WATER SUPPLY ADVISORY COMMITTEE

Monday, November 6, 2023
1975 Field Road, Sechelt, B.C.

AGENDA

CALL TO ORDER **3:30 p.m.**

AGENDA

1. Adoption of Agenda

PRESENTATIONS AND DELEGATIONS

BUSINESS ARISING FROM MINUTES AND UNFINISHED BUSINESS

MINUTES

2.	Water Supply Advisory Committee Meeting Minutes of September 11, 2023	Annex A Pages 1-2

REPORTS

3.	Water Rate Structure Study Committee of the Whole Staff Report, September 28, 2023 *Manager, Strategic Initiatives*	Annex B Pages 3-135
4.	Process for bringing forward Committee Recommendations *Manager, Strategic Initiatives*	Verbal

COMMUNICATIONS

NEW BUSINESS

NEXT MEETING January 8, 2023, 1975 Field Road

ADJOURNMENT

SUNSHINE COAST REGIONAL DISTRICT
WATER SUPPLY ADVISORY COMMITTEE

September 11, 2023

RECOMMENDATIONS FROM THE WATER SUPPLY ADVISORY COMMITTEE MEETING HELD IN THE CEDAR ROOM OF THE SUNSHINE COAST REGIONAL DISTRICT AT 1975 FIELD ROAD, SECHELT, BC.

PRESENT:	Chair	V. Macfarlane
	Vice-Chair	J. Bell
	Members	B. Fielding
		S. Fitchell
		K. Freemantle
		M. Hennessy
		B. Thicke
Regrets:		S. Leech
		G. Moore
		L. Chivers

ALSO PRESENT:

(Non-voting)	Manager, Strategic Initiatives	M. Edbrooke
	Water Sustainability Coordinator	G. Starsage
	Director, Area A	L. Lee
	Public	2

CALL TO ORDER 3:45 p.m.

AGENDA The agenda was adopted as presented.

MINUTES

Recommendation No. 1 *Water Supply Advisory Committee Meeting Minutes of May 6, 2023.*

The Water Supply Advisory Committee recommended that the Water Supply Advisory Committee meeting minutes of May 6, 2023, be received.

REPORTS

Integrated Sustainability presented a verbal presentation on the 2023 SCRD Water Demand Analysis.

Discussion included the following:

- Questions about the community water use assumptions of the Water Demand Model.
- Confirmed drought period was set to 200 days to represent a low snowpack and early snow melt with a long dry season until November 15.
- Clarification that the SCRD water sourcing policy was moved to a performance-based scenario of staying within Stage 2.

- Discussion about model assumptions and if more scenarios should be considered.
- Question if an extensive hydrological study could be completed.
- Approaches to how we can meet the water deficit and discussions about Langdale, Church Road, operations of the system.
- Question on how to support the shíshálh Nation reservoir proposal.
- Staff encouraged further feedback on the Water Demand Analysis by email.

Manager, Strategic Initiatives, opened the floor to discussion on future WASAC Meeting Topics

Discussion included the following:

- WASAC has interest in reviewing the Water Rate Structure Report once completed and a presentation.

NEXT MEETING November 6, 2023, 3:30 p.m. online via Zoom

ADJOURNMENT 5:44 p.m.

SUNSHINE COAST REGIONAL DISTRICT STAFF REPORT

TO: Committee of the Whole – September 28, 2023

AUTHOR: Tina Perreault, General Manager, Corporate Services / Chief Financial Officer

SUBJECT: SUNSHINE COAST REGIONAL DISTRICT WATER RATE STRUCTURE STUDY

RECOMMENDATION(S)

(1) THAT the report titled Sunshine Coast Regional District Water Rate Structure Study be received for information;

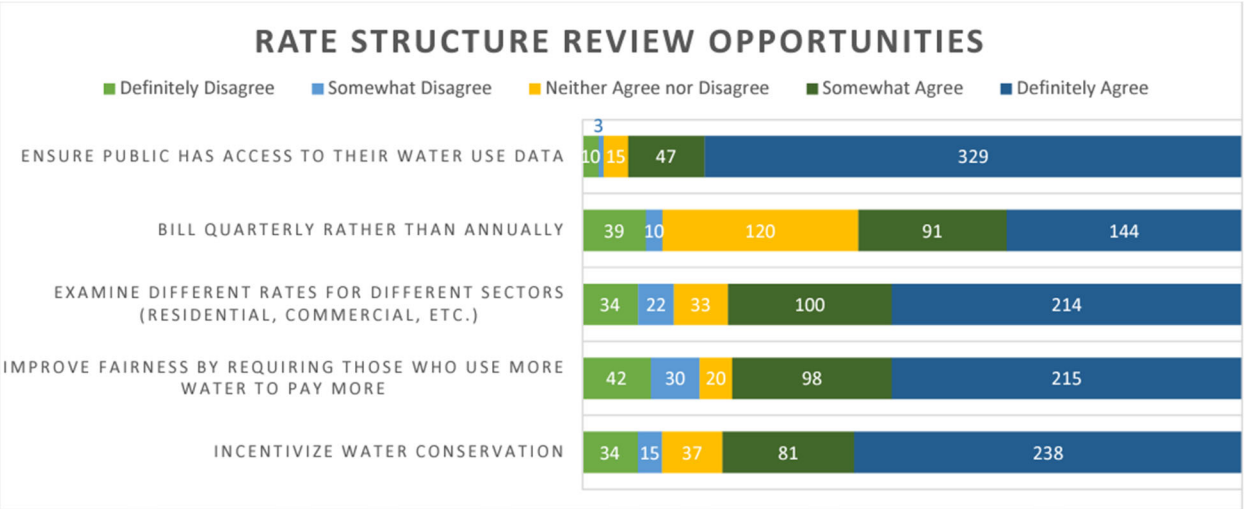
(2) AND THAT a project implementation plan to incorporate volumetric billing, starting with the North Pender Harbour and South Pender Harbour Water Services, be presented as part of the 2024 Budget deliberations.

BACKGROUND

The Sunshine Coast Regional District (SCRD) provides residents with drinking water through three distinct water services; North Pender Harbour Water Service (NPHWS), South Pender Harbour Water Service (SPHWS) and Regional Water Service (RWS). The annual operating cost of these services is recovered through User Fees charged to every parcel with a service connection.

All service connections within the NPHWS and SPHWS currently have water meters installed. The final phase of meter installations is underway for the RWS, it is anticipated that by the end of 2025 all service connections in the RWS will have meters installed. The SCRD's current water rate structure is based on a flat rate for the majority of users. Metered commercial users are charged volumetrically for the water they use.

A summary of a recent request for public opinion shows a desire for improvements to the water rate structure to better incentivize water conservation and to associate consumption with cost of service.



To better understand the potential rate structures that could be implemented, a Water Rate Structure Study contract was awarded to InterGroup Consultants in December 2022. InterGroup completed the report "Sunshine Coast Regional District 2023 Water Rate Structure Study" in September 2023 (Attachment A).

The purpose of this staff report is to summarize the InterGroup report and present recommendations for next steps.

DISCUSSION

The SCRD sought guidance on the selection and implementation of water rate structure options that promote fairness, stability, and recommended implementation strategies. InterGroup conducted a review of the SCRD's current approach for water billing and provided recommendations to achieve a more equitable rate structure across all Water Service Areas.

Rate Structure

InterGroup compared the SCRD's current water rate structure (*Option 1: Status Quo*) with two common best practice approaches:

i) a fixed charge based on service connection size combined with a charge based on metered water usage (*Option 2: Uniform Rates*); and

ii) a similar rate structure as Option 2 but also considers additional seasonal meter rates (*Option 3: Seasonal Rates*).

The allocation of targeted cost recovery for each component of the charges would determine the specific rates. Figure 2 below shows an excerpt from InterGroup's report summarizing their comparison.

	Option 1 - Status Quo	Option 2 - Uniform Rates	Option 3 - Seasonal Rates
Rate Equity[1]	X	XX	X
Better price signals/Conservation incentive		X	XX
Mixed-user residential		X	X
Rate congruency		X	X
Revenue Predictability	XX	X	X
Bill impacts[2]	X	X	X
Simplicity, ease to use	XX	XXX	X

Figure 2: Comparison of three Water Rate Structures (InterGroup Report)

The table suggests greater advantages with conservation and congruency for 'Option 2: Uniform Rates' and 'Option 3: Seasonal Rates' than 'Option 1: Status Quo'. While Option 2 is simpler, there can be greater incentive for conservation using Option 3.

InterGroup also considered inclining/declining block rates in their study. These incorporate different rates as the overall consumption crosses pre-defined thresholds. Although there is greater potential to incentivize conservation with inclining blocks in particular, these rate structures are not recommended until both volumetric billing and a more frequent billing period are employed.

Implementation

InterGroup's report highlights that water meters are necessary to implement volumetric billing and recommends that the RWS Area (which includes Chapman, Langdale, Eastbourne, Granthams and Soames Water Systems) should not consider a volumetric rate structure until the water service area is fully metered. A phased approach to volumetric billing could begin for the fully metered NPHWS and SPHWS Areas.

InterGroup recognizes the challenges for all parties when instituting changes to billing structures and highlights the importance of appropriately pacing the rate of change when introducing new rate structures. Option 2 considers an initial allocation target of 80% of service costs to be recovered through fixed charges and 20% through volumetric rates. Since the operational expenses of SCRD water services are not directly correlated to the volume of water that is delivered, this moderate ratio minimizes the risk that conservation actions will result in operational deficits.

InterGroup recommends gradually adjusting this ratio of fixed-to-variable charges as the behavioral impacts of the new rate structure are better understood. The nature of the SCRD's water usage may benefit from seasonal or inclining block rates to better promote timely water conservation. InterGroup did not recommend moving to an inclining rate structure at this time, given the current stage of organization development, and suggested this option be revisited later.

Analysis

Option 2 ranked the highest among the proposed rate structure options. Of the three options, this option best balanced conservation incentives, rate congruency, and simplicity. InterGroup recommends that this option be implemented across all SCRD Water Service Areas, starting with NPHWS and SPHWS.

This recommended rate structure is similar to that used by the Town of Gibsons, with the exception that inclining block rates are not recommended in the initial phase of implementation. InterGroup suggests that inclining blocks should be introduced later.

The SCRD typically has a seasonal water supply deficit requiring timely conservation. Option 3 best aligns with this challenge. It is possible to introduce seasonal rates while still maintaining a conservative ratio of fixed variable charges.

Implementation of a new rate structure is anticipated to require further work to communicate and implement the necessary changes internally and externally. Initiating public engagement quickly, and providing users with insight into how their current usage patterns would be reflected under a revised rate structure, would help to ease the transition.

It is recommended that the Board direct staff to develop a project implementation plan to begin the transition to volumetric billing starting with the NPHWS and SPHWS Areas as part of the 2024 Budget deliberations.

Organization and Intergovernmental Implications

The project implementation plan will seek to articulate the projected organizational impact of adopting a new water rate structure as well as proposed timelines for the water services.

Work is underway to update and modernize *SCRD Water Rates and Regulations Bylaw No. 422* (Bylaw 422). Changes to water rate structures and associated policy considerations will also be contemplated as part of the implementation plan.

Financial Implications

The project implementation plan will seek to better define the financial implications associated with adopting a new water rate structure, including staffing resources.

Communications Strategy

The project implementation plan will include consideration for communicating the decision to change the rate structure.

STRATEGIC PLAN AND RELATED POLICIES

A water rate structure review supports the advancement of the Boards Strategic Plan and aligns with the Financial Sustainability policy in seeking to ensure service delivery is fair and equitable.

CONCLUSION

The SCRD hired InterGroup to provide recommendations on potential changes to the SCRD rate structure for user fees in the RWS, NPHWS and SPHWS Areas. Given the need for increased fairness, efficiency, and conservation of SCRD drinking water, the shift to volumetric billing is an important intervention to build resilience and address the complex challenges of water supply management. A proposal to begin the process of volumetric billing will be provided as part of the 2024 Budget deliberations for the Boards consideration.

Attachment A – Sunshine Coast Regional District 2023 Water Rate Structure Study, September 2023

Reviewed by:			
Manager	X – G. Starsage	Finance	
GM	X – R. Rosenboom	Legislative	X – J. Hill
CAO	X – D. McKinley	Other	

Sunshine Coast Regional District 2023 Water Rate Structure Study

InterGroup
CONSULTANTS

Prepared by: InterGroup Consultants Ltd.
300-259 Portage Ave
Winnipeg, MB R3B 2A9

Submitted to: Sunshine Coast Regional District
September 2023

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EXECUTIVE SUMMARY

The Sunshine Coast Regional District (SCRD) water utility infrastructure includes approximately 9,759 connections (approximately 50% are metered connections) in the Regional Water Service Area, 918 connections in the South Pender Harbour Water Service Area (100% metered connections), and 770 connections in the North Pender Harbour Water Service Area (100% metered connections) in 2023.

As per *SCRD Water Rates and Regulation Bylaw No. 422* (the bylaw), under the current water rate structure, a quarterly metered volumetric rate is generally applied to commercial water users. All other customers are charged an annual flat rate.

The Regional District will complete installation of water meters in all water service areas by 2025 and this presents the opportunity to redesign the water user fee rate structures. User fees are for the daily operations and maintenance of each water service area, with remaining funds placed into an operating reserve fund for unexpected expenses and future operations.

InterGroup Consultants Ltd. ("InterGroup") was retained by the Regional District to examine, analyse, and recommend changes to the Regional District's water rate structure for its three Water Service Areas that can accomplish the following objectives:

- Ensure rates contemplate the short and long-term financial needs of the service such as cost recovery for operational needs and capital renewal;
- Consider a user pay approach (pay for what you use opposed to a flat rate);
- Promote water conservation and more conscious water use;
- Create a mechanism to establish rate stability;
- Provide a rate model whereas the SCRD has the flexibility to update; and
- Be simple to understand for staff, users, and the public.

The rate structure options developed for this study were based on the review of cost-of-service analysis and discussions with the Regional District staff, and designed based on the following criteria prioritizing solutions for considerations identified by the Regional District:

1. **Rate equity:** (revenue-cost-coverage ratio) to ensure rates contemplate an approach, where all users are contributing equitably in proportion to the cost of the Water Service Area.
2. **Better price signals/conservation incentive:** Consider a user pay approach.
3. **Mixed-use residential:** Consider mixed-use residential properties that are not currently addressed in the bylaw, meaning a property that brings together several uses, either through a single building or several buildings on a single property. For example, a residence and a business on the same property.

4. **Rate congruency:** Rate structures and user classification differ by Water Service Areas as a result of district growth and incorporation of previously existing community operated water systems.
5. **Revenue predictability:** The rate structure options must create a mechanism to establish revenue stability and reflect a gradual (phased) approach to rates structure changes to avoid rate spikes.
6. **Bill impacts:** The Regional District has heard concerns about affordability challenges that could arise from a new rate structure. The ongoing sustainability of the service is also a concern from maintaining existing service levels, adapting to growth, and climate change pressures.
7. **Simplicity:** for staff, users, and the public, and easy to update.

The rate structure options presented in this report for consideration of the Regional District include the following:

- **Option 1 –** Status Quo: Current rate structure (flat rates for unmetered customers).
- **Option 2 –** Uniform rates: a single volumetric rate per cubic meter plus fixed charges that correspond to water service connection (i.e., meter size or customer class).
- **Option 3 –** Seasonal rates: a time differentiated charge rate that varies by time period. Volumetric rates vary between Winter (i.e., Q1 and Q4) and Summer (i.e., Q2 and Q3) months.

Note: Options other than Status Quo require customer base to have meters installed and operating. Currently, the Regional Water Service Area does not have meters installed for all customers. Assumptions for consumption profiles were required for determining volumetric rates so revenues and rates supporting the study findings are **illustrative**. For illustrative purposes, a hypothetical revenue target of $10 million was used for the cost-of-service analysis and rate options. This is used to compare the revenues and rate impacts among the reviewed scenarios. As well, the rate structure options were analyzed assuming targeting 80% recovery of revenues through fixed charges to mitigate a risk of revenue instability resulting from uncertainty of how customer consumption would change from the possible implementation of volumetric rates.

Table below summarizes how Options 1, 2, and 3 meet each of the rate structure objectives prioritized by the Regional District.

Objectives for the Proposed Rate Structure Options

	Option 1 - Status Quo	Option 2 - Uniform Rates	Option 3 - Seasonal Rates
Rate Equity[1]	X	XX	X
Better price signals/Conservation incentive		X	XX
Mixed-user residential		X	X
Rate congruency		X	X
Revenue Predictability	XX	X	X
Bill impacts[2]	X	X	X
Simplicity, ease to use	XX	XXX	X

Notes:

1. Rate equity can be achieved for status quo through rebalancing rates among the customer classes.
2. Bill impacts will vary across customer classes and consumptions levels depending on the rate structure.

Summary comparison of the proposed rate structure options are provided below.

RCC Ratio/Equity

- Option 1: The current rate structure indicates higher cost recovery from metered customers and under-recovery of costs from apartments/mobile homes and motels/hospitals.
- Option 2: Uniform rate structure as proposed achieves 100% RCC ratio across rate classes.
- Option 3: Seasonal rate structure as proposed also achieves 100% RCC ratio for all classes, except motel/hospital, which indicate 85% RCC ratio. However, this class makes up only about 1% of allocated costs.

Better price signals/ Conservation incentive

- Option 1: The current rate structure does not have price signals for unmetered customers.
- Option 2 and Option 3: Both rate structures offer a price signal/conservation incentive via a variable charge (Seasonal rate structure offers the highest price signal/conservation incentive).

Rates Congruency/ Mixed-use Residential

- Option 1: The current congruency and muti-use residential issues remain.
- Option 2 and 3: Both rate structure options provide supporting basis for any rate differences. Rate classes can be collapsed (i.e., simplified) and categorized by meter size. This also resolves mixed-use residential customer rate definition issue.

Bill impacts:

- Option 1: This is the status quo.
- Option 2 and 3: Customers with lower consumption will pay less than customers with higher consumption as compared to flat rates. When the same overall utility revenue is targeted under each rate structure, for existing metered customers average bills in all Water Service Areas would decrease as compared to the existing rate structure (a decrease in the existing metered revenue would be offset by an increase in the newly added metered customers revenue). Rate setting, however, was not the focus of the current study, and once a new rate structure is implemented, a rate setting exercise would deal with rate subsidies and affordability specifically.

Simplicity

- Option 1 is simple and easy to use (does not require consumption metering and billing for majority of customers). However, the basis for the existing rate differences by customer class is not supported by COSA analysis.
- Option 2 is the simplest to understand by staff, users, and the public and easy to implement.
- Option 3 may require an education program by the utility to explain the structure to customers.

The uniform and seasonal rate structures require meters to be installed for all customers, however, SCRD has not yet completed the Regional Water Service Area meters installations. It is recommended that the Regional District wait until meters are installed for all customers before changing the Regional Water Service Area rate structure to include a volumetric rate for all customers.

However, given North Pender Harbour and South Pender Harbour Water Service Areas are 100% metered, as an interim phase, the Regional District could implement a uniform or seasonal rate structure in these Water Service Areas. This would help the Regional District understand how customers respond to a volumetric rate structure and improve the effectiveness when a similar rate structure is applied to the Regional Water Service Area.

InterGroup also reviewed Increasing block rate structure and Decreasing block rate structure options for completeness of the review.

- Decreasing block rate structure is contrary to the Regional District's objective of water conservation and more conscious water use. Therefore, this option is not recommended for the Regional District's consideration and was not analyzed in detail.
- Increasing block rate structure is currently in place in several peer regional districts reviewed in this study. However, given the current rate structure, billing frequency, information on water usage by customer classes, and a gradual approach to alternative rate structure considerations, InterGroup does not recommend implementing an inclining block rate structure at this time.

The study overall presents the following recommendations for the Regional District's consideration:

- If a decision is made with respect to transitioning to a volumetric metered rate structure, then the Regional District should consider a phased approach and implement a uniform or seasonal rate structure for North Pender Harbour and South Pender Harbour Water Service Areas to encourage water conservation and a user pay approach as these areas are 100% metered.
- Do not transition the Regional Water Service Area to a volumetric rate structure (e.g., uniform, seasonal) until all customers are metered to ensure rate payer fairness.
- Do not implement an inclining block rate structure until the Regional District has a more conservative volumetric rate structure in place to better understand the change in consumption habits of customers and their consumption profiles. After a few years of experience with a volumetric rate structure, another study is recommended to investigate implementing an inclining block rate structure. This ensures gradualism by first having customers become accustomed to volumetric pricing before moving to a rate structure with tiered pricing.
- Complete a comprehensive water demand study once meters are 100% installed to understand customer peaking requirements and customer consumption habits for each of the Water Service Area customer classes.
- Move to more frequent billing with information on water consumption used. The frequency of billing would need to consider available resourcing and capacity before a decision on the frequency is made. More frequent billing and information on water consumption used would allow for timely price signalling for customers to be able to respond to fluctuating bills based on water consumption.
- If a decision is made to implement a volumetric rate structure, then consider revising the customer classes from the current structure to a structure based on meter sizes and water usage. This would help address the issue of billing for mixed-use residential properties.
- InterGroup recommends the Regional District Board consider revising the District's Financial Sustainability Policy to implement a minimum reserve balance and consideration of an annual capital reserve contribution for each of the Water Service Areas. This would help to ensure the sustainability of the utilities and lessen the burden on frontage fees from future major capital projects.

1.0 INTRODUCTION AND OVERVIEW

The Sunshine Coast Regional District ("Regional District") is located in Southern British Columbia along the west coast and northwest of Vancouver. The Regional District is comprised of the District of Sechelt, Town of Gibsons, and the shíshálh Nation Government District, in addition to, the Egmont/Pender Harbour, Halfmoon Bay, Roberts Creek, Elphinstone, and West Howe Sound electoral areas.[1] The Regional District has a population of approximately 32,000 people.[2]

The Regional District provides drinking water to approximately 24,000 residents and businesses in three Water Service Areas. Each Water Service Area is distinct as outlined through a regional district service establishing bylaw that defines how the service will be provided, which areas participate, types of rates, and how the costs will be recovered through service charges. Therefore, each Water Service Area has different rates and a separate budget set to achieve cost recovery for that service.

The Regional District's water utility infrastructure includes approximately 9,759 connections (approximately 50% are metered connections) in the Regional Water Service Area, 918 connections in the South Pender Harbour Water Service Area (100% metered connections), and 770 connections in the North Pender Harbour Water Service Area (100% metered connections) in 2023.

The Regional District will complete installation of water meters in all water service areas by 2025 and this presents the opportunity to redesign the water user fee rate structures.

The following considerations were noted by the Regional District with respect to rate structures in the hypothetical Water Service Area:

- **Equity:** The existing bylaw generally applies the metered rate to commercial properties. The Regional District wishes to use an approach that is consistent across all water users, where all users are contributing equitably in proportion to the cost of the Water Service Area.
- **Affordability:** The Regional District has heard concerns about affordability challenges that could arise from a new rate structure. The ongoing sustainability of the service is also a concern from maintaining existing service levels, adapting to growth, and climate change pressures. For example, how will this impact low-income water users would be determined through a rate setting exercise to have targeted rate subsidies for customers who cannot consume below a certain threshold.
- **Mixed-use residential:** The bylaw does not currently address mixed-use residential, meaning a property that brings together several uses, either through a single building or

[1] The Sunshine Coast Regional District webpage: https://www.scrd.ca/electoral-areas-and-municipalities/
[2] Statistics Canada 2021 Census of Population: https://www12.statcan.gc.ca/census-recensement/2021/dp-pd/prof/details/page.cfm?Lang=E&SearchText=sunshine%20coast&DGUIDlist=2021A00035929&GENDERlist=1,2,3&STATISTIClist=1&HEADERlist=0.

several buildings on a single property. For example, a residence and a business on the same property.

- **Congruency:** As the Regional District has grown over time, Water Service Areas previously managed by community operated water systems have been incorporated into the Regional District. As a result, rate structures and user classification differ by Water Service Areas.

InterGroup Consultants Ltd. ("InterGroup") was retained by the Regional District to examine, analyse, and recommend changes to the Regional District's water rate structure for its three Water Service Areas that can accomplish the following objectives:

- Ensure rates contemplate the short and long-term financial needs of the service such as cost recovery for operational needs and capital renewal;
- Consider a user pay approach (pay for what you use opposed to a flat rate);
- Promote water conservation and more conscious water use;
- Create a mechanism to establish rate stability;
- Provide a rate model whereas the SCRD has the flexibility to update; and
- Be simple to understand for staff, users, and the public.

Through this study, InterGroup has completed the following tasks:

- Review and understand the Bylaw and all current service charges collected by the Regional District through its three Water Service Areas.
- Sales analysis for a hypothetical Water Service Area by billing class/connection type. This information was used to determine hypothetical rate revenues at existing and proposed rate structures, as well as for illustrative bill comparison purpose.
- A cost-of-service analysis (COSA) for the hypothetical Water Service Area to determine what cost differences, if any, exist between serving the various customer classes. This exercise helps to understand the costs that are incurred in providing service to different types of customers.
- Develop and assess rate structure options, and recommended rate structure, with justifications, within the abilities of Regional Districts that meets current and future service needs.
- Financial analysis on alternatives with how the proposed hypothetical rates will meet (cover) current and future operational and capital needs of the water services.
- Summary of alternative rate structures considered, including financial analysis.
- Suggested timelines for a rate structure implementation.
- Preparation of public communication strategies for proposed rate structure and rate setting changes, for example mock billing.

