

AMPC responses to supplementary questions arising from BC Hydro RDA Workshop 12

During the recent workshop, several key issues were identified that AMPC would like to respond to. These issues are covered in the following questions and answers.

Q. What is the appropriate weighting of the Bonbright principles of rate design adopted and described by BC Hydro as “fairness”, “rate stability”, “customer understanding” and “efficiency”?

A. James C Bonbright was clear in his original text on utility rate design that a number of principles need to be balanced to produce a reasonable and acceptable rate design, and that of those principles, matching the rate design to the cost of service outranks all others:

“ No writer whose views on public utility rates can command respect purports to find a single yardstick by sole reference to which rates that are reasonable or socially acceptable can be distinguished from rates that are unreasonable or adverse to the public interest. A complex of tests of acceptability is required. just as would be the case with the test of a good automobile, a good income-tax law, or a good poem. Nevertheless, one standard of reasonable rates can fairly be said to outrank all others in the importance attached to it by experts and by public opinion alike – the standard of cost of service, often qualified by the stipulation that the relevant cost is *necessary* cost or cost reasonably or prudently incurred.”

(Principles of Public Utility Rates, James C Bonbright, Columbia University Press 1961, Part One “Basic Standards of Reasonable Rates”, Chapter IV “Cost of Service as the Basic Standard of Reasonableness” page 67.)

The practice of implementing Bonbright’s advice by adjusting revenue to cost ratios (R/C) of each rate class within target bandwidths to match the fully allocated cost of service study is universally viewed as meeting rate design principle of “fairness” as defined by BC Hydro.

Contrary to generally accepted rate design practice, BC Hydro has for many years placed an excessive weighting on the single principle of “efficiency”, neglecting other rate design principles in pursuit of what BC Hydro describes as “conservation rates”.

“Rebalancing” revenue to cost ratios has also been avoided for many years and BC Hydro has interpreted rate design “efficiency” narrowly, matching second tier (variable) energy rates to the unit energy costs used by planners. This only provides a simplified ranking of the cost of various marginal sources of supply. This partial rate design approach ignores both the fact that marginal supply costs are

more fixed than variable, and that efficient utilization of existing infrastructure could be improved through increasing demand charges rather than energy charges.

In order to begin to redress the rate design imbalance of previous years, and to return to the well accepted and balanced approach of Bonbright, it is important that BC Hydro's narrow interpretation of efficiency be replaced by a broader understanding of efficiency, and that the rate design principles of fairness, rate stability, and customer understanding be given significantly more weight than previously.

Fairness, as measured by revenue to cost ratios, should generally be given the most weight as intended by Bonbright, and recognized in virtually all utility rate design proceedings through regular studies of fully allocated cost and appropriate rate design reference to targeted R/C ratios.

After fairness, the weighting of the various Bonbright principles depends on the circumstances of each rate class. Given the competitive nature of commodity markets facing most industrial customers, the energy intensity of resource extraction, and the unique imposition of PST on industrial customers in BC, the principle of rate stability and maintenance of a R/C ratio of no more than 100% is very important. On the other hand, the extraordinary complexity of the current SGS/MGS/LGS rate design suggests a higher weighting of "customer understanding" to simplify matters.

Q. Given the recent OIC prohibiting rate changes for the purpose of altering R/C ratios is it still important to proceed with the Fully Allocated Cost of Service Study (FACOSS) and what process is recommended?

A. Notwithstanding the disappointing OIC instructing the BCUC to refrain from adjusting rates to alter R/C ratios, it is imperative that BC Hydro and the BCUC conducts an open, comprehensive review of the FACOSS for a number of reasons:

1. As described above, the FACOSS is the basic yardstick of the most basic rate design principle of fairness. No rate design application could be considered complete without this measurement. Even if the R/C ratios cannot be adjusted in the near future, it is important to know the level of imbalance or cross-subsidy and the amount by which future rates must be corrected. This is particularly important to any customer with a planning horizon of more than three years.
2. Reviewing the allocation of major cost items (from generation to metering facilities) makes transparent an important and direct connection between the cost of planning alternatives and rate class impacts that provides a vital check and balance on utility expenditure decisions.

