Project Structuring for CDM and JI Projects

December 15, 2004
Charles Cormier, World Bank
World Bank Carbon Finance Business

$450 million in carbon finance under management

$760 million including written commitments
Understanding the impact of carbon finance on project financing and financial sustainability

Construction Capital for underlying climate friendly project

World Bank Emissions Reductions Purchase Agreement is bankable and additional revenue commitment helps bring projects to financial closure

Carbon Revenues for 10-21 years

Cash in

Debt

Equity

Construction

Operation

Carbon sales revenues are commonly in the range from 10-50% of total revenues for power and waste management projects
<table>
<thead>
<tr>
<th>Challenges</th>
</tr>
</thead>
<tbody>
<tr>
<td>Environment of Regulatory Uncertainty</td>
</tr>
<tr>
<td>Complex Procedures and High Transaction Costs</td>
</tr>
<tr>
<td>Political Regulator</td>
</tr>
<tr>
<td>Additional Sovereign Risks</td>
</tr>
<tr>
<td>SECURING UNDERLYING FINANCE FOR A PROJECT- in era where foreign direct investments to developing countries and economies in transition are decreasing</td>
</tr>
</tbody>
</table>
5Y of ERPAs – What is it worth?

- **Additional Revenues to the project** – An ERPA increases cash flow and boosts internal rate of return
- **0.5- 2.0 in renewable energy projects/ energy efficiency; between 5-15 % for methane mitigation**
- **Additional high quality income stream** - in $ or € from investment grade payer from OECD country
- **Additional Due Diligence** – An ERPA leads to additional scrutiny and risks assessments of the project
- **Forming Additional Partnerships** – An ERPA broadens the stakeholder basis and the support for a project
- **Additional Knowledge Generation** – Developing an ERPA provides a learning experience to all parties
Risk Management to Improve Access to Capital Markets

- Improve bankability, ie. Maximize the value of the Emission Reduction Purchase Agreement through the elimination of (perceived or real) risk by:
  - Managing Regulatory Risk
    - Kyoto and CDM/JI risk
    - Providing value to Emission Reductions beyond 2012
  - Managing Financial Risk
    - Maximizing ERPA values through structured finance
    - Credit enhancement for underlying projects supported by ERPAs
Basic Deal Structure

Host Country

Ltr. of Approval

CF

ERPA

Engagements re:
• Regulation (e.g. tariffs)
• Kyoto Protocol compliance

Sponsor/Project

ERs

ER payment
Hungary Pannonpower Biomass

Engagements re:
- Regulation (e.g. tariffs)
- Kyoto Protocol compliance

Host Country

Ltr. of Approval

PCF

ER payments

Parent Co.

ERPA

ERs

SPV

LOC

Upfront pmt

Project Co.

OTP Bank

Financing Agr. Loan

DH Co.

Debt service
Conclusions

- Carbon revenues can:
  ⇨ Improve returns, esp. in CH4 mitigation
  ⇨ Provide a bankable revenue stream
  ⇨ Soften financing terms by reducing risk

- Carbon *plus* risk mitigation = sustainable energy finance