

# Governing Technology for Clean Development

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## Power(in) Technology



Reflect on the relationship between technology & governance in the context of CDM



Draw on insights from 3 year ESRC funded research project on the governance of clean development ([www.clean-development.com](http://www.clean-development.com))

# Why Governance? Why CDM?

- **Why & whether** technology is transferred, **how** and on **whose terms & who benefits** will (in part) be a function of policies, regulations, institutions, decision-making processes & POWER.
- A **performance-related finance mechanism** for TT (amongst other things)
- Combines **quantitative** & **qualitative** performance indicators
- **Scale** will be different (hopefully!)
- Many **governance challenges** may be similar: priority-setting, participation & consultation; steering flows, securing co-benefits, monitoring

## Technology Transfer (TT) and the Clean Development Mechanism (CDM)

TT is intended as a key sustainable development benefit from the CDM (alongside jobs, economic benefits, health and other environmental benefits)



Most studies show this has not happened as much as expected



Uneven global distribution of projects; concentration on low-hanging fruit projects and mature technologies



Emphasis on **'hardware'** (equipment, blueprints, patents) rather than **'software'** (skills, training, capacity for longevity)

## Poor TT under the CDM: the first 1000 projects



### Level of Technology Transfer:

- Top **four countries** also dominate the number of projects with technology transfer (India, China, Brazil, Mexico)
- Overall, **27% projects** accounting for 46% of total estimated annual emission reduction **involve technology transfer**



### Quality of Technology Transfer

- Only **six** projects (of 265) involve **superior** forms of technology transfer (mainly in energy efficiency)
- The remaining **265** projects involve technology transfer where technological learning and capability building is confined only to the basic or **operational level**
- Technology import does not necessarily correlate with technology transfer

## TT under CDM: Reasons for poor performance

- **Sustainable Development** of which TT is a part is not valued (emphasis on low hanging-fruit low cost options). **Key lesson**: if co-benefits are not rewarded they will fall off the agenda
- Lack of **government capacity** to screen these components & monitor them at project level. **Key lesson**: who approves technologies & on what basis & how will their performance be evaluated on an on-going basis?
- **IPR issues**: difficult to say. In CDM not high end techs per se (wind turbines, SWHs, cooking stoves)

The **implication**: developing countries may not be benefiting from the development of their own technological capabilities

## Lessons learnt: CDM Governance **‘from below’**

TEC Mandate:

*“Catalyse the development and use of **technology road maps or action plans at the international, regional and national levels** through cooperation between relevant stakeholders, particularly governments and relevant organizations or bodies”.*



With **roadmaps** think about **TT as part of a broader national low carbon strategy**: demand-driven; alignment with national priorities; adding value to what is already there; being strategic about multiple funding streams (who will fund what).



For **Technology Needs Assessments** (TNAs): Make use of existing local institutions and decision-making processes



**Governance gaps need to be addressed**: consultation, participation, transparency. Absence of these benefits neither the provider, the government nor the host community

# Lessons learnt: CDM Governance **‘from above’**



TEC mandate: *“promote **coherence and cooperation across technology activities**, including activities under and outside of the Convention”*

- Need for **coordination** among tech providers, bilateral & multilateral donors: establish **divisions of labour by sector, region, target social groups**. Not everyone can do everything (CTF, REEEP, GEF, UNIDO, UNDP, WIPO)
- Be clear about **which technologies are off limits**, beyond the mandate (current CDM debates about ‘clean’ coal) & where support is most urgently required (& not available from elsewhere)
- Importance of **reducing barriers to SMEs** and smaller players- reduced barriers & transaction costs for them - may deliver higher development returns



## Future of the CDM

If CDM is to continue to be seen as one of the tools for TT, governance challenges will be more acute in future because:



EU proposals for LDC CERs only after 2013



Scaling up agenda: demands more capacity around monitoring, verification, managing SD impacts



Will be harder for poorer countries to negotiate terms with investors: power tools are not available to them

## Thank You



**For more information:**

Briefings are available  
or visit

[www.clean-development.com](http://www.clean-development.com)

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