

Energy Efficiency Standards and Labeling

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Overview of Energy Efficiency Standards and Labeling

Overview

- **Energy Efficiency Standards and Labelling (S&L) are mainstream energy policy tools**
- **Some 50 countries around the world have elements of an S&L program**
- **As many as 40 different product types are covered by S&L programs**

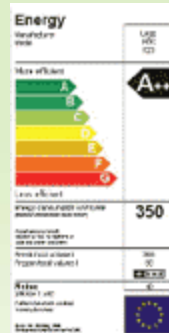
Energy Efficiency Standards

- **Prescriptive Standards**
- **Minimum Energy Performance Standards (MEPS)**
- **Class-average Standards**



Energy Efficiency Labeling

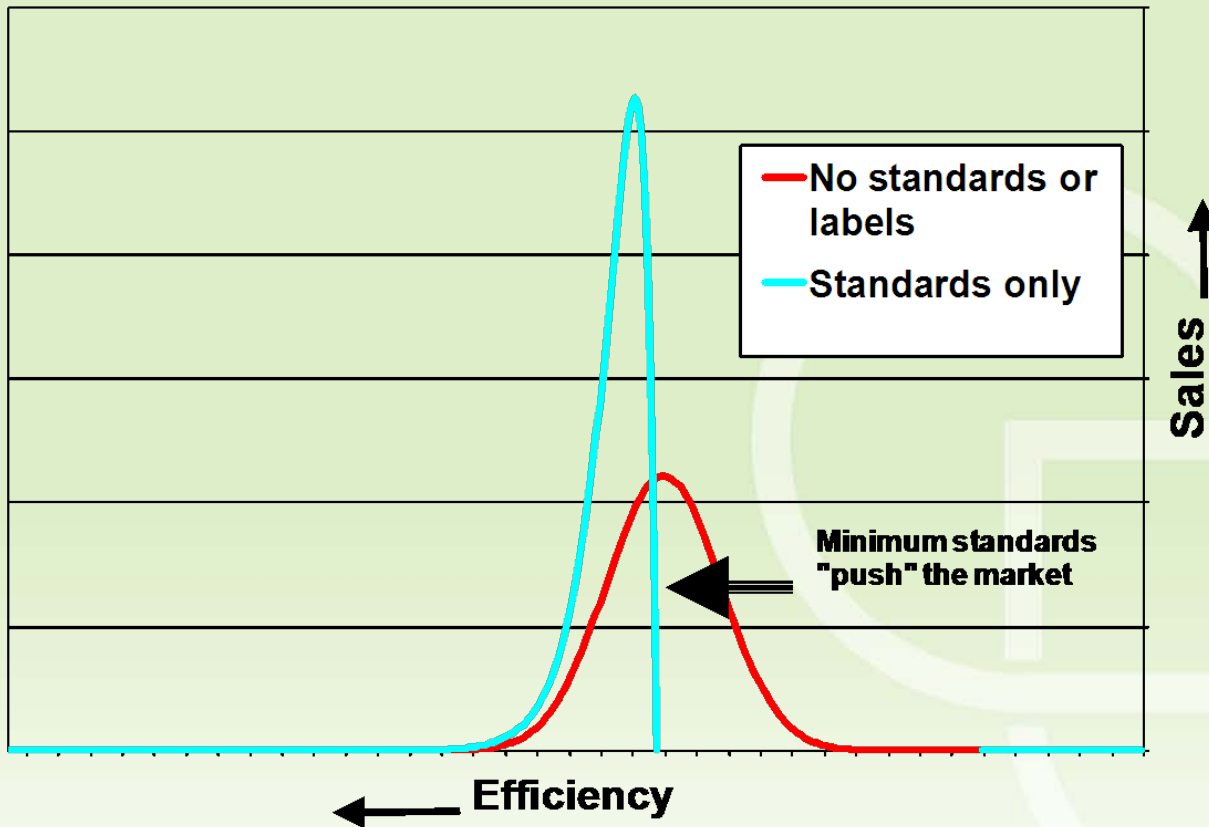
Comparative Label



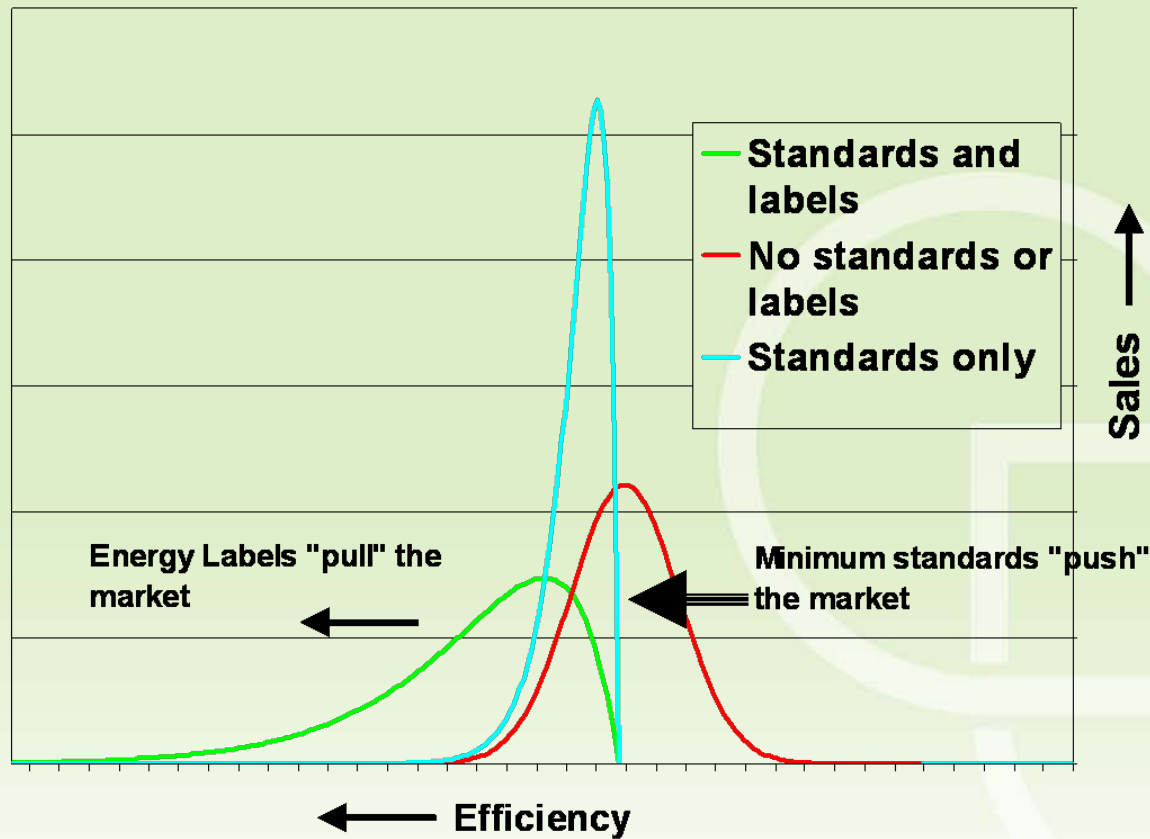
Endorsement Label



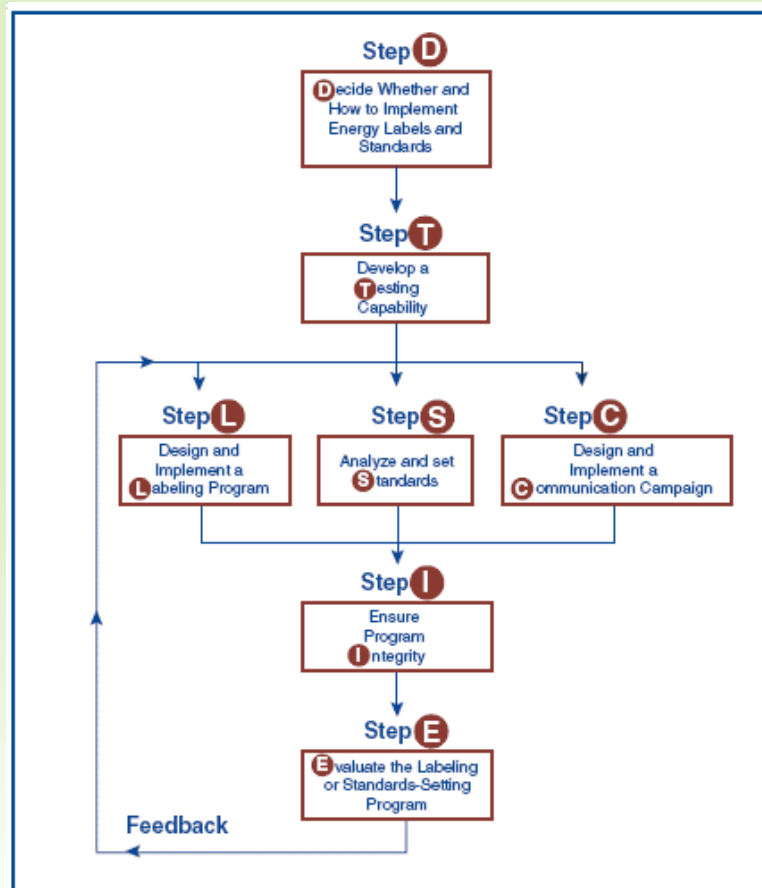
Energy Efficiency Standards “Push” the Market Towards Energy Efficiency



