



ONTARIO'S OPTIONS: EVALUATING HOW PROVINCIAL CARBON PRICING REVENUES CAN IMPROVE AFFORDABILITY

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EXECUTIVE SUMMARY

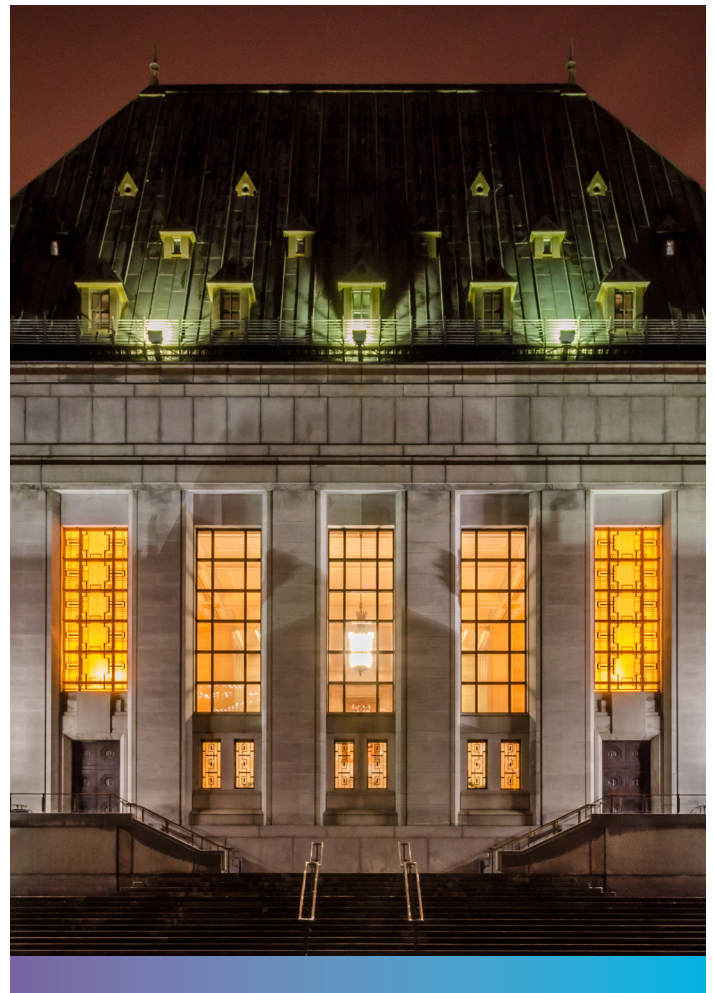
- The Ontario government may lose its upcoming Supreme Court battle over carbon pricing. This will require Ontario to choose between keeping the federal carbon pricing system or designing its own.
- The Ontario government can have a carbon pricing system and also work to reduce taxes to make life more affordable. The government has a range of options on how money can be returned to households, including cutting taxes and issuing rebates.
- This paper presents four options for using carbon price revenues. The distributional impacts of each option on the average household is measured by income quintile. This helps show how households with different income levels would benefit from each approach.
 - Option 1: Increase the basic personal amount (income tax credit) by \$6000 in 2020, \$8000 in 2021 and \$10,000 in 2022.
 - Option 2: Reduce the HST by 0.9% in 2020, 1.1% in 2021 and 1.3% in 2022.
 - Option 3: Develop a provincial version of the Climate Action Incentive.
 - Option 4: Increase the Ontario Trillium Benefit by \$350 in 2020, \$450 in 2021 and \$540 in 2022.
- Increasing the Trillium benefit would have the largest average benefit for low-income households.
- Low and middle-income earners (all households who earn under \$93,157 annually) only receive a positive benefit from revenues from progressive rebate options.
- A \$50/tonne revenue neutral carbon price would allow the province to lower the provincial component of the HST from 8% to 6.7% by 2023.

