**Natural Resource Gas Limited**
**Responses to Public Interrogatories from Board Staff**

**Issue 1 – Cost Consequences**

**Staff IR-1**
**Topic**: Administrative Costs

**Ref**: Exhibit 3 / Page 19 of 34 – Administrative Costs

**Preamble**:
NRG has indicated that its 2017 administrative costs are $100,000, made up of consulting services ($80,000), legal services ($10,000), auditing services ($5,000) and communications and marketing ($5,000).

**Questions and Responses**:

***a) Please expand on the rationale for engaging Blackstone Energy Services Inc. under a two-year contract at $80,000 per year. What is the scope of the work of Blackstone Energy Services Inc.? For example, are they responsible for advising NRG on its Cap and Trade strategies and developing the Cap and Trade Compliance application?***

NRG is a small company. There are only nine administrative positions within the organization. NRG does not have the existing internal resources to dedicate a full-time equivalent to Cap and Trade-related programs. More importantly, NRG does not have employees with the appropriate training and qualifications to yield effective results.

When considering the salary and benefits associated with an additional employee (with the skills and qualifications to effectively manage the Cap-and-Trade program), NRG believes the cost would be greater than the cost of the annual Blackstone agreement at $75,960 per year.

During the consultation process for the development of the Framework, the General Manager identified two risks that led to seeking a third-party delivery agent: 1) the risks to the utility and its ratepayers associated with the cost of missed opportunities/ineffective purchasing (prudence test) and; 2) the risk of overburdening the utility's already fully-burdened employees. Outsourcing for an initial two-year period seemed to NRG to be prudent because it allowed for: (a) Blackstone to become familiar with the internal workings of the utility; (b) Blackstone and the utility to work together during the initial start-up period for the Cap-and-Trade program; and (c) Ensured that Blackstone could be available and familiar with the utility at a time (potentially two years out) when secondary markets began to mature and greater opportunities could be identified for the benefit of NRG rate-payers.

The table below provides a summary of the services that Blackstone provides under the agreement.

| Advisory Services | Description |
|---|---|
| Market Intelligence | - Weekly market and regulatory updates<br>- Quarterly auction updates<br>- Scheduled subscriber-only presentations and webinars |
| Carbon Expenditure Management | Research compliance options to cap and trade, which would include:<br>- Different sources of carbon credits (primary and secondary markets)<br>- Research potential offset measures<br>- Carbon credit price forecast<br>- Emission reduction measures<br>- Estimate cost and potential size of mitigation |
| **Administrative Services** | **Description** |
| Emissions Reporting | - Data Entry of Annual Emission<br>- Data gathering and processing<br>- Minimize issues at the verification step<br>- Additional data gathering and validation tasks |
| Emissions Report Verification | - Research and vet verifiers based on cost and quality metrics<br>- Coordinate verification and report submission process |
| CITSS Account Management | - Administer credit transfers from/to CITSS accounts<br>- Manage and advise on holding and purchasing limit capacity<br>- Manage credit transfers for secondary market credits<br>- Manage credit transfers for compliance purposes |
| OEB Compliance Plan Development | Create Compliance Plan for OEB, including the following:<br>- Load, emissions, and carbon price forecasting<br>- Compliance Portfolio optimization, including the construction of the Marginal Abatement Cost Curve |
| **Brokerage Services** | **Description** |
| Emissions Allowance Brokerage (priced per engagement) | - Find emissions allowance purchasers and sellers on the secondary market<br>- Facility brokerage deal between counterparties |
| Offset Credit Brokerage (priced per engagement) | - Find offset credit purchasers and sellers on the secondary market<br>- Facility brokerage deal between counterparties |

***b) Please discuss the appropriateness of NRG's overall administrative costs relative to its compliance plan cost, on a percentage basis, as it is significantly greater than that proposed administrative costs of Enbridge and Union.***

Enbridge Gas Distribution has approximately 2 million customers, and Union Gas has approximately 1.4 million customers. NRG has approximately 8600 customers. In terms of customer count, NRG is less than half one percent when compared to Enbridge. Notwithstanding the size difference, the statutory and OEB regulatory requirements are similar for all three utilities:
NRG is required to develop a comprehensive plan, communicate with and educate its customers, procure emission allowances in a prudent fashion, audit the processes and performance of its plan, seek legal advice as well as invest in custom reports for measurement and billing. To return to the comparison with Enbridge, NRG's administrative obligations under the Cap-and-Trade program are not less than half of one percent of Enbridge's obligations. The basic costs to deliver the program are not diluted the same way for NRG when comparing on a per customer or percentage basis.

