





## Virtual Roundtable Financing Just and Affordable Energy Transition in the Asia-Pacific Region

5 April 2023 <u>1000-1300</u> Australian Eastern Standard Time

### REPORT

### Summary & Recommendations

Undergoing an energy transition while achieving fundamental development goals will require careful planning especially when considering the potential impact on demand, affordability, and livelihoods. The virtual roundtable was held with the aim of discussing the role APEC can play in helping economies meet ambitious Net-Zero emissions goals while ensuring a just and affordable energy transition.

Participants in the discussions noted the large and mounting obstacles in achieving Net-Zero by 2050 requiring large financial investments in alternative and renewable sources of energy with the goal of reducing emissions especially in hard to abate sectors such as steel, cement, shipbuilding and more. There is consensus that global capital is sufficient to fund these ambitions, but the difficulty lies in identifying these activities and shifting the flow of financing to these assets which are compounded by an environment of uncertainty and disruption. Moreover, each jurisdiction will require different approaches taking into consideration nuances such as availability of resources, transmission capacity, institutional and market arrangements, human resources, and the political environment which makes it imperative that transition plans start domestically.

Execution was also identified to be a major obstacle that needed to be addressed. There is no shortage of ambitious declarations made by various organisations, and economies but substantial measures and emissions reductions seems unabated especially in the shift from coal to renewables. Discussions also revolved around addressing specifics such as the energy supply chain, production centres, fossil fuel subsidies and sources of raw materials that are highly influential to a successful and resilient energy transition.

Participants also reiterated that energy transition should be just and affordable and consider social and governance structures and its impact to communities and the workforce affected. Regulators for example need to ensure equitable rates in utility sectors as they transition, providing a buffer for low-income households while providing clear signals to markets of their intention to Net Zero. In addition, social protection policies were noted as another important avenue for a just transition.

Transition roadmaps must be practical and realistic and should include financing strategies and identification of key policy levers to affect this change. Roadmaps for each key sector should be developed by governments in collaboration with the private sector in a bottom-up fashion that involves a whole-of-government approach.

Transition finance was often brought up as a key to a just and affordable energy transition, but concern was brought up on the need to define transition well as a pre-requisite to offer guidance. Data, technology, and metrics were also some cornerstones that were noted for effective policymaking and informing investment decisions. The international community was also called

on to play a part to coordinate and align efforts to tackle global challenges that require global responses. This was especially pertinent in unlocking global capital to channel finance in developing markets to accelerate transition.

Several other initiatives were noted by participants that could be used in APEC including ongoing efforts within the Finance Ministers' Process, the Sustainable Finance Development Network and the Asia-Pacific Infrastructure Partnerships to name a few. Some specific undertakings and aspects that could be leveraged on or considered include the Net-Zero Sum Carbon Offset Benefit Model, the Digital Project Preparation Platform, taxonomies to identify activities for investments, guiding tools and transition plans, transparency, verifiability, investment data platforms and currency volatility. All of which are pivotal in driving investments to energy transition.

# Session 1: The Economics of the Energy Market - Current Situation of Supply and Demand and Major Trends

The first session opened with an overview of the contemporary energy market highlighting that innovation is a big driver for the shift in energy sources. Clean energy and storage technologies particularly have been a big driver for these transitions especially in the solar, wind and battery sectors. The three sectors have seen significant cost reductions driven by the scale of production in manufacturing economies. While the rate of these cost reductions will slow over time, they will still significantly affect the mix of global electricity markets. A scenario analysis revealed that wind and solar could grow to make up to 65% of global electricity generation by 2050 if current trends continue to be driven by increasing electricity demands, population growth, higher economic output and increased demand for cleaner sources of energy. Global energy capacity will also need to increase in tandem with wind, solar and storage taking significant share by 2050 and this projected growth will require about 93 trillion USD of investments. The decrease in prices for clean technology will also have a compounding effect on other technologies such as electric vehicles, hydrogen production and more. A global pandemic, supply chain chaos and the conflict in Ukraine have also accelerated the increase in pledges to Net-Zero and the transition to clean energy.

Nonetheless, the projected increase in clean energy will not be able to reach Net-Zero by 2050. To reach Net-Zero, multiple sectors such as cement, petrochemicals, aviation, aluminium and more will need to accelerate their transition especially through pathways such as innovation and decarbonatisation. Reaching Net-Zero will require significant investments of up to 194 trillion USD. This is a significant investment opportunity which will require overcoming challenges such as a stable market condition, technology, design of systems and protection of consumers for capital markets to scale up to meet the investment gap.

The shift to clean energy will also disrupt the marketplace which is primarily commodity driven to a market that is highly geographically dependent such as the availability of solar, hydro and wind. Another aspect to consider is the complexity of utility economics which is driven by domestic policies, caps, tariffs, subsidies, and other institutional arrangements which could disrupt market signals to investors and further compound challenges.

Participants also noted that there has not been significant movement of financial flows and most financial institutions are still financing fossil fuels. China was noted to be the largest financier of clean energy, but this is only a fraction of energy investments which still flow on to fossil fuels. Asia instead has been facing energy addition rather than transition due to the slow uptake of

climate policies in the region including social and inequality aspects which are crucial for a just and affordable energy transition.