3. Beyond R/C ratios, the FACOSS also provides essential information on the appropriate determination and definition of rate classes, appropriate rate structures for those classes, and the appropriate levels of rate design elements such as demand, energy and customer charges.

As there are few definitive or objectively “correct” answers to determine the common cost allocators used in a FACOSS, and a wide range of approaches (with corresponding R/C outcomes) that could be considered reasonable, a FACOSS forming part of a RDA is rarely resolved without a hearing.

As with any BCUC application, AMPC is prepared to consider a negotiated settlement to determine the F2016 FACOSS, but considers that this would require at least one round of IRs and the filing of both utility and potentially intervenor evidence.

Q. Does AMPC support the idea of Fortis and the City of New Westminster (New West) being served on a newly created Wholesale Rate Class?

A. Yes. This is entirely reasonable, and long overdue as:

1. The definition of rate class is a set of customers that has similar (homogenous) electrical characteristics. Fortis and New West are currently considered to be part of the industrial (TSR) class, yet share little with them in terms of electrical characteristics. Like most municipalities or aggregations of smaller customers, Fortis and New West have a lower load factor and higher coincidence factor than typical Industrial customers, and higher costs to serve as a class.
2. BC Hydro is unusual in not having a wholesale rate class to serve large municipalities outside of its own direct service area. The introduction of a wholesale class allows the design of rates better suited to the customer’s characteristics. This need has already been recognized by exempting Fortis and New West from the tiered energy rates and baselines that apply to the industrial TSR class in which they are such an awkward fit.
3. The creation of a new class need not result in any rate increase to those placed in it, especially as the OIC forbids any immediate adjustment to R/C ratios.

Q. Should Freshet Rate customers be allowed to shift load to take advantage of the surplus of energy during the freshet period?

A. Yes. AMPC has already addressed this question in earlier feedback forms.

Q. Should the demand charge for the LGS rate be set to recover 65% of the demand charges allocated to that class in the FACOSS?

A. Yes. This better matches the cost structure of the rate class, and would provide a better incentive to improve utilization of existing assets (both utility and customer owned). AMPC has already provided separate detailed comments on this issue.

August 14, 2015

VIA EMAIL: bhydroregulatorygroup@bhydro.com

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Reply to: Sarah Khan
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Our file:7570

Dear Mr. Doyle,

Re: BCOAPO *et al.* comments on BC Hydro 2015 Rate Design Workshop 12

On behalf of BCOAPO *et al.*, we write to provide comments on BC Hydro's 2015 Rate Design Workshop #12, which was held on July 30, 2015. Our comments are organized below by the Workshop presentation table of contents headings. As we have already provided detailed feedback with respect to most topics referenced in the workshop, our comments below are brief.

Introduction

BC Hydro's proposed breakdown of the RDA topics to be addressed in Modules 1 and 2 makes sense. The proposed initial regulatory timetable also makes sense.

Rate Class Segmentation

We anticipate asking for more details once the RDA is filed regarding COPE 378's request for modeling based on segmentation by heating type. It would be useful to know whether there are any North American jurisdictions that offer differential residential low income rates based on primary heating type. We understand, for example, that City Water, Light & Power in Springfield, Illinois has Income Qualified Senior Citizen rates for Regular Residential and Income Qualified Senior Citizen rates for Electric Heat Residential.

At this time, we are not taking a position on BC Hydro's proposal to create separate rate class(es) for the City of New Westminster and FortisBC. Once we have reviewed comments from other stakeholders, we will be in a better position to provide feedback about the proposal, and whether it's more appropriate to wait for the F2019 COS filing.

