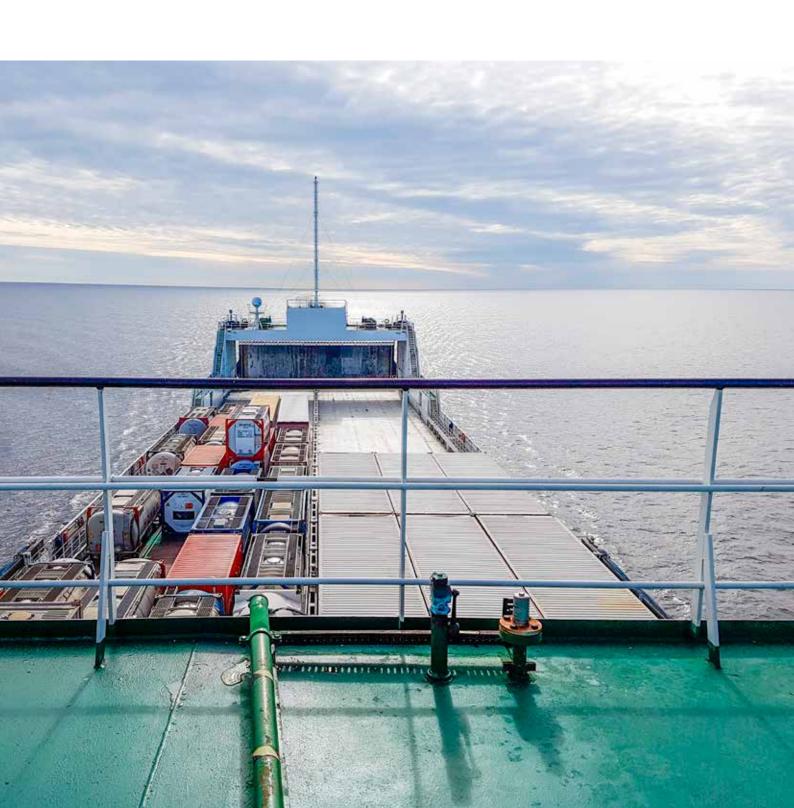


DIGITAL SERVICES | MARINE & PORTS

## **ABB MRV**

# Mastering EU emission regulations



### **ABB MRV**

## Mastering EU emission regulations

ABB offers the widest portfolio of digital services, marine software and optimization systems to the maritime market. With ABB Software, remote connections, and service built around the solution, we enable customers to digitalize their operations.

#### The facts

The European Union (EU) has introduced a Monitoring, Reporting and Verification (MRV) regulation of carbon dioxide, which will further cut back emissions coming from maritime transport. MRV will require large ships (over 5 000 gross tons) irrespective of where the ship or the company is registered calling at European ports from 1 January 2018 to monitor their carbon dioxide emissions and other relevant information.

#### The system

The ABB MRV software has been certified by Verifavia as a tool to monitor all parameters required to comply with within the EU's Monitoring Reporting and Verification (MRV) regulation requirements. The system is in compliance with the requirements of the Regulation (EU) N° 2015/757, the associated Delegated and Implementing Acts and the ISO IEC 25051 standard on software engineering.

Affected ship owners have until August 2017 to present an accredited method of reporting the information. ABB unburdens ship-owners and operators in this process by offering a userfriendly and fully compliant monitoring tool. So the advantage is two-fold. On one hand this takes away any efforts the ship-owner and operator in the process of coming up with an accredited method of reporting. On the other hand ABB delivers a plug-and-play MRV set-up that is ready for ship-owners to comply with the EU's emission regulations in the coming years. The ABB MRV set-up offers a standardized software solution based on ABB's industry proven decision support software solution for sea-going vessels. The system that collects and visualizes data from onboard sensors on a ships fuel consumption, the bunkering procedure and carbon dioxide emissions on a per-voyage basis. Furthermore data such as the total amount or weight of the carried cargo, total transport work, aggregated CO₂ emissions, expected distance at sea and start & stop of the voyage can be entered into the system.

