Report on EGEDA activities

Joint EGNRET58/EGEDA34 meeting

Honolulu, Hawaii, USA

4-5 April 2023

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EGEDA Secretariat

Outline

❑ EGEDA33 meeting

❑ APEC energy statistics and data collection

- 2020 data

- 2021 data

❑ APEC workshop on energy statistics

❑ APEC energy statistics training

❑ Other EGEDA activities

EGEDA 33 meeting

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EGEDA 33 meeting (1)

- **25-28 October 2022; the Philippines (Hybrid)**

  - 1st in-person meeting since 2019 (Bali, Indonesia)

  - Number of participants – 67

  - Member economies – 12 [Onsite : AUS; BD; INA; MAS; PHL; PNG; CT; THA (both online and onsite), VN; (Online: HKC; ROK; USA)]

  - APEC Secretariat, EGEEC and EGNRET (online)

  - International organizations– IEA; IRENA; IEF

  - Others –The Philippines government agencies and energy stakeholders

EGEDA 33 meeting (2)

EGEDA report

- Report on the *19th APEC workshop on energy statistics* and directives from EWG62 and EWG63

- Data collection report by the secretariat

- Overview of APEC 2020 energy supply and demand

- Progress toward the two APEC energy goals

- **Hydrogen** and **district cooling** data collection

- APERC research activities

- *No site visit*; key results from the **APERC Energy Demand and Supply Outlook 8th edition** were presented on Day 3

Other reports

- Experts group (EGEEC and EGNRET) and APEC secretariat

- Energy efficiency indicators (IEA)

- Global update on JODI (IEF)

- Renewable energy statistics for tracking SDG 7 (IRENA)

> *Exploring APEC funding for end-use survey;*
> *Hydrogen production and use in APEC.*

Regular APEC energy data collection

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Regular APEC energy data collection (1)

❑ **APEC Energy Statistics 2019** and **APEC Energy Handbook 2019** were published in July 2022 and disseminated

❑ **2020 data collection**
- EWG approval obtained on **3 February 2023**
- Will be published by end of March 2023 (4 months earlier than the previous publication)

❑ **2021 data collection**
- Energy questionnaires were sent to EGEDA members and requested submission of data by 31 March 2023
- 4 early submissions

❑ **Other data collections continue**
- Annual energy prices
- Annual CO_2 emissions from energy combustion
- Energy efficiency indicators
- Monthly oil and gas supply and demand (JODI)
- Quarterly energy supply
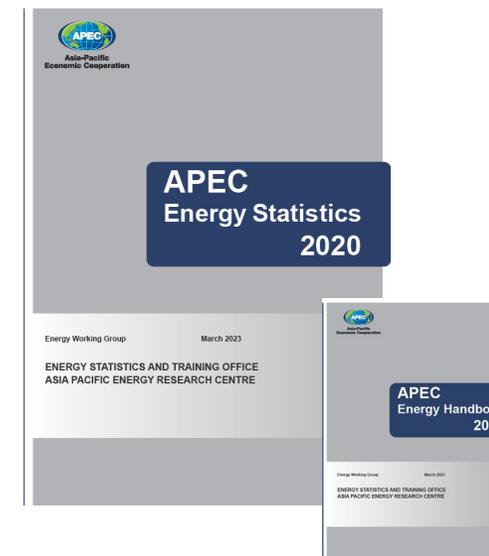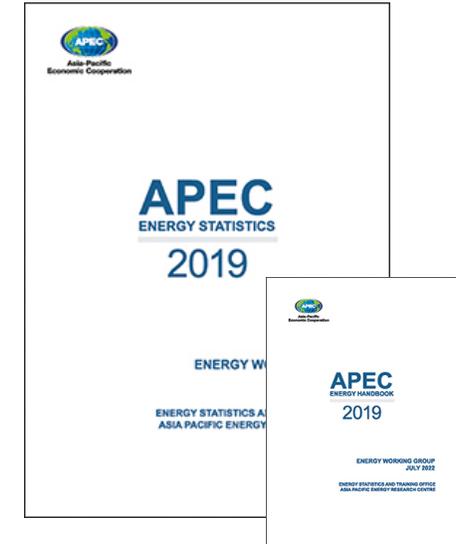
Regular APEC energy data collection (2)

