

# Programmatic CDM in Botswana

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- The BPC Lesedi project
  - Introduction of its contents
  - Its access to carbon markets
  - The Project Design Document for a programmatic approach



# Botswana first Program PDD?

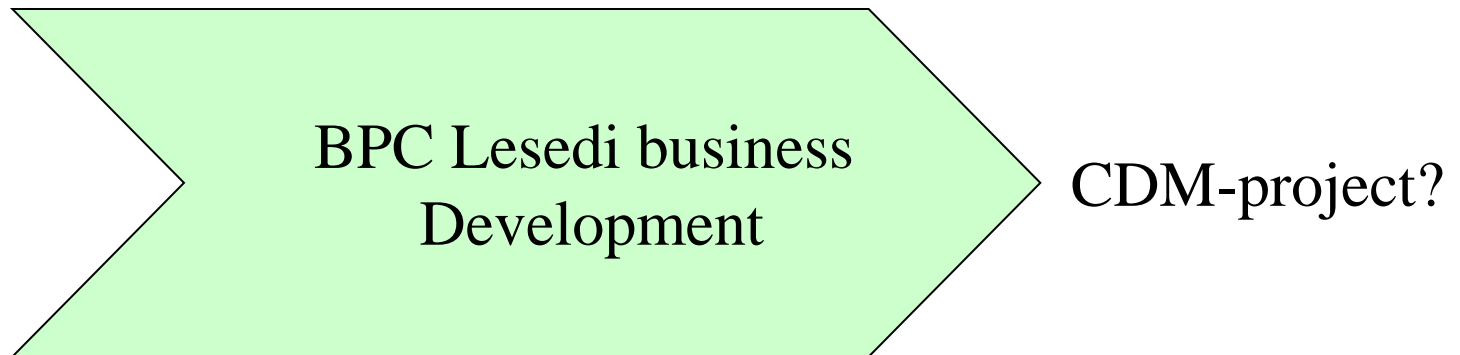
BPC Lesedi (pty) Ltd

March 2010:

- Draft Project Design Document(s)
- Dissemination workshop
- Report on possible proceedings



# To access the carbon markets



Costs:

Investments  
O & M

Income streams:

Sales of products and services  
+ sales of Emission Reductions?

