

## PRESS RELEASE

### MEYER Group shows future of cruising

**Family-owned company shows most innovative cruise ship of the year and future vision for the year 2100 at Seatrade Cruise Global**

**Papenburg/Turku/Fort Lauderdale, March 29, 2023** – With no less than two innovative ships, the MEYER Group underlines its technological leadership in cruise ship construction: At the leading global cruise trade fair in Fort Lauderdale, Florida, the MEYER Group presented for the first time a cruise ship concept that shows what the form of holidaying could look like in the year 2100.

Already this year MEYER WERFT will deliver a new cruise ship for Silversea Cruises, the Silver Nova, which will set new standards in technology and design. Additionally, there are two innovative cruise ships under construction at MEYER TURKU: With Icon of the Seas, the Finnish shipyard of the MEYER Group will deliver the largest cruise ship in the world to Royal Caribbean International later this year. The ship will set new standards for onboard entertainment in the industry. Only a few days ago, the block assembly of Mein Schiff 7 has started at MEYER TURKU. The latest vessel for TUI Cruises will be among the first to be ready for methanol and green methanol in the future, making its operation almost climate neutral.

Thanks to an innovative fuel concept with low-emission LNG, a fuel cell system and batteries, the Silver Nova will have the best possible measures to reduce emissions. With a number of unique technological innovations and groundbreaking design features, the fuel cell system is expected to provide part of the energy needs on board. After years of research and development by MEYER Group and fuel cell manufacturer Freudenberg, anticipation is growing that every single component of the fuel cell system will successfully pass the rigorous endurance tests at extreme temperatures and the classification societies' certification tests for safe use on board ships. This progress is very pleasing

as it brings the project one step closer to the goal of a more innovative and sustainable future for power generation and distribution on board ships.

The goal of the multi-year research project is to develop a maritime fuel cell system of unprecedented scale that will power Royal Caribbean Group's Nova-class ships. When completed, the fuel cell system is expected to meet a ship's entire hotel load.

The new building already exceeds the IMO's highest requirements, which will only apply in the future, by 25 per cent in the Energy Efficiency Design Index (EEDI). A newly developed Micro Auto Gasification System (MAGS) converts waste on board into thermal energy in the spirit of the circular economy, further increasing the ship's efficiency.

For the first time at Silversea, Nova-class ships will feature a horizontal layout and innovative asymmetrical design, with public spaces and suites extending the full length of the ship. Thanks to the large expanses of glass, this allows on board, guests will experience an unprecedented openness of the ship to the water and destinations.

### **One step ahead of the future**

Externally inspired by the rock penguin and thus particularly aerodynamic is the "Reverse" concept - a MEYER Group concept that shows what a cruise ship could look like in the year 2100. Externally equipped with a closed glass facade and urban gardening areas as well as drone landing pads, central public areas form the focal point inside the ship. Thanks to a cabin structure detached from the outer hull, efficient modular manufacturing methods are possible here. "The ship is based on global megatrends and is one - but not the only - logical response to them," explains Tim Krug, Head of Concept Development Group at MEYER Group. "For example, we have only provided for small restaurant areas that serve more as social meeting places because we imagine that a large part of the nutrients will be consumed in concentrated form like pills," Krug explains further. "From today's point of view, we sometimes come up with extreme approaches, but it is equally important to think them through and develop answers from them."

The energy concept on board also relies on innovation: thanks to the use of wave energy through horizontal wings on the hull, solar and fuel cells as well as wind energy, it manages without fossil fuels.

Even today, the MEYER Group is already demonstrating how eco-friendly materials can be used. The model of the "Reverse", which will be shown for the first time at the trade fair, has been made largely from sustainable materials. 90 percent of the materials used are recycled or can be recycled without leaving any residue. The model also already has a functioning fuel cell powered by methanol to supply the model's lighting with energy. The MEYER Group trade fair team also uses the system to charge smartphones and tablets.