

# **Environmentally Harmful Subsidies (EHS): Identification and Assessment**

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**EXECUTIVE SUMMARY** 

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#### **EXECUTIVE SUMMARY**

The EU has a long-standing commitment to removing environmentally harmful subsidies (EHS), which it has reiterated in several key strategies. Removing EHS is a particularly contentious issue and complex process, and while progress has been slow, recent environmental and economic challenges are providing renewed motivation to address the issue

The current fiscal crisis presents an opportunity for governments to revise their budgets and increase revenues. The removal of EHS would create revenues, for many would cut CO<sub>2</sub> emissions and generally reduce other environmental impacts, and create a level playing field in the markets. In many cases it would also create opportunities to increase social equity.

On 16 September 2009, IEEP organised a workshop on the identification and assessment of EHS, which was attended by many high-level experts and policy makers. The workshop revealed that there is evidence of a renewed interest in EHS reform in Europe, prompted by the need to secure increased revenues to tackle the fiscal crisis, the desire for greater transparency in public finances, and recognition that subsidy reform could help achieve key objectives such as addressing climate change and encouraging the development of a resource efficient economy. Some countries, for example France, are already identifying EHS to remove or reform.

At the EU level, the upcoming reviews of the Sustainable Development Strategy and the Lisbon Strategy offer opportunities for EHS reform to be set within the EC's policy priorities.

There are also prospects for action at the international level. At the G20 meeting in September, Heads of State approved a US-backed proposal to phase out fossil fuel subsidies in the mid-term, calling on their energy and finance ministers to report on strategies and timelines for implementing this 'critical commitment' by 2010.

In this context, it is crucial that policy makers have improved access to tools to identify and assess EHS. This project led by IEEP together with Ecologic, IVM and external expert Claudia Dias Soares for the European Commission's DG Environment is an initiative with this purpose in mind.

## The aims of the project

The European Commission is keen to continue to work on mainstreaming the review of EHS into the sectoral policies. The European Commission has been called upon by the EU Sustainable Development Strategy (2006) to draft a roadmap for the reform of EHS, sector by sector, with a view to gradually eliminating them. A roadmap by sector enabling governments to assess their subsidies and to consider to their reform could:

• Provide a framework for the identification of environmentally harmful subsidies:

- Provide a tool to assess whether the subsidy removal will benefit the environment;
- Help to understand the wider implications of subsidy removal including the economic and social dimensions;
- Contain simple guidance on the use of indicators, referring to the levels of subsidisation of an industry and its environmental and social cost, relevant to future measurements and useful in setting baselines for 'reduction rounds' by target dates.

This study is a contribution to the Commission's efforts in this area. It is mostly based on the scientific work carried out by the OECD over the past decade, with the specific aim of applying it in a European context. The application in this project of the tools developed by the OECD is aimed to:

- Test in practice the methodology proposed by the OECD for identification of EHS and their impacts and the impacts of their removal. This implies using the 'quick scan' and 'checklist' OECD tools as well as the principle of 'integrated assessment'.
- Identify shortcomings of the OECD method and possible improvements / adaptations needed to make it operational for practical use in a context of policy making.
- Identify good practice for use by policy makers both at EU and Member State level.
- Provide baseline information and indicators that could be useful for potential future measurements, benchmarking or efficiency target setting.

This is the first study carried out so far for the European Commission to be focused in particular on these aspects.

#### The results

### Case studies

The OECD tools (the quick scan; the checklist; the integrated assessment framework) for identifying and assessing EHS were tested in the context of six case studies. These were: in the **energy sector**: VAT reduction for domestic energy consumption in the UK; fuel tax exemptions for biofuels in Germany; nuclear energy decommissioning subsidies in Germany; in the **transport sector**: fuel taxes: diesel vs petrol in Austria, the Netherlands and the UK; company car taxation in the Netherlands; and in the **water sector**, irrigation water subsidies in Spain.