❑ APEC data produced by EGEDA provides baseline for the ***APEC Energy Demand and Supply Outlook 8th edition***

❑ EGEDA secretariat has used **petajoules (PJ)** in its reports and data analyses for the last three years (starting with 2018 publication)

❑ Outlook also now uses PJ instead of million tons of oil equivalent (mtoe)

APEC Energy Demand and Supply Outlook
8th Edition 2022   Volume 1

APEC Energy Demand and Supply Outlook
8th Edition 2022   Volume 2

APEC workshop on energy statistics

19th APEC workshop on energy statistics

❑ **Participants**

  ▪ No. of economies – 15

  ▪ No. of participants – 51

  ▪ EGs/Fora – EGEEC, APERC, APSEC

  ▪ Experts - IEA

❑ Held as a joint workshop with the International Energy Agency (IEA) on 28-30 June 2021

  ▪ **Part 1** of APEC-IEA collaboration on energy efficiency

❑ The **objective** was to impart the importance of energy efficiency indicators for energy policy analysis and sharing of experiences on end-use energy consumption data collection/estimation

❑ **7 economy presentations** (experiences in EEI collection)
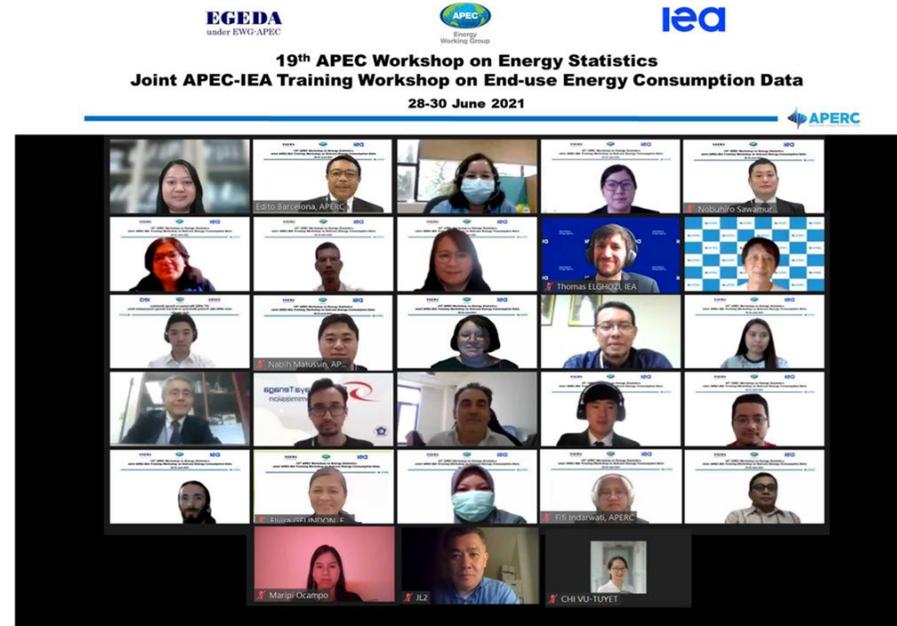
# 20th APEC workshop on energy statistics (1)

❑ Online on **15-17 November 2022:**

  ▪ **Part 2** of the Joint APEC/IEA Workshop on energy efficiency indicators,

❑ **Participants**

  ▪ No. of participants – 59
  ▪ No. of economies – 14 (AUS; CDA; PRC; HKC; INA; JPN; ROK; MAS; PNG; PHL; CT; THA; US; VN);
  ▪ EGs/Fora – EGEEC; APERC
  ▪ Experts and Speakers - IEA (6) and METI
  ▪ Consultants – 2

