

VRT50X2

DATASHEET



Cooling and Heating capacity Kw min 5 / std 45 / max 50
Cooling and Heating power source kW min 2 / std 7,5 / max 14

VRT50X2

MAIN FEATURES

• CONDENSER

Titanium Grade 2. No fouling, no corrosion. 3 times lighter than copper nickel

• COMPRESSOR

Toshiba inverter twin rotary. COP > 4
- Rotation speed: 600 to 6000 rpm

• FRAME

Stainless Steel 316

• SOFTWARE MANAGEMENT

Compressor high temperature, low temperature, high pressure condenser, low pressure compressor, electronic pressure gas, electronic pressure liquid, Condensation control, Evaporation control

• COMPRESSOR PROTECTION

Over/undervoltage, overcurrent, torque, winding temperature, stepout (bad lubrication), power input, power output, efficiency, overload, oil level (with EEV)

• ELECTRONIC

Microprocessor board with rs485 modbus rtu communication. Interface to Termodinamica air handling unit or fresh air unit.

VRT50X2

TECHNICAL SPECIFICATIONS

Total BTU Capacity	Comparable to 230.000 BTU/h of the competitors
Power supply options	180 - 230 VAC / 50-60Hz 1ph+N → mod. VRT50X2-2V On request 400 VAC → Mod. VRT50X2-4V On request 700 VDC → Mod. VRT50X2-7V
Sea water pump	Magnetic type. Centrifugal 1,2kW included in compressor power consumption. 500 lt/min
Size W x D x H	1182 x 660 x 697 mm
Weight	190 Kg
Sea water working range	+3°C to +40°C
Air working range	-20°C to +50°C
Noise	Compressor @ 140 hz – 73db @ 1 meter from box
Vibration	No significant vibration transmitted to the feet
Sea water pipes connection	1" 1/2
Refrigerant pipe	4 x 5/8" Gas - 4 x 1/2" Liquid

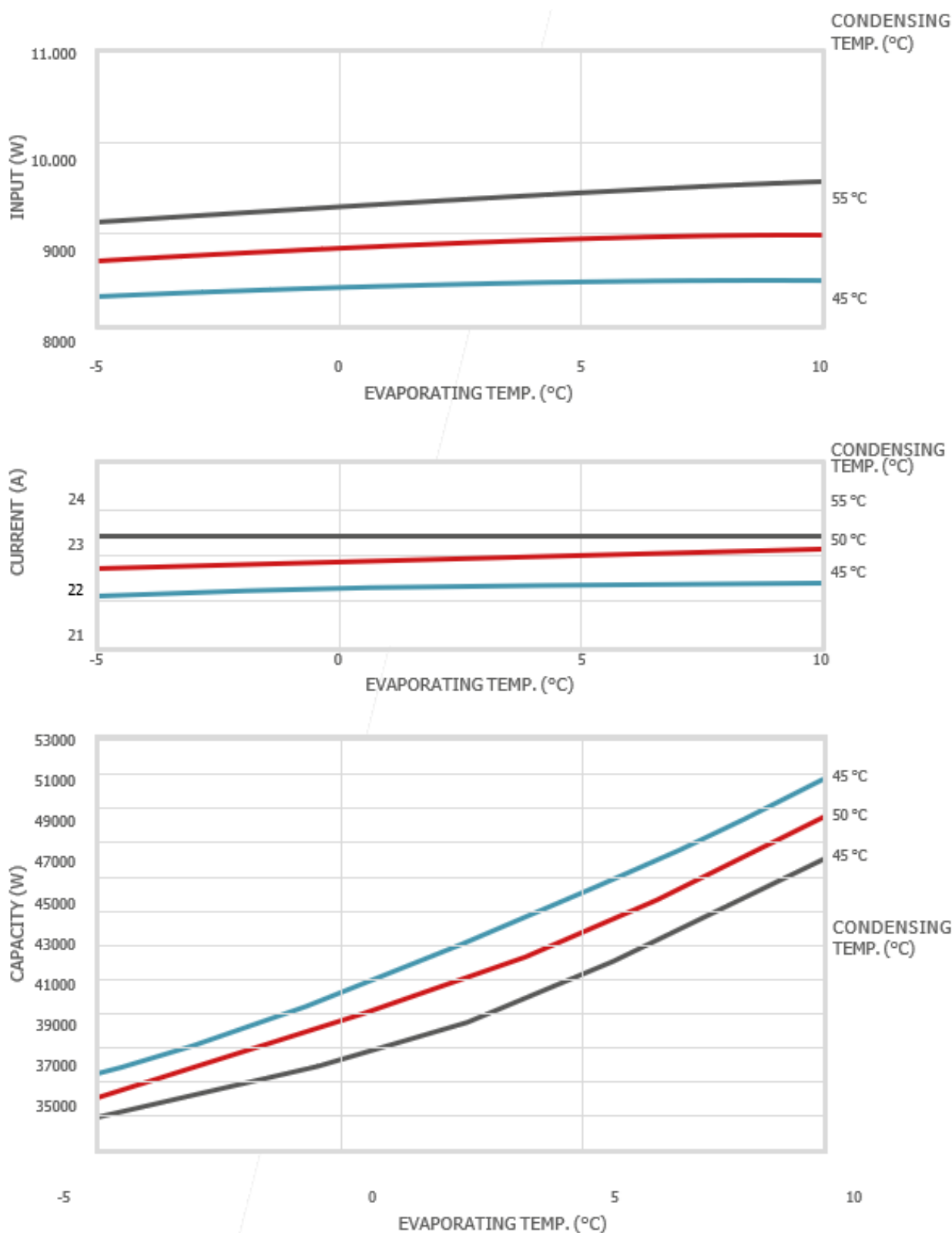
Compressor box uses VRV inverter architecture with refrigerant circulation inside air handler.

