



# Belize Water Services Limited Annual Report 2018





# CORPORATE PROFILE

Belize Water Services Limited (BWS) is the national water and sewerage utility that was vested with the Assets and Liabilities of the Water and Sewerage Authority (WASA) in March 2001. The company has issued share capital of forty million (40,000,000) shares with the Government of Belize (GOB), the majority shareholder, owning approximately 82.6% of the total shares; the Social Security Board holds 10% and minority shareholders the remainder. BWS is a regulated utility - the regulatory controls include a statutory regulator, the Public Utilities Commission, the Water Industry Act (2001), an operating license issued by the PUC and a Codes of Practice which is agreed by the Regulator and BWS and updated periodically.

Belize Water Services Limited operates in licensed service areas, serving all the municipalities of the country as well as some 44 villages. As at March 2018, BWS serves over 58,800 customers or approximately 250,000 consumers, with a total average water demand of approximately 212 million US gallons per month. Over 60% of the water supplied is produced using conventional water treatment processes with rivers as its sources. Satellite water wells are used for the majority of the other water systems. In San Pedro and Caye Caulker, BWS distributes water which has been treated by Reverse Osmosis, converting sea water to drinking water.

Since inception, BWS has continuously invested in improvement of assets and implementation of improved procedures and controls to increase its efficiency. In performing all the various investment projects, most of which are expansions or improvements to water systems, BWS focuses on the requirements of our stakeholders, including our Customers, Employees and Shareholders. Fundamental to meeting the company's vision, both in the short and long term, has been the initiation of a holistic strategic approach towards improving the Company's performance. This broad-based strategy, utilizing a structured approach to balance and align initiatives, provides the Company with a firm platform, which builds on achievements and aims to achieve further objectives in the coming years.

The Company's head office is in Belize City and it administrates operations via eleven (11) offices throughout the country.

## OFFICES

### **Toll-Free (All offices)**

0-800-CALL-BWS  
[0-800-225-5297]  
(NB: BTL/Digicell only)

### **Belize City (Head Office)**

7 Central American Blvd  
Belize City, Belize  
Tel: +501 222 4757

### **Belmopan City**

3 Mountain View Plaza  
Tel: +501 822 2400

### **Benque Viejo**

7 Churchill Street  
Tel: +501 823 3720

### **Caye Caulker**

Lagoon side  
(off Calle del Sol)  
Tel: +501 226 0119

### **Corozal**

7th Avenue  
Tel: +501 422 2101



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Cover Image: Pipeline being laid to North Caye Caulker

**Dangriga**  
Market Square  
Tel: +501 522 2068

**Punta Gorda**  
New Compound Area  
Tel: +501 722 2176

**Placencia Peninsula**  
Main Road, Placencia Village  
Tel: +501 523 4036

**Orange Walk**  
5 Stadium Street  
Tel: +501 322 2382

**San Ignacio/  
Santa Elena**  
8 Liberty Street  
Tel: +501 824 2154

**San Pedro**  
Manta Ray Street  
Tel: +501 226 2749

# CHAIRMAN'S REPORT



It is my pleasure to inform you that, despite the challenges faced, Belize Water Services Limited is reporting another very successful year. The Company continues to improve operational efficiency and customer satisfaction. Our Key Performance Indicators for measures such as Water Coverage, Staff Efficiency, Collection

Efficiency, Working Ratio and Profitability, have all been improved or maintained. In fact, the continued success of BWS has led many to praise our performance. International Financing Institutions such as the Caribbean Development Bank, the Inter-American Development Bank and the World Bank continue to use BWS as a model of performance - for efficiency, for Non-Revenue Water Loss reduction, for Governance, and basically for success.

There is a popular saying "money talks"; based on this, BWS' performance speaks for itself. Financial Year 2017/18 was the third consecutive year with profits of over \$8.5 million. As a result of our continued expansion and growth, our customer connections increased by 2.8%, from 57,234 at March 2017 to 58,822 at March 31, 2018. Gross Revenue increased by 2.4%, from \$45.484M the previous year to \$46.584M for 2017/18. Despite increases in costs, the strong financial performance of the Company continued with a net profit of \$8.509M this year, well in excess of our budget. This outstanding performance has allowed us to again issue dividends at 7.5% of share value to all minority shareholders, identical to

those of the previous two years. Again, based on this strong performance and our financial forecasts, the Company was able to advise the Public Utilities Commission that it did not need to apply for any tariff changes for the new Financial Year, 2018/19. Somewhat surprisingly, however, in January 2018, the PUC initiated an Annual Review Proceeding of their own volition, with the announced intention to reduce BWS rates, because, they say, BWS has been outperforming their regulatory model! Realizing the negative financial impact of the PUC-proposed rate reduction, BWS immediately initiated a Judicial Review in the Supreme Court to challenge PUC on this matter. We are anxiously awaiting the decision of the court.

