

SembSOx

your exhaust
gas cleaning
solution



SembSOx EXHAUST GAS CLEANING SYSTEM

Offers operational and economical flexibility to vessel's operations.

Available in Open Loop, Hybrid (open and closed loop) configurations:

Open loop

- No dosing of alkali required
- No treatment required before discharge
- Compliant with MEPC 259(68) Scheme B

In open loop mode, seawater is used as a washing medium to clean the exhaust gas. This simple process makes use of the natural alkalinity of seawater to chemically absorb SOx. The treated exhaust gas can then be released to the environment, and the effluent discharged. Both the exhaust gas and effluent have to meet several critical environmental requirements which are validated by continuous emission monitoring.

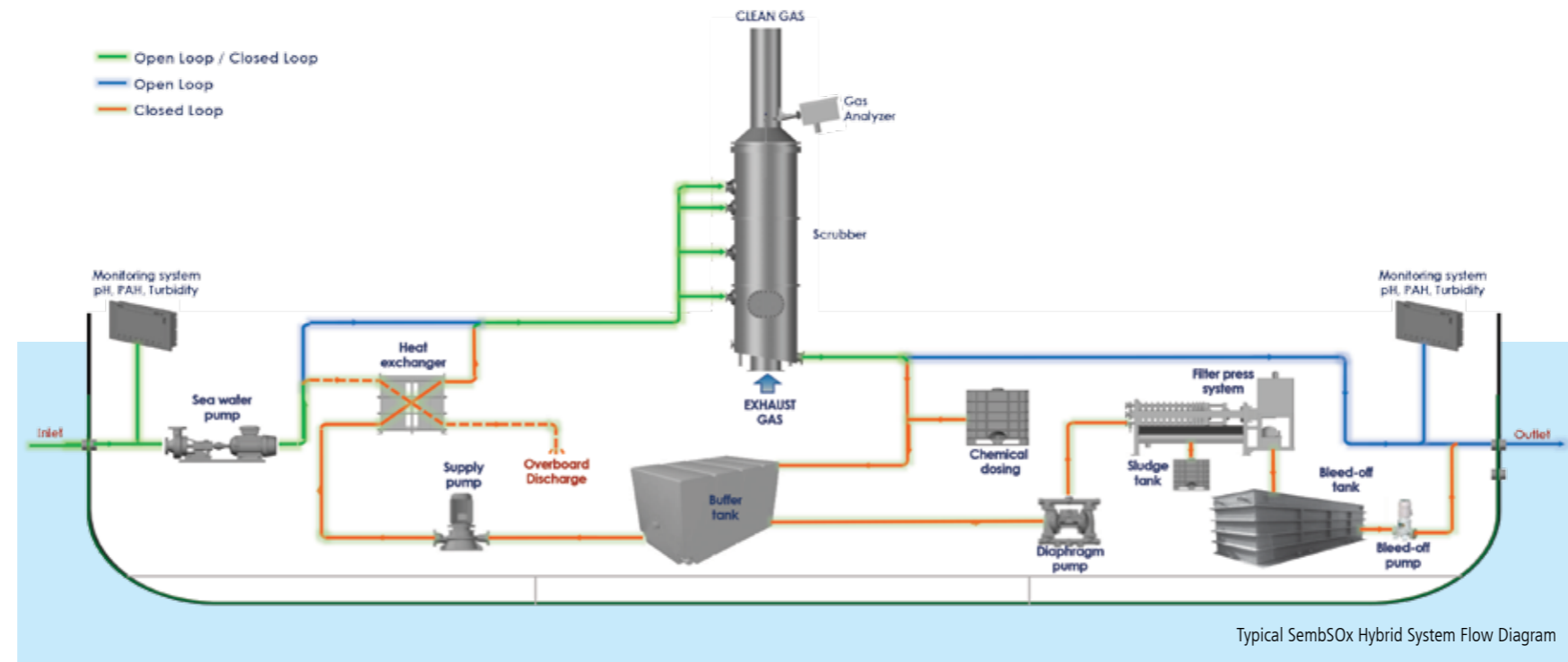
Closed loop (for Hybrid)

- Non-hazardous alkali for pH control
- Effective sludge management
- Extended washwater durability
- Suitable for operations in zero-discharge and low-alkalinity waters
- Compliant with MEPC 259(68) Scheme B

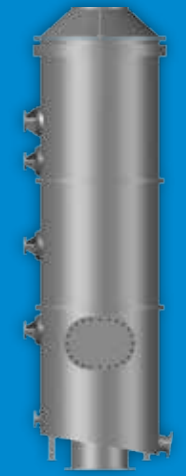
In a closed loop mode, seawater is used as a washing medium to clean the exhaust gas. The sulphur oxides in the exhaust react with seawater and are neutralised with an alkali added to the closed loop buffer tank to manage the pH value. The effluent formed is dehydrated to sludge to reduce storage space using a filter press.

