Product data sheet

Specifications

Motor controller, TeSys T, Motor Management, Modbus, 6 logic inputs, 3 logic outputs, 1.35 to 27A, 100 to 240VAC

LTMR27MFM

Main

Range	TeSys
Product name	TeSys T
Device short name	LTMR
Product or component type	Motor controller
Device application	Equipment monitoring and control
Measurement current	1.35…27 A
[Us] rated supply voltage	100...240 V AC 50/60 Hz
Current consumption	8...62.8 mA
Supply voltage limits	93.5…264 V AC
Communication port protocol	Modbus
Bus type	Modbus 2-wire RS 485 interface, addressing 1...247, transmission rate 1.2...19.2 kbit/s, RJ45 with 2 shielded twisted pairs Modbus 2-wire RS 485 interface, addressing 1...247, transmission rate 1.2...19.2 kbit/s, terminal block with 2 shielded twisted pairs

Complementary

[Ui] rated insulation voltage	690 V conforming to EN/IEC 60947-1 690 V conforming to CSA C22.2 No 14 690 V conforming to UL 508
[Uimp] rated impulse withstand voltage	4 kV supply, inputs and outputs conforming to EN/IEC 60947-4-1 6 kV current or voltage measurement circuit conforming to EN/IEC 60947-4-1 0.8 kV communication circuit conforming to EN/IEC 60947-4-1
Short-circuit withstand	100 kA conforming to EN/IEC 60947-4-1
Associated fuse rating	4 A gG for output 0.5 A gG for control circuit
Protection type	Reverse polarity protection Overload (long time) Earth-leakage protection Phase unbalance Overload Load fluctuation Phase failure Power factor variation Thermal protection Locked rotor Thermal overload protection

Disclaimer: This documentation is not intended as a substitute for and is not to be used for determining suitability or reliability of these products for specific user applications

Network and machine diagnosis type	Fault recording Starting current and time Remaining operating time before overload tripping Waiting time after overload tripping Motor control command recording Event recording Trip history information Running hours counter/operating time Phase fault and earth fault trip counters Trip context information
Logic input number	6
Input current	3.1 mA at 100 V 7.5 mA at 240 V
Current state 0 guaranteed	Logic input: 0...40 V and <= 15 mA for 25 ms
Current state 1 guaranteed	Logic input: 79...264 V and >= 2 mA for 25 ms
maximum output switching frequency	2 Hz
Load current	5 A at 250 V AC for logic output 5 A at 30 V DC for logic output
Permissible power	480 VA (AC-15), Ie = 2 A, 500000 cycles (output) 30 W (DC-13), Ie = 1.25 A, 500000 cycles (output)
maximum operating rate	1800 cyc/h
Contacts type and composition	1 NO + 1 NC fault signal 3 NO
Metering type	Temperature Phase current I1, I2, I3 RMS Average current Iavg Earth-fault current Imbalance current
Measurement accuracy	5...15 % earth fault current internal measurement 1 % voltage (100...830 V) 3 % power factor 5 % earth fault current external measurement +/- 30 min/year internal clock 0,02 temperature 1 % current 5 % active and reactive power
Overvoltage category	III
Connection pitch	5.08 mm
Connections - terminals	Control circuit: connector 1 cable(s) 0.25…2.5 mm² (AWG 24...AWG 14) flexible with cable end Control circuit: connector 1 cable(s) 0.2…2.5 mm² (AWG 24...AWG 14) flexible without cable end Control circuit: connector 1 cable(s) 0.25…2.5 mm² (AWG 24...AWG 14) flexible without cable end Control circuit: connector 1 cable(s) 0.2…2.5 mm² (AWG 24...AWG 14) solid without cable end Control circuit: connector 2 cable(s) 0.2…1 mm² (AWG 24...AWG 14) flexible with cable end Control circuit: connector 2 cable(s) 0.2…1.5 mm² (AWG 24...AWG 14) flexible without cable end Control circuit: connector 2 cable(s) 0.5…1.5 mm² (AWG 24...AWG 14) flexible without cable end Control circuit: connector 2 cable(s) 0.2…1 mm² (AWG 24...AWG 14) solid without cable end
Tightening torque	Control circuit: 0.5…0.6 N.m flat screwdriver 3 mm
Pollution degree	3

