LNG Shipping News

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Crown LNG finalises purchase agreements

Crown LNG Holdings, a developer of LNG liquefaction and regasification terminal technologies for harsh weather locations, has concluded two acquisitions - KGLNG and Grangemouth.

Both form the basis of Crown LNG's entry into the global LNG infrastructure network, the company said.

KGLNG involved the acquisition of all the shares in the company, which owns the operating license for the planned LNG import terminal at Kakinada, India, while the Grangemouth agreement finalised the acquisition of LNG import terminal assets in Grangemouth, Scotland from GBTron Lands.

Kakinada, located on the East coast of India, is a project licensed to operate 365 days per year - a first for the harsh weather prone area.

Imported gas from the planned terminal will reach demand centres via the East/West Pipeline, helping to support the Indian government's drive to more than double the share of natural gas in the country's energy mix to 15% by 2030.

Payment for the KGLNG project will be made in Crown LNG shares equal to $60 mill, the company said.

The Grangemouth project, located on the East coast of Scotland on the River Forth, seeks to support the UK's increasing drive for energy security post-Brexit and in the context of geopolitical impacts on energy markets.

Currently, the UK relies on just three facilities for all of the country's LNG imports, which increased 74% from 2021 to 2022.

The GBTron acquisition will be paid for by Crown LNG shares equal to $25 mill.

"We are excited and proud to announce the execution of these two transactions and move these two projects down the path," said Swapan Kataria, Crown LNG CEO.

"With Crown LNG and our subsidiaries now firmly in control of the Kakinada and Grangemouth projects, we look forward to driving the success of these two transformative projects for both India and the UK," he added.

Crown also said that it remained dedicated to delivering LNG liquefaction and regasification terminal infrastructure solutions services that cater to the evolving needs of under-served markets worldwide.

As the company focuses on expanding its operations in Europe and South Asia, it will continue to forge strategic partnerships and explore new opportunities to provide efficient and reliable solutions, it added. ■

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US sanctions UAE and Singapore LNGC owning entities

On 30th October, the US State Department designated a company involved in the transport of highly specialised LNG modules and gravity-based structure (GBS) equipment designed specifically for Russia's Arctic LNG 2 project.

In addition, a network of shipping companies based in the UAE and Singapore that are allegedly involved in the procurement of LNGCs for NOVATEK, an entity subject to less than full-blocking measures, and the future export of Russian LNG, were sanctioned.

Arctic LNG 2 has relied on foreign service companies' technology and maritime logistics support, and these actions were designed to further promote accountability for entities providing material support to LLC Arctic LNG 2, the sanctioned project operator.

The entity listed below was designated for having materially assisted, sponsored, or provided financial, material, or technological support for, or goods or services to or in support of LLC Arctic LNG 2:

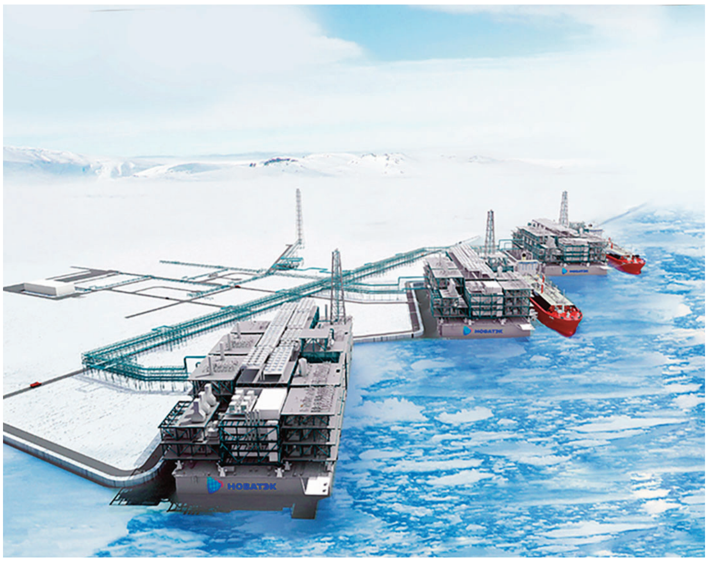
*Smart Solutions provided various gravity-based structure (GBS) parts to US-designated LLC Arctic LNG 2. For example, Smart Solutions was the charterer of the blocked vessels 'Audax' and 'Pugnax', which delivered liquefaction modules and other critical materials for the project.

Front companies

In an attempt to circumvent US sanctions and revitalise the Arctic LNG 2 project, Russian companies have made efforts to procure secondhand LNGCs, predominantly through front companies in third country jurisdictions, to make up for a critical shortage of available vessels.

In August, 2024, the US Department designated White Fox Ship Management, a UAE-based shipmanagement company, which continued to manage four blocked LNGCs that have transhipped LNG from Russia's Yamal and Arctic LNG 2 projects.

Last week's actions targeted the registered owners of the four blocked LNGCs, as well as a UAE-based company involved in the procurement of the vessels and their leasing to NOVATEK.


The US has hit Arctic LNG 2's equipment suppliers

The following Dubai-based entities were designated for operating or having operated in the marine sector of the Russian Federation economy:

- LNG Alpha Shipping is majority owned by New Transshipment and is the registered owner of US-designated LNGC 'North Air', which was acquired to expand Russia's LNG export capacity.

LNG Alpha Shipping is directed by Russian nationals, and is a joint venture created for LNGC construction and long-term charter to NOVATEK.

- New Transshipment is a NOVATEK subsidiary based in the UAE and is involved in the procurement and leasing of four blocked LNGCs to NOVATEK. This company is directed by a Russian national.

In addition, the following entities were designated for being owned or controlled by, or having acted for or on behalf of, directly or indirectly, New Transshipment in Singapore:

- LNG Beta Shipping is majority owned by New Transshipment and is the registered owner of the blocked vessel 'North Mountain, an LNGC that was procured to expand Russia's LNG export capacity.
- LNG Delta Shipping is also majority owned by New Transshipment and is the registered owner of the blocked vessel 'North Way'.
- LNG Gamma Shipping is another company owned by New Transshipment and is the registered owner of the blocked vessel 'North Sky'. ■

NEWS NUDGE

Latham & Watkins advises Vitol on SPA

Coterra Energy and Vitol have announced the execution of an LNG sale and purchase agreement (SPA).

Under the SPA, Coterra will supply 100,000 MMBtu per day of natural gas (equivalent of around 7 mill tonnes of LNG per annum) to Vitol with the purchase price indexed to JKM for a period of 11 years, beginning in 2027.

Latham & Watkins represented Vitol in the transaction with a Houston-based team led by partner, Chris Peponis, with associate, Carlos Diaz.

Klaipeda LNG terminal awarded EU funding

Lithuanian energy terminal operator, AB KN Energies, has been awarded €6 mill by the European Union's Modernisation Fund for the Klaipėda LNG terminal's electrification project.

Implementation of the project is planned to take place over a three-year period, following the final investment decision (FID) taken by the company's management, which is expected in the first quarter of 2025.

The objective is to reduce CO_2 emissions of the terminal's operations, thereby lowering associated costs and improving its overall operational efficiency. ■

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LNG - entering the winter period

For the past four to six weeks, LNG has been primarily snapped up by Asian buyers.

Demand has come from Southeast Asia, South Asia, and Egypt plus Brazil - the latter due a severe drought.

However, Chinese LNG demand has slowed recently, while Europe saw flattened growth.

Inventories were mainly on the high side, especially in Europe, which has not experienced a cold winter for several years, Poten & Partners said in a recent webinar.

Any price rises will hit European buyers hard, as they more or less rely on the spot market.

European underground storage is around 95% full, so it would take a prolonged cold spell or the cessation of Russian gas imports, which currently amount to about 20% of EU imports, up from 15% last year, to run down the amount stored.

The key issue for European LNG interests is Russia and the probable expiry of the pipeline gas transit deal with Ukraine next March.

This will form a prime policy decision for the incoming EU ministers next year. The question is - who would Europe turn to if Russian gas imports were stopped?

Increased Brazilian demand on the back of the current drought should last well into next year, while Egypt has changed from being a net exporter to a net importer of LNG, Poten added.

The amount of cargoes tendered for by Egypt recently caught most players by surprise. The country is following up the 20 cargoes needed by the end of this year with another tender for 15-20 cargoes to be delivered in the first quarter of next year.

Europe is 95% full

China bearish

As for China, the analysts said that the country was seen as bearish for spot cargoes this winter and into next year. One problem was that the 2025 Chinese New Year falls early, at the end of January, which could result in factories shutting down as early as this month, as they will rely on their inventories to get by.

Some Chinese long term contract supplies are due to kick in next year, which will also adversely affect the spot market, but will lead to imports being high.

Recently, Chinese interests were known to have bought at least 10 spot cargoes but not for economic reasons, rather to cover for the regasification slots available, Poten said.

Elsewhere, relative LNG importing newcomers, Thailand, the Philippines and Vietnam, had not negotiated many long term contracts thus far, while price sensitivity was deterring India, Bangladesh and Pakistan from buying LNG on the spot market. ■

NEWS NUDGE

NFE appoints new President

New Fortress Energy (NFE) has promoted Managing Director, Andrew Dete, to the role of President.

He joins the senior management team of Chairman and CEO, Wes Edens, General Counsel, Cameron MacDougall and CFO, Chris Guinta.

NFE also said that its initial Fast LNG unit had completed its third cargo loading towards the end of last month.

The cargo was loaded onto the 'BW Pavilion' and was bound for NFE's operation in Puerto Rico.

The FLNG unit has a nameplate capacity of 1.4 mill tonnes per annum. ■

MOL to renegotiate Russian LNGC contracts

Japan's Mitsui OSK Lines (MOL) may be unable to deliver LNGCs for Russia's sanctions-hit Arctic LNG 2 project.

This would be a blow to the plant that only began producing late last year and recently halted operations.

Tougher Western sanctions on Russia has meant that MOL needed to modify the charter contracts, it revealed last Thursday, and has already started talks to redraw the charter contracts.

Between 2020 and early 2022, MOL signed charter deals for three icebreaking LNGCs and an icebreaking condensate tanker for the project.

The US sanctioned the plant after Russia invaded Ukraine in February, 2022, as part of a raft of wider measures.

"Should the negotiation encounter difficulties, we may be unable to perform these charter agreements. In the event that the charter agreements are discontinued, we will seek to sell the vessels to third parties," MOL said in a statement.

In total, it said it had invested Yen105 bill ($689 mill) in the vessels and, given the possible difficulties in using the icebreakers for other businesses, it may face losses if it cannot sell them at a high enough price.

The three LNGCs were due to start operating last year and the condensate carrier was to be delivered in 2024 to ship LNG and condensate via the Arctic Northern Sea Route (NSR) to Europe and Asia.

Zvezda delays

Separately, Russian daily Kommersant reported last week that Russia's Zvezda shipyard has again delayed the delivery of two Arc7s for the Arctic LNG 2 project to 2025 from the initial 2023.

