

SEL-400G-0,-1

Generator Protection Relay

Standard With C37.118 2011 Synchrophasors, Standard Protocols⁽¹⁾, SEL Grid Configurator⁽²⁾, and Configurable Labels

Part Number: **0 4 0 0 G** **X X 8**

Firmware

Standard With Differential, Overcurrent, Voltage and Frequency Protection	0
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Standard Plus Autosynchronization Control ⁽³⁾ *	1
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Conformal Coat

None	X
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Conformally Coated Circuit Boards*	2
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Power Supply

24-48 Vdc	2
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48-125 Vdc or 110-120 Vac	4
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125-250 Vdc or 110-240 Vac	6
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Connector Type

Screw Terminal Block	X
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Connectorized ⁽⁸⁾ Relay ⁽⁸⁾ *	2
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AC Input Card 1 Configuration (Current Channels S, T, U), (Voltage Channel V)

S (Three-Phase) = 5 A, T (Three-Phase) = 5 A, U (Three-Phase) = 5 A, V (Phase) = 300 V	1
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S (Three-Phase) = 1 A, T (Three-Phase) = 1 A, U (Three-Phase) = 1 A, V (Phase) = 300 V	4
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AC Input Card 2 Configuration (Current Channels W, X, Y⁽⁴⁾), (Voltage Channel Z)

W (Three-Phase) = 5 A, X (Three-Phase) = 5 A, Y (Single or Three-Phase) = 5 A, 5 A, 5 A, Z (Three-Phase) = 300 V	1
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W (Three-Phase) = 5 A, X (Three-Phase) = 5 A, Y (Single-Phase) = 5 A, 1 A, 1 A, Z (Three-Phase) = 300 V	3
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W (Three-Phase) = 5 A, X (Three-Phase) = 5 A, Y (Single or Three-Phase) = 1 A, 1 A, 1 A, Z (Three-Phase) = 300 V	4
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W (Three-Phase) = 1 A, X (Three-Phase) = 1 A, Y (Single or Three-Phase) = 1 A, 1 A, 1 A, Z (Three-Phase) = 300 V	8
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W (Three-Phase) = 5 A, X (Three-Phase) = 5 A, Y (Single or Three-Phase) = 0.2 A, 0.2 A, 0.2 A, Z (Three-Phase) = 300 V	A
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W (Three-Phase) = 1 A, X (Three-Phase) = 1 A, Y (Single or Three-Phase) = 0.2 A, 0.2 A, 0.2 A, Z (Three-Phase) = 300 V	B
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W (Three-Phase) = 5 A, X (Three-Phase) = 5 A, Y (Single-Phase) = 1 A, 1 A, 0.2 A, Z (Three-Phase) = 300 V	C
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W (Three-Phase) = 5 A, X (Three-Phase) = 5 A, Y (Single-Phase) = 5 A, 5 A, 0.2 A, Z (Three-Phase) = 300 V	D
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Ethernet Communications Protocols

None																	X	X						
FTP, Telnet, DNP3 LAN/WAN, Modbus TCP and PRP*																	B							
FTP, Telnet, and DNP3 LAN/WAN, Modbus TCP, PRP and IEC 61850*																	C							

Ethernet Connection Options (Bay 3)

None																	X	X						
Four 10/100BASE-T Connectors*																	6							
Four 100BASE-FX Connectors*																	7							
Two 10/100BASE-T and Two 100BASE-FX Connectors ⁽⁵⁾ *																	8							

Mounting

Horizontal Rack Mount																								H
Horizontal Panel Mount																								3

Chassis

8U, Up to Three I/O Boards																								8
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I/O Board Position B

8 Optoisolated Independent Level-Sensitive Inputs, 13 Standard Form A, 2 Standard Form C Outputs*																								2
8 Optoisolated Independent Level-Sensitive Inputs, 13 High-Current Interrupting Form A, 2 Standard Form C Outputs*																								7
24 Optoisolated Level-Sensitive Inputs ⁽⁶⁾ , 2 Standard and 6 High-Speed High-Current Interrupting Form A Outputs*																								4
24 Optoisolated Level-Sensitive Inputs, 8 Standard Form A Outputs*																								D
8 Optoisolated Independent Level-Sensitive Inputs, 8 High-Speed High-Current Interrupting Form A Outputs*																								8