Databus rs485 Modbus on board.

System based on Toshiba VFD and twin rotary compressor.

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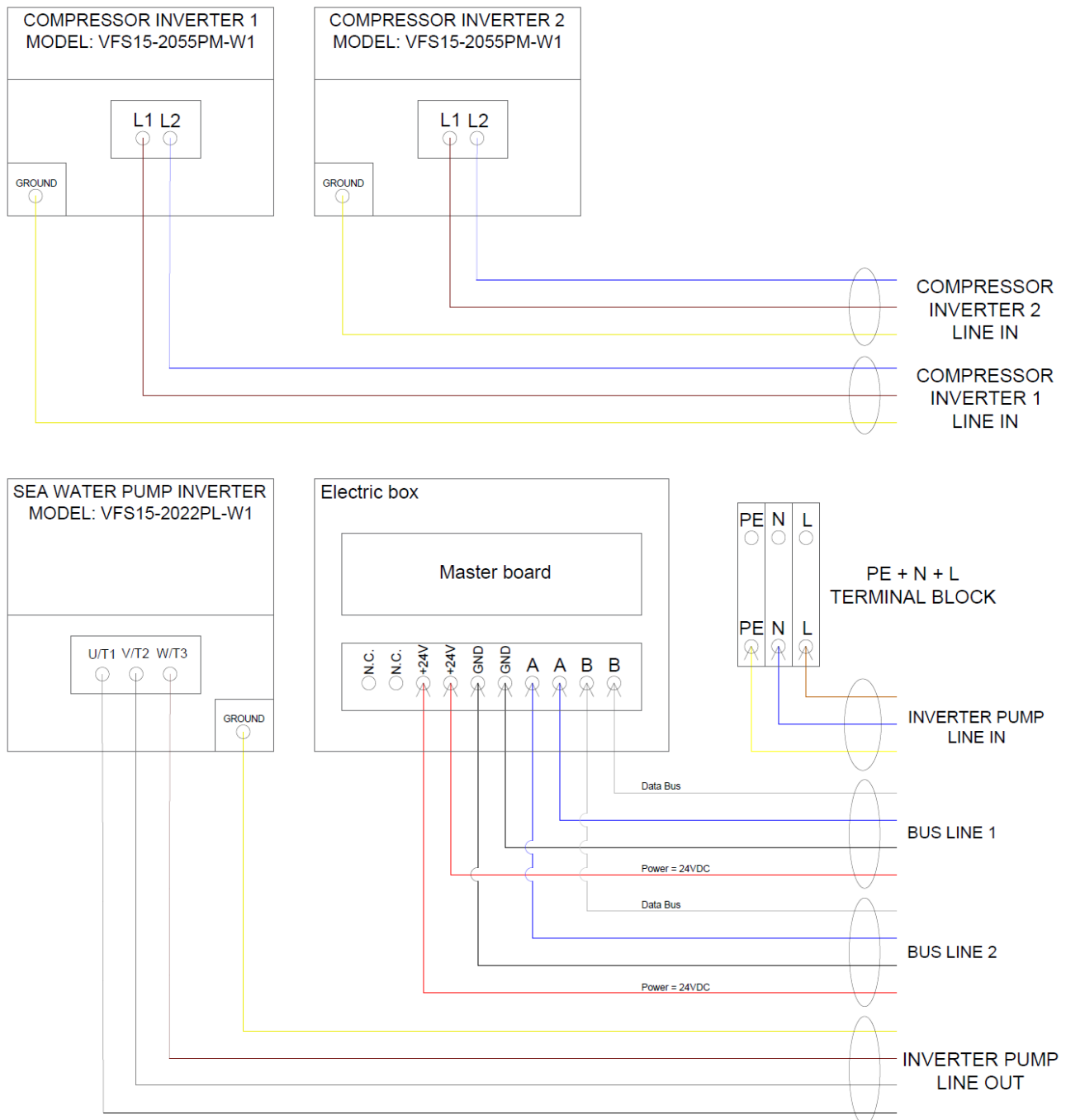
PERFORMANCE CURVE DC INVERTER 70 rps / 100



