Hydro One Networks Inc.

Distribution Rates Application 2018-2022

Power Workers' Union Interrogatories

A. GENERAL

- Issue 3: Is the overall increase in the distribution revenue requirement from 2018 to 2022 reasonable?
- Issue 4: Are the rate and bill impacts in each customer class in each year in the 2018 to 2022 period reasonable?
- Issue 5: Are Hydro One's proposed rate impact mitigation measures appropriate and do any of the proposed rate increases require rate smoothing or mitigation beyond what Hydro One has proposed?

PWU A3/A4/A5 - 1

- (a) Which Hydro One rate classes benefit from bill protection pursuant to the terms of the Fair Hydro Plan (FHP)?
- (b) In 2016, how many customers were in each of these rate classes?
- (c) What percentage of Hydro One's total customers in 2016, do these customers represent?
- (d) In 2016, how much distribution revenue did Hydro One receive from these customers?
- (e) In 2016, what percentage of Hydro One's total distribution revenue was received from these customers?

PWU A4 - 2

Assuming that the Board approves the application as requested:

- (a) What bill impact does Hydro One forecast for a customer in the R1 rate class consuming 750 kWh per month for each of the years of the application following 2018, taking account of the effects of the FHP?
- (f) What is the forecast of the bill impact for these customers in each of the years, if the inflation assumption is 0% for each year?

PWU A4 - 3

- (a) Does Hydro One agree that the Board prescribed Bill Impact calculations do not accurately reflect the actual impact that the application will have on the bills received by customers of Hydro One who are subject to the FHP?
- (g) In particular, does Hydro One agree that adjustment to the commodity price from year to year is an intrinsic element of the operation of the FHP for each year of the application?

PWU A4 - 4

(a) Please re-file Exhibit H1, Tab 4, Schedule 1, including attachments thereto, and Exhibit A Tab 3 Schedule 1, Table 17, reflecting the bill impacts after the effects of the FHP are accounted for. Provide illustrative examples of the calculation of the bill impacts for each year of the application. Please indicate what assumptions have been made, and the basis for those assumptions.

PWU A4 - 5

Ref (a): Exhibit Q, Tab 1, Schedule 1, Attachment, Page 21 of 24:

- (a) Do the Total Bill Impacts reflected on the table take account of the FHP?
- (b) If not, why not?
- (c) If so, what is the basis of the bill impacts listed for 2019-22? Provide illustrative examples of the calculation of the bill impacts for each year of the application. Please indicate what assumptions have been made, and the basis for those assumptions.

PWU A4 - 6

Ref (a): The June 15, 2017 Hydro One presentation materials at the OEB Townhall (https://www.hydroone.com/abouthydroone/RegulatoryInformation/AboutOurRateApplic ation/Documents/OEB_Townhall_Presentation_June_15.pdf) address the bill impacts of the application in light of the FHP. At Slide 8, there is a reference to \$1.95 in monthly charges to a representative customer in respect of "Flow through transmission costs not covered by FHP".

- (a) What are these costs, and why are they not covered by the FHP?
- (b) Are the bill impacts referenced in the evidence inclusive of these costs?
- (c) What would the bill impacts be, if these costs were covered by the FHP?

PWU A4 - 7

Ref (a): Exhibit B1, Tab 1, Schedule 1 DSP Section 1.3 p. 4-15 (Customer engagement process)

- (a) Please confirm that this process was undertaken prior to the FHP coming into effect?
- (b) Did Hydro One undertake any additional customer engagement activities (in particular regarding the bill impact of the application) after the implementation of the FHP? If so:
 - (i) describe the initiatives that were undertaken;
 - (ii) describe the feedback received; and
 - (iii) describe the manner in which any feedback was incorporated into the application in its current form.

D. DISTRIBUTION SYSTEM PLAN

Issue 29: Are the proposed capital expenditures resulting from the Distribution System Plan appropriate, and have they been adequately planned and paced?

Issue 30: Are the proposed capital expenditures for System Renewal, System Service, System Access and General Plant appropriately based on the Distribution System Plan?

PWU D29/D30 - 8

Ref (a): Exhibit B1, Tab 1, Schedule 1, DSP Section 2.3, Page 12 of 89

Distribution station transformer failures are highly impactful. Hydro One's distribution stations typically do not have on-site spare transformers that can be switched into service in the event of a failure, and load cannot be transferred

amongst rural stations, which are most often fed from a radial system. In these instances, when a station transformer fails, service restoration requires the installation of a mobile unit substation.

 a) Please describe the impacts, including costs, of typical major and non-major station transformer failures.

