

Electricity Prices in Northern Ontario

Electricity Prices

- Electricity commodity prices in Ontario are set by the Ontario Energy Board (OEB through the regulated price plan (RPP). The RPP price is the same for all grid-connected consumers across the province.

Electricity Distribution Rates

- One factor that can cause some consumer's bills to be higher than others is the distribution rate of their local distribution company (LDC). Distribution charges account for about 32% of the monthly electricity bill.
- Distribution rates vary from LDC to LDC. As a result, the distribution charge consumers pay on their bills varies based on which LDCs service territory they live in.
- There are a number of factors that can impact what an LDC's distribution rates are, and as a result, what consumers pay. For example, servicing areas with low density means there are more poles and lines to maintain, higher line-losses and fewer customers to support these costs.
- Hydro One serves customers across a very large geographic area comprising a majority of the province. As a result, it serves areas that have different density profiles. Some areas may be rural with just a few customers per kilometer; other areas may be small communities, while other areas may be urban areas within towns or cities. Hydro One's geography and customer base are unique amongst LDCs.
- As a result, Hydro One, unlike other LDCs, has a density-based rate structure. For residential customers who are full-time resident at their address, Hydro One has three density classes:
 - **Urban High Density (UR)** - contains 3,000 or more customers, with at least 60 customers for every kilometer of power line used to supply energy to the zone
 - **Medium Density (R1)** - contains 100 or more customers, with at least 15 customers for every kilometer of power line used to supply energy to the zone.
 - **Low Density (R2)** - the remaining area not covered by Urban or Medium Density areas.
- Approximately a quarter of Hydro One's customers (~360,000) are in the lowest density class. These customers are spread across Northern, Eastern, Central and South West Ontario.

- The different distribution rates across the province are not necessarily tied to geographic region.
 - For example, Hydro One serves many geographic regions across the province. In addition, neighbouring LDCs could have very different distribution rates.
- Low Density (R2) customers receive **Rural or Remote Electricity Rate Protection (RRRP)** to help mitigate consumer bills affected by the higher costs of distributing electricity in rural or remote areas. For 2016, R2 customers receive an RRRP subsidy of \$31.50 per month.
- Hydro One's distribution rates are higher than the distribution rates of many other LDCs. The below table shows (based on rates at May 1, 2015), what the distribution rates are for Hydro One's three residential rate classes, and the number of consumers who fall within each rate class. Hydro One R2 customers pay the highest distribution rates in the province.

Hydro One Rate Class	Distribution Charge	Total Bill	Customers (2016) ¹	% of Customers ²
R2 (low density)	\$78.27	\$188.81	331,826	25.7%
R1 (medium density)	\$55.51	\$163.58	439,437	34.1%
UR (urban high density)	\$36.45	\$142.79	212,691	16.5%