Residential Rate Design

BCOAPO supports maintaining a RIB rate structure, and will be proposing as part of the RDA that BC Hydro implement some low income residential rate relief, including emergency bill assistance, as well as a surcharge for high consumption. We do not support a flat rate structure for residential rates at this time, even if such a structure was to include bill assistance for low income ratepayers.

Terms and Conditions

We will be providing BC Hydro with more detailed comments next week about the standard charges and low income terms and conditions.

We may support an increase to security deposits if actual consumption is significantly greater than the initial assessment, so long as low income ratepayers will be adequately shielded from this.

We are still formulating our views on the late payment charge, and expect to provide you with more details shortly. While we had initially stated that we would like a reduction or elimination of the late payment charge for all residential ratepayers, we may modify that position following a more detailed review of the issue.

We appreciate the efforts that BC Hydro is taking to try to improve the credit actions for customers receiving direct social assistance from the Ministry of Social Development and Social Innovation, and look forward to learning more about the pilot project

Thank you for seeking our comments. Should you have any questions, do not hesitate to contact us.

BC Public Interest Advocacy Centre

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August 13, 2015

BC Hydro Regulatory Group

By email: bhydroregulatorygroup@bchydro.com

Dear RDA Team,

Re: Rate Design Application (RDA) Consultation, Comments arising from Workshop 12

I am writing to provide the comments of BC Sustainable Energy Association and Sierra Club BC on the topics identified in Workshop 12, July 30, 2015.

1. BC Hydro's prioritization of customer understanding and acceptance, rate stability and fairness (Bonbright criteria)

BCSEA-SCBC believe that 'efficiency' (price signals that support economically rational energy conservation and efficiency) should remain an important Bonbright criterion in BC Hydro's RDA. Nevertheless, as BCSEA-SCBC have said in earlier comments, it is evident that the complex general service rate structure (status quo) is not achieving the energy savings results that were predicted and desired; and BCSEA-SCBC support moving to a much simplified GS rate structure. This would greatly improve customers' understanding of the rate and would, BCSEA-SCBC believe, contribute to natural conservation and efficiency.

2. BC Hydro's proposal for a COS to be filed sometime in F2019

At the workshop, BC Hydro said it will continue to submit Fully Allocated Cost of Service results with the Commission every year pursuant to 2007 RDA Direction 2. Also, the F2016 COS will be addressed as part of Chapter 3 of the 2015 RDA. BC Hydro proposes to review COS methodologies again in F2019 and file a study for BCUC review to inform F2020 and beyond.¹

BCSEA-SCBC agree with what they understand to be BC Hydro's suggestion that COS methodology issues (separate from COS results) that can be dealt with without extensive controversy be addressed in the 2015 RDA Module One, and that any contentious COS methodology issues be deferred for consideration prior to F2020 when the special direction preventing any rate rebalancing expires. As a result, any COS methodology changes approved in the 2015 RDA would be implemented in the F2017 and subsequent COS studies, with the advantage being that the results would be more comparable when and if rate rebalancing comes back 'on the table.' BCSEA-SCBC are of the view that it would be a waste of time to delve into contentious COS methodology issues during the 2015 RDA, given the current freeze on rate rebalancing.

3. Potential segmentation of FortisBC and New West from the remainder of the Transmission service rate class

¹ 2015 RDA Workshop 12, Slides, 30 July 2015, p.10

It is understood² that the purpose of this action would be to put BC Hydro and the two customers in a position so that when rate rebalancing is ‘unfrozen’ there would be a structural basis for considering the possibility (depending on COS and revenue/cost ratio results) of rate rebalancing the rates for the two customers independently of any rate rebalancing for the transmission service class. BCSEA-SCBC do not have a firm view on the merits and implications of moving toward segmenting these two customers, either immediately (in the 2015 RDA) or in the F2020 timeframe when rate rebalancing may be legally feasible. From BCSEA-SCBC’s perspective, BC Hydro should (of course) explain the rationale for this concept if it decides to pursue it in the 205 RDA.

