

JOINT MINISTERIAL STATEMENT OF THE 36th ASEAN MINISTERS ON ENERGY MEETING

29 October 2018, Singapore

"Transforming Energy: Invest, Innovate, Integrate"

- 1. The 36th ASEAN Ministers on Energy Meeting (AMEM) was held on 29 October 2018 in Singapore. H.E. Mr. Chan Chun Sing, Minister for Trade and Industry of Singapore, officiated and chaired the Meeting. H.E. Dr. Siri Jirapongphan, Minister for Energy of Thailand was the Vice Chair. The Heads of the International Energy Agency (IEA) and the International Renewable Energy Agency (IRENA) were invited to participate in the 36th AMEM for the first time.
- 2. In his opening address, Minister Chan Chun Sing highlighted the need for continued strong cooperation within ASEAN, to ensure that ASEAN is able to live up to its economic potential and promise to its people and that ASEAN's growing energy needs are met in a sustainable way. Advances in technology are also reshaping the global energy landscape, and ASEAN would need to transform its energy sectors to address the challenges and seize opportunities that arise due to such changes. Minister Chan noted the ASEAN Energy Track's key achievements to date, which included good progress made on implementing the ASEAN Plan of Action for Energy Cooperation (APAEC). To implement the remaining measures, Minister Chan said that ASEAN Member States would need to continue to work closely together, and with our dialogue partners and international organisations, to build an affordable, sustainable and reliable energy future for ASEAN.
- 3. The Ministers welcomed the overall progress in the implementation of the APAEC 2016-2025 Phase 1: 2016-2020 as highlighted in the APAEC Mid-Term Review (MTR) Report. The overall score of 3.65 out of 5 in the APAEC MTR demonstrates that ASEAN is on track to achieve the collective energy targets by 2020 towards a secure, accessible, affordable and sustainable energy future. The Ministers looked forward to the development of Phase 2 of the APAEC 2016-2025, based on the recommendations of the MTR.

Working to achieve ASEAN's energy intensity reduction targets

4. The Ministers welcomed the good progress towards realising ASEAN's energy intensity reduction targets of 20% by 2020 and 30% by 2030, noting that ASEAN had achieved a 21.9% reduction in energy intensity compared with 2005 levels in 2016. The Ministers lauded the achievement as a milestone, having exceeded ASEAN's 2020 target. They looked forward to sustaining this positive momentum with increased energy efficiency (EE) efforts in buildings, home appliances, as well as in new areas such as transportation.

- 5. In particular, the Ministers noted that energy demand in the buildings sector is expected to grow significantly over the next decade and highlighted the potential for energy savings with the implementation of cost-effective EE measures. In this regard, the Ministers welcomed the progress towards the development of green building codes for ASEAN and endorsed the key recommendations of the study conducted by the ASEAN Centre for Energy (ACE) under the ASEAN-German Energy Programme (AGEP). The recommendations include (i) developing a comprehensive roadmap on regional green building codes, (ii) improving coordination between public and private stakeholders, (iii) incorporating EE measures in the initial stages of building design, and (iv) including green building codes and EE measures training to address the lack of skilled manpower in the buildings sector. As the next step, the Ministers looked forward to the convening of a training programme for policy makers to raise awareness on green building codes in 2019.
- 6. The Ministers acknowledged the efforts in building a conducive environment for wider energy efficiency and conservation (EE&C) adoption, including strengthening of energy management systems and certification programmes in ASEAN, and the enhancement of the ASEAN-Standards Harmonisation Initiatives for Energy Efficiency platform. The Ministers also welcomed the ongoing cross-sectoral collaboration between the EE&C Sub-Sector Network and the Joint Standard Committee on Electrical Electronic Equipment (JSC EEE) of the ASEAN Consultative Committee on Standards and Quality (ACCSQ) on harmonised EE performance testing standards for household air-conditioners under the existing ASEAN Electrical & Electronic Equipment Mutual Recognition Arrangement (ASEAN EE MRA). The Ministers looked forward to further efforts to include lighting, motors, television, refrigerators, electric fans and transformers into the MRA.

Working with IEA towards an energy resilient future through building capacity for energy investments and financing for ASEAN

- 7. The Ministers underscored the importance of sustainable investments and financing to facilitate the transformation of ASEAN's energy landscape. They endorsed the initiative on the Capacity Building Roadmap on Energy Investment and Financing, which aimed to enhance regional capabilities to attract investments in energy and develop sustainable financing models. The Ministers expressed appreciation to the IEA for co-developing the Roadmap with the Regional Energy Policy and Planning Sub-Sector Network (REPP-SSN). They also acknowledged the first activities under the Roadmap, namely the convening of the Singapore-IEA Clean Energy Investment and Financing Training Programme held from 28 30 August 2018 in Singapore and the completion of the IEA Toolkit on Energy Investments and Financing as an online resource for ASEAN Member States.
- 8. The Ministers discussed the global energy landscape and ways to address ASEAN's challenges of rising energy demand, improving grid connectivity and enhancing energy efficiency. They also spoke about new opportunities arising from digitalisation in the energy sector and emerging risks in the security of energy systems. In particular, the ASEAN Ministers and the IEA Executive Director discussed how ASEAN can respond to disruptions to the global energy landscape and tap on

innovation to develop robust policies to strengthen the region's energy resilience for the future.

