

Fiscal Policies: instruments for carbon and pollution control

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The role of green finance and fiscal policy in pollution control and carbon neutrality

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Wednesday, 16 November 2022, 15h30 – 16h30

We will look at

1. Context and role of GFPs
2. Tax and subsidies instruments
3. Perverse Subsidy reforms
4. Carbon pricing

Fiscal policies as an instrument to address market failures

How to account for misaligned prices of G&S we produce and consume?

“Climate change is a result of the greatest market failure the world has ever seen.”

Former World Bank
Chief Economist,
Prof. Nicholas Stern.

Production and consumption of G&S
carbon/pollution related impact

Negative externalities not included in the prices

- Health expenditure
- Increased GHG
- Reduced labor productivity
- Biodiversity loss
- ...

Green Fiscal Policies put a set-price on pollution = economic incentive to reduce pollution

A set of instruments to raise revenue and finance the green economy

- Revenue mobilization (taxes & fees, carbon markets, subsidy repurposing) for State Budget or earmarked for green investment/social policy/tax reduction
- Public finance efficiency through green budgeting instruments
- Instruments of redistribution for equity and fairness



Beware of...



- **Complexity** : can make tax system more complex, while imposing pollution taxes on quite narrow bases may entail high administration costs
- **Fairness**: social support measures might be needed
- **Social and political acceptability**: important to communicate clearly on objectives, to consult stakeholders, and to sequence the reform if needed
- **Revenue dependency**: a green tax should eventually become redundant !

Tax and fees to reduce pollution

A few country examples

- **London** : congestion charges introduced in 2003 led after one year to -18% NOX emissions and -22% for PM10 decreased; hybrid car sales and public transport use increased ([UNEP, 2019](#))
- **Denmark**: pesticide tax system applies since 2013 a differential tax rate based on the human health risks, environmental impact of each approved pesticide. ([UNEP, 2019](#))
- **Chile**: tax on local air pollutants (SO₂, NO_x, and PM) since 2014
- **China**: Environmental Protection Tax enacted in 2016, more stringent than pollutant discharge fee system previously in place ([ADB, 2022](#)). It covers water, air, noise, and solid wastes.



Subsidies and tax expenditure as another form of incentives

Fiscally more costly but politically easier to introduce

- **Norway:** incentives for electric vehicles included several tax exemptions— resulted in sales of electric and plug-in electric cars surpassing those of conventional cars ([UNEP, 2019](#))
- **China:** new EVs currently exempt from a purchase tax ([CNBC, 2022](#))
- **Sweden:** mandates the adoption of environment-friendly and electric cars for Government fleet ([ADB, 2019](#))
- **Madhya Pradesh State (India):** Subsidies for organic farming to encourage reduction in use of pesticides and inorganic fertilizers (farmers grant)



Reforming harmful subsidies

A starting point for most countries

“Reform of global energy subsidies could reduce carbon dioxide emissions by more than 20%, cut premature air pollution deaths by more than half, and raise government revenues by nearly \$3 trillion.”

DR MARGARET CHAN

Director-General, WHO



- Fossil fuel
- Pesticides and fertilizers
- Fisheries
- etc.

