A number of EU Member States are already using or considering Energy Efficiency Certificate (EEC) schemes. However a recent analysis suggests that Energy Sales Targets are an alternative worth considering. These targets focus on reducing the greenhouse gas (GHG) emissions associated with the energy sales per average customer.

In order to promote efficient use of energy resources and meet European targets for GHG emissions, Energy Efficiency Certificate (EEC) schemes, such as White Certificate schemes, are being used or proposed in a growing number of countries and states, including Flanders, France, Italy and the UK. These EEC schemes impose obligations on a target group, usually energy suppliers, to achieve a certain quantity of ‘energy savings’ through improvements in efficiency. Projects are awarded certificates for the amount of energy saved and trading may occur between projects and suppliers.

The study examined the effectiveness of EEC schemes and lists several shortcomings, including:

- Their effectiveness cannot be measured, only estimated with respect to what would have happened in their absence
- ‘Abatement’ certificates can be created while emissions increase, either in projects that experience increased demand for their product or in projects not covered by the scheme
- They may support projects that would have occurred anyway, so add little value

The study suggests that these problems are caused by the indirect link between the energy suppliers’ targets and the desired outcomes of the scheme. The authors propose that ‘Non-tradable Energy Sales Targets’ (NESTs) provide a more direct alternative. Although such a scheme does not yet exist, the authors suggest it could provide energy suppliers with average per customer sales targets. These would remove the need for tradable certificates and associated price volatility, although Tradable Energy Sales Targets (TESTs) could be used, where tradable permits correspond to the GHG emissions associated with energy sales. The mechanism for financing compliance is critical. The authors propose a levy process which ensures all suppliers pay an equal per customer amount to reduce emissions. Suppliers with higher per customer GHG emissions should receive more of the levy; the cost could be recouped from customers in a fair as possible manner.

The study provides a worked example to compare these policy measures. It considers an objective of a 1 per cent reduction in emissions of 2009 levels per year for residential electricity and gas use in the face of several uncertainties. For all scenarios, the NEST and TEST achieved the desired reduction in GHG emissions, whereas the performance of an EEC scheme varied. For example, if business-as-usual energy use and GHG emissions are higher than expected, the EEC scheme could not reduce emissions to the originally intended level without continual revision of targets. NEST and TEST schemes could still meet the target, although at greater cost to the supplier, which could be passed onto the consumer.

In summary, the study demonstrates some potential advantages of NESTs and TESTs over existing EECs, including a clear, measurable link between energy suppliers’ targets and the scheme outcomes, additionality and reduced administration costs for government, with many activities associated with certificates no longer required, such as auditing and verification. One issue that may need addressing is that providers of energy efficiency services would need prior agreements with energy suppliers in order to provide greater certainty.

The Energy Sales Targets, as they are formulated by the authors, could be achieved by using more renewables or buying emission allowances instead of investing in demand side energy efficiency measures. However, this would mean that other energy efficiency objectives besides climate change mitigation, such as improving energy security and lowering household energy bills, would not be met. Within the EU, electricity sector emission problems are addressed by the Emission Trading Scheme.

1 See [http://ec.europa.eu/environment/climat/climate_action.htm](http://ec.europa.eu/environment/climat/climate_action.htm)

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