



Smart connections.

Data sheet VERTIMO E

# **TECHNICAL DATA FOR VERTIMO E - "Smart connections."** on four levels



#### The VERTIMO E

- Decentralised device for mounting on wall near application
- High protection class IP55 / NEMA 12
- 2 sizes with power of between 30 kW and 75 kW
- Integrated EMC filter
- Functional Safety STO

### Communication

 Modbus RTU, Modbus TCP, BACnet MS/TP, BACnet/IP, Profibus DP, Profinet IO, DeviceNet, EtherNet/IP, EtherCAT

### Operation and observation

- Quick and easy commissioning
- Intuitive key control with plain text OLED display
- Specific pump functions (multiple pump-/ master-slave-operation, dry run protection, pump cleaning ...)
- PC Software

## Control process

■ IE1, IE2, IE3, IE4: for asynchronous motors and synchronous motors

	Size	400 V				
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Electrical data	Recommended motor rating* [KW]	30.0	37.0	45.0	55.0	75.0
	Supply voltage [V]	3 x 380 V AC -10%480 V AC +10%				
	Grid frequency [Hz]	48 Hz62 Hz				
	Network forms	TN / TT				
	Line current [A]	48.2	58.0	75.9	112.5	153.2
	Rated current output eff. [IN at 8 kHz]	61.0	72.0	90.0	110.0	150.0
	Min. brake resistance $[\Omega]$	-	-	-	-	-
	Overload	110 % for 60 s / 165 % for 4 s				
	Switching frequency	4 kHz - 32 kHz				
	Output frequency	0 Hz – 500 Hz				
	Mains cycles of operation / restart	120 per hour maximum, distributed evenly				
Functions	Protective function	Overvoltage and undervoltage, I <sup>2</sup> t restriction, short circuit, blocking detection, load monitoring, motor and drive controller temperature, stall prevention, dry run protection				
	Software functions	Process control (PID controller), fixed frequencies, frequency of fading out, flying restart, motor current limit, multiple pump-/ master-slave-operation, dry run protection				
Mechanical data	Dimensions [L x W x H] mm		540x235x270		865x330x330	
	Weight [kg]	23.1			55.0	
	Protection class [IPxy]	IP 55 / NEMA 12				
	Cooling	Active cooling				
Environmental conditions	Ambient temperature [°C]	-10 °C (non-condensing) to + 40 °C (without derating)				
	Storage temperature	-40 °C+ 60 °C				
	Altitude of the installation location	up to 2000 m above sea level / over 1000 m with reduced performance (1 % per 100 m)				
	Relative air humidity	≤ 95 %, condensation not permitted.				
	EMC (DIN-EN-61800-3)	C3				
Interfaces	I/O interfaces	3 DI / 2 Al can be configured to 2 DI / 1 AO can be configured to 1 DO / 2 relay / STO SIL2, PLd				
	Controls	Integrated multi-lingual control unit with OLED display as standard				
	Internal power supply	24 V DC, 100 mA / 10 V DC, 10 mA				
	Fieldbus integrated	Modbus RTU, Modbus TCP, BACnet MS/TP, BACnet/IP, Profibus DP, Profinet IO, DeviceNet, EtherNet/IP, EtherCAT				
	Certificates and conformity		C€	CUL US ROHS		

<sup>\*</sup> Recommended motor rating (4-pole asynchronous motor) is given based on the 400 V AC or 230 V AC supply voltage.



## Contact

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