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Programmatic CDM Approach to Financing Energy Efficiency and Renewable Energy projects

- Concept and Considerations

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Agenda

- Concept of pCDM
- What makes it different from conventional CDM
- Case study on registered pCDM
- Key issues and challenges in doing pCDM
- Analysis Investment Risks

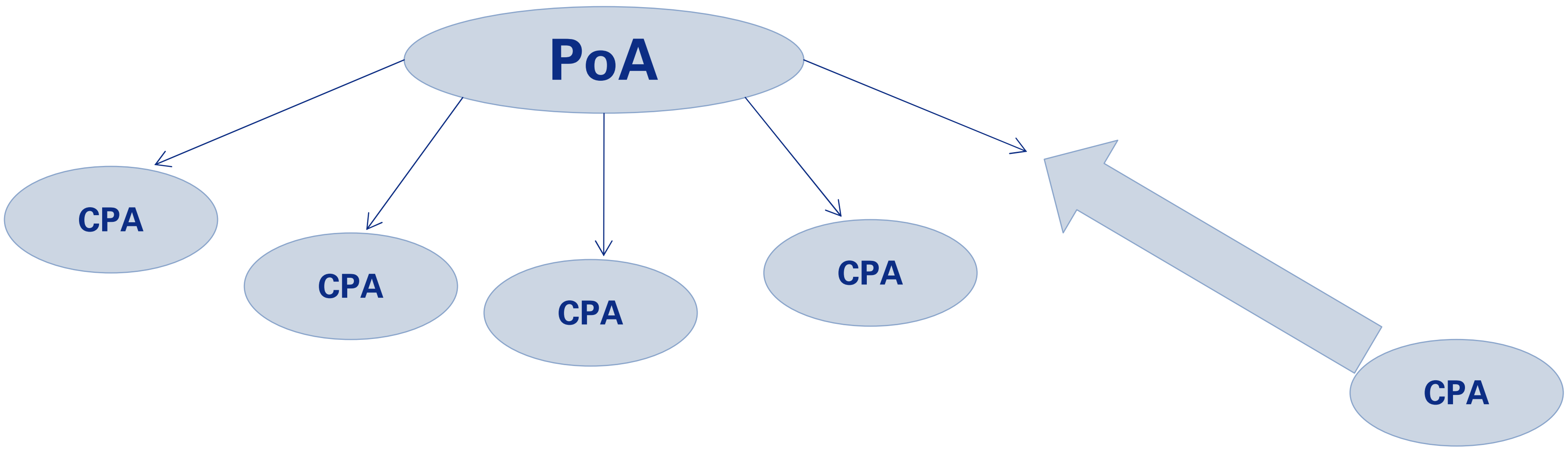
Concept of pCDM

What is a Programme of Activity?

- Is a voluntary coordinated action
- which coordinates and implements any policy/measure or stated goal
- which leads to additional GHG emission reductions or greenhouse gas removals by sinks
- via an unlimited number of CDM programme activities (CPAs).

What is a CDM Project Activity?

- Is a single or a set of inter-related actions
- consistent with the policy/measures or stated goals provided under the umbrella PoA.



pCDM vs CDM

pCDM	CDM
Broad based approach- implementation of policy, measures, stated goal	Project specific approach
Monitoring plan approved upfront. Applicable to "n" number projects	Only one project
Life 28 years (not forest projects)	7 years renewable, or 10 years fixed
Demonstrating additionality at PoA/ CPA level	Only at project level
Subsequent CPAs not submitted to EB for registration	Each CDM project to be individually submitted to EB
Registration fees payable for first CPA only	To be paid individually for each CDM project
Makes it financially viable to develop small scale projects as CDM	Not applicable
Can span over several host countries	Project located in a single host country

Approaches under pCDM vs CDM

Preparation of CDM PoA DD

Preparation of CDM CPA form DD

Not developed in normal CDM

coordinating / managing entity

Preparation of CDM CPA DD

Validation by DOE

Registration

Verification, Certification

CER

Key issues and challenges in developing pCDM projects

- Only 5 registered pCDM projects- a nascent but a promising mechanism- crucial to create awareness about the same.
- PoA-DD to be a holistic representation of the measure or set of interrelated measures (i.e. the CPAs) to be implemented under the PoA (clarity on the CDM PoA procedures is crucial)
- Demonstrating the additionality of the PoA
- Description of eligibility criteria for including CPA- criteria to be comprehensive enough to withstand technological changes, changes in PoA guidelines and other methodological requirements.
- Convincingly demonstrating the PoA start date- crucial for eligibility of CPAs to be covered by PoA
- Comprehensive explanation of the operational procedures, data systems, control measures to be implemented by CPAs. To be done carefully so as to accommodate future CPAs

Key issues and challenges in developing pCDM projects

- Flexible monitoring plan to accommodate future CPAs (relevant- clear understanding of PoA guidelines and methodological requirements).
- Explanation of a statistical programme in case all CPAs need not be verified
- Convincingly demonstrating start date of CPA- assessed before CPA could be included in PoA
- Procedures for appointment and withdraw of PP different from conventional CDM and require additional compliance
- Development of the CPA- Form-DD : used by future CPAs- to be comprehensive and flexible enough to accommodate future CPAs, and at the same time comply with PoA and CDM guidelines.
- Demonstrating additionality of each CPA under the PoA. (Critical- clear understanding of relevant PoA guidelines, conventional CDM guidelines and methodological requirements)

Key issues and challenges in developing pCDM projects

- Inclusion of a new CPA under the PoA- procedures and guidelines to be followed- totally new concept never covered under conventional CDM
- Renew the crediting period of CPA under the PoA- procedure to be followed- procedures are different compared to conventional CDM
- Planning CER issuance- gap of at least 3 months before previous request
- Establishing clear understanding between the ME and CPA implementer with regard to ME's obligations and responsibilities under the PoA.
- Compliance requirements both at PoA and CPA level when the approved meth. Is put on hold or withdrawn (How to address this concern in PoA and CPA DD).

Key Advantages of pCDM

- Allows inclusion of projects where CDM revenues are not significant enough to justify investments on stand-alone basis, assisting the SME & others on:
  - renewable energy project clusters (solar, biomass, etc.)
  - energy efficiency measures in residential, commercial and industrial applications (light bulbs, chillers, water pumps, forestry/plantation, etc.)

- Provides possibility of adding future projects of similar scope as a registered project:
  - without having to identify the specific project in advance
  - inclusion of future projects takes less time compared with conventional CDM projects

- Provides possibility of using small scale methodology as long as individual projects did not exceed the threshold stipulated for the applied small scale methodology

- Registration cost to individual project owners is expected to be low in comparison with conventional CDM projects

Investing on pCDM

- **Project Owner:** If your project (i.e., a prospective CPA) is small and the economics of registering it with the CDM EB is not justifiable, then:
  - look for a registered programme (PoA) nearer to you (within or outside your country) that is closest to your CPA
  - look for the 'managing entity' who could accommodate your CPA within this PoA, provided it meets the relevant pCDM guidelines
  - negotiate with the 'managing entity' regarding sharing of expenses and revenues.

- **Investor:**
  - Opportunity to identify small-scale project types that could be clustered in phases for registrations and CER issuance since the CER volume will grow over the PoA crediting period of 28 years (60 years for A/R)
  - Opportunity lies in developing PoA as the managing entity

Setting the baseline

- In most cases, the baseline will be existing practice not mandated by local regulations, and in line with applied baseline methodology

- Where existing practice is mandated, the baseline could still be existing practice if it is demonstrated that the regulations are not systematically implemented/enforced leading to non-compliance

- Parameters supporting an operational and management plan to capture relevant information for demonstrating the baseline conditions and estimating the baseline emissions

- Re-estimation of baseline in case of renewal of crediting period for individual CPAs

- Baseline in each CPA shall comply with a guiding CPA-DD document supporting the broad policy/targets prescribed in the PoA-DD

Monitoring Requirements

- Monitoring requirements are set at various levels:
  - Emission reductions → through baseline emissions, project emissions and leakage emissions
  - Validity of baseline conditions (in case of renewal of crediting period)
  - Environmental impacts (at PoA level or CPA levels)
  - Local stake-holder issues (at PoA level or CPA levels)
  - Additionality (at both PoA and CPA levels)

- Determination of appropriate sampling size and techniques, supported by acceptable monitoring/measurement protocols

- Reliability of data/monitored results (QA/QC is a must)

Managing the stretched Crediting Period

- Elongated crediting period for a PoA makes it an affordable mechanism to increase enforcement of policies/practices/technologies with emission reducing potential

- Elongated crediting period makes investments in a PoA, economically viable for a managing entity or another investor since individual CPAs could be generally small

- It allows for addition of similar new CPAs in future without the complication of full-fledged registration process related administrative issues

- However, the timelines have management complications in relation to:
  - long-term programme of adding new CPAs
  - CER monitoring and verification, and distribution to individual CPA owners
  - Transaction of CERs and associated legal issues

Managing PoA risks

- Impact on 'managing entity' in relation to CER issuance if:
  - CPA owner defaults and CERs issuance is reduced/stopped
  - CPA is disqualified and excluded from PoA

- Impact on 'CPA owner' in relation to PoA validity and CER issuance if:
  - PoA owner defaults or transfers PoA ownership rights
  - CPA monitoring activities are inadequate to generate estimated CER volumes

- Hence, financial and commercial structuring of agreement between 'managing entity' and CPA owners is critical in view of long-term relationships

- ERPA structuring for investment purposes becomes critical so that process and operational risks are identified and included

Thank You

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