



**CONCERTED ACTION
ENERGY SERVICES
DIRECTIVE**



New and existing business models for energy services

Executive Summary

WGR 4.1

**Core Theme 4
Working Group Report 1**

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This report summarises the market for energy services in different Member States (MS), focussing on issues such as business models, supporting measures, barriers and challenges. It also presents some examples of energy services in action. The report was compiled from the answers to a questionnaire received from representatives of 26 MS¹, combined with the presentations and discussions in the parallel session of Working Group (WG) 4.1 during the 1st Plenary Meeting in Warsaw in October 2011.

Business models

There are variations in the business models for energy services offered to industry and for large buildings, with a general tendency towards energy performance contracting (EPC) and supply contracting (SC).

A fundamental difference between the major business models for energy services is the presence of an energy saving guarantee. This guarantee is present in EPC, while in SC guarantees are limited to specific aspects of the service (level of service, quality, costs, etc.).

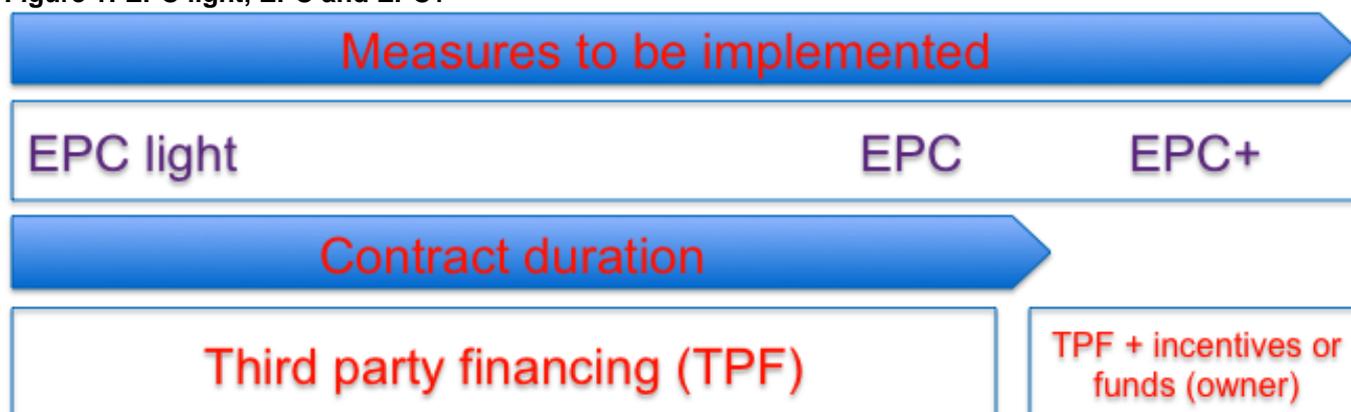
Business models for SC discussed included: Contract Energy Management², Business Improvement Service³, and Integrated Energy Contracting⁴. There are only a few examples of Integrated Energy Contracting, but it seems to be very interesting as it can be used on small energy saving projects; this is due to its simpler contract where the energy saving guarantee is replaced by quality assurance measures.

The following EPC business models were presented and discussed during the parallel sessions: EPC+, 'EPC light', green EPC, EPC in primary energy and EPC with stepping contract⁵.

'EPC light' is aimed at facilities where only minor measures are to be implemented and where savings can be obtained by optimising management, operation and maintenance. It is similar to the North American Recommissioning⁶ service.

EPC+ on the contrary is applied when deeper renovations are needed and the payback time is longer than the contract. Measures with longer payback periods are co-financed by the owner, by public funds or by incentives, meaning that all the measures can be implemented, producing higher savings from the outset.

Figure 1: EPC light, EPC and EPC+



Some of these business models can be considered variations of EPC and SC, different names for the same type of business model or just different ways of presenting them. In the past, energy services with third party financing was defined as "a form of 'creative financing'"⁷ whereas now the Business Improvement Service is presented as a better way to use part of a current budget, actually lost due to low efficiency, to obtain budget savings in the future.

