

EB-2011-0054

IN THE MATTER OF the *Ontario Energy Board Act, 1998*,
S.O. 1998, c. 15, (Schedule B);

AND IN THE MATTER OF an application by Hydro Ottawa
Limited for an order approving or fixing just and reasonable
rates and other charges for the distribution of electricity to
be effective January 1, 2012.

BEFORE: Marika Hare
Presiding Member

Ken Quesnelle
Member

DECISION AND ORDER

(Original December 28, 2011, as corrected December 30, 2011)

BACKGROUND

Hydro Ottawa Limited (“Hydro Ottawa” or the “Applicant”) filed an application (the “Application”) with the Ontario Energy Board (the “Board”) on June 17, 2011. The Application was filed under section 78 of the *Ontario Energy Board Act, 1998*, S.O. 1998, c. 15 (Schedule B) (the “Act”), seeking approval for changes to the rates that Hydro Ottawa charges for electricity distribution to be effective January 1, 2012. The Board assigned the Application file number EB-2011-0054.

The Proceeding

The Board issued a Notice of Application and Hearing on July 7, 2011. The Consumers Council of Canada (“CCC”), Energy Probe Research Foundation (“Energy Probe”), School Energy Coalition (“SEC”), Vulnerable Energy Consumers Coalition (“VECC”), Ecology Ottawa and EnviroCentre applied for intervenor status and cost eligibility. PowerStream Inc. (“PowerStream”) and Horizon Utilities Corporation (“Horizon”) applied for observer status. The Board also received a late intervention request from Enersource Hydro Mississauga Inc. No objections were received regarding the requests for intervenor status and observer status, and the Board approved all requests.

Hydro Ottawa objected to the cost eligibility applications of Ecology Ottawa and EnviroCentre stating that neither had met the burden of establishing eligibility for a cost award. The Board considered the objections and determined that EnviroCentre did not meet the eligibility requirements of the Board’s *Practice Direction on Cost Awards*. The Board determined that CCC, Energy Probe, SEC, VECC and Ecology Ottawa are eligible to apply for award of costs.

No letters of comment were received by the Board or by Hydro Ottawa.

In Procedural Order No. 1, issued on July 29, 2011, the Board established a schedule for submissions on the draft issues list, interrogatories and responses, a technical conference, a settlement conference and an oral hearing for any unsettled issues.

In Procedural Order No. 2, issued on August 11, 2011, the Board issued the Approved Issues List.

The facilitated settlement conference on all issues was held on October 13 and 14, 2011. CCC, Energy Probe, SEC and VECC (the “participating intervenors”) participated in the settlement conference. A Settlement Agreement, which incorporated settlement of many issues, but not all, was filed with the Board on November 1, 2011.

A Decision and Procedural Order No. 6 was issued on November 4, 2011 in which the Board accepted the Settlement Agreement. The parties filed a Supplementary Settlement Agreement at the commencement of the oral hearing on November 7, 2011 which narrowed the scope of the issues related to Modified International Financial Reporting Standards (“MIFRS”). The Board approved the settlement of this subset of

issues as filed, but requested full reference to the evidence and interrogatories. The document, compliant with the Board request, was re-filed on November 10, 2011.

The Settlement Agreement filed on November 1, 2011 and approved by the Board is provided at Appendix A to this Decision. The Supplementary Settlement Agreement filed on November 10, 2011 is provided at Appendix B to this Decision.

The Board's findings with respect to the issues that were not settled are set out below. Hydro Ottawa's Application was completed on a Canadian Generally Accepted Accounting Principles ("CGAAP") basis, and included a final exhibit that converted the results of the application to MIFRS. Unless otherwise noted, the references below are on a CGAAP basis.

RATE BASE

2.1 Is the proposed rate base for the test year appropriate?

2.2 Is the working capital allowance for the test year appropriate?

As updated on September 14, 2011, Hydro Ottawa proposed a rate base for 2012 in the amount of \$669.1 M on a CGAAP basis and \$670.6 M on a MIFRS basis. Hydro Ottawa and the participating intervenors agreed on the capital expenditure forecast for 2012. Agreement was not reached on the working capital allowance and the capitalization policy and allocation procedure. The latter is discussed in the MIFRS section of this Decision.

Working Capital Allowance

Hydro Ottawa has proposed a working capital allowance ("WCA") factor of 14.2% of the sum of the cost of power and controllable expenses. As noted in the Application, the WCA requirement is \$106.0 M.

In its previous 2008 Cost of Service application, a WCA factor of 12.5% was accepted as part of the Settlement Agreement approved by the Board in its Decision and Order (EB-2007-0713). In this Application, the 14.2% WCA factor was derived as a result of a lead-lag study prepared by Hydro Ottawa and reviewed by Navigant Consulting Inc. ("Navigant").

Energy Probe made detailed submissions that are summarized below. CCC, SEC and VECC supported the submissions of Energy Probe.

Service Lag

During the oral hearing it was confirmed that, while revenue weighting is used for most components of the lead-lag study, customer weighting is used to estimate the service lag.

Board staff submitted that customer weighting overestimates the service lag and that revenue weighting is appropriate. Board staff referred to Energy Probe's cross-examination. That cross-examination reviewed an example in which the service lag based on revenue-weighting was unchanged even when the billing cycles for different customer classes were reversed. Board staff acknowledged that the demand and associated revenues of customers within a class with a common billing cycle (i.e. every month or every two months) is not taken into consideration for the service lag, but noted that most revenues are from customers on monthly billing cycles, while the customer-weighting of the service lag is largely determined by the residential class currently on bi-monthly billing.

Energy Probe submitted that, based on the response to Energy Probe interrogatory #15, a service lag based on revenue weighting would be lower by 8 days and would reduce the WCA factor to less than 12%.¹

Hydro Ottawa replied that customer weighting is more appropriate because it more closely reflects the time between the service being provided and reading of the meter, and that prior to meter readings and a price from the IESO, revenue has not yet been considered. Further, Hydro Ottawa stated that adjustments would need to be made to other components to use revenue weighting in order to be consistent in the analysis.

Collection Lag

Hydro Ottawa used the Days Sales Outstanding ("DSO") approach to determine collection lag. During the oral hearing, the witness from Navigant stated that the use of DSO is an industry standard. Energy Probe submitted that Hydro Ottawa's calculation of collection lag should be rejected as it does not take into account the age of the receivables. Energy Probe suggested that 11.5 days should be the mid-point for the first bucket of receivables. Hydro Ottawa used 16 days, which Navigant stated is the period prescribed by the Board in the Distribution System Code. Based on responses to undertakings (LT1.2 and L1.3) and a mid-point of 11.5 days for the first bucket,

¹ Exh K2-2-5

Energy Probe submitted that the revenue lag should be reduced by a further 2.28 days and that the WCA factor should be 11.0%. This would result in a rate base reduction of \$24.0 M.

Hydro Ottawa disagreed with Energy Probe's submission, stating that some customers will be late or may never pay, the analysis is based on the premise that customers generally wait as long as possible to pay, and the approach is consistent with that used in the rest of the WCA determination – including Hydro Ottawa's payment of suppliers.

Comparison with Other Utilities

Recognizing that comparisons with other utilities are not definitive in themselves, Board staff observed that Hydro Ottawa's proposed WCA factor of 14.2% is higher than the 11.9% approved for Hydro One Networks Inc., 12.9% for Toronto Hydro-Electric System Limited ("THESL") and 13.5% approved for Horizon. In light of Board staff's submission that the customer weighting of the service lag results in an upwardly biased WCA factor, Board staff submitted that a WCA factor within the range of THESL and Horizon may be more appropriate. Energy Probe noted that the Board approved WCA factor for Horizon was virtually identical to that suggested by Energy Probe. However, Horizon differs from Hydro Ottawa as Hydro Ottawa has a larger proportion of bi-monthly billed customers.

Hydro Ottawa replied that the Horizon decision is not an endorsement of revenue weighting of service lag, noting that the Horizon decision approved a 13.5% WCA factor rather than a 13.0% WCA factor that would have resulted from revenue weighting. Hydro Ottawa also observed that the Horizon decision stated that the WCA failed to include the impact of smart meters in reducing WCA. Hydro Ottawa stated that smart meters do not impact the WCA in its Application because there is a dependence on receipt of the IESO pricing. Hydro Ottawa submitted that the proposed 14.2% WCA factor is more consistent with the WCA factor approved for other utilities than the 11.0% proposed by Energy Probe.

Proposed WCA Factor

Hydro Ottawa reviewed Energy Probe's determination of the 11.0% WCA factor in undertaking L1.2. Hydro Ottawa argued that it would be more accurate to first separate customers into monthly and bi-monthly groups and that if the service lag were to be revenue weighted that all components of the revenue lag should be revenue weighted also. Hydro Ottawa determined a WCA factor of 14.4% using this methodology, but

asserted that the 14.2% in its application is the most appropriate WCA factor. Energy Probe submitted that the methodology for the determination of the 14.4% had not been tested.

Hydro Ottawa's proposed 14.2% WCA factor is below the default value of 15% established by the Board for utilities that do not file a lead-lag study. Hydro Ottawa observed that the Board has not approved a WCA factor that approaches 11.0%, and that the Energy Probe proposal is based on only two elements of the WCA calculations without regard to circumstances and the use of an internally consistent approach.

Hydro Ottawa agreed that the WCA should be recalculated to reflect the updated cost of power and approved OM&A.

Monthly Billing

Finally, as Hydro Ottawa plans to move to monthly billing in late 2013 for all its customers, Energy Probe submitted that Hydro Ottawa should be directed to file an updated lead-lag study in its next cost of service application. Hydro Ottawa replied that it intends to file an updated lead-lag study with its next cost of service application, but does not agree that direction from the Board is necessary or appropriate.

Board Findings

Energy Probe has identified several issues with Hydro Ottawa's lead-lag study, however, the Board notes that these issues relate to only two elements of the WCA factor determination. The Board finds that the 11.0% WCA factor proposed by Energy Probe is too low when compared with Hydro One Networks, Horizon and THESL, and this may be the result of changing only two elements in isolation.

In the Horizon proceeding, EB-2010-0131, the Board found that the operational impacts of smart meters and TOU pricing should have been considered in the WCA determination. As a result, the Board directed that a 13.5% WCA factor be used which was also closer to the range of the WCA factor used by Hydro One Networks and THESL than the 14.0% proposed by Horizon.

Hydro Ottawa did consider smart meters and provided the view that they will have no impact on cash flow. This view was not successfully challenged during this proceeding and the Board therefore does not believe the comparability to Horizon to be sufficient to draw a conclusion. While at the same time noting that this argument has not been fully

tested by Board staff and the interveners, the Board is prepared to accept it for now. The Board however, directs that Hydro Ottawa prepare a new lead-lag study for its next cost of service application to reflect the move to monthly billing at the end of 2013. This will allow further examination of the differences in approaches at that time. The Board further notes that it has made this finding with an awareness that the default for Hydro Ottawa for the 2012 year might have been to use the default WCA factor of 15%.

In conclusion, the Board accepts 14.2% as the WCA factor. The determination of working capital is subject to adjustments the Board has determined are appropriate for OM&A.

LOAD FORECASTING AND OPERATING REVENUE

3.1 Is the load forecast methodology including weather normalization appropriate?

3.2 Are the proposed customers/connections and load forecasts (both kWh and kW) for the test year appropriate?

3.4 Is the proposed forecast of test year throughput revenue appropriate?

The customer/connection count for the test year, the impact of CDM on the load forecast, and demand sales were agreed to by Hydro Ottawa and the participating intervenors. Agreement was not reached on energy sales.

Hydro Ottawa used a statistical modeling software program from Itron Inc. to develop its system energy forecast. The model forecast a test year system energy of 8,030 GWh based on historical systems purchases, weather data and GDP data.

The forecast system energy was adjusted by a loss factor to derive a billed load forecast. As noted in Technical Conference undertaking LT2.6, Hydro Ottawa is seeking Board approval for a test year billed load forecast before adjustments of 7,753 GWh. This represents a 1.44% increase from 2010 actual billed load.

Class sales forecast models were also created. The results of these models, totaling 7,880 GWh, were calibrated to the loss adjusted system energy forecast of 7,753 GWh.

Board staff considered the billed sales forecast and compared it with the 2010 normalized actual year load and the growth trend for the period 2005 to 2010. Board staff submitted that the system energy forecast of 7,753 GWh was appropriate.

Energy Probe submitted that there is no reason to calibrate the class sales forecasts to match the system forecast. If the calibration was a conversion of data from billed monthly to calendar monthly, then an equal number of increases and decreases would be expected, however, this was not the case. Energy Probe submitted that the class specific forecast models are statistically valid and that the load forecast should be set at 7,817 GWh – the average of the loss adjusted system forecast, and the sum of sales before calibration. SEC adopted Energy Probe's analysis.

VECC stated that in several 2011 cost of service rate applications, the Board approved customer class specific models to forecast billed energy. VECC also noted that the Board found other distributors provided class specific models that were not satisfactory. VECC observed that the class specific models in Hydro Ottawa's application had reasonable R-squared values, with the exception of the USL class. VECC submitted that the class specific models should be the basis for the load forecast as the Board has accepted this approach unless the results were unsatisfactory. Hydro Ottawa's class specific model results, 7,880 GWh, are reasonable and there is no evidence to suggest that the class specific model accuracy is less than that of the system energy model.

VECC stated that a problem with Board staff's argument was that the comparison was with the 2010 weather normalized sales values, but should have been against class specific values, which were not provided.

Similarly, CCC supported the approach which sums the customer class specific results and found that the calibration step was unnecessary.

Hydro Ottawa replied that the system energy forecast yields a more accurate and reliable result, noting the R-squared value for the system forecast was 0.985, while the class sales forecast R-squared values ranged from 0.718 to 0.961. Hydro Ottawa submitted that the calibration factor brings the billed monthly forecast into line with the calendar month system forecast and that the calibrated results are more accurate than uncalibrated results. Hydro Ottawa submitted that VECC's observations about the Board's decisions in other proceedings do not shed light on this proceeding in the absence of further information on the load forecast models used by the other distributors.

Board Findings

The Board accepts the billed energy forecast of 7,753 GWh for the test year as proposed by Hydro Ottawa. The R-squared value for the system forecast is higher than the R-squared values for the individual class regression models and Hydro Ottawa's calibration for billed month and calendar month data appears to be reasonable. The Board finds that the forecast is reasonable and it accepts it on this basis.

OPERATING COSTS

1.2 Are Hydro Ottawa's economic and business planning assumptions for 2012 appropriate?

4.1 Is the overall OM&A forecast for the test year appropriate?

4.2 Are the methodologies used to allocate shared services and other costs appropriate?

4.4 Are the 2012 compensation costs and employee levels appropriate?

Depreciation on a CGAAP basis, property taxes and PILs were settled, as documented in the agreement filed on November 1, 2011.

For the 2012 test year, Hydro Ottawa is requesting Board approval of \$63,891,431 in OM&A expenses excluding taxes and amortization expenses. This represents a 4.2% increase over the 2011 bridge year and a 19.8% increase over 2010 actual. Both the core functions of operations and maintenance and the support functions (i.e. billing, administration, etc.) have increased by approximately 24% over 2008 actual, the last rebasing year. The following table summarizes Hydro Ottawa's OM&A expenses by year.

	2008 Approved	2008 Actual	2009 Actual	2010 Actual	2011 Bridge	2012 Forecast
Operations	13,062,448	11,752,560	11,364,065	11,971,416	12,061,906	11,883,322
Maintenance	5,111,153	5,183,949	5,171,079	5,663,033	8,462,994	9,274,548
Billing and Collecting	11,716,819	10,365,089	10,233,636	9,142,479	11,925,750	12,085,194
Community Relations	4,759,852	4,588,888	4,594,942	4,932,698	6,093,455	6,911,671
Administrative and General	20,679,521	19,738,418	20,670,993	21,641,059	22,790,434	23,736,696
Total	55,329,793	51,628,904	52,034,715	53,350,685	61,334,539	63,891,431
%Change (year over year)			0.8%	2.5%	15.0%	4.2%

Total OM&A

The intervenors have proposed reductions on the envelope of total OM&A costs. The proposed test year OM&A expenses ranged from \$57.7 M to \$59.244 M. Most of the

intervenors commented that actual OM&A expenses from 2008 to 2010 were below 2008 approved levels. Board staff and Energy Probe also commented that 2010 actual OM&A expenses were well below the forecast provided in the early rebasing application.

CCC stated that Hydro Ottawa was able to earn returns above the Board approved levels during the IRM term, and that the higher returns were to the benefit of Hydro Ottawa's shareholder.

Energy Probe noted that Hydro Ottawa spent 6.7% less than Board approved in 2008 and that the average OM&A increase in 2009 and 2010 was less than 2%. In aggregate the OM&A spending in 2008 to 2010 was \$9.0 M lower than 2008 Board approved applied to each year. Energy Probe also calculated that the actual return on equity resulted in a shareholder benefit of \$9.0 M.

CCC noted that the Board in recent years has approved OM&A levels accounting for inflation while considering customer growth (e.g. the Horizon and Hydro One Brampton 2011 cost of service proceedings). CCC submitted that based on customer growth of 1.5% and 2% inflation, a reasonable year over year increase from 2008 actual would result in a test year OM&A of \$59.244 M.

Energy Probe observed that Hydro Ottawa's historical and forecast OM&A follow a similar trajectory to Burlington Hydro Inc. ("Burlington"), Hydro One Brampton and Horizon. Energy Probe graphed OM&A in its submission and illustrated slow and steady increases in OM&A in the historical years, but significant increases in bridge and/or test years. Similar to CCC's submission, Energy Probe noted that in these cases, the Board approved lower OM&A levels and found that the forecasts were not warranted based on customer growth, inflation and prevailing conditions. Based on analysis of the Burlington, Hydro One Brampton and Horizon decisions, extrapolating similar findings to Hydro Ottawa would result in an OM&A level in the range of \$58.0 M to \$58.7 M. A similar range was determined by increasing 2010 OM&A per customer by 3% per year.

Energy Probe submitted that unlike the Horizon decision, it would not be appropriate to use the 2008 approved OM&A as a starting point. Horizon's expenses in 2008 were 98.6% of Board approved with a variance of \$0.6 M, while Hydro Ottawa's 2008 expenses were 93.3% of Board approved with a variance of \$3.7 M.

SEC agreed with Energy Probe that OM&A reductions, similar to those in the Hydro One Brampton and Horizon decisions should be applied. SEC submitted that 2010 actual OM&A expenses are an appropriate base. SEC disagreed with Hydro Ottawa's argument in chief in which the Applicant said non-recurring items produced savings in 2010 making it an inappropriate base year. SEC submitted that the non-recurring items only account for half of the increase between 2010 and 2011. SEC submitted that a 10% increase over 2010 actual spending, i.e. an OM&A budget of \$57.5 M, is reasonable and that 5% per year is higher than growth rate plus inflation.

VECC submitted that during the IRM period, utilities are motivated to keep costs down. In response to cross examination by VECC about the budget process in the IRM period, the witness replied that the process that was pursued was that of flat lining OM&A expenses. VECC observed in its submission that there was no evidence of service deterioration in the IRM period and no evidence that past OM&A reductions are not sustainable. VECC also observed that there were significant increases in executive incentive bonuses related to corporate performance for financial strength. VECC submitted that if the utility is able to significantly increase OM&A upon rebasing, there will be no efficiency gains or benefits of IRM to the ratepayer. SEC supported VECC's submission on IRM. VECC submitted that the Board should approve an OM&A level no higher than 3% escalation on 2008 actual, i.e. an OM&A budget of \$58.0 M.

Hydro Ottawa replied that the 2008 actual OM&A and the 2010 actual OM&A are not appropriate starting points for determination of a reasonable OM&A budget for the test year. The Applicant noted that it had explained the 2008 OM&A variance in the pre-filed evidence, at the oral hearing and in argument in chief. The reasons for the variance in 2008 included savings in certain programs including vegetation management and meter maintenance, and unfilled vacancies. The reasons for the variance in 2010 included unfilled vacancies, deferral of time of use roll out and some one time savings in consulting, communications and training. Hydro Ottawa's 2011 spending has closely tracked the budget, and the Applicant submitted that 2011 is the appropriate starting point for the 2012 forecast.

With respect to VECC's submission about the budget process in the IRM period, Hydro Ottawa replied that the budget memorandum stated that the 2010 budget was to be flat lined to the prior year's amount adjusted for inflation and that new initiatives required a business case. Similarly, Hydro Ottawa argued that VECC relied on an isolated excerpt

from the transcript to suggest that Hydro Ottawa applies a different budgeting standard in the IRM period.

Components of OM&A

Several parties commented that it is not useful to provide specific recommendations on how to reduce OM&A, as the utility is in the best position to manage reductions while maintaining reliability. VECC's submission provided an analysis to demonstrate that there are areas of uncertainty from which Hydro Ottawa could make reductions. Those areas included executive and management incentives, compensation and labour, community relations – customer service strategy, smart meter OM&A costs and corporate services. VECC identified that it would be possible to find \$3.0 M of possible savings in these selected areas of OM&A.

Board staff submitted that base wage increases for the non-union employees were in excess of 3% and that the Board could consider reductions as the base wage data are not affected by the number of employees. Board staff also submitted that the utility is hiring at a rate that is higher than attrition through retirement and that the Board could consider a related OM&A reduction. SEC agreed with Board staff and commented that Hydro Ottawa has an opportunity to control costs by reducing the growth in employee headcount. Energy Probe submitted that Hydro Ottawa should be able to manage within an OM&A envelope of \$58.0 M to \$58.7 M by managing staff additions, managing wage and benefit increases and managing non-compensation costs in a low inflation environment.

With respect to compensation, Hydro Ottawa stated that the increase for unionized staff under the collective agreement is 3% and that there is an additional 1% related to pension and benefits. Hydro Ottawa argued that VECC's submission of a 3% limit is not supported. VECC submitted that 2012 overtime is in excess of past experience by \$0.5 M. Hydro Ottawa replied that while 2011 overtime is higher than budget, the 2012 budget carries the 2011 budget forward. Hydro Ottawa stated that Board staff's submission on base wages did not recognize the transfer of 17 staff from the parent. Hydro Ottawa argued that management staff compensation is based on a 3% annual adjustment. Hydro Ottawa also stated that Board staff's submission regarding workforce planning, particularly regarding apprentices is based on a misunderstanding. Hydro Ottawa has hired replacements for employees expected to retire in 2016 and 2017, and the apprentices hired in 2011 are not replacements for those eligible to retire in the period 2008 to 2011.

In addition to compensation, Hydro Ottawa commented on some of the other reductions proposed by parties. Hydro Ottawa submitted that Board staff's submission to reduce regulatory costs did not recognize the higher Board cost assessment that must be absorbed in 2011 and the costs related to the renewed regulatory framework. VECC observed that the cost of meter maintenance is increasing, but that the trend is counter intuitive as the smart meters are relatively new. VECC submitted it should be possible to find savings of \$0.5 M to \$0.7 M. Hydro Ottawa replied that it is critical to ensure that the new meters and associated systems continue to work properly and that there are requirements to check collectors and ensure that data is provided to the MDM/R.

Board Findings

The Board accepts Hydro Ottawa's explanation that some of the variance between the 2008 Board approved OM&A and the actual expenses was due to savings in certain programs and unfilled vacancies. The Board also accepts that there is some need to address an aging workforce.

The intervenors have submitted that the OM&A envelope for the test year should be in the range of \$57.7 M to \$59.244 M, largely based on comparisons with other proceedings. The Board considers the comparisons to other proceedings to be informative and in some instances where a record is lacking in detail it becomes a very important element to consider. The Board has been able to base its determinations primarily on the record before it in this proceeding and finds that Hydro Ottawa has provided sound rationale for most of its requirements.

Compensation is an area of specific concern to the Board. The Board notes Hydro Ottawa's compensation costs are based largely on negotiated settlements with its unionized workforce. The Board further notes that the management compensation increases are tracking upward at the same pace as those settled on in negotiated settlements. These increased costs have been incurred at a time when compensation related benefit costs of various types have also increased. The Board recognizes that these particular benefit costs may not be under complete management control but the same cannot be said for the cost increases incurred in direct salaries to the management group nor the costs that are a result of the negotiations with the unionized employee group. It is the Board's expectation that costs be contained as a whole and where there is little the company can do to control costs in some areas it must make up for it in areas where it does have control. There does not appear to be an attempt at this overall control approach given the direct compensation increases that are planned.

The Board will therefore provide for a level of revenue utilizing an envelope approach. Given some growth in the customer forecast, an identified need for some additional staff and increases in compensation, the Board has determined that the forecast OM&A envelope will be \$61.1 M. This is based on a 2.5% year over year escalation of 2008 approved levels.

The Board will not direct specific spending cuts, as these are matters for Hydro Ottawa to manage within the spending envelope approved by the Board. The Board expects that Hydro Ottawa will be able to prioritize its business activities and implement planned projects within the envelope approved. The Board notes that Hydro Ottawa has demonstrated its focus on customer care and many of its spending programs are designed to improve customer value. The Board's establishment of an allowance cap that is less than proposed is intended to adjust the pace at which the these improvements occur to a rate that it considers more appropriate in the context of avoiding adverse rate impacts.

COST OF CAPITAL

5.2 Is the proposed long term debt rate appropriate?

As noted in the Settlement Agreement, the parties agreed to a capital structure of 56% long term debt, 4% short term debt and 40% equity. The parties also agreed that the cost of capital parameters effective January 1, 2012 would be applied.

Hydro Ottawa's evidence documents nine long term debt ("LTD") issuances, as summarized in the table below. All debt is owed to Hydro Ottawa Holding Inc. (the "parent" or the "parent company"), although older debt is tied to external debt arrangements, such as bond issuances, of the parent. The debt issuances since 2009 are under a Grid Promissory Note between Hydro Ottawa and the parent, and have a term ending February 9, 2015.

Date of Issuance	Principal (\$000's)	Actual or Deemed	Interest Rate	Issuance Costs	Admin. Costs	Total Rate
July 1, 2005	200,000	Actual	4.93%	0.11%	0.10%	5.140%
July 1, 2005	32,185	Deemed	5.900%	NIL	NIL	5.900%
Dec. 20, 2006	50,000	Actual	4.968%	0.25%	0.10%	5.318%
Dec. 21, 2009	15,000	Deemed	5.75%	NIL	0.10%	5.85%
April 30, 2010	15,000	Deemed	5.87%	NIL	0.10%	5.97%
July 5, 2011	15,000	Deemed	5.45%	0.10%	0.10%	5.65%
Sept. 1, 2011	15,000	Deemed	5.55%	0.10%	0.10%	5.75%

Date of Issuance	Principal (\$000's)	Actual or Deemed	Interest Rate	Issuance Costs	Admin. Costs	Total Rate
Dec. 1, 2011	15,000	Deemed	5.55%	0.10%	0.10%	5.75%
July 1, 2012	15,000	Deemed	5.55%	0.10%	0.10%	5.75%

Source: Exh E1-1-1 and Exh K5-2-1

LTD Prior to the Issuance of the 2009 Cost of Capital Report

Board staff took no issue with LTD issued in 2005 and 2006, noting that while the notes are callable, the Board had previously allowed the LTD rates and Hydro Ottawa had provided testimony indicating that its parent has no intention of calling the notes before maturity.

SEC disagreed with the Board staff submission. While the Board approved the LTD rates in the previous cost of service application, the *Report of the Board on the Cost of Capital for Ontario's Regulated Utilities* (the "2009 Cost of Capital Report"), issued on December 11, 2009, includes updated methods and guidelines for the treatment of LTD. Hydro Ottawa stated at the oral hearing that the parent issues a letter every year confirming that it will not call the debt. SEC submitted that there is no legal requirement prohibiting repayment and the parent has no legal authority to refuse repayment.

SEC submitted that the LTD rate for the historical actual debt should exclude issuance and administration costs. SEC proposed that the historical debt at the deemed rate should attract a LTD rate of 5.01%, which is the Board's deemed rate for rates effective January 1, 2012, as issued by way of a letter on November 10, 2011.

CCC and Energy Probe submitted that the three notes are callable on demand and should be subject to the 5.01%. Energy Probe referred to the Kingston Hydro decision (EB-2010-0136) in which the Board stated that "the affiliated debt rate should have attracted the deemed debt rate that was in place at the time of its resolution." Energy Probe noted that there is no letter that has been issued by the parent indicating that it will not call the loans in the test year. Further, Energy Probe noted that it would not be reasonable for Hydro Ottawa to obtain a letter during the submission phase. VECC adopted Energy Probe's submission on all aspects of LTD.

Hydro Ottawa stated that the debt issuances for this period are existing elements of the LTD financing and were previously approved by the Board. The submission referred to the 2009 Cost of Capital Report which states that, "The Board will primarily rely on the embedded or actual cost of existing long-term debt instruments." The submission also referred to the points made in argument in chief, among which was the higher LTD rate

scenario. While the parent could demand payment in that scenario, the issuances were not intended to be variable rate financing.

LTD After the Issuance of the 2009 Cost of Capital Report

Debt Issued December 21, 2009 and April 30, 2010

The Board's deemed LTD rate at the time of issuance of the 2009 Cost of Capital Report was 7.62%. Board staff submitted that the LTD rates for the Grid Promissory Note issuances on December 21, 2009 and April 30, 2010 are compliant with the 2009 Cost of Capital Report, which states that, for affiliated debt, "the deemed long-term debt rate at the time of issuance will be used as a ceiling on the rate allowed for that debt." (Emphasis in original) In its submission, Board staff stated that it would not contest the inclusion of the 0.10% administration cost for these issuances as the LTD rates were below the deemed LTD rate.

CCC submitted that it is for the Board to determine whether including administration costs in the debt rate is compliant with Board Guidelines. Energy Probe submitted that the Board should consider whether these initial issuances under the Grid Promissory Note should reflect a rate for term loans for 5 years.

Hydro Ottawa supported Board staff's submission with respect to the treatment of the December 2009 and April 2010 issuances under the Grid Promissory Note.

Debt Issued July 5, 2011 and Afterwards

Energy Probe submitted that the rate for the July 5, 2011 debt issuance should be reduced from 5.45% (omitting 0.20% issuance and administration costs) to 5.32%, the Board's deemed rate as issued on March 3, 2011. Energy Probe stated that this was consistent with Hydro Ottawa's use of 5.87% for the April 30, 2010 debt (omitting issuance and administration costs), which was the LTD rate noted in the February 24, 2010 letter from the Board. Board staff, CCC and SEC similarly submitted that the LTD for the July 5, 2011 issuance should be 5.32%.

With respect to its proposal for 5.65%, Hydro Ottawa replied that it calculated the deemed rate as of July 2011, as it had acquired the subscriptions in order to emulate the Board's calculation of LTD rate. The Applicant referred to the 2009 Cost of Capital Report which stated that the LTD rate at the time of issuance will be used as a ceiling.

Energy Probe submitted that the Board's deemed LTD rate of 5.01% should be used as a ceiling on forecast debt (September 1, 2011, December 1, 2011 and July 1, 2012). However, as issuances from the Grid Promissory Note have a payment date of February 9, 2015, there is no justification for ratepayers to pay a 30 year rate on loans for 2.5 to 5 years in length. Energy Probe's review of lending rates from Infrastructure Ontario indicate that 30 year loans are available at 4.1% and 4 year loans are available at 2.2%. While Hydro Ottawa's oral hearing testimony indicated that it cannot borrow from Infrastructure Ontario, Energy Probe submitted that the 3 forecast issuances should be costed at 2.2% as the terms for these issuances are less than 4 years. CCC supported Energy Probe's position that the three forecast issuances should be costed at 2.2%.

Board staff and SEC submitted that the cost for the forecast debt should be 5.01%, the Board's deemed LTD rate for rates effective January 1, 2012 as issued on November 10, 2011. Board staff noted in its submission that one of the inputs to Hydro Ottawa's 5.75% rate forecast was a January 2011 Bank of Montreal Report and that the Applicant had rejected the need to update the forecast. Board staff also noted that one of the forecast issuances is unlikely to take place based on Hydro Ottawa's testimony during the oral hearing.

Hydro Ottawa submitted that it would incur higher costs if it were to try to secure small issuances of LTD in the market and that ratepayers benefit from the financing arrangements with the parent. The methodology uses calculation of LTD rates on small issuances on a transitional basis until a large issuance of actual debt is raised from the market by the parent. Hydro Ottawa has looked at financing from Infrastructure Ontario, however its bond indenture does not allow it to have any encumbrance on any of its assets.

Page 53 of the 2009 Cost of Capital Report states that "utilities should be motivated to make rational decisions for commercial "arms-length" debt arrangements, even with shareholders or affiliates." Hydro Ottawa submitted that issuance and administration costs are associated with arms-length debt arrangements, and it should not matter how the lender obtains the money. The Applicant also submitted that the administration costs are a direct cost to the utility, and cover subscription costs and meetings with rating agencies and investment bankers.

Comparisons of LTD with Other Utilities

Hydro Ottawa submitted that the cumulative impact of Energy Probe's submissions is a weighted LTD rate of 4.35%. Hydro Ottawa stated that this result is unreasonable when compared with the LTD rates ranging from 5.37% to 6.2% for Hydro One Networks, Hydro One Brampton, Horizon and THESL.

Board staff submitted that such comparisons have no determinative weight. Further, the guidelines in the 2009 Cost of Capital Report are applied to each debt instrument based on its terms and market conditions at the time of issuance, and the weighted average cost of LTD will depend on the portfolio of debt instruments for each utility.

Hydro Ottawa noted that utility comparisons for LTD rates are useful as they are reflective of market conditions.

Board Findings

The Board has determined that, as the July 1, 2005 and the December 20, 2006 debt issuances are callable on demand, the applicable LTD rate is 5.01%, the deemed LTD rate issued by way of letter on November 10, 2011. This treatment is consistent with the 2009 Cost of Capital Report at page 53, which states that, "The deemed long-term debt rate will act as a proxy or ceiling for what would be considered to be a market-based rate by the Board in certain circumstances. These circumstances include: ...For debt that is callable on demand (within the test year period), the deemed long-term debt rate will be ceiling on the rate allowed for that debt."

The Board finds that it is not reasonable to add either the issuance costs or the administration costs to the bare LTD rate. The 2009 Cost of Capital Report does not explicitly deal with administration and issuance charges for LTD, although 50 basis points is already identified as being included in the ROE formula. Issuance and administration charges may be allowable where the firm demonstrates that it has such charges and that they are not otherwise recovered as part of OM&A. Hydro Ottawa's parent has not issued external debt to finance the Grid Promissory Note, and so has not incurred issuance costs that need to be recovered from Hydro Ottawa or its ratepayers. The 10 basis point administration cost seems excessive for what appears to the Board to be mechanical issuances under the Grid Promissory Note. Therefore the Board does not consider that these should be added onto the allowable debt rate recoverable from Hydro Ottawa's ratepayers. The Board has determined that the applicable LTD rate for

the December 21, 2009 debt issuance is 5.75%. The Board has determined that the applicable LTD rate for the April 30, 2010 debt issuance is 5.87%.

Board staff and the intervenors agreed that the LTD rate for the July 5, 2011 debt issuance should be 5.32%, the deemed LTD rate as issued on March 3, 2011. The Board agrees with these submissions. As noted in the 2009 Cost of Capital Report, for affiliate debt with a fixed rate, the deemed LTD rate at the time of issuance will be used as a ceiling on the allowed rate for rate making purposes.

The Board is not persuaded by Energy Probe and CCC's arguments that Infrastructure Ontario rates for 2 to 5 year debt should apply to the forecast \$15 M tranches of debt. Hydro Ottawa cannot access financing through Infrastructure Ontario and has testified that it would not be able to acquire financing for \$15 M issuances from the market at rates similar to Infrastructure Ontario. The Board finds that Hydro Ottawa's proposed 5.75% is unreasonable as it includes a factor based on a dated Bank of Montreal Report, as well as issuance cost and administration cost. Hydro Ottawa will be applying the return on equity and short term debt rate issued by way of letter on November 10, 2011. The Board finds that Hydro Ottawa should also apply the LTD rate, i.e. 5.01%, to the forecasted LTD which has not, at the time of this Decision, been issued. Specifically, the Board finds that the delayed issuances of \$15 M September 2011 and for December 2011, and the forecasted issuance of \$15 M for July 2012, should attract the deemed rate of 5.01%.

SMART METERS

6.1 Is the proposed elimination of the smart meter rate adder and the inclusion of the smart meter costs in the 2012 revenue requirement appropriate?

6.2 Is the proposal (not) to dispose of the balances in variance accounts 1555 and 1556 appropriate?²

9.1 Are the account balances, cost allocation methodology and disposition period appropriate?

In the Updated Application, Hydro Ottawa filed for final disposition of smart meter costs, and for inclusion of smart meter costs in rate base and revenue requirement for recovery in rates on an ongoing basis starting with the 2012 rate year. A Smart Meter

² Hydro Ottawa's application, as filed on June 17, 2011, did not request disposition of accounts 1555 and 1556. The updated application filed on September 14, 2011 did request disposition of accounts 1555 and 1556.

Disposition Rider (“SMDR”) was proposed to recover the deferred revenue requirement from 2006 up to December 31, 2011 for smart meters installed and associated operating expenses up to that same date, offset by the revenues received from the Smart Meter Funding Adder (“SMFA”).

Hydro Ottawa filed a revised draft smart meter model as an attachment to the Settlement Agreement filed on November 1, 2011, showing a net deferred revenue requirement amount of \$1,511,585.63 to be recovered from its ratepayers through the SMDR. The Board approved the Settlement Agreement and hence has approved the quantum to be recovered through the SMDR. Hydro Ottawa proposed recovery over a period of one year as a uniform SMDR of \$0.41/month from all metered customers.³

The outstanding issue with respect to the SMDR is whether it should be uniform across all metered customer classes, or whether there should be class-specific SMDRs.

Board staff submitted that a class-specific SMDR was appropriate as Hydro Ottawa has incurred smart meter costs for all customer classes and the per meter costs increase according to the demand level. Since the SMFA has been uniform for all metered customers, the deferred revenue requirement per meter will be higher for customer classes with higher per meter costs. Board staff submitted that the Board should approve the class-specific results summarized in undertakings LT1.14 and L1.4, noting that the results were similar to a “full cost allocation” methodology proposed by VECC in a PowerStream smart meter proceeding, EB-2010-0209. Board staff noted that the results of L1.4 were directionally similar to the methodology approved by the Board in the PowerStream proceeding.

VECC submitted that the Board should require disposition of the smart meter variance accounts in accordance with full cost causality or, in the alternative, use the proxy approach approved in the EB-2010-0209 PowerStream proceeding, as reflected in undertaking L1.4.

VECC noted that a recent PowerStream smart meter decision (EB-2011-0128) determined that full cost causality should be implemented to recover smart meter costs. VECC submitted that Board direction is required in the current case, but also is needed for other distributors so that the matter does not have to be re-examined in every proceeding. Energy Probe supported the submission of VECC. CCC supports the

³ Oral Hearing Tr Vol 1 p46-48

class-specific SMDR, and submitted that, while a full cost allocation was not performed, the analysis provided in L1.4 is a sufficient proxy.

SEC expressed concern about the quality and granularity of data that is available to allocate costs per customer class. SEC referred to the first PowerStream decision in which the Board stated that, “The requirements for tracking of smart meter related costs have evolved to the point where no class by class tracking has been required since the initial implementation plans were filed.” SEC noted that Hydro Ottawa used general assumptions to respond to undertakings and noted that the Applicant did not have great confidence in the results. SEC submitted that it is not clear that class-specific allocation is appropriate in this case and takes no position. However, SEC asked the Board to clarify the level of data necessary for a class-specific allocation.

In reply, Hydro Ottawa confirmed that all of the smart meter implementation costs cannot be allocated to classes with any degree of certainty. Hydro Ottawa has followed the Board’s directions on this matter as no tracking by class has been required since the implementation plans were filed. Hydro Ottawa stated that the proxy approach summarized in undertakings LT1.14 and L1.4 lack complete and accurate data.

Board Findings

While Hydro Ottawa does not have confidence in the data used to derive the class-specific SMDRs, it was able to use general assumptions and estimates to respond to the undertakings. The class-specific SMDRs are significantly different than the proposed \$0.41/month for all metered customers. Tracking of costs by class has not been required, but the Board finds that the estimates used to determine class-specific SMDRs are sufficient and reasonable in this case. The class-specific SMDRs provided in undertaking L1.4 will apply for a one year period.

VECC has submitted that the Board should provide direction in the current case on cost causality to recover smart meter costs to inform other distributors. Similarly, SEC has submitted that the Board should clarify the level of data necessary for a class-specific allocation. There has been no record developed in this case to address these generic issues and therefore no basis on which the Board could make any findings in this decision for the guidance requested.

LOST REVENUE ADJUSTMENT MECHANISM (“LRAM”)

10.1 Is the proposal related to LRAM appropriate?

Hydro Ottawa is seeking LRAM recovery of \$851,769 and carrying charges of \$7,169 for 2009 and 2010 OPA CDM programs.⁴ Hydro Ottawa based the 2010 LRAM on estimated results for the Updated Application filed on September 14, 2011. At the oral hearing, and in undertaking L1.7, Hydro Ottawa confirmed that the actual 2010 results are higher, such that the total recovery should be \$969,573 with carrying charges of \$10,194. However, the Applicant testified that it would not revise the Application or seek recovery of the difference in a future application.

The results of undertaking LT2.13 indicate that Hydro Ottawa did not achieve the CDM saving which was built into the 2008 load forecast, for the programs deployed in the period 2008-2010. Based on the results of undertaking L1.6, an over collection of \$541,801 is estimated.

Board staff submitted that the expectation has been that future LRAM claims pertaining to the test year, including true-ups to previous rebasing forecasts would be unnecessary once a distributor rebases and updates its load forecast. To proceed with a true-up of the effects of CDM activities embedded in a rebasing year would be counter to the principle that final rates mean no retroactive adjustment.

VECC observed that Hydro Ottawa is one of the first distributors to make an LRAM claim for IRM program years where CDM was incorporated into the load forecast. If higher CDM had been achieved ("positive results"), VECC submits that Ottawa would be eligible to apply for an LRAM. However, the CDM forecast was not achieved. VECC submitted that by allowing distributors to be rewarded for savings not achieved ("negative results") would be contrary to the intent of LRAM as set out in the Board's *Guidelines for Electricity Distributor Conservation and Demand Management* (EB-2008-0037). VECC noted that the Board's guidelines for natural gas utilities require a comparison of actual versus forecast CDM savings and recognize that the results can be positive (in the utility's favour) or negative (in the ratepayer's favour). VECC submitted that while the policies for electricity distributors are open to interpretation, it is instructive to refer to the guidelines for natural gas utilities to resolve the issue.

VECC submitted that the 2008 cost of service settlement agreement does not represent a decision, precedent or agreement about how LRAM should be calculated after the fact. VECC stated that the Board has been approving positive LRAMs for years. If

⁴ Exh I3-1-1 Updated Application

these are not considered retroactive ratemaking, there is no reason why negative LRAM should be considered retroactive ratemaking. The Board's current practice is to allow distributors to apply for LRAM at their discretion. In VECC's view, the approach is inappropriate as distributors will apply for LRAM when results are positive, but not in years when results are negative.

The Board staff submission referred to the guidelines for electricity distributors which state that, "Lost revenues are only accruable until new rates (based on a new revenue requirement and load forecast) are set by the Board, as the savings would be assumed to be incorporated in the load forecast at that time." VECC submitted that the interpretation of the Board guidelines is less certain when dealing with the impact of CDM in the test year and future years.

Energy Probe and SEC's submissions supported VECC. CCC stated that Hydro Ottawa is clearly being compensated for savings in 2008-2010 that did not actually occur. Hydro Ottawa is applying for an LRAM for 2009 and 2010 and CCC supports a reduction of the amounts to reflect 2008 savings.

Hydro Ottawa observed that the Board's *Demand Side Management Guidelines for Natural Gas Utilities* (EB-2008-0346) explicitly provide for LRAM symmetry and refunds to customers. As these words, and variations of these words, are not found in the guidelines for electricity distributors, Hydro Ottawa submitted that there is no basis that the guidelines for natural gas utilities can be used to interpret the guidelines for electricity distributors.

In its argument in chief, Hydro Ottawa stated that any effort to introduce the concept of an LRAM refund to ratepayers should only be considered on a prospective basis. Hydro Ottawa submitted that the Board should reject the submissions to change the regulatory framework that regulated entities have based their actions on. Further, it was Hydro Ottawa's understanding that if the CDM adjustment in the rebased load forecast had been exceeded, it could not request an additional LRAM.

Should the Board be inclined to accept VECC's position, Hydro Ottawa submitted that the \$541,801 over collection for the 2008-2010 period is overstated. The analysis was based on CDM savings that do not reflect the third tranche programs. The reported savings should be 57,529 MWh and not 13,933 MWh.

Board Findings

The Board approves Hydro Ottawa's LRAM proposal as filed. The Board's Guidelines for *Electricity Distributor Conservation and Demand Management* do not consider symmetry with respect to LRAM. In addition, as noted in the Board staff submission, there have been expectations related to LRAM, including no true-up of the effects of CDM activities embedded in a rebasing year. Hydro Ottawa confirmed this understanding in its reply submission, stating that if the CDM forecast for the historical period had been exceeded, it could not have applied for LRAM.

MODIFIED INTERNATIONAL FINANCIAL REPORTING STANDARDS ("MIFRS")

2.4 Is the capitalization policy and allocation procedure appropriate?

11.1 Is the proposed revenue requirement determined using modified IFRS appropriate?

11.2 Are the proposed new MIFRS deferral and variance accounts appropriate?

Hydro Ottawa will adopt MIFRS on January 1, 2012. Some parts of the MIFRS issues were agreed to in the Supplementary Settlement Agreement filed on November 10, 2011.

Board staff and SEC filed submissions on MIFRS related issues. SEC's submission on all MIFRS matters was supported by CCC, Energy Probe and VECC.

Componentization and Depreciation

As noted in Exhibit J, and based on Hydro Ottawa's internal depreciation study, the overall impact of MIFRS related componentization and asset service lives is a reduction in depreciation of \$8.0 M. With exceptions, Hydro Ottawa's asset useful lives were within the ranges suggested by Kinectrics Inc. in the Board commissioned Depreciation Study for Use by Electricity Distributors (EB-2010-0178) (the "Kinectrics Report").

In response to SEC technical conference question 18(c), Hydro Ottawa completed an analysis which compared the depreciation expenses using its componentization and asset service lives with those provided in the Kinectrics Report. The analysis indicated that application of the Kinectrics Report would reduce depreciation further by approximately \$2.0 M. Hydro Ottawa stated that the analysis was not rigorous or accurate and that it did not accept that the comparison with the Kinectrics Report was appropriate or relevant. Further, at the oral hearing, Hydro Ottawa noted that it has not

applied technical useful life, but appropriate useful life with consideration for Hydro Ottawa practices, local operating conditions and weather.⁵

In Board staff's view, whether the depreciation study conducted by Hydro Ottawa is an independent and objective study is less relevant for the Board in setting just and reasonable rates as long as the depreciation study gives due consideration of the Kinectrics Report. In the cover letter to the Kinectrics Report, the Board clearly stated that "a generic depreciation study could assist utilities with IFRS compliance in addition to providing considerable regulatory benefits". However, neither International Accounting Standard 16, Property, Plant and Equipment ("IAS 16"), nor the *Report of the Board, Transition to International Financial Reporting Standards* ("Board Report on IFRS"), nor the cover letter to the Kinectrics Report require distributors to conduct an independent study.

Regarding the appropriateness of components and asset useful lives in Hydro Ottawa's 2012 rate application under MIFRS, Board staff noted that Ernst & Young, in its audit capacity for Hydro Ottawa, has reported that based on the procedures performed and the audit evidence provided, that the components and useful lives determined by Hydro Ottawa management are reasonable.⁶

SEC referred to the Board's Accounting Procedures Handbook ("APH") with respect to amortization methods and the expectation that changes to methods are based on an objective study. In SEC's submission, if the Board accepts Hydro Ottawa's position, it will be allowing utilities discretion to set their own rates without proper oversight. Allowing depreciation to be set by the utility based on judgment only, without the rigorous analysis from an independent study, puts too much revenue requirement within unchecked control of the utility.

In response to an oral hearing undertaking, Hydro Ottawa provided survivor curves which plot percent survived against age. SEC's review of these curves indicates that the asset lives are longer than those used by Hydro Ottawa in its internal study. With respect to the auditor's acceptance of the depreciation results, SEC stated that this is not equivalent to having a firm with expertise in utility assets carrying out a review of useful life.

⁵ Oral Hearing Tr Vol 2 p72

⁶ Oral Hearing Tr Vol 2 p78-79 and L2.5

SEC submitted that depreciation expense should be decreased by \$2.0 M and that opening rate base be increased by the same amount. SEC submitted that the Board should direct Hydro Ottawa to carry out an independent depreciation study before its next rebasing application. The Board could allow Hydro Ottawa to file an application for an accounting order to change depreciation rates for the balance of its IRM term.

SEC also submitted that the Board should stipulate the level of evidence it will expect from utilities seeking to establish or change depreciation rates.

