

From: Anthony Martinello [/O=EXCHANGELABS/OU=EXCHANGE ADMINISTRATIVE GROUP (FYDIBOHF23SPDLT)/CN=RECIPIENTS/CN=3FB7D76317B34780B15D96309B995C31-ANTHONY MAR]
Sent: 2017-10-02 1:10:32 PM
To: LAURETA LAPIRA May -TREASURY [may.lapira@opg.com]
CC: Kim Marshall [/o=ExchangeLabs/ou=Exchange Administrative Group (FYDIBOHF23SPDLT)/cn=Recipients/cn=b63a22b42bf14587870d93119a054d88-Kim Marshall]; Jeannette Briggs [/o=ExchangeLabs/ou=Exchange Administrative Group (FYDIBOHF23SPDLT)/cn=Recipients/cn=148095610f7242f48a5a9da24b1a8a87-Jeannette B]; Michael Boll [/o=ExchangeLabs/ou=Exchange Administrative Group (FYDIBOHF23SPDLT)/cn=Recipients/cn=4811917e15054407b665fe16d12ff415-Michael Bol]; LEE John -TREASURY [john.s.lee@opg.com]; RYFA Ken -TREASURY [ken.ryfa@opg.com]; GO Matthew -TREASURY [matthew.go@opg.com]; WONG Leslie -LAWDIV [leslie.wong@opg.com]; Hamlet Alexanian [/o=ExchangeLabs/ou=Exchange Administrative Group (FYDIBOHF23SPDLT)/cn=Recipients/cn=d0fcff8aeea84848ba5a12380ec04460-Hamlet Alex]
Subject: RE: Estimate of LC
Attachments: Estimated Requirement for IESO LC Unrated LDC remittance FAA model - toxlsx

May,

Below are my comments for further consideration/discussion.

The numbers quoted below are to be double checked / given a quality assurance review.

IESO's rated LDCs (rated for the entity itself and/or the parent):

- These rated LDCs represent approximately 71% to 79% of total billings for all IESO LDCs;
- Includes such LDCs as Guelph Hydro, and Waterloo-North Hydro;
- Toronto Hydro is rated one-notch above Waterloo-North's rating and yet Toronto Hydro has approximately 14-17 times larger billings than Waterloo-North;

IESO's non-rated LDCs have the following general characteristics:

- Non-rated can be small LDCs to moderate sized LDCs;
- Includes such LDCs as Oakville Hydro, and Burlington Hydro which each are generally comparable in their size of billings to either Guelph Hydro or Waterloo-North Hydro;

Observation for IESO & OPG consideration/discussion : an argument could be made that many or all of the non-rated LDCs have a similar creditworthiness of those that are rated LDCs (or one-notch lower rating etc.):

- Each LDC whether rated or non-rated has their own unique mix of customer bases (i.e. residential, small-med-large commercial, industrial etc) and, in addition, each LDC has its own unique financial management/solvency characteristics;
- But, all LDCs provide "electricity distribution services" and all have regulatory oversight by the OEB;
- If some non-rated LDCs sought a real-life credit rating, one could argue that they could receive a similar/comparable credit rating as those whom are rated LDCs (e.g. Oakville Hydro ~ Waterloo North, etc);
- An argument could also be made that the mix of customer bases/financial mgmt. may pose less credit risk characteristics in some non-rated LDCs than in some rated LDCs;
- An argument could be made that if a non-rated LDC were to enter into court creditor protection, a likely scenario is that the LDC would still continue to provide "electricity distribution services" and continue to receive customer payments while it seeks to re-structure and leave creditor protection;
- An argument is its likely better to assign "proxy" credit ratings to those non-rated LDCs (e.g. Oakville Hydro could be given the same rating as Waterloo-North Hydro, etc.) in order to give them a fair assessment of their creditworthiness (e.g. if Waterloo North has "A" rating, Oakville could be assigned a proxy "A" rating, etc.);

- Once all non-rated LDCs have been assigned a “proxy” credit ratings – then we can look to Moody, DBRS, or S&P for their statistical data on the probability for a specific rating to default (e.g. Moody’s reports annually on the likelihood of a specific rating to default – e.g. an “A2” rating has a probability of 0.28% of default, etc.)
- Also, the statistical data should be refined to examine specific LDCs risk or at least utilities industry risk rather than a general corporate default risk, since LDCs (e.g. Toronto Hydro) typically have a low credit risk profile than an equally rated generic corporation (e.g. IBM or Suncor, etc);
- Rather than assigning all of Oakville Hydro’s CEA receipts as 100% at risk, the arguments from above is to a) apply a proxy credit rating and b) then calculate the expected probability of those Oakville’s CEA receipts to default in the year – e.g. 0.28%, etc..

In the end, I expect that the L/C amount to be smaller than purported in the estimated spreadsheet and also right-sized to the comparable real life risk of expected default.

Regards.

From: LAURETA LAPIRA May -TREASURY [mailto:may.lapira@opg.com]

Sent: September 27, 2017 9:01 PM

To: Anthony Martinello

Cc: Kim Marshall; Jeannette Briggs; Michael Boll; LEE John -TREASURY; RYFA Ken -TREASURY; GO Matthew -TREASURY; WONG Leslie -LAWDIV

Subject: Estimate of LC

Hi Anthony,

I have provided responses to your questions below in blue font. Please let me know if you have any follow up questions or comments.

Thanks,
May

May Laureta Lapira, CPA, CA | Senior Manager, Treasury | Ontario Power Generation

700 University Avenue, H18, Toronto, Ontario M5G 1X6 | T 416.592.3721 | E May.Lapira@opg.com

From: Anthony Martinello [mailto:Anthony.Martinello@ieso.ca]

Sent: Thursday, September 21, 2017 1:23 PM

To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>; LEE John -TREASURY <john.s.lee@opg.com>; GO Matthew -TREASURY <matthew.go@opg.com>

Cc: Michael Boll <Michael.Boll@ieso.ca>; Jeannette Briggs <jeannette.briggs@ieso.ca>; Kim Marshall <Kim.Marshall@ieso.ca>

Subject: EXTERNAL – IESO accounting issue with LCs

*** Exercise caution. This is an EXTERNAL email. DO NOT open attachments or click links from unknown senders or unexpected email. ***

May,

As noted in my email last week, regarding the proposed posting of an IESO letter of credit, can you provide:

-the quantum of the L/C amount – does the amount need to change;

The amount of the LC would be driven by credit rating agency requirements but for discussion purposes, we have done a prelim calc of what that LC requirement might look like. The attached takes the estimated CEA for every year it is being collected, assumed to start at year 2022 and estimates the amount of CEA that would be going through non-rated LDCs using three different periods of 30 days, 45 days, and 60 days.

The number of days represents how long LDCs hold customer remittances before sending to the IESO and the estimated CEAs are based on the latest information we have on how the fair allocation amount would look like. This assumes that 25% of customer dollar value is handled through unrated and non investment grade LDCs. Based on this, the range of credit exposure during the life of the program are as follows:

- \$13M to \$41M under the 30-day assumption
- \$20M to \$62M under the 45-day assumption; and
- \$27M to \$80M under the 60-day assumption.

Again, as noted above, the actual LC requirement would be driven by rating agencies' requirements but the ranges above can be used for discussion purposes. Just a side note because I know we threw a \$50M LC out there earlier – that was a ballpark figure that assumed 25% of a \$200M CEA monthly amount.

-how/why the amount is reasonable;

Pls see discussion above on how we modelled the calculations and the assumptions used. We can discuss if you think the assumptions need to be tweaked.

-specific when the financing entity would make any draws (e.g. only when LDCs enter into CCAA/bankruptcy);

Default events have not been defined yet, it's something that still needs to be discussed with the dealers and their counsel but the initial thought is that it's for any default events related to non-rated LDCs.

-when and or how long would the I/c be active;

For the duration of the program i.e. until 2047

Yesterday, Torys (Rima) mentioned that any IESO I/c provisions would need to be baked into the MTSA and so the above will provide the IESO / KPMG with much needed starting rationale regarding the purpose/amount of the I/c.

Regards.