***c) Please discuss if NRG considered the need and appropriateness of increasing its bad debt amount in relation to the impact of the Cap and Trade program.***

Yes, NRG has considered this. NRG expects that debt levels will increase in the same manner that has been observed during unseasonably cold winters. However, NRG manages its bad debt levels very effectively – below the OEB's threshold level. As a result, NRG feels that the impact of Cap and Trade related debt will remain manageable.

**Issue 1.1 - Are the volume forecasts used reasonable and appropriate?**

**Staff IR-2**

**Topic**: Forecasting Period
**Ref**: Exhibit 2 / p. 7

**Preamble**:
NRG indicates that it will opt to generate one-year forecasts of volume, GHG emissions and carbon prices for the year 2017.

Also, NRG states it will provide annual forecasts of the remaining three years of the compliance period to be submitted by August 1 of the filing year.

**Questions and Responses**:

***a) Is NRG choosing Option 1 or Option 2 as per the filing guidelines (Exhibit 2, 1, i)? Please explain.***

NRG is choosing Option 2 as per the Filing Guidelines. This option was chosen because there is a lack of reliable data upon which to base long-term forecasts.

**Staff IR-3**

**Topic**: Volume Forecasts
**Ref**: Exhibit 2 / p. 7

**Preamble**:
NRG states that its facility-related consumption will include only natural gas loss during distribution. Distribution loss is calculated by dividing the volume of gas delivered by the volume of gas purchased.

**Questions and Responses**:

***a) Does NRG own or operate a fleet of vehicles that are used in its service territory? Please explain. I.e. If yes, please update NRG's 2017 volume forecast to include the natural gas consumption from this facility. 1. Please update the relevant evidence.***

Please see Schedule 1, attached, for NRG's updated Rates Table.

NRG operates a fleet of vehicles that are used in its service territory. Fleet emission for the calendar year 2016 was 48.16t CO2e, from a fleet consumption of 888.6 Mcf.

NRG used the NEB conversion standard of 0.0283 to convert the usage from cubic feet, then follow the emission reporting guideline for Stationary General Combustion (ON.20) to convert the natural gas usage in m3 (25,147.38 m3) to calculate an emission of 48.16 t CO2e. An emission value of 0.001915 t CO2e per m3 was used.

This emission was previously reported in the customer-related emission and will be shifted to facility-related emission. NRG expects volume of gas from fleet usage to remain the same for the year 2017.

| | Fleet MCf | mcf to cf | cf to m3 | Total Fleet m3 |
|---|---|---|---|---|
| | A | B | C | D = A x B x C |
| 1-Jan-16 | 66.6 | 1000 | 0.0283 | 1884.78 |
| 1-Feb-16 | 56.4 | 1000 | 0.0283 | 1596.12 |
| 1-Mar-16 | 25.8 | 1000 | 0.0283 | 730.14 |
| 1-Apr-16 | 33 | 1000 | 0.0283 | 933.9 |
| 1-May-16 | 54.6 | 1000 | 0.0283 | 1545.18 |
| 1-Jun-16 | 66 | 1000 | 0.0283 | 1867.8 |
| 1-Jul-16 | 94.8 | 1000 | 0.0283 | 2682.84 |
| 1-Aug-16 | 108 | 1000 | 0.0283 | 3056.4 |
| 1-Sep-16 | 102 | 1000 | 0.0283 | 2886.6 |
| 1-Oct-16 | 99 | 1000 | 0.0283 | 2801.7 |
| 1-Nov-16 | 94.2 | 1000 | 0.0283 | 2665.86 |
| 1-Dec-16 | 88.2 | 1000 | 0.0283 | 2496.06 |
| **Fleet m3 (2016 Total)** | | | E = sum(D) | **25,147.38** |
| Emission Value (t CO2e per m3) | | | F | 0.001915 |
| **2016 Fleet emission (t CO2e)** | | | **G = E x F** | **48.16** |

***b) Does NRG own or operate any buildings for office use and/or its fleet of vehicles? Please explain.***

***i. If yes, please provide NRG's 2017 volume forecast to include the natural gas consumption from this facility. 1. Please update the relevant evidence.***

Please see Schedule 1, attached, for NRG's updated Rates Table.