As a responsible corporate citizen, BWS takes pride in generously contributing to several social assistance programs countrywide. This year, the Company and staff provided financial, time and other in-kind contributions to a number of needy persons and entities. Our Community Assistance and Outreach programs assisted with various and multiple needs for education, arts, sports and medical. The Restore Belize Scholarship program was given the second of four annual contribution tranches of \$10,000; BWS's 4-year assistance commitment to this program guarantees high school scholarships for a number of deserving



*BWS employee assisting in Dominica*





Some of BWS Headquarters' Staff

but under-privileged children. This year, the Company's humanitarian assistance program went international. Having recently felt the effects of Earl, a category 1 hurricane, BWS felt compelled to assist our hard-hit CARICOM sister country of Dominica, which felt the devastating effects of Maria, a huge category 5 hurricane. BWS contributed a number of items to the Dominica water utility company and sent a team of four to assist them with wiring up eleven water pumping stations to be able to utilise electrical generators as the full restoration of electricity was expected to take many months. As times like these remind us, water is life ... people can survive without electricity for extended periods, but water is absolutely the most essential service for survival and health. The Board of Directors takes this opportunity to personally thank those employees for their sacrifice and commitment in helping Dominica. I will also use this opportunity to thank all staff for the efforts they put in on a daily

basis, and even more in emergency situations. I have personally witnessed several of the late night efforts to repair leaks in a timely manner so that customers and consumers can have water restored and avoid interruptions to their daily routines. I extend gratitude and admiration to the hardworking and dedicated managers, supervisors and staff of the Belize Water Services Limited.

At Belize Water Services Limited, our primary mission is to provide high quality services to our customers; we have further built on this by updating our vision statement, highlighting that we intend to be "the leading utility in the developing world, delivering excellence to stakeholders through highly trained, courteous and empowered staff."

As in previous years, our expansion continued, this year our customer base increased by 1,588 new connections; most of which are residential households. BWS is therefore proud to have contributed towards improving the lives of approximately 7,000 more consumers by providing them with excellent potable water and continuity of supply.

As the national water and sewerage utility, BWS plays many vital roles. Of foremost importance is ensuring the sustainable supply of high quality potable water to our consumers. We also ensure high quality wastewater services to those within the areas with sewer coverage. Protecting the environment is crucial to ensure protection of water

*"...the leading utility in the developing world, delivering excellence to stakeholders through highly trained, courteous and empowered staff."*





Water Treatment Plant Operators in training

sources and avoiding pollution and contamination which could endanger water sources and other areas critical to life and livelihoods, including tourism, sustainable agriculture and aquaculture. BWS continues to actively partner with the Government of Belize, International Agencies and other stakeholders in this regard.

Climate Change is here – it is real and it is having significant impacts on our world. A recent report from the Weather Channel identified that September of 2017 was the busiest month of hurricane activity on record, and that Hurricanes Harvey, Irma and Maria changed parts of Texas, Florida and the Caribbean forever.

Black & Veatch, a highly reputable global consulting firm, in their 2018 annual water report identified that one key area of focus has to be on the issue of resiliency during natural disasters. As the industry focuses more on sustainability, value and innovation, a new water economy appears to be emerging: Utilities are embracing data and infrastructure in new ways to maximize efficiencies. However, the report identifies that calls to prepare for climate change and build resilience against extreme weather events also are stretching already thin budgets. Furthermore, it identifies that “the issues of rates and affordability remain major challenges for utilities. Much work remains to help utilities communicate the value of water to a skeptical rate paying public.” As was highlighted with the cases of Dominica, Puerto Rico and the other areas hard hit by these powerful hurricanes, it only takes one crisis to realize that water is invaluable.

It has to be mentioned then, that as well as Belize Water Services has been performing, there are a number of constraints and challenges. As the preceding highlights, BWS, like water utilities across the globe, must plan for Climate Change, including water scarcity and protection of water resources. Also, like many other water utilities, the Company must operate, and where necessary or pragmatic, upgrade and replace the old and often failing pre-existing infrastructure. Financing must be found to upgrade or construct assets in order to meet the requirements of current and potential customers - we must find financing to acquire property, build adequate water treatment plants and sewerage treatment plants which must meet the highest standards, and expand our water and sewerage networks, while providing superior services to all stakeholders, with minimal interruption! Managing water resources and supply in an efficient manner

*This year, the dividend  
is at the rate of*

**11.25**

**CENTS PER SHARE,**

*matching the figure from the  
last two years.*

*This equates to a*

**7.5%**

**RETURN**

*on the share investment*



requires increased investments – in treatment, in pumping, in technology, and, of course, in Human Resources. Adequate and ongoing protection of our environment and our natural resources is a must. Put all together, these require huge investments, hundreds of millions of dollars. For a small utility in a small country, these challenges are enormous.

Yet, without the necessary investment, over time, we endanger our environment, our livelihood, our economy, and, ultimately, our lives. One case in point is the situation in San Pedro, where significant investment is now required to be able to meet the ever increasing demand for water during peak periods.

The Board continues to ensure good governance and exercise fiduciary responsibility to all shareholders and other stakeholders. The Board and its Audit and Procurement Committees met regularly throughout the year to review financial and operational performance and reports and to approve various activities and projects. This oversight ensured adherence to best practices and to established policies in alignment with the Company's strategic plan. Yet again, I am pleased to report that the Government of Belize, our majority shareholder, continued its pledged support and commitment to the Company and its largesse to minority shareholders – as in previous years, GOB continued its agreement to grant its portion of the dividends to minority shareholders. It is with much pleasure therefore that we announce the uninterrupted payment of dividend to minority shareholders for the twelfth consecutive year. This year, the dividend is at the rate of 11.25 cents per share, matching the figure from the last two years. This equates to a 7.5% return on the share investment. This return provides one of the highest yields and is far better than the rates for financial instruments in the commercial sector.