2.0 FINANCIAL ANALYSIS

2.1 REVIEW AND UNDERSTAND CURRENT CHARGES

The Regional District adjusts water rates and charges annually. The most recent Fees and Charges were updated by the Sunshine Coast Regional District Bylaw No. 422.42.[3] In accordance with this Bylaw the 2023 user rates are set as follows:

- Water Utility User Rates:
  - For metered accounts per quarter:
    - Regional Water Service Area – quarterly meter rental charges ranging $9.00 to $60 by meter size plus a minimum consumption charge of $162.87 per quarter; and $1.93 per m3 for consumption beyond approximately 84 m3/quarter.
    - North Pender Harbour Water Service Area- minimum charge of $344.99 per quarter; and $3.90 per m3 for consumption beyond 227 m3/quarter.
    - South Pender Harbour Water Service Area- minimum charge of $272.48 per quarter; and $2.81 per m3 for consumption beyond 45 m3/quarter.
  - User fees are charged annually at the following flat rate:
  - Regional Water Service Area:
    - A single dwelling unit - $651.49
    - Motels - $344.25 per unit
    - Apartments - $524.48
    - Mobile homes - $524.48 per occupied pad
    - Hospitals and Intermediate Care Facilities - $344.25 per bed
    - All other users - $651.48 per user
  - North Pender Water Service Area:
    - A single dwelling unit - $918.12
    - Multiple family dwelling - $1,651.69
    - Institutional building - $843.24
    - All other users - $918.11 per user
  - South Pender Water Service Area:

[3] https://www.scrd.ca/wp-content/uploads/2023/04/422-Water-Rates-and-Regulations-consolidated-to-include-422.42-in-effect-from-2023-JAN-12-to-present.pdf

- A single dwelling unit - $762.95
- Multiple family dwelling - $762.95
- Office or place of business wherein is employed not more than one person - $762.95
- Office or place of business wherein is employed more than one person - $1,089.89
- For each clubhouse or hall - $1,089.89
- All other users - $762.95 per user

- Lands classified as farm land pay annual land charges based on land size.

The SCRD generally charges commercial businesses the metered rate. All other customers are charged annual flat rates.

2.2 CURRENT AND FUTURE WATER SERVICE NEEDS

The Regional District's Financial Planning Policy states:

Each service budget must include all projected costs related to providing that service including a share of support service allocation costs as per the Board's Administrative Support Services Allocation Policy.

The Regional District prepares 5-year Financial Plan with detailed operating expenses by year and sources of revenue. Accordingly, water user fees and charges are adjusted annually to ensure recovery of budgeted expenses.

With respect to capital expenses, the District's Financial Sustainability Policy 4.12.2 states:

Parcel Taxes, frontage fees, capital grants, or other revenues will be used to fund major capital projects associated with the service. In some cases, capital may be more appropriately funded through property taxation, such as debt servicing costs or minor capital purchases.

Further, the Financial Planning Policy 4.7 (Reserve Funds) states:

a) Any financial plan will consider reserve fund levels for those services that expose the SCRD to a level of risk and/or that require the ongoing replacement and acquisition of capital items. Budgeted reserve contributions strive to balance immediate service needs and taxpayer impacts with longer term funding requirements.

b) The financial plan considers reserve contribution requirements of services where an asset management plan is an integral part of the service's long-term fiscal management.

Also, as per the Financial Sustainability Policy 4.15.1, *the District will review all services to identify the appropriate uses and level of reserves and /or rate stabilization funds recommended for each service.*

It is understood that currently any reserve contribution is made via adjustments to the frontage fees.[4]

InterGroup had an opportunity to review high-level capital expenditures and debt costs. According to the 2023-2027 Financial Plan, total revenues from frontage fees are forecast at about $5.1 million for 2023[5]. Based on a review of the Regional District's forecast debt costs and capital expenditures for the next several years, the current revenue levels from frontage fees appear insufficient to generate reserve contributions over the forecast expenses.

InterGroup recommends the Regional District Board consider revising the District's Financial Sustainability Policy to implement a minimum reserve balance and consideration of an annual reserve contribution for each of the Water Service Areas. This would help to ensure the sustainability of the utilities and lessen the burden on frontage fees from future major capital projects.

2.3 SALES ANALYSIS

A sales analysis was completed for the three Water Service Areas by analyzing the total number of customers across the three Water Service Areas and the consumption amounts by customer classes. The analysis throughout the report uses a hypothetical $10 million revenue target for developing the cost-of-service and hypothetical rate options analysis. Table 2-1 shows the sales analysis by number of customers and consumption by customer classes.

Table 2-1: Sales Analysis by Customer Classes

	Number of Connections (2022 Actual)	Total Volume (m3)
Metered Users		
Subtotal	263	260,016
Unmetered Users		
Water MFD	579	89,586
Water SFD & Other	12,430	2,180,995
Water Institutional	109	14,941
Subtotal	13,118	2,285,522
Total	13,381	2,545,538

[4] Frontage fees are defined as frontage and parcel taxes throughout this report.
[5] Sunshine Coast Regional District 2023-2027 Financial Plan: https://www.scrd.ca/wp-content/uploads/SCRD-2023-2027-Financial-Plan-Final-Version.pdf

3.0 COST OF SERVICE ANALYSIS

The rates charged to each customer class within each Water Service Area Utility should be developed based on principles of "cost of service". This involved determining a fair allocation of total costs to the various rate classes based on their usage characteristics for each Water Service Area Utility.

The cost-of-service study provides an opportunity to check the reasonableness of the current rate structure. The calculation of cost to serve customer classes are based on equivalent meter sized ratios as per the Manual of American Water Works Association, M1 Principles of Water Rates, Fees, and Charges, 7th Edition ("AWWA Manual"). Equivalent meter size ratios are determined by the investment required to maintain meters and the associating meter flows. A revenue to cost coverage (RCC) ratio is calculated by dividing revenues from a class by the costs to serve that class. An RCC ratio of over 100% indicates that revenues exceed costs and that customers in that class are paying higher rates than the costs to serve them. An RCC ratio of below 100% indicates that revenues do not fully recover the costs to serve that class of customers. RCC ratios are generally not at 100% and it is an industry practice to target an RCC ratio between 95% to 105%.

A cost-of-service analysis was completed for a hypothetical Water Service Area Utility using hypothetical rates, a hypothetical $10 million revenue target, and the aggregate 2022 consumption and number of connections of all three water service areas to determine cost allocations for each customer class. The cost-of-service analysis used the following assumptions:

1. Utility costs are based on a $10 million hypothetical system cost of Water Service Area (i.e., service area recovers its budget costs).
2. The target revenue from fixed charges is set at 80% (variable charge revenue target is 20%).
3. Fixed cost allocation is based on Equivalent Meter Size Ratios as per the Manual of American Water Works Association, M1 Principles of Water Rates, Fees, and Charges, 7th Edition (AWWA Manual).

The SCRD does not have purely variable costs for the water utilities (e.g., water purchase costs) and all operating costs are associated with providing service to the customers. The selection of targeting 80% recovery of revenues through fixed charges is to mitigate a risk of revenue instability resulting from uncertainty of how customer consumption would change from the possible implementation of volumetric rates. The cost-of-service analysis for the hypothetical Water Service Area is described in more detail in Appendix A.

3.1 ILLUSTRATIVE COST OF SERVICE ANALYSIS

Table 3-1 presents the results of the cost-of-service breakdown by customer class based on a hypothetical system cost of $10 million, current customer counts and volume estimates. The results were used to compare RCC ratios by customer class for each rate structure options discussed in section 4.0.

Table 3-1: Illustrative Cost of Service Allocation for Water Service

	Number of Connections (2022 Actual)	Total Volume (m3)		Cost ($000's)
Metered Users				
Subtotal	263	260,016	$	587
Unmetered Users				
Water MFD	579	89,586	$	402
Water SFD & Other	12,430	2,180,995	$	8,937
Water Institutional	109	14,941	$	74
Subtotal	13,118	2,285,522	$	9,413
Total			$	10,000

4.0 RATE STRUCTURE OPTIONS

4.1 RATE STRUCTURE OPTIONS DEVELOPMENT APPROACH AND JUSTIFICATION

Rate design is the method by which utilities set rates to recover the costs of providing service to customers. Rate design seeks to balance a number of objectives that sometimes compete with each other. There are many possible rate designs for a utility that will recover the required revenue.

The rate structure options developed for this study were based on the review of the study objectives and discussions with the Regional District staff, and designed based on the following criteria prioritizing solutions for considerations identified by the Regional District:

1. **Rate equity:** (revenue-cost-coverage ratio) to ensure rates contemplate an approach, where all users are contributing equitably in proportion to the cost of the Water Service Area.
2. **Better price signals/conservation incentive:** Consider a user pay approach.
3. **Mixed-use residential:** Consider mixed-use residential properties that are not currently addressed in the bylaw, meaning a property that brings together several uses, either through a single building or several buildings on a single property. For example, a residence and a business on the same property.
4. **Rate congruency:** Rate structures and user classification differ by Water Service Areas as a result of district growth and incorporation of previously existing community operated water systems.
5. **Revenue predictability:** The rate structure options must create a mechanism to establish revenue stability and reflect a gradual (phased) approach to rates structure changes to avoid rate spikes.
6. **Bill impacts:** The Regional District has heard concerns about affordability challenges that could arise from a new rate structure. The ongoing sustainability of the service is also a concern from maintaining existing service levels, adapting to growth, and climate change pressures.
7. **Simplicity** for staff, users, and the public, and easy to update.

InterGroup analyzed and reviewed the following rate structure options for consideration of the Regional District:

- **Option 1 –** Status Quo: Current rate structure (flat rates for unmetered customers).
- **Option 2 –** Uniform rates: a single volumetric rate per cubic meter plus fixed charges that correspond to water service connection (i.e., meter size or customer class).
- **Option 3 –** Seasonal rates: a time differentiated rate that varies by time period. Volumetric rates vary between Winter (i.e., Q1 and Q4) and Summer (i.e., Q2 and Q3) months.

- **Option 4 –** Increasing block rates: the unit price of each succeeding block of usage is charged a higher volumetric rate than the previous block.
- **Option 5 –** Decreasing block rates: the unit price of each succeeding block of usage is charged a lower volumetric rate than the previous block.

The volumetric rate options (option 2 through 5) reviewed reflect a single rate per cubic meter by customer class and fixed charges that vary by meter size. This approach is based on the current rate structure concerns and common rate objectives identified by the Regional District and included in the AWWA Manual. In particular, (i) promoting fairness and equity (i.e., cost-based); and (ii) maintaining simplicity, certainty, convenience, feasibility and freedom from controversy. Also, to allow for improved price signalling while promoting conservation and rate stability, gradually introducing a single volumetric rate charge per cubic meter will allow for customers to improve water literacy by becoming accustomed to monitoring consumption levels and price signals.

From the cost-of-service perspective, there is no practical reason for setting different rates per cubic meter of consumption, as the unit cost of the water commodity is the same for all consumers (not considering customer and demand related costs, which would be different as the related capacity costs of these customers on the utility system would be different).

Therefore, many municipalities implement a rate structure with a single rate per cubic meter, while capturing the demand (i.e., peak) and customer (size) cost differences via fixed charges by meter size. This is aligned with the simplicity/feasibility objectives criterion. This also appears to be a practice of peer municipalities reviewed for this study (Nanaimo, Comox Valley, and Central Kootenay regional districts, which do not have rates differ by customer class).

Another consideration for selecting options with a single rate per cubic meter by customer class is the objective of gradualism (i.e., minimizing unexpected changes to customer bills). The Regional District currently has mainly flat rate structure, and it is recommended that if a decision is made to transition to a metered rate structure, then in the first phase a single volumetric rate is introduced to minimize bill impacts, as well as have a more simple structure to communicate to the public. This can be evolved to different volumetric rates by customer class in future revisions if so desired.

Further, moving to a volumetric rate structure allows defining the rates by meter size and water usage which resolves the mixed-use residential concern. This can be done by simplifying classes based on similar charges and/or by meter sizes.

Options 2 through 5 also target the volumetric charge to recover 20% of revenues with the balance recovered via fixed charges. This ratio was selected as part of a phased approach to reduce the revenue risk and ensure cost recovery. Considering that the Regional District have not had a metered rate structure for majority of their customer base, it is difficult to estimate how customers' consumption profiles will change in response to the implementation of a volumetric charge component at this time. If a volumetric rate structure is implemented a target volumetric ratio can be adjusted in the future as the new structure becomes more established.

Option 5 is contrary to the Regional District's objective of water conservation and more conscious water use. Therefore, this option is not recommended for the Regional District's consideration and was not analyzed in detail.

Option 4 is a rate structure that is currently in place in several peer regional districts reviewed in this study. In particular, Central Kootenay, Comox Valley, Cowichan Valley, and the Town of Gibsons all have inclining block rates based on a review of their rate structures. However, given the current rate structure, billing frequency, and information on water usage by customer classes, InterGroup does not recommend implementing an inclining block rate structure at this time for the following reasons:

- The current billing cycle is quarterly for metered customers and annual for unmetered customers. This does not provide adequate price signalling where customers will have a three-month lag to respond to any necessary changes in their consumption habits and billing.
- The current rate structure has a majority of customers paying an annual flat rate. Changing to a block rate structure will require customers who may not be conscious of their water consumption levels to change their consumption habits in a timely manner or face higher water bills.
- This option is more complex, requiring information and analysis of customer usage patterns and peaking requirements, which is not currently available in the Regional District, and especially in the Regional Water Service Area, where only approximately half of customer base is metered. This information is required to accurately complete a cost-of-service analysis for the implementation of a block rate structure.
- This option is difficult to implement if the utility does not already have a volumetric rate structure in place.
- The inclining block rate structure is more difficult to communicate to customers and definitions of rate blocks can be based on more than one rationale.
- The selection of block sizes and associated rates can dramatically affect the equity of rate design.
- Revenue predictability: the inclining block rate structure tend to result in more revenue volatility than other rate structures.

However, once volumetric rates are in place, this structure can be evolved to a block pricing in the future, when more data is available, which is aligned with the rate stability objective and a phased approach to rates structure changes in the current study.

Options 1 through 3 were analyzed separately for a combined Water Service Area and discussed in the following sections.

Note: all options other than Status Quo require customer base to have meters installed and operating. Currently, the Regional Water Service Area does not have meters installed for all

customers. Assumptions for consumption profiles were required for determining volumetric rates so revenues and rates under the alternative options are **illustrative**.

Illustrative revenues and rate calculations under these options are provided in Appendix B.

4.2 ILLUSTRATIVE RATE OPTIONS

Option 1: Current Rate Structure

The current rate structure (or status quo) uses a mixed rate structure with flat rates for unmetered customers and a fixed and volumetric charge after a certain threshold for the metered customers. Table 4-1 shows the illustrative revenues for a $10.0 million hypothetical target based on the current customer counts and volume estimates from **Option 1** - current rate structure.

Table 4-1: Illustrative Revenues Under the Current Rate Structure

	Number of Connections (2022 Actual)	Total Volume (m3)		Revenues ($000's)
Metered Users				
Subtotal	263	260,016	$	626
Unmetered Users				
Water MFD	579	89,586	$	338
Water SFD & Other	12,430	2,180,995	$	8,974
Water Institutional	109	14,941	$	42
Subtotal	13,118	2,285,522	$	9,354
Meter Rentals Subtotal	207		$	20
Total			$	10,000

Option 2: Uniform Rate Structure

Under **Option 2** rates apply a uniform volumetric charge to each customer class, and a fixed charge based on meter size. The volumetric charge is set to recover 20% of revenues and the varying fixed charges are based on meter size according to the AWWA manual equivalent meter size ratios. The equivalent meter size ratios are determined by the investment required to maintain meters and the associating meter flows. Table 4-2 shows the illustrative revenues from **Option 2** - uniform rate structure.

Table 4-2: Illustrative Revenues Under the Uniform Rate Structure

	Number of Connections (2022 Actual)	Total Volume (m3)		Revenue ($000's)
Metered Users				
Subtotal	263	260,016	$	587
Unmetered Users				
Water MFD	579	89,586	$	402
Water SFD & Other	12,430	2,180,995	$	8,937
Water Institutional	109	14,941	$	74
Subtotal	13,118	2,285,522	$	9,413
Total			$	10,000

Option 3: Seasonal Rate Structure

Under this option two uniform volumetric charges are applied to each customer class dependent on the season, and a fixed charge based on meter size. The volumetric rates vary for Summer (i.e., April to September) and Winter (i.e., October to March) months to account for the different levels of consumption between Summer and Winter months. The volumetric charges are set to recover 20% of revenues and the varying fixed charges are based on meter size according to the AWWA manual equivalent meter size ratios. Table 4-3 shows the illustrative revenues from **Option 3** - seasonal rate structure.

Table 4-3: Illustrative Revenues Under the Seasonal Rate Structure

	Number of Connections (2022 Actual)	Total Volume (m3)		Revenue ($000's)
Metered Users				
Subtotal	263	260,016	$	583
Unmetered Users				
Water MFD	579	89,586	$	408
Water Regional SFD & Other	12,430	2,180,995	$	8,936
Water Institutional	109	14,941	$	73
Subtotal	13,118	2,285,522	$	9,417
Total			$	10,000

Table 4-4 shows the hypothetical revenue to cost coverage ratios for the three rate options. The results show for the MFD and Institutional the RCC ratio would be below the average revenue recovery under the current rate structure and the seasonal rate structure. These customer classes revenues do not fully recover the costs to serve that class of customers. For the Metered customer class, the RCC ratios would be above the average revenue recovery under the current rate structure, indicating this customer class revenues are paying higher rates than the costs to serve the Metered customer class. Under the uniform and seasonal rate structure, all customer classes would be recovering the costs the serve that class of customers.

Table 4-4: Hypothetical Cost of Service Analysis Equity Under the Rate Options

	Cost ($000's)	Illustrative Revenue at Current Rate Structure ($000's)	RCC Ratio	Illustrative Revenue at Uniform Rate Structure ($000's)	RCC Ratio	Illustrative Revenue at Seasonal Rate Structure ($)	RCC Ratio
Metered Users							
Subtotal	$ 587	$ 646	110%	$ 587	100%	$ 583	99%
Unmetered Users							
Water MFD	$ 402	$ 338	84%	$ 402	100%	$ 408	102%
Water SFD & Other	$ 8,937	$ 8,974	100%	$ 8,937	100%	$ 8,936	100%
Water Institutional	$ 74	$ 42	57%	$ 74	100%	$ 73	98%
Subtotal	$ 9,413	$ 9,354	99%	$ 9,413	100%	$ 9,417	100%
Total	$ 10,000	$ 10,000	100%	$ 10,000	100%	$ 10,000	100%

4.3 SUMMARY OF RATE OPTIONS

Table 4-5 summarizes how Options 1, 2, and 3 meet each of the rate structure objectives prioritized by the Regional District.

Table 4-5: Objectives for the Proposed Rate Structure Options

	Option 1 - Status Quo	Option 2 - Uniform Rates	Option 3 - Seasonal Rates
Rate Equity[1]	X	XX	X
Better price signals/Conservation incentive		X	XX
Mixed-user residential		X	X
Rate congruency		X	X
Revenue Predictability	XX	X	X
Bill impacts[2]	X	X	X
Simplicity, ease to use	XX	XXX	X

Notes:

1. Rate equity can be achieved for status quo through rebalancing rates among the customer classes.

2. Bill impacts will vary across customer classes and consumptions levels depending on the rate structure.

Summaries of advantages and disadvantages for each rate structure option are provided below.

Option 1: Current Rate Structure

- Advantages:
  - The current rate structure offers the highest revenue/rate stability among the options reviewed, as only a small portion of water revenue is impacted by consumption profile changes.
  - The current rate structure is also simple and easy to use (does not require consumption metering and billing for majority of customers).
- Disadvantages:
  - The rates are not equitable between metered and unmetered rates. The current rate structure indicates higher cost recovery from metered customers and under-recovery of costs from MFD and Industrial. However, the largest customer class (SFD) cost recovery is within zone of reasonableness at 100%. Further, rates equity can be improved within the current structure by adjusting the rates close to the COSA results.
  - The rates do not promote water conservation as only a small portion of customers are metered.
  - The basis for the existing rate differences by customer class is not supported by COSA analysis.
  - The rate structure does not address mixed-use residential water use and billing concern.

Option 2: Uniform Rate Structure

- Advantages:
  - Simple to understand by staff, users, and the public and easy to implement.
  - Consistent rate across all water users within a Water Service Area.
  - Equitable, because all customers pay the same unit price for water service. Can also be designed to have different volumetric rates by rate class, if supported by COSA.
  - Promote water conservation and more conscious water use.
  - Easy to update by the Regional District.
  - Allows defining rates by meter size and water usage that resolve mixed-use residential concern.

  Note, more frequent (e.g., quarterly, monthly) billing period improves price signaling.
- Disadvantages:
  - Revenue stability could be impacted by anticipated water use reductions. This could be mitigated by targeting a higher share of cost recovery through fixed charges but maintaining customer bill flexibility via volumetric charge component.

- Requires customer base to have meters installed and operating.

Option 3: Seasonal Rate Structure

- Advantages:
  - Consistent rate across all water users within a Water Service Area.
  - Relatively simple to administer based on the review of SCRD meter reads.
  - Equitable, because the customers responsible for the higher peak-demand-related costs are charged for such costs.
  - Promote water conservation and more conscious water use. Seasonal rate structure offers the highest price signal/conservation incentive.
  - Allows defining the rates by meter size and water usage that resolve mixed-use residential concern.

    Note, more frequent (e.g., quarterly, monthly) billing period improves price signaling.
- Disadvantages:
  - May require an education program by the utility to explain the structure to customers.
  - Can place revenue stability at risk, depending on the differential in the peak-season rate and customer response to a higher rate.
  - Requires customer base to have meters installed and operating.

The uniform and seasonal rate structures require meters to be installed for all customers. Currently, the Regional Water Service Area does not have meters installed for all customer classes. It is recommended that the Regional District wait until meters are installed for all customer before changing the Regional Water Service area rate structure to include a volumetric rate for all customers. However, given North Pender Harbour and South Pender Harbour Water Service Areas are 100% metered, as an interim phase, the Regional District could implement a uniform or seasonal rate structure in these Water Service Areas. This would help the Regional District understand how customers respond to a volumetric rate structure and improve the effectiveness when a similar rate structure is applied to the Regional Water Service Area.

By moving to a volumetric rate structure, the Regional District can move away from the current customer classification and instead define rate classes by meter size and water usage which resolves the mixed-use residential concern. This can be done by simplifying the classes based on similar charges and/or by meter sizes. Table 4-6 shows the proposed changes to customer classes.

Table 4-6: Proposed Changes to Customer Classes

	Current Classes	Proposed Classes
All Service Areas	**Metered**	
	Group 1 (3/4 inch and under)	Group 1 (3/4 inch and under)
	Group 2 (3/4 - 1 inches)	Group 2 (3/4 - 1 inches)
	Group 3 (1 - 1 1/2 inches)	Group 3 (1 - 1 1/2 inches)
	Group 4 (1 1/2 - 2 inches)	Group 4 (1 1/2 - 2 inches)
RWS	**Unmetered**	
	Water Regional Apartment and Mobile Homes	Group 1 (3/4 inch and under)
	Water Regional SFD & Other	Captured by size in Group 1 - 4
	Water Regional Motel & Hospital	Group 1 (3/4 inch and under)
NPH	**Unmetered**	
	North Pender Institutional	
	North Pender MFD	Group 1 (3/4 inch and under)
	North Pender SFD	
SPH	**Unmetered**	
	South Pender BUS 1 EMP	
	South Pender BUS 1+ EMP	Group 1 (3/4 inch and under)
	Water South Pender SFD MFD	

If the Regional District proceeds with implementing a volumetric rate structure, it is recommended that volumetric rates are phased in. The first phase would be for volumetric rates to be implemented in the North Pender Harbour and South Pender Harbour Water Service Areas in 2024. Once the Regional Water Service Area is 100% metered a volumetric rate structure can be implemented in this area too. After a few years of experience with a volumetric rate structure, another study is recommended to investigate implementing an inclining block rate structure.

