



TRADE AND AGRICULTURE DIRECTORATE
ENVIRONMENT DIRECTORATE

Cancels & replaces the same document of 09 November 2009

Joint Working Party on Trade and Environment

**FACILITATING TRADE IN CLIMATE-CHANGE-RELATED SERVICES:
A SCOPING PAPER**

3-4 December 2009

Purpose and action required: This draft scoping paper describes a proposal for a study that would: explain the role of services trade in helping to mitigate emissions of GHGs; develop a better understanding of barriers to trade in these services; and highlight the benefits and possible pathways to reform. It is submitted for discussion and guidance.

Timing: This paper is to be discussed at the 3-4 December 2009 meeting of the JWPTE.

Link to programme of work and resource implications: This study was foreseen in the 2009-10 PWB under output area 3.1.3.2.1, "Trade and Environment". It would be funded by existing Part I resources, augmented by voluntary contributions.

Co-operation and context: Besides the Environment Directorate, this work would be undertaken in consultation with the International Energy Agency.

This version deletes three paragraphs (8-10) from the previous version and replaces them with two new paragraphs (8 and 9).

Contact: Ronald Steenblik, tel: +(33-1) 45.24.95.29; email: ronald.steenblik@oecd.org and Ysé Serret, tel: +(33-1) 45.24.13.83; email: yse.serret@oecd.org

JT03275453

FACILITING TRADE IN CLIMATE-CHANGE-RELATED SERVICES: A SCOPING PAPER

1. This scoping paper describes the work to be undertaken under 3.1.3.2, “Trade and Environment”, of the Trade Committee’s Programme of Work and Budget for 2009-10. It will build upon previous work by the OECD’s Joint Working Party on Trade and the Environment (JWPTE) on liberalizing trade in environmental goods and services, and other services work in the Trade Directorate.

2. The main objectives of this proposed study are threefold: to explain the role of services trade in helping to mitigate emissions of GHGs; to develop a better understanding of barriers to trade in these services; and to highlight the benefits and possible pathways to reform.

Background

3. In its first study on trade in environmental goods and services, the JWPTE noted the close relationship between the two trades, likening the former to hardware and the latter to software: both are needed to obtain an optimal solution to an environmental problem (OECD, 2001). Subsequent case-study-based empirical research substantiated the synergies between these two areas (Steenblik et al., 2005). Examples include companies that provide pollution-control services for steel and chemical industries located in concentrated industrial parks: it is more efficient for such heavy industries to rely on service providers with specialized knowledge of pollution control technologies and techniques than to develop that expertise themselves. Typically, over time, however, this knowledge becomes diffused in the importing country as the service provider identifies and works with local partners.

4. More recent research, based on interviews with stakeholders involved with the trade in environmental goods and services, has shown that among the barriers to trade in the sector are a number that affect related services (Fliess and Kim, 2007). Surveys targeted at industries more closely related to GHG mitigation suggest that barriers to trade in key services have often hampered trade in related technologies as well (Steenblik and Kim, 2009; Steenblik et al., 2009).

5. Several of the services used for GHG mitigation are included in the category of “environmental services” singled out for liberalization in paragraph 31(iii) of the Doha Declaration, which calls for “the reduction or, as appropriate, elimination of tariff and non-tariff barriers to environmental goods and services” with a view to “enhancing the mutual supportiveness of trade and environment”. Although the WTO Secretariat has provided an illustrative list of environmental services, drawn from its services sectoral list (W/120), WTO Members are not bound to use that classification, and several have proposed categories of services that vary slightly from the WTO list (Box 1). Of the services that have been proposed to date as “environmental”, those most relevant to GHG mitigation are likely to include those often classified as “other”: cleaning services for exhaust gases, nature and landscape protection services (e.g., including carbon sequestration in soil or vegetation), and other environmental services not elsewhere classified. However, some of the other services could be important for particular projects. For example, “(a) sewage services” could involve the capture of sewage gas, which has a high concentration of methane (a potent GHG), for use as an energy source. Similarly, in the performance of a refuse-disposal service, a company might also include the operation of equipment to harvest land-fill gas.

Box 1. Definitions of environmental services

In the WTO services sectoral list (W/120), which is based on the Provisional United Nations Central Product Classification (Provisional CPC), the environmental services sector comprises: (a) sewage services; (b) refuse-disposal services; (c) sanitation and similar services; and (d) other (cleaning services for exhaust gases, noise abatement services, nature and landscape protection services, and other environmental services not elsewhere classified).⁵ Thus, the classification reflects a traditional view of environmental services as largely public infrastructure services supplied to the general community, and focuses mainly on waste management and pollution control.

In the 1990s, the OECD and Eurostat developed for analytical purposes a more comprehensive classification of the environmental industry, including both goods and services. This classification aims to be as complete and flexible as possible to classify the industry as it is at present, allowing for current structural changes such as the development of new types of environmental services. It is divided into three broad categories according to the kind of economic activity undertaken: (a) pollution management group; (b) cleaner technologies and products group; and (c) resources management group (see OECD/Eurostat 1999 for details).