The Company will continue to execute its strategic plan aimed, not only, at improving overall performance and stakeholder relations, but also at ensuring water security well into the future. Being fully cognizant of the risks associated with climate change and population growth, BWS supports a national integrated water resources management

programme. Furthermore, we have begun to integrate climate change resiliency into all new projects and securing existing assets against the vulnerabilities of climate change. In line with this strategy, BWS is now actively seeking to implement energy efficiency and demand management in all our systems and to identify alternative or multiple supply sources for all our systems. As part of our strategic planning implementation, we are committed to continue improvements in operational and financial activities in tandem with growth and expansion of water and sewerage coverage. In collaboration with the Government of Belize, the Caribbean Development Bank and the Inter-American Development Bank, BWS has a number of ongoing and planned projects for water and sewer expansions. Preliminary studies and assessments are also underway for projects for Ambergris Caye, Placencia, and a number of other villages.

In closing, on behalf of the Board of Directors of Belize Water Services Limited, I convey our gratitude and appreciation to all shareholders - the Government of Belize, the Belize Social Security Board and the 1,400 plus smaller shareholders who have invested in the Company. We also extend appreciation to the funding agencies, particularly, the Caribbean Development Bank and the Inter-American Development Bank who have exhibited confidence in BWS and contributed to making our larger projects possible. I wish to reiterate our appreciation to the employees and the BWS Workers' Union for their continued commitment to making sure that excellence is the order of the day at BWS. Personally, I extend heartfelt gratitude to Board Members and the Management Team for their dedicated and committed efforts to make sure that BWS continues to be a success.

*Thank You.*





# MANAGEMENT DISCUSSION AND ANALYSIS

## — OVERVIEW —

The year 2017/18, the seventeenth year of operation of Belize Water Services Limited (BWS) and the third year of the Third Full Business Plan, resulted in a net profit of \$8.509 million, which is the third highest year in profit, in terms of financial performance to date. Contributing to this performance was a 2.1% increase in water sales revenue which was driven by a 1.5% increase in sales volume. There were no changes in tariffs for the year 2017/18.

### Efficiency Gains

**4.7%**

reduction in  
water loss volume,

**1.5%**

increase in  
Consumption and

**0.2%**

decrease in  
production volume.

strong support and liaison with International Financial Institutions, thereby assisting the company to continue capital investment programme; supporting expansion

to connect more customers and both new assets and improvements to assets to facilitate improved service. The cash generated from the company's operations was utilised to finance operating expenditure, debt servicing, expansion projects and other much needed capital investment by the company. GOB also continued its support of minority shareholders, who have received dividends for the twelfth consecutive year.

BWS continues to utilise a formal Strategic Planning Process to manage improvement, growth and the challenges of the future. This Strategic Business Planning methodology, adopted by the Board and Management, includes identifying the key objectives to assist with attaining the company's mission and vision and utilizing proactive approaches for creating an even more effective and efficient water utility. The company expanded on its strategy of continuous improvement by investing in resources and training and improving business processes to help with further improving efficiency. This strategy showed clear results in efficiency gains, helping the company to achieve its strategic targets and to improve service delivery to customers.

## Financial Performance

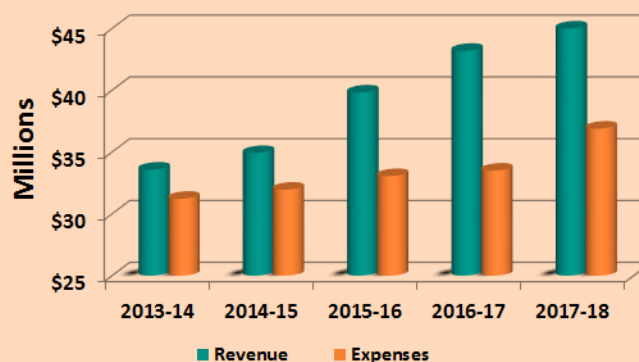
### — SALES AND INCOME —

The company's continued strategic initiative of "reaching to more" continued to drive the various water expansion projects, which added 1,588 new connections to our customer base, increasing our customer count from 57,234 to 58,822, a growth rate from the previous year of 2.8%. This growth, along with improved pressures and continuity of service, resulted in the 1.5% increase in total volume of water sold. Gross revenue for the year was \$46.584 Million, a 2.4% increase when compared to last year's revenue of \$45.483 Million.

Total Expenses increased by 3.2%, from \$36.898 Million to \$38.075 Million. This increase is attributed to increases in the customer base, areas of coverage and in total water production and inflation. As the increase in Revenue was marginally less than the increase in

Expenses, Profit declined by 0.8% from \$8.586 Million in the previous year to \$8.509 Million.

The Graph below shows the comparison of Revenues and Costs for the last 5 fiscal years.





The Earnings Before Interest, Tax, Depreciation and Amortization (EBITDA) for the year remained strong, equating to \$17.418M (37.4% of Revenue), almost similar to \$17.215M (37.8% ) in the previous year. Due to increases in costs mentioned above, EBIT, the Earnings Before Interest and Tax, was \$11.304M, up 1.2% from the previous year's figure of \$11.453M.

Water related sales provided income of \$44.979 million (\$44.076 M previous year), other services provided income of \$1.298 million (\$1.235M previous year) resulting in gross revenue for the year of \$46.584 million (\$45.483M last year). The average tariff for water sales was \$17.72 per thousand US gallons (last year's average tariff was \$17.59 per thousand US gallons).

## — DIVIDENDS —

For the twelfth year in a row, the Board of Directors was able to approve dividend payment to the minority shareholders. This decision is supported by the Government of Belize, the majority shareholder, having formally agreed to grant its dividend payments to the minority shareholders until 2020 in order to assist both the company and the minority shareholders. The Board declared total dividends amounting to \$0.758M or about 8.9% of net profit.