Reuters was told that Arctic LNG 2 had shut down commercial operations at its first and only operational train with no plans to restart it over the winter.

Russia's NOVATEK is the project's developer with a 60% stake. Other shareholders include France's TotalEnergies, China's CNPC and CNOOC, as well as Japan's Mitsui and the state agency JOGMEC.

(See also US/Russian sanctions story on page 2.) ■

TotalEnergies to supply LNG to Sinopec

French energy giant, TotalEnergies has signed a sales agreement (HoA) with China's Sinopec for the delivery of 2 mill tonnes of LNG per year for 15 years, starting in 2028.

Thanks to this major agreement with one of the leading LNG players in the country, TotalEnergies has strengthened its long-term position in the Chinese market, the world's largest LNG importer, the company added.

This agreement comes within the strategic co-operation pact signed earlier this year between TotalEnergies and Sinopec during Chinese President Xi Jinping's state visit to France.

"We are delighted to have been chosen by Sinopec to supply 2 mill tonnes of LNG to China, the largest LNG importing country in the world. This new agreement demonstrates the competitiveness of TotalEnergies' LNG business and allows us to continue growing our long-term sales in Asia," said Stéphane Michel, President Gas, Renewables & Power at TotalEnergies.

Niu Shuanwen, Senior Vice President of Sinopec Corp, added: "Sinopec and TotalEnergies are strategic partners. This HoA further strengthens the co-operation between the two companies in natural gas.

"Natural gas is an important enabler for realising energy transition and dual carbon goals. Sinopec is committed to building the world's leading clean energy and chemical company and will continue to promote energy transition and the clean, diversified and secure supply of energy. Sinopec strives to make positive contributions to global energy governance and climate change," he said. ■

Guyana and Suriname to join the LNG suppliers' list?

Gas developments are currently underway in Guyana and Suriname that could offer new competitive LNG supply sources early in next decade, said a new Wood Mackenzie report.

According to the report - 'Can Guyana and Suriname LNG compete against new global supply?' both countries could supply up to 12 mill tonnes per annum of LNG by the 2030s.

Guyana's Haimara cluster and Suriname's Block 52 (Sloanea) were estimated by WoodMac to hold 13 trill cu ft of discovered non-associated gas.

Both sources could deliver LNG at breakeven, excluding shipping and regasification costs, of about $6 per MMBtu (FOB NPV10 breakeven).

These positive economic results were supported by high well productivity and upstream partners experienced in LNG commercialisation, WoodMac claimed.

The consultancy added in the report that this move could come at a time when the global market still needs 105 mill tonnes per annum of pre-final investment decision (pre-FID) LNG to fill the supply/demand gap by 2035.

"Guyana and Suriname projects are firming up at an interesting time," said Amanda Bandeira, WoodMac's research analyst, Latin America Upstream Oil and Gas.

"US and Qatar LNG dominance is rapidly growing, but there is a supply window in the mid-2030s coming in part from the US President Biden's pause on approving new US LNG export projects.

"In this environment, Guyana and Suriname can offer a new cost-competitive LNG supply source and serve as regional suppliers, holding shipping costs advantage to address Caribbean and South American demand.

"They are also on par with US Gulf and West Africa projects to deliver to the main demand centres in Southeast Asia," she said.

However, these developments face uncertainty, as the commercial structure and fiscal terms were unclear.

"In Suriname, there is still no set terms for non-associated gas developments, but we expect this project to move forward swiftly – with first gas in 2031 – as the government and project partners have agreed to a 10-year tax break," added Luiz Hayum, principal analyst, Latin America Upstream. "In Guyana, the government and upstream partners alignment on fiscal terms and commercial structure are less advanced, and any disputes could delay the project first gas beyond 2031." ■

Sahara to expand LNG portfolio

Sahara Group, a global energy and infrastructure conglomerate, has signed a heads of agreement (HOA) with Mexico's Amigo LNG SA de CV, a subsidiary of LNG Alliance, to supply LNG from its Guaymas, Sonora, Mexico liquefaction facility.

This agreement marks a significant step in strengthening long-term LNG supply chains aimed at serving the rapidly growing energy markets in Asia and Latin America, the company said.

"This agreement strengthens our collaboration with Sahara Group, a dynamic leader in Africa's energy sector, and firmly positions Amigo LNG as a key player in the global LNG supply market," said Muthu Chezhian, LNG Alliance CEO.

"Our partnership drives forward our shared vision of delivering sustainable, reliable, and scalable energy solutions to meet the world's evolving needs. Together, we are committed to advancing energy transition goals, fostering innovation, and expanding access to clean energy resources globally, creating lasting impact and positive change for future generations," he said.

Wale Ajibade, Executive Director, Sahara Group, added: "This HOA with Amigo LNG perfectly aligns with Sahara Group's commitment to bringing energy to life responsibly by facilitating access to clean, reliable, and sustainable energy solutions.

"By expanding our LNG portfolio, we are reinforcing our dedication to delivering more affordable energy globally. This partnership not only strengthens our foothold in the LNG industry but also positions us to support energy transition efforts. We are excited to collaborate closely with Amigo LNG and look forward to the transformative impact we will create together," he said.

The Amigo LNG project, a 7.8 mill tonnes per annum liquefaction and export facility located on Mexico's west coast, will benefit from its proximity to key shipping lanes and access to Asia/Pacific markets.

Developed in close co-operation with the State of Sonora and the Port of Guaymas, this facility is a vital component of Mexico's emerging LNG export industry, the company claimed. ■

Cheniere raises its full year guidance

During the three and nine months up to 30th September, 2024, Cheniere generated revenues of around $3.8 bill and $11.3 bill, net income of about $0.9 bill and $2.3 bill, consolidated adjusted EBITDA of around $1.5 bill and $4.6 bill, and distributable cash flow of circa $0.8 bill and $2.7 bill, respectively.

The US energy plant developer also raised and narrowed its full year 2024 consolidated adjusted EBITDA guidance to $6 bill - $6.3 bill and full year 2024 distributable cash flow guidance to $3.4 bill - $3.7 bill.

In October 2024, Cheniere announced a voluntary, measurement-informed Scope 1 methane emissions intensity target for its liquefaction facilities.

This target builds upon Cheniere's climate strategy, leveraging data from its emissions measurement and mitigation programmes and is consistent with the requirements to achieve Gold Standard under its membership in the United Nations Environment Programme's Oil & Gas Methane Partnership 2.0.

A month earlier, Cheniere produced and loaded its 1,000th LNG cargo for export from the CCL project, which was discharged in Italy.

Since 2016, Cheniere has produced and exported around 3,720 cargoes from the SPL and the CCL projects, which have been delivered to about 40 markets worldwide.

"Our team's unwavering focus on safety, execution and capital discipline once again enabled key achievements throughout our business, highlighted by our 1,000th LNG cargo at Corpus Christi, continued progress on Stage 3, and further follow-through on our comprehensive capital allocation plan," said Jack Fusco, Cheniere's President and CEO.

"Our outstanding results and improved outlook enable us to further raise and tighten our guidance ranges for 2024, while the progress achieved on Stage 3 provides increased visibility into our production forecast for 2025.

"As we complete another strong year at Cheniere, reinforcing our track record for operational excellence and safety, executing on our long-term capital allocation plan, and growing our leading infrastructure platform remain our foremost priorities, as we aim to reliably meet the energy needs of our customers worldwide for decades to come," he said.

Income fall

Net income decreased around $808 mill and $6.2 bill for the three and nine months periods, respectively, compared to the corresponding 2023 periods.

This was primarily attributable to $923 mill and $6.1 bill of unfavourable variances related to changes in fair value of Cheniere's derivative instruments (before tax and non-controlling interests), compared to the corresponding 2023 periods.

Consolidated adjusted EBITDA decreased to about $180 mill and $2.5 bill for the periods respectively, compared to the corresponding 2023 months. The drop was primarily due to a higher proportion of he company's LNG being sold under long-term contracts, as well as a fall in international gas prices, resulting in lower total margins per MMBtu of LNG delivered during both periods, compared to 2023.

Through Cheniere Partners, the group operates six natural gas liquefaction trains for a total production capacity of around 30 mill tonnes per annum of LNG at the Sabine Pass LNG terminal in Cameron Parish, Louisiana (SPL).

Cheniere Partners is developing an expansion project adjacent to SPL with an expected total production capacity of up to about 20 mill tonnes per annum of LNG, inclusive of estimated debottlenecking opportunities.

In October, 2024, Cheniere received authorisation from the US Department of Energy (DoE) to export LNG to FTA countries.

Cheniere also operates three natural gas liquefaction trains totalling 15 mill tonnes per annum of LNG at the Corpus Christi LNG terminal (CCL).

The company is constructing another expansion project adjacent to CCL consisting of seven midscale trains with an expected total production capacity of over 10 mill tonnes per annum of LNG.

First LNG from the first train of the CCL Stage 3 project is expected to be achieved by the end of this year.

Also being developed are two additional midscale trains with an expected total production capacity of about 3 mill tonnes per annum of LNG, adjacent to the CCL Stage 3 project.

In July, 2023, Cheniere received authorisation from the DoE to export LNG to FTA countries and in June, 2024, received a positive Environmental Assessment from FERC and anticipated receiving all remaining necessary regulatory approvals for this project in 2025. ■

NEWS NUDGE

KOTUG to supply tugs for GTA

Following a thorough and competitive tender process, KOTUG International and its local Senegalese partner, Maritalia were chosen to provide the marine services to the Greater Tortue Ahmeyim (GTA) project.

The award was made by bp and its project partners, Kosmos Energy, and National Oil Companies Société des Pétroles du Sénégal (PETROSEN), plus Société Mauritanienne Des Hydrocarbures (SMH),

KOTUG and Maritalia have signed a long-term fixed-term contract, with extension options, to provide marine services to one of Africa's deepest subsea developments, located on the maritime border between Mauritania and Senegal.

The company will deploy four RAstar 32 m azimuthing stern drive (ASD), IMO Tier-III compliant tugs to support the offshore hub terminal, FLNG and FPSO operations, while Maritalia will fulfill local content requirements.

GTA will produce gas from an ultra deepwater subsea system and FPSO, which will process the gas, to be then exported through a 35 km pipeline to an FLNG, where it will be loaded onto LNGCs.

TMC wins contracts for more Capital Gas LNGC newbuildings

Korea Shipbuilding Offshore Engineering has awarded a contract to TMC Compressors to deliver the marine compressed air system to four LNGCs.

The 174,000 cu m LNGCs are being built by Hyundai Heavy Industries (HHI) for Capital Gas Corp.

Under the contracts, TMC will deliver a complete marine compressed air system to each of the four vessels. The system includes control and service air compressors.

Norway-based TMC will manufacture and assemble the equipment in Scandinavia and then ship it to South Korea.