Building emission for the calendar year 2016 was 16.98t CO2e, from a consumption of 313.4 Mcf. We used the NEB conversion standard of 0.0283 to convert the usage from cubic feet to m3, then follow the emission reporting guideline for Stationary General Combustion (ON.20) to convert the natural gas usage in m3 (8869.22 m3) to calculate an emission of 16.98t CO2e. An emission value of 0.001915 t CO2e per m3 was used.

This emission was previously reported in the customer-related carbon and will be shifted to facility-related charges. We expect volume of gas from building usage to remain the same for the year 2017.

| | Office Mcf | mcf to cf | cf to m3 | Building m3 |
|---|---|---|---|---|
| | A | B | C | D = A x B x C |
| 1-Jan-16 | 72.4 | 1000 | 0.0283 | 2048.92 |
| 1-Feb-16 | 61.3 | 1000 | 0.0283 | 1734.79 |
| 1-Mar-16 | 51.6 | 1000 | 0.0283 | 1460.28 |
| 1-Apr-16 | 42.9 | 1000 | 0.0283 | 1214.07 |
| 1-May-16 | 8.6 | 1000 | 0.0283 | 243.38 |
| 1-Jun-16 | 0.7 | 1000 | 0.0283 | 19.81 |
| 1-Jul-16 | 0.5 | 1000 | 0.0283 | 14.15 |
| 1-Aug-16 | 0.5 | 1000 | 0.0283 | 14.15 |
| 1-Sep-16 | 0.5 | 1000 | 0.0283 | 14.15 |
| 1-Oct-16 | 0.6 | 1000 | 0.0283 | 16.98 |
| 1-Nov-16 | 16.3 | 1000 | 0.0283 | 461.29 |
| 1-Dec-16 | 57.5 | 1000 | 0.0283 | 1627.25 |
| **Fleet m3 (2016 Total)** | | | E = sum(D) | **8,869.22** |
| Emission Value (t CO2e per m3) | | | F | 0.001915 |
| **2016 Fleet emission (t CO2e)** | | | **G = E x F** | **16.98** |

**Staff IR-4**

**Topic**: Forecasts – Volume and Emissions
**Ref**: Exhibit 2 / Page 7

**Preamble**:
NRG has provided information related to its 2017 volume forecast.

**Questions and Responses**:

***a) Please discuss whether NRG's 2018 abatement activities (customer- and facility-related) should be classified as: a) public information, b) confidential information as per OEB's Rules of Practice and Procedure and Practice Direction on Confidential Filings, and/or c) strictly confidential information as per the Climate Change Act and Cap and Trade Regulation.***

***i. If in 2018, Ontario is linked with the WCI market, would NRG's answer above change?***

NRG's facilities-related abatement activities should be filed as a) public. It should not be filed as c) strictly confidential, since the legislative regime does not consider it strictly confidential, and NRG is a rate-regulated utility. Other abatement activities involving ideas or processes that could involve proprietary or commercially sensitive information should be classified as strictly confidential.

***b) Please discuss whether NRG's 2018 offset activities should be classified as: a) public information, b) confidential information as per OEB's Rules of Practice and Procedure and Practice Direction on Confidential Filings, and/or c) strictly confidential information as per the Climate Change Act and Cap and Trade Regulation.***

***i. If in 2018, Ontario is linked with the WCI market, would NRG's answer above change?***

Offset activities should be filed as b) confidential as per OEB's Rules of Practices and Procedure and Practice Direction of Confidential Filings, for the same reasons as above. In addition, while offset activities are not regulated under the Act, information related pricing of offset purchases can reveal insight into a Participant's procurement strategy, and therefore should be confidential.