I/O Board Position B Input Voltage

24 Vdc																								1
48 Vdc																								2
110 Vdc																								3
125 Vdc																								4
220 Vdc																								5
250 Vdc																								6

I/O Board Position C

Empty I/O Board Position																								0	X	X	X
8 Optoisolated Independent Level-Sensitive Inputs, 13 Standard Form A, 2 Standard Form C Outputs*																								2			
8 Optoisolated Independent Level-Sensitive Inputs, 13 High-Current Interrupting Form A, 2 Standard Form C Outputs*																								7			
24 Optoisolated Level-Sensitive Inputs, 2 Standard and 6 High-Speed High-Current Interrupting Form A Outputs*																								4			
24 Optoisolated Level-Sensitive Inputs, 8 Standard Form A Outputs*																								D			

8 Optoisolated Independent Level-Sensitive Inputs, 8 High-Speed High-Current Interrupting Form A Outputs*	8
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I/O Board Position C Input Voltage

24 Vdc	1
48 Vdc	2
110 Vdc	3
125 Vdc	4
220 Vdc	5
250 Vdc	6

I/O Board Position D

Empty I/O Board Position	0	X
8 Optoisolated Independent Level-Sensitive Inputs, 13 Standard Form A, 2 Standard Form C Outputs*	2	
8 Optoisolated Independent Level-Sensitive Inputs, 13 High-Current Interrupting Form A, 2 Standard Form C Outputs*	7	
24 Optoisolated Level-Sensitive Inputs, 2 Standard and 6 High-Speed High-Current Interrupting Form A Outputs*	4	
24 Optoisolated Level-Sensitive Inputs, 8 Standard Form A Outputs*	D	
8 Optoisolated Independent Level-Sensitive Inputs, 8 High-Speed High-Current Interrupting Form A Outputs*	8	

I/O Board Position D Input Voltage

24 Vdc	1
48 Vdc	2
110 Vdc	3
125 Vdc	4
220 Vdc	5
250 Vdc	6

Accessories

Literature		
	Instruction Manual for SEL-400G ⁽⁷⁾ *	P M 4 0 0 G - 0 1
Wiring Harness		
	Wiring Harness for Connectorized SEL-400G ⁽⁸⁾ *	Please see Online MOT or contact SEL REP or CSR for ordering information.

* Additional Cost

- (1) Standard Protocols: SEL ASCII, Compressed ASCII, Settings File Transfer, SEL Fast Meter, Fast Operate, Fast SER, Fast Message, Enhanced MIRRORING BITS® Communications, DNP3 Level 2 Server Plus Dial-Out and Virtual Terminal Serial protocols and Modbus TCP when equipped with Ethernet Communication.
- (2) Download SEL Grid Configurator software for free at <https://www.selinc.com/software/solutions/>.
- (3) Autosynchronization Control provides raise/lower voltage and frequency control pulse outputs.
- (4) Current Channel Y can be configured as comprised of three single-phase neutral current inputs, or as a single three-phase current input. If a three-phase current input is required, or these channels are being used for three-phase synchrophasor data, you must select an option that has all three channels at the same nominal current (options 1,4,8,A,B).
- (5) Ports 5A and 5C are dedicated as 100BASE-FX and Ports 5B and 5D are dedicated as 10/100BASE-T.
- (6) The 24 Optoisolated Inputs are comprised of 18 Common Inputs and 6 Independent Inputs.
- (7) This product comes standard with a CD manual. One complimentary printed instruction manual is available upon request with each product purchased.
- (8) Order a Connectorized® Wiring Harness for SEL-400G (harness shipped separately).

Making Electric Power Safer, More Reliable, and More Economical®

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