From: LAURETA LAPIRA May -TREASURY [<mailto:may.lapira@opg.com>]
Sent: September 12, 2017 10:54 AM
To: Anthony Martinello
Cc: LEE John -TREASURY
Subject: RE: EXTERNAL – Re: IESO accounting issue with LCs

Hi Anthony,

Thanks for the update. I've cc'd John to include him in the loop as he needs an update for the Thursday risk mitigation meeting. Did KPMG give you a timeline of when they will advise you if there are accounting issues with the proposal?

On the matter of true-up mechanism and the reserve accounts, those mechanisms reside within the FHP Trust, so OPG cannot make use of them. Per my email below, the real issue is we have is on the accounting/consolidation and the negative credit rating implications. (i.e. OPG posting the LCs for non-rated LDCs when we don't have a business case as a commercial entity to provide the credit support will impact our ability to consolidate the Trust. Furthermore, this

obligation will undermine the objective of having OPG ring fenced from the FHP activities and will also negatively impact OPG's credit ratings).

May

From: Anthony Martinello [<mailto:Anthony.Martinello@ieso.ca>]

Sent: Tuesday, September 12, 2017 10:15 AM

To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>

Subject: EXTERNAL – Re: IESO accounting issue with LCs

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May,

We have not heard back in a formal manner from KPMG and will advise.

In general if the IESO is to post a letter of credit:

- there is likely a need for a new/updated regulation to be made to accommodate such action;
- the IESO and OPG will need determine what L/C amount is reasonable with supportive data/analysis to support the qual/quant of the amount;
- the annual costs to have the L/C would likely be scrutinized by stakeholders and externals – and value for money will be key etc;
- the IESO still needs to obtain KPMG's view on any acctg issues/impacts;
- we should consider if alternative instruments such as a letter of guarantee or other maybe be more cost effective than a letter of credit

As discussed last week – rather than rely on an IESO letter of credit:

- I suggested that OPG needs to revisit and determine on whether a) the true-up mechanism and/or b) the reserve account(s) mechanism could be utilized.....especially since these are both already built into the existing Fair Hydro act/regs. If not viable options, I suggested that OPG needs to explain why these two mechanisms cannot be utilized (e.g. is it an accounting issue, credit rating issue, interim funding issue?? Etc.). I think you mentioned that OPG could not fund the reserve account – but am not sure what this means.

Also, as discussed, after the initial 4 year moratorium, the Clean Energy Adjust amounts (post – 4 years) is simply a pass-thru from LDCs to the Financing Entity. The IESO is just a servicer and therefore the IESO has no obligation....which poses a question as to why does the IESO need to post a letter of credit.

Maybe the credit rating agencies may need more color on the IESO's role especially throughout this program given that the IESO will continue to run the electricity markets while also servicing the CEA.

Regards.

From: LAURETA LAPIRA May -TREASURY [<mailto:may.lapira@opg.com>]

Sent: September 11, 2017 4:28 PM

To: Anthony Martinello

Subject: RE: EXTERNAL – Re: IESO accounting issue with LCs

Hi Anthony – just wondering if you heard back from Michel on the accounting matter?

Per our discussion last week, OPG posting the LCs for non-rated LDCs when we don't have a business case as a commercial entity to provide the credit support will impact our ability to consolidate the Trust. Furthermore, this obligation will undermine the objective of having OPG ring fenced from the FHP activities and will also negatively impact OPG's credit ratings.

Without the IESO's support, we also expect the rating of the debt to be issued by the Trust to be negatively impacted. My understanding from our discussion last week is that the IESO will not suffer any similar impacts other than this potential issue to de-recognize?

From: Anthony Martinello [<mailto:Anthony.Martinello@ieso.ca>]
Sent: Friday, September 08, 2017 7:22 AM
To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>
Subject: RE: EXTERNAL – Re: IESO accounting issue with LCs

No problem. I am in meetings this morning. How does today in afternoon work – say 2:30pm?

Regards.

From: LAURETA LAPIRA May -TREASURY [<mailto:may.lapira@opg.com>]
Sent: September 07, 2017 11:40 PM
To: Anthony Martinello
Subject: RE: EXTERNAL – Re: IESO accounting issue with LCs

So sorry Anthony, I was in meetings all afternoon. Can I call tomorrow morning after 10:30?