ONTARIO'S OPTIONS: EVALUATING USES FOR PROVINCIAL CARBON PRICING REVENUES

Ontario's relationship with carbon pricing has had a rocky half decade. After installing a carbon pricing system in the province in 2017, the election of the Progressive Conservative government saw it removed less than two years later. Subsequently, the federal carbon pricing system was implemented in the province on June 21st 2018. The current provincial government then sued the federal government for implementing the system, arguing that the *Greenhouse Gas Pollution Pricing Act* is a violation of the constitution because it intrudes on matters of provincial jurisdiction. This case has successively made its way through provincial courts in Ontario, Saskatchewan and Alberta, with two of three rulings against the provinces' arguments, and in September 2020 came in front of the Supreme Court of Canada, with a decision pending.

Given the precedents set in provincial courts and opinions of numerous legal experts, there remains a chance that the provinces could lose their current Supreme Court battle and be forced to accept carbon pricing in their provinces. In Ontario's case, this would required the government to select from one of three options: first, they could keep the federal system that is currently in place. Second, they could implement their own provincial carbon pricing system that replaces the federal system provided it still meets the legally-required minimum standard. Third, they could opt to keep part of the federal system and create elements of their own, as numerous provinces including Prince Edward Island and Alberta have done.

If the Ontario government loses its current Supreme Court battle and decides to create its own provincial carbon pricing system, it would have freedom to decide how the revenues would be returned to households. There are a range of options to offset increased carbon costs for households, including offering tax



cuts or increasing tax credits. The provincial government has pledged future decreases in personal income and corporate taxes to make life more affordable for Ontario households (Powers, 2018). This pledge will matter even more as Ontario households continue to endure the COVID crisis. Yet far from

making life unaffordable, a provincial carbon pricing system could support this goal. Revenues from a provincial carbon pricing could be used to pay for tax cuts and credits.

There are several ways that carbon revenues could be returned to Ontario households that are consistent with the current government's vision for the province.

There are several ways that carbon revenues could be returned to Ontario households that are consistent with the current government's vision for the province. Manitoba's decision to set a flat \$25-per-tonne tax called a 'Green levy' and lower the provincial sales tax (PST) to 6% is one option (Dacey, 2020). The province estimates this will save the average household \$359 by 2022¹. Another option was floated by Mark Towhey in a 2019 Toronto Sun article. He argued that revenues from carbon pricing should be used to lower the federal goods and services tax (GST) (Towhey, 2019). Patrick Brown, when leader of Ontario's Progressive Conservative party, promised to replace the former provincial cap-and-trade scheme with a revenue neutral carbon tax. Revenues collected from the tax would be returned to households through over \$12.3 billion in assorted tax cuts. These tax cuts included lowering the two lowest provincial income tax rates by 10% and 22.5% respectively, increasing the Ontario sales tax credit by \$100, and lowering the small business tax rates from 3.5% to 2.5% (Cameron, 2017).

There are several ways the Ontario government can redistribute carbon price revenues back to households. This report evaluates four potential options that align with the current government's

aim of reducing taxes and making life more affordable for Ontario households. These four measures are:

1. Increasing the provincial basic personal amount for income taxes.
2. Reducing the provincial portion of the harmonized sales tax (HST).
3. Maintaining the status quo — the Climate Action Incentive.
4. Increasing the Ontario Trillium Benefit.

The options assessed in this paper are revenue-neutral, meaning all proceeds raised from a pricing system would be returned to consumers and households². The total carbon cost to Ontario households is estimated to be \$2.4 billion in 2020, \$3.2 billion in 2021 and \$4 billion in 2022 (PBO, 2020).

To calculate the distributional impact of each of the four options and their net impact vis-à-vis the carbon price, we use analysis undertaken by the Parliamentary Budget Office. The PBO's analysis estimates the distributional impact of carbon pricing in Ontario by calculating the average amount of carbon tax paid by households across income quintiles, as shown in Table 1 below (PBO, 2020).

To estimate the net impact of carbon pricing under each of the four options, we use Statistics Canada's Social Policy Simulations Database/Model (SPSD/M). Using the model, we estimate the average benefit accrued to households, by quintile. We then calculate the net benefit of the carbon tax and the tax relief measure by subtracting the carbon costs estimated by the PBO from the average benefits we estimate. The benefit and net benefit of each of the four options is summarized in the following section.