Based on the 40 million shares issued, the net profit of \$8.509M equates to earnings of approximately \$0.21 (twenty-one cents) per share which is similar to previous year. Thanks to the GOB directive, this dividend was distributed solely to minority shareholders who received dividends equivalent to \$0.1125 (11.25 cents) per share.

## — MAJOR COSTS AND EXPENSES —

The table insert shows the breakdown of costs for FY2017/18 as compared to the previous financial year.

Costs Summary	FY 2017/2018		FY 2016/2017	
	Total (BZ\$'000)	Percent of Total	Total (BZ\$'000)	Percent of Total
*Water Purchases	6,163	16.19%	5,472	14.85%
*Electricity	2,252	5.91%	2,384	6.47%
*Staff Costs	11,376	29.88%	10,423	28.27%
Other direct/Operating Costs	9,415	24.73%	9,990	27.10%
<b>Total direct costs &amp; Expenses</b>	<b>29,206</b>	<b>76.71%</b>	<b>28,269</b>	<b>76.69%</b>
*Depreciation	6,114	16.06%	5,762	15.63%
*Interest expense	1,943	5.10%	2,039	5.53%
Taxes & Fees	813	2.13%	793	2.15%
<b>Total Other Expenses</b>	<b>8,869</b>	<b>23.29%</b>	<b>8,594</b>	<b>23.31%</b>
<b>Total Costs and Expenses</b>	<b>38,075</b>	<b>100.00%</b>	<b>36,864</b>	<b>100.00%</b>
<b>*Total Major Costs</b>	<b>27,848</b>	<b>73.14%</b>	<b>26,081</b>	<b>70.75%</b>

Staff Costs, Interest, Water Purchases, Depreciation and Electricity remain the major costs for the company. The main direct costs continued to be Staff Costs, Water Purchases (San Pedro) and Electricity. The major indirect costs are Depreciation, Loan Interest Expense, and Taxes.

## — LOANS, GRANTS AND DEBT SERVICING —

The majority shareholder, GOB continues to assist by covering debt repayments to the Caribbean Development Bank for loans #5 and #10 which totalled \$2.416M in principal and interest payments for this financial year. As in previous years, BWS, with the support of GOB, was the recipient of several grant facilities. For 2017/18 grants were obtained from the Caribbean Development Bank (CDB), the Inter-American Development Bank (IDB), the Caribbean Regional Fund for Wastewater Management (CReW) and the US Trade and Development Agency (USTDA). USTDA contributed approximately US\$0.5M for an energy efficiency study. All other grants are being utilized primarily for technical assistance consultancies and training.

At the beginning of the 2017/18 financial year, BWS had outstanding loans of \$41.632 million. There was one drawdown of \$4,707K from the Belize Wastewater

Revolving Fund (BWRP). At March 31, 2018, the total outstanding loan balance was increased to \$43.046 million. The Table insert summarises the Loan balances and debt servicing cash requirements over the last two financial years.

### Loan Movement and Debt Servicing

Net Loan Movement	2017/18	2016/17
Beginning Balance	41,632	44,981
Draw downs/Increases	4,707	302
Principal Repaid	3,293	3,651
Principal Balance	43,046	41,632
<b>Total Debt Servicing</b>		
Principal Repaid	3,293	3,651
Interest Charges	1,943	2,039
<b>Total Debt Reduction</b>	<b>5,236</b>	<b>5,690</b>

All figures in BZ\$ '000

## — ASSET EXPANSION AND IMPROVEMENT —

During 2017/18, investments in new assets totalling \$17.054 million were undertaken with approximately \$0.580 million being contributed by the Government of Belize (GOB). Loan drawdowns of \$4.707 million from the Belize Wastewater Revolving Fund assisted with the completion of the Belmopan wastewater expansion project which added approximately 420 sewer service connections. Other than Belmopan wastewater expansion project, this year BWS also extended our wastewater system in Boca Del Rio area of San Pedro, which added approximately 61 sewer connections.

The company continues its strategic focus of expanding our water network in various municipalities and replacing aged infrastructures to improve on our pressure

management controls and service delivery. Major investments in water network expansions are ongoing in Corozal, Orange Walk, Cayo and the Belize District. Generator Buildings were constructed in Teakettle, Benque Viejo, and Calcutta, Corozal. A building was acquired and refurbished to serve as the branch office for Benque Viejo. The refurbishment of water treatment plants and storage reservoirs in Dangriga and Placencia Peninsula were also completed to better meet the peak demand. In addition, two new wells were commissioned at Punta Gorda, and Santa Elena. The overall investment in assets inclusive of new assets, refurbishments and maintenance was \$20.248 million in 2017/18 as compared to \$15.450 million in 2016/17.

The table insert shows the breakdown of the Investment in Assets and Asset Improvement over the last two financial years.

New Assets, Refurbishment and Maintenance	2017/18	2016/17
Plant & Equipment	5,824	3,665
Water Expansion	11,230	8,343
<b>Total New Assets</b>	<b>17,054</b>	<b>12,008</b>
Developer's Contributions & Grants	(974)	(5,468)
<b>BWS Expenditure</b>	<b>16,080</b>	<b>6,540</b>
Repairs & Maintenance	3,194	3,442
<b>Total Assets &amp; Maintenance</b>	<b>20,248</b>	<b>15,450</b>

All figures in BZ\$ '000





BWS and BEL representatives at Benque Viejo Opening

## — GOVERNMENT CONTRIBUTIONS —

The Government of Belize remains committed to the company and its shareholders and continues to forego the collection of its share of dividends. This continued solid assurance shown to BWS and its minority shareholders helps to ensure that the consumers can afford this life-essential service.

