

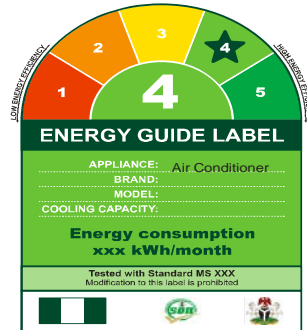
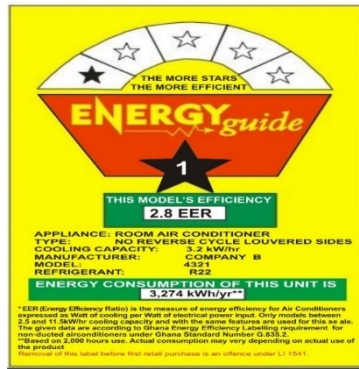
Energy Efficiency Appliances & On-Bill Financing Virtual Workshop

Workshop Interactive Webinar, Date: 29th July 2021

Regional program and policies for dissemination of energy efficient appliances and equipment (MEPS and energy labelling, market potential, Impact...)

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ENERGY EFFICIENCY PROGRAMMES



Regional Energy Efficiency standards & labelling implementation at national level

Energy Efficiency in industry

Energy Efficiency in buildings

Clean cooking fuels and stoves

High Performance Distribution of Electricity

Energy Efficiency in transportation:
Electric Cars

Energy Efficiency in lighting – domestic and public

ECOWAS Directives for Efficient fuels

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With respect to energy efficiency opportunities, there is significant potential to improve the demand side and supply side EE in buildings, appliances, power generation and transmission -

- Industry
- It is estimated that in ECOWAS, 25% to 30% of the total electricity supply is consumed in the building sector, namely cooling and hot water heating
- The technical and commercial energy losses due to theft and/or illegal operators lie in the range of 25% to 30% (with a number of sources pointing to 40%)
- This is quite high in comparison to the 7% to 10% range of energy theft in Northern America and Western Europe.

- The energy efficiency program will aim to implement measures that would free 2,000 MW of power generation capacity.
- Based on preliminary projections developed by the UNEP/GEF, by transitioning to efficient on-grid lighting, for example, the ECOWAS Region could attain annual energy savings of approximately 6.75% of total electricity consumption.
- These savings would be enough to supply the total annual electricity consumption of at least 2.4 million households.
- In monetary terms, regional annual financial savings on electricity bills, from transitioning to efficient lamps, could exceed US\$220 million.

1. Standards and Labeling:

- Market assessment of key energy-using appliances and assessment of costs & benefits
- Development of MEPS and EE labeling for electrical appliances
- Implementation of MEPS and EE Labels
- Capacity Building and Awareness Raising on MEPS and Labels

2. Result achieved :

- Regional MEPS for On-Grid Efficient Lighting Developed and Adopted by ECOWAS Ministers of Quality Standards
- Regional MEPS for Off-Grid Efficient Lighting Developed and Approved by ECOWAS Ministers of Quality
- Regional MEPS for Air-Conditioners
- Regional MEPS for Refrigerators

3. Opportunities and Future Prospects

- Support the implementation of Regional MEPS in ECOWAS Member states at national level

Standards and Labeling

Project S&L 1:

Establishment of Testing Laboratory for Clean Cooking, EE Lighting and Appliances, and Capacity Building at TGSB

- GEF- Unido Contract: 3000072500
- Period: August 19, 2019 to October 2021

Description:

- Design and procure Testing facility for TGSB.
- Conduct Capacity development (EE lighting and Clean Cooking)

Achievements

- i. First progress report completed (A combined inception workshop and EE Compliance labelling)
- ii. Second progress report: Ready and waiting for final selection of the type of testing facility for TGSB

Remaining activities to complete the project:

- Capacity building for key stakeholders in the Gambia

Challenge:

Procurement period for testing facility



Project S&L 2:

DEVELOPMENT OF TRAINING PROGRAMMES FOR TECHNICAL AND MARKETING SKILLS FOR ENERGY EFFICIENCY AND CLEAN COOKING SOLUTIONS

Description:

General objective of the assignment:

- Development and implementation of training programmes for technical and marketing skills for Energy Efficiency and Clean Cooking Solutions.