CHOOSE HEALTH
End Fossil Fuel Subsidies

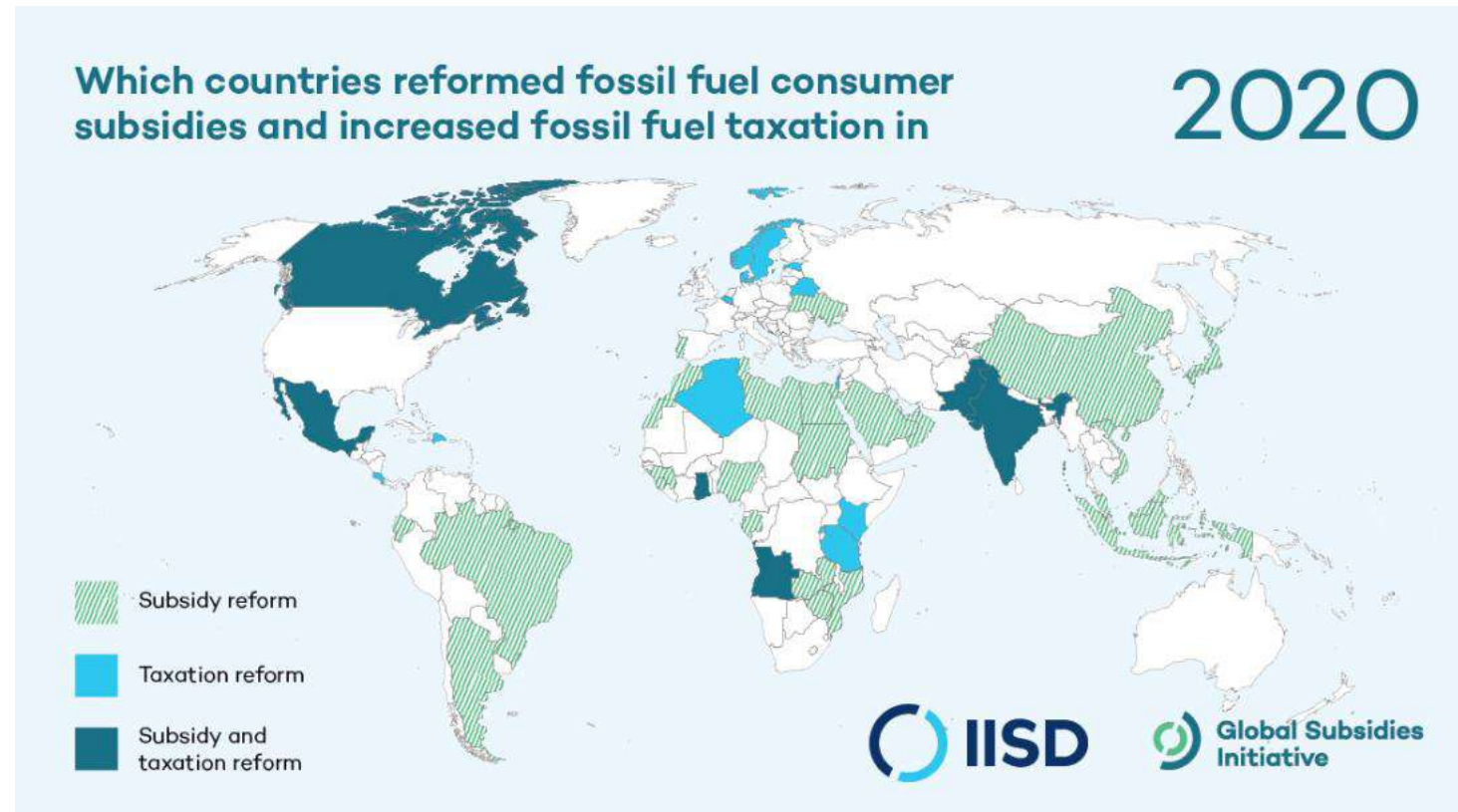


Health and
Environment
Alliance

campaign

From identifying to reforming

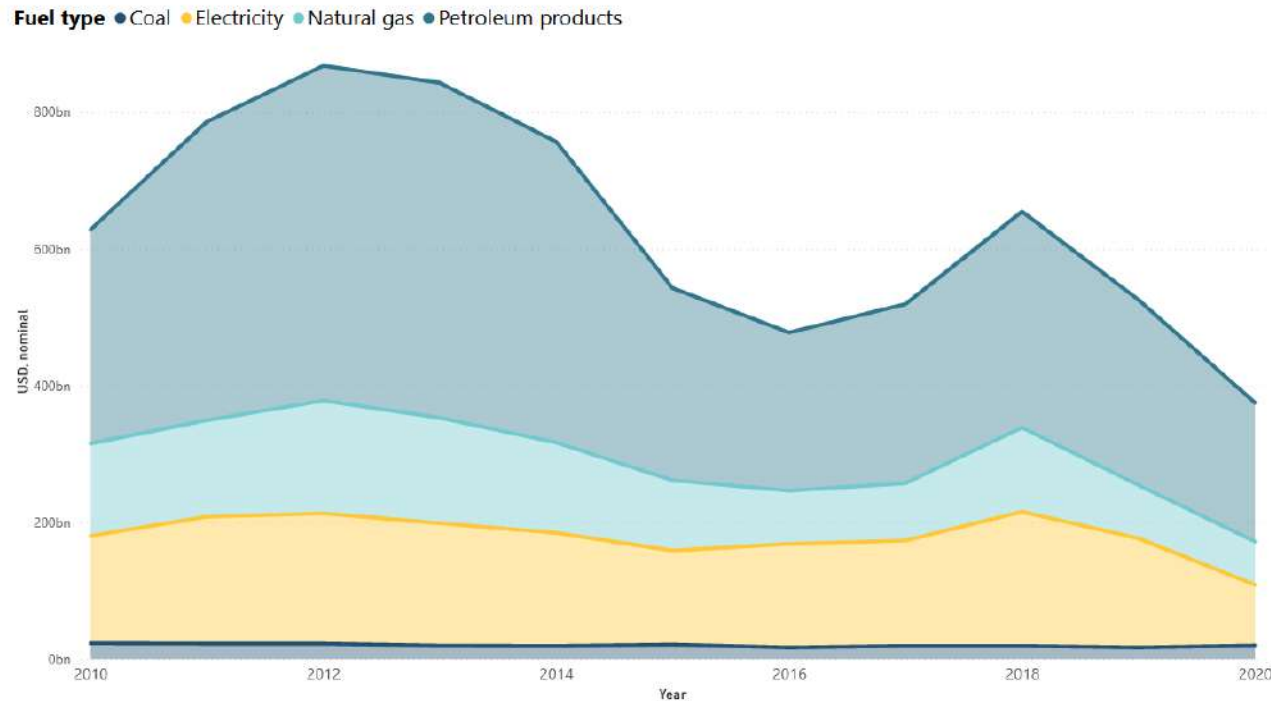
- Fiscally costly
- Not aligned with climate, nature and health targets
- Often badly targeted (not pro-poor)



The need to reform FFS is well understood

...but progress remains too slow.