PWU D29/D30 - 9

- (a) Prepare and provide a chart which provides the following information for each year since 2007:
 - (i) The number of wooden poles beyond expected service life;
 - (ii) The number of wooden poles in "poor", "very poor", and "in need of replacement" condition;
 - (iii) The number of poles replaced as part of a planned work program; and
 - (iv) The number of poles replaced outside of a planned work program.

PWU D29/D30 - 10

Ref (a): Exhibit B1, Tab 1, Schedule 1, Page 13 of 43

Hydro One indicates that it "proposes to cease reporting the Number of replaced Poles" as this is a measure which is "activity-based", which is not consistent with the RRF.

(a) Why does Hydro One not consider the number of poles replaced to be an "outcome"?

- (b) Why isn't this information critical to the Board's understanding of the adequacy of Hydro One's efforts to maintain its infrastructure on a sustainable basis?
- (c) Does Hydro One plan on continuing to track the number of poles replaced on an annual basis, in order that the data remains available to the Board?

PWU D29/D30 - 11

(a) How many wood poles does Hydro One forecast as newly becoming "in need of replacement" in each year from 2018-2022?

PWU D29/D30 - 12

Assuming that the work plan anticipated in the application with respect to pole replacement for 2018-22 is actually undertaken, at the end of 2022:

- (a) Would the total number of poles beyond expected service life be greater than, or less than the total number of poles beyond expected service life at the end of 2017? By what amount?
- (b) Would the average age of poles beyond expected service life be older or younger than the average age of poles beyond expected service life at the end of 2017? What are the average ages for each cohort at those two points in time?

PWU D29/D30 - 13

What additional funding in capital and OM&A would be required in order to execute a workplan which would result in:

- (a) The total number of poles beyond expected service life at the end of 2022 being no greater than the total number of poles beyond expected service life at the end of 2017; and
- (b) The average age of poles beyond expected service life at the end of 2022 being no older than the average age of poles beyond expected service life at the end of 2017?

PWU D29/D30 - 14

Ref (a): Exhibit B1, Tab 1, Schedule 1, DSP Section 3.8, ISD-SR-09, Page 1 of 5

As outlined in DSP Exhibit 2.3, there are currently approximately 67,000 poles in poor condition that are at high risk of failure. By the end of 2022, it is forecasted that an additional 77,000 poles will be added to this high risk category due to deteriorating condition.

In addition to concerns with condition, there are still a subset of 39,000 red pine poles that are demonstrating premature degradation, as documented in previous proceedings (EB-2013-0416, EB-2012-0136 and EB-2009-0096), that require replacement.

Ref (b): Exhibit B1, Tab 1, Schedule 1, DSP Section 3.8, ISD-SR-09, Pages 2-3 of 5

There are currently a large number of poles in poor condition that are at high risk of failure and it is forecasted that this number will be slightly reduced to 99,000 poles (including the red pine pole subset) over the plan. Poles are prioritized for replacement based on their impact on reliability and potential safety risks. The table below outlines the planned volume of poles to be replaced throughout the five year period.

	2018	2019	2020	2021	2022
Number of Poles Replaced	9,600	14,300	16,000	16,123	16,128

Ref (c): Exhibit B1, Tab 1, Schedule 1, DSP Section 1.1, Page 8 or 23

The pole replacement program will be replacing 77,400 poles over the planning period to manage the volume of poles in poor condition.

(a) Does the total number of poles that are in poor condition (67,000) include the 39,000 red pine poles?

- (b) How many poles would be at high risk of failure by the end of the test period if Hydro One continued at its current pole replacement rate?
- (c) The DSP overview states that 77,400 poles will be replaced over the test period. The sum of pole replacements in ISD-SR-09 is 72,151. Please explain the discrepancy.

PWU D29/D30 - 15

- (a) Confirm that, but for concerns regarding customer bill impacts, Hydro One would have agreed with its asset managers that Plan A was the appropriate workplan for Hydro One's assets and its customers.
- (b) Confirm that, aside from vegetation management issues, Hydro One did not re-visit the issue of whether Plan A, B, or modified B was the optimal plan to pursue.
- (c) In view of the fact that a significant proportion of Hydro One's customers are being protected from bill impacts for the foreseeable future, why isn't the 2018-22 timeframe the ideal timeframe to ensure that Hydro One's asset condition and reliability are improved (or at least are no worse)?
- (d) Confirm that the effect of pursuing modified Plan B rather than Plan A or Plan B is to defer the incremental costs associated with those plans from a period of time where a significant proportion of customers have bill impact protections under the FHP, to a period of time when they will be lacking such protection.