❑ **Purpose**: improve member knowledge about end-use data collection and estimation processes and how best to use published data.
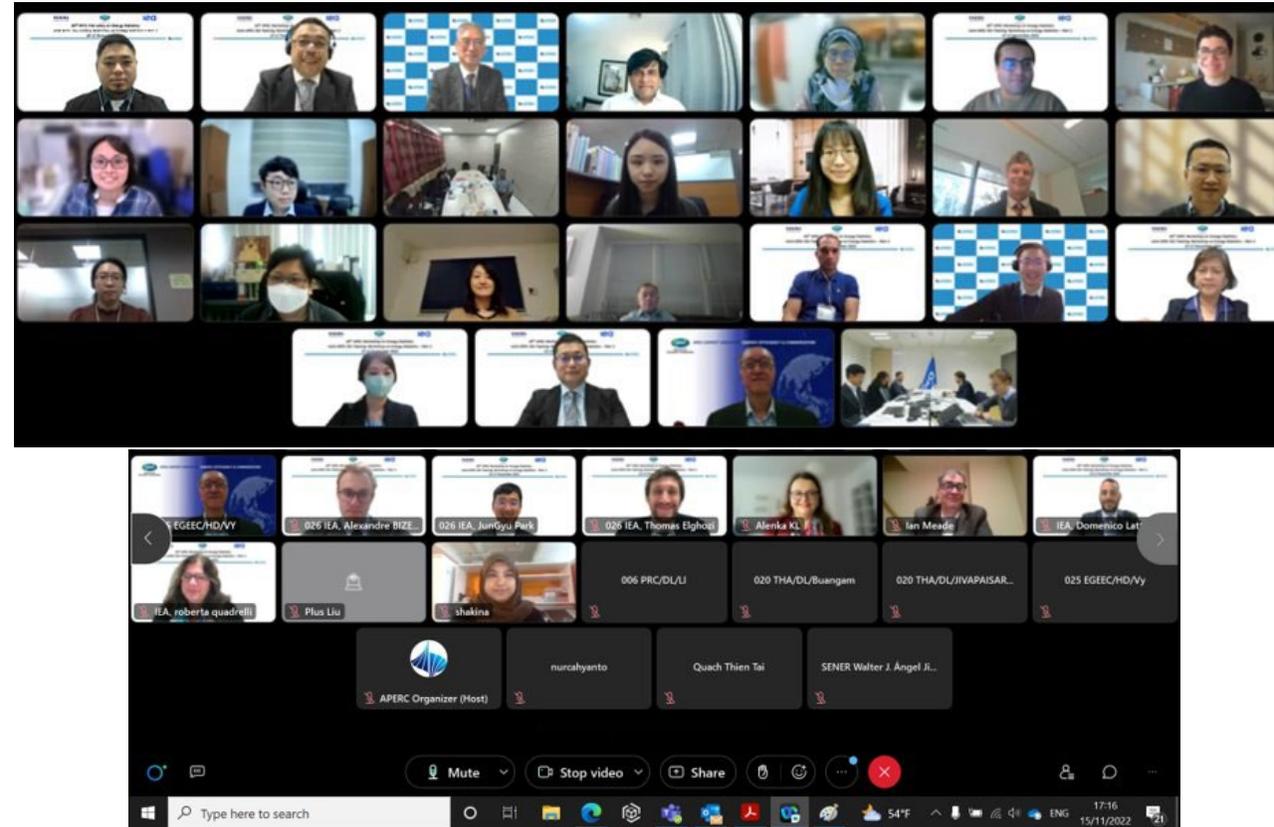
❑ **Agenda**

  ▪ Data gaps analysis
  ▪ Modeling sectoral end-use energy consumption
  ▪ Hands-on exercises on data estimation
  ▪ Resolving data gaps at the economy level

20th APEC workshop on energy statistics (2)

❑ **Economy presentation**

- **Chinese Taipei** presented "***Energy transition policies and tracking energy efficiency indicators***" showing how energy indicators are used to track energy transition policies.

  – Highlighted 11 indicators for tracking energy transition.

- The **US** presented "***EIA's experience with end-use energy estimation***".

  – meaningful disaggregation of end-use estimation from billing information;

  – importance of building characteristics data, administrative data and wider community knowledge.

  – EIA uses two approaches such as regression models and engineering models. Results should be calibrated/adjusted with billing data.

❑ **IEA's National roadmap for demand-side data collection and development of energy efficiency indicators**

  – includes energy efficiency indicators and their significance, different kinds of enablers (political will and awareness, trusted and empowered data collection system, proper resource allocation, staff capacity and stability, data collection strategy, and multilateral collaboration) for indicators' development, assessment tool and a guide.

20ᵗʰ APEC workshop on energy statistics (3)

- **Round-table discussion (1)**

1. In the first day we presented an assessment on data availability for each economy. Have you ever done a similar exercise in your economy?

IEA

3 — Yes, and the results presented are consistent with my assessment.

0 — Yes, and the results presented do not match my assessment.

