



KONGSBERG



META FUEL Fuel Performance

TECHNICAL DATA

- Calibration free Torque meter
- No extra computer, display or software is needed.
- Browse into the system with any computer, tablet, phone etc.
- Main Engine, Auxiliaries (as one unit), Boiler.
- Monitoring of bunker-flowmeters, + reporting.
- RS-485 Modbus interface
- Fuel reporting functions
- Advanced trend-tools to track S.F.O.C development
- Interface most industry standard mass flow meters
- Versatile Modbus tool let you interact with flowmeters for recalibrations & service. (No need for maker's software tools)
- Full accountability, all data stored locally in SQL format



- Turn-key solution with engineering, flowmeter-delivery and installation is available. Contact KM for information.

FUEL PERFORMANCE SYSTEM WITH METAPOWER QUAD

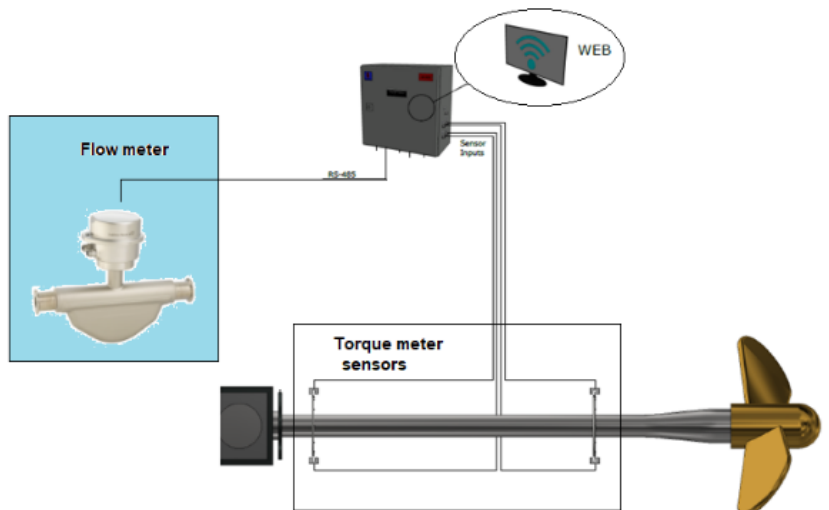
Kongsberg MetaFuel

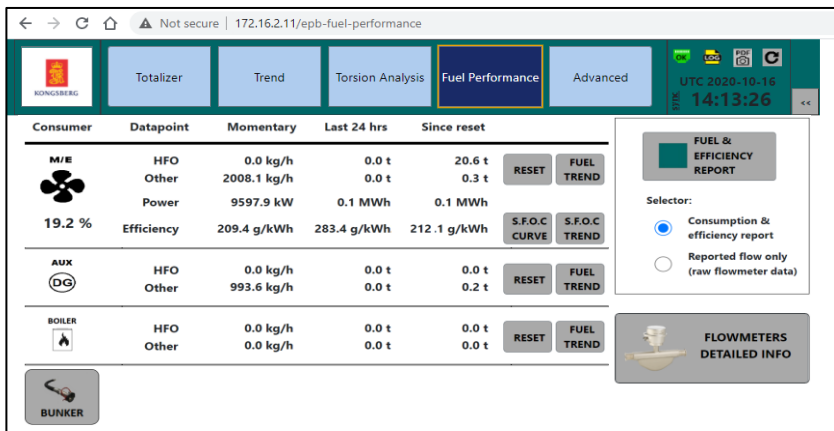
General description

KONGSBERG MetaFuel offers a reliable Fuel Performance solution based on the Metapower Quad shaft power meter. MetaFuel is made with the purpose to be an efficient and inexpensive solution for merchant vessels and others to obtain these basic figures, without committing to external logging and computer-based systems.