9. The Ministers expressed their appreciation to the IEA for their continued support to ASEAN, including through the ASEAN-IEA Dialogue platform and the initiatives under the ASEAN-IEA Memorandum of Understanding (MOU) on Energy Cooperation. The Ministers also looked forward to building stronger institutional ties with IEA, to assist the region to meet its energy priorities, including by way of projects discussed during the 36th AMEM on regional power system integration, renewables integration, energy efficiency for cooling/air conditioning, investments and digitalisation.

Cooperating with IRENA and bolstering efforts to attain ASEAN's aspiration on renewables

- 10. The Ministers welcomed the signing of the MOU on Energy Cooperation between ASEAN and IRENA to strengthen cooperation and assist ASEAN in scaling up renewable energy (RE) deployment and advancing the transition to a sustainable energy future. To implement the ASEAN-IRENA MOU, the Ministers endorsed the accompanying Action Plan, which outlined key areas of cooperation such as (i) strengthening dialogue between ASEAN and IRENA, (ii) developing roadmaps to accelerate the deployment of renewables, (iii) building capacity on RE policy support mechanisms, (iv) providing technical support on technology and innovation, and, (v) developing bankable RE projects and support to project facilitation.
- 11. To this end, the Ministers tasked SOME to deepen efforts to address the gaps and challenges in meeting the region's aspirational goal of 23% share of renewables in the ASEAN energy mix by 2025, noting the 12.4% renewables share achieved in 2016. The Ministers expressed confidence that the ASEAN-IRENA MOU would contribute towards closing this gap.
- 12. The Ministers also discussed with IRENA on the progress of global energy transition towards a low-carbon future. IRENA highlighted that global power capacity additions from new RE exceeded conventional power in 2017, that the cost of RE technologies are declining considerably, and there is potential to step up deployment in the heating and transport sectors. The Ministers and IRENA discussed the policies and strategies that could help ASEAN, such as innovative business and financing models, and, enhanced bankability of RE projects to help drive the deployment of renewables which can yield significant socio-economic benefits in the region, including in remote areas.
- 13. On further efforts to develop regional capabilities on RE policies and financing, the Ministers noted the continued support of AGEP which complements the ASEAN-IRENA cooperation on RE.

Enhancing Liquefied Natural Gas (LNG) cooperation and trade in ASEAN

14. The Ministers noted that natural gas would continue to play an important role in ASEAN's energy future and commended the ASEAN Council on Petroleum (ASCOPE) for their efforts towards enhancing intra-ASEAN LNG cooperation and trade, which would help to increase energy security in the region.

- 15. The Ministers were pleased with the continued progress in enhancing the capacity of the region's regasification infrastructure to 36.3 million tonnes per annum and noted the current Trans-ASEAN Gas Pipeline length of 3,673 km connecting six (6) countries. The Ministers also noted ASCOPE's efforts to develop templates for commercial agreements, transactions, and gas quality. This will contribute to the region's commercial and infrastructure readiness to facilitate greater LNG cooperation and gas trade.
- 16. The Ministers welcomed the completion of the Gas Advocacy White Paper, which identified key recommendations to promote the use of natural gas and LNG in the region, through a well-coordinated and connected common gas market. In particular, the Ministers endorsed the recommendations to (i) enhance capacity building and technical assistance amongst ASCOPE members, (ii) improve the regulatory framework and speed up price reforms to set the right signals for sustainable investments, and, (iii) support the commercial sector, through fiscal or tax incentives, to realise the economic benefits of greater LNG supply security and flexibility as well as environmental benefits. In addition, the Ministers looked forward to ASCOPE's study on the business opportunities for small-scale LNG deployment in ASEAN for 2019.

Building ASEAN Member States capabilities on civilian nuclear energy

- 17. The Ministers discussed the key findings and recommendations of the Study on Nuclear Legal and Regulatory Framework in ASEAN and the Pre-Feasibility Study on the Establishment of a Nuclear Power Plant in ASEAN, which was completed this year by the ACE-Canada Nuclear & Radiological Programme Administrative Support (NRPAS).
- 18. In the light of these recommendations, the Ministers affirmed the continuing need to build ASEAN's capabilities on policy, technology and regulatory aspects of civilian nuclear energy. The Ministers noted the convening of the Regional Nuclear Security and Emergency Preparedness: Security Culture and HRD programme in March 2018 in Malaysia.
- 19. On the collaboration with the International Atomic Energy Agency (IAEA), the Ministers looked forward to the conclusion of the proposed ASEAN-IAEA Practical Arrangement in 2019 led by the ASEAN Network of Regulatory Bodies on Atomic Energy (ASEANTOM).

