
Operating Expenses	3,059,858	3,172,163	3,494,603	3,564,495	3,635,785	3,726,101	3,800,271	3,875,924
Other Income	14,005	19,837	26,681	26,681	26,681	26,681	26,681	26,681
Cash Flow Before Debt Service	3,966,394	3,900,902	3,801,394	3,731,502	3,660,212	3,569,896	3,495,726	3,420,073
Debt Service								
Existing Debt Service	1,255,139	1,255,139	1,333,667	1,341,582	946,612	946,612	946,612	861,352
Proposed KIA Loan	0	0	0	0	0	0	135,067	270,133
Total Debt Service	1,255,139	1,255,139	1,333,667	1,341,582	946,612	946,612	1,081,678	1,131,485
Cash Flow After Debt Service	2,711,255	2,645,763	2,467,727	2,389,920	2,713,600	2,623,284	2,414,048	2,288,588
Ratios								
Current Ratio	4.4	5.7	7.1	10.3	10.7	9.0	9.9	10.1
Debt to Equity	0.5	0.5	0.6	0.5	0.5	0.6	0.6	0.5
Days Sales in Accounts Receivable	33.2	30.6	33.9	33.9	33.9	33.9	33.9	33.9
Months Operating Expenses in Unrestricted Cash	2.6	12.3	11.7	13.1	14.6	16.0	17.3	18.3
Debt Coverage Ratio	3.2	3.1	2.9	2.8	3.9	3.8	3.2	3.0