Session 9.1

## Introduction of the standard for sampling and surveys for CDM project activities and PoAs

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UNFCCC Secretariat SDM programme

## Background

- EB50 approval of sampling guidelines for small-scale
- EB60 requests
  - Development of PoA standards related to sampling
  - > Expansion of sampling guidelines:
    - Develop common guidelines and best practices examples covering large-scale, small-scale, and PoA.
    - $\checkmark$  Develop requirements to DOEs
      - How to review sampling plans
      - How to apply sampling to validation/verification work
- Useful comments received during May 2011's stakeholders workshop on PoA



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- Section 4: Sampling Requirements
  - Use the following confidence/precision requirements:
    - ✓ 90/10 for small-scale
    - ✓ 95/10 for large-scale
    - $\checkmark$  Unless specified in the applicable methodology
  - For precision (i.e. figure of ±10%), use relative percentage terms when parameter of interest is both a proportion and a mean value.
  - Use the sample mean value for ER calculation, not the lower or upper bound of the confidence interval.



- Section 8: Sampling Requirements for DOEs
  - How to determine the size of validation/verification samples in the following three scenarios:
    - i. DOE draws a sample from PP's sample
      - ≻[using 90/10]
      - ≻[25% of project samples]
    - ii. DOE draws a separate sample independently
      - ≻[using 90/10]
      - ≻[25% of project samples]
    - iii.While PP did not apply a sampling approach, DOE verifies
      - the parameter values based on samples.
      - ➤ [using 90/10]





- Section 9: Sampling Requirements for PoAs
  - This Section provides:
    - 1. Simplified sampling requirements when CMEs estimate parameter values through sampling for a homogeneous PoA.
    - 2.Sampling requirements when DOEs undertake validation/verification that uses a sampling approach i.e. without verifying all CPAs.



- Section 9-1: Sampling for a homogeneous PoA
  - Common sampling plan can be undertaken by CMEs under the following two conditions:
    - ✓ When a PoA confirms to the definition of a homogeneous PoA
    - When it meets the size threshold (i.e. each independent subsystem/measure in the CPA is equal to or smaller than 1% of SSC threshold)
  - Otherwise, sampling shall be undertaken separately and independently for each of the CPAs included in a PoA



- Section 9-1: Sampling for a homogeneous PoA
  - A homogeneous PoA is defined as follows:
    All CPAs included in a PoA implement technologies/measures only with high degree of standardization.
    - ✓ in relation to baseline and project technology/measure, relevant fuel/feed stock inputs, type and capacity of service, geographic location particularly the ambient/weather conditions of interest, combinations of technologies/measures and/or methodologies
    - Example: CFLs or LEDs to replace incandescent lamps in grid connected households



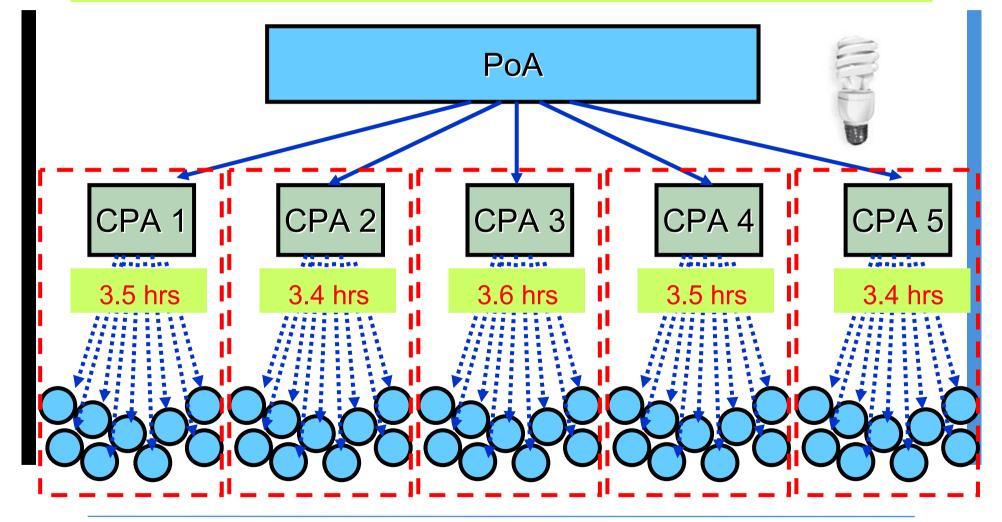


- Section 9-1: Sampling for a homogeneous PoA
  - > Additional conditions:
    - 1. The parameter of interest shall be proved not changed significantly over the time period specified (e.g. usage hours of CFLs)
    - 2.If it is expected to change significantly over time (e.g. retention rate of CFLs), group of CPAs covered under the common sampling plan shall have [been started and ... commissioned within a specified period defined by → CMEs (e.g. overlap with +/- 2 months)]
  - More rigorous confidence/precision (i.e. [95/10] [95/5] )



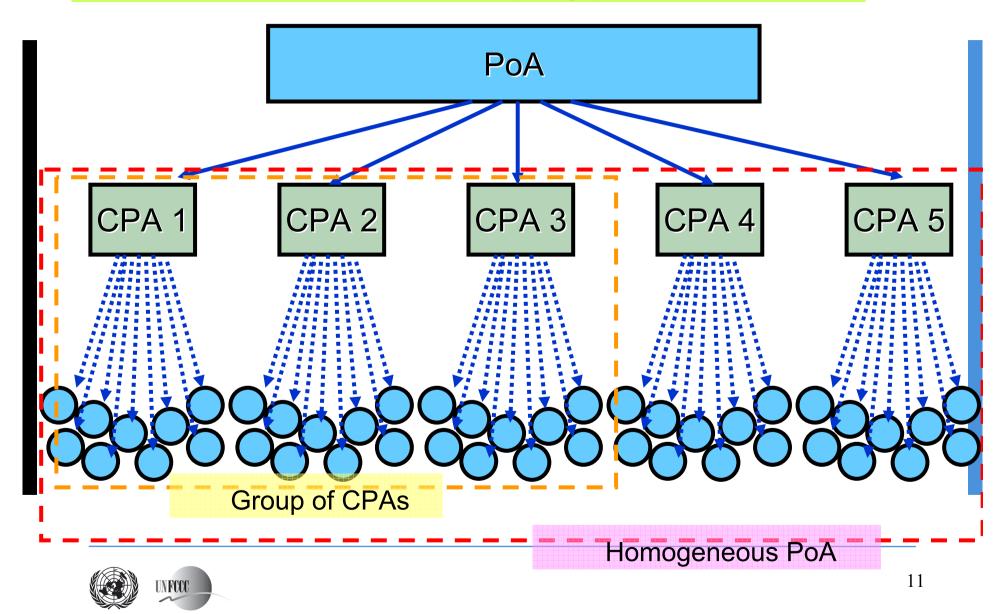
## Current Requirement: Individual sampling plan

<Example below: average daily usage hours of CFL>





## Common sampling plan



- Section 9-2: Sampling Requirements for DOE validation and verification for PoAs
  - DOEs shall meet the following sampling requirements:
    1)For homogeneous PoAs, use [90/10] or [25%] for sample size determination, following options in Section 8.
    - 2)For non-homogeneous PoAs consisting of only subsystem/measure that are no greater than [10%] of SSC threshold, use [90/10].
    - 3)For rest of the PoAs, DOEs shall verify each CPA and each technology/measure within the CPA.