F. OPERATIONS MAINTENANCE & ADMINISTRATION COSTS

Issue 38: Are the proposed OM&A spending levels for Sustainment, Development, Operations, Customer Care, Common Corporate and Property Taxes and Rights Payments, appropriate, including consideration of factors considered in the Distribution System Plan?

Issue 39: Do the proposed OM&A expenditures include the consideration of factors such as system reliability, service quality, asset condition, cost benchmarking, bill impact and customer preferences?

PWU F38/F39 - 16

Ref (a): Exhibit C1, Tab 1, Schedule 2, Pages 29-30 of 33

The overall vegetation management OM&A expenditure for the 2018 test year is an increase of 4.7% relative to the 2017 bridge year forecast. This increase represents the pacing of the vegetation management work programs in line with the long-term strategy to regain control of backlogged maintenance and reduce average maintenance cycles. However, compared to the last rate application (EB-2013-0416), the current proposed 2018 forecast expenditure has been reduced, as a result of efficiency improvements, while maintaining the same volume of work as the previous 2018 plan.









Figure 31 - ROW Vegetation Demographics

- (a) What are the estimated cycle clearing inventory and tactical maintenance inventory backlogs at the end of the test period?
- (b) What share of Hydro One's ROW is attributable to each of the cycle clearing and tactical maintenance inventories?

PWU F38/F39 - 17

Ref (a): Exhibit B1, Tab 1, Schedule 1, Section 1.6, Attachment 2, Page 61 of 294

The positive outlook is that 50% of the system is targeted for a consistent schedule (4-8 year cycle) of maintenance that includes the highest priority and largest load kilometers on the system, M-Class and non-M-class feeders. Over the next six years all of the backlog of work for this half of system will be brought up to date. This requires 8,500 kilometres of M-Class and non-M-class feeders to be managed each year.

The areas that are in need of improvement are the other half of the system, which is composed of single and two-phase lateral primaries and associated secondary lines that feed residential and commercial customers. Under the current plan only 3,500 kilometres of these lines will be managed each year for the next six years. This will put the second half of the system further behind and the annual increment

of work will be the equivalent of a 15-year cycle of management. This is a rational approach to cope with a reduced budget. Although greater efficiencies can improve the execution of the program, it will not be enough to offset the reductions in program expenditures. Additionally, the new schedule will increase the risk of outages occurring on the single and two-phase lines.

The highest priority recommendation from this study is that Hydro One should strive to bring all of its system to a 4-8 year flexible cycle that is trued up each year to ensure backlogs do not creep back into the schedule. The current plan to prioritize the M-Class and feeder system is appropriate if sufficient attention can be given to the rest of the system. This may require greater expenditures in the future and an increase in the number of lower cost hiring hall or contract personnel. In the short-term, the single and two-phase system should be worked on an eight to nine-year cycle of management instead of a 15 year cycle. This would require increasing the annual increment from 3,500 to approximately 6,000 kilometres. The program could be ramped up 500 kilometres each of the six years after which additional resources can be reassigned from the M-Class and feeders. These will be managed under a six-year IVM cycle and require fewer resources to keep cleared.

Ref (b): Exhibit C1, Tab 1, Schedule 2, Page 32 of 33

Hydro One develops investment levels for the tactical maintenance program based on a forecast level of work to manage overgrown vegetation, factoring in regional fluctuations in unit prices, and the productivity initiatives discussed in Exhibit B1, Tab 1, Schedule 1 the Distribution System Plan, Section 1.5. The proposed spending for the 2018 test year is an increase of approximately \$9 million relative to the 2017 bridge year forecast expenditures. This increase is primarily to allow another 750 kilometers of right-of-way (to a total of 4,250 kilometers) to be cleared in 2018 in order to further reduce asset age, improve reliability and improve asset condition in line with Hydro One's long-term strategy to reduce its average maintenance cycle as recommended in benchmarking study discussed in Exhibit B1, Tab 1, Schedule 1 the Distribution System Plan, Section 1.6.

