

MEETING BN

MEETING WITH ENMAX

Meeting Details:

Date and time: January 27, 2014, 2:00 pm

Location: McDougall Centre, Spruce View Room

Date: January 17, 2014

PURPOSE:

- ENMAX has not identified any issues beyond a "Meet and greet" with the new Minister.

CURRENT STATUS:

RECOMMENDATION:

- Affirm the Alberta Government's commitment to the Clean Air Strategic Alliance electricity framework review process and agreements on emissions from the electricity sector.
- Confirm that Alberta is committed to remaining the regulator for the electricity industry in the province for both criteria air contaminants and greenhouse gases.

DEPARTMENT REP:

Additional department staff recommended to attend meeting:

- Deputy Minister
- Assistant Deputy Minister (name, division)
- Department staff (name, title, division)

BACKGROUND:

- ENMAX obtains its power through its own generation assets (wind and gas-fired generation) and through Power Purchase Arrangements with coal-fired generators. They participate in the greenhouse gas offset system as both a user and a creator of offsets. This gives them a significant interest in the way in which wind power is treated in the offset system and in the current and future greenhouse gas and criteria air contaminant regulations that are applied by the federal and provincial governments.
- Some of ENMAX's offset credits submitted for compliance were rejected as a result of issues with the project developer. They are currently involved in legal action with the offset project developer to recover their costs. They may wish to discuss the ex-poste verification process used in the Alberta offset system, as they have been exposed to the risk this leaves with large final emitters when offsets are rejected after they have been submitted. In Alberta's offset system credits are verified after they are submitted for compliance rather than certified in advance. When submitted offsets are rejected, the Large Final Emitter that submitted them must make up the missing tonnes. The cost of the rejected tonnes becomes a commercial matter between the emitter and the offset project developer.
- The federal government, as part of the development of national emissions standards under the Air Quality Management System, have proposed improvements in air pollutant emissions from coal plants prior to the previously agreed to dates in the Clean Air Strategic

Advice to the Honourable Robin Campbell, Minister of Environment and Sustainable Resource Development

Alliance's electricity emissions management framework – these are called mid-life BLIERS. These could add a significant expense with very little improvement in air quality, and would add costs to the holders of Power Purchase Arrangements such as ENMAX. The provincial government has and will be arguing against these mid-life BLIERS.

- The federal government's greenhouse gas requirements for gas-fired generation are currently being negotiated. ENMAX is a participant in these discussions through their role on the Canadian Electricity Association. The current federal proposal requires few reductions but offers very limited compliance flexibility. Alberta is also participating and is advocating for accurate definitions of the various gas plant technologies and greater flexibility.
- ENMAX has partnered with the Climate Change and Emissions Management Fund on their solar panel program. ENMAX Generation Portfolio Inc. and its subsidiary plan to deliver 12,470 kW of installed solar and wind micro generators to consumers across Alberta.
-

ATTENDEES:

- Gianna Mannes (President and Chief Executive Officer), Rob Hemstock (executive Vice President – Legal and Regulatory), Tim Boston (Vice President of Government Relations)

Contact: Name (person DMO/MO can contact for more info), Branch, Phone (xxx-xxx-xxxx)
ADM: Name, Division, Phone (xxx-xxx-xxxx)

Minister's office use only

Comments/Required Followup:

DECISION REQUIRED

Subject: Draft Agreement in Principle with Environment Canada re: Equivalency Agreements for Greenhouse Gas Regulation.

February 14, 2014

ISSUE:

- Environment Canada has sent their initial draft of a proposed Agreement in Principle that would commit both governments to working towards an Equivalency Agreement(s) related to greenhouse gas management.
- There are concerns with a few of the clauses in the proposed wording and some feedback is required on how and how hard to push back.

RECOMMENDATIONS:

- Inform the Minister of the proposed Agreement in Principle and ensure his willingness to sign it once the final version is prepared.
- Discuss the five year fixed time window with Alberta Justice lawyers to determine if there is any room to work around it within the Canadian Environmental Protection Act (1999) provisions.
- Test at Executive and Political levels, the willingness to push back against the "ring fencing" of emissions from the electricity sector.

RATIONALE FOR RECOMMENDATIONS:

- Given the timelines of the various regulatory processes there may not be equivalency agreements and orders in place prior to significant investment decisions. The purpose of the Agreement in Principle is to provide some measure of reassurance to those making investment decisions about the regulatory regime in which they will be operating.
- Limiting the electricity sector's emissions reduction to the sector itself will reduce the compliance options available to generators. Alberta's system does not distinguish between offsets or performance credits generated within different sectors, and to do so would reduce the available compliance instruments and potentially add costs to the sector, while not changing the overall emissions to the atmosphere.
- The Federal government appears to place great emphasis on shutting down the coal plants, although that is not what their regulation requires.

24 (1) (a)

BACKGROUND:

- Environment Canada has sent us their initial draft of an Agreement in Principle and are awaiting our response.
- While some of the background work has been done and will continue, the actual Equivalency process cannot begin until each jurisdiction has a regulation in place.

- The Federal government's regulation for coal-fired electricity is in place and takes effect July 1, 2015, although the first reductions are not required until the end of 2019. Further regulations for other sectors are expected to be rolled out beginning in late spring or summer of 2014.
- **What is Equivalency?**
- Section 10 of the *Canadian Environmental Protection Act, 1999* (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement and order that will result in the federal government standing down a regulation under C.E.P.A. in that jurisdiction. This allows the levels of government to work together, ensures that the desired outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates.
- The jurisdiction must prove to the federal minister's satisfaction that an existing regulatory instrument is "equivalent to" the regulation under C.E.P.A., and that there exist provisions for the investigation of alleged offenses similar to C.E.P.A.'s. C.E.P.A. itself does not define what constitutes "equivalent to", but a background document on Environment Canada's website refers to achieving "the same environmental outcome". C.E.P.A. currently limits Equivalency Orders to a five year period, after which time they must be re-established. The process and Environment Canada's timelines are outlined below
- **How does it work?**
- The process begins once both jurisdictions have a regulation in force. The other jurisdiction, in this case Alberta, requests that an equivalency determination be made. This is done by Environment Canada, largely on the basis of modeled outcomes of each of the regulations.
- Once the determination has been made, an Equivalency Agreement is drafted and is gazetted by the federal government for a 60 day comment period. Once the comments have been received and any changes made, the final version is gazetted for a second time.
- At this point, on the basis of the agreement, an Order in Council is developed and a Regulatory Impact Assessment (relative to the impact of the agreement) is prepared by the federal government. This forms the rationale behind the Order in Council, which also goes through the two rounds of gazetting and, once these are completed, the order takes hold for a five year period, during which time the federal regulation stands down within the other jurisdiction.
- Environment Canada estimates that this process will take between 12 and 18 months from the moment an equivalency determination has been made. Given the most optimistic scenario, this will take us out into 2016 before the process has been completed.
- **Why an Agreement in Principle?**
- Much of Alberta's Industry is driven by large, long term capital decisions. Many of these decisions are now pending, and the lack of certainty as to which regulatory regime they will be following for greenhouse gas emissions is causing some anxiety for industry stakeholders. While we will be taking all actions possible to speed the equivalency process, an Agreement in Principle, signed by the two Ministers, will provide a clear and concise map of what both levels of government are intending. While not as much certainty as might be

preferred, it should provide some assurance and enable decision makers to proceed with decision about major projects.

• **What are our concerns with the draft?**

- The first concern is that the emissions and emission reductions must occur within the five year time period of the Agreement. This poses some challenges for offsets and performance credits that might be used, as they do not currently have any time limitation on their use. This problem, however, may be hard-wired into the federal Act and we may not be able to address it.

24 (1) (a)

- The second concern is the stated intention of the Federal government to "ring fence" the emissions from the electricity sector. This will reduce the compliance options for electricity generators, at least when making reductions to the level set out in the federal regulation

24 (1) (a)

It is possible that the primary concern for Environment Canada is that the coal fired plants reduce their emissions to 420 kilograms CO₂e/Megawatt hour or shut down as per the federal regulation. If this outcome can be assured there may be greater willingness to permit a more flexible approach for the balance of the electricity sector. It may also be that the new Minister is less concerned that the emissions reductions all come from the electricity sector.

Contact: Keith Denman, Air and Climate Change Policy Branch, 780-422-2832
ADM: Shannon Flint, Policy Division, 780-422-8463

Assistant Deputy Minister's use only

Decision:

- Approve recommendations
 Do NOT approve recommendations

(Name of ADM), Assistant Deputy Minister

Assistant Deputy Minister's Feedback/Comments/Instructions:

DECISION REQUIRED

Subject – Agreement in Principle with Environment Canada regarding Greenhouse Gas regulation.

March 20, 2014

ISSUE:

- Signing an Agreement in Principle with the federal government confirming our joint intention to put an Equivalency Agreement in place that will allow us to regulate greenhouse gases within the province.

RECOMMENDATIONS:

- Approve the "Agreement in Principle" and accompanying Q and A sheet.
- Environment and Sustainable Resource Development staff will work with the Minister's office and International and Intergovernmental Relations staff to determine the most appropriate forum for signing. It is hoped that this signing can be done within the month of April 2014.
- Options include adding it to the Agenda for a Ministerial meeting, signing separately and issuing a joint communique, or finding some other event at which its signing could be announced.

RATIONALE FOR RECOMMENDATIONS:

- Environment Canada has been working with the various sectors to establish standards for greenhouse gas emissions. Alberta and Environment Canada have been working to establish an Equivalency Agreement that will permit Alberta to retain the regulation of its primary industries.
- Federal regulations for the various sectors will not be completed at the same time, and industry members have stated a desire for some clarity as to the regulatory regime under which they will be operating.
- In order to provide some level of clarity in a time frame that will assist industry in investment decisions currently being made, we are signing an Agreement in Principle with Environment Canada that will state out intentions and outline the basic form and content of the eventual equivalency agreements.

BACKGROUND:

- The Canadian Environment Protection Act allows for Equivalency Agreements, in which the federal government stands down its regulation within the jurisdiction and allows the other jurisdiction to regulate an activity within its borders.
- In order to establish an equivalency agreement Alberta must have an enforceable regulatory regime in place that delivers an equivalent environmental outcome to the federal regulation, and also provisions for citizen's right to request an investigation. Further information may be found in the Q and A sheet (attached)
- Some changes may be required in the Specified Gas Emitters Regulation to ensure alignment. These will be put in place as part of the Regulation's renewal in September 2014.
- Alberta has been participating in the various sectoral tables to ensure we have a good understanding of the federal proposals.
- Currently the Federal Coal Regulation is in place, which mandates the closing of coal fired generating plants when they are roughly 50 years old. This regulation takes effect in July 2015, and the first plant required to close is scheduled for the end of 2019.

Advice to the Honourable Robin Campbell, Minister of Environment and Sustainable Resource Development

- We anticipate a number of further sectoral regulations over the next year or two. These will be added to the Equivalency Agreement in as they are rolled out.

Contact: Keith Denman Air and Climate Change Policy Branch, Phone 780-422-2832
ADM: Shannon Flint, Policy Division, 780-422-8463

Recommendations approved:

_____ Date

_____ Honourable Robin Campbell, Minister

DECISION REQUIRED

Subject – Agreement in Principle with Environment Canada regarding Greenhouse Gas Regulation.

March 20, 2014

ISSUE:

- Signing an Agreement in Principle with the federal government confirming our joint intention to put an Equivalency Agreement in place that will allow us to regulate greenhouse gases within the province.

RECOMMENDATIONS:

- Approve the "Agreement in Principle" and accompanying Q and A sheet.
- Environment and Sustainable Resource Development staff will work with the Minister's office and International and Intergovernmental Relations staff to determine the most appropriate forum for signing and announcing the Agreement in Principle, which could take place in April to coincide with the Climate Change Strategy and Specified Gas Emitters Regulation renewal.
- Options include adding it to the agenda for a Minister-Minister meeting, signing separately and issuing a joint communique, or at a joint event.

RATIONALE FOR RECOMMENDATIONS:

- Environment Canada has been working with the various sectors to establish standards for greenhouse gas emissions. Alberta and Environment Canada have been working to establish an Equivalency Agreement that will permit Alberta to retain regulatory jurisdiction of its primary industries.
- Federal regulations for the various sectors will not be completed at the same time, and industry members have stated a desire for some clarity as to the regulatory regime under which they will be operating.
- In order to provide some level of clarity in a time frame that will assist industry in investment decisions currently being made, we are signing an Agreement in Principle with Environment Canada that will state our intentions and outline the basic form and content of the eventual equivalency agreements.

BACKGROUND:

- The Canadian Environmental Protection Act allows for equivalency agreements, in which the federal government stands down its regulation within the jurisdiction and allows the other jurisdiction to regulate an activity within its borders.
- In order to establish an equivalency agreement, Alberta must have an enforceable regulatory regime in place that delivers an equivalent environmental outcome to the federal regulation, and also provisions for citizen's right to request an investigation. Further information may be found in the Q and A sheet (attached).
- Some changes may be required to the Specified Gas Emitters Regulation to ensure alignment. These will be put in place as part of the Regulation's renewal in September 2014.
- Alberta has been participating in the various sectoral tables to ensure we have a good understanding of the federal proposals.
- Currently the federal coal regulation is in place, which sets a "clean as gas" performance standard at end-of-life, which is set between 45-50 years depending on the date of

Advice to the Honourable Robin Campbell, Minister of Environment and Sustainable Resource Development

commission. This regulation takes effect in July 2015, and the first plant required to close is scheduled for the end of 2019.

- We anticipate a number of further sectoral regulations over the next year or two. These may be added to the Equivalency Agreement as they are rolled out.

Contact: Kate Rich, Air and Climate Change Policy Branch, Phone 780-427-4208
ADM: Shannon Flint, Policy Division, 780-422-8463

Recommendations approved:

_____ Date

_____ Honourable Robin Campbell, Minister

DECISION REQUIRED

Subject: Draft Canada/ Alberta Agreement in Principle on Efforts to Address Climate Change

February 14, 2014

ISSUE:

- Environment Canada has sent their initial draft of a proposed Agreement in Principle that would commit both governments to working towards an Equivalency Agreement(s) related to greenhouse gas management.
- There are concerns with a few of the clauses in the proposed wording and some feedback is required on how to respond.

RECOMMENDATIONS:

- 24 (1) (a) • Inform the Minister of the proposed Agreement in Principle and ensure his willingness to sign it once the final version is prepared. ? [Redacted]
- 24 (1) (a) • Discuss the five-year fixed time window with Alberta Justice lawyers to determine if there is any room to work around it within the Canadian Environmental Protection Act (1999) provisions. [Redacted]
- 24 (1) (a) • Test at Executive and Political levels, the willingness to push back against the "ring fencing" of emissions from the electricity sector. [Redacted]

RATIONALE FOR RECOMMENDATIONS:

- Given the timelines of the various regulatory processes there may not be equivalency agreements and orders in place prior to significant investment decisions. The purpose of the Agreement in Principle is to provide some measure of reassurance to those making investment decisions about the regulatory regime in which they will be operating.
- Limiting the electricity sector's emissions reduction to the sector itself will reduce the compliance options available to generators. Alberta's system does not distinguish between offsets or performance credits generated within different sectors, and to do so would reduce the available compliance instruments and potentially add costs to the sector, while not changing the overall emissions to the atmosphere.
- 24 (1) (a) • The Federal government appears to place great emphasis on shutting down the coal plants, although that is not what their regulation requires. [Redacted]

BACKGROUND:

- Environment Canada has sent us their initial draft of an Agreement in Principle and are awaiting our response.

- While some of the background work has been done and will continue, the actual Equivalency process cannot begin until each jurisdiction has a regulation in place.
- The Federal government's regulation for coal-fired electricity is in place and takes effect July 1, 2015, although the first reductions are not required until the end of 2019, when the first Alberta coal plants reach end-of-life. Further regulations for other sectors are expected to start to be rolled out in late spring/ summer 2014.
- **What is Equivalency?**
- Section 10 of the *Canadian Environmental Protection Act, 1999* (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement and order that will result in the federal government standing down a regulation under C.E.P.A. in that jurisdiction. This allows the levels of government to work together, ensures that the desired outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates.
- The jurisdiction must prove to the federal minister's satisfaction that an existing regulatory instrument is "equivalent to" the regulation under C.E.P.A., and that there exist provisions for the investigation of alleged offenses similar to C.E.P.A.'s. C.E.P.A. itself does not define what constitutes "equivalent to", but a background document on Environment Canada's website refers to achieving "the same environmental outcome". C.E.P.A. currently limits Equivalency Orders to a five year period, after which time they must be re-established. The process and Environment Canada's timelines are outlined below
- **How does it work?**
- The process begins once both jurisdictions have a regulation in force. The other jurisdiction, in this case Alberta, requests that an equivalency determination be made. This is done by Environment Canada, largely on the basis of modeled outcomes of each of the regulations.
- Once the determination has been made, an Equivalency Agreement is drafted and is gazetted by the federal government for a 60 day comment period. Once the comments have been received and any changes made, the final version is gazetted for a second time.
- At this point, on the basis of the agreement, an Order in Council is developed and a Regulatory Impact Assessment (relative to the impact of the agreement) is prepared by the federal government. This forms the rationale behind the Order in Council, which also goes through the two rounds of gazetting and, once these are completed, the order takes hold for a five year period, during which time the federal regulation stands down within the other jurisdiction.
- Environment Canada estimates that this process will take between 12 and 18 months from the moment an equivalency determination has been made. Given the most optimistic scenario, this will take us out into 2016 before the process has been completed.
- **Why an Agreement in Principle?**
- Much of Alberta's industry is driven by large, long term capital decisions. Many of these decisions are now pending, and the lack of certainty as to which regulatory regime they will be following for greenhouse gas emissions is causing some anxiety for industry stakeholders. While we will be taking all actions possible to speed the equivalency process,

Advice to (name of ADM), Assistant Deputy Minister of Environment and Sustainable Resource Development

an Agreement in Principle, signed by the two Ministers, will provide a clear and concise map of what both levels of government are intending. While not as much certainty as might be preferred, it should provide some assurance and enable decision makers to proceed with decision about major projects.

• **What are our concerns with the draft?**

- The first concern is that the emissions and emission reductions must occur within the five year time period of the Agreement. This poses some challenges for offsets and performance credits that might be used, as they do not currently have any time limitation on their use. This problem, however, may be hard-wired into the federal Act and we may not be able to address it.

24 (1) (a)

[Redacted]

- The second concern is the stated intention of the Federal government to "ring fence" the emissions from the electricity sector. This will reduce the compliance options for electricity generators, at least when making reductions to the level set out in the federal regulation.

24 (1) (a)

[Redacted]

It is possible that the primary concern for Environment Canada is that the coal fired plants reduce their emissions to 420 kilograms CO₂e/Megawatt hour or shut down as per the federal regulation. If this outcome can be assured there may be greater willingness to permit a more flexible approach for the balance of the electricity sector. It may also be that the new Minister is less concerned that the emissions reductions all come from the electricity sector. Again, we have to do some work before we can pose this question up.

Contact: Keith Denman, Air and Climate Change Policy Branch, 780-422-2832

ADM: Shannon Flint, Policy Division, 780-422-8463

Assistant Deputy Minister's use only

Decision:

- Approve recommendations
- Do NOT approve recommendations

(Name of ADM), Assistant Deputy Minister

Assistant Deputy Minister's Feedback/Comments/Instructions:

[Redacted]

Alberta's Perspective on Equivalency to the Coal-fired Power Regulation

The federal greenhouse gas regulation of coal-fired electricity requires new or end of life coal plants to physically meet a clean as gas performance standard. The equivalency template Environment Canada has advanced lays out emissions caps for the electricity sector for the period of 2015 to 2019 and 2020 to 2030.

Alberta has the following remaining items that need to be resolved before we are able to draft an agreement for Ministers' signatures:

Technology Fund and Offset Treatment:

While the federal coal regulation does not allow compliance flexibility in the form of low cost domestic reductions or access to a technology fund, the provincial regulation does allow for these. Alberta would like assurance of how these will be factored into an equivalency agreement on electricity both in terms of how reductions will be modeled in a comparison of regulations, and in how they will be recognized from a legal perspective.

Natural Gas Electricity Regulation:

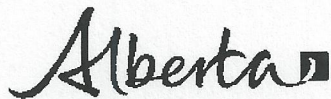
Regulation of greenhouse gas emissions for natural gas electricity generation is still forthcoming – Alberta will need to be aware of the regulation and its potential impact to the coal equivalency, as the equivalency is based on emissions across the electricity sector and not just for coal-fired electricity.

Uncertainty in Forecasting Generation and Emissions:

Environment Canada would like to use emissions forecasts originally developed for the Canada Gazette 2 Regulatory Impact Assessment, which differ from provincial forecasts of generation growth. If generation growth differs substantially from what was forecasted, it may be necessary to revisit the emissions numbers to ensure the equivalency agreement holds up to legal challenges. This would be done in cooperation with Environment Canada.