***c) If details on abatement programs and offsets are marked as strictly confidential, how does NRG intend to present the volume and GHG forecasts as part of future Compliance Plans when it has abatement activities and offsets to propose?***

NRG's abatement activities should be marked as a) public. If utility-private partnerships are formed to deliver abatement programs whereby private intellectual property must be protected, NRG will seek the OEB's advice or look at precedent.

**Issue 1.2 – Are the GHG emissions forecasts reasonable and appropriate?**

**Staff IR-5**

**Topic:** GHG Emissions Forecasts
**Ref:** Exhibit 2 / p. 9 -10

**Preamble:**
NRG states that it used the factors outlined in Table 3 to convert natural gas consumption volume to GHG emissions.

**Questions and Responses:**

***a) Please explain why NRG created only one emission factor despite the different uses of natural gas by its customers and facilities.***

***i. For example, please explain why NRG's ON.400 emission conversion factor (tonnes $CO_2e/m^3$) for customer-related volumes is not 0.001875.***

In NRG's original Compliance Plan, the emission factor of 0.039 GJ/m3 was used. The emission factor was based on documents Union submitted to MOECC as the default HHV, rounded to 3 decimal points. NRG will update the HHV value in an updated plan to 0.03881 GJ/ m3.

Note that the HHV value used by NRG as defined by Union (0.03881 GJ/m3) and is different than that of the default HHV value of 0.038 GJ/m3 – the default heating value for both ON.40 (General Stationary Combustion) and ON.400 (Natural Gas Distribution), of 0.038 GJ/m3.

The default HHV of 0.038 GJ/m3 gives an emission factor of 0.001875 t CO2e per m3. Using the Union-defined HHV of 0.03881 GJ/m3, NRG calculates an emission value of 0.001915 t CO2e per m3 for all customer- and facility- related activities.

Our system has very little usage related to power generation or industrial production and therefore NRG used the default value.

***b) Please identify the source of NRG's default CO2 emission factor of 49.01 kg per GJ***

In the original compliance plan, the 49.01 kg per GJ from Quebec (Table 20-3) was mistakenly used. The updated evidence includes the Ontario-specific 49.03 kg/GJ for Ontario natural gas, also from Table 20-3.

***c) Please explain whether NRG used ON 403 (a) Methodology 1 (equation 400-1) or Methodology 2 (equation 400-2) to calculate its carbon dioxide emissions as outlined in the Guidelines for Quantification, Reporting and Verification of Greenhouse Gas Emissions.***

NRG used ON.403 (a) Methodology 1 to calculate its CO2 emissions. Methodology 1 is chosen due to potential differences in higher heating value of natural gas received from Union into NRG's distribution network. The following table reports the emission calculation more closely aligned to the layout of equation 400-1.

| **Total Distributed Volume and emission** | | |
|---|---|---|
| NG (h) – 2016 historical | A | 62,114,000.0 |
| NG (h) - 2017 Forecast (5% non IGPC increase) | B | 64,368,401.7 |
| HHV (h) – from Union | C | 0.03881 |
| EF (h) | D | 49.03 |
| 0.001 | E | 0.001 |
| **$CO_2$ (i)** | **F = B x C X D x E** | **122,483.7** |

| **Participant Volume and Emission** | | |
|---|---|---|
| NG (h) – 2016 historical | A | 40,202,115.8 |
| NG (k) - 2017 Forecast (Union) | B | 41,360,923.3 |
| HHV (k) - from Union | C | 0.03881 |
| EF (k) | D | 49.03 |
| 0.001 | E | 0.001 |
| **$CO_2$ (k)** | **F = B x C X D x E** | **78,703.8** |

$CO_2(f) = \Sigma CO_2(i) - \Sigma CO_2(k) = 43,779.88$ *

*note that $\Sigma CO_2(j)$ (From export) – $\Sigma CO_2$ (l) (from storage) are zero for NRG. NRG does not export any natural gas out of its network and does not operate or own any storage facilities.

