

Product data sheet

Specifications



pre-assembled relay, Harmony Solid State Relays, 2A, zeroVoltage switching, screw sockets, input 16...30V DC, output 24...250V AC

SSL1A12BDPV

Main

Range of product	Harmony Solid State Relays
Device short name	SSL
Network number of phases	1 phase
[Uc] control circuit voltage	16...30 V
Connections - terminals	Screw connectors
Output switching mode	Zero voltage switching

Complementary

Mounting support	Screw socket
[In] rated current	2 A
Output voltage	24...250 V AC
[Uc] control circuit voltage	16...30 V DC
CLAMPING FORCE	< 0.5 N.m 4.4 lb-in
Connections - terminals	Flexible cable with cable end,clamping capacity: 0.2...2.5 mm² (AWG 24...AWG 14) Solid cable with cable end,clamping capacity: 0.2...2.5 mm² (AWG 24...AWG 14)
Capacitance unbalance	1.5 pF input/output
Minimum switching voltage	16 V DC turn-on
Maximum switching voltage	5 V DC turn-off
Input impedance	3.43 kOhm
Solid state output type	Zero voltage switching SCR output
Load current	0.07 ...2 A
Transient Overvoltage	600 V AC
Surge current	120 A for 16.6 ms 115 A for 20 ms
Maximum voltage drop	<1.1 V on-state
Maximum I²t for fusing	285 A².s for 10 ms at 50 Hz 260 A².s for 8.3 ms at 60 Hz
Maximum leakage current	4 mA off-state
DV/dt	500 V/µs off-state at maximum voltage
Response time	0.5 cycle (turn-on) 0.5 cycle (turn-off)
Overvoltage category	III

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

Width	6.2 mm
Height	96.5 mm
Depth	79.5 mm
Product weight	0.0285 kg
Device presentation	Complete product

Environment

Flame retardance	V0 conforming to UL 94
Dielectric strength	2500 V for input/output
Pollution degree	2
Standards	IEC 60950-1 IEC 61000 IEC 62314 IEC 61984 EN 61984
Product certifications	UL CSA CE UL 508 CSA22.2 No. 14-10 GOST
Marking	CURus CSA CE EAC
IP degree of protection	IP20
Ambient air temperature for operation	-20...70 °C
Ambient air temperature for storage	-20...85 °C

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	0.500 cm
Package 1 Width	8.000 cm
Package 1 Length	9.700 cm
Package 1 Weight	28.000 g
Unit Type of Package 2	BB1
Number of Units in Package 2	30
Package 2 Height	9.200 cm
Package 2 Width	10.200 cm
Package 2 Length	20.000 cm
Package 2 Weight	897.000 g
Unit Type of Package 3	S03
Number of Units in Package 3	60
Package 3 Height	30.000 cm
Package 3 Width	30.000 cm
Package 3 Length	40.000 cm

Package 3 Weight	2.540 kg
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Contractual warranty

Warranty	18 Months
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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	
Total lifecycle Carbon footprint	11

Use Better

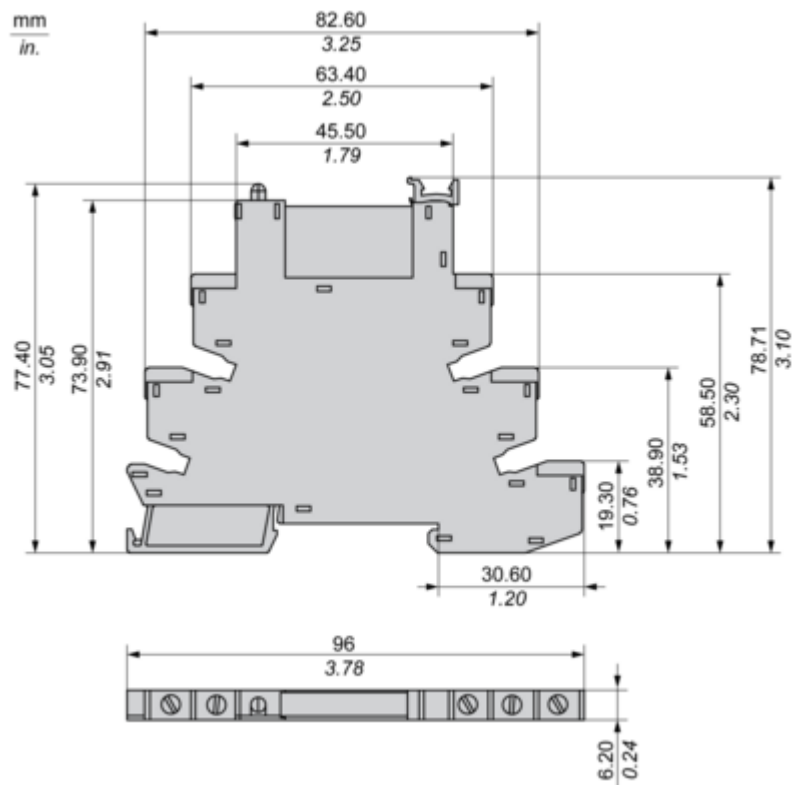
Materials and Substances	
Packaging made with recycled cardboard	Yes
Packaging without single use plastic	Yes
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope)
California proposition 65	WARNING: This product can expose you to chemicals including: Lead and lead compounds, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov

Use Again

Repack and remanufacture	
Take-back	No

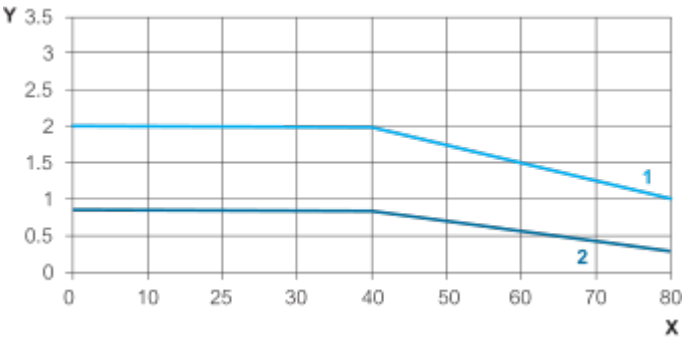
Dimensions Drawings

Dimensions



Performance Curves

Derating Curves



- X : Ambient Temperature (°C)
Y : Load Current (Amperes)
1 : Installed single unit, distance to adjacent components more than 6.2 mm
2 : Multiple units, no minimum spacing between components

Technical Illustration

Dimensions

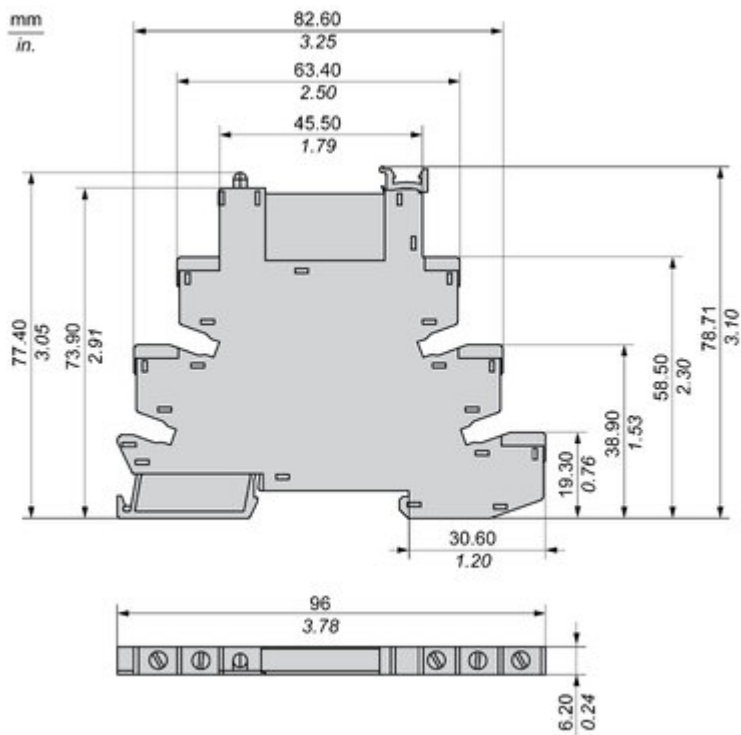
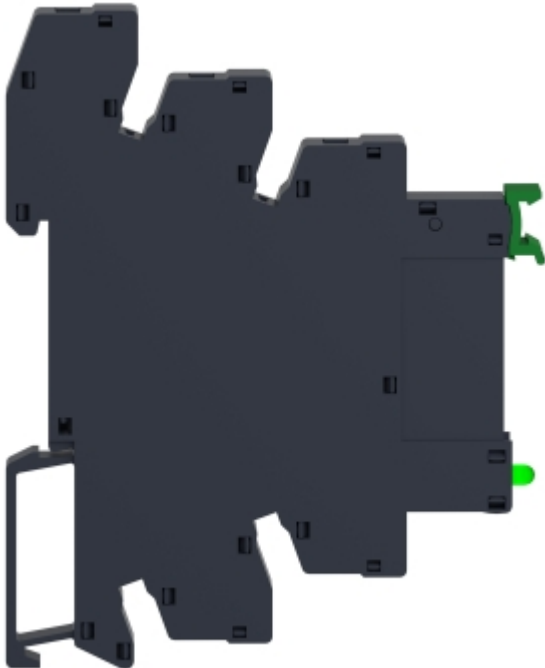
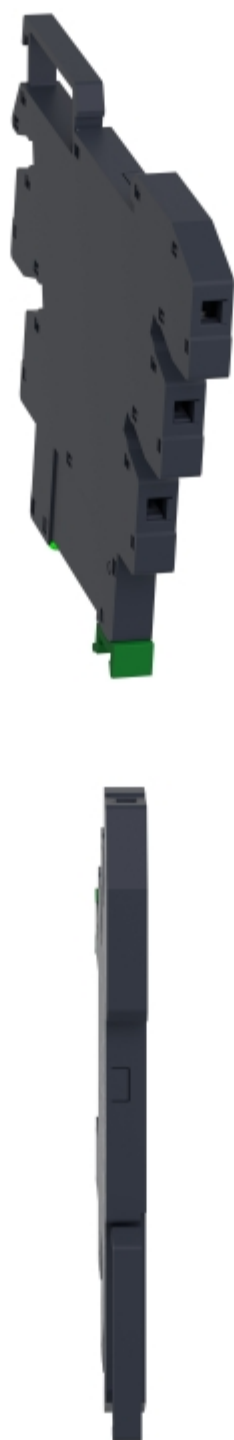


