



Update on PREE and CEEDS

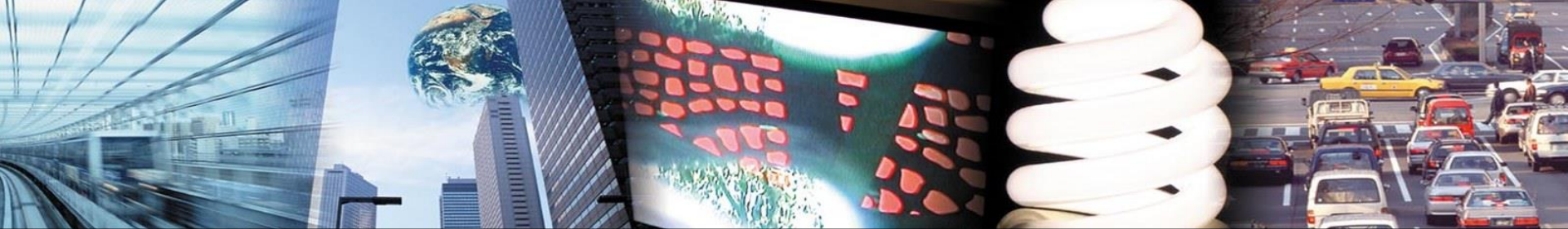
36th EGEE&C Meeting, Sendai, Japan

16 September 2010

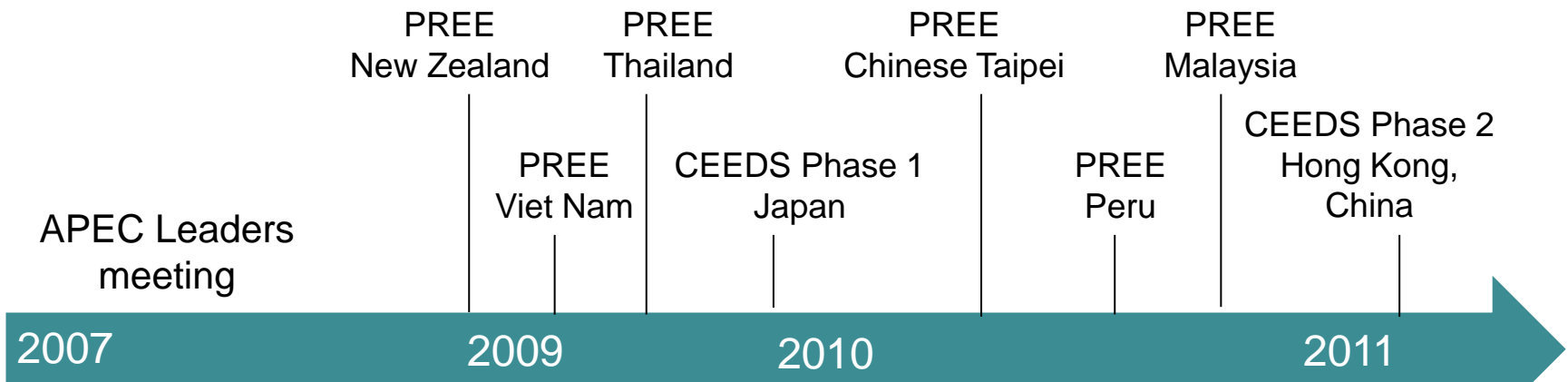
Satoshi Nakanishi
General Manager, APERC