- (a) Please explain why Hydro One is increasing the tactical maintenance program to 4,250 km and not 6,000 km as recommended in CN Utility Consulting's Hydro One Vegetation Management Study?
- (b) Does Hydro One plan to undertake tactical maintenance on 4,250 km each year of the test period, or will it increase each year as recommended by CN Utility Consulting?
- (c) What will the average maintenance cycle be for the tactical maintenance program under Hydro One's proposed plan?

PWU F38/F39 - 18

Ref (a): Exhibit B1-1-1 DSP Section 1.5, Page 7 of 12

Labour Optimization: Forestry is working to optimize the number of high-skilled regular work staff to the level required to complete core work programs. Temporary workers will be utilized to perform the additional work in the applicable areas, allowing for additional flexibility in Hydro One's labour expense. In addition, Forestry is working to outsource low skilled brush control work at reduced expense to Hydro One. Both of these initiatives are expected to develop throughout the Application period (2018-2022).

(a) Please explain what "In addition, Forestry is working to outsource low skilled brush control work at reduced expense to Hydro One" means in the above statement?

PWU F38/F39 – 19

- (a) With respect to vegetation management, please advise whether the new plan outlined in Exhibit Q-1-1 has any impact on the evidence with respect to Labour Optimization outlined at Exhibit B1-1-1, DSP Section 1.5, p. 7 of 12, or the savings forecast set out at Table 19 thereof.
- (h) How does the new vegetation management plan outlined in Exhibit Q-1-1 impact on the composition of the workforce needed to implement the plan relative to the previous plan? In particular, what changes to the number of (a) regular employees; (b) Hiring Hall staff; and non-Hiring Hall contractors are forecast to be used in each of the years of the application?

PWU F38/F39 - 20

(a) With respect to Exhibit B1-1-1, p. 15 of 43, does Hydro One agree that,

with respect to the events it has classified as "force majeure", the impact

of the outage (either scope or duration) would also likely have been

affected by the existence of vegetation management backlogs and/or

asset condition issues?

PWU F38/F39 - 21

Ref (a): Exhibit Q, Tab 1, Schedule 1, Page 14 of 25 (New Vegetation Management

Strategy)

This approach to vegetation management will allow Hydro One to eliminate its backlog more quickly and improve the overall condition of its right-of-ways by

2022.

(a) Please clarify if the above statement is stating that Hydro One will be able

to eliminate its backlog by 2022.

(b) If the new defect based approach focuses on defects rather than

completely clearing vegetation in a corridor like in the past, under what

definition of 'backlog' is HO assuming that it will be able to eliminate

backlog -specifically, HO will not be clearing completely the vegetation,

which is the basis of the current definition of backlog.

(c) Has HO started implementing the new strategy? If not, when is HO

planning to implement the new strategy?

PWU F38/F39 - 22

Ref (a): Exhibit Q, Tab 1, Schedule 1, Page 14 of 25

13

Hydro One forecasts the 2018 cost of \$149.6 million for vegetation management will not change with the new vegetation management strategy, as Hydro One views the 2018-2022 period as transitional, and Hydro One anticipates incurring transition costs with this new approach. Hydro One is cautiously optimistic that, once the transition is complete, vegetation management costs may decrease by 2023.

Ref (b): Exhibit Q, Attachment 1, Page 13

The strategy will not require any increases to the existing funding requirements and is expected to realize significant benefits by 2021. This transformation will also improve unit cost in the long term.

- (a) Please confirm that the new vegetation management strategy will not affect the vegetation management cost forecast not only for 2018 but also for the remaining test years. If not, please explain.
- (b) Please identify the nature and amount of transition costs that Hydro One anticipates to incur as a result of the new vegetation management strategy. Are the "transition costs" included in the forecasted \$149.6 million annual cost?
- (c) Hydro One says it is "cautiously optimistic" that once the transition is complete, vegetation management costs may decrease by 2023. Please discuss the uncertainties and risks around the new vegetation management strategy and its benefits that make Hydro One to be 'cautiously optimistic' about cost reductions by 2023.
- (d) In Ref (b), what are the significant benefits expected to be realized in 2021?

PWU F38/F39 - 23

Ref (a): Exhibit Q, Tab 1, Schedule 1, Page 14 of 25

The changes to the vegetation management strategy has resulted in a change to the 2018 target in the Distribution OEB Scorecard for "Vegetation Management – Gross Cyclical Cost per km \$" presented on page 20 of the updated Distribution Business Plan (Attachment 1).