Treatment of Cogeneration:

Environment Canada has defined the electricity sector more narrowly than desired, which could lead to greater uncertainty than necessary in emissions estimates and a lack of transparency. Alberta is advocating for a discussion of how this issue can be addressed



Office of Assistant Deputy Minister
11 Floor, South Petroleum Plaza
9915 – 108 Street
Edmonton, Alberta T5K 2G8
Telephone: 780-427-1799
Fax: 780-415-9669

Memorandum

From: Dana Woodworth
Deputy Minister

Our File Reference: {Action_Request_Number}

Your File Reference:

To:

Date:

Subject: Issues to resolve for equivalency to coal fired electricity regulation

Alberta is interested in pursuing an equivalency agreement with Environment Canada in order to deliver on the outcomes of proposed federal regulation of coal fired electricity under a provincial framework however some fundamental stumbling blocks exist.

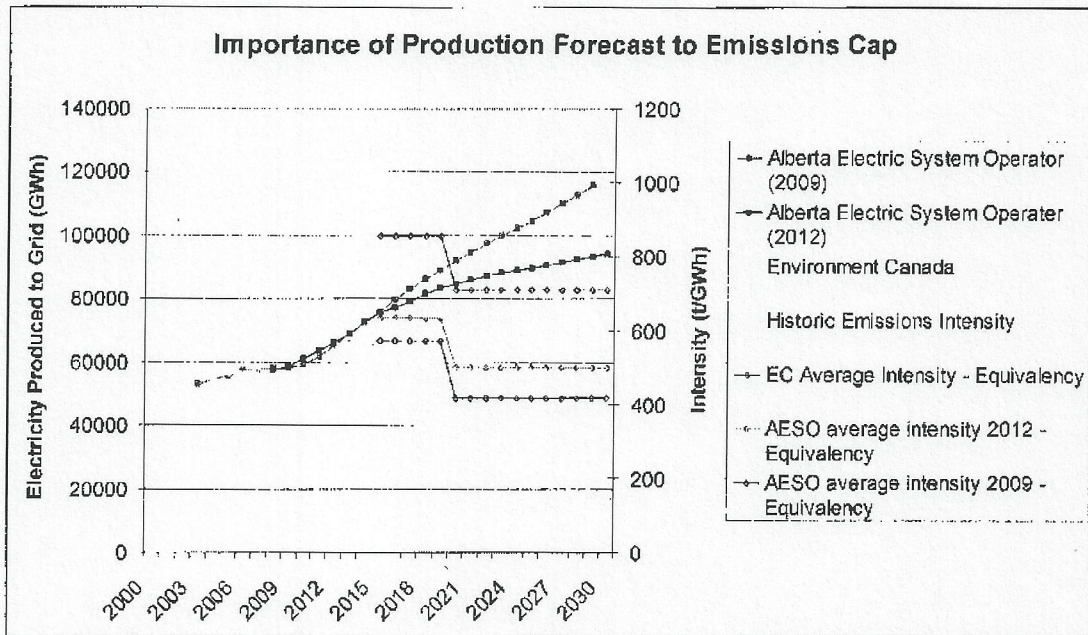
Alberta feels that the outcomes basis of equivalency is paramount. Equivalency on an outcomes basis will allow the province to deliver the sector reductions without necessarily shutting down plants on an arbitrary schedule. We are encouraged that the proposal for equivalency to the coal fired regulation reaches more broadly than the regulation and includes all electricity production to the grid allowing full access to fleet flexibility. Alberta feels this scope must extend to include industrial self generation since an open and level playing field between generators is necessary to the functioning of Alberta's electricity market.

Alberta is in the somewhat unusual position of having a number of sectors which will likely to be subject to federal greenhouse gas regulation. We feel that it is necessary to position individual sector equivalency agreements within an overarching framework that would allow emissions saved in excess of what is required in an individual sector to be recognized in another sector which is also under an equivalency agreement or banked for a future time period. This flexibility is crucial for provinces with multiple regulated sectors to efficiently deliver reductions. This approach is compatible with the likely sequencing of regulation and equivalency over several years.

The current proposed outcome for equivalency in the electricity sector is a cumulative emission cap of 236.9 Mt for 2015 to 2019 and 483.1 Mt for the 2020

to 2030 (sec. 4.1). It is important to note that the proposed Environment Canada regulation does not act as a cap on either electricity generation or emissions.

The figure below shows provincial generation as forecast by the Alberta Electrical System Operator in 2009, in 2012 and by Environment Canada. It also shows the historic generation intensity as well as average generation intensity that would be required to meet the proposed equivalency agreement under the different production forecasts.



These different average intensities imply very different compositions of generation within Alberta, very different investments by generators and very different costs to consumers.

Forecasts of future generation, especially distant forecasts, will always be uncertain and building an equivalency agreement based on a production forecast creates significant risk for both parties.

This risk could be mitigated by:

- evaluating equivalency based on average intensities in which case the implied intensities of 856 t/GWh from 2015 to 2019 and 709 t/GWh from 2020 to 2030 would be acceptable (sec 4.1)
- agreeing to a common production forecast and revisiting actual production annually to make sure it is tracking to the forecast. If the AESO 2012 forecast is used as a starting point then emissions caps of 320 Mt for 2015 to 2019 and 684 Mt for 2020 to 2030 would be appropriate under the current definition of the sector (sec 4.1).

Alberta recognizes the desire of Environment Canada to achieve some level of emissions certainty for 2020 and, consistent with this goal, feels that all low cost

domestic reductions purchased by Alberta generators in Alberta or from other parts of Canada should be credited under equivalency. This compliance flexibility is critically important to making short term reductions in sectors where capital stock turnover times are measured in decades.

The impact of sector equivalency on the Base Level Industrial Emissions Requirements also needs to be better understood. Assumed impacts on criteria air contaminants from the end of life coal regulation may not hold under provincial equivalency. Alberta would strongly prefer to continue the application of air emissions framework developed through the Clean Air Strategic Alliance rather than have mid-life BLIERs apply to existing coal plants. Perhaps some of the same equivalency principles could apply.

I look forward to working closely with you in resolving these issues which would allow us to move forward in pursuing equivalency for the electricity sector.

Dana Woodworth

Enclosure

c:

Key Messages on the Federal Regulatory Approach

- Alberta supports Canada's commitment to reduce greenhouse gas emissions and recognizes the province is an important source of potential reductions.

Cohesive and Consistent Policy Architecture:

- Under the federal government's current sector-by-sector regulatory approach, different frameworks/policy approaches are being proposed for each sector or even sub-sector. For example, the framework for some sectors allows for flexible compliance mechanisms such as access to the technology fund or to low cost domestic reductions (offset credits), while others do not.
- Alberta is advocating for a more consistent overarching policy approach to be applied across all sectors.
 - To achieve the most cost-effective policy that is also able to achieve the necessary deeper emissions reductions, Alberta is advocating for compliance flexibility for all sectors through use of offsets, inter-facility trading and provincial technology funds.
 - To ensure fair treatment across facilities, sectors and regions, Alberta is advocating for comprehensive and consistent analysis of economic and competitiveness impacts.
- Alberta supports a cohesive regulatory architecture across the economy, while allowing for individual levels of stringency or burden with consideration of respective economic and competitiveness impacts.

Achieving Reductions Across all Sectors:

- The current proposed approach for emissions intensive trade exposed sectors is focused on "achievable" performance standards. This regulatory approach will not encourage continuous improvement or innovation, and may serve to reinforce the status quo. Achieving long-term reductions in greenhouse gas emissions to meet our provincial and national targets requires commitment from all sectors to move towards a lower carbon future.

Alberta's current regulation requires a 12 per cent intensity reduction from large emitters across all sectors and has full compliance flexibility. Alberta is advocating that the national approach for these sectors should, at the very least, match the reduction currently imposed through Alberta's regulation. However, if Alberta is to achieve its own reduction commitments, it is likely that deeper reduction targets will be required.

Technology and Innovation Key to Long-term Deep Reductions:

- While Alberta understands the need to demonstrate performance out to 2020, it is imperative climate policy be viewed through a more holistic long-term lens to ensure certainty and continuous improvement over time.
- Technology and innovation are key to achieving long-term commitments. While offsets provide an important mechanism to achieve key short and medium-term reductions, only a significant investment in research and technology will bring the necessary long-term reductions to high emission intensive sectors.
- From an Alberta perspective, we want our industry to invest in their own operations to improve their emissions performance and maintain their global competitiveness. This is about attraction of capital and investment.
- In Alberta, the Climate Change Emissions Management Fund plays a key role in bridging the gap between lower cost, short-term opportunities and the deployment of transformational, long-term technologies that will lead to deep reductions.
- Lastly, alignment of greenhouse gas emissions regulations and mid-life base level industrial emission requirements (BLIERs) proposed through the national Air Quality Management System needs to be addressed.

Equivalency:

- Alberta sees potential benefits to pursuing equivalency but would emphasize the importance of equivalency on an outcomes basis

that allows provinces to employ the most appropriate regulatory tools.

- Alberta will only enter into an equivalency agreement if it allows the flexibility for the province to achieve its objectives through the most efficient and effective policy.
- Alberta will need to resolve the following items before an equivalency agreement can be settled on:
 - Assurance of how the agreement will factor in Alberta's regulation that allows for compliance flexibility (offsets, emissions performance credits, and the technology fund)
 - Information on the natural gas-fired electricity regulation – this is imperative as the emissions cap in the coal equivalency is electricity-wide
 - Assessment of uncertainty in the forecasting of electricity generation and greenhouse gas emissions, including an understanding of how the forecasted numbers will stand up to legal challenges if the actual numbers differ substantially.
 - Clear understanding of how Environment Canada will address cogeneration. While it is understood the plan is to not include cogeneration within the coal equivalency agreement, it is imperative that electricity production on grid and behind the fence face the same carbon signal to avoid disincentives for cogeneration development or other unintended consequences.

Equivalency Briefing

The goal of this Briefing note will be to affirm the aims that Alberta has in seeking an equivalency agreement(s) with Canada in regards to the federal government's climate change regulations.

What is Equivalency?

Section 10 of the *Canadian Environmental Protection Act, 1999* (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that will result in the federal government standing down a regulation under C.E.P.A. in that jurisdiction. This allows the levels of government to work together, ensures that the desired outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates. The jurisdiction must prove to the federal minister's satisfaction that an existing regulatory instrument is "equivalent to" the regulation under C.E.P.A., and that there exist provisions for the investigation of alleged offenses similar to C.E.P.A.'s. C.E.P.A. itself does not define what constitutes "equivalent to", but a background document on Environment Canada's website refers to achieving "the same environmental outcome". C.E.P.A. currently limits these to a five year period, after which time they must be re-established.

These agreements are legal documents and have their own formal process that must be followed – they are negotiated, draft versions are gazetted for comments, then the final versions are gazetted prior to coming into force. The final document that accompanies the equivalency agreement and enables the federal regulations to stand down is an Order in Council signed by both federal and provincial Ministers of the Environment – this Order is essentially a political document. The Order in Council does not necessarily expire after 5 years. Given the focus of many on the Oil Sands' greenhouse gas emissions a vigorous response from the ENGO community to any proposed equivalency may be anticipated, so it is important that the process and the result are defensible.

Among the items that will be negotiated with Canada is the number of the agreements, and whether and how the various sectors are aggregated or left separate. This document will refer to a single agreement, but recognizes that there may be more than one.

What the Federal government is proposing in its Climate Change regulations

The federal government is rolling out a sectoral approach to greenhouse gas reductions comprised of intensity-based performance standards for sectors outside of oil and gas [redacted]

24 (1) (a)

24 (1) (a)

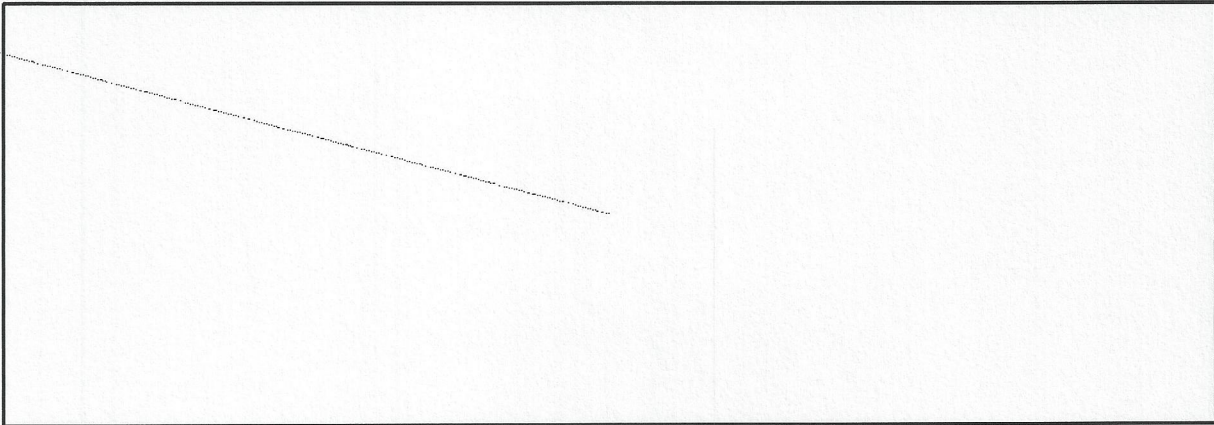
[redacted] Their system does not, as it stands currently, allow for the use of technology funds outside of the oil and gas sector, and provides for a limited use of offsets, which it describes as "low cost domestic reductions". Conversations with the various industrial sectors are underway. Alberta is participating in these conversations.

The first sector announced, and the only sector to have been completed to date, is coal-fired power generation. The regulation for this sector was gazetted in September 2012 and takes effect on July 1, 2015. It requires coal-fired generating units, at the end of a 45-50 year design life (depending on

commission date), to emit no more than 420 kg CO₂e/MWh (“clean as gas”). The same emissions standard applies to new facilities as of 2015. There is no allowance for flexibility mechanisms such as offsets or technology fund payments, though there is limited flexibility through fleet management. As Carbon Capture and Storage is the only option currently available that could achieve these levels, and as the technology is not yet sufficiently mature or cost-effective for industry to pursue, it is likely that these units will be decommissioned at the end of their design life and that no new coal facility will be built – unless at some time in the future carbon capture and storage becomes more economically feasible.

The process to establish the standards for gas-fired generation is at an early stage. The approach is based on a standard of 420 kg CO₂e/MWh, with a slightly higher standard possible for peaking plants, as yet not clearly defined. It appears as though co-generation will not be included in this regulation but would be handled through the host industrial sector (e.g. oil sands or fertilizers). This topic will be further discussed through the sectoral tables and the equivalency process.

NR



Why we would like to negotiate an equivalency agreement

1. Alberta's system works.

Alberta has been regulating greenhouse gases for a number of years through its Specified Gas Emitters Regulation. This covers a broad swath of the economy and currently includes a 12% reduction target for all large final emitters, regardless of sector. It also includes a variety of flexibility tools, including offsets, performance credits and the availability of technology fund payments (currently set at \$15/tonne). These tools allow companies to use the lowest cost reductions available to them, include non-covered activities through the offset system, and provide funding for research and commercialization of the new technologies that are needed to drive long term reductions in greenhouse gases.

Industry is familiar with Alberta's system and they have learned to meet its reporting and compliance requirements. Alberta's system has delivered significant reductions in greenhouse gases, and the funds collected have spurred research that will help meet the longer term goals of reducing the carbon footprint of the province.

An equivalency agreement could provide Alberta with the ability to continue to operate its system, and leave us a freer hand to make any changes that might come out of the current climate change strategy renewal.

2. Architectural Mis-match

The basic architecture of the federal system is not easily compatible with Alberta's existing system. The sector by sector performance standard approach is very time consuming and does not easily allow for the ongoing reductions that will be required if Alberta is to achieve its stated goals for greenhouse gas reductions. Alberta's system is designed to be scalable – the stringency of the reductions and the carbon price (as reflected in the technology fund) can be adjusted as needed without running many sectoral processes as the current federal process requires. Aligning the two systems, or trying to assist industry in working within the two systems at the same time, would be very difficult.

An equivalency agreement would leave the Alberta system in place, with some adaptations that might be required in the negotiating process. It should be noted Alberta's current system will not achieve an equivalent outcome as the proposed federal regulations for electricity and will need to be modified. NR

3. Missing Policy Drivers

One of Alberta's significant concerns with the federal approach is that it does not have any policy or economic drivers for deeper reductions in greenhouse gases, or for the major structural and technological changes that will be required over the longer term. It provides no incentives for companies to go beyond compliance with what are, for many sectors, minimal compliance obligations. The focus in the federal work is on short-term reductions that can be achieved on site.

An equivalency agreement that allowed us to run our existing system or something similar to it would maintain the drivers we have for step changes in technology and the changes that are required to reduce our carbon footprint.

4. Avoiding duplication of effort for industry

The reporting tasks and the operation of the system are known quantities for Alberta industry. In the absence of an equivalency agreement industry will have to layer on the reporting and compliance requirements of the federal system. This is not simply about filling out forms – it is about installing the control and measurement systems for steam, fuel and products that are needed to provide the data for those forms. Contracts are in place with offset providers, staff are trained in the reporting processes, and much of this may have to be redone in order to meet any new federal requirements.

An equivalency agreement would leave Alberta as the regulator and avoid a second set of reporting and compliance activities.

5. Specific Concerns with some Sectors

There are some sectors, such as electricity, for which the proposed federal system poses some real difficulties, primarily due to the lack of flexibility. Alberta's electricity system is investor owned and has different dynamics than that of other provinces. The province of Alberta is growing rapidly and the need for new generation to replace the coal plants that will be shutting down and to meet the increasing demand from industry and consumers means that Alberta will need a lot of new generation. Some of the policies that seem to be emerging from the federal system may not provide an incentive for co-generation and make some of the generation that is essential to keep the grid stable problematic. The timelines required to plan, find capital, build and commission significant amounts of electrical generation must be allowed for.

An equivalency agreement may give us the flexibility to allow the electricity sector to adjust its generation mix in realistic timelines while still meeting the greenhouse gas profile expected in the federal system.

6. Fairness and Economic Efficiency

The burden of the reductions in greenhouse gases in the federal proposal is not evenly distributed through the various sectors. Two sectors in particular: coal-fired electricity and (potentially) oil and gas bear a much heavier burden than the other sectors. While few sectors would say that they would be willing to accept a heavier burden than the federal program asks of them, we believe that all sectors should contribute to reductions, and that all sectors should have access to flexibility mechanisms, which will allow the costs to be distributed more evenly across the economy.

The use of tools such as offsets allow industry to pursue the lowest cost reductions available to them. If we assume that a tonne of CO₂e is a tonne of CO₂e no matter what the source, then allowing the use of less expensive reductions will allow for greater overall reductions for the same overall cost. At this time, Alberta's system allows for Alberta offsets only – this policy was enacted to enable flexibility and low-cost reduction opportunities but to limit capital flow outside of the Province's borders. This policy can be re-evaluated through equivalency discussions as the federal government is considering flexibility through national means such as corporate true-up.

Among our overarching policy goals is to achieving the greatest level of reductions for the least cost – an equivalency agreement may permit this.

7. Provincial Regulation of Provincially Significant Industry

In Alberta, more than most other jurisdictions, greenhouse gas policy and economic policy are intertwined. The economy of Alberta is dominated by a few industries, which are significant emitters of greenhouse gases. Decisions about the greenhouse gas management requirements will impact the costs

24 (1)-(a) for these industries.

Alberta is not comfortable leaving the future of our major industries in the hands of the federal government. One of the important goals in negotiating an equivalency agreement on greenhouse gases is to ensure that decisions that can have significant impacts on Alberta's economy should be made in Alberta.

Process we will be following

(A detailed work plan is available – this is a summary only)

As mentioned earlier, C.E.P.A. leaves the obligation on the other jurisdictions to establish that their regulation meets the conditions for an equivalency agreement, but does not give a great deal of detail as to how that is to be done. Alberta Environment and Sustainable Resource Development staff have begun a series of conversations with their Environment Canada counterparts with the goal of preparing a Memorandum of Understanding that will include items such as the following:

- The basic structure of the agreement or agreements(s)
 - i.e. single sector, single agreement or a combined document
- What constitutes “equivalent” for the purposes of this agreement and how it will be determined
- How the various sectors’ performance standards under the federal approach will be translated into the provincial system
 - Will they be aggregated or will each sector have to meet the target?
- Specific items that must be in Alberta’s regulations to assist in establishing equivalency.
- Outline of the content that will be found in the equivalency agreement

The goal is to have this part of the process completed by the end of 2013.

Once the memorandum has been prepared and signed off by senior officials at both Alberta Environment and Sustainable Resource Development and Environment Canada we will work with legal staff and Environment Canada to prepare the actual draft equivalency agreements. The equivalency process will require both the provincial level regulatory instruments that will be used to enforce the province’s greenhouse gas program and the draft equivalency agreement to be complete. Changes that are required to provincial regulations as a result of the equivalency process and the climate change strategy renewal are targeted for completion by July 2014.

The draft agreement will be gazetted and open to receive comments. These comments will be received and responded to and a final version of the agreement gazetted. The draft version should be done by the end of 2014, with the aim of having it in place prior to July 2015 when the federal coal-fired power regulation comes into force.