6 — No, I haven't done any assessment, but these results were useful.

1 — Prefer not to answer
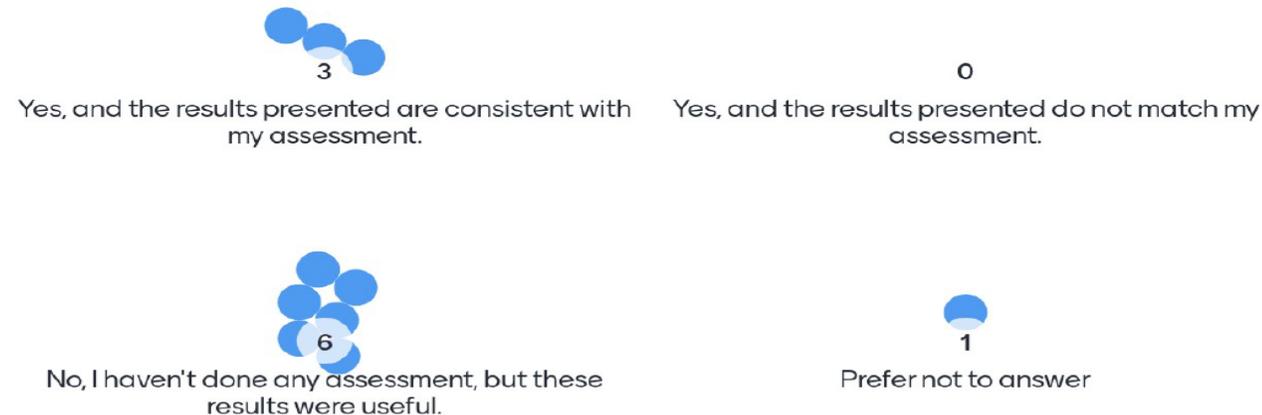
20th APEC workshop on energy statistics (3)

- **Round-table discussion (2)**

2-1. For what sectors do you have a demand side survey in your economy? (multiple choice allowed)

12 Household
10 Services
9 Transport
9 Industry
0 None of those
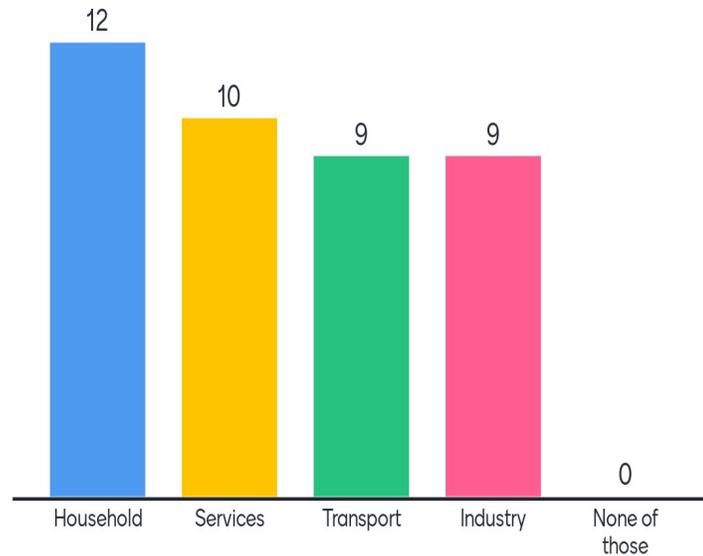
2-2. What sector will be your next priority for data collection? (multiple sectors can be selected)

8 Household
7 Services
6 Transport
7 Industry
1 None of those
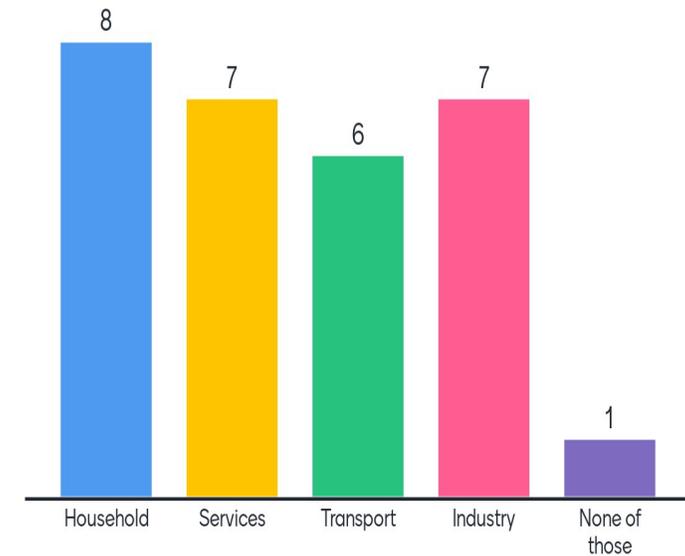
20th APEC workshop on energy statistics (3)