The compressors are designed so that they can be maintained by the vessel crew, which reduces the need for external service technicians.

TMC has already delivered compressors to several Capital Gas LNGCs.

In early 2022, TMC was contracted to supply marine compressed air systems to five LNGCs built by Hyundai Samho Heavy Industries and HHI, adding to the seven LNGCs that TMC was contracted for in 2020. ■

GTT reports increased revenues

GTT has revealed that its nine-month 2024 revenues were €465 mill, a rise of almost 55% on the same period in 2023.

The good order momentum continued with 68 LNGCs, 12 ethane carriers, 1 FSRU, 1 FLNG, 12 LNG powered containerships and 1 LNG bunker vessel on its books.

Commenting on the results, Jean-Baptiste Choimet, GTT's CEO, said: "With a total of 68 LNG carrier orders, 12 ethane carrier orders, one regasification unit order and one FLNG unit order, the commercial performance of our core business was particularly strong in the first nine months of 2024.

"As demand for LNG grows, so does the need for additional LNG carriers, which is supported by the ongoing investments in liquefaction plants and increasing construction capacity at shipyards.

"For LNG as fuel, GTT booked 12 orders for containerships and one order for a LNG bunker vessel in the third quarter of 2024, in a context of increased orders for new LNG-powered vessels, but also heightened competition from containment technologies marketed by Chinese shipyards.

"Since the start of the year, our services activities, which include Ascenz Marorka, have won some major contracts with leading shipowners, underlining the relevance of our digital solutions.

"Finally, Elogen, our subsidiary specialising in electrolysers for green hydrogen production, posted nearly stable revenues, in a weak market volume and a very low level of order intake.

"The GTT Group is pursuing its continued R&D and innovation efforts, as evidenced by the numerous new approvals obtained from classification societies during the first nine months of 2024, notably in the fields of liquid hydrogen transport and alternative fuels.

"On the financial front, revenues for the first nine months of 2024 were up by nearly 55%, compared to the first nine months of 2023, driven by the gradual increase in the number of LNG carriers under construction. Therefore, in the absence of significant delays in vessel building schedules, the Group confirms its 2024 objectives, which it now expects at the top of the initial ranges," he concluded.

The bunker vessel order mentioned was announced recently and came from Hudong-Zhonghua Shipbuilding for the tank design of a new LNGBV for Ondimar Transportes Marítimos, a Spanish Ibaizabal Group company.

To be chartered to French energy major, TotalEnergies, this LNGBV marked Ondimar's first order for a vessel equipped with a membrane containment system developed by GTT.

GTT will design the tanks for the 18,600 cu m vessel, which will feature the Mark III Flex membrane containment system.

This new order introduces significant improvements in terms of vessel performance with a guaranteed daily boil-off rate of 0,16% of vessel volume, as well as CO2 emissions reduction, compared with the LNGBVs 'Gas Agility' and 'Gas Vitality', both chartered by TotalEnergies.

Measuring 135.9 m long and 24.5 m beam, her delivery is scheduled for the end of 2026.

Meanwhile, GTT's latest approval in principle (AiP) came from ClassNK for a 30,000 cu m LNGC equipped with two Mark III Flex membrane tanks.

The unit's ballast tank design and ballasting operations allow for the elimination of filling limits, enhancing operational flexibility. The AiP demonstrated the feasibility of this design concept.

In LNGCs with membrane tanks, filling limits are often required based on the strength assessments against sloshing loads, which can pose challenges, especially in feeder transportation.

GTT's LNGC design has ballast tanks divided into upper and lower sections. During ballasting operations, water is pumped into the upper ballast tanks first to maintain a lower metacentric height (GM), while satisfying the stability requirements, reducing roll acceleration.

This helps prevent excessive sloshing loads at any cargo filling level, allowing unrestricted filling levels and eliminating prior filling limits, ClassNK said. ■

> **"As demand for LNG grows, so does the need for additional LNG carriers, which is supported by the ongoing investments in liquefaction plants and increasing construction capacity at shipyards."**
>
> *- Jean-Baptiste Choimet, CEO, GTT*

ABS has provided GTT with an AiP for its 30,000 cu m LNGC design

Nuclear powered LNGC feasibility study

Houston-based class society and consultancy, ABS has released a report into the potential of advanced nuclear technology utilising a small modular reactor on a standard LNGC.

The impact of a high-temperature, gas-cooled reactor (HTGR) on the design, operation and emissions of a 145,000 cu m LNGC design was modelled by ABS and Herbert Engineering Corp (HEC).

This study is designed to help industry better understand the feasibility and safety implications of nuclear propulsion and to support future development projects, ABS said.

It provides ABS and the industry important information on heat and energy management, shielding, weight distribution, and other design features for an LNGC with nuclear propulsion.

This will assist the identification of design issues that will inform future rules development.

ABS' study also found the HTGR technology allowed faster transit speeds and offers zero-emission operations. There would also be no requirement to refuel, although the HTGR technology would need replacing about every six years.

ABS has conducted a study on nuclear powered LNGCs

"While this technology is well understood on land, adapting it for marine application is in its infancy. However, this study and the other research we have carried out clearly highlight its significant potential to address not only shipping's emissions challenge but to deliver a range of other operational advantages to the industry.

"ABS is committed to helping the industry evaluate its suitability for use in a range of use cases and LNG carriers is just one of a range of potential applications we are exploring," said Patrick Ryan, ABS Senior Vice President and CTO.

The study showed a nuclear propelled LNGC would have specific design features, with reactors placed at the rear of the vessel and batteries forward of the location occupied by fuel tanks on current vessels and a reinforced hull.

Given the design constraints, the HTGR technology would only be suitable for larger LNGCs.

The report is the latest in a succession of initiatives from ABS designed to address challenges to the adoption of nuclear technology at sea.

Last month, ABS launched the industry's first comprehensive rules for floating nuclear power plants at a forum for nuclear industry leaders held jointly with Idaho National Laboratory (INL).

The US Department of Energy (DOE) has awarded ABS a contract to research barriers to the adoption of advanced nuclear propulsion on commercial vessels. ■

Wärtsilä ties up Capital Gas' LNGCs

Technology group Wärtsilä has signed a five-year lifecycle agreement covering seven 174,000 cu m LNGCs operated by Capital Gas Ship Management.

By applying Wärtsilä's operational support service and performance optimisation services, the agreement will deliver enhanced reliability, greater efficiency, minimised climate impact, and operational certainty for the vessels, the company claimed.

The seven ships are powered by WinGD X-DF 2-stroke, dual-fuel main engines.

In today's legislative and economic environment, shipowners and operators are increasingly looking for support in maximising efficiency and use of their assets, especially for LNGCs, which have limited opportunities for unscheduled stops and downtime, and owners/operators are specifically looking to safeguard their vessels' reliability.

The agreement with Wärtsilä will help Capital Gas to optimise the operations and maintenance of the seven vessels more effectively through 24/7 expert remote support and guidance for troubleshooting and maintenance using specialist diagnostic tools.

Wärtsilä experts will directly monitor the vessels' systems and employ diagnostic tools to support the crew with troubleshooting activities and rapid fault resolution.

Furthermore, the agreement will help Capital Gas minimise OPEX and lifecycle costs by enabling preventive interventions that can avoid the need for later expensive repairs and on-site visits.

"The agreement's combination of technology, high-quality spare parts delivery, and the expert support from Wärtsilä's Expertise Centres, as well as its global network of workshops and qualified engineers will deliver the operational reliability and certainty that we need to maximise the up-

Wärtsilä has signed a lifecycle deal with Capital Gas

time of these vessels," said Miltos Zissis, Managing Director, Capital Gas Ship Management Corp.

Wärtsilä and Capital Gas have established a close working relationship over the last few years. For example, in June, 2022, the two companies signed an agreement to partner in developing a fleet de-carbonisation programme, a tailored version of Wärtsilä's Decarbonisation Service initiative.

This programme is designed to develop an optimal means for achieving the greenhouse gas reduction targets set by Capital Gas.

"The future of the marine market is becoming more and more complex which is why we are pleased to continue to support Capital Gas with its sustainability goals. Our agreement has been tailored to meet the specific needs of Capital Gas; to optimise performance and reliability and ensure these vessels can deliver value throughout their lifecycle," added Rajeev Janardhan, Sales Manager, 2-Stroke Engine Lifecycle Solutions, Wärtsilä Marine. ■

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Wood gets second Singapore terminal FEED contract

UK-based consulting and engineering concern, the Wood Group, has been awarded the front-end engineering design (FEED) contract for the development of Singapore's second LNG terminal by operator, Singapore LNG Corp (SLNG).

According to the Singapore Economic Development Board, more than 95% of electricity in Singapore is generated from natural gas.

With an estimated 5 mill tonnes per annum of additional capacity to come from this expansion project, the new terminal will further enhance and secure Singapore's growing energy needs.

This project will utilise an FSRU, a first for Singapore. Intended to be located at Jurong Port, the terminal will feature facilities for transfer of regasified LNG from the ship to the onshore gas transmission network.

Wood will review the FSRU design and co-ordinate its integration into the onshore connecting infrastructure.

Henry Ling, Wood's Senior Vice President of Process & Chemicals Asia/Pacific, said: "We are thrilled to be awarded the engineering contract for the second LNG terminal, enabling the delivery of additional low-carbon LNG services.

"Wood successfully supported SLNG with the engineering of the first LNG terminal, which was completed in 2013. We will deliver the same exceptional quality of work for this complex concept, utilising our expertise in LNG terminal design and regasification.

"Combining our marine infrastructure design and experience with Singapore's regulatory approvals will bring this low-carbon concept to reality," he said.

Over 50 Wood employees based in Singapore will be involved in delivering the project, together with experts in Ireland and Scotland supporting the marine infrastructure design and experts in Spain aiding the FSRU design. ■

Minerva opts for Dualog's date transfer service

Minerva Marine (managing 54 tankers), Minerva Gas (managing five LNGCs) and Minerva Dry (managing 11 bulkers and three containerships), have deployed Dualog's data transfer service - Dualog Drive.

With this update, all three shipmanagement companies can now automatically send up to 1 mill files to and from their vessels each week.

The fleets operate worldwide and as such, a fast and reliable file sharing system was considered vital to their operations.

Minerva's daily data exchange requirements include - software distribution to keep all on board systems up-to-date; shore-to-vessel enterprise resource planning (ERP) database synchronisation and the ability to distribute large training videos, together with having prompt access to other types of data, such as videos from CCTV on board, VDR and ECDIS playback data.

Ilias Vlachogiannis, Minerva Marine's Head of Fleet ICT, said: "Our fleet's data flow capability required more control, as it was difficult to manage and troubleshoot, with multiple manual processes both on board and in the offices.

"Large files transfers were often facing interruptions making difficult their delivery on time due to connection issues. These were the key reasons we began exploring alternatives for data transfer within our fleet," he explained.