Equivalency Briefing note

The goal of this Briefing note will be to affirm the aims that Alberta has in seeking an equivalency agreement(s) with Canada in regards to the federal government's climate change regulations.

What is Equivalency?

Section 10 of the *Canadian Environmental Protection Act, 1999* (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that will result in the federal government standing down a regulation under C.E.P.A. in that jurisdiction. This allows the levels of government to work together, ensures that the desired outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates. The jurisdiction must prove to the federal minister's satisfaction that an existing regulatory instrument is "equivalent to" the regulation under C.E.P.A., and that there exist provisions for the investigation of alleged offenses similar to C.E.P.A.'s. C.E.P.A. itself does not define what constitutes "equivalent to", but a background document on Environment Canada's website refers to achieving "the same environmental outcome". C.E.P.A. currently limits these to a five year period, after which time they must be re-established.

These agreements are formal legal documents and have their own process that must be followed – they are negotiated, draft versions are gazetted for comments, then the final versions are gazetted prior to coming into force. The final document that accompanies the equivalency agreement and enables the federal regulations to stand down is an Order in Council signed by both federal and provincial Ministers of the Environment – this Order is essentially a political document. The Order in Council does not necessarily expire after 5 years. Given the focus of many on the Oil Sands' greenhouse gas emissions a vigorous response from the ENGO community to any proposed equivalency may be anticipated, so it is important that the process and the result are defensible.

Among the items that will be negotiated with Canada is the number of the agreements, and how the various sectors are aggregated or left separate. This document will refer to a single agreement, but recognizes that there may be more than one.

What the Federal government is proposing in its Climate Change regulations

The federal government is rolling out a sectoral approach to greenhouse gas reductions, primarily comprised of intensity-based performance standards for sectors outside of oil and gas. [redacted]

24 (1) (a)

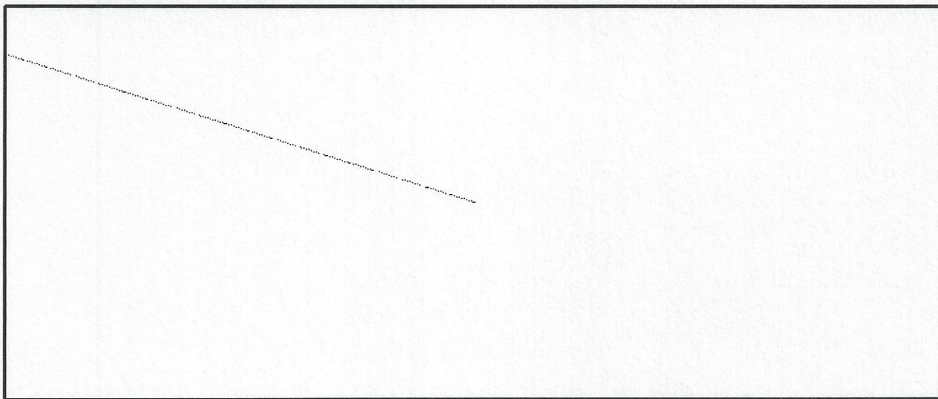
24 (1) (a) [redacted] Their system does not, as it stands currently, allow for the use of technology funds [redacted] and provides for a limited use of offsets, which it describes as "low cost domestic reductions". Conversations with the various industrial sectors are underway. Alberta is participating in these conversations.

The first sector announced, and the only sector to have been completed to date, is coal-fired power generation. The regulation for this sector was gazetted in September 2012 and takes effect on July 1, 2015. It requires coal-fired generating units, at the end of a 45-50-year design life (depending on

commission date), to emit at no more than 420 kg CO₂e/MWh ("clean as gas"). The same emissions standard applies to new facilities as of 2015. There is no allowance for flexibility mechanisms such as offsets or technology fund payments, though there is limited flexibility through fleet management. As Carbon Capture and Storage is the only option currently available that could achieve these levels, and as the technology is not yet sufficiently mature or cost-effective for industry to pursue, to a comfort level, it is likely that these units will be decommissioned at the end of their design life and that no new coal facility will be built – unless at some time in the future carbon capture and storage becomes more economically feasible.

The process to establish the standards for gas-fired generation is at an early stage. The approach is based on a standard of 420 kg CO₂e/MWh, with a slightly higher standard possible for peaking plants, as yet not clearly defined. It appears as though co-generation will not be included in this regulation but would be handled through the host industrial sector (e.g. oil sands or fertilizers). This topic will be further discussed through the process. ~~be handled through its host sector.~~

NR



Why we would like to negotiate an equivalency agreement

1. Alberta's system works.

Alberta has been regulating greenhouse gases for a number of years through its Specified Gas Emitters Regulation. This covers a broad swath of the economy and currently includes a 12% reduction target for all large final emitters, regardless of sector. It also includes a variety of flexibility tools, including offsets, performance credits and the availability of technology fund payments (currently set at \$15/tonne). These tools allow companies to use the lowest cost reductions available to them, include non-covered activities through the offset system, and provide funding for research and commercialization of the new technologies that are needed to drive long term reductions in greenhouse gases.

Industry is familiar with Alberta's system and while it would not be accurate to say that industry are all enamoured with Alberta's system, they have learned to meet its reporting and compliance requirements and, with the exception of a few glitches, the offset system is working well. Alberta's The

system has delivered significant reductions in greenhouse gases, and the funds collected have spurred a great deal of research that will help meet the longer term goals of reducing the carbon footprint of the province.

An equivalency agreement could provide Alberta with the ability to continue to operate its system, and leave us a freer hand to make any changes that might come out of the current climate change strategy renewal.

2. Architectural mis-match

The basic architecture of the federal system is not easily compatible with Alberta's existing system. The sector by sector performance standard approach is very time consuming and does not easily allow for the ongoing reductions that will be required of Alberta to achieve its stated goals for greenhouse gas reductions. Alberta's system is designed to be scalable – the stringency of the reductions and the carbon price (as reflected in the technology fund-fall-back) can be adjusted as needed without running many sectoral processes as the current federal process requires. Aligning the two systems, or trying to assist industry in working within the two systems at the same time, would be very difficult. An equivalency agreement would leave the Alberta system in place, with some adaptations that might be required in the negotiating process. It should be noted Alberta's current system will not achieve an equivalent outcome as the proposed federal regulations for electricity [redacted] and will need to be modified.

3. Missing Policy Drivers

One of Alberta's significant concerns with the federal approach is that it does not have any policy or economic drivers for deeper reductions in greenhouse gases, or for the major structural and technological changes that will be required over the longer term. It provides no incentives for companies to go beyond compliance with what are, for many sectors, minimal compliance obligations. An equivalency agreement that allowed us to run our existing system or something similar to it would maintain the drivers we have for step changes in technology and the changes that are required to reduce our carbon footprint.

4. We want to avoid duplication of effort for industry

The reporting tasks and the operation of the system are known quantities for Alberta industry. In the absence of an equivalency agreement industry will have to layer on the reporting and compliance requirements of the federal system. This is not simply about filling out forms – it is about installing the control and measurement systems for steam, fuel and products that are needed to provide the data for those forms. Contracts are in place with offset providers, staff are trained in the reporting processes, and much of this may have to be redone in order to meet any new federal requirements. An equivalency agreement would leave Alberta as the regulator.

5. Specific Concerns with some Sectors

There are some sectors, such as electricity, for which the proposed federal system poses some real difficulties, primarily due to the lack of flexibility. Alberta's electricity system is investor owned and has

different dynamics than other provinces. The province of Alberta is growing rapidly and the need for new generation to replace the coal plants that will be shutting down and to meet the increasing demand from industry and consumers means that Alberta will need a lot of new generation. Some of the policies that seem to be emerging from the federal system may not provide an incentive for decent co-generation and make some of the generation that is essential to keep the grid stable problematic. The time-lines required to plan, find capital, build and commission significant amounts of electrical generation must be allowed for. An equivalency agreement may give us the flexibility to allow the electricity sector to adjust its generation mix in realistic timelines while still meeting the greenhouse gas profile expected in the federal system.

6. Fairness and Economic Efficiency

The burden of the reductions in greenhouse gases in the federal proposal is not evenly distributed through the various sectors. Two sectors in particular, coal-fired electricity and (potentially) oil and gas bear a much heavier burden than the other sectors. While few sectors would say that they would be willing to accept a heavier burden than the federal program asks of them, we believe that something closer all sectors should contribute to reductions, and that all sectors should have access to an equal share, assisted by the availability of flexibility mechanisms, which will allow the costs to be distributed more evenly across the economy.

The use of tools such as offsets allow industry to pursue the lowest cost reductions that are available to them. If we assume (and we do) that a tonne of CO₂e is a tonne of CO₂e no matter what the source, then allowing the use of less expensive reductions will allow for greater overall reductions for the same cost. Among our overarching policy goals is to achieving the greatest level of reductions for the least cost – an equivalency agreement may permit this. At this time, Alberta's system allows for Alberta offsets only – this policy was enacted to enable flexibility and low-cost reduction opportunities but to limit capital flow outside of the Province's borders. This policy can be re-evaluated through equivalency discussions as the federal government is considering flexibility through national means such as corporate true-up.

7. Time-frames

The federal program has a very short time frame, and does not include policy drivers for ongoing reductions. The labour intensive process of negotiating performance standards and on site reductions will only take us out five or ten years, and will have to begin once again if there are to be further reductions. Alberta needs to look out to 2035 and 2050 for deep changes in our carbon-intensive economy, and the federal system could make that difficult. We hope that an equivalency agreement will enable policy drivers for the step changes in emissions that will be needed.

Comment [NS1]: I'm not sure what the issue is here – I suppose it is the short-term life of CEPA regulations and no long-term plan for deep reductions – if this is it can we be more clear??

Comment [NS2]: I don't understand what this means? What time frame is short? CEPA?

8. Provincial Regulation of Provincially Significant Industry

NR

In Alberta, more than most other jurisdictions, greenhouse gas policy and economic policy are intertwined. The economy of Alberta is dominated by a few industries, which are significant emitters of greenhouse gases. Decisions about the greenhouse gas management requirements will impact the costs for these industries.

Alberta is not comfortable leaving the future of our major industries in the hands of the federal government. One of the important goals in negotiating an equivalency agreement on greenhouse gases is to ensure that decisions that can have significant impacts on Alberta's economy should be made in Alberta.

Process we will be following

(A detailed work plan is available – this is a summary only)

As mentioned earlier, C.E.P.A. leaves the obligation on the other jurisdictions to establish that their regulation meets the conditions for an equivalency agreement, but does not give a great deal of detail as to how that is to be done. Alberta Environment and Sustainable Resource Development staff have begun a series of conversations with their Environment Canada counterparts with the goal of preparing a Memorandum of Understanding that will include items such as the following:

- The basic structure of the agreement or agreements(s)
 - i.e. single sector, single agreement or a combined document
- What constitutes "equivalent" for the purposes of this agreement and how it will be determined
- How the various sectors' performance standards under the federal approach will be translated into the provincial system
 - Will they be aggregated or will each sector have to meet the target?
- Specific items that must be in Alberta's regulations to assist in establishing equivalency.
- Outline of the content that will be found in the equivalency agreement

The goal is to have this part of the process completed by the end of 2013.

Once this document has been prepared and has been signed off by senior officials at both Alberta Environment and Sustainable Resource Development and Environment Canada we will work with legal staff and Environment Canada to prepare the actual draft documents. The equivalency process will require both the provincial level regulatory instruments that will be used to enforce the province's greenhouse gas program and the draft equivalency agreement to be complete. Changes that are required to provincial regulations as a result of the equivalency process and the climate change strategy renewal are targeted for completion by ~~September~~ July 2014.

The draft agreement will be gazetted and open to receive comments. These comments will be received and responded to and a final version of the agreement gazetted. The draft version should be done by the end of 2014, with the aim of having it in place prior to July 2015 when the federal coal-fired power regulation comes into force.

DRAFT – for discussion purposes only

Considerations for Equivalency between Government of Alberta and Government of Canada

Purpose of Equivalency Agreements

General as set out in CEPA (relevant section(s))

Section 10 of the Canadian Environmental Protection Act, 1999 (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that forms the basis for an equivalency order that will result in the federal government standing down its regulation in deference to that of the applicable jurisdiction. This is done in order to allow the two governments to work together, ensures that the desired environmental outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates the activity.

The non-federal jurisdiction must demonstrate, to the satisfaction of the federal Minister of the Environment, that their existing regulatory regime has equivalent provisions to that of the relevant C.E.P.A. regulation. In this case there will be several federal regulations relating to the management of greenhouse gases in various sectors. How the Province of Alberta will address these regulations and what constitutes equivalent outcomes is set out in this document

Specific to GHG emissions in Alberta

Alberta has an existing greenhouse gas regime in place, through its Specified Gas Emitters Regulation. Alberta's regulation includes an economy wide intensity reduction requirement for all large final emitters (currently defined as emitting more than 100,000 tonnes GHGs) and a variety of compliance flexibility tools, such as offsets, performance credits and a technology fund. Alberta's regulatory system has worked well. Government and industry have learned how to handle the reporting and administrative tasks associated with the system, and it has led to significant reductions in greenhouse gases at the covered facilities, across the economy through the offset system, and generated a pool of funds that are being used to spur innovation for long term reductions in Alberta's carbon footprint. Although we recognize that there may need to be some adaptation to align sufficiently well to achieve equivalency with federal regulations, Alberta would like to retain the ability to manage the province's greenhouse gas emissions through its existing regime. In order to achieve equivalency, Alberta will need to modify the SGER.

What constitutes "equivalent"

Achievement is based on total GHG emissions

In both the federal and provincial regulatory regimes, the overarching purpose of the regime is to reduce emissions of greenhouse gases. While C.E.P.A. does not define "equivalent provisions", for the purposes of this agreement it will be defined as the total greenhouse gas (CO₂e) emissions from the sector(s) covered by the agreement and order,. The target numbers will be a mutually agreed to

number of tonnes based on the federal proposed intensity standard and an assumed level of production at the covered facilities.

Facility Grouping

The current state of negotiations for the federal regulatory regime indicates that there will be three groupings of facilities:

- The electricity sector, currently covered by the federal coal regulation but with gas and other electricity generation to be included,
- The oil and gas sector, including both upstream and downstream activity, and,
- Emissions Intensive Trade Exposed sectors such as chemicals, cement, fertilizer, etc.

The agreement will be based on aggregate numbers for each of the three sectors. As some of the sectors are nearing agreement on the federal intensity based performance standards while some sectors are only in the early stages, it will be important to have a process by which additional facilities and their corresponding targets are incorporated into the agreement and order without re-opening the previously agreed to sectors. This is important as it will provide the stable regulatory environment needed by capital intensive industries.

Economic Assumptions Trigger

Translating intensity based performance standards into a hard number of greenhouse gas emissions requires assumptions about the level of activity in the covered sector. Discussions with industry about possible future activity, economic modeling and other tools can provide a reasonable basis for this assumption, but reality does not always cooperate. If the production (or level of activity as defined in the federal performance standard) is either greater or lesser than the assumptions that have been agreed to by both governments in setting the emissions number, then the agreement should provide for the target for that sector or sectors to be renegotiated without re-opening the entire agreement. The threshold for this renegotiation will be agreed to in advance. This will avoid either an excess of emissions available in the system or constraints on economic growth despite the facilities all meeting the federal performance standards.

Timing

The current wording in C.E.P.A. limits equivalency orders to a five year period. This time period is not sufficient to provide a stable regulatory environment. Changing this time period would require amendments to C.E.P.A. that are unlikely to take place in the near future. In light of this, wording should be included similar to that found in the agreement with Nova Scotia for the coal fired power sector that sets out notional targets for the longer term and commits to a negotiating in good faith to renew the agreement.

Measurement and Reporting

In the existing equivalency agreement between Ottawa and Alberta (related to pulp mill effluent) there is a letter sent each year to a contact at Environment Canada stating that the emissions at Alberta mills remain within the agreed to parameters. There is no detail provided about the specific mills and emissions. In the case of greenhouse gases, there is already a program to report them through the "one window" approach, and, given the level of interest by stakeholders in this issue a more fulsome report would be appropriate. Some details will be required on the quantification methodologies for specific activities, and a format and timelines will need to be agreed to.

I would suggest that an annual roll up report be proposed, with the emissions grouped according to the groupings that may exist in the agreement. This would be prepared by a set date in the year (coinciding with Alberta's reporting date - July 1?), and would be signed by the Director of Air and Climate Change branch. This would be a chart with gross emissions from the sector, compliance options used (offsets, EPCs and technology fund payments) and total net emissions. If needed the total to date during the five year term of the equivalency agreement could also be provided. There would be a proviso that Environment Canada could request further detail. This report would likely be two pages.

Technology Funds

In the Alberta system all facilities have the option of using payments to the Technology Fund as a compliance option. As Alberta's system provides greater flexibility for compliance, it also provides less certainty of reductions in the sector. Modeling for fund payments needs to be negotiated so both parties are satisfied with the calculations leading to the agreed upon environmental outcomes.

Banking outside of five-year period

The offsets and performance credits in the current Alberta system do not expire or lose value over time. The federal government has proposed the limited use of banking of performance credits in its sectoral discussions. A strict application of the five year time period for the equivalency order may complicate the use of tonnes banked from previous time periods. This may make it difficult to manage compliance in year six if industry is relying on credits from the previous year. As one of the goals of equivalency is keeping the compliance process simpler for industry it will be difficult if they have to track the vintage of credits in some years but not others. Some resolution to this would be helpful.

One means of handling this would be to state that offsets are considered to be applicable in the year and the sector in which they are used.

Use of offsets, accounting, corporate true up

Alberta's proposal for offsets and performance credits is set out above. Corporate true up is a major flexibility component of the proposed federal regulations. If this moves forward, the question of how it would apply (or not) through provincial equivalency needs to be determined. Modeling the effects of expected corporate true up may come into play. In addition, further work will need to be done on

provincial boundaries. Alberta will need to determine if it will allow offsets from other provinces., and as the national system develops there may be more reasons to encourage this.

Termination of agreement

Both the federal and Alberta governments have the right to withdraw from this agreement upon appropriate notice, but some wording ought to be included stating under what conditions this might occur, and what timelines might be given to industry to adjust their actions and compliance strategies to adapt to the new rules under which they would be expected to operate.

GHG Sectoral Regulations

The federal government is continuing to develop greenhouse gas regulations on a sectoral basis and is currently working on the oil and gas sector regulations.

Alberta has an interest in remaining the regulator of provincial greenhouse gas emissions. Staff are working to understand the potential to reach equivalency agreements for federal regulations. Many details remain to be worked through. We anticipate that by the end of the year, both parties will have a clear understanding of the process. Alberta's goals for equivalency include greater compliance flexibility including the use of offsets to involve a broader swath of the economy in reducing greenhouse gases, performance credits to incent behaviour beyond compliance, and the use of a technology fund to drive the research and development needed to reduce our greenhouse gas footprint beyond what can be done with current technology.

Alberta is looking at updates to its regulations in order to achieve its provincial 2020 commitments of megatonnes below business-as-usual, as well as to support outcomes required under equivalency. We are aiming to have proposed changes which will be shared with Environment Canada as part of the equivalency discussion in spring 2014.

Suggested messages:

- Alberta appreciates the collaborative approach adopted in developing greenhouse gas regulations for oil and gas and looks forward finalizing this work.
- Alberta would encourage Environment Canada to adopt some of the compliance flexibility being considered for oil and gas in other sectors under regulatory development as this would lead to greater cost effectiveness of reductions and greater scalability of these regulations in future.
- Efficiency of regulatory approach is crucial when requiring significant reductions.

Fed/Prov Status update

Environment Canada has been running a number of processes to establish intensity based greenhouse gas emissions targets for various sectors and, in some cases, sub-sectors. These standards will be implemented by a federal regulation under the Canadian Environmental Protection Act. The regulation for coal fired electricity is already in place, [REDACTED]

NR

[REDACTED] For many sectors Environment Canada is proposing minimal reductions and allowing little compliance flexibility – the focus of the sectoral discussion have been on site emission reductions.

Alberta, along with a number of other provinces and Industry representatives, has been participating in these tables. Alberta has some significant concerns about this approach and is working to improve the outcomes of these processes. Our intention at this time is to establish an equivalency agreement that will allow Alberta to remain the regulator for this activity within the province.

Main GHG points

Equivalency

The Canadian Environmental Protection Act allows other jurisdictions to establish equivalency agreements with Canada, which would permit the federal regulation to be stood down within that jurisdiction in deference to the jurisdiction's regulation. This requires that the regulations are deemed to result in an equivalent outcome. The Act does not define the criteria by which equivalency is determined, although some background documents on the Environment Canada website refer to equivalent environmental outcomes.

Alberta is beginning negotiations with Environment Canada staff on an agreement (or agreements) that would allow Alberta to regulate greenhouse gases within the province. We are hoping through this to allow greater flexibility to continue to operate our system which we believe provides greater flexibility to Industry to find the most economically efficient reductions available and includes policy drivers for longer term deeper reductions through the use of the technology fund.