***d) To calculate its $CH_4$ emissions, did NRG use ON.404 (a) calculations (equation 400-7) as outlined in the guidelines for quantification, Reporting and Verification of Greenhouse Gas Emissions? Please explain.***

NRG used ON.404 (a) calculations (equation 400-7) to calculate its CH4 emissions. The following table reports the emission calculation more closely aligned to the layout of equation 400-7.

| **$CH_4$ Emission Calculation** | | |
|---|---|---|
| **t CO2(i)** | **A** | **43,780** |
| EF ($CH_4$) - g / GJ | B | 966 |
| 0.000001 | C | 0.000001 |
| EF (h) | D | 49.03 |
| **t $CH_4$** | **E = A x B x C ÷ D** | **0.86256** |
| GWP ($CH_4$) | F | 21 |
| **$CH_4$ (t CO2e)** | **G = E x F** | **18.11** |

***e) To calculate its $NO_2$ emissions, did NRG use ON.404 (a) calculations (equation 400-8) as outlined in the guidelines for quantification, Reporting and Verification of Greenhouse Gas Emissions? Please explain.***

NRG employees ON.404 (a) calculations (equation 400-8) to calculate its CH4 emissions. The following table reports the emission calculation more closely aligned to the layout of equation 400-7

| **$N_2O$ Emission Calculation** | | |
|---|---|---|
| **t CO2(i)** | **A** | **43,780** |
| EF ($N_2O$) - g / GJ | B | 913 |
| 0.000001 | C | 0.000001 |
| EF (h) | D | 49.03 |
| **t $N_2O$** | **E = A x B x C ÷ D** | **0.81524** |
| GWP ($N_2O$) | F | 310 |
| **$N_2O$ (t CO2e)** | **G = E x F** | **252.72** |

***f) Please confirm that Union' Higher Heating Value (HHV) is 0.03881 GJ/m3 and not 0.039.***

In NRG's original Compliance Plan, the emission factor of 0.039 GJ/m3 was used. The emission factor was based on a document Union submitted to MOECC as the default HHV, rounded to 3 decimal points. NRG will update the HHV value in an updated plan to 0.03881 GJ/ m3.
See file:

http://www.energyontario.ca/images/Gas_Composition_Tables/Natural_Gas_HHV_MOE_02_24_17_-_Letter_from_Eric_Loi.pdf

***g) If NRG owns or operates a fleet of vehicles that are used in its service territory (as per Staff IR-3), please update NRG's 2017 GHG emissions forecast to include the natural gas consumption from this facility. Please update the relevant evidence.***

Please note that facility emission calculation has been updated to reflect fleet emission.

***h) If NRG owns or operates any buildings for office use and/or its fleet of vehicles (as per Staff IR-3), please update NRG's 2017 GHG emissions forecast to include the natural gas consumption from this facility. Please update the relevant evidence.***

Please note that facility emission calculation has been updated to reflect emission from building for office use.

**Issue 1.4 - Is the gas utility's Compliance Plan overview reasonable and appropriate?**

**Staff IR-6**

**Topic**: Overview of Compliance Plan
**Ref**: Exhibit 3 / p. 12 - 13

**Preamble**:
NRG indicates that in establishing the Cap and Trade Compliance Plan for the calendar year 2017, it will follow the guidelines established by the OEB.

**Questions and Responses**:

***a) As per OEB's Compliance Plan Filing Guidelines (Exhibit 3, 1.), has NRG established clear governance and accountability with respect to the development and implementation of its Compliance Plan? Please explain.***

This plan is currently in development. Governance will be significantly impacted by decisions made in the matter EB-2016-0351 currently before the Board.

***b) As per OEB's Compliance Plan Filing Guidelines (Exhibit 3, 1.), does NRG have policies and processes that describe the checks and balances in place to ensure effective risk management and compliance monitoring? Please explain.***

As mentioned above, decisions made in the matter EB-2016-0351 will impact NRG's policies and processes. Currently, NRG's risk management strategy sets maximum and minimum bid pricing for auction and secondary market purchases.

NRG plans to have regulatory counsel monitor compliance to the plan on a semi-annual basis.

***c) As per OEB's Compliance Plan Filing Guidelines (Exhibit 3, 1.), does NRG have the resources and capabilities to participate in the primary and secondary cap and trade markets (e.g., appropriate trading personnel, awareness of market tools, brokerages and exchanges)? Please explain.***

As noted in NRG's response to the first IR, Blackstone Energy Services has all of the appropriate tools to facilitate NRG's participation in primary and secondary markets. They currently leverage relationships and partnerships across Canada and in the United States.

***d) As per OEB's Compliance Plan Filing Guidelines (Exhibit 3, 1.), does NRG have any creditworthiness analysis of counter-parties and financial intermediaries that NRG may deal with? Please explain.***

Blackstone is undertaking credit-worthiness analysis. Blackstone has contact with counter-parties and intermediaries.

**Issue 1.6 - Are the proposed performance metrics and cost information reasonable and appropriate?**

**Staff IR-7**

**Topic**: Performance Metrics and Cost Information
**Ref**: Exhibit 3 / p. 17

**Preamble**:
NRG outlines in Table 8 its estimated costs based on the forecasted cost per tonne of GHG at $17.47 CAD per tonne.

**Questions**:

***a) Is NRG's forecasted cost per tonne $17.47 CAD or $17.41 CAD as stated in Ex 2, page 11? Please explain.***

The forecast, at the time of writing the Compliance plan, was $17.41 CAD. The estimated auction reserve price has become much higher in recent weeks due to movements in exchange rates.

***b) Enbridge Gas Distribution Inc. and Union Gas Ltd. have used $17.70 CAD per tonne, an estimate of the 2017 Ontario reserve price, to forecast the costs of their compliance plans because the Ontario minimum auction reserve price is higher than the 21-day CCA strip. Please comment on whether NRG agrees with this approach.***

NRG believes that the price estimate should be the higher of the estimated floor price or the 21-day average of secondary market price for December delivery, after accounting for exchange rates.
Generally, when secondary market prices are lower than the auction reserve price, the market clears at the reserve price.

Conversely, if secondary market prices are higher than the reserve price, the auction settlement price will likely be higher than the auction reserve price.

Further, the December price should be used (as it is the most liquid instrument based on highest volume of trade) and should provide better information in the price signal.

Lastly, until WCI linkage is confirmed, the higher of either the OCA or the CCA December delivery price should be used as the estimate for the secondary market prices.

**Issue 1.10 - Are the gas utility's proposed greenhouse gas abatement activities reasonable and appropriate?**

**Staff IR-8**

**Topic**: Compliance Plan – Abatement Activities

**Preamble**:
NRG has not proposed any abatement activities as part of its 2017 Compliance Plan.

**Questions and Responses**:

***a) Please indicate why NRG has not included any customer- and facility-related abatement programs in its 2017 Compliance Plan.***

NRG is exempt from DSM. The primary reason for that exemption is that 75% of NRG's current residential customers have been added since 2002. Between 2001 and 2005 mid-efficiency heating equipment was being phased out. The vast majority of equipment sold in NRG's system since 2002 was high efficiency heating equipment.

From 2005-2010 the remaining mid-efficiency or single category 1 appliances were replaced because of breakdown or as a result of OPA and NR Can rebate programs.
NRG has no compressors in its system and minimal gas loss. Facilities include a small fleet of 10 CNG vehicles and a newer 6000 square foot office building. The consumption of all NRG facilities is negligible and very small efficiency gains would not pass a cost-benefit analysis.

At the time of writing the compliance plan, NRG was waiting for Union Gas Representatives to complete the roll-out of government-funded abatement programs in areas outside of its franchise. Since the submission of the Compliance Plan, NRG has been promoting Home Improvement Rebate/Winterization Programs, facilitated by NR Can delivery agents and Union Gas. Details can be found on our website. NRG is currently seeking answers from Union Gas regarding measurement and tracking of results related to these residential abatement programs.
While NRG does not have custom-designed industrial load reduction programs, many of NRG's larger commercial, industrial and agribusiness customers have recently taken advantage of technology grants.

**Issue 2 - Monitoring and Reporting – Are the proposed monitoring and reporting processes reasonable and appropriate?**

**Staff IR-9**

**Topic**: Monitoring and Reporting
**Ref**: Exhibit 4 / p. 25

**Preamble**:
NRG indicates that monitoring and reporting will commence starting 2017 calendar year and the appropriate information will be reported in this section.

**Questions and Responses:**

***a) Does NRG have any concerns with the proposed reporting templates outlined in Enbridge Gas Distribution's Compliance Plan application – EB-2016-0300, Exhibit D, Tab 1, Schedule 5, pages 3 – 5? Please explain.***

None

***b) Does NRG have any concerns with the proposed reporting templates outlined in Union Gas Limited's Compliance Plan application – EB-2016-0296, Exhibit 4, Schedules 1 and 2. Please explain.***

None

**Issue 3 – Customer Outreach – Are the proposed customer outreach processes and methods reasonable and appropriate?**

**Staff IR-10**

**Topic**: Customer Outreach
**Ref**: Exhibit 5 / pp. 26-28

**Preamble**:
NRG describes its customer outreach activities and has indicated that it has undertaken a number of activities to ensure customers are informed about the Cap and Trade program and its impacts.

**Questions and Responses**:

***a) Please discuss NRG's experience to-date related to the communication material distributed to its customers? In your response, please discuss how the information has generally been received by customers and the volume of inquiries/comments submitted to NRG's call centre.***

As expected, NRG has experienced a 5-10% increase in billing related inquiries since January 1. The unseasonably warm conditions in December and January has helped to keep this call volume at a manageable level.
The volume of calls has not presented a significant challenge for NRG. However, Cap and Trade related calls are on average 30-60 seconds longer than typical billing questions.
The majority of customers that have provided feedback are not providing positive feedback. The largest area of criticism is the lack of transparency on the bill. "The Government is hiding the costs" or "They are burying the true costs in the delivery portion of the bill" are the most common comments.

***b) Is NRG considering any changes to its communication strategy based on feedback and customer response based on the early response to the Cap and Trade program?***

NRG is considering only one change to its strategy. That change would be to NRG's IVR script. NRG is considering changes to our prompts in efforts to channel general Cap and Trade inquiries to a series of scripted messages. The messages will help the customer understand the program without burdening the billing group with lengthy conversations.

***c) What tools has NRG developed to help customers quantify cap and trade costs? Is NRG developing any additional tools (i.e., bill calculators, etc.)?***

NRG is developing a Cap and Trade Bill Calculator, and the following text will be provided to customers: On January 1, 2017 the Ontario Cap and Trade Program was launched. Recent rate increases on the delivery portion of your bill are the result of the Utility's requirement to purchase Carbon Allowances on your behalf. NRG is currently developing a Cap and Trade Bill Calculator for its website. This tool will allow customers to better understand the charges related to the program. For more information on Cap and Trade, please visit www.nrgas.ca or call the Ontario Energy Board's Consumer Relations Centre at 1 (877) 632-2727.

**Issue 4 – Deferral and Variance Accounts - Are the proposed deferral and variance accounts reasonable and appropriate? Is the disposition methodology appropriate?**

**Staff IR-11**

**Topic**: Deferral and Variance Accounts
**Ref**: Exhibit 6 / Page 29 of 34

**Preamble**:
NRG states that in its current rate application filing (EB-2016-0236) it has requested to establish a deferral account for the purpose of recording and tracking its Cap and Trade costs. NRG further indicates that the appropriate information will be reported in this section for the next compliance plan.

As part of EB-2016-0236, NRG filed a letter on December 1, 2016 requesting the OEB to place its Application in abeyance as it sought to transfer its entire natural gas distribution system to EPCOR Natural Gas Limited Partnership.

In NRG's leave to transfer application (EB-2016-0351, Ex.1, T1, S1, p.3), NRG indicated that it requested that the OEB continue to consider the establishment of a deferral account in relation to Cap and Trade notwithstanding that the remainder of the EB-2016-0236 application was put in abeyance. On November 24, 2016, the Board approved this deferral account on an interim basis effective January 1, 2017.

**Questions and Responses**:

***a) Please describe what the deferral account applied for in EB-2016-0236 was meant to capture.***

In Exhibit 1, Schedule 2 of EB-2016-0236, NRG asked the Board to approve the establishment of a deferral account to record the impacts of Provincial greenhouse gas emissions requirements.

The above-noted application was filed with the Board prior to completion of NRG's Cap and Trade Compliance Plan. The request for a single deferral account was made prior to understanding of the accounting implications of having a single deferral account.

