

Cooperation for Energy Transition through Asia Energy Transition Initiative (AETI)

Nov 2023

Agency for Natural Resources and Energy

Movement of Fossil Fuel Divestment in International Financing Market

- World Bank Group and European investment institutions has expressed a stringent stance towards finance to fossil fuels projects.
- ADB stopped support for development of oil, natural gas, and coal.



2013: Exit from coal

2019: Exit from upstream oil and gas



2021: Stop new loan to fossil fuels related business by the end of 2021

- ※ Coal-fired power plants, whose generation efficiency under 250gCO₂/Kwh, will be provided support exceptionally
- ※ At COP26, the EIB signed a statement declaring the end of new direct public support for fossil fuels that do not meet the 1.5°C and Paris Agreement targets by the end of 2022. Western governments including Germany, France, the UK, and the US also signed the statement.



2020: Prohibit a support for oil production with routine pending/flaring (diffusion/incineration of disposed gas)

- ※ Support for production of gas, ordinary oil production, oil pipeline, oil-fired power generation and coal-fired power generation are not prohibited.



Stop providing export credits

2021: Shale oil /extra heavy oil projects

2025: New oil field projects

2035: New gas field projects



2021/10/20 Publicized financing policy for new energy sector ("Energy Policy"). Stop loaning to upstream development/ coal-fired power generation (including related facilities).

More rigid conditions for support(※) of gas-fired power-generation related facilities

(※) **3 conditions** for support to gas-fired power-generation.

- No other low-carbon or zero-carbon technology, or combination thereof can provide the same service at an equivalent or lower cost at a comparable scale.**
- The project's operating lifetime is consistent with the carbon stabilization trajectory aiming **to achieve carbon neutrality by about 2050, and by a time set by DMCs that is consistent with their nationally determined contributions (NDCs).** The project also **avoids long-term lock-in** into carbon infrastructure and the associated risk of creating stranded assets.
- The project is **economically viable considering the social cost of carbon and an operating lifetime consistent with (ii).**

Approaches to Achieve Carbon Neutrality (CN)

- The acceleration of energy transition for achieving CN is the common and urgent global issue. Despite the common goal, each country face different challenges and issues. Therefore, diverse and pragmatic pathway for each country is necessary.
- Background in Europe and in Asia are different as below. Therefore, adopting common approach should be difficult. Rather, Asian approach has affinity with that of Japan in terms of balance between Environment, Economy, and Energy Supply (3E).

Europe

- Rich renewable potentials such as wind
- High grid coverage and interconnections between countries throughout the continent
- Most of coal-fired plants are old and nearly depreciated. Easy for coal-out
- Gas pipelines available
- Some countries actively utilize nuclear
- Slow energy demand growth

⇒ Drastically promoting energy transition by utilizing renewables such as solar and wind

Asia

- Unevenly distributed renewable potentials
- Huge portion of island regions, poor grid coverage, and low interconnections
- Due to the sharp growth of energy demand, coal power generation has been growing. Most of plants are newly constructed
- Gas supply is chiefly from LNG, not pipeline
- Limited countries which can utilize nuclear

⇒ Due to limited energy source to fulfill 3E, not only renewables but also various approaches should be adopted, reflecting each country's situation

In Japan, the energy structure is similar to that of Asia in the following points.

- Zero-emission thermal technologies play essential roles in order to secure stable energy supply, due to low renewables potentials and limited grid areas
- Geographically, possible to jointly establish common supply chain for hydrogen and ammonia
- Strong history of cooperation for technologies, and strong reliable relationship at both government and business level

Asia Energy Transition Initiative (AETI)

- **“Asia Energy Transition Initiative (AETI)”** includes a variety of support for the realisation of various and practical energy transitions in Asia.

1. Support for country-level energy transition roadmaps



2. Promotion of Asia Transition Finance



3. US\$10 billion financial support for various projects



4. Technology development and deployment, utilizing the achievement of “Green Innovation Fund”

- (e.g.) Offshore wind, Fuel-ammonia, Hydrogen etc.