\$5.7M, made up as shown in the table insert.

During the course of FY 2017/18, GOB has contributed both directly and indirectly

Government Contributions	2017/18	2016/17
Debt Repayment	2,416	2,395
Expansion Projects	580	447
GST Savings - Zero Rated Status	2,750	2,371
<b>Total Contributions</b>	<b>5,746</b>	<b>5,213</b>
All figures in BZ\$ '000		

## Operations

### — OVERVIEW —

During the year 2017/18, the company achieved a number of operational improvements and successes - continuity of service was sustained above 99%, average pressures increased by 5.2%, and expansion helped to increase our customer base in all branches.

The comparison of the key performance indicators (KPIs) for the reporting year to the previous year is shown in the table below.

Initiatives to which helped propel the continued improvement included: continued training certification of our employees; process improvements in water supply, treatment and delivery; and similar improvements to wastewater collection and treatment systems.

Additionally, investments were undertaken to expand and improve the sewer collection, transportation and treatment systems.

Operating KPI's	Year 2017/18	Year 2016/17	%Change
Water Production	3,350.9	3,356.2	0.2%
Water Sales	2,542.5	2,505.4	1.5%
Non-Revenue Water Volume	808.4	850.8	-5.2%
Non-Revenue %	24.12%	25.35%	1.23%
Volume Figures are in Millions of US Gallons (MUSG)			



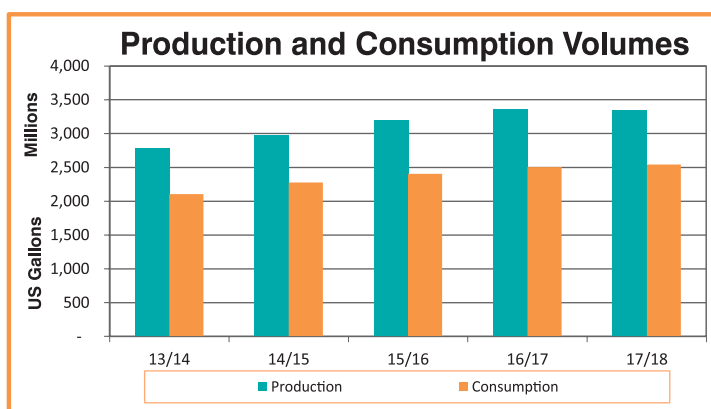
*Tie-in of 14" main on Philip Goldson Highway*

## — PRODUCTION AND CONSUMPTION —

The 2,542.5 million US gallons (MUSG) of potable water consumed during the year is the highest in the company's seventeen (17) year history. This 1.5% increase in sales volumes was achieved via water network expansions and growth in service connections, combined with a high continuity of supply percentage, increased pressures and our continued expansion program.

Thanks to our continued Non-Revenue Water loss reduction programme, despite the increase in consumption, production was reduced by 0.2%. There were a number of other gains in operational efficiency - these included: 0.3% decrease in electricity consumption; 0.9% increase in gallons produced per Kwh of electricity consumed; and 0.3% decrease in Chlorine consumption.

The Chart below highlights the movement in water production and consumption volumes for the last five (5) years.



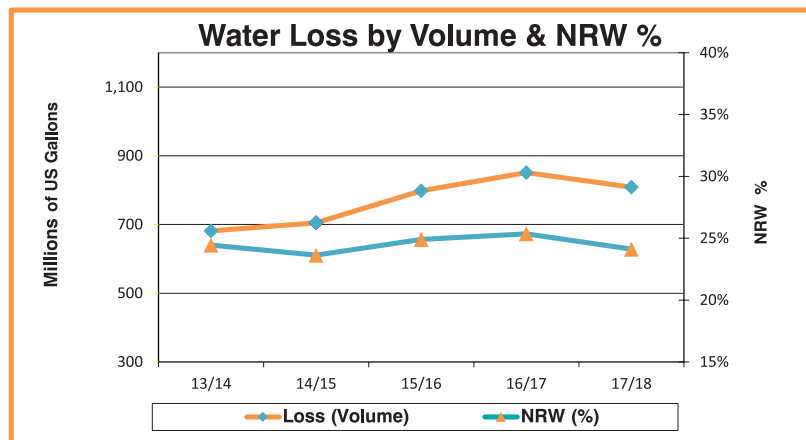
## — NON-REVENUE WATER (NRW) LOSSES —

The 808.4 MUSG water loss volume for this financial year is a decrease from the 850.8 million MUSG of the previous year. This resulted in a decrease of the overall NRW percentage from 25.4% in the previous year to 24.1%, which is the second lowest in the BWS's seventeen (17) year history. The company's water loss reduction programme includes proactive searching and repairing of leaks, replacing older water mains, identification/removal of illegal connections, and pressure management controls. During the year, the company continued its proactive replacement of aged infrastructure, and the identification and elimination of unauthorized connections and tampering.

This company remains proud of the achievement in keeping NRW below 25%. This figure is well below many water systems in

even the most developed countries and is among the very best in the Caribbean and Latin America.

The Chart below highlights the movement in water loss volume and NRW percentage for the last five (5) years.





# Customer Services and Billing

## — OVERVIEW —

For the fiscal year 2017/18, the company embarked on several new initiatives to improve our service delivery to our customers. A new branch office was opened in Benque Viejo del Carmen to serve our customers in that municipality more effectively and efficiently. This office operates a joint utility (BWS/BEL) office for the area. Another initiative was to reach out to our customers immediately during the billing period

whenever inconsistencies were found with their reading; this allowed us to identify meters that were not working and leakages at customers premises in a timely manner. Other initiatives included improved focused communications to inform affected customers of events, continued staff training and further improvements in business processes.