(a) On Page 20 of Attachment 1, the target in 2018 is given as \$3,600/km.
What was the original target before the change?

PWU F38/F39 - 24

Ref (a): Exhibit Q, Tab 1, Schedule 1, Attachment 2, Page 5, 10 (Clear Path's study)

...It was evident that maintenance activities have been largely focused on areas within the ROW, leaving behind Off-ROW vegetation which is the major contributor to poor reliability performance. (page 5)

.....Although, the number of hazard trees does not show the same obvious pattern of increase over time, this is primarily because the Off-ROW hazard trees are not a focus under the current work scope and a significant number remain in place in the years immediately following clearing work. (page 10)

- (a) Prior to the Clear Path Study, was Hydro One aware that Off-ROW hazard trees were the major contributor to poor reliability performance? If yes, why didn't Hydro One focus on Off-ROW hazards and broaden the scope of work to include them?
- (b) Please provide examples of the major categories of lands in the category "Off-ROW" where hazard trees contribute to Hydro One reliability performance.
- (c) Are these Off-ROW areas typically adjacent to ROWs, or are they in geographically distinct areas?

- (d) The Clear Path study recommends an approach different from a complete clearance of vegetation; however, it also recommends broadening the scope of work to include Off-ROW vegetation management. In this respect, how confident is Hydro One that the new approach will result in cost savings?
- (e) What are the major risks to the achievability of the new vegetation management plan, in terms of schedule and budget?
- Issue 40: Are the proposed 2018 human resources related costs (wages, salaries, benefits, incentive payments, labour productivity and pension costs) including employee levels, appropriate (excluding executive compensation)?
- Issue 41: Has Hydro One demonstrated improvements in presenting its compensation costs and showing efficiency and value for dollar associated with its compensation costs (excluding executive compensation)?

PWU F40/F41 - 25

Ref (a): Exhibit C1, Tab 2, Schedule 1, Page 30 of 51

Increased resourcing flexibility was achieved by negotiating enhancements to utilize temporary employees longer and to contract out more work. Hydro One annually performs approximately 200,000 cable locates and by contracting out this work, unit costs have dropped from \$107.00 to \$56.00;

(a) Please provide the dollar value of cost savings attributable to increased resourcing flexibility.

PWU F40/F41 - 26

Ref (a): Exhibit C1, Tab 2, Schedule 1, Pages 29-30 of 51

Pension costs were reduced by increasing employee pension contributions and reducing future pension benefits. In addition to advancing the progression to a 50-50 cost-sharing for pension benefits, it is also significant in that the increase in pension contributions more than offsets the costs of the share grant program for both unions.

- - -

Favourable future pension service benefit accrual impacts for active employees and new hires pensions including:

- increased early retirement eligibility rule of 85 (up from 82) commencing in 2025; and
- adjustment to number of years for final average earnings from 3 to 5 years commencing in 2025.
- (a) Please provide the pension cost savings arising from increased employee pension contributions.
- (b) Please provide an estimate of future savings arising from the move to the Rule of 85 and adjustment to the final average earnings calculation.

PWU F40/F41 - 27

Ref (a): Exhibit C1, Tab 2, Schedule 1, Page 33 of 51

Appendix B provides actual total compensation cost for Hydro One Distribution for 2014 to 2016 and forecast total compensation cost for bridge year 2017 and test years 2018 to 2022. Over the test period, total compensation for the Distribution business increases by 2.5%. In light of the increasing Distribution work program, Hydro One believes that this modest increase in compensation cost is reasonable and reflective of improving productivity.

Ref (a): Exhibit C1, Tab 2, Schedule 1, Page 48 of 51, Appendix B

	2014	2015	2016	2017	2018	2019	2020	2021	2022
Total Dx Compensation	628,687,087	625,297,510	639,004,626	606,748,484	637,778,506	642,530,718	631,275,350	616,248,742	622,009,219

- (a) Please confirm that total distribution compensation decreases by 2.5% over the test years.
- (b) Please confirm that compensation in 2017 is anomalously low. Why is compensation considerably lower in 2017?