5. Human resource development, knowledge sharing and rule-making on decarbonization technologies

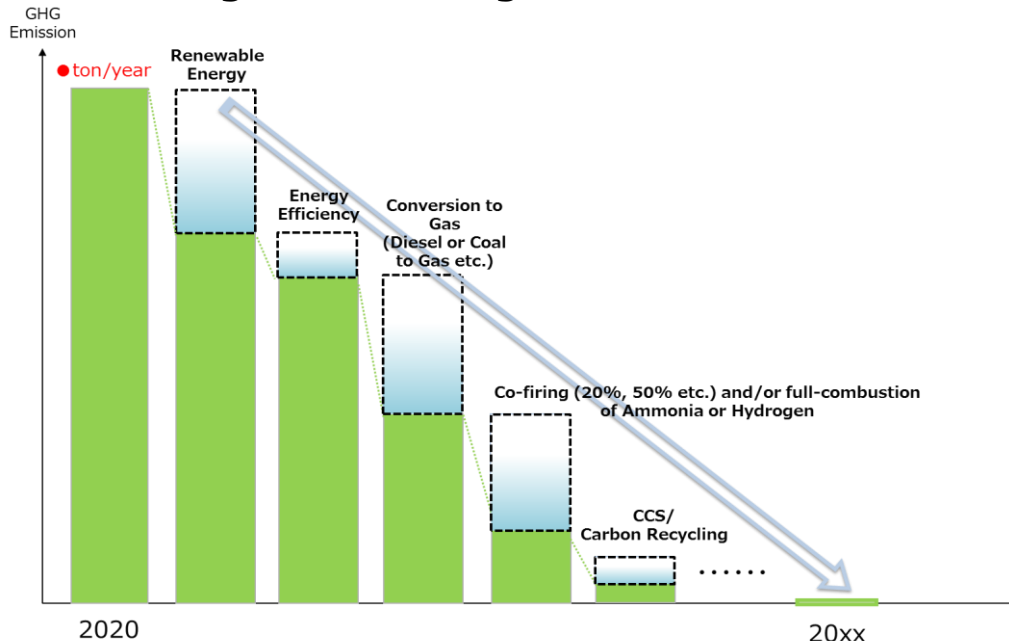
- Capacity building of decarbonization technologies for 1,000 people in Asian countries
- Hold workshops and seminars related to energy transition
- Asia CCUS network



Roadmap towards Carbon Neutrality in Asia

- We have developed the roadmaps (model analyses) that utilize all energy sources and technologies based on cost minimization models, based on carbon neutrality target years of each ASEAN country.
- While carefully listening to the requests of ASEAN countries, we will "accompany and support" each government in formulating their roadmaps, flexibly modifying the roadmaps in line with their domestic circumstances and energy policy directions.

