Market for Voluntary Carbon Compensation
An Overview

World Bank

EMG meeting on
C-Neutral and Sustainable Procurement
Washington D.C., June 26 2007

Why a Carbon Market?

Because of regulatory pressure (present or anticipated) or for voluntary reasons, firms, governments, and even individuals constrain their greenhouse gases (GHGs) emissions.

Since GHGs mix in the atmosphere, it does not matter where emissions are reduced.

Both internal abatement and purchase of “GHG commodities” (allowances & offsets).
Volumes transacted in 2006 (in MtCO₂e)

Project-Based Transactions

- CDM: 450
- Secondary CDM: 25 +
- Voluntary & Retail: 10 +
- Other Compliance: 19
- New South Wales Certificates: 20
- Chicago Climate Exchange: 10
- UK ETS: na

Allowance Markets

- EU Emission Trading Scheme: 1,100

Evolution of largest C mkts.

- Project-based transactions
- Allowances transactions

Graphs showing the annual volume of project-based transactions and allowances transactions from 1998 to 2006.
Prices: project-based and EUAs

Volumes and prices up

- US$ 10.4 /tCO₂e
- US$ 7.2 /tCO₂e
- US$ 5.2 /tCO₂e

Disconnected markets

- EUA price (€/tCO₂)
- Spot price (Pnxt)
- Dec 06 (ECX)

Volumes transacted in 2006

(in MtCO₂e)

- Project-Based Transactions
  - CDM: 150
  - Voluntary & Retail: 10 +
  - Other Compliance: 19

- Allowance Markets
  - EU Emission Trading Scheme: 1,100
  - Secondary CDM: 25 +
  - New South Wales Certificates: 20
  - Chicago Climate Exchange: 10
  - UK ETS: na
A fragmented, but growing mkt

Who’s buying?
Entities not under compliance (Europe, w/ recent push in the US)
– companies C-neutral for PR or “capacity building”
– good & service providers: C-free shipping, event organizers, etc.
– individuals: commuting, travels, housing, etc.
– intermediaries (retailers).

Who’s selling?
Africa, but also local offsets in North America.

Steady growth in the next few years?
From 10+ MtCO₂e in 2006 to 400 MtCO₂e by ‘10 (60% in the US)

Smaller w/ strong SD attributes

Why selling?
Small projects, methodology issues, outside Kyoto

Asset classes
Typically small forestry projects, w/ SD & community benefits
Now, more on Energy Efficiency and Renewable Energies

Examples
• Kuyasa low-cost urban housing energy upgrade (7k tCO₂e/yr)
• Avoided deforestation in Mozambique (100 tCO₂e/yr)
• Ecuadorian Rain Forest Restoration (650 tCO₂e/yr)
• A/R activities at Scole Te (Mexico) (30 tCO₂e/yr)
• Wind farm in China and Turkey (>50k tCO₂e/yr each)
Looking for a standard

Projects selection criteria:
Credible tCO2e w/ SD and community benefits > prices

More than 15 standards addressing diversely:
  Additionality, Verification, Registration, Permanence

Credible compliance units received strong interest
  CDM/JI, CCX, NSW

New standards being developed, capitalizing on CDM

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<thead>
<tr>
<th>Standard</th>
<th>Gold Standard</th>
<th>VCS</th>
<th>VER+</th>
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<tr>
<td>Sponsors</td>
<td>WWF, SSN, Hello International</td>
<td>the Climate Group, IETA, World Economic Forum</td>
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<td>Status</td>
<td>2003 for CDM and JI</td>
<td>final by Dec 07</td>
<td>active</td>
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<td>Offset types</td>
<td>EE (demand side) &amp; RE w/ community benefits</td>
<td>all project types</td>
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<tr>
<td>Website</td>
<td>cdrngoldstandard.org</td>
<td>v-c-s.org</td>
<td>tuev-sued.de</td>
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Prices: sustainability commands premium

US$ per t CO2e

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<thead>
<tr>
<th>Offset types</th>
<th>CER</th>
<th>ERU</th>
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Thank you

Further readings


Market studies to be soon released:
Ecosystem Marketplace and New Carbon Finance
Caisse des Dépôts