GME Marketplace
for
Energy Efficiency Certificates

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GME - Head of “Non electric markets” Department

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GME role in Energy Efficiency Certificates Market

- GME is in charge of organizing and managing a marketplace for Energy Efficiency Certificates;

- GME and Authority for Energy and Gas will jointly decide the Market Rules;

- Green Certificates market, launched in March, 2003, will be chosen as the market model to start from.
Market actors

- AUTHORITY
  - ENERGY AND GAS

- DISTRIBUTORS
  - MARKET

- ESCO

- FINAL CUSTOMERS
Activities for Market mechanism

- Projects evaluation
- Projects approval
- Communication to GME (certificates issuing)
- Verification of distributors annual obligation

- Register
- Certificates issuing
- Market sessions
- Bilateral contracts in to Register
- Communication of market results to Authority
Market cycle

Pre-market phase
- Authority: Projects examination and approval
- GME: Register organization, Certificates Issue (after Authority communication)

Market phase
- GME: Market sessions (plus OTC bilateral contracts)

Post-market phase
- GME: Register update for market based and bilateral transactions

Verification phase
- GME: Communication of register situation to the Authority
- Authority: Verification procedure (sanctions for those who do not comply)
Market features

- Main features of marketplace:
  - Continuous trading
  - One trading book for each type of Energy Efficiency Certificate (electricity, gas, primary energy)
  - Guaranteed deposit requested to buyers
  - Real-time link with Register
### Trading example (1)

**Trading Book**

<table>
<thead>
<tr>
<th>QUANTITY</th>
<th>BID</th>
<th>PRICE</th>
<th>OFFER</th>
</tr>
</thead>
<tbody>
<tr>
<td>50</td>
<td>180</td>
<td></td>
<td>185</td>
</tr>
<tr>
<td>30</td>
<td>175</td>
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<td>189</td>
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<td>70</td>
<td>172</td>
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<td>194</td>
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</table>

Bid with **price limit**: Buy 50 @ 190
### Trading Book

<table>
<thead>
<tr>
<th>QUANTITY</th>
<th>BID PRICE</th>
<th>OFFER PRICE</th>
<th>QUANTITY</th>
</tr>
</thead>
<tbody>
<tr>
<td>50</td>
<td>180</td>
<td>185</td>
<td>40</td>
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<tr>
<td>30</td>
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<td>70</td>
<td>172</td>
<td>194</td>
<td>20</td>
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</tbody>
</table>

Bid **without price limit**: Buy 50 @ market
## Electricity efficiency targets and avoidable emissions

<table>
<thead>
<tr>
<th>Year</th>
<th>National target (Mtpe)</th>
<th>Reduced consumption in MWh (*)</th>
<th>Mtpe CO₂ avoided (Hp: 1 kWh=0,5 kg CO₂)</th>
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<tbody>
<tr>
<td>2002</td>
<td>0,1</td>
<td>454.545</td>
<td>0,23</td>
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<tr>
<td>2003</td>
<td>0,5</td>
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<td>1,14</td>
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<td>2004</td>
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<td>4.090.909</td>
<td>2,05</td>
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<td>2005</td>
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<td>5.454.545</td>
<td>2,73</td>
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<td>2006</td>
<td>1,6</td>
<td>7.272.727</td>
<td>3,64</td>
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</tbody>
</table>

(*) Hp: the whole target is satisfied by reducing electricity consumption
Markets for environment sustainability

MARKETS FOR CO₂ EMISSIONS REDUCTION

GREEN CERTIFICATES

ENERGY EFFICIENCY CERTIFICATES

EMISSION RIGHTS (2003/87/CE)
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