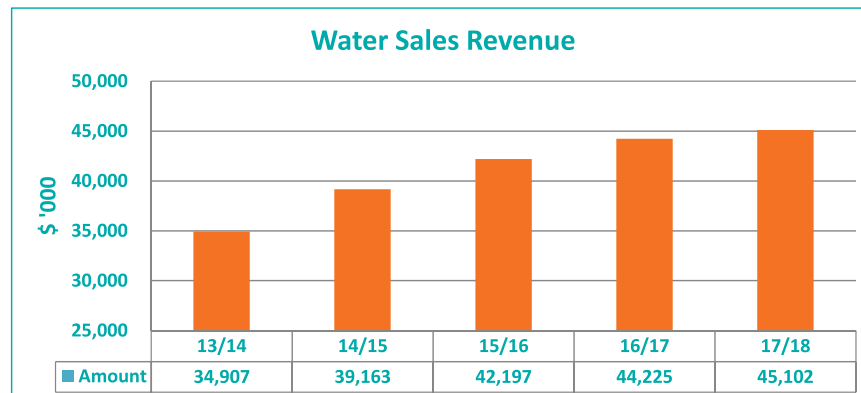


## — SALES —

In 2017/18, the gross water sales revenue was \$45,102M, 1.9% more than the same period last year. The 1.5% increase in total water consumption from 2,505.4 MUSG previous year to 2,542.5 MUSG is the result of a 2.5% increase in our customer base. However, the influx of new customers led to a decrease of 1% in

the average monthly sales volume per connection, from 3,704 to 3,649 US gallons, which was only partly offset by increased consumption by existing customers. The average tariff per 1,000 gallons increased by 1.0%, from \$17.59 to \$17.69, but the average monthly income per connection decreased by 1%, from \$65.33 to \$64.73.

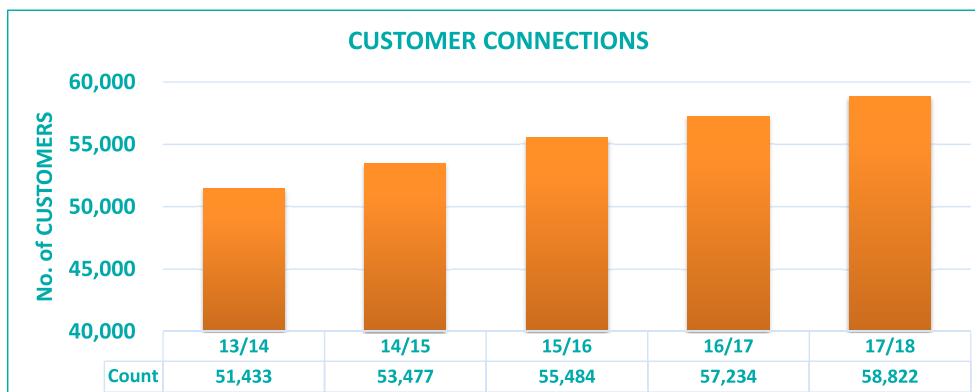
The chart insert illustrates the trend in annual Water-related Sales Revenue.



## — CUSTOMER CONNECTIONS AND ACCOUNTS —

During the year, the number of customers who requested discontinuation of their services was 2,111;

new installations were 4,614, of which 1,669 were new customer accounts. These, along with the net of disconnections and reconnections, resulted in a net increase in our customer base of 1,588 customers. At the end of the fiscal year, the active customer base had grown by 2.5%, from 57,234 to 58,822 water connections.



The chart highlights the growth in our customer connections over the last 5 years.



## Engineering and Projects

### — OVERVIEW —

During 2017/18 financial year, BWS completed 101 projects of varying sizes. The main focus areas of our capital expenditure program included:

- Improving Customer Satisfaction
- Increasing Customer Base
- Improving Resources
- Improve public health and environment

### — WATER DISTRIBUTION SYSTEMS —

Approximately \$3.0 million was invested in our water network expansion programme, expanding the water network systems by 92,830 feet and providing water to 2,374 immediate beneficiaries. Additionally, the Company invested approximately \$1.8 million on the upgrade and

replacement of water mains countrywide including 59,303 feet of water mains and 951 service connections in the reporting year. These works included the supply and installation of new pipes and fittings, flushing, pressure testing and disinfection.

### — CIVIL AND BUILDING WORKS —

Over thirty projects in this category were completed. These included new constructions, renovations and/or expansions and other improvements of existing facilities. Included in this list are water treatment plants, generator and chemical dosing buildings, water pumping stations, sewer lift stations, office buildings and compounds. Two of the most notable are:

Commissioning of 100,000 Gallon Ground Tank in Seine Bight: This included renovation, repairs and connection of an existing tank to increase the storage for the area to help meet high seasonal demands. The

Placencia Peninsula now has four functional storage tanks - 2 elevated and 2 ground tanks. The additional tank permits preventative maintenance works without affecting supply.

New Branch Office in Benque Viejo Del Carmen: We acquired and renovated a two-story building with approximately 5,000 square feet. This allowed us to quickly establish a new branch office to serve our customers in this municipality more efficiently. The facility now serves as a joint utility office for BWS and BEL customers.



The table below includes a summary of some of the major civil and building works completed within the year.