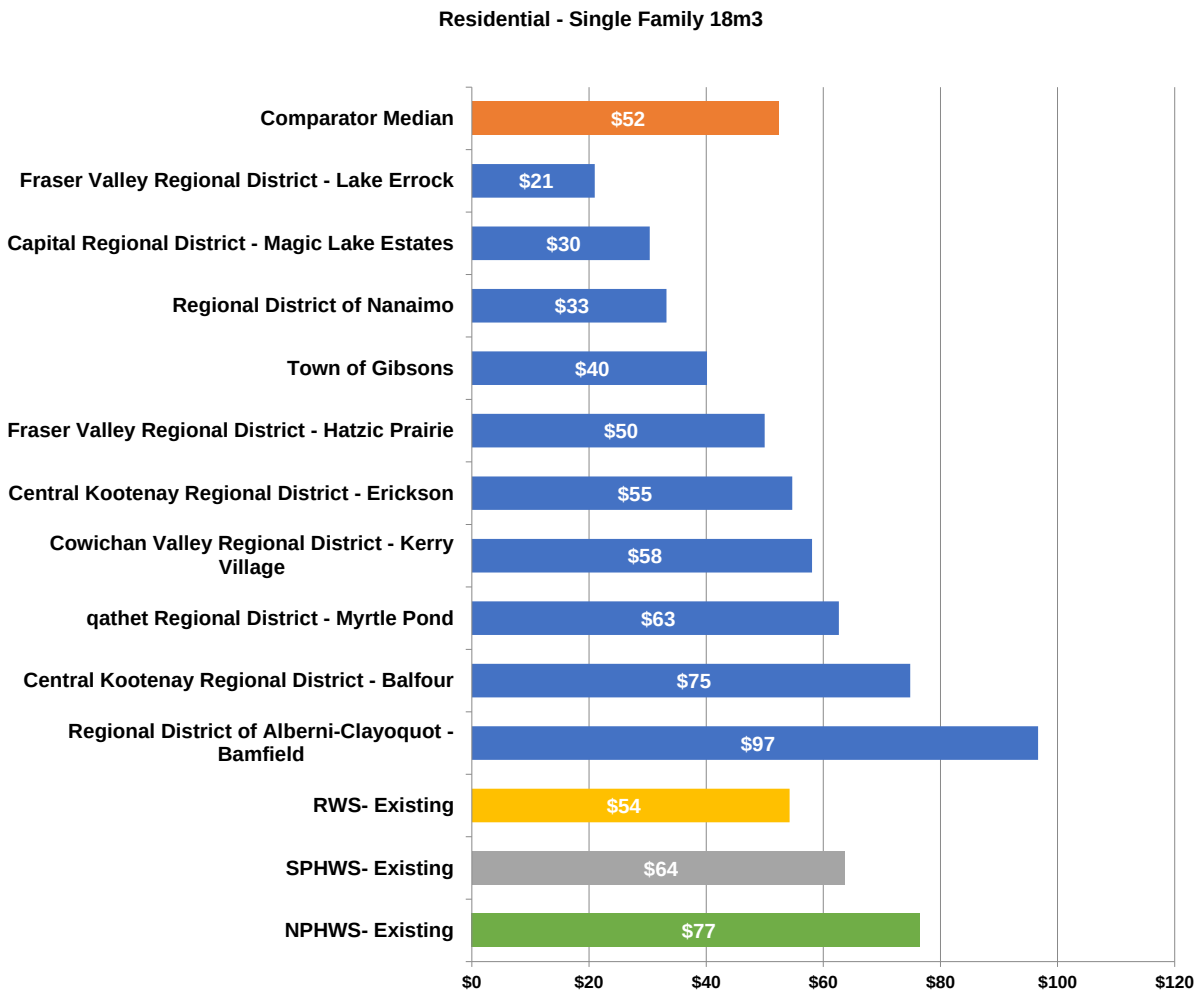
5.0 PEER REGIONAL DISTRICT BILL COMPARISONS

InterGroup selected nine peer Regional District water service areas across Southern British Columbia. InterGroup also provided a comparison for the Town of Gibsons given it is one of the only communities within the Sunshine Coast Regional District that has a community operated water system and rates. The Sunshine Coast Regional District water utilities are unique in that they supply water to many customers over a vast area. The peer Regional District water service areas generally do not provide service to many customers. Peer Regional District water service areas were selected by the number of customers they serve. There were water service areas with similar cost profiles as the Sunshine Coast Regional Coast Water Service Areas, but they serve a small number of customers (e.g., less than 100) and were not included for this reason. The review included Cowichan Valley Regional District (Kerry Village), Capital Regional District (Magic Lake Estates), Fraser Valley Regional District (Lake Errock and Hatzic Prairie), Central Kootenay Regional District (Erickson and Balfour), Regional District of Nanaimo (uniform rate across water service areas), Regional District of Alberni-Clayoquot (Bamfield), and qathet Regional District (Myrtle Pond). Detailed peer regional district supporting information is provided in Appendix C.

The following figures provide a comparison of total bills for typical SFD residential, MFD residential, lower consumption commercial, and higher consumption commercial customers in the Sunshine Coast Regional District for each of the water service areas compared to the other peer Regional District water service areas. The figures illustrate:

- For SFD, the average bills under the current rate structure are generally higher than the median bill among the peer districts.
- For MFD, the average bills are lower in the Regional Water Service Area but higher in other areas than the median bill among the peer districts.
- For lower consumption commercial customers, the average bills are some of the highest among the peer district median bill.
- For higher consumption commercial customers, the average bills are higher for the Regional and South Pender Water Service areas but lower for North Pender Water Service Area compared to the peer district median bill.

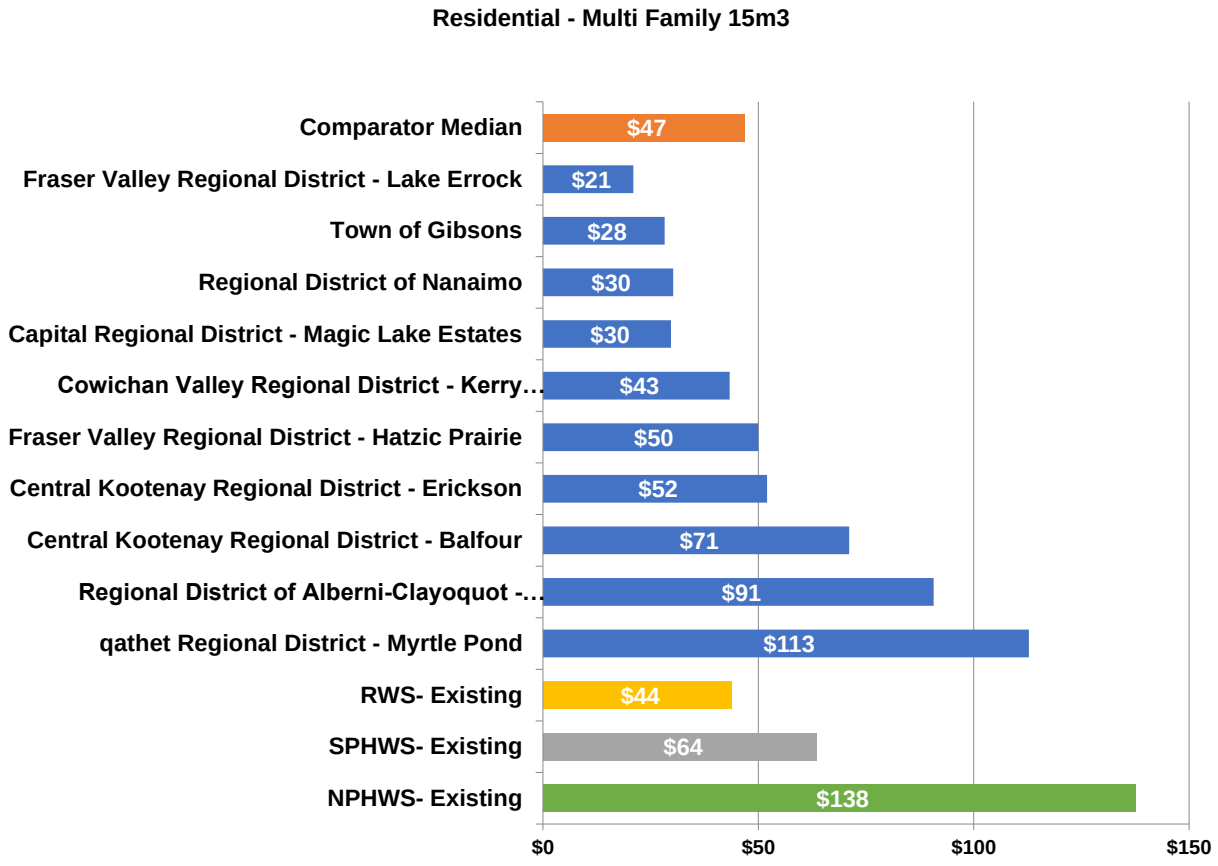
Figure 5-1: Residential Single Family Dwelling Average Monthly Bill Comparison



For the residential single-family dwellings, under the current rate structure, the Regional Water Service Area has a slightly higher average bill ($54) compared to the median ($52). The South Pender Harbour ($64) and North Pender Harbour ($77) average bills under the current rate structure are materially higher than the median.

Under the current rate structure, the Regional Water Service Area has the sixth lowest bill ($54), South Pender Harbour Water Service Area has the third highest bill ($64), and North Pender Harbour Water Service Area has the second highest bill among all comparators ($77).

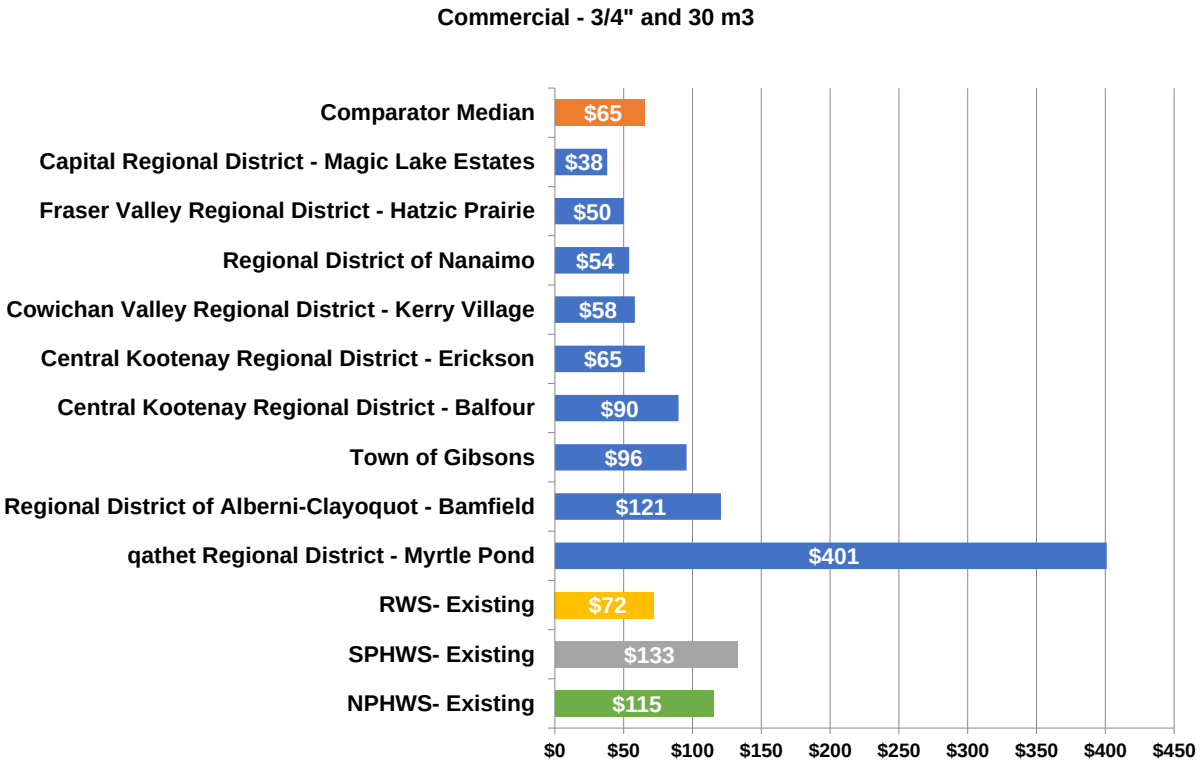
Figure 5-2: Residential Multi-Family Dwelling Average Monthly Bill Comparison



For the residential multi-family dwellings, under the current rate structure, the Regional Water Service Area has a lower average bill ($44) than the median ($47). The South Pender Harbour ($64) and North Pender Harbour ($138) average bills under the current rate structure are materially higher than the median.

Under the current rate structure, the Regional Water Service Area has the sixth lowest bill ($44), South Pender Harbour Water Service Area has the fourth highest bill ($64), and North Pender Harbour Water Service Area has the highest bill among all comparators ($138).

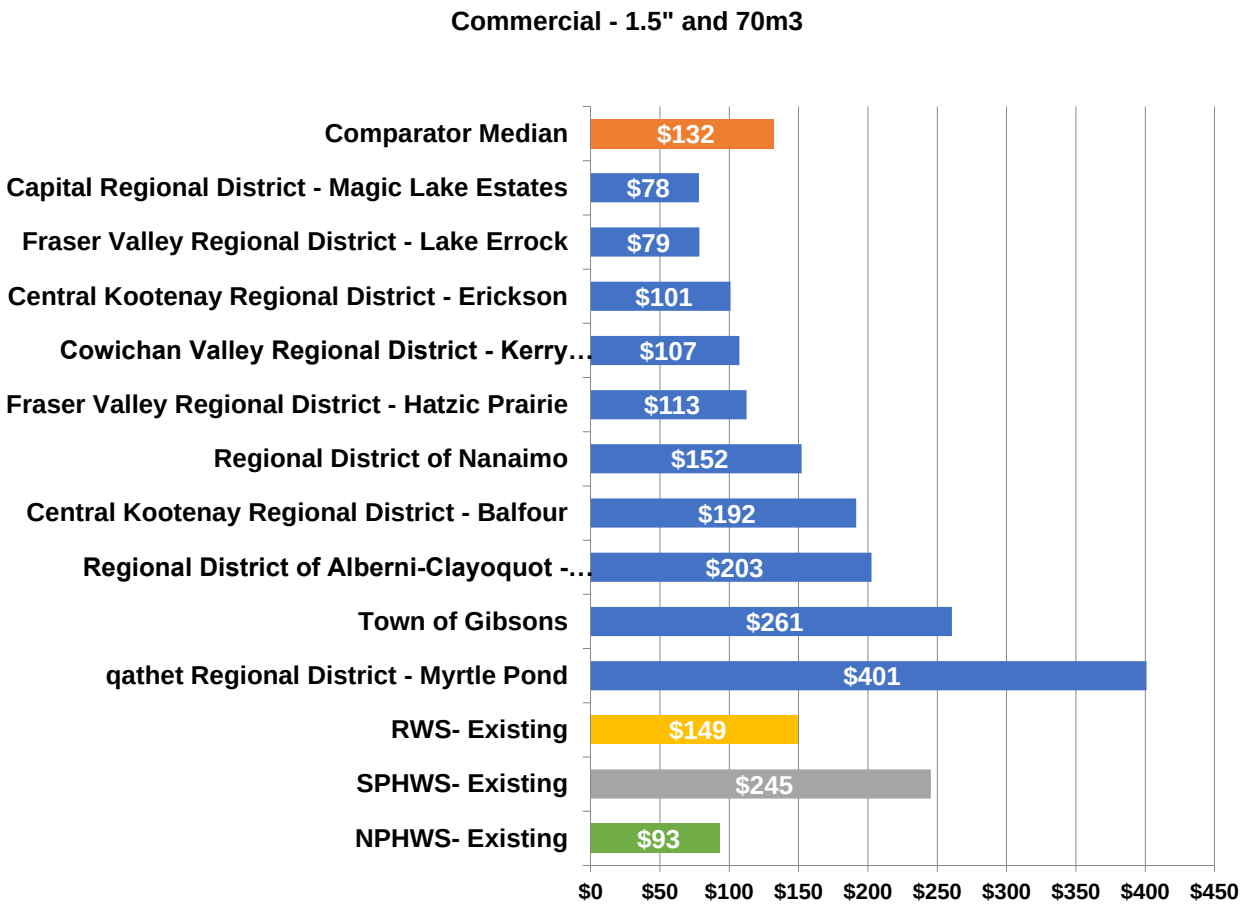
Figure 5-3: Commercial Low-Consumption Average Monthly Bill Comparison



For the commercial low-consumption customers, under the current rate structure, the Regional Water Service Area has a slightly higher average bill ($72) compared to the median ($65). The South Pender Harbour ($133) and North Pender Harbour ($115) average bills under the current rate structure are materially higher than the median.

Under the current rate structure, the Regional Water Service Area has the fifth highest bill ($72), South Pender Harbour Water Service Area has the second highest bill ($133), and North Pender Harbour Water Service Area has the third highest bill among all comparators ($115).

Figure 5-3: Commercial High-Consumption Average Monthly Bill Comparison



For the commercial high-consumption customers, under the current rate structure, the Regional Water Service Area ($149) and the South Pender Harbour Water Service Area ($245) have a notably higher average bill compared to the median ($132). The North Pender Harbour ($93) average bills under the current rate structure are notably lower than the median.

Under the current rate structure, the Regional Water Service Area has the sixth highest bill among all comparators ($149), the South Pender Harbour Water Service Area has the third highest bill among all comparators ($245), and the North Pender Harbour Water Service Area has the third lowest bill among all comparators ($93).

The Regional District public communication strategy is discussed in Appendix D, which includes bill comparisons of existing rates with peer districts, summary of rate options, and other relevant materials.

6.0 SUMMARY OF RECOMMENDATIONS

It is recommended the Regional District consider the following recommendations as a result of this study:

- InterGroup recommends that if a decision is made with respect to transitioning to a volumetric metered rate structure, then the Regional District should consider a phased approach and implement a uniform or seasonal rate structure for North Pender Harbour and South Pender Harbour Water Service Areas to encourage water conservation and a user pay approach as these areas are 100% metered.
- InterGroup recommends that the Regional District should not move the Regional Water Service Area to a volumetric rate structure (e.g., uniform, seasonal) until all customers are metered to ensure rate payer fairness.
- InterGroup recommends that the Regional District should not implement an inclining block rate structure until the Regional District has a more conservative volumetric rate structure in place to better understand the change in consumption habits of customers and their consumption profiles. After a few years of experience with a volumetric rate structure, another study is recommended to investigate implementing an inclining block rate structure. This ensures gradualism by first having customers become accustomed to volumetric pricing before moving to a rate structure with tiered pricing.
- InterGroup recommends that the Regional District complete a comprehensive water demand study once meters are 100% installed to understand customer peaking requirements and customer consumption habits for each of the Water Service Area customer classes.
- InterGroup recommends that the Regional District should consider moving to more frequent billing (e.g., quarterly, monthly) with information on water consumption used. The frequency of billing would need to consider available resourcing and capacity before a decision on the frequency is made. More frequent billing and information on water consumption used would allow for timely price signalling for customers to be able to respond to fluctuating bills based on water consumption.
- InterGroup recommends that the Regional District should consider revising the customer classes from the current structure to a structure based on meter sizes and water usage if it decides to implement a volumetric rate structure. This would help address the issue of billing for mixed-use residential properties.
- InterGroup recommends the Regional District Board consider revising the District's Financial Sustainability Policy to implement a minimum reserve balance and consideration of an annual capital reserve contribution for each of the Water Service Areas. This would help to ensure the sustainability of the utilities and lessen the burden on frontage fees from future major capital projects

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APPENDIX A:
Illustrative Cost of Service Analysis

A cost-of-service analysis was completed for a hypothetical Water Service Area Utility using hypothetical rates, a hypothetical $10 million revenue target, and the aggregate 2022 consumption and number of connections of all three water service areas to determine if revenues are adequately recovering costs for each customer class. The cost-of-service analysis used the following assumptions:

1. Utility costs are based on a $10 million hypothetical revenue projection from hypothetical rates and user fees for the hypothetical Water Service Area (i.e., service area recovers its budget costs).
2. The target revenue from fixed charges is set at 80% (variable charge revenue target is 20%).
3. Fixed cost allocation is based on Equivalent Meter Size Ratios as per the Manual of American Water Works Association, M1 Principles of Water Rates, Fees, and Charges, 7th Edition ("AWWA Manual").

Table A-1: Allocation Factors Between Fixed and Variable Revenues ($000's) for the Hypothetical Water Service Area

SCRD Water Utility: Hypothetical Water Service Area
COST ANALYSIS
Exhibit 1 - Revenue Requirement

	Allocated Cost	
Total Revenue recovered from rates ($000's)	$10,000	
From Fixed	$8,000	80%
From Variable	$2,000	20%

SCRD Water Utility: Hypothetical Water Service Area
Exhibit 2 - Rates by Meter Size - Fixed Charges

	Number of Customers	Equivalent Meter Size Ratios (AWWA)*	Quarterly fixed charge ($/month/ customer)	Fixed Charge Revenues, $000's
19mm (3/4 inch)	13,219	1.0	$143.19	$7,571
25mm (1 inch)	19	1.7	$238.65	$18
38mm (1 1/2 inches)	23	3.3	$477.30	$44
50mm (2 inches)	120	5.3	$763.69	$367
75mm (3 inches)		11.7	$1,670.56	$0
100mm (4 inches)		21.0	$3,007.02	$0
Total Fixed Charges	**13,381**			**$8,000**

SCRD Water Utility: Hypothetical Water Service Area
Exhibit 3 - Rates by Meter Size - Variable Charges

	Total Water Consumption, cubic meter	COS Variable charge, $ per cubic meter	Variable Charge Revenues, $000's
19mm (3/4 inch)	2,392,496	$0.79	$1,880
25mm (1 inch)	10,465	$0.79	$8
38mm (1 1/2 inches)	11,705	$0.79	$9
50mm (2 inches)	130,871	$0.79	$103
75mm (3 inches)		$0.79	$0
100mm (4 inches)		$0.79	$0
Total Variable Charges	**2,545,538**		**$2,000**
Total Revenue			**$10,000**

Table A-2: Cost of Service Results for the Hypothetical Water Service Area

	Number of Connections (2022 Actual)	Total Volume (m3)	Cost ($000's)	Illustrative Revenue at Current Rate Structure ($000's)	RCC Ratio
Metered Users					
Group 1 (3/4 inch and under)	148	106,974	$ 169	$ 303	
Group 2 (3/4 - 1 inches)	14	10,465	$ 22	$ 29	
Group 3 (1 - 1 1/2 inches)	21	11,705	$ 49	$ 35	
Group 4 (1 1/2 - 2 inches)	80	130,871	$ 347	$ 279	
Group 5 (2 - 4 inches)	-	-			
Group 6 (4 - 6 inches)	-	-			
Subtotal	263	260,016	$ 587	$ 646	110%
Unmetered Users					
Water MFD	579	89,586	$ 402	$ 338	84%
Water SFD & Other	12,430	2,180,995	$ 8,937	$ 8,974	100%
Water Institutional	109	14,941	$ 74	$ 42	57%
Subtotal	13,118	2,285,522	$ 9,413	$ 9,354	99%
Total			$ 10,000	$ 10,000	100%

APPENDIX B:
Illustrative Rate Options

Table B-1: Illustrative Rates Under the Current Rate Structure for the Hypothetical Water Service Area Utility

			Metered Quarterly Rates ($)		
	Number of Connections (2022 Actual)	Total Volume (m3)	Minimum Charge ($)	Per m3 ($)	Revenues ($000's)
Metered Users					
Group 1 (3/4 inch and under)	148	106,974	283.14	1.62	$ 298
Group 2 (3/4 - 1 inches)	14	10,465	283.14	1.62	$ 28
Group 3 (1 - 1 1/2 inches)	21	11,705	283.14	1.62	$ 33
Group 4 (1 1/2 - 2 inches)	80	130,871	283.14	1.62	$ 267
Group 5 (2 - 4 inches)	-	-			
Group 6 (4 - 6 inches)	-	-			
Subtotal	263	260,016			$ 626
Unmetered Users					
Water MFD	579	89,586	583.24		$ 338
Water SFD & Other	12,430	2,180,995	722.00		$ 8,974
Water Institutional	109	14,941	387.86		$ 42
Subtotal	13,118	2,285,522			$ 9,354
Meter Rentals Subtotal	207				$ 20
Total					$ 10,000

Table B-2: Illustrative Rates Under the Uniform Rate Structure for the Hypothetical Water Service Area Utility

			Metered Quarterly Rates ($)		
	Number of Connections (2022 Actual)	Total Volume (m3)	Fixed charge ($)	Per m3 ($)	Revenue ($000's)
Metered Users					
Group 1 (3/4 inch and under)	148	106,974	143.19	0.79	$ 169
Group 2 (3/4 - 1 inches)	14	10,465	238.65	0.79	$ 22
Group 3 (1 - 1 1/2 inches)	21	11,705	477.30	0.79	$ 49
Group 4 (1 1/2 - 2 inches)	80	130,871	763.69	0.79	$ 347
Group 5 (2 - 4 inches)	-	-			
Group 6 (4 - 6 inches)	-	-			
Subtotal	263	260,016			$ 587
Unmetered Users					
Water MFD	579	89,586	143.19	0.79	$ 402
Water SFD & Other	12,430	2,180,995	143.19	0.79	$ 8,937
Water Institutional	109	14,941	143.19	0.79	$ 74
Subtotal	13,118	2,285,522			$ 9,413
Total					$ 10,000

Table B-3: Illustrative Rates Under the Seasonal Rate Structure for the Hypothetical Water Service Area Utility

			Metered Quarterly Rates ($)			
	Number of Connections (2022 Actual)	Total Volume (m3)	Fixed charge ($)	Per m3 ($) - Summer	Per m3 ($) - Winter	Revenue ($000's)
Metered Users						
Group 1 (3/4 inch and under)	148	106,974	143.19	1.02	0.81	$ 166
Group 2 (3/4 - 1 inches)	14	10,465	238.65	1.02	0.81	$ 18
Group 3 (1 - 1 1/2 inches)	21	11,705	477.30	1.02	0.81	$ 43
Group 4 (1 1/2 - 2 inches)	80	130,871	763.69	1.02	0.81	$ 357
Group 5 (2 - 4 inches)						
Group 6 (4 - 6 inches)						
Subtotal	263	260,016				$ 583
Unmetered Users						
Water MFD	579	89,586	143.19	1.02	0.81	$ 408
Water Regional SFD & Other	12,430	2,180,995	143.19	1.02	0.81	$ 8,936
Water Institutional	109	14,941	143.19	1.02	0.81	$ 73
Subtotal	13,118	2,285,522				$ 9,417
Total						$ 10,000

APPENDIX C:
Peer District Bill Comparisons

Attachment C1:

qathet Regional District – Myrtle Pond Bylaw No 117.23

qathet Regional District

BYLAW NO. 117.23

****

Being a bylaw to amend "Myrtle Pond Specified Area Water System Rates and Regulation Bylaw No. 117, 1984"

****

The Board of Directors of the qathet Regional District, in open meeting assembled, enacts as follows:

1. Schedule "B" of the "Myrtle Pond Specified Area Water System Rates and Regulation Bylaw No. 117, 1984" is hereby deleted and the attached Schedule "B" substituted therefore.