**How does BPC Lesedi get access to the Carbon Markets?**

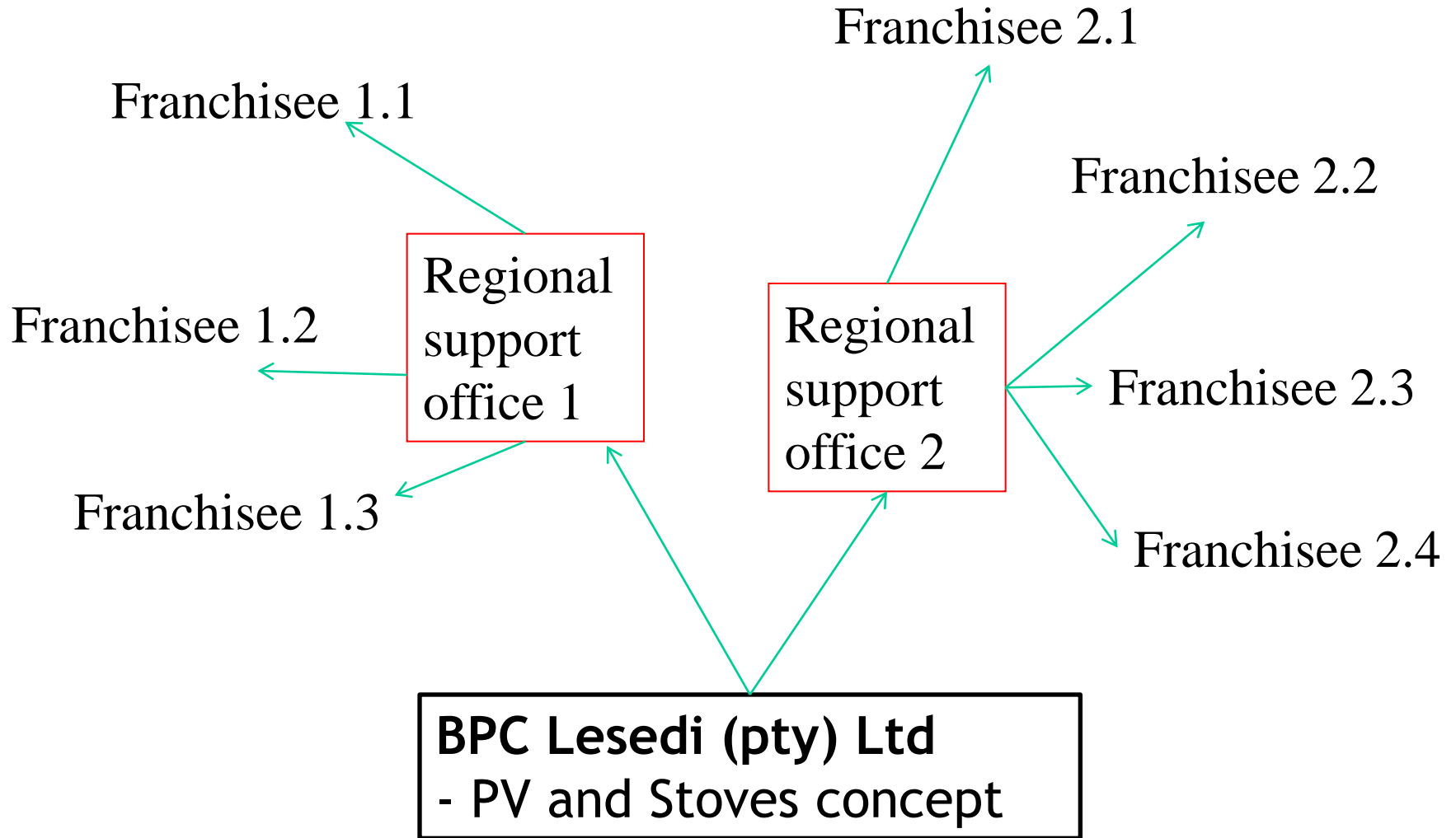


# BPC Lesedi (Pty) Ltd (franchise)

## Presentation

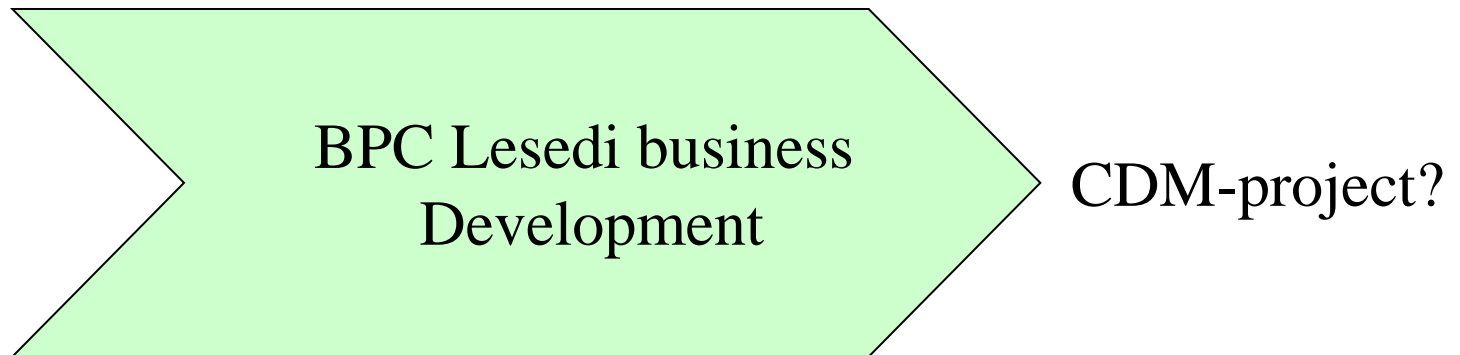


# The BPC Lesedi Franchise





# How to access the carbon markets



Costs:

Investments  
O & M

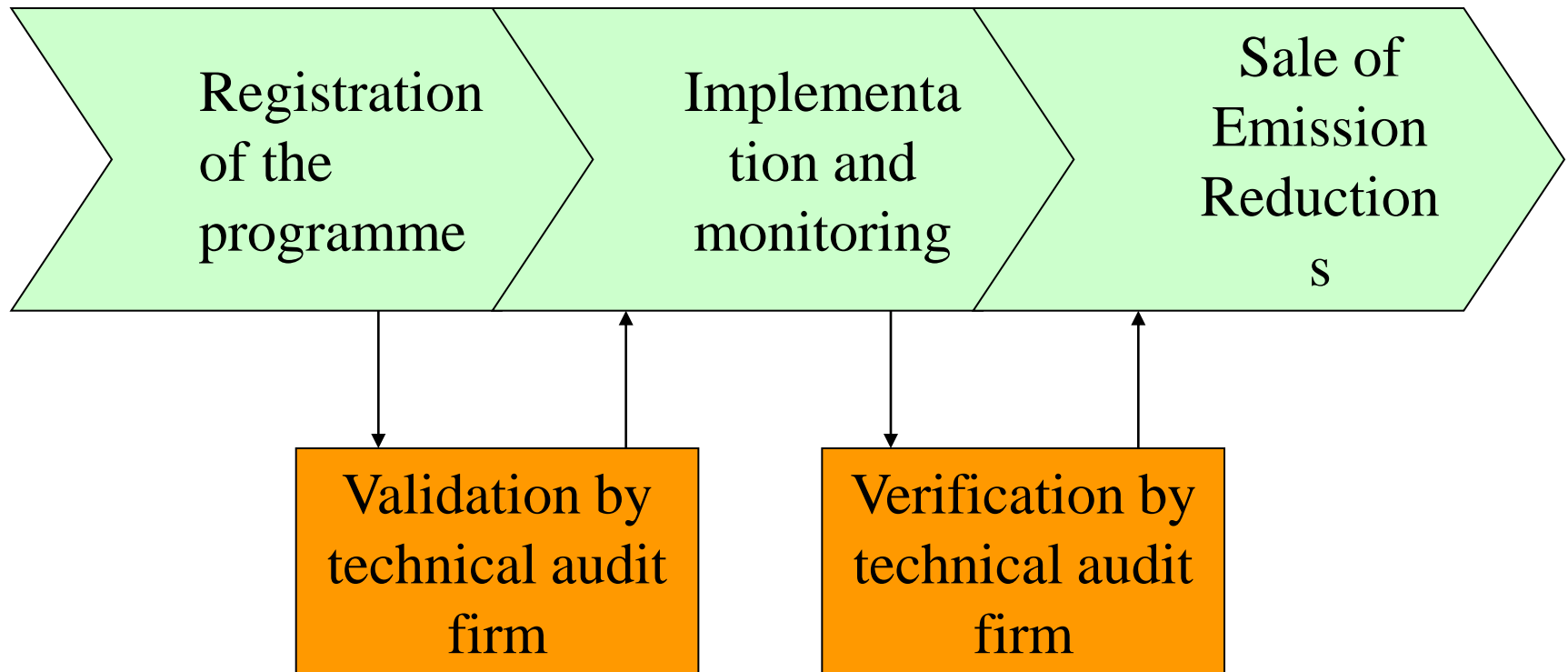
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**How does BPC Lesedi get access to the Carbon Markets?**