Electromagnetic compatibility	Electrostatic discharge, 3, 8 kV air, 6 kV contact, conforming to EN/IEC 61000-4-2 Radiated RF fields, 3, 10 V/m, conforming to EN/IEC 61000-4-3 Fast transients immunity test (other circuits), level 3, 2 kV, conforming to EN/IEC 61000-4-4 Fast transients immunity test (on supply and relay outputs), level 4, 4 kV, conforming to EN/IEC 61000-4-4 Voltage dips and interruptions immunity test, 70 %, 500 ms, conforming to EN/IEC 61000-4-11 Conducted RF disturbances, 10 V, conforming to EN/IEC 61000-4-6 Temperature sensor: surges (serial mode), 0.5 kV, conforming to EN/IEC 61000-4-5 Temperature sensor: surges (common mode), 1 kV, conforming to EN/IEC 61000-4-5 Control circuit: surges (serial mode), 1 kV, conforming to EN/IEC 61000-4-5 Communication: surges (common mode), 2 kV, conforming to EN/IEC 61000-4-5 Relay outputs and supply: surges (serial mode), 2 kV, conforming to EN/IEC 61000-4-5 Relay outputs and supply: surges (common mode), 4 kV, conforming to EN/IEC 61000-4-5 Control circuit: surges (common mode), 2 kV, conforming to EN/IEC 61000-4-5
Width	91 mm
Height	61 mm
Depth	122.5 mm
Net weight	0.53 kg
Web services	Web server
Compatibility code	LTMR

Environment

Standards	CSA C22.2 No 14 UL 508 EN 60947-4-1 IEC 60947-4-1 IACS E10
Product certifications	RMRoS LROS (Lloyds register of shipping) RINA ABS CCC EAC UL GL NOM DNV KERI ATEX BV CSA C-Tick
Protective treatment	12 x 24 hour cycles conforming to EN/IEC 60068-2-30 48 h conforming to EN/IEC 60070-2-11 TH conforming to EN/IEC 60068
Fire resistance	650 °C conforming to EN/IEC 60695-2-12 960 °C conforming to UL 94
Ambient air temperature for operation	-20…60 °C
Ambient air temperature for storage	-40…80 °C
Operating altitude	<= 2000 m without derating
Mechanical robustness	Vibrations mounted on symmetrical rail: 1 Gn, 5...300 Hz conforming to EN/IEC 60068-2-6 Vibrations plate mounted: 4 Gn, 5...300 Hz conforming to EN/IEC 60068-2-6 Shocks half sine wave acceleration: 15 Gn for 11 ms conforming to EN/IEC 60068-2-27
IP degree of protection	IP20

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	7.200 cm
Package 1 Width	10.000 cm
Package 1 Length	13.600 cm
Package 1 Weight	524.000 g
Unit Type of Package 2	S02
Number of Units in Package 2	10
Package 2 Height	15.000 cm
Package 2 Width	30.000 cm
Package 2 Length	40.000 cm
Package 2 Weight	5.604 kg

Contractual warranty

Warranty	18 months

Environmental Data

Schneider Electric aims to achieve Net Zero status by 2050 through supply chain partnerships, lower impact materials, and circularity via our ongoing “Use Better, Use Longer, Use Again” campaign to extend product lifetimes and recyclability.

Environmental Data explained >

How we assess product sustainability >

Environmental footprint

Environmental Disclosure	Product Environmental Profile

Use Better

Materials and Substances

Packaging made with recycled cardboard	Yes
Packaging without single use plastic	Yes
EU RoHS Directive	Compliant with Exemptions
SCIP Number	Fc01c523-9a07-4dfa-988f-c721d4816782
Halogen-free status	Halogen free plastic parts product
PVC free	Yes

Use Again

Repack and remanufacture

End of life manual availability	End of Life Information
Take-back	No
WEEE Label	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins