

CITY OF HAMILTON, OHIO – WATER SYSTEM

Financial Statements

Years Ended December 31, 2017 and 2016

With Independent Auditors' Report

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INDEPENDENT AUDITORS' REPORT

To the Honorable Mayor and Members of Council
City of Hamilton, Ohio:

Report on the Financial Statements

We have audited the accompanying financial statements of the City of Hamilton, Ohio - Water System, an enterprise fund of the City of Hamilton, Ohio (the Water System), as of and for the years ended December 31, 2017 and 2016 and the related notes to the financial statements, as listed in the table of contents.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation and fair presentation of these financial statements in accordance with accounting principles generally accepted in the United States of America; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error.

Auditors' Responsibility

Our responsibility is to express an opinion on these financial statements based on our audits. We conducted our audits in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditors' judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. Accordingly, we express no such opinion. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

Opinion

In our opinion, the financial statements referred to previously present fairly, in all material respects, the financial position of the City of Hamilton, Ohio - Water System as of December 31, 2017 and 2016, and the changes in financial position and cash flows thereof for the years then ended in accordance with accounting principles generally accepted in the United States of America.

Emphasis of Matter

As described in Note 1, the financial statements present only the Water System and do not purport to, and do not present fairly the financial position of the City of Hamilton, Ohio as of December 31, 2017 and 2016, and the changes in its financial position and cash flows for the years then ended in accordance with accounting principles generally accepted in the United States of America. Our opinion is not modified with respect to this matter.

Other Matters*Required Supplementary Information*

Accounting principles generally accepted in the United States of America require that the management's discussion and analysis and schedules of net pension liability and pension contributions, as listed in the table of contents, be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the Governmental Accounting Standards Board who considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audit of the basic financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

Clark, Schaefer, Hackett & Co.

Cincinnati, Ohio
June 25, 2018

City of Hamilton, Ohio

Water System

Management's Discussion and Analysis
For the Years Ended December 31, 2017 and 2016
Unaudited

The discussion and analysis of the City of Hamilton, Ohio's Water System's financial performance provide an overall review of that System's financial activities for the years ended December 31, 2017 and 2016. While the intent of this discussion and analysis is to look at the system's financial performance, readers should also review the Statements of Net Position; Revenues, Expenses and Changes in Net Position; and Cash Flows to enhance their understanding of the system's fiscal performance.

Financial Highlights

Key highlights for 2017 and 2016 are as follows:

- The assets and deferred outflows of resources of the Hamilton Water System exceeded its liabilities and deferred inflows of resources at the close of 2017 by \$74,169,865 and \$76,728,522 at the close of 2016 (net position). Of this amount, \$5,557,904 and \$7,410,666 (unrestricted net position) may be used to meet the system's ongoing obligations to customers and creditors.
- The system's total net position decreased by \$2,558,657 between 2016 and 2017, representing a 3% decrease.
- In 2017, the Water System's long-term debt, net of premiums and discounts, increased by \$1,343,812, as the Water System continued to receive loans from the Ohio Water Development Authority and Ohio Public Works Commission.

Water System Summary

The Water System is a fully integrated water supply, treatment, transmission and distribution system. Over the last decade, the City has implemented a number of improvements to the Water System, providing increased system capabilities and enhanced reliability. The System has two water treatment facilities and two well fields that draw water from the Great Miami Buried Valley Aquifer. The transmission and distribution system consists of more than 300 miles of various size main piping, storage facilities and pumping stations.

The Water System currently provides water service to approximately 24,500 customers who represent a diverse mixture of residential, as well as small and large commercial and industrial customers. The City Water Service Area is comprised of virtually all customers within the City's corporate boundaries and a small number of customers in some areas in the immediate surrounding environs. Butler County is the largest customer of the Water System and for the last several years has accounted for in excess of fifty percent of the Water System's revenue. The Water System provides water service to an area within the City limits and areas in the immediate surrounding environs. No water utility other than the Water System can serve new customers in the City without a franchise, and, under the City Charter, only the City Council has the authority to grant utility franchises. City Council has not granted any franchises.

This annual report consists only of the Statements of Net Position, the Statements of Revenues, Expenses and Changes in Net Position, and the s of Cash Flows as well as Notes to the Financial Statements for the City of Hamilton, Ohio's Water System for the years ended December 31, 2017 and 2016.

City of Hamilton, Ohio

Water System

Management's Discussion and Analysis
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Reporting Hamilton's Water System (Whole and Significant Fund)

The financial statements contained within this report include the City of Hamilton, Ohio's Water System *only*. Readers desiring to view city-wide financial statements, as well as the impact that the Water System has on the City's overall financial position and operating results, should refer to the City's Basic Financial Statements appearing in the Comprehensive Annual Financial Report for 2017 and 2016. The City of Hamilton's Water System is reported as a business-type, proprietary, enterprise fund and is considered a major fund for purposes of individual fund reporting. Payments made from the Water Fund are restricted to Water System purposes by municipal ordinance, Ohio Revised Code and indentures issued pursuant to long-term financing.

In the Statements of Net Position and the Statements of Revenues, Expenses and Changes in Net Position, the view of the system looks at all financial transactions of the Water Fund and asks the question, "How did we do financially during 2017 and 2016?" These statements provide answers to that question. The statements include all assets, deferred outflow of resources, and liabilities of the System using the accrual basis of accounting similar to the accounting used by private sector companies. This basis of accounting considers all of the current year's revenues and expenses regardless of when the cash is received or paid. These two statements report the System's net position and the change in net position. The change in net position is important because it tells the reader whether, for the system, the financial position of the City has improved or diminished. However, in evaluating this position, non-financial information including the condition of capital assets will also need to be evaluated. The Notes to the Water System's Financial Statements provide additional information that is essential to a full understanding of the data provided.

The System provides services that have a charge based upon the amount of usage. The City's Water System charges fees to recoup the cost of the entire operation of the Water System as well as all capital expenses associated with these facilities.

Financial Analysis

As noted earlier, net position may serve over time as a useful indicator of financial position. In the case of the Water Fund, assets and deferred outflows of resources exceeded liabilities and deferred inflows of resources by \$74,169,865 as of December 31, 2017 and \$76,728,522 as of December 31, 2016. By far, the largest portion of the net position of the Water System reflect its investment in capital assets (e.g. land, buildings, improvements, construction in progress, machinery and equipment) less any related debt used to acquire those assets that are still outstanding. The ratios of net investment in capital assets to total net position are as follows: 90% for 2017, 88% for 2016, 86% and for 2015. The System employs these assets in the treatment and distribution of water to customers; consequently, these assets are not readily available for future spending. The System's investment in its capital assets is reported net of related debt and it should be noted that the resources needed to repay these debts must be provided from other sources, primarily the revenues of the system, since the capital assets themselves cannot be used to liquidate the liabilities. Table 1 provides a summary of the Water System's Statement of Net Position for the Years Ended December 31, 2017, 2016 and 2015.

City of Hamilton, Ohio

Water System

Management's Discussion and Analysis
For the Years Ended December 31, 2017 and 2016
Unaudited

	2017	2016	2015
Current and other assets	\$ 10,805,385	\$ 12,626,503	\$ 14,211,728
Capital assets	96,084,026	95,800,053	95,565,392
Total assets	<u>106,889,411</u>	<u>108,426,556</u>	<u>109,777,120</u>
Deferred outflows of resources	2,148,258	1,440,397	838,924
Long-term liabilities:			
Net pension liability	3,425,456	2,490,354	2,016,384
Other long-term amounts	29,532,838	28,328,791	28,412,825
Other liabilities	1,839,813	2,175,815	1,796,811
Total liabilities	<u>34,798,107</u>	<u>32,994,960</u>	<u>32,226,020</u>
Deferred inflows of resources	69,697	143,471	35,739
Net investment in capital assets	66,920,743	67,651,447	67,261,052
Restricted	1,691,218	1,666,409	1,522,197
Unrestricted	5,557,904	7,410,666	9,571,036
Total net position	<u>\$ 74,169,865</u>	<u>\$ 76,728,522</u>	<u>\$ 78,354,285</u>

During 2015, the Water System adopted GASB Statement No. 68, *Accounting and Financial Reporting for Pensions—an Amendment GASB Statement No. 27*, which significantly revised accounting for pension costs and liabilities. For reasons discussed below, many end users of this financial statement will gain a clearer understanding of the Water System's actual financial condition by adding deferred inflows related to pension and net pension liability to the reported net position and subtracting deferred outflows related to pension.