Energy Efficiency Labeling “Pull” the Market Towards Energy Efficiency



Implementing Energy Efficiency Standards and Labeling Programs



Rationale for Energy-Efficiency Labels and Standards

Reduce Capital Investment in Energy Supply Infrastructure

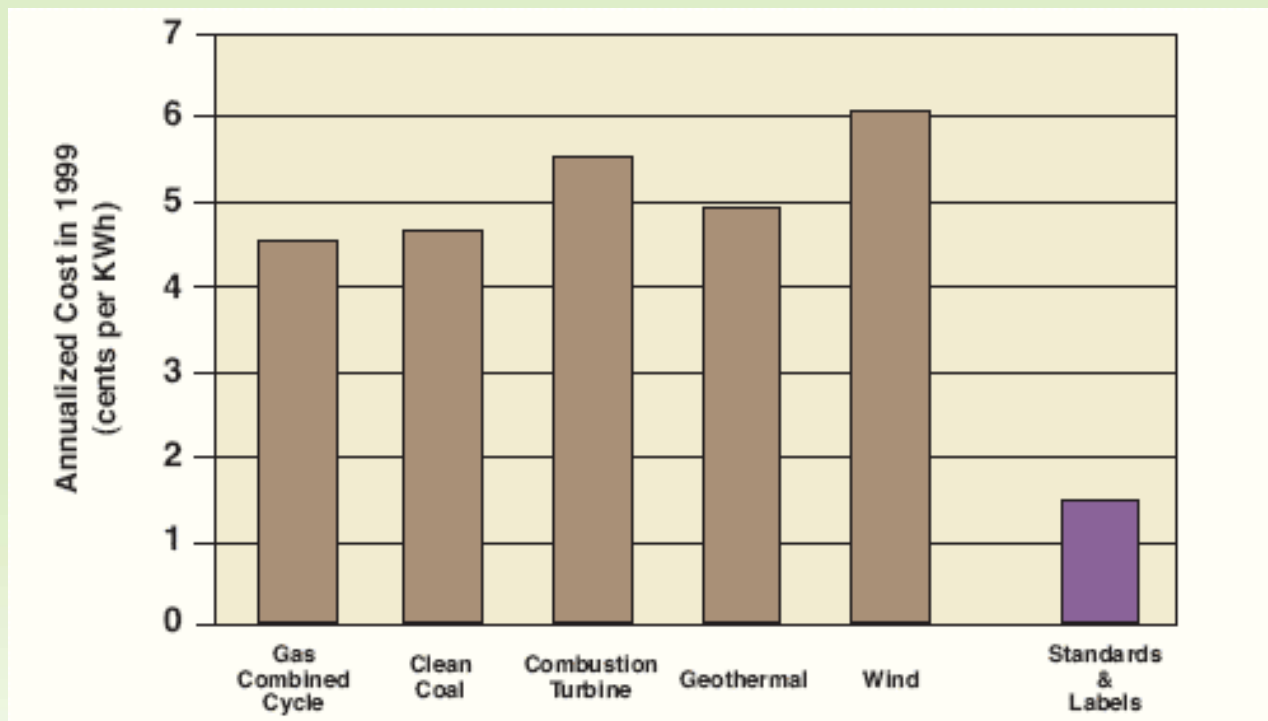


Figure 2-2 The cost of electricity in the U.S. from various new sources
Source: U.S. Energy Information Administration's National Energy Modeling System and (Meysers 2004)

Promote Competitiveness of Domestic Manufactures



Avert Urban/Regional Pollution



Meet Climate-Change Goals



Collaborative Labeling and Appliance Standards Program (CLASP)

The Collaborative Labeling and Appliance Standards Program (CLASP) serves as a leading international voice and resource for energy efficiency standards and labeling (S&L) for major appliances, equipment and lighting products.

In the fight against climate change, S&L offer enormous carbon reduction potential and are an especially cost-effective policy option for conserving energy – standards can save consumers money, reduce power demand, and slash greenhouse gas emissions.

CLASP's primary objective is to identify and respond to the assistance needs of S&L practitioners in targeted countries and regions while making the highest quality technical information on S&L best practice available globally.

CLASP's Funders



Climate Works Foundation



Established in 1999, CLASP joined the ClimateWorks Network as a **Best Practice Network (BPN)** in March of 2009. As a BPN, CLASP has expanded its efforts to improve energy efficiency in appliances, lighting, and equipment, and reduce the emission of greenhouse gases that cause climate change.

The ClimateWorks Foundation is a private foundation located in the United States, with a globally distributed network of philanthropic, technical, and policy advocacy organizations.

