

18 August 2020

VIA E-FILING

Marija Tresoglavic
Acting Commission Secretary
BC Utilities Commission
6th Floor 900 Howe Street
Vancouver, BC V6Z 2N3



Reply to: Leigha Worth
ED@bcpiac.org
Ph: 604-687-3034
Our File: 7400.210

Dear Ms. Tresoglavic,

**Re: Pacific Northern Gas (N.E.) Ltd. ~ Application for a Certificate of Public Convenience and Necessity to Implement Automated Meter Reading (AMR) Infrastructure
BCOAPO Final Argument**

We represent the BC Old Age Pensioners' Organization, Active Support Against Poverty, Council of Senior Citizens' Organizations of BC, Disability Alliance BC, and the Tenant Resource and Advisory Centre, known collectively in PNG regulatory processes as "BCOAPO et al." ("BCOAPO").

Enclosed please find the BCOAPO's Final Argument with respect to the above-noted matter.

If you have any questions, please do not hesitate to contact the undersigned.

Sincerely,

BC PUBLIC INTEREST ADVOCACY CENTRE

Original on file signed by:

Leigha Worth
Executive Director | General Counsel

Encl.

**BC OLD AGE PENSIONERS' ORGANIZATION, ACTIVE SUPPORT AGAINST
POVERTY, COUNCIL OF SENIOR CITIZENS' ORGANIZATIONS OF BC,
DISABILITY ALLIANCE BC, AND TENANT RESOURCE AND ADVISORY CENTRE
("BCOAPO")**

**Pacific Northern Gas (N.E.) Ltd. ~ Application for a Certificate of Public
Convenience and Necessity to Implement Automated Meter Reading (AMR)
Infrastructure**

BCOAPO Final Argument

August 18, 2020

TABLE OF CONTENTS

PACIFIC NORTHERN GAS (N.E.) Ltd's APPLICATION.....	2
INTRODUCTION.....	2
APPROVALS SOUGHT	3
PROJECT COST	3
THIS PROJECT VERSUS PROJECT ALTERNATIVES	4
RATIONALE FOR THE APPLICATION	4
ALTERNATIVES OFFERED TO PERSONS WITH AMR-RELATED CONCERNS.....	6
CONCLUSION.....	6

Please be advised that we provide the following final argument regarding the above noted application on behalf of our client groups known in this and other regulatory processes as BCOAPO or BCOAPO et al. The constituent groups of BCOAPO et al. represent the interests of residential energy consumers in British Columbia generally but in this process, the interests of PNG(NE)'s residential ratepayers.

PACIFIC NORTHERN GAS (N.E.) Ltd.'s APPLICATION

INTRODUCTION

In October of 2019, PNG(NE) filed an application seeking Commission approval of a Certificate of Public Convenience and Necessity (CPCN) for its Automated Meter Reading (AMR) project. However, the next month the utility withdrew that application, stating its intention to refile with additional materials included as evidence to support its case. On March 25, 2020, the utility submitted the revised application which has been the subject of this regulatory process.

In this application, PNG(NE) is seeking Commission approval, pursuant to the CPCN-related sections of the *UCA* (sections 45 and 46), of a CPCN to replace its current residential and commercial metering systems with a new AMR one: a project PNG submits will cost approximately \$4.2M.

There is a significant different between the format PNG is proposing and the AMI one used by other utilities – BC Hydro, for example. An Advanced Metering Infrastructure (AMI) is a system that allows two-way, real time “conversation” between ratepayers’ meters and the utility’s system, intended to increase utility efficiencies and service. Automated Meter Reading (AMR) is a system that allows a utility to ping their meters from nearby, triggering the one way communication between those meters and an endpoint that can be a walk-by or drive by collector or a fixed network endpoint. AMR is not equipped to provide the system benefits so often cited by AMI-proponents, but PNG’s position is that AMR is the most cost-effective solution available to achieve its efficiency goals.

THE REGULATORY PROCESS

On April 9, 2020, the BCUC issued Order G-86-20, setting a preliminary regulatory timetable allowing for one round of IR’s followed by submissions on further process. Then, on June 24, 2020, the BCUC issued Order G-126-20, adding further discovery and setting the schedule for final submissions and it is in accordance with the provisions of that Order that BCOAPO makes the following final submissions.