All this information is then further processed within the cloud to create an annual emission report as required by the MRV regulation.

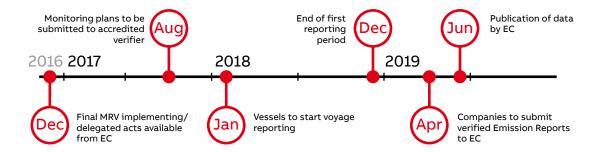
#### **Customer benefits**

- ABB delivers a verified plug-and-play MRV reporting system, so shipping companies do not have to invest any man hours in submitting monitoring plans to verifiers.
- Easy accessible and user friendly user-interface.
- Automatic detection of incorrect data input.
- · Low annual usage fee.
- Utilizes ABB's extensive and proven cloud functionality.
- Fully automated reporting functionality.
- Easy upscaling towards more optimization modules.

#### Why ABB?

ABB offers the maritime industry's most comprehensive software suite, and the MRV component is one of a number of its tools which allows ship owners to monitor performance, such as fuel usage, of individual vessels or whole fleets and create benchmarks. Where the ABB MRV set-up is used to comply with environmental regulations and to give shipping companies a sustainable license to operate, the broad range of other software modules give extensive possibilities to optimize the safety, efficiency and profitability of any sea-going vessel. Examples of modules are:

- Energy & SEEMP compliant Performance monitoring
- Trim optimization
- Engine SFOC monitoring
- · Speed optimization
- Bunker Transfer monitoring
- Hull condition monitoring
- DP Capability forecasts
- · Motion monitoring & forecasting

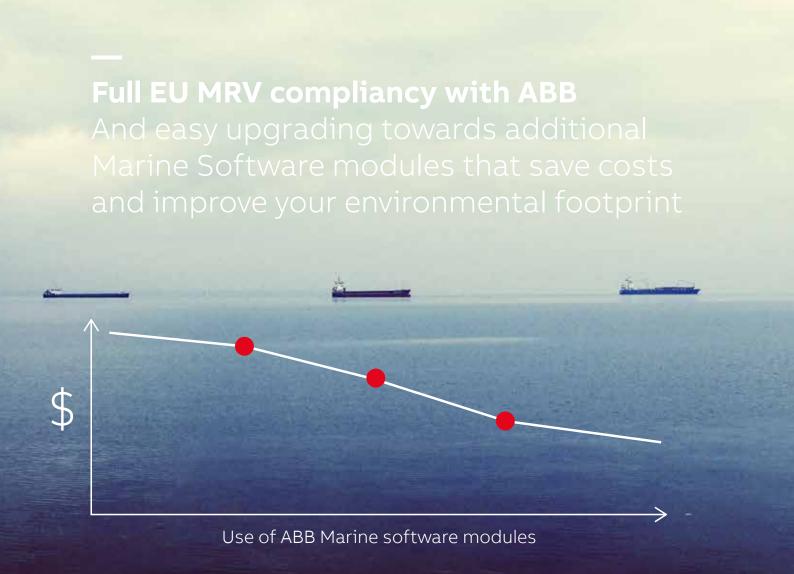


#### Marine & Ports Global Service

ABB Marine Services provides service solutions, support and training to any vessel with ABB equipment onboard. We also offer long-term agreements that lower your costs and you may consult us about making your vessels more energy efficient. With nearly 300 highly qualified service personnel available in over 25 international Marine Service Centers, we can always respond at short notice with whatever resources a situation demands. In addition ABB has offices in over 100 countries, which ensures that we are within reach wherever in the world you operate.

#### Writing the future. Together with ABB.

With ABB's Collaborative Operations we are enabling next generation vessel and customer onshore operations. We are bringing advanced analytics, portals, and the possibilities given with digital twin technology, to drive the digitalization of ship operations.





#### For more information, please contact:

ABB B.V.
Digital Services
Marine & Ports

Goldkampstraat 33B NL-7722RN Dalfsen, The Netherlands Phone: +31 (0)529 436876 Fax: +31 (0)529 436842

abb.com/marine