Governmental Accounting Standards Board standards are national and apply to all government financial reports prepared in accordance with generally accepted accounting principles. When accounting for pension costs, GASB Statement No. 27 focused on a funding approach. This approach limited pension costs to contributions annually required by law, which may or may not be sufficient to fully fund each plan's *net pension liability*. GASB Statement No. 68 takes an earnings approach to pension accounting; however, the nature of Ohio's statewide pension systems and state law governing those systems requires additional explanation in order to properly understand the information presented in these statements.

City of Hamilton, Ohio

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Management's Discussion and Analysis
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Under GASB Statement No. 68, the net pension liability equals the City's proportionate share of each plan's collective:

1. Present value of estimated future pension benefits attributable to active and inactive employees' past service
2. Minus plan assets available to pay these benefits

GASB notes that pension obligations, whether funded or unfunded, are part of the "employment exchange" – that is, the employee is trading his or her labor in exchange for wages, benefits, and the promise of a future pension. GASB noted that the unfunded portion of this pension promise is a present obligation of the government, part of a bargained-for benefit to the employee, and should accordingly be reported by the government as a liability since they received the benefit of the exchange. However, the City is not responsible for certain key factors affecting the balance of this liability. In Ohio, the employee shares the obligation of funding pension benefits with the employer. Both the employer and employee contribution rates are capped by State statute. A change in these caps requires action of both Houses of the General Assembly and approval of the Governor. Benefit provisions are also determined by State statute. The employee enters the employment exchange with the knowledge that the employer's promise is limited not by contract, but by law. The employer enters the exchange also knowing that there is a specific, legal limit to its contribution to the pension system. In Ohio, there is no legal means to enforce the unfunded liability of the pension system *as against the public employer*. State law operates to mitigate/lessen the moral obligation of the public employer to the employee, because all parties enter the employment exchange with notice as to the law. The pension system is responsible for the administration of the plan.

Most long-term liabilities have set repayment schedules or, in the case of compensated absences (i.e., sick and vacation leave), are satisfied through paid time-off or termination payments. There is no repayment schedule for the net pension liability. As explained above, changes in pension benefits, contribution rates, and return on investments affect the balance of the net pension liability, but are outside the control of the local government. In the event that contributions, investment returns, and other changes are insufficient to keep up with the required pension payments, State statute does not assign/identify the responsible party for the unfunded portion. Due to the unique nature of how the net pension liability is satisfied, this liability is separately identified within the long-term liability section of the statement of net position.

In accordance with GASB Statement No. 68, the Water System's statements prepared on an accrual basis of accounting include an annual pension expense for their proportionate share of each plan's *change* in net pension liability not accounted for as deferred inflows/outflows.

City of Hamilton, Ohio

Water System

Management's Discussion and Analysis
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The Water System reported decreases in net position of \$2,558,657, \$1,625,763 and \$1,947,396 in 2017, 2016 and 2015, respectively. The Water System reported operating losses of \$1,450,92 and \$470,830 in 2017 and 2016. An increase in operating revenues can be attributable to an increase in base rate charges that went into effect January 1, 2017. However, operating expenses increased due to increases in labor and central administration costs.

Net non-operating expenses of \$1,107,737, a slight decrease of \$47,196.

Statement of Revenues, Expenses and Changes in Net Position

	2017	2016	2015
Operating revenues	\$ 13,390,954	\$ 13,088,389	\$ 12,550,024
Operating expenses:			
Depreciation	3,524,198	3,421,802	3,160,788
Other operating expenses	11,317,676	10,137,417	9,364,217
Total operating expenses	14,841,874	13,559,219	12,525,005
Operating income (loss)	(1,450,920)	(470,830)	25,019
Non-Operating revenues (expenses)			
Interest and fiscal charges	(1,281,756)	(1,387,582)	(1,341,950)
Loss on disposal of capital assets	(110,681)	(1,761)	(696,944)
Other non-operating revenues	284,700	234,410	52,405
Total non-operating revenues (expenses)	(1,107,737)	(1,154,933)	(1,986,489)
Transfers	-	-	14,074
Change in net position	(2,558,657)	(1,625,763)	(1,947,396)
Beginning net position	76,728,522	78,354,285	80,301,681
Ending net position	\$ 74,169,865	\$ 76,728,522	\$ 78,354,285

City of Hamilton, Ohio

Water System

Management's Discussion and Analysis
For the Years Ended December 31, 2017 and 2016
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Capital Assets and Debt Administration

Capital Assets: The City's net investment in capital assets of the Water System as of December 31, 2017, 2016 and 2015 amounted to \$66.9 million, \$67.7 million and \$67.3 million, respectively, (net of accumulated depreciation and related debt). This investment in capital assets includes land, buildings, improvements, construction in progress, and machinery and equipment.

Note 5 (Capital Assets) provides Water System asset activity during 2017 and 2016.

Debt Administration: At the end of 2017, the Water System had two outstanding long-term revenue bond issues, the 2009 Water System Revenue Bonds totaling \$9,820,000 and the 2015 Water System Revenue Refunding Bonds totaling \$11,180,000.

In 2017, the Water System refunded \$5,685,000 in Series 2009A revenue bonds with the issuance of \$5,980,000 in notes maturing in March 2018.

The Water System received several State agency loans during 2017 for water main improvements.

See Note 6 for a discussion of outstanding Water System bonds, notes and related activity.

Economic Factors and Future Trends

The City's Water System is continually monitoring its costs and seeking ways to maintain its rates. However, the cost of providing water continues to escalate with rising chemical costs and environmental regulation. These costs are required by both ordinance and indentures to be passed along to its customers. The number of customers has remained steady, but per capita usage is dropping. The City implemented a series of five rate increases of 6% each, effective on February 1, 2008; January 1, 2009; January 1, 2010; January 1, 2011 and January 1, 2012. In 2014 the City adopted a five year cost of service rate plan to be implemented annually from 2015 through 2018.

The annual budget of the City Water System is adopted in accordance with ten-year projections developed by a rate consultant, and these projections are reviewed and updated in the spring and fall of each year, or more often as deemed necessary by City Management.

While the transmission and distribution system has been well-maintained, the age of the infrastructure has led to increases in the number of water main breaks and leaks over the last decade or so. For example, the average water main age in the City is approximately seventy years. In 2010, City Council adopted an ordinance which created the Water Main Replacement Program Rider (WMRPR). The WMRPR program is designed to renew and replace the City's water mains based upon an average 75-year useful life. Debt is expected to be issued, approximately every three years, to provide funding for the program until 2020. At that time, the Rider will fully fund the WMRPR. The WMRPR is being assessed on all City water customers, beginning in 2013. All funds collected through the WMRPR will be dedicated to meeting the capital expenditure and debt service requirements of the Water Main Replacement Program. Beginning with rates adopted in 2014, all water main replacement costs are being collected in the

City of Hamilton, Ohio

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Management's Discussion and Analysis
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base water service rates to more accurately reflect the cost of service. Furthermore, the WMRPR was set to zero at the time of the first step of the five-year rate plan in 2015.

While the U.S. EPA establishes water quality and testing guidelines, the Ohio EPA enforces these guidelines, by using Primary and Secondary Drinking Water Standards. The Primary Drinking Water Standards focus on health concerns, by placing restrictions on water content of certain chemicals, such as lead, arsenic, mercury, fluoride and nitrates. Secondary Drinking Water Standards focus on the aesthetic quality of water, such as color, odor, iron and pH. Based on its tests and monitoring program, the City is currently in compliance with all U.S. EPA and Ohio EPA requirements. The City's treated water meets or exceeds applicable standards and is generally regarded as high quality, which is confirmed by consumer surveys. To further support this label of "high quality," the City of Hamilton won the award of "Best of the Best" in the Ohio Section of the American Water Works Association Water Tasting Contest in 2010, 2012, and 2013. Furthermore, the City's water won "The World's Best Testing Tap Water" at the Berkeley Springs competition in 2010 and 2015.

The City maintains an Aa3 bond rating with a stable outlook for its Water System.

Requests for Information

This financial report is designed to provide our citizens, customers, taxpayers, creditors, investors and elected officials with an overview of the City of Hamilton, Ohio's Water System's finances and to show accountability for the money the system receives. If you have any questions about this report or need additional information, contact the City of Hamilton Finance Department, 345 High Street, Hamilton, Ohio 45011, (513) 785-7170, or visit the City website at www.hamilton-city.org.

**CITY OF HAMILTON, OHIO – WATER SYSTEM
STATEMENTS OF NET POSITION
DECEMBER 31, 2017 AND 2016**

	<u>2017</u>	<u>2016</u>
ASSETS		
Current assets:		
Cash and investments	\$ 6,922,894	8,971,323
Accounts receivable (less allowance for uncollectible accounts of \$730,533 and \$753,195)	1,797,843	1,616,181
Interest receivable	21,038	25,410
Inventory of supplies at cost	256,492	206,951
Prepaid expenses	115,900	140,229
Total current assets	<u>9,114,167</u>	<u>10,960,094</u>
Restricted assets:		
Cash and investments	<u>1,691,218</u>	<u>1,666,409</u>
Noncurrent assets:		
Nondepreciable capital assets	7,597,384	9,014,798
Depreciable capital assets, net	88,486,642	86,785,255
Total noncurrent assets	<u>96,084,026</u>	<u>95,800,053</u>
Total assets	<u>106,889,411</u>	<u>108,426,556</u>
DEFERRED OUTFLOWS OF RESOURCES		
Deferred charge on debt refunding	812,333	483,198
Pension	1,335,925	957,199
Total deferred outflows of resources	<u>2,148,258</u>	<u>1,440,397</u>
LIABILITIES		
Current liabilities:		
Accounts payable	271,099	625,338
Accrued wages and benefits	60,136	122,333
Intergovernmental payable	7,888	6,413
Accrued interest payable	238,486	294,531
Customer deposits payable	248,561	220,212
Compensated absences payable-current	208,248	201,988
OWDA loans payable - current portion	45,397	-
OPWC loans payable - current portion	24,998	-
Revenue bonds payable - current portion	735,000	705,000
Total current liabilities	<u>1,839,813</u>	<u>2,175,815</u>
Non-current liabilities:		
Compensated absences payable	237,028	276,398
OWDA loans payable	887,413	13,734
OPWC loans payable	1,424,512	627,337
General obligation notes payable	5,980,000	-
Revenue bonds payable	21,003,885	27,411,322
Net pension liability	3,425,456	2,490,354
Total noncurrent liabilities	<u>32,958,294</u>	<u>30,819,145</u>
Total liabilities	<u>34,798,107</u>	<u>32,994,960</u>
DEFERRED INFLOWS OF RESOURCES		
Pension	<u>69,697</u>	<u>143,471</u>
NET POSITION		
Net investment in capital assets	66,920,743	67,651,447
Restricted for debt service	691,218	666,409
Restricted for rate stabilization	1,000,000	1,000,000
Unrestricted	5,557,904	7,410,666
Total net position	<u>\$ 74,169,865</u>	<u>76,728,522</u>

See notes to financial statements.

CITY OF HAMILTON, OHIO - WATER SYSTEM
STATEMENTS OF REVENUES, EXPENSES AND CHANGES IN NET POSITION
YEARS ENDED DECEMBER 31, 2017 AND 2016

	<u>2017</u>	<u>2016</u>
Operating revenues:		
Charges for services	\$ 13,275,918	12,945,107
Other operating revenues	<u>115,036</u>	<u>143,282</u>
Total operating revenues	<u>13,390,954</u>	<u>13,088,389</u>
Operating expenses:		
Personal services	3,524,386	2,699,209
Materials and supplies	1,111,846	1,311,269
Contractual services	3,810,022	3,481,564
Depreciation	3,524,198	3,421,802
Other operating expenses	<u>2,871,422</u>	<u>2,645,375</u>
Total operating expenses	<u>14,841,874</u>	<u>13,559,219</u>
Operating loss	(1,450,920)	(470,830)
Non-operating revenues (expenses):		
Investment earnings	92,139	41,896
Grants	192,561	192,514
Loss on disposal of capital assets	(110,681)	(1,761)
Interest and fiscal charges	<u>(1,281,756)</u>	<u>(1,387,582)</u>
Total non-operating revenues (expenses)	<u>(1,107,737)</u>	<u>(1,154,933)</u>
Change in net position	(2,558,657)	(1,625,763)
Net position - beginning of year	<u>76,728,522</u>	<u>78,354,285</u>
Net position - end of year	\$ <u>74,169,865</u>	<u>76,728,522</u>

See notes to financial statements.

**CITY OF HAMILTON, OHIO - WATER SYSTEM
STATEMENTS OF CASH FLOWS
YEARS ENDED DECEMBER 31, 2017 AND 2016**

	<u>2017</u>	<u>2016</u>
Cash flows from operating activities:		
Cash received from customers	\$ 13,209,292	13,222,581
Cash paid for employee services and benefits	(3,134,833)	(2,704,994)
Cash paid to suppliers for goods and services	<u>(7,889,442)</u>	<u>(7,289,359)</u>
Net cash from operating activities	<u>2,185,017</u>	<u>3,228,228</u>
Cash Flows from noncapital financing activities:		
Intergovernmental grants	<u>192,561</u>	<u>192,514</u>
Cash flows from capital and related financing activities:		
Payment for capital acquisitions	(4,174,585)	(3,441,395)
Note issuance	5,980,000	-
Revenue bond principal retirement	(6,390,000)	(660,000)
OWDA loan proceeds	919,076	13,734
OPWC loan proceeds	822,173	627,337
Debt interest payments	<u>(1,654,373)</u>	<u>(1,404,721)</u>
Net cash from capital and related financing activities	<u>(4,497,709)</u>	<u>(4,865,045)</u>
Cash flows from investing activities:		
Interest from investments and change in fair value of investments	<u>96,511</u>	<u>21,375</u>
Net change in cash and cash equivalents	(2,023,620)	(1,422,928)
Cash and cash equivalents at beginning of year	<u>10,637,732</u>	<u>12,060,660</u>
Cash and cash equivalents at end of year	\$ <u><u>8,614,112</u></u>	<u><u>10,637,732</u></u>
Reconciliation of operating loss to net cash from operating activities		
Operating loss	\$ (1,450,920)	(470,830)
Adjustments to reconcile operating losses to net cash from operating activities:		
Depreciation	3,524,198	3,421,802
Change in deferred outflows-pension	(378,726)	(631,273)
Change in deferred inflows-pension	(73,774)	107,732
Changes in assets and liabilities:		
(Increase) decrease in receivables	(181,662)	134,192
(Increase) decrease in inventory	(49,541)	49,008
(Increase) decrease in prepaid items	24,329	(382)
Increase (decrease) in customer deposits payable	28,349	25,373
Increase (decrease) in payables	(98,506)	74,352
Increase (decrease) in accrued liabilities	(95,307)	61,068
Increase (decrease) in intergovernmental payables	1,475	(16,784)
Increase (decrease) in net pension liability	<u>935,102</u>	<u>473,970</u>
Net cash from operating activities	\$ <u><u>2,185,017</u></u>	<u><u>3,228,228</u></u>
Schedule of noncash activities:		
Outstanding liabilities for purchase of certain capital assets	\$ <u><u>87,441</u></u>	<u><u>343,174</u></u>

See notes to financial statements.

CITY OF HAMILTON, OHIO – WATER SYSTEM

Notes to Financial Statements Years Ended December 31, 2017 and 2016

1. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Financial Reporting Entity – The City of Hamilton, Ohio – Water System (Water System) is a utility operating as a separate enterprise fund of the City of Hamilton, Ohio (City). The Water System is controlled by and is dependent on the City’s executive and legislative branches. Control by or dependence on the City is determined on the basis of outstanding debt secured by revenues or general obligations of the City, obligation of the City to finance any deficits that may occur, or receipt of subsidies from the City.

Measurement Focus, Basis of Accounting and Basis of Presentation – The financial statements are prepared in accordance with accounting principles generally accepted in the United States of America as applied to government units. The Governmental Accounting Standards Board (GASB) is the accepted standard-setting body for establishing governmental accounting and financial reporting principles. The financial statements are reported using the economic resources measurement focus and the accrual basis of accounting. Revenues are recorded when earned and expenses are recorded when a liability is incurred, regardless of the timing of cash flows.

Operating revenues and expenses generally result from providing services and producing and delivering goods in connection with the Water System’s principal ongoing operations. The principal operating revenues are charges to customers for sales and services. Operating expenses include the cost of sales and services, administrative expenses, and depreciation on capital assets. All revenues and expenses not meeting these definitions are reported as non-operating revenues and expenses.

Income Taxes – The Water System, which is owned and operated by the City, is exempt from income taxes since it is a division of a municipality.

Cash and Investments – Certain Water System cash and investments are held in the City Treasury and pooled for investment management purposes. The portion of these pooled funds owned by the Water System is reported as cash and investments. In accordance with GASB Statement No. 31, Accounting and Financial Reporting for Certain Investments and for External Investment Pools, and GASB Statement No. 72, Fair Value Measurement and Application, all investments are recorded at fair value except for nonparticipating investment contracts which are reported at amortized cost, which approximates fair value. Interest earned on funds invested is distributed on the basis of the relationship of the average monthly balance of all funds, including the Water System.