Table 1: Distribution of carbon costs per household, 2020-2030

Base Net Income	2020/2021	2021/2022	2022/2023
\$0- \$32,299 (Quintile 1)	\$193	\$250	\$304
\$32,300 - \$59,197 (Quintile 2)	\$282	\$366	\$447
\$59,198 - \$93,157 (Quintile 3)	\$377	\$489	\$597
\$93,158 - \$141,131 (Quintile 4)	\$515	\$668	\$814
\$141,132+ (Quintile 5)	\$635	\$824	\$1004

¹ These estimates assume that the system remains at \$25-per-tonne and does not rise in line with the federal benchmark.

² One important assumption is that Ontario would install a carbon pricing system that is functionally identical to the federal system with a fuel charge and industrial OBPS with same coverage and stringency.



ANALYSES

Option 1: Increasing the provincial basic amount exemption income tax credit

The basic personal amount exemption is an income tax credit available to all households. In Ontario in 2020, the first \$10,783 earned by a taxpayer is essentially exempt from income taxes. By raising this amount, fewer Ontarians would pay income taxes at all, and anyone earning more than the current basic personal amount would see their income tax bills lower. Ontario could increase this amount by \$6,000 (to \$16,783) in 2020, \$8,000 in 2021 and \$10,000 in 2022, which would make the carbon tax revenue neutral.

Table 2a details the dollar benefit to the average Ontario household in each of the five quintiles. Households in the lowest quintile, in 2020-21, would see their taxes reduced by only \$36 on average, whereas households in the highest quintile would receive \$763.

Table 2a: Impact of increasing personal basic tax credit, 2020-2023

Base Net Income	+\$6,000 2020/2021	+\$8,000 2021/2022	+\$10,000 2022/2023
\$0- \$32,299	\$36	\$45	\$54
\$32,300 - \$59,197	\$206	\$266	\$321
\$59,198 - \$93,157	\$417	\$554	\$688
\$93,158 - \$141,131	\$550	\$732	\$909
\$141,132+	\$763	\$1017	\$1267

In Table 2b, we compare the amount households in each quintile pay in carbon prices relative to the amount of money they save on their taxes. In 2020-21, households in the lowest quintile would pay \$157 more in carbon expenditures than they receive back in income, whereas households in the highest income quintile receive a net benefit of \$128.

Table 2b: Net benefits, inclusive of carbon prices paid, to households of increasing personal basic tax credit, 2020-2023

Base Net Income	+\$6000 2020/2021	+\$8000 2021/2022	+\$10,000 2022/2023
\$0- \$32,299	-\$157	-\$205	-\$250
\$32,300 - \$59,197	-\$76	-\$100	-\$126
\$59,198 - \$93,157	\$40	\$65	\$91
\$93,158 - \$141,131	\$35	\$64	\$95
\$141,132+	\$128	\$193	\$263

Negative values indicate that households pay more back in carbon prices than they receive back in tax reductions.

Overall, such a tax swap would be regressive, as high income households see a net reduction in their tax bills, while lower income households would pay more.

Option 2: Reducing the HST

The harmonized sales tax combines the federal goods and services tax (GST) and the provincial sales tax (PST). Reducing the HST so that the carbon price is revenue neutral would correspond to a reduction in the provincial component of the HST to 7.15% in 2020, 6.9% in 2021 and 6.7% in 2022 if carbon pricing proceeds were fully used to lower the provincial portion of the HST (PST).

In Table 3a, we see that HST paid by households increases in line with household incomes.

Table 3a: Impacts of tax cuts from reducing the HST, 2020-2023

Base Net Income	-0.9% 2020/2021	-1.1% 2021/2022	-1.3% 2022/2023
\$0- \$32,299	\$199	\$272	\$347
\$32,300 - \$59,197	\$243	\$330	\$423
\$59,198 - \$93,157	\$306	\$417	\$532
\$93,158 - \$141,131	\$433	\$592	\$758
\$141,132+	\$591	\$805	\$1028

Table 3b shows that once we take carbon prices paid into account, the two measures roughly offset each other, with the lowest income quintile gaining more from reduced HST than they pay in carbon prices. It is important to note that these are for the average household within a quintile, as the actual amounts paid by any individual household could differ significantly.

