MANUFACTURER DOCUMENT PACKAGE

Manufacturer's Manual

Reference package for procurement and maintenance review

ALLEN-BRADLEY

1762-OB8

8-POINT 24 V DC SOURCE OUTPUT MODULE

Used with the applicable MicroLogix 1200 configuration.

REFERENCE PACKAGE

OFFICIAL DOCUMENT

Selected official manufacturer pages follow this cover.

Source: Allen-Bradley technical documentation for 1762-OB8

MicroLogix 1762-OB8 Solid-State 24V DC Source Output Module

Catalog Number 1762-OB8

Table of Contents

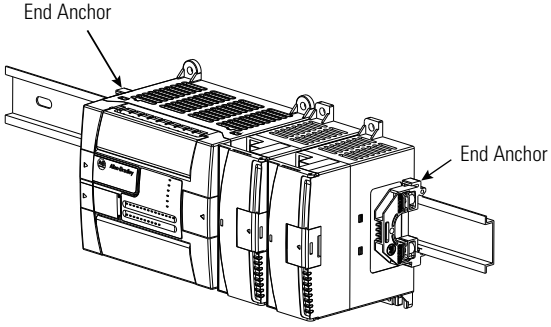
Topic	Page
Description	3
Installation	4
Mounting	5
System Assembly	7
Field Wiring Connections	8
I/O Memory Mapping	10
Specifications	11
North American Hazardous Location Approval	14

DIN Rail Mounting

The module can be mounted using the following DIN rails: 35 x 7.5 mm (EN 50 022 - 35 x 7.5) or 35 x 15 mm (EN 50 022 - 35 x 15).

Before mounting the module on a DIN rail, close the DIN rail latch. Press the DIN rail mounting area of the module against the DIN rail. The latch will momentarily open and lock into place.

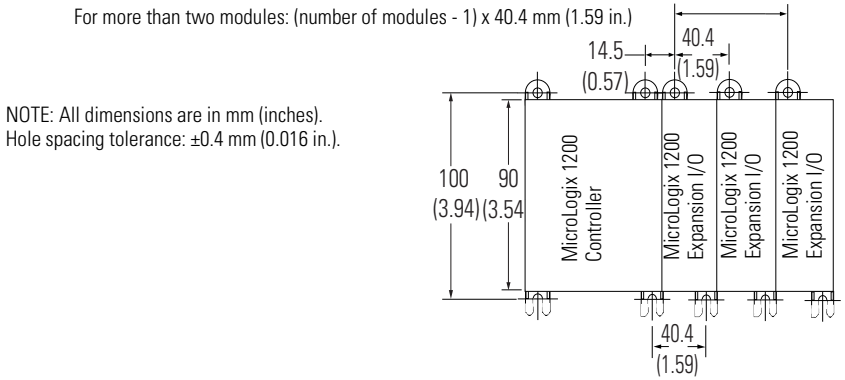
Use DIN rail end anchors (Allen-Bradley part number 1492-EA35 or 1492-EAH35) for vibration or shock environments.



TIP For environments with greater vibration and shock concerns, use the panel mounting method described below, instead of DIN rail mounting.

Panel Mounting

Use the dimensional template shown below to mount the module. The preferred mounting method is to use two M4 or #8 panhead screws per module. M3.5 or #6 panhead screws may also be used, but a washer may be needed to ensure a good mechanical contact. Mounting screws are required on every module.



NOTE: All dimensions are in mm (inches).
Hole spacing tolerance: ±0.4 mm (0.016 in.).

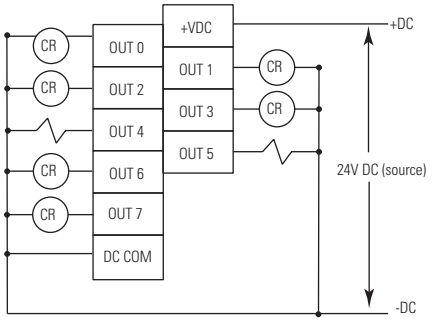
Field Wiring Connections

Grounding the Module

This product is intended to be mounted to a well-grounded mounting surface such as a metal panel. Refer to Industrial Automation Wiring and Grounding Guidelines, Allen-Bradley publication 1770-4.1, for additional information.

Output Wiring

Basic wiring of the 1762-OB8 is shown below.



A write-on label is provided with the module. Mark the identification of each terminal with permanent ink, and slide the label back into the door.

ATTENTION



Be careful when stripping wires. Wire fragments that fall into a module could cause damage when power is applied. Once wiring is complete, ensure the module is free of all metal fragments.

Output Specifications

Specification	1762-OB8
Voltage Category	24V DC
Operating Voltage Range	20.4…26.4V DC
Number of Outputs	8
Bus Current Draw (max.)	115 mA @ 5V DC (0.575W)
Heat Dissipation (max.)	1.61 Total Watts
Signal Delay (max.) – resistive load	On Delay: 0.1 ms Off Delay: 1.0ms
Off-State Leakage (max.)	1.0 mA
On-State Current (min.)	1.0 mA
On-State Volage Drop (max.)	1.0V DC
Continuous Current per Point (max.)	0.5A @ 55°C; 1.0A @ 30°C
Continuous Current per Module (max.)	4.0 A @ 55°C; 8.0 A @ 30°C
Surge Current (maximum)	2.0 A (Repeatability is once every 2 seconds for a duration of 10 msec.
Power Supply Distance Rating	6 (The module may not be more than 6 modules away from the power supply.)
Isolated Groups	Group 1: Outputs 0…7
Output Group to Backplane Isolation	Verified by one of the following dielectric tests: 1200V AC for 1 sec. or 1697V DC for 1 sec. 75V DC working voltage (IEC Class 2 reinforced insulation)
Vendor ID Code	1
Product Type Code	7
Product Code	101

Sourcing Output - Source describes the current flow between the I/O module and the field device. Sourcing output circuits supply (source) current to sinking field devices. Field devices connected to the negative side (DC Common) of the field power supply are sinking field devices. Field devices connected to the positive side (+V) of the field supply are sourcing field devices. Europe: DC sinking input and sourcing output module circuits are the commonly used options.

Typical Loading Resistor - To limit the effects of leakage current through solid-state outputs, a loading resistor can be connected in parallel with your load. Use a 5.6k Ω 1/4W resistor for transistor outputs, 24V DC operation.

Recommended Surge Suppression - Use a 1N4004 diode reverse-wired across the load for transistor outputs switching 24V DC inductive loads. For additional information, refer to Industrial Automation Wiring and Grounding Guidelines, Allen-Bradley publication 1770-4.1.