In reply, Hydro Ottawa stated that SEC has equated the APH reference to an “objective” study with an “independent” study. Hydro Ottawa stated that there is no requirement under IFRS for a depreciation study prepared by independent experts and referred to IAS 16 which states that, “The estimation of the useful life of the asset is a matter of judgment based on the experience of the entity with similar assets.” During the oral hearing, SEC referred to the THESL depreciation study prepared by an independent expert. Hydro Ottawa reviewed that study and observed in its submission that there are instances in which THESL has applied a useful life that differs from the results of the independent expert and from the Kinectrics Report.

Hydro Ottawa asserted that its study of the useful lives of assets was determined based on experience, professional judgment, failure data, and local conditions, and further that its study considered the Kinectrics Report in the results. The survivor curves were produced at SEC’s request during the oral hearing. The undertaking explained that the curves are based on limited data and that the curves assess risks of failure rather than the factors related to asset retirement. Hydro Ottawa further observed that there is no reference to survivor curves in the Kinectrics Report.

Board Findings

The Board finds that Hydro Ottawa has, with the exception the transformation assets discussed below, adequately supported its proposed componentization and depreciation under MIFRS. The Applicant has used its judgment in grouping assets and applied its operating experience in determining useful life. Sufficient explanation was provided where there were differences with ranges provided in the Kinectrics Report.

The Board agrees with Board staff that there is no requirement for distributors to conduct an independent study, nor is there a requirement to comply with the useful lives provided in the Kinectrics Report. The Board stated in the cover letter to the Kinectrics

Report that it “provides information that the Board expects distributors will consider as they develop asset service lives suitable in their particular circumstances.”

Hydro Ottawa may choose to conduct an independent depreciation study before its next rebasing application, as SEC suggests, but the Board will not provide such direction in this Decision.

SEC submitted that the Board should stipulate the level of evidence expected to establish or change depreciation rates. The Board finds that it is not appropriate to make these generic findings in the current case.

Transformers

Hydro Ottawa has determined that the useful life of its transformer assets, which includes overhead distribution transformers, pad mounted or underground distribution transformers, is 30 years. Hydro Ottawa has determined that the asset management plan 50 year theoretical life and the Kinectrics Report 40 year typical useful life are not appropriate due to the impact of summer peaking, heavy use of salt in the winter and requisite response to oil spills.

In response to questioning by SEC, Hydro Ottawa’s witness replied that 50% of transformer failures happened after 37 years of service. The witness noted that removing older vintage transformers from the analysis, dropped the life to 32 years.⁷ When asked whether there were transformers that are older than 30 years in the system, the witness replied, “Absolutely”. The Board notes that in response to undertaking L2.6, Hydro Ottawa provided survivor curves for selected assets including transformers. The undertaking reply stated that, “Currently Hydro Ottawa has polemount transformers which are greater than 60 years of age, and padmount transformers which are greater than 45 years of age in the system. The current window of failure data is insufficient to capture the early asset failures which have occurred for these older vintage assets.”

The Board finds that there is insufficient evidence to apply a useful life of 30 years for transformers. Absent failure, Hydro Ottawa does not remove the assets from service after 30 years of service and the Applicant has confirmed that there are still a number of older vintage transformers that have typical useful lives greater than 30 years. The Board will accept, to a degree, Hydro Ottawa’s analysis that it may have environmental

⁷ Oral Hearing Tr Vol 2 p 146

and operational issues that negatively impact the life expectancy of its assets but not to the extent claimed. The Board finds that a useful life of 35 years for transformers is appropriate.

Capitalization

Staff submitted that the Board was not prescriptive in the Board Report on IFRS and subsequent documentation about the granularity of evidence required to support changes in capitalization as a result of adoption of MIFRS and was satisfied with Hydro Ottawa's evidence.

In cross examination, SEC asked Hydro Ottawa to provide a more detailed breakdown of overhead expenses that are being capitalized. The resulting undertaking was a summary of 85 categories. SEC stated that it had no specific submission on the matter. However, SEC proposed that the Board review the capitalization approaches used by the distributors in current applications and provide a comprehensive list of items that the Board believes are appropriately capitalized under IFRS in normal circumstances. Further, SEC proposed that the Board establish a variance account so that, in the event the Board's list differs from Hydro Ottawa's list, the cost consequences can be recorded.

Hydro Ottawa submitted that a generic review of capitalization is not something that can or should be accomplished in the context of the current application.

Board Findings

The Board is satisfied with Hydro Ottawa's application with respect to capitalization of overhead costs.

The Board acknowledges that there is likely a range of items that distributors may choose to capitalize. SEC proposed that the Board provide a comprehensive list of items that are capitalized under IFRS in normal circumstances. Similar to an earlier finding in this decision, the Board finds that the record was not sufficiently developed in this hearing to address these types of generic issues.

Capital Contributions

SEC has questioned the amount of the capital contributions in the test year and why it is lower than the capital contribution under CGAAP. Hydro Ottawa explained that due to the decreased capitalized amount of PP&E resulting from the accounting change to

MIFRS, the customer contribution is similarly lower since it is dependant on the amount capitalized in the capital program. Hydro Ottawa explained at the oral hearing that the capital contribution gap between CGAAP and MIFRS will close over time because OM&A is included in the economic evaluation formula, and OM&A is increasing.

Board staff had no concerns with the quanta or treatment of test year contributions.

In its submission, SEC referred to the Guelph Hydro Inc. proceeding (EB-2011-0123) on the same subject. SEC stated that Guelph Hydro's contributions and grants will not change after transition to MIFRS and that Guelph Hydro will adjust how amounts are calculated to achieve the results. SEC agreed that adjusting the model (Guelph Hydro approach) or allowing contributions to be reduced (Hydro Ottawa approach) can be supported. SEC submitted that the Board should make a determination on whether the "old" methodology over-collected. If the "old" method produced a fair result, SEC submitted that Hydro Ottawa should be required to amend their calculations to collect the same amount as previously.

Hydro Ottawa submitted that the record of this proceeding does not provide the Board with a basis to make a determination on the methodology related to capital contributions.

Board Findings

The Board notes that section 3.2.4 of the Board's *Distribution System Code* ("DSC") sets an upper limit on capital contributions. Section 3.2.4 states that:

The capital contribution that a distributor may charge a customer other than a generator or distributor to construct an expansion shall not exceed that customer's share of the difference between the present value of the projected capital costs and on-going maintenance costs for the facilities and the present value of the projected revenue for distribution services provided by those facilities. The methodology and inputs that a distributor shall use to calculate this amount are described in Appendix B.

The approach that Hydro Ottawa has utilized is prescribed by the DSC and the Board agrees with Hydro Ottawa that the record of this proceeding does not provide a sufficient basis for a determination of a different methodology. The Board therefore makes no finding here on the matters raised by SEC. Any consideration that the impact

of the transition to MIFRS from CGAPP has on this element of the DSC would need to be done on a generic basis. The Board's understanding of the transition to MIFRS is expected to continue to evolve. Should a change in methodology concerning the calculation of capital contributions be made as a result of this further understanding, it is expected that this would be applied on a prospective basis.

Deferral Account in Relation to Asset Disposals

Hydro Ottawa is seeking approval for a deferral account to capture gains or losses on disposal of pooled assets. In Exhibit J, Hydro Ottawa stated that losses on pooled asset disposal largely result from early asset disposal due to unforeseen events. The Applicant stated that it does not have any data to support an accurate forecast. As a result, no estimates have been included in the rate application.

Staff submitted that given the lack of information on materiality and Hydro Ottawa's failure to collect information on the losses on pooled asset disposal in the period 2008 to 2011, the Board has sufficient reason to deny the request for the deferral account.

SEC submitted that its cross examination on the deferral account indicated that Hydro Ottawa has not complied with the Board's policy outlined in the Addendum to the Board Report on IFRS. Neither a forecast of losses nor a demonstration of volatility was provided, and accordingly SEC agreed with Board staff that the deferral account should not be approved.

In response to Board staff's submission on materiality and failure to collect information in the period 2008-2011, Hydro Ottawa stated that it is unable to forecast gains and losses on disposal of pooled assets as numerous system changes are required to gather the information. Further, Hydro Ottawa noted that the Addendum to the Board Report on IFRS states that utilities will be expected to provide a forecast of gains and losses from retirement at the first cost of service application **after** transition to IFRS.

Board Findings

The request for the deferral account is denied.

The Addendum to the Board Report on IFRS considered the matter of a variance account for gains and losses arising from early retirement of in-service assets to mitigate volatility of the expense that may arise from the application of IFRS rules. The Addendum did not consider a deferral account. Utilities need to provide a forecast and

demonstrate probability of volatility in order for the Board to consider the matter of a variance account. Hydro Ottawa has requested a deferral account, and provided no evidence except that it was unable to provide a forecast for the current proceeding. The Board does not consider the applicant's inability to provide a forecast to be, in and of itself, sufficient grounds to justify the account.

EFFECTIVE DATE

Hydro Ottawa applied for rates effective January 1, 2012. The Settlement Agreement filed on November 1, 2011 stated that the participating parties agreed that rates be effective January 1, 2012.

In the event that rates cannot be implemented for the month of January, Hydro Ottawa requested that the Board approve a rate rider to recover foregone revenue.

Board Findings

The Board approves Hydro Ottawa's alignment of the rate and fiscal years. Hydro Ottawa's new rates will be effective January 1, 2012. The Board orders that the current rates are declared interim as of January 1, 2012 and that a rate rider be established to recover foregone revenue.

IMPLEMENTATION

The Board has made findings in this Decision which change the 2012 revenue requirement and therefore change the distribution rates from those proposed by Hydro Ottawa. In filing its draft Rate Order, the Board expects Hydro Ottawa to file detailed supporting material, including all relevant calculations showing the impact of the Settlement Agreement filed on November 1, 2011, the Supplementary Settlement Agreement filed on November 10, 2011 and this Decision on Hydro Ottawa's revenue requirement, the allocation of the approved revenue requirement to the classes and the determination of the final rates. Supporting documentation shall include, but not be limited to, filing a completed version of the Revenue Requirement Work Form excel spreadsheet, which can be found on the Board's website. A draft accounting order for the establishment of the approved deferral and variance accounts should also be included.

A Rate Order will be issued after the steps set out below are completed.

1. Hydro Ottawa shall file with the Board, and shall also forward to intervenors, a draft Rate Order attaching a proposed Tariff of Rates and Charges reflecting the Board's findings in this Decision within **7 business days** of the date of the issuance of this Decision. The draft Rate Order shall also include customer rate impacts and detailed supporting information showing the calculation of the final rates including the Revenue Requirement Work Form in Microsoft Excel format.
2. Board staff and intervenors shall file any comments on the draft Rate Order with the Board and forward to Hydro Ottawa within **7 business days** of the date of filing of the draft Rate Order.
3. Hydro Ottawa shall file with the Board and forward to intervenors responses to any comments on its draft Rate Order within **4 business days** of the date of receipt of Board staff and intervenor comments.

COST AWARDS

The Board may grant cost awards to eligible parties pursuant to its power under section 30 of the *Ontario Energy Board Act, 1998*. When determining the amount of the cost awards, the Board will apply the principles set out in section 5 of the Board's *Practice Direction on Cost Awards*. The maximum hourly rates set out in the Board's Cost Awards Tariff will also be applied.

1. Intervenors shall file with the Board and forward to Hydro Ottawa their respective cost claims within **7 business days** from the date of issuance of the final Rate Order.
2. Hydro Ottawa shall file with the Board and forward to intervenors any objections to the claimed costs within **10 business days** from the date of issuance of the final Rate Order.
3. Intervenors shall file with the Board and forward to Hydro Ottawa any responses to any objections for cost claims within **17 business days** of the date of issuance of the final Rate Order.

4. Hydro Ottawa shall pay the Board's costs incidental to this proceeding upon receipt of the Board's invoice.

All filings with the Board must quote the file number EB-2011-0054, and be made through the Board's web portal at www.errr.ontarioenergyboard.ca, and consist of two paper copies and one electronic copy in searchable / unrestricted PDF format. Filings must be received by the Board by 4:45 p.m. on the stated date. Parties should use the document naming conventions and document submission standards outlined in the RESS Document Guideline found at www.ontarioenergyboard.ca. If the web portal is not available, parties may e-mail their documents to the attention of the Board Secretary at BoardSec@ontarioenergyboard.ca. All other filings not filed via the Board's web portal should be filed in accordance with the Board's *Practice Directions on Cost Awards*.

DATED at Toronto, December 28, 2011

ONTARIO ENERGY BOARD

Original Signed By

Kirsten Walli
Board Secretary

Appendix A
Settlement Agreement
Hydro Ottawa Limited
2012 Electricity Distribution Rates
EB-2011-0054
November 1, 2011



Proposed Settlement Agreement

Hydro Ottawa Limited 2012 Electricity Distribution Rates EB-2011-0054

November 1, 2011



Table of Contents

	Page
I Introduction	3
II Settlement Conference	3
III Issues	3
IV Settlement Categories	4
V Parameters of Proposed Settlement Agreement	5
VI Overview of Proposed Settlement Agreement	7
VII Issue-by-Issue Settlements	7
Schedule A – Specific Approvals Requested (Exhibit A1-4-1)	25
Schedule B – Issues List (Appendix “A” to Procedural Order No. 2, issued August 11, 2011)	27
Schedule C – Issue 6.1 - Smart Meter Additional Explanation	32



I. INTRODUCTION

This Proposed Settlement Agreement is filed with the Ontario Energy Board (“OEB” or the “Board”) in connection with the application of Hydro Ottawa Limited (“Hydro Ottawa” or the “Company”) for an order or orders approving or fixing just and reasonable distribution rates effective January 1, 2012 and, in addition, the specific relief that Hydro Ottawa requested as described in Exhibit A1-4-1. A copy of Exhibit A1-4-1 is attached as Schedule A for ease of reference.

II. SETTLEMENT CONFERENCE

A Settlement Conference was held October 13 and 14, 2011 in accordance with Rule 31 of Board’s *Rules of Practice and Procedure* (“the Rules”) and the Board’s *Settlement Conference Guidelines* (the “Guidelines”) . This Proposed Settlement Agreement arises from the Settlement Conference and subsequent discussions between the parties.

Hydro Ottawa and the following Intervenor (the “Intervenor”), as well as the Board’s technical staff (“OEB Staff” or “Board Staff”), participated in the Settlement Conference:

- Consumers Council of Canada (“CCC”),
- Energy Probe Research Foundation (“Energy Probe”),
- School Energy Coalition (“SEC”), and
- Vulnerable Energy Consumers Coalition (“VECC”).

In addition, Enersource Hydro Mississauga Inc., Envirocentre and Ecology Ottawa intervened in this proceeding. They did not, however, participate in any part of the Settlement Conference.

III. ISSUES

The Proposed Settlement Agreement deals with all of the issues identified in the Issues List attached as Appendix “A” to the Board’s Procedural Order No. 2 dated August 11, 2011 (the



"Issues List") even if there was no agreement to settle a particular issue. A copy of the Issues List is attached as Schedule B for ease of reference.

IV. SETTLEMENT CATEGORIES

Each issue dealt with in this Proposed Settlement Agreement falls within one of the following three categories:

1. **Complete Settlement** – an issue in respect of which Hydro Ottawa and the other parties who discussed the issue agree with the settlement;
2. **Incomplete Settlement** – an issue in respect of which Hydro Ottawa and the other parties who discussed the issue were only able to agree on some, but not all, aspects of that issue; and
3. **No Settlement** – an issue in respect of which Hydro Ottawa and the other parties who discussed the issue are unable to reach an agreement to settle the issue.

The following table summarizes the outcome of the Settlement Conference:

Table 1: Outcome of Settlement Conference

Complete Settlement	Incomplete Settlement	No Settlement
<ul style="list-style-type: none">• 1.1, 1.3, 1.4• 2.3, 2.5• 3.3, 3.5• 4.3, 4.5, 4.6• 5.1• 6.3• 7.1, 7.2• 8.1, 8.2, 8.3, 8.4• 9.2, 9.3	<ul style="list-style-type: none">• 1.2• 2.1, 2.2• 3.1, 3.2• 6.1, 6.2• 9.1	<ul style="list-style-type: none">• 2.4• 3.4• 4.1, 4.2, 4.4• 5.2• 10.1• 11.1, 11.2



V. PARAMETERS OF PROPOSED SETTLEMENT AGREEMENT

The Proposed Settlement Agreement has been prepared in accordance with Rule 32 of the Board's *Rules of Practice and Procedure* and the Board's *Settlement Conference Guidelines* by Hydro Ottawa in consultation with CCC, Energy Probe, SEC, and VECC (the "Participating Parties"). They discussed every issue, negotiated each agreement to settle an issue, and so they are collectively the parties to this Proposed Settlement Agreement.

The role adopted by OEB staff in the Settlement Conference is set out in page 5 of the Guidelines. Although OEB staff is not a party to this agreement, as noted in the Guidelines, OEB staff who did participate in the Settlement Conference are bound by the same confidentiality standards that apply to the Participating Parties to the proceeding.

The Proposed Settlement Agreement describes the agreements reached on the completely settled and incompletely settled issues. The Proposed Settlement Agreement also provides a direct link between each issue and the supporting evidence in the record to date.

Best efforts have been made to identify all of the evidence that relates to each issue. The supporting evidence for each issue is identified individually by reference to its Exhibit number in an abbreviated format; for example, Exhibit A1, Tab 8, Schedule 1 is referred to as A1-8-1. The interrogatories are listed under the asking party, with their number provided in brackets. For example, K1-1-1 (1) under Board Staff Interrogatories refers to Board Staff interrogatory #1. Under Additional Evidence, D1 and D2 refer to the transcripts from Day 1 and Day 2 of the Technical Conference held on September 26 and 27, 2011. LT refers to Undertakings and MT refers to handouts at the Technical Conference.

The identification and listing of the evidence that relates to each issue is provided to assist the Board. The identification and listing of the evidence that relates to each issue is not intended to limit any Participating Party who wishes to assert that other evidence is relevant to a particular issue.

The Participating Parties are of the view that the evidence provided is sufficient to support the Proposed Settlement Agreement in relation to the settled issues and, moreover, that the quality



and detail of the supporting evidence, together with the corresponding rationale, will allow the Board to make findings agreeing with the proposed resolution of the settled issues.

The issues listed in the “Complete Settlement” and “Incomplete Settlement” columns of Table 1 have been settled by the Participating Parties as a package (the “Proposed Settlement Agreement”) and none of the parts of this Proposed Settlement Agreement are severable. The distinct issues addressed in this agreement are intricately interrelated and reductions or increases to the agreed-upon amounts may have financial consequences in other areas of this Proposed Settlement Agreement which may be unacceptable to one or more of the Participating Parties. If the Board does not accept the Proposed Settlement Agreement in its entirety, then there is no Proposed Settlement Agreement (unless the Participating Parties agree that any portion of the Proposed Settlement Agreement that the Board does accept may continue as part of a valid settlement agreement). None of the Participating Parties can withdraw from the Proposed Settlement Agreement except in accordance with Rule 32 of the Rules. Finally, unless stated otherwise, the settlement of any particular issue in this proceeding is without prejudice to the rights of the Participating Parties to raise the same issue in any future proceeding.

These settlement proceedings are subject to the rules relating to confidentiality and privilege contained in the Guidelines. The Participating Parties agree that all positions, information, documents, offers and counter-offers, negotiations and discussion of any kind whatsoever which took place or were exchanged during the Settlement Conference are strictly confidential and without prejudice, and inadmissible unless relevant to the resolution of any ambiguity that subsequently arises with respect to the interpretation of any provision of this Proposed Settlement Agreement.

It is also agreed that this Proposed Settlement Agreement is without prejudice to any of the Participating Parties re-examining these issues in any subsequent proceeding and taking positions inconsistent with the resolution of these issues in this Proposed Settlement Agreement. However, none of the Participating Parties will in any subsequent proceeding take the position that the resolution therein of any issue settled in this Proposed Settlement Agreement, if contrary to the terms of this Proposed Settlement Agreement, should be applicable for all or any part of the 2012 Test Years.



The Participating Parties agree that inability to achieve settlement on all of the issues should not otherwise displace the settlement described in this Proposed Settlement Agreement. The Participating Parties agree that all unsettled issues will be dealt with during the hearing phase of this proceeding.

VI. OVERVIEW OF SETTLEMENT PACKAGE

In this Proposed Settlement Agreement, Issues 1 through 10 inclusive are addressed on the basis of Canadian Generally Accepted Accounting Principles ("CGAAP"). Issue 11 is the sole issue related to the modified International Financial Reporting Standards ("IFRS") requirements.

Hydro Ottawa and the Intervenor achieved complete settlement of 21 of the 37 issues on the Board's Issues List. Eight issues have incomplete settlement and eight further issues have no settlement.

Given the nature of the unsettled issues it is not possible to provide a precise statement regarding the bill impact of this Proposed Settlement Agreement. However, the Application filed by Hydro Ottawa in June 2011, and updated in September 2011 had a bill impact for residential customers (800 kWh) of 0.49% and for GS<50kW customers of 0.20% (Based on IFRS). It is expected that this Proposed Settlement Agreement will result in a rate reduction from the Application for the majority of Hydro Ottawa's ratepayers.

VII. ISSUE-BY-ISSUE SETTLEMENTS

1 GENERAL

1.1 Has Hydro Ottawa responded appropriately to all relevant Board directions from previous proceedings?

- **Complete Settlement:** As per Exhibit A1-8-1, Hydro Ottawa had two outstanding Board directives. One is related to distribution losses and has been addressed in Exhibit H4-3-1. The other is related to Smart Meters and has been addressed in Exhibit I2-1-1. For the purposes of settlement, the Participating Parties accept the



evidence of Hydro Ottawa that there are no outstanding Board directions from previous proceedings.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-8-1; H4-2-1; H4-3-1, I2-1-1
Board Staff Interrogatories	K1-1-1(1)
Energy Probe Interrogatories	K1-1-2(1)
CCC Interrogatories	K1-1-3(1); K1-1-4(2); K1-1-5(3); K1-1-6(4); K1-1-7(5)
SEC Interrogatories	K1-1-8(1)
VECC Interrogatories	K1-1-9(1)
Additional Evidence	D1-13; D2-71; LT2.6; LT2.8; D1-15; D1-56; D1-81; D2-13

1.2 Are Hydro Ottawa's economic and business planning assumptions for 2012 appropriate?

- **Incomplete Settlement:** For the purposes of settlement, the Participating Parties have accepted Hydro Ottawa's economic and business planning assumptions for 2012, except as they relate to OM&A expenses (see Issue 4.1).

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-9-1; A1-2-2; B5-4-1; B5-1-1; B5-3-1; B6-1-1; B8-1-1; D1-1-2
Board Staff Interrogatories	K1-2-1(2)
Energy Probe Interrogatories	K1-2-2(2); K1-2-3(3);
CCC Interrogatories	K1-2-4(6)
SEC Interrogatories	K1-2-5(2); K1-2-6(3); K1-2-7(4)
VECC Interrogatories	K1-2-8(2); K1-2-9(5); K1-2-10(6);
Additional Evidence	D1-13; D1-34; D1-50; D2-40 to D2-45; LT2.4

1.3 Is service quality, based on the Board specified performance indicators, acceptable?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have agreed that service quality, based upon the Board specified performance indicators and the Hydro Ottawa evidence, is acceptable.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	B6-1-1; B8-1-1
Board Staff Interrogatories	K1-3-1(3)
VECC Interrogatories	K1-3-2(3); K1-3-3(4)
Additional Evidence	D1-72; D2-40 to D2-45; LT2.4

1.4 Is the proposal to align the rate year with Hydro Ottawa's fiscal year, and for rates effective January 1, 2012 appropriate?



- **Complete Settlement:** For the purposes of settlement, the Participating Parties agree that the proposal to align the rate year with Hydro Ottawa's fiscal year is appropriate. Further, the Participating Parties agree that rates be effective January 1, 2012.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-2-2; D1-1-2
Board Staff Interrogatories	K1-4-1(4); K1-4-2(5); K1-4-3(6)
Energy Probe Interrogatories	K1-4-4(4); K1-4-5(5); K1-4-6(6)
CCC Interrogatories	K1-4-7(7)
Additional Evidence	D1-34

2 RATE BASE

2.1 Is the proposed rate base for the test year appropriate?

- **Incomplete Settlement:** Hydro Ottawa had forecasted a rate base of \$669,087k, based on Average Net Fixed Assets of \$563,116k and an Allowance for Working Capital of \$105,971k, based on CGAAP. For the purposes of settlement, the Participating Parties have settled on the Average Net Fixed Assets portion of the rate base as adjusted by the settled Issue 2.3, as set out below. As part of the settlement, for the purposes of setting rates, the \$4,000k adjustment below is to a non-depreciable asset. The Average Net Fixed Assets under modified IFRS are dealt with under Issue 11.1. Rate base has not been settled with respect to Issue 2.2, the Working Capital Allowance.

CGAAP	Application \$000	Adjustment for \$4M in capital additions \$000	Adjustment for hybrid premiums \$000	Settlement \$000
2011 Net Fixed Assets	\$547,514	\$0	(\$314)	\$547,200
2012 Net Fixed Assets	\$578,718	(\$4,000)	(\$399)	\$574,319
Average Net Fixed Assets	\$563,116	(\$2,000)	(\$357)	\$560,759

- **Evidence:** The evidence in relation to this issue includes the following:



Exhibits	A1-9-1; B1-1-1; B1-2-3; B1-2-4; B1-2-5; B1-2-6; B1-2-7; B3-1-1; B4-5-2; B5-1-1; B5-2-1; B5-3-1; B5-4-1; B5-4-2; B5-1-1; B5-3-1; B5-3-2; C1-1-1; D1-1-1; D1-5-1
Board Staff Interrogatories	K2-1-1(7); K2-1-2(8)
Energy Probe Interrogatories	K2-1-3(7); K2-1-4(8); K2-1-5(9); K2-1-6(10); K2-1-7(11); K2-1-8(12); K2-1-9(13)
SEC Interrogatories	K2-1-10(5); K2-1-11(6); K2-1-12(7); K2-1-13(8); K2-1-14(9); K2-1-15(10); K2-1-16(11); K2-1-17(12); K2-1-18(13); K2-1-19(14); K2-1-20(15); K2-1-21(16)
VECC Interrogatories	K2-1-22(7); K2-1-23(8); K2-1-24(9); K2-1-25(10); K2-1-26(11); K2-1-27(12); K2-1-18(13); K2-1-29(14); K2-1-30(15); K2-1-31(16); K2-1-32(23)
EnviroCentre	K2-1-33(1&2); K2-1-34(3)
Additional Evidence	D1-50; D1-73; MT1.8; MT1.9; D2-10; D1-18; LT1.1; D1-74; D2-4; D2-8; D2-50; MT2.2; D2-45; D1-8; D1-66; MT1.2; LT1.4; LT1.5

2.2 Is the working capital allowance for the test year appropriate?

- **Incomplete Settlement:** The Hydro Ottawa forecast of its Working Capital Allowance (“WCA”) for the Test Year is \$105,971k. This forecast is based on a lead-lag study that determined the WCA% to be 14.2% applied to a Cost of Power of \$680,576k and OM&A of \$66,698k. For the purposes of settlement, the Participating Parties have agreed that the Cost of Power will be updated with the load forecast as per Issue 3.2 and the updated 2012 wholesale transmission rates established by the Board at the time a decision in this proceeding is issued. No agreement was reached with respect to the WCA% nor Issue 4.1, the Operating, Maintenance and Administration (“OM&A”).
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	B4-1-1; B4-2-1
Board Staff Interrogatories	K2-2-1(9); K2-2-2(10); K2-2-3(11)
Energy Probe Interrogatories	K2-2-4(14); K2-2-5(15); K2-2-6(16); K2-2-7(17)
VECC Interrogatories	K2-2-19(17); K2-2-20(18)
Additional Evidence	D1-41; D1-49; D1-50; D2-8 to D2-10; D2-4; D2-40 to D2-45; D2-52; D2-53; LT1.2; LT1.3; LT2.4

2.3 Is the capital expenditure forecast for the test year appropriate?

- **Complete Settlement:** Hydro Ottawa’s forecasted capital expenditures (net of contributed capital) are \$90,577k, based on CGAAP. For purposes of settlement, the Participating Parties agreed to the following:
 - Removal of \$4M from 2012 capital expenditures (\$2M from Average Net Fixed Assets).



- Removal of \$175k from 2012 capital expenditures related to the hybrid premium on vehicle purchases (removal of \$89k from Fixed Assets) and \$357k from Average Net Fixed Assets related to the hybrid premium on all vehicle purchases since 2005, as per Issue 2.1.

The capital expenditures under modified IFRS are dealt with under Issue 11.1.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-9-1; B1-1-1; B1-2-3; B1-2-4; B1-2-5; B1-2-6; B1-2-7; B4-5-2; B5-1-1; B5-1-2; B5-2-1; B5-2-2; B5-3-1; B5-3-2; B5-4-1; B5-4-2; B5-4-3; B5-5-1; B5-5-2; B5-6-1; B5-7-1; C1-1-1; C2-1-1; D1-5-1; F1-1-1
Board Staff Interrogatories	K2-3-1(12); K2-3-2(13); K2-3-3(14); K2-3-4(15); K2-3-5(16)
Energy Probe Interrogatories	K2-3-6(18); K2-3-7(19); K2-3-8(20); K2-3-9(21); K2-3-10(22)
SEC Interrogatories	K2-3-11(17); K2-3-12(18); K2-3-13(19); K2-3-14(20); K2-3-15(21); K2-3-16(22); K2-3-17(23); K2-3-18(24); K2-3-19(25); K2-3-20(26); K2-3-21(27); K2-3-22(28); K2-3-23(29); K2-3-24(30); K2-3-25(31); K2-3-26(32); K2-3-27(33); K2-3-28(34); K2-3-29(35); K2-3-30(36)
Additional Evidence	D1-50; D1-73; MT1.8; MT1.9; D2-10; D1-18; LT1.1; D1-74; D2-4; D2-8; D2-51; MT2.3; D1-8; D1-12; D2-54; D1-64; MT1.4; D2-45

2.4 Is the capitalization policy and allocation procedure appropriate?

- **No Settlement:** No agreement was reached with respect to settlement of this issue because the capitalization policy and allocation procedure for the Test Year will be dealt with under Issue 11.1 in this Proposed Settlement Agreement.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	B1-3-1; D1-1-1
VECC Interrogatories	K2-4-1(19); K2-4-2(20)
Additional Evidence	D2-11; MT2.1

2.5 Is Hydro Ottawa's Green Energy Act Plan appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties agree that the Hydro Ottawa Green Energy Act Plan for the test year is appropriate.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	B1-2-2
Board Staff Interrogatories	K2-5-1(17); K2-5-2(18); K2-5-3(19); K2-5-4(20); K2-5-5(21); K2-5-6(22); K2-5-7(23)
CCC Interrogatories	K2-5-8(19); K2-5-9(20); K2-5-10(21)



VECC Interrogatories	K2-5-11(21); K2-5-12(22)
EnviroCentre	K2-5-13(4); K2-5-14(5); K2-5-15(6); K2-5-16(7)
Additional Evidence	D1-23 to D1-29; D1-75; D1-76; D1-77; D2-55; D2-56

3 LOAD FORECASTING AND OPERATING REVENUE (EXHIBIT C)

3.1 Is the load forecast methodology including weather normalization appropriate?

- **Incomplete Settlement:** For the purposes of settlement, the Participating Parties accept Hydro Ottawa's load forecast methodology with respect to the kW sales for each rate class. The Participating Parties did not agree on the methodology with respect to the forecast of system energy and the kWh sales for each rate class.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	C1-1-1; C1-1-2
Board Staff Interrogatories	K3-1-1(23); K3-1-2(24); K3-1-3(25); K3-1-4(26); K3-1-5(27); K3-1-6(28)
Energy Probe Interrogatories	K3-1-7(24)
VECC Interrogatories	K3-1-8(24); K3-1-9(25); K3-1-10(26); K3-1-11(27); K3-1-12(28)
Additional Evidence	D1-51; D2-62; LT2.5; D1-67, MT1.3

3.2 Are the proposed customers/connections and load forecasts (both kWh and kW) for the test year appropriate?

- **Incomplete Settlement:** For the purposes of settlement, the Participating Parties have agreed to adjust the customer/connection counts for 2012 as shown in the table below. The load forecast was not settled as the issue is dependent upon a resolution of Issue 3.1.

Class	Application	Adjustment	Settlement
Residential	278,421	0	278,421
GS < 50 kW	23,587	0	23,587
GS > 50 < 1,499 kW	3,296	+27	3,323
GS > 1,500 < 4,499 kW	67	+4	71
Large Use	12	-1	11
UMSL	3,093	0	3,093
Streetlight	55,051	0	55,051

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	B5-3-1; C1-1-1; D1-1-1
----------	------------------------



Board Staff Interrogatories	K3-2-1(29)
Energy Probe Interrogatories	K3-2-2(25); K3-2-3(26); K3-2-4(27)
VECC Interrogatories	K3-2-5(29); K3-2-6(30)
Additional Evidence	D1-67; D2-71; LT2.6; LT2.8; D1-8; D1-66, MT1.3

3.3 Is the impact of CDM appropriately reflected in the load forecast?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties agreed to reduce the impact of CDM reflected in the load forecast for 2012 from 165 GWhs to 75 GWhs and a reduction to the forecasted system peak of 38 MW in 2012. The revision to the GWh CDM reduction reflects the changed interpretation of 'cumulative' targets.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	C1-1-1
Board Staff Interrogatories	K3-3-1(30)
Energy Probe Interrogatories	K3-3-2(28); K3-3-3(29); K3-3-4(30)
VECC Interrogatories	K3-3-5(31); K3-3-6(32)

3.4 Is the proposed forecast of test year throughput revenue appropriate?

- **No Settlement:** See Issues 3.1 and 3.2.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	C1-1-1; C2-1-1
VECC Interrogatories	K3-4-1(33)

3.5 Is the test year forecast of other revenues appropriate?

- **Complete Settlement:** The Hydro Ottawa forecast for other revenues is \$9,026k. For the purposes of settlement the Participating Parties agree that the forecast is appropriate.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-7-1; A1-7-2; A1-7-3; A1-7-4; A1-9-1; C2-1-1; C2-2-1; D1-2-1
Board Staff Interrogatories	K3-5-1(31); K3-5-2(32)
Energy Probe Interrogatories	K3-5-3(31); K3-5-4(32); K3-5-5(33); K3-5-6(34)
CCC Interrogatories	K3-5-7(22)
VECC Interrogatories	K3-5-8(34); K3-5-9(35); K3-5-10(36); K3-5-11(37)
Additional Evidence	D1-13; D1-54; D2-15



4 OPERATING COSTS (EXHIBIT D)

4.1 Is the overall OM&A forecast for the test year appropriate?

- **No Settlement:** Hydro Ottawa's forecast of OM&A (not including property taxes) for the Test Year is \$63,891k, based on CGAAP. No agreement was reached with respect to the settlement of this issue. The OM&A, under modified IFRS, is dealt with under Issue 11.1.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	B5-1-1; B5-3-1; C1-1-1; D1-1-1; D1-1-2; D1-4-2; D1-5-1; D2-1-1; D2-1-4; D2-1-5; D3-1-1; D6-1-1
Board Staff Interrogatories	K4-1-1(33); K4-1-2(34); K4-1-3(35); K4-1-4(36); K4-1-5(37); K4-1-6(38); K4-1-7(39)
Energy Probe Interrogatories	K4-1-8(35); K4-1-9(36); K4-1-10(37); K4-1-11(38); K4-1-12(39)
CCC Interrogatories	K4-1-14(23); K4-1-15(24); K4-1-16(25); K4-1-17(26); K4-1-18(27)
SEC Interrogatories	K4-1-19(37); K4-1-20(38); K4-1-21(39); K4-1-22(40); K4-1-23(41)
VECC Interrogatories	K4-1-24(38); K4-1-25(39)
EnviroCentre	K4-1-26(8); K4-1-27(9); K4-1-28(10)
Additional Evidence	D2-45; D1-8; D1-66; D1-15; D1-56; D1-81; D2-13; D1-80; D1-83; MT1.10; LT1.8; D2-78; LT2.9; D1-57; D1-15

4.2 Are the methodologies used to allocate shared services and other costs appropriate?

- **No Settlement:** No agreement was reached with respect to the settlement of this issue.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-7-1; A1-7-2; A1-7-3; A1-7-4; D1-2-1
Energy Probe Interrogatories	K4-2-1(40); K4-2-2(41); K4-2-3(42); K4-2-4(43); K4-2-5(44); K4-2-6(45); K4-2-7(46); K4-2-8(47); K4-2-9(48); K4-2-10(49); K4-2-11(50)
CCC Interrogatories	K4-2-12(32); K4-2-13(33); K4-2-14(34); K4-2-15(35)

4.3 Is the proposed level of depreciation/amortization expense for the test year appropriate?

- **Complete Settlement:** Hydro Ottawa's forecast of depreciation/amortization is \$47,415k, under CGAAP. For the purposes of settlement, the Participating Parties accept the forecasted depreciation/amortization, adjusted for the removal of the hybrid premiums as outlined in Issue 2.3, as appropriate. As noted below, no



agreement was reached with respect to Issue 11.1 and the conversion of depreciation/amortization to modified IFRS.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	D5-1-1
----------	--------

4.4 Are the 2012 compensation costs and employee levels appropriate?

- **No Settlement:** Hydro Ottawa applied for \$63,651k (based on CGAAP) in gross compensation costs for 598 full time equivalents. No agreement was reached with respect to settlement of this Issue.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A1-7-4; B1-3-1; D1-1-1; D1-1-2; D1-5-1; D2-1-4; D3-1-1
Board Staff Interrogatories	K4-4-1(4); K4-4-2(41); K4-4-3(42); K4-4-4(43); K4-4-5(44); K4-4-6(45); K4-4-7(46); K4-4-8(47)
Energy Probe Interrogatories	K4-4-9(51)
CCC Interrogatories	K4-4-10(28); K4-4-11(29); K4-4-12(30); K4-4-13(31)
SEC Interrogatories	K4-4-14(42); K4-4-15(43); K4-4-16(44); K4-4-17(45); K4-4-18(46); K4-4-19(47); K4-4-20(48); K4-4-21(49); K4-4-22(50); K4-4-23(51)
VECC Interrogatories	K4-4-24(40); K4-4-25(41); K4-4-26(42); K4-4-27(43)
Additional Evidence	D2-11; MT2.1; D1-80; D1-83; MT1.10; LT1.8; D2-78; LT2.9; D1-57; D2-15

4.5 Is the test year forecast of property taxes appropriate?

- **Complete Settlement:** Hydro Ottawa's forecast of property tax was \$1,806k. For the purposes of settlement, the Participating Parties have agreed to adjust the property tax forecast to \$1,700k. The settlement value is comprised of 2011 actual costs plus 2.5% inflation based on assumed Municipal property tax increases for 2012.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	D1-1-1; D1-2-1
Energy Probe Interrogatories	K4-5-1(52)

4.6 Is the test year forecast of PILs appropriate?

- **Complete Settlement:** Hydro Ottawa forecast of PILs was \$5,951k, based on CGAAP. For the purposes of settlement, the Participating Parties have agreed: (i) the PILs will be recalculated when the revenue and expense issues are determined; and (ii) Energy Probe noted that there was a potential generic issue with the PILS



model in calculating the Ontario Small Business Deduction (“SBD”) surtax (also known as claw back). The estimated amount of this was a \$20k reduction in PILS from the original forecast. Hydro Ottawa agrees that the recalculation in part (i) will reflect the SBD surtax calculation correctly to address this noted issue. The calculation of PILS under modified IFRS will be dealt with under Issue 11.1.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	D6-1-1; D6-1-1 Attach AD; D6-2-1; J3-1-1; J3-1-1 Attach AU
Board Staff Interrogatories	K4-6-1(48); K4-6-2(49); K4-6-3(50)
Energy Probe Interrogatories	K4-6-4(53); K4-6-5(54); K4-6-6(55)
Additional Evidence	D1-11; D1-58

5 CAPITAL STRUCTURE AND COST OF CAPITAL

5.1 Is the proposed capital structure, rate of return on equity and short term debt rate appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have agreed that the Hydro Ottawa proposed capital structure of 56% long term debt, 4% short term debt, and 40% equity is appropriate. In addition, the Participating Parties have agreed to use the most up to date Cost of Capital Parameters updated for Cost of Service Applications effective January 1, 2012, return on equity (“ROE”) and short term debt rate set by the Board.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	A2-1-2; E1-1-1; E1-1-1 Attach AF; E1-1-1 Attach AG
Board Staff Interrogatories	K5-2-1(51); K5-2-2(52)
Energy Probe Interrogatories	K5-1-1(56); K5-2-3(57)
CCC Interrogatories	K5-1-2(36); K5-2-4(37)
SEC Interrogatories	K5-2-5(52)
VECC Interrogatories	K5-1-3(44); K5-1-4(45)
Additional Evidence	MT1.5; MT1.6; MT1.7; MT1.11; LT1.11; LT1.11 Attach 1; LT2.1; LT2.2

5.2 Is the proposed long term debt rate appropriate?

- **No Settlement:** Hydro Ottawa requested a weighted average long term debt rate of 5.39%. No agreement was reached with respect to settlement of this Issue.
- **Evidence:** The evidence in relation to this issue includes the following:



Exhibits	E1-1-1
Board Staff Interrogatories	K5-2-1(51); K5-2-2(52)
Energy Probe Interrogatories	K5-2-3(57)
CCC Interrogatories	K5-2-4(37)
SEC Interrogatories	K5-2-5(52)
Additional Evidence	D1-57; D1-69; MT1.5; Mt1.6; Mt1.7; D1-93; D1-97; MT1.11; D1-100; LT1.11; LT2.1; LT2.2

6 SMART METERS

6.1 Is the proposed elimination of the smart meter rate adder and the inclusion of the smart meter costs in the 2012 revenue requirement appropriate?

- **Incomplete Settlement:** For the purposes of settlement, the Participating Parties have agreed on the elimination of the smart meter adder and the inclusion of the smart meter costs in the 2012 revenue requirement as presented in the evidence cited below. In addition, based on the attached Schedule C and draft Board model, the Participating Parties agree that Hydro Ottawa's current Smart Meter adder of \$1.42/metered customer/month will end December 31, 2011 and will be replaced by a Smart Meter Disposition Rider to collect \$1.511.586. The Participating Parties also agreed that this amount could be collected on a fixed amount per month; therefore this amount was removed from the regulatory rate riders referred to in Issue 9.1 below, without prejudice to the determination of the disposition rate rider. No agreement was reached with respect to whether the disposition rider should be:
 - a) as proposed by Hydro Ottawa on a per meter basis, or
 - b) rate class specific, based on the smart meter capital costs incurred on behalf of each rate class such that some classes would be entitled a refund, while others will have to fund a deficit.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I2-1-1
Board Staff Interrogatories	K6-1-1(53)
Energy Probe Interrogatories	K6-1-2(38); K6-1-3(39); K6-1-4(40)
SEC Interrogatories	K6-1-5(53)
VECC Interrogatories	K6-1-6(46)
Additional Evidence	D1-9; D1-61; D1-118; LT1.12; D1-124; LT1.13



6.2 Is the proposal not to dispose of the balances in variance accounts 1555 and 1556 appropriate?

Note that this issue should have been updated with 'Is the proposal to dispose of the balances in variance accounts 1555 and 1556 appropriate as a result of the Board's updated Filing Requirements?'

- **Incomplete Settlement:** See Issue 6.1 above.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I1-1-2; I2-1-1
Board Staff Interrogatories	K6-2-1(54); K6-2-2(55)
VECC Interrogatories	K6-2-3(47); K6-2-4(48); K6-2-5(49)
Additional Evidence	D1-126; D1-127; LT1.14; D1-132; LT1.15

6.3 Is the proposal related to stranded meters appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have agreed that the Hydro Ottawa proposed treatment of stranded meters is appropriate.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I1-1-2; I2-1-1
Board Staff Interrogatories	K6-3-1(56)
Additional Evidence	D1-126; D1-127; LT1.14; D1-132; LT1.15

7 COST ALLOCATION

7.1 Is Hydro Ottawa's cost allocation appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties accept the Hydro Ottawa cost allocation methodology as appropriate.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	G1-1-1
Board Staff Interrogatories	K7-1-1(57); K7-1-2(58); K7-1-3(59)
Energy Probe Interrogatories	K7-1-4(58)
SEC Interrogatories	K7-1-5(54)
VECC Interrogatories	K7-1-6(50); K7-1-7(51)



7.2 Are the proposed revenue to cost ratios for each class appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties accept as appropriate the revenue to cost ratios for the Residential and General Service rate classes. All rate classes are within the Board Target Range for their respective rate classes, after adjustments. With respect to the Large Use, Streetlighting, Sentinel and Unmetered Scattered load rate classes, the Intervenor, for the purposes of settlement, take no position with respect to the appropriateness of the revenue to cost ratios.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	G1-1-1
Energy Probe Interrogatories	K7-2-1(59)
CCC Interrogatories	K7-2-2(41)

8 RATE DESIGN

8.1 Are the fixed to variable splits for each class appropriate?

- **Complete Settlement:** For purposes of settlement, the Participating Parties have settled on the basis that the fixed monthly service charges for the GS > 50 kW < 1,499 kW, GS > 1,500 kW < 4,999 kW and Large Use classes will be held constant at the 2011 levels. For the remainder of rate classes the Participating Parties have accepted the fixed to variable splits included in the Hydro Ottawa Application as submitted in the evidence below.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	H1-2-1
Board Staff Interrogatories	K8-1-1(60)
VECC Interrogatories	K8-1-2(52); K8-1-3(53)
Additional Evidence	C2-17

8.2 Are the proposed retail transmission service rates appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have agreed that Hydro Ottawa's proposed Retail Transmission rates, as submitted in the evidence below, will be updated based on the updated 2012 wholesale transmission rates established by the Board at the time a decision in this proceeding is issued.
- **Evidence:** The evidence in relation to this issue includes the following:



Exhibits	H2-1-1; I1-5-1 Updated
Board Staff Interrogatories	K8-2-1(61)
Additional Evidence	D1-10; D1-39

8.3 Are the proposed LV rates appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have accepted Hydro Ottawa's proposed new LV rates as set out in the evidence cited below, as appropriate.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	H3-1-1; I1-4-1
Energy Probe Interrogatories	K8-3-1(60)
VECC Interrogatories	K8-3-2(54); K8-3-3(55)

8.4 Are the proposed loss factors appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have accepted Hydro Ottawa's Distribution Loss Factors, as set out in the evidence cited below, as appropriate.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	H1-2-1; H4-1-1; H4-2-1; H4-3-1; H5-1-1
Board Staff Interrogatories	K8-4-1(62); K8-4-2(63); K8-4-3(64); K8-4-4(65)
VECC Interrogatories	K8-4-5(56)
Additional Evidence	D1-10; D1-56

9 DEFERRAL AND VARIANCE ACCOUNTS

9.1 Are the account balances, cost allocation methodology and disposition period appropriate?

- **Incomplete Settlement:** For the purposes of settlement, the Participating Parties have agreed that the account balances, cost allocation methodology and disposition period for the deferral and variance accounts as presented in the evidence cited below, adjusted for the disposal of the Smart Meters as described in Issues 6.1 and 6.2 above, are appropriate. No agreement was reached with respect to whether the Smart Meter disposition rider should, as proposed by Hydro Ottawa, be on a per meter basis or rate class specific, based on capital costs.



The revised rate riders are as follows:

Class	Rate Rider as per I1-1-2 Attachment AR Updated	Rate Rider with Smart Meter Variance Accounts Removed	Global Adjustment Rate Rider
Residential	-\$0.0024	-\$0.0026	\$0.0024
GS < 50 kW	-\$0.0027	-\$0.0027	\$0.0024
GS > 50 < 1,499 kW	-\$1.1509	-\$1.1516	\$0.0024
GS > 1,500 < 4,499 kW	-\$1.3606	-\$1.3606	\$0.0024
Large Use	-\$1.5859	-\$1.5859	\$0.0024
UMSL	-\$0.0028	-\$0.0028	N/A
Sentinel	-\$0.9828	-\$0.9828	N/A
Streetlight	-\$0.9425	-\$0.9426	\$0.0024

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I1-1-1; I1-1-2
Board Staff Interrogatories	K9-1-1(66); K9-1-2(67); K9-1-3(68); K9-1-4(69); K9-1-5(70); K9-1-6(71); K9-1-7(72); K9-1-8(73); K9-1-9(74); K9-1-10(75); K9-1-11(76); K9-1-12(77); K9-1-13(78)
SEC Interrogatories	K9-14(55)
Additional Evidence	D1-17; D1-135; LT1.16; D1-139; D1-140; LT1.17; LT1.18; D1-155; LT1.19; D1-152

9.2 Are the proposed rate riders to dispose of the account balances appropriate?

- **Complete Settlement:** For the purposes of settlement, the Participating Parties have accepted Hydro Ottawa's proposed rate riders to dispose of the account balances, as set out in the evidence cited below and as adjusted for the disposal of the Smart Meters as described in Issues 6.1 and 6.2 above, are appropriate. No agreement was reached with respect to whether the Smart Meter disposition rider should, as proposed by Hydro Ottawa, be on a per meter basis or rate class specific, based on capital costs.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I1-1-2
Energy Probe Interrogatories	K9-2-1(61)

9.3 Are the proposed new deferral and variance accounts appropriate?

- **Complete Settlement:** Hydro Ottawa has requested two new sub-accounts to Account 1595 to record the disposition and recoveries of the deferral and variance accounts. For the purposes of settlement, the Participating Parties have agreed to



Hydro Ottawa's proposal to establish two new sub-accounts. This issue of new deferral and variance accounts requested under modified IFRS is addressed under Issue 11.2.

- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I1-1-3
Energy Probe Interrogatories	K9-3-1(62)

10 LOST REVENUE ADJUSTMENT MECHANISM

10.1 Is the proposal related to LRAM appropriate?

- **No Settlement:** Hydro Ottawa requested a LRAM of \$859k related to lost revenue in 2009 to 2011 due to 2009 and 2010 Ontario Power Authority programs. No agreement was reached with respect to the settlement of this Issue, with some intervenors advancing the position that the CDM adjustment to the load forecast in 2008 resulted in Hydro Ottawa collecting excess revenue from some rate classes and under collecting from others.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	I3-1-1
VECC Interrogatories	K10-1-1(57); K10-1-2(58)
Additional Evidence	D1-10, MT2.4, LT2.8, LT2.13, LT1.14

11 MODIFIED INTERNATIONAL FINANCIAL REPORTING STANDARDS

11.1 Is the proposed revenue requirement determined using modified IFRS appropriate?

- **No Settlement:** As noted previously, Issues 1 through 10 inclusive are addressed in this Proposed Settlement Agreement on the basis of CGAAP. No agreement was reached with respect to settlement of whether the proposed revenue requirement determined using modified IFRS is appropriate. For greater certainty, this includes but is not limited to, the proposed rate base and capital expenditures as calculated in modified IFRS, capitalization policy and allocation procedure and depreciation/amortization expenses for the test year.
- **Evidence:** The evidence in relation to this issue includes the following:



Exhibits	B1-3-1; J1-1-1; J2-1-1; J3-1-1; J3-1-2; J3-1-3; J3-1-4
Board Staff Interrogatories	K11-1-1(79); K11-1-2(80); K11-1-3(81); K11-1-4(82); K11-1-5(83); K11-1-6(84); K11-1-7(85); K11-1-8(86); K11-1-9(87); K11-1-10(88); K11-1-11(89); K11-1-12(90); K11-1-13(91); K11-1-14(92); K11-1-15(93); K11-1-16(94)
Energy Probe Interrogatories	K11-1-17(63); K11-1-18(64); K11-1-19(65); K11-1-20(66)
Additional Evidence	D1-158; D1-168; D1-170; D2-30; D2-37

11.2 Are the proposed new MIFRS deferral and variance accounts appropriate?

- **No Settlement:** Hydro Ottawa proposed two new deferral accounts for the Test Year related to the transition to modified IFRS; one to capture the opening balance sheet adjustment required to pensions as a result of converting to modified IFRS and the other to capture future gains and losses on disposals of pooled assets, which is not required under modified IFRS. No agreement was reached on the settlement of this Issue.
- **Evidence:** The evidence in relation to this issue includes the following:

Exhibits	J4-1-1
Board Staff Interrogatories	K11-2-1(95); K11-2-2(96); K11-2-3(97)
Energy Probe Interrogatories	K11-2-4(67)
Additional Evidence	D1-172; D1-174; MT1.12



Schedule A – Specific Approvals Requested (Exhibit A1-4-1)



SPECIFIC APPROVALS REQUESTED

Hydro Ottawa Limited ("Hydro Ottawa") requests the following specific approvals:

1. The approval of (a) Hydro Ottawa's forecast Base Revenue Requirement for the Test Year, or such other Base Revenue Requirement as the Board may find reasonable for the Test Year, in each case adjusted as required to update the Return On Equity and short-term debt rate as described in Exhibit E1-1-1 and (b) corresponding final rates effective January 1, 2012.
2. The approval of clearing the balances recorded in certain deferral and variance accounts by means of class-specific rate riders effective January 1, 2012 for a period of one year.
3. Approval for four new deferral and variance accounts, or sub-accounts as described in Exhibits I1-1-3 and J4-1-1.
4. Approval of all expenditures made as part of the Smart Meter Initiative to the end of 2010, as identified in Exhibit I2-1-1, and inclusion of the capital spending in the 2012 rate base.
5. Pursuant to Section 84 (a) of the *Ontario Energy Board Act*, deem the following assets which operate at a voltage greater than 50 kilovolts to be distribution assets:
 - a) Transformer substations Cyrville, Ellwood and Terry Fox, as discussed in Exhibits B5-1-1 and B5-5-1; and,
 - b) Additional transformation capacity constructed at the existing Fallowfield transformer substation, consistent with the existing Fallowfield substation owned by Hydro Ottawa.
6. Approval of revised Distribution Loss Factors as described in Exhibit H4-1-1.
7. Approval of updated rates for Dry Core Transformer Charges that are incorporated in Hydro Ottawa's proposed Tariff of Rates and Charges effective January 1, 2012.
8. Approval of revised Low Voltage rates as proposed in Exhibit H3-1-1.
9. Approval of Stand By rates as final effective January 1, 2012.



Schedule B – Issues List (Appendix “A” to Procedural Order No. 2, issued August 11, 2011)



Appendix 'A'

To

Procedural Order No. 2

Hydro Ottawa Limited
EB-2011-0054

Approved Issues List
August 11, 2011



Hydro Ottawa Limited
2012 Electricity Distribution Rates
EB-2011-0054
Issues List

1 General

- 1.1 Has Hydro Ottawa responded appropriately to all relevant Board directions from previous proceedings?
- 1.2 Are Hydro Ottawa's economic and business planning assumptions for 2012 appropriate?
- 1.3 Is service quality, based on the Board specified performance indicators, acceptable?
- 1.4 Is the proposal to align the rate year with Hydro Ottawa's fiscal year, and for rates effective January 1, 2012 appropriate?

2 Rate Base

- 2.1 Is the proposed rate base for the test year appropriate?
- 2.2 Is the working capital allowance for the test year appropriate?
- 2.3 Is the capital expenditure forecast for the test year appropriate?
- 2.4 Is the capitalization policy and allocation procedure appropriate?
- 2.5 Is Hydro Ottawa's Green Energy Act Plan appropriate?

3 Load Forecast and Operating Revenue

- 3.1 Is the load forecast methodology including weather normalization appropriate?
- 3.2 Are the proposed customers/connections and load forecasts (both kWh and kW) for the test year appropriate?
- 3.3 Is the impact of CDM appropriately reflected in the load forecast?
- 3.4 Is the proposed forecast of test year throughput revenue appropriate?
- 3.5 Is the test year forecast of other revenues appropriate?

4 Operating Costs

- 4.1 Is the overall OM&A forecast for the test year appropriate?
- 4.2 Are the methodologies used to allocate shared services and other costs appropriate?
- 4.3 Is the proposed level of depreciation/amortization expense for the test year appropriate?
- 4.4 Are the 2012 compensation costs and employee levels appropriate?



4.5 Is the test year forecast of property taxes appropriate?

4.6 Is the test year forecast of PILs appropriate?

5 Capital Structure and Cost of Capital

5.1 Is the proposed capital structure, rate of return on equity and short term debt rate appropriate?

5.2 Is the proposed long term debt rate appropriate?

6 Smart Meters

6.1 Is the proposed elimination of the smart meter rate adder and the inclusion of the smart meter costs in the 2012 revenue requirement appropriate?

6.2 Is the proposal not to dispose of the balances in variance accounts 1555 and 1556 appropriate?

6.3 Is the proposal related to stranded meters appropriate?

7 Cost Allocation

7.1 Is Hydro Ottawa's cost allocation appropriate?

7.2 Are the proposed revenue to cost ratios for each class appropriate?

8 Rate Design

8.1 Are the fixed to variable splits for each class appropriate?

8.2 Are the proposed retail transmission service rates appropriate?

8.3 Are the proposed LV rates appropriate?

8.4 Are the proposed loss factors appropriate?

9 Deferral and Variance Accounts

9.1 Are the account balances, cost allocation methodology and disposition period appropriate?

9.2 Are the proposed rate riders to dispose of the account balances appropriate?

9.3 Are the proposed new deferral and variance accounts appropriate?

10 Lost Revenue Adjustment Mechanism

10.1 Is the proposal related to LRAM appropriate?



11 Modified International Financial Reporting Standards

11.1 Is the proposed revenue requirement determined using modified IFRS appropriate?

11.2 Are the proposed new MIFRS deferral and variance accounts appropriate?



Schedule C - Issue 6.1 Smart Meters – Additional Explanation

Hydro Ottawa Limited has requested disposition of the Smart Meter variance and deferral accounts 1555 (except for Stranded Meters) and 1556 where the net balance of the two accounts is based on the revenue received from the funding adders and the calculated revenue requirement based on the capital expenditures and OM&A.

Revenue:

- (EB-2005-0381) Hydro Ottawa started spending capital dollars on the Smart Meter program and collecting revenue from a funding adder (\$0.41 for Residential and \$0.81 for GS < 50 kW) May 2006-April 2007.
- (EB-2007-0544) For May 2007-April 2008 the approved smart meter funding adder was \$1.74.
- (EB-2007-0748) Actual capital spending to April 30, 2007 was approved to be included in rate base, no longer included in variance account.
- (EB-2007-0713) For May 2008-April 2009 the approved smart meter funding adder was \$1.15.
- (EB-2008-0188) For May 2009-April 2010 the approved smart meter funding adder was \$1.68.
- (EB-2009-0231) For May 2010-April 2011 the approved smart meter funding adder was \$1.68.
- (EB-2010-0326) For May 2011-April 2012 the approved smart meter funding adder was \$1.42.

The calculation of the Smart Meter funding adder has always been based on the revenue requirement related to the Smart Meter spending, as per Ontario Energy Board (the "Board") Direction (G-2008-0002).

On October 22, 2008 Board issued a "*Guideline for Smart Meter Funding and Cost Recovery G-2008-0002*" (the "Guidelines"). The Guidelines (Appendix A) indicated that:

- The smart meter funding was to be recorded in 1555 – Hydro Ottawa did this.



- The capitalized direct costs related to the smart meter program should be recorded in 1555 – Hydro Ottawa did not do this. Instead Hydro Ottawa recorded the return and interest related to the capitalized costs in this account. The reason for doing this was that it more correctly matched the revenue which was being collected.
- Carrying charges were to be applied to the net monthly principle balance of 1555 – Hydro Ottawa did this but only the return and interest were used and not the capitalized cost. Hydro Ottawa's calculation of the carrying costs is lower as shown in the table below.
- The OM&A and amortization was to be recorded in 1556 – Hydro Ottawa recorded the OM&A, the amortization and the PILS in 1556.
- Carrying charges were to apply to the monthly principle balance of 1556 – Hydro Ottawa did this and the total calculated carrying charges were recorded in 1556.

Accounting FAQs were issued August 2008 and December 2010 which attempted to clarify the accounting for Smart Meters, however Q8 from the August 2008 FAQs stated:

"The following example is provided to illustrate the accounting treatment applicable to the smart meters variance accounts upon the Board's review of a distributor's in-service smart meters, which results in the issuance of a rate order to the distributor. The information in this **illustrative example** is not precedent setting and does not imply Board approval of any smart meter policy matter. The specific approval of these matters in the individual decision and order of a distributor apply." Note the emphasis was part of the FAQ.

2011 Smart Meter Rate Calculation Model was issued August 20, 2010, was for calculating the Smart Meter Rate Adder. In the model the carrying charges were only calculated on the revenue collected. This was shown as (\$1,116,291) for Hydro Ottawa in the model. Hydro Ottawa did not use this interest calculation for the Smart Meter rate disposition rider.

The Board has issued an updated draft Smart Meter Model (October 27, 2011) and in addition pointed out an error in Hydro Ottawa's calculations. The information is summarized below and is shown for both situations if the rate adder continues to April 30, 2012 or ends December 31, 2011:



	April 30, 2012 end date	Dec 31, 2011 end date
Board Staff's Draft Updated Model	(\$363k)	\$1,512k
Hydro Ottawa Methodology ¹	\$166k	\$1,906k

Hydro Ottawa is prepared to accept Board Staff's Draft Updated Model calculation (copy attached) and would prefer that the current Smart Meter Adder end as of December 31, 2011.

¹ High level approximation.



Ontario Energy Board

Smart Meter Model

Choose Your Utility:

Hydro Ottawa Limited

Innisfil Hydro Distribution Systems Limited

Application Contact Information

Name: Jane Scott

Title: Manager, Rates and Revenue

Phone Number: 613-739-5499 ext. 749

Email Address: janescott@hydroottawa.com

We are applying for rates effective: January 1, 2012

Last COS Re-based Year 2008

Legend

DROP-DOWN MENU

INPUT FIELD

CALCULATION FIELD

Copyright

This Workbook Model is protected by copyright and is being made available to you solely for the purpose of filing your application. You may use and copy this model for that purpose, and provide a copy of this model to any person that is advising or assisting you in that regard. Except as indicated above, any copying, reproduction, publication, sale, adaptation, translation, modification, reverse engineering or other use or dissemination of this model without the express written consent of the Ontario Energy Board is prohibited. If you provide a copy of this model to a person that is advising or assisting you in preparing the application or reviewing your draft rate order, you must ensure that the person understands and agrees to the restrictions noted above.

While this model has been provided in Excel format and is required to be filed with the applications, the onus remains on the applicant to ensure the accuracy of the data and the results. The use of any models and spreadsheets does not automatically imply Board approval. The onus is on the distributor to prepare, document and support its application. Board-issued Excel models and spreadsheets are offered to assist parties in providing the necessary information so as to facilitate an expeditious review of an application. The onus remains on the applicant to ensure the accuracy of the data and the results.



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

Distributors must enter all incremental costs related to their smart meter program and all revenues recovered to date in the applicable tabs except for those costs (and associated revenues) for which the Board has approved on a final basis, i.e. capital costs have been included in rate base and OM&A costs in revenue requirement.

For 2012, distributors that have completed their deployments by the end of 2011 are not expected to enter any capital costs. However, for OM&A, regardless of whether a distributor has deployments in 2012, distributors should enter the forecasted OM&A for 2012 for all smart meters in service.

Smart Meter Capital Cost and Operational Expense Data

Smart Meter Installation Plan

Actual/Planned number of Smart Meters installed during the Calendar Year

	2006 Audited Actual	2007 Audited Actual	2008 Audited Actual	2009 Audited Actual	2010 Audited Actual	2011 Forecast	2012 and later Forecast	Total
Residential	96,570	70,694	73,798	26,454	4,931	5,974		278421
General Service < 50 kW	765	5,605	10,269	5,053	1,270	724		23686
Actual/Planned number of Smart Meters installed (Residential and GS < 50 kW only)	97335	76299	84067	31507	6201	6698	0	302107
Percentage of Residential and GS < 50 kW Smart Meter Installations Completed	32.22%	57.47%	85.30%	95.73%	97.78%	100.00%	0.00%	100.00%
Actual/Planned number of GS > 50 kW meters installed	235	137	894	775	698	30		2769
Other (please identify)	58	327	343	174	131	320		1353
Total Number of Smart Meters installed or planned to be installed	97628	76763	85304	32456	7030	7048	0	306229

1 Capital Costs

1.1 ADVANCED METERING COMMUNICATION DEVICE (AMCD)

1.1.1 Smart Meters (may include new meters and modules, etc.)

1.1.2 Installation Costs (may include socket kits, labour, vehicle, benefits, etc.)

1.1.3a Workforce Automation Hardware (may include fieldwork handhelds, barcode hardware, etc.)

1.1.3b Workforce Automation Software (may include fieldwork handhelds, barcode hardware, etc.)

Total Advanced Metering Communications Devices (AMCD)

Asset Type
Asset type must be
selected to enable
calculations

	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
Smart Meter	10,912,767	10,596,597	9,726,371	3,924,168	1,123,912	1,290,068		\$ 37,573,883
Smart Meter	1,716,248	2,798,928	3,499,536	2,894,422	928,802	109,808		\$ 11,947,744
Tools & Equipment	838,597	9,112						\$ 847,709
Computer Software								\$ -
Total Advanced Metering Communications Devices (AMCD)	\$ 13,467,612	\$ 13,404,637	\$ 13,225,907	\$ 6,818,590	\$ 2,052,714	\$ 1,399,876	\$ -	\$ 50,369,336

1.2 ADVANCED METERING REGIONAL COLLECTOR (AMRC) (includes LAN)

1.2.1 Collectors

1.2.2 Repeaters (may include radio licence, etc.)

1.2.3 Installation (may include meter seals and rings, collector computer hardware, etc.)

Total Advanced Metering Regional Collector (AMRC) (Includes LAN)

Asset Type

	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
Smart Meter	53,473	384,929	302,372	152,591	126,137	308,121		\$ 1,327,623
Smart Meter								\$ -
Smart Meter	12,133	43,599	56,272	21,200	111,316	271,917		\$ 516,437
Total Advanced Metering Regional Collector (AMRC) (Includes LAN)	\$ 65,606	\$ 428,528	\$ 358,644	\$ 173,791	\$ 237,453	\$ 580,038	\$ -	\$ 1,844,060

1.3 ADVANCED METERING CONTROL COMPUTER (AMCC)

	Asset Type	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
1.3.1 Computer Hardware	Computer Hardware		53,634	5,138		666,387	363,072		\$ 1,088,231
1.3.2 Computer Software	Computer Software		79,986						\$ 79,986
1.3.3 Computer Software Licences & Installation (includes hardware and software) (may include AS/400 disk space, backup and recovery computer, UPS, etc.)	Computer Software		319,638	982,788	113,462	3,033,355	416,477		\$ 4,865,720
Total Advanced Metering Control Computer (AMCC)		\$ -	\$ 453,258	\$ 987,926	\$ 113,462	\$ 3,699,742	\$ 779,549	\$ -	\$ 6,033,937

1.4 WIDE AREA NETWORK (WAN)

	Asset Type	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
1.4.1 Activation Fees									\$ -
Total Wide Area Network (WAN)		\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -

1.5 OTHER AMI CAPITAL COSTS RELATED TO MINIMUM FUNCTIONALITY

	Asset Type	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
1.5.1 Customer Equipment (including repair of damaged equipment)	Other Equipment								\$ -
1.5.2 AMI Interface to CIS	Computer Software						231,177		\$ 231,177
1.5.3 Professional Fees	Computer Software								\$ -
1.5.4 Integration	Computer Software						927,930		\$ 927,930
1.5.5 Program Management	Computer Software								\$ -
1.5.6 Other AMI Capital	Computer Software								\$ -
Total Other AMI Capital Costs Related to Minimum Functionality		\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,159,107	\$ -	\$ 1,159,107
Total Capital Costs Related to Minimum Functionality		\$ 13,533,218	\$ 14,286,423	\$ 14,572,477	\$ 7,105,843	\$ 5,989,909	\$ 3,918,570	\$ -	\$ 59,406,440

1.6 CAPITAL COSTS BEYOND MINIMUM FUNCTIONALITY

(Please provide a descriptive title and identify nature of beyond minimum functionality costs)

	Asset Type	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
1.6.1 Costs related to technical capabilities in the smart meters or related communications infrastructure that exceed those specified in O.Reg 425/06									\$ -
1.6.2 Costs for deployment of smart meters to customers other than residential and small general service									\$ -
1.6.3 Costs for TOU rate implementation, CIS system upgrades, web presentation, integration with the MDM/R, etc.									\$ -
Total Capital Costs Beyond Minimum Functionality		\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total Smart Meter Capital Costs		\$ 13,533,218	\$ 14,286,423	\$ 14,572,477	\$ 7,105,843	\$ 5,989,909	\$ 3,918,570	\$ -	\$ 59,406,440

2 OM&A Expenses

2.1 ADVANCED METERING COMMUNICATION DEVICE (AMCD)

2.1.1 Maintenance (may include meter reverification costs, etc.)

2.1.2 Other (please specify)

Total Incremental AMCD OM&A Costs

2.2 ADVANCED METERING REGIONAL COLLECTOR (AMRC) (includes LAN)

2.2.1 Maintenance

2.2.2 Other (please specify)

Total Incremental AMRC OM&A Costs

2.3 ADVANCED METERING CONTROL COMPUTER (AMCC)

2.3.1 Hardware Maintenance (may include server support, etc.)

2.3.2 Software Maintenance (may include maintenance support, etc.)

2.3.2 Other (please specify)

Total Incremental AMCC OM&A Costs

2.4 WIDE AREA NETWORK (WAN)

2.4.1 WAN Maintenance

2.4.2 Other (please specify)

Total Incremental AMRC OM&A Costs

2.5 OTHER AMI OM&A COSTS RELATED TO MINIMUM FUNCTIONALITY

2.5.1 Business Process Redesign

2.5.2 Customer Communication (may include project communication, etc.)

2.5.3 Program Management

2.5.4 Change Management (may include training, etc.)

2.5.5 Administration Costs

2.5.6 Other AMI Expenses
(please specify)

Total Other AMI OM&A Costs Related to Minimum Functionality

TOTAL OM&A COSTS RELATED TO MINIMUM FUNCTIONALITY

2.6 OM&A COSTS RELATED TO BEYOND MINIMUM FUNCTIONALITY

(Please provide a descriptive title and identify nature of beyond minimum functionality costs)

2.6.1 Costs related to technical capabilities in the smart meters or related communications infrastructure that exceed those specified in O.Reg 425/06

2.6.2 Costs for deployment of smart meters to customers other than residential and small general service

2.6.3 Costs for TOU rate implementation, CIS system upgrades, web presentation, integration with the MDM/R, etc.

Total OM&A Costs Beyond Minimum Functionality

Total Smart Meter OM&A Costs

	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast	Forecast	
			32,720	33,430	20,750	238,414		\$ 325,314
								\$ -
	\$ -	\$ -	\$ 32,720	\$ 33,430	\$ 20,750	\$ 238,414	\$ -	\$ 325,314
								\$ -
								\$ -
	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
		210	2,842	1,983		259		\$ 5,294
		92,700	75,905	179,037	637,760	949,000		\$ 1,934,402
								\$ -
	\$ -	\$ 92,910	\$ 78,747	\$ 181,020	\$ 637,760	\$ 949,259	\$ -	\$ 1,939,696
		201,153	366,373	356,332	453,543	321,560		\$ 1,698,961
								\$ -
	\$ -	\$ 201,153	\$ 366,373	\$ 356,332	\$ 453,543	\$ 321,560	\$ -	\$ 1,698,961
		109,042	42,345	204,560	40,775	100,000		\$ 496,722
		54,995	53,138	4,893	139,701	921,000		\$ 1,173,727
		49,835	26,800	56,501	46,075			\$ 179,211
		2,535	8,167	97,127	203,668	32		\$ 311,529
		92,680	30,346	113,454	145,855	194,146		\$ 576,481
			76,975	82,454	2,763			\$ 162,192
	\$ -	\$ 309,087	\$ 237,771	\$ 558,989	\$ 578,837	\$ 1,215,178	\$ -	\$ 2,899,862
	\$ -	\$ 603,150	\$ 715,611	\$ 1,129,771	\$ 1,690,890	\$ 2,724,411	\$ -	\$ 6,863,833
	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Audited Actual	Forecast		
								\$ -
								\$ -
								\$ -
	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
	\$ -	\$ 603,150	\$ 715,611	\$ 1,129,771	\$ 1,690,890	\$ 2,724,411	\$ -	\$ 6,863,833

3 Aggregate Smart Meter Costs by Category

3.1	Capital									
3.1.1	Smart Meter	\$ 12,694,621	\$ 13,824,053	\$ 13,584,551	\$ 6,992,381	\$ 2,290,167	\$ 1,979,914	\$ -	\$ 51,365,687	
3.1.2	Computer Hardware	\$ -	\$ 53,634	\$ 5,138	\$ -	\$ 666,387	\$ 363,072	\$ -	\$ 1,088,231	
3.1.3	Computer Software	\$ -	\$ 399,624	\$ 982,788	\$ 113,462	\$ 3,033,355	\$ 1,575,584	\$ -	\$ 6,104,813	
3.1.4	Tools & Equipment	\$ 838,597	\$ 9,112	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 847,709	
3.1.5	Other Equipment	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	
3.1.6	Total Capital Costs	<u>\$ 13,533,218</u>	<u>\$ 14,286,423</u>	<u>\$ 14,572,477</u>	<u>\$ 7,105,843</u>	<u>\$ 5,989,909</u>	<u>\$ 3,918,570</u>	<u>\$ -</u>	<u>\$ 59,406,440</u>	
3.2	OM&A Costs									
3.2.1	Total OM&A Costs	<u>\$ -</u>	<u>\$ 603,150</u>	<u>\$ 715,611</u>	<u>\$ 1,129,771</u>	<u>\$ 1,690,890</u>	<u>\$ 2,724,411</u>	<u>\$ -</u>	<u>\$ 6,863,833</u>	



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

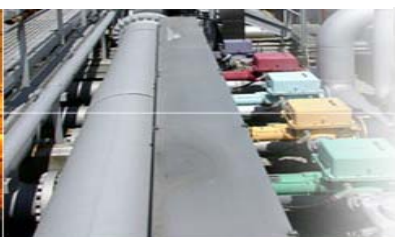
	2006	2007	2008	2009	2010	2011	2012 and later
Cost of Capital							
Capital Structure¹							
Deemed Short-term Debt Capitalization			4.0%	4.0%	4.0%	4.0%	
Deemed Long-term Debt Capitalization	60.0%	60.0%	56.0%	56.0%	56.0%	56.0%	56.0%
Deemed Equity Capitalization	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	44.0%
Preferred Shares							
Total	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
Cost of Capital Parameters							
Deemed Short-term Debt Rate			4.47%	4.47%	4.47%	4.47%	
Long-term Debt Rate (actual/embedded/deemed) ²	5.25%	5.25%	5.26%	5.26%	5.26%	5.26%	
Target Return on Equity (ROE)	9.0%	9.00%	8.57%	8.57%	8.57%	8.57%	
Return on Preferred Shares							
WACC	6.75%	6.75%	6.55%	6.55%	6.55%	6.55%	0.00%
Working Capital Allowance							
Working Capital Allowance Rate	15.0%	15.0%	12.5%	12.5%	12.5%	12.5%	
<i>(% of the sum of Cost of Power + controllable expenses)</i>							
Taxes/PILs							
Aggregate Corporate Income Tax Rate	36.12%	36.12%	33.50%	33.00%	31.00%	28.25%	26.25%
Capital Tax (until July 1st, 2010)	0.30%	0.225%	0.225%	0.225%	0.075%	0.00%	0.00%
Depreciation Rates							
<i>(expressed as expected useful life in years)</i>							
Smart Meters - years	15	15	15	15	15	15	
Smart Meters - rate (%)	6.67%	6.67%	6.67%	6.67%	6.67%	6.67%	0.00%
Computer Hardware - years	5	5	5	5	5	5	
Computer Hardware - rate (%)	20.00%	20.00%	20.00%	20.00%	20.00%	20.00%	0.00%
Computer Software - years	5	5	5	5	5	5	
Computer Software - rate (%)	20.00%	20.00%	20.00%	20.00%	20.00%	20.00%	0.00%
Tools & Equipment - years	10	10	10	10	10	10	
Tools & Equipment - rate (%)	10.00%	10.00%	10.00%	10.00%	10.00%	10.00%	0.00%
Other Equipment - years	10	10	10	10	10	10	
Other Equipment - rate (%)	10.00%	10.00%	10.00%	10.00%	10.00%	10.00%	0.00%
CCA Rates							
Smart Meters - CCA Class	47	47	47	47	47	47	
Smart Meters - CCA Rate	8%	8%	8%	8%	8%	8%	
Computer Equipment - CCA Class	45	45	50	50	50	50	
Computer Equipment - CCA Rate	45%	45%	55%	55%	55%	55%	
General Equipment - CCA Class	8	8	8	8	8	8	
General Equipment - CCA Rate	20%	20%	20%	20%	20%	20%	

Assumptions

¹ Planned smart meter installations occur evenly throughout the year.

² Fiscal calendar year (January 1 to December 31) used.

³ Amortization is done on a straight line basis and has the "half-year" rule applied.



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

	2006	2007	2008	2009	2010	2011	2012 and later
Net Fixed Assets - Smart Meters							
Gross Book Value							
Opening Balance		\$ 12,694,621	\$ 26,518,674	\$ 25,391,340	\$ 32,383,721	\$ 34,673,888	\$ 36,653,802
Capital Additions during year (from Smart Meter Costs)	\$ 12,694,621	\$ 13,824,053	\$ 13,584,551	\$ 6,992,381	\$ 2,290,167	\$ 1,979,914	\$ -
Retirements/Removals (if applicable)			\$ 14,711,885				
Closing Balance	\$ 12,694,621	\$ 26,518,674	\$ 25,391,340	\$ 32,383,721	\$ 34,673,888	\$ 36,653,802	\$ 36,653,802
Accumulated Depreciation							
Opening Balance		-\$ 423,154	-\$ 1,730,264	-\$ 1,633,497	-\$ 3,559,332	-\$ 5,794,586	-\$ 8,172,176
Amortization expense during year	-\$ 423,154	-\$ 1,307,110	-\$ 2,220,730	-\$ 1,925,835	-\$ 2,235,254	-\$ 2,377,590	\$ -
Retirements/Removals (if applicable)			-\$ 2,317,497				
Closing Balance	\$ 423,154	\$ 1,730,264	\$ 1,633,497	\$ 3,559,332	\$ 5,794,586	\$ 8,172,176	\$ 8,172,176
Net Book Value							
Opening Balance	\$ -	\$ 12,271,467	\$ 11,413,230	\$ 23,757,843	\$ 28,824,389	\$ 28,879,302	\$ 28,481,627
Closing Balance	\$ 12,271,467	\$ 24,788,410	\$ 23,757,843	\$ 28,824,389	\$ 28,879,302	\$ 28,481,627	\$ 28,481,627
Average Net Book Value	\$ 6,135,733	\$ 18,529,939	\$ 17,585,537	\$ 26,291,116	\$ 28,851,845	\$ 28,680,464	\$ 28,481,627
Net Fixed Assets - Computer Hardware							
Gross Book Value							
Opening Balance		\$ -	\$ 53,634	\$ 5,640	\$ 5,640	\$ 672,027	\$ 1,035,099
Capital Additions during year (from Smart Meter Costs)	\$ -	\$ 53,634	\$ 5,138	\$ -	\$ 666,387	\$ 363,072	\$ -
Retirements/Removals (if applicable)			\$ 53,132				
Closing Balance	\$ -	\$ 53,634	\$ 5,640	\$ 5,640	\$ 672,027	\$ 1,035,099	\$ 1,035,099
Accumulated Depreciation							
Opening Balance	\$ -	\$ -	-\$ 5,363	-\$ 665	-\$ 1,793	-\$ 69,560	-\$ 240,272
Amortization expense during year	\$ -	-\$ 5,363	-\$ 11,241	-\$ 1,128	-\$ 67,767	-\$ 170,713	\$ -
Retirements/Removals (if applicable)			-\$ 15,939				
Closing Balance	\$ -	\$ 5,363	\$ 665	\$ 1,793	\$ 69,560	\$ 240,272	\$ 240,272
Net Book Value							
Opening Balance	\$ -	\$ -	\$ 452	\$ 4,975	\$ 3,847	\$ 602,467	\$ 794,827
Closing Balance	\$ -	\$ 48,271	\$ 4,975	\$ 3,847	\$ 602,467	\$ 794,827	\$ 794,827
Average Net Book Value	\$ -	\$ 24,135	\$ 2,713	\$ 4,411	\$ 303,157	\$ 698,647	\$ 794,827
Net Fixed Assets - Computer Software							
Gross Book Value							
Opening Balance		\$ -	\$ 399,624	\$ 1,270,668	\$ 1,384,130	\$ 4,417,485	\$ 5,993,069
Capital Additions during year (from Smart Meter Costs)	\$ -	\$ 399,624	\$ 982,788	\$ 113,462	\$ 3,033,355	\$ 1,575,584	\$ -
Retirements/Removals (if applicable)			\$ 111,744				

Closing Balance	\$ -	\$ 399,624	\$ 1,270,668	\$ 1,384,130	\$ 4,417,485	\$ 5,993,069	\$ 5,993,069
Accumulated Depreciation							
Opening Balance	\$ -	\$ -	-\$ 39,962	-\$ 184,643	-\$ 450,123	-\$ 1,030,284	-\$ 2,071,340
Amortization expense during year	\$ -	-\$ 39,962	-\$ 178,204	-\$ 265,480	-\$ 580,162	-\$ 1,041,055	\$ -
Retirements/Removals (if applicable)			-\$ 33,523				
Closing Balance	\$ -	-\$ 39,962	-\$ 184,643	-\$ 450,123	-\$ 1,030,284	-\$ 2,071,340	-\$ 2,071,340
Net Book Value							
Opening Balance	\$ -	\$ -	\$ 259,092	\$ 1,086,025	\$ 934,007	\$ 3,387,201	\$ 3,921,729
Closing Balance	\$ -	\$ 359,662	\$ 1,086,025	\$ 934,007	\$ 3,387,201	\$ 3,921,729	\$ 3,921,729
Average Net Book Value	\$ -	\$ 179,831	\$ 672,558	\$ 1,010,016	\$ 2,160,604	\$ 3,654,465	\$ 3,921,729
Net Fixed Assets - Tools and Equipment							
Gross Book Value							
Opening Balance		\$ 838,597	\$ 847,709	\$ -	\$ -	\$ -	\$ -
Capital Additions during year (from Smart Meter Costs)	\$ 838,597	\$ 9,112	\$ -	\$ -	\$ -	\$ -	\$ -
Retirements/Removals (if applicable)			\$ 847,709				
Closing Balance	\$ 838,597	\$ 847,709	\$ -	\$ -	\$ -	\$ -	\$ -
Accumulated Depreciation							
Opening Balance	\$ -	-\$ 41,930	-\$ 126,245	-\$ 0	\$ -	\$ -	\$ -
Amortization expense during year	-\$ 41,930	-\$ 84,315	-\$ 84,771	\$ 0	\$ -	\$ -	\$ -
Retirements/Removals (if applicable)			-\$ 211,016				
Closing Balance	\$ 41,930	\$ 126,245	\$ 0	\$ -	\$ -	\$ -	\$ -
Net Book Value							
Opening Balance	\$ -	\$ 796,667	-\$ 0	-\$ 0	\$ -	\$ -	\$ -
Closing Balance	\$ 796,667	\$ 721,464	-\$ 0	\$ -	\$ -	\$ -	\$ -
Average Net Book Value	\$ 398,334	\$ 759,066	-\$ 0	-\$ 0	\$ -	\$ -	\$ -
Net Fixed Assets - Other Equipment							
Gross Book Value							
Opening Balance		\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Capital Additions during year (from Smart Meter Costs)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Retirements/Removals (if applicable)							
Closing Balance	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Accumulated Depreciation							
Opening Balance	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Amortization expense during year	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Retirements/Removals (if applicable)							
Closing Balance	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Net Book Value							
Opening Balance	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Closing Balance	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Average Net Book Value	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

	2006	2007	2008	2009	2010	2011	2012 and Later
Average Net Fixed Asset Values (from Sheet 4)							
Smart Meters	\$ 6,135,733	\$ 18,529,939	\$ 17,585,537	\$ 26,291,116	\$ 28,851,845	\$ 28,680,464	\$ 28,481,627
Computer Hardware	\$ -	\$ 24,135	\$ 2,713	\$ 4,411	\$ 303,157	\$ 698,647	\$ 794,827
Computer Software	\$ -	\$ 179,831	\$ 672,558	\$ 1,010,016	\$ 2,160,604	\$ 3,654,465	\$ 3,921,729
Tools & Equipment	\$ 398,334	\$ 759,066	\$ -	\$ 0	\$ -	\$ -	\$ -
Other Equipment	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total Net Fixed Assets	\$ 6,534,067	\$ 19,492,970	\$ 18,260,808	\$ 27,305,543	\$ 31,315,607	\$ 33,033,576	\$ 33,198,183
Working Capital							
Operating Expenses (from Sheet 2)	\$ -	\$ 603,150	\$ 715,611	\$ 1,129,771	\$ 1,690,890	\$ 2,724,411	\$ -
Working Capital Factor (from Sheet 3)	15%	15%	13%	13%	13%	13%	0%
Working Capital Allowance	\$ -	\$ 90,473	\$ 89,451	\$ 141,221	\$ 211,361	\$ 340,551	\$ -
Incremental Smart Meter Rate Base	\$ 6,534,067	\$ 19,583,443	\$ 18,350,260	\$ 27,446,764	\$ 31,526,968	\$ 33,374,128	\$ 33,198,183
Return on Rate Base							
Capital Structure							
Deemed Short Term Debt	\$ -	\$ -	\$ 734,010	\$ 1,097,871	\$ 1,261,079	\$ 1,334,965	\$ -
Deemed Long Term Debt	\$ 3,920,440	\$ 11,750,066	\$ 10,276,145	\$ 15,370,188	\$ 17,655,102	\$ 18,689,512	\$ 18,590,982
Equity	\$ 2,613,627	\$ 7,833,377	\$ 7,340,104	\$ 10,978,706	\$ 12,610,787	\$ 13,349,651	\$ 14,607,200
Preferred Shares	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total Capitalization	\$ 6,534,067	\$ 19,583,443	\$ 18,350,260	\$ 27,446,764	\$ 31,526,968	\$ 33,374,128	\$ 33,198,183
Return on							
Deemed Short Term Debt	\$ -	\$ -	\$ 32,810	\$ 49,075	\$ 56,370	\$ 59,673	\$ -
Deemed Long Term Debt	\$ 205,823	\$ 616,878	\$ 540,525	\$ 808,472	\$ 928,658	\$ 983,068	\$ -
Equity	\$ 235,226	\$ 705,004	\$ 629,047	\$ 940,875	\$ 1,080,744	\$ 1,144,065	\$ -
Preferred Shares	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total Return on Capital	\$ 441,050	\$ 1,321,882	\$ 1,202,382	\$ 1,798,422	\$ 2,065,773	\$ 2,186,806	\$ -
Operating Expenses	\$ -	\$ 603,150	\$ 715,611	\$ 1,129,771	\$ 1,690,890	\$ 2,724,411	\$ -
Amortization Expenses (from Sheet 4)							
Smart Meters	\$ 423,154	\$ 1,307,110	\$ 1,239,938	\$ 1,925,835	\$ 2,235,254	\$ 2,377,590	\$ -
Computer Hardware	\$ -	\$ 5,363	\$ 614	\$ 1,128	\$ 67,767	\$ 170,713	\$ -
Computer Software	\$ -	\$ 39,962	\$ 155,855	\$ 265,480	\$ 580,162	\$ 1,041,055	\$ -
Tools & Equipment	\$ 41,930	\$ 84,315	\$ -	\$ 0	\$ -	\$ -	\$ -
Other Equipment	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total Amortization Expense in Year	\$ 465,084	\$ 1,436,751	\$ 1,396,406	\$ 2,192,443	\$ 2,883,182	\$ 3,589,358	\$ -
Incremental Revenue Requirement before Taxes/PILs	\$ 906,133	\$ 3,361,783	\$ 3,314,399	\$ 5,120,636	\$ 6,639,845	\$ 8,500,575	\$ -
Calculation of Taxable Income							
Incremental Operating Expenses	\$ -	\$ 603,150	\$ 715,611	\$ 1,129,771	\$ 1,690,890	\$ 2,724,411	\$ -
Amortization Expense	\$ 465,084	\$ 1,436,751	\$ 1,396,406	\$ 2,192,443	\$ 2,883,182	\$ 3,589,358	\$ -
Interest Expense	\$ 205,823	\$ 616,878	\$ 573,336	\$ 857,547	\$ 985,029	\$ 1,042,741	\$ -
Net Income for Taxes/PILs	\$ 235,226	\$ 705,004	\$ 629,047	\$ 940,875	\$ 1,080,744	\$ 1,144,065	\$ -
Grossed-up Taxes/PILs (from Sheet 7)	\$ 100,647.85	\$ 261,874.08	\$ 146,942.49	\$ 311,094.06	\$ 178,823.65	\$ 108,442.45	\$ -
Revenue Requirement, including Grossed-up Taxes/PILs	\$ 1,006,781	\$ 3,623,657	\$ 3,461,342	\$ 5,431,730	\$ 6,818,669	\$ 8,609,017	\$ -



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

For PILs Calculation

UCC - Smart Meters

	2006 Audited Actua	2007 Audited Actua	2008 Audited Actua	2009 Audited Actua	2010 Audited Actua	2011 Forecast	2012 and later Forecast
Opening UCC	\$ -	\$ 12,186,836.16	\$ 11,334,518.15	\$ 23,468,925.66	\$ 28,304,097.36	\$ 28,238,329.89	\$ 27,879,980.94
Capital Additions	\$ 12,694,621.00	\$ 13,824,053.00	\$ 13,584,551.00	\$ 6,992,381.00	\$ 2,290,167.00	\$ 1,979,914.00	\$ -
Retirements/Removals (if applicable)							
UCC Before Half Year Rule	\$ 12,694,621.00	\$ 26,010,889.16	\$ 24,919,069.15	\$ 30,461,306.66	\$ 30,594,264.36	\$ 30,218,243.89	\$ 27,879,980.94
Half Year Rule (1/2 Additions - Disposals)	\$ 6,347,310.50	\$ 6,912,026.50	\$ 6,792,275.50	\$ 3,496,190.50	\$ 1,145,083.50	\$ 989,957.00	\$ -
Reduced UCC	\$ 6,347,310.50	\$ 19,098,862.66	\$ 18,126,793.65	\$ 26,965,116.16	\$ 29,449,180.86	\$ 29,228,286.89	\$ 27,879,980.94
CCA Rate Class	47	47	47	47	47	47	0
CCA Rate	8%	8%	8%	8%	8%	8%	0%
CCA	\$ 507,784.84	\$ 1,527,909.01	\$ 1,450,143.49	\$ 2,157,209.29	\$ 2,355,934.47	\$ 2,338,262.95	\$ -
Closing UCC	\$ 12,186,836.16	\$ 24,482,980.15	\$ 23,468,925.66	\$ 28,304,097.36	\$ 28,238,329.89	\$ 27,879,980.94	\$ 27,879,980.94

UCC - Computer Equipment

	2006 Audited Actua	2007 Audited Actua	2008 Audited Actua	2009 Audited Actua	2010 Audited Actua	2011 Forecast	2012 and later Forecast
Opening UCC	\$ -	\$ -	\$ 223,496.95	\$ 816,819.98	\$ 449,828.94	\$ 2,884,735.97	\$ 2,703,656.79
Capital Additions Computer Hardware	\$ -	\$ 53,634.00	\$ 5,138.00	\$ -	\$ 666,387.00	\$ 363,072.00	\$ -
Capital Additions Computer Software	\$ -	\$ 399,624.00	\$ 982,788.00	\$ 113,462.00	\$ 3,033,355.00	\$ 1,575,584.00	\$ -
Retirements/Removals (if applicable)							
UCC Before Half Year Rule	\$ -	\$ 453,258.00	\$ 1,211,422.95	\$ 930,281.98	\$ 4,149,570.94	\$ 4,823,391.97	\$ 2,703,656.79
Half Year Rule (1/2 Additions - Disposals)	\$ -	\$ 226,629.00	\$ 493,963.00	\$ 56,731.00	\$ 1,849,871.00	\$ 969,328.00	\$ -
Reduced UCC	\$ -	\$ 226,629.00	\$ 717,459.95	\$ 873,550.98	\$ 2,299,699.94	\$ 3,854,063.97	\$ 2,703,656.79
CCA Rate Class	45	45	50	50	50	50	0
CCA Rate	45%	45%	55%	55%	55%	55%	0%
CCA	\$ -	\$ 101,983.05	\$ 394,602.97	\$ 480,453.04	\$ 1,264,834.97	\$ 2,119,735.19	\$ -
Closing UCC	\$ -	\$ 351,274.95	\$ 816,819.98	\$ 449,828.94	\$ 2,884,735.97	\$ 2,703,656.79	\$ 2,703,656.79

UCC - General Equipment

	2006 Audited Actua	2007 Audited Actua	2008 Audited Actua	2009 Audited Actua	2010 Audited Actua	2011 Forecast	2012 and later Forecast
Opening UCC	\$ -	\$ 754,737.30	\$ -	\$ -	\$ -	\$ -	\$ -
Capital Additions Tools & Equipment	\$ 838,597.00	\$ 9,112.00	\$ -	\$ -	\$ -	\$ -	\$ -
Capital Additions Other Equipment	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Retirements/Removals (if applicable)							
UCC Before Half Year Rule	\$ 838,597.00	\$ 763,849.30	\$ -	\$ -	\$ -	\$ -	\$ -
Half Year Rule (1/2 Additions - Disposals)	\$ 419,298.50	\$ 4,556.00	\$ -	\$ -	\$ -	\$ -	\$ -
Reduced UCC	\$ 419,298.50	\$ 759,293.30	\$ -	\$ -	\$ -	\$ -	\$ -
CCA Rate Class	8	8	8	8	8	8	0
CCA Rate	20%	20%	20%	20%	20%	20%	0%
CCA	\$ 83,859.70	\$ 151,858.66	\$ -	\$ -	\$ -	\$ -	\$ -
Closing UCC	\$ 754,737.30	\$ 611,990.64	\$ -	\$ -	\$ -	\$ -	\$ -



PILs Calculation

	2006 Audited Actual	2007 Audited Actual	2008 Audited Actual	2009 Audited Actual	2010 Audited Actual	2011 Forecast	2012 and later Forecast
INCOME TAX							
Net Income	\$ 235,226.41	\$ 705,003.94	\$ 629,046.90	\$ 940,875.08	\$ 1,080,744.46	\$ 1,144,065.10	\$ -
Amortization	\$ 465,083.88	\$ 1,436,750.93	\$ 1,396,406.07	\$ 2,192,443.12	\$ 2,883,181.83	\$ 3,589,357.67	\$ -
CCA - Smart Meters	\$ 507,784.84	\$ 1,527,909.01	\$ 1,450,143.49	\$ 2,157,209.29	\$ 2,355,934.47	\$ 2,338,262.95	\$ -
CCA - Computers	\$ -	\$ 101,983.05	\$ 394,602.97	\$ 480,453.04	\$ 1,264,834.97	\$ 2,119,735.19	\$ -
CCA - Other Equipment	\$ 83,859.70	\$ 151,858.66	\$ -	\$ -	\$ -	\$ -	\$ -
Change in taxable income	\$ 108,665.76	\$ 360,004.15	\$ 180,706.50	\$ 495,655.87	\$ 343,156.85	\$ 275,424.63	\$ -
Tax Rate (from Sheet 3)	36.12%	36.12%	33.50%	33.00%	31.00%	28.25%	26.25%
Income Taxes Payable	\$ 39,250.07	\$ 130,033.50	\$ 60,536.68	\$ 163,566.44	\$ 106,378.62	\$ 77,807.46	\$ -
ONTARIO CAPITAL TAX							
Smart Meters	\$ 12,271,466.97	\$ 24,788,410.13	\$ 23,757,843.17	\$ 28,824,388.80	\$ 28,879,302.17	\$ 28,481,626.50	\$ 28,481,626.50
Computer Hardware	\$ -	\$ 48,270.60	\$ 4,975.00	\$ 3,847.00	\$ 602,467.30	\$ 794,826.70	\$ 794,826.70
Computer Software	\$ -	\$ 359,661.60	\$ 1,086,025.00	\$ 934,007.20	\$ 3,387,200.70	\$ 3,921,729.30	\$ 3,921,729.30
Tools & Equipment	\$ 796,667.15	\$ 721,463.85	\$ 0.05	\$ -	\$ -	\$ -	\$ -
Other Equipment	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Rate Base	\$ 13,068,134.12	\$ 25,917,806.18	\$ 24,848,843.12	\$ 29,762,243.00	\$ 32,868,970.17	\$ 33,198,182.50	\$ 33,198,182.50
Less: Exemption	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Deemed Taxable Capital	\$ 13,068,134.12	\$ 25,917,806.18	\$ 24,848,843.12	\$ 29,762,243.00	\$ 32,868,970.17	\$ 33,198,182.50	\$ 33,198,182.50
Ontario Capital Tax Rate (from Sheet 3)	0.300%	0.225%	0.225%	0.225%	0.075%	0.000%	0.000%
Net Amount (Taxable Capital x Rate)	\$ 39,204.40	\$ 58,315.06	\$ 55,909.90	\$ 66,965.05	\$ 24,651.73	\$ -	\$ -
Change in Income Taxes Payable	\$ 39,250.07	\$ 130,033.50	\$ 60,536.68	\$ 163,566.44	\$ 106,378.62	\$ 77,807.46	\$ -
Change in OCT	\$ 39,204.40	\$ 58,315.06	\$ 55,909.90	\$ 66,965.05	\$ 24,651.73	\$ -	\$ -
PILs	\$ 78,454.47	\$ 188,348.56	\$ 116,446.57	\$ 230,531.48	\$ 131,030.35	\$ 77,807.46	\$ -
Gross Up PILs							
Tax Rate	36.12%	36.12%	33.50%	33.00%	31.00%	28.25%	26.25%
Change in Income Taxes Payable	\$ 61,443.44	\$ 203,559.01	\$ 91,032.60	\$ 244,129.01	\$ 154,171.92	\$ 108,442.45	\$ -
Change in OCT	\$ 39,204.40	\$ 58,315.06	\$ 55,909.90	\$ 66,965.05	\$ 24,651.73	\$ -	\$ -
PILs	\$ 100,647.85	\$ 261,874.08	\$ 146,942.49	\$ 311,094.06	\$ 178,823.65	\$ 108,442.45	\$ -



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

This worksheet calculates the funding adder revenues.