Table 3b: Net benefits, inclusive of carbon prices paid, to households of reducing the HST, 2020-2023

	-0.85%	-1.1%	-1.3%
Base Net Income	2020/2021	2021/2022	2022/2023
\$0- \$32,299	\$6	\$22	\$43
\$32,300 - \$59,197	-\$39	-\$36	-\$24
\$59,198 - \$93,157	-\$71	-\$72	-\$65
\$93,158 - \$141,131	-\$82	-\$76	-\$56
\$141,132+	-\$44	-\$19	\$24

As we will see in Option 3 (the status quo) the HST measure is less progressive than the existing system of Climate Action Incentives.

Option 3: Maintaining the status quo – the Climate Action Incentive

The provincial government could opt to replace the current federal income tax benefit, the Climate Action Incentive, with an identical benefit administered by the province. The provincial benefit would have the same distributional impact as the federal Climate Action Incentive (CAI), which has been modeled by the PBO in its 2019 report and replicated in the tables below (PBO, 2019).

Table 4a shows that higher income households do receive more in Climate Action Incentive payments than lower income households, though the amounts do not rise in proportion to income. The payments received by lower-income households represent a larger portion of their income than it does for higher-income households.

Table 4a: Impacts of returning money directly to households, 2020-2023

Base Net Income	2020/2021	2021/2022	2022/2023
\$0- \$32,299	\$308	\$399	\$483
\$32,300 - \$59,197	\$353	\$457	\$553
\$59,198 - \$93,157	\$420	\$544	\$660
\$93,158 - \$141,131	\$454	\$588	\$712
\$141,132+	\$501	\$650	\$789

In Table 4b, we see that the existing system is more progressive than either the basic personal amount or HST options, with lower income households receiving the largest (net positive) benefits and higher income households paying more in carbon prices than they receive back in CAI cheques.

Table 4b: Net benefits of returning money directly to households, inclusive of carbon prices paid, 2020-2023

Base Net Income	2020/2021	2021/2022	2022/2023
\$0- \$32,299	\$115	\$149	\$179
\$32,300 - \$59,197	\$71	\$91	\$106
\$59,198 - \$93,157	\$43	\$55	\$63
\$93,158 - \$141,131	-\$61	-\$80	-\$102
\$141,132+	-\$134	-\$174	-\$215

But, as we will see in Option 4, there is an even more progressive option that the Ontario government could consider, which would particularly help low-income households.

Option 4: Increasing the provincial sales tax credit

The Ontario sales tax credit (OSTC), or the Ontario Trillium Benefit, is a refundable income tax credit accessible for low-income households (Government of Ontario, 2020). If all carbon pricing revenues were used to increase the Trillium benefit, the benefit could be increased by \$350 in 2020, \$450 in 2021 and \$540 in 2022 for each benefit recipient.

Unlike in our other three options, using the Trillium benefit would see lower-income households receive the highest level of benefits (as shown in Table 5a), before even taking into account carbon prices paid.

Table 5a: Impacts of increasing Ontario Trillium Benefit, 2020-2023

	+\$350	+\$450	+\$540
Base Net Income	2020/2021	2021/2022	2022/2023
\$0- \$32,299	\$563	\$723	\$862
\$32,300 - \$59,197	\$546	\$711	\$864
\$59,198 - \$93,157	\$365	\$508	\$648
\$93,158 - \$141,131	\$283	\$402	\$513
\$141,132+	\$202	\$267	\$334

When also considering the impact of carbon prices paid, we see that our two lowest quintiles come out ahead by several hundred dollars per year, while our highest income quintile pays \$433 (and rising) more in carbon prices than they receive in Trillium benefits.