Specific Objectives

- **For EE appliances:** conduct capacity building in marketing, distribution, installation and maintenance for key stakeholders, including women and youth
- **For clean cooking solutions:** enhance existing capacities of Improved Cooking Solutions (ICS) producers in the country,
- Identifying capacity and knowledge gaps of key stakeholders,
- Efforts to be made to ensure that at least 40% of the training participants are women, at least 40% are under 35 and at least 1/3 are from provinces outside of the Greater Banjul Area

Project S&L 2:

Development of Training Programmes for Technical and Marketing Skills for Energy Efficiency and Clean Cooking Solutions

Achievements

- i. ToR for consultancy services developed and published

Remaining activities to complete the project:

- Selection of consultancy services
- Inception workshop
- Capacity building for key stakeholders in the Gambia

S&L: Project 3: AGOSEREE Project

Project Description: Development of 3 new Standards for electric Appliances

- Minimum energy performance standard for electric comfort fans
- Minimum energy performance standard for televisions
- Minimum energy performance standard for electric storage water heaters
- Review of ECOSHAM process

Achievement:

- ECOSTAND 081 : 2020 : MEPS for Electric fans
- ECOSTAND 084 : 2020 : MEPS for TV
- ECOSTAND 085 : 2020 : MEPS for water heaters
- TMC Meeting in Abidjan (April 6-8, 2021) on Review of ECOSHAM process

Energy Efficiency in Lighting

Objectives :

- Development of regional efficient lighting strategy
- Supporting Policies and Mechanisms to implement MEPS
- Monitoring, Verification and Enforcement (test laboratory and accreditation, etc.)
- Environmentally Sound Management of used products (regulation, collection, etc.)

Achievement

- Development of Ecowas Energy Policy (EEP)
- Development of NEEAP
- Elaboration of Regional Status Report on Efficient Lighting
- Development and adoption of Regional Strategy on Energy Efficient Lighting

Opportunities and Future Prospects

- Phasing out inefficient lights by
- Harmonization of National MEPS at regional level





Introduction

- Industrial energy database and energy consumption benchmarks
- Development of programs/projects , implement EnMs (ISO-50001)
- Promotion of Energy Efficiency Service Companies “EESCOs” (audits, ESPC, etc.)
- Awareness raising and Capacity building on energy efficiency in industry

Results achieved

- Review of measures to promote energy efficiency in the industrial sector
- 160 experts trained in 8 ECOWAS members states for the establishment and management of Energy Performance Services and the use of EE Energy Performance Contracting, measurement and verification of EE measures
- Promotion of EE Market and Energy Performance contracting: Benin, Burkina Faso, Mali, Niger, Senegal, Togo)
- Introduction or ISO 50001 standard
- Capacity building on RETScreen Expert

**Improving Nigerian's Industrial Energy Performance and Resource Efficient Cleaner Production through Pragmatic Approaches and the Production of innovation in Cleaner Technology Solutions
ISO 50001 and ISO 140001**

Achievement:

- Project document formulated: June 2020
- Project approved by UNIDO and GEF

Next steps:

- Signing of project by ECOWAS
- Preparation of project implementation schedule
- Inception Meeting with MAN and ECN, FMP.

EE Industry Project _2 New Project in process

ECOWAS Industrial Energy Efficiency Programme

- UNIDO Contract No.
- Project Period:
- Project Amount: 7,000,000 US\$

Achievement: ECOSTAND 085 : 2020

- Project document formulated
- Project document sent to ECOWAS President

Next steps:

- Signing of project by ECOWAS President
- Approval of Project by EU Commission

Regional Data Base for Electrical Appliances Products Registration based on ECOWAS MEPS

Product Registration System

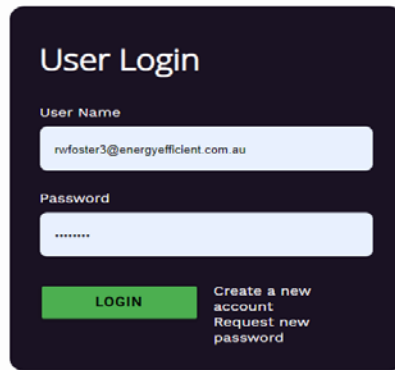
- A tool used to capture specific information on products used to underpin policies or programs.
- Product Registration Systems form the initial compliance gateway for products to enter into the market.
- Currently, a number of product registrations systems are already in use, such as in Australia, China, Europe, India the United States, Canada