Account 1555 - Sub-account Funding Adder Revenues

Interest Rates	Approved Deferral and		CWIP	Date	Year	Quarter	Opening Balance (Principal)	Funding Adder Revenues	Interest Rate	Interest	Closing Balance	Annual amounts	Board Approved Smart Meter Funding Adder (from Tariff)
	Variance Accounts												
2006 Q1				Jan-06	2006	Q1	\$ -		0.00%	\$ -	\$ -		
2006 Q2	4.14%	4.68%		Feb-06	2006	Q1	\$ -		0.00%	\$ -	\$ -		
2006 Q3	4.59%	5.05%		Mar-06	2006	Q1	\$ -		0.00%	\$ -	\$ -		
2006 Q4	4.59%	4.72%		Apr-06	2006	Q2	\$ -		4.14%	\$ -	\$ -		
2007 Q1	4.59%	4.72%		May-06	2006	Q2	\$ -	\$ 125,861	4.14%	\$ -	\$ 125,861.48		
2007 Q2	4.59%	4.72%		Jun-06	2006	Q2	\$ 125,861.48	\$ 126,014	4.14%	\$ 434.22	\$ 252,309.50		
2007 Q3	4.59%	5.18%		Jul-06	2006	Q3	\$ 251,875.28	\$ 126,117	4.59%	\$ 963.42	\$ 378,955.86		
2007 Q4	5.14%	5.18%		Aug-06	2006	Q3	\$ 377,992.44	\$ 126,220	4.59%	\$ 1,445.82	\$ 505,657.82		
2008 Q1	5.14%	5.18%		Sep-06	2006	Q3	\$ 504,212.00	\$ 126,371	4.59%	\$ 1,928.61	\$ 632,511.98		
2008 Q2	4.08%	5.18%		Oct-06	2006	Q4	\$ 630,583.37	\$ 126,605	4.59%	\$ 2,411.98	\$ 759,600.72		
2008 Q3	3.35%	5.43%		Nov-06	2006	Q4	\$ 757,188.74	\$ 126,809	4.59%	\$ 2,896.25	\$ 886,894.28		
2008 Q4	3.35%	5.43%		Dec-06	2006	Q4	\$ 883,998.03	\$ 126,869	4.59%	\$ 3,381.29	\$ 1,014,248.45	\$ 1,024,328.75	
2009 Q1	2.45%	6.61%		Jan-07	2007	Q1	\$ 1,010,867.16	\$ 126,498	4.59%	\$ 3,866.57	\$ 1,141,231.26		
2009 Q2	1.00%	6.61%		Feb-07	2007	Q1	\$ 1,137,364.69	\$ 127,349	4.59%	\$ 4,350.42	\$ 1,269,064.15		
2009 Q3	0.55%	5.67%		Mar-07	2007	Q1	\$ 1,264,713.73	\$ 127,433	4.59%	\$ 4,837.53	\$ 1,396,984.17		
2009 Q4	0.55%	4.66%		Apr-07	2007	Q2	\$ 1,392,146.64	\$ 127,512	4.59%	\$ 5,324.96	\$ 1,524,984.08		
2010 Q1	0.55%	4.34%		May-07	2007	Q2	\$ 1,519,659.12	\$ 494,372	4.59%	\$ 5,812.70	\$ 2,019,844.10		
2010 Q2	0.55%	4.34%		Jun-07	2007	Q2	\$ 2,014,031.40	\$ 494,592	4.59%	\$ 7,703.67	\$ 2,516,326.59		
2010 Q3	0.89%	4.66%		Jul-07	2007	Q3	\$ 2,508,622.92	\$ 495,552	4.59%	\$ 9,595.48	\$ 3,013,770.40		
2010 Q4	1.20%	4.01%		Aug-07	2007	Q3	\$ 3,004,174.92	\$ 495,999	4.59%	\$ 11,490.97	\$ 3,511,665.07		
2011 Q1	1.47%	4.29%		Sep-07	2007	Q3	\$ 3,500,174.10	\$ 496,692	4.59%	\$ 13,388.17	\$ 4,010,253.97		
2011 Q2	1.47%	4.29%		Oct-07	2007	Q4	\$ 3,996,865.80	\$ 497,614	5.14%	\$ 17,119.91	\$ 4,511,599.61		
2011 Q3	1.47%	4.29%		Nov-07	2007	Q4	\$ 4,494,479.70	\$ 498,724	5.14%	\$ 19,251.35	\$ 5,012,455.07		
2011 Q4	1.47%	4.29%		Dec-07	2007	Q4	\$ 4,993,203.72	\$ 499,390	5.14%	\$ 21,387.56	\$ 5,513,981.72	\$ 4,605,856.29	
2012 Q1		4.29%		Jan-08	2008	Q1	\$ 5,492,594.16	\$ 500,255	5.14%	\$ 23,526.61	\$ 6,016,375.99		
2012 Q2		4.29%		Feb-08	2008	Q1	\$ 5,992,849.38	\$ 500,903	5.14%	\$ 25,669.37	\$ 6,519,421.25		
2012 Q3		4.29%		Mar-08	2008	Q1	\$ 6,493,751.88	\$ 501,313	5.14%	\$ 27,814.90	\$ 7,022,879.92		
2012 Q4		4.29%		Apr-08	2008	Q2	\$ 6,995,065.02	\$ 502,047	4.08%	\$ 23,783.22	\$ 7,520,895.66		
				May-08	2008	Q2	\$ 7,497,112.44	\$ 329,278	4.08%	\$ 25,490.18	\$ 7,851,880.22		
				Jun-08	2008	Q2	\$ 7,826,390.04	\$ 329,658	4.08%	\$ 26,609.73	\$ 8,182,658.13		
				Jul-08	2008	Q3	\$ 8,156,048.40	\$ 330,258	3.35%	\$ 22,768.97	\$ 8,509,075.37		
				Aug-08	2008	Q3	\$ 8,486,306.40	\$ 330,546	3.35%	\$ 23,690.94	\$ 8,840,543.76		
				Sep-08	2008	Q3	\$ 8,816,852.82	\$ 330,652	3.35%	\$ 24,613.71	\$ 9,172,118.97		
				Oct-08	2008	Q4	\$ 9,147,505.26	\$ 331,741	3.35%	\$ 25,536.79	\$ 9,504,783.19		
				Nov-08	2008	Q4	\$ 9,479,246.40	\$ 332,166	3.35%	\$ 26,462.90	\$ 9,837,875.66		
				Dec-08	2008	Q4	\$ 9,811,412.76	\$ 332,543	3.35%	\$ 27,390.19	\$ 10,171,345.51	\$ 4,954,718.67	
				Jan-09	2009	Q1	\$ 10,143,955.32	\$ 333,101	2.45%	\$ 20,710.58	\$ 10,497,767.06		
				Feb-09	2009	Q1	\$ 10,477,056.48	\$ 333,555	2.45%	\$ 21,390.66	\$ 10,832,002.02		
				Mar-09	2009	Q1	\$ 10,810,611.36	\$ 333,677	2.45%	\$ 22,071.66	\$ 11,166,359.88		



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

This worksheet calculates the funding adder revenues.

Account 1555 - Sub-account Funding Adder Revenues

Interest Rates	Approved Deferral and Variance Accounts	CWIP				Opening Balance	Funding Adder	Interest				Annual amounts	Board Approved Smart Meter Funding Adder (from Tariff)
			Date	Year	Quarter	(Principal)	Revenues	Rate	Interest	Closing Balance			
			Apr-09	2009	Q2	\$ 11,144,288.22	\$ 334,063	1.00%	\$ 9,286.91	\$ 11,487,638.45			
			May-09	2009	Q2	\$ 11,478,351.54	\$ 492,796	1.00%	\$ 9,565.29	\$ 11,980,712.91			
			Jun-09	2009	Q2	\$ 11,971,147.62	\$ 493,203	1.00%	\$ 9,975.96	\$ 12,474,326.22			
			Jul-09	2009	Q3	\$ 12,464,350.26	\$ 493,718	0.55%	\$ 5,712.83	\$ 12,963,781.49			
			Aug-09	2009	Q3	\$ 12,958,068.66	\$ 493,715	0.55%	\$ 5,939.11	\$ 13,457,722.81			
			Sep-09	2009	Q3	\$ 13,451,783.70	\$ 494,859	0.55%	\$ 6,165.40	\$ 13,952,808.22			
			Oct-09	2009	Q4	\$ 13,946,642.82	\$ 495,795	0.55%	\$ 6,392.21	\$ 14,448,829.91			
			Nov-09	2009	Q4	\$ 14,442,437.70	\$ 496,684	0.55%	\$ 6,619.45	\$ 14,945,740.75			
			Dec-09	2009	Q4	\$ 14,939,121.30	\$ 497,292	0.55%	\$ 6,847.10	\$ 15,443,260.16	\$ 5,423,134.90		
			Jan-10	2010	Q1	\$ 15,436,413.06	\$ 497,996	0.55%	\$ 7,075.02	\$ 15,941,483.76			
			Feb-10	2010	Q1	\$ 15,934,408.74	\$ 498,474	0.55%	\$ 7,303.27	\$ 16,440,186.49			
			Mar-10	2010	Q1	\$ 16,432,883.22	\$ 499,138	0.55%	\$ 7,531.74	\$ 16,939,553.04			
			Apr-10	2010	Q2	\$ 16,932,021.30	\$ 499,575	0.55%	\$ 7,760.51	\$ 17,439,356.81			
			May-10	2010	Q2	\$ 17,431,596.30	\$ 500,196	0.55%	\$ 7,989.48	\$ 17,939,781.78			
			Jun-10	2010	Q2	\$ 17,931,792.30	\$ 500,842	0.55%	\$ 8,218.74	\$ 18,440,853.04			
			Jul-10	2010	Q3	\$ 18,432,634.30	\$ 501,477	0.89%	\$ 13,670.87	\$ 18,947,782.17			
			Aug-10	2010	Q3	\$ 18,934,111.30	\$ 502,086	0.89%	\$ 14,042.80	\$ 19,450,240.10			
			Sep-10	2010	Q3	\$ 19,436,197.30	\$ 502,706	0.89%	\$ 14,415.18	\$ 19,953,318.48			
			Oct-10	2010	Q4	\$ 19,938,903.30	\$ 503,620	1.20%	\$ 19,938.90	\$ 20,462,462.52			
			Nov-10	2010	Q4	\$ 20,442,523.62	\$ 504,395	1.20%	\$ 20,442.52	\$ 20,967,360.94			
			Dec-10	2010	Q4	\$ 20,946,918.42	\$ 505,116	1.20%	\$ 20,946.92	\$ 21,472,980.86	\$ 6,164,956.83		
			Jan-11	2011	Q1	\$ 21,452,033.94	\$ 505,877	1.47%	\$ 26,278.74	\$ 21,984,189.24			
			Feb-11	2011	Q1	\$ 21,957,910.50	\$ 506,671	1.47%	\$ 26,898.44	\$ 22,491,480.14			
			Mar-11	2011	Q1	\$ 22,464,581.70	\$ 507,068	1.47%	\$ 27,519.11	\$ 22,999,168.49			
			Apr-11	2011	Q2	\$ 22,971,649.38	\$ 507,459	1.47%	\$ 28,140.27	\$ 23,507,248.77			
			May-11	2011	Q2	\$ 23,479,108.50	\$ 429,263	1.47%	\$ 28,761.91	\$ 23,937,133.57			
			Jun-11	2011	Q2	\$ 23,908,371.66	\$ 429,899	1.47%	\$ 29,287.76	\$ 24,367,558.74			
			Jul-11	2011	Q3	\$ 24,338,270.98	\$ 430,300	1.47%	\$ 29,814.38	\$ 24,798,385.36			
			Aug-11	2011	Q3	\$ 24,768,570.98	\$ 430,714	1.47%	\$ 30,341.50	\$ 25,229,626.48			
			Sep-11	2011	Q3	\$ 25,199,284.98	\$ 431,413	1.47%	\$ 30,869.12	\$ 25,661,567.10			
			Oct-11	2011	Q4	\$ 25,630,697.98	\$ 432,635	1.47%	\$ 31,397.61	\$ 26,094,730.59			
			Nov-11	2011	Q4	\$ 26,063,332.98	\$ 433,139	1.47%	\$ 31,927.58	\$ 26,528,399.56			
			Dec-11	2011	Q4	\$ 26,496,471.98	\$ 433,644	1.47%	\$ 32,458.18	\$ 26,962,574.16	\$ 5,831,776.64		



This worksheet calculates the funding adder revenues.

Account 1555 - Sub-account Funding Adder Revenues

Interest Rates	Approved Deferral and Variance Accounts	CWIP				Opening Balance	Funding Adder	Interest		Closing Balance	Annual amounts	Board Approved Smart Meter Funding Adder (from Tariff)
			Date	Year	Quarter	(Principal)	Revenues	Rate	Interest			
			Jan-12	2012	Q1	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Feb-12	2012	Q1	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Mar-12	2012	Q1	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Apr-12	2012	Q2	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			May-12	2012	Q2	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Jun-12	2012	Q2	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Jul-12	2012	Q3	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Aug-12	2012	Q3	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Sep-12	2012	Q3	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Oct-12	2012	Q4	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Nov-12	2012	Q4	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98		
			Dec-12	2012	Q4	\$ 26,930,115.98		0.00%	\$ -	\$ 26,930,115.98	\$ -	
Total Funding Adder Revenues Collected						\$ 26,930,115.98		\$ 1,074,656.10	\$ 28,004,772.08	\$ 28,004,772.08		



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

This worksheet calculates the interest on OM&A and amortization/depreciation expense, based on monthly data.

Account 1556 - Sub-accounts Operating Expenses, Amortization Expenses, Carrying Charges

Prescribed Interest Rates	Approved Deferral and Variance Accounts	CWIP	Date	Year	Quarter	Opening Balance (Principal)	OM&A Expenses	Amortization / Depreciation Expense	Closing Balance (Principal)	(Annual) Interest Rate	Interest (on opening balance)	Cumulative Interest
2006 Q1	0.00%	0.00%	Jan-06	2006	Q1	\$ -			-	0.00%	-	-
2006 Q2	4.14%	4.68%	Feb-06	2006	Q1	-			-	0.00%	-	-
2006 Q3	4.59%	5.05%	Mar-06	2006	Q1	-			-	0.00%	-	-
2006 Q4	4.59%	4.72%	Apr-06	2006	Q2	-			-	4.14%	-	-
2007 Q1	4.59%	4.72%	May-06	2006	Q2	-			-	4.14%	-	-
2007 Q2	4.59%	4.72%	Jun-06	2006	Q2	-			-	4.14%	-	-
2007 Q3	4.59%	5.18%	Jul-06	2006	Q3	-		\$ 77,514.00	77,514.00	4.59%	-	-
2007 Q4	5.14%	5.18%	Aug-06	2006	Q3	77,514.00		\$ 77,514.00	155,028.00	4.59%	296.49	296.49
2008 Q1	5.14%	5.18%	Sep-06	2006	Q3	155,028.00		\$ 77,514.00	232,542.00	4.59%	592.98	889.47
2008 Q2	4.08%	5.18%	Oct-06	2006	Q4	232,542.00		\$ 77,514.00	310,056.00	4.59%	889.47	1,778.95
2008 Q3	3.35%	5.43%	Nov-06	2006	Q4	310,056.00		\$ 77,514.00	387,570.00	4.59%	1,185.96	2,964.91
2008 Q4	3.35%	5.43%	Dec-06	2006	Q4	387,570.00	\$ -	\$ 77,514.00	465,084.00	4.59%	1,482.46	4,447.37
2009 Q1	2.45%	6.61%	Jan-07	2007	Q1	465,084.00	\$ 41,430.76	\$ 119,729.24	626,244.00	4.59%	1,778.95	6,226.31
2009 Q2	1.00%	6.61%	Feb-07	2007	Q1	626,244.00	\$ 75,641.45	\$ 119,729.24	810,849.88	4.59%	2,395.38	8,621.70
2009 Q3	0.55%	5.67%	Mar-07	2007	Q1	810,849.88	\$ 55,799.23	\$ 119,729.24	986,378.35	4.59%	3,101.50	11,723.20
2009 Q4	0.55%	4.66%	Apr-07	2007	Q2	986,378.35	\$ 73,790.63	\$ 119,729.24	#####	4.59%	3,772.90	15,496.09
2010 Q1	0.55%	4.34%	May-07	2007	Q2	#####	#####	\$ 119,729.24	#####	4.59%	4,513.11	20,009.20
2010 Q2	0.55%	4.34%	Jun-07	2007	Q2	#####	\$ 75,641.45	\$ 119,729.24	#####	4.59%	5,430.60	25,439.81
2010 Q3	0.89%	4.66%	Jul-07	2007	Q3	#####	\$ 80,175.18	\$ 119,729.24	#####	4.59%	6,177.90	31,617.70
2010 Q4	1.20%	4.01%	Aug-07	2007	Q3	#####	\$ 50,215.35	\$ 119,729.24	#####	4.59%	6,329.19	37,946.89
2011 Q1	1.47%	4.29%	Sep-07	2007	Q3	#####	\$ 46,409.59	\$ 119,729.24	#####	4.59%	6,979.23	44,926.12
2011 Q2	1.47%	4.29%	Oct-07	2007	Q4	#####	\$ 96,394.85	\$ 119,729.24	#####	5.14%	8,527.15	53,453.27
2011 Q3	1.47%	4.29%	Nov-07	2007	Q4	#####	\$ 45,552.04	\$ 119,729.24	#####	5.14%	9,452.88	62,906.14
2011 Q4	1.47%	4.29%	Dec-07	2007	Q4	#####	\$ 13,076.69	\$ 119,729.24	#####	5.14%	10,160.83	73,066.98
2012 Q1	0.00%	4.29%	Jan-08	2008	Q1	#####	\$ 46,369.62	\$ 74,118.87	#####	5.14%	10,729.68	83,796.66

2012 Q2	0.00%	4.29%		Feb-08	2008	Q1	#####	\$ 61,979.05	\$ 80,524.43	#####	5.14%	11,245.78	95,042.44
2012 Q3	0.00%	4.29%		Mar-08	2008	Q1	#####	\$ 25,138.13	\$ 83,578.92	#####	5.14%	11,856.17	106,898.61
2012 Q4	0.00%	4.29%		Apr-08	2008	Q2	#####	\$ 66,155.02	\$ 96,556.00	#####	4.08%	9,780.76	116,679.36
				May-08	2008	Q2	#####	\$ 78,452.35	\$ 100,282.76	#####	4.08%	10,333.98	127,013.34
				Jun-08	2008	Q2	#####	\$ 29,524.41	\$ 106,703.68	#####	4.08%	10,941.68	137,955.02
				Jul-08	2008	Q3	#####	#####	\$ 112,953.58	#####	3.35%	9,364.28	147,319.29
				Aug-08	2008	Q3	#####	\$ 24,274.13	\$ 113,721.58	#####	3.35%	9,961.96	157,281.26
				Sep-08	2008	Q3	#####	\$ 74,024.33	\$ 122,614.63	#####	3.35%	10,347.20	167,628.46
				Oct-08	2008	Q4	#####	#####	\$ 131,114.23	#####	3.35%	10,896.15	178,524.61
				Nov-08	2008	Q4	#####	-\$ 4,270.78	\$ 134,864.84	#####	3.35%	11,568.57	190,093.17
				Dec-08	2008	Q4	#####	#####	\$ 239,373.27	#####	3.35%	11,933.14	202,026.32
				Jan-09	2009	Q1	#####	\$ 73,524.68	\$ 164,166.19	#####	2.45%	9,426.38	211,452.70
				Feb-09	2009	Q1	#####	\$ 52,783.01	\$ 168,877.90	#####	2.45%	9,911.67	221,364.36
				Mar-09	2009	Q1	#####	\$ 41,949.32	\$ 175,078.66	#####	2.45%	10,364.22	231,728.59
				Apr-09	2009	Q2	#####	\$ 74,786.87	\$ 178,766.65	#####	1.00%	4,411.15	236,139.74
				May-09	2009	Q2	#####	\$ 85,824.90	\$ 181,923.33	#####	1.00%	4,622.45	240,762.18
				Jun-09	2009	Q2	#####	\$ 60,836.58	\$ 186,166.38	#####	1.00%	4,845.57	245,607.75
				Jul-09	2009	Q3	#####	\$ 78,278.12	\$ 183,918.27	#####	0.55%	2,778.27	248,386.03
				Aug-09	2009	Q3	#####	\$ 52,829.09	\$ 189,241.42	#####	0.55%	2,898.45	251,284.47
				Sep-09	2009	Q3	#####	\$ 62,113.06	\$ 186,923.13	#####	0.55%	3,009.40	254,293.87
				Oct-09	2009	Q4	#####	#####	\$ 192,680.32	#####	0.55%	3,123.54	257,417.41
				Nov-09	2009	Q4	#####	#####	\$ 194,264.53	#####	0.55%	3,278.71	260,696.11
				Dec-09	2009	Q4	#####	#####	\$ 190,436.43	#####	0.55%	3,425.78	264,121.89
				Jan-10	2010	Q1	#####	#####	\$ 203,578.57	#####	0.55%	3,638.81	267,760.70
				Feb-10	2010	Q1	#####	#####	\$ 204,882.97	#####	0.55%	3,789.16	271,549.86
				Mar-10	2010	Q1	#####	#####	\$ 244,581.48	#####	0.55%	3,986.44	275,536.29
				Apr-10	2010	Q2	#####	\$ 54,584.08	\$ 247,189.34	#####	0.55%	4,198.43	279,734.72
				May-10	2010	Q2	#####	#####	\$ 242,704.10	#####	0.55%	4,336.74	284,071.47
				Jun-10	2010	Q2	#####	#####	\$ 234,731.35	#####	0.55%	4,501.90	288,573.36
				Jul-10	2010	Q3	#####	\$ 6,190.94	\$ 238,513.02	#####	0.89%	7,611.82	296,185.18
				Aug-10	2010	Q3	#####	#####	\$ 238,595.17	#####	0.89%	7,793.31	303,978.50
				Sep-10	2010	Q3	#####	#####	\$ 228,306.17	#####	0.89%	8,113.83	312,092.33
				Oct-10	2010	Q4	#####	#####	\$ 267,268.24	#####	1.20%	11,318.43	323,410.76
				Nov-10	2010	Q4	#####	#####	\$ 260,231.59	#####	1.20%	11,732.60	335,143.36
				Dec-10	2010	Q4	#####	#####	\$ 272,599.88	#####	1.20%	12,103.43	347,246.79
				Jan-11	2011	Q1	#####	#####	\$ 278,630.09	#####	1.47%	15,328.78	362,575.57
				Feb-11	2011	Q1	#####	\$ 93,207.77	\$ 281,525.29	#####	1.47%	15,793.67	378,369.23
				Mar-11	2011	Q1	#####	\$ 90,493.09	\$ 284,139.18	#####	1.47%	16,252.71	394,621.95
				Apr-11	2011	Q2	#####	#####	\$ 284,386.10	#####	1.47%	16,711.64	411,333.59
				May-11	2011	Q2	#####	#####	\$ 285,374.41	#####	1.47%	17,257.47	428,591.05
				Jun-11	2011	Q2	#####	#####	\$ 287,155.22	#####	1.47%	17,762.30	446,353.35
				Jul-11	2011	Q3	#####	#####	\$ 291,656.49	#####	1.47%	18,401.38	464,754.73
				Aug-11	2011	Q3	#####	#####	\$ 288,959.12	#####	1.47%	18,982.29	483,737.02
				Sep-11	2011	Q3	#####	#####	\$ 290,025.08	#####	1.47%	19,562.34	503,299.36
				Oct-11	2011	Q4	#####	#####	\$ 290,344.36	#####	1.47%	20,091.63	523,390.98
				Nov-11	2011	Q4	#####	#####	\$ 291,260.98	#####	1.47%	20,619.80	544,010.78
				Dec-11	2011	Q4	#####	#####	\$ 435,901.40	#####	1.47%	21,150.37	565,161.15
				Jan-12	2012	Q1	#####			#####	0.00%	-	565,161.15
				Feb-12	2012	Q1	#####			#####	0.00%	-	565,161.15
				Mar-12	2012	Q1	#####			#####	0.00%	-	565,161.15
				Apr-12	2012	Q2	#####			#####	0.00%	-	565,161.15

May-12	2012	Q2	#####		#####	0.00%	-	565,161.15
Jun-12	2012	Q2	#####		#####	0.00%	-	565,161.15
Jul-12	2012	Q3	#####		#####	0.00%	-	565,161.15
Aug-12	2012	Q3	#####		#####	0.00%	-	565,161.15
Sep-12	2012	Q3	#####		#####	0.00%	-	565,161.15
Oct-12	2012	Q4	#####		#####	0.00%	-	565,161.15
Nov-12	2012	Q4	#####		#####	0.00%	-	565,161.15
Dec-12	2012	Q4	#####		#####	0.00%	-	565,161.15

#####



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

This worksheet calculates the interest on OM&A and amortization/depreciation expense, in the absence of monthly data.