Several key areas for consideration have been brought up in designing transition finance mechanisms. Firstly, discussions need to include parties such as governments and companies involved with coal power projects as they are key to transition. Clarity should also be given on the social and environmental safeguards to ensure that communities affected by transition policies have adequate access to grievance mechanisms. Options for clean energy must be defined clearly especially parameters for repurposing projects and that it is crucial to keep in mind that different clean energy sources have an impact on social and environmental conditions. Transparency and accountability were also noted to be important especially in the terms and conditions of the retirement of coal power plants (or other legacy assets) on items such as compensation. Economies' debt burdens should be minimized by prioritising grants instead of loans which is pertinent for developing economies. In regions such as APEC, shrinking civic space, justice and the protection of human rights defenders should be noted as energy transition becomes a part of conversation on energy security. In addition, local policies have not caught up with market demands which has signaled higher interest for investments in renewables. In essence, a robust strategy for energy transition which provides the baseline of energy mix, the transition period, the considerations mentioned above and a whole-of-government approach could provide clear signals to the financial markets.

Participants agreed that APEC could play a role in convening and forming common principles (eg. carbon pricing, taxonomy). Participants again reiterated that the challenge lies in practical approaches to integrating renewables into the energy system for transition to happen.

# Session 2: Challenges for Energy Transition to Net Zero – Technological, Economic, Social and Political

In the second session, participants noted specific challenges have posed an obstacle or opportunity for financing namely on issues related to the power grid, infrastructure support, energy efficiency, fossil fuel subsidies (coal financing has increased in Asia) and technology which needs addressing at the systems level (regional and/or local) for a more systemic effect. The larger scale and high cost of power production also necessitates support and scrutiny particularly from governments at a project level as well. Legacy issues (the lifespan of current power plants and consequently dealing with decommissioning or having it as a stranded asset) will have to be considered for domestic planning.

From a social perspective, supply chains related to energy production need to be addressed by the corporate sector. Government policies particularly in corporate due diligence could help the corporate sector implement identify, prioritize, and address human rights abuses especially within supply chains. When this is unavailable, the use of other robust standards or tools would help companies to set principles or help them benchmark themselves against the prevailing standards. This is particularly pertinent in the extractives industry that is pivotal in battery supply chains and the race to renewables. While most economies have stated Net Zero ambitions at the domestic level, this has not yet trickled down to sectorial specific roadmaps or pledges, which are equally useful and provide more clarity.

#### Financing a Just and Affordable Energy Transition in the Asia-Pacific Region

For private and institutional investors, investing in renewables in Asia poses higher risks making it less attractive for multiple knock-on factors including maturity of technology, market readiness, grid connection, capacity, political stability, financial incentives, supply chains and human capacity. In addition is it crucial to identify how these investments will be utilized which has to be locally adapted. In Asia, the rise of green financing particularly with green bonds or loans needs to be taken advantage of and transition elements must be included for financing to be funnelled into energy transition related projects. At the economy level, climate change frameworks, policies and tools need to be well developed and implemented from disclosures, taxonomies, carbon markets, capacity building and lending practices which are open to being demand led. Within a company, governance processes internally need to prioritize climate change from a management point of view for sustainability and the climate to take centre stage.

There were some divisions when it came to the use of natural gas as a source of energy for transition to renewables. So much uncertainty has arisen regarding the use of natural gas and its supply chain which were driven largely by the war in Ukraine. Proper planning and considerations need to be factored into the use of natural gas as a transition source of energy as infrastructure supporting natural gas and the lifespan of power plants is extensive and could jeopardise transition goals.

### Session 3: Financing a Just and Affordable Energy Transition

Participants in this session focused on the possible policy levers that could be induced to enable financial flows for a just and affordable energy transition especially for developing economies. Robust, interoperable, and coherent taxonomies that take into consideration transition elements could ensure clarity in identifying activities that are green, in transition or brown. Regional policies that extend for longer term will be able to cater to the nature of climate change which will affect communities and ensure better signals to the market. These policies also need to be coherent between industry and energy to avoid overlaps and competing effects which only cause confusion and inefficiencies. Putting communities first will also ensure that the 'just' aspect of transition finance is preserved in these policies and activities. To gather all these aspects, a comprehensive financing plan will need to be developed alongside transition roadmaps to ensure that there will be traction on these policies and targets. Other sectors besides the power sector also needs consideration when designing energy transition plans as they also play a large role in decarbonizing. Investments in skills and human resources via curriculum design, training/education or centres of excellence also need fair consideration to sustain these transition and adaptability at the local level.

Private sector capital needs to be supplemented by public capital as private sector investments has seen stagnation driven by uncertainty and market challenges such as economic downturns. These public capital sources such as the Just Energy Transition Partnerships provide the assistance and seed funding needed while at the same time consolidating the different donors needed for this public capital to flow to carbon intensive emitters. The JET Partnerships are also economy-led and will be able to aggregate other sources of financing such as philanthropy, domestic capital and international ensuring that public finance is able to generate the maximum returns in terms of effect.

In addition, participants also noted that the focus should not just be on reskilling workers, but also on pathways to pull to in industries and sources of employment that focus on renewables and its

#### Financing a Just and Affordable Energy Transition in the Asia-Pacific Region

value chains. In leveraging financing, special attention will have to be paid to ensure nuances to the roles and responsibilities that each arm of government is playing to consolidate effective transition finance strategies. This includes the responsibility of social protection, local government, power supply, agencies for climate change, labour, finance and planning as each economy presents different approaches.

Multilateral platforms are also increasing in importance to ensure global challenges to financing can be tackled in coordination with other stakeholders, lending support and sharing best practices. Especially as time becomes a limiting factor, urgency at all levels is needed.

Prepared by the SFDN Secretariat 10 June 2023