- China
- India
- European Union
- Latin America
- United States
- Cross-cutting/Research

CLASP collaborates with several **Regional Climate Foundations** (RCFs) supported by ClimateWorks globally, including **Shakti** in India, the **European Climate Foundation**, the **Energy Foundation** in the United States, and the **China Sustainable Energy Foundation** (CSEP).

- Support Monitoring, Enforcement, and Compliance of national S&L program in China
 - Round-robin testing for room Air Conditioners
 - Check-testing for 8 different products
- Air Conditioner Metering Campaign
 - To continue through 2010
- S&L Program Evaluation
 - Consumer awareness survey of information label launched in January 2010
- S&L for Computers & Servers
 - Technical support and coordination from CLASP, CSEP, LBNL, and CNIS

- Technical Analysis on Standards
 - Launched RFQ in January 2010: “Study to Assess Barriers to Improving Energy Efficiency in Heating Appliances/Systems for New and Existing Buildings in EU and EEA Member Countries and Propose Cost-Effective Solutions to Removing Them”
 - Technical Analysis for Air Conditioners forthcoming; working to identify additional products for analysis, per the EC’s calendar
- Analysis on Compliance and Monitoring in the EU and Member States
 - Launched RFQ February 2010: “Study to Assess the Monitoring, Verification and Evaluation (MV&E) Capabilities and Practices for the Implementation of the Ecodesign and Labelling Directives in each EU Member State and EEA Country”
- Technical Analysis on Labeling
 - Developing revised strategy to address issues concerning implementation of new label, including preparing for its scheduled revision in 2014, and monitoring of its impact on market uptake of energy efficient products