PWU F40/F41 - 28

Ref (a): Exhibit C1, Tab 2, Schedule 1, Page 41 of 51

Table 12 illustrates that the PLM rate at Hydro One ranges from being slightly below to slightly above other LDCs in Ontario. Despite the rates being very close, the type of work and skills required at Hydro One are often more complex. Hydro One employees often work in a more rural setting than their counterparts in other LDCs. As a consequence, Hydro One employees can work in conditions and with equipment not normally required at other LDCs. Trades employees working on lines maintenance often work on both Distribution and Transmission assets and are required to be knowledgeable and proficient with overhead, underground and submarine cable. Again, this is not typical of the PLM role at other Ontario LDCs.

Ref (b): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 9 of 30 (Mercer's Compensation Benchmarking Study – List of peers)

- (a) What share of Hydro One employees work on both transmission and distribution assets?
- (i) Which, if any, members of the Mercer peer benchmarking group have employees that work on both transmission and distribution assets?
- (j) Please explain the benefit of employing workers with the ability to work on both transmission and distribution assets within the context of Hydro One's overall compensation strategy.

PWU F40/F41 - 29

Ref (a): Exhibit C1, Tab 2, Schedule 1, Page 33 of 51

Hydro One has assumed base salary increases of 2% for MCP staff over the Custom IR period. Annual base salary increases of 1% have been assumed for PWU staff and casual construction staff from 2018 onwards. Increases of 0.5 % have been assumed for Society staff from 2019 onwards.

Ref (b): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 29 of 30

Other Actuarial Assumptions:

...

- Salary Increase: 4.00% per annum

- (a) Why is the annual salary increase used in the Mercer study assumed to be 4% when Hydro One's assumed base salary increases range from 0.5% to 2%?
- (k) Generally, what would be the impact on the study's results if an increase of 1%, as assumed for PWU represented workers, is used instead?

PWU F40/F41 - 30

Ref (a): Exhibit C1, Tab 2, Schedule 1, Pages 49-50 of 51, Appendix C

PWU REPRESENTED POSITIONS

	1999	2013	2017	% Change
Mechanical Maint	ainer/Regional	Maintainer - M	I echanical	
Hydro One	\$28.23	\$42.48	\$45.32	61%
OPG	\$29.08	\$50.08	\$53.01	82%
Bruce Power	\$29.08	\$57.10	\$62.41	115%
Shift Control Tech	nician/Regiona	nl Maintainer –	Electrical	
Hydro One	\$28.23	\$42.48	\$45.32	61%
OPG	\$30.31	\$50.08	\$53.01	75%
Bruce Power	\$30.31	\$57.27	\$62.60	107%
Clerical – Grade 5	6 (based on a 3	5-hour work w	eek)	
Hydro One	\$21.46	\$32.30	\$34.46	61%
Bruce Power	\$21.46	\$35.59	\$39.87	86%
Clerical – Grade 5	8 (based on a 3	5-hour work w	eek)	
Hydro One	\$24.20	\$36.42	\$38.85	61%
OPG	\$24.20	\$38.95	\$41.23	70%
Bruce Power	\$24.20	\$40.13	\$44.96	86%

Regional Field Mechanic/Transport & Work Equipment Mechanic								
Hydro One	\$26.20	\$39.43	\$42.08	61%				
OPG	\$26.20	\$50.08	\$53.01	102%				
Bruce Power	\$26.20	\$49.71	\$54.33	107%				
Stockkeeper								
Hydro One	\$23.27	\$36.75	\$39.21	69%				
OPG	\$23.27	\$38.95	\$41.23	77%				
Bruce Power	\$23.27	\$44.88	\$49.06	111%				
Labourer								
Hydro One	\$19.03	\$28.63	\$30.54	60%				
OPG	\$19.03	\$38.95	\$41.23	117%				
Bruce Power	\$19.03	\$44.88	\$49.06	158%				

(a) Please provide the number of FTEs (and/or employees) for each of the seven listed PWU represented positions.

PWU F40/F41 - 31

Ref (a): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 13 of 30

In the 2013 study, Hydro One's overall weighted average was 10% above the market total compensation P50 – a 4% shift from the market median since 2013.

	Legend
▲ 2016 Hydro C	one Position Relative to Market
☐ 2013 Hydro C	one Position Relative to Market
\times 2011 Hydro C	one Position Relative to Market
○ 2008 Hydro C	one Position Relative to Market

			Multiple	of P50		F	lydro One P	60 Relative to	o Market P5	50
Hydro One Group	# of Hydro One Incumbents	2016	2013	2011	2008	0.50	0.75	P50 = 1	1.25	1.50
Non-Represented	167	1.02	0.99	0.83	0.99		×	E)A		
Professionals	612	1.11	1.09	1.05	1.05			⊠D_		
Power Workers	2,212	1.16	1.12	1.18	1.21			С		
Overall	2,991	1.14	1.10	1.13	1.17				40	

- (a) Please provide the trend in the market median from 2013 to 2016 for both the PWU group and overall.
- (b) Please provide the results for 2013 and 2016 that exclude comparators that are not present in both years.