The federal coal fired electricity regulation is in place and will be applied starting in July 2015. In order to provide some certainty for Alberta's electricity generators we hope to have an equivalency agreement in place prior to that date.

Updating strategy and Regs

BACKGROUNDER

Substantive Equivalency Between Canada and Alberta Greenhouse Gas Emissions

Addressing GHG management and climate change requires a National effort. Alberta can show further leadership by adopting federal targets and negotiate openness to tech funds, \$ from the federal government for CCS and accelerated capital depreciation considerations. These actions provide clarity for Alberta industry and communities. Notwithstanding Alberta's concerns about federal targets and strategies, a strong commitment by Alberta to work more collaboratively is needed.

The federal government has set a target for Canadian industry to reduce GHG emissions from today's levels by 20% by 2020. This is essentially a 20% reduction target on all existing facilities and a total caps emissions from any new facilities.

Alberta analysis indicates that this is not possible without serious economic harm to some sectors (e.g. forestry) and a major purchase of credits from the rest of Canada for other sectors (e.g. oil sands).

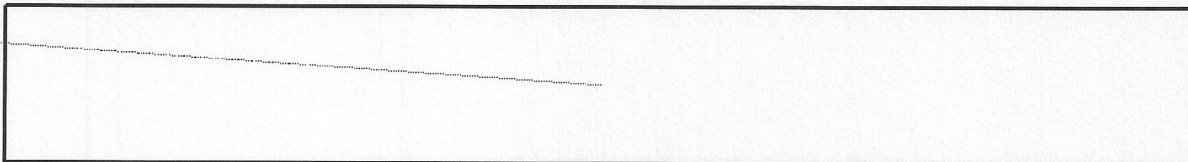
The following are suggested policy changes for the current Alberta system. These changes alone will likely not achieve the federal overall target, but are intended to signal a more serious effort by Alberta in that direction – sufficient enough to form the basis of an agreement to ensure it is Alberta, not federal legislation that applies in the province.

The suggested policy changes are about buying some time to allow the federal government to assess the reasonableness of their overall 20% target and shift the focus of the discussion on 'equivalency' away from matching arbitrary targets to achieving realistic emission reductions through technology implementation.

This approach reflects the reality that in the short term, the focus of the climate change policy is to signal future investment expectations and to generate funds through reasonable targets to support investment in step-change technologies such as carbon capture and storage. These funds would be supplemented by contributions by government to close the price gap. Potential breakthroughs in technology (carbon capture and storage becomes commercially viable, nuclear fusion) could deliver the reductions outside of this framework.

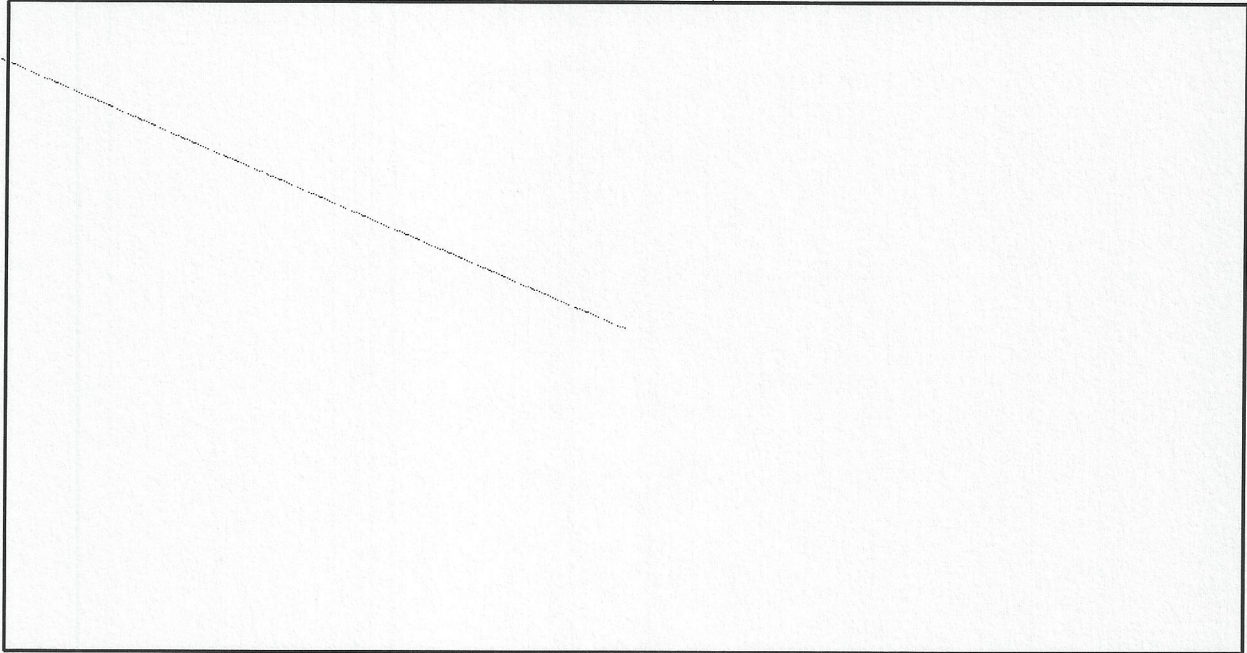
No formal discussions with industry or the federal government have taken place about these changes and the potential implications. The changes do reflect advice received from representatives of the oil and gas and electricity sectors.

NR



These changes and the associated agreement with the federal government could result in some sectors in Alberta having easier targets than operations in other provinces, and others having more stringent requirements. Alberta's proposed shifts will have stronger traction if adopted by other jurisdictions.

NR



CURRENT ALBERTA REGULATIONS

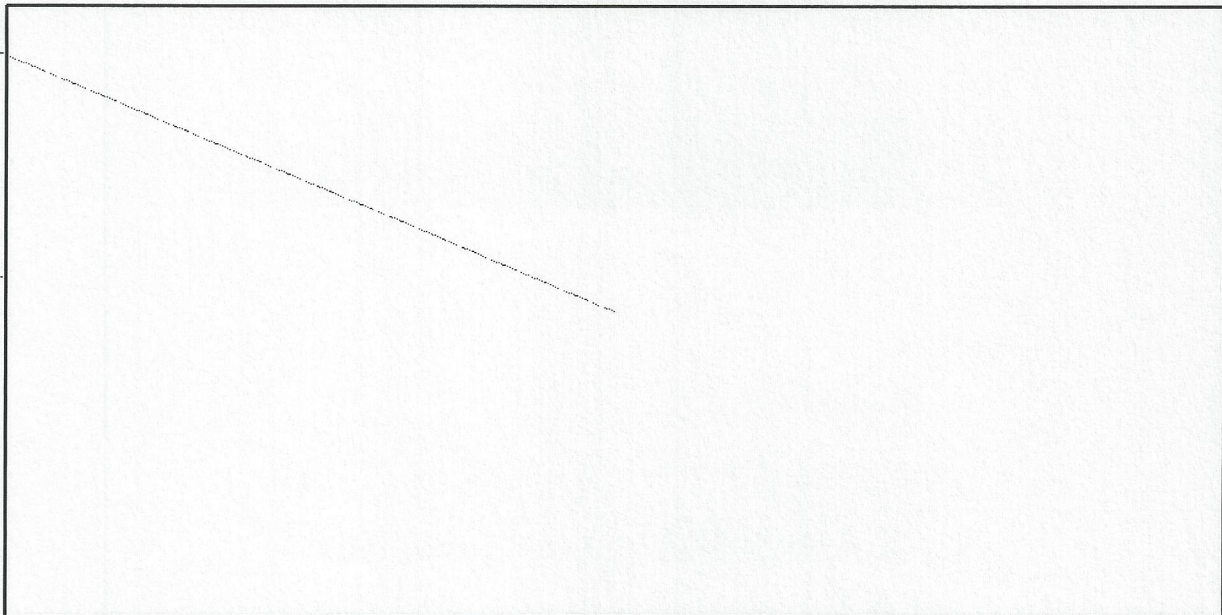
- 12% emissions intensity target for all industrial sectors starting in 2007
- 3 year phase in for new facilities, then a 2% annual increasing target towards 12%
- Unlimited access to a technology fund
- Payment in to the technology fund set at \$15 per tonne
- Coverage of large facilities for all sectors (100,000 tonne threshold)
- Proposed carbon capture and storage requirements for new facilities

Alberta Estimates of Provincial Outcomes

- Reduction of 30 million tonnes from projected 2020 emissions (*an estimated \$1-2 billion annual compliance cost – most towards technology*)

24 (1) (a)

NR



NR

24 (1) (a)

POTENTIAL IMPACTS IN 2015

NR

| System | | Cost Per Kilowatt Hour | % of Current Market Price |
|-----------------------|--|---------------------------|------------------------------|
| Alberta – Current | | \$0.002 | 0.02% |
| Alberta – With Shifts | | \$0.005 | 0.1% |

OTHER CONSIDERATIONS TO NEGOTIATE

24 (1) (a), NR

NR

Enhanced Federal Cooperation

- National support for carbon capture and storage
 - Provision of Federal funding
- Use of accelerated capital cost allowance and other fiscal tools to support enhanced greening of capital stock
 - Use of appropriate federal tax levers
- Appropriate lead times for implementation of green technologies
 - Streamlining of Federal environmental review processes

Federal/Provincial Coal Issues analysis

This paper is an attempt to explain, in non-technical language, issues that are currently being faced by the coal-fired electricity generators in the province.

Coal-fired power has many advantages, not the least of which is the availability of huge coal resources at cheap cost, but it is not as clean as other forms of generation. As a result, coal currently faces both existing obligations through provincial GHG and air pollution policies and much harsher and potentially devastating new requirements from the federal government's GHG and air quality initiatives. The Government of Alberta needs to determine how its interest can best be maintained in the face of these challenges.

The issues in this paper have been studied at a significant level of detail, and further work on the economic, environmental and electricity grid impacts of the policies under consideration are available. This document has chosen to eschew the detailed analysis in order to provide the broad policy picture. It is the cumulative impact of the various policies that has the potential to adversely impact Alberta's electricity system.

Context and Key Initiatives

Electricity sector basics

The system used to produce and deliver electricity is big, expensive and complicated, yet the product cannot be stored or borrowed, and varies wildly in price during the course of a month. (e.g. prices in Alberta during September 2012 have varied between \$10.88 - 648.87 per MWh). Most of us only pay attention to it when it isn't there. All of these things matter in the discussion about the current federal regulation initiatives in the electricity sector.

Electricity in Alberta is generated in coal and gas fired thermal plants, wind farms, hydro dams, biomass units and solar panels. Alberta's coal units provide much of the "base load", the foundation if you will, of the electricity system. Power is fed into the provincial grid and delivered to end users over an enormous system of wires, switches and transformers. The amount of electricity in the system must be balanced to within a very small margin continuously – the amount used and the amount generated must match up or else the system will "trip" or there will be brownouts.

The Alberta Electric System Operator (AESO) operates the overall transmission system, dispatching units on and off the system 24 hours a day to ensure that use and generation match. In Alberta's deregulated marketplace the order in which the units are turned on and off is based on

Alberta Generation Capacity as of Sept 2012:

| |
|------------------------------|
| Coal: 6286 MW |
| Gas: 5733 MW |
| Wind: 939 MW |
| Hydro: 894 MW |
| Other: 404 MW (c.g. biomass) |

price. Generators bid into the system, offering a certain amount of power at a price. The AFSO uses the “stacking order” based on these bids, to decide which sources to draw upon. No generator is guaranteed a price or a market for their power.

A final note about the electricity sector in Alberta is that the price paid by most individual consumers is a fairly direct flow-through of the pool price, so changes that impact the power supply or costs will be felt fairly quickly by consumers.

Power Purchase Arrangements (PPAs)

When Alberta deregulated its electricity system in 2000, among the tools it employed to assist generators in transitioning to the new system were PPAs. Recognizing that the generators had made large capital investments based on the presumed revenue stream from a regulated system, the PPAs allowed the power supply from existing coal plants to be sold on the basis of an agreed-to set of costs, including both fixed capital and variable operating costs. Coal plants built since 1998 do not have PPAs. The purchasers of the PPAs can use the power themselves or resell it into the competitive market. The PPAs include clauses that provide for the handling of additional costs resulting from “force majeure” events or changes in the law. These costs may be passed through to the PPA buyers, although the definition of what constitutes a “change in law” has been the subject of considerable debate – not surprising given the sums of money involved. The PPAs begin to run out in 2013, with most of them ending by 2020.

CASA Electricity Project Team (EPT)

In 2002, in response to ongoing rancorous public debate about the Genesee power plant expansion, the Alberta Government asked the Clean Air Strategic Alliance to work with stakeholders to develop an overall emissions management framework for the electricity sector in Alberta. The CASA project team, which included the electricity industry, industrial users, CAPP, PPA buyers, ENGOs and various levels of government including Environment Canada, was able to come to consensus on a comprehensive set of recommendations. The Alberta Government agreed with all of the recommendations, which have formed the basis of Alberta’s management of emissions from the electricity sector for almost ten years.

Among the central pieces of the agreement was the concept of “Design Life” for coal plants, which was established as 40 years or the expiry of the PPA on the plant, whichever was longer. (e.g. Battle River 3’s design life is 44 years.) This allowed the PPA buyers to be spared the retrofit costs for NO_x and SO₂ controls, although, as part of the CASA agreement, mercury controls were installed during the life of the PPAs. There was also recognition that, due to the size of the coal fleet and the need to maintain a stable electricity supply, some flexibility was needed to ensure that the refits required for the coal plants could be staggered. An emissions trading system for NO_x and SO₂ was agreed to and has been implemented. The system allows reductions in emissions over and

above requirements at one unit to be moved around to extend the life of other units. This enables generators to minimize the cost and impact to the system while ensuring that the overall emissions are reduced by the agreed to amount. When units reach 50 years they will be required to refit to meet the emissions standards of that time.

This framework, by providing both the certainty and timelines desired by industry, the assurance of major reductions in air pollutants desired by ENGOs and less acrimonious public debate and growth in the electricity sector desired by governments, has been a great success. Recent efforts by Environment Canada on both the GHG and air quality front (described below) have the potential to disrupt the framework dramatically and place the stability of the electrical system in jeopardy.

National Air Quality Management System (AQMS)

The current federal government rolled out its initial attempt at air quality management under the Canadian Environmental Protection Act in 200X. Their first system included significant reductions based on sector based emission caps, with trading allowed within sectors. The provinces were not happy with this proposal, which was regarded as a significant intrusion into areas of provincial jurisdiction as well as a poorly designed response to local air quality issues. In response, a small group of ENGO, government and industry members met and developed an alternative proposal that was well received within the Canadian Council of Ministers of the Environment (CCME).

The current federal/national system is loosely based on the work of that group, but includes some significant changes. The CCME Ministers will be meeting in Lake Louise in October and are expected to sign off on the national AQMS. It needs to be noted that Alberta has some very serious reservations about some of the details which have yet to be finalized. There are a few key pieces in the national AQMS:

- **Canadian Ambient Air Quality Standards (CAAQS)**
 - The initial CAAQS are PM and Ozone standards that are more stringent than the current standards.
 - Other pollutants may be added in the future.
 - There is an expectation that all areas will be managed to remain under the CAAQS, and that increasingly stringent steps will be taken as areas approach the CAAQS.
 - Alberta has no problem with the current proposal on CAAQS.

- **Base Level Industrial Emission Requirements (BLIERS)**
 - A minimum performance standard for various sectors and types of equipment. They would be established as regulations under CEPA (federal).
 - The provincial government wants to use the CASA EPT framework as the basis for BLIERS in the coal sector. The federal government has been pushing hard for “mid-life BLIERS” for the coal fired electricity sector.

These would be a major departure from the EPT framework, and fall within the lifetime of the PPAs.

- In addition to the economic challenges they would pose, Alberta believes that the timelines set out for mid-life BLIERS are unachievable due to the engineering and construction challenges. They could result in a large portion of Alberta's generation being offline at the same time and potentially put the grid's stability at risk.
 - The BLIERS impact on the coal sector is exacerbated by the short time in which the generators are able to pay for the upgrades before their units are retired due to the impact of federal GHG regulations.
 - The work on BLIERS for various sectors and equipment is ongoing and may take several years to complete. The federal government has been working with multi-stakeholder groups on the BLIERS but has not shown a great deal of flexibility.
 - This is a BIG issue for Alberta and needs to be addressed as it has the potential to cause significant cost and disruption to Alberta's electricity supply.
- **Air Zones**
 - The AQMS includes both larger inter-provincial air zones that are intended to respond to cross-boundary air issues and smaller zones with the provinces that are used to manage air quality with the goal of remaining with the CAAQS.
 - Alberta has no problem with the Air Zones-based approach and is looking to align its zones based in part on the Land Use Framework planning regions.

GHGs and Coal

Coal-fired electricity generation is a major source of GHGs. To be effective, a climate change framework will have to include significant reductions from the coal-fired electricity sector. In the absence of significant technological breakthroughs or a carbon price signal that makes Carbon Capture and Sequestration (CCS) a viable option it will be difficult to make big reductions in the GHG emissions from coal fired plants.

Alberta's plans for coal fired generation hinged on the adoption of CCS, but the high costs of CCS and the low price for both carbon and natural gas have made its adoption in the electricity sector unlikely. Future development of coal fired generation will likely come only after major breakthroughs in technology coupled with a significantly higher carbon price, or the abandonment of carbon reduction policies. Alberta's coal plants are likely to be replaced with natural gas fired generation.

The federal government's "Gazette 2" regulation for the electricity sector sets a target for the coal sector that is "clean as gas" – 420 kg CO₂E/MWh. There have been some changes to the regulation that ease some of Alberta's concerns, (adding some limited

flexibility, five years to the design life, added time for units that do decide to install CCS), but **the effect of the regulation will be to shut down Alberta's coal-fired plants and replace them with gas.** Under the federal regulation Units will begin shutting down in 2020, with much of the generation gone by 2030. Keephills 3 and the Genesee and Sheerness plants will be the last ones off the system as they are the most recent units on.

Alberta is considering signing an equivalency agreement for the electricity sector, which would establish Alberta's commitment to the outcomes of the federal regulation and ask that the federal government stand down the relevant sections of CEPA within the province in deference to Alberta's regulations, but until some significant concerns are addressed it will be difficult to recommend signing.

There are a number of concerns that arise from the federal government's approach, not the least of which is the lack of information about the federal government's requirements for the balance of the electricity sector and the lack of flexibility mechanisms. The federal government has set an overall carbon cap for the electricity sector, and therefore any concession on coal units will have to be made up in the rest of the sector. The federal government seems firmly entrenched in a "reduction within the sector" approach that does not work well in the Alberta context.

In addition to these concerns, it has been noted that the federal government's sector-wide cap of XXX Mtonnes/year has been based on a slow growth trajectory for the Alberta power sector (283 PJ in 2020). Alberta does not share this forecast, preferring the AESO's higher load forecast (XXX GWh in 20XX). Any equivalency agreement that is reached will need to include a clause providing for an adjustment in the overall cap if the growth exceeds that forecast by the federal government.

Cumulative impacts: mid-life BLIERS, PPAs, GIIGS and the CASA Framework

The CASA FPT Framework was the product of two years of hard negotiating by a number of parties, including the federal government. It has proven itself over time and continues to be the Alberta Government's guiding principles in managing the emissions from the electricity sector. Its handling of the concerns of the PPA holders has been an important aspect of its success in Alberta's deregulated system.

The federal government's insistence on mid-life BLIERS may result in the abandonment of the framework and potentially the collapse of a number of the existing PPAs due to the addition of major costs to them through the "change in law" provisions. While this might make it easier for the generators to pass on these costs, the unanticipated added costs that would be handed on to the PPA buyers may make the PPAs no longer viable and they could be turned back in to the Balancing Pool. The Department of Energy is doing some analysis to better understand who could be held responsible for which costs, and how they might be expected to react. Even in a best case scenario it will add significant costs with little or no environmental benefit when compared with allowing the CASA framework to constitute the BLIERS for the Alberta electricity sector.

The combination of the federal GHG regulation with the mid-life BLIERS could potentially be devastating, as it would require the generators to refit their plants in 2015 yet allow them only a very short time frame in which to recoup the costs of the refit before they have to shut down due to the GHG regs.

In the face of this, a number of generators have been asking that they be relieved of their obligations under the CASA framework, as the impending shut down due to the federal GHG regulations will reduce the time period in which they have to meet and amortize the costs of not only the CASA EPT requirements but also the mid-life BLIERS.

Key Policy Goals:

Room to Grow:

Alberta has been fortunate to be endowed with tremendous energy resources. Alberta's economy is booming and there are reasons to believe that this growth will continue for the foreseeable future. Future growth in the energy sector will require Alberta to demonstrate to its potential customers and to the people whose lands are traversed by the pipelines we need that we are willing and able to reduce our carbon footprint.

The challenge for Alberta is to do that in the midst of an economy and a population that is growing well ahead of the national average. We will need electricity for both industrial and consumer use, yet we do not have the geography for large hydro development. We have been a leader in the field of wind generation, yet the bulk of our power needs will be made by fossil fuels for the foreseeable future.