Depending on the alkali selected, bleed-off and washwater holding tanks may not be required.

YOUR ENVIRONMENTALLY-FRIENDLY SOLUTION TO SULPHUR EMISSION CONTROL AREA & GLOBAL SULPHUR CAP 2020



Hybrid SembSOx

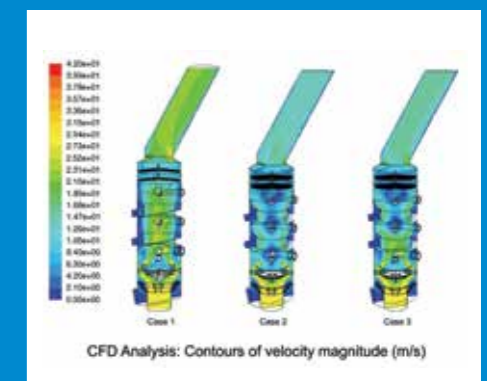


- Cost-effective and non-hazardous alkali
- Extended life of washwater
- Minimal top-up water required
- No washwater holding tank requirement
- Environmentally-friendly sludge
- No exhaust gas fans requirement
- Inline or bypass configuration possible



Purpose-built EGCS Testing Facility

Shipboard Installation

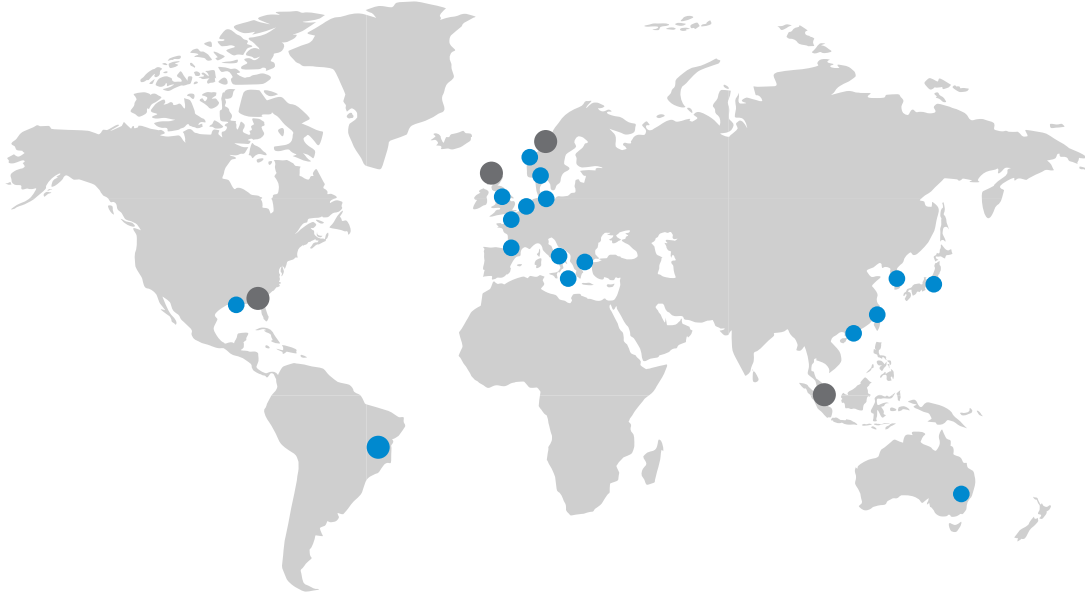


Extensively researched and developed

WORLDWIDE NETWORK

SALES | AFTER SALES | SERVICE SUPPORT | MAINTENANCE

Semb-Eco leverages on the extensive worldwide representation of Sembcorp Marine, as well as shipyards and facilities in Singapore, Indonesia, the United Kingdom, Norway and Brazil.



WHO ARE WE?

Semb-Eco is a wholly owned subsidiary of Sembcorp Marine that promotes novel, viable, cost-effective and sustainable solutions developed by the Group, to help customers and our partners meet environmental challenges in the Marine & Offshore industry.

Together with our products, we also offer complete solutions including integrated engineering and installation.

Our product includes:

- Semb-Eco LUV Ballast Water Management System (BWMS)
- SembSOx Hybrid Exhaust Gas Cleaning System (EGCS)
- ELMag corrosion protection system for seawater cooled stern tubes



FOR FURTHER INFORMATION, PLEASE CONTACT:

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