Inventories – Inventories are stated at cost based on a moving-average cost method.

Capital Assets – Expenses that increase values or extend the useful life of the respective assets are capitalized while the costs of maintenance and repairs are charged to operating expenses. Interest costs related to the construction of property, plant and equipment are capitalized. Depreciation is calculated on a straight-line basis over the estimated useful life of the various classes of assets. The range of useful lives for computing depreciation is 5 to 75 years.

Bond Premiums and Discounts – Unamortized bond premiums discounts are amortized on the interest method over the term of the related bonds. Amortization of bond discounts was \$60,071 and 9,753 in 2017 and 2016, respectively. Amortization of bond premiums was \$47,508 and \$50,769 in 2017 and 2016, respectively.

Compensated Absences - The Water System follows the provisions of GASB Statement No. 16, *Accounting for Compensated Absences*. Vacation and compensatory time benefits are accrued as a liability as the benefits are earned if the employees' rights to receive compensation are attributable to services already rendered and it is probable that the Water System will compensate the employees for the benefits through paid time off or some other means. Sick leave termination benefits are accrued using the vesting method. The liability includes the employees who are currently eligible to receive termination benefits and those employees for whom it is probable that they will become eligible to receive payment in the future. The amount is based on accumulated sick leave and employees' wage rates at year-end.

Pension – For purposes of measuring the net pension liability, deferred outflows of resources and deferred inflows of resources related to pensions, and pension expense, information about the fiduciary net position of the pension plans and additions to/deductions from their fiduciary net position have been determined on the same basis as they are reported by the pension system. For this purpose, benefit payments (including refunds of employee contributions) are recognized when due and payable in accordance with the benefit terms. The pension system reports investments at fair value.

Deferred Outflows of Resources – In addition to assets, the statement of financial position will sometimes report a separate section for deferred outflows of resources. This separate financial statement reporting element, *deferred outflows of resources*, represents a consumption of net position that applies to a future period(s) and so will *not* be recognized as an outflow of resources (expense) until then. For the Water System, deferred outflows of resources are reported in the statement of net position for deferred charges on refunding and pension. A deferred charge on refunding results from the difference in the carrying value of refunded debt and its reacquisition price. This amount is deferred and amortized over the shorter of the life of the refunded or refunding debt. The deferred outflows of resources related to pension are explained in Note 7.

Deferred Inflows of Resources – In addition to liabilities, the statement of financial position will report a separate section for deferred inflows of resources. Deferred inflows of resources represent an acquisition of net position that applies to a future period and will not be recognized until that time. For the Water System, deferred inflows of resources include pension (see Note 7).

Net Position – Net position represents the difference between assets and deferred outflows of resources, reduced by liabilities and deferred inflows of resources. Net position invested in capital assets, net of related debt consists of capital assets, net of accumulated depreciation, reduced by the outstanding balances of any borrowings used for the acquisition, construction, or improvement of those assets. Net position is reported as restricted when there are limitations imposed on their use either through the enabling legislation adopted by the City or through external restrictions imposed by creditors, grantors or laws or regulations of other governments. The Water System applies restricted resources when an expense is incurred for purposes for which both restricted and unrestricted net position is available.

Use of Estimates – The preparation of the financial statements in conformity with accounting principles generally accepted in the United States of America requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenses during the reporting period. Actual results could differ from those estimates.

2. CASH AND INVESTMENTS

The Water System follows the practice of pooling cash and investments with the City Treasurer except for the cash and investments of certain accounts maintained by trustees. Pooled cash and investments of the Water System totaled \$7,922,894 and \$9,971,323 at December 31, 2017 and 2016, respectively, and consisted of demand deposits, money market funds, U.S. government agency securities and State Treasury Asset Reserve of Ohio (STAR Ohio). Cash and investments held by trustees were \$691,218 and \$666,409 at December 31, 2017 and 2016, respectively.

STAR Ohio is an investment pool managed by the State Treasurer’s Office, which allows governments within the State to pool their funds for investment purposes. STAR Ohio is not registered with the SEC as an investment company, but does operate in a manner consistent with Rule 2a7 of the Investment Company Act of 1940. Investments in STAR Ohio are valued at the net asset value (NAV) per share provided by STAR Ohio. The NAV per share is calculated on an amortized cost basis that provides a NAV per share that approximates fair value. For 2017, there were no limitations or restrictions on any participant withdrawals due to redemption notice periods, liquidity fees, or redemption gates. However, notice must be given 24 hours in advance of all deposits and withdrawals exceeding \$25 million. STAR Ohio reserves the right to limit the transaction to \$50 million, requiring the excess amount to be transacted the following business day(s), but only to the \$50 million limit. All accounts of the participant will be combined for these purposes.

Deposits – Custodial credit risk is the risk that in the event of a bank failure, the City’s deposits may not be returned to it. The City does not have a custodial risk policy. As of December 31, 2017, approximately 93% of the City’s deposits with financial institutions, including the amount of pooled deposits related to the Water System, were exposed to custodial credit risk because they are considered uninsured and uncollateralized. However, the State of Ohio has established by statute a collateral pooling system for financial institutions acting as public depositories. Public depositories must pledge qualified securities with fair values greater than the total amount of all public deposits to be secured by the collateral pool. This pooled collateral covers the Water System’s uninsured and uncollateralized deposits.

Investments – The State of Ohio statutes, Water Revenue Bond indentures, and the City Charter authorize the City to invest in obligations of the U.S. Treasury, agencies, instrumentalities, and repurchase agreements. Custodial credit risk in regards to investments is the risk that, in the event of a failure of a counter party, the City will not be able to recover the value of its investments or collateral securities that are in possession of an outside party. The City employs the use of “safekeeping” accounts to hold and maintain custody of its investments as identified within this policy and as means of mitigating this risk. Fair value in U.S. Treasury securities are measured using level 1 inputs, using quoted prices in active markets for identical assets. Fair value in U.S. agency securities and commercial paper are measured using level 2 inputs, using significant other observable inputs.

Interest rate risk is the risk that the City will incur fair value losses arising from rising interest rates. Such risk is mitigated by the investment policy by limiting investments to certain maximum maturities. As a rule, unless specified otherwise within the policy, investments are to have a maximum maturity of five years unless the investment is matched to a specific expenditure. The context of a specific investment purchase must be weighed in proportion to the remainder of the existing investment portfolio and the “prudent investor” rule to attempt to limit such risk.

The City’s pooled investments, as well as the investments held by trustees specifically for the Water System, are invested primarily in U.S. governmental agency securities with a credit rating of AA+ and an average maximum maturity of 1.96 years and STAR Ohio which has a credit rating of AAAM.

3. ACCOUNTS RECEIVABLE

Receivables at December 31, 2017 and 2016 consist of the following:

	<u>2017</u>	<u>2016</u>
Earned and unbilled consumer accounts	\$ 1,252,914	1,036,992
Earned and billed consumer accounts	1,268,933	1,292,637
Other	6,529	39,747
Less allowance for uncollectible accounts	<u>(730,533)</u>	<u>(753,195)</u>
Total	<u>\$ 1,797,843</u>	<u>1,616,181</u>

4. RESTRICTED ASSETS

Restricted assets consist of assets whose use has been restricted by bond indenture for debt service and rate stabilization. Restricted assets were \$1,691,218 and \$1,666,409 at December 31, 2017 and 2016, respectively.