Asia-Pacific
Economic Cooperation



PREE and CEEDS History



2007

APEC Leaders meeting

Declaration to reduce energy intensity of APEC region by 25% by 2030

Introduction of Peer Review Mechanism

2009

PREE Chile

PREE Viet Nam

PREE Thailand

CEEDS Phase 1 Chinese Taipei

CEEDS Phase 1 Japan

2010

EMM9

APEREC reported progress on peer review mechanism

CEEDS Phase 2 Thailand

PREE Chinese Taipei

PREE Peru

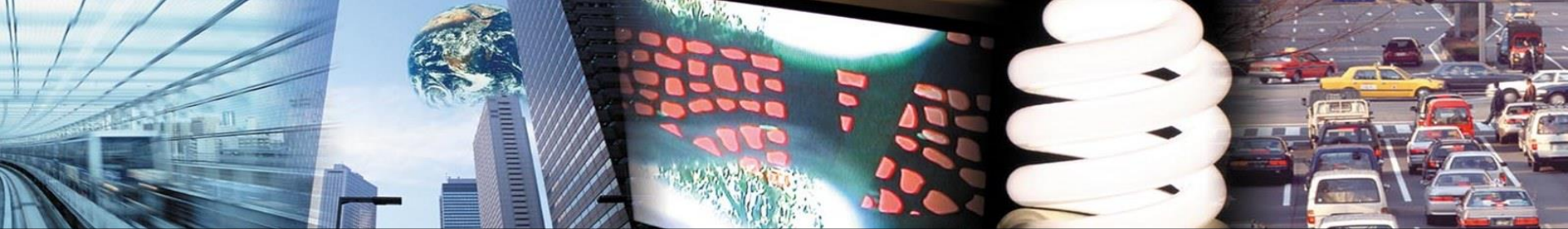
2011

PREE Malaysia

CEEDS Phase 2 Hong Kong, China

The results from the PREE and CEEDS workshops are presented to the EWG

Singapore and Indonesia have expressed an interest to host Peer Reviews



EMM9 Fukui, Japan, 19 June 2010

—Message from APEC Energy Ministers

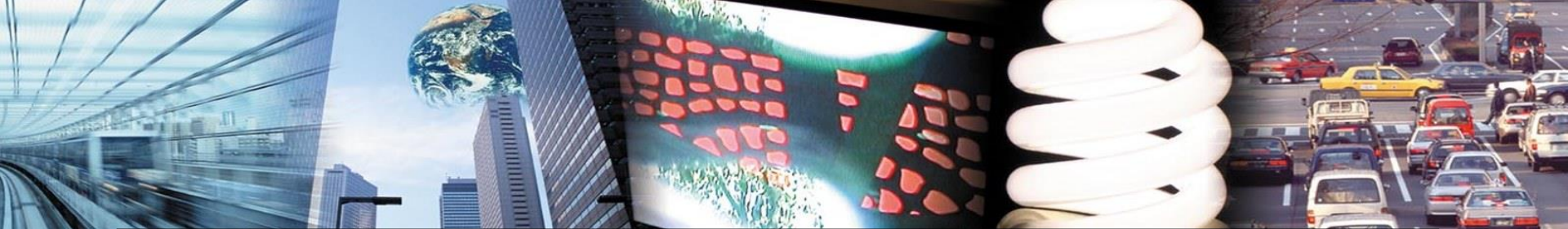
- We commend the Peer Review on Energy Efficiency(PREE) which has been successfully performed for four APEC economies and urge additional economies to participate.
- The aspirational energy intensity reduction goal to reduce the ratio of energy use to economic output by at least 25 percent from 2005 levels by 2030, will be far surpassed if recent trends continue.
We therefore instruct EWG to intensify analysis of the potential for further energy intensity improvement.
- Energy-efficient buildings and appliances are key to a sustainable future since the building sector accounts for two-fifths of energy use in the region.