Minerva has been using Dualog's maritime email service for a year, and being familiar with its environment, was able to easily adopt a new file transfer tool into its fleet. Dualog developed Dualog Drive in collaboration with vessel IT teams worldwide, ensuring it seamlessly integrates into the data flow of all the fleets.

Eftihia Benaki, ICT Manager at Minerva Marine, added: "We saved dozens of man-hours per month, due to the process being automated. Configuring and troubleshooting have become much easier because we can see all fleet transfers in one interface. We have also reduced our manual work significantly, and I believe we can still do more."

"Because of the Dualog technology, we can transfer large files without worrying about interruptions, and we know that all files will be delivered on time. It feels like we're always online," stressed Vlachogiannis.

Kyriakos Papapolydorou, Dualog's Regional Manager, added: "Our objective was to reduce the pain of manual processes of data transfer between ship and shore, while safeguarding smooth operations in diverse environments. We're glad to hear that Minerva has experienced an increase in productivity in such a short period of time." ■

Minerva has tapped into Dualog's data transfer service

NEWS NUDGE

Ships - Newbuildings, charters, deliveries

Samsung Heavy Industries has won an order for a 174,000 cu m LNGC, said to be worth $259 mill.

She will be chartered to GAIL for about seven years.

The owner was thought to be 'K' Line.

Elsewhere, Mitsui OSK Lines (MOL) has confirmed the long term timecharter of a newbuilding FSRU to Singapore LNG Corp, Singapore's state-owned LNG terminal operator.

The FSRU will be built at Hanwha Ocean in South Korea. After her delivery, MOL will own, manage, and operate the unit.

MOL has also held a naming ceremony for the newbuilding 174,000 cu m LNGC, 'Marvel Swallow', which will be chartered to Mitsui & Co, at Hanwha Ocean's Geoje Shipyard, the fourth in the series.

After her delivery on 28th October, the vessel will undergo gassing-up/cool-down operation in Japan and then proceed to the US. ■

Kiewit wins Texas LNG's EPC development lead

US engineering company, Kiewit has won a contract to lead the engineering, procurement, and construction (EPC) of Glenfarne's Texas LNG development at Brownsville under a lump-sum turnkey (LSTK) structure.

Glenfarne Energy Transition's Texas LNG Brownsville is a 4 mill tonnes per annum LNG export terminal to be built at Brownsville, Texas.

Kiewit's subsidiaries, Kiewit Engineering Group and Kiewit Energy Group, will lead the project.

Glenfarne's founder and head, Brendan Duval

In addition, Texas LNG will work with Kiewit to promptly complete the pre-final investment decision (FID) engineering required for the project to proceed to a FID, which aligns with Texas LNG's recent announcement of selling sufficient offtake for a FID to be taken.

Brendan Duval, CEO and Founder of Glenfarne, and Co-President of Texas LNG, said: "Texas LNG received immense interest from world-class contractors that wanted to be involved in the project.

"Kiewit's proposal, capability, and partnership vision for Texas LNG, as well as their significant execution and implementation expertise on the US Gulf Coast, made a substantial impression on our project team. We look forward to working with them," he said.

"Kiewit is excited to partner with Glenfarne to deliver this crucial LNG project in the region," added Eric Gutierrez, Executive Vice President, Kiewit Energy Group.

"Our extensive experience delivering complex, integrated LNG EPC projects for our clients continues to be a differentiator for our company. We appreciate the opportunity to work with a client committed to developing important energy infrastructure opportunities in the US," he said.

Glenfarne Energy Transition, a developer, owner, and operator of energy transition infrastructure, is the majority owner and managing member of Texas LNG. The company's LNG portfolio also includes the 8.8 mill tonnes per year Magnolia LNG export facility under development in Lake Charles, Louisiana. ■

NEWS NUDGE

GAIL to import more LNG

GAIL (India) is seeking long-term LNG import deals amounting to 5.5 mill tonnes per year, raising its capacity to 21 mill tonnes per year by 2030, finance chief Rakesh Kumar Jain said recently.

India's largest gas pipeline utility has deals for the supply of 15.53 mill tonnes of LNG per year, having earlier signed supply agreements with trader Vitol and ADNOC.

The state-run company plans to raise loans of Rup40 bill ($475.9 mill) in this financial year to fund its pipeline network expansion and boost petrochemicals capacity, Jain said.

GAIL has not raised a foreign currency loan since 2016/17.

The company would consider raising the debt from foreign markets if that proves cheaper than rupee-denominated loans, Jain added. ■

Genting moves FLNG project ahead

Genting Berhad's 95%-owned indirect subsidiary, PT Layar Nusantara Gas (PTLNG), has signed a design, engineering and procurement agreement for the onshore gas processing plant, connecting pipelines and supporting facilities for an FLNG project to be located in West Papua, Indonesia.

China National Machinery Import & Export Corporation (CMEC) and Shandong Kerui Energy Development (Kerui) will be responsible for the activities going forward.

The fixed lump sum price for the procurement contract is $182,873,905.87 (excluding a reimbursable sum of $2,574,000.00).

PTLNG also signed another contract for the construction, installation and commissioning of the midstream infrastructure with a local Indonesian company, PT China Construction Yangtze River Indonesia (PT CCYRI) for a fixed lump sum contract price of IDR2,053,215,546,327.001 (excluding reimbursable sum of IDR213, 611, 206, 985.00).

Once it is completed in about two years, the facility will receive raw gas from the Asap, Merah and Kido structures within the concession area of the Kasuri Block in West Papua, Indonesia, awarded to Genting Oil Kasuri (GOKPL), another 95% indirect subsidiary.

The upstream raw gas will be treated at the midstream infrastructure before being liquefied into LNG at the FLNG, which is being constructed by Wison New Energies, and was 32.83% complete as of 26th September, 2024. ■

LNG rate assessments

Spot market (155,000-165,000 cu m)

Region	This week	Change*
East of Suez	$22,000	- $8,000
West of Suez	$12,000	- $5,500
12 mos T/C	$30,000	- $7,000

*Since last report (24/10/24)

Source: Fearnleys (06/11/24)

Monthly Large LNGC Values*

Newbuildings (174,000 cu m)	$269.86 mill
Five years old (174,000 cu m)	$233.29 mill
Total Fleet (615 ships)	$104.84 bill
Orderbook (369 ships)	$103.15 bill

*Source: VesselsValue (08/10/24)

*The above is updated each month courtesy of VesselsValue

WORLD LNG CARRIER ORDERBOOK

Name	Owners	Yard	Capacity	Propulsion	Ordered Date	Delivery Date
Apostolos	Capital Gas	Hyundai Heavy	174,000	ME-GA	01/11/2021	01/07/2024
North Light	MOL	Hanwha Ocean	174,000	ME-GA	01/09/2021	01/07/2024
Ilya Mechnikov	MOL, COSCO	Hanwha Ocean	172,500	TFDE - Azipod	01/08/2020	01/07/2024
Venture Bayou	JP Morgan	Samsung	174,000	ME-GA	01/12/2021	01/07/2024
Celsius Greenwich	Celsius Shipping	Samsung	180,000	ME-GA	01/08/2021	01/07/2024
Nikolay Basov	MOL, COSCO	Hanwha Ocean	172,500	TFDE - Azipod	01/08/2020	01/07/2024
Daewoo 2524	MOL	Hanwha Ocean	174,000	ME-GA	01/09/2021	01/07/2024
Daewoo 2527	MOL	Hanwha Ocean	174,000	ME-GA	01/10/2021	01/07/2024
Daewoo 2528	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/11/2021	01/08/2024
Pyotr Stolypin	Smart LNG	Zvezda SSK	172,600	TFDE - Azipod	01/09/2019	01/08/2024
Alexey Kosygin	Smart LNG	Zvezda SSK	172,600	TFDE - Azipod	01/09/2019	01/08/2024
Nantes Knutsen	Knutsen	Hyundai Samho	174,000	ME-GA	01/12/2020	01/08/2024
Celsius Grenada	Celsius Shipping	Samsung	180,000	ME-GA	01/08/2021	01/08/2024
Gaslog Italy	GasLog	Hanwha Ocean	174,000	MEGI	01/01/2022	01/08/2024
Athos Lng	TMS Cardiff Gas	Samsung	174,000	ME-GA	01/04/2022	01/08/2024
Sergei Witte	Smart LNG	Zvezda SSK	172,600	TFDE - Azipod	01/09/2019	01/08/2024
Daewoo 2525	MOL	Hanwha Ocean	174,000	ME-GA	01/09/2021	01/08/2024
Kool Tiger	Cool Co	Hyundai Samho	174,000	ME-GA	01/06/2022	31/08/2024
Orion Iris	JP Morgan	Samsung	174,000	ME-GA	01/10/2021	01/09/2024
Samsung 2474	Maran Gas Maritime	Samsung	174,000	XDF	01/05/2021	01/09/2024
Maran Gas Nice	Maran Gas Maritime	Samsung	174,000	XDF	01/05/2021	01/09/2024
Rex Tillerson	MOL, COSCO	Hudong-Zhonghua	175,000	XDF	01/10/2021	01/09/2024
Lev Landau	Hanwha Ocean	Hanwha Ocean	172,500	TFDE - Azipod	01/08/2020	01/09/2024
Zhores Alferov	Hanwha Ocean	Hanwha Ocean	172,500	TFDE - Azipod	01/08/2020	01/09/2024
Pyotr Kapitsa	Hanwha Ocean	Hanwha Ocean	172,500	TFDE - Azipod	01/08/2020	01/09/2024
Marvel Phoenix	GasLog	Hanwha Ocean	174,000	MEGI	01/01/2022	01/09/2024
Marvel Dove	SK Shipping	Hyundai Samho	174,000	ME-GA	01/01/2022	01/09/2024
New Brave	Pan Ocean	Hyundai Heavy	174,000	XDF	01/12/2020	01/09/2024
Daewoo 2536	MOL	Hanwha Ocean	174,000	ME-GA	01/01/2022	01/10/2024
North Valley	MOL	Hanwha Ocean	174,000	ME-GA	01/09/2021	01/10/2024
Id'asah	JP Morgan	Samsung	174,000	ME-GA	01/10/2021	01/10/2024
New Nature	Pan Ocean	Hyundai Heavy	174,000	XDF	01/12/2020	01/10/2024
New Green	Pan Ocean	Hyundai Heavy	174,000	ME-GA	01/07/2021	01/10/2024
Daewoo 2529	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/11/2021	01/11/2024
Samsung 2604	NYK	Samsung	174,000	XDF	01/12/2021	01/11/2024
Orion Sinead	JP Morgan	Hyundai Heavy	174,000	XDF	01/12/2020	01/11/2024
Puteri Mahsuri	Hyundai LNG Shipping	Hyundai Heavy	174,000	XDF	01/07/2021	01/11/2024
Kool Panther	Cool Co	Hyundai Samho	174,000	ME-GA	01/06/2022	01/12/2024
Umm Ghuwailina	MOL, COSCO	Hudong-Zhonghua	175,000	XDF	01/10/2021	01/12/2024
Lng Ping Hu	Zhejiang Huaxiang	Jiangsu Yixiang	78,900	XDF	01/07/2023	01/12/2024
Umm Swayyah	H-Line, Pan Ocean, SK Shipping	Hanwha Ocean	74,000	ME-GA	01/06/2022	01/12/2024
Samsung 2603	H-Line, Pan Ocean, SK Shipping	Samsung	174,000	ME-GA	01/01/2022	01/12/2024
Samsung 2602	H-Line, Pan Ocean, SK Shipping	Samsung	174,000	ME-GA	01/01/2022	01/12/2024
Nuaijah	H-Line, Pan Ocean, SK Shipping	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/12/2024
New Oasis	Pan Ocean	Hyundai Heavy	174,000	ME-GA	01/07/2021	01/12/2024
Samsung 2597	JP Morgan	Samsung	174,000	ME-GA	01/10/2021	01/12/2024
Jiangnan H2700	ADNOC	Jiangnan	175,000	XDF	01/03/2022	01/01/2025
Josef Pilsudski	Knutsen	Hyundai Samho	174,000	ME-GA	01/03/2022	01/01/2025
Samsung 2595	JP Morgan	Samsung	174,000	ME-GA	01/10/2021	01/01/2025
Samsung 2601	JP Morgan	Samsung	174,000	ME-GA	01/12/2021	01/01/2025
Lebrethah	H-Line, Pan Ocean, SK Shipping	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/01/2025