** Includes \$31.50 RRRP subsidy.*

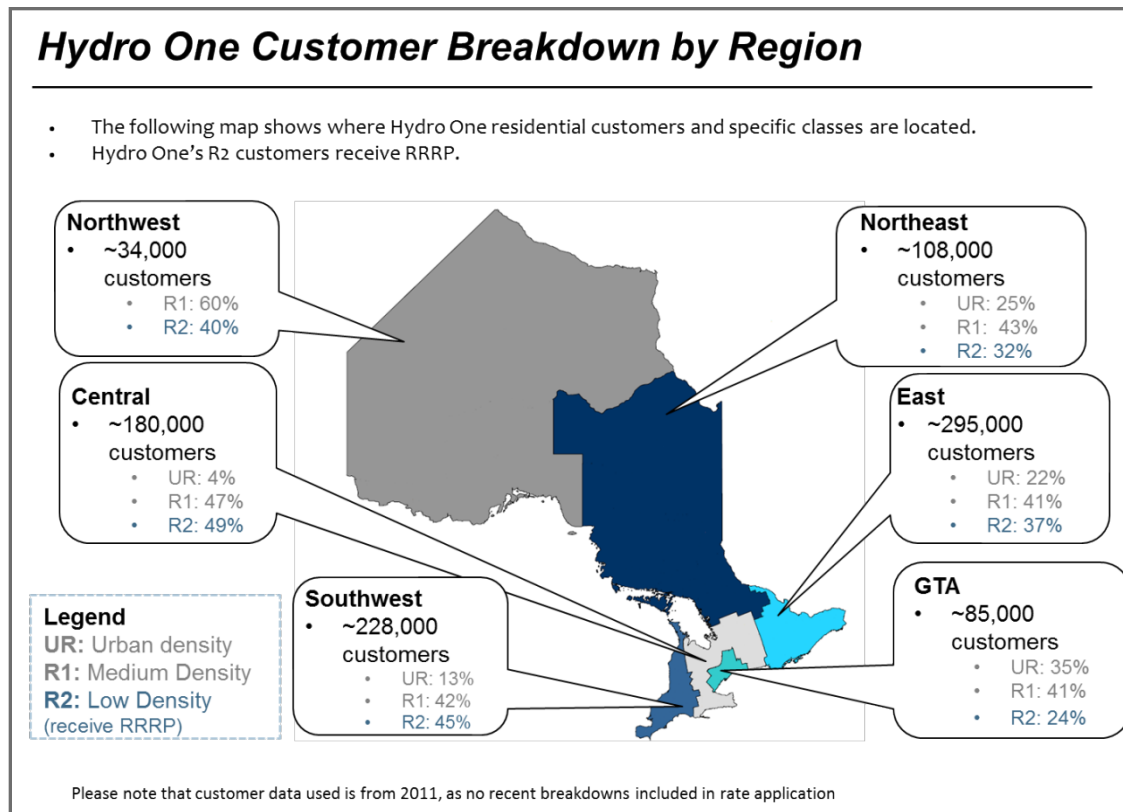
RRRP Subsidy

- RRRP is a subsidy paid to rural or remote customers in Ontario to mitigate the higher costs of providing electricity service in rural or remote areas, such as Hydro One's R2 rate class customers, non-government customers of Hydro One Remote Communities, and residential customers of Algoma Power. Three grid connected James Bay First Nation communities also receive RRRP. The RRRP is funded by all ratepayers across Ontario.

¹ Hydro One Year 2 Rates, EB-2015-0079, 2016 Cost Allocation Model, Undertaking response DRO TC1.

² Percentage of total customers. Hydro One also has a seasonal residential class, several non-residential classes, for a total of roughly 1.3 million customers.

- The below graphic shows a breakdown of Hydro One's customers by region, and the number of people found in each rate class in the region.



- Examples of LDCs with relatively higher distribution rates include:

Distributor	Distribution Charge	Total Bill	Residential Customers
Atikokan Hydro	\$46.33	\$154.30	1,408
Algoma Power	\$39.78	\$145.59	11,607
Erie Thames Powerlines	\$39.23	\$144.61	16,327
Toronto Hydro	\$33.76	\$140.17	661,959

Question from Minister Oraziotti:

- What would the cost be to subsidize rural distribution rates such that they are comparable to non-rural customers?

Answer:

- RRRP is funded by a charge applied to all electricity customers in Ontario, regardless of customer class. The cost of funding the \$31.50 monthly RRRP subsidy for Hydro One R2 customers is roughly \$125M per year.
- ENERGY staff have calculated a rough estimate of the cost to equalize distribution costs of Hydro One R2 and R1 class customers at the high density rate (UR) of \$36.45. Based on high level estimates, the cost of the RRRP program would increase to roughly \$490M from \$174M.³
 - This would result in an increase in the RRRP rate from 0.13 cents per kWh to 0.36 cents per kWh. For a typical residential customer, this would increase the yearly cost from about \$12 to \$34.50. For a larger industrial customer using 5MW, for example, the increase could be close to \$1.8M.
- Alternatively, the additional \$316M in costs would have to be found through the tax-base or funded by revenues from the government's Cap and Trade Strategy.

³ Analysis is based on data filed by Hydro One in technical conference undertaking responses in its year 2 custom IR update (EB-2015-0079, DRO TC1, 2016 Cost Allocation Model).