Case studies revealed the significant amounts of public money provided to subsidies with clear environmental damage and that in most cases do not reach their intended recipients and do not fulfil efficiently their original objectives. For each case study, the study developed an estimate of the size of the environmental impact, an estimate of the size of the subsidy (both indicators of subsidy levels and marginal social cost), as well as a detailed assessment of their social and economic impacts and options for policy reform.

# Critical appraisal of the OECD tools

The appraisal was performed from the perspective of the use of the tools by policy makers and in particular by those less well-versed to subsidy analysis, but yet with a legitimate interest in EHS reform. Since an aim of the tools is to provide a clear and accessible means to identify and assess EHS, the methodological recommendations for their improvement and guidelines were developed to ensure their accessibility to policy makers who are confronted with EHS reform for the first time.

It was found that the tools overlap in several ways, and complement each other in others. Therefore, it seemed desirable that elements of all three tools should be integrated into one single methodology.

The OECD guidance accompanying the tools is to be considered clear and exhaustive. However, with respect to their practical application, it was considered beneficial to streamline the guidance and to develop more guidance on their use.

The tools were considered to be applicable as quick scans and, as such, are not particularly hindered by data availability, nor are they applicable only in the context of certain types of analysis. Each tool allows analyses at different levels, depending on data availability and the resources available. Most of the analysis could be performed qualitatively providing insights on the subsidy.

There are a few main elements which were found to be implicit in the tools but not clearly defined. All three tools require more guidance on how to specify a counterfactual scenario (i.e. what would the world look like without the subsidy). It was considered therefore necessary to develop guidance on how to set the baseline, or to at least require a level of transparency in undertaking this step.

Another element that is implicit in the use of the three tools is the calculation of the size of the subsidy. A step-by-step 'recipe book' for calculating the size of the EHS was developed as part of this study and will accompany the guidelines for the use of the tools developed in the study.

The application of the OECD tools to some case studies (e.g. biofuels, fuel taxes), highlighted that trade impacts need be taken into account to provide a more comprehensive assessment of the impact of a subsidy and the impacts of possible options for reform. While it would be difficult to do so without the use of econometric models, it was considered useful to at least complete the assessment by describing them, while providing examples of potential impacts.

Also, the tools do not explicitly consider some crucial elements of subsidy impacts, such as their impacts on competitiveness. In particular, due to their size and limited resources, SMEs can be affected by the existence of a subsidy in the market in which they operate, positively or negatively, and can be particularly affected by their removal. The analysis should assess whether SMEs are disproportionately affected by the existence of a subsidy and whether the subsidy removal/reform requires specific compensatory measures for these businesses.

While the tools were considered effective at showing the main impacts of a subsidy, they should not substitute a more detailed analysis. Rather they were considered useful to help prioritising the analysis and thus the reform of the most harmful subsidies. They are also useful to ensure a check on the political feasibility of the reform process and to prepare the process to ensure that stakeholders are engaged appropriately early in the process.

# Integrating the recommendations into the tools – the EHS reform tool

One of the main findings of the critical assessment was that the tools could be streamlined into one single method to maximise individual strengths and eliminate duplication. Drawing on the results of the application of the OECD tools to the case studies, we have outlined a methodology that builds on the strengths of the OECD tools and tries to address the weaknesses identified. The tool is developed into four phases:

- 1. **Screening of subsidies**: This screening phase serves at identifying and prioritising those subsidies that have a clear potential environmental harm and are politically more viable for reform.
- 2. **Application of the checklist**: The objective of this step is to identify the subsidy and to assess whether the subsidy reform/removal is likely to bring significant environmental benefits. If so, the assessment should be carried forward and trade offs with social and economic objectives explored in the next phase.
- 3. **Broader assessment of subsidies:** this phase builds on the application of the integrated assessment framework tool. The potentially harmful subsidies will be analysed in more detail with regard to their impacts on the environment and to determine whether they actually achieve the targets for which they were introduced.
- 4. **Analysis of reform options:** here, concrete policy reform options for EHS are developed. They should help to prepare the political decision making for the reform/ removal of EHS. The analytical steps build on the integrated assessment framework tool.