DFDE = dual fuel diesel engines, STRH = steam turbine reheat / ultra steam turbine, MEGI = marine electric gas injection,
DRL = slow speed diesel, FSRU = vessel with regas capacity, FLNG = floating LNG production unit
Data last updated = 29 July 2024

Fearnley LNG

Name	Owners	Yard	Capacity	Propulsion	Ordered Date	Delivery Date
Samsung 2598	Celsius Shipping	Samsung	180,000	ME-GA	01/12/2021	01/01/2025
Al-kheesah	Pan Ocean, SK Shipping, H-Line	Samsung	174,000	ME-GA	01/09/2022	01/01/2025
Puteri Mayang	Hyundai LNG Shipping	Hyundai Heavy	174,000	XDF	01/07/2021	01/01/2025
Samsung 2612	Pan Ocean, SK Shipping, H-Line	Samsung	174,000	ME-GA	01/09/2022	01/02/2025
Puteri Sabah	SK Shipping	Hyundai Heavy	174,000	ME-GA	01/05/2022	01/02/2025
Al-kharrarah	H-Line, Pan Ocean, SK Shipping	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/02/2025
Daewoo 2559	SK Shipping, Pan Ocean, H-Line	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/02/2025
Venture Acadia	Venture Global LNG	Hanwha Ocean	174,000	MEGI	01/11/2021	01/03/2025
Ignacy Jan Paderewski	Knutsen	Hyundai Samho	174,000	ME-GA	01/03/2022	01/03/2025
Hudong-zhonghua H1792a	MOL, COSCO	Hudong-Zhonghua	175,000	XDF	01/10/2021	01/03/2025
Al-slaimi	H-Line, Pan Ocean, SK Shipping	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/03/2025
Puteri Sarawak	SK Shipping	Hyundai Heavy	174,000	ME-GA	01/05/2022	01/03/2025
Hudong-zhonghua H1836a	ULT	Hudong-Zhonghua	174,000	XDF	01/12/2021	01/03/2025
Clean Mistral	Dynagas	Hyundai Heavy	200,000	ME-GA	01/03/2022	01/03/2025
Hl Alyssa Warner	H-Line	Samsung	174,000	ME-GA	01/02/2022	01/03/2025
Hyundai Samho 8049	NYK	Hyundai Samho	174,000	XDF	01/08/2022	01/03/2025
Samsung 2634	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/04/2025
HL Fortuna	H-Line	Hyundai Samho	174,000	XDF	01/01/2022	01/04/2025
Clean Levant	Dynagas	Hyundai Heavy	200,000	ME-GA	01/03/2022	01/04/2025
Venture Creole	Venture Global LNG	Hanwha Ocean	174,000	MEGI	01/11/2021	01/05/2025
Mareekh	Knutsen	Hyundai Heavy	174,000	XDF	01/06/2022	01/05/2025
Hudong-zhonghua H1793a	MOL, COSCO	Hudong-Zhonghua	175,000	XDF	01/10/2021	01/05/2025
Samsung 2599	Celsius Shipping	Samsung	180,000	ME-GA	01/12/2021	01/05/2025
Hl Edward Austin	H-Line	Samsung	174,000	ME-GA	01/02/2022	01/05/2025
Daewoo 2561	Pan Ocean, SK Shipping, H-Line	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/05/2025
Jiangnan H2701	ADNOC	Jiangnan	175,000	XDF	01/03/2022	01/05/2025
Wadi Al Syl	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/06/2025
Mesaieed	Knutsen	Hyundai Heavy	174,000	XDF	01/06/2022	01/06/2025
Hl Sea Eagle	H-Line	Samsung	174,000	ME-GA	01/02/2022	01/06/2025
Daewoo 2562	SK Shipping, Pan Ocean, H-Line	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/06/2025
Zoe Knutsen	Knutsen	Hyundai Samho	174,000	ME-GA	01/07/2021	01/07/2025
Hyundai Samho 8188	SK Shipping	Hyundai Samho	174,000	ME-GA	01/05/2022	01/07/2025
Daewoo 2541	Venture Global LNG	Hanwha Ocean	200,000	ME-GA	01/03/2022	01/07/2025
Samsung 2637	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/07/2025
Orion Hugo	JP Morgan	Hyundai Heavy	174,000	ME-GA	01/07/2021	01/07/2025
Samsung 2631	H-Line	Samsung	174,000	ME-GA	01/05/2022	01/07/2025
Daewoo 2534	GasLog	Hanwha Ocean	174,000	MEGI	01/01/2022	01/08/2025
Hyundai Ulsan 3395	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/08/2025
Nikolay Semenov	MOL, COSCO	Hanwha Ocean	172,500	TFDE - Azipod	01/08/2020	01/08/2025
Samsung 2638	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/08/2025
Hyundai Samho 8189	SK Shipping	Hyundai Samho	174,000	ME-GA	01/05/2022	01/08/2025
Hudong-zhonghua H1881a	MOL	Hudong-Zhonghua	174,000	XDF	01/01/2022	01/08/2025
Daewoo 2566	Meiji Shipping	Hanwha Ocean	174,000	XDF	01/09/2022	01/08/2025
Sea Spirit	China Merchant	Dalian Shipbuilding	175,000	XDF	01/04/2022	01/09/2025
Daewoo 2537	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/01/2022	01/09/2025
Al Zour	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/09/2025
Orion Gauguin	JP Morgan	Hyundai Heavy	174,000	ME-GA	01/07/2021	01/09/2025
Hudong-zhonghua H1797a	K-Line, MISC, NYK, China LNG Shipping	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/09/2025
Samsung 2640	JP Morgan	Samsung	174,000	ME-GA	01/09/2022	01/09/2025
Daewoo 2550	MOL	Hanwha Ocean	174,000	ME-GA	01/04/2022	01/09/2025
Hl Puffin	H-Line	Samsung	174,000	ME-GA	01/02/2022	01/09/2025

DFDE = dual fuel diesel engines, STRH = steam turbine reheat / ultra steam turbine, MEGI = marine electric gas injection,
DRL = slow speed diesel, FSRU = vessel with regas capacity, FLNG = floating LNG production unit
Data last updated = 29 July 2024

Fearnley LNG

Name	Owners	Yard	Capacity	Propulsion	Ordered Date	Delivery Date
Samsung 2639	JP Morgan	Samsung	174,000	ME-GA	01/09/2022	01/09/2025
Daewoo 2567	Meiji Shipping	Hanwha Ocean	174,000	XDF	01/09/2022	01/09/2025
Jiangnan H2702	ADNOC	Jiangnan	175,000	XDF	01/05/2022	01/09/2025
Daewoo 2542	Venture Global LNG	Hanwha Ocean	200,000	ME-GA	01/03/2022	01/10/2025
Hyundai Samho 8181	Knutsen	Hyundai Samho	174,000	ME-GA	01/04/2022	01/10/2025
Samsung 2619	Celsius Shipping	Samsung	180,000	ME-GA	01/03/2022	01/10/2025
Hyundai Samho 8174	NYK	Hyundai Samho	174,000	XDF	01/08/2022	01/10/2025
Hudong-zhonghua H1882a	MOL	Hudong-Zhonghua	174,000	XDF	01/01/2022	01/10/2025
Hudong-zhonghua H1892A	COSCO	Hudong-Zhonghua	174,000	XDF	01/07/2022	01/10/2025
Daewoo 2539	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/02/2022	01/11/2025
Daewoo 2538	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/01/2022	01/11/2025
Bw Nivalis	BWGas	Hanwha Ocean	174,000	MEGI	01/04/2022	01/11/2025
Hudong-zhonghua H1798a	K-Line, MISC, NYK, China LNG Shipping	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/11/2025
Samsung 2651	Celsius Shipping	Samsung	180,000	ME-GA	01/10/2022	01/11/2025
Samsung 2641	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/11/2025
Jiangsu Yangzi Xinfu YZJ2022-1475	Hammonia Reederei	Yangzijiang	175,000	ME-GA	01/10/2022	01/11/2025
Hudong-zhonghua H1908a	ULT	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/11/2025
Dalian No 1 G175k-3	China Merchant	Dalian Shipbuilding	175,000	XDF	01/09/2022	01/11/2025
Daewoo 2564	Pan Ocean, SK Shipping, H-Line	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/11/2025
Daewoo 2563	H-Line, Pan Ocean, SK Shipping	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/11/2025
Daewoo 2540	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/02/2022	01/12/2025
Bw Borealis	BWGas	Hanwha Ocean	174,000	MEGI	01/04/2022	01/12/2025
Daewoo 2535	GasLog	Hanwha Ocean	174,000	MEGI	01/01/2022	01/12/2025
Hyundai Ulsan 3396	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/12/2025
Hudong-zhonghua H1909a	ULT	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/12/2025
Dalian No 1 G175k-2	China Merchant	Dalian Shipbuilding	175,000	XDF	01/04/2022	01/12/2025
Clean Srocco	Dynagas	Hyundai Heavy	200,000	ME-GA	01/03/2022	01/12/2025
Daewoo 2543	Venture Global LNG	Hanwha Ocean	200,000	ME-GA	01/03/2022	01/12/2025
Samsung 2632	H-Line	Samsung	174,000	ME-GA	01/05/2022	01/12/2025
DAEWOO 2570	MISC	Hanwha Ocean	174,000	XDF	01/09/2022	01/01/2026
Archimidis	Capital Gas	Hyundai Samho	174,000	ME-GA	01/06/2022	01/01/2026
Agamemnon	Capital Gas	Hyundai Samho	174,000	ME-GA	01/06/2022	01/01/2026
Al Udeid	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/01/2026
Hyundai Ulsan 3397	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/01/2026
Samsung 2642	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/01/2026
Hyundai Samho 8182	TMS Cardiff Gas	Hyundai Samho	174,000	XDF	01/10/2022	01/01/2026
Dalian No 1 G175k-4	China Merchant	Dalian Shipbuilding	175,000	XDF	01/09/2022	01/01/2026
Jiangnan H2703	ADNOC	Jiangnan	175,000	XDF	01/05/2022	01/01/2026
Samsung 2633	H-Line	Samsung	174,000	ME-GA	01/05/2022	01/01/2026
Barzan	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/02/2026
Hudong-zhonghua H1799a	K-Line, MISC, NYK, China LNG Shipping	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/02/2026
Samsung 2652	Minerva Marine	Samsung	174,000	ME-GA	01/11/2022	01/02/2026
Samsung 2643	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/02/2026
Daewoo 2565	Pan Ocean, SK Shipping, H-Line	Hanwha Ocean	174,000	ME-GA	01/06/2022	01/02/2026
Samsung 2653	Minerva Marine	Samsung	174,000	ME-GA	01/11/2022	01/03/2026
Hyundai Samho 8200	TMS Cardiff Gas	Hyundai Samho	174,000	XDF	01/07/2022	01/03/2026
China Merchants Jiangsu Cmhi-282-01	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2023	01/03/2026
Samsung 2636	TMS Cardiff Gas	Samsung	174,000	ME-GA	01/04/2022	01/03/2026