5. CAPITAL ASSETS

Capital asset activity for the years ended December 31, 2017 and 2016 was as follows:

	Balance 1/1/17	Increases	Decreases	Balance 12/31/17
<i>Nondepreciable capital assets:</i>				
Land	\$ 2,487,106	-	-	2,487,106
Construction in progress	<u>6,527,692</u>	<u>1,211,912</u>	<u>(2,629,326)</u>	<u>5,110,278</u>
Subtotal	<u>9,014,798</u>	<u>1,211,912</u>	<u>(2,629,326)</u>	<u>7,597,384</u>
<i>Capital assets being depreciated:</i>				
Buildings and improvements	25,378,615	96,708	-	25,475,323
Machinery and equipment	<u>123,215,449</u>	<u>5,239,558</u>	<u>(300,766)</u>	<u>128,154,241</u>
Subtotal	<u>148,594,064</u>	<u>5,336,266</u>	<u>(300,766)</u>	<u>153,629,564</u>
Totals at historical cost	<u>157,608,862</u>	<u>6,548,178</u>	<u>(2,930,092)</u>	<u>161,226,948</u>
Less accumulated depreciation:				
Buildings and improvements	16,613,535	691,914	-	17,305,449
Machinery and equipment	<u>45,195,274</u>	<u>2,832,284</u>	<u>(190,085)</u>	<u>47,837,473</u>
Total accumulated depreciation	<u>61,808,809</u>	<u>3,524,198</u>	<u>(190,085)</u>	<u>65,142,922</u>
Capital assets, net	\$ <u>95,800,053</u>	<u>3,023,980</u>	<u>(2,740,007)</u>	<u>96,084,026</u>
	Balance 1/1/16	Increases	Decreases	Balance 12/31/16
<i>Nondepreciable capital assets:</i>				
Land	\$ 2,487,106	-	-	2,487,106
Construction in progress	<u>4,456,169</u>	<u>2,553,405</u>	<u>(481,882)</u>	<u>6,527,692</u>
Subtotal	<u>6,943,275</u>	<u>2,553,405</u>	<u>(481,882)</u>	<u>9,014,798</u>
<i>Capital assets being depreciated:</i>				
Buildings and improvements	25,378,615	-	-	25,378,615
Machinery and equipment	<u>121,671,054</u>	<u>1,586,701</u>	<u>(42,306)</u>	<u>123,215,449</u>
Subtotal	<u>147,049,669</u>	<u>1,586,701</u>	<u>(42,306)</u>	<u>148,594,064</u>
Totals at historical cost	<u>153,992,944</u>	<u>4,140,106</u>	<u>(524,188)</u>	<u>157,608,862</u>
Less accumulated depreciation:				
Buildings and improvements	15,945,264	668,271	-	16,613,535
Machinery and equipment	<u>42,482,288</u>	<u>2,753,531</u>	<u>(40,545)</u>	<u>45,195,274</u>
Total accumulated depreciation	<u>58,427,552</u>	<u>3,421,802</u>	<u>(40,545)</u>	<u>61,808,809</u>
Capital assets, net	\$ <u>95,565,392</u>	<u>718,304</u>	<u>(483,643)</u>	<u>95,800,053</u>

6. LONG TERM DEBT

On September 9, 2009, the City issued \$9,675,000 in Series 2009A Water System Revenue Bonds and \$8,915,000 in Series 2009B Taxable Water System Build America Revenue Bonds to currently refund bond anticipation notes and provide funding for Water System production and distribution improvements. With the issuance of the Build America Bonds, the City will be entitled to receive an interest subsidy payment of 35% from the U.S. Treasury on any interest payment date. The Series 2009A revenue bonds fully mature in 2029 with interest from 2.25 to 4.63 percent per annum. The Series 2009B Build America Bonds fully mature in 2039 with interest of 6.62 percent per annum.

In September 2015, the Water System issued \$11,700,000 of water revenue refunding bonds to refund Series 2002 mortgage revenue bonds. The Series 2015 bonds fully mature in 2044 and bear interest of 4.4 to 5.25 percent per annum.

In 2016, the Water System entered into an agreement with Ohio Water Development Authority (OWDA), as administrator for the U.S. Environmental Protection Agency (EPA), for the Water System to receive a loan for a water main replacement at River Road. The total amount is subject to change and has not been finalized. The interest rate on the loan is 1.33 percent per annum. The loan is payable from water service charges and will be received in increments as the project is completed. During 2017, the Water System received an additional \$919,076. As of December 31, 2017, the outstanding balance of the loan is \$932,810. Subsequent amounts will be received in future years.

In 2016, the Water System obtained financing through the Ohio Public Works Commission (OPWC) for a water main replacement at Pershing Avenue with a 0 percent interest rate. This loan will be received in increments as the project is completed. During 2017, the Water System received an additional \$122,604. As of December 31, 2017, the outstanding balance of the loan is \$749,941.

In 2016, the Water System obtained financing through the OPWC for a water main replacement at Arlington Avenue at an interest rate of 0 percent. This loan is received by the Water System in increments as the project is completed. As of December 31, 2017, the Water System had received \$394,813 from the OPWC. Subsequent amounts will be received in future years. As of December 31, 2017, the loan has not been finalized and there is no amortization schedule for the loan.

In 2017, the Water System obtained financing through the OPWC for a water main replacement at State Route 4 at an interest of 0 percent. This loan is received by the Water System in increments as the project is completed. As of December 31, 2017, the Water System had received \$304,756 from the OPWC. Subsequent amounts will be received in future years. As of December 31, 2017, the loan has not been finalized and there is no amortization schedule for the loan.

In December 2017, the City defeased \$5,685,000 of Water System Revenue Bonds, along with portions of Electric and Wastewater Revenue Bonds, through the issuance of \$45,220,000 of Various Purpose General Obligation Notes. The Water System's portion of the 2017 Notes was \$5,980,000. The net proceeds of the 2017 Notes have been invested in obligations guaranteed as to both principal and interest by the United States and placed in irrevocable escrow accounts which, including interest earned, will be used to pay the principal and interest on the refunded bonds. The refunded bonds, which have an outstanding balance of \$5,685,000 at December 31, 2017 are not included in the Water System's outstanding debt since the Water System has in-substance satisfied its obligations through the advanced refunding.

As a result of the issuance of the \$45,220,000 Notes, the City reduced its aggregate debt service payments over the life of the Electric, Water and Wastewater refunded bonds by \$4,118,083 and obtained an economic gain (difference between the present value of the old and new debt service payments) of \$539,762.

The \$45,220,000 in Various Purpose General Obligation Notes were retired in March 2018 with the issuance of \$43,930,000 of Revenue Refunding Bonds. See Note 12.

Debt activity for the year ended December 31, 2017 was as follows:

	Balance 1/1/17	Additions	Reductions	Balance 12/31/17	Due Within One Year
Series 2009A Revenue Bonds	\$ 7,020,000	-	(6,115,000)	905,000	445,000
Series 2009B Revenue BABs	8,915,000	-	-	8,915,000	-
Series 2015 Refunding Bonds	11,455,000	-	(275,000)	11,180,000	290,000
Less deferred amount:					
for issuance premiums	823,192	-	(47,508)	775,684	-
for issuance discounts	(96,870)	-	60,071	(36,799)	-
Notes payable	-	5,980,000	-	5,980,000	-
OWDA Loan-River Road	13,734	919,076	-	932,810	45,397
OPWC Loan- Pershing Ave	627,337	122,604	-	749,941	24,998
OPWC Loan-Arlington Ave	-	394,813	-	394,813	-
OPWC Loan-SR 4	-	304,756	-	304,756	-
Net pension liability	2,490,354	935,102	-	3,425,456	-
Compensated absences	478,386	168,878	(201,988)	445,276	208,248
	<u>\$ 31,726,133</u>	<u>8,825,229</u>	<u>(6,579,425)</u>	<u>33,971,937</u>	<u>1,013,643</u>

Debt activity for the year ended December 31, 2016 was as follows:

	Balance 1/1/16	Additions	Reductions	Balance 12/31/16	Due Within One Year
Series 2009A Revenue Bonds	\$ 7,435,000	-	(415,000)	7,020,000	430,000
Series 2009B Revenue BABs	8,915,000	-	-	8,915,000	-
Series 2015 Refunding Bonds	11,700,000	-	(245,000)	11,455,000	275,000
Less deferred amount:					
for issuance premiums	873,961	-	(50,769)	823,192	-
for issuance discounts	(106,623)	-	9,753	(96,870)	-
OWDA Loan-River Road	-	13,734	-	13,734	-
OPWC Loan- Pershing Ave	-	627,337	-	627,337	-
Net pension liability	2,016,384	473,970	-	2,490,354	-
Compensated absences	455,203	222,899	(199,716)	478,386	201,988
	<u>\$ 31,288,925</u>	<u>1,337,940</u>	<u>(900,732)</u>	<u>31,726,133</u>	<u>906,988</u>

Under the terms of the revenue bond indenture, the City has agreed to certain covenants including, among other things, maintaining revenue levels and providing for operating expenses and debt service. The revenue bonds are insured under a municipal bond insurance policy. Under the terms of this policy, the payments of principal and interest are guaranteed by the insurer.