The approved Interim rates are comprised of two separate charges: 1) Customer-related Cap-and-Trade costs and; 2) Facility-related Cap-and-Trade costs. Therefore NRG would require 2 distinct Deferral and Variance accounts to capture these costs separately.

***b) Please provide a copy of the OEB decision approving NRG's request for a deferral account.***

No approval for the establishment of a deferral and variance account was provided by the Board.

***c) If applicable, is NRG seeking approval in this proceeding to establish new deferral and variance accounts to record the difference between actual and forecast costs for customer- and facility-related obligations?***

NRG seeking approval in this proceeding to establish two new deferral and variance accounts to record the difference between actual and forecast costs for customer- and facility-related obligations.

***d) Please indicate where NRG proposes to dispose of the new deferral and variance accounts that deal with customer- and facility-related obligations. In your response, please indicate if NRG proposes that they would be dealt with as part of the Cap and Trade Compliance Plan applications or as part of a separate deferral account disposition proceeding?***

Please see answer below.

***e) How does NRG propose to dispose of any balances? For example, would this be as a one-time adjustment or would the balances be spread over time? If so, over what period of time? Would the recovery of these balances be included in the Delivery Charge or presented as a separate line item?***

Disposal of the balance in the Deferral Account would be done by one of the following methods:

1. Dispose of any balance by way of a Rate Rider (shown as a separate line item) over a 1 to 12 month period, depending on the amount;
2. Carry forward any balance when determining the Cap and Trade rate for the next 12 month period. It would be imbedded in the Cap and Trade rate for the following year and not shown as a separate line item.

**Issue 6 - Implementation – What is the implementation date of the final rates and how will the final rates be implemented?**

**Staff IR-12**

**Preamble**:
NRG received approval from the OEB on November 25, 2017 to incorporate customer-related and facility-related obligation costs in rates on an interim basis effective January 1, 2017.

**Questions and Responses:**

***a) Please discuss how NRG proposes to recover any variance between the OEB's Interim Decision issued on November 25, 2016 and the Decision and Final Rate Order for this proceeding. In your response, please discuss if NRG proposes to clearly indicate any difference between the Interim Rates and Final Rates on a customer's bill.***

When a final rate is approved, NRG would treat this similar to a foregone revenue calculation. NRG proposes to calculate the "foregone revenue" and charge the difference by way of a rate rider. This rate rider would clearly indicate any difference between the interim rates and final rates on a customer's bill.

***b) Please indicate how NRG proposes to reconcile the HST related to any differences between Interim Rates and Final Rates.***

No reconciliation of HST would be required.

**Schedule 1:**

**NEW RATES TABLE**

| | | |
|---|---|---|
| 2017 Total Volume (m3) | A = NG(h) | 64,368,401.7 |
| 2017 Non IGPC Volume (m3) | B = A - NG(k) | 23,007,478.4 |
| UFG (2.7172%) | C = B x 0.027172 | 625,159.2 |
| Fleet Usage (m3) | D | 25,147.4 |
| Building Usage (m3) | E | 8,869.2 |
| Customer-related Volume (m3) | F = B - C - D - E | 22,348,302.6 |
| Facility-related Volume (m3) | G = C + D + E | 659,175.8 |
| | | |
| Emission Value (t CO2e per m3) | H | 0.001915 |
| | | |
| Customer-related Emission (t CO2e) | I = F x H | 42,797 |
| Facility-related Volume Emission (t CO2e) | J = G x H | 1,262 |
| | | |
| Forecasted Price of Allowance (CAD)* | K | $ 17.41 |
| | | |
| Customer-related Carbon Cost (CAD) | L = I x K | $ 745,095.76 |
| Facility-related Carbon Cost (CAD) | M = J x K | $ 21,977.02 |
| | | |
| Customer-related charge (cents per m3) | N = (L ÷ F) x 100 | 3.33402 |
| Facility related charge (cents per m3) | O = (M ÷ A) x 100 | 0.03414 |
| Customer + facility related charge (cents per m3) | P = N + O | 3.36816 |
| | | |
| Administrative Cost (CAD) | Q | $ 100,000.00 |
| Administrative Charge (cents per m3) | R = (Q ÷ A) x 100 | 0.15536 |

*Based on Compliance Plan submitted November 15, 2016