Full fuel accountability

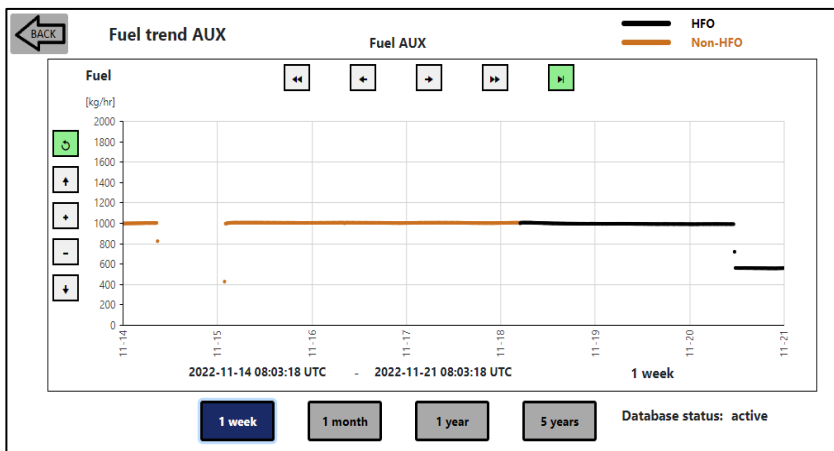
The build-in software allows you to connect flowmeters on a standard serial line into the Metapower Quad cabinet, enabling fuel counting for Main Engine, Auxiliaries(as one), Boiler, and the option to monitor Bunkering flowmeters. Turn-key solution with engineering, flowmeters and installation is available.





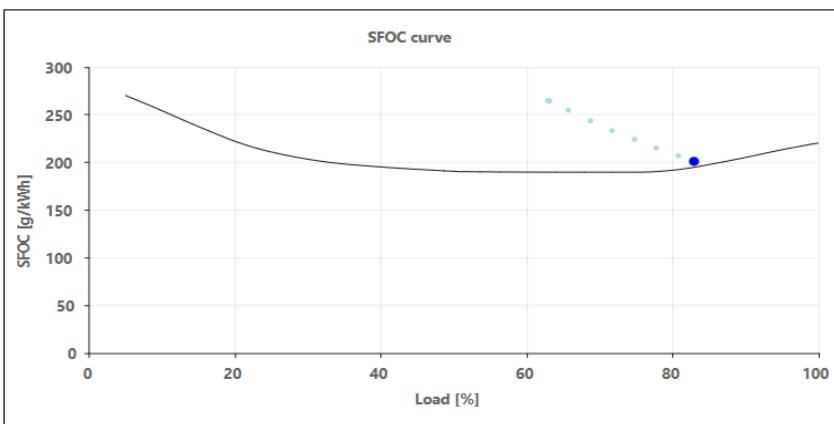
Dashboard view for any display or computer

Dedicated display will usually be supplied, but the system also support web view on any networked device for accessing the dashboards and performance figures real-time. If necessary, this can be transferred to shore. (IT, connectivity, and cyber security measures are not part of standard package)



Closely monitor main engine performance & fuel consumption

System support auto detection of fuel type based on configurable algorithm. View calculated specific fuel oil consumption (SFOC) in real time, or in long-term history perspective. Intuitive graphing and history data tools. Select a load level to see development in SFOC over time.

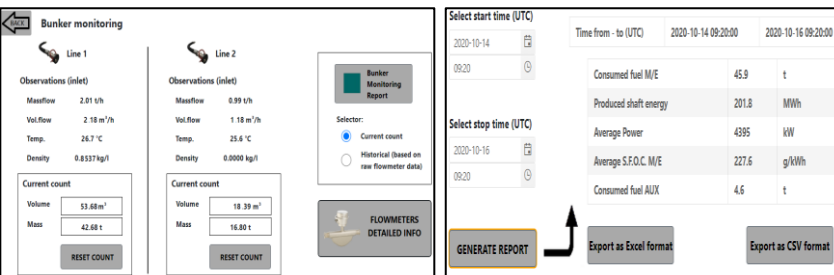


Real time view

Real time view lets you compare the main engine's present performance compared to the ideal curve.

Data storage

All data is stored locally on the removable industry-grade memory card (microSD). Set up acquisition interval in accordance with ISO 19030-2 to store the raw data like shaft power and consumption in synchronized UTC time. The storage capacity of 32GB lasts >10 years. Data can be extracted in SQL format for extra backup and scrutiny.



Tamper proof fuel logging

The log is tamper-protected, and the system can be set up to monitor check-valves where bypass is used.

Reports

Fuel performance and bunker reports are available for selected periods (e.g. voyage report) in Excel or CSV format.

The Metapower Quad family

Metapower Quad comes with many options. Shaft torque meter, Fuel performance, ShaPoLi stand alone, Flex coupling monitoring, Vessel Performance and more. Check them out at www.kongsberg.com.