



NAVIGATION AND ROUTE PLANNING SYSTEM

The system is a virtually integrated solution for all aspects of route planning, optimisation and monitoring. It enables route planning (from port to port), optimises the route using weather data and artificial intelligence, downloads the navigation data and fine-tunes the route as regards waypoints and stages, with the captain maintaining complete control over planning.



FREE WIFI ON BOARD / STARLINK ANTENNA

Starlink, a satellite internet access technology launched by SpaceX, provides the crew with additional bandwidth of up to 250 Mbit/s, making video calls and streaming services possible at sea.



FIRE-FIGHTING SYSTEM

With an output of 250 m³ per hour and a range of 110 metres, the fire hydrants prevent a fire from spreading on the upper deck. To enable effective fire-fighting below deck, the hatch covers are fitted with a built-in fire-extinguishing nozzle system.



HIGHLY EFFICIENT PROPELLERS

Highly efficient propellers manufactured in Germany will help cut fuel consumption and greenhouse gas emissions.

ULTRA-LARGE VESSEL

The capacity increase of 20% compared with the A18 class leads to greater energy efficiency and therefore lower energy consumption per container.



OPTIMISED HULL

Hull including bulbous bow, propeller and rudder are optimised to the specific deployment profile. This cuts emissions by around 3%.

CUSTOMISED LASHING AND LOADING SYSTEM

A lashing and loading system has been customised for the Hamburg Express class. It offers greater flexibility and therefore greater efficiency in container stowage. Containers of different heights can be secured better and the stack weight can be optimised.

LNG TANK

Due to the lower density of LNG, the tanks are roughly twice as big as heavy-oil tanks. The use of LNG reduces CO2 by 20%.

GAS BUNKER STATION

The liquefied gas is bunkered at -160 degrees celsius. The entire procedure involves cleaning and cooling the pipelines as well as numerous safety checks. Bunkering usually takes around 24 hours, and is therefore completed while the vessel is docked in port.

ENGINE ROOM

The MAN B&W11G95ME-C10.5-GI dual fuel main engine can be operated using both very low sulphur fuel oil (VLSFO) and LNG, as can the auxiliary engines and boilers. One full tank of LNG is sufficient for a complete Europe-Asia-Europe round trip. Future-proof: the engine can also run on non-fossil fuels, such as synthetic gas.

ONSHORE POWER CONNECTION TO REDUCE EMISSIONS

All vessels in the Hamburg Express class can connect to an environmentally friendly power supply onshore – the auxiliary diesel engines on board can be shut down in port. The connection points are located on both sides of the vessel.