VRT50X2

ELECTRICAL CONNECTIONS

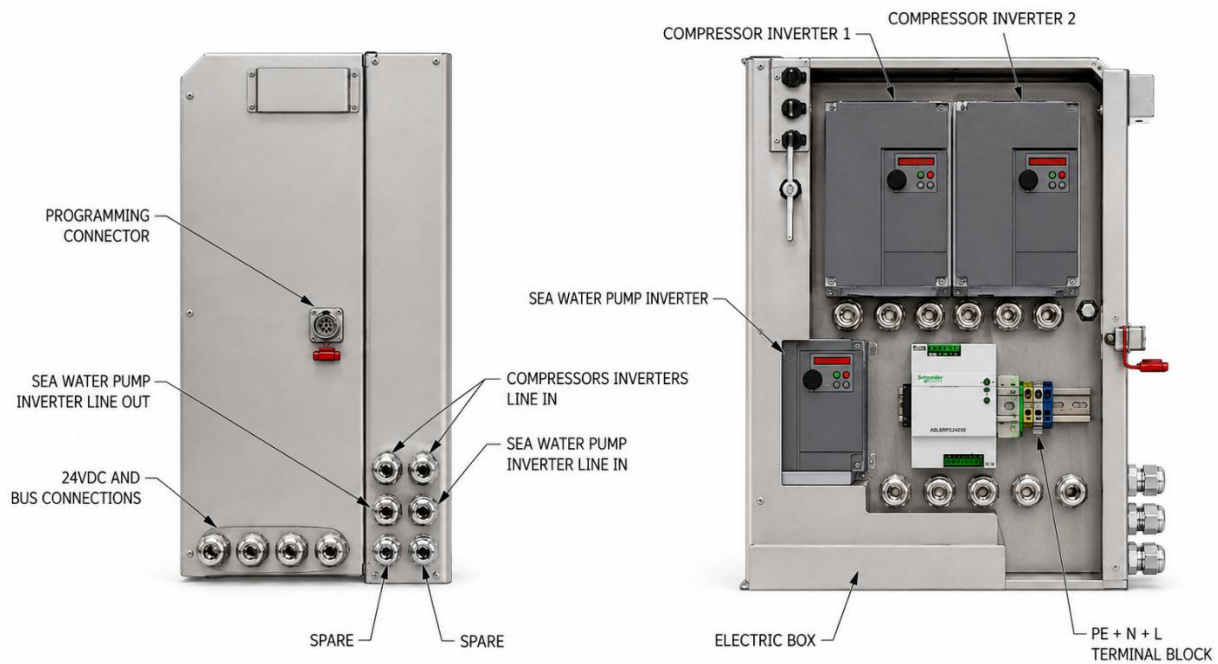
VRT50X2-2V (230VAC Version)



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ELECTRICAL CONNECTIONS

230VAC INVERTER PANEL DETAIL



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OVERALL DIMENSIONS

