

## WATER AND WASTEWATER DEPARTMENT

The Bristol water system continues to operate in compliance with all state and federal drinking water standards. A consumer confidence report is generated each year that explains the quality of Bristol's water and terminology to help us understand what the Department of Environment Conservation requires we test for. It is available on our Website at [www.bristolvt.org](http://www.bristolvt.org).



The Bristol Selectboard is also the Water Commission and they review monthly budget reports, review reports from our water operators, plan for infrastructure projects, and tend to routine maintenance. They authorized the purchase of a new hand-held meter reader, which gave us the ability to use new technology to determine a water customer's usage based on time of day, day of the week, and will be compatible with radio read meters, if we go in that direction.

With engineering and project management assistance from Green Mountain Engineering, the project to upgrade the water line on West Street was completed by Munson Earth-Moving in November 2017. The project addressed many leaks in the old lines and expanded the water district by installing a new water line and fire hydrant to Lovers Lane. This will help bring on more customers, bring us closer to looping the system by connecting to the South Street waterline, improve fire protection for the area, and support development of the campus style business park on Stoney Hill.



The water line replacement project on Mountain View Street and extension to the Bristol Co-Housing on North Street was completed in 2017, resulting in fifteen new connections to the water system. Efforts continued into 2018 to work with the Woodland Apartments owner to connect the apartment complex on Woodland Drive off Lovers Lane to the water system. Interest is also being explored to extend the water line along Lovers Lane to Orchard Terrace.

In July, preventative maintenance was performed on the water storage tank by Aquastore and Liquid Engineering to preserve the structure with new cathodic protection on the inside to prevent rusting, minor repairs and cleaning the interior to keep the tank in compliance with drinking water regulations.



The Town continues to monitor leakage and address repairs. A major repair was completed on Heath Road with cooperation of the property owner. We continue to monitor metered water use against water produced to achieve as little water loss and as much efficiency as possible.

Selectboard meetings are held every other Monday night and the Water Commissioners hold an annual public meeting in the spring, where customers may voice concerns, ask questions, and make suggestions. Customers may also contact the Town Office at 453-2410 any business day, and someone will be there to help.

The Core Area sewer system continues to serve the thirty-four properties located on Main Street and Prince Lane. The Selectboard is also the Sewer Commission and holds an annual public meeting in the spring.

Two new access ports were installed on the wastewater storage tank and other minor repairs were completed. To prevent further erosion, the slope behind Main Street, just above the septic tank, was stabilized with large rocks and rip rap.

Vermont Utility Management Services (VTUMS) operates our water and wastewater systems and has a contract with the Town until June 2018. Cyrus Marsano is our local operator and may be contacted via the Town Office at 453-2410.

Respectfully Submitted,  
Valerie Capels, Town Administrator  
Cyrus Marsano, VTUMS



### Water Department Capital Fund Long Range Plan

	<u>2017-2018</u>	<u>2018-2019</u>	<u>2019-2020</u>	<u>2020-2021</u>	<u>2021-2022</u>	<u>2021-2022</u>
<b>Balance (6/30/16)</b>	92,665	88,751	87,833	76,938	0	10,600
<b>Appropriation</b>	25,000	28,000	31,000	34,000	37,000	38,000
<b>Estimated Interest</b>	111	107	105	.92	0	13
<b>Grant Revenue</b>						
<b>Total Available</b>	117,776	116,858	118,938	111,030	37,000	48,613
				<i>Leak detector &amp; remote monitor &amp; meter reader &amp; possible upgrade</i>		
	<i>replace 150 water meters</i>	<i>replace 150 water meters</i>	<i>replace 150 meters</i>	<i>of pine street water line</i>	<i>pipe locator &amp; high lift pump</i>	<i>replace 150 water meters</i>
<b>Equipment/Service</b>	29,025	29,025	42,000	111,030	26,400	29,025
<b>Closing Balance</b>	88,751	87,833	76,938	0	10,600	19,588

The following project descriptions provide backup to the spreadsheet schedule for replacement of the Water Department's capital fund shown above. This is a planning tool and it is inevitable that circumstances will arise that require the plan to be altered. This plan is meant to be revisited each year, so adjustments, either financial, or in needs, may be made. The purpose of long range planning is to maintain the equipment and system in working order and to maintain a financial commitment. This plan was designed to reduce the need for bonding for all of our equipment and service needs. This plan does not reflect any emergency repairs.

