



Marine Hybrid Kit

Auxiliary propulsion system
For Main Engines up to 2000 kW



Hybrid
has never been
so simple



THE BIG FIVE



EMISSIONS

- significantly CO₂ and NOx reduction
- Zero Emissions with batteries
- minimal emissions with gensets



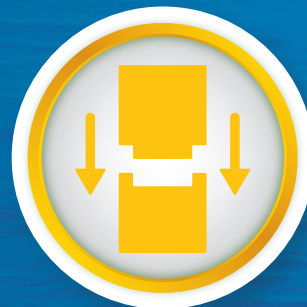
COMFORT

- no noise and vibrations during the night
- night cruising in full comfort



CONSUMPTIONS

- cruising up to 10 knots with excellent fuel economy
- high efficient navigation with “e-shaft mode” (two propellers with only one engine running)



PLUG & PLAY

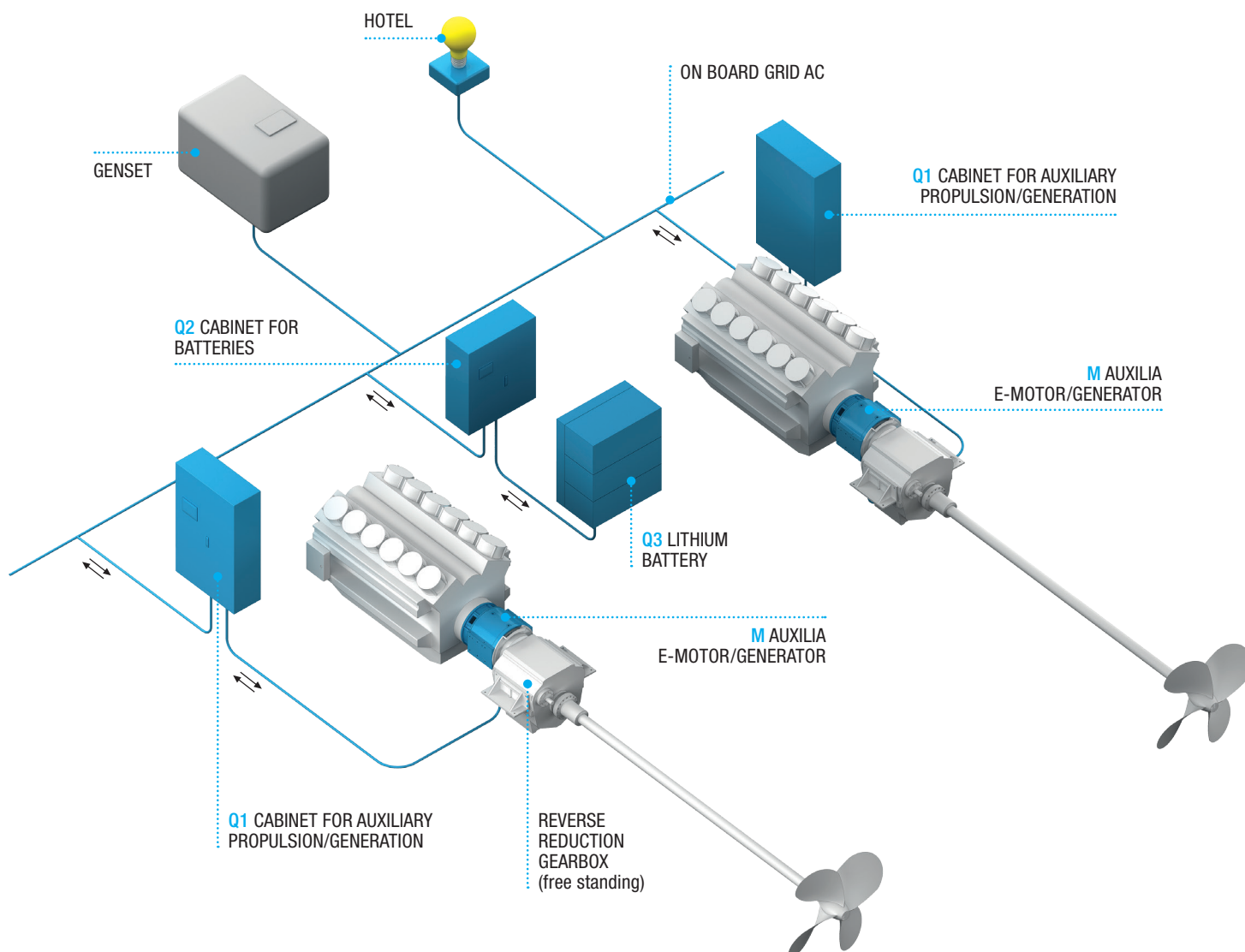
- Easy installation
- Turn-key system



PATROLLING AND DP

- easy dynamic position mode (DP) especially with FPP
- patrolling at low and very low speed (below idle engine speed) with excellent fuel economy

Auxilia Hybrid Kit



HYBRID KIT GENERAL DESCRIPTION

The Auxilia system is a plug&play “kit” ready to be installed on board and connected to the standard electric grid 400V, 50Hz or 440V, 60Hz.

The “**AUXILIA hybrid kit**” includes:

- “M” Auxilia Electric motor/generator water cooled with integrated clutch (patented by RTN Srl) to be installed in the propulsion drive-line (direct mounted on the engine flywheel housing)
- “Q1” Electric Cabinet air cooled for auxiliary propulsion generation with PMS (Power Management System), frequency converter and filter to let the electric power flow to/from Electric motor/generator
- “Q2” Electric Cabinet air cooled for lithium battery with PMS (Power Management System), frequency converter and filter to let the electric power flow to/from lithium battery

- “Q3” Lithium battery pack water cooled (10°C) for an optimum manage of the electric energy
- Integrated Cooling “box” with all the needed pumps/heat exchangers
- [optional] Chiller system for battery pack

Every electric cabinet can be installed as a self-functioning module and it is independently connected to the AC standard electric grid.

The Shipyard has one supplier and the system is standardized in several combinations of power to cover almost 90% of inquiries.

We are always ready for special execution when needed.



OPERATING MODE

The **AUXILIA hybrid kit** gives you the freedom to operate with the following modes:

EMISSIONS ZERO

Propulsion "Zero Emission"
(power from the batteries to AUXILIA motor)

COMFORT

Comfort mode/night mode
(hotel load from battery - diesel generators OFF)

FAST RECHARGE/GENERATOR

Electric power from main diesel engines
for hotel loads and battery fast recharge