Image of product / Alternate images

Alternative





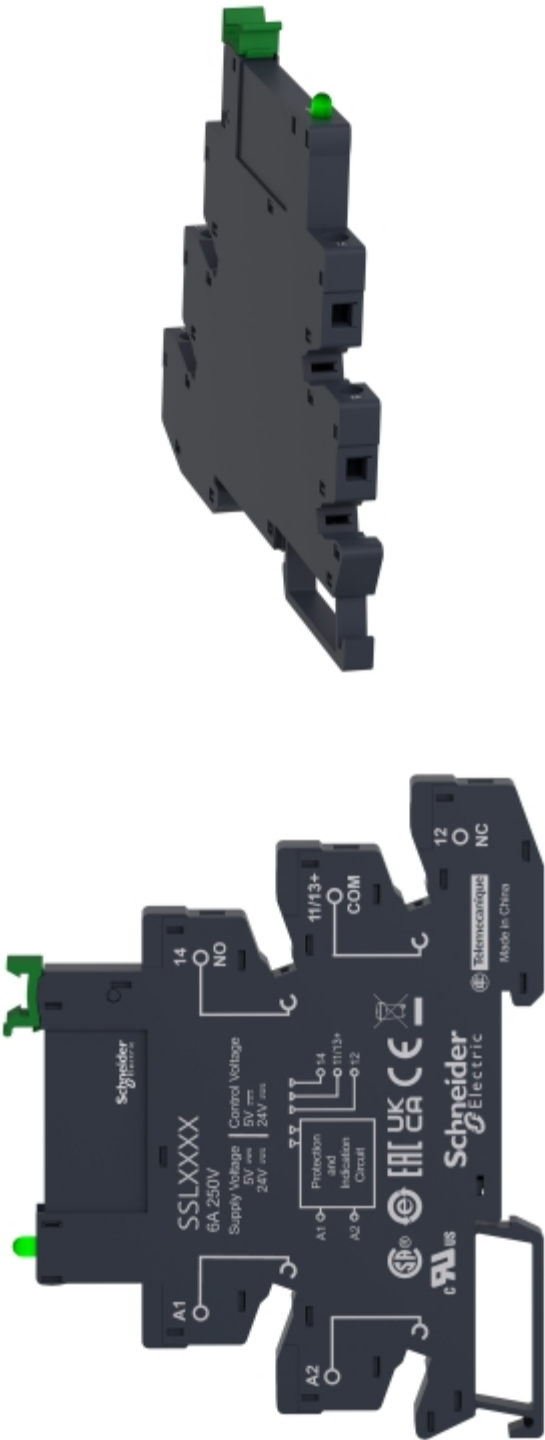


Image of product in real life situation