4. LGS demand cost recovery at 65% of fixed costs

BCSEA-SCBC support the concept of raising the LGS demand cost recovery ratio from 53% up to 65%. It is understood that this change would blunt the bill impacts of flattening the LGS energy charge.

BC Hydro asked for input regarding whether there should be a transition period associated with the LGS energy charge change (to a flat rate) and demand charge change (to recovery of 65% of fixed costs) given³ that the bill impacts in this scenario are modest (less than 7%). Subject to confirmation of the size of the bill impacts estimates, BCSEA-SCBC’s view is that a transition period would not be necessary. It would be desirable to avoid a transition period if possible, because a transition period would defer the customer-understanding benefit of the new flat energy rate design and prolong the confusion associated with the current complex rate design.

5. Other topics

(a) Standard charges, separate process

BCSEA-SCBC support an accelerated process for reviewing reductions in several of the standard charges. Implementing these changes sooner rather than later would benefit low income customers.

(b) E-Plus, Residential and Commercial

BC Hydro proposes to address the residential E-Plus rate in Module 1 of the 2015 RDA, to be filed in September 2015. BC Hydro says the main alternative to the *status quo* (which is also an open option) that it is developing for consideration is one in which the terms and conditions under which BC Hydro is allowed to interrupt E-Plus service⁴ to residential E-Plus customers at BC Hydro’s discretion, as distinct from the *status quo* conditions that are worded in a way that BC Hydro says means that interruption would never be a practical possibility. BCSEA-SCBC question whether this would actually improve the situation. However, BC Hydro says it will respond to BCSEA-SCBC’s May 5, 2015 written questions about E-Plus in a ‘consideration memo’ to be provided in the week of August 3. BCSEA-SCBC look forward to BC Hydro’s responses.

BC Hydro proposes addressing commercial E-Plus rate in Module 2 (to be filed after a decision by the Commission regarding Module 1). An important distinction between the commercial and

² BC Hydro’s email of August 7, 2015 provided additional information about the FBC and City of New Westminster separate rate class topic.

³ 2015 Rate Design Application Workshop 12, 30 July 2015, slide 50.

⁴ To be clear, it is understood that E-Plus customers have a ‘regular’ account in addition to their E-Plus account.

residential E-Plus situations is that while both rates are closed and not generally transferable⁵ many (how many?) of the commercial E-Plus customers are corporate entities (i.e., not individuals) that are legally capable of continuing to exist indefinitely. In contrast, the residential E-Plus customers are understood to be mostly (all?) individuals. Therefore, in the *status quo* scenario the commercial E-Plus rate could continue to have customers indefinitely, whereas the residential E-Plus rate would eventually have no customers (due to natural attrition). In BCSEA-SCBC's view it would have been preferable to have both the residential and commercial E-Plus rates considered at that same. However, they acknowledge that the commercial E-Plus component may not be ready for filing in Module 1.

BCSEA-SCBC appreciate this opportunity for input.

Yours truly,



William J. Andrews
Barrister & Solicitor

⁵ There are some exceptions, such as for spouses of deceased E-Plus account holders.