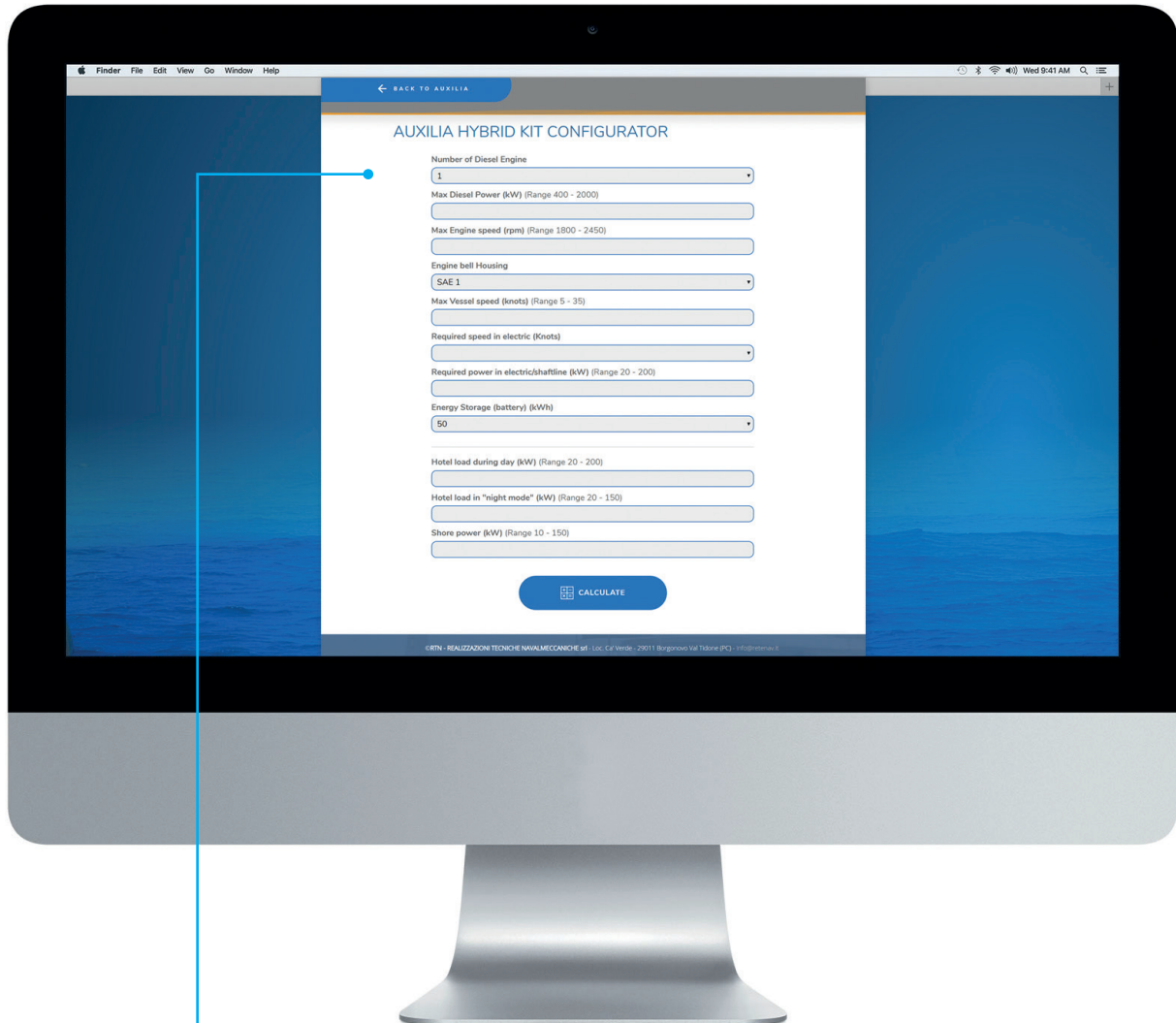
COMBI

Only one diesel ON running two propellers



WEB CONFIGURATOR

“Now you can easily select your own Auxilia Hybrid Kit through our configurator. Just fill out the required information and the Auxilia configurator will do the selection for you. You can then download all technical features such as drawings, weights and dimensions.”



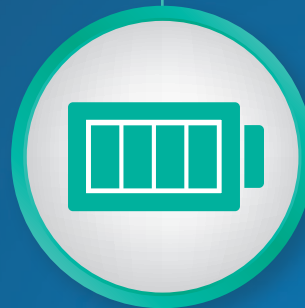
<https://www.auxilia-propulsion.com/index.php/auxilia-hybrid-kit-configurator>

Auxilia also supplies

Electric motor/generator
on **gearbox PTI**



Battery for silent
night and **zero**
emissions mode



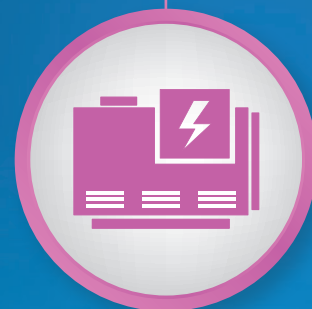
Full Electric
propulsion



Booster
mode



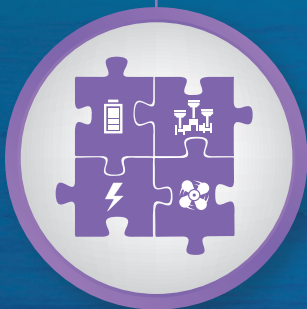
Variable Speed
generator sets



Power
Management
Systems



Complete
Propulsion
Systems



Technical
electrical
consultancy



Hydrogen
Fuel Cells



Shore Power
connection



AUXILIA[™]
ELECTRIC PROPULSION



The Auxilia warranty Service Worldwide



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