Maturities of revenue bonds at December 31, 2017 are as follows:

		<u>Principal</u>	<u>Interest</u>	<u>Total</u>
2018	\$	735,000	1,334,399	2,069,399
2019		760,000	1,307,224	2,067,224
2020		305,000	1,040,911	1,345,911
2021		310,000	1,034,811	1,344,811
2022		320,000	1,027,836	1,347,836
2023-2027		1,735,000	4,994,841	6,729,841
2028-2032		4,205,000	4,466,138	8,671,138
2033-2037		6,625,000	2,803,393	9,428,393
2038-2042		4,770,000	818,116	5,588,116
2043-2044		<u>1,235,000</u>	<u>74,600</u>	<u>1,309,600</u>
Total	\$	<u>21,000,000</u>	<u>18,902,269</u>	<u>39,902,269</u>

Maturities of the completed OWDA and OPWC loans as of December 31, 2017 are as follows:

		<u>Principal</u>	<u>Interest</u>	<u>Total</u>
2018	\$	70,395	13,586	83,981
2019		71,001	12,980	83,981
2020		71,615	12,366	83,981
2021		72,237	11,744	83,981
2022		72,868	11,114	83,982
2023-2027		374,092	45,816	419,908
2028-2032		391,161	28,744	419,905
2033-2037		309,401	10,505	319,906
2038-2042		124,990	-	124,990
2043-2047		<u>124,991</u>	<u>-</u>	<u>124,991</u>
Total	\$	<u>1,682,751</u>	<u>146,855</u>	<u>1,829,606</u>

7. DEFINED BENEFIT PENSION PLANS AND OTHER POSTEMPLOYMENT BENEFITS

The Water System contributes to the Ohio Public Employees Retirement System, the City of Hamilton Metropolitan Pension Plan, and post-employment life insurance.

Net Pension Liability

The net pension liability reported on the statement of net position represents a liability to employees for pensions. Pension is a component of exchange transactions—between an employer and its employees—of salaries and benefits for employee services. Pensions are provided to an employee—on a deferred-payment basis—as part of the total compensation package offered by an employer for employee services each financial period. The obligation to sacrifice resources for pensions is a present obligation because it was created as a result of employment exchanges that already have occurred.

The net pension liability represents the Water System's proportionate share of each pension plan's collective actuarial present value of projected benefit payments attributable to past periods of service, net of each pension plan's fiduciary net position. The net pension liability calculation is dependent on critical long-term variables, including estimated average life expectancies, earnings on investments, cost of living adjustments and others. While these estimates use the best information available, unknowable future events require adjusting this estimate annually.

Ohio Revised Code limits the Water System's obligation for this liability to annually required payments. The Water System cannot control benefit terms or the manner in which pensions are financed; however, the Water System does receive the benefit of employees' services in exchange for compensation including pension.

GASB 68 assumes the liability is solely the obligation of the employer, because (1) they benefit from employee services; and (2) State statute requires all funding to come from these employers. All contributions to date have come solely from these employers (which also includes costs paid in the form of withholdings from employees). State statute requires the pension plans to amortize unfunded liabilities within 30 years. If the amortization period exceeds 30 years, each pension plan's board must propose corrective action to the State legislature. Any resulting legislative change to benefits or funding could significantly affect the net pension liability. Resulting adjustments to the net pension liability would be effective when the changes are legally enforceable.

The proportionate share of each plan's unfunded benefits is presented as a long-term *net pension liability* on the accrual basis of accounting. Any liability for the contractually-required pension contribution outstanding at the end of the year is included in *intergovernmental payable* on both the accrual and modified accrual bases of accounting.

Plan Description – Ohio Public Employees Retirement System (OPERS)

Water System employees participate in the Ohio Public Employees Retirement System (OPERS). OPERS administers three separate pension plans. The traditional pension plan is a cost-sharing, multiple-employer defined benefit pension plan. The member-directed plan is a defined contribution plan and the combined plan is a cost-sharing, multiple-employer defined benefit pension plan with defined contribution features. While members (e.g. Water System employees) may elect the member-directed plan and the combined plan, substantially all employee members are in OPERS' traditional plan; therefore, the following disclosure focuses on the traditional pension plan.

OPERS provides retirement, disability, survivor and death benefits, and annual cost of living adjustments to members of the traditional plan. Authority to establish and amend benefits is provided by Chapter 145 of the Ohio Revised Code. OPERS issues a stand-alone financial report that includes financial statements, required supplementary information and detailed information about OPERS' fiduciary net position that may be obtained by visiting <https://www.opers.org/financial/reports.shtml>, by writing to the Ohio Public Employees Retirement System, 277 East Town Street, Columbus, Ohio 43215-4642, or by calling 800-222-7377.

Senate Bill (SB) 343 was enacted into law with an effective date of January 7, 2013. In the legislation, members were categorized into three groups with varying provisions of the law applicable to each group. The following table provides age and service requirements for retirement and the retirement formula applied to final average salary (FAS) for the three-member groups under the traditional plan as per the reduced benefits adopted by SB 343 (see OPERS CAFR referenced above for additional information):

Group A Eligible to retire prior to January 7, 2013 or five years after January 7, 2013	Group B 20 years of service credit prior to January 7, 2013 or eligible to retire ten years after January 7, 2013	Group C Members not in other Groups and members hired on or after January 7, 2013
State and Local	State and Local	State and Local
Age and Service Requirements: Age 60 with 60 months of service credit or Age 55 with 25 years of service credit	Age and Service Requirements: Age 60 with 60 months of service credit or Age 55 with 25 years of service credit	Age and Service Requirements: Age 57 with 25 years of service credit or Age 62 with 5 years of service credit
Formula: 2.2% of FAS multiplied by year of service for the first 30 years and 2.5% for service years in excess of 30	Formula: 2.2% of FAS multiplied by year of service for the first 30 years and 2.5% for service years in excess of 30	Formula: 2.2% of FAS multiplied by year of service for the first 35 years and 2.5% for service years in excess of 35

Final average salary (FAS) represents the average of the three highest years of earnings over a member's career for Groups A and B. Group C is based on the average of the five highest years of earnings over a member's career.

Members who retire before meeting the age and years of service credit requirement for unreduced benefits receive a percentage reduction in the benefit amount.

When a benefit recipient has received benefits for 12 months, an annual cost of living adjustment (COLA) is provided. This COLA is calculated on the base retirement benefit at the date of retirement and is not compounded. For those retiring prior to January 7, 2013, the COLA will continue to be a 3 percent simple annual COLA. For those retiring subsequent to January 7, 2013, beginning in calendar year 2019, the COLA will be based on the average percentage increase in the Consumer Price Index, capped at 3 percent.

Funding Policy – The Ohio Revised Code (ORC) provides statutory authority for member and employer contributions as follows:

	2017	2016
Statutory Maximum Contribution Rates		
Employer	14.0 %	14.0 %
Employee	10.0 %	10.0 %
Actual Contribution Rates		
Employer:		
Pension	13.0 %	12.0 %
Post-employment Health Care Benefits	1.0 %	2.0 %
Total Employer	14.0 %	14.0 %
Employee	10.0 %	10.0 %

Employer contribution rates are actuarially determined and are expressed as a percentage of covered payroll. The Water System's contractually required contributions were \$277,833 and \$225,190 for 2017 and 2016, respectively. Of these amounts, \$6,470 and \$6,413 were reported as intergovernmental payables in 2017 and 2016, respectively.

Pension Liabilities, Pension Expense, and Deferred Outflows of Resources and Deferred Inflows of Resources Related to Pensions

The net pension liabilities for OPERS were measured as of December 31, 2016 and 2015, and the total pension liability used to calculate the net pension liability was determined by an actuarial valuation as of those dates. The Water System's proportion of the net pension liability was based on the Water System's share of contributions to the pension plan relative to the contributions of all participating entities in those measurement periods. The following is information related to the proportionate share and pension expense:

	<u>2017</u>	<u>2016</u>
Proportionate Share of the Net Pension Liability	\$3,425,456	\$2,490,354
Proportion of the Net Pension Liability	0.0150846%	0.0143774%
Change in Proportion	0.0007072%	
Pension Expense	\$225,190	\$308,804

At December 31, 2017 and 2016, the Water System reported deferred outflows of resources and deferred inflows of resources related to pension from the following sources:

	<u>2017</u>	<u>2016</u>
Deferred Outflows of Resources		
Net difference between projected and actual earnings on pension plan investments	\$ 510,129	\$ 732,009
Change in assumptions	543,319	-
Differences between expected and actual experience	4,644	-
Water System contributions subsequent to the measurement date	<u>277,833</u>	<u>225,190</u>
Total Deferred Outflows of Resources	<u>\$ 1,335,925</u>	<u>\$ 957,199</u>
Deferred Inflows of Resources		
Differences between expected and actual experience	\$ 20,386	\$ 53,394
Water System change in proportionate share	<u>49,311</u>	<u>90,077</u>
Total Deferred Inflows of Resources	<u>\$ 69,697</u>	<u>\$ 143,471</u>

\$277,833 reported as deferred outflows of resources related to pension resulting from the Water System's contributions subsequent to the measurement date will be recognized as a reduction of the net pension liability in the year ending December 31, 2018.