2015 Rate Design Application
Workshop 12 – Application Structure and Issues
Commission Staff feedback

Topic	Staff Comments
<p>BC Hydro’s prioritization of customer understanding and acceptance, rate stability and fairness (Bonbright Criteria).</p>	<p>Should BC Hydro have different prioritization for the different rate groups? For example, if the demand response to changes in energy prices is very low (particularly for GS customers), does that imply that LRMC pricing should be given a lower priority and DSM should be expanded since the response to DSM projects seem to be more effective?</p> <p>With the economic efficiency criterion being only measured as amount of conservation/DSM achieved, BC Hydro should consider whether there is a need to look at giving higher priority to some Bonbright criteria relative to others that may be rate group specific.</p>
<p>BC Hydro’s proposal for a COS to be filed sometime in F2019.</p>	<p>F2019 could be a reasonable target for filing an updated COSS.</p>
<p>Potential segmentation of FortisBC and New West from the remainder of the Transmission service rate class.</p>	<p>FortisBC and New West are already effectively segmented from the rest of the Transmission service class by being on RS 1827, the inability to move New West to the default rate by Government Direction No. 7, and because of their different characteristics.</p> <p>It would be helpful for BC Hydro to discuss the benefits of this potential segmentation. For example, will this allow BCH to better track costs? If so, what would the information be used for?</p>
<p>LGS demand cost recovery at 65% of fixed costs</p>	<p>In workshop 11B, slide 8, BC Hydro proposes to maintain the LGS current demand cost recovery at about 50%. At this time, it would seem that the support for moving the LGS demand to 65% cost recovery is premature until the cost recovery for MGS is also considered.</p> <p>A higher demand recovery for LGS will reduce the energy charge further to below LRMC in the flat energy charge LGS options. Furthermore, the appropriate demand cost recovery is influenced by the flat energy option as well as whether the demand charge would also be flat or whether there is a two-step charge.</p> <p>Staff believe that the option should be reviewed further in the filing and not be rejected at this time.</p>

Further, as noted in BC Hydro's slide number 40, the R/C ratios shown do not account for DSM. The impact of increased BC Hydro costs attributed to paid incentives and reduced energy purchase revenues may well have reduced individual customers R/C ratios below that which is shown in the table.

Rate design methodology focuses on grouping utility costs by electric system service for assignment to groups of customers or for sharing across all services or all customers. Next, the group costs are classified by their associated cost driver. For example, utility demand costs are directly related to meeting system peak requirements. Next, the grouped and classified costs are allocated to the customer classes. Transmission voltage customers share the same group of utility costs. The ease of determining revenue to cost ratios is not a valid basis for multiple transmission rate classes. It is evident from BC Hydro's table and chart that cost effective and readily available analysis can provide the R/C ratios of customers or groups of customers within a rate class.

While segmentation of sales and revenues within each rate class is fundamental to analyze the ability of the current rate schedule to match the utilities' costs to collect revenue, it is by no means the criteria by which to determine rate design.

To conclude, NW Hydro sees no value in creating a separate rate class at this time but recognizes that this will be the topic of review in the F2019 Cost of Service filing and submits that that is the most fair and appropriate time for this issue to be dealt with.

Rod Carle, General Manager, Electric Utility Commission
City of New Westminster

British Columbia Hydro and Power Authority
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Attention: BC Hydro Regulatory Group – 2015 RDA Workshops

Dear Sirs/Mesdames:

**RE: 2015 Rate Design Application (RDA)
Application Structure and Issues Session (July 30, 2015)
COPE 378 Feedback**

Please be advised that we submit the following comments and feedback relating to the above-noted RDA wrap up session on behalf of our client, COPE 378.

Residential Service

During this process, COPE 378 repeatedly expressed its view that the current Residential Inclining Block Rate (RIB) is inequitable: there remains a large sector of the Utility's ratepayers (30%) who do not see Tier 2's conservation signal at all because of their dwelling type (apartments). The Union remains of the opinion that, in its current form, this rate structure discriminates by dwelling type and it also fails to protect low income ratepayers as well as those experiencing energy poverty – a sector of the population that cannot help but to grow in size given the general rate increases BC Hydro must begin implementing once the government's artificially low statutorily imposed rates expire.

Initially, the Union's preference was to do away with the inequities inherent to the RIB and to move back to a flat rate provided there was a mechanism in place to offset the financial impacts to low income ratepayers (a lifeline or LICO rate). Now, however, COPE sees some limited value in the short term to maintaining the RIB rate if:

1. The general rate increases are applied to Tier 1 with Tier 2's price being held steady. This assumes that Tier 2 price will remain within the BC Hydro's calculated LRMC band and that an adjustment would be made should it stray from that band. This should be continued until the prices for the two tiers merge, mitigating the financial impact of moving to a flat rate in one fell

- swoop while increasing the rate structure's fairness because then all residential ratepayers would be exposed to the increasing cost of energy.
2. COPE urges BC Hydro to consider instituting a gluttonous usage surcharge on very high use accounts to fund a lifeline rate and, if possible, additional DSM to offset any the possible temporary adverse effects to conservation brought about by the flattening of the RIB's two rates.