2. This bylaw shall come into force and take effect on January 1, 2023.

3. This bylaw may be cited for all purposes as the "Myrtle Pond Local Area Water System Rates and Regulations Amendment Bylaw No. 117.23, 2022".

READ A FIRST TIME	this 29th day of September, 2022
READ A SECOND TIME	this 29th day of September, 2022
READ A THIRD TIME	this 29th day of September, 2022
ADOPTED	this 29th day of September, 2022

Chair

Corporate Officer

Bylaw No. 117.23
Schedule 'B'

qRD Myrtle Pond Water User Fees, Rates and Charges

The following rates shall be effective January 1, 2023.

1. Definitions

- **Commercial Recreation** – includes a use providing overnight accommodation and recreational opportunities and includes the following uses:
    - campgrounds and cabins providing temporary overnight accommodation;
    - an office, restaurant, laundry facility and playground accessory to a use in a);
    - a swimming pool.
- **Dwelling Unit** – means a self-contained unit used as a residence for a single household and containing a single set of facilities for food preparation and eating, sleeping and living areas.
- **Multiple Residential** – includes parcels used for residential purposes and that contain more than one dwelling unit.
- **Residential** – includes parcels used for residential purposes and that contain only one dwelling unit.
- **Summer** – means the months of April through September, inclusive.
- **Winter** – means the months of October through March, inclusive.

2. Minimum and Metered User Rates

a. Users that consume up to the maximum cubic meters allowed per month under Rate 1 will pay the minimum monthly fee specified in section 2(c).

b. Users that exceed the maximum monthly cubic meter consumption specified under Rate 1 will be charged at the metered rates specified in paragraph 2(c).

c. Minimum monthly fees, water allowances and metered rates are specified in the table below:

	Minimum Fee	Rate 1	Rate 2	Rate 3	Rate 4
Rate per m^3		$ 2.51	$ 3.01	$ 3.61	$ 4.33
Residential					
Use per month - Summer	$ 75.18	<= 30 m^3	<= 45 m^3	<= 60 m^3	> 60 m^3
Use per month - Winter	$ 50.12	<= 20 m^3	<= 30 m^3	<= 45 m^3	> 45 m^3
Multiple Residential					
1st Dwelling Unit					
Use per month - Summer	$ 75.18	<= 30 m^3	<= 45 m^3	<= 60 m^3	> 60 m^3
Use per month - Winter	$ 50.12	<= 20 m^3	<= 30 m^3	<= 45 m^3	> 45 m^3
Each Additional Dwelling Unit					
Use per month - Summer - Per Unit	$ 62.65	<= 25 m^3	<= 40 m^3	<= 55 m^3	> 55 m^3
Use per month - Winter - Per Unit	$ 37.59	<= 15 m^3	<= 25 m^3	<= 40 m^3	> 40 m^3
Commercial Recreation					
Use per month - Summer	$ 426.04	<= 170 m^3	<= 270 m^3	<= 645 m^3	> 645 m^3
Use per month - Winter	$ 375.92	<= 150 m^3	<= 250 m^3	<= 625 m^3	> 625 m^3

Note: One cubic meter (m^3) equals approximately 220 imperial gallons.

3. **Metered Charges for Mixed Use Properties**
Notwithstanding the minimum charge for any water users on metered rates, properties which have both commercial recreation users and other classes of users shall be charged at the Commercial Recreation rate.

4. **Invoicing**
Metered users will be billed quarterly based on monthly consumption or minimum user rates whichever rate is applicable. Charges for any lesser period shall be pro-rated.

5. **Meter Testing Fee**
$100 per test.

6. **Connection Fees**
The fee to install a new connection will include the actual cost of labour, equipment, meter and materials to install the connection plus $400 administration / inspection fee.

7. **Turn On/Shut Off Fee**
$50.00 per occurrence

8. **Penalty On Overdue Accounts**
10% of the current amount billed

Attachment C2:
Regional District of Alberni-Clayoquot
Bylaw No F1147-3

REGIONAL DISTRICT OF ALBERNI-CLAYOQUOT

BYLAW NO. F1147-3

A BYLAW TO AMEND THE RATES FOR THE BAMFIELD WATER SYSTEM LOCAL SERVICE AREA

WHEREAS the Board of the Regional District of Alberni-Clayoquot, operates and maintains a water system in the Bamfield Water Local Service Area established by Bylaw No. 268 of the Regional District, (hereinafter called the "Local Service Area").

AND WHEREAS the Board of Directors deems it necessary to amend the rates and charges for the service.

NOW THEREFORE the Board of the Regional District of Alberni-Clayoquot in open meeting assembled enacts as follows:

1. Bylaw No. F1147, cited as "Bamfield Water System Rates and Regulations Bylaw No. F1147, 2020" is hereby amended by replacing Schedule "A" with Schedule "A" attached to and forming part of this bylaw.

2. This bylaw will come into effect on January 1, 2023.

3. This bylaw may be sited as "Bamfield Water System Rates and Regulations Amendment Bylaw No. F1147-3, 2022.

Read a first time this	14th day of December, 2022
Read a second time this	14th day of December, 2022
Read a third time this	14th day of December, 2022
ADOPTED this	14th day of December, 2022

Certified true and correct copy of
"Bamfield Water Local Service Area Rates and Regulations Amendment Bylaw No. F1147-3, 2022"

Wendy Thomson

Wendy Thomson,
General Manager of Administrative Services

The Corporate seal of the Regional District of Alberni-Clayoquot was hereto affixed in the presence of:

John Jack

John Jack,
Chairperson

WATER RATES

SCHEDULE "A"

1. WATER RATES

(a) All Metered Accounts are subject to the basic monthly charges outlined in the table below (not including meter rental):

January 1, 2023	$67.00/month
July 1, 2023	$69.00/month

(b) An additional charge or $2.00 per cubic meter (m3) shall be calculated on consumption that exceeds 14 cubic meters (m3) per quarter.

(c) All metered accounts are also subject to a monthly water meter rental charge as follows:

Meter Size – Imperial	Meter Size – Metric	Monthly Rental Amount
Up to 1 inch	25mm	$2.00
1 ½ inch	38mm	$4.00
2 inch	50mm	$6.00
3 inch	75mm	$10.00
4 inch	100mm	$20.00
6 inch	150mm	$30.00
8 inch	200mm	$40.00
10 inch	250mm	$50.00

(d) If a meter fails to register or to properly indicate the flow of water, consumption will be estimated and billed based on the average previous consumption. This estimate will take into account seasonal variations and other factors, such as ownership changes, that may affect the consumption of water.

(e) The Alberni-Clayoquot Regional District reads the meters once every quarter. If access is not provided to the meter during the regular quarterly readings, return visits to read the meter are $25.00 per call.

2. GENERAL CHARGES

A charge under this bylaw shall be paid by the owner of a serviced property for:

(a) Application for new water service, activation or extension $200.00.

(b) Water turn-on - $50.00 each.

(c) Service locate fee – at cost.

(d) Emergency water turn-off – at cost.

(e) Services related to the identification and repair of a water leak on the property side of a water line – at cost.

(f) Reconnection of any water service disconnected pursuant to this Bylaw – at cost.

(g) Water connection & meter - $5,000.00 per consumer unit or cost of construction as determined by the Regional District, whichever is larger. If a connection requires a line extension the cost of this construction is to be paid by the applicant. Cost of connection is to be paid by the applicant once the application for service is reviewed and approved and an invoice is issued.

(h) Water Model Analysis - $850.00 per connection or cost of engineering as determined by the Regional District, if required.

3. HOURLY RATE

The hourly rate for services completed and billed out at cost shall be:

(a) $75.00/hr.

Attachment C3:
Central Kootenay Regional District
Bylaw No 2895, 2023

REGIONAL DISTRICT OF CENTRAL KOOTENAY

Bylaw No. 2895

A Bylaw to regulate utility rates, fees, and charges for the Regional District of Central Kootenay owned utilities.

WHEREAS the Regional District of Central Kootenay wishes to regulate utility rates, fees, and charges for the Regional District of Central Kootenay owned utilities.

NOW THEREFORE the Board of the Regional District of Central Kootenay, in open meeting assembled, HEREBY ENACTS as follows:

APPLICATION

1 (1) This Bylaw is applicable to all Water Service Areas of the Regional District of Central Kootenay.

(2) When a Regional District water system is supplied with water from an adjacent local government, the bylaws of that local government and agreement conditions may apply.

(3) Schedule A Labour rates and Schedule B Arrow Creek Water Treatment and Supply Service Area rates of this Bylaw only shall apply to the Town of Creston.

DEFINITIONS

2 In this bylaw:

Account means a formal arrangement under this Bylaw for the provision of water services to a Property.

Account Holder means the person, organization, agent or representative that holds the water Account with the Regional District of Central Kootenay.

Account Type means the predominate usage of the Account such as but not limited to: Single Family Dwelling, Multiple Dwelling Property, Commercial, Industrial, Institutional, Agricultural, and Recreational.

Agricultural Land means land where agricultural irrigation privileges have been assigned by the Manager.

Auxiliary Building or Dependent Suite means a secondary or supplementary building or Unit that does not include all of cooking, eating, living, sleeping and sanitary facilities. An Auxiliary Building or Dependent Suite intended for habitation would be reliant on the main Dwelling.

Board means the Regional District of Central Kootenay Board of Directors.

Capital Infrastructure Charge means a fee levied during Development that is placed into reserves as a contribution to the cost of existing water infrastructure, upgrades and long term asset renewal.

Capital Reserve Fund Contribution means a fee levied that is placed into reserves as a contribution to the cost of water infrastructure upgrades and long term asset renewal.

Carwash means a building or structure containing facilities for washing motor vehicles, including tunnel car washes, coin operated automatic car washes and coin operated self service car washes.

Commercial means any Unit for which the use is the provision for the selling of goods and services, for the servicing and repair of goods or for commercial office functions, including but not limited to retail sales, wholesaling incidental to retail sales, commercial education and entertainment services, household services and all associated repairs, other personal and non-personal services and administrative, commercial and professional offices.

Commercial Carwash means a Carwash used or operated by a Commercial or Industrial business.

Customer means the Owner or occupant of any Property to which water is supplied or made available from the Regional District.

Development means the construction, alteration, or extension of buildings, structures, utilities or any use that requires the issuance of a building permit, plumbing permit, or Interior Health construction permit issued in accordance with the *Drinking Water Protection Act*.

Disconnection means physically turning off the water to a Owner's Property and adjusting the Owner's Account accordingly.

Dwelling means any living quarters used or has the potential to be used by one or more persons which contains cooking, eating, living, sleeping and sanitary facilities.

Flat Use Water Rates means water use rates that are independent of the water quantity used.

Folio means a land identification number assigned by British Columbia Assessment and is used for Property tax purposes. Folio is synonymous with Assessment Roll Number. A Folio in this Bylaw may describe one or more Parcels grouped under one British Columbia Assessment Folio.

Guest Room means a room or structure with sleeping facilities provided for guests.

Industrial means businesses such as but not limited to airports, aggregate processing, asphalt plants, bulk fuel storage, concrete plants, fabrication plants, manufacturing, processing, sawmills, and truck terminals.

Institutional means activities focusing on non-profit services in the public's interest. For example, schools, hospitals, group foster homes, and buildings used for religious worship.

Irrigation means the distribution of water to the surface or subsurface of lawns, gardens, orchards greenhouses by pipes, hoses, sprinklers or any other method.

Manager in this Bylaw, unless the context otherwise requires, means the Regional District of Central Kootenay General Manager of Environmental Services, the Water Operations Manager, Utility Services Manager or designate.

Manufactured Home means any structure, whether ordinarily equipped with wheels or not, that is designed, constructed or manufactured to be moved from one place to another by being towed or carried, and that is used as a Dwelling.

Manufactured Home Park means property for which Manufactured Homes or other Dwellings sites are offered for lease or rent.

Meter means meters and other equipment or instruments used by the Regional District or authorized by the Regional District to be used to calculate the amount of water consumed.

Metered Base Charge is a fixed fee charged for water associated with metered based accounts that represent fixed water service costs and not variable costs related to the volume of water treated and distributed.

Metered Rate Based Accounts are Accounts that include a water billing rate based on volumetric metered consumption.

Metered Rate Volumetric Charge is a charge that varies with the volume of water delivered to the property.

Mobile Housing Unit is any type of living accommodation that has been produced to be transported or is a mobile unit such as a ship, boat, recreational vehicle, Manufactured Home and so on, and occupied as living quarters.

Multiple Dwelling Property means any Property containing more than one Dwelling Units on one Folio.

Owner has the same meaning as in the *British Columbia Land Title Act* and *Manufactured Home Act*.

Owner Water Connection means the Owner's water lines and appurtenances downstream of the Regional District Water Connection.

Parcel means the unit lot, block or other area in which land is registered under the *British Columbia Land Title Act*.

Property means land and improvements.

Property Line means a line which defines, in the British Columbia Land Title Office, the perimeter of a Parcel.

Recreational is land primarily used for public recreation and includes but is not limited to parks, sports fields, playgrounds, green areas, beaches and public camping sites.

Reconnection means physically turning on the water and re-establishing or adjusting an Account as required.

Regional District of Central Kootenay or **Regional District** or **District** means the Regional District of Central Kootenay, as described under the British Columbia Local Government Act with offices located at 202 Lakeside Drive, Nelson, BC V1L 5R4 Phone: 250-352-6665 or toll-free number 1-800-268-7325 and Fax: 250-352-9300.

Regional District Water Connection means the water line extending from the Water Main to the Curb Stop Valve, generally near the Property Line and shall include any immediate downstream Meter installation, or Backflow Preventer.

Reserve Account means a financial account maintained by the Regional District to fund Water System infrastructure improvements, renewal, replacements, major repairs, study, assessments, plans and project management.

Seasonal Service means a service that is turned on for 8 months or less. The Seasonal Service rate only applies if identified in the Fees and Charges Bylaw.

Secondary Suite means an additional Dwelling attached to the principle Dwelling that is used or has the potential to be used as a living quarters by one or more persons. A Secondary Suite contains cooking, eating, living, sleeping and sanitary facilities.

Short-Term Accommodation Rental means a Dwelling, Secondary Suite, or Guest Room wherein accommodation is offered for rent to the public on a temporary basis of 31 days or less.

Single Family Dwelling means building or structure that contains only one Dwelling.

Subdivision means a subdivision as defined in the *British Columbia Land Title Act*, and a subdivision under the *British Columbia Strata Property Act*.

Subdivision Bylaw means the Subdivision Bylaw No. 2159 as it may be amended or replaced from time to time.

Surveyor of Taxes is responsible for collection of taxes for British Columbia rural areas.

Swimming Pool is any permanent or semi-permanent artificial pool for swimming in.

Title (Land Title) refers to the registration of land ownership in accordance with the *British Columbia Land Titles Act*.

Turn On/Off means a temporary interruption in or discontinuance of the supply of water authorized by the Regional District.

Undeveloped Parcel is a Parcel of land within a Regional District Water System where the water has not yet been turned on and where water has been made available.

Unit means any Dwelling, Commercial, Industrial, or Institutional space.

Water Conservation Measures any measures implemented by the Manager to restrict water usage.

Water Main means any water pipe under the control of the District which is intended for public use.

Water Main Extension is the extension or construction of a new water main to provide servicing to a new Water Connection(s).

Water Meter see Meter.

Water Service Area means the area defined by the Water System service area establishment bylaw.

Water Service Area Extension is the extension of the Water Service Area boundary by bylaw to include one or more additional parcels of land.

Water System means all Regional District owned assets like Water Mains, water treatment facilities, pump stations, reservoirs, wells, water intakes and all associated appurtenances.

Water Tax is a tax levied that contributes to the funding for a Water System.

Work means construction, maintenance, inspection or testing services provided for an Owner.

Work Order is a written order on an Approved form providing agreement by a Owner to proceed with Work identified on the form for which the Owner will be responsible for costs incurred by the Regional District in accordance with this Bylaw.

SEVERABILITY

3 If any portion of this Bylaw is for any reason held to be invalid by the decision of any court of competent jurisdiction, that portion may be severed from the Bylaw and such decision shall not affect the validity of the remaining portions of the Bylaw.

ADMINISTRATION

4 (1) The Manager is hereby authorized and directed to have general supervision over the Regional District of Central Kootenay Water Systems and to see that the provisions of this Bylaw are carried out.

(2) The Manager shall have the power to appoint Designated Officers for the purpose of effectually carrying out the provisions of this Bylaw, and wherever the Manager is authorized or directed to perform any act or duty under this Bylaw, such act or duty may be performed by any Designated Officer authorized by the Manager to perform such act or duty.

RATES AND ACCOUNT BILLING GENERAL

5 (1) The Manager shall classify Accounts into Account Types and apply service charge rates as set out in this Bylaw.

(2) Accounts may include a mix of service charge fees.

(3) The Account Holder must pay all fees and charges for water supplied to the Account Holder's Property, as set out in this Bylaw.

(4) The Regional District's annual billing cycle will be from January 1st to December 31st.

(5) When a property changes ownership, the new Owner is responsible to apply for a New Account and the old Owner is responsible to close their Account. If an Application is not made, the Account Holder will be changed when British Columbia Assessment provides the new Property Owner information to the Regional District.

(6) Payments will be deemed to have been received on:

(a) the date payment is received in person at locations identified on Regional District utility bills;
(b) the date stamped by Canada Post on mailed payments; or
(c) the confirmed date the funds were transferred from the Customer's Account to the Regional District when payment was made through an approved financial institution.

(7) Any outstanding Account balances or Work invoices of more than 65 days on December 31st shall be deemed to be taxes in arrears in respect to the Property and the outstanding balance will be sent to the Surveyor of Taxes in accordance with Section 363.2(2) of the *Local Government Act.*

(8) Seasonal Service and Golf Course rates shall include one (1) annual Turn On and Turn Off.

(9) Seasonal Service, Public Campgrounds, Golf Course and Irrigation rates shall apply for the entire billing cycle regardless of whether or not the water has been Turned Off for a portion of the billing cycle.

(10) If an Auxiliary Building is used as the only Dwelling on a Property it is considered a Single Family Dwelling.

(11) Auxiliary Buildings and Dependent Suites are not subject to Dwelling Unit charges unless specifically identified in this Bylaw.

(12) If the Dwelling is occupied for more than 30 days of the calendar year, it is subject to assessment under this Bylaw.

(13) Mobile Housing Units set up for long-term occupancy greater than 90 days per calendar year or used as the only Dwelling, or Mobile Housing Units used for Commercial purposes shall be subject to service charges.

(14) Agricultural Land Charge shall be assessed in increments of 0.1 acres, rounded down.

(15) The Agricultural Land Charge assessed shall exclude the first acre when the property is also assessed other charge(s) that includes up to 1 acre of irrigation privileges.

(16) If an Owner requests a reduction in the amount of Agricultural Land Charge assessed area the following shall apply:

(a) an assessment of the suitability of the lands for agricultural production shall be completed by Qualified Person and paid for by the Owner;
(b) only those lands identified by the Qualified Person as not suitable for agricultural production might be considered by the Manager for removal from assessment of the Agricultural Land Charge; and
(c) if a reduction in the Agricultural Land Charge is approved by the Manager, the Owner shall be responsible for the installation costs of a Water Meter and related appurtenances, and the Account may be switched to a Metered Rate Based Account.

(17) Where an error is found to have been made in the amount invoiced or billed to an Account, the amount either under-billed or over-billed shall be debited from or credited to Account and shown on the next invoice subject to the following:

(a) The adjustment period is limited to the time that the current Owner is on Title;
(b) The adjustment period(s) for under-billing are to a maximum of 1 year where the error can reasonably be said to have been the fault of the Regional District;
(c) Where an under-billing is found to have been made in the amount invoiced or billed to an Account as a result of unauthorized use of a water service, or can reasonably be said to be a result of fraud, theft, tampering with a Meter or other equipment, or any other similar act, the following may be charged to the Customer Account:
    (i) the amount of the under-billing, up to 5 years,
    (ii) any direct administrative costs incurred by the Regional District in investigating the circumstances, and
    (iii) interest and penalties at the rate normally charged on unpaid Accounts receivable by the Regional District;
(d) The adjustment period(s) for over-billing are to a maximum of 5 years or when the current Owner came on title for the property, whichever is less;
(e) Where the exact amount of under-billing or over-billing cannot be determined, the Regional District may make a reasonable and fair estimate of the amount, using its own records or those of the Customer, and in keeping with amounts billed to other Customers in similar premises, being used in a similar manner, over the same time period; and
(f) Where an amount has been under-billed, and where the error can reasonably be said to have been the fault of the Regional District, the Regional District may offer the Customer reasonable terms of repayment, and may be interest and penalty free.

(18) A separate Account will only be created for a Manufactured Home in a Manufactured Home Park if the Manufactured Home is registered with the British Columbia Manufactured Home Registry and a Folio has been assigned.

(19) Any charges or Work invoices with payment outstanding of more than 65 days by the owner of an unregistered Manufactured Home in Manufactured Home Park may be transferred to the Manufactured Home Park owner's Account.

FLAT USE WATER RATES AND ACCOUNT BILLING

6 (1) Flat Use Water Rates may be prorated to the 15th or the end of each month for changes to Flat Use Water Rate Based Accounts.

(2) Changes to Flat Use Water Rate Based Accounts based on Customer Application, resulting in a reduction in water billing shall be prorated to the date of Application, unless an error in billing provided for in 5 (17).

(3) When a specific Flat Use Water Rate has not been identified by this bylaw and a usage rate is required, an equivalent rate may be applied by the Manager and the equivalent rate chosen shall consider fair consumption and operational cost equivalency.

(4) For Flat Use Water Rate Based Accounts, a penalty of 10% will be imposed on any outstanding Account balances as of the end of the first business day following July 4th or 65 days following the date the utility bill is issued by the Regional District, whichever is later.

(5) Clause 6(4) does not apply to Account Holders enrolled in the Voluntary Pre-Authorized Payment Plan.

(6) The Capital Reserve Fund Contribution shall apply to all land Folios in a Service Area for which a rate is identified for the Service Area.

(7) The Capital Reserve Fund Contribution shall apply to all specific types of improvements in a Service Area for which a specific Capital Reserve Fund Contribution is identified for the Service Area.

METERED RATE BASED ACCOUNT BILLING

7 (1) For Metered Rate Based Accounts, the Account Holder is responsible to request a Meter reading when ownership changes.

(2) For Metered Rate Based Accounts, Meters shall be read as near as reasonably possible to the date of any ownership change. Water usage shall be estimated for any difference in time between meter reading and date of ownership change.

(3) Metered Base Charge fees may be prorated to the 15th or the end of each month for changes to Metered Rate Based Accounts, and Meter Base Charge will not be assessed if an Owner Water Connection is disconnected.

(4) A Water Meter reading may be estimated for billing by the Manager based on either previous consumption patterns or a daily average consumption for the Customer Service Connection, or an Unmetered Building Construction rate might be used for billing if:

(a) the Regional District is unable to obtain a Water Meter reading;

(b) a Water Meter fails to properly register the amount of water consumed.

(5) If a Customer experiences abnormal water consumption, the Manager may adjust the Account Holder's bill taking into consideration any or all of the following factors:

(a) the cause or nature of the abnormal water consumption;
(b) any evidence of action taken by the Customer to abate the abnormal consumption;
(c) Flat Use Water Rates established for the water service; and
(d) any other factors that might be relevant.

(6) The Manager shall establish a Meter reading and billing schedule for Metered Rate Based Accounts.

(7) For Metered Rate Based Accounts a penalty of 10% will be imposed as of the end of the first business day, following 65 days from the date the utility bill is issued by the Regional District on any outstanding Account balances.

SUBDIVISION AND DEVELOPMENT

8 (1) The Regional District may waive or modify the Capital Infrastructure Charge requirements identified in this Bylaw for large Developments, if addressed by separate agreement with the Developer and the Regional District, in accordance with Section 937.1 of the *Local Government Act*.

(2) Capital Infrastructure Charges collected shall be deposited to the Water Service's Reserve Account.

(3) Capital Infrastructure Charges shall not be assessed for temporary Mobile Housing Units but shall be assessed for Commercial Mobile Housing Unit parking sites.

(4) If a Parcel, subdivided after December 31, 2015, was not subject to some form of Regional District Capital Infrastructure Charge and a Regional District Water Connection was not provided, the Parcel is subject to a Capital Infrastructure Charge if a later Application is made and Approved for a new Regional District Water Connection to the Parcel.

