

DATA SHEFT

## **DO802**

## ABB Ability™ System 800xA® hardware selector



The DO802 is an 8 channel 110 V d.c./250 V a.c. relay (NO) output module for the S800 I/O. The maximum voltage range is 250 V and the maximum continuous output current is 2 A. All outputs are individually isolated. Each output channel consists of optical isolation barrier, output state indication LED, relay driver, relay and EMC protection components.

The relay supply voltage supervision, derived from the 24 V distributed on the ModuleBus, gives a channel signal error and a module warning signal if the voltage disappears. The error signal and warning signal can be read through the ModuleBus. This supervision can be enabled/disabled with a parameter.

## **Features and benefits**

- 8 channels for 110 V d.c. / 250 V a.c. relay Normally Open (NO) outputs
- 8 isolated channels
- Process connection via detachable connectors

General info		
Article number	3BSE022364R1	
Туре	Digital Output	
Signal specification	24110 V d.c. / 250 V a.c. (max 2 A)	
Number of channels	8	
Signal type	Relay (NO)	
HART	No	
SOE	No	
Redundancy	No	
High integrity	No	
Intrinsic safety	No	
Mechanics	S800L	

Detailed data		
Isolation	Individually isolated, channel-to-channel and to circuit commor	
Maximum field cable length	600 meters (600 yards)	
Rated insulation voltage	250 V	
Dielectric test voltage	2000 V a.c.	
Power dissipation	Typ. 2.2 W	
Current consumption +5 V Modulebus	70 mA	
Current consumption +24 V Modulebus	80 mA	
Current consumption +24V external	0	
Supported wire size	Solid: 0.05-2.5 mm², 30-12 AWG Stranded: 0.05-1.5 mm², 30-12 AWG Recommended torque: 0.5-0.6 Nm Stripping length 6-7.5mm, 0.24-0.30 inch	

Diagnostics		
Front LED's	S(tatus), Channel 1-8 Status	
Supervision	24/12 V Relay power converter monitor	
Status indication of supervision	Module Error, Module Warning, Channel Error	

Environment and certification		
CE mark	Yes	
Electrical safety	EN 61010-1, UL 61010-1, EN 61010-2-201, UL 61010-2-201	
Hazardous Location	-	
Marine certification	ABS, BV, DNV, LR	
Temperature, Operating	0 to +55 °C (+32 to +131 °F), approvals are issued for +5 to +55 °C	
Temperature, Storage	-40 to +70 °C (-40 to +158 °F)	
Pollution degree	Degree 2, IEC 60664-1	
Corrosion protection	ISA-S71.04: G3	
Relative humidity	5 to 95 %, non-condensing	
Max ambient temperature	55 °C (131 °F), for vertical mounting 40 °C (104 °F)	
Protection class	IP20 according to IEC 60529	
Mechanical operating conditions	IEC/EN 61131-2	
EMC	EN 61000-6-4, EN 61000-6-2	
Overvoltage categories	IEC/EN 606641, EN 50178	
Equipment class	Class I according to IEC 61140; (earth protected)	
RoHS compliance	DIRECTIVE/2011/65/EU (EN 50581:2012)	
WEEE compliance	DIRECTIVE/2012/19/EU	

Dimensions	
Width	86.1 mm (3.4")
Depth	58.5 mm (2.3")
Height	110 mm (4.33")
Weight	0.24 kg (0.53 lbs.)



solutions.abb/800xA solutions.abb/controlsystems 800xA and Symphony Plus is a registered trademark of ABB. All rights to other trademarks reside with their respective owners.

We reserve the right to make technical changes to the products or modify the contents of this document without prior notice. With regard to purchase orders, the agreed particulars shall prevail. ABB does not assume any responsibility for any errors or incomplete information in this document.

We reserve all rights to this document and the items and images it contains. The reproduction, disclosure to third parties or the use of the content of this document – including parts thereof – are prohibited without ABB's prior written permission.

Copyright© 2024 ABB All rights reserved