The WTO Committee on Specific Commitments has also been exploring ways to modernise the existing GATS classification of environmental services. Several Members have submitted proposals suggesting alternative definitions of environmental services that could be used when countries submit their requests and offers. The EC has proposed the creation of seven sub-sectors based on the environmental media (air, water, soil, waste, noise and so forth), closely resembling the first category of the OECD-Eurostat classification (pollution management group).

Source: Adapted from Geloso Grosso (2005), p. 11

6. Other services that are not deemed “environmental”, and are not uniquely provided to environmental projects, are nonetheless frequently drawn upon in connection with greenhouse-gas mitigation. These may include (examples of applications shown in brackets):

- Construction services (used for the erection of wind turbines)
- Electricity distribution services (often involved with distributed power generation using low-carbon technologies);
- Gas distribution services through mains (often involved with distributed collection and treatment of small-scale sources of coal-mine or landfill recovery of methane)
- Research and development services (used to develop or adapt technologies for greenhouse-gas mitigation)
- Other professional, scientific and technical services (architectural services for designing energy-efficient building; engineering services for designing low-carbon power-generation facilities)
- Telecommunications services; information retrieval and supply services (may be used in connection with “smart grids” — electricity grids that deliver electricity from suppliers to consumers using digital technology to control appliances at consumer's homes to save energy, reduce cost and increase reliability and transparency)
- Installation services, other than construction (used in the installation of fabricated metal products, machinery, electrical apparatus, etc.)
- Maintenance and repair services (used for the maintenance and repair of fabricated metal products, machinery and equipment)

7. Most trade in environmental services takes place through commercial presence (Mode 3), with the accompanying presence of natural persons (Mode 4) (Geloso Grosso, 2007). The same is probably true of many other climate-related services. Due to technological developments, cross-border supply (Mode 1) — e.g., engineering-design services, supplied, by an engineer in one country by post or electronic mail to a customer in another country — is of increasing importance in this sector. These services, particularly those relating to public utilities and infrastructure, are affected by a variety of restrictions (Geloso Grosso, 2005 and 2007; Zarrilli, 2003).

8. The average level of restrictiveness for computer services in OECD countries is believed to be relatively low, and no OECD country has restrictions on foreign equity. The level of restrictiveness is believed to be low also for construction services. By contrast, the level of restrictiveness in respect of trade in telecommunication services — which are likely to be in increasing demand in connection with the operation of “smart electricity grids” — varies considerably across OECD countries (OECD, 2009). Foreign-equity limits and other market-entry restrictions distinguish the most restrictive countries from the more liberal ones. Lack of adequate regulation when there is a dominant firm in the market still exists in some countries; and discriminatory measures are important in a few of the most restrictive countries.

9. Evidence of restrictive measures can also be found in engineering services. For example, Dihel and Shepherd (2007) recently looked at barriers to trade in such services in 10 non-OECD countries. These barriers included: establishment requirements (Mode 1); restrictions on consumers purchasing business services abroad (Mode 2); licensing restrictions, limits on foreign-equity, and restrictions relating to foreign partnerships and joint ventures, and on investment and ownership by foreign professionals (Mode 3); and limits on the duration of stay of foreign professionals, on the number of work permits issued, and restrictions relating to the licensing and accreditation of foreign professionals (Mode 4). Their analysis suggested that the overall level of restrictiveness was relatively high for Malaysia, China, Indonesia, Brazil and Thailand, and relatively low for Singapore, Argentina and Russia. Establishment requirements were found to be commonplace, and restrictions on the movement of people were important in most of the countries examined, but limitations on foreign ownership and other market-entry conditions varied considerably from one country to the next.

10. WTO members have identified individually or in groups a number of objectives in the market-access negotiations on environmental services (WTO, 2005, p. 17):

- “high levels of market access across sub-sectors¹], as far as possible;
- Mode 1 commitments for as many sub-sectors as possible, in particular advisory services;
- full commitments for Mode 2 (consumers or firms making use of a service in another country);
- ambitious commitments for Mode 3, removing barriers on commercial establishment; if exclusive rights are awarded, foreign suppliers should be able to participate in the tender and operation of the service;
- Mode 4 commitments to ensure mobility of service suppliers, such as remediation specialists, conservationists and geomatic professionals;

¹ In CPC Prov. these are: Sewage services (9401); Refuse disposal services (9402); Sanitation and similar services (9403); Cleaning services of exhaust gases (9404); Noise abatement services (9405); Nature and landscape protection services (9406); Other environmental protection services n.e.c. (9409)

- commitments across all sub-sectors listed in CPC Prov., i.e. 9401 to 9409 (environmental services), taking into account the interplay with related services, such as construction, engineering, technical testing, and analysis and management-consulting services.”

