### **Model Regulation Guidelines**

# Energy Efficiency and Functional Performance Requirements based on International Standards



#### **BACKGROUND**

The electricity demand in developing and emerging countries is expected to more than double by 2030. Consequently, dramatically increased greenhouse gas emissions are predicted. High-efficient technologies available as of today offer impressive energy improvements, in fact energy-efficiency is one of the most effective ways to reduce electricity consumption and to mitigate climate change.

#### **AIM**

The Model Regulation Guidelines intend to

- help inform regulatory authorities and policy makers in developing and emerging economies
- and set a minimum efficiency floor to prohibit future sales of inefficient products from the market

**Light Bulbs** 



Residential Refrigerators



Room Air Conditioners



Electric Motors Distribution Transformers





#### GLOBALLY APPLICABLE MODEL REGULATIONS

Governments can establish cost-effective policy measures that remove the least efficient products from the market and accelerate the adoption of the highest efficiency models. In order to help countries in the transition, United Nations Environment Programme (UNEP) United for Efficiency (U4E) initiative has developed Model Regulation Guidelines which aim to simplify the deployment, adoption and enforcement of regulations in developing and emerging countries.

The documents contain all essential pieces, including products scope, definitions, test methods, minimum efficiency levels, and a set of minimum performance requirements along with market surveillance to ensure consumers satisfaction. The Model Regulation Guidelines are a supplement to the Policy Guides which is one of a series along the five focus products of U4E: Lighting, room air conditioners, residential refrigerators, electric motors, and transformers.

## The Model Regulations Guidelines support the global market transformation to energy-efficient technologies





As described in the Model Regulation Guidelines, U4E encourages countries to follow a five-stage Policy Integrated Approach to transform their markets with efficient, quality lighting, appliances and equipment.

#### SUPPORTED BY VAST GLOBAL EXPERTISE

The development of the Model Regulation Guidelines involved close collaboration with many public and private stakeholders, all sharing the common objective to accelerate the transition towards energy efficient lighting, appliances and equipment. It has been reviewed by leading environmental groups, technical institutions, national/regional governments and by leading manufacturers.

#### **ELECTRICITY SAVINGS FOR THE FIVE MAIN PRODUCTS IN 2030\***

**1,100 TWh** of electricity consumption, which is equivalent to approximately:

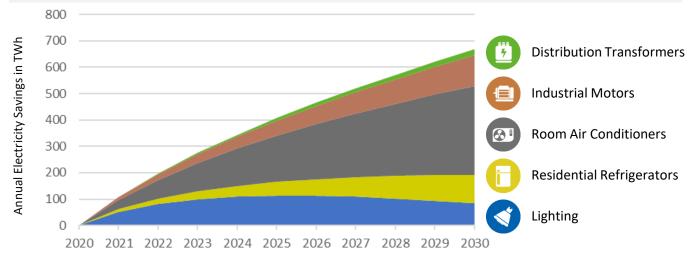
**500 Power Stations** [500 MW each]



990 Million tonnes of CO2



100 Billion USD on electricity bills



<sup>\*</sup>U4E Country Savings Assessments (September 2019), which are derived from the U4E Model Regulation Guidelines

#### **GET INVOLVED**

Governments that are interested in transforming their markets to more energy-efficient and environmentally sound technologies are encouraged to contact U4E for additional guidance and an update on the status of energy-efficient policy developments around the world.

For more information about the Model Regulation Guidelines and other key energy-efficiency market transformation topics please visit our website at http://united4efficiency.org/