PWU F40/F41 - 32

Ref (a): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 6 of 30

Mercer selects peer organizations, for compensation benchmarking purposes, based on a stable metric that reflects the size and operating complexity of the organization (typically, this is revenue and/or total assets). Where there is a relatively small sample of relevant comparator organizations, Mercer establishes limits of 33% to 300% of the scope criteria for the organization we are analyzing.

Some organizations were included in the analysis despite falling below the 33% of revenue threshold value. These organizations were primarily Ontario based local distribution companies that are seen as important benchmarks by stakeholders.

- (a) Please confirm that 6 of the 17 comparators fall out of the 33% to 300% of the Hydro One revenue range.
- (b) Please confirm that, as 3 of the 6 comparators that fall out of the range, the out-of-range comparators are not primarily Ontario based local distribution companies. Why are these companies included?

PWU F40/F41 - 33

Ref (a): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 14 of 30

For new employees hired into Non-Represented and Professional job classifications, the value of pensions and/or benefits, where applicable, have decreased due to recent amendments to these plans (see "Future" & "Go Forward" columns on the following pages).

- (a) Why is there no "Future" column for PWU job classifications? If possible, please update Table 7 to include a "Future" column.
- (b) Does the future column for the Society in Table 6 consider the move to the Rule of 85 and adjustment to the final average earnings calculation?

PWU F40/F41 - 34

Ref (a): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 14 of 30

As requested by stakeholders in 2011, in addition to comparing Hydro One P50 to market P50, a comparison was also made of Hydro One median to market average ("mean"). On a weighted average basis, Hydro One's total compensation cost is 8% above market average. Hydro One's position relative to market varies by employee group from 2% below market average for the Non-Represented group to a high of 10% above the market average for the PWU group. There is a noticeable difference between the market median and market average. This is driven, to a certain extent, by outliers in the data set and the sample size used. See Appendix A for detailed results.

Ref (b): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Page 4 of 30

					Total Re	muneration	(Current)			
			Multiple	e of P50		ŀ	łydro One P	50 Relative t	o Market P	i0
Hydro One Group	# of Hydro One Incumbents	2016	2013	2011	2008	0.50	0.75	P50 = 1	1.25	1.50
Non-Represented	167	1.02	0.99	0.83	0.99		×	DA		
Professionals	612	1.11	1.09	1.05	1.05			⊠D.		
Power Workers	2,212	1.16	1.12	1.18	1.21					
Overall	2,991	1.14	1.10	1.13	1.17				* O	
				•		Below P5	γ 60 Compens	ation Ab	ove P50 Con	npensati

Ref (c): Exhibit C1, Tab 2, Schedule 1, Attachment 5, Appendix A, Page 18 of 30



- (a) What drivers, aside from outliers and sample size, can explain the divergence of the market mean and median?
- (b) How can the presence of outliers impact the trend of the market mean?

 Are some peers outliers in terms of compensation trend rather than outliers in terms of relative market position?

(c) Hydro One's mean and median relative positions have been similar in Mercer's previous studies and the mean and median trends between studies were consistent. Why is this not the case for the 2016 study?

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Ref (a): Exhibit C1, Tab 2, Schedule 1, Page 43 of 51

Table 13: Annual Savings from Increased Employee Pension Contributions (DX)

Year	\$M
2018	\$10.9
2019	\$12.0
2020	\$11.9
2021	\$11.5
2022	\$11.7

(a) What underlining assumptions regarding employee pension contributions were used to determine the annual savings figures in each year of the test period?

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Ref (a): Procedural Order No. 3 Joint Session of Parties – January 16, 2018

(a) Following the Joint Session Meeting intended to identify compensation evidence filed in the EB-2016-0160 Transmission Proceeding record that may be relevant to Distribution Proceeding record (EB-2017-0049), Hydro One advised that one of the 2016 interrogatories that may require updates is PWU's Undertaking J10.1 that asked Hydro One to update Exhibit K9.7. Please provide an update to K9.7.