Branch	Description
Corozal	New Branch Office renovation (rental)
	Santa Rita Pump Station Refurbishment
	New Generator and Chemical Dosing Building, Calcutta
Belize	Improvements and renovations to HQ Building
	Welding Shed, Security Hut and Bathroom at Wilson Street
	Fence for Double Run Water Treatment Plant
Belmopan	New Generator and Chemical Dosing Building, Teakettle
San Pedro	New Operations Office
Cayo	Improvement of Santa Elena Branch office
	New well on Cristo Rey Road, Santa Elena
	New Branch Office in Benque Viejo
	New Generator and Chemical Dosing Building, Benque Viejo
Dangriga	New Water Treatment Plant Building
Placencia Peninsula	Office Improvements & Refurbishment
	Mechanical and Electrical Improvement of Placencia Pumping Station
	Supply and Install Generator at Placencia Intake
	Commissioning of 100,000 gallon Ground Tank in Seine Bight
Punta Gorda	New well in Forest Home
Various	Removal of unusable Elevated Tanks from Orange Walk, Corozal, San Pedro, Rockville and Punta Gorda.

*Water mains were extended accross new Macal Bridge to supply water to Santa Elena.*



## — MAJOR FUNDED AND SPECIAL PROJECTS —

The capital projects described below are those funded by external funding agencies that were either begun in the year under review, or were work-in-progress from prior year. The more significant of these are:

### **Belmopan Wastewater Expansion Project:**

This \$8 million project was successfully completed during 2017/18. The goal of the Project is to support economic development and improve the quality of life for the residents of Belmopan through environmental improvements. The Wastewater Treatment Plant was upgraded to meet international environmental standards for treated wastewater and 20,426 feet of Sewer main, 421 sewer connections, 79 manholes and 1 pumping station were installed.

### **Boca Del Rio, Sewerage Expansion Project, San Pedro:**

This project installed 2,210 feet of wastewater pipe, 61 new sewer connections, 10 manholes and 1 pumping station at cost of approximately \$2 million.

### **Macal Bridge Crossing, San Ignacio/Santa Elena:**

Piggy-backing on the new road and bridge constructed across the Macal River by Government of Belize, BWS routed a new 8" main including a pipeline on the new bridge at cost of \$530,000. This has significantly improved the water pressure to, and alleviated the many complaints from, the Bradley's Bank, and Trapiche areas.

## — ON-GOING PROJECTS —

For the purposes of this Report “On-going Projects” refer to those capital projects, funded by external funding agencies, that were either begun in the year under review; or, those projects that were begun in prior years but were work-in-progress at some time during the year ended March 31, 2018. Four such projects, highlighted in the last Annual Report, and which are on-going includes:

- Detailed Designs for the Expansion of Water and Wastewater Facilities on North Ambergris Caye;
- Nutrient Fate and Transport (NFT) Study on

the Placencia Peninsula, Lagoon, and Surrounding Marine Areas; and

- Water Utility Climate Risk and Vulnerability Assessment.
- Feasibility Study – Clean (Alternate-Wind and Solar) Energy Integration for Water Treatment Plants, Belize Water Services

The first three (3) projects are being funded by the Caribbean Development Bank (CDB), while the fourth project was funded by United States Trade and Development Agency (USTDA).

## — UPCOMING PROJECTS —

Looking forward The Company will proceed to complete the three uncompleted projects in the upcoming financial year, and quickly move to construction phase for:

- The North Ambergris Caye Water and Wastewater Expansion Project; and
- The Placencia Wastewater Management Project.

Furthermore, BWS has identified Grant funds to undertake two (2) new studies in the upcoming year, namely:

- Development of a Gender and Public Relation Policy; and
- Determining Full Feasibility of Biogas from Municipal Sewage Lagoons Belize

The latter new feasibility study, ‘Biogas from Municipal Sewage Lagoons’, will complement the Clean (Alternate-Wind and Solar) Energy Study previously completed.

BWS has commenced discussion with Belize Electricity Limited (BEL) for BWS to produce its own energy from environmentally friendly alternate energy sources and sell excess power to their (BEL) grid. This conversation is encouraging and BWS will take definitive steps to implement and generate its own power from alternate energy sources.

These projects going forward will promote and achieve BWS’s strategic goals to, (i) foster a better appreciation of and protect the environment and our natural resources to guarantee the continued supply of safe water; and (ii) Improve organizational capacity, secure qualified personnel and more modern technologies to ensure operational efficiencies.



# Human Resources and Public Relations

## — STRATEGIC PLAN EXECUTION —

During 2017/18, the company organized and delivered various training aligned to our organizational capacity strategic objectives of improving knowledge and skills and improving employee trust and engagement. Numerous training sessions were effectively and efficiently delivered resulting in more qualified employees. Our certification program has resulted in 50 employees being further certified in their respective areas of practice. This had the added benefit of helping some of these employees to be promoted within their respective departments or units.

Some initiatives included training and development via workshops, which included climate change.

*“Numerous trainings aligned to strategic objectives were delivered.”*

Other initiatives included staff recognition for high performers, those receiving promotions and long-tenured employees. These help to promote our commitment to excellence, and serve as a motivator for the recipients and an encouragement for others.

The permanent staff numbers showed a 2% increase in this financial year, from 287 to 294. These hires were strategically done to achieve the highest possible output. For the same period, temporary employee numbers increased from 97 to 115 or 16% growth. The latter were to keep pace with the increased demands for the large number of projects being executed countrywide.

## — EMPLOYEE PERFORMANCE & DEVELOPMENT AND WELLBEING —

In 2017/18, the company recorded 1,142 instances of employee participation in training sessions; this equates to an average of approximately 4 trainings per employee. These sessions were geared towards improved practices and business processes, safety in the workplace and formal certifications.

