



Potentially Environmental Damaging Subsidies (PEDS) and links to the SDG 12.c.1. indicator

SDG Indicator 12.c.1 training (online)

Eurostat Unit E2 – Environmental statistics and accounts; sustainable development

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23 May 2022

Outline

- PEDS: Statistical framework
- Related policy actions at the European level
- Eurostat progress:
 - Milestones
 - Preliminary estimations
- Comparison with UNEP methodology
- To know more

PEDS: Statistical framework

- PEDS with respect to the other environmental accounts

		Type of transfer	
		Taxes	Subsidies (+Tax abatement)
Scope	Environmental activities/products	-	ESST
	Environmental damaging activities/products	ETEA	PEDS

- Clarification about the term ‘subsidy’:
 - Subsidy (D3) vs Transfer (D3+D6+D7+D9) vs Subsidy as WTO/UNEP/OECD
 - Direct vs indirect: Effect on the price/quantity
 - Explicit vs implicit: Effect on the budget.
- The general objective is clear and very relevant (as a cost-effective way to enhance the environment), for this reason is high in the agenda. However, once details are addressed, problems with delimitation arise.

Related policy actions at the European level

- European Green Deal:
 - Action plan ‘Sustainable and smart mobility’ specifically mentioning *“The price of transport must reflect the impact it has on the environment and on health. **Fossil-fuel subsidies should end**”*
 - Greening national budgets and sending the right price signals: *National budgets play a key role in the transition. A greater use of green budgeting tools will help to redirect public investment, consumption and taxation to green priorities and **away from harmful subsidies***
- 8th Environmental Action Plan in force (May 2022). Six priority objectives – PEDS potentially useful for all of them.
- DG ENV EHS list
- DG ENER – National Energy and Climate Plans + Study on energy subsidies
- DG ECFIN: Brown and green budgetary items

Eurostat progress: Milestones (1/2)

- During the MESA WG 2020 meeting, a pilot questionnaire was approved. In the recent MESA WG 2022 meeting a modified version was agreed (See next slide).
- MESA WG 2022 also agreed to launch an annual and voluntary data collection, late in 2022.
- Guidance documents to be provided also during 2022 in order to determine relevant definitions, scope, compilation approach, possible data sources and explanations for filling in the questionnaire.
- Relevant organisations in the field: OECD; UNEP; IEA; IMF; DG ENER; DG ENV; DG ECFIN; Country projects (some of them with Eurostat grants), London Group Task Force on Fossil Fuel Subsidies.

Eurostat progress: Milestones (2/2)

Questionnaire (simplified version):