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Data last updated = 29 July 2024

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Name	Owners	Yard	Capacity	Propulsion	Ordered Date	Delivery Date
Hudong-zhonghua H1883a	MOL	Hudong-Zhonghua	174,000	XDF	01/01/2022	01/03/2026
Hudong-zhonghua H1893A	COSCO	Hudong-Zhonghua	174,000	XDF	01/07/2022	01/03/2026
Clean Texas	Dynagas	Hyundai Heavy	200,000	XDF	01/01/2023	01/04/2026
Hyundai Ulsan 3386	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/04/2026
Samsung 2644	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/04/2026
Daewoo 2572	TMS Cardiff Gas	Hanwha Ocean	174,000	ME-GA	01/09/2022	01/04/2026
DAEWOO 2571	MISC	Hanwha Ocean	174,000	XDF	01/09/2022	01/05/2026
Daewoo 2552	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/06/2022	01/05/2026
Hyundai Ulsan 3387	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/05/2026
Hudong-zhonghua H1800a	K-Line, MISC, NYK, China LNG Shipping	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/05/2026
Hyundai Samho 8204	Oman Shipping Co.	Hyundai Samho	174,000	XDF	01/01/2023	01/05/2026
Samsung 2664	K-Line	Samsung	174,000	ME-GA	31/03/2023	01/05/2026
Jiangsu Yangzi Xinfu YZJ2022-1476	Hammonia Reederei	Yangzijiang	175,000	ME-GA	01/10/2022	01/05/2026
Daewoo 2553	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/06/2022	01/06/2026
Hyundai Ulsan 3393	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/06/2026
Hyundai Samho 8205	Oman Shipping Co.	Hyundai Samho	174,000	XDF	01/01/2023	01/06/2026
Samsung 2645	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/06/2026
Hudong-zhonghua H1884a	MOL	Hudong-Zhonghua	174,000	XDF	01/01/2022	01/06/2026
Daewoo 2568	Meiji Shipping	Hanwha Ocean	174,000	XDF	01/09/2022	01/06/2026
Jiangnan H2704	ADNOC	Jiangnan	175,000	XDF	01/05/2022	01/06/2026
Hyundai Ulsan 3394	Knutsen	Hyundai Heavy	174,000	XDF	01/07/2022	01/07/2026
Hudong-zhonghua H1801a	K-Line, MISC, NYK, China LNG Shipping	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/07/2026
Hyundai Ulsan 3398	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/07/2026
Clean Rio Grande	Dynagas	Hyundai Heavy	200,000	XDF	01/01/2023	01/07/2026
Clean Brownsville	Dynagas	Hyundai Heavy	200,000	XDF	01/01/2023	01/07/2026
Daewoo 2573	TMS Cardiff Gas	Hanwha Ocean	174,000	ME-GA	01/09/2022	01/07/2026
China Merchants Jiangsu Cmhi-282-02	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2023	01/07/2026
Samsung 2646	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/07/2026
Jiangnan H2716	Shandong Marine	Jiangnan	175,000		01/03/2023	01/08/2026
Hyundai Samho 8201	TMS Cardiff Gas	Hyundai Samho	174,000	XDF	01/07/2022	01/08/2026
Hudong-zhonghua H1886a	NYK	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/08/2026
Dalian No 1 G175K-5	China Merchant	Dalian Shipbuilding	175,000	XDF	01/03/2023	01/08/2026
Samsung 2647	JP Morgan	Samsung	174,000	ME-GA	01/06/2022	01/08/2026
Daewoo 2574	Venture Global LNG	Hanwha Ocean	174,000	MEGI	01/03/2023	01/09/2026
Alcaios I	Capital Gas	Hyundai Samho	174,000	ME-GA	01/01/2023	01/09/2026
Hyundai Ulsan 3399	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/09/2026
Samsung 2687	MOL	Samsung	174,000	ME-GA	01/11/2023	01/09/2026
Daewoo 2558	MOL	Hanwha Ocean	174,000	ME-GA	01/09/2022	01/09/2026
Daewoo 2551	MOL	Hanwha Ocean	174,000	ME-GA	01/04/2022	01/09/2026
Samsung 2316	SinoKor	Samsung	173,400	ME-GA	01/12/2019	01/09/2026
Samsung 2662	MOL	Samsung	174,000	ME-GA	20/01/2023	01/09/2026
Hudong-zhonghua H1885a	MOL	Hudong-Zhonghua	174,000	XDF	01/01/2022	01/09/2026
Daewoo 2569	Meiji Shipping	Hanwha Ocean	174,000	XDF	01/09/2022	01/09/2026
Jiangnan H2705	ADNOC	Jiangnan	175,000	XDF	01/05/2022	01/09/2026
Samsung 2693	Shandong Marine	Samsung	174,000	XDF	06/02/2024	01/10/2026
Hudong-zhonghua H1887a	NYK	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/10/2026
Dalian No 1 G175K-6	China Merchant	Dalian Shipbuilding	175,000	XDF	01/03/2023	01/10/2026
Hudong-zhonghua H1894a	K-Line	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/10/2026

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Name	Owners	Yard	Capacity	Propulsion	Ordered Date	Delivery Date
Antaios I	Capital Gas	Hyundai Samho	174,000	ME-GA	01/01/2023	01/11/2026
Samsung 2694	China Merchant	Samsung	174,000	XDF	06/02/2024	01/11/2026
Hanwha Ocean 2585	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/11/2026
Samsung 2665	K-Line	Samsung	174,000	ME-GA	31/03/2023	01/11/2026
China Merchants Jiangsu Cmhi-282-03	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2023	01/11/2026
Daewoo 2576	MOL	Hanwha Ocean	174,000	ME-GA	01/12/2022	01/12/2026
Daewoo 2575	Venture Global LNG	Hanwha Ocean	174,000	MEGI	01/03/2023	01/12/2026
Hanwha Ocean 2586	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/12/2026
Jiangnan H2717	Shandong Marine	Jiangnan	175,000		01/03/2023	01/12/2026
Hyundai Ulsan 3400	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/12/2026
Hyundai Ulsan 3401	K-Line, MISC, NYK, China LNG Shipping	Hyundai Heavy	174,000	XDF	01/08/2022	01/12/2026
Samsung 2695	Shandong Marine	Samsung	174,000	XDF	06/02/2024	01/12/2026
Hyundai Samho 8262	Nakilat	Hyundai Samho	174,000	XDF	09/01/2024	01/12/2026
Daewoo 2579	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/10/2022	01/12/2026
Hyundai Samho 8208	NYK	Hyundai Samho	174,000	XDF	01/02/2023	01/12/2026
Hudong-zhonghua H1888a	NYK	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/12/2026
Dalian No 1 G175K-7	China Merchant	Dalian Shipbuilding	175,000	XDF	01/03/2023	01/12/2026
Hudong-zhonghua H1895a	K-Line	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/12/2026
Dalian No 1 G175k-12	Wah Kwong, China Gas, CSSC	Dalian Shipbuilding	175,000	XDF	21/08/2023	01/01/2027
Hd Hyundai Ulsan 3476	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/01/2027
Samsung 2663	MOL	Samsung	174,000	ME-GA	20/01/2023	01/01/2027
Hanwha Ocean 2584	MOL	Hanwha Ocean	174,000	ME-GA	01/08/2023	31/01/2027
Athlos	Capital Gas	Hyundai Samho	174,000	ME-GA	01/03/2023	01/02/2027
Samsung 2696	China Merchant	Samsung	174,000	XDF	06/02/2024	01/02/2027
Hanwha Ocean 2594	K-Line, Hyundai Glovis	Hanwha Ocean	174,000	XDF	01/06/2024	01/02/2027
Hanwha Ocean 2593	K-Line, Hyundai Glovis	Hanwha Ocean	174,000	XDF	01/06/2024	01/02/2027
Hudong-zhonghua H1794A	MOL, COSCO	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/02/2027
Hd Hyundai Ulsan 3477	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/02/2027
DALIAN NO 1 G175K-8	China Merchant	Dalian Shipbuilding	175,000	XDF	01/03/2023	01/02/2027
Hd Hyundai Ulsan 3441	NYK	Hyundai Heavy	174,000	ME-GA	28/04/2023	01/03/2027
Hanwha Ocean 2580	MOL	Hanwha Ocean	174,000	ME-GA	01/02/2023	01/03/2027
Archon	Capital Gas	Hyundai Samho	174,000	ME-GA	01/03/2023	01/03/2027
Dalian No 1 G175K-9	China Gas, Wah Kwong, Fortune Clean Energy	Dalian Shipbuilding	174,000	XDF	12/03/2024	01/03/2027
Hudong-zhonghua H1889a	NYK	Hudong-Zhonghua	174,000	XDF	01/04/2022	01/03/2027
Samsung 2656	Seapeak	Samsung	174,000	ME-GA	01/11/2022	01/03/2027
Samsung 2317	SinoKor	Samsung	173,400	ME-GA	01/12/2019	01/03/2027
China Merchants Jiangsu Cmhi-282-04	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2023	01/03/2027
Cosco 1	COSCO	Dalian Shipbuilding	175,000		31/08/2023	01/03/2027
Hudong-zhonghua H1896a	K-Line	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/03/2027
Hanwha Ocean 2581	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/04/2023	01/04/2027
Samsung 2697	Shandong Marine	Samsung	174,000	XDF	06/02/2024	01/04/2027
Hd Hyundai Ulsan 3454	Evalend Shipping	Hyundai Heavy	174,000	XDF	02/08/2023	01/04/2027
Hd Hyundai Ulsan 3478	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/04/2027
Hanwha Ocean 2595	K-Line, Hyundai Glovis	Hanwha Ocean	174,000	XDF	01/06/2024	01/05/2027
Hyundai Samho 8263	Nakilat	Hyundai Samho	174,000	XDF	09/01/2024	01/05/2027
Hd Hyundai Ulsan 3479	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/05/2027
Clean Astraeus	Dynagas	Hyundai Heavy	200,000	XDF	01/04/2023	01/05/2027
Samsung 2657	Seapeak	Samsung	174,000	ME-GA	01/11/2022	01/05/2027
Hudong-zhonghua H1890a	NYK	Hudong-Zhonghua	174,000	XDF	01/04/2022	01/05/2027