From: Anthony Martinello [<mailto:Anthony.Martinello@ieso.ca>]
Sent: Thursday, September 07, 2017 12:14 PM
To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>
Subject: EXTERNAL – Re: IESO accounting issue with LCs

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May – please give me a quick call back 905-403-6944,... I have two additional points to discuss.

From: LAURETA LAPIRA May -TREASURY [<mailto:may.lapira@opg.com>]
Sent: September 07, 2017 8:45 AM
To: Anthony Martinello
Subject: RE: EXTERNAL – Re: IESO accounting issue with LCs

That's ok. I sent you an invite for 11 – talk then.

From: Anthony Martinello [<mailto:Anthony.Martinello@ieso.ca>]
Sent: Thursday, September 07, 2017 7:37 AM
To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>
Subject: EXTERNAL – Re: IESO accounting issue with LCs

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Fyi My 10am was booked overnight for another meeting.

Regards.

From: may.lapira@opg.com
Sent: September 6, 2017 5:35 PM
To: Anthony.Martinello@ieso.ca
Subject: Re: EXTERNAL – IESO accounting issue with LCs

Sounds good, talk to you then!

Sent with BlackBerry Work

(<https://na01.safelinks.protection.outlook.com/?url=www.blackberry.com&data=01%7C01%7CAnthony.martinello%40ieso.ca%7C4bed977e4b1143e3637608d4f56f316d%7C7cd55abd63f243c58f4bd38ea458add8%7C0&sdata=ZysjxOxdP01U3rB%2Fg6VVHQlIrP0CjskCoCkCw74RoQU%3D&reserved=0>)

From: Anthony Martinello <Anthony.Martinello@ieso.ca>
Sent: Sep 6, 2017 5:34 PM
To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>
Subject: EXTERNAL – IESO accounting issue with LCs

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Please call me @ 905-403-6944 at 10am or 11am tomorrow. Regards.

-----Original Message-----

From: LAURETA LAPIRA May -TREASURY [mailto:may.lapira@opg.com]
Sent: September 06, 2017 4:52 PM
To: Anthony Martinello
Subject: FW: EXTERNAL – RE: IESO accounting issue with LCs

Hi Anthony - can I give you a call tomorrow morning to chat about the IESO's accounting position/issue with this? I just want to get an understanding of what the issue IESO is facing so we can move it ahead. Not sure if you're the right person but I thought I'd try you first given Kim is busy. I am available any time in the morning of Thursday, Sep 7th.

Thanks,
May

May Laureta Lapira, CPA, CA | Senior Manager, Treasury | Ontario Power Generation
700 University Avenue, Toronto ON M5G 1X6 | Tel: (416) 592-3721 | Fax: (416) 592-7758 |E-mail: may.lapira@opg.com

-----Original Message-----

From: Kim Marshall [mailto:Kim.Marshall@ieso.ca]
Sent: Wednesday, September 06, 2017 7:36 AM
To: LAURETA LAPIRA May -TREASURY <may.lapira@opg.com>
Cc: LEE John -TREASURY <john.s.lee@opg.com>; Michael Boll <Michael.Boll@ieso.ca>; Anthony Martinello <Anthony.Martinello@ieso.ca>
Subject: EXTERNAL – RE: IESO accounting issue with LCs

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May, thanks for your email. Our view may be broader than accounting but happy to discuss. I am copying Michael Boll and Anthony Martinello to see if you can connect with the this week. My week is busy but could join a call early next week, thanks

Kimberly Marshall | VP, Corporate Services & CFO Independent Electricity System Operator (IESO) | T: (416) 969-6232 | C: (416) 545-7202

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-----Original Message-----

From: LAURETA LAPIRA May -TREASURY [mailto:may.lapira@opg.com]

Sent: September 05, 2017 6:21 PM

To: Kim Marshall

Cc: LEE John -TREASURY

Subject: IESO accounting issue with LCs

Hi Kim,

John asked me to follow up on the potential accounting issue relating to the scenario where the IESO posts letters of credits for non-rated LDCs to address liquidity/credit risk. Is there someone in your team I can speak to so we can get an understanding of the potential issue? Pls let me know and I can arrange for a call with our auditors.

Thank you,

May Lapira

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