Rural Electrification Experiences

BENIN

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Off-Grid Clean Energy Access

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SUMMARY

Power Compact Overview

Opportunities in Benin:
- Regulatory framework in place
- Off-grid clean energy facility (OCEF)
Disponibilité d'une énergie électrique efficace et fiable pour une croissance économique forte et durable
Availability of efficient and reliable electric energy
For sustainable economic growth
Disponibilité d'une énergie électrique efficace et fiable pour une croissance économique forte et durable

Our 4 Components
Our cross-sectoral concerns
Regulatory Framework
Off-Grid Electrification

The 4th component of this Compact concerns Decentralised Electricity including 2 main activities:

- Enabling Environment for Off-Grid Electricity

- Off-Grid Clean Energy Facility (OCEF). OCEF intends to leverage private sector engagement. The first call for project proposals has been launched on February 22, 2017.

OCEF targets areas that will not be covered by the grid extensions for the next 10 - 15 years (Rural Electrification Master Plan – www.benin-energie.org).
REGULATORY ENVIRONMENT FOR OFF-GRID ELECTRIFICATION

Policy and strategy for off-grid electrification

Off-grid Electrification Master Plan

Legal, Institutional, Regulatory and Tariff Framework of the Off-grid Electrification

Communication and information WEB site

Capacity building, training

Logical framework
Monitoring evaluation
Steering Committee

Gender

Disponibilité d’une énergie électrique efficace et fiable pour une croissance économique forte et durable
TARGET GROUPS

871 localities covering a population of 1.7 million will still be off-grid in 2030 (1.2 million in 2017)

Over a 10 year horizon:

- **74%** of the off-grid population will have access to clean drinking water, health & educational services, of which
- **47%** will have access to electricity

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Disponibilité d’une énergie électrique efficace et fiable pour une croissance économique forte et durable
89% of the population will eventually be connected to the electricity network.

The four market segments for off-grid:

- **solar mini et micro-networks** for 4.8% of the population (159 loc)
- **Hydro mini-réseaux hydro** for 0.4% of the population (29 loc)
- **pico-networks and PV kits for community organizations** (essential institutions not served by a mini-network) for 4.3% of the population (413 loc.)
- **PV kits / solar lanterns or access to electricity service** distributed by private companies for 1.3% of the dispersed population (274 loc)

- However, public lighting coverage will be 100%.
Regulatory Framework set up to facilitate Private Sector

• The Regulatory Framework related to off-grid electrification in Benin is adopted by the Government

• Principle of *Cost Plus* tarification is garanteed
  – Meaning: the tariff reflects the cost of supply plus a margin

• Unified off-grid licence regime
  – Concession agreement/contract after request for proposal in case of capacities $\geq 500$ kW
  – Authorisation for total capacities $< 500$kW.

• In case of commercial market development (i.e. PV kits) *without donor support*, no authorisation needed
New dynamics for off-grid electrification

Paradigm shift: From a public service with a social connotation in rural areas to a private supply with a public service character

- ARE (electricity regulatory authority) ensure compliance with the laws and regulations governing the electricity sector in Benin. Insure equity between the stakeholders and the respect of their contractual commitments

- ABERME technical department of the ministry of energy is in charge of implementing state policy in the fields of rural electrification and energy management. Implementation Agency for rural electrification (grid and off-grid), ABERME is the Granting Authority by delegation of the Ministry of Energy
The Off-Grid Clean Energy Facility (OCEF) is a component of the MCC Electricity Compact.

OCEF is managed by MCA-Benin II.

Its objective is to: Increase access to electricity for the currently unserved population in rural and peri-urban areas of Benin by reducing barriers to investment in the off-grid electric power sector.
Off-Grid Clean Energy Facility  OCEF

OCEF offers the possibility to private project providers (national, international) and NGOs, community organizations, and other institutions

To submit a request for cofinancing to off-grid support their clean energy or energy efficiency projects

The submission should include a business plan which, with OCEF support, must be viable
Providing funding in four windows

**Window 1**

*Off-grid energy for essential public infrastructure* such as water treatment and pumping facilities, street lighting, hospitals, public health centres, courts, universities, schools.

**Window 2**

*Decentralized generation and distribution of electricity* via mini-grids or micro-grids for community and/or productive use.
Disponibilité d'une énergie électrique efficace et fiable pour une croissance économique forte et durable

Window 3

**Household energy systems** - This window supports companies that import, sell, distribute, install, and maintain household-level photovoltaic technologies, including solar home kits and other similar products.

Window 4

**Energy efficiency measures** - This window focuses on supporting business models for the deployment of energy efficiency measures to the benefit of public institutions, households, and users in the commercial and industrial sectors.
Amount Available for the 2\textsuperscript{nd} Call For Proposals

\textbf{20.000.000 USD}

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<th>Window</th>
<th>Minimun OCEF contribution (USD)</th>
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<td>Window 1</td>
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Level of Own Support Required

• All request for financial support must include an own contribution of a minimum of 25% and maximum of 75% by the project developer.

• The project developer is highly encouraged to bring a substantial contribution to realize his investment project.

• The own contribution can be in the form of a combination of equity, partner funds, other subsidies, commercial debt, etc.
Partnership Platform: matchmaking between potential partners

- **List of potential partners** who intend to create partnerships to submit an OCEF proposal.

- You can add your organization to the list if you want

- [https://ocef.bj/fr/pages/matchmaking](https://ocef.bj/fr/pages/matchmaking)
2\textsuperscript{ND} CALL FOR PROPOSAL

- **November 2018 – February 2019 (90 days)**

- Co-financing OCEF (in the form of a grant) coupled with technical assistance to applicants

- All project developers / applicants contribute 25% - 75% of the financing to realize their business plan.

- Environment, gender, social inclusion, safety and health considerations to be addressed

- More information at: [https://ocef.bj](https://ocef.bj) and OCEF’s Linkedin Page
Let’s keep in contact

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OCEF - Off-Grid Clean Energy Facility

www.benin-energie.org