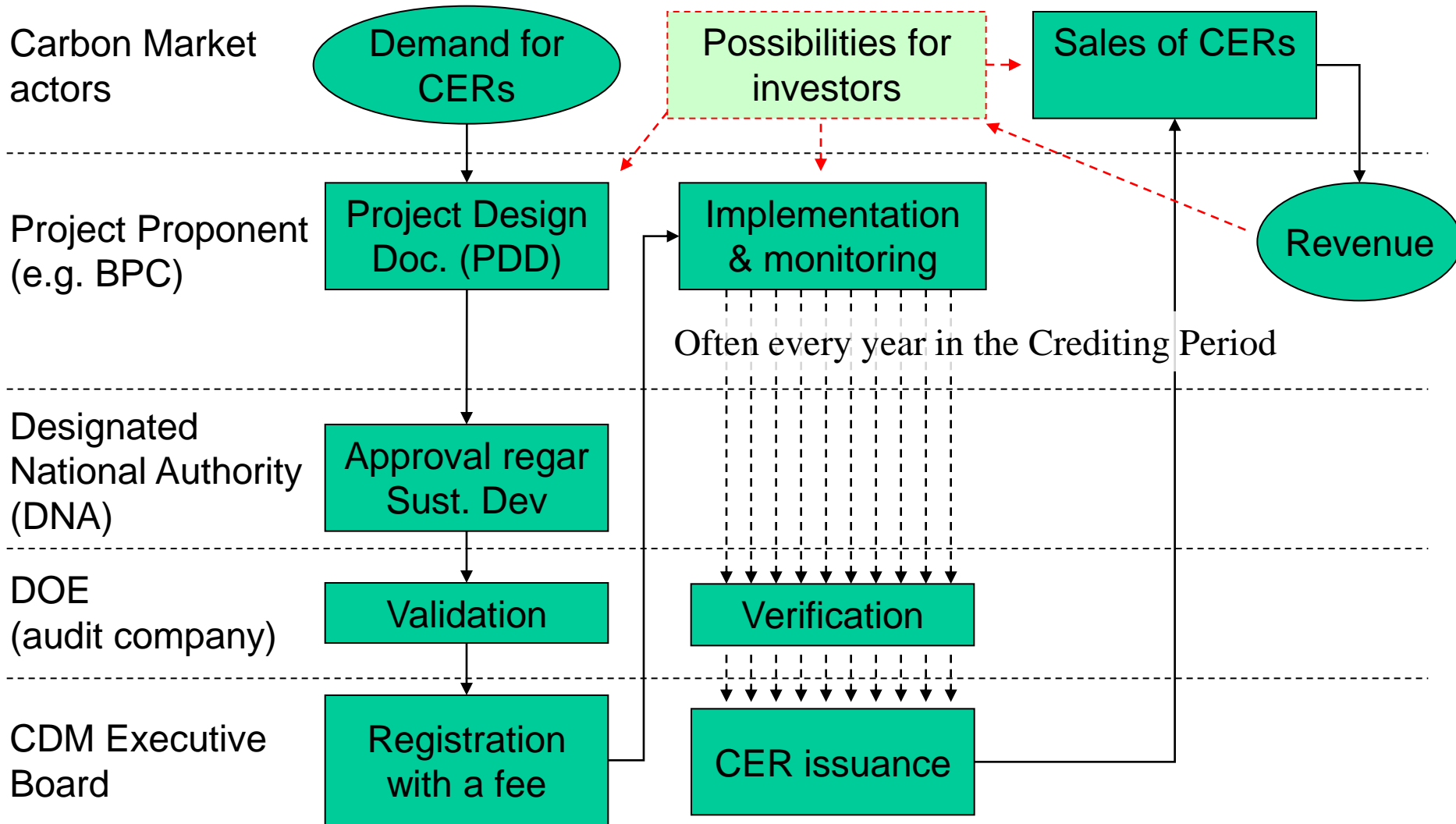
# To access the carbon markets







# The CDM Small Scale Process





# Programmatic CDM

- “Normal” Project
  - 1 project a site → 1 PDD
- Programmatic CDM
  - Many project sites under one program and one managing entity
  - Additional activities can be added later on
- “Program of Activities” (PoA - PDD)
  1. CDM Program Activity (CPA) 1
  2. CDM Program Activity (CPA) 2
  3. Etc
  4. ...

## The BPC Lesedi case:

- PoA PDD - BPC Lesedi
  - Stoves
  - PV
- Every franchisee-business becomes a CPA
  - CPA-PDD Franchisee 1.1
  - CPA-PDD Franchisee 1.2
  - CPA-PDD....



# To find the right template

Everything on internet: [www.unfccc.int](http://www.unfccc.int)

1. Normal scale or small-scale? (SSC-)
  - < 15 MW, < 60 GWh, < 60 kton CO<sub>2</sub>/year
  
2. Project or a programme?
  - One site or many sites?
  - One management entity for many sites?
  - Many sites developed over time?

BPC Lesedi:

➔ [CDM-SSC-PoA-DD](#) = Small-Scale CDM Programme of Activities Design Document form



- A PoA is distinct from a bundle of small-scale projects, because it is possible to add new CPAs to a PoA without undertaking the validation process afresh.
- No registration fee is payable on CPAs which are added subsequently to validation.



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## Forms - Programme of Activities (PoA)

This page provides access to forms relating to a Programme of Activities. You may also want to reference other CDM-related documentation including [Clarifications](#); and [Tools](#).

The [CDM Glossary of Terms](#) is also useful in assisting project participants when filling out the various CDM forms.

