

Launching a green future at sea



With two new buildings currently in the process of the final details at a China shipyard, Danish offshore shipping company MHO-Co already has the next generations on the drawing board. 'Go green or go home', the founder bluntly stated in a previous article and he and his staff continually practice what they preach. Following a straight course since establishing the business in 2015, CEO and Founder Mik Henriksen continues to design and develop new sustainable vessels in a seemingly endless process.



'Therefore, we have ensured that our new and future vessels can be operated on all imaginable fuel types, and in all imaginable combinations with electric hybrid operation.'

Following many years of broad, international experience in the business, 'Captain Mik' knows his vessels piece by piece and knows how to build the next ones even better. Since the very beginning with MHO-Co he has been designing his own vessels and looking into the future he sees one decisive demand on the radar: flexibility.

'The challenge is to design for a future with too many unknown variables. To give just one example, we continuously see a variety of technical innovations on the engine front, almost monthly. To navigate this, we need first and foremost to secure our freedom to act and change course if needed,' Mik Henriksen explains.

'Who can predict engine choices five years from now in a rapidly changing world? The harsh truth is that no one can, but at least we can anticipate the unpredictability.'

In addition to the rapid technological development, ever-changing political winds and expectations from the outside world also need to be navigated. European countries have all set ambitious goals for zero emissions, everyone is now navigating by ESG standards and requirements will be extending to Scope 1, 2 and 3.

'Everyone must comply with these demands and expectations, and this applies in particular to those of us serving the green sector. That is why we design all our new vessels to comply with the full package. Any customer chartering a vessel from us in the future can rest assured that the net zero goals can be reached without any major issues.'

In technical terms the solution is 'power of plenty'. It is not just a multi-redundant propulsion system, but the most redundant propulsion system of any vessel out there. And once again, full flexibility is a built-in standard in the modular design for future newbuilds from MHO-Co.

'At MHO-Co we have a strong strategic cooperation with Volvo Penta on engine development. But our design also allows the installation of a Caterpillar engine, for example. You can mix and match any power plant and propulsion system to suit any given requirements,' Henriksen adds.

'The most important factor is distance to shore in a given project. With our modular design we can build a vessel that fits 100% to the requirements and yet is still future-proofed. You do not need to choose a specific fuel system on the day you order the vessel, and you will not have to pay a premium if you choose the wrong fuel for the future. This protects you from going down a dead end and ending up with something that cannot be used in five to ten years.'

As a key player in the operation of existing and new offshore wind farms, when you contribute to the green transition, you must, of course, lead the way with your own operation. Hence, the ongoing development of larger, more efficient and even greener offshore wind turbines. 'We need to do our part of the job and take responsibility for everything we can do in our part of the field,' Mik Henriksen emphasises.

By early 2024 MHO-Co expects the latest two new buildings to be in operation and with 36 meters LOA they will not only be

the world's largest CTVs. The new vessels will also be the most sustainable in the market, with the world's first full electrical propulsion, as the shipping company takes a significant step towards zero emissions.

'In designing these new vessels, we ensured a flexible future for the propulsion systems to cover all thinkable scenarios in the years to come. We see rapid developments in different fuels and right now it is impossible to predict the winners of this tight technology race,' says Henriksen.



For the two new builds the power of plenty system is already a built-in feature. 'We have four separate powertrains, supplied with power from nine individual power

sources, plus a battery pack. If one power source fails, we can continue our service, as we can even if two or three sources fail,' explains Henriksen.

SWATH, semi-SWATH, Wave Piercer and traditional CTV. 'For vessels spanning from 31 meters and up to 40 meters we now have ready-to-build blue prints that will satisfy any sort of customer demand, designed around these propulsion systems. We are ready and the vessels are ready for the fuels of the future, whether it be hydrogen, methanol or even a mobile nuclear power setup,' Henriksen concludes.

MHO-Co and US Offshore in new strategic cooperation

Same customers, same locations and same high ambitions for the future. These are the main motives behind a new strategic cooperation between MHO-Co and US Offshore, a well-reputed contractor within subsea survey and cable installations.

'Our companies have a long history of close cooperation and now we make it official and move even closer together with some exciting perspectives for the future,' CEO and founder of MHO-Co, Mik Henriksen, explains.

'US Offshore offer other types of services to the industry and we see some clear synergies in expanding our operations together geographically.'

The first step of the cooperation is already in effect, with Partner & Business Development Manager Jeppe Lystrup from US Offshore working from a new base in Esbjerg at the MHO-Co headquarters.

Even though the new propulsion system is double the cost of conventional systems, it is worth the extra investment in relation to charter / off-charter.

With the latest propulsion systems as the flexible center MHO-Co now has designed the future CTVs in four different sizes:

www.mho-co.dk

Pioneer vessels ready for new charter

The very first vessels designed by Mik Henriksen returned 'home' to the shipping company earlier this year and were appropriately named MHO 1 and MHO 2. Following a very busy year of tripling the fleet and full hire of all vessels, the two pioneer boats will return from long term charters in France and the North Sea at the beginning of November.

'It has been a very hectic period, but we are now again in the happy situation of having some vessels to offer the market. Basically, it is a luxury issue for us with empty shelves, but on the other hand we are always keen to meet customers' demand,' says Brian Schlosser, Commercial Manager at MHO-Co.

MHO 1 and MHO 2 are twin vessels, 28 meter CTVs boarding 24 passengers. When designed and built they were a decade ahead of time pioneering the sector and they are very competitive.

'Considering their size, these vessels are still industry-leading in terms of fuel consumption and very fast compared to new builds of today,' Brian Schlosser emphasises.

Alongside these two vessels he will again be able to dispose of MHO 3, a Class A guard ship returning from a long term charter at the end of October. 'In general we see a trend in the market towards more long term contracts and we are already well booked for 2024.'