- **While Alberta agrees with the broad goal of reducing the nation's carbon footprint, this must be done in a way that will allow for growth in Alberta's electricity supply and overall economy.**

Stability of the Grid

As indicated above, the electricity system requires careful tending, and major changes in the supply of electricity can have a big impact on the stability of the system. The proposed refits for both GIIGs and mid-life BLIERS are not trivial tasks – they require a lot of engineering and construction expertise. These are, coincidentally, the same skill sets that the Oil Sands companies are in the market for. There is a good chance that the timelines may not be achievable no matter how many dollars are spent.

There is a certain amount of contingency reserve available for emergency outages, and the system has adapted to large units being off line due to repairs or shorter term issues, but the proposed time-lines for the mid life BLIERS (in particular) cannot be achieved without taking too many units off the system at the same time.

- **Federal policies must not place the stability of Alberta's electricity system in jeopardy. This will require more flexibility than the current policies allow for.**

Compliance Flexibility

Effective environmental policy should allow for the most efficient solutions that meet the stated environmental outcomes. There is a wide range of marginal abatement costs in the Alberta economy, and tools that allow for reductions to be made at the lowest cost per tonne should be a key element in the regulatory system.

The federal GHG regulation for the electricity sector does not allow for any flexibility mechanisms outside of the sector itself, nor does it allow credits for performance beyond requirements or investments in tech funds that would enable transformative change.

- **Federal Policies should not restrict compliance options in a way that will increase the cost of achieving outcomes or discourage the transformative changes needed to significantly reduce Alberta's carbon footprint.**

Disagreement over Forecast growth

The growth forecast used by Environment Canada in setting the sectoral cap for electricity is smaller than the forecast that is used by the AESO. This issue has been brought to the federal government's attention but they have been unwilling to adjust their forecast. While both numbers are educated guesses about what will occur, we believe that the AESO are more likely to have a realistic picture of what lies ahead.

- **Any Equivalency agreements with the federal government must include a clause that will allow for an adjustment to the overall sectoral cap if the actual growth in the sector differs from the forecast used in setting the cap.**

Affirm the EPT framework

The EPT framework has provided a solid foundation both economically and environmentally for the regulation of the electricity sector, and its broad base of support within industry, government and ENGOs has bought a relatively peaceful time. While Industry can make a case that some of the conditions in which they operate have changed in material ways, the government should be wary of requests to set its requirements aside, as all parties to the agreement should be involved in the discussion. A decision to set some of its requirements aside would likely result in an angry response from the ENGO community at a time when Alberta's "social license to operate" is viewed warily by many.

- **The government of Alberta should clearly state its continuing support of the EPT framework and its intention to rely on its timelines and standards in regulating the electricity sector.**

Process forward:

- Seek Clarity on issues of concern for Alberta from the Feds (underway). This should include sounding out what they are willing/able to move on at the staff level and what they aren't. Some issues may need to be elevated to the political level to get confirmation of the items that have been deemed off the table by federal government staff. This includes in-sector only emissions reductions and mid life BLIERS for coal plants.
- Meet with Industry to discuss overall impacts of:
 - a. Federal GHG regulation
 - b. Mid-life BLIERS
 - c. PPAs
 - d. CASA EPT framework
- Determine the critical needs for Alberta
 - a. Electricity system MUST be viable and include room for growth in Alberta economy
 - b. Environmental requirements can be tough but should not push Industry into insolvency – reasonable lead times and amortization for investment in technology must be allowed for (a problem with BLIERS and GHG shut-down)
 - c. Alberta will regulate industries that are critical to the province's economy, such as the Energy industry.
- Work with IIR, AESRD and Energy to determine the most appropriate negotiating stance and approach to meet Alberta's needs.

Equivalency Briefing note

The goal of this Briefing note will be to affirm the aims that Alberta has in seeking an equivalency agreement(s) with Canada in regards to the federal government's climate change regulations.

What is Equivalency?

Section 10 of the *Canadian Environmental Protection Act, 1999* (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that will result in the federal government standing down a regulation under C.E.P.A. in that jurisdiction. This allows the levels of government to work together, ensures that the desired outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates. The jurisdiction must prove to the federal minister's satisfaction that an existing regulatory instrument is "equivalent to" the regulation under C.E.P.A., and that there exist provisions for the investigation of alleged offenses similar to C.E.P.A.'s. C.E.P.A. itself does not define what constitutes "equivalent to", but a background document on Environment Canada's website refers to achieving "the same environmental outcome". C.E.P.A. currently limits these to a five year period, after which time they must be re-established.

These agreements are formal legal documents and have their own process that must be followed – they are negotiated, draft versions are gazetted for comments, then the final versions are gazetted prior to coming into force.

NR

Among the items that will be negotiated with Canada is the number of the agreements, and how the various sectors are aggregated or left separate. This document will refer to a single agreement, but recognizes that there may be more than one.

What the Federal government is proposing in its Climate Change regulations

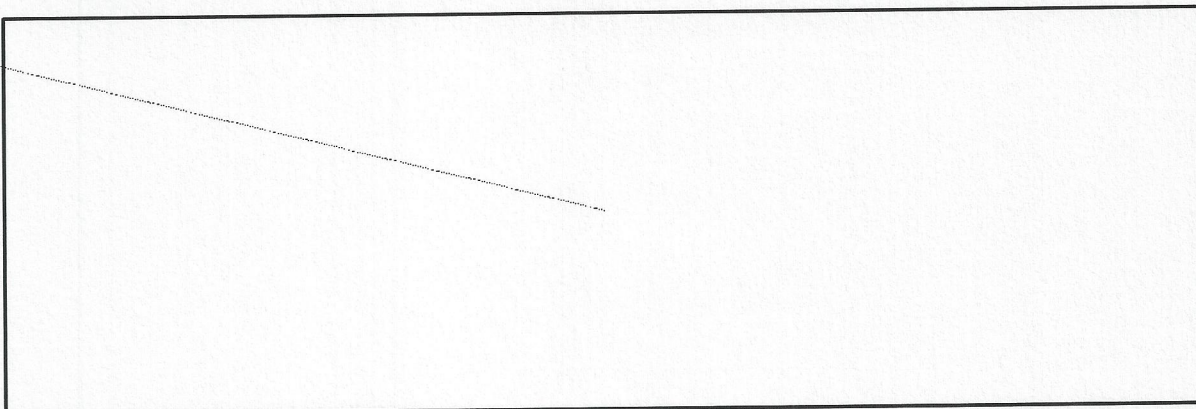
The federal government is rolling out a sectoral approach to greenhouse gas reductions, primarily comprised of intensity-based performance standards. Their system does not, as it stands currently, allow for the use of technology funds and provides for a limited use of offsets, which it describes as "low cost domestic reductions". Conversations with the various industrial sectors are underway. Alberta is participating in these conversations.

The first sector announced, and the only sector to have been completed to date, is coal-fired power generation. The regulation for this sector was gazetted in September 2012 and takes effect on July 1, 2015. It requires coal-fired generating units, at the end of a 50 year design life, to emit at no more than 420 kg CO₂e/MWh ("clean as gas"). There is no allowance for flexibility mechanisms such as offsets or technology fund payments. As Carbon Capture and Storage is the only option currently available that could achieve these levels, and as the technology is not yet sufficiently mature or cost-effective for

industry's comfort level, it is likely that these units will be decommissioned at the end of their design life.

The process to establish the standards for gas-fired generation is at an early stage. The approach is based on a standard of 420 kg CO₂e/MWh, with a slightly higher standard possible for peaking plants, as yet not clearly defined. It appears as though co-generation will be handled through its host sector.

NR



Why we would like to negotiate an equivalency agreement

1. Alberta's system works.

Alberta has been regulating greenhouse gases for a number of years through its Specified Gas Emitters Regulation. This covers a broad swath of the economy and currently includes a 12% reduction target for all large final emitters, regardless of sector. It also includes a variety of flexibility tools, including offsets, performance credits and the availability of technology fund payments (currently set at \$15/tonne). These tools allow companies to use the lowest cost reductions available to them, include non-covered activities through the offset system, and provide funding for research and commercialization of the new technologies that are needed to drive long term reductions in greenhouse gases.

While it would not be accurate to say that industry are all enamoured with Alberta's system, they have learned to meet its reporting and compliance requirements and, with the exception of a few glitches, the offset system is working well. The system has delivered significant reductions in greenhouse gases, and the funds collected have spurred a great deal of research that will help meet the longer term goals of reducing the carbon footprint of the province.

An equivalency agreement could provide Alberta with the ability to continue to operate its system, and leave us a freer hand to make any changes that might come out of the current climate change strategy renewal.

2. Architectural mis-match

The basic architecture of the federal system is not easily compatible with Alberta's existing system. The sector by sector performance standard approach is very time consuming and does not easily allow for the ongoing reductions that will be required of Alberta to achieve its stated goals for greenhouse gas

reductions. Alberta's system is designed to be scalable – the stringency of the reductions and the carbon price (as reflected in the technology fund fall-back) can be adjusted as needed without running many sectoral processes as the current federal process requires. Aligning the two systems, or trying to assist industry in working within the two systems at the same time, would be very difficult. An equivalency agreement would leave the Alberta system in place, with some adaptations that might be required in the negotiating process.

3. Missing Policy Drivers

One of Alberta's significant concerns with the federal approach is that it does not have any policy or economic drivers for deeper reductions in greenhouse gases, or for the major structural and technological changes that will be required over the longer term. It provides no incentives for companies to go beyond compliance with what are, for many sectors, minimal compliance obligations. An equivalency agreement that allowed us to run our existing system or something similar to it would maintain the drivers we have for step changes in technology and the changes that are required to reduce our carbon footprint.

4. We want to avoid duplication of effort for industry

The reporting tasks and the operation of the system are known quantities for Alberta industry. In the absence of an equivalency agreement industry will have to layer on the reporting and compliance requirements of the federal system. This is not simply about filling out forms – it is about installing the control and measurement systems for steam, fuel and products that are needed to provide the data for those forms. Contracts are in place with offset providers, staff are trained in the reporting processes, and much of this may have to be redone in order to meet any new federal requirements. An equivalency agreement would leave Alberta as the regulator.

5. Specific Concerns with some Sectors

There are some sectors, such as electricity, for which the proposed federal system poses some real difficulties, primarily due to the lack of flexibility. Alberta's electricity system is investor owned and has different dynamics than other provinces. The province of Alberta is growing rapidly and the need for new generation to replace the coal plants that will be shutting down and to meet the increasing demand from industry and consumers means that Alberta will need a lot of new generation. Some of the policies that seem to be emerging from the federal system may disincent co-generation and make some of the generation that is essential to keep the grid stable problematic. The time lines required to plan, find capital, build and commission significant amounts of electrical generation must be allowed for. An equivalency agreement may give us the flexibility to allow the electricity sector to adjust its generation mix in realistic timelines while still meeting the greenhouse gas profile expected in the federal system.

6. Fairness and Economic Efficiency

The burden of the reductions in greenhouse gases in the federal proposal are not evenly distributed through the various sectors. Two sectors in particular, coal-fired electricity and [redacted] bear a much heavier burden than the other sectors. While few sectors would say that they would be willing to accept a heavier burden that the federal program asks of them, we believe that something closer to an equal share, assisted by the availability of flexibility mechanisms, will allow the costs to be distributed more evenly in the economy.

NR

The use of tools such as offsets allow industry to pursue the lowest cost reductions that are available to them. If we assume (and we do) that a tonne of CO₂e is a tonne of CO₂e no matter what the source, then allowing the use of less expensive reductions will allow for greater overall reductions for the same cost. Among our overarching policy goals is to achieving the greatest level of reductions for the least cost – an equivalency agreement may permit this.

7. Time frames

The federal program has a very short time frame, and does not include policy drivers for ongoing reductions. The labour intensive process of negotiating performance standards and on site reductions will only take us out five or ten years, and will have to begin once again if there are to be further reductions. Alberta needs to look out to 2035 and 2050 for deep changes in our carbon-intensive economy, and the federal system makes that difficult. We hope that an equivalency agreement will enable policy drivers for the step changes in emissions that will be needed.

8. Provincial Regulation of Provincially Significant Industry

In Alberta, more than most other jurisdictions, greenhouse gas policy and economic policy are intertwined. The economy of Alberta is dominated by a few industries, which are significant emitters of greenhouse gases. Decisions about the greenhouse gas management requirements will impact the costs for these industries. [redacted]

NR

[redacted] Alberta is not comfortable leaving the future of our major industries in the hands of the federal government. One of the important goals in negotiating an equivalency agreement on greenhouse gases is to ensure that decisions that can have significant impacts on Alberta's economy should be made in Alberta.

Process we will be following

(A detailed work plan is available – this is a summary only)

As mentioned earlier, C.E.P.A. leaves the obligation on the other jurisdictions to establish that their regulation meets the conditions for an equivalency agreement, but does not give a great deal of detail as to how that is to be done. Alberta Environment and Sustainable Resource Development staff have begun a series of conversations with their Environment Canada counterparts with the goal of preparing a Memorandum of Understanding that will include items such as the following:

- The basic structure of the agreement or agreements(s)
 - i.e. single sector, single agreement or a combined document
- What constitutes "equivalent" for the purposes of this agreement and how it will be determined
- How the various sectors' performance standards under the federal approach will be translated into the provincial system
 - Will they be aggregated or will each sector have to meet the target?
- Specific items that must be in Alberta's regulations to assist in establishing equivalency.
- Outline of the content that will be found in the equivalency agreement

The goal is to have this part of the process completed by the end of 2013.

Once this document has been prepared and has been signed off by senior officials at both Alberta Environment and Sustainable Resource Development and Environment Canada we will work with legal staff and Environment Canada to prepare the actual draft documents. The equivalency process will require both the provincial level regulatory instruments that will be used to enforce the province's greenhouse gas program and the draft equivalency agreement to be complete. Changes that are required to provincial regulations as a result of the equivalency process and the climate change strategy renewal are targeted for completion by September 2014.

The draft agreement will be gazetted and open to receive comments. These comments will be received and responded to and a final version of the agreement gazetted. The draft version should be done by the end of 2014, with the aim of having it in place prior to July 2015 when the federal coal-fired power regulation comes into force.

Equivalency Briefing note

The goal of this Briefing note will be to affirm the aims that Alberta has in seeking an equivalency agreement(s) with Canada in regards to the federal government's climate change regulations.

What is Equivalency?

Section 10 of the *Canadian Environmental Protection Act, 1999* (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that will result in the federal government standing down a regulation under C.E.P.A. in that jurisdiction. This allows the levels of government to work together, ensures that the desired outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates. The jurisdiction must prove to the federal minister's satisfaction that an existing regulatory instrument is "equivalent to" the regulation under C.E.P.A., and that there exist provisions for the investigation of alleged offenses similar to C.E.P.A.'s. C.E.P.A. itself does not define what constitutes "equivalent to", but a background document on Environment Canada's website refers to achieving "the same environmental outcome". C.E.P.A. currently limits these to a five year period, after which time they must be re-established.

These agreements are formal legal documents and have their own process that must be followed – they are negotiated, draft versions are gazetted for comments, then the final versions are gazetted prior to coming into force.

NR

Among the items that will be negotiated with Canada is the number of the agreements, and how the various sectors are aggregated or left separate. This document will refer to a single agreement, but recognizes that there may be more than one.

What the Federal government is proposing in its Climate Change regulations

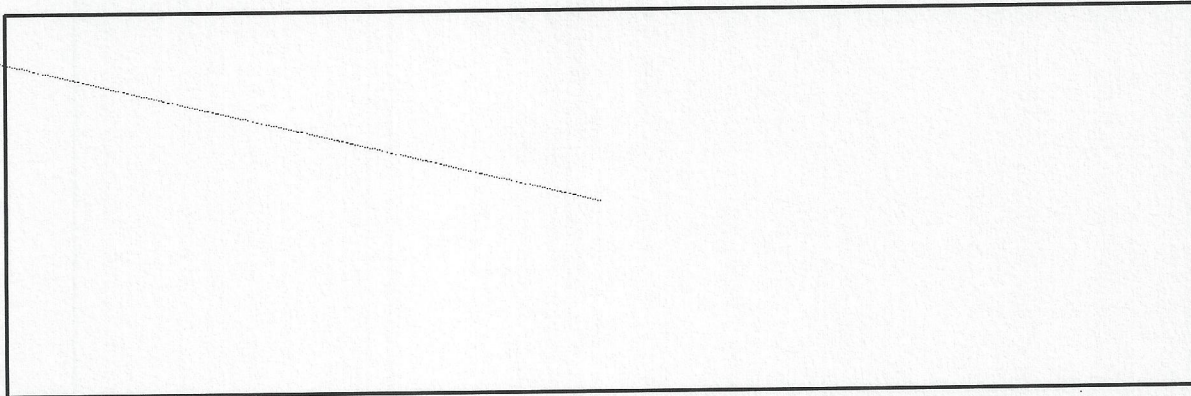
The federal government is rolling out a sectoral approach to greenhouse gas reductions, primarily comprised of intensity-based performance standards. Their system does not, as it stands currently, allow for the use of technology funds and provides for a limited use of offsets, which it describes as "low cost domestic reductions". Conversations with the various industrial sectors are underway. Alberta is participating in these conversations.

The first sector announced, and the only sector to have been completed to date, is coal-fired power generation. The regulation for this sector was gazetted in September 2012 and takes effect on July 1, 2015. It requires coal-fired generating units, at the end of a 50 year design life, to emit at no more than 420 kg CO₂e/MWh ("clean as gas"). There is no allowance for flexibility mechanisms such as offsets or technology fund payments. As Carbon Capture and Storage is the only option currently available that could achieve these levels, and as the technology is not yet sufficiently mature or cost-effective for

industry's comfort level, it is likely that these units will be decommissioned at the end of their design life.

The process to establish the standards for gas-fired generation is at an early stage. The approach is based on a standard of 420 kg CO₂e/MWh, with a slightly higher standard possible for peaking plants, as yet not clearly defined. It appears as though co-generation will be handled through its host sector.

NR



Why we would like to negotiate an equivalency agreement

1. Alberta's system works.

Alberta has been regulating greenhouse gases for a number of years through its Specified Gas Emitters Regulation. This covers a broad swath of the economy and currently includes a 12% reduction target for all large final emitters, regardless of sector. It also includes a variety of flexibility tools, including offsets, performance credits and the availability of technology fund payments (currently set at \$15/tonne). These tools allow companies to use the lowest cost reductions available to them, include non-covered activities through the offset system, and provide funding for research and commercialization of the new technologies that are needed to drive long term reductions in greenhouse gases.

While it would not be accurate to say that industry are all enamoured with Alberta's system, they have learned to meet its reporting and compliance requirements and, with the exception of a few glitches, the offset system is working well. The system has delivered significant reductions in greenhouse gases, and the funds collected have spurred a great deal of research that will help meet the longer term goals of reducing the carbon footprint of the province.

An equivalency agreement could provide Alberta with the ability to continue to operate its system, and leave us a freer hand to make any changes that might come out of the current climate change strategy renewal.

2. Architectural mis-match

The basic architecture of the federal system is not easily compatible with Alberta's existing system. The sector by sector performance standard approach is very time consuming and does not easily allow for the ongoing reductions that will be required of Alberta is to achieve its stated goals for greenhouse gas

reductions. Alberta's system is designed to be scalable – the stringency of the reductions and the carbon price (as reflected in the technology fund fall-back) can be adjusted as needed without running many sectoral processes as the current federal process requires. Aligning the two systems, or trying to assist industry in working within the two systems at the same time, would be very difficult. An equivalency agreement would leave the Alberta system in place, with some adaptations that might be required in the negotiating process.

3. Missing Policy Drivers

One of Alberta's significant concerns with the federal approach is that it does not have any policy or economic drivers for deeper reductions in greenhouse gases, or for the major structural and technological changes that will be required over the longer term. It provides no incentives for companies to go beyond compliance with what are, for many sectors, minimal compliance obligations. An equivalency agreement that allowed us to run our existing system or something similar to it would maintain the drivers we have for step changes in technology and the changes that are required to reduce our carbon footprint.

4. We want to avoid duplication of effort for industry

The reporting tasks and the operation of the system are known quantities for Alberta industry. In the absence of an equivalency agreement industry will have to layer on the reporting and compliance requirements of the federal system. This is not simply about filling out forms – it is about installing the control and measurement systems for steam, fuel and products that are needed to provide the data for those forms. Contracts are in place with offset providers, staff are trained in the reporting processes, and much of this may have to be redone in order to meet any new federal requirements. An equivalency agreement would leave Alberta as the regulator.

5. Specific Concerns with some Sectors

There are some sectors, such as electricity, for which the proposed federal system poses some real difficulties, primarily due to the lack of flexibility. Alberta's electricity system is investor owned and has different dynamics than other provinces. The province of Alberta is growing rapidly and the need for new generation to replace the coal plants that will be shutting down and to meet the increasing demand from industry and consumers means that Alberta will need a lot of new generation. Some of the policies that seem to be emerging from the federal system may dis-incent co-generation and make some of the generation that is essential to keep the grid stable problematic. The time lines required to plan, find capital, build and commission significant amounts of electrical generation must be allowed for. An equivalency agreement may give us the flexibility to allow the electricity sector to adjust its generation mix in realistic timelines while still meeting the greenhouse gas profile expected in the federal system.

6. Provincial Regulation of Provincially Significant Industry

In Alberta, more than most other jurisdictions, greenhouse gas policy and economic policy are intertwined. The economy of Alberta is dominated by a few industries, which are significant emitters of

NR greenhouse gases. Decisions about the greenhouse gas management requirements will impact the costs for these industries. [REDACTED]

[REDACTED] Alberta is not comfortable leaving the future of our major industries in the hands of the federal government. One of the important goals in negotiating an equivalency agreement on greenhouse gases is to ensure that decisions that can have significant impacts on Alberta's economy should be made in Alberta.

Process we will be following

(A detailed work plan is available – this is a summary only)

As mentioned earlier, C.E.P.A. leaves the obligation on the other jurisdictions to establish that their regulation meets the conditions for an equivalency agreement, but does not give a great deal of detail as to how that is to be done. Alberta Environment and Sustainable Resource Development staff have begun a series of conversations with their Environment Canada counterparts with the goal of preparing a Memorandum of Understanding that will include items such as the following:

- The basic structure of the agreement or agreements(s)
 - i.e. single sector, single agreement or a combined document
- What constitutes “equivalent” for the purposes of this agreement and how it will be determined
- How the various sectors’ performance standards under the federal approach will be translated into the provincial system
 - Will they be aggregated or will each sector have to meet the target?
- Specific items that must be in Alberta’s regulations to assist in establishing equivalency.
- Outline of the content that will be found in the equivalency agreement

The goal is to have this part of the process completed by the end of 2013.

Once this document has been prepared and has been signed off by senior officials at both Alberta Environment and Sustainable Resource Development and Environment Canada we will work with legal staff and Environment Canada to prepare the actual draft documents. The equivalency process will require both the provincial level regulatory instruments that will be used to enforce the province’s greenhouse gas program and the draft equivalency agreement to be complete. Changes that are required to provincial regulations as a result of the equivalency process and the climate change strategy renewal are targeted for completion by September 2014.

The draft agreement will be gazetted and open to receive comments. These comments will be received and responded to and a final version of the agreement gazetted. The draft version should be done by the end of 2014, with the aim of having it in place prior to July 2015 when the federal coal-fired power regulation comes into force.

Draft letter to Mike Beale from Shannon Flint

January XX, 2013

Mr Mike Beale
Associate Assistance Deputy Minister
Environment Canada
351 Boul. St Joseph,
Gatineau, Quebec K1A 0H3

Dear Mr. Beale:

Our respective Ministers had an opportunity to discuss the process and content of federal greenhouse gas emissions regulations while in Doha, Qatar during the recent 18th Conference of the Parties. This meeting provided an excellent opportunity to further the dialogue on climate change between Canada and Alberta amongst Ministers, and I provide the following memo to reiterate to you the key topic areas Alberta raised at this meeting. I look forward to continuing to work with you and your team on these specific areas of priority for our Province.

Alberta supports Canada's commitment to reduce greenhouse gas emissions and recognizes the industrial sectors within Alberta are important sources of potential reductions. As such, my staff and I will continue to work on the sectoral tables your department is leading to develop specific greenhouse gas regulations. Across all sectors, Alberta's position is focused on the following key areas:

Policy Architecture

The sector-by sector approach being undertaken to advance federal greenhouse gas emissions regulations does not provide policy coherence or certainty. The sectoral approach could result in uneven or unfair treatment across industries, sectors, or regions. Under the current approach, different frameworks and policy approaches are being proposed for each sector or even sub-sector. For example, the framework for some sectors allows for flexible compliance mechanisms such as access to the technology fund or to low cost domestic reductions, while others do not.

Under the current approach, specific processes and facilities, such as boilers and co-generation, could face very different reduction targets in various sectors. An identical piece of equipment may face little or no reductions in one sector but steep reductions in another. A fair and equitable treatment of these units should be found in whatever regime is ultimately implemented. Co-generation is a particular concern in Alberta as we must look at replacing our existing coal-fired generation within a relatively short time, and any uncertainty or disincentive for co-generation may delay needed investment decisions.

The Alberta government is advocating for a more consistent overarching policy approach that would be applied across all sectors. This should include the use of compliance flexibility tools such as low cost domestic reductions, performance credits, technology funds and economic instruments that will allow industry to pursue the lowest cost reductions. Recognizing sectors have differing abilities to reduce emissions or absorb the costs of compliance, there could be allowance for individual levels of stringency or burden with consideration of respective economic and competitiveness impacts. To ensure fair treatment across facilities, sectors and regions, Alberta is advocating for comprehensive and consistent analysis of economic and competitiveness impacts.

Achieving Reductions Across the Economy

The current proposed approach for emissions intensive trade exposed sectors is focused on "achievable" performance standards. This regulatory approach will not encourage continuous improvement or innovation, and may in fact serve to reinforce the status quo. Achieving long-term reductions in greenhouse gas emissions to meet our respective provincial and national targets requires commitment from all sectors to move towards a lower carbon future. "Achievable" performance standards also do not allow for the ability to "scale up" the regulation at a future date if and when further reductions are needed from the sectors.

Alberta's current regulation requires a 12 per cent intensity reduction from all large emitters with full access to compliance flexibility. Alberta is advocating that the national approach for these sectors should, at the very least, match the reduction currently imposed through Alberta's regulation. However, if Alberta is to achieve its own reduction commitments, it is likely that deeper reduction targets will be required.

Technology and Innovation Key to Long-term Deep Reductions

While Alberta understands the need to demonstrate performance out to 2020, it is imperative climate policy be viewed through a long-term lens to ensure certainty and continuous improvement over time. Technology and innovation are essential in achieving the deep reductions that the environment and stated government policy require. While on site reductions and offsets can achieve short and medium-term reductions, only a significant investment in research and technology will bring the necessary step changes in emission intensive sectors.

From an Alberta perspective, we want our industry to invest in their own operations to improve their emissions performance and maintain their global competitiveness. This is about attraction of capital and investment. In Alberta, the Climate Change Emissions Management Fund plays a key role in bridging the gap between lower cost, short-term opportunities and the deployment of transformational, long-term technology and innovation that will lead to deep reductions. We would like to see the use of such funds play a significant role in the federal approach.

Equivalency

Alberta sees potential benefits to pursuing equivalency but would like to ensure it is pursued on an outcomes basis that allows provinces to employ the most appropriate regulatory tools across the province's economy. Alberta will only enter into an equivalency agreement if it allows the flexibility for the province to achieve its objectives through the most efficient and effective policy.

Alberta will need to resolve the following items before an equivalency agreement can be settled on:

- Assurance of how the agreement will factor in Alberta's regulation that allows for compliance flexibility (offsets, emissions performance credits, and the technology fund)
- Information on the natural gas-fired electricity regulation – this is imperative as the emissions cap in the coal equivalency is electricity-wide
- Assessment of uncertainty in the forecasting of electricity generation and greenhouse gas emissions, including an understanding of how the forecasted numbers will stand up to legal challenges if the actual numbers differ substantially.
- Clear understanding of how Environment Canada will address cogeneration. While it is understood the plan is to not include cogeneration within the coal equivalency agreement, it is imperative that electricity production on grid and behind the fence face the same carbon signal to avoid disincentives for cogeneration development or other unintended consequences.

I appreciate your attention to these areas, and look forward to ongoing conversations as we and our staff work to design the best possible greenhouse gas management system for Canada.

Sincerely,

Shannon Flint
Assistant Deputy Minister

DRAFT – for discussion purposes only

Considerations for Equivalency between Government of Alberta and Government of Canada

Purpose of Equivalency Agreements

General as set out in CEPA (relevant section(s))

Section 10 of the Canadian Environmental Protection Act, 1999 (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that forms the basis for an equivalency order that will result in the federal government standing down its regulation in deference to that of the applicable jurisdiction. This is done in order to allow the two governments to work together, ensures that the desired environmental outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates the activity.

The non-federal jurisdiction must demonstrate, to the satisfaction of the federal Minister of the Environment, that their existing regulatory regime has equivalent provisions to that of the relevant C.E.P.A. regulation. In this case there will be several federal regulations relating to the management of greenhouse gases in various sectors. How the Province of Alberta will address these regulations and what constitutes equivalent outcomes is set out in this document

Specific to GHG emissions in Alberta

Alberta has an existing greenhouse gas regime in place, through its Specified Gas Emitters Regulation. Alberta's regulation includes an economy wide intensity reduction requirement for all large final emitters (currently defined as emitting more than 100,000 tonnes GHGs) and a variety of compliance flexibility tools, such as offsets, performance credits and a technology fund. Alberta's regulatory system has worked well. Government and industry have learned how to handle the reporting and administrative tasks associated with the system, and it has led to significant reductions in greenhouse gases at the covered facilities, across the economy through the offset system, and generated a pool of funds that are being used to spur innovation for long term reductions in Alberta's carbon footprint. Although we recognize that there may need to be some adaptation to align sufficiently well to achieve equivalency with federal regulations, Alberta would like to retain the ability to manage the province's greenhouse gas emissions through its existing regime. In order to achieve equivalency, Alberta will need to modify the SGER.

What constitutes "equivalent"

Achievement is based on total GHG emissions

In both the federal and provincial regulatory regimes, the overarching purpose of the regime is to reduce emissions of greenhouse gases. While C.E.P.A. does not define "equivalent provisions", for the purposes of this agreement it will be defined as the total greenhouse gas (CO₂e) emissions from the sector(s) covered by the agreement and order. The target numbers will be a mutually agreed to

number of tonnes based on the federal proposed intensity standard and an assumed level of production at the covered facilities.

Facility Grouping

The current state of negotiations for the federal regulatory regime indicates that there will be three groupings of facilities:

- The electricity sector, currently covered by the federal coal regulation but with gas and other electricity generation to be included,
- The oil and gas sector, including both upstream and downstream activity, and,
- Emissions Intensive Trade Exposed sectors such as chemicals, cement, fertilizer, etc.

The agreement will be based on aggregate numbers for each of the three sectors. As some of the sectors are nearing agreement on the federal intensity based performance standards while some sectors are only in the early stages, it will be important to have a process by which additional facilities and their corresponding targets are incorporated into the agreement and order without re-opening the previously agreed to sectors. This is important as it will provide the stable regulatory environment needed by capital intensive industries.

Economic Assumptions Trigger

Translating intensity based performance standards into a hard number of greenhouse gas emissions requires assumptions about the level of activity in the covered sector. Discussions with industry about possible future activity, economic modeling and other tools can provide a reasonable basis for this assumption, but reality does not always cooperate. If the production (or level of activity as defined in the federal performance standard) is either greater or lesser than the assumptions that have been agreed to by both governments in setting the emissions number, then the agreement should provide for the target for that sector or sectors to be renegotiated without re-opening the entire agreement. The threshold for this renegotiation will be agreed to in advance. This will avoid either an excess of emissions available in the system or constraints on economic growth despite the facilities all meeting the federal performance standards.

Timing

The current wording in C.E.P.A. limits equivalency orders to a five year period. This time period is not sufficient to provide a stable regulatory environment. Changing this time period would require amendments to C.E.P.A. that are unlikely to take place in the near future. In light of this, wording should be included similar to that found in the agreement with Nova Scotia for the coal fired power sector that sets out notional targets for the longer term and commits to a negotiating in good faith to renew the agreement.

Measurement and Reporting

In the existing equivalency agreement between Ottawa and Alberta (related to pulp mill effluent) there is a letter sent each year to a contact at Environment Canada stating that the emissions at Alberta mills remain within the agreed to parameters. There is no detail provided about the specific mills and emissions. In the case of greenhouse gases, there is already a program to report them through the "one window" approach, and, given the level of interest by stakeholders in this issue a more fulsome report would be appropriate. Some details will be required on the quantification methodologies for specific activities, and a format and timelines will need to be agreed to.

I would suggest that an annual roll up report be proposed, with the emissions grouped according to the groupings that may exist in the agreement. This would be prepared by a set date in the year (coinciding with Alberta's reporting date - July 1?), and would be signed by the Director of Air and Climate Change branch. This would be a chart with gross emissions from the sector, compliance options used (offsets, EPCs and technology fund payments) and total net emissions. If needed the total to date during the five year term of the equivalency agreement could also be provided. There would be a proviso that Environment Canada could request further detail. This report would likely be two pages.

Technology Funds

In the Alberta system all facilities have the option of using payments to the Technology Fund as a compliance option. As Alberta's system provides greater flexibility for compliance, it also provides less certainty of reductions in the sector. Modeling for fund payments needs to be negotiated so both parties are satisfied with the calculations leading to the agreed upon environmental outcomes.

Banking outside of five-year period

The offsets and performance credits in the current Alberta system do not expire or lose value over time. The federal government has proposed the limited use of banking of performance credits in its sectoral discussions. A strict application of the five year time period for the equivalency order may complicate the use of tonnes banked from previous time periods. This may make it difficult to manage compliance in year six if industry is relying on credits from the previous year. As one of the goals of equivalency is keeping the compliance process simpler for industry it will be difficult if they have to track the vintage of credits in some years but not others. Some resolution to this would be helpful.

One means of handling this would be to state that offsets are considered to be applicable in the year and the sector in which they are used.

Use of offsets, accounting, corporate true up

Alberta's proposal for offsets and performance credits is set out above. Corporate true up is a major flexibility component of the proposed federal regulations. If this moves forward, the question of how it would apply (or not) through provincial equivalency needs to be determined. Modeling the effects of expected corporate true up may come into play. In addition, further work will need to be done on

provincial boundaries. Alberta will need to determine if it will allow offsets from other provinces., and as the national system develops there may be more reasons to encourage this.

Termination of agreement

Both the federal and Alberta governments have the right to withdraw from this agreement upon appropriate notice, but some wording ought to be included stating under what conditions this might occur, and what timelines might be given to industry to adjust their actions and compliance strategies to adapt to the new rules under which they would be expected to operate.

The overall goal for Alberta is a system that is effective in the short, medium and long term and provides sufficient flexibility to allow for the most economically efficient means of achieving Alberta's provincial objectives, including the 2020 and 2050 greenhouse gas targets. Alberta's economy is built, in large part, on major capital investments and whatever regulatory system is in place should be able to provide the regulatory stability that these projects require.

Preamble:

Purpose of Equivalency Agreements

General as set out in CEPA (relevant section(s))

Section 10 of the Canadian Environmental Protection Act, 1999 (C.E.P.A.) allows jurisdictions to negotiate an equivalency agreement that forms the basis for an equivalency order that will result in the federal government standing down its regulation in deference to that of the applicable jurisdiction. This is done in order to allow the two governments to work together, ensures that the desired environmental outcomes take place, duplication is avoided, and that the most appropriate jurisdiction regulates the activity.

The non-federal jurisdiction must demonstrate to the satisfaction of the federal Minister of the Environment that their existing regulatory regime has equivalent provisions to that of the relevant C.E.P.A. regulation. There are also further requirements about the rights to citizens to trigger an investigation. In this case there ultimately will be several federal regulations relating to the management of greenhouse gases in various sectors. A proposal for how the Province of Alberta will address these regulations and what constitutes equivalent outcome are set out in this document.

Specific to GHG emissions in Alberta

Alberta has an existing greenhouse gas regime in place, through its Climate Change and Emissions Management Act and Specified Gas Emitters Regulation. Alberta's regulation includes an economy-wide intensity reduction requirement for all large final emitters (currently defined as emitting more than 100,000 tonnes of greenhouse gas emissions per year) and a variety of compliance flexibility tools, such as offsets, performance credits and payments into a technology fund. This regulation will be used to achieve equivalency with federal regulations.

What constitutes "equivalent"

Achievement is based on total greenhouse gas emissions, net of offsets

In both the federal and provincial regulatory regimes, the overarching purpose is to reduce emissions of greenhouse gases. While C.E.P.A. does not define "equivalent provisions", for the purposes of this agreement it will be defined as the total greenhouse gas (CO₂e) emissions from the sector(s) covered by the agreement and order. The target numbers will be a mutually agreed to number of tonnes based on

modelling of the federal proposed intensity standard and an assumed level of production at the covered facilities and the proposed provincial regime.

How facilities are grouped

It is proposed that equivalency be determined with three groupings of facilities:

- The electricity sector, currently covered by the federal coal regulation but with gas and other electricity generation to be included,
- The oil and gas sector, including both upstream and downstream activity, (*note: comments made by the Prime Minister in a year-end interview suggest that the oil and gas sector may not be completed for several years*) and,
- Emissions Intensive Trade Exposed sectors such as chemicals, cement, fertilizer, etc.

The agreement will be based on aggregate five year emissions for each of the three groupings. The federal government has expressed a desire to segregate the emissions from the electricity sector in order to ensure that the emissions and reductions counted are all from the electricity sector. Alberta would prefer to leave this more open to allow the use of offsets from outside the electricity sector, and will be discussing this with the federal government.

As some of the sectors are nearing agreement on the federal intensity based performance standards while some sectors are only in the early stages, it will be important to have a process by which additional facilities and their corresponding targets are incorporated into the equivalency agreement and equivalency order without re-opening the previously agreed to sectors. This is important as it will provide the stable regulatory environment needed by capital intensive industries.

Economic Assumptions Trigger

Translating intensity-based performance standards into a hard number of greenhouse gas emissions requires assumptions about the level of activity in the covered sector. Discussions with industry about possible future activity, economic modeling and other tools can provide a reasonable basis for these assumptions, but reality does not always cooperate. If the production (or level of activity as defined in the federal performance standard) is either greater or lesser than the assumptions that have been agreed to by both governments in setting the emissions number, then the agreement should provide for the target for that sector or sectors to be renegotiated without re-opening the entire agreement. The threshold for this renegotiation will be agreed to in advance. This will avoid either an excess of emissions available in the system or constraints on economic growth despite the facilities all meeting the federal performance standards.

Five year period but language around extensions

The current wording in C.E.P.A. limits equivalency agreements to a five year period. (It should be noted that the equivalency order does not expire at the end of five years, even though the underlying agreement does.) This time period is not sufficient to provide a stable regulatory environment for capital intensive industries. Changing this time period would require amendments to C.E.P.A. that are unlikely

to take place in the near future. In light of this, wording should be included similar to that found in the agreement with Nova Scotia for the coal fired power sector that sets out notional targets for the longer term and commits to a negotiating in good faith to renew the agreement.

How it's measured, reported and to whom

In the existing equivalency agreement between Ottawa and Alberta (related to pulp mill effluent) there is a letter sent each year to a contact at Environment Canada stating that the emissions at Alberta mills remain within the agreed to parameters. There is no detail provided about the specific mills and emissions. In the case of greenhouse gases, there is already a program to report them through the "one window" approach, and, given the level of interest by stakeholders in Alberta's greenhouse gas emissions, a more fulsome report would be appropriate. Some details will be required on the quantification methodologies for specific activities, and a format and timelines will need to be agreed to.

Alberta proposes that an annual "roll up" compliance report be prepared, with the emissions reported according to the groupings that may exist in the agreement. This would be prepared by a set date in the year, and signed by the Executive Director of the Air and Climate Change Policy Branch. This would be a chart with gross emissions from the sector, compliance options used (offsets, emissions performance credits and technology fund payments) and total net emissions. If needed the total to date during the five year term of the equivalency agreement could also be provided. There would be a proviso that Environment Canada could request further detail.

Handling of fund payments

In the Alberta system all facilities have the option of using payments to the Technology Fund as a compliance option. It is understood that negotiations with the oil and gas sector include the use of fund payments. It is also understood that while Technology Fund payments are available as compliance options, they will not contribute to the emissions reductions within the sector in the five year period in the equivalency determination.

Banking outside of five year period

The offsets and performance credits in the current Alberta system do not expire or lose value over time. The federal government has proposed the limited use of banking of performance credits in its sectoral discussions. A strict application of the five year time period for the equivalency order may complicate the use of tonnes banked from previous time periods. This may make it difficult to manage compliance in year six if industry is relying on credits from the previous year. As one of the goals of equivalency is keeping the compliance process simpler for industry it will be difficult if they have to track the vintage of credits in some years but not others. Some resolution to this would be helpful. One means of handling this would be to give direction that offsets are applicable in the year, the sector, and, potentially, the jurisdiction in which they are used, not when and where they are generated.

Use of offsets, accounting, corporate true up

Alberta has not yet determined if corporate true up would be allowed as a compliance flexibility option in addition to use of offsets, technology fund payments and emissions performance credits. Further work will need to be done on provincial boundaries and how they might work in a system in which some provinces have equivalency agreements and some don't. Alberta's position on the use of offsets from a national or federal system, or those from other provinces, also needs to be determined.

Termination of agreement

Both the federal and Alberta governments have the right to withdraw from this agreement upon appropriate notice, but some wording ought to be included stating under what conditions this might occur, and what timelines might be given to industry to adjust their actions and compliance strategies to adapt to the new rules under which they would be expected to operate.