11. WTO Members (individually or in groups) have also asked for “meaningful commitments” across all modes of supply of energy services (ownership of natural resources is outside the scope of the negotiations) and, in the case of construction and related engineering services, for the reduction or the elimination of foreign equity limitations, joint venture and joint operation requirements, discriminatory licensing or registration procedures, restrictions on the types of projects that can be undertaken by foreign service suppliers, and restrictions on the movement of natural persons. Given these ambitions, and the need for the world to transition quickly to a low-carbon form of economic growth, a study of the degree to which restrictions are hindering trade in climate-related services would be timely.

Methodology and data sources

12. For basic data on the value of trade in the studied services, the Secretariat will attempt to obtain data from several sources: the OECD provides some information on trade in services according to the Extended Balance of Payments Services Classification (EBOPS). Some information may also be gleaned from statistics on foreign direct investment (FDI) and the Foreign affiliate trade statistics (FATS) database. However, these data are very limited, and do not distinguish services used for greenhouse gas mitigation or adaptation from other purposes.

13. As with the previous studies on barriers to trade in climate-related technologies, the study will also rely on structured surveys and interviews with companies engaged in supplying internationally traded services to obtain an impression of perceived barriers to trade in those services. These surveys and questionnaires will draw on existing lists of measures affecting trade in services. The country coverage of the study will include both OECD and non-OECD countries. It is proposed that the services sectors examined will include, at a minimum, cleaning services for exhaust gases, construction services, engineering services, and maintenance and repair services.

Suggested outline

14. The outline suggested is the following. The first part of the paper will introduce the issues at stake, provide a general discussion of which services are used for greenhouse-gas mitigation (including the provision of low-carbon energy), and explain the methodology. The second part will contain separate chapters or sections on the services to be examined. Each chapter or section will describe the examined services, providing information on the significance of current trade in the service (where known), and discuss the survey results. The third part will conclude and provide policy implications of the analysis.

Audience, communication strategy and co-operation

15. The paper will support discussions at the international level to liberalize trade in environmental goods and services, particularly services. It will also inform the development of the OECD’s Green Growth Strategy. As such, it will be addressed to policymakers and trade negotiators from OECD and non-OECD countries. The results of the study will be disseminated to relevant stakeholders and to a broader audience through trade-and-environment and climate-change networks and outreach events.

16. The study can also be seen as an independent piece aimed at policymakers and researchers interested in understanding the role of services in climate mitigation, and the barriers to trade in those services. It would also complement and build on work undertaken at the OECD on the Services Trade Restrictiveness Index.

Timing and resource implications

17. A first draft of the report could be prepared for the JWPTE's meeting in June 2010. In addition to an administrator's time needed to describe how various internationally traded services are used in climate mitigation, the work of specialized consultants (i.a., for undertaking the surveys) would need to be funded by a voluntary contribution of circa € 15 000.

REFERENCES

- Fliess, B. and J. Kim (2007), “Business Perceptions of Non-Tariff Barriers (NTBs) Facing Trade in Selected Environmental Goods and Associated Services—Part I: Survey Results”, *OECD Trade and Environment Working Paper* No. 2007-02. Paris; OECD.
- Geloso Grosso, M. (2005), “Managing Request-Offer Negotiations under the GATS: The Case of Environmental Services”, *OECD Trade Policy Working Papers*, No. 11, OECD Publishing. doi:10.1787/276102368237
- Geloso Grosso, M. (2007), *Regulatory Principles for Environmental Services and the General Agreement on Trade in Services*, International Centre for Trade and Sustainable Development, Geneva.
- Colin Kirkpatrick, Colin (2006), *Trade in Environmental Services: Assessing the Implications for Developing Countries in the GATS*, International Centre for Trade and Sustainable Development, Geneva.
- Dihel, Nora and Ben Shepherd (2007), "Modal Estimates of Services Barriers", *OECD Trade Policy Working Papers*, No. 51, OECD Publications, Paris.
- OECD (2001), *Environmental Goods and Services: The Benefits of Further Global Trade Liberalisation*, OECD Publications, Paris.
- OECD (2009), *OECD Communications Outlook 2009*, OECD Publications, Paris.
- OECD and Eurostat (1999), *The Environmental Goods and Services Industry: Manual on Data Collection and Analysis*, OECD, Paris.
- Steenblik, R., D. Drouet & G. Stubbs (2005), “Synergies Between Trade in Environmental Services and Trade in Environmental Goods”, *OECD Trade and Environment Working Paper* No. 2005-01, OECD, Paris.
- Steenblik, R and J.A. Kim (2009), “Facilitating Trade in Selected Climate Change Mitigation Technologies in the Energy Supply, Buildings, and Industry Sectors”, *OECD Trade and Environment Working Paper* No. 2009-02, OECD, Paris.
- WTO: World Trade Organization (2005), “Special Session of the Council for Trade in Services: Report by the Chairman to the Trade Negotiations Committee”, Document TN/S/23, 28 November 2005, Geneva
- Zarrilli, Simonetta (2003), “Managing ‘Request-Offer’ Negotiations under the GATS: The Case of Energy Services”, Paper prepared for the Ad Hoc Expert Meeting on Energy Services (Geneva, 6 June 2003), United Nations Conference on Trade and Development, Geneva.