Table 5b: Net benefits of increasing Ontario Trillium Benefit, inclusive of carbon prices paid, 2020-2023

	+\$350	+\$450	+\$540
Base Net Income	2020/2021	2021/2022	2022/2023
\$0- \$32,299	\$370	\$473	\$558
\$32,300 - \$59,197	\$264	\$345	\$417
\$59,198 - \$93,157	-\$12	\$19	\$51
\$93,158 - \$141,131	-\$232	-\$266	-\$301
\$141,132+	-\$433	-\$557	-\$670

If the Ontario government is looking for a way to increase the purchasing power of low-income households, using carbon price revenues to increase the Trillium benefit is a particularly attractive option.

All four options under \$50-per-tonne

The attractiveness of increasing the Ontario Trillium Benefit is particularly noticeable when we compare it directly to the other three options. A comparison of the net benefits of each option in 2023, when carbon pricing is equivalent to \$50-per-tonne, is presented below.

Summary Table: Comparing the net benefits to households of each revenue option at \$50/tonne

	Increase basic income tax credit by \$10,000	Reduce the HST by 1.3%	Return cheques directly to households	Increase the Trillium benefit by \$540
Base Net Income	2022/23	2022/23	2022/23	2022/23
\$0- \$32,299	-\$250	\$43	\$179	\$558
\$32,300 - \$59,197	-\$126	-\$24	\$106	\$417
\$59,198 - \$93,157	\$91	-\$65	\$63	\$51
\$93,158 - \$141,131	\$95	-\$56	-\$102	-\$301
\$141,132+	\$263	\$24	-\$215	-\$670



CONCLUSIONS

This analysis identified several key findings:

- **Increasing the Ontario Trillium Benefit would have the largest average benefit for low-income households.** Of all the analyses, one is regressive (it offers more benefits to higher income households than to lower income households), two are progressive (they offer larger benefits to lower income households than to higher income households) and one is neutral. The regressive option evaluated is increasing the income tax credit across all levels. By 2023, increasing income tax credits would offer a \$263 benefit to households in the highest income threshold and households in the lowest income threshold would lose \$250. By contrast, increasing the Ontario Trillium Benefit would benefit households in the lowest income threshold by \$558, with households in the highest income threshold losing \$670. A provincial version of the status quo is another progressive option. By 2022, mailing cheques directly or following a similar model to the federal system would benefit households in the lowest income threshold by \$179, while households in the lowest threshold would lose \$215.
- **Both low and middle-income earners (and all households who earn under \$93,157 annually) only receive a positive benefit from revenues from progressive rebate options.** Low-to-middle income households will pay a larger percentage of income towards carbon costs than higher income households. Under the four options assessed, households earning between \$32,300 - \$59,197 only receive positive benefits if revenues are returned through increases in the Trillium Benefit, or are directly returned through Climate Action Incentive-model rebate cheques. Given the importance of addressing affordability in the province, and the reality that low to middle-income earners have been hardest hit by the COVID crisis, this should be considered in policy decisions.

- **A \$50/tonne revenue neutral carbon price would allow the province to lower the provincial component of the HST from 8% to 6.7% by 2023.**

If all revenues from a revenue-neutral carbon price were put towards compensating for cuts to the HST, the provincial component of the HST could be lowered by roughly 0.2% for every \$10 increase in the carbon price. Given that the carbon price benchmark in 2020 will be \$30-per-tonne, an initial HST reduction to compensate for expenses would need to be set at 0.85%. This would increase to 1.1% for a \$40-per-tonne price, and 1.3% for a \$50-per-tonne price.

Households earning less than \$93 157 annually only receive a positive benefit from revenues returned through the Trillium Benefit, or a Climate Action Incentive-model.

METHODOLOGY

This analysis is based on Statistics Canada's Social Policy Simulation Database and Model (V28.0). The assumptions and calculations underlying the simulation results were prepared by Robin Shaban for Smart Prosperity Institute and the responsibility for the use and interpretation of these data is entirely that of the authors. The value of changes to the provincial portion of Ontario's HST may be slightly overstated. Of the provincial sales taxes considered in the simulation, 0.7% are not part of the HST (e.g. regulatory charges on electricity). However, given that only a very small proportion of sales taxes modified in the simulation are not included in the HST, we do not make any adjustments to correct for the overstatement.

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