APPROVALS SOUGHT

In this Application, PNG(NE) is seeking BCUC approval of its application for a CPCN pursuant to sections 45 and 46 of the *UCA* for expenditures of approximately \$4.2M to purchase and implement the hardware, software and systems necessary to use Itron AMR technology. PNG's chosen vendor is named Vendor A on the record and the applied-for figure includes the \$3.1M in Vendor A's quote plus provincial taxes, PNG(NE)'s 10% overhead, and a contingency fund of 15%.

SUBMISSIONS

PROJECT COST

The capital cost for the Project is an estimated \$4.2M.¹ This figure includes the amount quoted by Vendor A (\$3.1M) plus PST (7%), an overhead cost estimate (+10%), and contingency fund (15%). We, like the BCUC, were curious as to why PNG chose to add a 10% overhead and 15% contingency on an estimate it characterized as definitive, with a Class 1 to Class 2 level of accuracy and we read PNG's responses to BCUC IR's 16.1 and 16.2 hoping for further clarity on that issue. While PNG did respond to those IR's, we did not find those responses particularly illuminating except as indication that the utility was attempting to present a conservative case "so as not to overstate the net benefit to customers."²

While we appreciate that mindset and our clients would not like to see PNG understating its costs risks, these conservative figures are not particularly comfortable without further evidentiary support. However, based on the information we do have on the record and the fact that the Commission received confidential information on this point, BCOAPO is content to register those general concerns and then leave it to the Commission's expertise and discretion to determine whether PNG has struck the appropriate balance between costs and risk.

Another factor that is relevant to a consideration of cost is that, once Itron announced it was discontinuing its 100G ERT, Vendor A has agreed to provide the Itron 500G ERT for the same price. While this free upgrade should not overrule an evaluation of cost-related considerations discussed above, the fact is that it could more easily facilitate a move to using more of AMR's potential functionality in the future should PNG determine it appropriate.

¹ PNG(NE) Final Submission, page 5

² PNG(NE) Final Submission, page 6

THIS PROJECT VERSUS PROJECT ALTERNATIVES

It is important to our clients in cases like these to be able to contrast a utility's chosen project with alternatives: one configuration versus another and sometimes one vendor versus another. In this case, PNG's position is that AMR is the clear winner in any evaluation of project alternatives.

The Utility's evidence is that, based on quotes received from prospective vendors, there is an AMR-caused net customer *benefit* over status quo operations of approximately \$2.178M³ over the notional 20 year lifespan of its proposed meters while the NPV of AMI would result in net customer *costs* over that same time period of \$32.656M.⁴ PNG(NE)'s residential ratepayers have no desire to add unnecessarily to their energy costs absent clear and compelling evidence of either necessity or net benefit to them and the utility and there is no evidence on the record that would persuade our clients that AMI is the better option.

PNG sought two proposals for its AMR project: referred to in the Application as Vendor A and Vendor B. Vendor A's proposal used Itron technology and Vendor B's proposal used the Sensus Flexnet technology. In its evaluation, PNG factored in capital and operating costs to generate an NPV for each proposal and the utility's evidence was that this bare calculation rendered a result indicating Vendor A had presented the most favourable option⁵. However, in addition to that, PNG(NE) noted in its application that Vendor A's use of Itron technology made it an even more attractive option because that is the technology PNG already uses, meaning they could avoid the additional cost of switching to another system to accommodate a novel technology.⁶

As such, BCOAPO's position is that PNG has provided adequate evidence of its inquiries into project alternatives to satisfy residential ratepayers that we have sufficient information upon which to contrast their application with "the roads not taken".

RATIONALE FOR THE APPLICATION

PNG(NE) is clearly following the industry's technological trend and seeking to join the growing number of utilities using automated meters to "improve the efficiency and accuracy of the meter reading process."⁷ While the utility's application does not allege that its current manual reading system was subject to any major service or quality issues, our clients accept that the absence of evidence of a systemic issue does not necessarily preclude PNG from successfully justifying its

³ Exhibit B-8, BCOAPO IR 1.2

⁴ Exhibit B-3, BCUC IR 4.1 and Exhibit B-8, BCOAPO IR 1.1

⁵ Application and Exhibit B-7, BCUC IR 23.4

⁶ Exhibit B-1, page 4

⁷ Exhibit B-1, page 2 of 3

proposed AMR project and related expenses. Instead, the specific goals for this CPCN as cited by the utility in its application were: achieving operational efficiencies, improving employee safety, and improving customer satisfaction⁸.