BC Hydro's IT Issues and Limitations

BC Hydro has demurred to intervener suggestions such as a credit system or pay as you go rate, citing IT limitations with an expected resolution window of five to ten years. COPE is concerned that BC Hydro's current ability to make use of expensive infrastructure like smart meters is overly limited, negatively impacting the Utility's ability to consider options that are in the public interest or to utilize those assets in a manner that justifies their cost. COPE will be seeking information to better understand BC Hydro's timelines and the steps needed today in order to be able to realize opportunities in the not-too-distant future such as smart energy management services, enhanced communication with customers, and the introduction of new rate or payment options.

Industrial Service

In this process, BC Hydro has not yet, the Union feels, adequately addressed the concerns of interveners of the effect on the system and on ratepayers of the addition of major new loads. COPE intends to pursue issues relating to Tariff Supplement No. 6, the terms and conditions under which BC Hydro supplies new accounts. The Union sees the RDA as an appropriate venue to delve into this issue to ensure that that these new loads pay the true incremental costs of the facilities and services they require to avoid a situation where ratepayers from other classes are forced to shoulder costs and cost risks to subsidize these private interests.

The Freshet Rate

The Union recognizes that this is a pilot project but will pursue issues in this process designed to ensure that this does not create a rate ripe to be gamed by participants or to have it incent seasonal layoffs. The Union will be seeking input from BC Hydro regarding what the terms upon which the pilot will be evaluated, how the movement of players will be tracked, how it will define success, how it proposes to track impacts (both positive and negative) on the industrial rate class as well as the other rate classes,

what the scale of this pilot will be, what (if any) controls such as entry and/or exit fees BC Hydro proposes to use to ensure it is not economic to game the program, and what results would be required for BC Hydro to pursue this as a permanent rate class in future.

The Marginal Versus the Embedded Cost of Service

Given the recent rate rebalancing amendments to Direction 7, COPE no longer plans to litigate the marginal COS versus the embedded as part of Module 1 in this application. However, the Union sees this as an issue that must be addressed in the next Cost of Service process.

Please do not hesitate to contact the undersigned if you have any questions regarding this input.

Yours truly,

Original on File Signed by:

Leigha L. Worth
Barrister & Solicitor



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September 14, 2015

Via Email

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Mr. Doyle:

Re: British Columbia Hydro and Power Authority (BC Hydro) 2015 Rate Design Application (RDA) Structure and Issues - Workshop No. 12
FortisBC Inc. (FBC) Comment Regarding Separate Rate Class(es) for the City of New Westminster and FBC

By this letter, FBC wishes to provide comment specifically on the issue of whether or not BC Hydro in its 2015 RDA should create separate rate class(es) for the City of New Westminster and FBC.

In this regard, BC Hydro made the following request via e-mail dated August 7, 2015, of all workshop participants:

BC Hydro also seeks feedback on whether it's more appropriate to wait for the F2019 COS filing, which BC Hydro proposed at Workshop 12, as the potential impacts of creating separate rate class(es) for FortisBC and New West (such as possible rate rebalancing from F2020 onward if appropriate) may be better understood.

In FBC's view, the approach suggested by the quote above is appropriate. Any consideration of such a change should be deferred until 2019 when it can be fully examined and the potential impacts better understood.

FEI further agrees with the submission of the City of New Westminster that given the governments direction that BC Hydro undertake no rate rebalancing until at least fiscal 2020, expending resources on this matter at this time is of little value.

Any questions on this matter should be directed to Corey Sinclair, FBC Manager of Regulatory Affairs at (250)469-8038.

Sincerely,

FORTISBC INC.

Original signed by: Corey Sinclair

For: Diane Roy