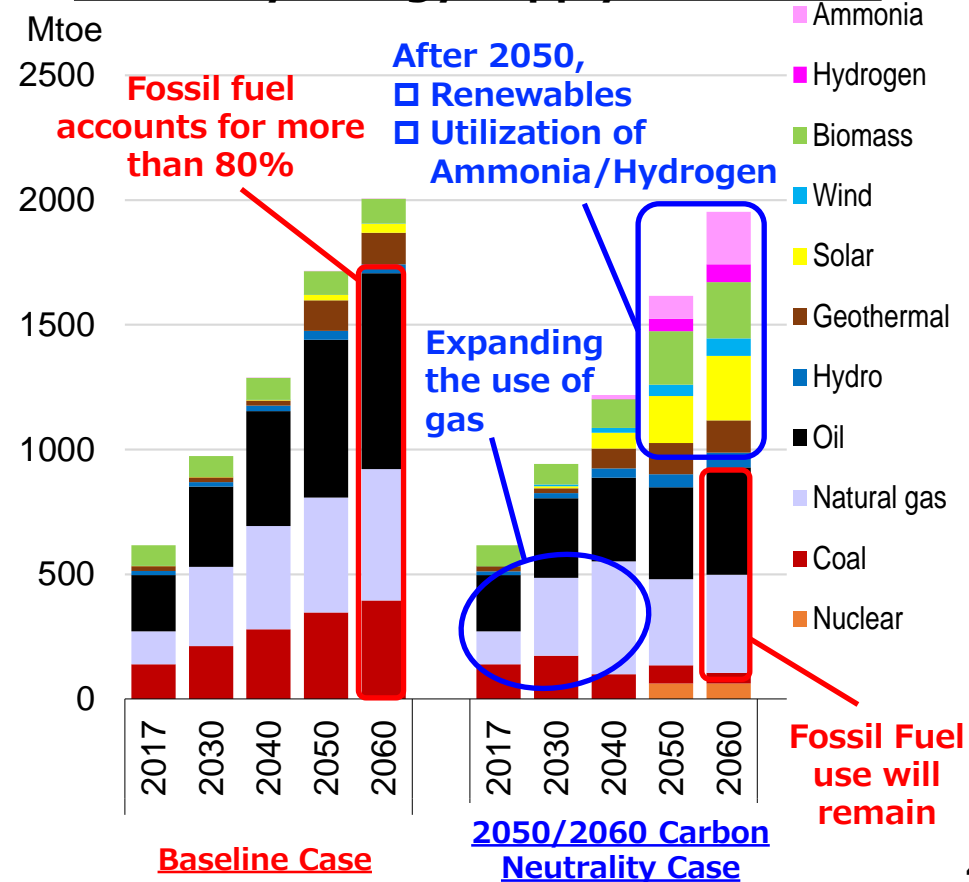
<Image of achieving net-zero in Asia>



[Cost minimization model]

- An assumption that the cheapest energy sources and technologies will be introduced first, followed by more expensive ones.