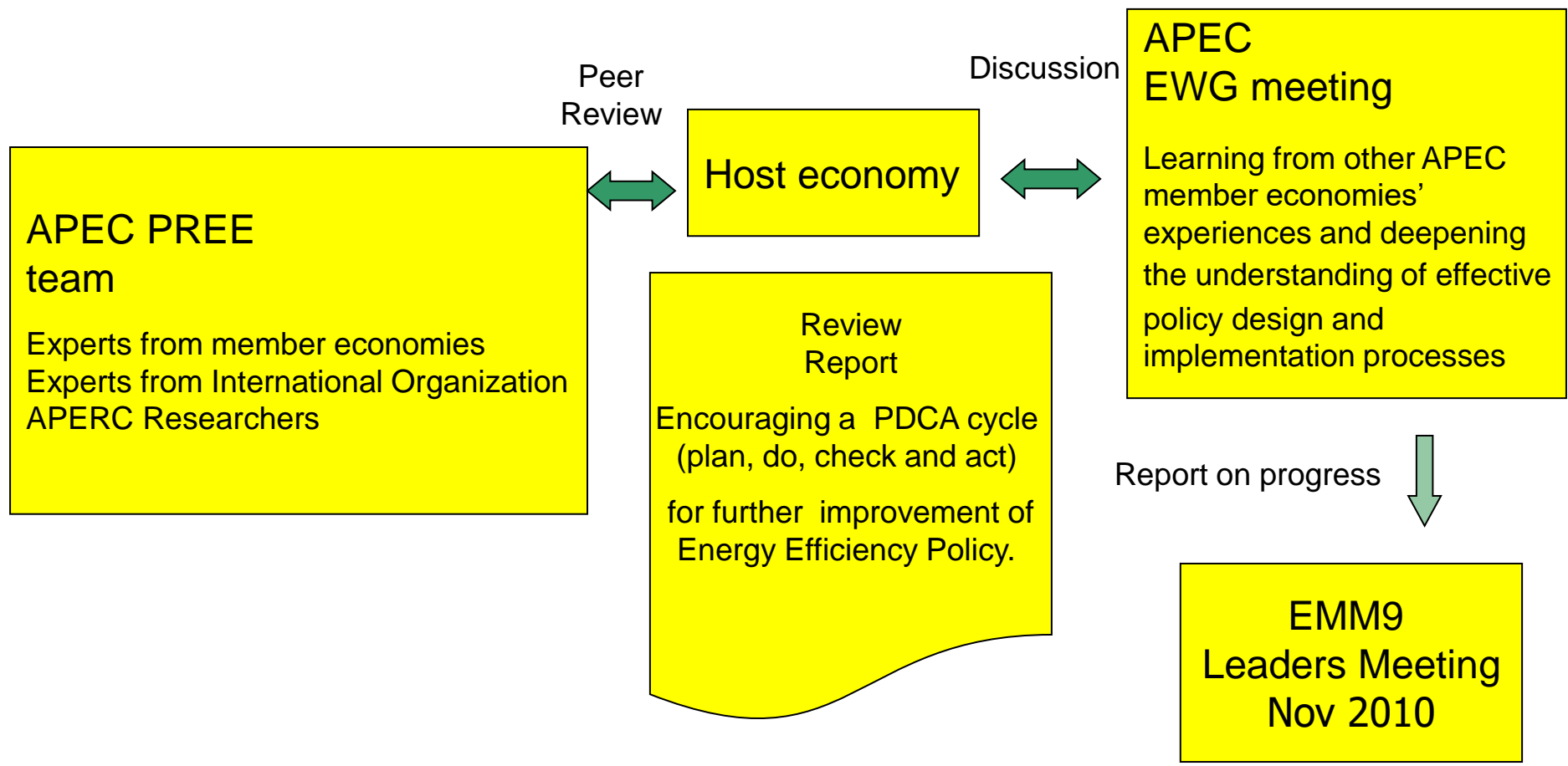
EMM9 Fukui, Japan, 19 June 2010

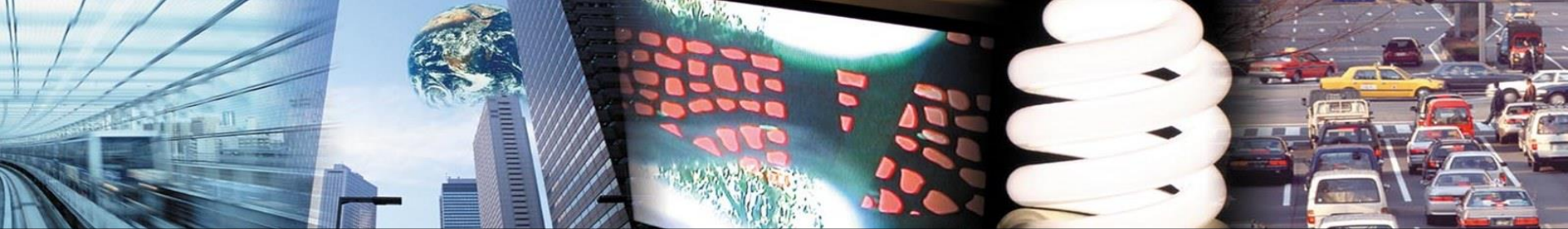
Instructions from APEC Energy Ministers

- We instruct the EWG to assess the potential for reducing the energy intensity of economic output in APEC economies between 2005 and 2030, beyond the 25 percent aspirational goal already agreed by the APEC Leaders, with assistance from APERC, EGEDA and EGEEC
- We instruct the EWG and APERC to keep promoting energy efficiency through the PREE and CEEDS, and to consider follow-up efforts including capacity building activities and policy research support



PREE Mechanism





Review Team & Organizations/Officials Consulted

* Members of the Review Team

	Government Officials	Professors, Researchers, Consultants	International Organization	APERC	Total
New Zealand	1(AUS)	1(CHL)	0	3	5
Chile	1(NZ) 1(CT)	1(US), AUS(1) 1(SIN)	1	2	7
Viet Nam	1(MAS) 1(JPN)	1(US), 1(INA) 1(THA), 1(SIN)	0	3	9
Thailand	1(MAS) 1(SIN)	1(US) 1(INA), 1(JPN)	0	3	8
Chinese Taipei	1(INA), 1(JPN) 1(NZ), 1(SIN)	1(MEX) 1(US)	0	3	9



* Organizations and Officials Consulted