	C	D	E	F	K	L	Q	R	W	X	Y	Z	AA	AB	AI	AJ	AK	AL	AM	AN	AU	AV	AW	AX	AY	AZ	BG	BH	BI	BJ	BK	BL	BS	BT	BU
1					ESATRANSFERS			Taxes for Average Effective Carbon Rates			CO ₂ emissions			Average EFFECTIVE CARBON RATES (Automatically calculated)			Emissions Range (automatically calculated)																		
2	COUNTRY:		UNIT:	MIO_NAC				COUNTRY: MIO_NAC			CO ₂ UNIT: tonne CO ₂			COUNTRY: UNIT: MIO_NAC/tonne CO ₂			COUNTRY: UNIT: % of CO ₂ emissions																		
3					Fossil Fuel	Other PEDS	TOTAL PEDS ESA TRANSFERS																												
4					Fossil Fuel	Other PEDS	TOTAL PEDS ESA TRANSFERS				Taxes for Average Effective Carbon				AEA CO ₂ data				Average Effective Carbon Rates				AEA CO ₂ data (%)												
5	Institutional Sector				2019	footnotes	2019	footnotes	2019	footnotes	Sector			2019	footnotes	Sector			2019	footnotes	Sector			2019	footnotes										
6	To HH (Institutional sector as ESA-2010)				:		:		:		HH (as final consumers)			:		HH (as final consumers)			:		HH (as final consumers)			:											
7	Corporations				:		:		:		Corporations			:		Corporations (Sum of NACE)			:		Corporations			:											
8	Transfers paid to NACE A Agriculture, forestry and fishing				:		:		:		NACE A Agriculture, forestry and fishing			:		NACE A Agriculture, forestry and fishing			:		NACE A Agriculture, forestry and fishing			:											
9	Transfers paid to NACE B Mining and quarrying				:		:		:		NACE B Mining and quarrying			:		NACE B Mining and quarrying			:		NACE B Mining and quarrying			:											
10	Transfers paid to NACE C Manufacturing				:		:		:		NACE C Manufacturing			:		NACE C Manufacturing			:		NACE C Manufacturing			:											
11	Transfers paid to NACE D Electricity, gas, steam and air conditioning supply				:		:		:		NACE D Electricity, gas, steam and air conditioning supply			:		NACE D Electricity, gas, steam and air conditioning supply			:		NACE D Electricity, gas, steam and air conditioning supply			:											
12	Transfers paid to NACE E Water supply, sewerage, waste management and remediation activities				:		:		:		NACE E Water supply, sewerage, waste management and remediation activities			:		NACE E Water supply, sewerage, waste management and remediation activities			:		NACE E Water supply, sewerage, waste management and remediation activities			:											
13	Transfers paid to NACE F Construction				:		:		:		NACE F Construction			:		NACE F Construction			:		NACE F Construction			:											
14	Transfers paid to NACE G Wholesale and retail trade; repair of motor vehicles and motorcycles				:		:		:		NACE G Wholesale and retail trade; repair of motor vehicles and motorcycles			:		NACE G Wholesale and retail trade; repair of motor vehicles and motorcycles			:		NACE G Wholesale and retail trade; repair of motor vehicles and motorcycles			:											
15	Transfers paid to NACE H Transportation and storage				:		:		:		NACE H Transportation and storage			:		NACE H Transportation and storage			:		NACE H Transportation and storage			:											
16	Transfers paid to NACE I-U Services (except wholesale and retail trade, transportation and storage)				:		:		:		NACE I-U Services (except wholesale and retail trade, transportation and storage)			:		NACE I-U Services (except wholesale and retail trade, transportation and storage)			:		NACE I-U Services (except wholesale and retail trade, transportation and storage)			:											
17	Transfers not elsewhere classified				:		:		:		not elsewhere classified			:		not elsewhere classified			:		not elsewhere classified			:											
18					:		:		:		TOTAL taxes paid (Corporations + HH)			:		TOTAL emissions = (Corporations + HH)			:		Average ECR whole economy			:		TOTAL emissions = (Corporations + HH)			:						
19					:		:		:					:					:					:											

Eurostat progress: Preliminary estimations (1/3)

Motivation:

- Testing the use of data already covered in SEEA-CF accounts (AEA/PEFA and ETEA) as a feasible and cost-effective approach for PEDS compilation
- Exploring the synergies within SEEA-CF.
- Proving countries that compilation with the proposed approach is possible.
- Producing a first estimation in order to check the complementarity of Average Effective Carbon Rates proposal (breakdown by NACE) with OECD work.

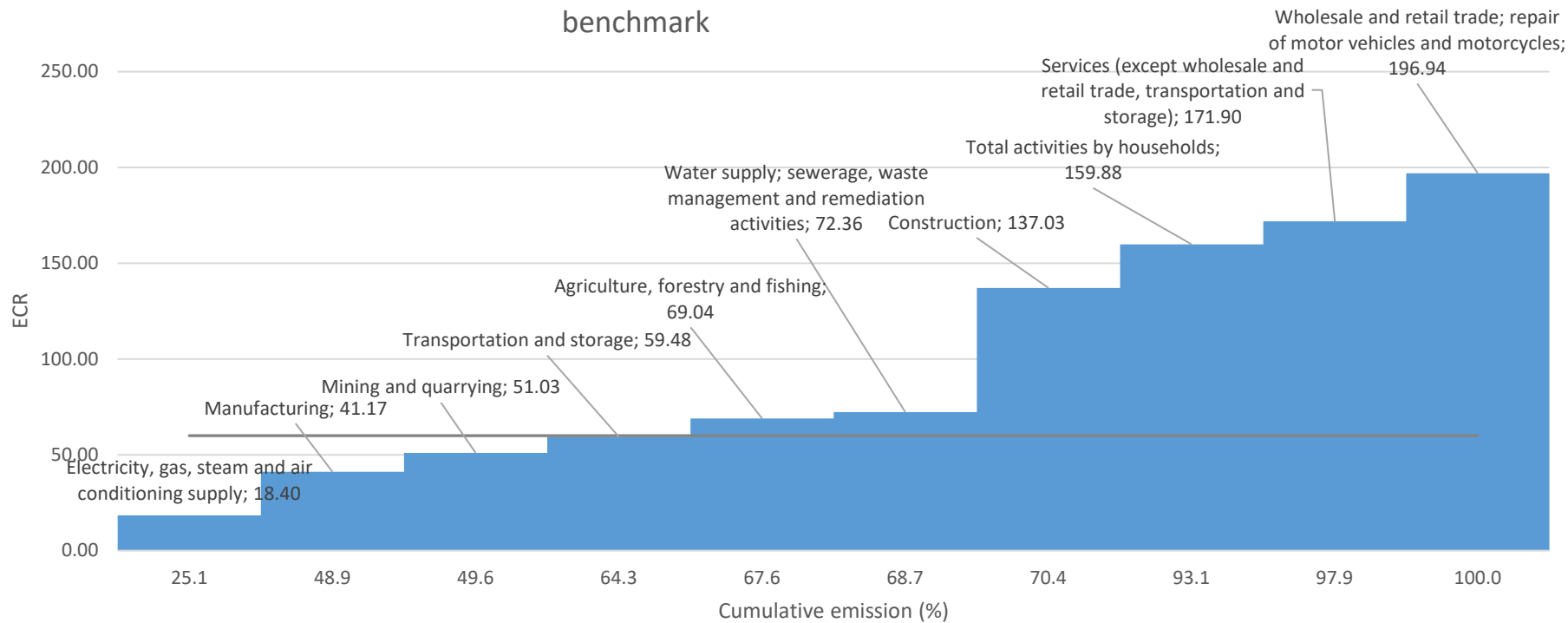
Eurostat progress: Preliminary estimations (2/3)

