



## LNG in World Markets

### Japanese LNG Demand Sees Near-Term Upside

The Ministry of Economy, Trade and Industry (METI) of Japan is expected to release its sixth strategic energy plan after June. Poten Global LNG Outlook estimates LNG demand in Japan will increase to an average 80 MMT/y during the 10 years from 2021 to 2031, from 74.5 MMT in 2020 and 77.8 MMT in 2019. This is taking into consideration the government's aim to increase renewables and nuclear power in the energy mix.

The operational life of Japan's nuclear reactors is being extended beyond 40 years to 60 years, previously unthinkable, which indicates that the government is seeking to revive nuclear power generation to meet emissions reduction targets. This creates uncertainty for LNG demand for power utilities with significant idle nuclear capacity and they are currently looking for short-term LNG supply deals of one to three years to keep their options open. METI is also concerned about reserve power ratio this summer and winter, as the ratio for July and August is forecast to be under 4%.

Current discussions are centered on LNG supply that would help to avoid the power shortages seen last winter. Kansai Electric, Tohoku Electric and Jera are said to be looking for supply and may have received short-term offers of 11% to 13% of Brent for supply starting this year. Chugoku Electric is in discussions for 200,000 t/y starting from this year to 2024, likely to replace the volumes from its expired contract with Qatargas. Osaka Gas is also said to be looking for four to six cargoes a year for two to three years. Its balanced portfolio meets domestic demand, and the additional cargoes are for portfolio optimization, after it sold LNG in strip deals to other North Asian buyers.

#### *Japan Nuclear Reactor Operations in 2021*

Company	Nuclear capacity - MW	Nuclear unit(s) owned	Jan-21	Feb-21	Mar-21	Apr-21
Tepco	8,212	7	0%	0%	0%	0%
Kansai	6,578	7	8%	19%	28%	39%
Kyushu	4,140	4	75%	75%	85%	104%
Chubu	3,617	3	0%	0%	0%	0%
Tohoku	2,750	3	0%	0%	0%	0%
JAPC	2,260	2	0%	0%	0%	0%
Hokkaido	2,070	3	0%	0%	0%	0%
Hokuriku	1,746	2	0%	0%	0%	0%
Shikoku	890	1	0%	0%	0%	0%
Chugoku	820	1	0%	0%	0%	0%
<b>Total</b>	<b>33,083</b>	<b>33</b>	<b>11%</b>	<b>13%</b>	<b>16%</b>	<b>21%</b>

Some of the Japanese LNG importers are said to have exercised up to 7-8% of the downward quantity tolerance of their long-term contracts in 2020 due to reduced energy demand as a result of the Covid-19 pandemic. They then bought more spot supply when it was cheaper than long-term contracts. Spot and short-term contracts that are less than four years were 30% of Japanese LNG imports in 2020, according to data provided by International Group of Liquefied Natural Gas Importers.

Carbon emission reduction goals in theory would support LNG demand for the next decade because there is a lack of viable and mature alternative energy sources. However, Japanese buyers are starting to question the role of LNG from 2030 to 2040. In order to reach carbon neutrality targets by 2050, LNG use could drop the same way coal demand is now. Consequently, Japanese buyers are increasingly asking for contracts of 15 years or shorter.

Few buyers remain in the market for long-term volumes, and they are at various stages in their discussions. Jera is seeking four to six cargoes annually for seven to 10 years from 2023 at a low 10% of Brent. Two other buyers, gas utilities Tokyo Gas and Osaka Gas, are said to be looking for long-term supply from the mid-to late 2020s to replace expiring long-term contracts. Discussions are said to be with greenfield projects as the buyers are assured the LNG specifications would suit their needs, while contract extensions with some of the existing projects may not be possible due to a lack of feedgas supply.