	Government Officials	Private Sector and Industry Associations	Academics and Non-Profit Organizations	Total
New Zealand	24	4	3	31
Chile	17	4	6	27
Viet Nam	12+	6+	3+	21+
Thailand	10	10	0	20
Chinese Taipei	13	10	1	24





Contents of Peer Review Report

- **EXECUTIVE SUMMARY**
- **RECOMMENDATIONS**
- **PART 1 : BACKGROUND INFORMATION**
 - 1. STATISTICS, FORECASTS AND TRENDS IN ENERGY EFFICIENCY
 - 2. ENERGY EFFICIENCY INSTITUTIONS, POLICY AND OBJECTIVES
- **PART 2 : REVIEW TEAM REPORT**
 - 1. INSTITUTIONAL CONTEXT
 - 2. ENERGY EFFICIENCY GOALS, TARGETS AND STRATEGY
 - 3. ENERGY DATA COLLECTION AND MONITORING
 - 4. POLICY MEASURES – SECTORAL ANALYSIS
 - 5. APPLIANCES AND EQUIPMENT
 - 6. RETROFIT PROJECTS AND PROJECT FINANCING
 - 7. EDUCATION, CAPACITY BUILDING AND R&D
 - 8. SWOT ANALYSIS
 - 9. CONCLUSION





Findings – PREE

➤ Some highlights on the 4 PREE Reports

- New Zealand

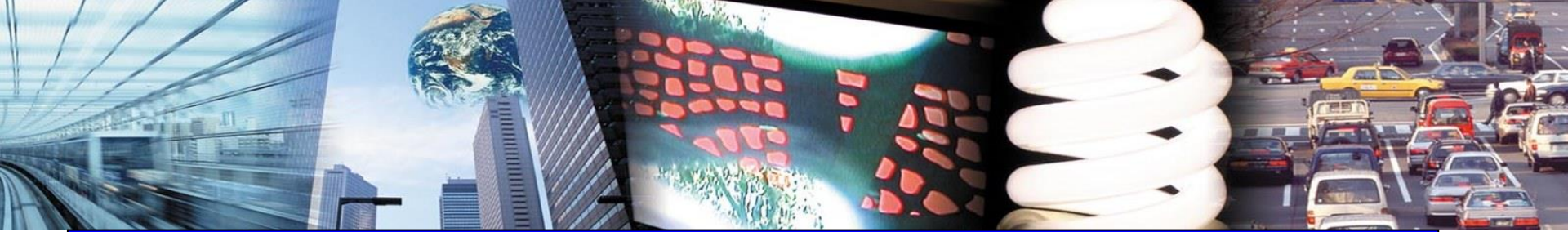
Sectoral-approach in energy efficiency programs with explicit goals and outcomes. The roles and responsibilities of agencies that need to contribute to the EE goals are clearly distinguished.