- 2017-2018** Upgrade 150 meters in district to meter guaranteed to be accurate for 20 years.
- 2018-2019** Upgrade 150 meters in district to meter guaranteed to be accurate for 20 years.
- 2019-2020** Upgrade 150 meters in district to meter guaranteed to be accurate for 20 years.  
Upgrade remote monitor at the reservoir and the meter reading equipment.
- 2020-2021** Upgrade hand held leak detecting equipment and replace or rebuild a high lift pump.
- 2021-2022** Upgrade pipe locator , replace or rebuild a high lift pump, start engineering &/or construction of water line upgrade on Pine Street.
- 2022-2023** Upgrade 150 meters in district to meter guaranteed to be accurate for 20 years.

## Water District Budget

	2016-2017	2016-2017	2017-2018	2017-2018	2018-2019
	BUDGET	ACTUAL	BUDGET	ACTUAL as of 12/31/17	PROPOSED
<b>REVENUES</b>					
Water Rents	245,000	248,493	270,709	128,598	270,710
Interest & Penalty	3,800	4,036	3,800	2,336	3,800
Water Service Connection Fees	500	2,000	500	835	500
Interest	100	-	-	-	-
Sugar Wood Revenue	625	567	625	-	625
Miscellaneous Revenue	100	63	100	-	100
<b>TOTAL REVENUES</b>	<b>250,125</b>	<b>255,159</b>	<b>275,734</b>	<b>131,769</b>	<b>275,735</b>
	-0.07%		10.24%		0.00%
<b>EXPENSES</b>					
Personnel/Labor	350	-	350	1,762	2,000
Admin/Clerical Salaries	6,834	6,961	10,131	3,396	10,425
FICA/Medicare	523	523	775	393	810
Health Insurance	1,767	1,645	3,988	852	4,000
Retirement	504	522	747	-	770
Disability Insurance	75	65	111	23	115
Supplies	10,000	6,474	11,200	5,089	12,000
Computer Supplies	200	-	200	-	200
Meters, Touchpads, etc.	6,292	5,829	250	-	2,500
Electricity - Pump	37,246	31,959	35,000	12,201	35,000
Electricity - Basin St. Building	240	228	240	93	240
Operating Contract	66,150	64,650	68,803	33,075	69,835
Contracted Services	14,100	10,822	16,500	9,602	18,500
Rent at Town Garage	400	-	400	-	400
Postage & Office Supplies	1,500	174	1,500	168	750
Communications	700	31	600	563	600
Insurance	1,500	1,353	1,520	1,292	1,500
Building Overhead & Maintenance	3,000	2,643	8,000	2,750	6,000
Compliance Testing	1,400	1,279	2,000	945	2,000
Vt Water System Fee	4,000	4,589	4,700	1,126	5,000
Property Tax - Lincoln property	360	330	360	336	360
Bond and Note Payments	66,984	26,660	80,358	51,822	71,730
Capital Reserve Fund	23,000	23,000	25,000	-	28,000
Transfer to Capital Roads - Paving	2,500	2,500	2,500	-	2,500
Miscellaneous	500	-	500	-	500
<b>TOTAL EXPENSES</b>	<b>250,125</b>	<b>192,237</b>	<b>275,734</b>	<b>125,490</b>	<b>275,735</b>
	-0.07%		10.24%		0.00%

## Sewer District Budget

	<b>2016-2017 BUDGET</b>	<b>2016-2017 ACTUAL</b>	<b>2017-2018 BUDGET</b>	<b>2017-2018 ACTUAL</b> <small>as of 12/31/17</small>	<b>2018-2019 PROPOSED</b>
<b>REVENUES</b>					
User Fees	40,174	35,848	40,500	20,009	41,280
Interest & Penalty Charges	200	554	420	0	600
Misc. & Allocation Revenue	100	250	0	250	250
<b>TOTAL REVENUES</b>	<b>40,474</b>	<b>36,651</b>	<b>40,920</b>	<b>20,259</b>	<b>42,130</b>
	7.36%		1.10%		2.96%
<b>EXPENSES</b>					
Admin/Clerical Salaries	2,644	2,663	2,724	1,360	2,800
FICA/Medicare	202	202	208	105	215
Health Insurance	530	489	997	330	1,000
Retirement	194	177	204	0	210
Disability Insurance	30	27	30	11	30
Operating Contract	9,450	9,000	9,592	4,725	9,750
Supplies	500	721	800	594	800
Insurance	182	181	202	186	200
Debt Retirement	12,317	2,561	11,874	11,019	12,300
Capital Reserve Fund	2,500	2,500	169	0	500
Maintenance & Septic Tank	9,000	16,230	11,100	2,581	11,100
Testing	1,300	1,189	1,200	612	1,200
Engineering	1,600	2,608	1,800	5,183	2,000
Miscellaneous	25	20	20	0	25
<b>TOTAL EXPENSES</b>	<b>40,474</b>	<b>38,568</b>	<b>40,920</b>	<b>26,706</b>	<b>42,130</b>
	7.36%		1.10%		2.96%