(5) When a Parcel is added to a Water Service Area, any further Subdivision or addition of Units is subject to Capital Infrastructure Charges at a rate equivalent to the rate for addition of a new Parcel to the Water Service Area, for a period of ten (10) years following the addition of the Parcel to the Water Service Area.

SERVICE WORK BY THE REGIONAL DISTRICT

9 (1) A Customer is required to sign a Work Order or cost estimate to provide an agreement to do the Work before the Regional District can do any non-emergency Work for a Customer.

(2) Prior to commencing Work, the Regional District must provide a cost estimate in writing.

(3) The Designated Officer may require a deposit in the amount of the cost estimate prior to starting the Work.

(4) Customers will be invoiced for Actual Cost Work as follows:

(a) at Labour and Equipment rates provided in this bylaw;
(b) at actual Labour rates plus 20% for Administration for all Regional District employees not identified in this Bylaw;
(c) at actual contract Labour rates plus 20%;
(d) at actual cost plus 20% for all other Equipment and Materials.

VOLUNTARY PRE-AUTHORIZED PAYMENT PLAN

10 (1) The Manager shall establish and maintain a Pre-Authorized Payment Plan.

(2) Account Holders wishing to participate in the Pre-Authorized Payment Plan, are required to sign an agreement provided by the Manager.

(3) Participation in the Pre-Authorized Payment Plan program is voluntary. Customers who choose not to participate in the program will be required to pay their water bill in full by the end of the first business day following July 4th or 65 days following the date the utility bill is issued by the Regional District, whichever is later.

(4) Participation in the Pre-Authorized Payment Plan is subject to cancellation at the discretion of the Chief Financial Officer.

(5) Those who sign up after the end of the first business day following July 4th, in any year, will be subject to a 10% penalty on the outstanding Account Balance for that year. The new outstanding Account Balance will then be divided by the number of months remaining from the time the Customer Account information has been added to the PAWS (Pre-Authorized Withdrawals) system, starting no sooner than July 15th.

(6) Customers must sign up by November 30th in order for monthly payment plans to start in January of the following year. If customers sign up after November 30th, payments may begin in later months.

(7) For all years where payments begin on January 15th, payment amounts will be determined by dividing the previous year's annual water bill by 12.

(8) Returned payments (NSF) result in a $25.00 fee, charged to the Customer Account.

(9) Any outstanding balance on the Customer Account as of December 31st of each year due to returned payments (NSF) will be subject to a 10% penalty.

(10) Customer Accounts may be adjusted at any time due to Regional District Board approved water rate changes or changes in water usage, as required. The outstanding balance will be recalculated and the equal withdrawal payment amounts will be adjusted accordingly for the remainder of the year.

(11) The Pre-Authorized Payment Plan is not available for Metered based Customer Accounts.

CITATION

11 This Bylaw may be cited as **"Regional District of Central Kootenay Utilities Rates, Fees and Charges Bylaw No. 2895, 2023."**

REPEAL

12 **"Regional District of Central Kootenay Utilities Rates, Fees, and Charges Bylaw No. 2825, 2022"**, and amendments thereto, are hereby repealed.

READ A FIRST TIME this 20th day of April, 2023.

READ A SECOND TIME this 20th day of April, 2023.

READ A THIRD TIME this 20th day of April, 2023.

ADOPTED by an affirmative vote of at least 2/3 of the votes cast this 20th day of April, 2023.

Aimee Watson, Board Chair

Mike Morrison, Corporate Officer

SCHEDULE A TO BYLAW NO. 2895
GENERAL RATES, FEES, AND CHARGES

General Rates and Fees and Charges are as follows:

1 GENERAL

No.	Item	Rate	Unit
1	**Labour**		
1.1	Manager		
a)	Utility Services Manager	$132.15	hour
b)	Water Operations Manager	$120.08	hour
1.2	Utilities Supervisor		
a)	Operations, Maintenance, Installations & Repairs	$94.80	hour
b)	Projects & Administration	$110.23	hour
1.3	Water Services Liaison	$110.23	hour
1.4	Environmental Services Technologist/Coordinator	$103.25	hour
1.5	Utility Tech 2	$76.52	hour
1.6	Utility Tech 1 or Maintenance Person	$66.97	hour
2	**Equipment (excluding operator)**		
2.1	Service Truck – Greater of the following:		
a)	Half Daily Rate	$70	½ day
b)	Kilometer Rate	$0.80	km
2.2	Vehicle – Greater of the following:		
a)	Half Daily Rate	$50	½ day
b)	Kilometer Rate	$0.65	km
2.3	Backhoe	$60	hour
2.4	Leak Noise Correlator	$30	hour
3	**Temporary Water Usage**		
3.1	Damage Deposit for Connection to Standpipe or Hydrant	$100	lump sum
3.2	Temporary Water Usage ($100 minimum)	$5.00	cubic meter
4	**Customer Account Administration & Development Administrative Charges**		
4.1	Change of Property Ownerships	No Charge	each
4.2	Water Application from Within an Existing Water Service Area		
a)	Owner Initiated Change in Water Usage	No Charge	each
b)	Staff Initiated Change in Water Usage	$100	each
c)	For New Connection	$300	each
4.3	Water Application from Outside of a Water Service Area	$800	each
4.4	Development or Redevelopment Administrative Cost Recovery Charge		
a)	Per First 1 to 10 Capital Infrastructure Charges Assessed	$500	each
b)	Per Additional 11 or More Capital Infrastructure Charges Assessed	$200	each
c)	Latecomer Agreement Application	$500	each
4.5	Disconnection	$150	each

No.	Item	Rate	Unit
4.6	Reconnection		
a)	No Ownership Change	$150	each
b)	On Ownership Change	No Charge	each
5	**Customer Connection Maintenance**		
5.1	Temporary Turn Off and Turn On (includes both Turn Off and Turn On, if required)		
a)	Pre-scheduled during business hours	$50	each
b)	Outside regular business hours or not pre-scheduled	$100	each
5.2	Seasonal Rate based Account Turn Off and On		
a)	Pre-scheduled during business hours	No Charge	each
b)	Outside regular business hours or not pre-scheduled	$100	each
6	**Subdivision and Development**		
6.1	Capital Infrastructure Charge for creation of a new Serviced Parcel by Subdivision, and Capital Infrastructure Charge for creation of a Serviced Parcel with separate Folio from a group of two or more Parcels with one Folio		
a)	Balfour Water System	$3,000	each
b)	Burton Water System	$5,000	each
c)	Duhamel Water System	$2,000	each
d)	Edgewood Water System	$4,000	each
e)	Erickson Water System	$3,000	each
f)	Fauquier Water System	$5,000	each
g)	Grandview Properties Water System	$5,000	each
h)	Lister Water System	$5,000	each
i)	Lucas Road Water System	$3,000	each
j)	McDonald Creek Water System	$2,000	each
k)	Riondel Water System	$2,000	each
l)	Rosebery Highlands Water System	$5,000	each
m)	Sanca Water System	$2,000	each
n)	South Slocan Water System	$5,000	each
o)	West Robson Water System	$4,000	each
p)	Woodbury Water System	$4,000	each
q)	Woodlands Heights Water System	$3,000	each
r)	Ymir Water System	$2,000	each

No.	Item	Rate	Unit
6.2	Capital Infrastructure Charge for creation of Serviced Dwelling Units in a Multiple Dwelling Parcel Development after the initial Dwelling Unit, and Capital Infrastructure Charge for creation of Serviced Commercial, Industrial or Institutional Unit after the initial Unit		
a)	Balfour Water System	1,500	each
b)	Burton Water System	2,500	each
c)	Duhamel Water System	1,000	each
d)	Edgewood Water System	2,000	each
e)	Erickson Water System	1,500	each
f)	Fauquier Water System	2,500	each
g)	Grandview Properties Water System	2,500	each
h)	Lister Water System	2,500	each
i)	Lucas Road Water System	1,500	each
j)	McDonald Creek Water System	1,000	each
k)	Riondel Water System	1,000	each
l)	Rosebery Highlands Water System	2,500	each
m)	Sanca Water System	1,000	each
n)	South Slocan Water System	2,500	each
o)	West Robson Water System	2,000	each
p)	Woodbury Water System	2,000	each
q)	Woodlands Heights Water System	1,500	each
r)	Ymir Water System	1,000	each
6.3	Capital Infrastructure Charge for new irrigation privileges on Agricultural Land	$5,000	per acre
6.4	Water Main Extension and Improvements	Actual Cost	
6.5	Water Connection Charges		
a)	Installation	Actual Cost	
b)	Capital Infrastructure Charge for existing Parcels within a Water System Service Area not currently paying a Water Tax, Capital Reserve Fund Contribution or Undeveloped Parcel Fee	$10,000	
6.6	Abandonment of Water Connection	Actual Cost	

No.	Item	Rate	Unit
7	**Water Service Area Boundary Extension**		
7.1	Capital Infrastructure Charge for addition of a new Parcel to a Service Area, and bringing land into a Water Service Area by lot line cancellation or lot boundary adjustment		
a)	Balfour Water System	25,000	each
b)	Burton Water System	25,000	each
c)	Duhamel Water System	18,000	each
d)	Edgewood Water System	25,000	each
e)	Erickson Water System	25,000	each
f)	Fauquier Water System	25,000	each
g)	Grandview Properties Water System	25,000	each
h)	Lister Water System	25,000	each
i)	Lucas Road Water System	25,000	each
j)	McDonald Creek Water System	17,000	each
k)	Riondel Water System	20,000	each
l)	Rosebery Highlands Water System	25,000	each
m)	Sanca Water System	20,000	each
n)	South Slocan Water System	25,000	each
o)	West Robson Water System	25,000	each
p)	Woodbury Water System	25,000	each
q)	Woodlands Heights Water System	25,000	each
r)	Ymir Water System	22,000	each
7.2	Capital Infrastructure Charge for each additional Serviced Dwelling Unit in a Multiple Dwelling Parcel development after the initial Dwelling Unit and Capital Infrastructure Charge for each additional Serviced Commercial, Industrial or Institutional Unit after the initial Unit		
a)	Balfour Water System	12,500	each
b)	Burton Water System	12,500	each
c)	Duhamel Water System	9,000	each
d)	Edgewood Water System	12,500	each
e)	Erickson Water System	12,500	each
f)	Fauquier Water System	12,500	each
g)	Grandview Properties Water System	12,500	each
h)	Lister Water System	12,500	each
i)	Lucas Road Water System	12,500	each
j)	McDonald Creek Water System	8,500	each
k)	Riondel Water System	10,000	each
l)	Rosebery Highlands Water System	12,500	each
m)	Sanca Water System	10,000	each
n)	South Slocan Water System	12,500	each
o)	West Robson Water System	12,500	each
p)	Woodbury Water System	12,500	each
q)	Woodlands Heights Water System	12,500	each
r)	Ymir Water System	11,000	each
7.3	Capital Infrastructure Charge for irrigation privileges on Agricultural Land	$25,000	per acre

No.	Item	Rate	Unit
7.5	Water Main Extension and Improvements	Actual Cost	
7.6	Water Connection Installation	Actual Cost	
8	**Alternate Meter Read**		
8.1	Manual Meter Read – when read during scheduled automated readings	$50	annual
8.2	Manual Meter Read – unscheduled trip	$50	each

SCHEDULE B TO BYLAW NO. 2825
WATER SYSTEM SPECIFIC RATES, FEES AND CHARGES

1 ARROW CREEK WATER TREATMENT AND SUPPLY SERVICE AREA

No.	Item	Rate	Unit
1	Town of Creston (Operations and Maintenance)	$769,996.00	annually
2	Erickson Water Distribution Service (Operations and Maintenance)	$625,124.00	annually

2 BALFOUR WATER SYSTEM

No.	Item	Rate	Unit
1	Metered Rate		
a)	Base Charge: 3/4" meter	$157.00	quarterly
b)	Base Charge: 1" meter	$194.00	quarterly
c)	Base Charge: 1 1 /2" meter	$244.00	quarterly
d)	Base Charge: 2" meter	$305.00	quarterly
e)	Metered Consumption: First Block (Up to 100 cubic meters)	$1.25	per cubic meter quarterly
f)	Metered Consumption: Second Block (Over 100 cubic meters)	$1.87	per cubic meter quarterly
g)	Metered Consumption: Approved Non Profit (Per cubic meter)	$0.81	per cubic meter quarterly
2	Unmetered or Failed Meter	$873.00	annually
3	Queens Bay Resort Capital Reserve Fund Contribution	$175.00	annually per dwelling unit site

3 BURTON WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Campground (includes washrooms, serviced campsites and standpipe fill stations)	$2,205.00	annually
2	Commercial: Business	$1,455.00	annually
3	Commercial: Food and Beverage Service	$1,455.00	annually
4	Commercial: Orchard	$1,455.00	annually
5	Dwelling: Multi Family		
a)	First Dwelling	$1,455.00	annually
b)	Additional Dwelling	$730.00	annually
c)	Additional Mobile Housing Unit Dwelling	$730.00	annually
6	Dwelling: Single Family	$1,455.00	annually
7	Institutional: Church	$1,326.00	annually
8	Institutional: Community Hall	$1,326.00	annually
9	Institutional: School	$2,205.00	annually
10	Metered Rate		
a)	Base Charge	$146.00	quarterly
b)	Metered Consumption	$2.48	per cubic meter quarterly

4 DUHAMEL WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Short-Term Accommodation Rentals	$753.00	annually
2	Dwelling: Multi Family		
a)	First Dwelling	$753.00	annually
b)	Additional Dwelling	$753.00	annually
c)	Additional Mobile Housing Unit Dwelling	$753.00	annually
3	Dwelling: Single Family	$753.00	annually
4	Metered Rate		
a)	Base Charge	$76.00	quarterly
b)	Metered Consumption	$1.14	per cubic meter quarterly

5 EDGEWOOD WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Business (Includes store, bank, post office, office, concession & small business)	$896.00	annually
2	Dwelling: Multi Family		
a)	First Dwelling	$1,539.00	annually
b)	Additional Dwelling	$771.00	annually
c)	Additional Mobile Housing Unit Dwelling	$771.00	annually
3	Dwelling: Single Family	$1,539.00	annually
4	Industrial: Road Maintenance Yard	$2,685.00	annually
5	Institutional: Church	$1,345.00	annually
6	Institutional: Community Hall	$1,345.00	annually
7	Institutional: Health Facility	$673.00	annually
8	Institutional: Fire Hall	$1,539.00	annually
9	Institutional: School	$2,235.00	annually
10	Recreational (includes park & field Irrigation and Restroom Facilities)	$2,235.00	annually
11	Metered Rate		
a)	Base Charge	$154.00	quarterly
b)	Metered Consumption	$1.94	per cubic meter quarterly

6 ERICKSON WATER SYSTEM

No.	Item	Rate	Unit
1	Agricultural: Land Charge (Per acre, excluding first acre)	$360.00	annually
2	Agricultural: Greenhouse (for each square foot over 2,000)	$0.13	per square foot annually
3	Commercial: Short-Term Accommodation Rentals		
a)	Base Rate	$1,159.00	annually
b)	Rate per additional Rental Room	$193.00	annually
4	Commercial: Business (Includes store, bank, post office, office & small business)	$1,193.00	annually

No.	Item	Rate	Unit
5	Commercial: Campground		
a)	Base Rate (for Retail/Business /Dwelling)	$1,193.00	annually
b)	Per Camp Site	$85.00	annually
6	Commercial: Food & Beverage Services (Including restaurant, fruit stand, food stand, bakery, coffee shop, lounge, beverage room/stand)	$1,193.00	annually
7	Commercial: Food & Beverage Process & Storage	$5,870.00	annually
8	Commercial: Hotel/Motel		
a)	Base Rate	$0.00	annually
b)	Per Room Rate	$627.00	annually
c)	Restaurant	$1,193.00	annually
d)	Lounge	$1,193.00	annually
e)	Swimming Pool	$608.00	annually
9	Commercial: Manufactured Home Park (Conforming to *Manufactured Home Park Bylaw* No. 1082, 1995 with all Dwellings under one Account)		
a)	Base Rate	$1,193.00	annually
b)	Per Dwelling	$797.00	annually
10	Dwelling: Multi Family		
a)	First Dwelling	$1,159.00	annually
b)	Additional Dwelling	$1,159.00	annually
c)	Secondary Suite	$797.00	annually
d)	Additional Mobile Housing Unit Dwelling	$1,159.00	annually
e)	Swimming Pool (greater than 5,000 Litres)	$284.00	annually
11	Dwelling: Single Family		
a)	Dwelling	$1,159.00	annually
b)	Swimming Pool (greater than 5,000 Litres)	$284.00	annually
12	Industrial: Small Business (Includes office and yard)	$1,193.00	annually
13	Industrial: Saw Mill	$7,313.00	annually
14	Institutional: Church	$1,098.00	annually
15	Institutional: Community Hall	$1,098.00	annually
16	Institutional: School (per classroom)	$1,023.00	annually
17	Water Usage with No Development	$360.00	annually
18	Metered Rate		
a)	Base Charge	$116.00	quarterly
b)	Metered Consumption	$0.89	per cubic meter quarterly
19	Capital Reserve Fund Contribution		
a)	Per Parcel of Land	$389.00	annually
b)	Per Manufactured Home Park Dwelling	$389.00	annually

7 FAUQUIER WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Business (Includes store & laundromat)	$2,771.00	annually
2	Commercial: Concession Stand	$1,476.00	annually

No.	Item	Rate	Unit
3	Commercial: Food & Beverage Services	$3,334.00	annually
4	Commercial: Golf Course (Includes club house, irrigation and campsites)	$5,728.00	annually
5	Commercial: Hotel/Motel	$2,036.00	annually
6	Dwelling: Multi Family		
a)	First Dwelling	$1,476.00	annually
b)	Additional Dwelling	$740.00	annually
c)	Additional Mobile Housing Unit Dwelling	$740.00	annually
7	Dwelling: Single Family	$1,476.00	annually
8	Institutional: Church	$1,298.00	annually
9	Institutional: Community Hall	$1,298.00	annually
10	Institutional: Public Restrooms (Transportation)	$1,047.00	annually
11	Institutional: Utility Restrooms	$1,047.00	annually
12	Recreational (Includes Park & Field Irrigation and Restroom Facilities)	$1,696.00	annually
13	Metered Rate		
a)	Base Charge	$147.00	quarterly
b)	Metered Consumption	$1.12	per cubic meter quarterly

8 GRANDVIEW PROPERTIES WATER SYSTEM

No.	Item	Rate	Unit
1	Metered Rate		
a)	Base Charge	$181.00	quarterly
b)	Metered Consumption: First Block (Up to 50 cubic meters)	$1.26	per cubic meter quarterly
c)	Metered Consumption: Second Block (Over 50 cubic meters)	$3.16	per cubic meter quarterly
2	Undeveloped Parcel	$725.00	annually
3	Unmetered or Failed Meter	$1,310.00	annually

9 LISTER WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Business (Includes store, bank, post office, office & small business)	$963.00	annually
2	Commercial: Food & Beverage Services (Including restaurant, fruit stand, food stand, bakery, coffee shop, lounge, beverage room/stand)	$963.00	annually
3	Commercial: Food Processing	$963..00	annually
4	Commercial: Golf Course (Does not include irrigation)	$4,212.00	annually
5	Dwelling: Multi Family		
a)	First Dwelling	$609.00	annually
b)	Additional Dwelling	$609.00	annually
c)	Additional Mobile Housing Unit Dwelling	$609.00	annually
d)	Swimming Pool (greater than 5,000 Liters)	$416.00	annually

No.	Item	Rate	Unit
6	Dwelling: Single Family		
a)	Dwelling	$609.00	annually
b)	Swimming Pool (greater than 5,000 Liters)	$416.00	annually
7	Institutional: Fire Hall	$609.00	annually
8	Institutional: Community Hall/Park	$609.00	annually
9	Metered Rate		
a)	Base Charge	$61.00	quarterly
b)	Metered Consumption	$0.55	per cubic meter quarterly
10	Capital Reserve Fund Contribution	$458.00	annually

10 LUCAS ROAD WATER SYSTEM

No.	Item	Rate	Unit
1	Metered Rate		
a)	Base Charge	$265.00	quarterly
b)	Metered Consumption	$2.00	per cubic meter quarterly

11 MCDONALD CREEK WATER SYSTEM

(1) Rates and fees for the McDonald Creek Water System are in accordance with the agreement between the Regional District and the Village of Kaslo.

(2) McDonald Creek Customer Account Administration and Water Connection Maintenance is subject to Village of Kaslo fees and charges.

12 RIONDEL WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Business (Includes store, bank, post office, office & small business)	$838.00	annually
2	Commercial: Recreational Rentals Seasonal (per unit)	$520.00	annually
3	Commercial: Food & Beverage Services (Including restaurant, fruit stand, food stand, bakery, coffee shop, lounge, beverage room/stand)	$1,456.00	annually
4	Commercial: Golf Course (includes irrigation)	$15,575.00	annually
5	Commercial: Campground (includes washrooms, serviced campsites and standpipe fill stations)	$4,162.00	annually
6	Dwelling: Multi Family		
a)	First Dwelling	$838.00	annually
b)	Additional Dwelling	$838.00	annually
c)	Additional Mobile Housing Unit Dwelling	$838.00	annually
7	Dwelling: Single Family	$838.00	annually
8	Institutional: Ambulance Station	$1,243.00	annually
9	Institutional: Church	$838.00	annually
10	Institutional: Church Seasonal	$520.00	annually
11	Institutional: Regional District Community Building	$0.00	annually
12	Institutional: Regional District Community Center	$0.00	annually
13	Institutional: Regional District Recreational Center	$0.00	annually

14	Institutional : Regional District Fire Hall	$0.00	annually
15	Recreational: Regional District Recreational Center	$0.00	annually
16	Metered Rate		
a)	Base Charge	$83.00	quarterly
b)	Metered Consumption	$1.27	per cubic meter quarterly

13 ROSEBERY HIGHLANDS WATER SYSTEM

No.	Item	Rate	Unit
1	Dwelling : Multi Family		
a)	First Dwelling	$1,365.00	annually
b)	Additional Dwelling	$1,365.00	annually
c)	Additional Mobile Housing Unit Dwelling	$1,365.00	annually
2	Dwelling: Single Family	$1,365.00	annually
3	Undeveloped Parcel	$955.00	annually
4	Metered Rate		
a)	Base Charge	$239.00	quarterly
b)	Metered Consumption	$2.66	per cubic meter quarterly

14 SANCA WATER SYSTEM

No.	Item	Rate	Unit
1	Dwelling: Multi Family		
a)	First Dwelling	$737.00	annually
b)	Additional Dwelling	$737.00	annually
c)	Additional Mobile Housing Unit Dwelling	$737.00	annually
2	Dwelling: Single Family	$737.00	annually

15 SOUTH SLOCAN WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Business (Includes store, bank, office & small business)	$1,977.00	annually
2	Commercial: Food & Beverage Services (Including restaurant, fruit stand, food stand, bakery, coffee shop, lounge, beverage room/stand)	$5,079.00	annually
3	Dwelling: Multi Family		
a)	First Dwelling	$1,977.00	annually
b)	Additional Dwelling	$1,977.00	annually
c)	Additional Mobile Housing Unit Dwelling	$1,977.00	annually
d)	Secondary Suite	$1,382.00	annually
4	Dwelling: Single Family	$1,977.00	annually
5	Industrial: Small Business (Includes office, shop and yard)	$1,977.00	annually
6	Institutional: Regional District Community Building	$1,977.00	annually
7	Metered Rate		
a)	Base Charge	$198.00	quarterly
b)	Metered Consumption	$2.27	per cubic meter quarterly

16 WEST ROBSON WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Manufactured Home Park (Conforming to *Manufactured Home Park Bylaw* No. 1082, 1995 with all Dwellings under one Account)		
a)	Per Dwelling	$584.00	annually
b)	Capital Reserve Fund Contribution per Dwelling	$110.00	annually
2	Dwelling: Multi Family		
a)	First Dwelling	$780.00	annually
b)	Additional Dwelling	$389.00	annually
c)	Additional Mobile Housing Unit Dwelling	$389.00	annually
3	Dwelling: Single Family	$780.00	annually
4	Metered Rate		
a)	Base Charge	$78.00	quarterly
b)	Metered Consumption	$1.34	per cubic meter quarterly

17 WOODBURY WATER SYSTEM

No.	Item	Rate	Unit
1	Dwelling: Multi Family		
a)	First Dwelling	$951.00	annually
b)	Additional Dwelling	$500.00	annually
c)	Additional Mobile Housing Unit Dwelling	$500.00	annually
d)	Secondary Suite	$500.00	annually
2	Dwelling: Single Family	$951.00	annually
3	Undeveloped Parcel	$377.00	annually
4	Metered Rate		
a)	Base Charge	$135.00	quarterly
b)	Metered Consumption	$3.88	per cubic meter quarterly