Timely and Accurate Meter Readings

At present, the majority of PNG’s residential customers have their meters manually read: according to the utility that means 18,514 separate residential meters being read every two months by a staff of five meter readers.⁹ In addition to those 111,084 separate residential readings per year¹⁰, each of PNG’s 2,792 commercial meters are read monthly, adding 33,504 additional reads to the yearly total completed by those same five employees. While we do not have or need the assignments for each meter reading employee we have generated a simple table using averaged figures we present as a reasonable estimate of the numbers of meters each of these five readers are responsible for:

Average Meter Reading Responsibility per Employee¹¹

Time Period	Number of Meter Reads/Recordings
Yearly	28,917.6
Monthly	2,409.8 ¹²
Weekly	556.2 ¹³
Daily	114.8 ¹⁴

These estimates show how often PNG’s meter reading employees have to read and then manually enter their meter reading results for each time period. To be clear, BCOAPO’s submissions and position on this point are not informed by a belief that PNG’s meter reading staff

⁸ Exhibit B-1, page 2 of 3

⁹ Exhibit B-1, pp 9-10

¹⁰ 18,514 x 6 meter readings

¹¹ Please note this calculation does not include adjustments for vacation time, sick time, or other variations in peoples’ work schedules aside from public holidays.

¹² 28,917.6 ÷ 12 months

¹³ 28,917.6 ÷ 52 weeks

¹⁴ 28,917.6 ÷ 252 working days per year (based on 2020)

are anything but competent and conscientious. Instead, we are providing these estimates as evidence of the number of opportunities there are for inadvertent human error. It is a fact that a certain amount of human errors are unavoidable and the volume of reads these individuals are required to take in a year increases the odds of those errors occurring.

PNG's evidence on AMR is persuasive on this point: we accept the utility's submission that PNG's plan would increase the accuracy of its meter reads and reduce the need to use utility resources to manually adjust billing or bill based on estimates. In addition, PNG's evidence also presented qualitative benefits of timely meter readings¹⁵: evidence our clients accept and support. While it is not possible to quantify the benefit of more timely and accurate meter reads, we cannot imagine a situation where, absent any other concerns, any reasonable ratepayer would argue against a project that would have such a result. The inability to quantify these benefits does not diminish their importance to our clients though, accuracy and timeliness are especially important factors for residential ratepayers these days as a surprising number of people and families are living close to their economic margins no matter what their incomes are.

ALTERNATIVES OFFERED TO PERSONS WITH AMR-RELATED CONCERNS

As representatives of the residential rate class, we cannot take the position that everyone within PNG(NE)'s service area will agree that the proposed \$30 bimonthly meter reading charge payable by those who wish to opt out of AMR (to instead continue with manual meter reading) is fair or reasonable. However, we do acknowledge that there is sufficient evidence on record the Commission can use to determine the appropriate fee. The same can be said for the one time opt in/opt out fees PNG seeks to implement although in this case we do note there is a significant outlier: in the first scenario outlined in response to BCUC IR 15.1, the proposed fee does represent a significant overpayment.

CONCLUSION

Our client groups have been involved in proceedings where other utilities have sought CPCN's for similar projects and as such, they think it unlikely that Ms. Kira Baines is alone in her concerns regarding the addition of AMR-related radio frequency capability to PNG's meters. However, because this issue is so divisive and the science so contradictory our clients do not take a position on applications of this type either supporting or rejecting a project based on radio frequency-related concerns.

¹⁵ Exhibit B-3, BCUC IR 11.1

We can advise that PNG(NE) has satisfied our clients that the cost risk of this project is low and that its chosen vendor (Vendor A) appears to have provided a solid, well-informed estimate. Our clients also note there is clear evidence that AMR will yield efficiency and accuracy benefits as well as a reasonably likely net consumer benefit of \$2.178M¹⁶ over the course of twenty years.

As such, our clients support PNG(NE)'s application, subject to the comments offered above and any consideration the Commission might make of Ms. Baines' or other individuals' radio frequency concerns.

ALL OF WHICH IS RESPECTFULLY SUBMITTED:

Original on file signed by:

Original on file signed by:

Leigha Worth, Executive Director

Irina Mis, Staff Lawyer

BC Public Interest Advocacy Centre

BC Public Interest Advocacy Centre

¹⁶ Exhibit B-8, BCOAPO IR 1.2