- Support BEE in Developing S&L for New Products
 - Draft Policy brief forthcoming
 - Baseline and S&L Thresholds for Consumer Electronics
 - Baseline and S&L Thresholds for Additional Products
- Impact Assessment and Monitoring
 - Phase 1 of Impact Assessment for Refrigerators and Air Conditioners S&L Program complete; Second Phase initiated
 - Impact Assessment for additional products forthcoming: ceiling fans, televisions, storage water heaters (geysers), and fluorescent tube lights
 - Providing staff support to BEE
- Support Shakti in Promotion and Outreach activities
- Harmonization of Test Procedures for Computers & Servers
- Report on Market Transformation Strategies forthcoming (3 Products)

Latin America

- Support to CONUEE of Mexico
 - Focusing on MEPS for high energy savings potential
 - Perspective to align with US and Canadian standards
- Support to Fundacion Chile/CNE-PPEE
 - Technical Assistance on complementary policies and evaluation of certification system
 - Technical Assistance on EE standards and MEPS for gas appliances
- Support to ENARGAS of Argentina
 - Technical Assistance on EE standards and MEPS for gas appliances
- Collaboration with OLADE (Latin America Energy Organization; Quito, Ecuador)
 - For regional trainings on S&L Building Blocks

United States

- Initiated work on a snapshot study of US compliance
 - For EnergyGuide, Energy Star, and Federal Energy Efficiency Standards
- Coordinate US Labeling Working Group
 - Collaborating with ASAP, NRDC, ACEEE, Alliance to Save Energy
- Provide ASAP working groups with product-specific expertise and technical analysis for standards development

Cross Cutting/Research

- *Assess Opportunities for Success and CO₂ Savings from Appliance Energy Efficiency Harmonization* (Paul Waide)
 - The objective of this study is to document the products and regions wherein Standards and Labeling harmonization has succeeded or is likely to succeed or where there is alignment potential; the resources required for that success; the energy and CO₂ savings likely attributable to that success; as well as estimates of the overall cost savings resulting from reduced transaction costs as a result of a harmonized standard versus varying standards by country.
- *Monitoring, Verification, and Enforcement* (Mark Ellis)
 - The objective of the study is to survey and then develop a better understanding of best practices for establishing effective frameworks and sets of MV&E activities.

Cross Cutting/Research

- Product Benchmarking & Scorecard of S&L Programs
 - Study to Provide International Comparison of Energy Efficiency Performance and Policy Measures for Heating Appliances Used in Residential and Commercial Sectors
 - Study to Provide International Comparison of Energy Efficiency Performance and Policy Measures for Air-conditioners Used in Residential and Commercial Sectors
 - Additional products forthcoming: lighting, televisions, motors, and domestic refrigeration
- Convening Experts: International Workshop on Computers & Servers
- Latin America Regional Training with OLADE

Regional Collaboration and Other Countries



Cooperative Energy Efficiency Design for Sustainability (CEEDS) Program

- Collaboration with Asia Pacific Energy Research Center (APEREC) and LBNL
- Support an analysis of the potential impacts of EE S&L programs being considered by 6 countries using a refined BUENAS (Bottom-Up Energy Analysis System)
- Focusing on residential appliances in China, Chile, Malaysia, Philippines, Vietnam and Thailand
- 2 Workshops: October 2009 and March 2010

APEC ESIS · www.apec-esis.org

CLASP Serves as the Secretariat for the Asia Pacific Economic Cooperation's Energy Standards & Information Systems Site