Forms - Programme of Activities	Format
<a href="#">CDM-PoA-DD-SSC-AR</a> - Programme of Activities Design Document form for SSC-AR project activities	<a href="#">PDF</a> (188 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-CPA-DD-SSC-AR</a> - CDM Programme Activity Design Document form for SSC-AR project activities	<a href="#">PDF</a> (191 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-PoA-DD-AR</a> - Programme of Activities Design Document form for A/R project activities	<a href="#">PDF</a> (187 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-CPA-DD-AR</a> - CDM Programme Activity Design Document form for A/R project activities	<a href="#">PDF</a> (184 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-PoA-DD</a> - Programme of Activities Design Document form	<a href="#">PDF</a> (101 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-CPA-DD</a> - CDM Programme Activity Design Document form	<a href="#">PDF</a> (93 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-SSC-PoA-DD</a> - Small-Scale CDM Programme of Activities Design Document form	<a href="#">PDF</a> (105 KB) <a href="#">W</a> <a href="#">M</a>
<a href="#">CDM-SSC-CPA-DD</a> - Small-Scale CDM Programme Activity Design Document form	<a href="#">PDF</a> (97 KB) <a href="#">W</a> <a href="#">M</a>



# The CDM Process



## **PDD**

Project Design Document  
for a Programme of Activities  
(PoA-PDD)

+ PDD for first Franchisee ([SSC-CPA-PDD](#))

+ PDD for all coming Franchisees (CPA-PDD-generic)



# The Project Design Document

**CLEAN DEVELOPMENT MECHANISM  
SMALL-SCALE PROGRAMME OF ACTIVITIES DESIGN DOCUMENT FORM  
(CDM-SSC-PoA-DD) Version 01**

## CONTENTS

- A. General description of small-scale programme of activities (SSC-PoA)
- B. Duration of the small-scale programme of activities
- C. Environmental Analysis
- D. Stakeholder comments
- E. Application of a baseline and monitoring methodology to a typical small-scale CDM Programme Activity (SSC-CPA)

## Annexes

- Annex 1: Contact information on Coordinating managing entity and participants of SSC-PoA
- Annex 2: Information regarding public funding
- Annex 3: Baseline information
- Annex 4: Monitoring plan



# Methodology for Calculations

- Every CDM-project activity is based on a certain technology for cutting emissions
- Every technology has a methodology how to calculate the emission reductions
- UN Executive Board approves methodologies to be used





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Afforestation / Reforestation Methodologies

Small Scale CDM Methodologies

Approved SSC methodologies

SSC Methodology Progress Table

Your location: CDM-Home &gt; Methodologies &gt; Small Scale CDM Methodologies

## Approved SSC methodologies

**Quick Search:** Click [here](#) to search all approved methodologies !

Approved methodologies for small-scale CDM project activities, which are listed in the table below, are part of the Appendix B of the [Small Scale CDM project activities](#) (735 KB) (decision 4/CMP.1, Annex II). Note that [decision 1/CMP.2](#) (Further guidance on the use of the [Small Scale CDM project activities](#) (735 KB) (decision 4/CMP.1, Annex II)) revises the definitions for small-scale CDM project activities referred to in paragraph 6 (c) of [decision 17/CP.7](#).

### Methodological Tools

- [Tool for the demonstration and assessment of additionality](#) (318 KB)
- [Combined tool to identify the baseline scenario and demonstrate additionality](#) (341 KB)
- [Tool to calculate project or leakage CO2 emissions from fossil fuel combustion](#) (260 KB)
- [Tool to determine methane emissions avoided from disposal of waste at a solid waste disposal site](#) (370 KB)
- [Tool to calculate baseline, project and/or leakage emissions from electricity consumption](#) (537 KB)
- [Tool to determine project emissions from flaring gases containing methane](#) (499 KB)
- [Tool to calculate the emission factor for an electricity system](#) (457 KB)
- [Tool to determine the mass flow of a greenhouse gas in a gaseous stream](#) (251 KB)
- [Tool to determine the baseline efficiency of thermal or electric energy generation systems](#) (218 KB)



# Forms, tools and methodologies

- Tool for the demonstration and assessment of additionality” (Version 05.2)

**E.1. Title and reference of the approved SSC baseline and monitoring methodology applied to a SSC-CPA included in the PoA:**

>> The SSC-CPAs are consistent with the Clean Development Mechanism (CDM) approved small-scale CDM project activities:

- Renewable Energy projects (type I):
    - AMS-I.A Electricity generation by the user, version 13
- For CPAs regarding:
- Selling rechargeable lanterns
  - Renting out Solar Electric Systems (SES)
  - Offering Solar PV Recharging services

The methodology can be downloaded from the website:

<http://cdm.unfccc.int/methodologies/SSCmethodologies/approved.html>

NOTE: The approved SSC baseline and monitoring methodology should be approved for use in a PoA by the Board.