-PREE team recommended that the implementation of programs needs some flexibility according to the current progress and the allocation of resources should be made inline with that progress.

- Chile

In progress to firm up the policy framework on energy efficiency improvements by creating an entity to promote more vigorously efforts on EE.

- PREE team recommended that the direct involvement of private sector in the new entity shouldn't create a conflict of interest.



Findings – PREE (Continued)

➤ Some highlights on the 4 PREE Reports

- Viet Nam

Developed a comprehensive national energy efficiency improvement plan up to 2015.

- PREE team recommended that the gap between planning and implementation of the National EE Plan should be shortened by better resources allocation and human capital development.

- Thailand

Energy efficiency improvement efforts are well supported through a special fund created from a levy imposed on petroleum products use.

- PREE team recommended that monitoring and evaluation of EE programs should be given more attention and efforts, in order to identify any shortfalls and to gauge the achievement of the programs.



Findings – PREE (Continued)

➤ **Some highlights on the 4 PREE Reports**

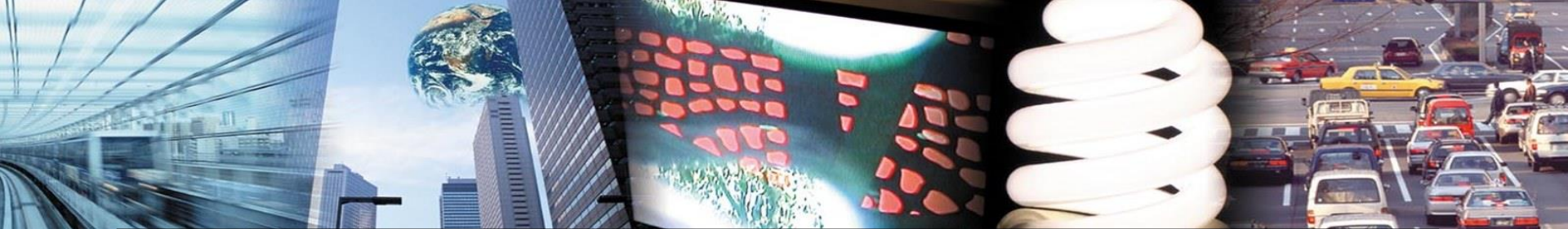
- Energy efficiency and conservation has become one of the important element in the energy policy framework;
- Resources are allocated to the efforts to improve energy efficiency and conservation;
- In developing economies, lacking of a mechanism to monitor and evaluate energy efficiency programs is one of the major barrier. The problem in this area is mainly because of the shortage of human capital and insufficient end-use energy data;
- Transport sector was the most challenging area for policymakers to implement energy efficiency programs– although, all economies have realized the necessity of fuel economy standards policy imposed on vehicle manufacture or sale



Findings – PREE (Continued)

➤ Some highlights on the 4 PREE Reports

- Financial barrier; Lack of *access* to capital and difficulty in getting loan because EE projects are perceived risky by lenders;
- Lack of infrastructure and human resource in some areas such as *standard setting and testing* to ensure full implementation of high performance EE policies;
- Energy subsidy which behaves as a disincentive on energy efficiency improvement; and
- Lack of political will and support to implement more vigorous energy efficiency improvement measures.



Progress – Compendium

Compendium

- ❑ APERC Compendium team collected and compiled **Summary Table** and **Detailed Compendium of EE policies and measures** for 21 APEC economies.
- ❑ Under a common format, information includes each economy's goals, measures and action plan for EE improvement in a comparative manner
- ❑ The first draft Compendium was endorsed at EWG 38 in Bali in Nov 2009.
- ❑ The final draft was endorsed at EWG 39 in March 2010 in Tokyo.
- ❑ The **Summary Table and Detailed Compendium was posted on the APERC website in April 2010.**

Next Action:

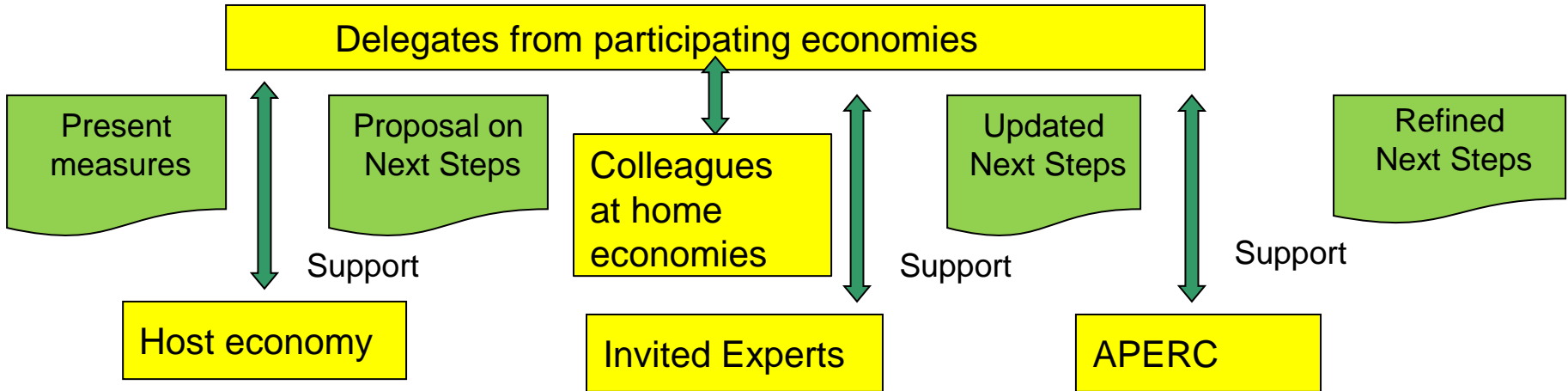
- ❖ APERC should regularly update the Compendium annually.
- ❖ APERC should officially request from, and confirm these updates to member economies.

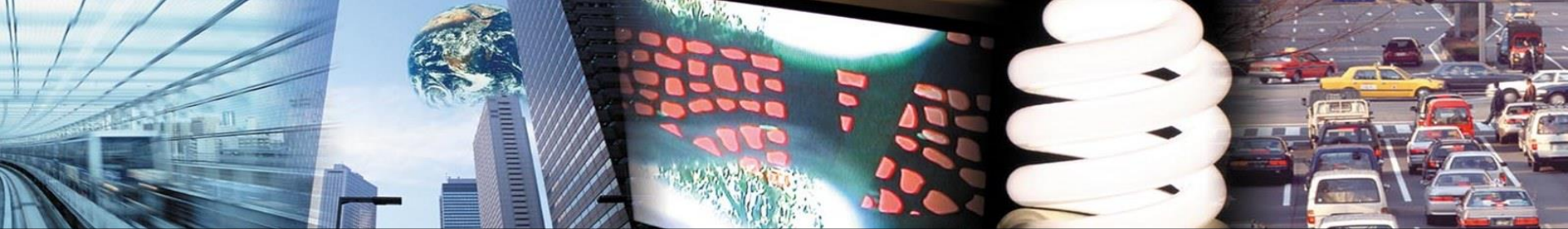


CEEDS Mechanism

- ### 1st Workshop
1. Delegates present the present status of selected measures including barriers /challenges.
 2. Brainstorming on what are the next steps to develop selected measures for each participating economies.
 3. Discussions to identify key points in the next steps.

- ### 2nd Workshop
1. Delegates present updated Next Steps.
 2. Brain storming among participants.
 3. Delegates present refined proposals on the Next Steps.



