

Market Monitoring, Verification and Enforcement for EELA

Challenges and Opportunities of implementing MV&E in an Import Oriented Market

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Mr. My K. Ton



Presentation Objectives

To highlight some challenges to implementing measurement, verification and enforcement (MV&E) framework in the context of an import-oriented market, the opportunities to address these challenges, and lessons learned from other regions.

Note: MV&E and MVE are used interchangeably.



Presentation Outline

1. MV&E in context
2. MV&E implementation challenges
3. Opportunities and examples
4. Takeaways



Introduction: MV&E

Rationale

- Establishing energy performance through product testing is an essential component of any standards and labeling program (S&L),.
- Market monitoring, verification, and enforcement (MVE) testing schemes play a key role in ensuring that products can satisfy program requirements as well as meeting consumer expectations.
- The systematic performance testing of products is a critical programmatic investment because the process relies upon internationally agreed upon test methods, sophisticated equipment operated in controlled environments, and experienced technicians.

Governments implementing energy efficient S&L policies need to also consider how to allocate scarce resources to support their MV&E activities.

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MV&E Implementation: Challenges

The “3 Cs” of MV&E implementation challenges:

- **Cost:** Establishing an MV&E infrastructure requires resources for planning, development, and implementation, including an effective enforcement scheme for non-compliant products.
- **Capacity:** Depending on the appliance, MV&E implementation requires reliable test methods, experienced laboratory/staff, and trained inspectors/monitors.
- **Coverage:** MV&E programs are challenged in monitoring the market for product compliance in a statistically meaningful way.

Governments implementing energy efficient S&L policies must consider how to also allocate resources to support their MV&E activities.

MV&E Implementation: Challenges

The “3 Cs” of MV&E implementation in the context of an import-oriented market:

- **Cost:** Cost for an import-oriented market will be specific to local situations and the MVE framework in place.
- **Capacity:** Import-oriented market may lack locally available capacities such as experienced laboratories/staff, and support from domestic suppliers/stakeholders.
- **Coverage:** Depending on how appliances are imported and distributed, adequate monitoring coverage may not be prohibitive. Second-hand appliance market can also be a significant factor.

Import-oriented market can exacerbate certain aspects posed by the 3 Cs of MV&E challenges.

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MV&E Implementation: Opportunities

Some ways to manage MV&E costs:

- **Adapt program entry conditions to local market situation:** For example, Ghana, Malaysia, and USA EnergyStar programs have entry conditions that minimize the need for each program to conduct actual testing of products:
 - *The Ghanaian program's entry conditions require suppliers to provide proof of compliance upon registration.*
 - *The Malaysian program requires suppliers to provide proof of compliance, including test results prior to the issuance of the certificate of compliance (COA).*
 - *The USA EnergyStar program requires all labeled products to be third-party certified for listing in the product database.*

Building test capacity to meet market coverage is an expensive proposition, both in terms of initial and on-going maintenance investments.

MV&E Implementation: Opportunities

Some ways to increase MV&E capacities :

- **Capacities such as testing can be increased through international/regional cooperation and resource sharing:**
 - *The International Energy Agency's 4E Solid State Lighting Annex adopted strategies leveraging available resources to accelerate and build capacity for testing of LED products.*
 - *The US DOE and Natural Resources Canada (NRCAN) have a broad Memorandum of Understanding (MOU), affording access to technology energy efficiency-related studies, including test results conducted for the DOE by its national laboratories, and by Canada's research institutions.*
 - *The ASEAN SHINE project aims to support the harmonization of test methods and MEPS for ACs in ASEAN, which in the long run will help to reduce the cost of testing and compliance for both suppliers and MVE agencies.*

A product registration database can be an effective tool for resource sharing and regional cooperation

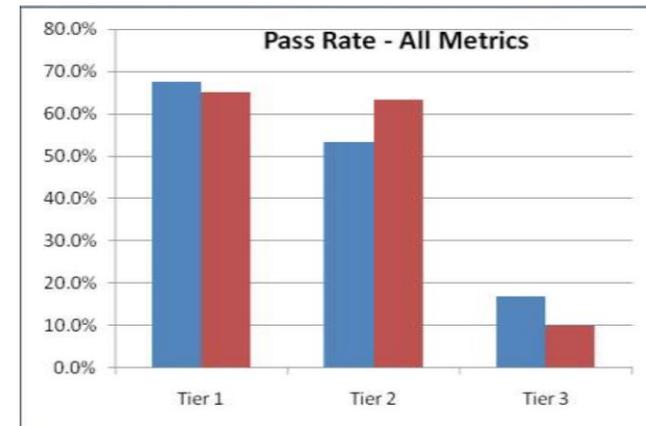
MVE Implementation: Opportunities

Some ways to increase market monitoring effectiveness and coverage:

- **“paper” product screening, and low-cost testing methods** can help to extend market monitoring coverage:
 - *Denmark focusses its market surveillance on document examination and only conducts tests by exception. It is a much more cost effective technique for market surveillance than testing.*
 - *Lithuania’s inspectors measure TVs’ standby and off-mode consumption using a hand-held instrument when visiting shops. Appliances on display can be assessed quickly with no significant testing costs beyond the initial purchase of the measuring instrument.*
 - *Australia and others rely on “check” tests designed to measure key performance parameters of products as indicators of their overall performance or compliance risk.*

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MV&E Implementation: Some Takeaways

Some ways to increase market monitoring effectiveness and coverage:

- *Successful programs put the onus on suppliers to provide proof of conformance, while devoting their MVE resources to conduct market surveillance and inspection adapted for their situation.*
- *Co-ordination of market surveillance has provided essential support to individual Market Surveillance Authorities, especially for import-oriented markets. But, co-operation will take time to build and take full effect.*
- *Governments and programs do operate or leverage test laboratories equipped with high quality test instrumentation and staffed by persons with specialist knowledge. Such facilities are needed to conduct research on performance of appliances, and evaluation of new or emerging technologies.*



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CONTACT UNIDO

Ms. Karin Reiss, email: K.REISS@unido.org

EACREEE

Mr. Fungai Matura, email: info@eacreee.org

Mr. Denis Ariho, email: info@eacreee.org

SACREEE

Mr. Readlay Makaliki, email: energy@sacreee.org

For further information, visit:

www.eacreee.org | www.sacreee.org | www.unido.org