The EHS reform tool is a *checklist to prioritise environmentally harmful subsidy reform*. Its main target audience are policy makers and in particular those less well-versed to subsidy analysis. The guidelines here drafted to accompany the integrated tool were focused on enhancing the accessibility of the OECD tools and make them operational to a broad range of policy makers.

The EHS reform tool is meant to be used as a quick and easy-to-use tool (although it can also be used as a reference for more complex evaluations). It helps with the identification of subsidy, the assessment of their harmfulness, the identification of the likely environmental benefits of reform, as well as allowing one to highlight the social and economic impacts, therefore highlighting the co-benefits of reform, as well as guiding the policy maker through a list of elements to consider to put in place a successful reform process.

2. Checklist for assessing the Recipe book on 1. Screening 3.Broader assessment 4. Analysis of reform environmental benefits of size of of EHS removal options subsidy 1) Is there a subsidy? Do the size and 1) What are the subsidy 1) What are the possible conditionality of the objectives? reform options? subsidy lead to higher Subsidy 2) Does the subsidy lead to a volumes? removal is significant environmental not likely NO impact? to have 2) Are they 2) What are the cost and <mark>YE</mark>S Policy filter limits met? significant benefits of each option? environmental damage 3) What is the sectoral environme policy context? ntal benefits 3) What are the potential 3) Cost effectiveness econ and 4) What is the economic and 3) More benign alternatives social relevance of the available or emerging subsidy? 4) Social, economic What the are and other impacts facilitating factors for 5) Are there insurmountable success? obstacles to reform? 5) Long term Subsidy removal likely to effectiveness 6) Are data available? benefit the environment List of potentially Insights on validity of Outline alternative environmentally harmful subsidy rationale policies subsidies for assessment Outline of trade offs Analysis of impacts of Insights on political between environmental, alternative policies feasibility of subsidy social and economic List of compensatory impacts of subsidy measures

Figure 1: The EHS reform tool

This tool streamlines the essential elements needed to prepare an informed subsidy reform process, thus enabling the process to be more organised, focused and cost-effective.

## Recipe book for calculating the size of subsidies

The impacts of a subsidy on the amounts and composition of production and consumption and, therefore, on the environment depend on its relative size (i.e. its proportion of the total costs or price of an activity or commodity). Furthermore, the absolute amounts involved in a subsidy scheme represent public money that could be used for other purposes if the subsidy would not exist.

In order to provide simple guidance on how to calculate the size of subsidies, a user guide, or 'recipe book', to the main approaches to subsidy measurement was developed. The Recipe Book provides basic operational guidelines to quantify different types of subsidy, using five OECD subsidy quantification methodologies. It also suggests a methodology to calculate the marginal external cost of subsidies (i.e. to express the subsidy's environmental impact in monetary terms).

It provides step-by-step guidance on the use of these calculation methodologies. These should be considered 'starter recipes' since additional methodological development may be required based on aspects unique to each case.

#### Communication tool

Ultimately, the decision on whether to reform subsidies is often taken by non-specialists and motivated by heightened awareness and concern on the part of the media and general public. For this reason, it is critical to find a way to present the results of the evaluations undertaken in this project in an accessible, impactful and concise way.

This is the rationale behind the communication tools developed in this study intended to offer an accessible means of describing key aspects of subsidies, including technical issues, in a highly abbreviated way suitable for tabular summaries and use in schematic figures. They include a 'summary assessment table', which builds on the categories covered in the integrated tool and incorporate the most important features that emerged from the assessment process. This assessment table can be compiled for a subsidy to illustrate its main characteristics.

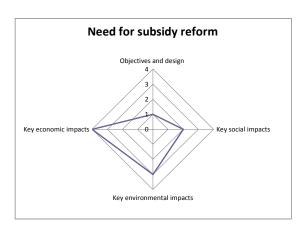
Finally, to communicate assessment results in a brief and colourful manner, a 'subsidy identity card' was created. It illustrates the impacts of a subsidy and the reform scenarios through the use of short text, icons and colours and a spider diagram, which records the objectives and design of a subsidy, impacts of the subsidy on the social, economic and environmental dimensions to demonstrate the need for subsidy reform.