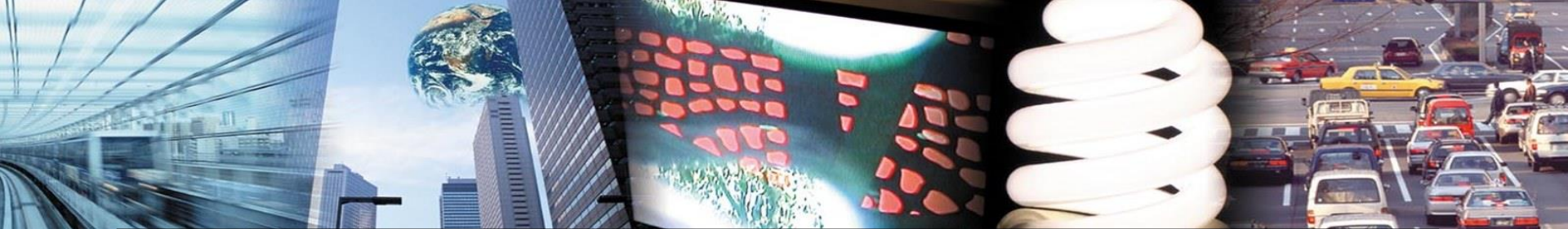


List of Participants (CEEDS Phase 2 in Bangkok)

* List of Members (CEEDS)

	Members	Total
Delegates	1(PRC), 1(INA), 1(MAS) 1(MEX), 1(CHL), 1(VN)	6
Experts	2(US), 1(NZ), 1(SIN)	4
Other Speakers	4(US), 4(THA), 1(HK), 1(SIN), 1(ROK) 1(India), 1(EIA), 1(UNESCAP)	14
Host Economy	4(THA)	4
Co-Host Economy	2(HK)	2
Observer	1(ROK), 1(MEX), 1(SIN) 2(UNESCAP), 1(JPN)	6
APERC	11	11
		47





Progress – CEEDS Phase1

- ❑ The **1st CEEDS Workshop** on “**Appliance EE Standards and Labeling (AEES&L)**” was held in Chinese Taipei in October 2009 to develop **proposals** for advancing AEES&L programs for the participating economies: Chile, China, Malaysia, The Philippines, Thailand and Viet Nam, and worked together with experts from ASE, CLASP, IEEJ and LBNL.
- ❑ The **2nd CEEDS Workshop** was held in Tokyo in March 2010 with further “*fine-tuning*” on the proposals and recommendations on **how selected measures could be effectively implemented in those participating economies.**
- ❑ The **Energy Saving Potential Study** in AEES&L for those participating economies was also reported and discussed.
- ❑ The findings and summary records of the two CEEDS workshops have been endorsed at EWG39 in March 2010 in Tokyo.



Findings – CEEDS Phase 1

Overview of the CEEDS Phase 1 major findings :

- **Policy-makers' involvement is essential** to develop credible Minimum Energy Performance Standards (MEPS), labeling, and harmonization.
- **Inadequate staff capacity and budgets** in developing APEC economies to carry out test-lab capabilities, certification procedures, and enforcement.
- **Limited data availability** and/or of low quality; lack of economy-specific and end-use & sales data.

Examples of key priorities and possible resources available:

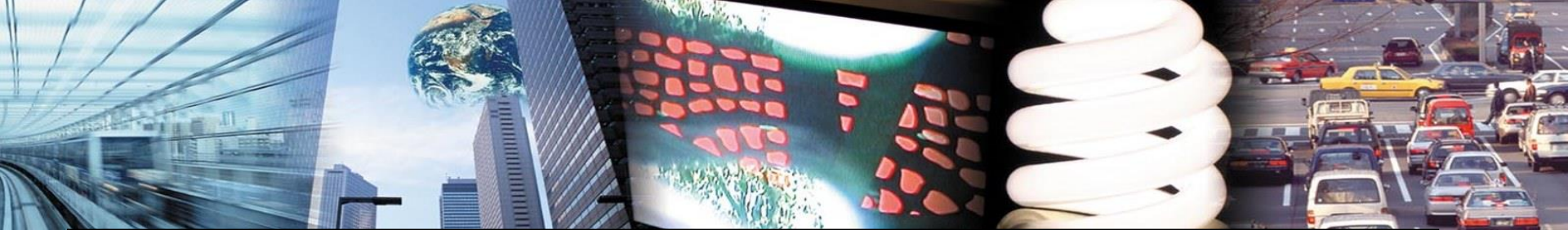
- **Networking, Information-Sharing and Advice:** CLASP, LBNL, ESIS, EWG, etc
- **Test Standard Harmonization:** the APEC Subcommittee on Standards and Conformance (SCSC) works on aligning standards under the Committee on Trade and Investment (CTI).
- **Regional Cooperation on Energy Testing Facilities:** cooperation with the Asia-Pacific Laboratory Accreditation Cooperation (APLAC); inter-laboratory round-robin testing.