<Primary energy supply in ASEAN>



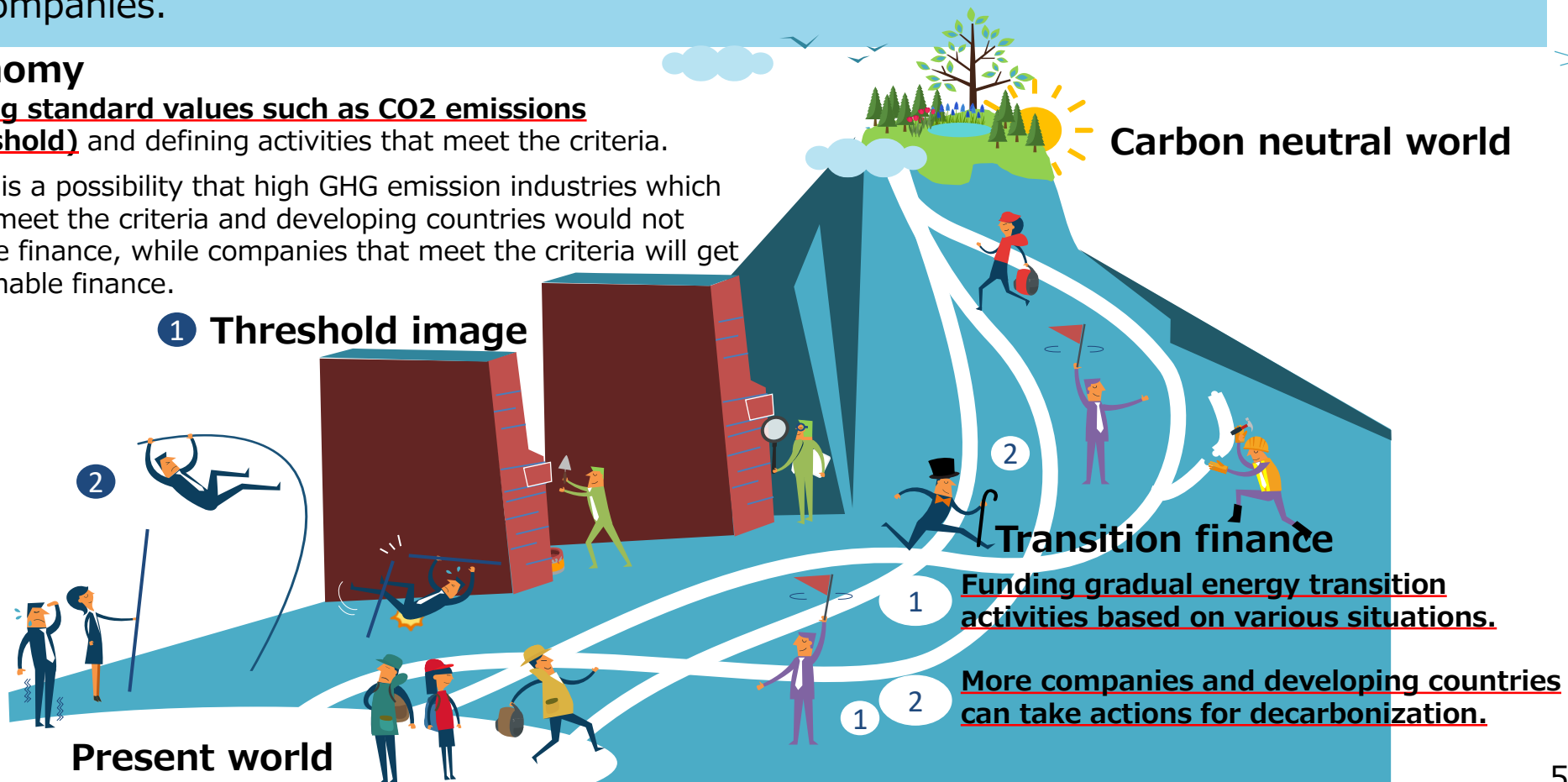
Basic Concept for Transition Finance



- In May 2020, Japanese government announced the basic policy for Transition Finance (TF) and will promote the basic concept for TF in order to support practical and various energy transition based on circumstances of each country.
- TF focuses on gradual energy transition for decarbonization based on local circumstances, which enables wider supports. TF is required to become an international framework by receiving approval in Asia and increasing TF adopting companies.

Taxonomy

- 1 Setting standard values such as CO2 emissions (threshold) and defining activities that meet the criteria.
- 2 There is a possibility that high GHG emission industries which don't meet the criteria and developing countries would not receive finance, while companies that meet the criteria will get sustainable finance.