Global estimates of subsidies by fuel type



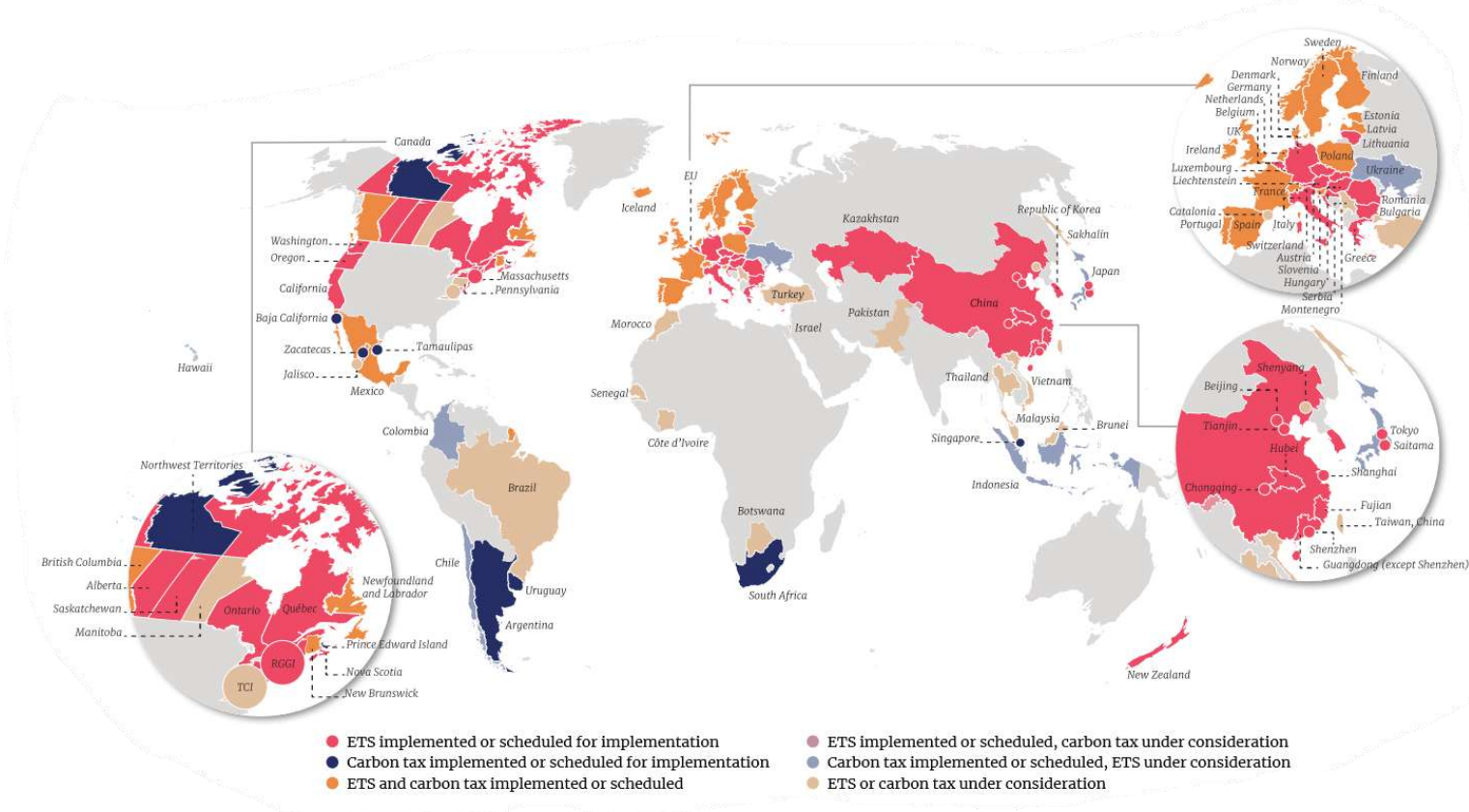
<https://fossilfuelsubsidytracker.org/>

“Support for fossil fuels almost doubled in 2021, slowing progress toward international climate goals”

Analysis by OECD and IEA of 51 countries, [released in November 2022](#)

Carbon pricing : progress and untapped potential

Map of carbon taxes and ETSs, 2022



World Bank. 2022. State and Trends of Carbon Pricing 2022

- Carbon pricing schemes generated USD 84 billion in 2022, from USD 48 billion in 2019
- 33% of the 2019 revenue stems from carbon taxes (28bn) and 67% are generated by carbon quotas (56bn).

Thank you



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