**E.2. Justification of the choice of the methodology and why it is applicable to a SSC-CPA:**

>> AMS-I.A Electricity generation by the user





From the AMS.I.A:, version 13

- *“This category comprises renewable energy generation units that supply individual households or users or groups of households or users with electricity. The applicability is limited to households and users that do not have a grid connection.”*



# What is the Emission Reduction?

*For the lanterns (which are substituting the burning of candles and paraffin):*

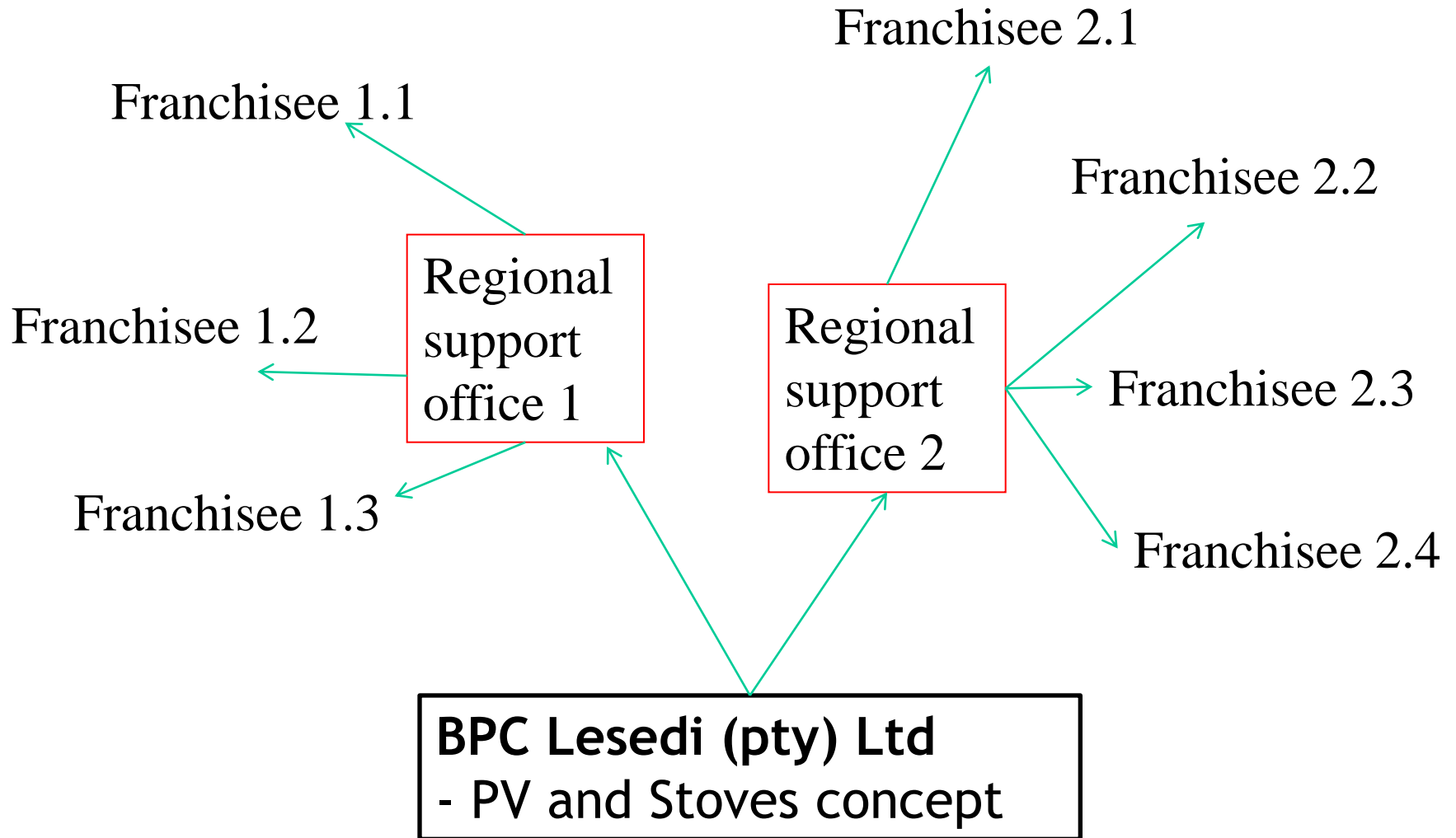
- Amount of emissions coming from burning of candles and paraffin

*For SES (which are substituting a diesel generator):*

1. Amount of kWh consumed per year \* the emission factor for diesel generator or
2. The average individual kWh consumption from a consumer in a comparable village connected to the grid \* the emission factor for diesel generator



# The BPC Lesedi Franchise



# Thank you!

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