AECR (EUR/ton CO₂) by NACE economic activities and country

NACE activities	European Union - 27 countries (from 2020)
Agriculture, forestry and fishing	69
Mining and quarrying	51
Manufacturing	41
Electricity, gas, steam and air conditioning supply	18
Water supply; sewerage, waste management and remediation activities	72
Construction	137
Wholesale and retail trade; repair of motor vehicles and motorcycles	197
Transportation and storage	59
Services (except wholesale and retail trade, transportation and storage)	172
Total - all NACE activities	53
Total activities by households	160
TOTAL NACE+HH	78

Eurostat progress: Preliminary estimations (3/3)

AECR and % CO2 emissions they affect (cumulative) EU-27 – Straight line OECD 60 EUR/ton benchmark



GEO/NACE_R2	%AEA emissions - European Union - 27 countries (from 2020)	ECR for that % emissions - European Union - 27 countries (from 2020)
Electricity, gas, steam and air conditioning supply	25.12	18.40
Manufacturing	23.73	41.17
Mining and quarrying	0.76	51.03
Transportation and storage	14.71	59.48
Agriculture, forestry and fishing	3.26	69.04
Water supply; sewerage, waste management and remediation activities	1.16	72.36
Construction	1.67	137.03
Total activities by households	22.70	159.88
Services (except wholesale and retail trade, transportation and storage)	4.82	171.90
Wholesale and retail trade; repair of motor vehicles and motorcycles	2.07	196.94

Comparison with UNEP methodology

- Generally, both methodologies are compatible to some extent, although guiding principles, user needs and countries interests might lead to some differences.
- Setting out clearly similarities and differences is not fully possible at this stage. As of the moment of writing:
 - Similarities: Tax abatement*; similar approach to direct transfers; catalogue of measures.
 - Differences: UNEP is focused on fossil fuel subsidies as such, Eurostat introducing also pricing of CO₂ emissions through AECR; NACE breakdown
 - Not confirmed yet: To what extent taxes on production have to be considered for AECR; Electricity; biofuels; non-energy use of fossil fuels, ETS
- Doubts: The case of induced transfers.
- Need of exploiting synergies between data collections!?

*Tax abatement on discussion, in any case as voluntary as in UNEP

To know more

- Eurostat website for methodology material, ESST handbook and other environmental accounts: <https://ec.europa.eu/eurostat/web/environment/methodology>
- PEDS main document for discussion during MESA WG 2022 meeting: <https://circabc.europa.eu/ui/group/922b4700-1c83-4099-b550-763badab3ec0/library/b1e77b94-9db8-4e7c-a0b3-8f68db32416e/details>
- PEDS background document to complement MESA WG 2022 discussion: <https://circabc.europa.eu/ui/group/922b4700-1c83-4099-b550-763badab3ec0/library/0228a317-06b2-4c3e-8bac-c079438d97c5/details>
- Adjusted questionnaire, as presented during MESA WG 2022: <https://circabc.europa.eu/ui/group/922b4700-1c83-4099-b550-763badab3ec0/library/fdedd0ea-a8e1-4128-8679-46d49f3f251d/details>

Thank you

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