- **Round-table discussion (3)**

3. Would you be interested in tailoring the sectoral models presented during this workshop to fit your economy?

0	2	1	2
Yes, for all sectors	Yes, for one sector	Yes, but I would require expert's help	Yes, but I would need more resources

7	0	2
Yes, but I would need more training	No, it's not our priority	Prefer not to answer

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20th APEC workshop on energy statistics (3)

- **Round-table discussion (4)**

4. During the workshop we presented the IEA's guide for designing a national roadmap. Would you be interested in using it for:

1 — Enhancing your current system for efficiency data

1 — Raising awareness with your decision makers

5 — Finding weaknesses and strengths in your system

3 — Identifying actions for next steps

3 — Learning from, and comparing with, other economies
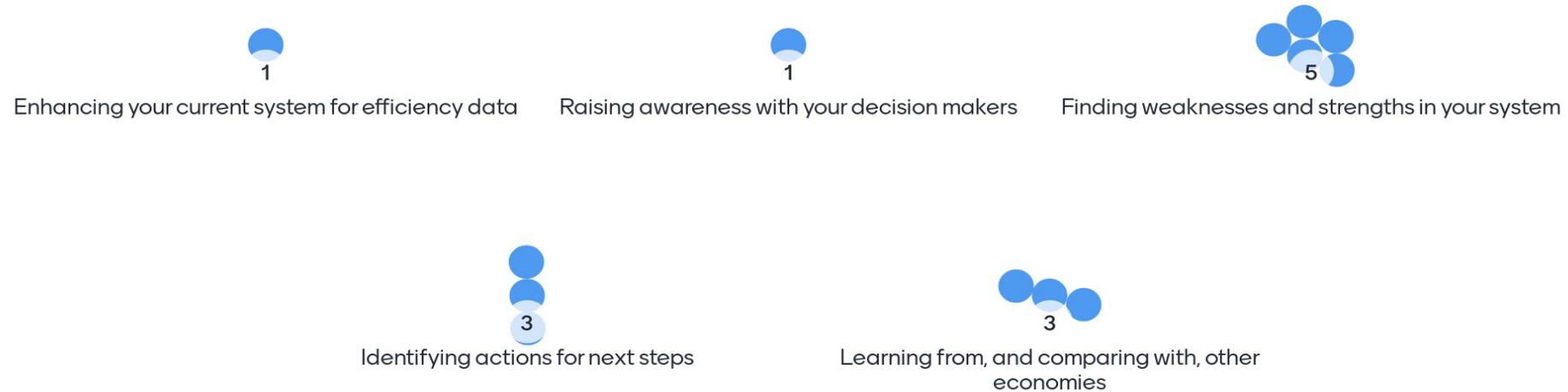
20th APEC workshop on energy statistics (3)

- **Round-table discussion (5)**

5. You think international support would be useful to... (multiple choices allowed)

- 7 — Assess current efficiency data / indicators in your economy
- 5 — Design a national roadmap to develop data and indicators
- 7 — Raise awareness of the importance of end-use data/indicators in your economy
- 8 — Design a model to estimate disaggregated end-use data starting from available data
- 6 — Design a survey for a specific sector
- 10 — Build and enhance knowledge thanks to trainings and workshops
- 0 — Prefer not to answer
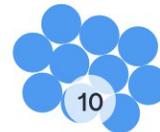
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APEC energy statistics training

Training activities (1)

Held in Tokyo

❑ **EGEDA Short term course**

- No. of economies – 9 (BD; INA; CHL; MAS; PNG; PHL; SGP; THA; VN)
- No. of participants – 12
- Consultant/Trainers - 6

❑ **Objectives**

- To increase the level of understanding of APEC energy data base by APEC economies.
- To improve reliability of the APEC energy database.
- To enhance members' understanding on end-use energy consumption and energy efficiency indicators.
- To enhance human resource network between APEC economies and APERC.