18 WOODLAND HEIGHTS WATER SYSTEM

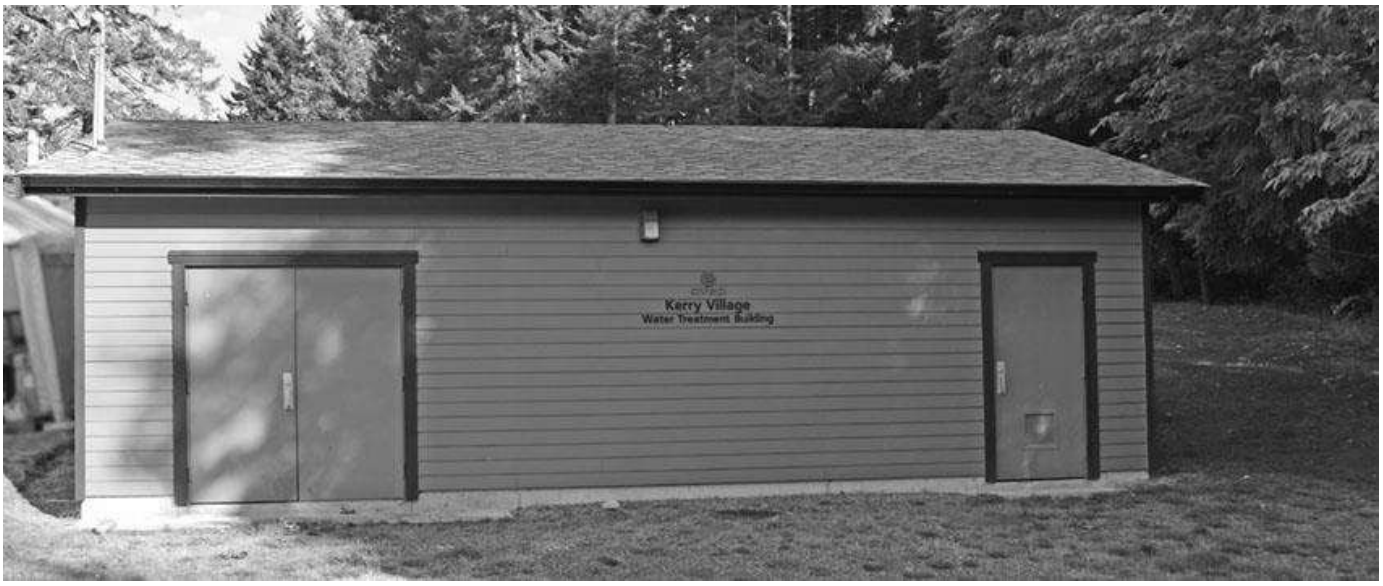
No.	Item	Rate	Unit
1	Dwelling: Single Family	$1,521.00	annually
2	Dwelling: Multi Family		
a)	First Dwelling	$1,521.00	annually
b)	Additional Dwelling	$1,521.00	annually
c)	Secondary Suite	$913.00	annually
3	Metered Rate		
a)	Base Charge	$151.00	quarterly
b)	Metered Consumption	$2.09	per cubic meter quarterly

19 YMIR WATER SYSTEM

No.	Item	Rate	Unit
1	Commercial: Short-Term Accommodation Rentals		
a)	Base Rate (Including Dwelling)	$622.00	annually
b)	Rate per Rental Room	$95.00	annually
2	Commercial: Business (Includes store, bank, post office, office, food stand, food counter, bakery, coffee service & small business)	$622.00	annually
3	Commercial: Food & Beverage Services (Including restaurant, lounge, & beverage room)	$935.00	annually
4	Commercial - Hotel/Motel		
a)	Base Rate	$2,981.00	annually
b)	Per Room Rate	$95.00	annually
c)	Restaurant	$674.00	annually
d)	Lounge/Beverage Room	$485.00	annually
e)	Laundry	$2,981.00	annually
f)	Coffee shop	$674.00	annually
5	Dwelling: Multi Family		
a)	First Dwelling	$622.00	annually
b)	Additional Dwelling	$622.00	annually
c)	Additional Mobile Housing Unit Dwelling	$622.00	annually
6	Dwelling: Single Family	$622.00	annually
7	Institutional: Community Association	$0.00	annually
8	Institutional: Arts & Museum Society	$0.00	annually
9	Institutional: Fire Hall	$0.00	annually
10	Metered Rate		
a)	Base Charge	$62.00	quarterly
b)	Metered Consumption	$2.53	per cubic meter quarterly

Attachment C4:
Cowichan Valley Regional District
Kerry Village Rates and Fees

Kerry Village Water System



Kerry Village Water System is located west of Mill Bay in Area A. The water system services the Kerry Village mobile home park, a residential development off of Briarwood Drive and a new subdivision on Shawnigan Mill Bay Road.

Source, Treatment and Distribution

A groundwater well pumps water to the treatment building where the water is treated for manganese and iron in the source water. The water then receives chlorine disinfection before being pumped to a 318 m^3, below-grade, concrete water storage reservoir and is fed to the distribution system as required by the customers.

Critical equipment is monitored 24-hours a day for malfunctions, such as high or low chlorine levels or pump failures; if such an abnormality occurs, an alarm is immediately sent to the on-duty pager to alert CVRD staff for quick response.

Annual Water Testing

Kerry Village water system is sampled, at a minimum, once a week. The following table shows the sampling frequency and parameters tested for the water system:

Frequency	Parameter Tested	Laboratory
Weekly	Bacterial (E.Coli and Total Coliforms)	Samples are submitted to the Island Health Authority for testing by a provincial laboratory
Annual	Full spectrum analysis based on the Canadian Drinking Water Guidelines. Sampling of the source and distribution is alternated each year.	Bureau Veritas

Testing results can be found in the Annual Water Report completed each year.

Fee Structure

Kerry Village water system is a partially metered water system. Customers receive user fee invoices every six months and an annual parcel tax is levied on individual property taxes. Mobile homes are charged a flat rate. Single family homes have a water meter that records water consumption. Water meters are read every six months and these customers are charged according to their consumption and based on the rates set out in the table below.

Annual Charges

Billing Period	Billing Date	User Fees* (per billing period)	Parcel Tax**	Annual Fee (User Fee and Parcel tax)
January 1-June 30	February 1	$260 (mobile home) $348.50 (single family dwelling)	$200.00	$720 (mobile home) $897 (single family dwelling)
July 1- December 31	August 3	$260 (mobile home) $348.50 (single family dwelling)		

Inclined Block Rate Table

User Fees	
Water Use (per billing period)	**Charge**
0-200 m3	$348.50
201-300 m3	$348.50 + 1.00 per m^3 over 200 m^3
301-400 m3	$448.50 + 1.50 per m^3 over 300 m^3
over 400 m3	$598.50 + 2.25 per m^3 over 400 m^3

*User Fees are mailed out to each customers on the billing date stated above.

**Parcel Tax is charged once a year and is incorporated into the property tax for each customer.

Current year budget information can be viewed here.

Undetected Leaks

Undetected Leaks will be considered in any buried service water line or water line in the building's walls. Plumbing fixtures are taps, toilets and hose bibs.

User Charges may be adjusted where an undetected leak on the consumer's property has resulted in water usage greatly exceeding typical usage of water, according to the applicable classification(s) and there is no indication that water was knowingly allowed to run to waste. A request for a leak adjustment may be granted if all the following conditions are met or in extraordinary circumstances approval of the Corporate Financial Officer or the Manager.

1. The property owner has not been granted a leak adjustment in the last 5 years.
2. The leak was repaired within 30 days of billing or discovery of the leak;
3. Written verification describing the nature of the leakage and the action taken to rectify the problem must be received by the Manager before a leak adjustment will be granted.

Where a leak adjustment is approved, User Charge adjustments will be determined as follows:

1. If the leak is found in the service line, volumes from the 2 previous years, of the same billing cycle, will be averaged and charged. i.e. Average of 2 previous summers, if leak occurs in the summer.
2. If the leak is associated with an in-home plumbing fixture or irrigation system, volumes from the 2 previous years, of the same billing cycle will be averaged plus 50% of the incremental water usage (between the average and the overage) will be charged to a maximum added value of $500.
3. Subsequent leaks occurring within 5 years of the previous leak adjustment request will be eligible for the cap of $1,500 per single family dwelling equivalent, up to a maximum of $5,000. Where the

average of the 2 previous years of the same billing cycle is greater than $5,000, the eligible cap will be 1.5 times the average.

Contact Us

Utilities

Email

Physical Address
175 Ingram Street
Duncan, BC V9L 1N8

Phone 250.746.2530

Directory

After hours Utilities emergency telephone 1.888.453.0148

Quick Links

- Change Your Mailing Address
- Report a Non-Emergency Sewer or Water Concern
- Toilet Rebate Application
- Bylaw 4232 - Schedule E Source Control
- Boil Water Notice FAQs
- Current Water Restrictions
- High Water Bill?

View All

Attachment C5:
Capital Regional District
Magic Estates Rates and Fees

Information by Area

Drinking Water

This page lists account details (rates, billing) by water system name as listed on your utility or water bill. Click on a water system name below to show details.

- Beddis (Salt Spring Island)
- Cedar Lane (Salt Spring Island)
- Cedars of Tuam (Salt Spring Island)
- CRD Water Service (Westshore & parts of Juan de Fuca EA)
- Fernwood (Salt Spring Island)
- Fulford (Salt Spring Island)
- Highland (Salt Spring Island)
- Lyall Harbour - Boot Cove (Saturna Island)

The Magic Lake Estates Water System provides drinking water to a small Water Service Area on North Pender Island.

Water Rates

Quarterly User Charge: $89.10 per Single Family Equivalent
Consumption Charge: 0 to 50 cubic meters = $0 per cubic meter
50 to 80 cubic meters = $.50 per cubic meter
Greater than 80 cubic meters = $1.00 per cubic meter

Water Billing

Water meters are read and billed out every three months. Payment is due within 30 days of issuing the water bill. A late payment charge of 1.5% will be added after the billing due date.

- Port Renfrew
- Skana (Mayne Island)
- Sticks-Allison (Galiano Island)
- Surfside Park Estates (Mayne Island)
- Wilderness Mountain (East Sooke)

Water and Sewer Emergencies 1.855.822.4426

When phoning with respect to an emergency, please specify to the operator the service area in which the emergency has occurred. This is a 24-hour line. Read more >>

General Inquiries: 1.800.663.4425

Attachment C6:
Regional District of Nanaimo
Bylaw No 1655.14

User Rates

Share

Residential Curbside Collection

The annual curbside collection amount charged per dwelling unit is dependent on the size of the GARBAGE cart you selected (in the absence of a selection, you will be provided and charged for the default 100L GARBAGE cart size). The curbside collection fee covers:

- The cost of garbage disposal at the Regional Landfill;
- The cost of processing recyclables at the material recovery facility;
- The cost of composting food waste at the organics processing facility; and
- The cost of community education, outreach and wildlife awareness programs

Curbside Fees - Single Family Dwellings (2023)

Annual utility fees are based on the garbage cart size

Recycling	Food Waste	Garbage	Annual Fee[$]
100 L	100 L*	80 L	$177/yr
240 L*		100 L*	$187/yr
360 L		240 L	$268/yr
		2x 100 L	$268/yr

**Default size*
[$]Before Prompt Payment Discount

To learn more about the new automated curbside collection service, please visit **the RDN Curbside Collection Services webpage**. The curbside collection service is governed under **RDN Bylaw 1802 (consolidated version including Bylaw 1802.02)**.

Residential Sewer Rates

Residential sewer rates vary depending on the service area. The rates are as follows:

French Creek	$ 175.63	per dwelling unit per year
Surfside	$ 145.66	per dwelling unit per year
Fairwinds	$ 77.09	per dwelling unit per year
Barclay Cr.	$ 250.37	per dwelling unit per year

Cedar	$ 233.40	per dwelling unit per year + $1.60 per day, if connected

Service Area Rates

To learn more about your sewer service area, please visit our RDN **Sewer Systems** webpage.

Not all residences in the Regional District of Nanaimo have sewer service. Some properties may have onsite systems often called septic systems. To learn more about these types of systems, please visit our **Septic Smart** webpage.

Residential Water Rates

The Regional District of Nanaimo has amended its system of tiered rates for water usage, starting with the 2023 water bills. The cost of water increases with increased usage. This service falls under Bylaw 1655.14.

		Average Daily Consumption in Cubic Metres (m3)		
	Minimum Daily Rate	Up t 0.70 m3	0.71 to 2.0 m3	Over 2.01 m3
2023 Rate	$0.50	$1.00	$2.00	$4.00
2023 Sandpiper Bulk Water	$0.00	$2.40	$2.40	$2.40

For more information on the water systems, please visit the **WaterSmart Communities** webpage.

Sandpiper Bulk Water Rates (if applicable)

As of November 5, 2021 the Regional District of Nanaimo has entered into a water supply agreement with the Town of Qualicum Beach to supply bulk drinking water to French Creek water service area residents in the Sandpiper subdivision.

The rate is $2.40 per cubic meter (1000 litres) in addition to the RDN's metered water rates.

How your Water Bill is Calculated

Calculating your water bill based on 2023 rates:

Step 1: Calculate your average daily consumption

$$\frac{\text{Total consumption (found on your bill)}}{\text{Number of days in billing period}} = \text{Average daily consumption}$$

To Calculate the Number of Days in a Billing Period

Previous reading date:

Current reading date:

Number of days between readings: **0** Days

Step 2: Calculate total bill amount

If your average daily consumption is equal to or less than 0.7 m^3 per day, proceed with the following calculation:

Assuming your average daily consumption is 0.55 m^3 per day (66 cu m / 120 days)

(a) Average daily consumption x rate per m^3 x number of days in the billing period

= 0.55 m^3 x $1.00 per cu m x 120 days = $66.00

(b) Minimum daily rate = $0.50 x 120 days = $60.00

Your bill will be the greater of (a) or (b)

If your average daily consumption is greater than 0.7 m^3 per day, proceed with the following calculation:

Assuming your average daily consumption is 2.5 m^3 per day (300 cu m / 120 days)

(a) First 0.7 cu m x $1.00 per m^3 = $0.70 per day

(b) From 0.7001 to 2.0 m^3 (1.2999 cu m) x $2.00 m^3 = $2.5998 per day

(c) From 2.001 m^3 and above (0.5001 m^3) x $4.00 = $2.0004 per day

Total daily cost = $5.3002

Your bill will be = $5.3002 x 120 days = $636.02

Community Averages for Water Usage in Your Area - For Billing Period May 2022 to September 2022:

Code:	Service Area:	Cubic meters per Day:
W34	Surfside	1.36
W38	French Creek	0.78
W39	Whiskey Creek	0.76
W42	Decourcey	0.62
W43A	San Pareil	1.04
W45	Englishman River	1.31
W46A	Melrose Terrace	0.55
W47	Nanoose Peninsula	1.12
W51	Westurne Heights	0.49

- Grants
- Payment Information, Electronic Billing and Forms
- Customer Service Access Point
- Frequently Asked Questions
- User Rates

Contact Our Department

inquiries@rdn.bc.ca

Ph: 250-390-4111

MAY 2023

Su	Mo	Tu	We	Th	Fr	Sa
30						
7				11		
14			17			20
21				25	26	27
28				1	2	3
4	5	6	7	8	9	10

Partner Websites

englishmanriverwaterservice.ca
getinvolved.rdn.ca

Contact The RDN

250-390-4111

1-877-607-4111 **Toll Free**

inquiries@rdn.bc.ca

Address: 6300 Hammond Bay Road,
Nanaimo, BC, V9T 6N2

admin

Attachment C7:

Fraser Valley Regional District Bylaw No 1693, 2023

CONSOLIDATED FVRD WATER SUPPLY SYSTEMS
REGULATIONS FEES & CHARGES BYLAW

RECORD OF AMENDMENTS

FVRD Water Supply Systems Regulations, Fees & Charges

BYLAW	SUMMARY	DATE AUTHORIZED
FVRD BL 1631, 2021	Regulations, Fees and Charges Establishment for all FVRD Water Systems	2021 06 24
1647, 2022	Fees & Charges Amendment	2022 02 24
1693, 2023	Fees & Charges Amendment	2023 03 23

THIS BYLAW HAS BEEN CONSOLIDATED FOR CONVENIENCE ONLY AND SHOULD NOT BE USED FOR LEGAL PURPOSES.

COPIES OF THE ORIGINAL BYLAWS CAN BE REQUESTED AT INFO@FVRD.CA

FRASER VALLEY REGIONAL DISTRICT

BYLAW NO. 1631, 2021

A bylaw to establish regulations, terms, conditions, fees and other charges under which water, may be supplied and used in Fraser Valley Regional District Water Supply Systems.

WHEREAS the Board of Directors of the Fraser Valley Regional District ("the Board") wishes to establish the terms and conditions under which water may be supplied and used in Fraser Valley Regional District established water system service areas, and to establish the fees and charges associated with the delivery of said services;

THEREFORE the Board enacts as follows:

1. CITATION

This bylaw may be cited as *Fraser Valley Regional District Water Supply Systems Regulations, Fees and Charges Establishment Bylaw No. 1631, 2021*.

2. ADMINISTRATION

The Manager is authorized to administer and oversee the operation of the Fraser Valley Regional District Water Supply Systems.

3. SCHEDULES

The following Schedules are attached to and form an integral part of this bylaw:

- Schedule A - Water Service Areas
- Schedule B - Water Service Fees And Charges

4. INTERPRETATION

In this bylaw:

"Applicant" means a person who has submitted an application to the Regional District for a Water Services Connection and has not yet received approval;

"Application for Water Service" means an application for Water Service which must be made in the form(s) prescribed by the Regional District and must furthermore contain any and all information necessary to establish compliance with the British Columbia Plumbing Code, this bylaw or any other enactment;

“Backflow” means the flow of water or other liquids, gases or solids from any source in the reverse direction back into Private Waterworks or any Water Supply System;

“Backflow Preventer” means a device or method to prevent Backflow;

“Board” means the Fraser Valley Regional District Board of Directors;

“British Columbia Plumbing Code” means the British Columbia Plumbing Code 2018;

"Building Service Line" means the piping which conveys water to a building, between the exterior boundary of the Parcel and the building to which the water is to be conveyed;

"Capital Improvement Connection Fees" means a fee levied that is placed into reserves as a contribution to the cost of existing water infrastructure, upgrades and long term asset renewal.

“Commercial” means any occupation, employment or enterprise that is carried on for profit;

"Commercial Metered" means any connection not servicing two or more residences or buildings other than a single residence;

“Cross Connection” means any pipe, channel or link connecting a potable water supply with a potential source of pollution such that there may be a flow from the source of pollution to the potable water;

“Cross Connection Control Bylaw” means the Fraser Valley Regional District Water Systems Cross Connection Control Regulation Bylaw No. 1177, 2012 as amended or replaced from time to time;

“CSA” means the Canadian Standards Association;

“Customer” means a person who is being provided Water Services or who has filed an Application for Water Services with the Regional District that has been approved by the Regional District;

"Development Cost Charges" means a fee levied on new development to pay for new or expanded infrastructure such as water, sewer, drainage, parks and roads necessary to adequately service the demands of that new development.

“Electronic Water Meter” means a device used to electronically measure and record water usage;

“Inspector” means the Director of Engineering and Utilities, the Manager of Operations or their designates and Bylaw Enforcement Officers of the Regional District;

“Institutional” means a facility which relates to human development such as education, recreation, religion or politics or which relates to public service such as health or protective services;

“Manager” means the Director of Engineering and Utilities or the Manager of Operations or their designates;

"Owner" means any person who is the owner of real property, or any other person authorized in writing by the owner to represent the owner, including, but not limited to, a person, firm or corporation ;

"Parcel" means a lot, block or other area of real property in which land is held or into which it is subdivided;

"Private Waterworks" means any pipe fittings, valves, appurtenances, water supply outlets and any other plumbing devices that is intended to receive water from a Water Service Connection and deliver or distribute the water to and on the land of any Owner whether or not within a building but does not include a Water Service Connection;

"Regional District" means the Fraser Valley Regional District;

"Water Conservation Bylaw" means Fraser Valley Regional District Electoral Area Water Conservation Regulation Bylaw No. 1387,2016, as amended or replaced from time to time;

"Water Service" means the supply of water from the Regional District to a Customer pursuant to this Bylaw;

"Water Service Area" means any of the service areas identified in **Schedule A**;

"Water Service Connection" means the point where a Water Supply System connects to any Parcel and includes all pipes, taps, valves, connections and other appurtenances used to connect the Private Waterworks into the Water Supply System, and will typically be at the downstream side of an Electronic Water Meter near the boundary or property line of the Parcel;

"Water Service Curb Stop" means that device which is used to turn on and turn off water at the exterior boundary of a Parcel;

"Water Service Main" means pipes installed within a public right-of-way for Water Service for more than one (1) Parcel;

"Water Supply System" means the system of supply and water works of the Fraser Valley Regional District owned and maintained by the Fraser Valley Regional District including mains, service pipes, fire hydrants, valves, meters, services, reservoirs, wells, control buildings, and all other accessories and appurtenances thereto.

5. AREA OF APPLICATION

This bylaw applies to all Owners or occupiers of all Parcels situated within the boundaries of Fraser Valley Regional District Water Service Areas or the Owners or occupiers of all Parcels connected to a Fraser Valley Regional District Water Supply System.

6. PENALTIES

6.1 Every person who violates any of the provisions of this bylaw or who suffers or permits any act or thing to be done in contravention of any of the provisions of this bylaw or who neglects to do or refrains from doing anything required to be done under any of the provisions of this bylaw, commits an offence against this bylaw and is subject to the penalties imposed. Each day that a contravention of a provision of this bylaw occurs or continues constitutes a separate offence.

6.2 Every person who commits an offence against this bylaw is liable to a fine and penalty of not more than Two Thousand Dollars ($2,000) and not less than Two Hundred Dollars ($200) for each offence, recoverable under the provisions of the Offence Act R.S.B.C. 1996 Ch. 338.

7. PROHIBITIONS

7.1 Except in cases of fire or other emergency or exigent circumstance, every person commits an offence contrary to the provisions of this bylaw who:

a) takes, consumes or uses water from Water Supply Systems without first making application for Water Service in the forms prescribed by the Regional District along with any supplementary information required by the Regional District and without having those applications authorized and signed by the Inspector ;

b) taps into or makes any Water Service Connection to a Water Service Main, without the prior written consent of the Inspector;

c) connects or allows a Water Service Connection to be made or permits a Water Service Connection to continue to exist without first obtaining a Water Service Connection permit to do so from the Regional District;

d) fails to obtain an inspection if an installation is required to be inspected;

e) covers any part of any pipe or of any fitting used for a Water Service Connection before it is inspected and approved by the Inspector;

f) turns on or turns off a Water Service Curb Stop without the prior written consent of the Inspector;

g) installs any pump, booster or other device or who uses same without permission in writing from the Inspector for the purpose of, or having the effect of, increasing water pressure in Building Service Lines to a higher pressure than the normal water pressure in the Building Service Line;

h) alters or tampers with any Water Supply Systems works or services, including, but not limited to hydrants located on any street, Parcel or right-of-way located therein, without the prior written consent of the Inspector;

i) alters or tampers with any Electronic Water Meters without the prior written consent of the Inspector;

j) obstructs or prevents the Inspector from administering and enforcing any provisions of this bylaw;

k) uses water from the Water Supply Systems to sprinkle and irrigate lawns, gardens, fields or otherwise during times of limited consumption or of restricted hours of usage as declared by the Regional District from time to time;

l) acts, or fails to act in any manner whatsoever which causes damage to the Water Supply Systems;

m) acts, or fails to act in any manner whatsoever which causes or contributes to contamination of the Water Supply Systems;

n) installs or connects any pipe, valve or any other fitting required for any Water Service Connection or Building Service Line at a depth of less than 1.2m of earth fill;

o) installs, permits to be installed or connects any pipe, valve or any other fitting for the purpose of water consumption between the Water Service Curb Stop and Electronic Water Meter;

p) contravenes any other provision of this bylaw.

8. POWERS OF THE REGIONAL DISTRICT

8.1 The Regional District administers and determines all water fees and other charges for all connections to a Water Supply System.

8.2 The Regional District may:

a) limit the number of Water Service Connections to the Water Supply Systems;

b) require a permit for Water Service Connections larger than 25mm;

c) in the interest of efficient operation of the Water Supply System and equitable distribution of water and whenever in its discretion the public interest so requires, suspend or limit the consumption of water from the Water Supply System, or may regulate the hours of use, or may further prescribe the manner in which such water may be used, which will not result in any reduction or refund of rates or fees;

d) disconnect the Water Service to any Parcel in accordance with this bylaw;

e) refuse any Water Service Main extension or enlargement if such extension or enlargement may jeopardize the supply to those uses and Parcels already connected to the Water Supply Systems;

f) require an existing user or an Applicant for a Water Service Connection to install an Electronic Water Meter for measuring water use;

g) require an Applicant for a Water Service Connection to uncover any part of any pipe or fitting used in such connection which was covered before it was inspected and approved by the Inspector.

8.3 The Fraser Valley Regional District, its officers, employees or agents will not incur any liability of any kind what so ever by reason of the cessation in whole or in part of water pressure or water supply, or changes in operating pressures, or by reason of the water containing sediments, deposits, or other foreign matter.

8.4 The failure to be sent a notice(s), or the failure to receive a notice(s), will not excuse the mandatory duty of the Customer or other responsible party to comply with this bylaw and/or the Cross Connection Control Bylaw and all other applicable bylaws.

9. POWERS AND DUTIES OF THE INSPECTOR

9.1 An Inspector must retain the following records in accordance with any and all relevant bylaws of the Fraser Valley Regional District and any and all relevant statutes, codes, regulations and other legislation enacted by the Province of British Columbia:

a) any Application for Water Service received;

b) any Water Service Connection permit issued;

c) any waterworks stop work notice issued;

d) any water shut-off notice issues

e) any inspection reports;

f) any test results; and

g) any and all relevant notices, papers and documents connected with the administration of this bylaw.

