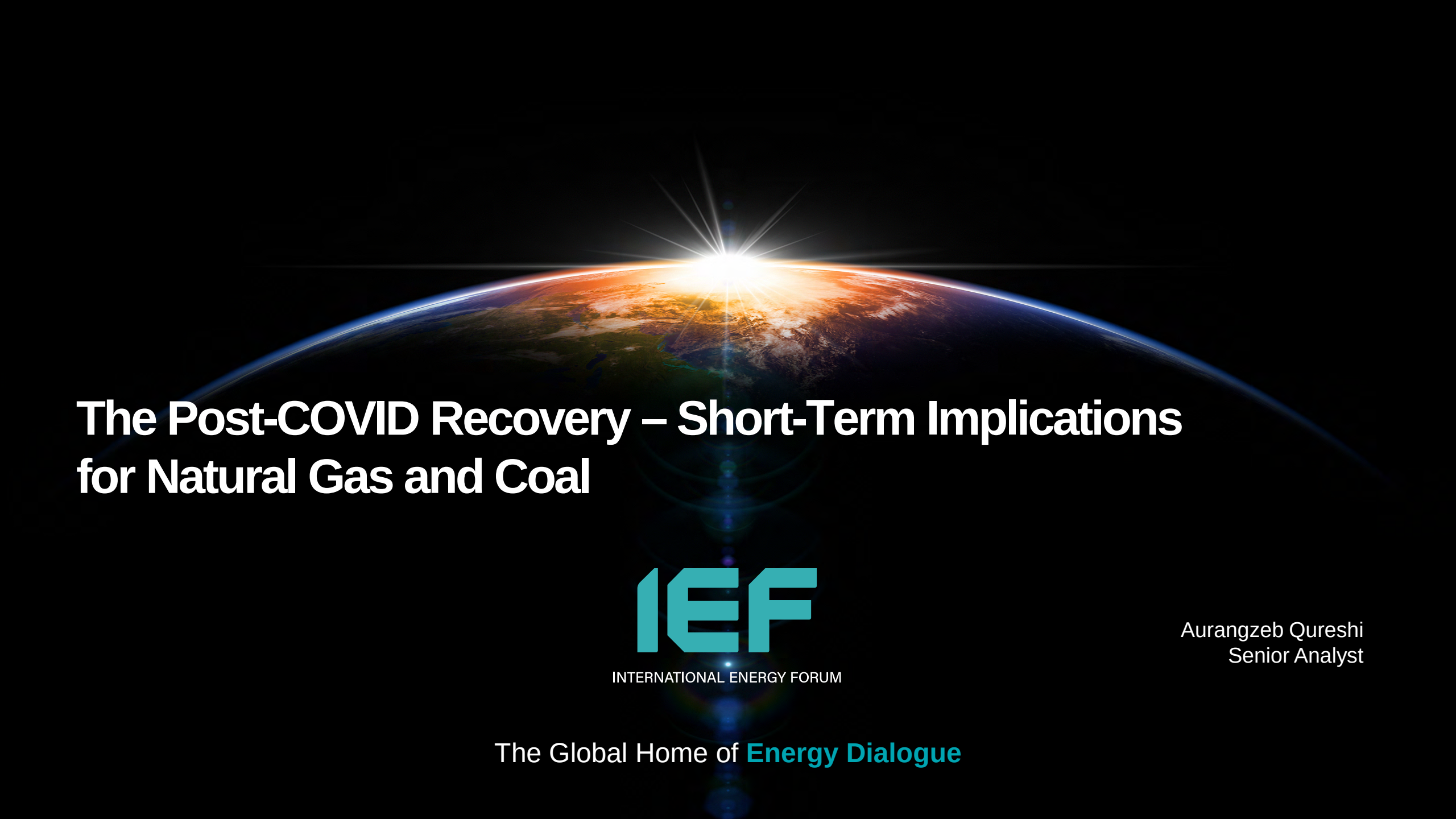




The Post-COVID Recovery – Short-Term Implications for Natural Gas and Coal



INTERNATIONAL ENERGY FORUM

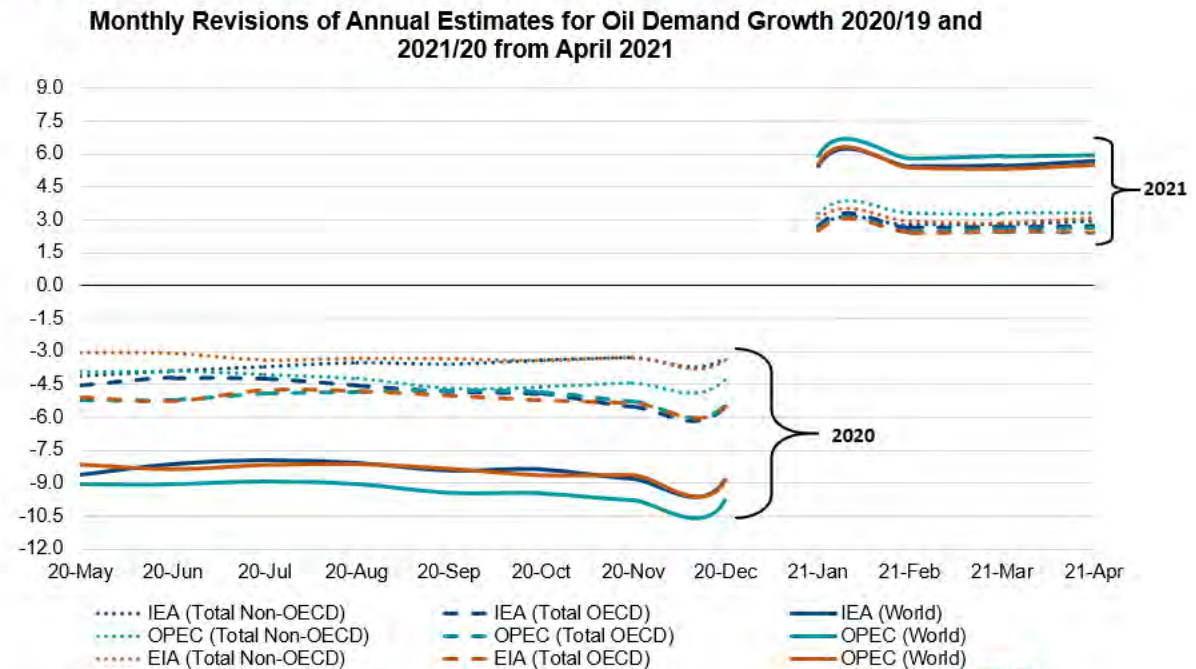
Aurangzeb Qureshi
Senior Analyst

The Global Home of **Energy Dialogue**

A Cautious Recovery is Underway

- The International Monetary Fund lifts global economic growth in 2021 to 6 percent after 3.3 percent contraction in 2020 – the largest increase in over 40 years
- Global oil demand growth is a traditional proxy for economic recovery – IEA, OPEC, and EIA project oil demand growth to be 5.5 mb/d to 5.9 mb/d in 2021
 - **US** – 1.3 – 1.4 mb/d
 - **India** – 0.4 mb/d – 0.6 mb/d
 - **China** – 0.9 mb/d – 1.1 mb/d
- Global CO₂ emissions are rebounding in 2021 after declining almost 6 percent in 2020 – the largest decline in history

IEA, OPEC, and EIA demand growth forecasts increase IEA and EIA growth assessments converge with OPEC

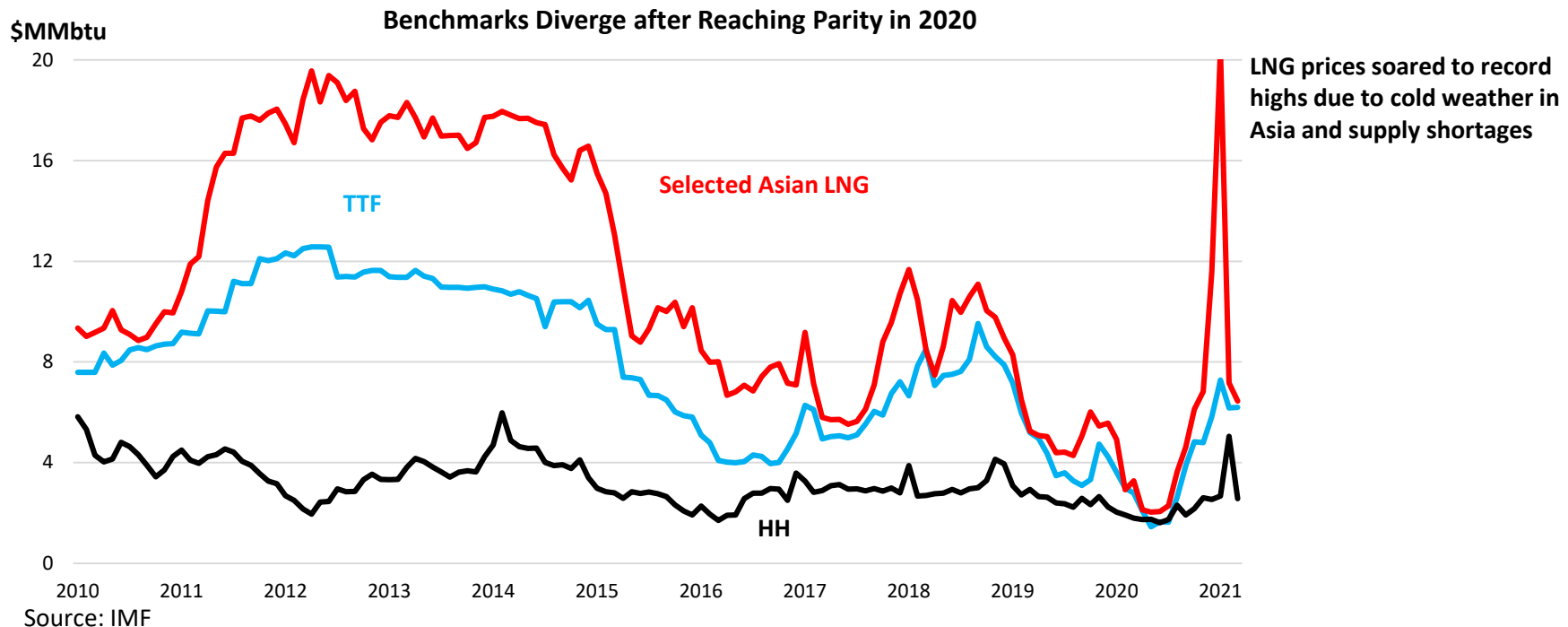


IEF comparative analysis of IEA, OPEC, and EIA Monthly Reports on the Oil Market April 2021



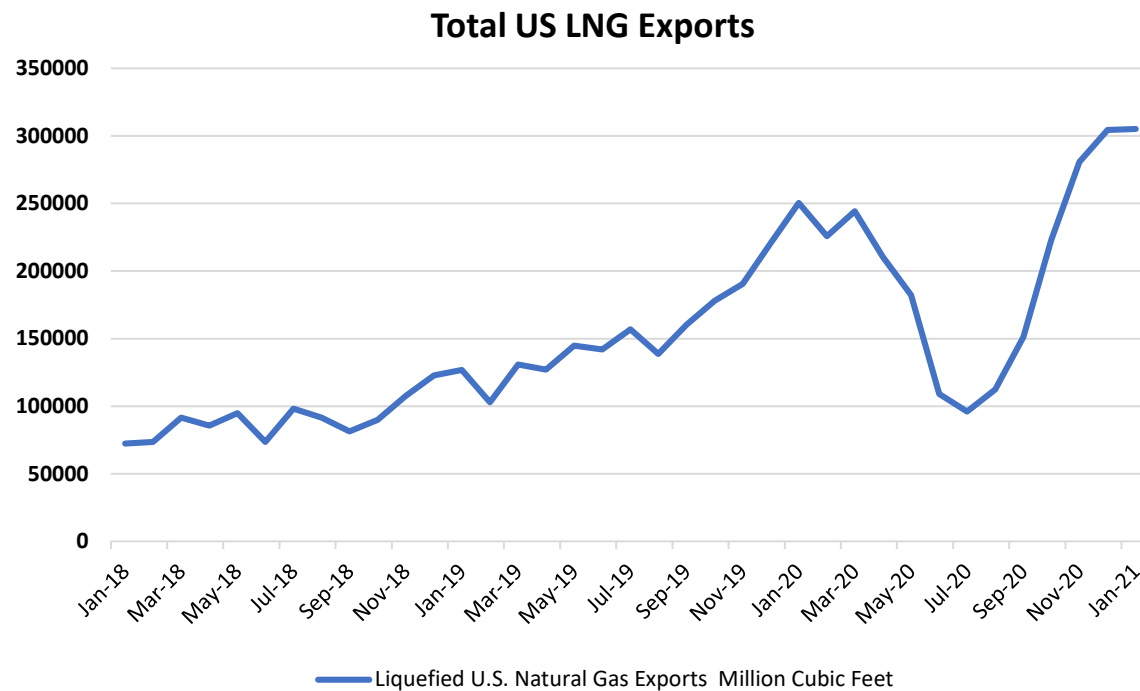
Implications for Natural Gas

- Natural gas demand is expected to progressively recover in 2021 as consumption returns close to its pre-COVID level in mature markets such as China and Japan
- Diverging benchmarks once again indicate varied demand in key regions and different price indexation underscoring the importance of demand and supply security

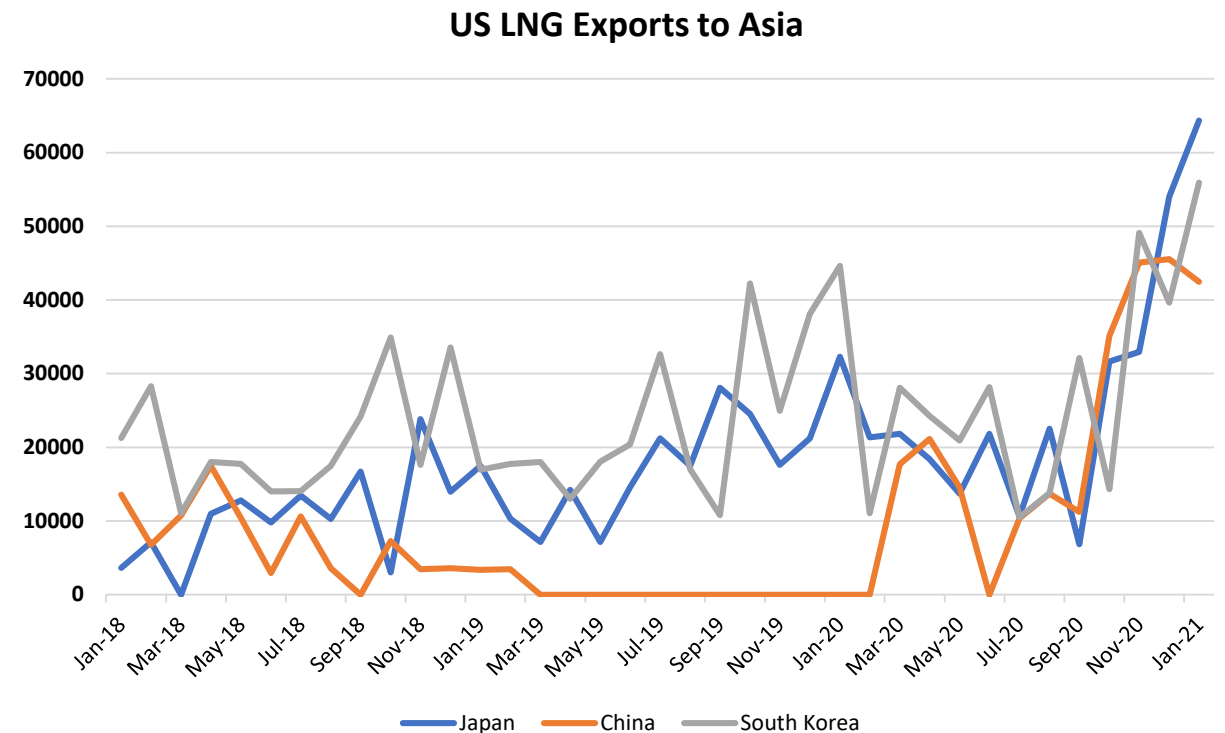


Implications for Natural Gas

- LNG demand was stable in 2020 but will see a boost driven by continued Asian demand and available US supply
- Asia has accounted for 34 percent of US LNG exports since 2018
- As the economy picks up this trend is likely to continue



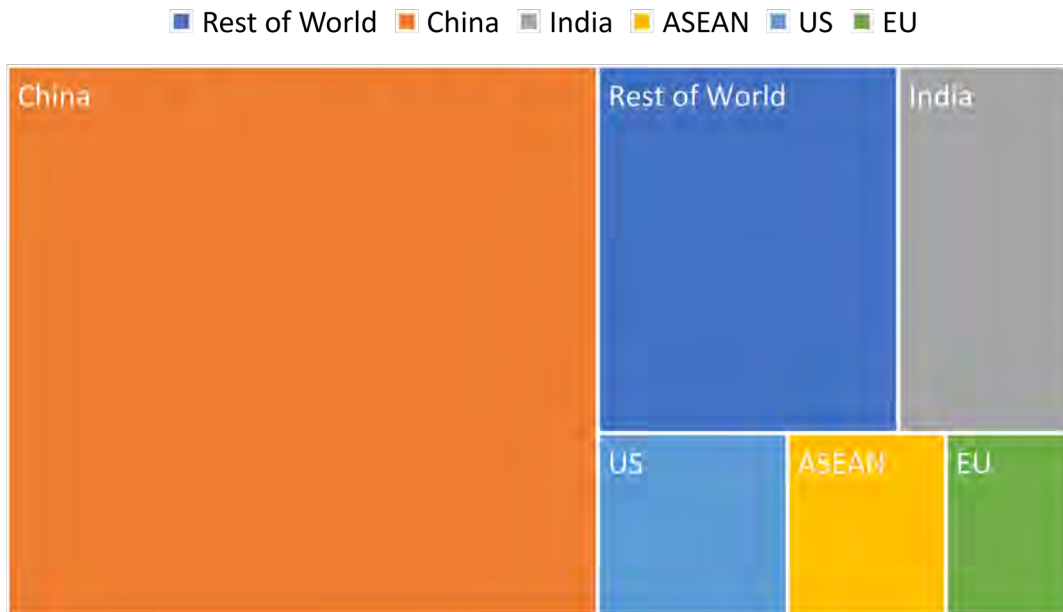
Source: US Energy Information Administration



Implications for Coal

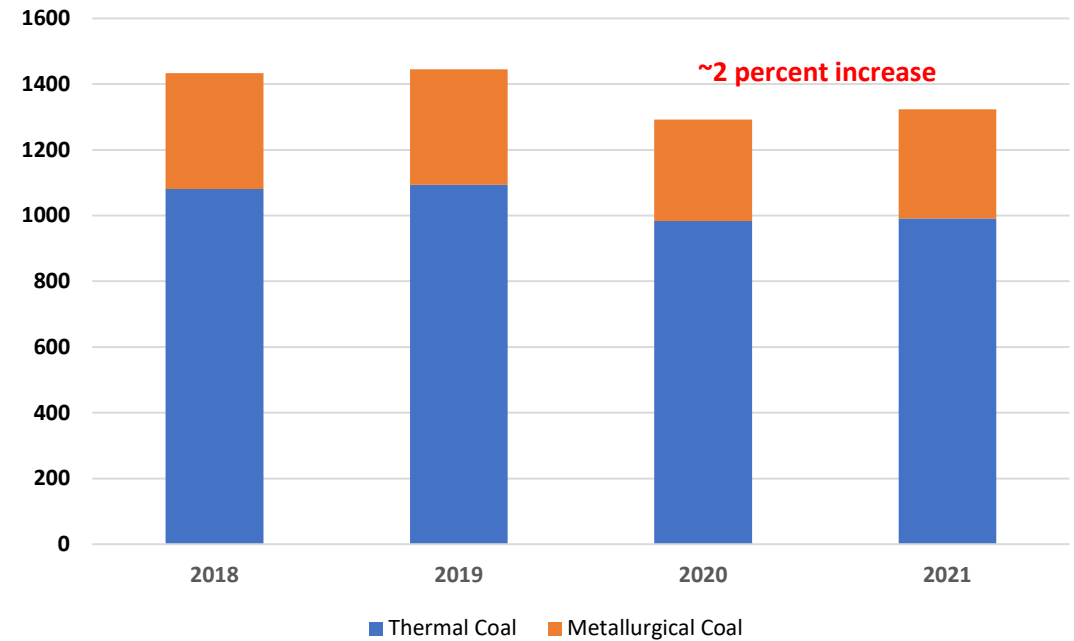
- Coal demand surpassed pre-COVID levels in late 2020 and set to rebound in 2021
- China and India maintain positive demand growth after declines in 2020
- Global carbon emissions are set to jump in 2021 largely due to a resurgence of coal use in the power sector
- Australia, Indonesia, and Russia as key exporters should benefit in the short-term

