IEA-DSM
Task Definition
MARKET MECHANISMS
FOR WHITE CERTIFICATES
TRADING

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Background

• Issuing of National Decrees on mandatory targets on primary energy savings (24.4.01), including an Energy Efficiency Certification Trading (EET or WhC) scheme

• Interest of IEA-DSM gathered in Barcellona Executive Committee meeting (October 2001) and promotion of a dedicated workshop

• Workshop on Energy Efficiency Certification Trading - 17 April 2002, Milano, Italy, coorganised by IEA-DSM and CESI
Background

- Actions within IEA-DSM to promote a new task on EET - Preparatory work by L. Hull (EA Technology - UK)

- Interest of Italy to take over as Operative Agent of the task (Canberra and Paris ExCo meetings - 2003) - Set up of a draft Concept Paper

- Interest explicitly gathered from six Countries: Belgium, France, Italy, Norway, Sweden, UK (possibly Australia and Denmark)
Background

- Preliminary meeting in Milan (5/12/03):
  - aimed at gathering wider interest and consent
  - focused on discussing the goals and the organisation of the task and revising the draft Concept paper
  - open also to interested organisations and Countries willing to contribute to a more definite finalisation of the goals,
- participants (13):
  - Belgium (1)
  - Greece (1)
  - Italy (4)
  - UK (1)
  - EC (1)
  - IEA (1)
  - Norway (1)
  - Sweden (1)
  - France (1)
  - Central European University
The task: general goals

Studies on methodologies to attain:
- primary energy savings
- reduction of CO₂ emission

through market mechanisms based on:
- schemes of Energy Efficiency Certificates Trading (*White Certificates* - WhC - Trading)

and possible connections with other schemes:
- Renewable Energy Commitment scheme (*Green Certificates* Trading)
- Carbon trading scheme (*Black Certificates* Tr.)
WhC: actors

Public board: mandatory EE (=WhC) targets

Marketplace

OB = Obligation-bound actor
EI = Eligible Implementer

OB1 → OB_N → OB2
EI_1 → EI_3 → EI_2

WhC excess
Gained WhC

IEA-DSM Task on WhC Trading
WhC: a possible trading scheme

**End-user**
- Reduced fee
- Energy Service
- Tariff regulation

**ESCO**
- WhC purchase
- Transfer
- Request / Issuing

**Regulatory body**
- Acknowledged costs
- E.E. Fund
- E.E. Funding

**DSO**
- WhC
- Delivery

**E.E. Fund**

Diagram: Flowchart showing interactions between End-user, ESCO, Regulatory body, DSO, and E.E. Fund with arrows indicating flow of information or services.
Rationale

- WhC attractive: pursue EE benefits through market-based instruments
- Being applied in UK and Italy
- To be introduced in France
- Attracting in principle Norway and Sweden
- In line with a Proposal of EC (Dec 2003) for a EU Directive on EE in end-uses and services
- Complements with REC and ET schemes
- Complements with ongoing IEA-DSM tasks
Task features

- Interested Countries expressed a position (Milan / Pre-meeting) in favour of:
  - Concentrating works on WhC Trading (touching other schemes only for interactions)
  - Light task, e.g.:
    - duration: about 12-18 months
    - limited in cost sharing $\iff$ more task sharing

- Priority to operational issues rather than policy
- No particular needs for division into sub-tasks
Task features

∗ **Focus on market/trading aspects**

∗ **Use of direct exchange of experience:**
  - through open national events (workshop/seminar)
  - organised during the task
  - in the participating Countries
  - involving the national stakeholders

∗ **Deliverable made up mainly of critical syntheses of presentations and discussions during the national events**

∗ **Chance of attendance of Academia**
Objective of the study

- Deepening
- Discussing

through:
- periodical experts meetings
- open workshops

a group of items classified as:
- *Principle (Policy)* issues
- *Practical (Operational)* issues
Objective of the study

Policy issues (1)

- Specificity and effectiveness of WhC trading on EE
- Obligation-bound actors (DSO, suppliers, ESCO)
- Buyers and sellers (DSO, ESCO, other)
- Targeted sectors and EE programmes
- How to create a market (in altern. to bilateral contr.)
- Competition issues
- Possible cost-recovery mechanisms
Objective of the study

Policy issues (2)

- Interaction with other EE policy tools
- Interaction with other trading schemes (REC, ET)
- Chance of an enlarged extra-national market of WhC
Objective of the study

Operational issues

- Criteria for design and development of EE projects
- How to measure/evaluate the saving impact of a project
- Monitoring mechanisms (duration, responsibilities)
- Non-compliance regime
- Trading mechanisms (participants, transactions frequency and safety, banking)
- Rebound effects (unexpected upshots)
Objective of the study

The following points will have to be deepened for the above issues:

- relevance for the national energy policies
- national expected/forecast/already adopted approaches
- problems connected to possible/actual implementation of the issue
- already gained national experiences - case studies
Approach