➢ *The participants were satisfied with the training*

Training activities (2)

Held in Tokyo

☐ **Special training course for Viet Nam** (**27 Feb – 3 Mar 2023**)

- 7 participants from 5 agencies in VN (EREA, OGCD, IEVN, MLTPD, GSO)
- Others-OJT, long-term trainee, APERC-VN
- Trainers – 5

☐ Enhance capability on energy data and statistics and in filling out the questionnaires using Viet Nam data.

☐ **Workshop-** identified challenges encountered in data collection.

☐ **Proposed solution-** creation of MOU for inter-agency collaboration

> *We expect that further relaxing of COVID 19 travel restrictions will allow in-person meetings/trainings to continue*

Data collection system (MOIT)

Consumption – Proposed solution/action

Challenges	Concerned agency	Proposed solution/action	Time-frame
Disaggregation of available data/ not enough data	MOIT; Ministry of Transport, Defense, Ministry of Finance, Agriculture, Ministry of Construction	• Cooperation between line agencies/Ministries • Review the existing law; proposed an expansion of the Law (Ministerial action), based on the needs • Survey/improve data collection	• Cooperation can be Immediate • Working level proposal/action • Ministerial level – longer term
Non-availability of data	MOIT, GSO, IEVN, provincial DOIT, Ministry of Natural Resources and Environment, MOF; Department of Energy Efficiency and Sustainable Development, MOF	• Conduct survey or coordinate with GSO • Need for stronger collaboration • Moratorium of existing cooperation/ MOU; • Creation of MOU for inter-agency working group on energy data and statistics	At working group level can be immediate
"Poor" quality of available /cross checking for the accuracy of data	• GSO, MOIT, IEVN	• Development of methodology to check data • Conduct user/producer data forum • Strong coordination/collaboration, instructions, in conducting survey	Immediate

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Training activities (3)

Future plans

❑ **Mid-term training (8 weeks internship)** –will start preparation (April 2023)
- Preparation of APEC energy statistics publications
- Validation check on energy data
- Historical and demand & supply balance checks
- Transformation balance check (input/output)
- Check indicators such as TPES/GDP
- One person each from two economies will be invited.
- Prospective trainees: energy statisticians with at least 1 year of experience and are responsible for energy data collection and processing in their economies. Trainees are also expected to continue to work on energy statistics in their economies after the training.

❑ **21st APEC Workshop on energy Statistics**
- Main topics are *Hydrogen* and *district cooling* data and statistics
- Drafting of **Cover Sheet**
- Tentatively scheduled in **September 2023**

Last mid-term training *20 August – 12 October 2018 (8 weeks)*

❑ **PNG** training needs (energy statistics and energy modeling)

❑ **INA** capability enhancement on energy efficiency indicators

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Other EGEDA activities

Secretariat's participation in international meetings

❑ **JODI Inter-Secretariat Working Group (ISWG) meeting on 7 June 2022**

  ▪ Discuss organization updates, technical issues and cooperation with private stakeholders

❑ **Task Team for the Revision of Standard International Energy Classification (TT-SIEC) under International** Energy Statistics Working Group (InterEnerStat) meetings on **14 July**, **20 September** and **18 October 2022**

  ▪ Discuss revisions to SIEC with the ongoing revisions of Central Product Classification (CPC) and International Standard Industrial Classification (ISIC).

  ▪ APEC (EGEDA) is proposing to include district cooling in SIEC as energy product.

  ▪ Monthly online meetings on SIEC revisions will be held until **December 2023 (**next meeting is **on 28 March 2023)**

❑ **IEA's Energy Statistics Development Group (ESDG, 9-10 November 2022)**

  ▪ EGEDA secretariat to share plans to pilot data collection of **Hydrogen** data in APEC in 2022-2023; propose collection of **district cooling** data and **energy efficiency indicators** data in APEC.

❑ **EGEEC60 meeting (15-17 March 2023, Hong Kong, China)**

  ▪ Members are encouraged to strengthen collaboration between EGEE&C and APERC / EGEDA on energy efficient data collection and potential new EWG energy goals.

Thank you for your kind attention.

https://www.egeda.ewg.apec.org/