ENERGY & ENVIRONMENTAL Policy Trends

EMISSIONS PRICING AND AFFORDABILITY: LESSONS FROM BRITISH COLUMBIA

How does emissions pricing affect affordability in Canada? BC, with the longest-running carbon tax, offers some lessons.

Some blame emissions pricing for <u>increasing costs</u> and decreasing <u>energy affordability</u>. Concerns about affordability in Atlantic Canada even prompted the Government of Canada to <u>exempt heating oil</u> from the federal fuel charge until March 31, 2027.

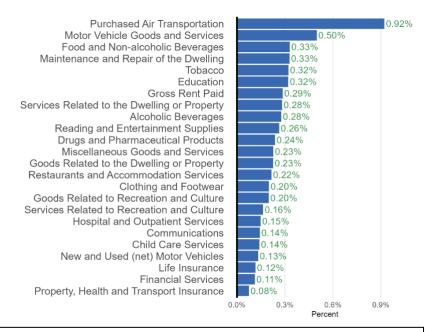
Emissions pricing affects households' costs in two ways. First, it **directly** increases the price of fuels based on the amount of CO_2 emitted as they are burned. The 2023 price is \$65 per tonne, which translates into 14.3 cents per litre of gasoline and \$3.32 per GJ of natural gas. Second, increases in the price of fossil fuels — gasoline, diesel, natural gas, heating oil etc. — trickle through the supply chain, **indirectly** raising the price of goods and services across the economy and so increasing households' costs.

The effect of emissions pricing on the prices of goods and services can be measured using the **effective tax rate**: the ratio of carbon taxes paid to total expenditure on a specific product. It includes both direct and indirect costs, meaning it shows the full burden of the tax relative to its absence.

For most goods and services, BC's carbon tax of \$65 per tonne adds less than 0.3% to the cost.

The figure uses the latest estimates from Statistics Canada to calculate BC's effective carbon tax rates for a range of goods and services. From a high of 0.9% for relatively energy-intensive *air transportation* to lower than 0.12% for *insurance* and *financial services*, the figure shows how necessities like *food* or *clothing and footwear* are increased by the province's carbon tax by 0.33% and 0.2%, respectively.

While some politicians and policymakers are blaming emissions pricing for high costs of living, the figure shows that the actual effect is quite modest for most items.



Effective Carbon Tax Rates in B.C. for Selected Items (2023)

Note: These estimates reflect the direct and indirect costs of carbon pricing. They capture the input-output interconnections between sectors and products.

Source: Authors' calculations from <u>Statistics Canada SPSD/M</u> version 30.0.2. The assumptions and calculations underlying the simulation results were prepared by, and the responsibility for the use and interpretation of these data is entirely that of, the authors.

Emissions pricing is just one of many indirect taxes that households face. Other examples are sales taxes and alcohol levies. We estimate that the combined effect on Canadian <u>consumer</u> <u>prices</u> from all indirect tax increases between January 2015 and October 2023 was 0.6%.

Knowing that much of the present affordability crisis is due to factors other than emissions pricing, the elimination of the carbon tax is unlikely to solve the problem. As Canada <u>slowly recovers from high inflation in</u> <u>2021 and 2022</u>, policy makers will need to consider alternative solutions.

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