Other amounts reported as deferred outflows of resources and deferred inflows of resources related to pension will be recognized in pension expense as follows:

Year Ending December 31:		
	2018	\$ 383,708
	2019	437,537
	2020	182,155
	2021	<u>(15,005)</u>
Total		<u>\$ 988,395</u>

Actuarial Assumptions - OPERS

Actuarial valuations of an ongoing plan involve estimates of the values of reported amounts and assumptions about the probability of occurrence of events far into the future. Examples include assumptions about future employment, mortality, and cost trends. Actuarially determined amounts are subject to continual review or modification as actual results are compared with past expectations and new estimates are made about the future.

Projections of benefits for financial reporting purposes are based on the substantive plan (the plan as understood by the employers and plan members) and include the types of benefits provided at the time of each valuation.

In 2016, the OPERS’ actuarial consultants conducted an experience study for the period 2011 through 2015, comparing assumptions to actual results. The experience study incorporates both a historical review and forward-looking projections to determine the appropriate set of assumptions to keep the plan on a path toward full funding. Information from this study led to changes in both demographic and economic assumptions, with the most notable being a reduction in the actuarially assumed rate of return from 8.0 percent down to 7.5 percent, for the defined benefit investments. The total pension liability in the December 31, 2016, actuarial valuation was determined using the following actuarial assumptions, applied to all periods included in the measurement:

Wage Inflation	3.25 percent
Future Salary Increases, including inflation COLA or Ad Hoc COLA	3.25 to 10.75 percent including wage inflation Pre 1/7/2013 Retirees: 3 percent, simple; Post 1/7/2013 Retirees: 3 percent simple through 2018, then 2.15 percent simple
Investment Rate of Return	7.5 percent
Actuarial Cost Method	Individual Entry Age

Mortality rates are based on the RP-2014 Healthy Annuitant mortality table. For males, Healthy Annuitant Mortality tables were used, adjusted for mortality improvement back to the observation period base of 2006 and then established the base year as 2015. For females, Healthy Annuitant Mortality tables were used, adjusted for mortality improvements back to the observation period base year of 2006 and then established the base year as 2010. The mortality rates used in evaluating disability allowances were based on the RP-2014 Disabled mortality tables, adjusted for mortality improvement back to the observation base year of 2006 and then established the base year as 2015 for males and 2010 for females. Mortality rates for a particular calendar year for both healthy and disabled retiree mortality tables are determined by applying the MP-2015 mortality improvement scale to the above described tables.

The most recent experience study was completed for the five-year period ended December 31, 2015.

The long-term rate of return on defined benefit investment assets was determined using a building-block method in which best-estimate ranges of expected future real rates of return are developed for each major asset class. These ranges are combined to produce the long-term expected real rate of return by weighting the expected future real rates of return by the target asset allocation percentage, adjusted for inflation.

During 2016, OPERS managed investments in four investment portfolios: the Defined Benefits portfolio, the 401(h) Health Care portfolio, the 115 Health Care Trust portfolio and the Defined Contribution portfolio. The 401(h) Health Care Trust was closed as of June 30, 2016. The Defined Benefit portfolio contains the investment assets of the Traditional Pension Plan, the defined benefit component of the Combined Plan, the annuitized accounts of the Member-Directed Plan. The Defined Benefit portfolio historically included the assets of the Member-Directed retiree medical accounts funded through the VEBA Trust. However, the VEBA Trust was closed as of June 30, 2016 and the net position transferred to the 115 Health Care Trust portfolio as of July 1, 2016. Within the Defined Benefit portfolio, contributions into the plans are all recorded at the same time, and benefit payments all occur on the first of the month. Accordingly, the money-weighted rate of return is considered to be the same for all plans within the portfolio. The money weighted rate of return, net of investments expense, for the Defined Benefit portfolio is 8.3 percent for 2016.

The allocation of investment assets with the Defined Benefit portfolio is approved by the Board of Trustees as outlined in the annual investment plan. Plan assets are managed on a total return basis with a long-term objective of achieving and maintaining a fully funded status for the benefits provided through the defined benefit pension plans. The table below displays the Board-approved asset allocation policy for 2016 and the long-term expected real rates of return:

Asset Class	Target Allocation	Weighted Average Long-Term Expected Real Rate of Return (Arithmetic)
Fixed Income	23.00 %	2.75 %
Domestic Equities	20.70	6.34
Real Estate	10.00	4.75
Private Equity	10.00	8.97
International Equities	18.30	7.95
Other investments	18.00	4.92
Total	100.00 %	5.66 %

Discount Rate The discount rate used to measure the total pension liability was 7.5 percent. The projection of cash flows used to determine the discount rate assumed that contributions from plan members and those of the contributing employers are made at the statutorily required rates. Based on those assumptions, the pension plan's fiduciary net position was projected to be available to make all projected future benefits payments of current plan members. Therefore, the long-term expected rate of return on pension plan investments was applied to all periods of projected benefit payments to determine the total pension liability.

Sensitivity of the Water System’s Proportionate Share of the Net Pension Liability to Changes in the Discount Rate The following table presents the Water System’s proportionate share of the net pension liability calculated using the current period discount rate assumption of 7.5 percent, as well as what the Water System’s proportionate share of the net pension liability would be if it were calculated using a discount rate that is one-percentage-point lower (6.5 percent) or one-percentage-point higher (8.5 percent) than the current rate:

	1% Decrease (6.50%)	Current Discount Rate (7.50%)	1% Increase (8.50%)
Water System's proportionate share of the net pension liability	\$ 5,233,218	3,425,456	\$ 1,919,088

OPERS Other Postemployment Benefits

Plan Description – OPERS administers three separate pension plans: the Traditional Pension Plan – a cost-sharing, multiple-employer defined benefit pension plan; the Member-Directed Plan – a defined contribution plan; and the Combined Plan – cost-sharing, multiple-employer defined benefit pension plan that has elements of both a defined benefit and defined contribution plan.

OPERS maintains a cost-sharing, multiple-employer defined benefit post-employment health care trust, which funds multiple health care plans including medical coverage, prescription drug coverage and deposits to a Health Reimbursement Arrangement to qualifying benefit recipients of both the Traditional Pension and the Combined plans. This trust is also used to fund health care for Member-Directed Plan participants, in the form of a Retiree Medical Account (RMA). At retirement or refund, Member-Directed Plan participants may be eligible for reimbursement of qualified medical expenses from their vested RMA balance.

In order to qualify for post-employment health care coverage, age-and-service retirees under the Traditional Pension and Combined Plans must have 20 or more years of qualifying Ohio service credit. Health care coverage for disability benefit recipients and qualified survivor benefit recipients is available. The health care coverage provided by OPERS is considered an Other Postemployment Benefit (OPEB) as described in GASB Statement No. 45. Please see the Plan Statement in the OPERS 2016 CAFR for details.

The ORC permits, but does not mandate, OPERS to provide OPEB benefits to its eligible members and beneficiaries. Authority to establish and amend benefits is provided in Chapter 145 of the ORC.

OPERS issues a stand-alone financial report. Interested parties may obtain a copy by visiting <https://www.opers.org/financial/reports.shtml#CAFR>, by making a written request to OPERS, 277 East Town Street, Columbus, Ohio 43215-4642, or by calling (614) 222-5601 or 1-800-222-7377.

Funding Policy – The ORC provides the statutory authority requiring public employers to fund post retirement health care coverage through their contributions to OPERS. A portion of each employer’s contribution to OPERS is set aside for the funding of post retirement health care benefits. Employer contribution rates are expressed as a percentage of the covered payroll of active members. In 2017, local government employers contributed at a rate of 14 percent of covered payroll. The ORC currently limits the employer contribution to a rate not to exceed 14 percent of covered payroll for local government employers. Active members do not make contributions to the OPEB plan.

Each year, the OPERS Board of Trustees determines the portion of the employer contribution rate that will be set aside to fund health care plans. The portion of employer contributions allocated to health care for members in the Traditional Pension and Combined Plans was 1 percent during calendar year 2017. As recommended by OPERS' actuary, the portion of employer contributions allocated to health care beginning January 1, 2018 decreased to 0 percent for both plans. The Board is also authorized to establish rules for the retiree or their surviving beneficiaries to pay a portion of the health care provided. Payment amounts vary depending on the number of covered dependents and the coverage selected. The employer contribution as a percentage of covered payroll deposited to the RMA for participants in the Member-Directed Plan for 2017 was 4 percent.

