



Smart
connections.

Data sheet

VERTIMO

TECHNICAL DATA FOR VERTIMO – “Smart connections.” on four levels



The VERTIMO

- Decentralised device for mounting on wall
- High protection class IP66 / NEMA 4X
- 4 sizes with power of between 0.37 kW and 22.0 kW
- Fan-free design up to 7.5 kW
- Integrated class C1 EMC filter (optional)*

Communication

- Modbus and CANopen on board

Operation and observation

- Quick and easy commissioning
- Intuitive key control with LED display
- Application macros for industrial, pump and fan operations
- With integrated potentiometer, direction of rotation switch and switch disconnecter as options
- PC Software
- Memory stick for cloning parameter sets (accessory)

Control process

- IE1, IE2, IE3, IE4, IE5: for asynchronous motors and synchronous motors

Size		230 V				400 V									
		A		B	A		B		C			D			
Electrical data	Recommended motor rating** [KW]	0.37	0.75	1.5	2.2	0.75	1.5	2.2	4.0	5.5	7.5	11.0	15.0	18.5	22.0
	Supply voltage [V]	1 x 200 V AC -10%... 240 V AC +10%				3 x 380 V AC -10%...480 V AC +10%									
	Grid frequency [Hz]	48 Hz...62 Hz													
	Network forms	TN / TT													
	Line current [A]	3.7	7.5	12.9	19.2	3.5	5.6	7.5	11.5	17.2	21.2	27.5	34.2	44.1	51.9
	Rated current output eff. [IN at 8 kHz]	2.3	4.3	7.0	10.5	2.2	4.1	5.8	9.5	14.0	18.0	24.0	30.0	39.0	46.0
	Min. brake resistance [Ω]	-	-	100***	50	-	250***	200	120	100	80	50	30	22	22
	Overload	150 % for 60 s / 175 % for 2.5 s													
	Switching frequency	4 kHz - 32 kHz (default settings 8 kHz)													
	Output frequency	0 Hz – 500 Hz													
Mains cycles of operation / restart	120 per hour maximum, distributed evenly														
Functions	Protective function	Overvoltage and undervoltage, I²t restriction, short circuit, motor and drive controller temperature, stall prevention													
	Software functions	Process control (PI controller), fixed frequencies, flying restart, motor current limit, application macros for industrial, pump and fan operations													
Mechanical data	Dimensions [L x W x H] mm	232x161x179			257 x 188 x 187	232 x 161 x 179		257 x 188 x 187	310 x 211 x 252			380 x 211 x 272			
	Weight [kg]	2.1			3.0	2.1		3.0	5.0			7.0			
	Protection class [IPxy]	IP 66 / NEMA 4X												IP 55	
	Cooling	Passive 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)	C1 (optional)*													
Interfaces	I/O interfaces	2 DI / 2 AI can be configured to 2 DI / 1 AO can be configured to 1 DO / 1 relay													
	Controls	Integrated control unit with LED display, optional with integrated potentiometer, direction of rotation switch and switch disconnecter													
	Internal power supply	24 V DC, 100 mA / 10 V DC, 10 mA													
	Fieldbus integrated	Modbus RTU / CANopen													
Certificates and conformity		<div>CE</div> <div>UL LISTED US</div> <div>RoHS 2011/65/EU</div> <div></div>													

Technical data for VERTIMO (subject to technical changes)

* See operating manual

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

*** In size B

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