

# Product datasheet

Specifications



## motor - M61 - Sepam series 60

59792

⚠ Discontinued on: 31 Dec 2023

⚠ End-of-service on: 30 Apr 2024

⚠ To be discontinued

### Main

Relay application	Motor
Range of product	Sepam series 60
Device short name	M61
Control and monitoring type	Circuit breaker/contactor control ANSI code: 94/69 (option) Latching/acknowledgement ANSI code: 86 Logic discrimination ANSI code: 68 (option) Switching of groups of settings Annunciation ANSI code: 30 Logic equation editor 200 operators Load shedding/automatic restart
Metering type	Positive sequence voltage Vd/rotation direction Frequency Calculated active and reactive energy (+/- W.h, +/- VAR.h) Active and reactive energy by pulse counting (+/- W.h, +/- VAR.h) (option) Phase current I1, I2, I3 RMS Demand current I1, I2, I3 Peak demand current IM1, IM2, IM3 Voltage U21, U32, U13, V1, V2, V3 Residual voltage V0 Negative sequence voltage Vi Active power P, P1, P2, P3 Reactive power Q, Q1, Q2, Q3 Apparent power S, S1, S2, S3 Peak demand power PM, QM Power factor Temperature (16 RTDs) (option) Rotation speed (option) Measured residual current I0, calculated I'0Σ
Network and machine diagnosis type	Unbalance ratio/negative sequence current li Disturbance recording Thermal capacity used Remaining operating time before overload tripping Waiting time after overload tripping Running hours counter/operating time Starting current and time Start inhibit time, number of starts before inhibition Tripping context Phase fault and earth fault trip counters Harmonic distortion (THD), current and voltage Ithd, Uthd Apparent positive sequence impedance Zd Apparent phase-to-phase impedances Z21, Z32, Z13 Cable arcing fault detection Phase displacement Datalog (DLG) Motor start report (MSR) Motor start trend (MST)
Switchgear diagnosis type	Cumulative breaking current CT/VT supervision ANSI code: 60FL Trip circuit supervision ANSI code: 74 (option) Nb of operations, operating time, charging time, nb of racking out operations (option)

## Complementary

<b>Type of measurement</b>	Power factor Current Rotation speed Peak demand power Harmonic distortion (I THD & U THD) Frequency Temperature Voltage Power (P,Q) Energy
<b>Protection type</b>	Thermostat / buchholz ANSI code: 26/63 (option) Phase undercurrent ANSI code: 37 (1) Starts per hour ANSI code: 66 (1) Neutral voltage displacement ANSI code: 59N (2) Breaker failure ANSI code: 50BF (1) Directional earth fault ANSI code: 67N/67NC (2) Temperature monitoring (16 RTDs) ANSI code: 38/49T (option) Thermal overload for machines ANSI code: 49RMS (2) Excessive starting time, locked rotor ANSI code: 48/51LR (1) Field loss (underimpedance) ANSI code: 40 (1) Overspeed (2 set points) ANSI code: 12 (option) Underspeed (2 set points) ANSI code: 14 (option) Directional reactive overpower ANSI code: 32Q (1) Phase overcurrent ANSI code: 50/51 (4) Earth fault/sensitive earth fault ANSI code: 50N/51N (4) Earth fault/sensitive earth fault ANSI code: 50G/51G (4) Negative sequence/unbalance ANSI code: 46 (2) Overfrequency ANSI code: 81H (2) Underfrequency ANSI code: 81L (4) Positive sequence undercurrent ANSI code: 27D (2) Remanent undervoltage ANSI code: 27R (2) Negative sequence overvoltage ANSI code: 47 (2) Directional active overpower ANSI code: 32P (2) Undervoltage (L-L or L-N) ANSI code: 27 (2) Overvoltage (L-L or L-N) ANSI code: 59 (2)
<b>Communication port protocol</b>	Measurement readout ( option ) : Modbus Remote indication and time tagging of events ( option ) : Modbus Remote control orders ( option ) : Modbus Remote protection setting ( option ) : Modbus Transfer of disturbance recording data ( option ) : Modbus
<b>Input output max capacity</b>	28 inputs + 16 outputs
<b>Communication compatibility</b>	Modbus RTU IEC 61850 goose message IEC 60870-5-103 IEC 61850 Modbus TCP/IP DNP3
<b>User machine interface type</b>	Without Mimic-based Advanced Remote

## Packing Units

<b>Unit Type of Package 1</b>	PCE
<b>Number of Units in Package 1</b>	1
<b>Package 1 Height</b>	1.0 cm
<b>Package 1 Width</b>	1.0 cm
<b>Package 1 Length</b>	1.01 cm
<b>Package 1 Weight</b>	100.0 g