30 employees at various levels, including supervisors, foremen, technicians and field workers, completed water and wastewater management courses and water production certification programs at the introductory level; while fourteen completed the advanced level courses. Water treatment plant operators continued their certification in Water Treatment Plant Operation. These certifications validate the capabilities of employees and provides the company with skills necessary to achieve our mission and vision.

Human Resource Department and PR was also instrumental in leading the development of career paths with clear objectives and guidance so employees can be guided on their development. This has resulted in 14 employees being promoted across the company.

During this financial year, the company also celebrated eighteen loyal and dedicated employees for long service awards. Our Staff Performance and development process, when appraised showed a positive upturn in competency and overall deliverables during this financial year. Of the 274 tenured employees appraised, 238 or 88% were recognized as performing well and were awarded performance-based incentives.



**Award ceremony for Office of Water Programme Certificates**

## — PUBLIC RELATIONS AND COMMUNITY OUTREACH —

BWS, during this financial year was engaged with the communities in which we serve. Our Community Assistance and Outreach programs continues to be effective as donations were given to meet community and social needs, education, sports and some medical needs. Donations were aligned to our strategic objective of improving stakeholder relationships. On the national level we partner with NGO's like the Cancer



Cancer Walk

Society, the Diabetes and Kidney Association, and the Wildlife Conservation Society. During the year, we made contributions

of \$22,000 to national sports representations, \$49,000 in community activities and \$25,000 in education. This included the Restore Belize Scholarship programme which received their second \$10,000 annual tranche as part of the 4-year assistance program that provides high school scholarships for deserving children. BWS continues to be an active and responsible citizen in communities we serve. On several occasions, staff cooperated in promoting initiatives which contributed to needy persons, schools and children.

The company maintained its public communication as we forged forward with developmental projects, providing more connections to both new and existing service areas. Customers and the public were kept up-to-date on interruptions, low pressures and other related issues facing the company.

## Support Services and Programmes

### — INFORMATION TECHNOLOGY —

With one key strategic objective being “Improve Resources and Technology”, Information Technology provides the necessary platforms and will continue to be a key driver to a number of our strategic initiatives. We continue upgrading our hardware and software infrastructure to keep pace with modern technology, to serve as a platform for improved business processes and to mitigate against emerging threats and risks.

During 2017/18, one of the most significant projects was the adoption of Microsoft Sharepoint services and the relocation of our e-mail from our data centre to the cloud. This relocation allows us to ensure that our service is available 24/7, even during hurricanes and power failure. Using Sharepoint has provided additional software tools to facilitate improvements in efficiency, better track and analyse requests for intra-departmental assistance, collaborate on projects with MS Teams, provide feedback and post updates in real time. The synergistic effect is that our staff feel better connected, informed and empowered to suggest new ideas. We have upgraded our core network infrastructure to facilitate business growth over the next ten years alongside upgrading network bandwidth. As a 24/7/365

business, continuity of service is at the forefront of our endeavours and this year we have utilized BTL's LTE service to provide a backup to the fibre connections at our Treatment Plant facilities.

BWS continues to provide the convenience of making payments via the banks and through payment agents. Collection options remained consistent on a month by month basis with BWS collections accounting for roughly 70% of all collections and on-line bank and agent collections accounting for the remaining 30%.

Looking ahead, after concentrating efforts in planning for Geographic Information Systems (GIS), we anticipate the implementation and development of applications in phases commencing over the next fiscal year. We will continue to assist in expanding our SCADA network and associated monitoring and reporting systems. We continue to look for a customer service relationship system that will incorporate the required GIS features as well as offer new and exciting ways for our customers to interact with us.



# Internal Audit

With the completion of the Enterprise Risk Management Framework late last year, Internal Audit embarked on its first set of risk-based audits. Internal Audit planned and executed risk based audits focused on four of the seven departments. These audits focused on the Operations, Customer Services, Information Technology and Human Resources Departments.

Ensuring that quality service is provided to customers is one of our biggest goals. During the year we have executed and completed numerous engagements including spot checks and verifications. Management remains committed to continuous improvement in providing service to our valued customers.

The Internal Audit complement continue to receive training to continue to add value to the company. These trainings included Network Security Auditing, Risk Proofing Your Organization, The Right Way to Manage Risk and Data Analytics to name a few. One of the major accomplishments during the year was gaining certification as a Certified Information Systems Auditor. Through these trainings, Internal Audit is better able to assist Management and the Board of Directors with close monitoring of risk.

Board and Management's commitment to improvement, combined with Internal Audit's continuous monitoring, resulted in better processes and controls being implemented.



## — HEALTH AND SAFETY —

With improving Health and Safety being one of the key strategic objectives, a number of initiatives were executed to improve Health and Safety and staff awareness during 2017/18. BWS, in partnership with the National Safety Council of America, delivered defensive driving to its authorized drivers in an effort to reduce unnecessary costs, be a courteous citizen on the road and, most importantly, to protect our most important asset – our employees.

The staff safety committee continued with branch visits and regular worksite inspections. We are proud to report increased awareness and safety consciousness. Each project being executed now considers safety as part of the planning process; ensuring that staff have and wear their protective gear is now part of our standard operating practice. We also maintain a record of safety failures and for each such incident clearly identify and communicate improvements or changes to practices, processes and resources. As a highly responsible corporate citizen, BWS aims to minimize risks to staff and the public.



**Santa Cruz Booster Station**