9.2 An Inspector may:

a) enter a structure any time for the purpose of administering or enforcing this bylaw, but if any dwelling or structure to be entered is occupied, the Inspector must first either obtain consent of the occupant or provide written notice to the occupant twenty-four (24) hours in advance of inspection;

b) issue a waterworks stop work notice in accordance with the provisions of this bylaw;

c) authorize or refuse an application for Water Service Connection in accordance with the provisions of this bylaw;

d) disconnect the Water Service to any premises in accordance with the provisions of this bylaw or any other enactment; and

e) determine, if specialized knowledge is required, that a Professional Engineer or Applied Sciences Technologist registered in the Province of British Columbia and competent in the area of water supply and distribution services, prepare and sign all drawings, specifications and plans and supervise construction of any such installation or Water Service Connection.

10. CROSS CONNECTION CONTROL

10.1 Pursuant to the Cross Connection Control Bylaw, the Regional District may, at its sole discretion, require an Owner of a Water Service to install an approved Backflow prevention assembly conforming to the CAN/CSA B64.10-07 or most current edition, for the selection, installation, maintenance, and field testing of Backflow Preventers, and Regional District Cross Connection Control Bylaw .

10.2 The Regional District will only provide Water Services to a Customer if, in the opinion of the Regional District, the Water Supply System has been effectively protected from any actual or potential Cross Connections existing at or within the Customer's Private Waterworks system.

11. ELECTRONIC WATER METERS

11.1 All new Water Service Connections, with the exception of those within the Townsite of Yale Water Supply and Distribution Local Service Area, require an Electronic Water Meter;

11.2 Except as provided under Section 12.6 hereto, Electronic Water Meters will be supplied by the Regional District and must be installed as directed by the Inspector at the Applicant's expense;

11.3 Electronic Water Meters will remain the property of the Regional District;

11.4 Electronic Water Meters must be accessible for inspection and changed as may be required from time to time by the Regional District.

12. APPLICATIONS FOR WATER SERVICE

12.1 A person must not take, consume and/or use water from the Water Supply System without the prior written consent of the Inspector and without making payment of fees and charges in accordance with this bylaw.

12.2 A separate Application for Water Service must be made for any and all extensions of service to an existing Water Service Connection.

12.3 If there is an existing Water Service Curb Stop, an Application for Water Service must:

a) be accompanied by the fee as set out in Schedule B; and

b) contain any and all information necessary to establish compliance with the British Columbia Plumbing Code, this bylaw or any other enactment.

12.4 If there is no existing Water Service Curb Stop or if a change in the location of the Water Service Connection is requested, an Application for Water Service must:

a) be accompanied by the fee set out in Schedule B to this bylaw;

b) include as an exhibit, copies of the specifications and scale drawings ;

c) include the legal description of the area of land to be served by the Water Service Connection, and the location of:

i. the Water Service Curb Stop;

ii. the Building Service Line;

iii. all building, structures and other installations requiring or related to the Water Service;

iv. all septic system installations, sewer pipes, drains, and other underground pipes, wires, or cables; and

v. all pressure reducing valves, shut-off valves, etc... as per drawings;

vi. Electronic Water Meter;

d) Include pipe sizes, valves and other plumbing fixtures; and

e) Include depth of the Water Service Connection and Building Service Line; and

f) contain all other information necessary to establish compliance with the British Columbia Plumbing Code, this bylaw or any other enactment.

12.5 If a Water Service Connection larger than 25mm is required:

a) an application for a permit shall be made in the form prescribed by the Regional District and contain, for each proposed connection:

i. a description of the purpose of the connection;

ii. a description of the size of pipe intended to be used at the Water Service Connection and the approximate placement of the Private Waterworks;

iii. annual volume of water requested;

iv. all information necessary to establish compliance with the British Columbia Plumbing Code, this bylaw or any other enactment;

b) the Water Service Connection must be installed at the Owner's expense;

c) the Owner must pay any and all required fees and charges in accordance with Schedule B;

d) the Electronic Water Meter must be supplied and installed by the Owner as per the directives of the Inspector;

e) the Electronic Water Meter becomes the property of the Regional District once installed.

12.6 If an Application for Water Service has been made under this section and it is found that there is no Water Service Main adjacent to the Applicant's Parcel, the Applicant has the option of:

a) paying in advance for such works, installations or any other costs as may be required to extend the Water Supply System, as a condition precedent to the approval of the Application for Water Service; or

b) accepting a refund in full of any monies paid at the time of Application for Water Service.

12.7 If an Application for Water Service has been made under this section, the Regional District will, in every case, determine the use, the location and size of a Building Service Line to be used, having first given due consideration to specific requests.

12.8 If an Application for Water Service Connection has been made under this section and if a specific size of Water Service Connection and or Building Service Line has been requested, and if the Regional District cannot readily supply such Water Service, the Applicant has the option of:

a) providing at their own cost such facilities as they require to ensure a continuous and uninterrupted supply, pressure, or quality of water as required for their use;

b) accepting a refund in full of any monies paid at the time of Application for Water Service.

12.9 An Application is not considered approved until it has been signed by the Inspector.

13. ISSUANCE OF A WATER SERVICE CONNECTION PERMIT

13.1 If:

a) an Application for Water Service has been made; and

b) the proposed work set out in the application is approvable under this bylaw and conforms with this bylaw, the British Columbia Plumbing Code and all other enactments; and

c) the Applicant for a Water Service Connection has paid the fee prescribed and as set out in Schedule B;

the Inspector will issue a Water Service Connection permit for which the Application for Water Service has been made.

14. CALL FOR INSPECTIONS

14.1 The entire Building Service Line between the Water Service Curb Stop and/or Electronic Water Meter and the residence must be inspected by the Inspector and to the Inspector's satisfaction before authorized to turn on the water to any Water Service Connection.

14.2 A person must give the Inspector at least two (2) working days notice of a request for an inspection and the Inspector will use their best efforts to undertake an inspection within a reasonable time thereafter.

15. DISCONNECTION AND RECONNECTION

15.1 When any Building Service Line is abandoned, it will be sealed off by the Regional District and for such service, the Regional District is entitled to demand and receive the fees as outlined in Schedule B.

15.2 If an Owner seeks to reconnect a Building Service Line, the Owner must make an Application for Water Service and must otherwise comply with the terms of this bylaw.

16. WATER USAGE

16.1 The Regional District may, in its discretion and when the public interest so requires, suspend or limit the consumption of water from a Water Supply System or may regulate the hours of use or may further prescribe the manner in which such water may be used.

16.2 A change or addition to the number or type of fixtures on a Parcel, for the purpose of expanding the number of dwellings, installation of a swimming pool, or Commercial or Institutional enterprise, must not be made until an Application for Water Service is made to the Manager and written permission thereof obtained.

16.3 Water supplied to a Parcel must not be used to supply another Parcel.

16.4 A person must not:

a) cause, allow, or fail to promptly repair any damage to an appliance that results in a waste of water;

b) continue to use an appliance that, as a result of damage or deterioration, causes water to be wasted, or fail to promptly repair or replace any appliance that has deteriorated to the extent that it causes water to be wasted;

c) waste water by allowing a tap or hose to run water unnecessarily, thereby causing waste:

i. in relation to completing a task, providing a service, or producing a thing; or

ii. by over-watering a targeted lawn, boulevard or landscaped area;

d) draw water from any fire hydrant or attach any apparatus to a fire hydrant without the prior written approval of the Manager;

e) sell or distribute water supplied by the Regional District unless specifically authorized by the Regional District to do so.

17. WATERWORKS STOP WORK NOTICE

17.1 If an Owner undertakes the construction or installation of any Building Service Line, Water Service Connection or any other works (collectively referred to as "waterworks"), which in whole or in part:

a) contravenes the British Columbia Plumbing Code, this bylaw or any other enactment;

b) contravenes the specifications of the plans submitted with the Application for Water Service;

c) are being constructed without a Water Service Connection permit having been issued by the Inspector, or

d) are being constructed or installed in such a manner that represents a hazard to the health and safety of persons within Water Service Areas,

an Inspector may issue a Waterworks Stop Work Notice, which will give the Owner fourteen (14) days to remediate the construction or installation of the waterworks. The Inspector must post the Waterworks Stop Work Notice at the site and must deliver a copy to the Owner.

17.2 If a Water Works Stop Work Notice has been issued, a person must not continue the construction or installation of any waterworks.

17.3 If a Waterworks Stop Work Notice has been issued, the Inspector may require the Owner to make a separate Application for Water Service Connection in order to comply with the terms of the notice.

17.4 Notwithstanding the provisions of this section, if a person acts in such a manner or if there are exigent circumstances which represent a hazard to the health and safety of any user of a Water Supply System, the Inspector may issue a Waterworks Stop Work Notice which by its terms will cause the immediate suspension of any and all waterworks.

17.5 A Water Works Stop Work Notice will not be lifted until the violation has been corrected to the Inspector's satisfaction. Once the violation has been corrected, the Inspector will issue a new Water Service Connection Permit.

18. WATER SHUT-OFF NOTICES

18.1 The Regional District may, without notice, disconnect the Water Service for any of the following reasons, and the Regional District is not liable for damages by reason of discontinuing Water Service for such reasons:

a) unnecessary, misused or wasteful use of water, or violation of regulations concerning rationing, watering or sprinkling;

b) failure to repair or replace defective pipes, fittings, valves, tanks or appliances which are leaking or are otherwise not in a good state of repair and which are, or may become, a cause of wasted of water or represents a hazard to the health and safety of persons on the system;

c) if, in the opinion of the Inspector, any Water Service Connection, Building Service Line, pipe or fixture contravenes the requirements of the British Columbia Plumbing Code, this bylaw or any other enactments;

d) if a person fails to comply with the terms of a Water Works Stop Work Notice;

e) if a person fails to comply with the terms and conditions of a Water Service Connection permit;

f) if an Inspector determines that there exists a connection or Cross Connection prohibited by this bylaw or any other enactment.

18.2 The Inspector may issue a Water Shut-off Notice, which by its terms will give the Owner fourteen (14) days to remediate the violation. The Inspector must post the Water Shut-off Notice at the site and must deliver a copy to the Owner.

18.3 If the terms of the Water Shut-off Notice have not been satisfied and the Owner has been duly notified, the Inspector may cause the water to be shut-off at the Water Service Curb Stop.

18.4 Notwithstanding the provisions of this section, if a person acts in such a manner or if there are exigent circumstances which represent a hazard to the health and safety of any user of a Water Supply Systems, the Inspector may cause the water to be immediately shut-off without notice.

18.5 For so long as the Water Shut-off Notice is in effect, a person must not reconnect the water in contravention of the notice.

18.6 A Water Works Shut-off Notice will not be lifted until the violation has been corrected to the Inspector's satisfaction and all associated fees have been paid to the Regional District. Once the violation has been corrected, the Inspector will issue a new Water Service Connection permit.

19. WATER CONSERVATION

Pursuant to the Water Conservation Bylaw and in consultation with the affected Electoral Area Directors and the Board, the Director of Engineering and Utilities or their designate may declare that the Regional District has activated a water conservation stage.

20. WATER MAIN EXTENSIONS AND CONNECTIONS

20.1 All Water Service Main extensions or Water Service Connections must be approved in writing by an Inspector prior to construction, and all costs incurred will be a direct charge against the developer of a subdivision or the Owner of the property being connected.

20.2 The Inspector will inspect and approve all such extensions or service connections before back-filling is started.

20.3 The Regional District has the right to disallow any water main extension if such extension may jeopardize the supply to those persons already connected to a Water Supply System.

21. MULTIPLE DWELLINGS

In the case of apartment houses, mobile homes, duplex houses or houses containing one or more suites, each dwelling unit within such structure is considered as a separate unit and will be charged the appropriate fees and other charges as shown in Schedule B.

22. GENERAL

22.1 All water pipes, connections, appurtenances or facilities required for water distribution to the Owner's property line which are constructed, whether at the Owner's expense or Regional District's expense in present or future public highways or within Regional District rights-of-way or property, are the property of the Regional District, with respect to the Water Service Areas listed in Schedule A.

22.2 Each Owner of land and/or premises is responsible for the construction, repair and maintenance of all pipes and fixtures between the property line and their premises.

23. FEES AND CHARGES

23.1 There are hereby imposed and levied the fees and other charges for the provision of Water Services supplied by the Regional District to Water System Users as set out in Schedule B.

23.2 All fees and charges will be billed at such times as determined by the Regional District and are due and payable on or within 30 days following the issuance of statements.

23.3 In the case of connections being made during the year, the charge imposed will begin in the month during which the Water Service Connection was made provided such connection was made before the 15th day of the month; otherwise the charge will begin with the 1st of the month following the date the connection was made.

23.4 Accounts with user fees and other charges outstanding on the 31st of December in each year will be subject to recovery as authorized by Section 399.2of the Local Government Act [RSBC 2015] Ch. 1.

23.5 When any fees or charges for Water Services are overdue for a period of 3 months, such Water Services will be turned off from the premises in respect of which such fees or charges are overdue, without notice. Such service will not be turned on again to the premises until the following have been paid to the Regional District:

a) all overdue amounts;

b) any additional costs incurred by the Regional District with respect to turning off the Water Services.

24. LIABILITY

Nothing contained in this bylaw shall be construed to impose any liability on the Regional District to give a continuous supply of water to any person or premises and the Regional District hereby reserves the right, at any time, to shut off water from any premises without giving notice to any person from whose premises the water may be shut off.

25. PUBLIC HEALTH

The Province of British Columbia appointed Health Inspector shall be the authority in all matters pertaining to public health resulting from the operation of a Water Supply System.

26. NOTICE

26.1 Whenever it is a requirement of this bylaw that the Regional District deliver or serve notice on any person or party, any such notice will be conclusively deemed valid when served or delivered:

a) on the date of personal delivery if personally delivered;

b) when received by the addressee at the address shown on the assessment roll of the Parcel as of the date of mailing on the seventh (7th) business day following the mailing of same by pre-paid registered mail at any Canada Post Office.

27. REPEAL

The following bylaws and all amendments are hereby repealed:

a) Fraser Valley Regional District Electoral Area "D" Integrated Water System Fees and Regulations Establishment Bylaw No. 1094, 2011;

b) Regional District of Fraser-Cheam Bell Acres Water Supply and Distribution System Fees and Regulations Bylaw No. 1200, 1994;

c) Fraser Valley Regional District Boston Bar Integrated Water Supply and Distribution System Fees and Regulations Establishment Bylaw No. 1175, 2012;

d) Regional District of Fraser-Cheam Regional Waterworks System No. 1, East Cultus Lake Rates and Charges Bylaw No. 759, 1987;

e) Regional District of Fraser-Cheam East Cultus Lake Water Supply and Distribution System Regulations Bylaw No. 760, 1987;

f) *Fraser Valley Regional District Deroche Water System Rates, Fees and Regulations Establishment Bylaw No. 0198, 2000;*

g) *Fraser Valley Regional District Electoral Area "G" Dewdney Community Water System Fees and Regulations Establishment Bylaw No. 1028, 2010;*

h) *Fraser Valley Regional District Dogwood Water Supply and Distribution System Fees and Regulations Establishment Bylaw No. 0233, 1998;*

i) *Fraser Valley Regional District Hatzic Prairie Water Supply and Distribution System Fees and Regulations Establishment Bylaw No. 0910, 2008;*

j) *Fraser Valley Regional District Lake Errock Water Supply and Distribution System Fees and Regulations Establishment Bylaw No. 0912, 2008;*

k) *Fraser Valley Regional District Morris Valley Bulk Water Supply Fees and Regulations Establishment Bylaw No. 0423, 2000;*

l) *Fraser Valley Regional District North Bend Water Supply and Distribution System Fees and Regulations Bylaw No. 0074, 1996;*

m) *Fraser Valley Regional District Yale Water System Regulations Fees and Other Charges Establishment Bylaw No. 1514, 2019.*

28. SEVERABILITY

If a portion of this bylaw is found invalid by a court, it will be severed and the remainder of the bylaw will remain in effect.

FRASER VALLEY REGIONAL DISTRICT Bylaw No. 1631, 2021

SCHEDULE A - WATER SERVICE AREAS

This Bylaw will apply to each Water Service Area as established by the following bylaws, including any amendments:

a) Fraser Valley Regional District Electoral Area "D" Integrated Water System Service Area Merger Bylaw No. 0861, 2011;

b) Regional District of Fraser-Cheam Bell Acres Water Supply and Distribution System Local Service Area Establishment Bylaw No. 1004, 1991;

c) Fraser Valley Regional District Boston Bar Integrated Water Supply and Distribution System Service Area Establishment Bylaw No. 0991, 2009;

d) Regional District of Fraser-Cheam Regional East Cultus Lake Water Supply and Distribution System Local Service Area, Establishment Bylaw No. 906, 1990;

e) Dewdney-Alouette Regional District Deroche Water System Local Service Establishment Bylaw No. 0608, 1992;

f) Fraser Valley Regional District Electoral Area "G" Dewdney Community Water System Service Area Establishment Bylaw No. 0604, 2004;

g) Fraser Valley Regional District Dogwood Water System Local Service Area Establishment Bylaw No. 0143, 1997;

h) Fraser Valley Regional District Hatzic Prairie Water Supply and Distribution System Service Area Establishment Bylaw No. 0837, 2007;

i) Fraser Valley Regional District Lake Errock Water Supply and Distribution System Service Area Establishment Bylaw No. 0800, 2007;

j) Fraser Valley Regional District Electoral "C" Morris Valley Bulk Water Supply Local Service Area Establishment Bylaw No. 0343, 2000;

k) Regional District of Fraser-Cheam North Bend Water System Local Service Area Establishment Bylaw No. 0917, 1990;

l) Fraser Valley Regional District Townsite of Yale Water Supply and Distribution Local Service Area Conversion and Amendment Bylaw No. 0292, 1999.

This is Schedule A attached to and forming part of Bylaw No. 1631, 2021.

FRASER VALLEY REGIONAL DISTRICT BYLAW NO.1693, 2023

SCHEDULE B - WATER SERVICE FEES AND CHARGES

WATER SERVICE CONNECTION FEES

1. Existing Water Service Curb Stop which is of adequate size for the use intended and is located at or immediately abutting the boundary of the Parcel which is the subject of an Application for Water Service:

   $338.00 Electronic Water Meter (meter and register) per connection

   $78.00 Inspection Fee

   $37.00 Administration Fee

   $453.00 TOTAL COST OF CONNECTION

2. No Existing Water Service Curb Stop on an existing Water Service Main:

   i) The Water Service Connection will be installed at the Owner's expense.

   ii) The Electronic Water Meter will be supplied as per the provisions of Section 1 in this Schedule.

3. No existing Water Service Main adjacent to the Parcel which is the subject of an Application for Water Service:

   i) Water Service Main will be extended at Owner's expense.

   ii) The Water Service Connection will be installed at the Owner's expense.

   iii) The Electronic Water Meter will be supplied as per the provisions of Section 1 in this Schedule.

4. Water Service Connection larger than 25mm:

   i) The Water Service Connection will be installed at the Owner's expense,

   ii) The Electronic Water Meter will be supplied and installed at the Owner's expense.

   iii) $78.00 Inspection Fee and $37.00 Administration Fee.

5. To seal off and disconnect an abandoned Water Service Connection:

   i) The disconnection will be made at cost at the Owner's expense,

   ii) $78.00 Inspection Fee per disconnection.

6. Requests for a Water Service Connection to be turned on or off at the property line will be subject to a fee of $156.00.

SCHEDULE B – FEES

1. WATER SUPPLY SYSTEMS WATER USAGE FEES

a. Electoral Area A - North Bend Water System

Category of User	Quarterly Charge	Amount of Water Provided Quarterly
Metered Users	Minimum $63.88	Up to 100 m^3
Metered Users	$0.86/$m^3$	Over 100 m^3
Metered CP Rail	$1.94/$m^3$	
Metered Commercial Almer Carlson Pool	$0.92/$m^3$	

b. Electoral Area A Boston Bar Water System

Category of User	Semi Annual Charge	Amount of Water Provided Semi Annually
Metered Users	Minimum $147.02	Up to 150 m^3
Metered Users	$1.20/$m^3$	Over 150 m^3

c. Electoral Area B Yale Water System

Category of User	Monthly Charge
Residential	
Single Family Dwelling	$21.79
First Unit in Commercial & Recreational	$21.79
Business Commercial	
Premises used for businesses; Hotel containing dining room/restaurant/beverage room	$33.02
Additional commercial units	$9.91
Additional recreation units	$13.21
Institutional	$9.91
Community use facility	$47.18
Railway use - for service to railway buildings or trains	$455.71

d. Electoral Area B Dogwood Water System

Category of User	Quarterly Charge	Amount of Water Provided Quarterly
Metered Users	Minimum $91.04	Up to 100 m^3
Metered Users	$0.91/$m^3$	Over 100 m^3
Metered Commercial	$1.21/$m^3$	

e. Electoral Area C Morris Valley Bulk Water Supply System

Category of User	Quarterly Charge	Amount of Water Provided Quarterly
Metered Users	Minimum $48.67	Up to 300 m^3
Metered Users	$0.333/$m^3$	Over 300 m^3

f. Electoral Area C Lake Errock Water Supply System

Category of User	Semi-Annually Charge	Amount of Water Provided Semi-Annually
Metered Users	$125.88	Up to 200 m^3
Metered Users	$1.57/$m^3$	Over 200 m^3

g. Electoral Area D Integrated Water System

Category of User	Quarterly Charge	Amount of Water Provided Quarterly
Metered Users	$77.00	Up to 100 m^3
Metered Users	$0.86/$m^3$	Over 100 m^3

h. Electoral Area E Bell Acres Water System

Category of User	Quarterly Charge	Amount of Water Provided Quarterly
Metered Users	$77.76	Up to 50 m^3
Metered Users	$1.59/$m^3$	Over 50 m^3

i. Electoral Area F Hatzic Prairie Water System

The following minimum semi-annual Charge will be billed:

Meter Size	Semi-Annual Charge
20mm (5/8 inch)	$300

Notwithstanding the meter size, a semi-annual quantity charge will be added to the semi-annual billing:

Quantity	Semi-Annual Charge
0 - 200 m^3	No additional charge
200 - 400 m^3	$1.63/ m^3
All consumption over 400 m^3	$2.45/ m^3

j. Electoral Area G Deroche Water System

Category of User	Quarterly Charge
Metered User - Residential	$90.00 – Flat Rate
Metered User - Commercial	$114.30 or $0.72/ m^3 (whichever is greater)
Metered User - Institutional	$231.00 – Flat Rate

k. Electoral Area G Dewdney Water System

Meter Size and above	Quarterly Minimum Charge	Consumption Charge (per cubic metre)		
		0 - 200	201 - 800	801
20mm (5/8th inch)	$164.46	$0.00	$1.06	$1.33
25 mm (1 inch)	$164.46	$0.00	$1.06	$1.33
38.1mm (1½ inch)	$164.46	$0.00	$1.06	$1.33
50.8mm (2 inch)	$164.46	$0.00	$1.06	$1.33
101.6mm (4 inch)	$164.46	$0.00	$1.06	$1.33
200mm (8 inch)	$164.46	$0.00	$1.06	$1.33

I. The following applies to all the Water Service Areas: notwithstanding the maximum fees established herein, if the costs necessary to deliver the service are less than anticipated in a given budget year, than a lesser amount of water user fees may be charged.

2. SPECIAL DETAILS FOR ELECTORAL AREA D INTEGRATED WATER SYSTEM DEVELOPMENT COST CHARGES (DCC)

This additional provision applies to residents receiving Water Service in accordance with the Fraser Valley Regional District Popkum Bridal Falls Water Development Cost Charge Bylaw No. 0797, 2007, as amended or replaced from time to time;

The Development Cost Charge is a fee in addition to all the other applicable fees for Water Services that a Customer may be required to pay.

3. SPECIAL DETAILS FOR WATER SUPPLY SYSTEMS WITH CAPITAL IMPROVEMENT CONNECTION FEES

Capital Improvement Connection Fees is a fee levied for all new Water Service connections to the affected Water Service Areas that is placed into reserves as a contribution to the cost of existing water infrastructure, upgrades and long term asset renewal.