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Hyundai Samho 8238	NYK	Hyundai Samho	174,000	XDF	01/02/2023	01/05/2027
Hd Hyundai Ulsan 3442	NYK	Hyundai Heavy	174,000	ME-GA	28/04/2023	01/06/2027
Dalian No 1 G175K-10	China Gas, Wah Kwong, Fortune Clean Energy	Dalian Shipbuilding	174,000	XDF	12/03/2024	01/06/2027
Hanwha Ocean 2582	Maran Gas Maritime	Hanwha Ocean	174,000	MEGI	01/04/2023	01/06/2027
Samsung 2698	Shandong Marine	Samsung	174,000	XDF	06/02/2024	01/06/2027
Samsung 2318	SinoKor	Samsung	173,400	ME-GA	01/12/2019	01/06/2027
Cosco 2	COSCO	Dalian Shipbuilding	175,000		31/08/2023	01/06/2027
Hudong-zhonghua H1897a	K-Line	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/06/2027
Hanwha Ocean 2588	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/07/2027
Hanwha Ocean 2587	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/07/2027
Hudong-zhonghua H1795A	MOL, COSCO	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/07/2027
Dalian No 1 G175k-13	Wah Kwong, China Gas, CSSC	Dalian Shipbuilding	175,000	XDF	21/08/2023	01/07/2027
Hd Hyundai Ulsan 3480	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/07/2027
Hyundai Samho 8209	NYK	Hyundai Samho	174,000	XDF	01/02/2023	01/07/2027
Hd Hyundai Ulsan 3443	NYK	Hyundai Heavy	174,000	ME-GA	28/04/2023	01/08/2027
Hanwha Ocean 2583	MOL	Hanwha Ocean	174,000	ME-GA	01/04/2023	01/08/2027
Samsung 2699	China Merchant	Samsung	174,000	XDF	06/02/2024	01/08/2027
Hanwha Ocean 2596	K-Line, Hyundai Glovis	Hanwha Ocean	174,000	XDF	01/06/2024	01/08/2027
Hd Hyundai Ulsan 3481	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/08/2027
Samsung 2658	Seapeak	Samsung	174,000	ME-GA	01/11/2022	01/08/2027
Hd Hyundai Ulsan 3444	NYK	Hyundai Heavy	174,000	ME-GA	01/05/2023	31/08/2027
Hanwha Ocean 2589	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/09/2027
China Merchants Jiangsu Cmhi-282-05	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/02/2024	01/09/2027
Hd Hyundai Ulsan 3482	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/09/2027
Samsung 2659	Seapeak	Samsung	174,000	ME-GA	01/11/2022	01/09/2027
Hanwha Ocean 2590	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/10/2027
Samsung 2700	Shandong Marine	Samsung	174,000	XDF	06/02/2024	01/10/2027
Hd Hyundai Ulsan 3483	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/10/2027
Hudong-zhonghua H1891a	NYK	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/10/2027
Hudong-zhonghua H1898a	COSCO, MOL, ENN	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/10/2027
Hyundai Samho 8239	NYK	Hyundai Samho	174,000	XDF	01/02/2023	01/10/2027
Hanwha Ocean 2951	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/11/2027
Samsung 2701	Shandong Marine	Samsung	174,000	XDF	06/02/2024	01/11/2027
Hd Hyundai Ulsan 3484	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/11/2027
Clean Azeus	Dynagas	Hyundai Heavy	200,000	XDF	01/04/2023	01/11/2027
Samsung 2702	MISC	Samsung	174,000	XDF	06/02/2024	01/12/2027
Hudong-zhonghua H1796A	MOL, COSCO	Hudong-Zhonghua	174,000	XDF	01/09/2022	01/12/2027
Samsung 2668	Chevron	Samsung	174,000	XDF	01/06/2023	01/12/2027
Hd Hyundai Ulsan 3455	Evalend Shipping	Hyundai Heavy	174,000	XDF	02/08/2023	01/12/2027
Hd Hyundai Ulsan 3485	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/12/2027
Samsung 2660	Seapeak	Samsung	174,000	ME-GA	01/11/2022	01/12/2027
Hyundai Samho 8210	NYK	Hyundai Samho	174,000	XDF	01/02/2023	01/12/2027
Hudong-zhonghua H1899a	COSCO, MOL, ENN	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/12/2027
Hanwha Ocean 2592	Nakilat	Hanwha Ocean	174,000	XDF	01/06/2024	01/01/2028
China Merchants Jiangsu Cmhi-282-06	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2024	01/01/2028
HD Hyundai Ulsan 3456	Evalend Shipping	Hyundai Heavy	74,000	XDF	14/11/2023	01/01/2028
Samsung ADNOC 4	ADNOC	Samsung	174,000		01/07/2024	01/02/2028
Samsung 2669	Chevron	Samsung	174,000	XDF	01/06/2023	01/02/2028
Capital Samho 1	Capital Gas	Hyundai Samho	174,000		26/02/2024	01/02/2028
Hudong Qatar 1	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/03/2028

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Name	Owners	Yard	Capacity	Propulsion	Ordered Date	Delivery Date
Samsung 2702	China Merchant	Samsung	174,000	XDF	06/02/2024	01/03/2028
Hd Hyundai Ulsan 3457	Evalend Shipping	Hyundai Heavy	174,000	XDF	14/11/2023	01/03/2028
Hudong-zhonghua H1900a	COSCO, MOL, ENN	Hudong-Zhonghua	174,000	XDF	01/06/2023	01/03/2028
Hd Hyundai Ulsan 3501	Evalend Shipping	Hyundai Heavy	174,000	XDF	03/05/2024	31/03/2028
Samsung ADNOC 3	ADNOC	Samsung	174,000		01/07/2024	01/04/2028
Dalian No 1 G175K-11	China Gas, Wah Kwong, Fortune Clean Energy	Dalian Shipbuilding	174,000	XDF	12/03/2024	01/04/2028
Cosco 3	COSCO	Dalian Shipbuilding	175,000		31/08/2023	01/04/2028
Hanwha ADNOC 4	ADNOC	Hanwha Ocean	174,000		01/07/2024	15/04/2028
Samsung 2704	MISC	Samsung	174,000	XDF	06/02/2024	01/05/2028
Hd Hyundai Ulsan 3502	Evalend Shipping	Hyundai Heavy	174,000	XDF	03/05/2024	01/05/2028
China Merchants Jiangsu Cmhi-282-07	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2024	01/05/2028
Hd Hyundai Ulsan 3486	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/05/2028
Hudong-zhonghua H1901a	CSSC	Hudong-Zhonghua	174,000	XDF	01/05/2023	31/05/2028
Hudong Qatar 2	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/06/2028
Samsung ADNOC 2	ADNOC	Samsung	174,000		01/07/2024	01/06/2028
Samsung 2705	China Merchant	Samsung	174,000	XDF	06/02/2024	01/06/2028
Capital Samho 2	Capital Gas	Hyundai Samho	174,000		26/02/2024	01/06/2028
Hanwha ADNOC 3	ADNOC	Hanwha Ocean	174,000		01/07/2024	15/06/2028
Samsung 2706	MISC	Samsung	174,000	XDF	06/02/2024	01/07/2028
Hd Hyundai Ulsan 3487	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/07/2028
Samsung ADNOC 1	ADNOC	Samsung	174,000		01/07/2024	01/08/2028
Hanwha ADNOC 2	ADNOC	Hanwha Ocean	174,000		01/07/2024	15/08/2028
Hudong Qatar 3	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/09/2028
China Merchants Jiangsu Cmhi-282-08	Celsius Shipping	China Merchants HI Jiangsu	180,000	ME-GA	01/05/2024	01/09/2028
Hd Hyundai Ulsan 3488	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/09/2028
Capital Samho 3	Capital Gas	Hyundai Samho	174,000		26/02/2024	01/09/2028
Hudong-zhonghua H1902a	CSSC	Hudong-Zhonghua	174,000	XDF	01/05/2023	01/09/2028
Samsung 2707	China Merchant	Samsung	174,000	XDF	06/02/2024	01/10/2028
Hanwha ADNOC 1	ADNOC	Hanwha Ocean	174,000		01/07/2024	15/10/2028
Hd Hyundai Ulsan 3489	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/11/2028
Hudong Qatar 4	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/12/2028
Capital Samho 4	Capital Gas	Hyundai Samho	174,000		26/02/2024	01/12/2028
Hudong-zhonghua H1903a	CSSC	Hudong-Zhonghua	174,000	XDF	01/05/2023	01/12/2028
Hudong Qatar 5	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/03/2029
Hd Hyundai Ulsan 3490	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/03/2029
Hudong Qatar 6	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/06/2029
Hd Hyundai Ulsan 3491	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/06/2029
Hudong Qatar 7	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/09/2029
Hd Hyundai Ulsan 3492	Nakilat	Hyundai Heavy	174,000	XDF	01/09/2023	01/09/2029
Hudong Qatar 8	Nakilat	Hudong-Zhonghua	271,000	XDF	12/01/2024	01/12/2029
Hudong Qatar 9	Nakilat	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/01/2030
Hudong Qatar 10	China Merchant	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/03/2030
Hudong Qatar 11	China Merchant	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/05/2030
Hudong Qatar 12	China Merchant	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/07/2030
Hudong Qatar 13	China Merchant	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/09/2030
Hudong Qatar 14	Shandong Marine	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/11/2030
Hudong Qatar 15	Shandong Marine	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/01/2031
Hudong Qatar 16	Shandong Marine	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/03/2031
Hudong Qatar 17	China LNG Shipping	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/05/2031
Hudong Qatar 18	China LNG Shipping	Hudong-Zhonghua	271,000	XDF	29/04/2024	01/07/2031