Dissemination and establishment of Asia Transition Finance

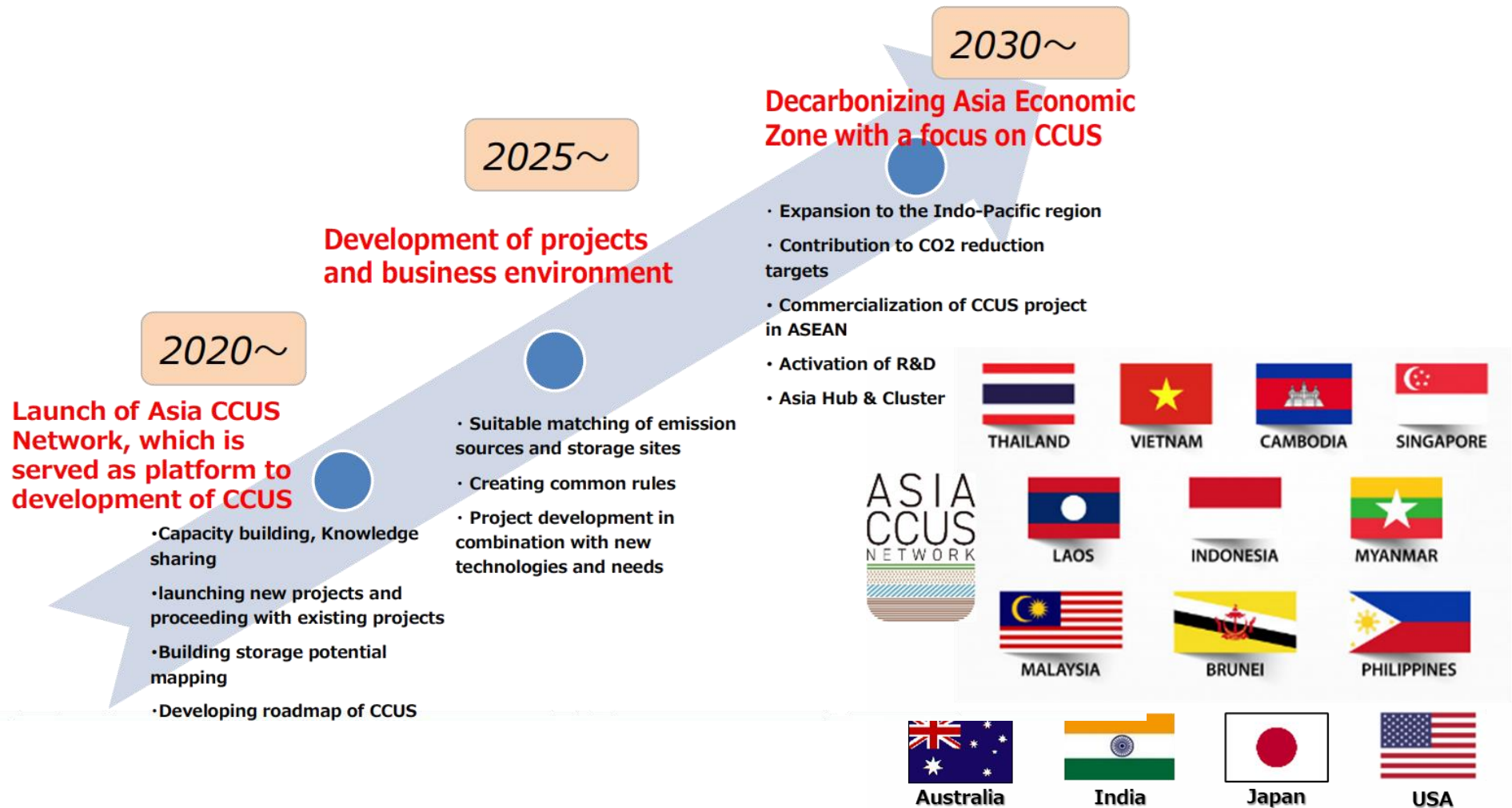
- Asian Transition Finance Study Group (ATF SG) is an initiative led by private financial institutions in Asia to support gradual and practical energy transition of each Asian country from the perspective of finance.
- It emphasizes the necessity of decarbonization roadmaps that are in line with Paris Agreement and reflect circumstances of each country in order to support projects / technologies financially.

ATF SG Participating Organizations

Core members	Financial Institutions (20)										
	Development banks, ECAs, and others (7)										
	Public agencies and finance associations (13)										

Activities of Asia CCUS Network

- Through the Asian CCUS network (ACN) launched in June 2021 as part of the AETI framework, it will contribute to knowledge sharing, developing human resources, and improving the business environment for CCUS utilization in Asia.



Human Resource Development Training for Energy Transition

- Japan has provided the HR development training program for government officials and business people in Asian countries, such as Vietnam and Thailand.
- The program consisted of ①lectures on energy transition and roadmap, ②site visits to key industrial players (MHI, JERA, Iwatani, Roppongi Hills(for energy conversation) etc.), and ③business matching session.
- Going forward, Japan will continue to support the development of the roadmap and decarbonization in each Asian country through business development by Japanese companies.