3.1 Boston Bar Water Supply System

Year	Fee
2023	$2,606

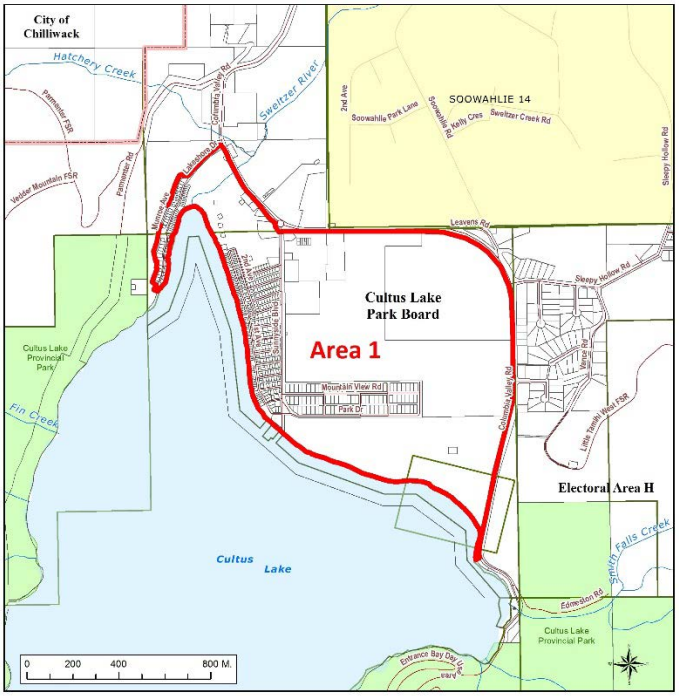
3.2 Cultus Lake Integrated Water Supply System

I. Area 1

Year	Fee
2023	$1,658

II. Area 2 - all other areas in Electoral Area H for future Water Service Connections

Year	Fee
2023	$0



3.3 Deroche Water Supply System

Year	Fee
2023	$3,998

3.4 Hatzic Prairie Water Supply System

I. Area 1

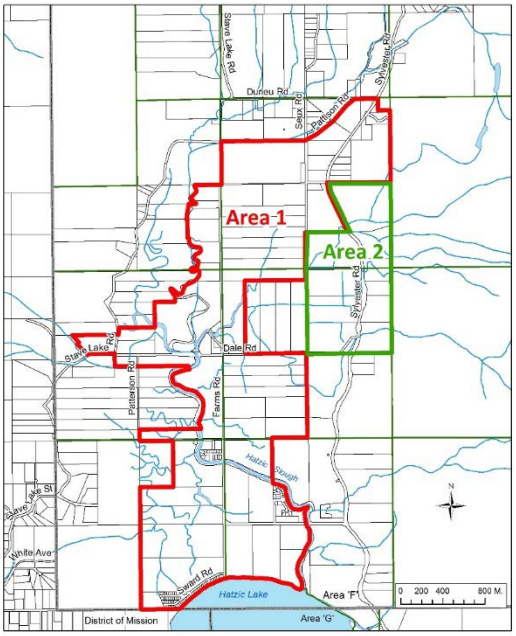
Year	Fee
2023	$5,572

II. Area 2

Year	Fee
2023	$1,970

III. Area 3 - all other areas within Electoral Area F for future Water Service Connections

Year	Fee
2023	$347



3.5 Lake Errock Water Supply System

I. Area 1

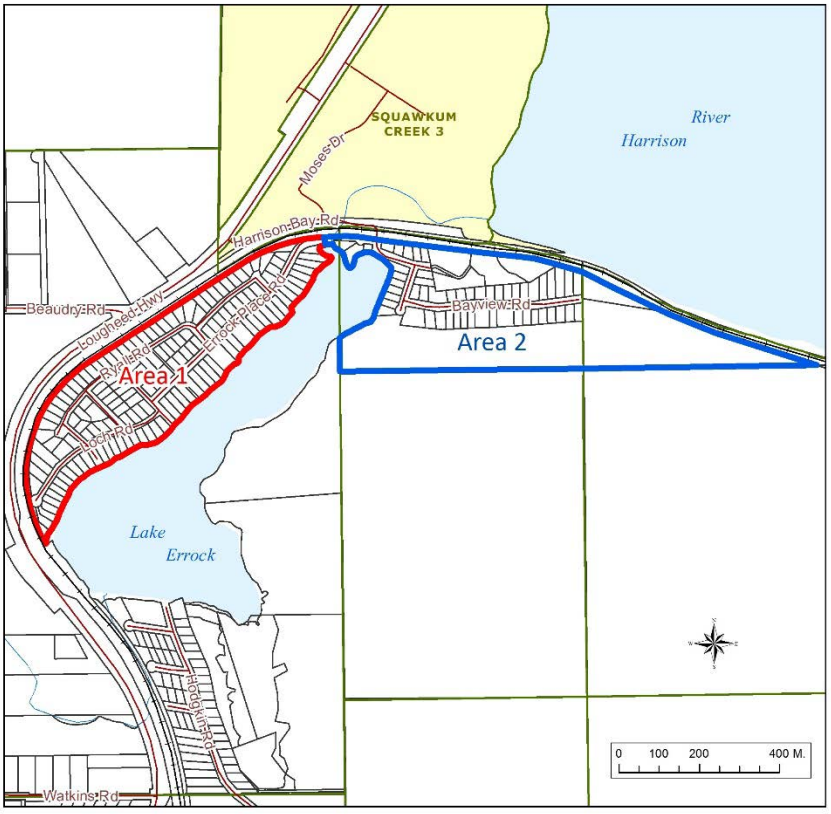
Year	Fee
2023	$10,334

II. Area 2

Year	Fee
2023	$5,343

III. Area 3 - all other areas within Electoral Area C for future Water Service Connections

Year	Fee
2023	$4,653



3.6 North Bend Water Supply System

Year	Fee
2023	$2,475

This is Schedule B attached to and forming part of Bylaw No. 1631, 2021

Attachment C8:
Town of Gibsons
Bylaw No 1196-22

Schedule B, Bylaw 1196-22
Water Rates, Fees and Charges

WATER				
FEES AND CHARGES				
Bylaw No.	**Description**		**Fee**	**Unit**
No.1192, 2014	3/4” Service Connection, c/w setter and Meter Box*		$2,920	each
No.1192, 2014	3/4” Meter Setter and box*		$1,440	each
No.1192, 2014	1” Service Connection, c/w setter and Meter Box*		$3,060	each
No.1192, 2014	1” (25 mm) Meter Setter and box*		$1,510	each
No.1192, 2014	5/8” x 3/4” Meter		$730	each
No.1192, 2014	3/4" Meter		$790	each
No.1192, 2014	1” Meter		$810	each
No.1192, 2014	Meter Box (supply and installation)		$1,200	each
No.1192, 2014	Meter Box and Lid (Supply only)		$120	each
No.1192, 2014	Meter Box Riser (Supply only)		$30	each
No.1192, 2014	Service connection to watermain only, no excavation or materials		$500	each
No.1192, 2014	Asphalt trench repair		$500	sq m
No.1192, 2014	Concrete curb repair (10m max)		$850	10m max
No.1192, 2014	Concrete curb repair (>10m)		$90	metre
No.1192, 2014	Concrete sidewalk repair (7 sq m max)		$850	7 sq m max
No.1192, 2014	Concrete sidewalk repair (>7 sq m)		$120	sq m
No.1192, 2014	Inspection Fee		$50	each
No.1192, 2014	Disconnection Fee (up to 2”)		$410	each
No.1192, 2014	Disconnection Fee (over 2”)		At Cost	each
No.1192, 2014	Water Shut Off		$70	each
No.1192, 2014	Administration Fee		$100	Lump Sum
No.1192, 2014	Basic Service Call	Minimum	$80	each
No.1192, 2014	Meter Testing	Minimum	At Cost	each
No.1192, 2014	Leak Adjustment		$50	each
No.1192, 2014	Hydrant Use Fee	per day	$100	each
No.1192, 2014	Hydrant Use – Damage Deposit		$500	each
No.1192, 2014	Temporary Lawn Sprinkling Permit		$25	each
No.1192, 2014	Facilities charge – single family and duplex residential subdivision		$966.33	per parcel
No.1192, 2014	Facilities charge - Garden Suites		$637.78	per unit
No.1192, 2014	Facilities charge - Townhouse		$7.43	per square meter of floor area
No.1192, 2014	Facilities charge - Apartment		$12.23	per square meter of floor area
No.1192, 2014	Facilities charge - industrial, Commercial and Institutional		$1.93	per square meter of floor area
*Additional Fees will be charged at cost for excavation depths greater than 1.5m				
*Fees marked with an asterisk are minimum costs. Cost will be charged at cost if greater.				

Schedule B, Bylaw 1196-22
Water Rates, Fees and Charges

USER RATES – DOMESTIC			
Bylaw No.	**Description**	**Fee**	**Unit**
No.1192, 2014	Single Family base rate	$58.25	Utility Account
No.1192, 2014	Multi-Family base rate	$17.33	Utility Account
No.1192, 2014	For each cubic meter of water consumed up to 138 cubic meters	$1.69	Cubic metre
No.1192, 2014	For each cubic meter of water consumed in excess of 138 cubic meters and up to 275 cubic meters	$2.26	Cubic metre
No.1192, 2014	For each cubic meter of water consumed in excess of 275 cubic meters	$2.86	Cubic metre
No.1192, 2014	Unmetered Domestic User	$400.00	each
USER RATES – COMMERCIAL (BASE RATES)			
Bylaw No.	**Description**	**Fee**	**Unit**
No.1192, 2014	5/8 or 3/4 inch meter	$182.17	each
No.1192, 2014	1 inch meter	$245.99	each
No.1192, 2014	1.5 inch meter	$601.03	each
No.1192, 2014	2 inch meter	$809.12	each
No.1192, 2014	3 inch meter	$1,323.71	each
No.1192, 2014	4 inch meter	$2,693.63	each
USER RATES – COMMERCIAL			
Bylaw No.	**Description**	**Fee**	**Unit**
No.1192, 2014	Commercial base rate	$96.40	Utility Account
No.1192, 2014	For each cubic meter of water consumed up to 138 cubic meters	$1.52	Cubic metre
No.1192, 2014	For each cubic meter of water consumed in excess of 138 cubic meters and up to 275 cubic meters	$2.05	Cubic metre
No.1192, 2014	For each cubic meter of water consumed in excess of 275 cubic meters	$2.59	Cubic metre
No.1192, 2014	Unmetered Commercial User	$1,325.00	each
No.1192, 2014	Unmetered service surcharge	$1,200.00	each
No.1192, 2014	Unprotected water service surcharge (no-backflow prevention device)	$1,200.00	each
No.1192, 2014	Town of Gibsons Water Vending	$0.25	Litre

APPENDIX D:
Materials for Public Communication

Public communication materials which includes bill comparisons of existing rates with peer districts, summary of rate options, and other relevant materials.

Table D-1: Objectives for the Proposed Rate Structure Options[1,2]

	Option 1 - Status Quo	Option 2 - Uniform Rates	Option 3 - Seasonal Rates
Rate Equity[1]	X	XX	X
Better price signals/Conservation incentive		X	XX
Mixed-user residential		X	X
Rate congruency		X	X
Revenue Predictability	XX	X	X
Bill impacts[2]	X	X	X
Simplicity, ease to use	XX	XXX	X

Notes:
1. Rate equity can be achieved for status quo through rebalancing rates among the customer classes.
2. Bill impacts will vary across customer classes and consumptions levels depending on the rate structure.

Summaries of advantages and disadvantages for each rate structure option are provided below.

Option 1: Current Rate Structure

- Advantages:
  - The current rate structure offers the highest revenue/rate stability among the options reviewed, as only a small portion of water revenue is impacted by consumption profile changes.
  - The current rate structure is also simple and easy to use (does not require consumption metering and billing for majority of customers).
- Disadvantages:
  - The rates are not equitable between metered and unmetered rates. The current rate structure indicates higher cost recovery from metered customers and under-recovery of costs from MFD and Industrial. However, the largest customer class (SFD) cost recovery is within zone of reasonableness at 100%. Further, rates equity can be improved within the current structure by adjusting the rates close to the COSA results.
  - The rates do not promote water conservation as only a small portion of customers are metered.

- The basis for the existing rate differences by customer class is not supported by COSA analysis.
- The rate structure does not address mixed-use residential water use and billing concern.

Option 2: Uniform Rate Structure

- Advantages:
  - Simple to understand by staff, users, and the public and easy to implement.
  - Consistent rate across all water users within a Water Service Area.
  - Equitable, because all customers pay the same unit price for water service. Can also be designed to have different volumetric rates by rate class, if supported by COSA.
  - Promote water conservation and more conscious water use.
  - Easy to update by the Regional District.
  - Allows defining rates by meter size and water usage that resolve mixed-use residential concern.

  Note, more frequent (e.g., quarterly, monthly) billing period improves price signaling.
- Disadvantages:
  - Revenue stability could be impacted by anticipated water use reductions. This could be mitigated by targeting a higher share of cost recovery through fixed charges but maintaining customer bill flexibility via volumetric charge component.
  - Requires customer base to have meters installed and operating.

Option 3: Seasonal Rate Structure

- Advantages:
  - Consistent rate across all water users within a Water Service Area.
  - Relatively simple to administer based on the review of SCRD meter reads.
  - Equitable, because the customers responsible for the higher peak-demand-related costs are charged for such costs.
  - Promote water conservation and more conscious water use. Seasonal rate structure offers the highest price signal/conservation incentive.
  - Allows defining the rates by meter size and water usage that resolve mixed-use residential concern.

    Note, more frequent (e.g., quarterly, monthly) billing period improves price signaling.
- Disadvantages:
  - May require an education program by the utility to explain the structure to customers.

- Can place revenue stability at risk, depending on the differential in the peak-season rate and customer response to a higher rate.
- Requires customer base to have meters installed and operating.

The uniform and seasonal rate structures require meters to be installed for all customers. Currently, the Regional Water Service Area does not have meters installed for all customer classes. It is recommended that the Regional District wait until meters are installed for all customer before changing the Regional Water Service area rate structure to include a volumetric rate for all customers. However, given North Pender Harbour and South Pender Harbour Water Service Areas are 100% metered, as an interim phase, the Regional District could implement a uniform or seasonal rate structure in these Water Service Areas. This would help the Regional District understand how customers respond to a volumetric rate structure and improve the effectiveness when a similar rate structure is applied to the Regional Water Service Area.

By moving to a volumetric rate structure, the Regional District can move away from the current customer classification and instead define rate classes by meter size and water usage which resolves the mixed-use residential concern. This can be done by simplifying the classes based on similar charges and/or by meter sizes. Table D-2 shows the proposed changes to customer classes.

Table D-2: Proposed Changes to Customer Classes

	Current Classes	Proposed Classes
All Service Areas	**Metered**	
	Group 1 (3/4 inch and under)	Group 1 (3/4 inch and under)
	Group 2 (3/4 - 1 inches)	Group 2 (3/4 - 1 inches)
	Group 3 (1 - 1 1/2 inches)	Group 3 (1 - 1 1/2 inches)
	Group 4 (1 1/2 - 2 inches)	Group 4 (1 1/2 - 2 inches)
RWS	**Unmetered**	
	Water Regional Apartment and Mobile Homes	Group 1 (3/4 inch and under)
	Water Regional SFD & Other	Captured by size in Group 1 - 4
	Water Regional Motel & Hospital	Group 1 (3/4 inch and under)
NPH	**Unmetered**	
	North Pender Institutional	
	North Pender MFD	Group 1 (3/4 inch and under)
	North Pender SFD	
SPH	**Unmetered**	
	South Pender BUS 1 EMP	
	South Pender BUS 1+ EMP	Group 1 (3/4 inch and under)
	Water South Pender SFD MFD	

If the Regional District proceeds with implementing a volumetric rate structure, it is recommended that volumetric rates are phased in. The first phase would be for volumetric rates to be implemented in the North Pender Harbour and South Pender Harbour Water Service Areas in 2024. Once the Regional Water Service Area is 100% metered a volumetric rate structure can be implemented in this area too. After a few years of experience with a volumetric rate structure, another study is recommended to investigate implementing an inclining block rate structure.

Figure D-1: Residential Single Family Dwelling Average Monthly Bill Comparison

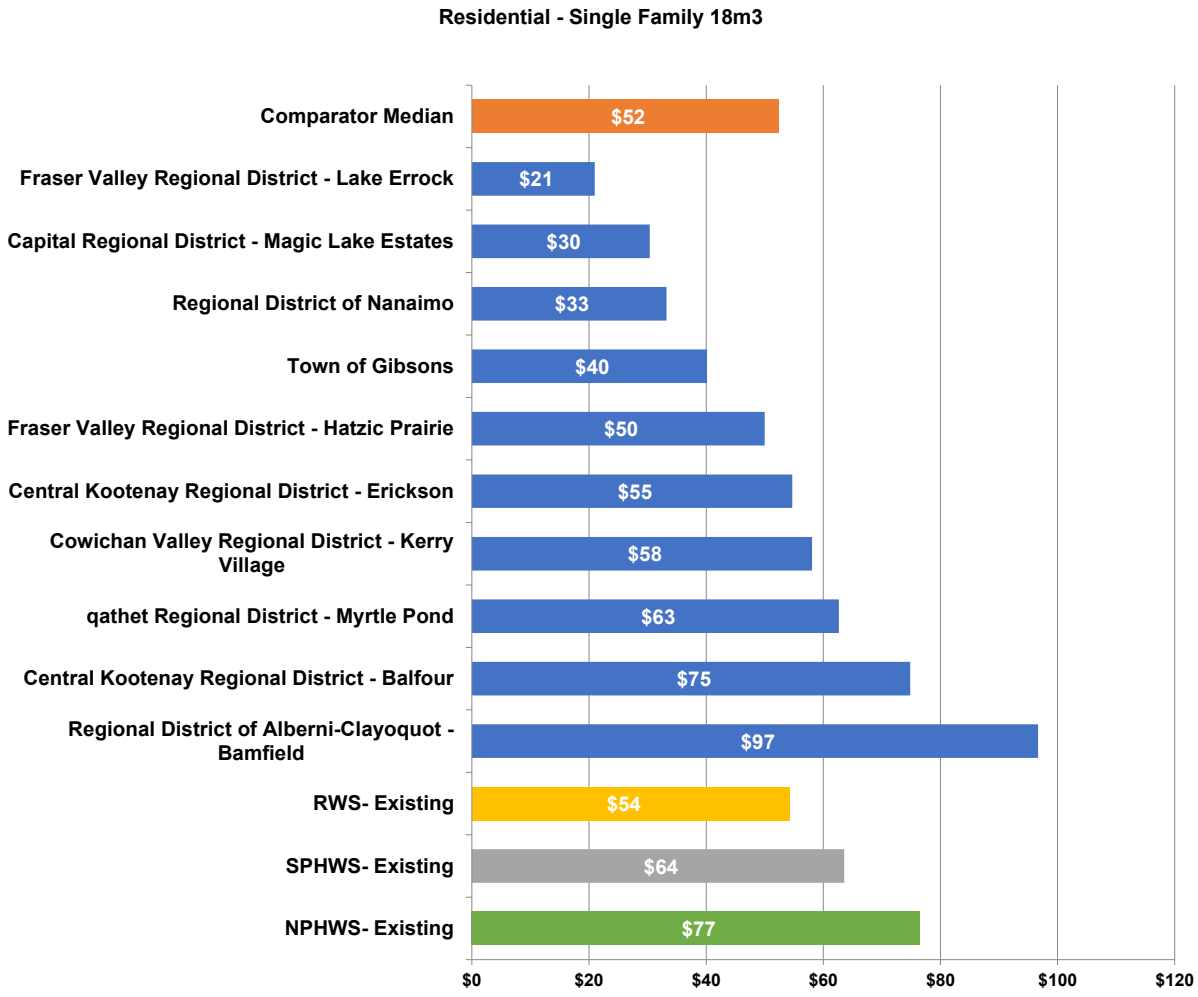


Figure D-2: Residential Multi-Family Dwelling Average Monthly Bill Comparison

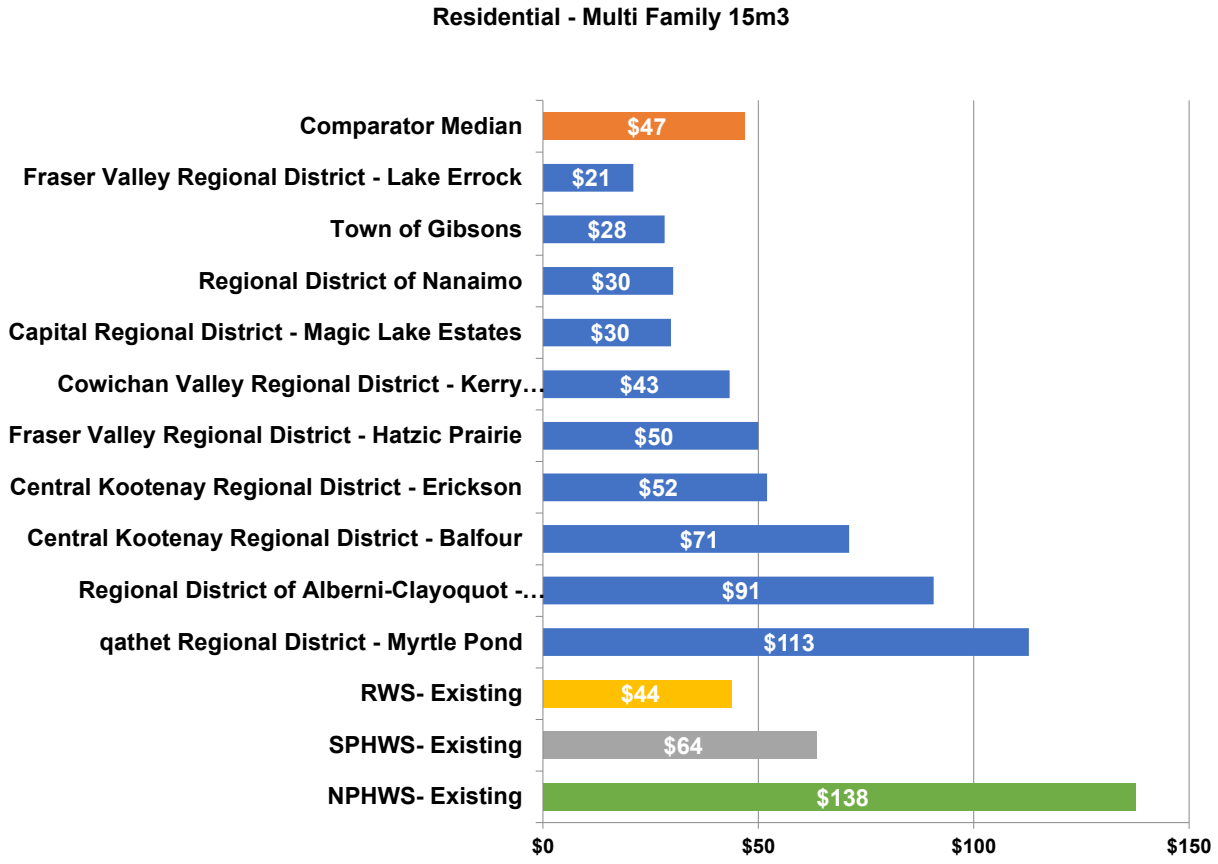


Figure D-3: Commercial Low-Consumption Average Monthly Bill Comparison

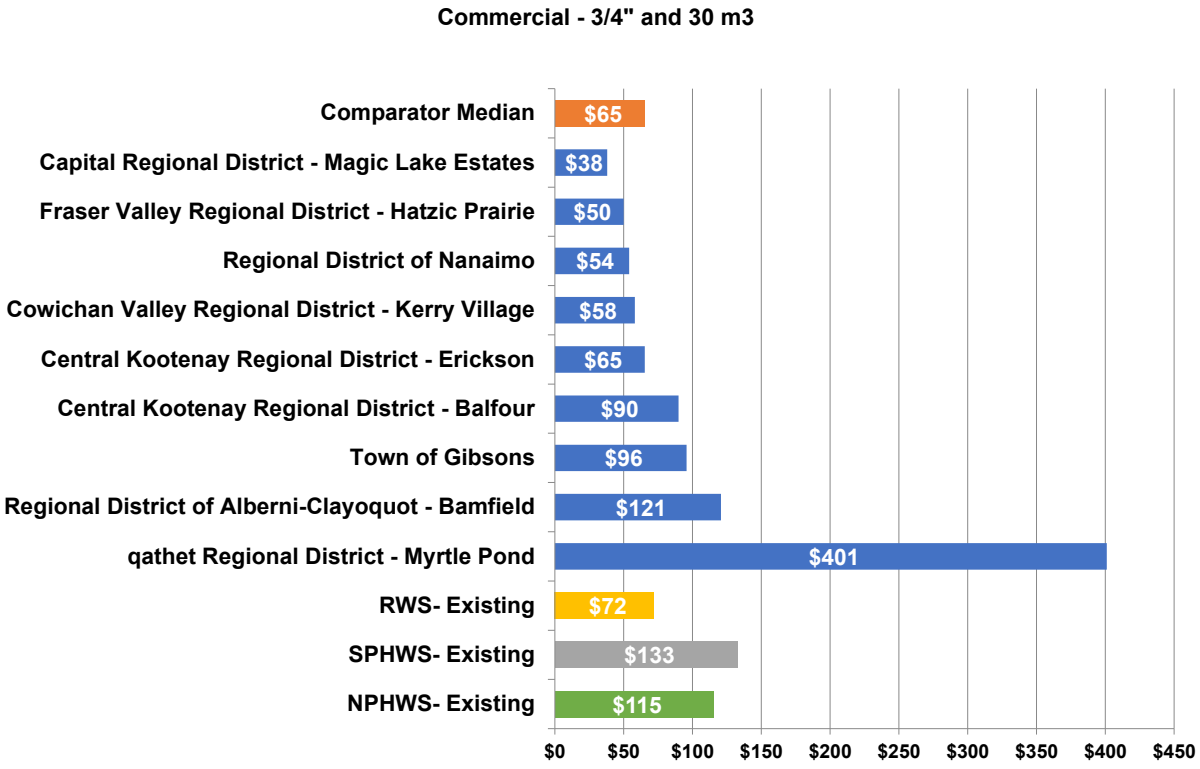


Figure D-4: Commercial High-Consumption Average Monthly Bill Comparison