Findings - CEEDS Phase 1 (Continued)

Overview of the CEEDS Phase 1 major issues and recommendations:

- **Building solid foundations: political will and forward vision.**
 - Develop a comprehensive economy-wide EE plan
 - Creation of appropriate Gov bodies to handle testing, certification and compliance.
- **Analyzing the market and setting MEPS**
 - What products should be covered?
 - Endorsement vs. comparative label
 - Voluntary vs. mandatory certification
- **Laboratory testing and capacity building**
 - Evaluate an economies' laboratory testing capacity
 - Laboratory accreditation
 - International cooperation to enhance a S&L laboratory testing capacity



Findings – CEEDS Phase 1 (Continued)

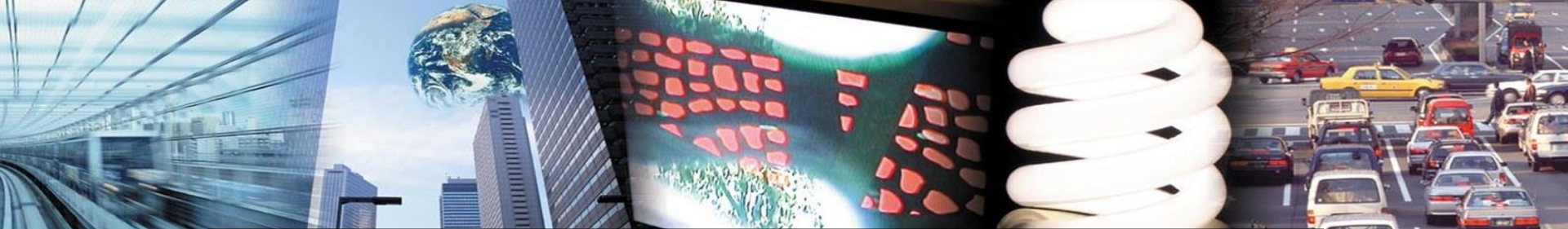
Overview of the CEEDS Phase 1 major issues and recommendations:

- **Implementing a labeling program**
 - Public awareness campaigns
 - Label interpretation training for salespersons, officials, consumers and other stakeholders.
- **Program integrity**
 - Monitoring enforcement and compliance
 - Regular update and upward stringency of standards
- **Harmonization**
 - Enhancing regional and international cooperation
 - Developing new vs. using existing testing protocols



Progress – CEEDS Phase 2

- ❑ The **1st CEEDS Workshop** on “***Building Energy Code and Labeling (BEC&L)***” was held in Bangkok in September 2010 to develop **proposals** for advancing BEC&L programs for the participating economies: Chile, China, Indonesia, Malaysia, Mexico and Viet Nam, and worked together with experts from ASE, IEA, PNNL, WB, ECO-III India, etc.
- ❑ The **2nd CEEDS Workshop** will be held in Hong Kong, China in January 2011 with further “*fine-tuning*” on the proposals and recommendations on **how BEC&L measures could be effectively implemented in those participating economies.**
- ❑ The **Energy Saving Potential Study** in BEC&L for those participating economies will also be reported and discussed.



Call For Further Action

- Continuing PREE and CEEDS for interested APEC economies and regularly updating Compendium are essential under APERC's role to further enhance the implementation of *more* best / high performance EE policy measures and practices.
- A follow-up *capacity building* scheme will form a good basis to ensure full implementation of best/high performance EE practices in some areas, e.g. *end-use data collection, standard setting and testing method harmonization, EE project financing & investment, EE marketing, EE in Transport, EE regulatory framework, etc.*
- *Closer cooperation* with EGEEC and relevant expert groups and international/regional organisations is also essential.



Thank you for your attention.

**FREE Peer Review Reports, Compendium and
CEEDS Phase 1 Report are available in APERC website
<http://www.ieej.or.jp/aperc/>**