- Little experience exists on WhC trading
- Task based on exchange of ongoing experiences instead of gained experiences
- Through regular events made up of:
  - one-day thematic open workshop with national stakeholders
  - a “day after” restricted meeting of designed task experts
## Approach

<table>
<thead>
<tr>
<th>Event</th>
<th>Workshop</th>
<th>Workshop subject</th>
<th>Task experts meeting subject</th>
<th>Month*</th>
</tr>
</thead>
</table>
| 1     | NO       |                 | – Kick-off.  
|       |          |                 | – Task organisation  
|       |          |                 | – Preparation of following workshop | 1  
|       |          |                 | June 04 Italy | 1  |
| 2     | YES      | Existing experiences and expectations at national level | – Discussion on the past workshop  
|       |          |                 | – Preparation of following workshop | 4  
|       |          |                 | Nov 04 UK | 4  |
| 3     | YES      | Policy/principle issues | – Discussion on the past workshop  
|       |          |                 | – Preparation of following workshop | 8  
|       |          |                 | March 05 France | 8  |
| 4     | YES      | Organisation / practical issues | – Discussion on the past workshop  
|       |          |                 | – Preparation of following workshop | 12  
|       |          |                 | June 05 Sweden | 12  |
| 5     | YES      | Interaction with other schemes/EE policies | – Closing meeting  
|       |          |                 | – Discussion on the past workshop  
|       |          |                 | – Discussions on the organisation and structure Final Synthesis Report | 16  
|       |          |                 | Oct 05 Norway | 16  |

* Assuming that the Task will officially start in Month “1”
Deliverables

The deliverables of the task will consist on:

 Critical Synthesis Reports (CS) - one for each event involving a workshop (events 2 to 5)

 Final Synthesis Report (FR) of the task summary and review of:
  - undertaken activities
  - gained experiences
### Schedule of activities

<table>
<thead>
<tr>
<th>Month</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
<th>10</th>
<th>11</th>
<th>12</th>
<th>13</th>
<th>14</th>
<th>15</th>
<th>16</th>
<th>17</th>
<th>18</th>
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</thead>
<tbody>
<tr>
<td>Event</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
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<td>14</td>
<td>15</td>
<td>16</td>
<td>17</td>
<td>18</td>
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</table>

CS = Critical Synthesis Report of the event (workshop + expert meeting)
FR = Final Synthesis Report
Operating Agent’s responsibilities

- Organise 5 task experts meetings, relying on the local assistance of the host-country expert
- Propose and discuss with IEA-DSM task experts the organisation of four national workshops
- Organise the results of each event into a Critical Synthesis Report, collecting and critically reviewing all the contributions and discussions
- Write and issue the Final Synthesis Report
- Internal and external steps for circulating the results
National Experts’ responsibilities

- Organise and host one of four national workshops; host one of five IEA-DSM experts meeting
- Attend all the organised national workshops and Task experts meetings
- Comment and discuss with the Operating Agent the content of four national workshops
- Assist OA in setting up the Critical Synthesis Report of each of the four events
- Comment on the draft Final Synthesis Report set up by the OA
Administrative

- **Duration:** 18 months
- **Min. 4 Countries; max 8 Countries**
- **Mix of:**
  - **task-sharing** (work performed by the national experts, funded by the participating Countries - see Expert Responsibilities): *3 man-months per Country* - about 60%
  - **cost-sharing** (amount of Operative Agent’s costs, shared among the participants’ Countries) - about 40%
## Cost sharing

<table>
<thead>
<tr>
<th>N. Participating Countries</th>
<th>Country Contribution (€)</th>
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<tbody>
<tr>
<td>4</td>
<td>22,500</td>
</tr>
<tr>
<td>5</td>
<td>18,000</td>
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<tr>
<td>6</td>
<td>15,000</td>
</tr>
<tr>
<td>7</td>
<td>12,857</td>
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<tr>
<td>8</td>
<td>11,250</td>
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<tr>
<td><strong>Total Budget</strong></td>
<td><strong>90,000</strong></td>
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</table>

### Costs (k€)

<table>
<thead>
<tr>
<th>Item</th>
<th>Costs (k€)</th>
</tr>
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<tbody>
<tr>
<td>OA's input</td>
<td>53</td>
</tr>
<tr>
<td>Assistants input</td>
<td>8</td>
</tr>
<tr>
<td>Travel</td>
<td>15</td>
</tr>
<tr>
<td>Administrative costs</td>
<td>9</td>
</tr>
<tr>
<td>Contingencies</td>
<td>5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>90</strong></td>
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</tbody>
</table>
Remarks

Written/electronic versions of presentations and of oral contributions in workshops are required.

Draft of CS and FR will be circulated by OA by e-mail. Comments and ballot on final versions will be required.
Thank you

Antonio Capozza

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