Page 150 of 174

withheld pursuant to section
sont retenues en vertu de l'article

21 (1)(a)

of the Freedom of Information and Protection of Privacy Act

Page 151 of 174

withheld pursuant to section
sont retenues en vertu de l'article

21 (1)(a)

of the Freedom of Information and Protection of Privacy Act

Draft letter to Mike Beale from Shannon Flint

January XX, 2013

Mr Mike Beale
Associate Assistance Deputy Minister
Environment Canada
351 Boul. St Joseph,
Gatineau, Quebec K1A 0H3

Dear Mr. Beale:

As you are likely aware, staff from Alberta Environment and Sustainable Resource Development have been participating in many of the sectoral tables that Environment Canada is currently running as part of its climate change strategy. A number of concerns have arisen in this process, and I would like to bring these to your attention. We share the goal of developing policy that will make Alberta and Canada leaders in greenhouse gas management and for that reason I am confident that these concerns will be addressed. They have been the subject of discussion between our respective Ministers at the Conference of the Parties in Doha, and are expected to be the subject of ongoing discussions until such time as these issues are resolved to our mutual satisfaction.

Policy Architecture

The federal government's approach is based on sector by sector regulation, and this is proving to be both unwieldy and ineffective. Differing targets, access to compliance mechanisms, and metrics for determining compliance will result in a dozen or more different greenhouse gas regimes. In addition to being resource-intensive for staff, this approach will make it very difficult to scale up reductions as is likely to be required in the future.

There are also a number of specific processes and facilities, such as boilers and co-generation, which may face very different reduction targets in various sectors. An identical piece of equipment may face little or no reductions in one sector but steep reductions in another. A fair and equitable treatment of these units should be found in whatever regime is ultimately implemented. Co-generation in particular is a concern in Alberta as we must look at replacing our existing coal-fired generation within a relatively short time, and any uncertainty or disincentive for co-generation may delay needed investment decisions.

The Alberta government is advocating for a more consistent overarching policy approach that would be applied across all sectors. This should include the use of compliance

flexibility tools such as offsets (“low cost domestic reductions”), performance credits, technology funds and economic instruments that will allow industry to pursue the lowest cost reductions. Sectors have differing abilities to reduce emissions or absorb the costs of compliance. To ensure fair treatment across facilities, sectors and regions, Alberta is advocating for comprehensive and consistent analysis of economic and competitiveness impacts.

Achieving Reductions Across the Economy:

The federal government’s approach for emissions intensive trade exposed sectors is focused on “achievable” performance standards. We recognize that some industries are more exposed to competition from jurisdictions in which there are less stringent greenhouse gas requirements, however, the desire to protect vulnerable industries may enshrine the status quo at a time when governments need to be driving the shift to a lower carbon economy. Of course industries need to make available on-site reductions, but these alone will not achieve the overall greenhouse gas reductions that both our government’s stated targets require. We have not seen anything to date in the federal government’s approach that will drive deeper reductions and transformational changes in the industrial base.

Alberta’s current regulation requires a 12 per cent intensity reduction from large emitters across all sectors and has full compliance flexibility. Alberta is advocating that the national approach for these sectors should, at the very least, match the reductions currently imposed through Alberta’s regulation. It should be noted that if Alberta is to achieve its own reduction commitments, it is likely that reduction targets beyond the current 12% will be required. If these industries are being told by Ottawa that a much smaller reduction will suffice that places Alberta in a very difficult position.

Technology and Innovation Key to Long-term Deep Reductions:

While Alberta understands the need to demonstrate performance out to 2020, it is imperative climate policy be viewed through a long-term lens to ensure certainty and continuous improvement over time. Technology and innovation are essential in achieving the deep reductions that the environment and stated government policy require. While on site reductions and offsets can achieve short and medium-term reductions, only a significant investment in research and technology will bring the necessary step changes in emission intensive sectors.

From an Alberta perspective, we want our industry to invest in their own operations to improve their emissions performance and maintain their global competitiveness. This is about attraction of capital and investment. In Alberta, the Climate Change Emissions Management Fund plays a key role in bridging the gap between lower cost, short-term opportunities and the deployment of transformational, long-term technologies that will lead to deep reductions. We would like to see the use of such funds play a significant role in the federal approach.

Equivalency:

Alberta sees potential benefits to pursuing equivalency but would like to ensure that it is pursued on an outcomes basis that allows provinces to employ the most appropriate regulatory tools across the province's economy. Alberta will only enter into an equivalency agreement if it allows the flexibility for the province to achieve its objectives through the most efficient and effective policy.

Alberta will need to resolve the following items before an equivalency agreement can be settled on:

- Assurance of how the agreement will factor in Alberta's regulation that allows for compliance flexibility (offsets, emissions performance credits, and the technology fund)
- Information on the natural gas-fired electricity regulation – this is imperative as the emissions cap in the coal equivalency is electricity-wide
- Assessment of uncertainty in the forecasting of electricity generation and greenhouse gas emissions, including an understanding of how the forecasted numbers will stand up to legal challenges if the actual numbers differ substantially.
- Clear understanding of how Environment Canada will address cogeneration. While it is understood the plan is to not include cogeneration within the coal equivalency agreement, it is imperative that electricity production on grid and behind the fence face the same carbon signal to avoid disincentives for cogeneration development or other unintended consequences.

I appreciate your attention to these concerns, and look forward to ongoing conversations as we and our staff work to design the best possible greenhouse gas management system.

Sincerely,

Shannon Flint
Assistant Deputy Minister

Page 155 of 174

withheld pursuant to section
sont retenues en vertu de l'article

NR.24 (1) (a).24 (1) (b).21 (1)(a)

of the Freedom of Information and Protection of Privacy Act

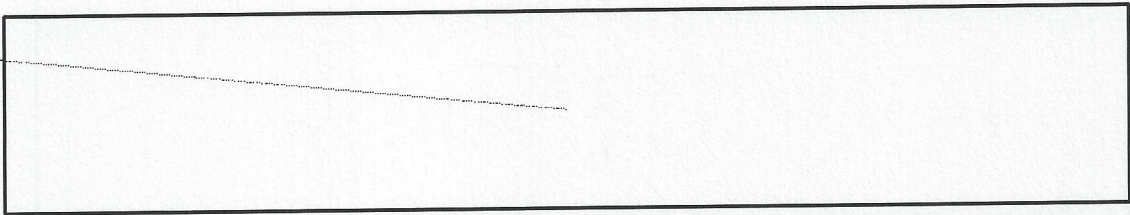
Page 156 of 174

withheld pursuant to section
sont retenues en vertu de l'article

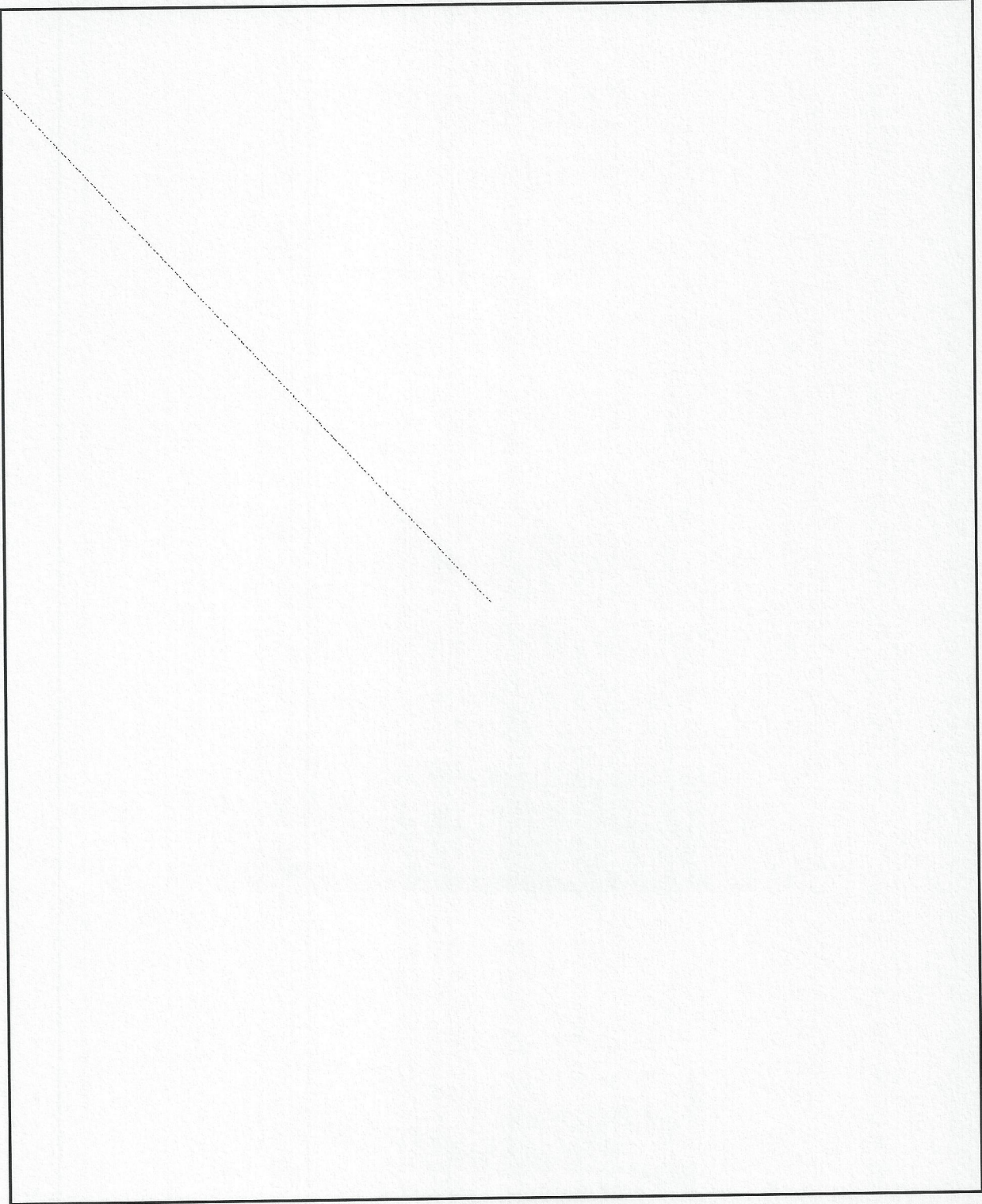
NR.24 (1) (a).24 (1) (b).21 (1)(a)

of the Freedom of Information and Protection of Privacy Act

NR,24 (1)
(a),24 (1)
NR,24 (1)



NR



E14-G-0575

Pages (s) 158 has been withheld in their entirety, as these pages are not responsive to your request.

DRAFT CLIMATE CHANGE STRATEGY RENEWAL POLICY EVALUATION CRITERIA

| Policy Evaluation Dimension | Description | 12% Fed EOL Reg | 12% CASA flex end of life | 20% CASA flex end of life | 2 nd market |
|---|--|--|--|--|---|
| <ul style="list-style-type: none"> Environmental effectiveness | <ul style="list-style-type: none"> GHG reductions (2020, 2035, 2050) Contribution to meeting target and measurability Certainty of anticipated outcomes (adverse outcomes minimized) Flexibility to respond to changing circumstances/ Impact on other environmental priorities Minimize GHG emissions leakage | <ul style="list-style-type: none"> Significant reduction in the 2035 time frame. Is not well aligned with deep reduction required for 2050. Outcomes are well defined. Not very flexible relative to changing circumstances | <ul style="list-style-type: none"> Better alignment with 2050 objectives Less certainty of reductions. Requires deployment of large sums through the tech fund. <u>[May need a little explanation – is there a companion document that outlines the basics of these scenarios?]</u> Flexible | <ul style="list-style-type: none"> Greater short term impact through cost pass through | <ul style="list-style-type: none"> Greater certainty over environmental outcomes, less certainty on costs. Somewhat reduced flexibility |
| <ul style="list-style-type: none"> Cost efficiency and cost minimization | <ul style="list-style-type: none"> Cost effectiveness Static efficiency – the ability of policy to incent the use of existing technology to lower marginal abatement costs (equalize abatement costs across sectors) Dynamic efficiency – reduces the cost of mitigation over time by incenting the development of new technology Compliance costs (i.e. \$/bbl or \$/mcf or \$/MWh) Effects on competitiveness | <ul style="list-style-type: none"> Is not cost equalizing and puts higher value on reductions through coal plant closure than other reductions. | <ul style="list-style-type: none"> Is cost equalizing. <u>[partially?]</u> | <ul style="list-style-type: none"> Increased reduction incentive at the point of design or generation technology choice <u>Is there a role for the approval</u> | <ul style="list-style-type: none"> Creates a second market price for the electricity sector |

E14-G-0575

| | | | | | |
|---|--|--|---|---|--|
| | | | | process to require BATEA? it should already be in place) | |
| <ul style="list-style-type: none"> • Equity/Fairness | <ul style="list-style-type: none"> • Social impacts • Economic rent taking minimized • Transparency • Polluter pays principle is satisfied • Distributional cost/benefit effects across generations and, income groups • Distributional cost/benefit effects across income groups • <u>Costs increase for higher emitting producers – cost of per tonne CO2e, not per MWh. May be presented as unfair by coal people as their costs will be “higher”.</u> | <ul style="list-style-type: none"> • Unequal treatment of emissions by source type. • Some issues of fairness related to fleet flexibility. • Distributional effects on consumers possible via increased pool pricing. (not quite sure what this means) | <ul style="list-style-type: none"> • Equal compliance flexibility for all operators. • Distributional effects on consumers possible via increased pool pricing. | <ul style="list-style-type: none"> • Equal compliance flexibility for all operators. • Distributional effects on consumers possible via increased pool pricing. | <ul style="list-style-type: none"> • Distributional effects on consumers possible via increased pool pricing. |
| <ul style="list-style-type: none"> • Regulatory efficiency | <ul style="list-style-type: none"> • Measurement, reporting, administrative and verification requirements • Complexity of design, implementation and administration • Costs of design, implementation and administration (government and industry) • Enforcement of compliance • Regulatory ability to adapt to changing contexts • Respect for jurisdiction/equivalency • Appropriate level of authority for decisions • Regulatory certainty | <ul style="list-style-type: none"> • Similar in administrative burden. | | | <ul style="list-style-type: none"> • Differentiated pricing requires very clear rules upfront on what credit types are allowed. |
| <ul style="list-style-type: none"> • Political acceptability | <ul style="list-style-type: none"> • Meets equivalency goals • Impact on economic growth and employment (competitiveness) • Distribution effects (national and international) • Who makes the decision regarding policy | <ul style="list-style-type: none"> • Meets equivalency goals • Can position as adopting existing regulation if desired. • Intervention may be desired if gas prices | <ul style="list-style-type: none"> • Would rely on some recognition of reductions from tech fund to meet | <ul style="list-style-type: none"> • Would rely on some recognition of reductions | <ul style="list-style-type: none"> • May meet equivalency goals • Most likely to increase quantity of |

| | | | | | |
|----------------------------|---|---|---|--|--|
| | <ul style="list-style-type: none"> • Coordination (with other policies) • Disproportionally adverse impacts to some • <u>Likelihood of unintended consequences to government, industry and the public</u> • <u>Likelihood of intended consequences to public (i.e. electricity price impacts)</u> • Policy flexibility to accommodate a range of situations without intervention • Policy stability allowing investment certainty • Public acceptability • Impacts on competitiveness | increase. | equivalency. | <ul style="list-style-type: none"> • from tech fund to meet equivalency. • Increases sector costs relative to 12% target. | <ul style="list-style-type: none"> • alternative and renewable generation in the short run. (And in the long run?) May forestall the invasion of CCGT generation. |
| • Other Benefits | <ul style="list-style-type: none"> • Benefits of policy design, specifics, social cost of carbon, etc. • Benefits to be considered regarding: <ul style="list-style-type: none"> ○ human health ○ economic (increased environmental efficiency allows for more economic activity with lessened ecological impact) ○ ecosystem quality ○ social license | <ul style="list-style-type: none"> • Air emissions co-benefits (smaller if Electricity Framework is maintained). | <ul style="list-style-type: none"> • Potentially less stranded capital now and in the future. | <ul style="list-style-type: none"> • Can be viewed as a stronger position than existing coal regulations. • Potentially less stranded capital now and in the future. | <ul style="list-style-type: none"> • Potential to be a meaningful driver of renewables in the short term. |
| • Risks | <ul style="list-style-type: none"> • <u>Unforeseen events that could impact success</u> • <u>(if they're listed here aren't they by definition unforeseen events?)</u> | <ul style="list-style-type: none"> • Increases to natural gas price would increase the costliness of this approach. <u>Would this be more costly than high gas price without this policy?</u> • Push back on Electricity Framework due to hard GHG end of life. | <ul style="list-style-type: none"> • Inability to achieve equivalency. • Difficulty in re-investing fund dollars from sector back to sector while maintaining market confidence. • Opposition from industry related to additional costs. | <ul style="list-style-type: none"> • Criticism of higher carbon price in electricity than oil and gas sector. | |
| • Supports Alternative and | • Effective in encouraging the development of | | | | • Provides |

Formatted: Font: (Default) +Body (Calibri), 11 pt

| | | | | | |
|---|---|---|---|---|---|
| Renewable Generation | alternative and renewable supplies for the power sector | | | | more support relative to other options. |
| • Cost Effective | <ul style="list-style-type: none"> • Cost-effective from a society-wide perspective • Cost-effective from a consumer perspective • Options available to reduce cost impacts on consumers • <u>Expectations of consumers for continuing cheap power may be unrealistic and may require some careful messaging</u> • <u>Maintains fuel diversity to mitigate fuel price risk</u> | • <u>Most expensive option due to limited flexibility</u> | • | • | • <u>Second most expensive option but may lead to more diverse generation mix</u> |
| • Consistent with Energy-Only Market Design | <ul style="list-style-type: none"> • Consistent with the existing energy market • <u>Impacts bidding behaviour indirectly through internalizing carbon costs.</u> • Uniform/single clearing price <ul style="list-style-type: none"> ○ No mandated reserve margin ○ No firm capacity ○ Undifferentiated product ○ Fuel neutral ○ Even playing field | • | • | • | • |
| • Market-based Generation Investments | <ul style="list-style-type: none"> • Private investors make generation investments • Shareholders, not consumers, backstop risks of <u>generation investment, but consumers are exposed to price impact of policy and investment decisions.</u> • No public funds or guarantees used to support generation investment • No centralized planning of generation (<u>Is this really true? Energy seems to fret about it a lot</u>) • Technology neutral | • | • | • | • |
| • Implications for Transmissions Policy | <ul style="list-style-type: none"> • Policy of maintaining an unconstrained system • Transmissions paid by load • <u>No transmission rights</u> • <u>Time horizons for planning and building required generation need to be considered, also added costs of new wires if required by shifts in generation due to GHG policies.</u> | • | • | • | • |
| • Implications for the retail market | <ul style="list-style-type: none"> • End users not obligated enter into long-term contracts • Customer choice on provider and contract | • | • | • | • |

E14-G-0575

Range of Tools/Options

Equivalency Agreement

- Shifts federal accountability and implementation responsibility to the province.
- The federal government, through an Order in Council, designates the provincial regime as equivalent to federal regulatory requirements and states that the federal regulatory provisions do not apply in that province. The Province implements its own "equivalent" regulatory regime as the single regulator. The federal regulation remains in effect but the federal government agrees not to exercise its authority over it.
- To date, equivalency has been determined by federal lawyers. It has not been defined by the courts.
- Under the Fisheries Act and CEPA, a federal-provincial equivalency agreement is developed. It identifies the provisions which are deemed equivalent and specific federal requirements, e.g. the province must provide information to the federal government to enable the federal minister to report to Parliament demonstrating that the federal regulation is being implemented, and the term of the agreement.
- Examples: Canada/AB: Agreement on the Equivalency of Federal and Alberta Regulations for the Control of Toxic Substances in Alberta; Canada/NS: Agreement on the Equivalency of Federal and Nova Scotia Regulations for the Control of Greenhouse Gas Emissions from Electricity Producers in Nova Scotia
- It may not belong in this document but there should be somewhere a one or two page document that outlines the documents required and the process and order in which they happen. The legal folk may be the best ones to do this work. i.e. Agreement, Order, RIAS, etc.
- **Environmental Assessment:** On the recommendation of the federal Minister of the Environment and by order, the exemption of a designated project from the application of CEAA 2012 by the Governor in Council under conditions specified in CEAA 2012, if an equivalent EA is conducted by a province. (Source: Practitioners Glossary for the Environmental Assessment of Designated Projects under the Canadian Environmental Assessment Act, 2012)
- Where equivalency is agreed to on a project, there would be no federal Environmental Assessment and therefore no determination on the significance of effects by the federal Minister of Environment. There may be specific federal approvals required for the project under other federal legislation and those ministers would retain their decision making authority.
- **Environmental Assessment:** Equivalency refers to the ability for an Environmental Assessment jurisdiction to determine that the Environmental Assessment process and requirements of another jurisdiction are "equivalent" to its own. When such a

Comment [k1]: As noted the lawyers have significant input to the process but at the end of the day it is a decision of the federal minister. This should be clearly stated as as not to let him/her off the hook.

determination is made, the Environmental Assessment process and requirements of the jurisdiction making the equivalency determination will not apply to the project. Moreover, the equivalent jurisdiction will obtain regulatory decision-making authorities regarding project approval. (Source: CCME Environmental Assessment Task Group, 2009)

Administrative Agreement

- Shifts responsibility but not accountability to the province.
- Under an administrative agreement, one order of government agrees to administer aspects of the regulations on behalf of the other. Both orders of government retain their legal authorities and responsibilities. There is no delegation of legislative power.
- Administrative Agreements are working arrangements between the federal government and provincial and territorial governments to streamline efforts in administering regulations. The agreements usually cover activities such as inspections, enforcement, monitoring and reporting
- Examples: Canada-Alberta Administrative Agreement for the Control of Deposits of Deleterious Substances under the Fisheries Act

Substitution

- Hybrid tool: the provincial process is used, but federal government retains accountability and decision making authority

Environmental Assessment: A provision under CEAA 2012 that provides, under certain conditions, for the Environmental Assessment process of a province to be substituted by the Minister for the conduct of an Environmental Assessment of a designated project by the Agency.