Figure 2: The Subsidy Identity Card – Spider Diagram

Spider diagram

Overall scores by key area

	Need for
	subsidy reform
Objectives and design	1
Key social impacts	2
Key environmental impacts	3
Key economic impacts	4



## The workshop

The initial results of the study were presented in a workshop with representatives from a variety of Member States, Commission DGs, EHS experts, academic and NGOs representatives. They were invited to comment and provide feedback on the initial results of the study, where it clearly emerged that there is a new interest in EHS reform.

At the workshop, there was agreement on the need for a method that is accessible to policy makers and allows them to prioritise moves towards EHS reform. In this context, the efforts made to assess and improve the operability of the OECD tools (quick scan, checklist and IA framework) were welcomed.

The 'quick scan' approach chosen was considered an essential step to improve the accessibility of the issue of EHS to policy makers and facilitate EHS reform. It was considered however that it might still be necessary to employ econometric tools or cost-benefit analyses once the quick scan had allowed to 'filter' subsidies and highlighted important potential impacts, as the complexity of a subsidy's impacts can only be unveiled with the use of general equilibrium models.

The Workshop concluded that there is a need to ensure buy-in for EHS reform from various governmental departments and from the cabinet offices. However these are all likely to be open to the need to reform in the current economic and financial context.

## Windows of opportunity

# Opportunities to remove EHS and tackle the 'debt crisis'

The recent recovery plans (and the exit strategies to be developed by Governments in the coming months) offer an unprecedented opportunity for fundamentally restructuring the economy on a more sustainable basis and stimulating appropriate investment that would facilitate the transition to a low carbon economy.

Unfortunately, the short-term, rather haphazard context within which recovery plans have been proposed have not allowed for a fundamental re-think of current public spending patterns and how these may be reformed to reduce the burden on public budgets. It appears that, so far, the focus of the economic recovery plans has been on ensuring timely, new (or repackaged existing) spending, rather than reforming or removing existing subsidies. This was a missed opportunity.

In the coming months, countries need to plan the phase out of temporary measures, finance Ministries are planning exit strategies, while in the next few years, Member States will need to cut spending and refill their national accounts, strained by the debt crisis. Hence, there will be growing pressure to reduce spending in all areas. In this context, environmental departments could prepare a list of EHS that need reform or removal to provide their contribution to solving the crisis. The guidelines developed as part of this study offer a practical means to enable policy makers to draw up a priority list and are already being tested by the French Ministry for the Environment.

# Opportunities for including EHS reform among policy priorities

The Commission is currently preparing for the next phase of the Lisbon Strategy and a strategic approach to the future strategy is expected to be agreed by EU leaders at the spring Summit in 2010.

The recent conclusions adopted by Environment Ministers, 'Toward an eco-efficient economy', invited the Commission to 'review, as a matter of urgency, sector by sector, of subsidies that have considerable negative effects on the environment and are incompatible with sustainable development, with a view to gradually eliminating them, in line with the EU Sustainable Development Strategy (2006) and the recent G20 call in that regard'.

Future opportunities to raise the reform of EHS as a policy priority in the EU include the discussions on the post-2010 Lisbon Strategy for growth and jobs and the EU Sustainable Development Strategy, in particular:

- A revision of the Integrated Guidelines under the Lisbon Strategy and review of the Lisbon Strategy are expected to be published by the Commission by the end of 2009 or early 2010. The European Council will adopt Conclusions on the Commission's review in March 2010 and more detailed Conclusions on operational guidelines will be adopted in June 2010.
- Review of the renewed EU Sustainable Development Strategy by the European Council in December 2009 based on Commission's second implementation report published in July.

Thus, the reform of environmental harmful subsidies will remain a challenge for the foreseeable future, both due to the extent and complexity of the subsidy landscape, and also because it is politically easier to set new subsidies than to reform existing ones. The EHS reform tool *to prioritise environmentally harmful subsidy reform*, the recipe book for calculating subsidies and the subsidy identity card aim to help support those committed to the reform of subsidies for economic, environmental and good governance benefits.