Year	OM&A (from Sheet 5)	Amortization Expense (from Sheet 5)	Cumulative OM&A and Amortization Expense	Average Cumulative OM&A and Amortization Expense	Average Annual Prescribed Interest Rate for Deferral and Variance Accounts (from Sheets 8A and 8B)	Simple Interest on OM&A and Amortization Expenses
2006	\$ -	\$ 465,083.88	\$ 465,083.88	\$ 232,541.94	4.37%	\$ 10,150.46
2007	\$ 603,150.00	\$ 1,436,750.93	\$ 2,504,984.82	\$ 1,485,034.35	4.73%	\$ 70,205.00
2008	\$ 715,611.00	\$ 1,396,406.07	\$ 4,617,001.88	\$ 3,560,993.35	3.98%	\$ 141,727.54
2009	\$ 1,129,771.00	\$ 2,192,443.12	\$ 7,939,216.00	\$ 6,278,108.94	1.14%	\$ 71,413.49
2010	\$ 1,690,890.00	\$ 2,883,181.83	\$ 12,513,287.83	\$ 10,226,251.92	0.80%	\$ 81,554.36
2011	\$ 2,724,411.00	\$ 3,589,357.67	\$ 18,827,056.50	\$ 15,670,172.17	1.47%	\$ 230,351.53
2012	\$ -	\$ -	\$ 18,827,056.50	\$ 18,827,056.50	1.47%	\$ 276,757.73
Cumulative Interest to 2011						\$ 605,402.37
Cumulative Interest to 2012						\$ 882,160.10



Ontario Energy Board

Smart Meter Model

Hydro Ottawa Limited

This worksheet calculates the Smart Meter Disposition Rider and the Smart Meter Incremental Revenue Requirement Rate Rider, if applicable. This worksheet also calculates any new Smart Meter Funding Adder that a distributor may wish to request. However, please note that in many 2011 IRM decisions, the Board noted that current funding adders will cease on April 30, 2011 and that the Board's expectation is that distributors will file for a final review of prudence at the earliest opportunity. The Board also noted that the SMFA is a tool designed to provide advance funding and to mitigate the anticipated rate impact of smart meter costs when recovery of those costs is approved by the Board. The Board observed that the SMFA was not intended to be compensatory (return on and of capital) on a cumulative basis over the term the SMFA was in effect. The SMFA was initially designed to fund future investment, and not fully fund prior capital investment. Distributors that seek a new SMFA should provide evidence to support its proposal. This would include documentation of where the distributor is with respect to its smart meter deployment program, and reasons as to why the distributor's circumstances are such that continuation of the SMFA is warranted. Press the "UPDATE WORKSHEET" button after choosing the applicable adders/riders.

Check if applicable

- ☐ Smart Meter Funding Adder (SMFA)
- ☒ Smart Meter Disposition Rider (SMDR)
- ☐ Smart Meter Incremental Revenue Requirement Rate Rider (SMIRR)

The SMDR is calculated based on costs to December 31, 2011

The SMIRR is calculated based on the incremental revenue requirement associated with the recovery of capital related costs to December 31, 2012 and associated OM&A.

	2006	2007	2008	2009	2010	2011	2012 and later	Total
Deferred and forecasted Smart Meter Incremental Revenue Requirement (from Sheet 5)	\$ 1,006,781.26	\$ 3,623,657.39	\$ 3,461,341.97	\$ 5,431,729.97	\$ 6,818,668.52	\$ 8,609,017.46	\$ -	\$ 28,951,196.56
Interest on Deferred and forecasted OM&A and Amortization Expense (Sheet 8A/8B) (Check one of the boxes below)	\$ 4,447.37	\$ 68,619.61	\$ 128,959.34	\$ 62,095.58	\$ 83,124.90	\$ 217,914.36		\$ 565,161.15
<input checked="" type="checkbox"/> Sheet 8A (Interest calculated on monthly balances)	\$ 4,447.37	\$ 68,619.61	\$ 128,959.34	\$ 62,095.58	\$ 83,124.90	\$ 217,914.36		\$ 565,161.15
<input type="checkbox"/> Sheet 8B (Interest calculated on average annual balances)								\$ -
SMFA Revenues (from Sheet 8)	\$ 1,010,867.16	\$ 4,481,727.00	\$ 4,651,361.16	\$ 5,292,457.74	\$ 6,015,620.88	\$ 5,478,082.04	\$ -	\$ 26,930,115.98
SMFA Interest (from Sheet 8)	\$ 13,461.59	\$ 124,129.29	\$ 303,357.51	\$ 130,677.16	\$ 149,335.95	\$ 353,694.60	\$ -	\$ 1,074,656.10
Net Deferred Revenue Requirement	-\$ 4,085.90	-\$ 858,069.61	-\$ 1,190,019.19	\$ 139,272.23	\$ 803,047.64	\$ 3,130,935.42	\$ -	\$ 1,511,585.63
Number of Metered Customers (average for 2012 test year)							307,959	

Calculation of Smart Meter Disposition Rider (per metered customer per month)

Years for collection or refunding	1	
Deferred Incremental Revenue Requirement from 2006 to December 31, 2011 plus Interest on OM&A and Amortization	\$ 29,516,357.71	
SMFA Revenues collected from 2006 to 2012 test year (inclusive) Plus Simple Interest on SMFA Revenues	\$ 28,004,772.08	
Net Deferred Revenue Requirement	\$ 1,511,585.63	
SMDR January 1, 2012 to December 31, 2012	\$ 0.41	Match
Check: Forecasted SMDR Revenues	\$ 1,515,158.28	



Funding and Cost Recovery Mechanisms

The following table provides a summary of the three mechanisms for smart meter funding and cost recovery that the Board has established and that can be calculated by this model. The Smart Meter Funding Adder ("SMFA") was described in Guideline G-2008-0002. The Smart Meter Disposition Rider ("SMDR") and Smart Meter Incremental Revenue Requirement Rate Rider (SMIRR) were defined by the Board in the Decision for PowerStream Inc.'s application for Smart Meter disposition [EB-2010-0209], October 1, 2010.

Title	Acronym	Description
Smart Meter Funding Adder	SMFA	<ul style="list-style-type: none"> Mechanism to provide funding before and during smart meter deployment and acts to smooth the rate increases due to smart meter implementation. First implemented in rates for May 1, 2006. Initially established at a level of about \$0.26/month per metered customer for most distributors; some utilities have had unique SMFA rates due to initial Smart Meter Implementation Plans. Distributors could subsequently apply for a standard SMFA of \$1.00 per metered customer per month or a utility-specific SMFA. SMFA revenues are tracked in a sub-account of Account 1555. Upon disposition, the SMFA revenues and interest are used to offset the deferred historical revenue requirement of installed smart meters, with the variance recovered or refunded through the SMDR. In many 2011 EDR applications, the Board capped the SMFA at \$2.50/month per metered customer and established an end date of April 30, 2012.
Smart Meter Disposition Rider	SMDR	<ul style="list-style-type: none"> The SMDR recovers, over a specified time period, the variance between: 1) the deferred revenue requirement for the installed smart meters up to the time of disposition; and 2) the SMFA revenues collected and associated interest. To date the SMDR has been calculated on a monthly basis. In many cases the SMDR has been recovered on an equal basis from all metered customer classes, although more recent decisions have dealt with class-specific disposition riders. The distributor should determine and support its proposed allocation, based on principles of cost causality and practicality.
Smart Meter Incremental Revenue Requirement Rate Rider	SMIRR	<ul style="list-style-type: none"> When smart meter disposition occurs in a stand-alone application, a SMIRR is calculated as the proxy for the incremental change in the distribution rates that would have occurred if the assets and operating expenses were incorporated into the rate base and revenue requirement. The SMIRR is calculated as the annualized revenue requirement for the test year for the capital and operating costs for smart meters. The SMIRR will be calculated on a monthly basis, similar to the SMDR. The allocation for the SMIRR should generally be the same as for the SMDR. The SMIRR ceases at the time of the utility's next cost of service application when smart meter capital and operating

Cost of Service Applications

The recovery of smart meter capital and operating costs is normally approved (or denied) following a review for prudence and disposition in a cost of service proceeding. A smart meter disposition rate rider ("SMDR") is used to recover the residual revenue requirement that is made up of smart meter costs up to the time of disposition, less amounts collected through the SMFA and associated interest. The approved gross book value and accumulated depreciation of installed smart meters are then added to rate base, and the test period operating expenses are added to OM&A. This ensures the recovery of the incremental revenue requirement on a going-forward basis through base rates. Further, smart meter capital and operating costs should be reflected in the cost allocation study to ensure an appropriate allocation of costs to the various customer classes.¹

If a distributor seeks approval for costs related to 100% smart meter deployment, any capital and operating costs for smart meters that are installed beyond the (2012) test year (i.e. for new customers) should not be recorded in Accounts 1555 and 1556.

The Board considers that rates will be fully compensatory when smart meter costs are either incorporated into base rates or recovered by means of the SMIRR. When smart meters are installed for new customers, these customers will pay rates that reflect the recovery of smart meter costs. The costs of these additional smart meter costs should be reflected in normal capital and operating accounts, akin to other normal distribution assets and costs.

Stand-alone Applications

As per *Chapter 3 of the Filing Requirements for Transmission and Distribution Applications*, issued June 22, 2011, the Board expects those distributors that are scheduled to remain on IRM to file a stand-alone application with the Board seeking final approval for smart meter related costs. When rates are adjusted in a stand-alone application, there is no re-evaluation of rate base or of the revenue requirement for the purpose of setting distribution rates. Where the Board approves smart meter capital and operating costs outside of a cost of service proceeding, a SMDR is still required. In addition, a smart meter incremental revenue requirement rate rider ("SMIRR") is established to recover the prospective annualized incremental revenue requirement for the approved smart meters, until the distributor's next cost of service application. The SMIRR continues until the effective date of the distributor's next cost of service rate order, at which time assets and costs are incorporated into the rate base and revenue requirement and recovered on a going-forward basis through base rates.

As in a cost of service application, when smart meter costs are approved for 100% deployment, capital and operating costs for smart meters on a going-forward basis are no longer recorded in Accounts 1555 and 1556; instead the costs are recorded in the applicable capital or operating expense account (e.g. Account 1860 – Meters for smart meter capital assets).

Evidence to be Filed in Support of Smart Meter Cost Recovery in a Cost of Service or Stand-Alone Application

The purpose of this model is to calculate a smart meter revenue requirement from a distributor's capital and OM&A costs, and to provide one methodology for the determination of associated riders and/or adders. In addition to filing this model, distributors must provide in any application for cost recovery detailed descriptions of all costs incurred. The onus is on the distributor to support its case, and the distributor should provide any additional information necessary to understand the distributor's costs in light of its circumstances. In considering the recovery of smart meter costs, the Board also expects that a distributor will provide evidence on any operational efficiencies and cost savings that result from smart meter implementation. As an example, meter reading expenses may be reduced with the activation of remote meter reading through the AMI network for residential and small general service customers.

When applying for the recovery of smart meter costs, a distributor should ensure that historical cost information has been audited including the smart meter-related deferral account balances up to the distributor's last Audited Financial Statements. A distributor may also include historical costs that are not audited and estimated costs, corresponding to a stub period or to a forecast for the test rate year. The Board expects that the majority (i.e. 90% or more) of costs for which the distributor is seeking recovery will be audited. In all cases, the Board expects that the distributor will document and explain any differences between unaudited or forecasted amounts and audited costs.

"Beyond Minimum Functionality" Costs

While authorized smart meter deployment must meet the requirements for minimum functionality, a distributor may incur costs that are beyond the "minimum functionality". To date, the Board has reviewed three types of costs that are "beyond minimum functionality":

A. Costs for technical capabilities in the smart meters or related communications infrastructure that exceed those specified in O.Reg 425/06;

B. Costs for deployment of smart meters to customers other than residential and small general service (i.e. Residential and GS < 50 kW customers); and

C. Costs for TOU rate implementation, CIS system upgrades, web presentation, integration with the MDM/R, etc.

Costs beyond minimum functionality for which recovery is sought must be recorded in the Smart Meter Costs tab of the model in these three categories, and appropriate supporting evidence for each cost type must be provided in the application. Further comments on each of these cost types are provided below.

A. Costs for technical capabilities in the smart meters or related communications infrastructure that exceed those specified in O.Reg. 425/06

O.Reg. 425/06 specifies that costs that exceed minimum functionality may be approved by the Board for recovery. In deciding whether technical capabilities of installed smart meters or associated communications or other infrastructure that exceed minimum functionality are recoverable, the Board will consider the benefits of the added technical features and the prudence of these costs. Any distributor seeking recovery for these additional capabilities should provide documentation of the additional technical capabilities, the reasons for them and a detailed cost/benefit analysis.

Technical functionality "beyond minimum functionality" was dealt with by the Board with respect to Hydro One Networks' 2008 cost of service application, regarding the costs and benefits of super-capacitors in the smart meters and AMI collectors. In its Decision and Order on that application (EB-2007-0681), issued December 18, 2008, the Board approved the recovery of the incremental costs.

B. Costs for deployment of smart meters to customers other than residential and small general service

O.Reg. 425/06 defines smart meter deployment as pertaining to residential and small general service customers. The Functional Specification sets the required minimum level of functionality for the AMI to be "for residential and small general service consumers where the metering of demand is not required." As such, minimum functionality has been defined as customers in the residential and general service ("GS") < 50 kW classes.

While some customers in other metered customer classes (GS > 50 kW, Intermediate, Large Use) have interval meters that measure peak demand in a time interval, some distributors may have customers in these classes that have conventional meters and are not eligible for the regulated price plan ("RPP") and therefore are subject to the weighted average spot market price.

A distributor may, as part of its smart meter deployment program, decide to install smart meters for these customers. This could be on the basis that these customers will have higher demand than will typical residential and GS < 50 kW customers, and providing them with better information on how much and when they consume electricity may provide these customers with opportunities for more energy conservation and load shifting. While such meter conversions may generally appear to be logical, they are outside of the regulation and hence are "beyond minimum functionality". In other instances, a distributor may convert the meters of interval-metered customers upon repair or re-sealing to "smart" meters that communicate using the AMI infrastructure that the distributor has installed, replacing the existing communications systems for these meters. Again, as these are for meters for customers other than residential and small general service, they are outside of the regulation and hence "beyond minimum functionality".

The Board, as part of the Combined Proceeding (EB-2007-0063, December 13, 2007), approved cost recovery for meter conversions for GS > 50 kW customers for both Toronto Hydro Electric System Limited ("Toronto Hydro") and Hydro Ottawa Limited. However the Board stated:

"The Board is explicitly not finding that the costs associated with these meters fall into the minimum functionality costs. The Board approval of these costs is ancillary to the smart meter decision."

With respect to Toronto Hydro, the Board subsequently approved the recovery of these costs for smart meter installation/conversion for GS > 50 kW customers in Toronto Hydro's 2008-2009 [EB-2007-0681] and 2011 [EB-2010-0142] cost of service rate applications.

Some distributors may be doing "smart meter" conversions for General Service > 50 kW customers upon repair or resealing to enable meter data collection through the AMI infrastructure. While it is recognized that these smart meter installations and conversions are "beyond minimum functionality", a distributor may apply for the recovery of such costs. The application should document the nature, the justification and the cost per meter separately from those for the residential and GS < 50 kW customers.

C. Costs for TOU rate implementation, CIS system upgrades, web presentation, etc.

Costs for CIS systems, TOU rate implementation, etc., are beyond minimum functionality as established by the Board in the Combined Proceeding. However, such costs may be recoverable. In its application, a distributor should show how these costs are required for its smart meter program. Further, a distributor should document how these costs are incremental. For example, if a distributor has a normal budget for maintenance of its billing and CIS systems, costs claimed for system maintenance and upgrades must be shown to be incremental to the normal budget that is already recovered in base rates.

All costs "beyond minimum functionality" should be clearly identified and supported. Costs that are for meter data functions that will be the responsibility of the Smart Metering Entity will not be recoverable, unless already allowed for as per O.Reg. 426/06. Costs for other matters such as CIS changes or TOU bill presentment may be recoverable, but the distributor will have to support these costs and will have to demonstrate how they are required for the smart meter deployment program and that they are incremental to the distributor's normal operating costs.

Cost recovery for ongoing costs of the Smart Metering Entity should not be included in any smart meter cost recovery application, until such time as the Board establishes a cost recovery mechanism. To date, the Board has disallowed requests for either cost recovery or the establishment of a deferral account to track these costs.

Cost Allocation

The model does not deal with allocations between customer rate classes. In calculating the SMDR and SMIRR, the Board has approved, in some applications, the recovery of amounts from certain applicable customer classes based on the availability of detailed data at the customer class level and on principles of cost causality.

If a distributor does not have sufficient information to support an allocation to the applicable classes, a distributor may choose to propose a recovery on the basis of all metered customers resulting in one uniform rate rider for all metered customer classes. The model calculates the SMFA, SMIRR and SMDR on this basis.

Whichever method is adopted, the Board is of the view that any cost allocation approach should be consistent between the SMDR and the SMIRR when disposition is sought in a stand-alone application. The Board will entertain proposals supported by analysis for SMDRs and SMIRRs based on principles of cost causality and where the distributor has the necessary historical and forecasted data. Distributors should refer to the PowerStream application considered under EB-2010-0209 for a practical approach. However, if a distributor decides to adopt this approach in its application, it will have to adjust it to its own circumstances.² Further, adoption of this approach will not predetermine its approval by the Board in an individual application.

Stranded Meters

The model does not address the recovery of stranded meter costs. Distributors filing Cost of Service applications should refer to *Chapter 2 of the Filing Requirements for Transmission and Distribution Applications*, issued June 22, 2011 (Section 2.5.1.5).

While it would be preferable, conceptually, to also deal with stranded meter costs in a non-cost of service application, the Board recognizes that practical difficulties would arise since there is no restatement of rate base and rates. The Board therefore expects that stranded meter costs will be left in rate base until the distributor's next cost of service application.

¹ See Section 2.10 – Cost Allocation of Chapter 2 of the Filing Requirements for Transmission and Distribution Applications, issued June 22, 2011.

² For example, if a distributor has deployed smart meters to classes other than Residential and GS < 50 kW, it will have to reflect the additional classes in any cost allocation proposal.

Appendix B
Supplementary Settlement Agreement
Hydro Ottawa Limited
2012 Electricity Distribution Rates
EB-2011-0054

Originally filed November 7, 2011
Re-filed November 10, 2011

Proposed Supplementary Settlement Agreement

EB-2011-0054

Issues related to Modified International Financial Reporting Standards (“MIFRS”)

This Proposed Supplementary Settlement Agreement incorporates Parts I through VI of the Settlement Agreement filed with the Board on November 1, 2011. This Proposed Supplementary Settlement Agreement is severable in full or in part.

Best efforts have been made to identify all of the evidence that relates to each issue. The supporting evidence for each issue is identified individually by reference to its Exhibit number in an abbreviated format; for example, Exhibit A1, Tab 8, Schedule 1 is referred to as A1-8-1. The interrogatories are listed under the asking party, with their number provided in brackets. For example, K1-1-1 (1) under Board Staff Interrogatories refers to Board Staff interrogatory #1. Under Additional Evidence, D1 and D2 refer to the transcripts from Day 1 and Day 2 of the Technical Conference held on September 26 and 27, 2011. LT refers to Undertakings and MT refers to handouts at the Technical Conference.

The identification and listing of the evidence that relates to each issue is provided to assist the Board. The identification and listing of the evidence that relates to each issue is not intended to limit any Participating Party who wishes to assert that other evidence is relevant to a particular issue.

The Participating Parties are of the view that the evidence provided is sufficient to support the Proposed Settlement Agreement in relation to the settled issues and, moreover, that the quality and detail of the supporting evidence, together with the corresponding rationale, will allow the Board to make findings agreeing with the proposed resolution of the settled issues.

Hydro Ottawa and Intervenor (“the Participating Parties”) agree on the following issues related to Modified IFRS (Issue 11).

1. **Transition of PP&E.** IFRS requires that accumulated depreciation be closed out to gross fixed assets, so that on the commencement of IFRS (i.e. the year prior to the actual conversion, usually January 1, 2011) the opening gross fixed assets is equal to the former net book value, and the opening accumulated depreciation is zero. Consistent with the Board's IFRS report, utilities would for regulatory purposes be required to retain the former gross fixed assets amount (closing amount on December 31, 2010, usually) as the opening gross fixed assets, and retain the old accumulated depreciation amount in the same way. Intervenor understand that Ottawa has now filed on this modified basis, and the Participating Parties propose that be the basis on which the Board approve the final numbers.

Evidence: The evidence in relation to this issue includes the following:

Exhibits	J1-1-1; J2-1-1 (updated); J2-1-1 Attachment AT (updated); J4-1-1; J4-1-1 Attachment AZ
Board Staff Interrogatories	K11-1-1(79); K11-1-7(85); K11-1-16(94); K11-2-1(95); K11-2-2(96); K11-2-3(97);
Energy Probe Interrogatories	
Additional Evidence	D1-157; D1-174

2. **Contributions and Grants.** Some utilities are closing out contributions and grants to the individual asset items (getting a net GFA and net accumulated depreciation). Others are not. Some are treating contributions and grants "depreciation" as Other Revenues.

The Participating Parties agree that contributions and grants remain in PP&E as separate line items, and be depreciated at the same rate as the assets to which they relate. Any negative depreciation would be an offset to the depreciation figure, rather than separately reported in Other Revenues.

Evidence: The evidence in relation to this issue includes the following:

Exhibits	J1-1-1; J2-1-1 (updated); J2-1-1 Attachment AT (updated); J4-1-1; J4-1-1 Attachment AZ
Board Staff Interrogatories	K11-1-1(79); K11-1-7(85); K11-1-16(94); K11-2-1(95); K11-2-2(96); K11-2-3(97);
Energy Probe Interrogatories	
Additional Evidence	D1-157; D1-174

3. **Opening Rate Base.** Consistent with the Board's IFRS report, each utility including Ottawa should calculate their opening 2012 rate base on CGAAP, and as proposed (i.e. IFRS). The difference is an increase or decrease in rate base that is not reflected in their prior rates. For utilities that convert as of January 1, 2012, it will be made up primarily of their CGAAP/IFRS depreciation and capitalization differences for 2011. For ones like Guelph that converted January 1, 2011, it will be made up primarily of those two factors for both 2010 and 2011.

The Participating Parties agree that the general rule should be that the balance in that account should be paid to the ratepayers, or collected from the ratepayers, over the four year IRM period (depending on the amount, of course). It should be allocated using the same factors as depreciation expense. This is fully consistent with what Hydro Ottawa is proposing and the Participating Parties agree to Hydro Ottawa's calculation of Opening Rate Base.

Evidence: The evidence in relation to this issue includes the following:

Exhibits	J1-1-1; J4-1-1; J4-1-1 Attachment AZ;
Board Staff Interrogatories	K11-2-1(95)
Energy Probe Interrogatories	K11-2-4(67)
Additional Evidence	

4. **OPEBs and Pension.** Most utilities will revalue their OPEB liability (and some pensions as well) as of the conversion, although they were in fact required to do this under CGAAP anyway. If their liability has gone down, this means they have collected more from ratepayers than they needed, and this would otherwise increase their retained earnings. If their liability has gone up, this means they have under collected, and this would otherwise decrease their retained earnings.

The Participating Parties agree with Hydro Ottawa's proposal to establish a deferral account for these amounts and amortize the amount over the average remaining expected lives of the employees (For Hydro Ottawa that is 13.3 years Exhibit K11-1-13(2)) . Three years from now (for 2016 rates), when Hydro Ottawa does its next valuation, a further adjustment

(if required) will be made, and the net balance in the deferral account will be recalculated. The amortization will then also be recalculated (if required) at that time. The effect is to smooth the adjustments over a long time.

Evidence: The evidence in relation to this issue includes the following:

Exhibits	J4-1-1; J4-1-1AZ
Board Staff Interrogatories	K11-1-13
Energy Probe Interrogatories	K11-2-4(67)
Additional Evidence	D1-177; D1-178; D1-179