Promoting clean coal technologies and energy security in ASEAN

20. Given the rising demand for coal use for power generation in the region till 2040, the Ministers acknowledged the efforts by the ASEAN Forum on Coal (AFOC) to share and build technical capacity for (i) the deployment of low emission coal technologies, (ii) carbon capture storage and utilisation, (iii) best practices in coal handling and clean coal use and technology innovation, and, (iv) corporate social responsibility (CSR) programmes to improve the image of coal and advance carbon capture initiatives for the region.

- 21. The Ministers appreciated the convening of the High-Level Policy Dialogues for Coal in ASEAN in Malaysia in April 2018 and encouraged regular exchanges to discuss and consider regional action towards enhancing intra-ASEAN coal trade, coal security and the promotion of clean coal technologies (CCT). They encouraged the AFOC to continue fostering collaboration with other ASEAN sectoral bodies, Dialogue Partners, International Organisations, international financial institutions, and the energy business community to advance CCT in ASEAN.
- 22. The Ministers noted the initiatives such as the application of coal upgrading technologies by Indonesia, business and financing models to promote coal trade by Viet Nam, and workshops by Thailand to address the image of coal in the light of global environmental concerns.

Widening multilateral electricity trade in the ASEAN Power Grid (APG)

- 23. The Ministers welcomed the multilateral electricity trade among Lao PDR, Thailand and Malaysia which commenced in January 2018 under the Energy Purchase and Wheeling Agreement (EPWA) the first of its kind in ASEAN. The Ministers noted that 15.97 gigawatt hours of electricity was traded as of October 2018. These transactions represent Phase 1 of the pathfinding Lao PDR-Thailand-Malaysia-Singapore Power Integration Project (LTMS-PIP) to study the cross-border power trade of up to 100 MW electricity power from Lao PDR to Malaysia through Thailand's existing transmission grid. They welcomed the initiatives to expand participation to more ASEAN Member States and to explore commercial arrangements which would enable transactions for firm power.
- 24. The Ministers also noted that the Heads of ASEAN Power Utilities/Authorities (HAPUA) and the ASEAN Power Grid Consultative Committee (APGCC) have commenced the APG studies to examine the institutions, market mechanisms, and interconnection infrastructure to advance multilateral electricity trade. They looked forward to the findings of the APG studies at the next AMEM.
- 25. The Ministers requested HAPUA to synergise the studies on the APG, with considerations to integrate renewables into power grid planning. In this regard, the Ministers encouraged HAPUA to explore ways of deploying smart grid and digitisation technologies not only to integrate variable RE supply but also to capture cost and energy efficiencies.

Motivating best practices through the ASEAN Energy Awards

26. The Ministers congratulated the 63 awardees of the ASEAN Energy Awards 2018 recognised for best practices in energy efficiency and conservation, renewable energy and excellence in energy management. The awards were given in the areas of (i) ASEAN Energy Management in Buildings and Industries with 14 awards from five (5) countries, (ii) ASEAN Energy Efficient Building with 12 awards from five (5) countries, (iii) ASEAN Green Building with seven (7) awards from five (5) countries, (iv) ASEAN Renewable Energy with 19 awards from six (6) countries, and, (v) Awards for Excellence in Energy Management by Individuals conferred to 11 senior energy officials in recognition of their significant contributions to advance ASEAN's energy cooperation goals. A Special Submission Category on Zero Energy Building will be added in 2019.

27. Following the 36th AMEM, the Ministers looked forward to participating in the discussions at the 11th Singapore International Energy Week on 30 October 2018.

37th AMEM

28. The Ministers agreed to convene the 37th AMEM in September 2019 in Bangkok, Thailand.

The Ministers expressed their sincere appreciation to the Government and people of Singapore for the warm hospitality accorded to the delegations and the excellent arrangements made for the 36th AMEM and associated meetings.

ASEAN MINISTERS FOR ENERGY

- 1. **The Hon. Dato Mat Suny Hussein**, Minister of Energy, Manpower and Industry, Brunei Darussalam
- 2. **H.E. Suy Sem**, Minister of Mines and Energy, Cambodia
- 3. **H.E. Dr. Arcandra Tahar**, Vice Minister of Energy and Mineral Resources, Indonesia
- 4. **H.E. Dr. Khammany Inthirath**, Minister of Energy and Mines, Lao PDR
- 5. **The Hon. Yeo Bee Yin**, Minister of Energy, Science, Technology, Environment and Climate Change, Malaysia
- 6. **H.E. U Win Khaing**, Union Minister for Electricity and Energy, Myanmar
- 7. **H.E. Alfonso G. Cusi**, Secretary of the Department of Energy, Philippines
- 8. **H.E. Chan Chun Sing**, Minister for Trade and Industry, Singapore
- 9. **H.E. Dr. Siri Jirapongphan**, Minister of Energy, Thailand
- 10. **H.E. Dang Hoang An**, Vice Minister of Industry and Trade, Vietnam
- 11. **H.E. Dato Lim Jock Hoi**, Secretary General of ASEAN