EPC appears very flexible but it is not widely used across the EU. There are still problems in many MS around public tendering for EPC, mainly due to its complexity and to various problems with legislative frameworks. There are some experiences of EPC in public private partnerships (PPP) and some MS representatives consider this an interesting way to implement EPC.

¹ AT, BE, BG, CY, CZ, DE, EE, ES, EL, FI, FR, HR, HU, IE, IT, LT, LU, LV, MT, NL, NO, PL, PT, RO, SE, SK

² Information from: Energy Service Companies Market in Europe - Status Report 2010, JRC, P. Bertoldi et al.

³ Presentation of D. Malley in WG 4.1 first parallel session, CA ESD II 25-11-11 Warsaw (www.esd-ca.eu)

⁴ Integrated Energy Contracting is discussed by IEA DSM Task XVI and applied by Grazer EnergieAgentur

⁵ More information on advanced EPC and IEC can be found in the presentations of Susanne Berger and Vladimir Sochor in Warsaw on 26-11-2011 (www.esd-ca.eu) or in European Energy Service Initiative (EESI) project website (www.energy-service-initiative.net)

⁶ www.energystar.gov/ia/business/EPA_BUM_CH5_RetroComm.pdf

⁷ Definition of EPC in Energy Service Companies in Europe, status report 2005, P. Bertoldi and S. Rezessy

Supportive measures

Some MS representatives highlighted their support for the diffusion of EPC through legislative acts, model contracts and guidelines. They also indicated some challenges for fostering the development of energy services related to legislative frameworks for public tendering and taxation, guarantee funds, etc.

In the first parallel session, MS representatives presented their supporting schemes for energy services. Finland, Ireland and Spain showed in their presentations a framework of measures, not only incentives or guarantees on financing but also different kinds of support for clients, such as information provision, training, third party audit or risk assessment. In addition to the presentations, two good practice factsheets are available (see [CA ESD website](#)) illustrating some of the measures implemented in Spain and Finland.

The presentations and the discussion in the parallel session highlighted that different measures have to be considered for different stages of the energy services market. In an under-developed market, a systematic approach is needed, through simpler projects with concrete and visible results in the short term (Ireland's presentation) or through a global approach to contracts, risk assessment and guarantees (Spain's presentation). In more developed markets, there is no need for new business models; it is more important to identify gaps and barriers, whether these are legal, budget/accounting or economic/financing (as in Finland and France).

Approach to foster Energy Services (ES)

Combining the different experiences collected through the questionnaires and the discussions in the sessions it is possible to outline the main steps of an ideal approach to foster ESs:

- An independent study, involving stakeholders, on barriers and proposals;
- Modification of legislation and rules on public tendering and accounting;
- Informative campaigns for clients and training for clients and service providers;
- Guides and models for contracting;
- Market facilitators (e.g. public energy agency) to support the tendering of complex public projects;
- Subsidies to start and develop the market;
- Guarantee/revolving funds to start and sustain the third party financing;
- Third party (e.g. public energy agency) involved in energy audit and business plans;
- Instruments to increase the quality of the offer and trust on the market (e.g. official public website containing updated list of ESCOs and their references, ESCOs certification, etc.).

To support the ESs there is no single magic measure, but a mix of measures tuned to the market stage and the national legislative framework.

Moreover, some of the examples provided show interesting applications of ESs in low economy periods. For example, supporting programmes to reduce the energy expenditure of public buildings via EPC in third party financing, or taking advantage of a low activity period in the building sector to re-train workers on the integration and installation of energy efficient technologies.

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The Concerted Action for the Energy Services Directive II (CA ESD II) was launched by Intelligent Energy Europe (IEE) in May 2011 to provide a structured framework for the exchange of information between the 29 Member States during their implementation of the Energy Services Directive (ESD).

For further information please visit www.esd-ca.eu or contact the CA ESD Coordinator Lucinda Maclagan at lucinda.maclagan@agentschapnl.nl