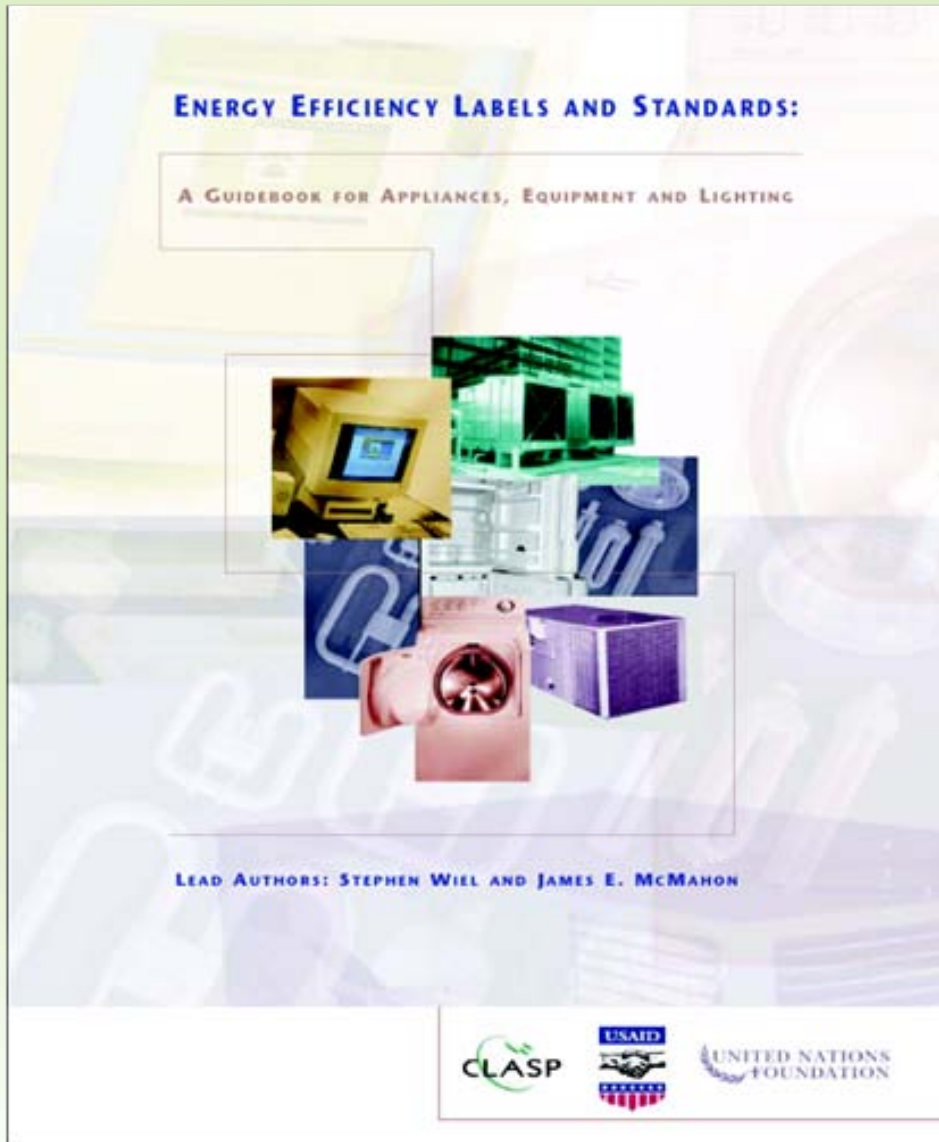
The primary objectives of ESIS are to provide:

- Up-to-date information on appliance and equipment energy standards and regulations;
- Links to experts and information related to standards and regulations used by APEC and other economies;
- A regular newsletter with listings of new and proposed standards in the region;
- A way for Key Contacts in APEC economies to review standards listings for all economies so that they can be updated systematically, on a regular basis;
- "Communities of Practice" for experts and officials to discuss efforts to harmonize and rationalize the testing, labeling, and minimum energy standards for specific appliances and equipment.

Pending funding and opportunity, as well as taking into account global potential and country priorities, **CLASP** will work with non-ClimateWorks Foundation target countries and regions



Guidebook



For more information, please visit

www.clasponline.org