The Water System's contributions for health care to the OPERS for the years ending December 31, 2017, 2016, and 2015 \$20,000, \$32,000 and \$38,000, respectively, which were equal to the required contributions for each year.

Metropolitan Pension Plan

Employees of the City who were not included under the Ohio Public Employees Retirement System (OPERS) prior to May 15, 1962 and who were included under a Group Annuity Contract of the Metropolitan Life Insurance Company participate in the City of Hamilton Metropolitan Pension Plan, a single-employer defined benefit pension plan.

Upon retirement, plan participants are entitled to a supplemental retirement benefit paid by the City, equal to the difference between OPERS benefits that would have been payable to such employee had the employee been covered by OPERS during the full period of employment and actual OPERS benefits received. Benefit provisions of the plan are established and may be amended by the City Council through ordinance. All current participants in the Metropolitan Pension Plan are retired from service with the City.

The Metropolitan Pension Plan currently has no assets and the plan is not administered through a trust. GASB Statement No. 73 establishes requirements for defined benefit pensions that are not within the scope of GASB Statement No. 68, as well as for the assets accumulated for purposes of providing those pensions. The total pension liability was deemed not material to the Gas System's financial statements. As such, the Metropolitan Pension Plan liability is not reported in the financial statements.

Retiree Life Insurance

The City provides post-employment life insurance coverage through the Hartford Insurance Company. The insurance coverage provided is considered an other post-employment benefit (OPEB) as described in GASB Statement No. 45.

Eligible employees are grouped into two classes. Employees who retired prior to March 1, 1977 are eligible to receive \$2,000 in life insurance benefits. Employees who retired after March 1, 1977 are eligible to receive \$4,000 in life insurance benefits. Benefit provisions of the plan are established and may be amended by City Council through ordinance.

The Water System's annual OPEB cost and net OPEB for the Retiree Life Insurance Plan for the years ended December 31, 2017, 2016, and 2015 are as follows:

	<u>2017</u>	<u>2016</u>	<u>2015</u>
Annual required contribution (ARC)	\$ 18,980	\$ 19,363	\$ 18,099
Interest on Net OPEB	392	282	183
Adjustments to ARC	<u>(593)</u>	<u>(417)</u>	<u>(274)</u>
Annual OPEB cost	18,779	19,228	18,008
Contributions made	<u>16,460</u>	<u>16,634</u>	<u>15,947</u>
Increase in Net OPEB	2,319	2,594	2,061
Net OPEB, beginning of year	<u>9,230</u>	<u>6,636</u>	<u>4,575</u>
Net OPEB, end of year	<u>\$ 11,549</u>	<u>\$ 9,230</u>	<u>\$ 6,636</u>

The Water System's annual OPEB cost, percentage of OPEB contributed, net OPEB, and unfunded actuarial accrued liabilities for years ended December 31, 2017, 2016, and 2015 are as follows:

<u>Years Ended</u>	<u>Annual OPEB Cost</u>	<u>Percentage of OPEB Contributed</u>	<u>Net OPEB Obligation</u>	<u>Unfunded Actuarial Accrued Liability</u>
2017	\$ 18,779	87.7%	\$ 11,549	\$ 277,234
2016	19,228	86.5%	9,230	254,226
2015	18,008	88.6%	6,636	266,328

The actuarial valuation date was December 31, 2017 and the accrued liability was calculated using the entry age normal cost method. The City's post-employment life-insurance plan currently has no assets.

8. CONTINGENT LIABILITIES

Various claims and lawsuits are pending against the City involving the Water System. The City believes that the ultimate disposition of such claims and lawsuits will not have a material adverse effect on the financial position of the Water System.

9. RELATED PARTY TRANSACTIONS

The Water System purchases electricity from the City's Electric System. Purchases of \$928,612 and \$1,217,154 from the Electric System are included in operating expenses in 2017 and 2016, respectively.

The City allocates the cost of certain administrative services. In addition, the City established internal service funds which provide services to various City departments. Charges to the Water System for these services were approximately \$3,014,000 and \$2,749,000 in 2017 and 2016, respectively, and are included in other operating expenses.

10. RISK MANAGEMENT

The City is exposed to various risks of loss related to torts and liability, damage to and theft of or destruction of assets; errors and omissions; injuries to employees; and natural disasters. The City maintains comprehensive insurance coverage, for all City departments including the Water System, with private carriers for real property, building contents, vehicle, property and general liability insurance, police professional liability, and public officials errors and omissions insurance. Vehicle policies include liability coverage for bodily injury and property damage. Claim payments have not exceeded coverage in the past three years. There was no decline in the level of coverage from the prior year.

11. CONTRACTUAL COMMITMENTS

At December 31, 2017, the Water System had contractual commitments in the amounts of approximately \$278,000 related to property, plant and equipment improvements and additions, as well as various other contract and agreements to provide or receive services related to the Water System operations.

12. SUBSEQUENT EVENT

In March and April 2018, the City issued \$43,930,000 of Revenue Refunding Bonds. The 2018 bond proceeds, including issuance premium, were used to retire the 2017 Various Purpose General Obligation Notes reported by the Electric, Water and Wastewater Systems.

The Water System refunding bonds were issued in the amount of \$5,625,000, carry an interest rate of 4 percent, and mature in 2029.

**CITY OF HAMILTON, OHIO – WATER SYSTEM
REQUIRED SUPPLEMENTARY INFORMATION
OHIO PUBLIC EMPLOYEES RETIREMENT SYSTEM**

**SCHEDULE OF THE PROPORTIONATE SHARE OF THE NET PENSION LIABILITY
LAST FOUR MEASUREMENT PERIODS**

	<u>2017</u>	<u>2016</u>	<u>2015</u>	<u>2014</u>
Water System's proportion of the Net Pension Liability	0.0150846%	0.0143774%	0.0167181%	0.0167181%
Water System's proportionate share of the Net Pension Liability	\$ 3,425,456	\$ 2,490,354	\$ 2,016,384	\$ 1,988,353
Water System's Covered Payroll	\$ 1,876,583	\$ 1,811,517	\$ 2,074,942	\$ 2,168,223
Water System's Proportionate Share of the Net Pension Liability as a Percentage of it Covered Payroll	182.54%	137.47%	97.18%	91.70%
Plan Fiduciary Net Position as a Percentage as a Percentage of the Total Pension Liability	77.25%	81.08%	86.45%	86.36%

Note: Information prior to 2014 was not available.

The schedule is reported as of the measurement date of the net pension liability, which is the prior year end.

**SCHEDULE OF CONTRIBUTIONS
LAST FIVE YEARS**

	<u>2017</u>	<u>2016</u>	<u>2015</u>	<u>2014</u>	<u>2013</u>
Contractually Required Contributions	\$ 277,833	\$ 225,190	\$ 217,382	\$ 248,993	\$ 281,869
Contributions in Relation to the Contractually Required Contribution	<u>(277,833)</u>	<u>(225,190)</u>	<u>(217,382)</u>	<u>(248,993)</u>	<u>(281,869)</u>
Contribution Deficiency (Excess)	<u>\$ -</u>				
Water System's Covered Payroll	\$ 2,137,177	\$ 1,876,583	\$ 1,811,517	\$ 2,074,942	\$ 2,168,223
Contributions as a Percentage of Covered Payroll	13.00%	12.00%	12.00%	12.00%	13.00%

Note: Information prior to 2013 was not available.

NOTES TO THE REQUIRED SUPPLEMENTARY INFORMATION

There were no recent significant changes of benefit terms, investment policies, the size or composition of the population covered by the benefit terms impacting the actuarial valuation study for the year ended December 31, 2016.

In 2016, a five-year experience study was completed on the period January 1, 2011 through December 31, 2015. The Board adopted changes to both the demographic and economic assumptions as a result of the study. The most notable change in demographic assumptions is an increased life expectancy of the members and the most notable change in economic assumptions is the reduction in the actuarially assumed rate of return from 8.00% down to 7.50% for the defined benefit investments. The new assumptions are included in the 2016 actuarial valuation.

In 2016, OPERS, in conjunction with the Board's investment consultants, also completed an asset liability study. Periodically, the System engages in a more comprehensive study that examines the nature of the pension liabilities the plan will ultimately pay and the characteristics of the asset allocation projections and the associated level of risk. As a result of this study, OPERS modified the asset allocation slightly, but not substantively.