Achievements:

- **Beta version of data base designed**
- <https://v2.ecowasprs.aspirestaging.com.au/welcome/>
- Organisation of workshop for focal Points at the Ministries of Energy
- Organisation of workshop with Custom officers
- Organisation of Workshop with standards bodies
- Beta version tested by countries
- Data base approved by members states
- Data base incorporation in the ECOWAS standards and labelling, by the TMC in Abidjan, Cote d'Ivoire.

ECOWAS Regional Data base for Electrical Appliances

<https://v2.ecowasprs.aspirestaging.com.au/welcome/>



The web based on-line product registration system offers two main facilities to applicants:

1. Product registration application forms. The information necessary to register a product that is not already registered in that country
2. Import notification application forms The information necessary to support an application to import a regulated product
 - If the product is not already registered in the particular country of import then a “product registration application form” must first be completed
 - This web based facility also provides facility for you to conduct a search to see if the product you intend to sell or import is already registered

Challenges:

Perdiem Payment suspended after being approved by ED

- Organisation of workshop for focal Points at the Ministries of Energy
- Organisation of workshop with Custom officers
- Organisation of Workshop with standards bodies

Multi-Country Regional Project: Leapfrogging to Energy-Efficient and Climate-Friendly Lighting, Refrigerators and Room Air Conditioners in the ECOWAS Member States

Objective

- The project aims to help the 15 member countries leapfrog to superior lighting and efficient refrigerator and air conditioners.
- enhancing stakeholder capacity for pursuing strategic priorities electrical appliances
- implementing a framework for MEPS and labels and
- Creating greater knowledge sharing and learning for consumers from the residential and public sector on purchasing efficient electrical appliances

Workshop

- The virtual workshop organized by the ECOWAS Centre for Renewable Energy and Energy Efficiency (ECREEE), in collaboration with the United for Efficiency (U4E), and the African Development Bank (AfDB) on the 17th May 2021

Capacity Building on Energy-Efficient Distribution Transformers for ECOWAS Member States

Goal: Design, organize and deliver a tailored remote Capacity Building Training Session on Energy Efficient Transformer equipment for the Member States of the ECOWAS region in West Africa.

Partners: U4E, AfDB,

Collaboration with AfDB

Project 2: Improved Clean Cooking Solutions

Objectives

- i. Improve living conditions (economic, social and health) of the population of ECOWAS countries through increased access to clean cooking facilities
- ii. Reduce local deforestation and greenhouse gas (GHG) emission which has adverse environmental impacts.
- iii. Promote the adoption of clean and efficient cooking equipment and disseminate sustainable biofuels and modern fuels for all households of ECOWAS,
- iv. Ensure the quality and sustainability of cooking equipment distributed in terms of environmental performance and public health in the ECOWAS countries,

Technical Assistant to ensure the long term sustainability of CEMG in Bambadinca and Bissora in Guinea-Bissau

Project Description:

- Two CEMGs, in Bambadinca and Bissora, are not working up to their full potential due to several technical and managerial issues.
- A consultant was recruited in order to do an analysis of both CEMG and propose improvements.



- Evaluation work done

Diagnostic de la minicentrale Bissora

- Capacité de produire 851 MWh soit 269 MWh supplémentaires par rapport à son état actuel.
- La prise en compte des 273 clients potentiels nécessitera une extension de la minicentrale.
- En tenant compte de l'espace disponible, il serait possible d'ajouter un champ PV additionnel de 289 kWc sur une surface d'environ 1 hectare.





Praia - February 8th, 2019 –

The Prime-Minister of the Republic of Cabo Verde, the Executive Director of ECREEE and the Chargé d’Affaires of the Embassy of Luxembourg, inaugurate the debut of the first seven vehicles 100% electric in Cabo Verde. This was the beginning of a process, which according to the Government of Cabo Verde, will culminate in the next decades by achieving the goal of phasing out the use of fossil-fuel based vehicles.

Merci



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