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Data sheet 7SX8000-3AA50-1BA0



Figure similar

7SX800 universal protection device; BI: 4; BO: 5 (4 fast, 1 life) I: 4 (4x protection); U: 4 (standard); housing: 1/6 x 19"; 8 LEDs; 9 operating keys; Ethernet: electrical; serial interface; operation panel: integrated; display type: color display; front design: standard; auxiliary voltage: 24 V - 250 V DC, 100 V - 230 V AC, modules: PS050

Product details	
number of function keys	9
number of LEDs	8
Product Functions	
type of measured value detection / of operational measured value / standard	Yes
type of measured value detection / expanded / min./max. values, mean values	Yes
switching statistics	Yes
circuit breaker monitoring	Yes
product feature / logic editor	Yes
control	Yes
fault recording for analog and digital signals	Yes
monitoring	Yes
number of parameter sets	8
parameter set switchover	Yes
circuit breaker test	Yes
Protection Functions	
three-pole tripping	Yes
with blocked rotor (ANSI 14)	Yes
undercurrent protection (ANSI 37)	Yes
temperature monitoring (ANSI 38)	Yes
bearing temperature monitoring (ANSI 38)	Yes
unbalance protection (ANSI 46)	Yes
overcurrent-time protection negative sequence system (ANSI 46)	Yes
phase-rotation supervision (ANSI 47)	Yes
thermal overload protection (ANSI 49)	Yes
definite overcurrent-time protection (ANSI 50/50N)	Yes
Switch On To Fault (ANSI SOTF)	Yes
sensitive ground current protection (ANSI 50Ns)	No
intermittent ground-fault protection	Yes
circuit breaker failure protection (ANSI 50BF)	Yes
circuit breaker backfire monitoring (ANSI 50RS)	Yes
dependent overcurrent-time protection (ANSI 51/51N)	Yes
dynamic response value changeover (ANSI 51C)	Yes
current unbalance protection for capacitor banks 1-phase (ANSI 60C)	Yes
trip-circuit supervision (ANSI 74TC)	Yes

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automatic reclosing (ANSI 79)	Yes
closing lock-out (ANSI 86)	Yes
ground fault differential protection (ANSI 87N)	Yes
inrush current detection	Yes
external trip initiation	Yes
slow-scan recorder (ANSI SSR)	Yes
continuous recorder (ANSI CR)	Yes
trend recorder (ANSI TR)	Yes
product conformity / according to IEEE 802.1X-port based Network Access Control	No
Optional functionality - function points (FP) necessary	
voltage-based protection functions	one-time 30 function points for voltage-based function package
● voltage measurement	Yes
● overexcitation protection (ANSI 24)	Yes
● synchrocheck (ANSI 25)	Yes
● undervoltage protection (ANSI 27)	Yes
● voltage variation protection (ANSI 59R/27R)	Yes
● reactive power-low-voltage protection / Q-U protection	Yes
● directional power monitoring (ANSI 32)	Yes
● forward power supervision (ANSI 32F)	Yes
● reverse power protection (ANSI 32R)	Yes
● overvoltage protection negative-sequence system (ANSI 47)	Yes
● voltage-dependent overcurrent-time protection (ANSI 51V)	Yes
● power factor (ANSI 55)	Yes
● overvoltage protection (ANSI 59)	Yes
● peak overvoltage protection, 3-phase for capacitors	Yes
● overvoltage protection zero-sequence system (ANSI 59N)	Yes
● measuring voltage failure detection (ANSI 60FL)	Yes
● directional overcurrent-time protection, phases (ANSI 67)	Yes
● directional ground fault protection (ANSI 67N)	Yes
● directional sensitive ground-fault detection for resonant-grounded systems and isolated systems (ANSI 67Ns)	No
● sensitive ground-fault detection for resonant-grounded systems and isolated systems according to the admittance method (ANSI 67Ns)	No
● sensitive ground-fault detection for resonant-grounded systems and isolated systems via pointer measurement with 3rd or 5th harmonic (ANSI 67Ns)	No
● ground-fault wiper function, for transient and static ground faults in resonant-grounded systems and isolated systems (ANSI 67Ns)	No
● directional intermittent ground-fault protection	Yes
● frequency protection (ANSI 81)	Yes
● automatic frequency relief (ANSI 81U)	Yes
● frequency variation protection (ANSI 81R)	Yes
● vector step protection	Yes
● fault locator (ANSI FL)	Yes
motor protection	
● blocked rotor monitoring (ANSI 48)	Yes
● load step protection (ANSI 50L)	Yes
● reclosing lockout (ANSI 66)	Yes
communication / Ethernet	one-time 50 function points for ethernet communication package
● Modbus TCP	Yes
● IEC 61850-8-1	Yes
● DNP3	Yes
● IEC 60870-5-104	Yes
● PROFINET IO	Yes
● RSTP	Yes
● PRP	Yes
● HSR	Yes

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communication / serial protocols	one-time 20 function points for serial communication package
● IEC 60870-5-103	Yes
● Modbus RTU	Yes
power quality assessment function / voltage unbalance	20 function points
power quality assessment function / Total Demand Distortion (TDD)	10 function points
power quality assessment function / 10/12 cycle values for continuous recorder	25 function points
power quality assessment function / trend values for trend recorder	25 function points
power quality assessment function / flicker values for trend recorder	25 function points
voltage supply deviation / requirement / voltage-based function package	30 function points
Supply voltage	
supply voltage / at AC	110 ... 230 V
supply voltage / at DC	24 ... 250 V
type of voltage / of the supply voltage	AC/DC
Inputs / Outputs	
number of digital inputs / maximum	4
number of digital outputs / incl. signaling contact / maximum	5
number of voltage inputs / maximum	4
number of current inputs / maximum	4
product component / with RTD unit connection	Yes
Time synchronization	
type of time synchronization	SNTP, protocol
Mechanical Design	
width	74 mm
height	266 mm
depth	229 mm
design of the display	Graphic Display
product feature / plug-in terminal blocks	Yes
Environmental conditions	
ambient temperature / during operation / maximum	55 °C

Further information

Siemens is working on the renewal of the current EAC certificates.
Please contact your local Siemens office on the status of validity of the EAC certification if you intend to import or offer to supply these products to an EAC relevant market (other than the sanctioned EAEU member states Russia or Belarus).

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https://www.siemens.com/energy-automation

Industry Mall (Online ordering system)
https://mall.industry.siemens.com/mall/en/en/Catalog/product?mlfb=7SX8000-3AA50-1BA0

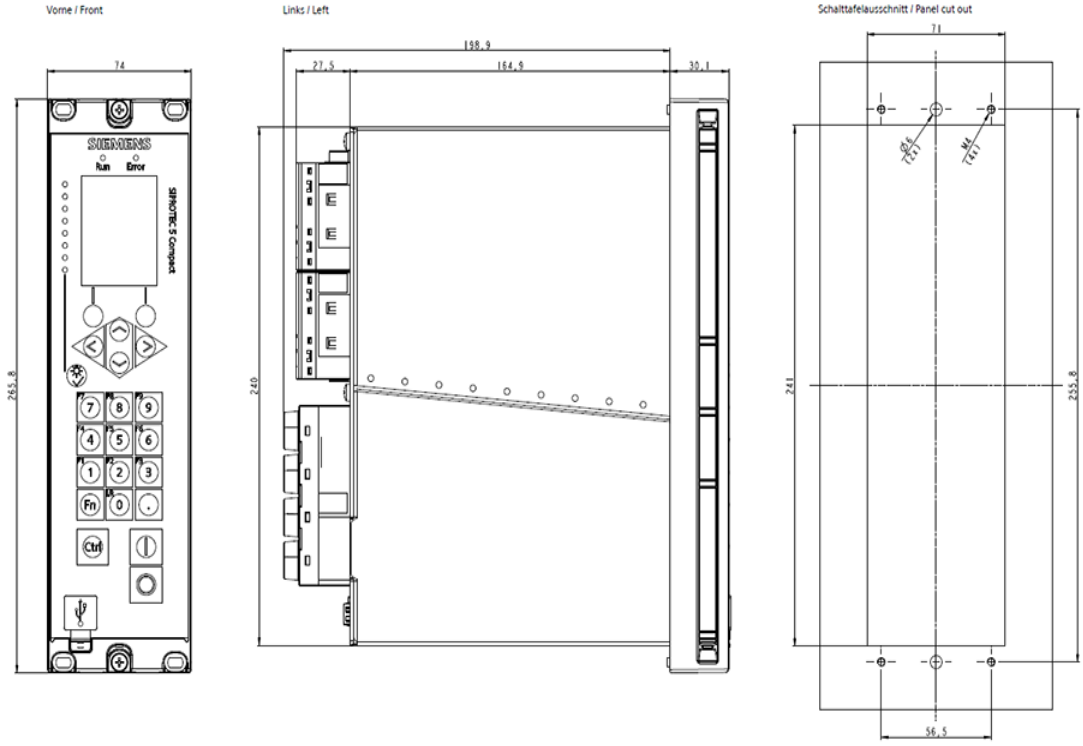
Service&Support (Manuals, Certificates, Characteristics, FAQs,...)
https://support.industry.siemens.com/cs/ww/en/ps/7SX8000-3AA50-1BA0

Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, ...)
https://www.automation.siemens.com/bilddb/cax_en.aspx?mlfb=7SX8000-3AA50-1BA0

Tender specifications
https://www.siemens.com/specifications

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