Share of Coal Consumption in 2020



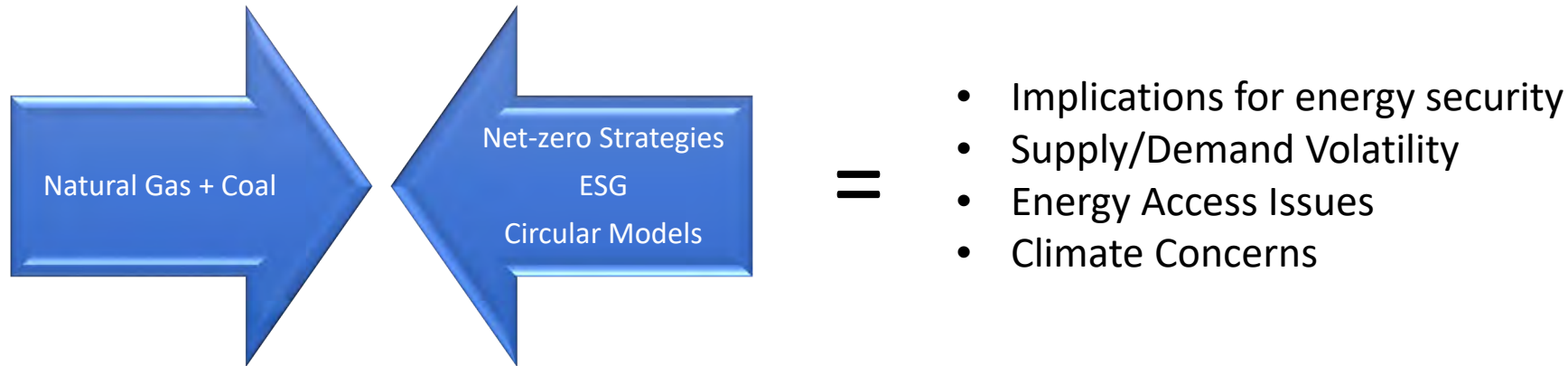
Source: IEA, IEF

Coal Trade 2018-2021

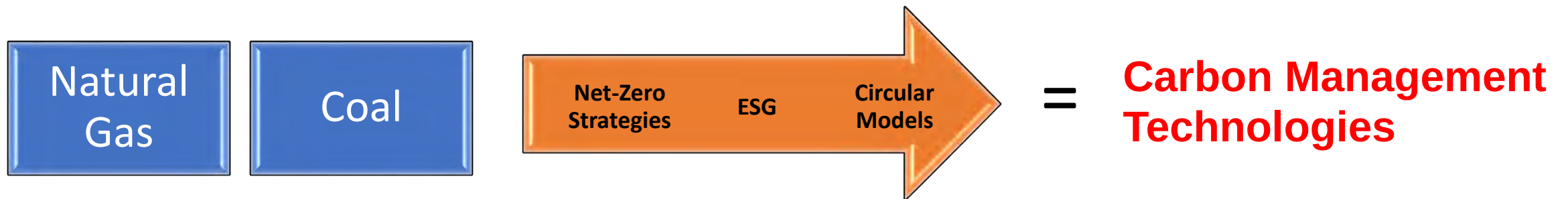


Hydrocarbons are a mainstay in the global energy mix

Zero-Sum Approach:

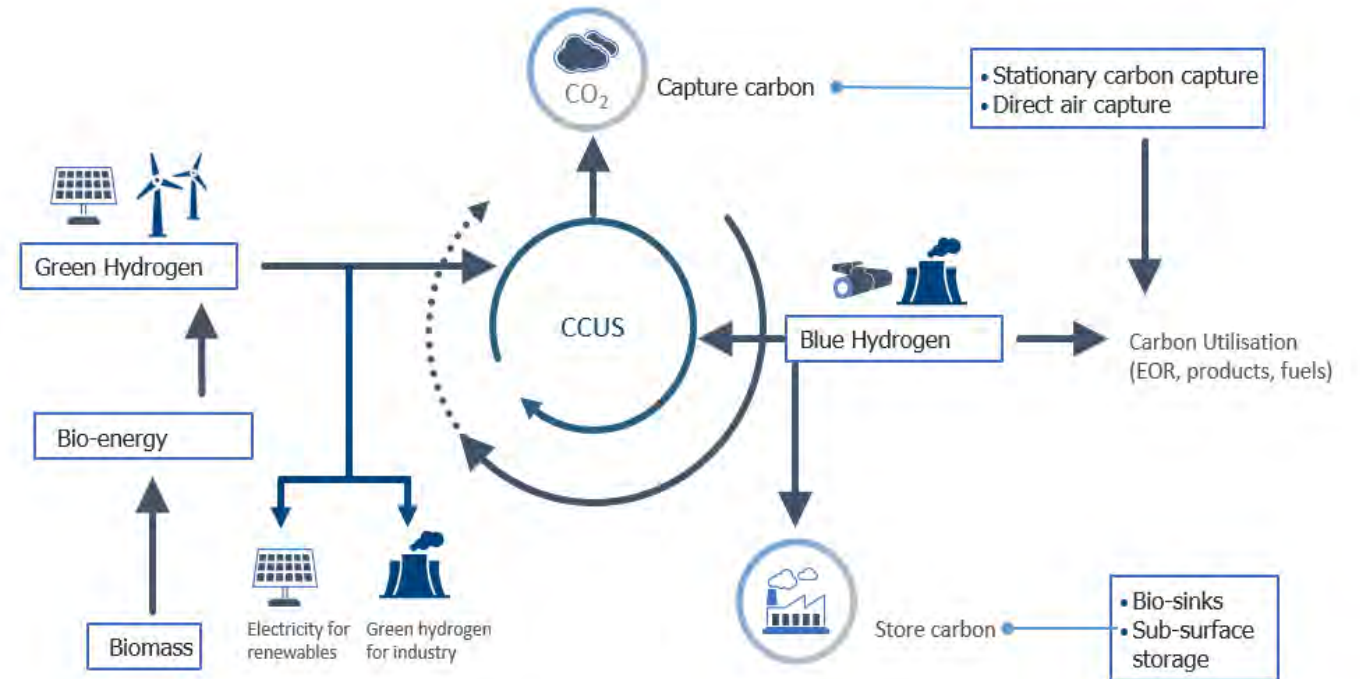


Balanced Approach:



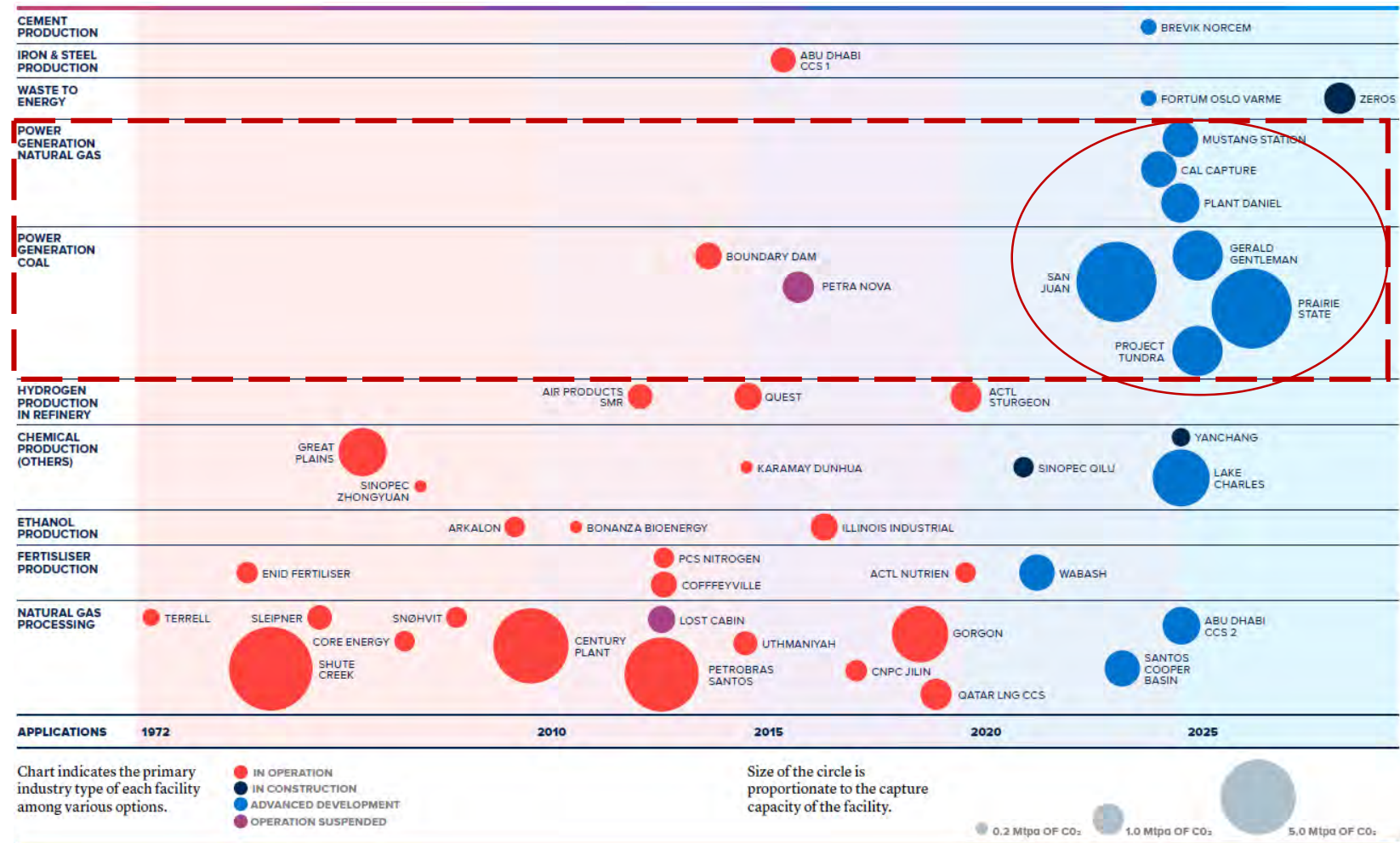
Carbon Capture Use and Storage (CCUS)

- CCUS is a necessary carbon management solution to meet climate goals by mid-century
- CCUS is one part of a holistic Circular Model that integrates energy systems and enables sector coupling which includes hydrogen
- CCUS in combination with bioenergy (BECCs) and Direct Air Capture (DAC) can result in net-negative carbon emissions



CCUS application to Natural Gas and Coal

- Majority of CCUS projects with the largest capture capacity in advanced development are tied to the power sector
- All of these projects are in the US due to a combination of financial incentives, regulatory drivers, and public-private partnerships
- CCUS addresses CO₂ emissions from coal while decarbonising natural gas power generation and production of zero-carbon LNG



Source: Global CCS Institute

Thank you!



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