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Greens critical of shipowner investments in LNG-fuelled vessels

Photo: CMA CGM



Maersk's apparent about-turn on gas-powered vessels, and other orders for LNG dual-fuelled ships, have drawn the ire of environmental organisations and highlighted the gap between the industry and the green lobby.

Nick Savvides | Aug 13, 2024

After the rush of dual-fuel methanol newbuilding orders in 2023, the latest round of container ship contracting has seen a strong focus back on LNG-dual fuel and the potential pathway to using bio-LNG.

Seaspan has recently revealed orders for 27 dual-fuel vessels, all but four of which can operate on LNG. Environmentalists and others are criticising the gaps in regulations that encourage the industry to shift to LNG.

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Braemar researcher Jonathan Roach said a raft of deliveries has left Seaspan's orderbook a little thin, but he added: "With the Red Sea situation becoming entrenched, potentially newbuilding decisions are being brought forward. Today, the newbuilding lead time for a container ship is about three years. With the uncertainty in the Red Sea, prioritising alternative fuel newbuilding investments makes complete sense."

Increasingly the maritime sector is seeing methane-heavy LNG as a viable alternative fuel to oil, with the avowed anti-LNG carrier Maersk now ordering gas powered ships in what is seen by some as a Uturn on the Danish carrier's previous commitments.

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The Say No to LNG (SNTL) an anti-LNG campaign group said it is "deeply concerned" by Maersk's decision to order LNG vessels.

"This move directly contradicts Maersk's previous commitments to prioritise zero-emission fuels," said the group, who quoted former Maersk CEO Søren Skou: "We don't believe that LNG will play a big role for us as a transition fuel, because it is still a fossil fuel and we would rather go from what we do today straight to a neutral type of fuel."

Maersk, which signed an undertaking to back the phase out of <u>LNG</u> at COP26, along with the Danish and Marshall Island government's and was supported by John Kerry, former US special envoy on climate, until March this year, said its "overall position on LNG has not changed".

A Maersk spokesman said: "While we can consider LNG as an alternative to fossil bunker fuel, it is not an alternative to any green fuel."

However, Maersk believes that LNG can decrease GHG emissions by a "modest" 10-15% on a well-to-wake basis, if used with the correct engine technology, but the company concedes: "it is not a solution to the [global warming] problem."

Even so Maersk argues that it has learnt from its decarbonisation path: "We now consider biomethane to be a viable fuel pathway contributing to the transition. We see promising developments for availability of liquified bio-methane (also known as bio-LNG), though its full scaling abilities are yet to be seen."

Technological advances have reduced methane slip, while boil-off gas handling has further reduced the escape of methane, according to Maersk.

It is a fact, said Lookout Maritime CEO, Martin Crawford-Brunt, that MAN's two-stroke engines suffer 2% methane slip, compared to 3.1% from Wärtsilä's four-stroke engines, which he says, "negates the benefits of LNG".

"Maersk's so-called U-turn [on LNG] is because they can't exclude a fuel type, it would be madness to exclude a viable alternative fuel," said Crawford-Brunt.

Current regulations from the EU mean that by pooling just a few lower emission vessels with the rest of the fleet, a company can average out reductions across its fleet, reducing FuelEU regulatory costs.

It means that Maersk's decision to order LNG powered ships was "inevitable, because they would not be able to compete against MSC and CMA CGM," said Crawford-Brunt, adding that Maersk would have been aware that burning methanol would be challenging, "it is just not economically viable," he concluded.

According to Crawford-Brunt, pooling is unregulated and "offers significant cost incentives to choose LNG."

Environmental organisations such as SNTL believe that to be effective, maritime GHG regulations "must be developed with a high level of ambition and precision," according to SNTL global director Elissama Menezes.

Menezes argues that the IMO must align its regulatory framework with the Paris goal of maintaining global warming at 1.5degs centigrade. "This strategy should include science-based targets-aligned interim goals of a 37% reduction [in GHGs] by 2030 and a 96% reduction by 2040 or higher," said Menezes.

SNTL want to see a levy of at least \$100 per tonne of carbon levied, or some other market-based measure, using the income raised to support vulnerable communities.

"There is no space for LNG in the future of maritime fuel. LNG is a fossil fuel that climate scientists agree must be phased out as quickly as possible to prevent catastrophic damage to our planet. The notion that LNG could serve as a "bridge" to Bio-LNG/Bio-Methane or synthetic methane/e-LNG is flawed. We do not have the luxury of spare decades to transition from one fuel to another," added Menezes.

Geunha Kim, senior program officer at green NVO Solutions For Our Climate, an SNTL affiliate, believes: "While there are pros and cons to various fuel options, the key to the shipping industry's sustainable fuel transition is to move away from fossil fuels."

A return to LNG is "just a return to another fossil fuel" said Kim, who said that the industry should concentrate on "renewable energy-based fuels could offer a sustainable solution decoupled from a reliance on fossil fuels."

Meanwhile, Maersk rejects the view that it has performed a U-turn: "We still firmly believe in methanol as the most scalable and impactful decarbonisation lever for shipping this decade, which is underpinned by the addition of further methanol-enabled vessels to our newbuilding portfolio," said the company.

According to Maersk, methanol can be produced via a variety of biomass, which makes the fuel more scalable than LNG.

A Maersk spokesman pointed out: "The methanol supply chain is simpler, as methanol can be handled as a liquid at ambient temperature and is not dependent on an advanced infrastructure like LNG and bio-methane."

Maersk said it will continue to explore and evaluate different fuel options, including options for bio and e-methanol and drop-in biodiesels, as well as ammonia.

"By diversifying our fleet of dual-fuel vessels, we gain technical and commercial knowledge and experience across multiple future fuel pathways, and we strengthen the toolkit that will lead us towards our near-term 2030 SBTi [Science Based Targets initiative]-validation targets," said Maersk.

Environmentalists, however, point to the potency of LNG as a GHG and the commercial as well as climate risks that companies are taking by ordering LNG powered vessels.

"With geopolitical tensions, rising LNG prices, and impending international methane regulations, the value of LNG-fuelled assets could plummet by up to \$850 billion by 2030. The message is clear: LNG is not a viable solution for shipping decarbonization and will only push us closer to critical climate tipping points," said Menezes.

Methane, the main component of LNG, has a 28 times greater global warming potential than CO2 on a 100-year timescale and am 84 times greater potential on a 20-year timescale.