- The Minister of the Environment must approve substitution at the request of a province ... if the Minister is of the opinion that the Environmental Assessment process would be an appropriate substitute and all the conditions as specified in CEAA 2012 or any additional conditions set by the Minister will be met. The Minister retains the Environmental Assessment decision-making authority.
- An Environmental Assessment of a designated project that is to be conducted by the National Energy Board or the Canadian Nuclear Safety Commission or designated projects referred by the Minister to review panels cannot be substituted.

(Source: Environmental Assessment (CEAA Glossary) Practitioners Glossary for the Environmental Assessment of Designated Projects under the Canadian Environmental Assessment Act, 2012)

Environmental Assessment: Substitution refers to the possibility of the EA process and requirements of one jurisdiction to be substituted for those of another EA jurisdiction. In

such a situation, the substitute process would be deemed to meet the requirements of the jurisdiction agreeing to the substitution. (Source: CCME Environmental Assessment Task Group, 2009)

Examples: Canada/British Columbia Memorandum of Understanding on Substitution of Environmental Assessments (overarching agreement)

Delegation

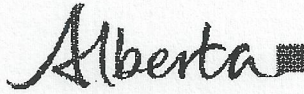
- Appears to be similar to an administrative agreement: shifts responsibility, but not accountability, to the province.
- Delegation (in its legal meaning) of federal authority is not something that would occur in an agreement. It does not appear that the federal government can delegate its authority to the province due to the Constitutional division of powers – the provinces cannot have legal authority over areas within the exclusive jurisdiction of the federal government.
- More information is needed on how the federal government (Fisheries and Oceans) defines delegation.
- In some cases, there is the potential for the ESRD staff to be designated as federal officers – e.g. as fishery officers under the Fisheries Act. This would not be delegation, but rather an administrative arrangement between the two governments.
- Examples: ?

Other Options

Federal implementation

- The federal government implements its own legislation/regulations. Alberta implements its own regime and does not agree to take on any federal roles or responsibilities. This may result in dual regulation.

24 (1) (a)



Environment and Sustainable Resource
Development

Assistant Deputy Minister
11 Floor, South Petroleum Plaza
9915 - 108 Street
Edmonton, Alberta T5K 2G8
Canada
Telephone: 780-422-8463
Fax: 780-415-9669
www.alberta.ca

October 2, 2012

Mr. Mike Beale
Associate Assistant Deputy Minister
Environment Canada
351 St Joseph Blvd
Gatineau, Quebec K1A 0H3

Dear Mr. Beale: *Mike*

Please find attached a number of key questions and inquiries that the Government of Alberta has for Environment Canada related to the finalization of an equivalency agreement on the proposed federal regulation of coal-fired electricity. I look forward to your reply on this important matter.

Please contact me if you have any questions.

Sincerely,

Shannon Flint
Assistant Deputy Minister

Enclosure: Attachment 1

Attachment 1: Alberta's Key Questions Regarding an Equivalency Agreement with the Government of Canada for the Federal Regulation of Coal-Fired Electricity

Alberta is interested in pursuing an equivalency agreement with Environment Canada in order to deliver on the outcomes of proposed federal regulation of coal-fired electricity under a provincial framework; however, some questions remain on key items that we would like to discuss before we can move forward.

Outcomes basis:

Alberta feels that the outcomes basis of equivalency is paramount. Equivalency on an outcomes basis will allow the province to deliver the sector reductions without necessarily shutting down plants on an arbitrary schedule. We are encouraged that the proposal for equivalency to the coal-fired regulation reaches more broadly than the regulation and includes all electricity production to the grid allowing full access to fleet flexibility. Alberta feels this scope must extend to include industrial self-generation (including cogeneration) since an open and level playing field between generators is necessary to the functioning of Alberta's electricity market.

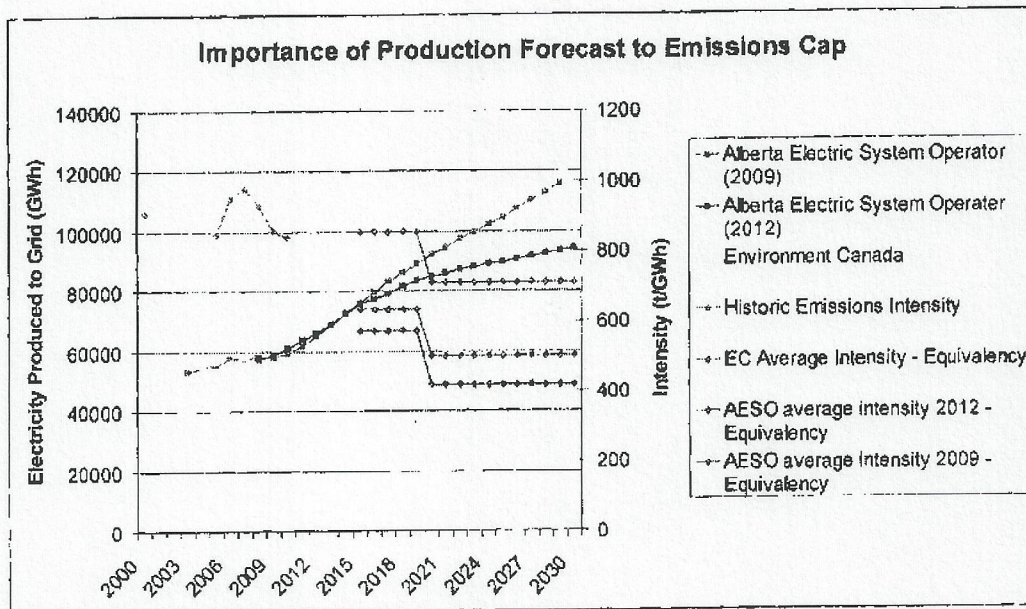
Cross-sector crediting:

Alberta is in the somewhat unusual position of having a number of sectors which will likely to be subject to federal greenhouse gas regulation. We feel that it is necessary to position individual sector equivalency agreements within an overarching framework that would allow emissions saved in excess of what is required in an individual sector to be recognized in another sector that is also under an equivalency agreement, or banked for a future time period. This flexibility is crucial for provinces with multiple regulated sectors to efficiently deliver reductions. This approach is compatible with the likely sequencing of regulation and equivalency over several years.

The current proposed outcome for equivalency in the electricity sector is a cumulative emission cap of 236.9 Mt for 2015 to 2019 and 483.1 Mt for the 2020 to 2030 (sec. 4.1). It is important to note that the proposed Environment Canada regulation does not act as a cap on either electricity generation or emissions.

Issues regarding forecasting

The figure below shows provincial generation as forecast by the Alberta Electrical System Operator in 2009 and in 2012, and by Environment Canada. It also shows the historic generation intensity as well as average generation intensity that would be required to meet the proposed equivalency agreement under the different production forecasts.



These different average intensities imply very different compositions of generation within Alberta, very different investments by generators and very different costs to consumers.

Forecasts of future generation, especially distant forecasts, will always be uncertain and building an equivalency agreement based on a production forecast creates significant risk for both parties.

This risk could be mitigated by:

- evaluating equivalency based on average intensities in which case the implied intensities of 856 t/GWh from 2015 to 2019 and 709 t/GWh from 2020 to 2030 would be acceptable (sec 4.1)
- agreeing to a common production forecast and revisiting actual production annually to make sure it is tracking to the forecast. If the AESO 2012 forecast is used as a starting point then emissions caps of 320 Mt for 2015 to 2019 and 684 Mt for 2020 to 2030 would be appropriate under the current definition of the sector (sec 4.1).

Compliance Flexibility

Alberta recognizes the objective of Environment Canada to achieve some level of emissions certainty for 2020 and, consistent with this goal, feels that all low cost domestic reductions purchased by Alberta generators in Alberta or from other parts of Canada should be credited under equivalency. This compliance flexibility is critically important to making short-term reductions in sectors where capital stock turnover times are measured in decades.

Mid-life BLIERS

The impact of sector equivalency on the mid-life Base Level Industrial Emissions Requirements (BLIERS) also needs to be better understood. Assumed impacts on criteria air contaminants from the end of life coal regulation may not hold under provincial equivalency. Alberta would strongly prefer to continue the application of the air emissions framework developed through the Clean Air Strategic Alliance rather than have mid-life BLIERS apply to existing coal plants. Perhaps some of the same equivalency principles could apply.

I look forward to working closely with you in resolving these issues which would allow us to move forward in pursuing equivalency for the electricity sector. Below are detailed questions we have posed to your staff, and I thank you for the continued dialogue to respond to these inquiries.

Specific Questions on Equivalency:

Accounting

- Will the method of performance measurement be specified in detail in the equivalency agreement?
 - For example, treatment of biomass emissions
- Will retirement of green attributes to the province will be required in accounting for renewable electricity and others that separate green attributes?
- Will accounting attribute reductions through low cost domestic reductions to the jurisdiction that purchases them?
- Will this necessarily extend to attributing LCDRs to the sector which retires them or is that at the discretion of the province?
- How will historic provincial offsets (which are bankable) be handled if retired for compliance during an equivalency window?
- We assume that reductions counted towards equivalency need to be beyond provincial regulatory measure already in place such as the SGER in its current form. What might this mean with respect to provincial carbon capture and storage projects?

Equivalent Outcomes

- Does Environment Canada have strict requirements for physical in sector reductions in some sectors beyond a requirement for a level of compliance from those sectors?
- Is Environment Canada open to banking reductions made in excess of those required to meet equivalency in one time period forwards in time to a subsequent time period? If no please elaborate.
- Is Environment Canada open to transferring reductions made in excess of those required to meet equivalency in one sector to another sector under provincial equivalency? If no please elaborate.
- Alternatively is Environment Canada willing to entertain a single equivalency agreement for provincial emissions that is updated with each subsequent federal regulation?
- What is the timing of the Environment Canada analysis of the impact of provincial measure? Will there be an opportunity to confirm the projected impacts of potential provincial measures before they are brought forward provincially as regulation.
- It seems the examples of equivalency agreements we have seen so far translate federal regulation into an emissions cap in instances when the regulation does not actually act as an emissions cap. Has total emissions been specified as the only available metric for provincial equivalency?
 - Other metrics are possible and potentially align more closely with the federal regulations, such as sectoral intensity schedules. Are these metrics being considered for equivalency?
 - If total emissions are the metric of choice does Environment Canada propose a method for addressing sectoral output uncertainty which poses a significant risk for both parties to the equivalency agreement?
 - Is there an opportunity to work with Environment Canada to ensure the best, most appropriate, output forecasts are being used?
- Greenhouse gas reductions resulting from spending of money collected to provincial technology funds has associated uncertainty and is delayed in time but Alberta feels is critical to achieving deep long term reductions, especially in the oil sands sector where

technology improvement is not likely to come from other parts of the world. It would be useful to have a dialogue on this topic and to get clear sense for how Environment Canada intends to model reductions resulting from technology funding in planning our regulations to satisfy equivalency, i.e. in evaluating proposed provincial regulations how will technology fund contributions be treated?

Electricity

- Alberta is encouraged that equivalency is being considered on the sector while the regulation is specific to coal. Can this be extended to behind the fence (industrial self-) generation? This generation directly impacts the amount of demand on the Alberta electrical grid and is directly tied to output in the sector.
- Timing is an issue for Alberta as regulations on coal-fired electricity are likely to be in place in advance of regulations for oil and gas being finalized. The reality of the Alberta electrical system is that cogeneration in oil and gas is significant and could be more so in the future. If we wished to pursue equivalency in the electricity sector how could we move forward to resolve some of these uncertainties?
- Is Environment Canada planning on regulating emissions from natural gas generation of electricity, creating additional incentives for renewables or other policies impacting the electricity sector? If yes or in the hypothetical case how would this impact equivalency agreements contemplated for the sector as a whole?
- Provincial regulation under equivalency to the federal coal regulation could achieve equal greenhouse gas outcomes but have different impacts on criteria air contaminants which were part of the benefits put forward in the RIAS. Would this be accounted for? In what ways?

Process on Federal Coal Regulation Equivalency

The federal government has now rolled out the "Gazette 2" version of their coal regulation and the GoA must determine their options and path forward. The timing for these conversations with the federal government are less than ideal as we are working on a renewal of our 2008 Climate Change Strategy and would prefer to have a better understanding of our own overall policy direction before engaging in discussions about one specific sub-sector. This being the real world, the federal government are committed to their timelines and approach which leaves us a couple of choices:

- pursue equivalency (with what conditions),
- allow the federal government to regulate this sector, or
- seek to overturn the Federal regulation through the political process (unlikely to occur)

Our direction to date has been and remains to pursue an equivalency agreement as the path most likely to meet Alberta's needs. Alberta has no problem in principle with strict regulations for the coal fired power sector but has some real concerns with the methods and timing. The current version of the federal regulation has gone some distance to meet Alberta's concerns.

This issue must be understood and pursued by the GoA in conjunction with the "mid-life BLIERS for coal plants" conversations that are taking place, as the combination of the two has the potential to cause serious economic harm to the industry and also place the reliable supply of electricity in jeopardy. The two conversations within the federal government do not seem to be coordinated and they must be as it is the compounding of the two initiatives that has the potential to cause significant harm to the industry and the reliability of Alberta's power grid. We need to insist that the two conversations be joined.

In order to assist the decision making process the following steps have been undertaken:

Discussion with Government of Canada:

Conversations have taken place with Environment Canada in an attempt to clarify various questions. (See notes from John Storey-Bishop). The gist of the conversations to date indicate that they are willing to enter into equivalency agreements, yet they are not willing to move on in-sector emissions targets. They are open to some limited flexibility mechanisms from within the electricity sector, but not to compliance mechanisms from other sectors.

The federal government's ongoing roll out of regulations and the impact of other upcoming federal regulations (such as gas generation) will impact the amount of flexibility we have to negotiate on the coal requirements. Their approach is not an easy thing for our system to work with and some discussion of how we handle this on an ongoing basis needs to take place.

Our preferred approach is to have our strategy renewal complete prior to engaging in a sector by sector arm-wrestle with the federal government. There is a fundamentally different philosophy in the two approaches (top-down, economy-wide approach vs. bottom-up sectoral performance targets) and aligning the two may be difficult. There is some concern that we may agree to something early on that will tie our hands for other sectors.

Discussions with other GoA Departments

Alberta Energy has been involved in analyzing the potential impact of the federal coal regulation on the electricity system as a whole, on the PPA buyers and the Balancing Pool, on individual facilities, and on consumer costs for electricity. This conversation includes the potential impact of the proposed mid-life BLIERS for coal plants. The assumption in these conversations has been that the power will be replaced by gas-fired generation. The likely availability of cheap natural gas for the foreseeable future makes this a likely outcome even in the absence of the coal regulation, but the timelines and flexibility allowed are major issues for Alberta. The staff from Alberta Energy are on side with our desire to broaden the conversation to look at ALL federal initiatives that impact the coal sector.

Discussion with Industry

Some Industry players have indicated that, in light of the federal GHG requirements, they would like to be absolved of their commitments to reduce NO_x and SO₂ under the CASA EPT framework. The Government of Alberta has maintained its commitment to the CASA framework and its opposition to mid life BLIERS. Industry should be asked to explain why the GHG rules make the CASA framework requirements unachievable. They may have a case - a plant that is shut after 50 years due to GHG rules will only have 7 – 10 years to cover the costs of meeting the CASA standards rather than the anticipated 40 years.

The PPAs and the “change in law” provisions, which impact who will be required to pay for mid life BLIERS (PPA buyers?), will be a factor in the discussion with Industry, who may prefer an earlier bill for BLIERS that they don’t have to pay for rather than a later bill that they do under the CASA framework. The CASA requirements for NO_x and SO₂ don’t kick in until the expiry of the PPAs. Staff from Alberta Energy are seeking some input from their legal staff on how this might impact the PPAs.

Nicole Spears is planning a meeting with the coal fired sector.

Drafting of Potential Equivalency Agreement

We have drafted the wording for an equivalency agreement, which has been reviewed and sent out for comment internally.

Completing the agreement will require legally binding tools (i.e. regulation) in place. The changes that will be required to the Act and to SGER will need to be mapped out and the texts prepared. This will then have to be entered in through the legislative system.

Given the piecemeal nature of the federal approach there may ultimately need to be a series of agreements or amendments to a larger agreement. This may require a lot of work from the legislative planning folk and will need to be discussed with them.

Process forward:

- Seek Clarity on issues of concern for Alberta (Based on John's list) from the federal government. This should include sounding out what they are willing/able to move on at the staff level and what they aren't. Some issues may need to be elevated to the political level to get confirmation of the items that have been deemed off the table by federal government staff. This includes in-sector only emissions reductions and mid life BLIERS for coal plants.
- Meet with Industry (Nicole organizing) to discuss overall impacts of:
 - a. Federal GHG regulation
 - b. Mid-life BLIERS
 - c. PPAs
 - d. CASA EPT framework
- Determine the critical needs for Alberta
 - a. Electricity system MUST be viable and include room for growth in Alberta economy
 - b. Environmental requirements can be tough but should not push Industry into insolvency or place the stability of the system in jeopardy. Reasonable lead times and amortization for investment in technology must be allowed for (a problem if both mid-life BLIERS and GHG shut-down are enacted).
 - c. Alberta will regulate industries that are critical to the province's economy, such as the Energy industry.
- Work with IIR, AESRD and Energy to determine the most appropriate negotiating stance to meet Alberta's needs.

Section 21 - Disclosure harmful to intergovernmental relations

21(1) The head of a public body may refuse to disclose information to an applicant if the disclosure could reasonably be expected to

(a) harm relations between the Government of Alberta or its agencies and any of the following or their agencies:

(i) the Government of Canada or a province or territory of Canada,

(ii) a local government body,

(iii) an aboriginal organization that exercises government functions, including

(A) the council of a band as defined in the *Indian Act* (Canada), and

(B) an organization established to negotiate or implement, on behalf of aboriginal people, a treaty or land claim agreement with the Government of Canada,

(iv) the government of a foreign state, or

(v) an international organization of states, or

or

(b) reveal information supplied, explicitly or implicitly, in confidence by a government, local government body or an organization listed in clause (a) or its agencies.

(2) The head of a public body may disclose information referred to in subsection (1)(a) only with the consent of the Minister in consultation with the Executive Council.

(3) The head of a public body may disclose information referred to in subsection (1)(b) only with the consent of the government, local government body or organization that supplies the information, or its agency.

(4) This section does not apply to information that has been in existence in a record for 15 years or more.

1994 cF-18.5 s20;1995 c17 s9;1999 c23 s13

Section 24 Advice from officials

24(1) The head of a public body may refuse to disclose information to an applicant if the disclosure could reasonably be expected to reveal

- (a) advice, proposals, recommendations, analyses or policy options developed by or for a public body or a member of the Executive Council,
 - (b) consultations or deliberations involving
 - (i) officers or employees of a public body,
 - (ii) a member of the Executive Council, or
 - (iii) the staff of a member of the Executive Council,
 - (c) positions, plans, procedures, criteria or instructions developed for the purpose of contractual or other negotiations by or on behalf of the Government of Alberta or a public body, or considerations that relate to those negotiations,
 - (d) plans relating to the management of personnel or the administration of a public body that have not yet been implemented,
 - (e) the contents of draft legislation, regulations and orders of members of the Executive Council or the Lieutenant Governor in Council,
 - (f) the contents of agendas or minutes of meetings
 - (i) of the governing body of an agency, board, commission, corporation, office or other body that is designated as a public body in the regulations, or
 - (ii) of a committee of a governing body referred to in subclause (i),
 - (g) information, including the proposed plans, policies or projects of a public body, the disclosure of which could reasonably be expected to result in disclosure of a pending policy or budgetary decision, or
 - (h) the contents of a formal research or audit report that in the opinion of the head of the public body is incomplete unless no progress has been made on the report for at least 3 years.
- (2) This section does not apply to information that
- (a) has been in existence for 15 years or more,
 - (b) is a statement of the reasons for a decision that is made in the exercise of a discretionary power or an adjudicative function,
 - (c) is the result of product or environmental testing carried out by or for a public body, that is complete or on which no progress has been made for at least 3 years, unless the testing was done
 - (i) for a fee as a service to a person other than a public body, or