DFDE = dual fuel diesel engines, STRH = steam turbine reheat / ultra steam turbine, MEGI = marine electric gas injection,
DRL = slow speed diesel, FSRU = vessel with regas capacity, FLNG = floating LNG production unit
Data last updated = 29 July 2024

Fearnley LNG

WORLD SMALL SCALE LNG FLEET*

Built	Name	CBM	Cargo Type	Trading Area	Trading in LNG?	Ship Owner / Operator
1974	Seagas	187	LNG	Sweden	Yes	AGA
1988	Kayoh Maru	1,517	LNG	Japan	Yes	Daiichi
1993	Aman Bintulu	18,928	LNG	Malaysia - Japan	Yes	Perbadanan/NYK
1996	Surya Aki	19,475	LNG	Indonesia - Japan	Yes	MCGC
1997	Aman Sendai	18,928	LNG	Malaysia - Japan	Yes	Perbadanan/NYK
1998	Pelita Energy	18,800	LNG	Malaysia - Japan	Yes	Perbadanan/NYK
2000	Triputra	23,096	LNG	Indonesia - Japan	Yes	MCGC
2003	Pioneer Knutsen	1,100	LNG	Norway	Yes	Knutsen
2003	Shinju Maru No.1	2,540	LNG	Japan	Yes	Shinwa
2005	North Pioneer	2,500	LNG	Japan	Yes	Japan Liquid Gas
2007	Sun Arrows	19,531	LNG	Malaysia - Russia - Japan	Yes	Mitsui
2008	Kakurei Maru	2,536	LNG	Japan	Yes	Hogaki Zosen
2008	Shinju Maru No.2	2,540	LNG	Japan	Yes	Shinwa
2009	Coral Methane	7,551	LNG/LPG/Ethylene	Northwest Europe/Baltics	Yes, sometimes	Anthony Veder
2010	Coral Favia	10,000	LNG/LPG/Ethylene	Worldwide	No	Anthony Veder
2010	Coral Fraseri	10,000	LNG/LPG/Ethylene	Worldwide	No	Anthony Veder
2011	Coral Furcata	10,000	LNG/LPG/Ethylene	Worldwide	No	Anthony Veder
2011	Coral Fungia	10,000	LNG/LPG/Ethylene	Worldwide	No	Anthony Veder
2011	Akebono Maru	3,556	LNG	Japan	Yes	Chuo Kaiun
2011	Titan Vision	12,000	LNG/LPG/Ethylene	Europe	No	Titan LNG
2011	Titan Unikum	12,000	LNG/LPG/Ethylene	Europe	No	Titan LNG
2012	Coral Energy	15,600	LNG	Northwest Europe/Baltics	Yes	Anthony Veder
2013	Coral Anthelia	6,500	LNG/Ethylene			Anthony Veder
2013	JX Energy TBN	2,500	LNG	Japan	Yes	JX Energy
2013	Kakuyu Maru	2,500	LNG	Japan	Yes	Tsurumi Sunmarine
2015	JS Ineos Ingenuity	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2015	JS Ineos Insight	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2015	JS Ineos Intrepid	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2015	LNG Barge TBN	3,000	LNG	US Coast	Yes	LNG America
2015	PetroChina TBN	30,000	LNG	China		PetroChina
2016	Hai Yang Shi You 301	30,000	LNG	Bali FSU	Yes	CETS (CNOOC)
2016	Clean Jacksonville	2,200	LNG	US Coast	Yes	CME
2016	JS Ineos Indepence	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2016	JS Ineos Innvovation	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2016	JS Ineos Inspiration	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2016	LNG Prime	2,250	LNG	Northwest Europe	Yes	Veka Deen LNG
2017	Coralius	5,800	LNG	Northwest Europe/Baltics	Yes, for Skangas	Anthony Veder
2017	Coral EnergICE	18,000	LNG	Northwest Europe/Baltics	Yes	Anthony Veder
2017	Coral Encanto	30,000	LNG	China	Yes	Anthony Veder
2017	JS Ineos Invention	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2017	JS Ineos Intuition	27,500	LNG/Ethylene	Markus Hook - Rafnes	Ethane, for Ineos	Evergas
2017	Oizmendi	600	LNG	Spain	Yes	Itsas Gas
2017	LNG-Gorskaya TBN	7,300	LNG	Russia	Yes	LNG-Gorskaya
2017	LNG-Gorskaya TBN	7,300	LNG	Russia	Yes	LNG-Gorskaya
2017	LNG-Gorskaya TBN	7,300	LNG	Russia	Yes	LNG-Gorskaya
2017	Green Zeebrugge	5,000	LNG	Northwest Europe	Yes	NYK
2017	New Frontier 1	6,500	LNG	Northwest Europe	Yes	Shell
2018	Kairos	7,500	LNG	Baltic	Yes	Bernhard Schulte
2018	LNG London	3,000	LNG	Northwest Europe	Yes	Shell
2018	Shell Bunker Barge TBN 2	6,500	LNG	Northwest Europe	Yes	Shell
2018	Shell Bunker Barge TBN 3	6,500	LNG	Northwest Europe	Yes	Shell
2018	Bunker Breeze	1,200	LNG	Barcelona	Yes	Suardiaz Energy Shipping
2018	HUA XIANG 8	13,720	LNG	China	Yes	Zhejiang Huaxiang
2019	Blue Whale	7,500	LNG	Korea	Yes	Korea Line
2019	Gas Agility	18,600	LNG	NWE	Yes	MOL
2019	Flexfueller 001	1,480	LNG	Amsterdam	Yes	Titan LNG

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Built	Name	CBM	Cargo Type	Trading Area	Trading in LNG?	Ship Owner / Operator
2020	Avenir Advantage	7,500	LNG	Mediterranean	Yes	Avenir LNG
2020	Avenir Accolade	7,500	LNG	Mediterranean	Yes	Avenir LNG
2020	Avenir Aspiration	7,500	LNG		Yes	Avenir LNG
2020	Kaguya	3,500	LNG	Japan	Yes	CLS
2020	CNTIC VPOWER Global	28,000	LNG	Myanmar	Yes	Dalian Inteh Group
2020	Ecobunker Tokyo Bay	2,500	LMG	Japan	Yes	Ecobunkers
2020	Optimus	6,000	LNG	NWE	Yes	Elenger
2020	FueLNG Bellina	7,500	LNG	Singapore	Yes	FuelLNG
2020	SM Jeju LNG2	7,500	LNG	Korea	Yes	Korea Line
2020	Q-LNG 4000	4,000	LNG	US Coast	Yes	Q-LNG Transport / Harvey Gulf
2020	Flexfueller 002	1,480	LNG	Antwerp	Yes	Titan LNG
2021	Avenir Ascension	7,500	LNG		Yes	Avenir LNG
2021	Hai Gang Wei Lai	20,000	LNG	China	Yes	SSES
2021	Bergen LNG	850	LNG	Norway	Yes	Bergen Tankers
2021	Dmitry Mendeleev	5,800	LNG	Russia	Yes	Gazprom Neft
2021	JMU TBN	2,500	LNG	Japan	Yes	JMU
2021	Ravenna Knutsen	30,000	LNG	Mediterranean	Yes	Knutsen OAS
2021	Brassavola	12,000	LNG	Singapore	Yes	MOL
2021	Gas Vitality	18,600	LNG	Mediterranean	Yes	MOL
2021	TG TBN	500	LNG	Korea	Yes	Trans Gas
2021	Titan Hyperion	8,000	LNG	Benelux	Yes	Titan LNG
2022	Xin Ao Pu Tuo Hao	8,500	LNG	China	Yes	ENN
2022	Coral Nordic	30,000	LNG	Worldwide	Yes	Anthony Veder
2022	Avenir Achievement	20,000	LNG	Worldwide	Yes	Avenir LNG
2022	Haugesund Knutsen	5,000	LNG	Spain	Yes	Knutsen OAS
2022	Clean Cañaveral	5,400	LNG	USG	Yes	PNE
2022	K.Lotus	18,000	LNG	Korea	Yes	K Line
2023	Cryopeak TBA	4,000	LNG	West Canada	Yes	Cryopeak
2023	Levante LNG	12,500	LNG	Spain	Yes	Knutsen OAS
2023	SM Jeju LNG3	7,500	LNG	Korea	Yes	Korea Line
2023	New Frontier 2	18,000	LNG	USG	Yes	Shell
2023	Krios	4,200	LNG	Benelux	Yes	Titan LNG
2023	Alice Cosulich	8,000	LNG	Mediterranean	Yes	Fratelli Cosulich
2023	Kanfer TBN	6,000	LNG	Worldwide	Yes	Kanfer Shipping
2023	Kanfer TBN	6,000	LNG	Worldwide	Yes	Kanfer Shipping
2023	Clean Everglades	5,500	LNG	USG	Yes	PNE
2023	FueLNG Venosa	18,000	LNG	Singapore	Yes	FuelLNG
2023	LNG Erasmus	8,000	LNG	NWE	Yes	Shell
2023	Energy Stockholm	8,000	LNG	NWE	Yes	Shell
2024	Coral Evolution	30,000	LNG	Australia	Yes	Anthony Veder ?
2024	Progress	12,000	LNG	US Coast	Yes	Crowley Maritime
2024	CNOOC TBN	12,000	LNG	China	Yes	CNOOC
2024	TBN	12,500	LNG	Worldwide	Yes	???
2024	Keys TBN	3,500	LNG	Japan	Yes	Keys Bunkering West Japan Co
2024	Seaspan Garbaldi	7,600	LNG	Panama	Yes	Seaspan ULC
2024	Paolina Cosulich	8,000	LNG	Mediterranean	Yes	Fratelli Cosulich
2024	Huaihe Nengyuan Qihang	14,000	LNG	China	Yes	Anhui Changjiang LNG
2024	Keys Azalea	3,500	LNG	Japan	Yes	Keys Bunkering West Japan
2024	Seaspan Lions	7,600	LNG	Canada	Yes	Seaspan ULC
2024	Hai Yang Shi You 302	12,000	LNG	China	Yes	CETS (CNOOC)
2025	Axpo TBN	7,500	LNG	Italy	Yes	Axpo
2025	Seaspan TBN 3	7,600	LNG	Canada	Yes	Seaspan ULC
2026	Avenir TBN (option)	20,000	LNG	Worldwide	Yes	Avenir LNG
2026	ScaleGas TBN	12,500	LNG	Spain	Yes	ScaleGas
2026	Vitol TBN 1	12,500	LNG	Worldwide	Yes	Vitol
2026	Total TBN	18,600	LNG	Worldwide	Yes	Total Energies
2027	Avenir TBN (option)	20,000	LNG	Worldwide	Yes	Avenir LNG
2027	Vitol TBN 2	20,000	LNG	Worldwide	Yes	Vitol
2027	Peninsula TBN	18,000	LNG	Europe	Yes	Peninsula

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